Stanyl® Diablo OCD2100 BK27021

PA46-GF40 Envalior

Product Texts

40% Glass Reinforced, Heat Stabilized

ISO 1043 PA46-GF40

Processing/Physical Characteristics	dry / cond	Unit	Test Standard
ISO Data			
[C] Molding shrinkage, parallel	**0.5 / ***	%	ISO 294-4, 2577
[C] Molding shrinkage, normal	**1.0 / ***	%	ISO 294-4, 2577
[C] Density of melt	**1320**	kg/m³	-
[C] Thermal conductivity of melt	**0.314**	W/(m K)	-
[C] Spec. heat capacity of melt	**2130**	J/(kg K)	-
[C] Eff. thermal diffusivity	**1.12E-7**	m²/s	-

[C]: CAMPUS

Mechanical properties	dry / cond	Unit	Test Standard
ISO Data			
[C] Tensile Modulus	**13000 / 7000**	MPa	ISO 527
[C] Stress at break	**210 / 125**	MPa	ISO 527
[C] Strain at break	**3 / 8**	%	ISO 527
[C] Charpy impact strength, +23°C	**90 / 105**	kJ/m²	ISO 179/1eU
[C] Charpy impact strength, -30°C	**65 / 75**	kJ/m²	ISO 179/1eU
[C] Charpy notched impact strength, +23°C	**15 / 25**	kJ/m²	ISO 179/1eA
[C] Charpy notched impact strength, -30°C	**12 / 12**	kJ/m²	ISO 179/1eA

[C]: CAMPUS

Thermal properties	dry / cond	Unit	Test Standard
ISO Data			
[C] Melting temperature, 10°C/min	**282 / ***	°C	ISO 11357-1/-3
[C] Glass transition temperature, 10°C/min	**70 / ***	°C	ISO 11357-1/-2
[C] Temp. of deflection under load, 1.80 MPa	**256 / ***	°C	ISO 75-1/-2
[C] Temp. of deflection under load, 0.45 MPa	**270 / ***	°C	ISO 75-1/-2
[C] Coeff. of linear therm. expansion, parallel	**25 / ***	E-6/K	ISO 11359-1/-2
[C] Coeff. of linear therm. expansion, normal	**50 / ***	E-6/K	ISO 11359-1/-2

[C]: CAMPUS

Electrical properties	dry / cond	Unit	Test Standard
ISO Data			
[C] Comparative tracking index	**300 / -**	-	IEC 60112

[C]: CAMPUS

Other properties	dry / cond	Unit	Test Standard
[C] Water absorption	**6.7 / ***	%	Sim. to ISO 62
[C] Humidity absorption	**2.2 / ***	%	Sim. to ISO 62
[C] Density	**1480 / -**	kg/m³	ISO 1183

[C]: CAMPUS

Material specific properties	dry / cond	Unit	Test Standard
ISO Data			
[C] Viscosity number	**155 / ***	cm³/g	ISO 307, 1157, 1628

[C]: CAMPUS

Characteristics

Processing

Injection Molding

Special Characteristics

Heat stabilized or stable to heat

Delivery form
Pellets, Black

Regional Availability
North America, Europe, Asia Pacific

Additives
Lubricants, Release agent

Other text information

Injection molding
Injection Molding Recommendations
Hot runner recommendations for molding high heat performance Engineering Materials
Steel recommendations for molds screws and barrels
Supporting document for Stanyl quality processing
Trouble shooting guideline for injection molding