

Stonesheet[™] Substrate for stone facades & exterior tiling

Technical Specification | Oct 2012

Update: This document replaces the technical details in BGC External Cladding brochure July 2007 and BGC Stonesheet[™] Technical Update June 2008 and September 2010.

This document is to be read in conjunction with BEAL Appraisal C807 BGC Stonesheet[™] and Render Tape for use with manufactured or natural stone slip veneers.

Product Description

BGC Stonesheet[™] is a purpose designed Fibre Cement sheet for external application. It is recommended as a backing board for stone slip substrates on timber framed buildings.

BGC Render Tape is a single-faced self-adhesive tape comprising a non-woven polyester fabric adhered to a film of butyl-rubber.

BGC Render Tape comes in a 60mm x 20m roll.

Sheet Sizes & Mass

Stonesheet[™] is available in the following tabulated sizes. The approximate weight of Stonesheet[™] at equilibrium moisture content (7% moisture) is also as tabulated:

Thickness	Length	Width	Approx. Weight
(mm)	(mm)	(mm)	(kg/m²)
7.5	3000	1200	11.8
9.0	3000	1200	14.27

Framing

Please refer to page 6, Timber Framing Section of the BGC Durasheet[™] brochure - February 2010. Please also refer to your stone supplier for any specific framing requirements.

Fixing Guide

Slip Weight (kg/m²)	Wall Height	Stonesheet™ Type (mm)
20 – 50	Up to and above 4m	7.5
50 - 60	Up to 4m	7.5
50 - 60	Above 4m	9.0

Fasteners:

- Cavity 10g x 65mm Surefast Screws
- Direct Fixed -10g x 50mm Surefast Screws
- Washer Direct and Cavity M6 x 19mm x 1.6mm
- Interior Application Zinc Chromate
- Exterior Application Stainless Steel 304 or 316
- Or fasteners as per your stone suppliers installation details.

Screws and washers can be sourced from BGC, MSL Fortress Fasteners or your local Building Merchant, providing they are compliant with AS 3566 part 2.

For stone weights above 60 kg/m² please refer to your stone supplier for fasteners, mechanical fixings and adhesives.

Installation

BGC Stonesheet[™] can either be installed on a cavity or direct fixed. This is determined upon the calculated Risk Score as per the NZBC, Section 3 of E2/AS1.

General fixing:

- · Sheets are to be fixed vertically with a 2-3mm gap between sheets.
- Sheets are to be fixed with screws and washers, as per the fixing guide, at 200mm centres (edges and centre). Sheets must be fixed with the smooth side on the external face (i.e. rough surface on the framing side).
- Screws must be 12mm from the edge and 50mm from the corner of the sheets.
- · Or fixed as per your stone suppliers installation details.

Joints:

- Joints must be dry and free from dust and contaminates before applying the BGC Render Tape. BGC Render tape is to be installed over the joint with the joint in the centre of the tape. The tape must be well adhered to the Stonesheet[™] by pressing down on both sides of the adhesive tape.
- Where the BGC Render Tape has been applied to both the vertical and horizontal joint, the tape is to be installed so it overlaps the tape already applied. To join the tape – overlap the joint by at least 100mm. BGC Render tape can be used for both vertical and horizontal sheet joints except for Horizontal Control Joints (5400mm maximum centres or all floor joist locations).
- Horizontal Control Joints must be formed as per E2/AS1 fig 107 and/or fig 108 for up to 2 stories – BGC Render tape can be applied over the Horizontal joint to ensure the joint is kept free from Adhesives or Fig. 70 for over 2 stories in height.
- Vertical Non Flush finished joints are deemed to be control joints so no special vertical control joint is required.

Corners:

 Sheets are to be butt jointed (leave 2-3mm gap) with tape applied over the joint.

General:

- BGC Stonesheet[™] should not be left exposed in external applications for longer than 90 days before the installation of the stone work.
- All cut sheet edges must be sealed with BGC Edge Sealer which can be ordered with BGC Stonesheet[™] from your local Building Merchant.
- For information on BGC Render Tape contact BGC Fibre Cement (NZ).
- Please also refer to E2/AS1 section 9.7 Fibre Cement.

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Note

Stonesheet[™] is a non-structural substrate. BGC does not accept any responsibility for the selection and design of mechanical fixing and adhesives used. Installation instructions and recommended kg/m² are supplied as a guide only.

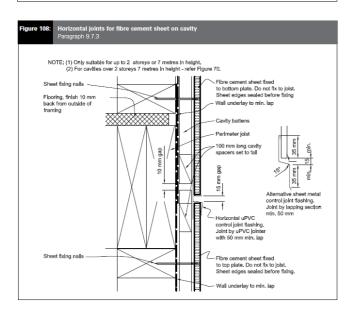
BGC Stonesheet™ and BGC Render tape are not the primary waterproofing in a Stone Slip veneer system.

BGC recommend using a Stone system that has been suitably evaluated to comply with all relevant Building Codes and standards.

Pictorial Figures

Following are pictorials taken from section 9.5 of the NZBC Acceptable Solutions E2/AS1 (Amendment 5 - 1 August 2011).

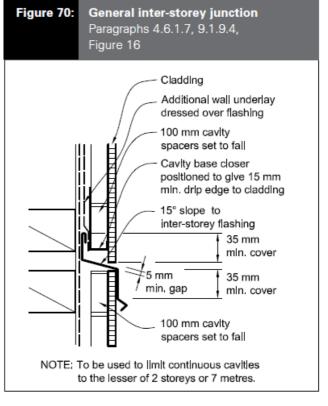
ntal joints for direct fixed fibre cer igure 107 Fibre cement sheet fixed to bottom plate. Do not fix to joist Sheet edges sealed before fixing Sheet fixing nalls Flooring, finish 10 mm b from outside of framing Wall underlay fitted ove horizontal joint flashing \otimes er jolst B 5 Joint by lapping section min. 50 mm tzontal uPVC trol joint flashing nt by uPVC jointe 50 mm min, lar Sheet fixing nalls Flbre cement sheet flxed to top plate. Do not flx to jolst. Sheet edges sealed before flxing Wall underlay under horizontal



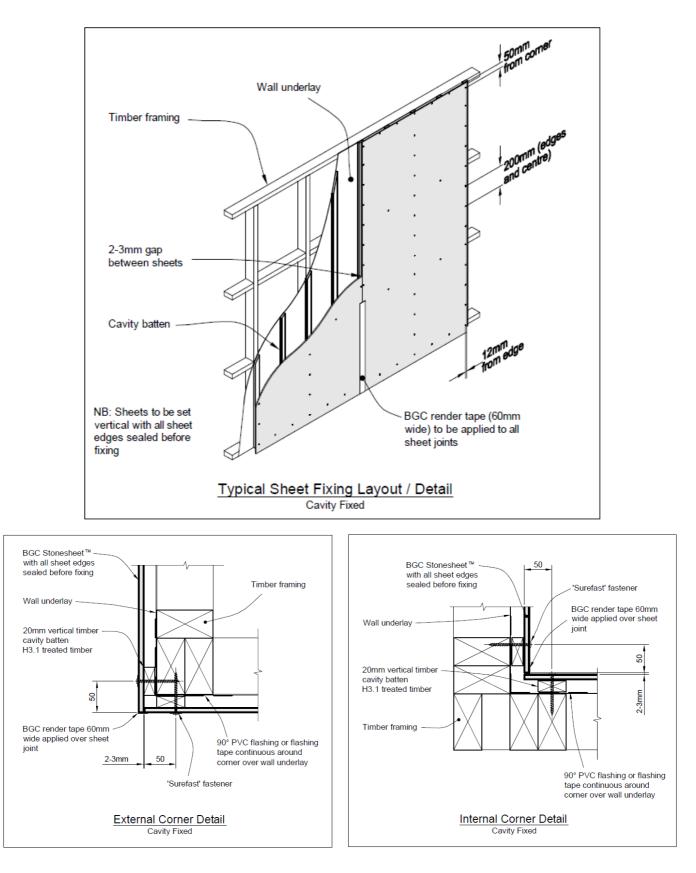
Warranty

BGC warrants Stonesheet[™] to be free from defects caused by defective manufacture or materials for a period of 15 years from the date of purchase. Furthermore, BGC warrants its products to be resistant from rotting, fire and cracking so long as the installation is carried out in accordance with BGC literature available at the time of purchase.

This warranty is subject to conditions as set out in a separate document. For a copy of this information and/or a copy of the quality control measures, please contact BGC Fibre Cement (NZ).



Architectural Details



BGC Fibre Cement

Notes:



BGC Fibre Cement provides builders, developers and architects with a range of design alternatives and innovative products, such as:

EXTERIOR PRODUCTS AND APPLICATIONS Innova™ Range of Products:		
¥	dential & Duragrid™ Light Commercial	
·	A lightweight façade giving a modern and durable finish.	
Duracom™	A compressed fibre cement façade system.	
Duragroove™	A vertically grooved exterior façade panel.	
Durascape™	A lightweight exterior façade base sheet with a subtle vertical shadow line.	
Nuline™	A weatherboard style cladding system.	
Stonesheet [™]	A purpose designed substrate for stone tile	
	facades.	

EXTERIOR PRODUCTS AND APPLICATIONS BGC Fibre Cement Range of Products:

Durasheet™	Ideal for the cladding of gables and lining of eaves.
	Can also be used on commercial soffits and
Duranlank	cladding.
Duraplank™	A weatherboard style cladding system, available in Smooth and Woodgrain finishes.

EXTERIOR PRODUCTS AND APPLICATIONS BGC Fibre Cement Range of Products (Continued):		
Duralux™	Suitable for exterior applications where it will be sheltered from direct weather.	
Duraliner™	Suitable for eaves and soffits where it will be sheltered from direct weather.	
INTERIOR PROI	DUCTS AND APPLICATIONS	
Duralux™	A square edge interior lining board. This is a perfect substrate for tiles and is ideal for wet areas.	
Duraliner™	A rebated interior lining board. This is a perfect substrate for tiles and is ideal for wet areas.	
Duraliner™ Ceramic Tile F	substrate for tiles and is ideal for wet areas.	
	substrate for tiles and is ideal for wet areas.	