

TUFNOL KITE

The following information corresponds with our current knowledge and indicates our products and possible applications. We cannot give a legally binding guarantee of certain properties or the suitability for a specific application. Existing commercial patents must be observed. A definitive quality guarantee is given in our general conditions of sales. Unless otherwise stated, these values represent averages taken from injection moulding samples. We reserve the right of technical alterations.

Properties	Unit	Typical Result
Cross breaking strength	MPa	175
Impact strength, notched, Charpy	kJ/m ²	2.7
Compressive strength, flatwise	MPa	350
Compressive strength, edgewise	MPa	200
Resistance to flatwise compression	%	1.2
Shear strength, flatwise	MPa	105
Water Absorption		
1.6mm thick	mg	39
3mm thick	mg	47
6mm thick	mg	56
12mm thick	mg	70
Electric strength, flatwise in oil at 90°C		
1.6mm thick	MV/m	14.5
3mm thick	MV/m	13
6mm thick	MV/m	8.8
12mm thick	MV/m	6.1
Electric strength, edgewise in oil at 90°C	kV	55
Insulation resistance after immersion in water	Ω	1x10 ¹⁰
Loss tangent at 1 MHz	-	0.037
Permittivity at 1 MHz	-	5.1
Relative density	-	1.36
Maximum working temperature**		
Continuous	°C	90
Intermittent	°C	120
Thermal classification	-	Class E
Thermal conductivity through laminae	W/(mK)	0.26
Thermal expansion in plane of laminae	X 10 ⁻⁵ /K	1.8
Specific heat	kJ/(kgK)	1.5

*** Users of highly stressed components at temperatures approaching the maximum are recommended to seek further advice.