

RPC C27 BKTD

PC, 27% carbon fiber/steel fiber reinforced, EMI/RF shielding, flame retardant – halogen (RoHS compliant), black

Property (dry as molded)				
General Properties	Condition	Value	Unit	Standard
Abbreviation	-	PC (CF+MF)27 FR(16)	-	ISO 1043
Density	-	1,40	g/cm ³	ISO 1183
Melt Flow Rate	1.2kg, 300 °C	-	g/10'	ISO 1133
Molding Shrinkage	Parallel / Normal	0,2 / 0,6	%	ISO 15512
Moisture Content	-	<0,1	%	ISO 15512
Moisture Absorption	50% RH, 23 °C	0,2	%	ISO 62
Mechanical Properties	Condition	Value	Unit	standard
Stress at Break	+23 °C	130	MPa	ISO 527
Strain at Break	+23 °C	1,5	%	ISO 527
Tensile Modulus	+23 °C	15000	MPa	ISO 527
Yield Strength	+23 °C	-	MPa	ISO 527
Izod Impact, notched	+23 °C	8	kJ/m ²	ISO 180/1A
Izod Impact, notched	-30 °C	7	kJ/m ²	ISO 180/1A
Izod Impact, un-notched	+23 °C	-	kJ/m ²	ISO 180/1U
Izod Impact, un-notched	-30 °C	-	kJ/m ²	ISO 180/1U
Thermal Properties	Condition	Value	Unit	Standard
Melting Temperature	10 K/min	-	°C	ISO 11357
Heat Deformation Temperature	0.45 MPa	-	°C	ISO 75
Heat Deformation Temperature	1.80 MPa	-	°C	ISO 75
Vicat Softening Temperature	50N	-	°C	ISO 306
Electrical Properties & Flammability	Condition	Value	Unit	Standard
Volume Resistivity	-	<1E+2	Ohm.cm	IEC 60093
Surface Resistivity	-	-	Ohm	IEC 60093
Comparative Tracking Index	Solution A	-	V	IEC 60112
Glow Wire Flammability Index (GWFI)	2 mm plaque	-	°C	IEC 60695
Glow Wire Ignitability Temperature (GWIT)	2 mm plaque	-	°C	IEC 60695
Flame Rating	0.75 mm	V0	-	UL 94
Flame Rating	1.6 mm	V0	-	UL 94
Processing Parameters	Condition	Value	Unit	Standard
Drying		120 / 3 – 4	°C /hr	
Feed Throat Temperature		60 – 80	°C	
Processing Temperature		250 – 290	°C	
Mold Temperature		80 – 100	°C	
Hold Pressure		60 – 120	MPa	
Back Pressure		Low	-	
Injection Speed		Medium - Fast	-	

All above information are gathered under the supervision of ReMo Polytechnic Company in laboratories. For sure there is no guarantee due to various test result under different condition process. As result this is the end users responsibilities and duties to test our products under their required processing condition, uses and by their own facilities.