

Description of Product

Alumasc Extruded Polystyrene Insulation is our standard-grade XPS board, featuring a closed-cell structure, low water absorption, and rebated (ship lap) edges on all sides.

Suitable for use in inverted roof constructions above the waterproofing layer, in conjunction with Alumasc LO-K Water Flow Reducing Layer (WFRL), and beneath roof finishes such as paving, ballast, blue roof and green roof systems.

Product Information

Alumasc Extruded Polystyrene Insulation								
Product code	TF300							
Composition	Closed-cell extruded polystyrene foam (XPS)							
Facing	Skin							
Edge profile	Rebated							
Length / Width	1250 x 600mm (0.75m ²)							
Thickness (mm)	50	80	100	115	120	130	140	145
Indicative weight (kg/m ²)	1.70	2.72	3.40	3.91	4.08	4.42	4.76	4.93
Thickness (mm):	160	165	175	180	190	195	200	
Indicative weight (kg/m ²)	5.44	5.61	5.95	6.12	6.46	6.63	6.80	

Technical Information

Characteristic	Standard	Unit	Value	
Reaction to fire	EN 13501-1	Euroclass	E	
Declared thermal conductivity	EN 13165	W/mK	≤ 120mm = 0.038	
			≥ 120mm = 0.031	
Compressive strength at 10%	EN 826	kPa	300	
Design compressive stress (long-term)	EN 1606	kPa	130	
Long term water absorption by total immersion	EN 12087	%	< 0.7	
Water absorption by diffusion	EN 12088	%	< 80mm = 2	≥ 80mm = 1
Water absorption after freeze thaw	EN 12091	%	< 1	
Coefficient of linear thermal expansion		mm/(m.K)	0.07	

Application Information

The substrate should be sufficiently smooth and level to provide full support to the insulation boards with no rocking or movement.

Install the boards in dry conditions using a staggered bond pattern, ensuring all joints are tightly butted. Where multiple layers are required, ensure board joints are offset between successive layers. Ensure boards are cut square and fitted tightly, with no gaps at abutments.

Boards are loose laid over the completed waterproofing.

Cut using a fine-toothed saw or a hot wire system.

The insulation and WFRL must be progressively ballasted throughout the installation process to achieve the required wind uplift resistance. If temporary ballasting must be used, it should prevent any movement of the WFRL.

The imposed ballast load shall be determined by project-specific wind load calculations. As a minimum, a load of 80 kg/m² must be provided to prevent flotation.

Storage & Handling

Store flat on a clean, dry surface off the ground and under waterproof protection. Factory packaging is used to wrap the product for transit and is not intended to provide protection during storage. Boards must be kept dry at all times prior to installation.

Consider the load's size, shape, and weight before lifting. Manual handling assessments should be completed for heavy or repetitive lifting in accordance with HSE guidance; refer to document INDG143. Appropriate PPE must be worn as identified in the project risk assessment, Safety Data Sheet, and site-specific requirements.

Health & Safety

Copies of Alumasc Safety Data Sheets can be downloaded from the Alumasc Roofing [website](#).