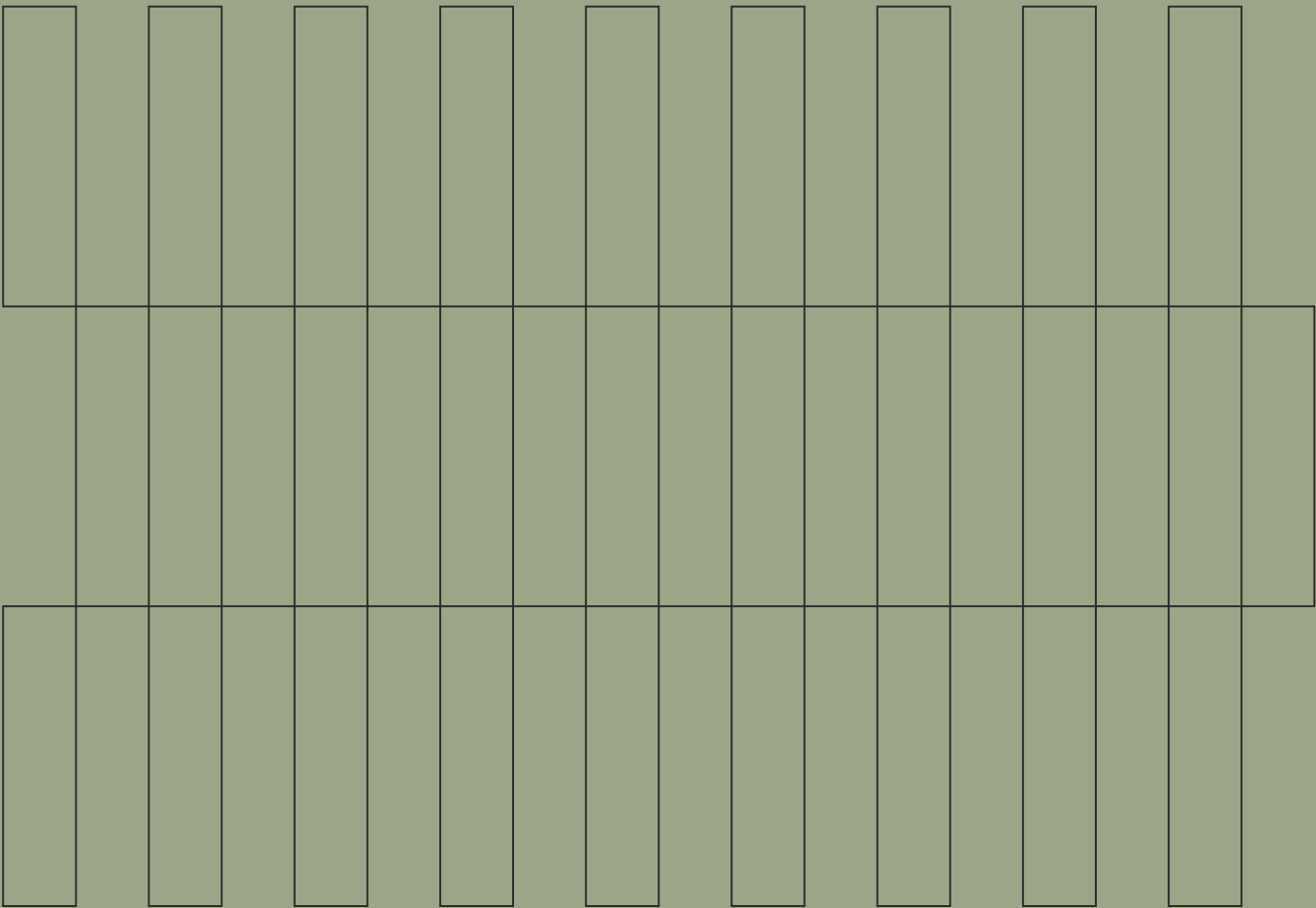




Alu Selekt Channel and Castellation

Installation Guide

Product description

Modinex Alu Selekt Channel and Castelation is an innovative exterior cladding product made from highly durable solid extruded aluminum. This non-combustible cladding looks just like timber and can be alternated as a sustainable option. Eco-friendly, low maintenance and incredibly durable, it's ideal for high rises and bushre rated areas designed for ease of installation.

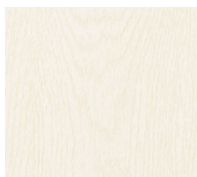
Colours/Finishes

— MXDURA

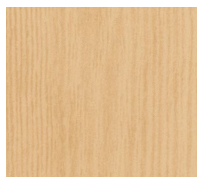
The MX Dura timber look finish is a next-generation signature double baked powder coat timber grain finish with a 3D grain, 25-year structural warranty and 15-year fading warranty for internal and external use.



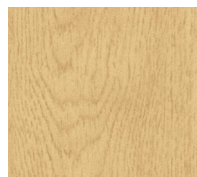
Everest



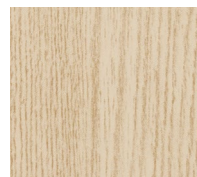
Light Oak



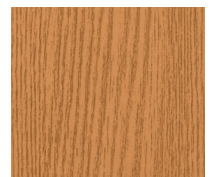
Tasmanian Oak



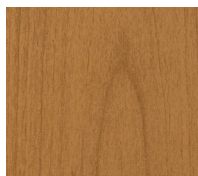
Blackbutt



Cedar



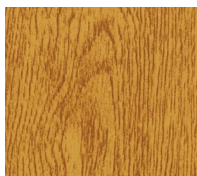
White Oak



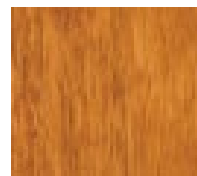
Spotted Gum



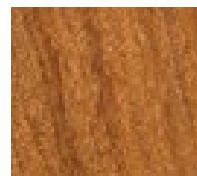
Dark Cedar



American Oak



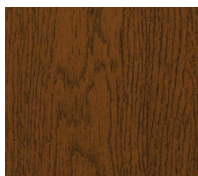
Brushbox



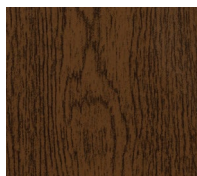
Meranti



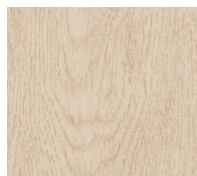
English Oak



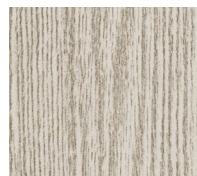
Brown Oak



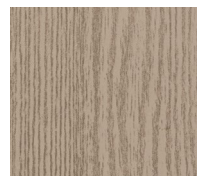
Dark Smoked Oak



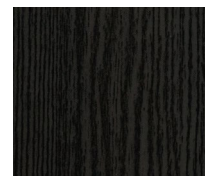
Sivertop Ash



White Birch



Silver Oak



African Ebony

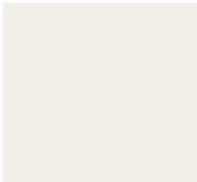
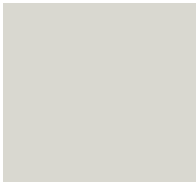
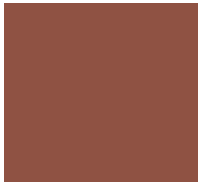
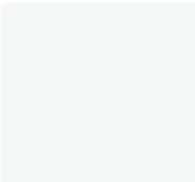
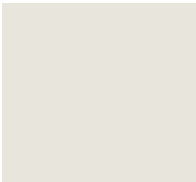


Midnight Carbon

Solid Powder Coat Colours

— ALPHA

The Alpha solid colour range is a collection of on trend solid colours, delivered with warranty grade advanced super durable polyester thermosetting powder.

					
Basalt Matt / Satin	Dune Matt / Satin	Natural White Matt	Shale Grey Matt / Satin	Surfmist Matt / Satin	Territory Matt
					
White Matt / Gloss	Talc Satin	Lunar Grey Matt	Silver Grey Matt	Timberland Satin	Charcoal Satin
					
Monument Matt / Satin	Black Matt				

*All Interpon and Dulux standard colours are available.

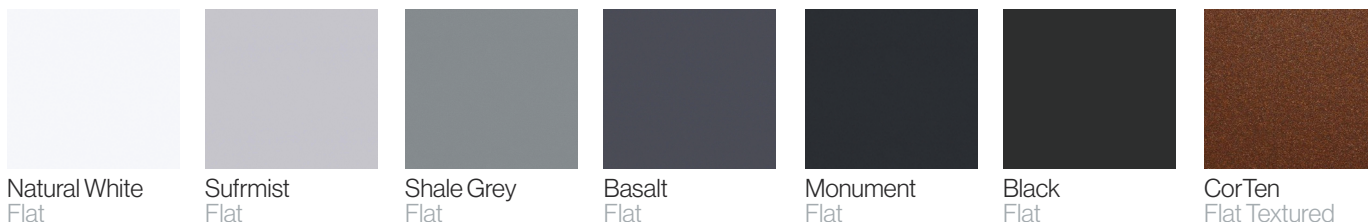
— CHARISMA

The Charisma™ flat matt range features contemporary, solid colours in a flat matt finish for a subtle and sophisticated look, delivered with warranty grade advanced super durable polyester thermosetting powder.



— STRUTTURA

The Struttura Range is a collection of popular, highly mar and scuff resistant textured finishes built to protect, delivered with warranty grade advanced highly durable polyester thermosetting powder.



*All Interpon and Dulux standard colours are available.

— METTALICO

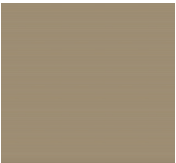
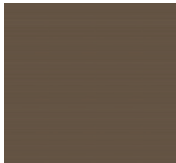
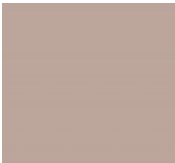
The Metallico anodised look range is a collection of unique anodised look finishes, designed to subtly change in appearance as light conditions after in the day, delivered with warranty grade advanced super durable polyester thermosetting powder.



Anodised Colours

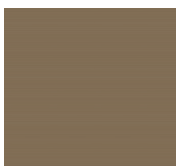
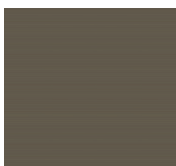
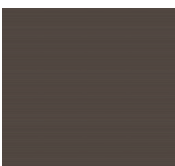
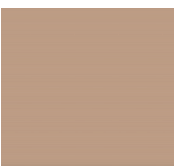
— MATT

The traditional sophisticated matt lustre (10% Gloss).

						
Portland Stone — E60TM	Amber Gold — E42TM	Jamaican Chocolate — E42TM	Summer Maize — E82GM	Sovereign Gold — E78GM	Maroochy Sand — E74GM	Prosecco — E70RM

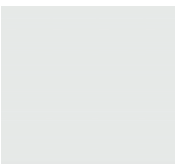
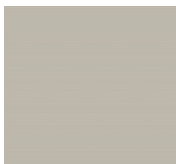
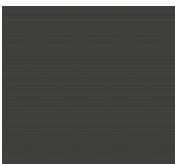
— ILLUSTRO

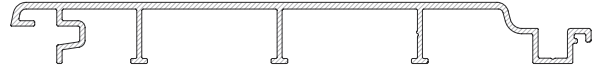
Best of both, this hybrid provides an elegant look and feel (30% Gloss).

						
Bold as Brass — E58TL	Medallion Bronze — E44TL	Macchiato — E36TL	Bronze Monument — E30TL	Gold Odyssey — E78GL	Blush — E64RL	Copper Coin — E56RL

— BRIGHT

A brilliant finish that makes your product stand proud (80% Gloss).

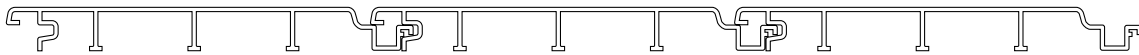
				
Diamond Light — E87CB	Moonbeam — E74NB	Smokey Quartz — E60TB	Smooth Onyx — E25TB	Burnished Gold — E80GB



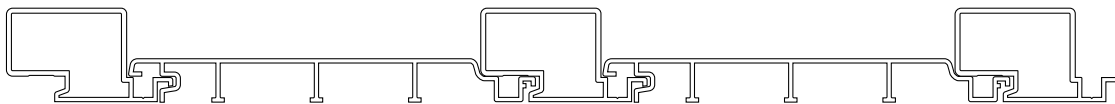
Alu Selekt Profile Cladding

General information, profile dimensions, calculating the required quantity and guidelines

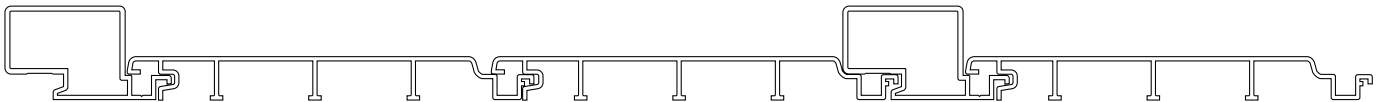
The scope of this installation covers all installation variants of facade cladding, including soffits



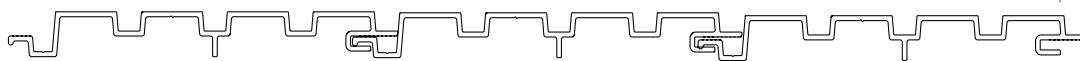
Alu Selekt Groove Profile Cladding - Option 1



Alu Selekt Batten Profile Cladding - Option 2



Alu Selekt Batten Profile Cladding - Option 3



Alu Selekt Castellation Profile Cladding - Option 4

Calculating required quantity (calculation values exclude cutting waste)

			Required quantity/m ²	Required quantity/m ²
	Coverage width	Standard lengths	Facade profile	Galvanised screws 3.9 x 15 mm
Modinex Alu Selekt Channel Cladding at max. fastening spacing = 625mm				
Alu Selekt Channel	155 mm	5,400 mm	6.45 Linear m	0.3 pcs.
Alu Selekt Castellation	190 mm	5,400 mm	NIL	103 pcs.

Sub-framework of facade cladding

Typical top hat spacing is 625mm. Increased wind suction at the edge areas of the building walls must be considered when planning the sub-framework. The fastening spacing of the Alu Selekt profiles must be reduced to max. 300 mm in these areas; additional support battens must be provided as necessary.

Installation lengths

For installation lengths is 5400mm as set lengths. Expansion joints are dependent on local temperature fluctuations.

Wind loadings

This is a simplified form or general rule of thumb for wind loadings. The product has been tested and results reported by Sum mermore Pty Ltd. to the requirements of:

Generic Structural Design Certificate

(supplied by summermores engineering – refer to the Alu Selekt Channel warranty)

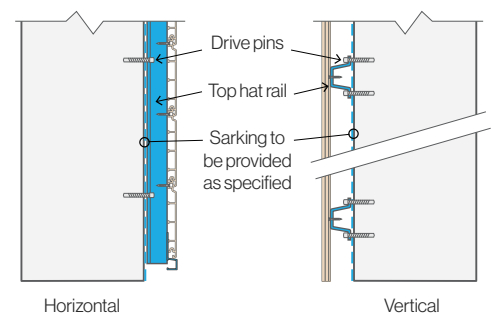
The Alu Slekt Channel is design certified and complies with the following provisions of the building act 1993, Building regulations 2018 or Nation Construction Code.

Act, Regulation or NCC	Section, Regulation, Part, Performance Requirement or Other Provision
AS/NZS1170.0: 2002	Structural Design Actions—General Principles
AS/NZS1170.1: 2002	Structural Design Actions—Permanent, Imposed & Other Actions
AS/NZS1170.2:2011	Structural Design Actions—Wind Actions
AS/NZS1664. 1:197	Aluminium Structures—Limit State Design
AS/NZS1664.2: 1997	Aluminium Structures—Allowable Stress Design

Important Building Design Notes:

- The supporting wall must be watertight and correct flashings used in the event of any water penetration i.e. severe storms
- Refer to installation instructions for joint options
- Galvanised mild steel top hats are recommended with a minimum of 0.9mm thick G550 pull out capacity.
- Suggest drive pin / fixings for top hat to concrete or blockwork substrate to engineer specifications.
- Always confirm with a registered structural engineer.

Alu Selekt Channel Cladding fix to top hat sections per engineer specifications.



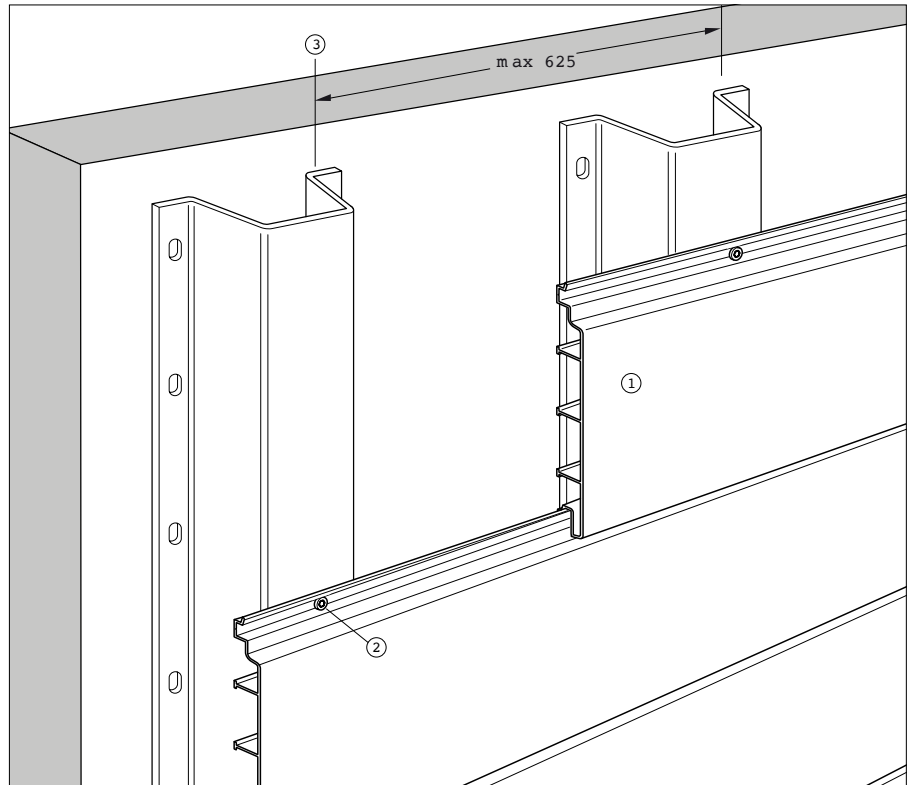
Notes:

The Building Design Engineer is to provide the design zones relating to Local Pressure requirements of AS/NZS 1170.2:2011 CL5.4.4.

The wood decors are equivalent to natural wood surfaces, meaning that different grain textures are possible within a single shipment (plain and/or mottled). Unfortunately, sorting at the factory is not possible! In order to obtain a uniform overall finish, we recommend considering this fact and, for example, laying out the façade profiles before starting with the installation.

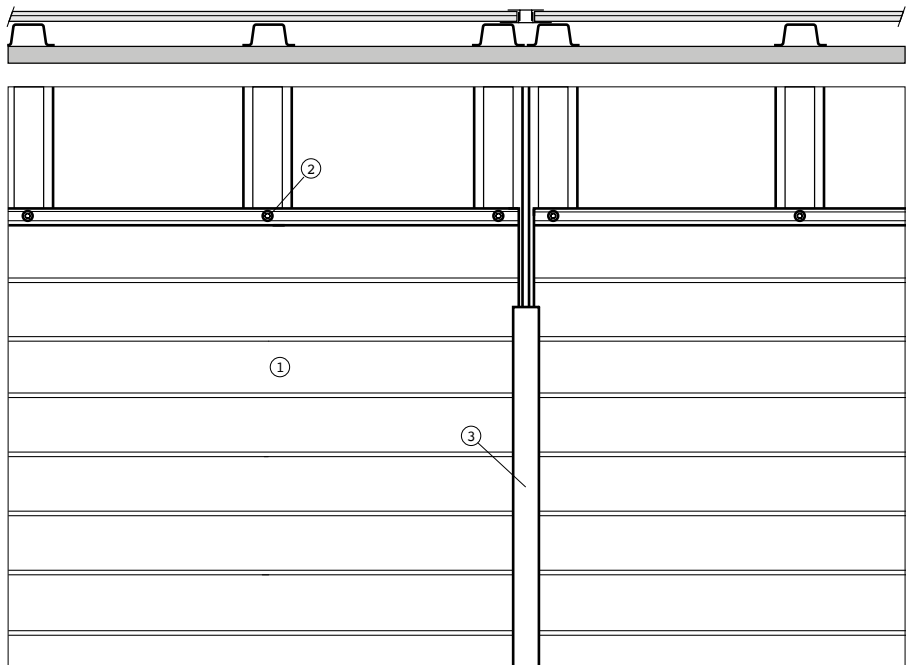
Horizontal Installation

1. Alu Selektfa facade profiles
2. 8-18x16 Metal Self Tapping Screw (Screw head must be a minimum of 8mm in Diameter]
3. Sub-Framework is to be provided by a minimum thickness 0.75mm G550 Battens spaced in accordance with the Summermore Design Tables. Fixing of the Sub-Framework Battens to the SubStructure is to be designed for by others.



A. Typical fixing detail

1. Alu Selektfa facade profiles
2. 8-18x16 Metal Self Tapping Screw
3. Cover profile.



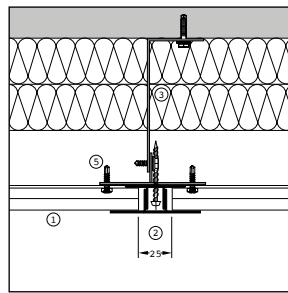
B. Typical joiner detail

Please Note:

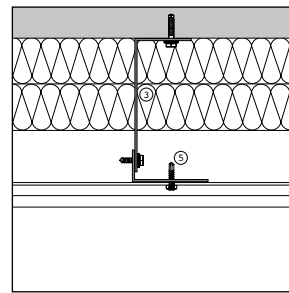
Refer to Generic Structural Design Certificate (available on our website)

Horizontal installation

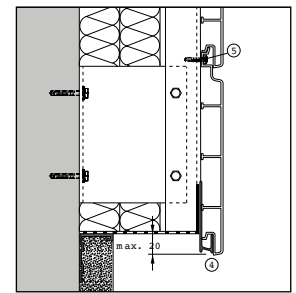
1. Alu Selekt facade profiles
2. Cover profile
3. Sub-framework
4. Horizontal Starter profile
5. 8-18×16 Metal Self Tapping Screw
6. Top hat section n
7. Drive Pin
8. Internal/external corner profile.



A. Joiner detail

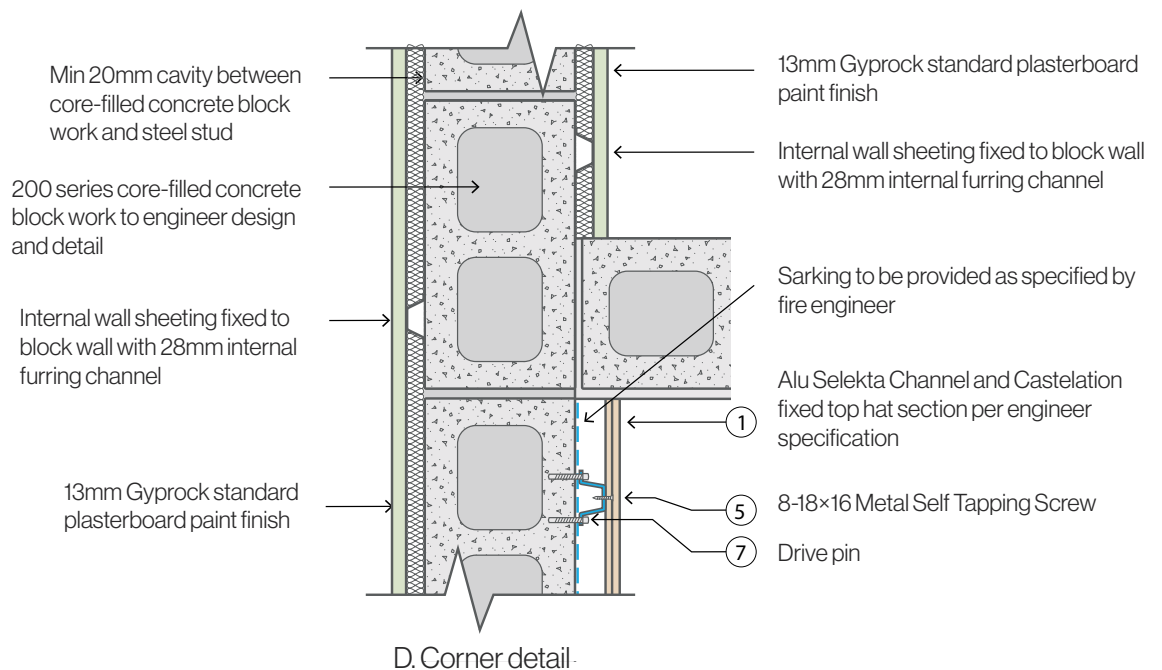


B. Fixing detail

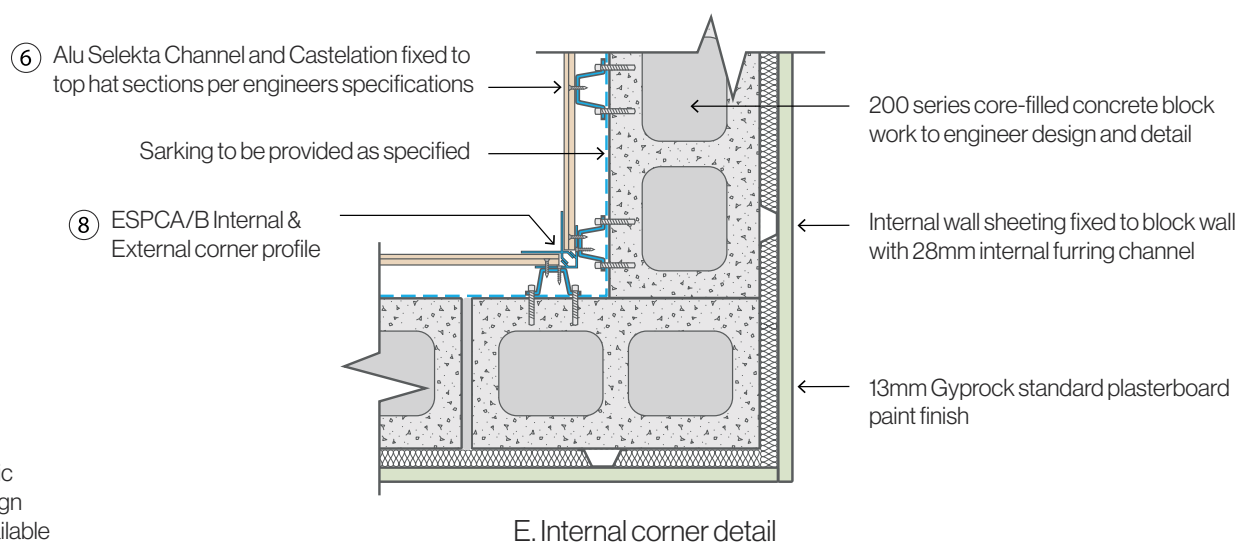


C. Vertical junction

Details are for light-weight construction techniques.



Note: Minimum 0.9mm G550 Battens spaced in accordance with the Summermore Design Tables

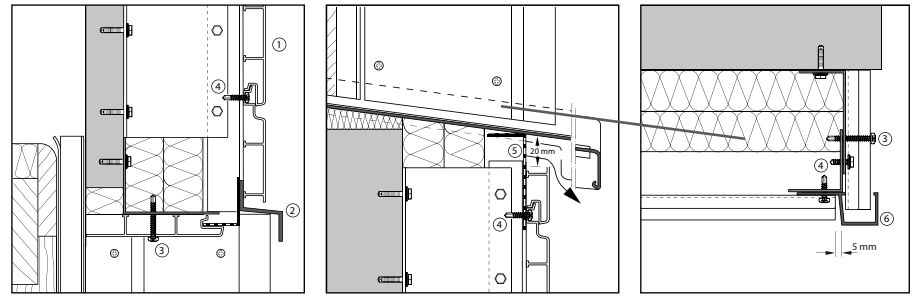


Please Note:

Refer to Generic Structural Design Certificate (available on our website)

Horizontal installation

1. Alu Selektfa façade profiles
2. Z profile
3. 8-18×16 Metal Self Tapping Screw
4. 8-18×16 Metal Self Tapping Screw
5. Ventilation pro file 30/90
6. Connection pro file F
7. ESA 4 Ox 20 L-profile
8. ESECB External corner box profile
9. Top hat section
10. Drive Pin
11. Starter profile - horizontal.

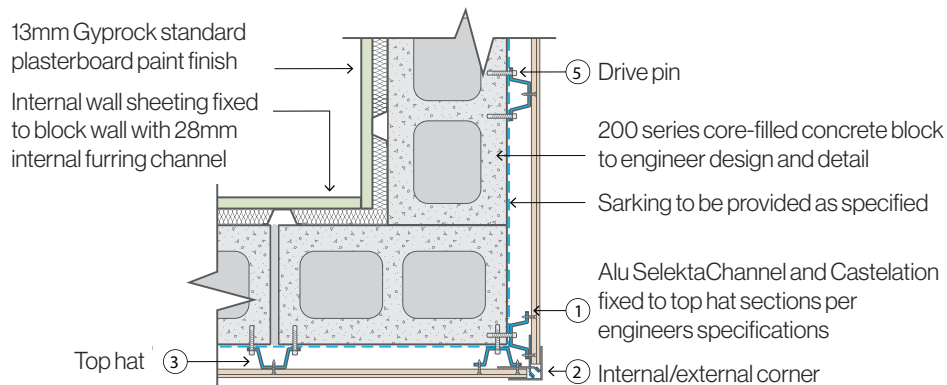


A. Junction detail

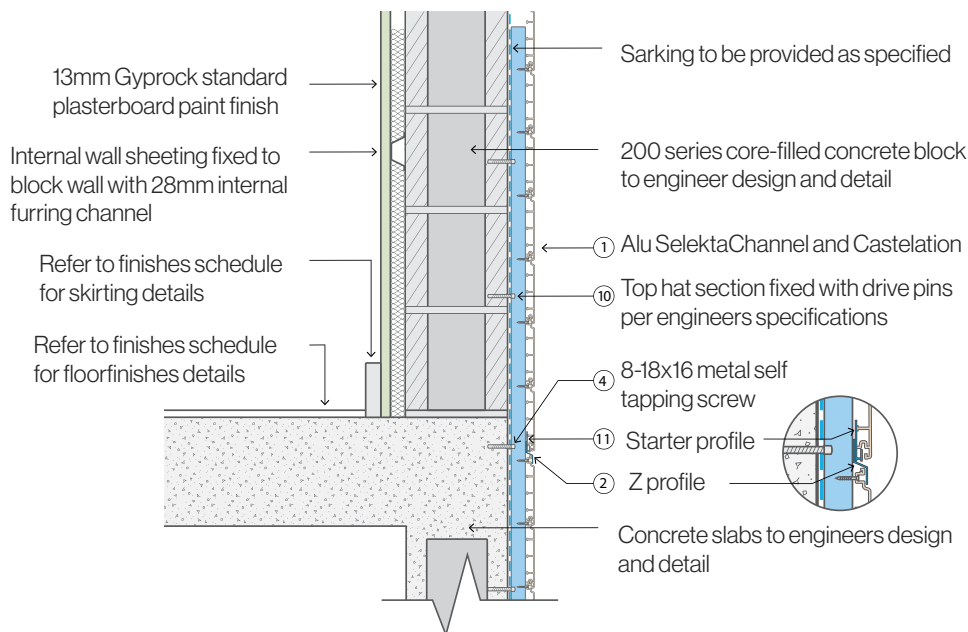
B. Window detail

C. Soffit detail

Details are for light-weight construction techniques.



D. Light weight construction facade to soffit detail



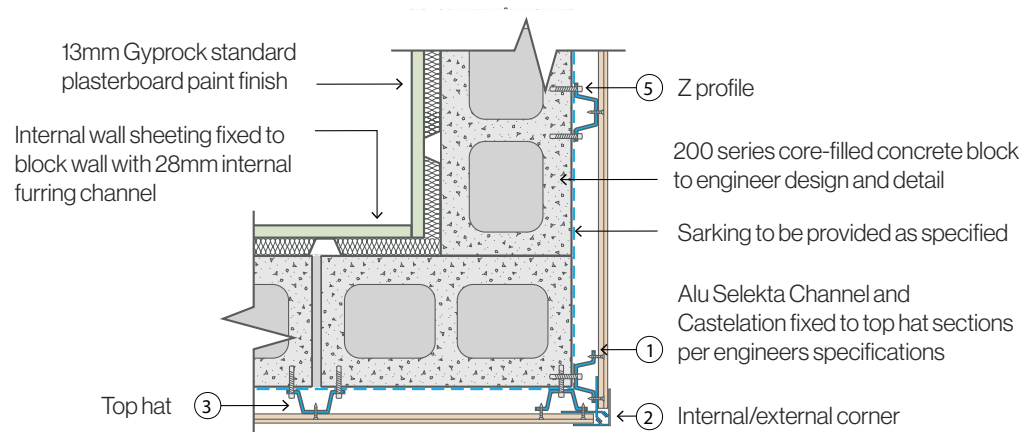
E. Starter detail

Please Note:

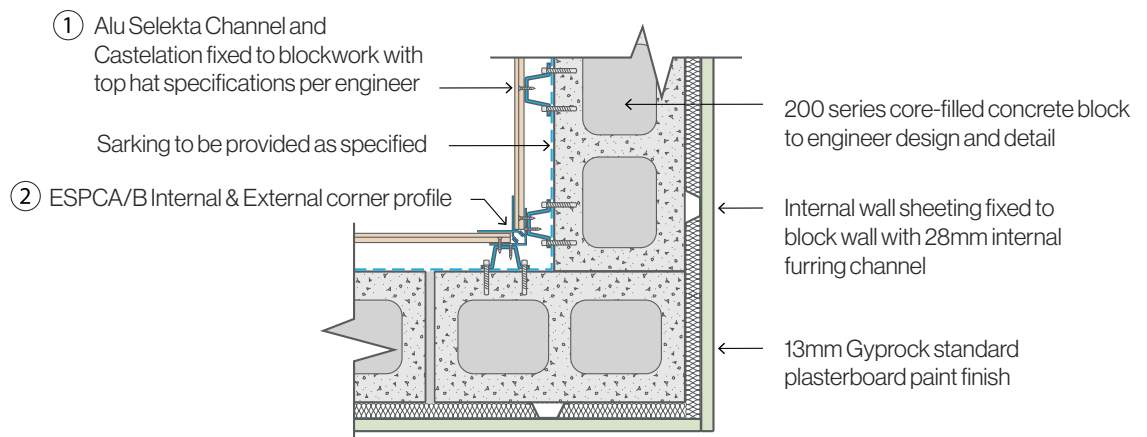
Refer to Generic Structural Design Certificate (available on our website)

Horizontal installation

1. Alu Selekt
2. Internal /external corner profile
3. Top hat section
4. 8-18x16 Metal Self Tapping Screw
5. Drive Pin



A. External corner details - masonry wall



B. Alternative internal corner detail - masonry wall

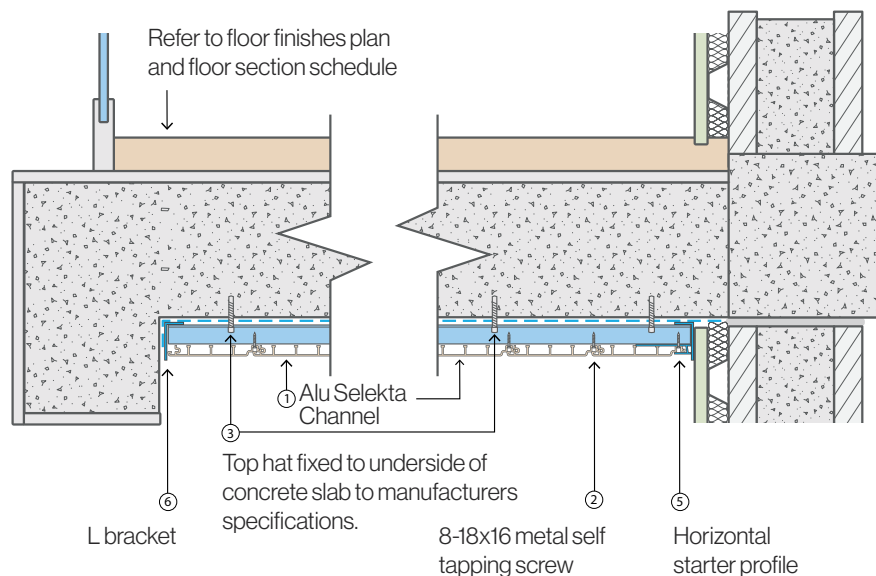
Please Note:

Refer to Generic
Structural Design
Certificate (available
on our website)

Soffit installation

1. Alu Selekt façade profiles
2. 8-18×16 Metal Self Tapping Screw
3. Sub-framework, spacing approx. 625 mm, structural analysis to be performed by the customer
4. 8-18x16 Metal Self Tapping Screw
5. Starter profile
6. Lbracket.

Important building design notes:
Designed with positive interlock so planks are self-supporting, as fixed into position in ceiling spaces.



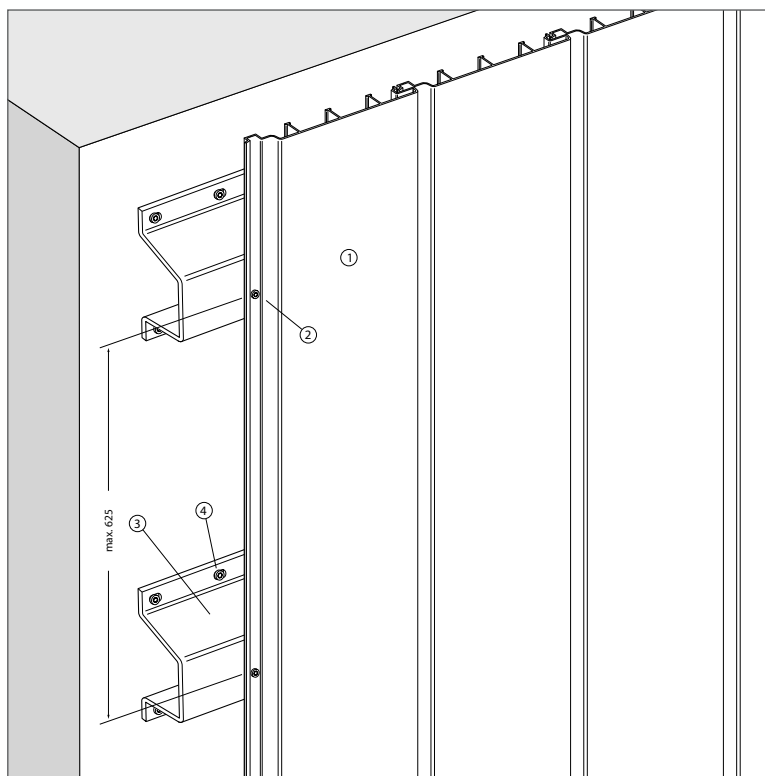
A. Soffit intallation detail

Vertical installation

1. Alu Selekt façade profiles
2. 8-18×16 Metal Self Tapping Screw
3. Sub-framework, spacing approx. 625 mm, structural analysis to be performed by the customer
4. Drive Pin.

Please Note:

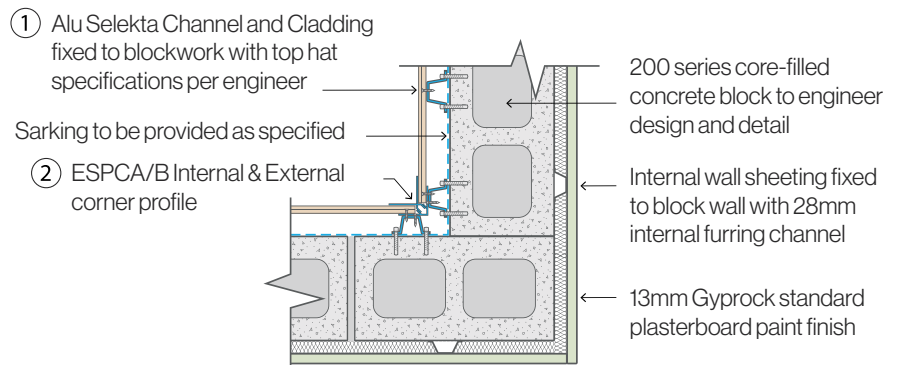
Refer to Generic
Structural Design
Certificate (available
on our website)



B. Vertical intallation detail

Vertical installation

1. Alu Selekt façade profiles
2. Sub-framework
3. 8-18×16 Metal Self Tapping Screw
4. Drive Pin
5. Aluminum external corner profile
6. Aluminum internal corner profile
7. F profile
8. Top Hat Section
9. Vertical starter profile
10. Z profile

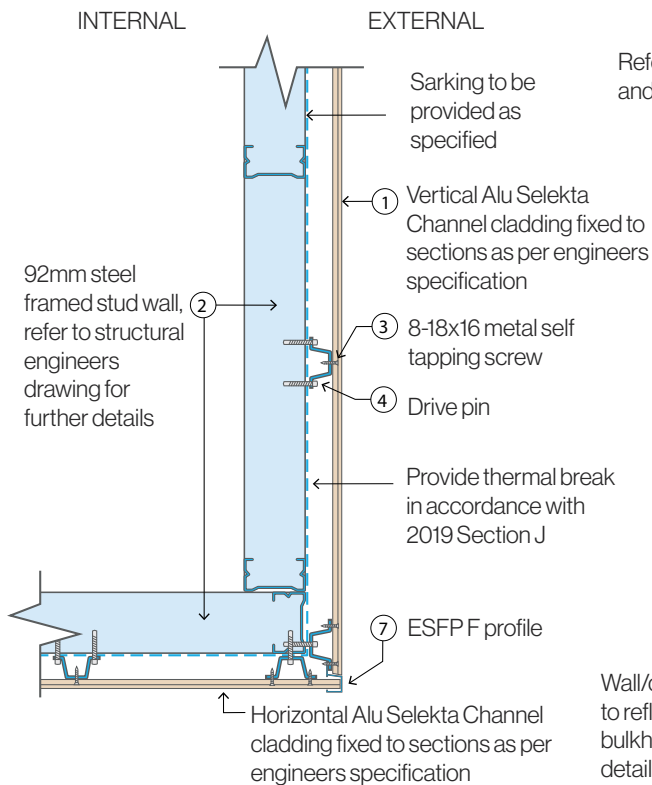


A. Alternative internal corner detail - masonry wall

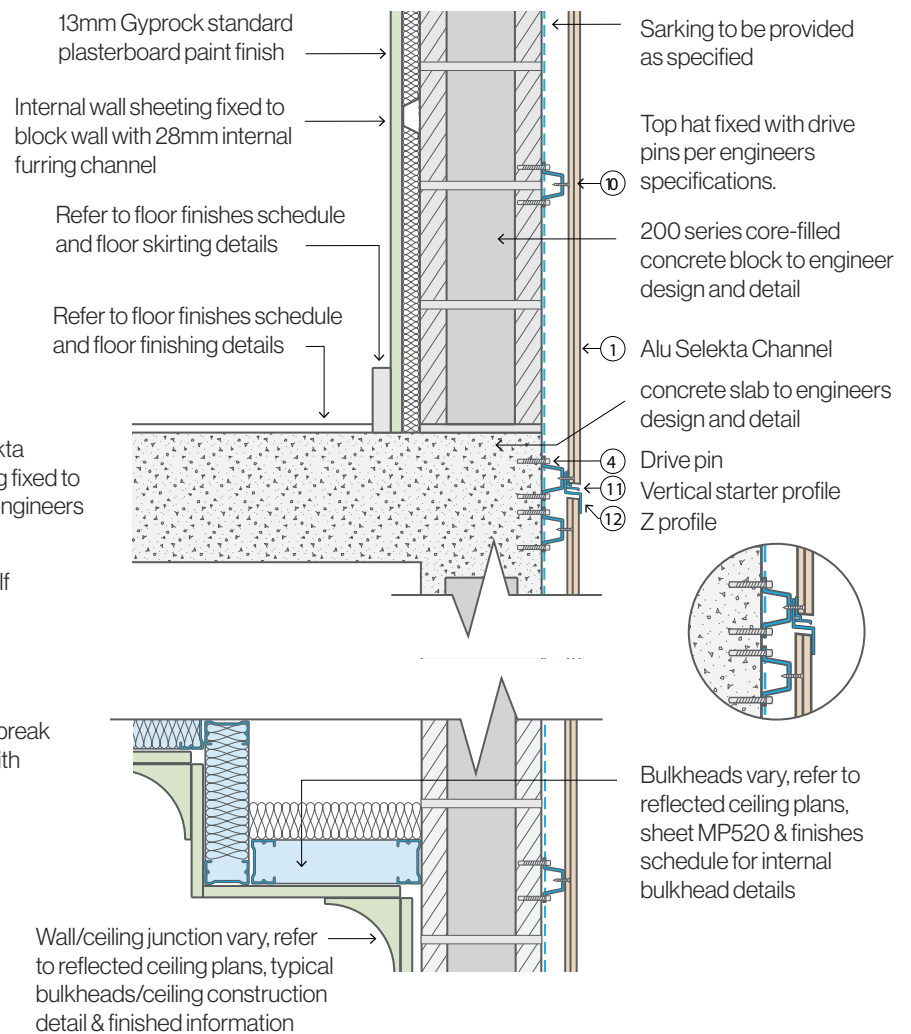
Alternative details utilising light-weight construction techniques.

Please Note:

Refer to Generic Structural Design Certificate (available on our website)



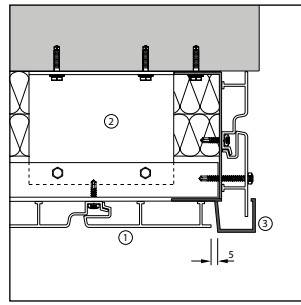
B. Light weight corner detail



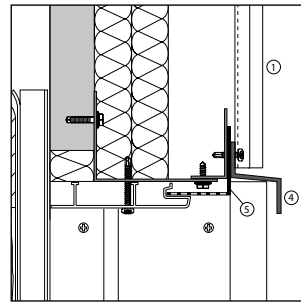
C. External masonry wall detail

Vertical installation

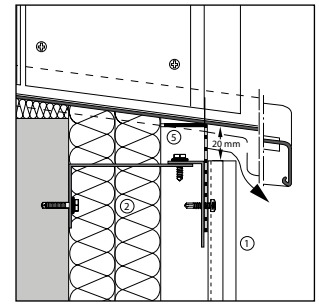
1. Alu Selekt facade profiles
2. Sub-framework
3. Connection profile F
4. Z profile
5. Ventilation profile 30/90
6. Internal/external corner profile
7. L bracket 20x20 fixed to Alu Selekt Channel with 8-18x16 Metal Self Tapping Screw.



A. Junction detail

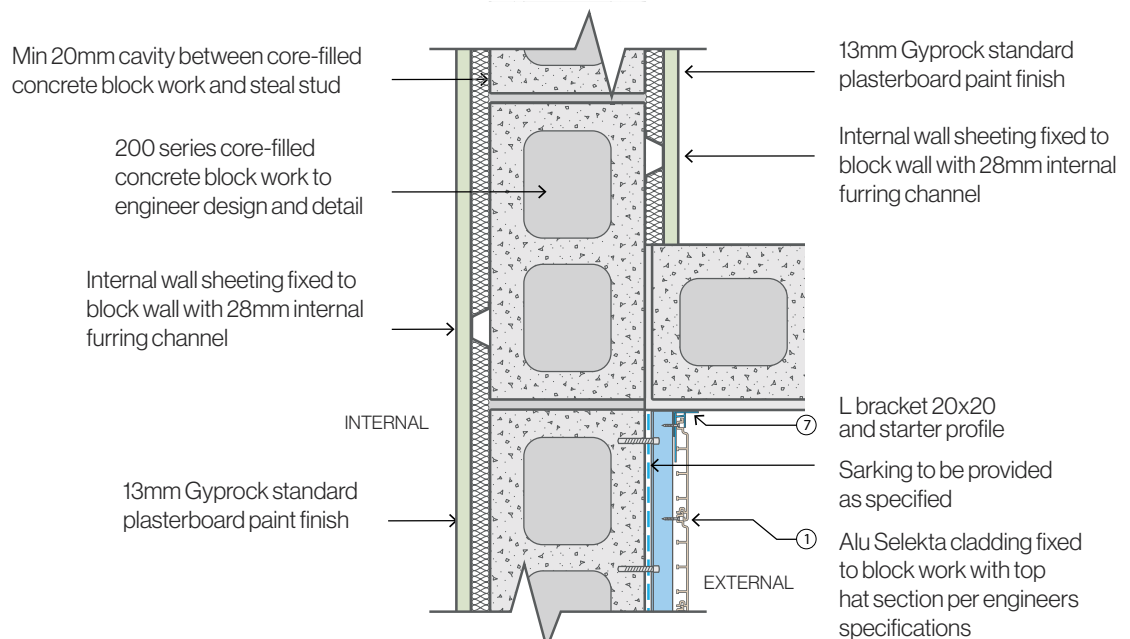


B. Window detail

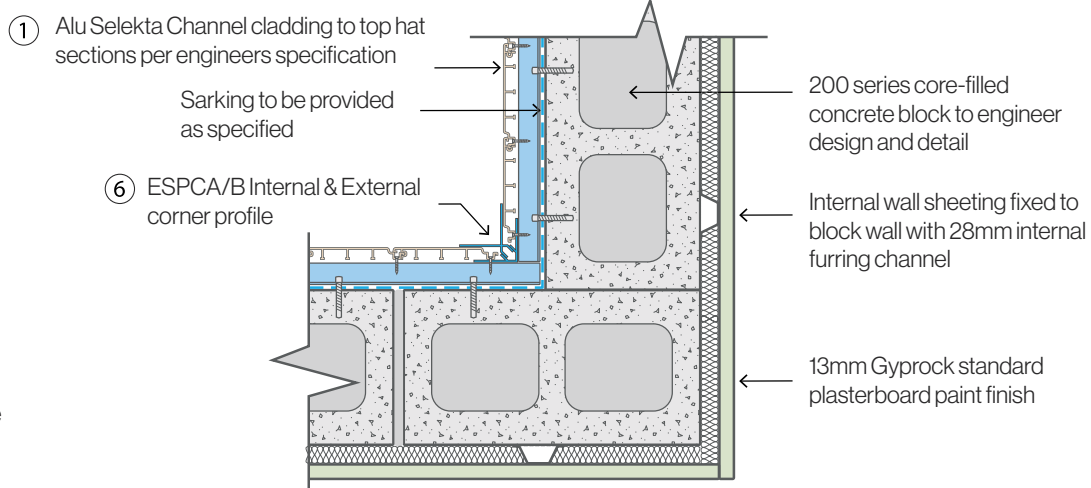


C. Soffit detail

Alternative details utilising light-weight construction techniques.



D. Wall junction detail



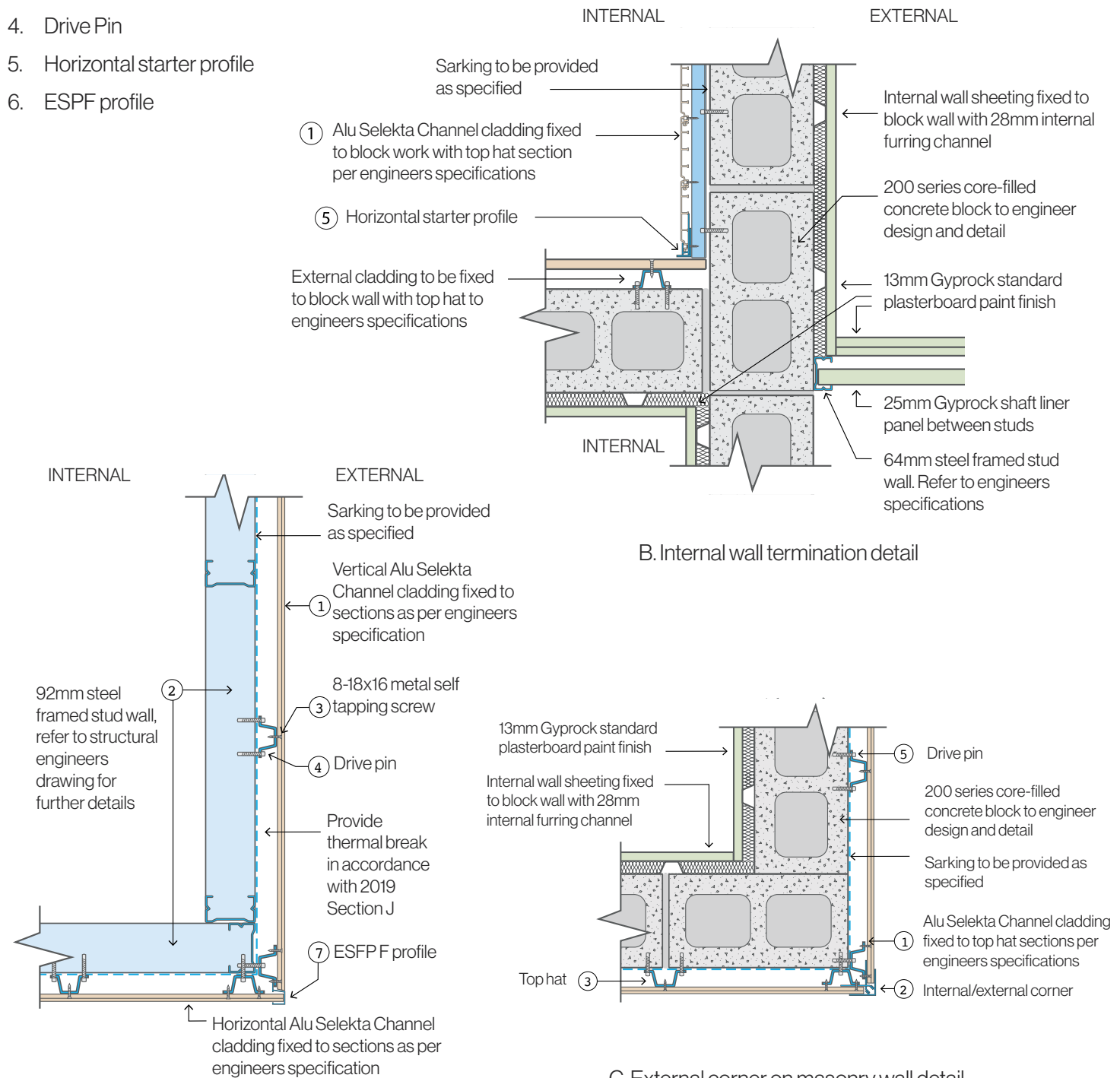
E. Internal corner masonry walls

Please Note:

Refer to Generic Structural Design Certificate (available on our website)

Vertical installation

1. Alu Selekt façade profiles
2. Sub-framework
3. 8-18×16 Metal Self Tapping Screw
4. Drive Pin
5. Horizontal starter profile
6. ESPF profile



A. Light weight facade & soffit detail

C. External corner on masonry wall detail

General guidelines

Handling

The Alu Selekt Channel profiles must be stored in their packaging, lying flat until use.

Sawing with power tools

Aluminium saw blade must be used to cut profile.

Fastening the façade profiles

Suggest 8-18x16 Metal Self Tapping Screw [Screw head must be a minimum of 8mm in Diameter] or equivalent. Pre-drill Ø 0.4mm holes. Centre the fastening screws onto the screen recess grooves. To fasten efficiently, the screw head rests against the surface.

Fastening of all connection profiles

Suggest 8-18x16 Metal Self Tapping Screw [Screw head must be a minimum of 8mm in diameter].

Please Note:

Contact your structural engineer for further compliance with your project wind load and terrain category requirements.

Generic Structural Design Certificate:

Battens spaced in accordance with the Summermore Design Tables. Fixing of the Sub-Framework Battens to the SubStructure is to be designed for by others.

Sub-framework

Facade profiles are typically fastened to a galvanised mild steel structural sub-frame. In principle, the following guidelines should be followed:

- a. Compliance to Australian & NZ Building Codes is essential.
- b. Fixing of the Sub-Framework Battens to the Sub-Structure is to be designed for by others.
- c. The support battens must be fastened as per Australian Building Codes. The support battens must be fastened as per Australian Building Codes and in accordance with Design Advice by Others.

- d. The sub-framework must be level and plumb.
- e. Sub-Framework is to be provided by a minimum thickness 0.9mm G550 Battens spaced in

Cut edges

Cut edges with a sharp aluminium saw blade. In coastal regions [up to approximately 50 km inland], all cut edges must be protected against corrosion. Paint ends if required.

Expansion

8-18x16 Metal Self Tapping Screw clearance allowed for in profile.

The length change of the façade profiles is approximately 1 mm/linear m, for a 40°C temperature differential. Expansion joints of 5 mm must be maintained at profile butt joints and profile connections.

Maintenance

On an annual basis use a soft sponge or cloth, hose with water and mild detergent, non-abrasive soap with the pH range of 5-9 to clean the powder coated area of dirt, grime and other debris. Pressure washing and the use of harsh detergents or chemicals is not recommended. Include in your maintenance records the following: date, time, specific products used, name of maintenance person and their designation, maintenance company name and general condition of the powder coated finish.

Declaration

Please check sustainability with your specifier.

The product may not be used as a continuous façade of Class 2 to 10 structures over 20 metres in height without approval from a structural engineer. Once approved, the product is deemed suitable for use.

If you have additional questions, please contact Modinex Architectural - 1800 156 455. Subject to changes due to technical improvements.

