



Technical Properties

Tile Backer Board



Baseboard

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Baseboard is a complete waterproof, tile backing board and insulating system for wet rooms, showers and bathrooms.

The system is used in preference over against chipboard, ply or plasterboard.

Benefits -



Waterproof

Totally impervious to moisture, providing a stable ready to tile substrate.



Insulating

High thermal insulation properties ensuring minimal heat transfer to adjacent surfaces.



Lightweight

No extra load requirements. Easy to handle and cut.



Versatile

Suitable for use on timber and metal studworks, concrete and timber floors.



Underfloor Heating

Suitable for use beneath electrical underfloor heating.

Contact and Technical Information -



Website

www.baseboard.com



Email

info@baseboard.com

Baseboard Panels

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Baseboard boards are made of high-performance waterproof extruded polystyrene. It has a 1mm coating on either side comprising a glass fibre mesh embedded in a polymer-cement mortar.

Properties of Foam Component -

Property	Assessed to	Rating
Density	DIN 53420	36 ± 2 kg/m ³
Thermal Conductivity (initial)	DIN 52612	0.034 Watt/mK
Thermal Conductivity (→5yrs)	ASTM C518	0.036 Watt/mK
Compressive Strength (10% deflection)	DIN 53421	Minimum of 0.25N/mm ²
Flexural Strength	ASTM C203	0.30 ± 0.02 MPa
Water Absorption (2-day immersion)	ISO2896	0.2% by volume
Water Absorption (Capillary)	DIN 53428	Zero
Coefficient of linear expansion	N/A	70 x 10 ⁻⁶ K ⁻¹
Water Vapour Diffusion Resistivity (μ)	DIN 52615	110 - 225 μ
Water Vapour Permeability	ASTM E-96	0.028 ng/Pa.m.s
EU controlled substances content	N/A	None

Properties of Tile Backer Board -

Property	Assessed to	Rating
Thermal Conductivity (→ 5yrs)	EN 12667:2001	0.033 - 0.036 Watt/mK
Compressive Strength (10% deflection)	EN 826:1996	Minimum of 0.25N/mm ²
Bond Strength	BS EN 1384	0.3N/mm ²
Maximum Tile Loading Weight	CERAM121107	62kg/m ²
Flexural Strength	ASTM C203	2.05 ± 0.02 MPa
Water Vapour Permeability (Sd)	DIN EN 12086	3.2m
Resistance to body Impact	ETAG 003	3 x 120N/m
Bending Stiffness, E(20mm / 30mm)	EN 12089	601KNmm ² / 1285 kN/mm ²
Coefficient of linear expansion	N/A	30 x 10 ⁻⁶ K ⁻¹
Flammability	EN 13501-1	Class E
Impact Sound Reduction	BS-ISO140-8	dLw = 21
Shear Bond Strength	EN 1448	3.32kg/cm ²
EU controlled substances content	N/A	None
Working Temp Range	N/A	-50 to +80c

Baseboard Trays

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Board Weights and Dimensions-

		600x1250mm	600x2500mm
Thickness	Density (kg/m ³)	Weight (kg)	Weight (kg)
6mm	425	1.87	N/a
12mm	297	2.18	4.36
20mm	167	2.45	4.9
30mm	121	2.68	5.35
50mm	86	3.15	6.3

Dimensional tolerances for standard boards: Thickness +/- 2mm, Width +/- 2mm, Length +/- 2mm

The boards should be stored dry and flat. Slight bowing caused by incorrect storage or transport, for example, is not permanent and does not represent a technical defect. Slight curving can be rectified through storing the boards flat.

Thermal Insulation Values -

Thickness	Net thickness (xps)	R-Value (m ² .k)/W	U-Value W/m ² x K	AD Rated Value
6mm	4	0.11	3.63	0.0378
10mm	8	0.21	2.62	0.0378
12mm	10	0.28	2.23	0.0378
20mm	18	0.49	1.55	0.0378
30mm	28	0.74	1.10	0.0378
50mm	48	1.27	0.69	0.0378

Baseboard boards offer thermal insulation that in most constructions satisfies the U-value requirements of different regions building regulations. The nonconductive surface reduces condensation by masking any cold bridging from the substrate beneath.

The cementitious surface is resistant to heat and the chemicals within the sheathing around electric underfloor heating elements making it safe to use with these types of systems.

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