

Safron[®] (PolyPropylene)

Technical Data Sheet

H504-12M

Natural Polypropylene Homopolymer

Safron[®] H504-12M Polypropylene Resin is recommended for the spinning of staple fibre in the range 2 – 25 denier. It is also used for the manufacture of Bulk Continuous Filament (BCF) yarns.

Safron[®] H504-12M Polypropylene Resin is a medium to high flow injection moulding grade for applications where rigidity and fast cycle times are essential.

Typical Process Applications

- High tenacity yarns
- Staple fibres

End use Applications

- Needle punched floor coverings
- Tufted carpets

PROPERTIES ⁽¹⁾	VALUE	UNIT	TEST METHOD
Physical			
Melt Flow Rate, 230 °C/ 2.16 kg	12	g/10min	ISO 1133
Density	0.9	g/cm ³	ISO 1183
Mechanical ⁽²⁾			
Tensile Strength at Yield	30	MPa	ISO 527
Elongation at Yield	7.5	%	ISO 527
Flexural Modulus	1360	MPa	ISO 178
Thermal ⁽²⁾			
Heat Deflection Temperature - HDT A (1.8 MPa)	55	°C	ISO 75/A
Heat Deflection Temperature - HDT B (0.45 MPa)	83	°C	ISO 75/B
Vicat Softening Point B (50 N)	85	°C	ISO 306/B
Impact ⁽²⁾			
Charpy Notched Impact Strength (23 °C)	2.3	kJ/m ²	ISO 179

(1) Typical values; not to be construed as specification limits.

(2) Injection Moulded specimens.

Typical processing conditions	Extrusion	Injection Moulding
Zone 1 (°C)	180 - 240	180 - 200
Zone 2 (°C)	230 - 250	220 - 230
Zone 3 (°C)	240 - 270	240 - 260
Zone 4 (°C)	270	250
Nozzle (°C)	~	240
Die (°C)	240 - 260	~

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Food Contact Compliance	<p>Safron[®] H504-12M Polypropylene Resin should comply with Commission Regulation (EU) No 10/2011 and with U.S. FDA 21 CFR 177.1520(c)1.1a food contact regulations when used unmodified and processed according to good manufacturing practices for food contact applications. The purchaser remains responsible for determining whether the use complies with all relevant regulations.</p>
Customer Notice	<p>Safripol strongly encourages its customers to review both their manufacturing processes and their applications of Safripol products from the standpoint of human health and environmental quality to ensure that Safripol products are not used in ways for which they are not intended or tested. Safripol personnel are available to answer your questions and to provide reasonable technical support. Safripol product literature, including safety data sheets, should be consulted prior to use of Safripol products. Current safety data sheets are available from Safripol.</p>
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Additional Information

<p>Our contact details:</p> <p>Safripol (Pty) Ltd Private Bag X 52 Bryanston 2021 South Africa</p> <p>Website: www.safripol.com</p> <p>Published:</p>	<p>Gauteng: Tel: +27 (0) 11 575 4549</p> <p>Kwa-Zulu Natal: Tel: +27 (0) 31 450 4111</p> <p>Email: info@safripol.com</p> <p>September 2019</p>
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