

Technical Data Sheet

# Polyflam RPP 2000 E S CS1 GRY 64540

Polypropylene Homopolymer  
LyondellBasell Industries  
Engineering Plastics

**Product Description**

Flame-retardant PP-Compound; halogenfree according to DIN VDE 0472 part 815; for extrusion, CU-stabilized, UV-stabilized

**General**

Features	<ul style="list-style-type: none"> <li>• Flame Retardant</li> <li>• Halogen Free</li> </ul>	<ul style="list-style-type: none"> <li>• High Viscosity</li> <li>• Homopolymer</li> </ul>
Processing Method	<ul style="list-style-type: none"> <li>• Extrusion</li> </ul>	
Resin ID (ISO 1043)	<ul style="list-style-type: none"> <li>• PP FR(40)</li> </ul>	

Physical	Nominal Value (English)	Nominal Value (SI)	Test Method
Density	0.940 g/cm <sup>3</sup>	0.940 g/cm <sup>3</sup>	ISO 1183/A
Melt Volume-Flow Rate (MVR) (230°C/2.16 Kg)	2.0 cm <sup>3</sup> /10min	2.0 cm <sup>3</sup> /10min	ISO 1133

Mechanical	Nominal Value (English)	Nominal Value (SI)	Test Method
Tensile Modulus	203000 psi	1400 MPa	ISO 527-1/1A/1
Tensile Stress (Yield)	4350 psi	30.0 MPa	ISO 527-2/1A/50
Tensile Strain (Yield)	10 %	10 %	ISO 527-2/1A/50
Flexural Modulus <sup>1</sup>	189000 psi	1300 MPa	ISO 178
Flexural Stress <sup>1</sup>			ISO 178
7.0% Strain	5800 psi	40.0 MPa	
3.5% Strain	4350 psi	30.0 MPa	

Impact	Nominal Value (English)	Nominal Value (SI)	Test Method
Charpy Notched Impact Strength (73°F (23°C))	5.7 ft·lb/in <sup>2</sup>	12 kJ/m <sup>2</sup>	ISO 179/1eA
Charpy Unnotched Impact Strength 73°F (23°C)	No Break	No Break	ISO 179/1eU

Thermal	Nominal Value (English)	Nominal Value (SI)	Test Method
Deflection Temperature Under Load			
66 Psi (0.45 Mpa), Unannealed	194 °F	90.0 °C	ISO 75-2/Bf
264 Psi (1.8 Mpa), Unannealed	113 °F	45.0 °C	ISO 75-2/af
Vicat Softening Temperature			
--	176 °F	80.0 °C	ISO 306/B50
--	302 °F	150 °C	ISO 306/A50

Electrical	Nominal Value (English)	Nominal Value (SI)	Test Method
Comparative Tracking Index	600 V	600 V	IEC 60112

Flammability	Nominal Value (English)	Nominal Value (SI)	Test Method
Flame Rating			
0.031 In (0.8 Mm)	V-2	V-2	UL 94
0.06 In (1.6 Mm)	V-2	V-2	UL 94 IEC 60695-11-10, -20
0.13 In (3.2 Mm)	V-2	V-2	UL 94 IEC 60695-11-10, -20
0.03 In (0.8 Mm)	V-2	V-2	IEC 60695-11-10, -20
Glow Wire Flammability Index			IEC 60695-2-12
0.030 In (0.75 Mm)	1760 °F	960 °C	
0.06 In (1.5 Mm)	1760 °F	960 °C	
0.12 In (3.0 Mm)	1760 °F	960 °C	



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Flammability	Nominal Value (English)	Nominal Value (SI)	Test Method
Glow Wire Ignition Temperature			IEC 60695-2-13
0.030 In (0.75 Mm)	1380 °F	750 °C	
0.06 In (1.5 Mm)	1380 °F	750 °C	
0.12 In (3.0 Mm)	1380 °F	750 °C	
Oxygen Index	30 %	30 %	ISO 4589-2

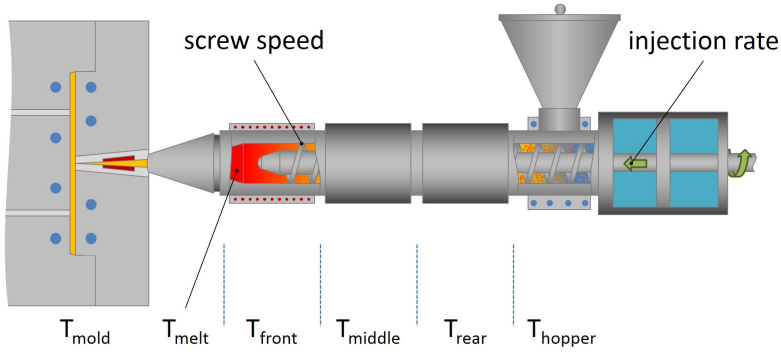
**Additional Information**

- 1.) Not for use in food contact applications
- 2.) Not for use in medical or pharmaceutical applications

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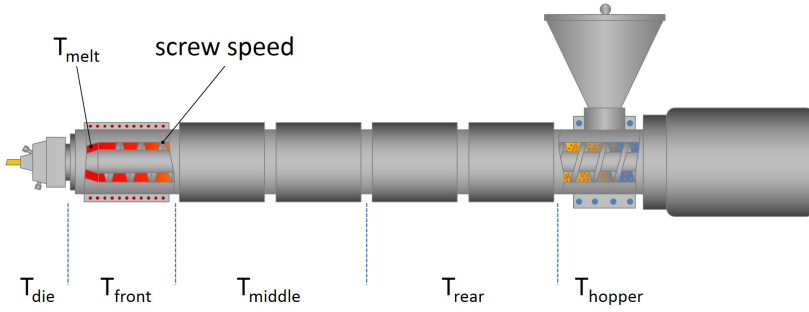


Injection	Nominal Value (English)	Nominal Value (SI)
Drying Temperature	158 to 176 °F	70 to 80 °C
Drying Time	2.0 to 4.0 hr	2.0 to 4.0 hr

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Extrusion	Nominal Value (English)	Nominal Value (SI)
Drying Temperature	158 to 176 °F	70 to 80 °C
Drying Time	2.0 to 4.0 hr	2.0 to 4.0 hr
Suggested Max Moisture	< 0.10 %	< 0.10 %
Melt Temperature	338 to 410 °F	170 to 210 °C