

Material description:	
DIN Abbreviation:	Hgw 2375.4
Standard thickness tolerance:	According to IEC 893-2
Chemical Designation:	Epoxy Glass
Color, Filler:	Green

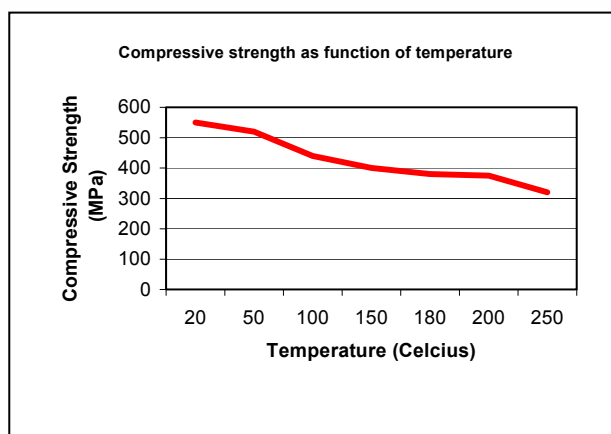
Applications:	
•	Thermal Insulation for moulds
•	Electrical insulation
•	Construction material

Stock Availability:	
Sheet sizes	1250x1250 or 1250x2500 mm
Thicknesses	0,15 -150 mm thick
Tube	up to 1250 mm ID Up to 1270 mm OD
Finished, machined parts	

Preferred Fields:	
High resistance to chemicals. Particularly good, lasting strength properties and insulation values at high application temperatures. Radiation-resistant. Can be used at cryogenic temperatures. Insulation and construction material in electrical machinery, transformers and chemical plants.	

Standard thickness tolerances:	
Nominal Thickness (mm)	Tolerance
0,2	±0,06
0,3	±0,08
0,4	±0,10
0,5	±0,12
0,6	±0,13
0,8	±0,16
1,0	±0,18
1,2	±0,20
1,6	±0,24
2,0	±0,28
2,5	±0,33
3	±0,37
4	±0,45
5	±0,52
6	±0,60
8	±0,72
10	±0,82
12	±0,90
14	±1,02
16	±1,12
20	±1,30
25	±1,50
30	±1,70
35	±1,95
40	±2,10
45	±2,30
50	±2,45
60	±2,45
70	±2,45
80	±2,50
90	±2,60

Properties	Unit	Test method DIN /ISO/ ASTM	Value
Mechanical			
Flexural strength at room temperature	Mpa	ISO 178	450
Flexural strength at 150 °C	Mpa	ISO 178	-
Modulus of elasticity	Mpa	ISO 178	20000
Compressive strength parallel to laminations	Mpa	ISO 604	300
Compressive strength perpendicular to laminations	Mpa	ISO 604	550
Impact strength a_{n10}/a_{n15}	kJ/m ²	DIN 53453	130
Impact strength a_{k10}	kJ/m ²	DIN 53453	70
Impact strength a_{k15}	kJ/m ²	DIN 53453	120
Izod impact strength parallel to laminations	kJ/m ²	DIN 53453	65
Shearing strength parallel to laminations	MPa	IEC 893-2	55
Tensile strength	Mpa	ISO 527	320
Physical and Thermal			
Thermal endurance index at 20.000 h	°C	IEC 216-1	180
Flammability at thickness $\geq 3,0$ mm	Category	IEC 707	HB
Heat distortion	°C	DIN53462	> 200
Heat conductivity	W/(m . K)	ISO 2581	0,3
Density	g/cm ³	ISO 1183/A	1,80
Water absorption 50x50x3 mm	mg	ISO 62/1	15
Thermal expansion MD/CD	10 ⁻⁶ /K	TMA 50-200 °C	12/14
Electrical			
Electrical strength at 90°C in oil, 3 mm, perpendicular	KV/mm	IEC 243-1	18
Electrical strength at 90°C in oil, 25 mm, parallel	Kv/25 mm	IEC 243-1	60
Permittivity at 50 Hz	-	IEC 250	5
Permittivity at 1 MHz	-	IEC 250	5
Dissipation factor at 50 Hz	-	IEC 250	0,008
Dissipation factor at 1 MHz	-	IEC 250	0,01
Insulation resistance after immersion in water	MΩ	IEC 167	500,000
Comparative tracking index, CTI	V	IEC112	200



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