

Ultradur® B 4521 PRO
PBT

BASF

Rheological properties	Value	Unit	Test Standard
ISO Data			
Melt volume-flow rate, MVR	20	cm³/10min	ISO 1133
Temperature	250	°C	-
Load	2.16	kg	-
Molding shrinkage, parallel	2.1	%	ISO 294-4, 2577
Molding shrinkage, normal	2.5	%	ISO 294-4, 2577

Mechanical Properties	Value	Unit	Test Standard
ISO Data			
Tensile Modulus	2600	MPa	ISO 527
Yield stress	60	MPa	ISO 527
Yield strain	10.8	%	ISO 527
Nominal strain at break	30	%	ISO 527
Impact Strength (Charpy), +23°C	228	kJ/m²	ISO 179/1eU
Impact Strength (Charpy), -30°C	140	kJ/m²	ISO 179/1eU
Notched Impact Strength (Charpy), +23°C	4.5	kJ/m²	ISO 179/1eA

Thermal Properties	Value	Unit	Test Standard
ISO Data			
Temp. of deflection under load (1.80 MPa)	55	°C	ISO 75-1/-2
Temp. of deflection under load (0.45 MPa)	155	°C	ISO 75-1/-2

Other Properties	Value	Unit	Test Standard
ISO Data			
Density	1300	kg/m³	ISO 1183
Bulk density	750	kg/m³	-

Material Specific Properties	Value	Unit	Test Standard
ISO Data			
Viscosity number	127	cm³/g	ISO 307, 1157, 1628

Processing Recommendation Injection Molding	Value	Unit	Test Standard
Processing humidity	≤0.04	%	-
Melt temperature	250 - 270	°C	-
Mold temperature	40 - 70	°C	-

Processing Recommendation Extrusion	Value	Unit	Test Standard
Processing humidity	≤0.04	%	-
Melt temperature	250 - 270	°C	-

Characteristics

Processing

Injection Molding, Other Extrusion

Delivery form

Natural Color

Certifications

Medical, Biocompatibility ISO 10993, US Pharmacopeia Class VI Approved, Drug Master File, Food approval

Applications

Medical, Packaging

Disclaimer

Liability Exclusion

These guide values are measured and provided by the product manufacturer and have been determined on standardised test specimens and can be affected by pigmentation, mould design and processing conditions. M-Base has taken the guide values from the producer's original Technical Data Sheet. **ALBIS AND M-BASE ARE THEREFORE NOT RESPONSIBLE FOR THE ACCURACY OF THE GUIDE VALUES AND CANNOT GIVE ANY WARRANTY WITH REGARD TO THEIR CORRECTNESS.**

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