

TECHNICAL DATA SHEET

POLYPROPYLENE TIPPLEN R 359

Random copolymer for injection moulding

TIPPELIN / TIPOLEN / TIPPLEN / TATREN / BRALEN+

The joint product portfolio of MOL Petrochemicals and Slovnaft provides infinite opportunities

DESCRIPTION

TIPPLEN R 359 is a random copolymer polypropylene for injection moulding applications. The products made of this grade show high transparency and gloss. The product is formulated with a clarifying agent.

APPLICATIONS

TIPPLEN R 359 is recommended for injection moulding of household kitchen articles, containers and thin-walled packaging for cosmetics, toiletries, herbs and confectioneries, where the higher gas permeability is no problem. It is applicable for injection moulding of transparent food containers, which can be used in a microwave oven.

PRODUCT COMPLIANCE

See DDS.

PROPERTIES

Parameter	Note	Test method	Unit	Typical value
Melt Mass-Flow Rate (MFR) (230 °C /2.16 kg)	-	ISO 1133-1	g/10 min	12
Tensile Strain at Yield	(1)	ISO 527-1,2	%	13
Tensile Stress at Yield	(1)	ISO 527-1,2	MPa	28
Modulus of Elasticity in Tension	(1)	ISO 527-1,2	MPa	1050
Flexural Modulus	(1)	ISO 178	MPa	1100
Izod Impact Strength (notched, 23 °C)	(1)	ISO 180/A	kJ/m ²	6
HDT (0.45 MPa, flatwise)	(1)	ISO 75-1,2	°C	88
Rockwell Hardness	(1)	ISO 2039-2	R scale	81
Haze	(2)	ISO 14 782	%	11

Typical properties, not to be used as specification.

(1) Average mechanical property values of several measurements carried out on standard injection-moulded test specimens prepared in accordance with ISO 294-1.

(2) Measured on specimen with 1 mm wall thickness.

PROCESSING

TIPPLEN R 359 can be used in conventional injection moulding machines. Recommended processing temperatures are 185-230 °C.

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STORAGE AND HANDLING

Pellets are packed in 25 kg polyethylene bags and transported on shrink-wrapped or stretch-wrapped pallets at eligible load of polymer 1375 kg. We use adhesive between the bags in order to avoid their slipping. Pay attention to this fact during the removing of the bags from the pallets. The preferred method is to lift the bag at first without rotation. Heat treated pallets are provided by PRS, a member of the Faber Halbertma Group, operating a pooling system which collects the pallets after use, and organizes reuse as part of a sustainable, circular system. PRS pallets remain property of PRS at all times. Transportation in road silo or rail silo is also available. For more detailed information please contact a sales representative at SLOVNAFT or at MOL Petrochemicals.

Since polypropylene is a combustible substance, the fire safety rules applicable for combustible materials in warehouses and store rooms should be observed.

If polymer is stored in conditions of high humidity and fluctuating temperatures, then atmospheric moisture can condense inside the packing. If it happened, it is recommended the pellets to be dried before use. During the storage polypropylene should not be exposed to UV radiation and temperatures above 40°C. Producer does not take responsibility for any damages caused by adverse storage.

REACH STATEMENT

Polymers are exempt of REACH registration. However, their raw materials which mean monomers and relevant additives have been registered. MOL Petrochemicals is committed to fully respect legislation and will only use REACH compliant raw materials. At this point in time PP TIPPLEN does not contain any substances specifically identified as SVHC at levels greater than 0.1%.

RECYCLING

Polypropylene resins are suitable for recycling using modern recycling methods. In-house production waste should be kept clean to facilitate direct recycling.

SAFETY

See MSDS.

DISCLAIMER

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