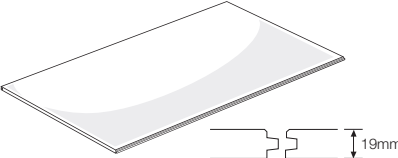


Installation Instructions



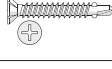


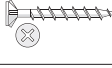

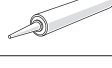



IMPORTANT NOTES

1. Scyon™ Secura™ wet area flooring is suitable for internal residential wet areas only.
2. Failure to install, finish or maintain this product in accordance with applicable building codes, regulations, standards and James Hardie's written application instructions may lead to personal injury, affect system performance, violate local building codes, and void James Hardie's product warranty.
3. All warranties, conditions, liabilities (direct, indirect or consequential) and obligations whether arising in contract, tort or otherwise other than those specified in James Hardie's product warranty are excluded to the fullest extent allowed by law. For James Hardie's product warranty information and disclaimers about the information in this manual, see the section at the end of this manual.
4. For wet area construction this manual must be read in conjunction with James Hardie Wet Area Construction Design Manual which provides wet area waterproofing requirements and details.
5. The builder must ensure the product meets aesthetic requirements before installation. James Hardie will not be responsible for rectifying aesthetic surface variations following installation.
6. Make sure your information is up to date. When specifying or installing James Hardie® products, ensure you have the current manual. If in doubt, or you need more information, visit www.jameshardie.com.au or Ask James Hardie™ on 13 11 03.

SCYON™ SECURA™ WET AREA FLOORING

PRODUCT	DESCRIPTION
	<p>Scyon Secura wet area flooring</p> <p>Structural flooring substrate. Long edges have tongue and groove feature for easy jointing. Tongue-and-groove on two long edges.</p> <p>Size: 19 x 900 x 1800mm Approx. mass: 38kg</p>

PRODUCT / ACCESSORIES / TOOLS

COMPONENTS SUPPLIED BY JAMES HARDIE			
ACCESSORIES	DESCRIPTION	ACCESSORIES	DESCRIPTION
	HardiBlade® saw blade Ø 185mm poly diamond blade, for fast clean cutting of Scyon™ Secura™ wet area flooring.		James Hardie joint sealant Polyurethane joint sealant for sheet jointing in wet areas.
	HardiDrive® screw For fastening to 0.75mm to 1.6mm BMT steel frames. Class 3 finish. Length 40mm		
COMPONENTS NOT SUPPLIED BY JAMES HARDIE			
James Hardie recommends the following products for use in conjunction with its Scyon™ Secura™ wet area flooring. James Hardie does not supply these products and does not provide a warranty for their use. Please contact the component manufacturer for information on their warranties and further information on their products.			
ACCESSORIES	DESCRIPTION	ACCESSORIES	DESCRIPTION
	Nails ■ 2.8 x 50 corrosion resistant fibre cement nails ■ 50 mm corrosion resistant D Head gun nails or equivalent		Gun nailer Suitable pneumatic or coil gun nailer.
	Screws ■ N° 8 x 40mm self embedding head for screwing to timber. Corrosion resistant.		Cordless drill Recommended tool for screw fixing the sheets to steel joists.
	Construction adhesive Suitable construction adhesive for gluing panels to joists.		Spatula For removal of excess adhesive from the panel surface (shown with narrower blade).
	Dust-reducing saw Dust reducing saw with a HardiBlade® saw blade. Makita 5057KB / Hitachi C7YA		Vacuum extraction with HEPA filter Used with HEPA filter and paper bag for reduced dust exposure.

WARNING

DO NOT BREATHE DUST AND CUT ONLY IN WELL VENTILATED AREA

James Hardie products contain sand, a source of respirable crystalline silica which is considered by some international authorities to be a cause of cancer from some occupational sources. Breathing excessive amounts of respirable silica dust can also cause a disabling and potentially fatal lung disease called silicosis, and has been linked with other diseases. Some studies suggest smoking may increase these risks. During installation or handling:

- (1) work in outdoor areas with ample ventilation;
- (2) minimise dust when cutting by using either 'score and snap' knife, fibre cement shears or, where not feasible, use a HardiBlade® saw blade and dust-reducing circular saw attached to a HEPA vacuum;
- (3) warn others in the immediate area to avoid breathing dust;
- (4) wear a properly-fitted, approved dust mask or respirator (e.g. P1 or P2) in accordance with applicable government regulations and manufacturer instructions to further limit respirable silica exposures. During clean-up, use HEPA vacuums or wet cleanup methods - never dry sweep. For further information, refer to our installation instructions and Material Safety Data Sheets available at www.jameshardie.com.au. **FAILURE TO ADHERE TO OUR WARNINGS, MATERIAL SAFETY DATA SHEETS, AND INSTALLATION INSTRUCTIONS MAY LEAD TO SERIOUS PERSONAL INJURY OR DEATH.**

JAMES HARDIE RECOMMENDED SAFE WORKING PRACTICES

CUTTING OUTDOORS

1. Position cutting station so wind will blow dust away from the user or others in working area.
2. Use a dust reducing circular saw equipped with HardiBlade® saw blade and HEPA vacuum extraction.

SANDING/DRILLING/OTHER MACHINING

When sanding, drilling or machining you should always wear a P1 or P2 dust mask and warn others in the immediate area.

IMPORTANT NOTES

1. NEVER use a power saw indoors.
2. NEVER use a circular saw blade that does not carry the HardiBlade® logo.
3. NEVER dry sweep - Use wet suppression or HEPA vacuum.
4. NEVER use grinders.
5. ALWAYS follow tool manufacturers' safety recommendations.

P1 or P2 respirators should be used in conjunction with above cutting practices to further reduce dust exposures. Additional exposure information is available at www.jameshardie.com.au to help you determine the most appropriate cutting method for your job requirements. If concern still exists about exposure levels or you do not comply with the above practices, you should always consult a qualified industrial hygienist or contact James Hardie for further information.

STORAGE AND HANDLING

To avoid damage, all James Hardie building products should be stored with edges and corners of the sheets protected from chipping.

James Hardie building products must be installed in a dry state and protected from weather during transport and storage. The product must be laid flat under cover on a smooth level surface clear of the ground to avoid exposure to water, moisture, etc.

DESIGN

General

All design and construction must comply with the appropriate requirements of the current Building Code of Australia (BCA) and other applicable regulations and standards.

Responsibility

The specifier or other party responsible for the project must ensure that the details in this specification are appropriate for the intended application and that additional detailing is performed for specific design or any areas that fall outside the scope of this specification.

Loading

The James Hardie flooring systems in this manual have been designed to satisfy the requirements for domestic and residential activities (Category A1) of Table 3.1 of AS/NZS 1170.1 - 'Structural design actions - Permanent, imposed and other actions'.

NOTE

The code specifies higher loads in areas subject to crowd loading, storage of materials and heavy wheel loads. For these application James Hardie recommends the use of HardiPanel compressed. For more information see the HardiPanel Compressed Installation Instructions.

Appraisal

Scyon™ Secura™ wet area flooring has been appraised by CSIRO (Technical Assessment 318, July 2005) as satisfying the relevant requirements for use in wet areas).

FRAMING

General

Scyon™ Secura™ wet area flooring may be fixed to timber or steel joists installed at 450mm max. centres. Floor joists must be 45mm wide as a minimum to enable adequate jointing of panels.

Timber Framing

Use of timber framing must be in accordance with AS 1684 - 'Residential timber-framed construction' and the framing manufacturer's specifications.

Use only seasoned timber. Unseasoned timber must not be used because it is prone to shrinkage and can cause sheets and frames to move.

'Timber used for house construction must have the level of durability appropriate for the relevant climate and expected service life and conditions including exposure to insect attacks or to moisture, which could cause decay.'
 Reference AS 1684.2.

Steel Framing

Use of steel framing must be in accordance with AS 3623 - 'Domestic metal framing' and the framing manufacturers specifications. Framing members must be in the range 0.55mm to 1.9mm BMT (base metal thickness).

The steel framing must have the appropriate level of durability required to prevent corrosion.

Tolerances

In order to achieve an acceptable finish, it is imperative that framing is straight and true. Framing tolerances must comply with the relevant codes and the manufacturer's specifications.

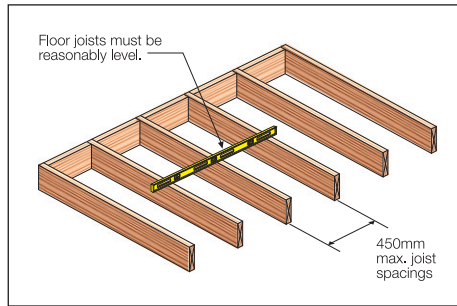


FIGURE 1 FRAME PREPARATION

PANEL LAYOUT

Scyon™ Secura™ wet area flooring is installed across the floor joists with the short sheet edges being butt jointed on joists. See Figure 2.

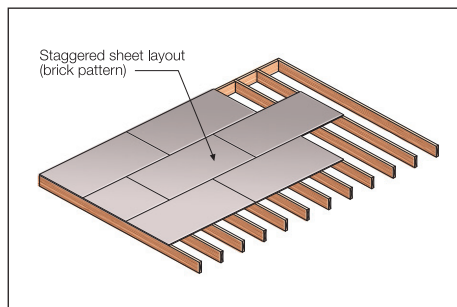


FIGURE 2 FRAME PREPARATION

Being 19mm thick, Scyon™ Secura™ wet area flooring can be combined with traditional particleboard or plywood flooring substrates. There are two options to install Scyon™ Secura™ wet area flooring in the intended wet area, refer to Figures 3a and 3b.

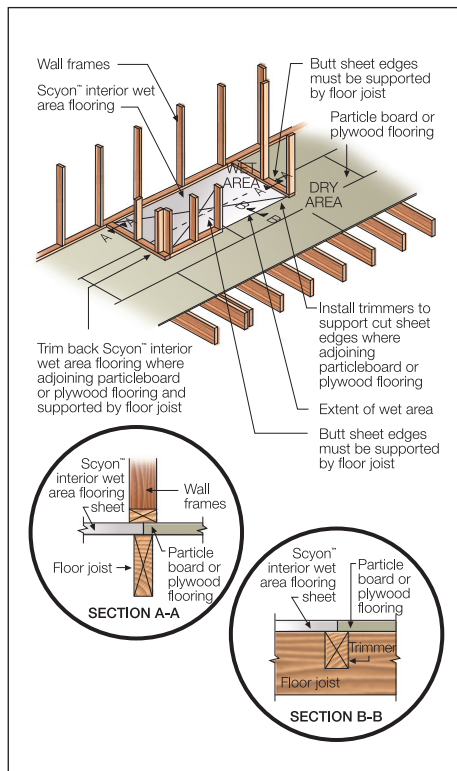


FIGURE 3A OPTION 1 - INSTALLING SCYON SECURA WET AREA FLOORING TO EXTENT OF WET AREA

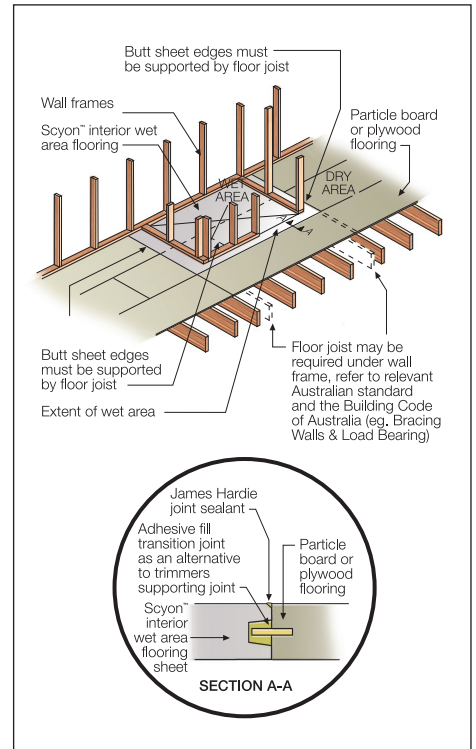


FIGURE 3B OPTION 2 - INSTALLING SCYON SECURA WET AREA FLOORING BEYOND EXTENT OF WET AREA (TO SUIT SHEET LAYOUT)

INSTALLATION STEPS

NOTE: You must ensure the product is of acceptable quality prior to installation, see Important Note 5. The following illustrations show how to install the Scyon™ Secura™ wet area flooring.

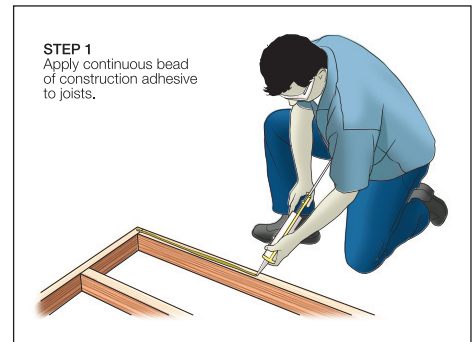


FIGURE 4 CONSTRUCTION ADHESIVE



FIGURE 5 FIXING 1ST PANEL

FASTENER SELECTION

PRODUCT	TIMBER JOISTS	STEEL JOISTS 0.75 - 1.6MM BMT	STEEL JOISTS BETWEEN 1.6 TO 1.9MM BMT
2.8 x 50mm FC nails	✓		
50mm D Head gun nails	✓		
No.8 x 40mm CSK self drilling screw	✓		
40mm HardiDrive screw		✓	
40mm CSK self drilling screws			✓*

NOTE: All fasteners must have a Class 3 finish minimum. Fasteners with equivalent dimensions (i.e. head size and shape, shank diameter and length to those above) are acceptable for use. *Refer to manufacturer's specifications for suitability.

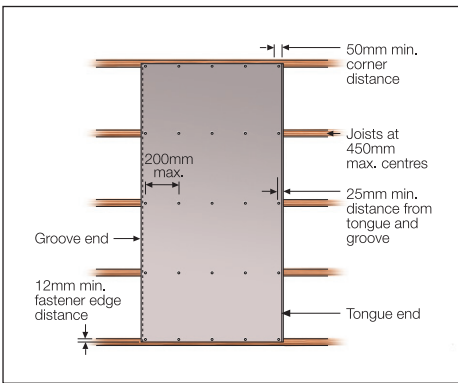


FIGURE 6 FASTENER LAYOUT

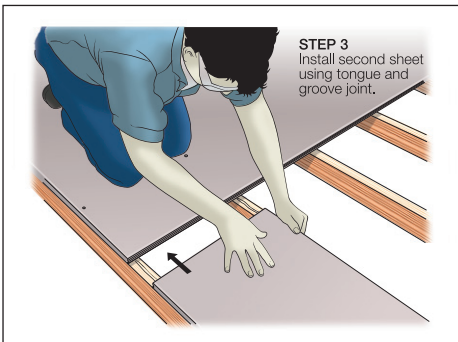


FIGURE 7 JOINING 2ND PANEL

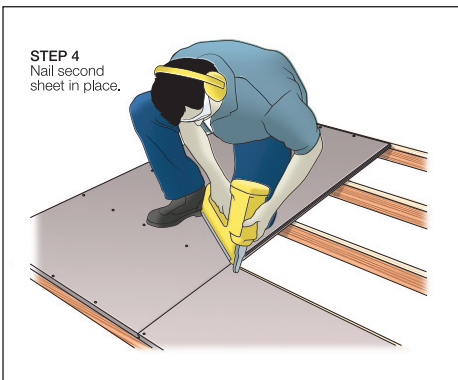


FIGURE 8 NAILING 2ND PANEL

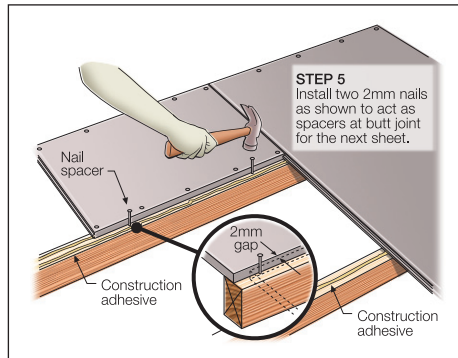


FIGURE 9 SEALING PANEL EDGES

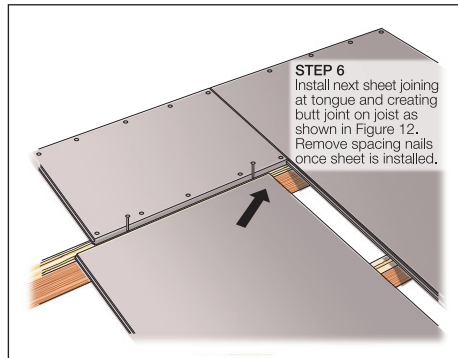


FIGURE 10 JOINING 3RD PANEL

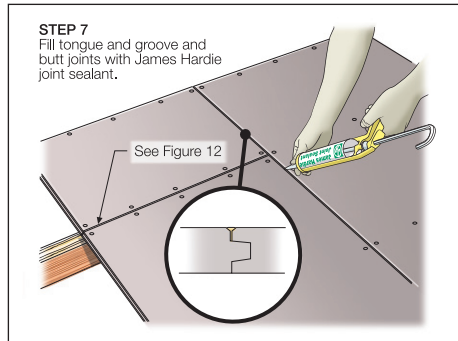


FIGURE 11 SEALING THE JOINT

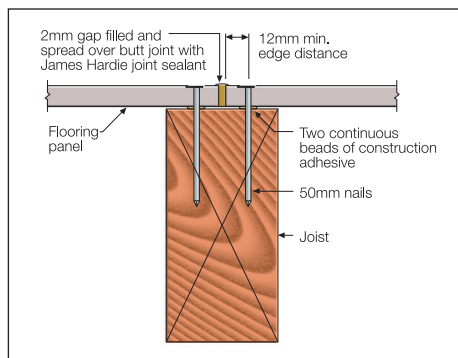


FIGURE 12 BUTT JOINT

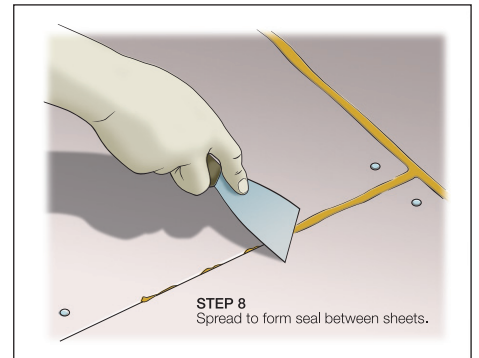


FIGURE 13 REMOVING EXCESS SEALANT

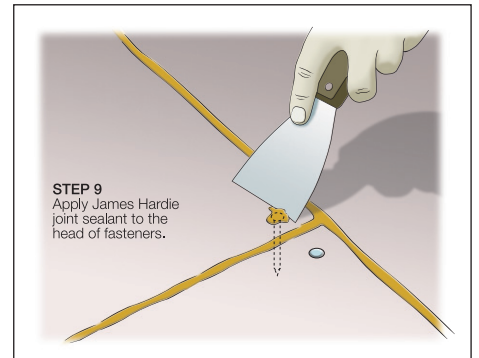


FIGURE 14 SEALING OVER FASTENERS

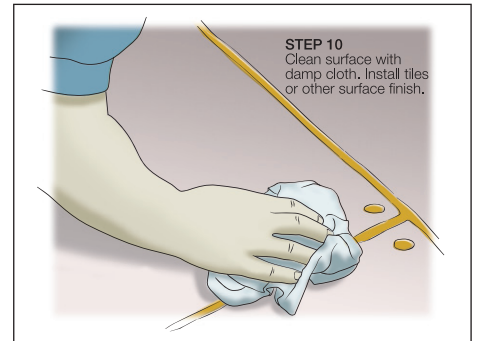


FIGURE 15 CLEANING SURFACE

PRODUCT INFORMATION

General

Scyon™ Secura™ wet area flooring is a reengineered concrete formulation utilising patented technology. The basic composition is Portland cement, ground sand, cellulose fibre, water and proprietary additives. Scyon™ Secura™ wet area flooring is manufactured to AS/NZS 2908.2 'Cellulose-Cement Products Part 2: Flat Sheets'. Scyon™ Secura™ wet area flooring is classified Type B, Category 2 in accordance with AS/NZS 2908.2.

For Material Safety Data Panels (MSDS) visit www.jameshardie.com.au or Ask James Hardie™ on 13 11 03.

Product mass

Based on equilibrium moisture content the Scyon™ Secura™ wet area flooring is 22.5kg/m².

Durability

Resistance to moisture/rotting

Scyon™ Secura™ wet area flooring has demonstrated resistance to permanent moisture induced deterioration (rotting) by passing the following tests in accordance with AS/NZS2908.2:

- Water permeability (Clause 8.2.2)
- Warm water (Clause 8.2.4)
- Heat rain (Clause 6.5)
- Soak dry (Clause 8.2.5)

Resistance to termite attack

Based on testing completed by CSIRO Division of Forest Products and Ensis Australia James Hardie building products have demonstrated resistance to termite attack.

Resistance to fire

Scyon™ Secura™ wet area flooring is suitable where non-combustible materials are required in accordance with C1.12 of the Building Code of Australia. Scyon™ Secura™ wet area flooring has the following early fire hazard indices (tested to AS 1530 Part 3).

EARLY FIRE HAZARD INDICES

Ignition index	0
Flame spread index	0
Heat evolved index	0
Smoke developed index	0 - 1

NOTES: Zero is the best possible result. The range is 0 - 10, except Ignition Index which is 0 - 20.

MEMBRANES AND FINISHES

For wet area applications this manual must be read in conjunction with James Hardie's Wet Area Construction Design Manual which provides wet area waterproofing requirements and details. The waterproofing requirements of AS 3740 and the BCA must be met. Once Scyon™ Secura™ wet area flooring has been fixed in place, install floor tiles in accordance with tile manufacturer's specifications within 3 months of installation.

MAINTENANCE

Regular cleaning and maintenance of the finished surface, joints, junctions, penetrations etc must be carried out at regular intervals. Maintain waterproofing to meet the objectives of AS 3740 and as per the requirements of the relevant component manufacturer.

WARRANTY

James Hardie Australia Pty Limited ("James Hardie") warrants to the first purchaser of the Product and the last purchaser prior to the installation of the Product for a period of 10 years from the date of purchase that Scyon™ Secura™ wet area flooring (the "Product") will be free from defects due to defective factory workmanship or materials and, subject to compliance with the conditions below, will be resistant to cracking, rotting, fire and damage from termite attacks to the extent set out in James Hardie's relevant published literature current at the time of installation. James Hardie warrants for a period of 12 months from the date of purchase that the accessories supplied by James Hardie will be free from defects due to defective factory workmanship or materials.

Nothing in this document shall exclude or modify any legal rights a customer may have under the Trade Practices Act or otherwise which cannot be excluded or modified at law.

Conditions of Warranty

The warranty is strictly subject to the following conditions:

- (a) James Hardie will not be liable for breach of warranty unless the claimant provides proof of purchase and makes a written claim either within 30 days after the defect would have become reasonably apparent or, if the defect was reasonably apparent prior to installation, then the claim must be made prior to installation;
- (b) this warranty is not transferable;
- (c) the Product must be installed and maintained strictly in accordance with the relevant James Hardie literature current at the time of installation and must be installed in conjunction with the components or products specified in the literature. To obtain copies of such literature contact Ask James Hardie™ on 13 11 03. Further, all other products, including coating and jointing systems, applied to or used in conjunction with the Product must be applied or installed and maintained strictly in accordance with the relevant manufacturer's instructions and good trade practice;
- (d) the project must be designed and constructed in strict compliance with all relevant provisions of the current Building Code of Australia, regulations and standards;

- (e) the claimant's sole remedy for breach of warranty is (at James Hardie's option) that James Hardie will either supply replacement product, rectify the affected product or pay for the cost of the replacement or rectification of the affected product;
- (f) James Hardie will not be liable for any losses or damages (whether direct or indirect) including property damage or personal injury, consequential loss, economic loss or loss of profits, arising in contract or negligence or howsoever arising. Without limiting the foregoing, James Hardie will not be liable for any claims, damages or defects arising from or in any way attributable to poor workmanship, poor design or detailing, settlement or structural movement and/or movement of materials to which the Product is attached, incorrect design of the structure, acts of God including but not limited to earthquakes, cyclones, floods or other severe weather conditions or unusual climatic conditions, efflorescence or performance of paint/coatings applied to the Product, normal wear and tear, growth of mould, mildew, fungi, bacteria, or any organism on any Product surface or Product (whether on the exposed or unexposed surfaces);
- (g) all warranties, conditions, liabilities and obligations other than those specified in this warranty are excluded to the fullest extent allowed by law;
- (h) if meeting a claim under this warranty involves re-coating of Products, there may be slight colour differences between the original and replacement Products due to the effects of weathering and variations in materials over time.

DISCLAIMER

The recommendations in James Hardie's literature are based on good building practice, but are not an exhaustive statement of all relevant information and are subject to conditions (c), (d), (f) and (g) above. Further, as the successful performance of the relevant system depends on numerous factors outside the control of James Hardie (eg quality of workmanship and design), James Hardie shall not be liable for the recommendations in that literature and the performance of the relevant system, including its suitability for any purpose or ability to satisfy the relevant provisions of the Building Code of Australia, regulations and standards.

For more information please Ask James Hardie™ on 13 11 03 or visit www.jameshardie.com.au

Ask James Hardie™
Call 13 11 03
www.jameshardie.com.au

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