



## Flashclad NZ Ltd Technical & Compliance Statement

FCNZ Ltd are the designers and suppliers of Flashclad's innovative extruded aluminium cladding and mechanical flashing systems.

### DESIGN

Flashclad's aluminium weatherboard profiles utilise a unique and innovative interlocking joint at all board connections. Our superior board connections provide the ultimate in water-tightness.

Flashclad's thicker profiles are designed to provide the ultimate in weathertight performance and importantly long-term durability.

Our one-piece cladding trims ensure clean architectural lines and aesthetic appeal.

Flashclad cladding systems incorporate the patented Flashman mechanical flashing system. Our mechanical flashing system is designed to separate the cladding from the joinery and to provide solutions at all critical junctions around openings.

Our one-piece head flashing incorporates a cavity closure, CNC machined aluminium stop ends are fitted to each end of the head flashing...

Our mechanical jamb flashings are unique to the building industry as they separate the cladding from the joinery and disperse any water onto our sill flashing below.

Our sill provides full joinery support and expels all rain water from above preventing the risk of leaks at the base of the joinery.

When using Flashclad cladding a jamb facing and a head trim is provided around all joinery.

**Note: There is no use of, or the reliance on sealants, foams or plastic back flashings to manage water around joinery openings.**

## CLADDING PROFILES

### **Bevelbord**

This profile provides a traditional horizontal weatherboard look with an aesthetic 7 degree point of difference at the base of the board. This creates a level nosing to the bottom of the board

Cover = 135 mm

Thickness = 2 mm

Weight = 8.5 Kg per Sq/m

### **Dualbord**

This profile provides a modern flat face and recessed negative detail appearance.

When installed vertically it resembles traditional ship lap cladding, and when installed horizontally it resembles rusticated weatherboard.

Cover = 170 mm

Thickness = 2 mm

Weight = 8.5 Kg per Sq/m

### **Euro-line**

This profile provides a wide flat faced board which creates a panel effect with a fine 2mm vee joint between boards.

Euro-line Can be installed horizontally or vertically.

Cover = 230 mm

Thickness = 3 mm

Weight = 11.5 Kg per Sq/m

### **Euro-lap 210 – 95 - 65**

Our Eurolap range of profiles provide a recessed appearance to create a definitive 20 mm wide and a 3 mm deep recess.

Eurolap 95 and 65 mimics the appearance of narrower timber profiles.

Eurolap 210, 95 and 65 can be installed in a random pattern form

Euro-lap Can be installed horizontally or vertically and creates the safest negative detail ever designed.

Cover = 230 mm cover

Thickness = 3 mm

Weight = 11.5 Kg per Sq/m

### **Euro-rib**

Eurorib provides an exceptionally strong profile insuring a flat tray surface

Our Rib design also provides seismic abilities.

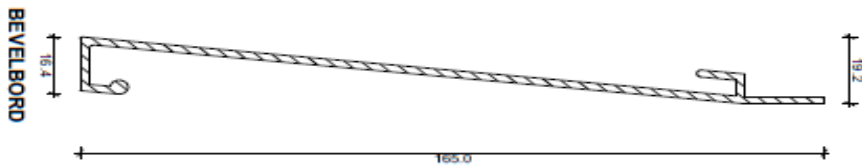
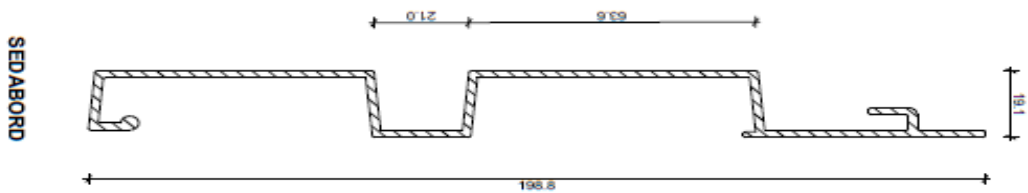
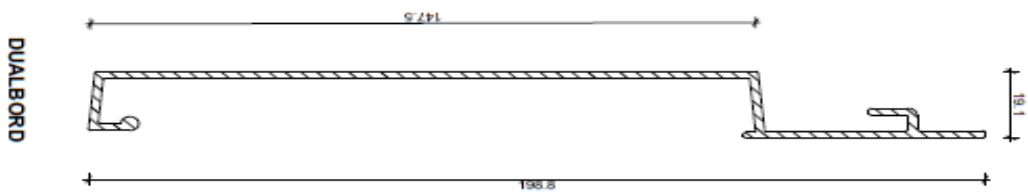
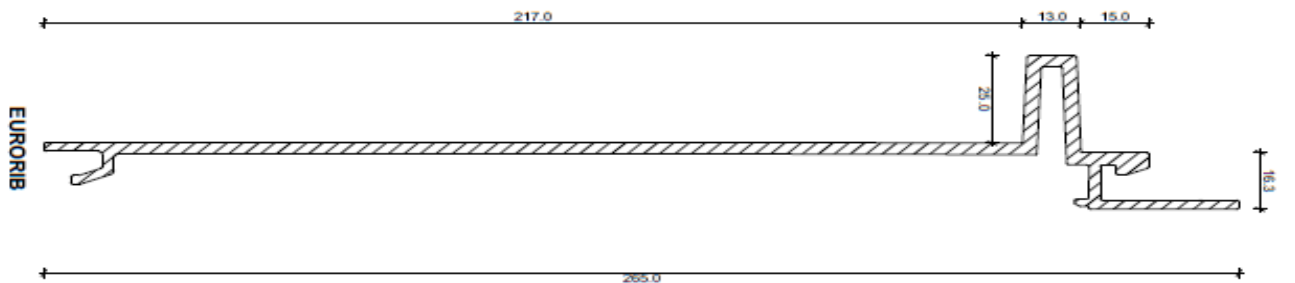
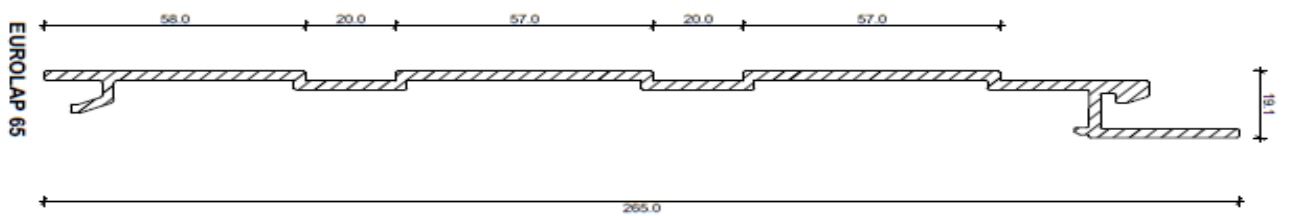
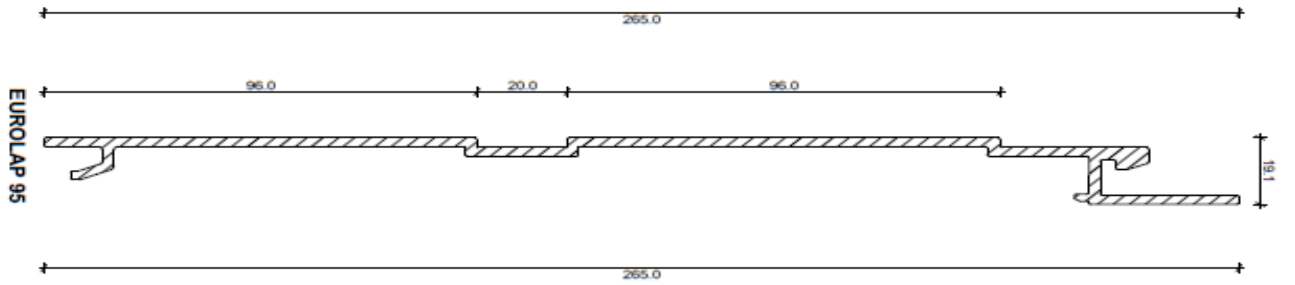
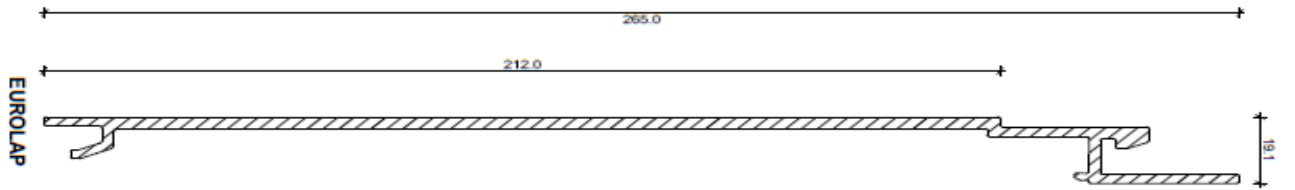
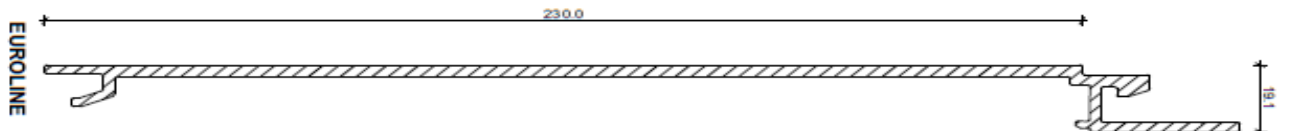
Eurorib Cladding is available in a 230 mm rib pattern or by adding a Euroline creates a 460 mm wider rib pattern.

Larger trims accent this profile to accommodate the "Rib" and create a deeper recessed effect around joinery.

Cover = 230 mm cover

Thickness = 3 mm

Weight = 11.5 Kg per Sq/m



## CAVITY AND FIXINGS

Flashclad must be installed over a cavity system. Flashclad systems compliance testing was undertaken using a standard 20mm cavity depth; increases in cavity depths can be achieved with minor system adaptations.

Flashclad manufactures its own multipurpose 20mm Aluminium cavity batten which can be installed horizontally or vertically, the batten meets fire safety requirements. We can also provide a 20 mm structural batten rated to 4.5 kPa

Flashclad cladding is secured through the hidden lap sections of our board profiles using Stainless Steel Type 17, 65mm Tek screws.

Flashclad fixing methods provide exceptionally strong face load abilities and eliminate board movement. Our cladding fixing methods have been tested to wind speeds of approx. **6.200 kPa**

**Note: we do not rely on clips to hold our board profiles in position.**

## DURABILITY

Flashclad's thicker aluminium profiles provide unique properties of strength, are corrosion resistant and won't rot. Our thicker profiles provide extreme durability with a serviceable life of 50-100 years.

Flashclad promotes the use of quality powder finishes on their cladding systems using only, Interpon's Commercial Futura range (25 year warranty) and Dulux's Duratec/Electro range (25 year warranty).

The combination of Flashclad's quality extrusions and the best powder coating solutions available provide the building owner with extremely easy care and low-cost maintenance. Due to having zero reliance on sealants or membranes the owner can rest assured that with even minimal maintenance the systems will remain watertight, durable, and functional.

## FIRE SAFETY

Flashclad's cladding systems can incorporate an aluminium cavity batten which will provide a fully non-combustible cladding system which meets NZ Fire Safety standards, when used in conjunction with a fire rated substrate,

Flashclad is fit for purpose in any fire rated location

Flashclad's 20 mm cavity depth restricts air flow and flame spread in the event of a fire. Our unique inter-locking weatherboard design will not allow flame to escape.

Flashclad's Aluminium cladding will not ignite, smoulder, or explode off the wall in the event of a fire.

Powder coating finishes contain no combustible materials.

## COMPLIANCE

### AS/NZS 4284

Predominately used for testing “Rainscreen cladding systems” on expensive rail systems with varying cavity depths of approximately 60mm - 120mm. The focus for rainscreen testing is on how water is managed behind the cladding.

Flashclads 4284 testing was conducted as a **watertight** cladding system using a standard 20 mm cavity depth.

The test was conducted using the patented Flashman mechanical extruded flashing system without the reliance on sealants, foam or back flashings

Our test level limit was set at 4.500 kPa to meet the highest of NZ’s wind conditions.

Flashclad’s AS/NZS 4284 testing achieved **4.500 kPa**

Flashclad has proven to be one the best tested **watertight** cladding and mechanical flashing systems available in New Zealand

### Branz Appraisals

VM/1 testing concluding Branz appraisals 573, 800 & 829

### Face-Load testing

Face-Load tested using vertical Eurobord installed over a 150mm x 50mm timber framed wall with studs at 600mm c/s and dwang lines at 800mm c/s.

Using vertically installed Eurobord our fixings were positioned into the bottom plate, the top plate and dwang lines through the board laps at 350mm c/s

Achieving the testing rigs maximum capabilities of **6.200 kPa > 360 kph**

A specific project requiring 6.200 kPa using Dualbord has undergone Mathcad computer analysing and achieved the required face load rating.

## MECHANICAL FLASHING SYSTEMS

The Patented extruded aluminium Flashman Flashing Systems were introduced in 2005 as an alternative to the common costly practice on relying on sealants around joinery openings to keep the water out. The Flashman system is an Alternative Solution in terms of the NZBC.

AS/NZS 4284 **watertight** tested to **4.500 kPa**.

Branz VM/1 tested – Appraisal 573

<https://flashclad.co.nz/drawings/flashman/>

## NEW ZEALAND BUILDING CODE

Flashclad's systems meet the provisions and requirements of the NZBC

### **B1 STRUCTURE:** Performance: B1.3.1, B1.3.2 & B1.3.4

Flashclad's thicker and unique profiles meet the requirements from loads arising from self-weight wind and impact.

### **B2 DURABILITY:** Performance: B2.3.1 & B2.3.2

Flashclad systems are produced from extruded aluminium and CNC machined aluminium componentry. Our products will provide a minimum 50-year life expectancy.

Flashclad uses powder coated surface finishes which provide minimum warranty periods of 25 years (Interpon D2525) and 25 year Dulux (Duratec/Electro)

### **E2 EXTERNAL MOISTURE:** Performance: E2.3.2

AS/NZS 4284 **watertight** tested to **4.500 kPa**..

### **F1 HAZARDOUS MATERIALS:** Performance F2.3.1

Flashclad cladding systems are aluminium and are non- combustible therefore will not ignite, flame or burn.

## INSTALLATION

Flashclad systems are installed only by its nationwide distributor network. This ensures that the installation is being undertaken and supervised by experienced, qualified and skilled installers every time. The result is that installation timeframes are minimised and that the finished quality is of the highest standard.

Our systems are installed and continue to be specified on residential, architectural, re-clads, apartment complexes, rest homes, light commercial, schools, government projects and high-rise buildings to fifteen storey.

## WARRANTIES

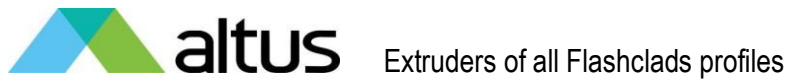
10 Year Installation Warranty

25 Year Product Warranty

Interpon 25 year powder coating warranty

Duratec/Electro 25 Year powder coating warranty

Metwood and special effect coatings - Interpon 25 year powder coating warranty



For all technical advice please contact [info@flashclad.co.nz](mailto:info@flashclad.co.nz)

For technical details please visit [www.flashclad.co.nz](http://www.flashclad.co.nz)

23 August 2019

Revision

20 June 2022