

Solvay Specialty Polymers Amodel® AFA-6145 V0 Z Polyphthalamide (PPA), 45% Glass Fiber

Category : Polymer , Thermoplastic , Polyphthalamide (PPA) , Polyphthalamide (PPA), 50% Glass Fiber Reinforced

Material Notes:

Amodel® AFA-6145 V0 Z is a 45% glass-fiber reinforced, flame retardant grade of polyphthalamide (PPA) resin specifically formulated for connector applications requiring compatibility with both infrared and vapor phase soldering operations typically used by the electronics industry. Features: Flame Retardant; Good Chemical Resistance; Good Dimensional Stability; Good Electrical Properties; Good Stiffness; High Flow; High Strength; Hot Water Moldability. Uses: Automotive Applications; Automotive Electronics; Automotive Under the Hood; Cell Phones; Connectors; Housings; Industrial Applications; Industrial Parts. Injection Molding Notes: Amodel® compounds are shipped in moisture-resistant packages at moisture levels according to specifications. Sealed, undamaged bags should be preferably stored in a dry room at a maximum temperature of 50°C (122°F) and should be protected from possible damage. If only a portion of a package is used, the remaining material should be transferred into a sealable container. It is recommended that Amodel® resins be dried prior to molding. Automotive Specifications ASTM D6779 PA104G45. Information provided by Solvay Specialty Polymers.

Order this product through the following link:

http://www.lookpolymers.com/polymer_Solvay-Specialty-Polymers-Amodel-AFA-6145-V0-Z-Polyphthalamide-PPA-45-Glass-Fiber.php

Physical Properties	Metric	English	Comments
Density	1.80 g/cc	0.0650 lb/in ³	ISO 1183
Filler Content	45 %	45 %	Glass Fiber
Linear Mold Shrinkage, Flow	0.0020 cm/cm	0.0020 in/in	
Linear Mold Shrinkage, Transverse	0.0040 cm/cm	0.0040 in/in	ASTM D955

Mechanical Properties	Metric	English	Comments
Tensile Strength at Break	193 MPa	28000 psi	ASTM D638
Elongation at Break	1.5 %	1.5 %	ASTM D638
Flexural Strength	276 MPa	40000 psi	ASTM D790
Flexural Modulus	15.5 GPa	2250 ksi	ASTM D790
Izod Impact, Notched	1.10 J/cm	2.06 ft-lb/in	ASTM D256

Thermal Properties	Metric	English	Comments
Melting Point	310 °C	590 °F	ASTM D3418
Deflection Temperature at 1.8 MPa (264 psi)	277 °C	531 °F	Unannealed; ASTM D648
Flammability, UL94	V-0	V-0	

Thermal Properties	@Thickness 0.794 mm Metric	@Thickness 0.0313 in English	Comments
Electrical Properties	Metric	English	Comments
Volume Resistivity	1.00e+15 ohm-cm	1.00e+15 ohm-cm	ASTM D257
Surface Resistance	1.00e+13 ohm	1.00e+13 ohm	ASTM D257
Dielectric Constant	4.1	4.1	ASTM D150
	@Frequency 1.00e+6 Hz	@Frequency 1.00e+6 Hz	
Dielectric Strength	23.0 kV/mm	584 kV/in	ASTM D149
	@Thickness 1.59 mm	@Thickness 0.0626 in	
Dissipation Factor	0.011	0.011	ASTM D150
	@Frequency 1.00e+6 Hz	@Frequency 1.00e+6 Hz	
Comparative Tracking Index	400 - 600 V	400 - 600 V	PLC 1; UL 746
Hot Wire Ignition, HWI	>= 120 sec	>= 120 sec	UL 746
High Amp Arc Ignition, HAI	60 - 120 arcs	60 - 120 arcs	UL 746

Processing Properties	Metric	English	Comments
Rear Barrel Temperature	316 - 324 Â°C	601 - 615 Â°F	
Front Barrel Temperature	327 - 332 Â°C	621 - 630 Â°F	
Melt Temperature	321 - 338 Â°C	610 - 640 Â°F	
Mold Temperature	65.6 - 93.3 Â°C	150 - 200 Â°F	
Drying Temperature	120 Â°C	248 Â°F	
	@Time 14400 sec	@Time 4.00 hour	
Moisture Content	<= 0.045 %	<= 0.045 %	

Descriptive Properties	Value	Comments
Additive	Flame Retardant	
Availability	Africa & Middle East	
	Asia Pacific	
	Europe	
	Latin America	

Descriptive Properties	Value America	Comments
Color	Black; Natural	
Form	Pellets	
Injection Rate	Fast	
Processing Technique	Water-Heated Mold Injection Molding	
RoHS Compliance	RoHS Compliant	

Contact Songhan Plastic Technology Co.,Ltd.

Website : www.lookpolymers.com
Email : sales@lookpolymers.com
Tel : +86 021-51131842
Mobile : +86 13061808058
Skype : lookpolymers
Address : United North Road 215,Fengxian District, Shanghai City,China