

**Arnite® AV2 360 S**

Envalior - Polyethylene Terephthalate

## General Information

**Product Description**

33% Glass Fiber Reinforced, Flame Retardant

**General**

Material Status	• Commercial: Active
Availability	• Africa & Middle East • Europe • North America • Asia Pacific • Latin America
Filler / Reinforcement	• Glass Fiber, 33% Filler by Weight
Features	• Flame Retardant
Processing Method	• Injection Molding
Resin ID	• PET-GF33 FR(17)

 Properties <sup>1</sup>

Physical	Nominal Value	Unit	Test Method
Density	1.73	g/cm <sup>3</sup>	ISO 1183
Molding Shrinkage			ISO 294-4
Across Flow	1.0	%	
Flow	0.50	%	
Water Absorption (Saturation, 73°F)	0.40	%	ISO 62
Water Absorption (Equilibrium, 73°F, 50% RH)	0.12	%	ISO 62
Mechanical	Nominal Value	Unit	Test Method
Tensile Modulus	1.89E+6	psi	ISO 527-1
Tensile Stress (Break)	23200	psi	ISO 527-2
Tensile Strain (Break)	2.0	%	ISO 527-2
Impact	Nominal Value	Unit	Test Method
Charpy Notched Impact Strength			ISO 179/1eA
-22°F	3.8	ft·lb/in <sup>2</sup>	
73°F	3.8	ft·lb/in <sup>2</sup>	
Charpy Unnotched Impact Strength			ISO 179/1eU
-22°F	17	ft·lb/in <sup>2</sup>	
73°F	17	ft·lb/in <sup>2</sup>	
Thermal	Nominal Value	Unit	Test Method
Deflection Temperature Under Load (66 psi, Unannealed)	464	°F	ISO 75-2/B
Deflection Temperature Under Load (264 psi, Unannealed)	428	°F	ISO 75-2/A
Melting Temperature <sup>2</sup>	491	°F	ISO 11357-3
CLTE - Flow	1.1E-5	in/in/°F	ISO 11359-2
CLTE - Transverse	3.6E-5	in/in/°F	ISO 11359-2
RTI Elec (0.028 in)	302	°F	UL 746B
RTI Imp			UL 746B
0.030 in	257	°F	
0.06 in	266	°F	
RTI Str (0.030 in)	284	°F	UL 746B
Effective Thermal Diffusivity	1.34E-4	in <sup>2</sup> /s	
Electrical	Nominal Value	Unit	Test Method
Volume Resistivity	> 1.0E+13	ohms·m	IEC 62631-3-1
Electric Strength	740	V/mil	IEC 60243-1
Relative Permittivity			IEC 62631-2-1
100 Hz	3.70		



1 MHz	3.40	
Dissipation Factor		IEC 62631-2-1
100 Hz	1.0E-3	
1 MHz	0.012	
Comparative Tracking Index	225 V	IEC 60112
<b>Flammability</b>	<b>Nominal Value Unit</b>	<b>Test Method</b>
Flame Rating		UL 94
0.06 in	V-0	
0.12 in	V-0	
Flammability Classification		IEC 60695-11-10, -20
0.06 in	V-0	
0.12 in	V-0	
0.030 in	V-2	
Oxygen Index	36 %	ISO 4589-2
<b>Fill Analysis</b>	<b>Nominal Value Unit</b>	<b>Test Method</b>
Melt Density	1.35 g/cm <sup>3</sup>	
Melt Specific Heat	0.399 Btu/lb/°F	
Melt Thermal Conductivity	1.4 Btu·in/hr/ft <sup>2</sup> /°F	ASTM E1461

#### Notes

<sup>1</sup> Typical properties: these are not to be construed as specifications.

<sup>2</sup> 10°C/min

