

## Technical Datasheet PC 9415

**1) Product Description:**

PC 3113 is a medium flow polycarbonate featuring excellent mechanical properties such as toughness.

**2) Applications:**

Technical parts, Automotive, Appliances

**3) Typical data:**

Property	Test method	Unit	value
Melt volume-flow rate, MVR@300 °C, 1.2kg	ISO 1133	cm <sup>3</sup> /10min	6
Molding shrinkage, parallel	ISO 294-4,2577	%	0.6
Molding shrinkage, normal	ISO 294-4,2577	%	0.5
Tensile Modulus	ISO 527-1/-2	MPa	3800
Stress at break	ISO 527-1/-2	MPa	45
Strain at break	ISO 527-1/-2	%	15
Tensile creep modulus, 1h	ISO 899-1	MPa	3600
Tensile creep modulus, 1000h	ISO 899-1	MPa	2900
Puncture- maximum force, +23°C	ISO 6603-2	N	4000
Puncture- maximum force, -30°C	ISO 6603-2	N	3700
Puncture- energy, +23°C	ISO 6603-2	J	25
Puncture- energy, -30°C	ISO 6603-2	J	15
Temp. of deflection under load, 1.80 MPa	ISO 75-1/-2	°C	136
Temp. of deflection under load, 0.45 MPa	ISO 75-1/-2	°C	142
Vicat softening temperature, 50 °C/h 50N	ISO 306	°C	145
Coeff. Of liner therm. Expansion, parallel	ISO 11359-1/-2	E-6/K	40
Coeff. Of liner therm. Expansion, normal	ISO 11359-1/-2	E-6/K	65
Burning Behav. at 1.5 mm nom. Thickn.	IEC 60695-11-10	Class	V-0
Thickness tested	IEC 60695-11-10	mm	1.5
UL recognition	-	-	UL
Burning Behav, at thickness h	IEC 60695-11-10	Class	V-2
Thickness tested	IEC 60695-11-10	mm	0.8
UL recognition	-	-	UL
Burning Behav, at thickness h	IEC 60695-11-20	Class	5VA
Thickness tested	IEC 60695-11-20	mm	3.0
UL recognition	-	-	UL
Oxygen index	ISO 4589-1/-2	%	35
Relative permittivity, 100Hz	IEC 60250	-	3.2
Relative permittivity, 1MHz	IEC 60250	-	3.2
Dissipation factor, 100Hz	IEC 60250	E-4	10
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	36
Comparative tracking index	IEC 60112	-	175
Water absorption	Sim. To ISO 62	%	0.26
Humidity absorption	Sim. To ISO 62	%	0.1
Density	ISO 1183	Kg/m <sup>3</sup>	1270
Density of melt	-	Kg/m <sup>3</sup>	1080
Thermal conductivity of melt	-	w/(m k)	0.252
Spec. heat capacity of melt	-	J/(kg k)	2100
Eff. Thermal diffusivity	-	M <sup>2</sup> /s	1.11E-7
Ejection temperature	-	°C	140
Injection Molding, melt temperature	ISO 294	°C	300
Injection Molding, mold temperature	ISO 10724	°C	110
Injection Molding, injection velocity	ISO 294	mm/s	200

\* Typical values not to be construed as specifications.cm