

CELANEX® 4002

CELANEX® PBT

Product information

Resin Identification	PBT-I	ISO 1043
Part Marking Code	>PBT-I<	ISO 11469

Rheological properties

Melt mass-flow rate	4 g/10min	ISO 1133
Melt mass-flow rate, Temperature	250 °C	
Melt mass-flow rate, Load	2.16 kg	
Moulding shrinkage, parallel	1.8 %	ISO 294-4, 2577
Moulding shrinkage, normal	1.7 %	ISO 294-4, 2577

Typical mechanical properties

Tensile modulus	1450 MPa	ISO 527-1/-2
Tensile stress at yield, 50mm/min	32 MPa	ISO 527-1/-2
Tensile strain at yield, 50mm/min	4 %	ISO 527-1/-2
Flexural modulus	1450 MPa	ISO 178
Flexural strength	50 MPa	ISO 178
Izod notched impact strength, 23 °C	75 kJ/m ²	ISO 180/1A
Poisson's ratio	0.43 ^[C]	

[C]: Calculated

Thermal properties

Melting temperature, 10 °C/min	225 °C	ISO 11357-1/-3
Temperature of deflection under load, 1.8 MPa	49 °C	ISO 75-1/-2

Physical/Other properties

Density	1240 kg/m ³	ISO 1183
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Injection

Drying Recommended	yes
Drying Temperature	120 °C
Drying Time, Dehumidified Dryer	4 h
Processing Moisture Content	≤0.02 %
Melt Temperature Optimum	250 °C
Min. melt temperature	240 °C
Max. melt temperature	260 °C
Screw tangential speed	0.1 - 0.3 m/s
Mold Temperature Optimum	80 °C
Min. mould temperature	60 °C
Max. mould temperature	130 °C

Characteristics

Processing	Injection Moulding
Delivery form	Pellets
Special characteristics	High impact or impact modified