

DELTRIN 100T BK602

Delrin USA, LLC - Acetal (POM) Homopolymer

General Information

General			
Material Status	• Commercial: Active		
Availability	• Africa & Middle East • Asia Pacific	• Europe • Latin America	• North America
Additive	• Impact Modifier • Mold Release		
Features	• Good Impact Resistance • Good Mold Release	• High Toughness • High Viscosity	• Homopolymer • Impact Modified
RoHS Compliance	• Contact Manufacturer		
Part Marking Code (ISO 11469)	• >POM-I<		
Resin ID (ISO 1043)	• POM-I		

Properties ¹

Physical	Nominal Value	Unit	Test Method
Density	1.37	g/cm ³	ISO 1183
Melt Mass-Flow Rate (MFR) (190°C/2.16 kg)	2.0	g/10 min	ISO 1133
Melt Volume-Flow Rate (MVR) (190°C/2.16 kg)	1.7	cm ³ /10min	ISO 1133
Molding Shrinkage			ISO 294-4
Across Flow	1.5	%	
Flow	1.3	%	
Mechanical	Nominal Value	Unit	Test Method
Tensile Modulus	276000	psi	ISO 527-1
Tensile Stress (Yield)	7830	psi	ISO 527-2
Tensile Strain (Yield)	27	%	ISO 527-2
Nominal Tensile Strain at Break	> 50	%	ISO 527-2
Poisson's Ratio	0.41		
Impact	Nominal Value	Unit	Test Method
Charpy Notched Impact Strength			ISO 179/1eA
-22°F	5.2	ft-lb/in ²	
73°F	11	ft-lb/in ²	
Thermal	Nominal Value	Unit	Test Method
Deflection Temperature Under Load (264 psi, Unannealed)	160	°F	ISO 75-2/A
Melting Temperature ²	352	°F	ISO 11357-3
RTI Elec			UL 746B
0.06 in	212	°F	
0.12 in	212	°F	
RTI Imp			UL 746B
0.06 in	185	°F	
0.12 in	185	°F	
RTI Str			UL 746B
0.06 in	185	°F	
0.12 in	185	°F	
Annealing Temperature	320	°F	
Annealing Time - Optional	30.0	min/mm	
Flammability	Nominal Value	Unit	Test Method
Burning Rate ³ (0.0394 in)	1.7	in/min	ISO 3795
Flame Rating (0.06 in)	HB		UL 94
Flammability Classification (0.06 in)	HB		IEC 60695-11-10, -20



FMVSS Flammability	B	FMVSS 302
Additional Information	Nominal Value Unit	Test Method
Emission	< 8 ppm	VDA 275
Processing Information		
Injection		Nominal Value Unit
Drying Temperature		176 °F
Drying Time - Desiccant Dryer		4.0 to 8.0 hr
Suggested Max Moisture		< 0.050 %
Processing (Melt) Temp		392 to 410 °F
Melt Temperature, Optimum		401 °F
Mold Temperature		104 to 140 °F
Mold Temperature, Optimum		122 °F
Holding Pressure		8700 to 11600 psi
Drying Recommended		yes
Hold Pressure Time		7.50 s/mm
Maximum Screw Tangential Speed		472 in/min
Extrusion		Nominal Value Unit
Drying Temperature		176 °F
Drying Time		4.0 to 8.0 hr
Suggested Max Moisture		< 0.050 %
Melt Temperature		383 to 401 °F
Extrusion Melt Temperature, Optimum		392 °F

Notes

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

² 10°C/min

³ FMVSS 302

