

Durethan® BKV50H2.0EF 901510 DUS030
PA6-I-GF50

Envalior

Injection Molding, 50% Glass Reinforced, Heat Stabilized, Improved flow

ISO 1043 PA6-GF50

Rheological properties	dry / cond	Unit	Test Standard
ISO Data			
Molding shrinkage, parallel	0.2 / *	%	ISO 294-4, 2577
Molding shrinkage, normal	0.6 / *	%	ISO 294-4, 2577

Mechanical Properties	dry / cond	Unit	Test Standard
ISO Data			
Tensile Modulus	16000 / 9000	MPa	ISO 527
Stress at Break	215 / 130	MPa	ISO 527
Strain at Break	2.5 / 4	%	ISO 527
Impact Strength (Charpy), +23°C	90 / 90	kJ/m ²	ISO 179/1eU
Impact Strength (Charpy), -30°C	90 / -	kJ/m ²	ISO 179/1eU
Puncture - maximum force, +23°C	1000 / -	N	ISO 6603-2
Puncture - maximum force, -30°C	900 / -	N	ISO 6603-2
Puncture energy, +23°C	3.7 / -	J	ISO 6603-2
Puncture energy, -30°C	3.5 / -	J	ISO 6603-2

Thermal Properties	dry / cond	Unit	Test Standard
ISO Data			
Melting Temperature (10°C/min)	220 / *	°C	ISO 11357-1/-3
Temp. of deflection under load (1.80 MPa)	213 / *	°C	ISO 75-1/-2
Temp. of deflection under load (0.45 MPa)	220 / *	°C	ISO 75-1/-2
Coeff. of Linear Therm. Expansion, parallel	10 / *	E-6/K	ISO 11359-1/-2
Coeff. of Linear Therm. Expansion, normal	80 / *	E-6/K	ISO 11359-1/-2

Other Properties	dry / cond	Unit	Test Standard
ISO Data			
Density	1570 / -	kg/m ³	ISO 1183

Test specimen production	Value	Unit	Test Standard
ISO Data			
Injection Molding, melt temperature	280	°C	ISO 294
Injection Molding, mold temperature	80	°C	ISO 294

Processing Recommendation Injection Molding	Value	Unit	Test Standard
Pre-drying - Temperature	80	°C	-
Pre-drying - Time	2 - 6	h	-
Processing humidity	≤0.12	%	-
Melt temperature	270 - 290	°C	-
Mold temperature	80 - 120	°C	-

Characteristics
Processing

Injection Molding

Special Characteristics

Impact modified, Heat aging stabilized

Delivery form

Pellets

Injection Molding
PREPROCESSING

Residual moisture content: 0.03 - 0.12%

Drying temperature dry air dryer: 80 °C

Drying time dry air dryer 2 - 6 h

PROCESSING

Melt temperature (Tmin - Tmax): 270 - 290 °C

Mold temperature: 80 - 120 °C