

SANTOPRENE® 8221-70

SANTOPRENE®

A soft, colorable, UV resistant thermoplastic vulcanizate (TPV) in the thermoplastic elastomer (TPE) family. This material combines good physical properties and chemical resistance for use in a wide range of applications. This grade of Santoprene® TPV is shear-dependent and can be processed on conventional thermoplastics equipment for injection molding or blow molding. It is polyolefin based and recyclable within the manufacturing stream.

Key Features

- · UL listed: file #QMFZ2.E80017, Plastics Component; file #QMFZ8.E80017, Plastics Certified For Canada Component.
- · Neutral, easy coloring formulation.
- · Used in sealing applications.

Product information

Resin Identification Part Marking Code	TPV >TPV<		ISO 1043 ISO 11469
Typical mechanical properties			
Tensile stress at 100% elongation, perpendicular Stress at break, perpendicular Elongation at break, perpendicular Shore A hardness, 15s Compression set, 70°C, 24h Compression set, 125°C, 70h		%	ISO 527-1/-2 or ISO 37 ISO 527-1/-2 or ISO 37 ISO 527-1/-2 or ISO 37 ISO 48-4 / ISO 868 ISO 815 ISO 815
Thermal properties			
RTI, electrical, 1.5mm RTI, electrical, 3.0mm RTI, strength, 1.5mm RTI, strength, 3.0mm		_	UL 746B UL 746B UL 746B UL 746B
Specific Application Suitability			
Outdoor suitability	f1		UL 746C
Flammability			
Burning Behav. at 1.5mm nom. thickn. Thickness tested UL recognition Burning Behav. at thickness h Thickness tested UL recognition	1.6 yes HB	class mm class mm	IEC 60695-11-10 IEC 60695-11-10 UL 94 IEC 60695-11-10 IEC 60695-11-10 UL 94
Electrical properties			
High Amperage Arc Ignition Category, 1.5 mm	PLC 1	class	UL 746A

Printed: 2024-05-10 Page: 1 of 2

Revised: 2024-01-23 Source: Celanese Materials Database



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Physical/Other properties

Density 950 kg/m³ ISO 1183

Injection

Drying Temperature	82	°C
Drying Time, Dehumidified Dryer	3	h
Processing Moisture Content	≤0.08	%
Max. regrind level	20	%
Min. mould temperature	24	°C
Max. mould temperature	52	°C
Back pressure	0.517	MPa

Extrusion

Melt Temperature Range 185 - 221 °C

Additional information

Processing Notes

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Desiccant drying for 3 hours at 80 °C (180 °F) is recommended. Santoprene® TPV has a wide temperature processing window from 175 to 230 °C (350 to 450 °F) and is incompatible with acetal and PVC.

Printed: 2024-05-10 Page: 2 of 2

Revised: 2024-01-23 Source: Celanese Materials Database

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