

Technical Datasheet PC 2447

1) Product Description:

PC 2447 is a Polycarbonate resin featuring good flow properties.

2) Applications:

Injection molded technical items.

3) Typical data:

Property	Test method	Unit	value
Melt volume-flow rate, MVR	ISO 1133	cm ³ /10min	19
Temperature	ISO 1133	°C	300
Load	ISO 1133	kg	1.2
Molding shrinkage, parallel	ISO 294-4,2577	%	0.7
Molding shrinkage, normal	ISO 294-4,2577	%	0.7
Tensile Modulus	ISO 527-1/-2	MPa	2400
Yield stress	ISO 527-1/-2	MPa	66
Yield strain	ISO 527-1/-2	%	6
Nominal strain at break	ISO 527-1/-2	%	>50
Tensile creep modulus, 1h	ISO 899-1	MPa	2200
Tensile creep modulus, 1000h	ISO 899-1	MPa	1900
Charpy impact strength, +23°C	ISO 179/1eU	kJ/m ²	N
Charpy impact strength, -30°C	ISO 179/1eU	kJ/m ²	N
Puncture- maximum force, +23°C	ISO 6603-2	N	5100
Puncture- maximum force, -30°C	ISO 6603-2	N	6000
Puncture- energy, +23°C	ISO 6603-2	J	55
Puncture- energy, -30°C	ISO 6603-2	J	65
Glass transition temperature, 10 °C/min	ISO 11357-1/-2	°C	145
Temp. of deflection under load, 1.80 MPa	ISO 75-1/-2	°C	125
Temp. of deflection under load, 0.45 MPa	ISO 75-1/-2	°C	138
Vicat softening temperature, 50 °C/h 50N	ISO 306	°C	144
Coeff. Of liner therm. Expansion, parallel	ISO 11359-1/-2	E-6/K	65
Coeff. Of liner therm. Expansion, normal	ISO 11359-1/-2	E-6/K	65
Burning Behav, at thickness h	IEC 60695-11-10	Class	V-2
Thickness tested	IEC 60695-11-10	mm	0.8
UL recognition	-	-	UL
Oxygen index	ISO 4589-1/-2	%	28
Relative permittivity, 100Hz	IEC 60250	-	3.1
Relative permittivity, 1MHz	IEC 60250	-	3
Dissipation factor, 100Hz	IEC 60250	E-4	5
Dissipation factor, 1MHz	IEC 60250	E-4	90
Volume resistivity	IEC 60093	Ohm*m	>1E13
Surface resistivity	IEC 60093	Ohm	>1E15
Electric strength	IEC 60243-1	kV/mm	34
Comparative tracking index	IEC 60112	-	250
Water absorption	Sim. To ISO62	%	0.3

Humidity absorption	Sim. To ISO62	%	0.12
Density	ISO 1183	Kg/m ³	1200
Luminous transmittance	ISO 13468-1,-2	%	89
Density of melt	-	Kg/m ³	1020
Thermal conductivity of melt	-	w/(m k)	0.214
Spec. heat capacity of melt	-	J/(kg k)	2100
Eff. Thermal diffusivity	-	M ² /s	1E-7
Ejection temperature	-	°C	130
Injection molding, melt temperature	ISO 294	°C	280
Injection molding, mold temperature	ISO 10724	°C	80
Injection molding, injection velocity	ISO 294	mm/s	200

* Typical values not to be construed as specifications.

