

Technical Data Sheet

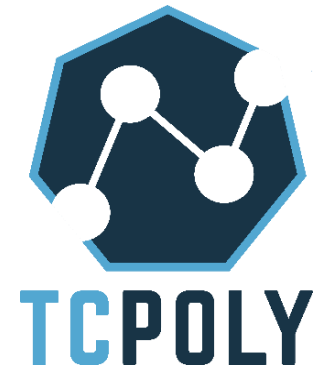
Ice9™ Aero PEKK

Product code: TC-PEKK-015-315

Thermally conductive, electrically non-insulating PEKK Composite

Product type: filament or pellets

Properties based on 3D printed samples



GENERAL PROPERTIES	METRIC		ENGLISH		ASTM
Color	Dark gray				
Density	1400	kg/m ³			
THERMAL PROPERTIES	METRIC		ENGLISH		ASTM
Thermal conductivity, in-plane	3	W/m-K	28	BTU·in/hr·ft ² ·°F	E1461
Thermal conductivity, through-plane	1	W/m-K	7	BTU·in/hr·ft ² ·°F	E1461
Coefficient of thermal expansion	17	ppm/°C	30	ppm/°F	E831
Heat deflection temperature, 0.45 MPa	270	°C	536	°F	D648
Max. continuous temperature	290	°C	572	°F	-
Flammability Rating (Base Resin @1mm)	V0				UL94
MECHANICAL PROPERTIES	METRIC		ENGLISH		ASTM
Flexural modulus	8	GPa	1160	ksi	D638
Tensile strength	100	MPa	14	ksi	D638
Elongation at break	1	%	1	%	D638
Impact strength, Izod notched	75	J/m	-		D256
ELECTRICAL PROPERTIES	METRIC		ENGLISH		ASTM
Volume resistivity	10 ⁵	Ω-cm			D257
FDM PRINTING GUIDELINES	METRIC		ENGLISH		ASTM
Extruder temperature	370-400	°C	700-750	°F	
Bed temperature	90-150	°C	190-300	°F	
Chamber temperature	50-100	°C	120-210	°F	

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