PRODUCT DATA SHEET

Polypropylene

Purpolen™ PP Y55

Post-Consumer Recyclate



Description

Purpolen™ PP Y55 is a polypropylene post-consumer recyclate available in light colour (-71) supplied in pellets. This product is an ideal PP, used where sustainability and circularity matter. It is a post-consumer recyclate including a large part of recycled post-consumer waste coming from pre-sorted municipality waste. It is a part of EuCertPlast certificate according to European Standard EN15343:2007 (certificate available upon request). It is not intended for use in beverages, drinking water contact, food contact, medical, pharmaceutical or healthcare applications. Due to the nature of recyclates, some variation in colour can be observed between batches.

Homogenised 24 tonne- truckloads Pellet shape: cylindrical

Pore size of filter: 180µm

Cas No. 9003-07-0

Typical characteristics

Purpolen™ PP Y55 can be described with following typical characteristics:

Good stiffness / impact balance and low odour

Good demoulding properties

Applications

Purpolen™ PP Y55 is intended for following applications:

Injection-moulded non-food applications

Physical properties

Property	Typical value *	Unit	Test method
Density	915	kg/m³	ISO 1183
Melt flow rate (230 °C/2.16 kg)	55	g/10min	ISO 1133-1
Moisture content (105°C) ¹	<0.1	ppm	Internal Test Method
Ash content (650°C) ²	<=2%	%	ISO 1172
Tensile modulus (1 mm/min)	1200	MPa	ISO 527-2
Tensile stress at yield (50 mm/min)	24	MPa	ISO527-2
Charpy impact strength, notched (23 °C)	5.5	kJ/m²	ISO 179-1/1eA

¹ infrared

Processing techniques

This product is easy to process with standard injection moulding machines. Following parameters should be used as a guideline:

Processing setting	Typical value/range
Melt temperature ³	230 °C
Holding pressure ⁴	350 bar
Mould temperature ⁵	35 °C

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* Data should not be used for specification work





² refers to filler content

Polypropylene

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3 range: 210 - 260 °C ⁴ range: 200 - 500 bar ⁵ range: 30 - 40 °C

Injection speed: High

Shrinkage 1 - 2 %, depending on wall thickness and moulding parameters

Packaging and storage

Purpolen™ PP Y55 should be stored in dry conditions at temperatures below 50°C and protected from UV-light. Improper storage can initiate degradation, which can result in odour generation and colour changes and can have negative effects on the physical properties of this product.

Product compliance documents

Latest versions of product safety information sheets (PSIS), product safety data sheets (SDS) and other product liability documents are available in our website www.borealisgroup.com.

Sustainability aspects

Borealis is ever mindful of the impact of our products on the planet. We promote Design for Circularity (DfC) and Design for Recycling (DfR) to conserve natural resources and to reduce the environmental impact of products over their entire lifetime (including production, use phase and after phase). DfR helps ensure that material can be effectively recycled while maximizing the material performance efficiency.

Further information on sustainability and Design for Recycling (DfR) can be found from our websites www.borealisgroup.com and www.borealiseverminds.com.

Disclaimer

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