

Technical Data Sheet

CirculenRecover 330 PA6 MV HI 8001



Polyamide 6

Product Description

Unfilled, Medium viscosity, impact modified Polyamide 6 formulated on mechanical recycled sourcing. Standard color is black, color matching for dark colors possible.

Automotive structural applications are possible.

Sustainability:

According with the requirements of Standard ISO 14021:2016, *CirculenRecover 320 PA6 MT30 8001* contains **30% of recycled material that is fully based on pre-consumer waste.**

Recycled content according to DIN SPEC 91446:2021-12: R25

Data Quality Level according to DIN SPEC 91446:2021-12: DQL4

Data Quality Level according to VDA 284: DQL Automotive

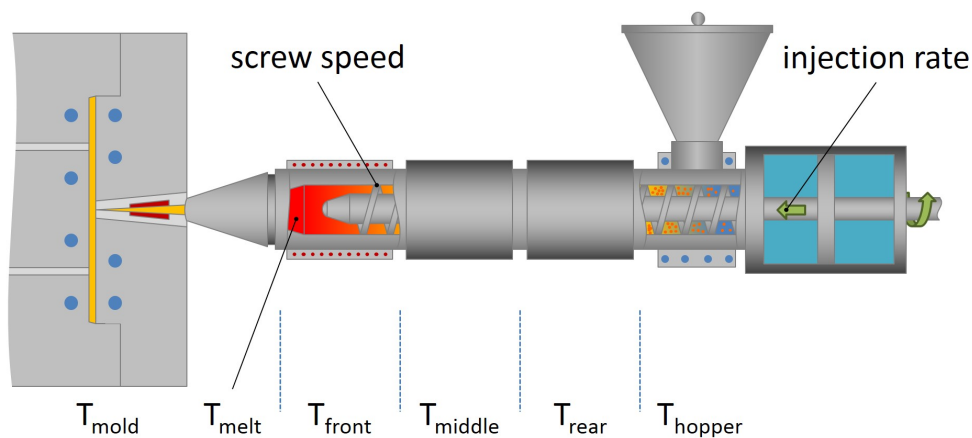
Regulatory Status

For regulatory compliance information, see *CirculenRecover 330 PA6 MV HI 8001* [Product Stewardship Bulletin \(PSB\)](#) and [Safety Data Sheet \(SDS\)](#).

Status	Commercial: Active
Availability	Europe
Processing Method	Injection Molding
Attribute	High Impact Resistance; Low Temperature Toughness; Medium Viscosity
Resin ID	PA6-I

Typical Properties	Nominal Value	Units	Test Method
Physical			
Density, (Method A)	1.11	g/cm ³	ISO 1183
Mechanical			
Tensile Stress at Yield			
(Type 1A, 50 mm/min)	60.0	MPa	ISO 527-2
(Type 1A, 50 mm/min) - Conditioned	35.0	MPa	ISO 527-2
Nominal Tensile Strain at Break			
(50 mm/min, Type 1A) - Conditioned	>100	%	ISO 527-2
(50 mm/min, Type 1A)	>50	%	ISO 527-2
Tensile Strain at Yield			
(Type 1A, 50 mm/min)	4.2	%	ISO 527-2
(Type 1A, 50 mm/min) - Conditioned	20	%	ISO 527-2
Tensile Modulus			
(1 mm/min, Type 1A)	2200	MPa	ISO 527-1
(1 mm/min, Type 1A) - Conditioned	800	MPa	ISO 527-1
Impact			
Charpy Impact Strength - Notched			
(23 °C, Type 1, Edgewise, Notch A)	16	kJ/m ²	ISO 179
(-30 °C, Type 1, Edgewise, Notch A)	10	kJ/m ²	ISO 179
(23 °C, Type 1, Edgewise, Notch A) - Conditioned	60	kJ/m ²	ISO 179

Charpy Impact Strength - Unnotched			
(23 °C, Type 1, Edgewise)	No Break		ISO 179
(-30 °C, Type 1, Edgewise)	No Break		ISO 179
(23 °C, Type 1, Edgewise) - Conditioned	No Break		ISO 179
Hardness			
Ball Indentation Hardness			
(H 358/30)	110 MPa		ISO 2039-1
(H 358/30) - Conditioned	60.0 MPa		ISO 2039-1
Thermal			
Vicat Softening Temperature			
(B (50N), 50 °C/h)	175 °C		ISO 306
(A (10N), 50 °C/h)	215 °C		ISO 306
Deflection Temperature Under Load Unannealed (0.45 MPa), (Flatwise)	140 °C		ISO 75-2/B
Deflection Temperature Under Load Unannealed (1.80 MPa), (Flatwise)	60.0 °C		ISO 75-2/A
RTI Elec			
(1.5 mm)	65.0 °C		UL 746B
(3.0 mm)	65.0 °C		UL 746B
RTI Imp			
(1.5 mm)	65.0 °C		UL 746B
(3.0 mm)	65.0 °C		UL 746B
RTI Str			
(1.5 mm)	65.0 °C		UL 746B
(3.0 mm)	65.0 °C		UL 746B
Electrical			
Volume Resistivity	>1.0E+13 ohm*m		IEC 62631-3-1
- Conditioned	>1.0E+10 ohm*m		IEC 62631-3-1
Comparative Tracking Index (CTI)	600 V		IEC 60112
Surface Resistivity	>1.0E+15 ohm		IEC 60093
- Conditioned	>1.0E+12 ohm		IEC 60093
Flammable			
Burning Rate			
(2.00 mm)	<100 mm/min		FMVSS 302
(2.00 mm)	<100 mm/min		ISO 3795
Glow Wire Flammability Index			
(1.5 mm)	650 °C		IEC 60695-2-12
(3.0 mm)	650 °C		IEC 60695-2-12
Additional Information			
Water Absorption 23C/50RH	2.3 %		ISO 62
UL Information			
Flammability Classification			
(0.75 mm)	HB		IEC 60695-11-10, -20
(1.5 mm)	HB		IEC 60695-11-10, -20
(3.0 mm)	HB		IEC 60695-11-10, -20
UL File Number	E86615		



Injection Parameters	Nominal Value	Units
Drying Time	3.0 to 4.0	hr
Drying Temperature	80	°C
Suggested Max Moisture	0.040 to 0.10	%
Processing (Melt) Temp	250 to 270	°C
Mold Temperature	60 to 90	°C

Notes

These are typical property values not to be construed as specification limits.

Processing Techniques

Specific recommendations for resin type and processing conditions can only be made when the end use, required properties and fabrication equipment are known.

Company Information

For further information regarding the LyondellBasell company, please visit <http://www.lyb.com/>.

© LyondellBasell Industries Holdings, B.V. 2018

Disclaimer

Information in this document is accurate to the best of our knowledge at the date of publication. The document is designed to provide users general information for safe handling, use, processing, storage, transportation, disposal and release and does not constitute any warranty or quality specification, either express or implied, including any warranty of merchantability or fitness for any particular purpose. Users shall determine whether the product is suitable for their use and can be used safely and legally.

In addition to any prohibitions of use specifically noted in this document, LyondellBasell may further prohibit or restrict the sale of its products into certain applications. For further information, please contact a LyondellBasell representative.

Trademarks

The Trademark referenced within the product name is owned or used by the LyondellBasell family of companies.