

AuroraGuard™ TPO20MF2003

 Aurora Material Solutions, LLC - *Compounded Polypropylene*
General Information
Product Description

20% Mineral reinforced TPO with up to 100% sustainable feedstock

Formerly known as Evolve TPO20MF2003

General

Material Status	• Commercial: Active		
Availability	• Africa & Middle East	• Europe	• North America
	• Asia Pacific	• Latin America	
Filler / Reinforcement	• Mineral, 20% Filler by Weight		
Features	• Renewable Resource Content		
Uses	• Automotive Applications	• Lawn & Garden Equipment	• Material Handling
Appearance	• Black		
Processing Method	• Injection Molding		

Properties ¹

Physical	Nominal Value	Unit	Test Method
Density / Specific Gravity	1.04		ASTM D792
Melt Mass-Flow Rate (MFR) (230°C/2.16 kg)	20	g/10 min	ASTM D1238
Mechanical	Nominal Value	Unit	Test Method
Tensile Strength (73°F)	2000	psi	ASTM D638
Tensile Elongation (Yield, 73°F)	4.0	%	ASTM D638
Flexural Modulus - Tangent (73°F)	220000	psi	ASTM D790
Impact	Nominal Value	Unit	Test Method
Notched Izod Impact (73°F)	33	ft-lb/in	ASTM D256
Thermal	Nominal Value	Unit	Test Method
Deflection Temperature Under Load (66 psi, Unannealed)	180	°F	ASTM D648

Processing Information

Injection	Nominal Value	Unit
Drying Temperature	170	°F
Drying Time	2.0	hr
Suggested Max Moisture	0.20	%
Suggested Shot Size	25 to 75	%
Rear Temperature	350 to 400	°F
Middle Temperature	360 to 410	°F
Front Temperature	370 to 420	°F
Nozzle Temperature	370 to 420	°F
Processing (Melt) Temp	380 to 420	°F
Mold Temperature	90 to 160	°F
Injection Rate	Slow-Moderate	
Back Pressure	25.0 to 100	psi
Vent Depth	1.0E-3 to 1.5E-3	in

