

Electrafil® J-50/CF/10 BK223

Techmer Polymer Modifiers - Polycarbonate

General

Material Status	• Commercial: Active
Availability	• North America
Filler / Reinforcement	• Carbon Fiber
Features	• Conductive
Appearance	• Black
Processing Method	• Injection Molding

Properties ¹

Physical	Nominal Value	Unit	Test Method
Density / Specific Gravity	1.23		ASTM D792
Melt Mass-Flow Rate (MFR) (300°C/1.2 kg)	6.4	g/10 min	ASTM D1238
Mechanical	Nominal Value	Unit	Test Method
Tensile Modulus	1.16E+6	psi	ISO 527-1
Tensile Stress (Yield)	17100	psi	ISO 527-2
Tensile Strain (Break)	3.1	%	ISO 527-2
Impact	Nominal Value	Unit	Test Method
Notched Izod Impact (0.125 in)	3.1	ft·lb/in	ISO 180
Electrical	Nominal Value	Unit	Test Method
Surface Resistivity	1.0E+2 to 1.0E+6	ohms	ASTM D257
Flammability	Nominal Value	Unit	Test Method
Flame Rating			UL 94
0.06 in		HB	
0.12 in		HB	

Processing Information

Injection	Nominal Value	Unit
Drying Temperature	250	°F
Drying Time	2.0 to 4.0	hr
Rear Temperature	550 to 590	°F
Middle Temperature	560 to 600	°F
Front Temperature	570 to 610	°F
Nozzle Temperature	580 to 620	°F
Processing (Melt) Temp	560 to 625	°F
Mold Temperature	150 to 225	°F
Injection Rate	Slow-Moderate	
Back Pressure	0.00 to 50.0	psi
Screw Speed	Moderate	

