

Product	InsulWall® Structural Insulated Wall Panel
Product Description	InsulWall® is a lightweight and structural insulated panel made from EPS-FR that is lined with a unique BlueScope® primed steel ready for third party coating systems such as a Dulux® Wash & Wear painted interiors and Dulux® Acratex® acrylic-render coated exteriors. InsulWall® is purpose designed to suit commercial applications as well as the residential housing, modular and renovation market. InsulWall® is available in thicknesses to suit 90mm interior walls and 140mm exterior walls and is available for use with the NCC CodeMark accredited InsulLiving® building system.
Supplier	BONDOR®
Contact Number	1300 300 099
Website	www.bondor.com.au

Product Overview

Core	EPS-FR (Expanded Polystyrene with fire retardant)
Width (cover mm)	1200
Thickness (mm)	90, 140
Length	Up to 16m (check for availability)
External Material	0.6mm G300 prime coated BlueScope® steel
External Finishes	Plain
Exterior Colour Options	External coating should strictly follow Dulux® DuSpec Specification. Dulux® Acratex® Coventry Coarse.
Internal Material	0.6mm G300 prime coated BlueScope® steel
Internal Finishes	Plain
Interior Colour Options	Internal coating should strictly follow Dulux® DuSpec Specification. Broad walls - Dulux® Wash & Wear 101 Adv L/G. Kitchens - Dulux® Wash & Wear Kitchen. Bathrooms - Dulux® Wash & Wear Bathroom L/G for wet areas
Paint System	AS/NZS 2728 & AS 1397
Accreditations	Codemark Certificate Number CM40033
Acoustic Properties	Rw 24 - 25 depending on thickness
Bushfire Attack Level	BAL-40 (All exposed core to be covered with flashing)

Technical Properties

Thermal - AS/NZS 4859.1

Declared R-Value (m²K/W)	90, 140mm InsulWall® delivers Declared R-value at 23°C of 2.15, 3.40 respectively. Contact us for other temperatures and different EPS-FR core grades.
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Acoustics - AS 1191, AS/NZS 1276 & AS/NZS ISO 717.1

R_w Value (dB)	InsulWall® has been tested in accordance with the requirements of AS 1191. The Weighted Sound Reduction Index (R _w) of the panel is calculated using AS/NZS 1276 and AS/NZS ISO 717.1 respectively with acoustic values of Rw 24 - 25 depending on thickness. Refer to Bondor® Australia for your specific application.
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Fire

Fire Hazard Properties	AS/NZS 1530.3
Ignitability Index	0
Spread of Flame Index	0
Heat Evolved Index	0
Smoke Index	2-3
SMOGR_{RC}	< 100
Bushfire Attack Level AS 3959	InsulWall® is suitable for use as external walls of Class 1 to 10 buildings to be constructed in designated bushfire prone areas that have a BAL-40 or less.

Structural - AS/NZS 1170, AS 1562.1, AS4040

Span Tables	Bondor® provides the latest Ultimate Limit State Span Tables developed specifically for Australasian conditions, in accordance with AS/NZS 1170, AS 1562.1 & AS 4040. Span tables, bracing capacity, axial loads, support of cupboards and bracket loading for InsulWall can be determined using the InsulLiving technical manual. Refer to Span Table Notes for design guidelines relating to fixing, and deflection limits. The panel design shall be specified by the certifying engineer as determined from the Span Tables.
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Support Details	The support spacing shall be specified by the structural engineer as determined from the Span Tables.
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Safe Handling & Installation

Panel Length	Up to 16m, however site, transport and wind load restrictions can limit panel length.
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Storage	Panels should always be kept dry and if placed on site, stored off the ground, slightly inclined, allowing adequate drainage and ventilation of the panel pack. No other materials to be stored / stacked on top of panel pack.
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Handling	In the event of manual handling, careful consideration should be given to panel weight and appropriate PPE. Consider using mechanical aides if necessary.
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Safety	The contractor is to determine and use safe working methods throughout the installation and construction period, which complies with OHS requirements. A safe work method template (although NOT project specific) is available from Bondor®.
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Supporting Frame	The builder is to ensure that the substrates including slabs and kerbs; and sub frames are straight, smooth and fit for purpose.
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Fixing	Fixings are to meet the requirements of BlueScope TB-16 Fasteners for Roofing and Walling Product Selection Guide. Fasteners must be manufactured from high grade carbon steel with a minimum class 4 anti-corrosion coating as per Australian Standards. Refer to Span Tables Notes for design guide relating to screw fixing.
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Flashing	Flashings are manufactured from 0.55mm BlueScope COLORBOND® steel and installed to AS 1562.1 or as otherwise specified in the Bondor® Standard Construction Drawings. Aluminium can be used if there is no Group Number requirement.
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Sealant	Sealant to be neutral cure and meet recommendations for sealants as per BlueScope TB-9 Sealants for Exterior Finishes. Silicon, polyurethane, butyl mastic and acrylic based sealants may be appropriate if neutral cure and recommended by their manufacturer for use on COLORBOND® steel and for the application. Sealant to be placed between flashings/angles and panel and between panel joints as shown on the Bondor® Standard Construction Details.
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Installation	<p>Installation as per the Bondor® Standard Construction Details.</p> <ul style="list-style-type: none"> • Panels are to be cut & trimmed to ensure a flush finish. • Panels are to be confirmed square & plumb as per project requirements. • Panels are to be cut with a suitable metal cutting circular type saw. Angle grinder is not recommended. • Penetrations for outlets, vents, flues etc. are to be flashed & sealed with appropriate materials. Refer flashing details above. • Gaps to be filled with a suitable sealant or foam filler. • Refer to Bondor® Standard Construction Details & Fixing Details above for fastener requirements. • Remove all swarf and any foreign matter immediately from all panel surfaces as per BlueScope TB-5 Swarf staining of steel profiles.
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Maintenance	Refer to BlueScope TB-4 Maintenance of COLORBOND® and Zincolume® Steel and the relevant Bondor® maintenance information.
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Warranties & Disclaimers

Warranty	Bondor® architectural walling panels offer a conditional warranty of up to 15 years from install date for projects on an application basis, dependent on project location, design, installation, end use, environmental conditions and maintenance of the product. Please contact Bondor® sales team with your specific project details for more information on the available conditional warranties.
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Disclaimers	Under certain light conditions this product may show an undulating surface which can vary depending on exterior profile and steel gauge selection as well as the environments varying light conditions.
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