



PC 50x3000 mm transparent

Article No.	P1002648
Category	PC

Technical Properties

Density & Weight

Property	Value	Unit	Test standard
Density	1.2	g/cm ³	ISO 1183

Moisture Absorption

Property	Value	Unit	Test standard
Water absorption to saturation	0.15	%	ISO 62
Water Absorption to Saturation	0.35	%	ISO 62

Tensile Properties

Property	Value	Unit	Test standard
Tensile Strength	75	MPa	ISO 527
Modulus of elasticity (tensile)	2400	MPa	ISO 527-2
Breakdown Voltage	60	MPa	
Break Elongation	50	%	ISO 527-2

Flexural Properties

Property	Value	Unit	Test standard
Flexural Strength	2400	MPa	ISO 178

Impact Resistance

Property	Value	Unit	Test standard
----------	-------	------	---------------

Property	Value	Unit	Test standard
Notched impact strength (Charpy)	9	kJ/m ²	ISO 179/1eA

Hardness

Property	Value	Unit	Test standard
Hardness Shore D	85	° Shore D	ISO 868
Ball pressure hardness	120	MPa	ISO 2039-1

Temperature Limits

Property	Value	Unit	Test standard
Melting point	160	°C	ISO 3146
Maximal operating temperature (short-term)	119	°C	UL746B
Maximum Operating Temperature	113.75	°C	
Minimum temperature	-54	°C	UL746B
Heat deflection temperature (HDT/A)	130	°C	ISO 75-2
Heat deflection temperature (HDT/B)	140	°C	ISO 75
Vicat softening temperature (VST/B/50)	150	°C	ISO 306

Thermal Conductivity

Property	Value	Unit	Test standard
Thermal Conductivity	0.21	W/(m·K)	DIN 52612

Thermal Expansion

Property	Value	Unit	Test standard
Thermal Expansion Coefficient	0.65	10 ⁻⁴ /K	DIN 11359

Insulation Properties

Property	Value	Unit	Test standard
Dielectric Strength	29	kV/mm	IEC 60243-1
Volume Resistivity	10 ¹³	Ω·cm	IEC 60093
Dielectric Constant (1 MHz)	2.98	-	IEC 60250
Dielectric Constant (100 Hz)	3	-	IEC 60250
Dielectric loss factor (1 MHz)	0.0	-	IEC 60250
Dielectric loss factor (100 Hz)	0.0	-	IEC 60250

Static spread

Property	Value	Unit	Test standard
Surface Resistivity	10 ¹⁵	Ω	IEC 60093
Comparative Tracking Index (CTI)	279.2	V	IEC 60112

Fire Classification

Property	Value	Unit	Test standard
Flammability Classification (UL 94)	0		UL 94