

AuroraTec™ 396-(a)

Aurora Material Solutions, LLC - Polycarbonate + PBT

General Information
Product Description

Injection Molding Grade, Non-Halogenated/Non-Brominated Flame Retardant, Impact Modified, UV Stabilized, w/Mold Release. UL94 Flame Rated, Product. REACH and RoHS Compliant.

Note: 396-(a) Denotes UL Recognizes the (a) to Represent a 4 or 5 Digit Number Indicating Natural, Black or Custom Color.

Formerly known as ENVIRON® 396-(a)

General

Material Status	• Commercial: Active		
Availability	• Africa & Middle East • Asia Pacific	• Europe • Latin America	• North America
Additive	• Flame Retardant • Impact Modifier		
Features	• Bromine Free • Flame Retardant	• Good Mold Release • Halogen Free	• Impact Modified • UV Stabilized
Uses	• Electrical/Electronic Applications • Outdoor Applications		
Agency Ratings	• EC 1907/2006 (REACH)		
RoHS Compliance	• RoHS Compliant		
UL File Number	• E.192776		
Appearance	• Black	• Colors Available	• Natural Color
Processing Method	• Injection Molding		

Properties ¹

Physical	Nominal Value	Unit	Test Method
Density / Specific Gravity	1.22		ASTM D792
Melt Mass-Flow Rate (MFR) (250°C/5.0 kg)	36	g/10 min	ASTM D1238
Molding Shrinkage - Flow (0.125 in)	7.0E-3 to 0.011	in/in	ASTM D955
Mechanical	Nominal Value	Unit	Test Method
Tensile Strength (Yield)	8600	psi	ASTM D638
Tensile Elongation (Break)	90	%	ASTM D638
Flexural Modulus	330000	psi	ASTM D790
Flexural Strength	12200	psi	ASTM D790
Impact	Nominal Value	Unit	Test Method
Notched Izod Impact (73°F)	12	ft·lb/in	ASTM D256
Gardner Impact (73°F)	440	in·lb	ASTM D5420
Thermal	Nominal Value	Unit	Test Method
Deflection Temperature Under Load (264 psi, Unannealed, 0.125 in)	140	°F	ASTM D648
RTI Elec			UL 746B
0.06 in	176	°F	
0.12 in	176	°F	
RTI Imp			UL 746B
0.06 in	176	°F	
0.12 in	176	°F	
RTI Str			UL 746B
0.06 in	176	°F	
0.12 in	176	°F	
Flammability	Nominal Value	Unit	Test Method
Flame Rating			UL 94
0.06 in	V-0		



0.12 in

• V-0
• 5VA

Processing Information

Injection	Nominal Value	Unit
Drying Temperature	180	°F
Drying Time	3.0 to 4.0	hr
Suggested Max Moisture	0.020	%
Rear Temperature	410 to 450	°F
Middle Temperature	410 to 450	°F
Front Temperature	430 to 460	°F
Nozzle Temperature	430 to 460	°F
Mold Temperature	100 to 140	°F
Injection Rate	Moderate-Fast	
Back Pressure	50.0 to 100	psi
Screw Speed	50 to 80	rpm

Notes

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

