INEOS PP R01C-01

INEOS Olefins & Polymers USA - Polypropylene Random Copolymer

Tuesday, November 5, 2019

General Information

Product Description

R01C-01 is a low melt flow rate high clarity nucleated random copolymer designed for extruded sheet and profiles, including blow molding and thermoformed packaging. End-use applications that require good see-through clarity combined with good heat resistance and refrigerator temperature impact properties can benefit from using R01C-01. This material meets the requirements of the U.S. Food and Drug Administration as specified in 21 CFR 177.1520.

General			
Material Status	• Commercial: Active		
Availability	• North America		
Additive	• Nucleating Agent		
Features	• Food Contact Acceptable • High Clarity	• Low Flow • Medium Heat Resistance	• Nucleated • Random Copolymer
Uses	• Packaging	• Profiles	• Sheet
Agency Ratings	• EC 1907/2006 (REACH)	• FDA 21 CFR 177.1520	
RoHS Compliance	• Contact Manufacturer		
Forms	• Pellets		
Processing Method	• Blow Molding • Profile Extrusion	• Sheet Extrusion • Thermoforming	

ASTM & ISO Properties [1]

Physical	Nominal Value	Unit	Test Method
Density / Specific Gravity	0.905		ASTM D792
Melt Mass-Flow Rate (230°C/2.16 kg)	1.9	g/10 min	ASTM D1238
Mechanical	**Nominal Value**	**Unit**	**Test Method**
Tensile Strength [2] (Yield, Injection Molded)	4270	psi	ASTM D638
Tensile Strength [2] (Break, Injection Molded)	2740	psi	ASTM D638
Tensile Elongation [2] (Yield, Injection Molded)	13	%	ASTM D638
Tensile Elongation [2] (Break, Injection Molded)	170	%	ASTM D638
Flexural Modulus - 1% Secant (Injection Molded)	159000	psi	ASTM D790A
Impact	**Nominal Value**	**Unit**	**Test Method**
Notched Izod Impact			ASTM D256
39°F, Injection Molded	0.50	ft·lb/in	
73°F, Injection Molded	6.4	ft·lb/in	
Notched Izod Impact (Area)			ASTM D256
39°F, Injection Molded	1.24	ft·lb/in²	
73°F, Injection Molded	15.9	ft·lb/in²	
Hardness	**Nominal Value**	**Unit**	**Test Method**
Rockwell Hardness (R-Scale, Injection Molded)	81		ASTM D785
Thermal	**Nominal Value**	**Unit**	**Test Method**
Deflection Temperature Under Load			ASTM D648
66 psi, Unannealed, Injection Molded	190	°F	
Vicat Softening Temperature	271	°F	ASTM D1525
Optical	**Nominal Value**	**Unit**	**Test Method**
Gloss (60°, Injection Molded)	97		ASTM D2457

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Optical	Nominal Value	Unit	Test Method
Haze [3] (50.0 mil)	16.0	%	ASTM D1003

Notes

[1] Typical properties: these are not to be construed as specifications.

[2] 2.0 in/min

[3] 23°C