

Physical properties PTFE +25% GF

Product characteristics:

- Improved thermal dimensional stability
- Improved creep resistance
- Reduced cold flow
- Improved compression strength
- Excellent chemical stability
- Excellent electrical insulating properties
- Low friction behaviour
- Improved surface hardness

General properties	Test method	Unit	Value
Color	-	-	White cream
Specific gravity	ASTM D792	g/cm ³	2.200 - 2.270
Water absorption	ASTM D570	%	0.03
Flamability	UL 94		V-0
Thermal properties			
Thermal conductivity	ASTM C177	W/(m·K)	0.41
Coefficient of linear thermal expansion (25 - 100°C)	ASTM D696	10 ⁻⁵ /°C	7.7 - 11.2
Mechanical properties			
Tensile strength	ASTM D4745	MPa	≥ 13
Elongation	ASTM D4745	%	≥ 180
Hardness	ASTM D2240	Shore D	≥ 60
Ball Hardness	ASTM D785	MPa	≥ 25
Deformation under load (140 Kg/cm ² for 24 hrs. at 23°C)	ASTM D621	%	9 - 11
Permanent deformation (after 24 hrs. Relaxation at 23°C)	ASTM D621	%	5 - 7
Coefficient of static friction	ASTM D1894		0.17 - 0.20
Coefficient of dynamic friction	ASTM D1894		0.15 - 0.17
Wear coefficient		cm ³ min. 10 ⁻⁸ kg m h	15 - 25
Electrical properties			
Volume resistivity	ASTM D257	Ohm·cm	10 ¹⁵
Surface resistivity	ASTM D257	Ohm	10 ¹⁴

This table is a valuable help in the choice of a material. The data listed here fall within the normal range of products properties, but they should not be used to establish material specification limits nor used alone as the basis of design.