



Typical Properties of

Fluorosint® 500

Polytetrafluoroethylene (PTFE) with Mica Filler

Process: Compression Molded

Property	Test Method	Unit	Value
Specific Gravity	D792	--	2.32
Tensile Strength	D638	psi	1,100
Tensile Modulus	D638	psi	300,000
Elongation	D638	%	10
Flexural Strength	D790	psi	2,200
Flexural Modulus	D790	psi	500,000
Compressive Strength	D695	psi	4,000
Compressive Modulus	D695	psi	250,000
Hardness, Rockwell	D785	--	R55
Hardness Durometer	--	--	D70
Izod Impact (notched)	D256	ft. lb of notch	0.9
Coeff. of Friction (Dynamic)	--	dry v.s steel	0.15
Coeff. of Linear Therm. Expan.	E831/ D696	in./in./°F	2.5×10^{-5}
Continuous Use Temperature	--	°F	500
Heat Deflection Temperature	D648	°F	270
Glass Transition Temperature	D3418	°F	68-75
Melting Point	D3418	°F	621
Thermal Conductivity	E1530-11	BTU in/hr ft ² °F	5.3
Dielectric Strength	D149	Volts/mil	275
Surface Resistivity	EOS/ESD 511.11	ohm/square	$>10^{13}$
Flammability	UL94	--	V-0
Water Absorption, 24 hrs.	D570	% by weight	0.1
Water Absorption, Saturation	D570	% by weight	0.3
Limiting PV (4:1 Safety Factor)	--	--	8,000
K-Factor	--	--	600
FDA Compliance	--	--	No

Note: The data provided is for reference purposes only. Additional testing may be required for design specifications or quality control.
All values at 73 F unless otherwise stated.