



Material description:

DIN Abbreviation: Hm2471
Standard thickness tolerance: According to IEC 893-2
Chemical Designation: Polyester Glass
Color, Filler: Red

Applications:

- Thermal Insulation for moulds
- Electrical insulation
- Construction material

Stock Availability:

Sheet sizes 1220x1220 or 1220x2440 mm
Thicknesses 0,8 -50 mm thick

Finished, machined parts

Preferred Fields:

Good electrical properties such as high breakdown voltage in air and oil and highest arc resistance and tracking resistance. Self-extinguishing. Low smoke emission, halogen-free. Used as an insulation material in electrotechnical constructions such as plate-enclosed distribution systems, partition plates, busbar carriers, etc

Standard thickness tolerances:

Nominal Thickness (mm)	Tolerance
2,0	±0,25
2,5	±0,30
3	±0,35
4	±0,40
5	±0,55
6	±0,60
8	±0,70
10	±0,80
12	±0,90
14	±1,00
16	±1,10
20	±1,30
25	±1,40
30	±1,45
35	±1,50
40	±1,55
45	±1,65
50	±1,75
60	±1,90
70	±2,00
80	±2,20
90	±2,35
100	±2,50

Properties	Unit	Test method DIN /ISO/ ASTM	Value
Mechanical			
Flexural strength at room temperature	Mpa	ISO 178	170
Flexural strength at 150 °C	Mpa	ISO 178	-
Modulus of elasticity	Mpa	ISO 178	9000
Compressive strength parallel to laminations	Mpa	ISO 604	-
Compressive strength perpendicular to laminations	Mpa	ISO 604	240
Izod impact strength parallel to laminations	kJ/m ²	DIN 53453	45
Shearing strength parallel to laminations	MPa	IEC 893-2	35
Tensile strength	Mpa	ISO 527	75
Physical and Thermal			
Thermal endurance index at 20.000 h	°C	IEC 216-1	155
Flammability at thickness ≥ 3,0 mm	Category	IEC 707	FV 0
Density	g/cm ³	ISO 1183/A	1,80
Water absorption 50x50x3 mm	mg	ISO 62/1	30
Electrical			
Electrical strength at 90°C in oil, 3 mm, perpendicular	KV/mm	IEC 243-1	7
Electrical strength at 90°C in oil, 25 mm, parallel	Kv/25 mm	IEC 243-1	50
Permittivity at 50 Hz	-	IEC 250	4
Permittivity at 1 MHz	-	IEC 250	4
Dissipation factor at 50 Hz	-	IEC 250	0,003
Dissipation factor at 1 MHz	-	IEC 250	0,003
Insulation resistance after immersion in water	MΩ	IEC 167	100,000
Comparative tracking index, CTI	V	IEC112	450

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