

NORYL GTX™ RESIN GTX8120P

REGION AMERICAS

DESCRIPTION

NORYL GTX8120P resin is a 20% glass fiber reinforced alloy of Polyphenylene Ether (PPE) + Polyamide (PA). This extrudable grade has excellent chemical resistance and high heat resistance. . NORYL GTX8120P resin is anodizable, has low thermal conductivity and is an excellent candidate for extruded thermal break applications.

GENERAL INFORMATION	
Features	Chemical Resistance, Hydrolytic Stability, Low Warpage, Low Moisture Absorption, Low Specific Gravity, Dimensional stability, High stiffness/Strength, High temperature resistance
Fillers	Glass Fiber
Polymer Types	Polyphenylene Ether + PA (PPE+Nylon)
Processing Techniques	Extrusion

INDUSTRY	SUB INDUSTRY
Building and Construction	Building Component

TYPICAL PROPERTY VALUES

Revision 20231109

PROPERTIES	TYPICAL VALUES	UNITS	TEST METHODS
MECHANICAL ⁽¹⁾			
Tensile Stress, yield, 5 mm/min	125	MPa	ISO 527
Tensile Stress, break, 5 mm/min	125	MPa	ISO 527
Tensile Strain, yield, 5 mm/min	3	%	ISO 527
Tensile Strain, break, 5 mm/min	3.5	%	ISO 527
Tensile Modulus, 1 mm/min	6800	MPa	ISO 527
Flexural Stress, yield, 2 mm/min	175	MPa	ISO 178
Flexural Modulus, 2 mm/min	5000	MPa	ISO 178
IMPACT ⁽¹⁾			
Izod Impact, notched 80*10*4 +23°C	7	kJ/m ²	ISO 180/1A
Izod Impact, notched 80*10*4 -30°C	6	kJ/m ²	ISO 180/1A
Charpy 23°C, V-notch Edgew 80*10*4 sp=62mm	8	kJ/m ²	ISO 179/1eA
THERMAL ⁽¹⁾			
CTE, 23°C to 60°C, flow	3.5E-05	1/°C	ISO 11359-2
CTE, 23°C to 60°C, xflow	7.5E-05	1/°C	ISO 11359-2
Vicat Softening Temp, Rate B/50	235	°C	ISO 306
Vicat Softening Temp, Rate B/120	235	°C	ISO 306
HDT/Bf, 0.45 MPa Flatw 80*10*4 sp=64mm	240	°C	ISO 75/Bf
PHYSICAL ⁽¹⁾			
Density	1.24	g/cm ³	ISO 1183
Water Absorption, (23°C/saturated)	2.5	%	ISO 62-1
Moisture Absorption (23°C / 50% RH)	1	%	ISO 62
Melt Volume Rate, MVR at 280°C/10.0 kg	12	cm ³ /10 min	ISO 1133

PROPERTIES	TYPICAL VALUES	UNITS	TEST METHODS
PROFILE EXTRUSION			
Drying Temperature	110 – 120	°C	
Drying Time	2 – 4	Hrs	
Melt Temperature	270 – 280	°C	
Calibrator Temperature	20 – 100	°C	

(1) The information stated on Technical Datasheets should be used as indicative only for material selection purposes and not be utilized as specification or used for part or tool design.

DISCLAIMER

Any sale by SABIC, its subsidiaries and affiliates (each a "seller"), is made exclusively under seller's standard conditions of sale (available upon request) unless agreed otherwise in writing and signed on behalf of the seller. While the information contained herein is given in good faith, SELLER MAKES NO WARRANTY, EXPRESS OR IMPLIED, INCLUDING MERCHANTABILITY AND NONINFRINGEMENT OF INTELLECTUAL PROPERTY, NOR ASSUMES ANY LIABILITY, DIRECT OR INDIRECT, WITH RESPECT TO THE PERFORMANCE, SUITABILITY OR FITNESS FOR INTENDED USE OR PURPOSE OF THESE PRODUCTS IN ANY APPLICATION. Each customer must determine the suitability of seller materials for the customer's particular use through appropriate testing and analysis. No statement by seller concerning a possible use of any product, service or design is intended, or should be construed, to grant any license under any patent or other intellectual property right.