



We give you - Quality, Service, Integrity™



# Ullrich Aluminium Extrusion & Rolled Products

We manufacture and distribute a wide range of Aluminium extrusions to suit a variety of applications in residential, commercial and industrial projects.

From simple geometric shapes to high end structural aluminum sections using high purity aluminium, Ullrich Aluminium has an extrusion that gives you quality.



Consistent — Reliable



# Whatever your extrusion needs, Ullrich Aluminium is your trusted expert.

The Ullrich Aluminium Team is on hand to advise, guide and support you in whatever residential, commercial, or industrial project you are undertaking.

Tried and trusted for over 60 years.

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### More Information

View more of our extensive range on our website

www.ullrich.com.au

# PART NUMBER MATRIX

Use the part number matrix below as a tool to design your Ullrich Aluminium Extrusion, some products may not require all elements of the part number matrix.

# E | LMNOP | X | Y | Z

Example: A25251.6CL6.5L

Angle | 25mm | 25mm | 1.6mm Thickness | Clear Anodised | 6.5 Metres in Length

# How to use this guide.

Ullrich Aluminium provides access to an extensive range of specialist aluminium extrusion and rolled products as well our own team of experienced design engineers.

If you can't find what you're looking for in this guide, give us a call and we'll source or custom manufacture a solution to suit your specific extrusion application requirements.



### Ullrich Aluminium Design

E = Profile Type			
Α	=	Angles	
С	=	Channel	
F	=	Flat Bar	
FR	=	Flat Bar Radius	
RH	=	Rectangular Hollow Sections	
RR	=	Rectangular Hollow Radius Corners Sections	
SH	=	Square Hollow Sections	
SR	=	Square Hollow Radius Corners Sections	
Z	=	Zed Sections	
Т	=	Tee Sections	
RT	=	Aluminium Tube	
SQR	=	Square Rod	
RDR	=	Round Rod	

L = Construction Variation			
Α	=	1st Dimension	
В	=	2nd Dimension	
С	=	3rd Dimension	
D	=	4th Dimension	

M = Construction Variation				
<u>T</u>	_	=	1st Thickness	
T2	)	=	2nd Thickness	

N = Construction Variation				
R1	=	1st Radius		
R2	=	2nd Radius		

U:	= Lonstruction	variation
L	=	Lengt

P = Consti	ruction	Varia	ition

W = Width

X = Finish		
MI	=	Mill
BCL	=	AN 5-7um Bright Dip Clear
CL	=	AN 10um Matt Clear
PPSE	=	PC Primrose
PPWH	=	PC Pearl White
PSBK	=	PC Satin Black
PSTB	=	PC Stone Beige
PWBI	=	PC White Birch
TLB	=	AN 10um 2 Step Light Bronze
PPUS	=	PC Ultra Silver
PMAG	=	PC Magnolia
PMOT	=	PC Monument Grey Matte
PMRD	=	PC Manor Red
POGY	=	PC Oyster Grey
PPJR	=	PC Jasper (Dulux)
PSGY	=	PC Slate Grey
PSM	=	PC Surfmist (Dulux)
PWDG	=	PC Woodland Grey (Slate Grey)
PWRC	=	PC Ever Grain Western Red Cedar
PPSP	=	PC Precious Silver Pearl
PABZ	=	PC Anodic Bronze
PADG	=	PC Anotec Dark Grey
PANM	=	PC Anotec Natural Matt
PCCM	=	PC Classic Cream
PBMP	=	PC Bronze Metropolis Pearl
PBOW	=	PC Bond Off White
PBRW	=	PC Bright White
PDNE	=	PC Dune
PSHW	=	PC Shoji White (Interpon)
PDON	=	Deep Ocean (Mountain Blue)

Finishes are available in all colour ranges from Interpon and Dulux with 10,15,20 year warranties

Y = Profile Length	1
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Y = Standard Extrusion Length

Z = Alloy & Temper			
6060T5	=	Standard Geometrics	
6061T6	=	Structural Angles, Structural Channel	
5005-H34	=	Aluminium Sheet/Coil	
3003-H16	=	Aluminium Sheet/Coil	
5052-H32	=	Aluminium Sheet/Coil	
5083-H321	=	Heavy Gauge Aluminium Sheet/Coil	
5083-H116	=	Heavy Gauge Aluminium Sheet/Coil	
5083-H112	=	Aluminium Plate	
5052-0	=	5-Bar Aluminium Treadplate	
3003-H224	=	Pattern Aluminium Treadplate	

Our engineering specialists are on hand to help so you can trust that an extrusion from Ullrich Aluminium will work the way you need it to. We are ready to support your project with quality products, smart service and trusted integrity.

Note: Aluminium extrusions are available in the range of alloys, tempers and finishes we offer.

Not all aluminium extrusions are available ex-stock, check with your local branch for advice or availability.

Contact us on 1300 650 075

or email sales@ullrich.com.au

### HOW ALUMINIUM IS MADE

Bauxite is mined by various process. Once mined it is finely crushed for refining recovery of alumina, the base from which aluminium is made. The separation of the alumina from bauxite is a complicated process. This involves the use of a caustic soda solution heated under pressure to dissolve the alumina. Impurities are filtered out of the solution in the form of a mud-like material. The filtered solution is cooled and alumina is recovered by precipitation in a hydrate form. The resulting fine crystals are heated in long, revolving kilns to drive off the water of crystallization.

The product is alumina in a white powder form. Aluminium metal is produced in large steel shells lined with carbon. These shells are known in the industry as **pots** and are arranged in long rows called **pot lines**.

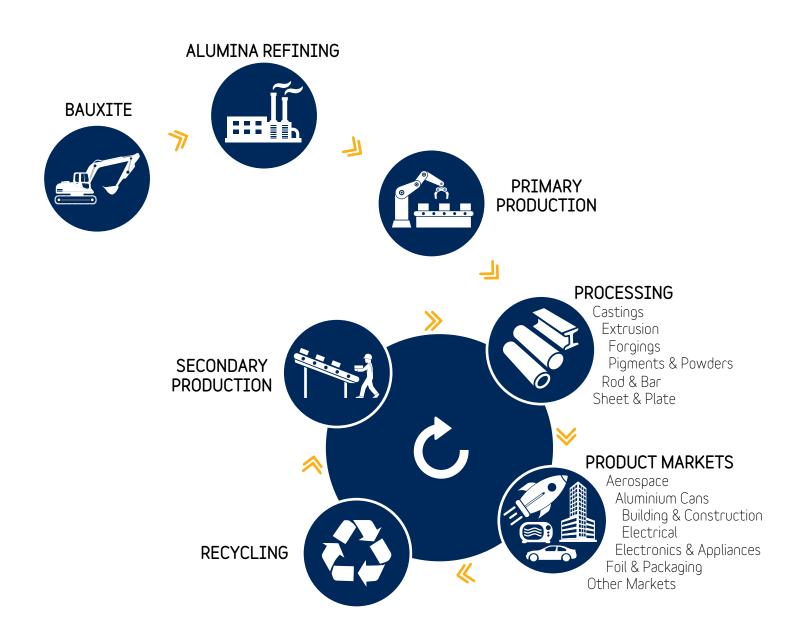
Alumina is mixed with cryolite in the pots and large quantities of electricity are introduced to reduce the alumina into aluminium and oxygen. The process is continuous and molten metal is siphoned from the pots at regular intervals.



### HOW ALUMINIUM IS TURNED INTO PRODUCTS

Once aluminium is produced it can be made into forms ready for manufacturers to convert into finished products. Industries requiring aluminium may specify from a range of alloys and their metal can be supplied in the form of ingots, extruded shapes, rod, tube, bar, sheet, plate and foil.

Aluminium extrusions have been used commercially for many years. The process involves a heated billet being pushed under extreme pressure through a die, the metal taking the shape of the holes in the die. Extrusions are mostly used to reduce the weight or number of parts in an assembly, or to achieve shapes that cannot be produced satisfactorily any other way.



Aluminium has a unique combination of properties that can be amplified and utilized through alloying. For example – substituting steel components in a motor vehicle with aluminium components can contribute to a lighter more fuel efficient vehicle, however pure aluminium is very malleable; by alloying aluminium with magnesium, manufacturers are able to create a metal that is as strong as steel at only one third of the weight.

Some of the characteristics of aluminium include:



### Strong

When mixed with small amount of other metals (particularly magnesium) to create alloys, aluminium is as strong as steel



### Impermeable

Aluminium has excellent barrier function which keeps out air, light and microorganisms



### Light-weight

Aluminium can weigh only one third of a piece of steel that is the same size and shape



### Corrosion Resistant

Aluminium forms a natural film on its surface upon exposure to oxygen. This film is called aluminium oxide, and it protects the surface of the aluminium. If this film is scratched or damaged, it will instantly reform. It is only under certain conditions and exposure to certain elements that aluminium will corrode



### Durable

Aluminium's unique combination of strength and corrosion resistance makes it a particularly durable material



### 100% Recyclable

Recycling aluminium does not compromise any of its unique properties and uses only 5% of the energy used to create the original product. Aluminium can be reused endlessly – approximately two-thirds of all aluminium ever produced is still in use today – representing a growing "energy and resource bank"



### Non-Magnetic and Non-Sparking

Aluminium is non-magnetic and non-sparking. These properties make it a suitable material for applications where explosive vapour mixtures are present



### **Electrical Conductivity**

Aluminium is one of two common metals with electrical conductivity high enough to permit its use as an electrical conductor – copper being the other. While aluminium's conductivity is 62% of that of copper, its light-weight is aluminium's main benefit – an aluminium conductor of equal current-carrying capacity is half the weight of a copper conductor



### Thermal Barrier and Conductor

Aluminium in its different applications can act as both a good barrier against and conductor of heat

### SUSTAINABILITY

The Australian aluminium industry employs a life-cycle approach to address the challenges of climate change, focusing not only on the energy required to produce aluminium products but also on the energy savings to be made through their use and reuse.

It is in the use phase that the majority of energy is used and/or saved (e.g. during the useful life of cars, buildings, aircraft, etc).

### Aluminium's contribution to sustainable transportation

The high strength-to-weight ratio of aluminium plays a crucial role in producing lighter vehicles and other forms of transport, reducing fuel consumption without compromising performance and safety. The use of lightweight aluminium components in a vehicle can save six to twelve times the energy taken to produce the primary aluminium used in its construction. Up to eight per cent fuel savings can be realized for every 10% reduction in weight. One kilogram of aluminium, used to replace heavier materials in a car or light truck, has the potential to eliminate 20kg of CO2 over the lifetime of the vehicle. For other vehicles, such as trains, ferries and aircraft, the potential savings are even greater.

### Aluminium's contribution to sustainable building and construction

Aluminium is increasingly becoming the material of choice in modern sustainable buildings due to its corrosion resistance and recyclability.

The energy used for primary production is embodied, to a large extent, in the metal and, consequently, in the building too. Today's buildings and their contents therefore present large "urban mines" of around 400 million tonnes of aluminium metal that can be extracted and recycled by future generations through the use of only 5% of the originally used energy, not just once but repeatedly.

Aluminium is extensively employed in buildings, but it does not remain permanently in place. Buildings are remodeled periodically, and even deconstructed, thereby freeing the aluminium for recycling. Therefore, it is not inaccurate to regard this aluminium as "urban ore" and cities as "urban mines".

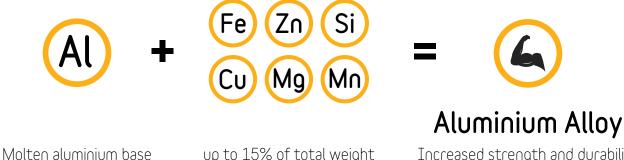
The aluminium is embodied in such items as exterior surfaces, counters, appliances, and electronics. In highly-developed countries, aluminium in buildings of all types amounts to between 120 and 200 kg per person. Globally, it is estimated that buildings and their contents contain some 400 million tonnes of aluminium, which can be extracted and reused by future generations time after time, requiring only about 5% of the energy originally used to extract and process aluminium from more traditional geologic sources.

Aluminium recycling thus not only represents good urban housekeeping, it provides major energy benefits today and tomorrow.



### WHAT IS AN ALUMINUM ALLOY

An aluminum alloy is a chemical composition where other elements are added to pure aluminum in order to enhance its properties, primarily to increase its strength. These other elements include iron, silicon, copper, magnesium, manganese and zinc at levels that combined may make up as much as 15 percent of the alloy by weight. Alloys are assigned a four-digit number, in which the first digit identifies a general class, or series, characterized by its main alloying elements.



up to 15% of total weight

Increased strength and durability

### Three types of aluminium alloys:



COMMERCIALLY **PURF** 



**HEAT** TRFATABI F



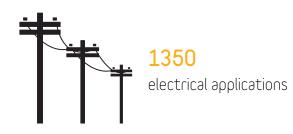
**NON HEAT** TREATABLE

### COMMERCIALLY PURE ALUMINIUM

### **1xxx Series**

The 1xxx series alloys are comprised of aluminum 99 percent or higher purity. This series has excellent corrosion resistance, excellent workability, as well as high thermal and electrical conductivity. This is why the 1xxx series is commonly used for transmission, or power grid lines that connect the national grids across Australia. Common alloy designations in this series are 1350 for electrical applications, and 1100 for food packaging trays.





### **HEAT-TREATABLE ALLOYS**

Some alloys are strengthened by solution heat-treating and then quenching, or rapid cooling. Heat treating takes the solid, alloyed metal and heats it to a specific point. The alloy elements, called solute, are homogeneously distributed with the aluminum putting them in a solid solution. The metal is subsequently quenched, or rapidly cooled, which freezes the solute atoms in place. The solute atoms consequently combine into a finely distributed precipitate. This occurs at room temperature which is called natural aging or in a low temperature furnace operation which is called artificial aging.

### 2xxx Series

In the 2xxx series, copper is used as the principle alloying element and can be strengthened significantly through solution heat-treating. These alloys possess a good combination of high strength and toughness, but do not have the levels of atmospheric corrosion resistance as many other aluminum alloys. Alloy 2011 perhaps the most widely known for its machinability features.



2011 machining alloys

### 6xxx Series

The 6xxx series are versatile, heat treatable, highly formable, weldable and have moderately high strength coupled with excellent corrosion resistance. Alloys in this series contain silicon and magnesium in order to form magnesium silicide within the alloy. Extrusion products from the 6xxx series are the first choice for architectural and structural applications. Alloy 6061 is the most widely used alloy in this series and is often used in truck and marine frames. Additionally, the iPhone 6 extrusion was made from 6xxx series alloy.



oxxx architectural and structural applications

### 7xxx Series

Zinc is the primary alloying agent for this series, and when magnesium is added in a smaller amount, the result is a heat-treatable, very high strength alloy. Other elements such as copper and chromium may also be added in small quantities. The most commonly known alloys are 7050 and 7075, which are widely used in the aircraft industry. Apple®'s aluminum Watch, released in 2015, was made from a custom 7xxx series alloy.

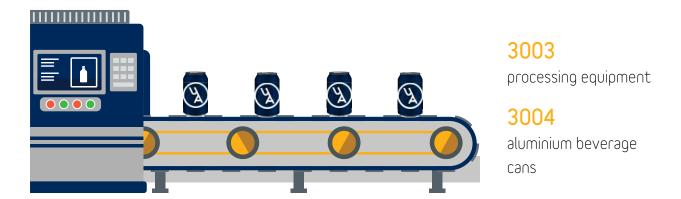


### NON-HEAT TREATABLE ALLOYS

Non-heat treated alloys are strengthened through cold-working. Cold working occurs during rolling or forging methods and is the action of "working" the metal to make it stronger. For example, when rolling aluminum down to thinner gauges, it gets stronger. This is because cold working builds up dislocations and vacancies in the structure, which then inhibits the movement of atoms relative to each other. This increases the strength of the metal. Alloying elements like magnesium intensify this effect, resulting in even higher strength.

### 3xxx Series

Manganese is the major alloying element in this series, often with smaller amounts of magnesium added. However, only a limited percentage of manganese can be effectively added to aluminum. 3003 is a popular alloy for general purpose because it has moderate strength and good workability and may be used in applications such as heat exchangers, pressure vessels and chemical equipment.. Alloy 3004 and its modifications are used in the bodies of aluminum beverage cans.



### 4xxx Series

4xxx series alloys are combined with silicon, which can be added in sufficient quantities to lower the melting point of aluminum, without producing brittleness. Because of this, the 4xxx series produces excellent welding wire and brazing alloys where a lower melting point is required. Alloy 4043 is one of the most widely used filler alloys for welding 6xxx series alloys for structural and automotive applications.



### 5xxx Series

Magnesium is the primary alloying agent in the 5xxx series and is one of the most effective and widely used alloying elements for aluminum. Alloys in this series possess moderate to high strength characteristics, as well as good weldablility and resistance to corrosion in the marine environment. Because of this, aluminum-magnesium alloys are widely used in building and construction, storage tanks, pressure vessels and marine applications. Examples of common alloy applications include: 5052 in electronics, 5083 in marine applications, anodized 5005 sheet for architectural applications and 5182 makes the aluminum beverage can lid. Some of Australia's military vehicles are made with 5083 and the 7xxx series aluminum.



# ALUMINIUM ALLOY



### Aluminium Alloy Designation System

This system is a four-digit numerical system in which the first digit indicates the alloy group as follows.

The first digit XXXX indicates the principal alloying element, which has been added to the aluminum alloy and is often used to describe the aluminum alloy series i.e. 1000 series, 2000 series, 3000 series, up to 8000 series.

In the 1XXX group, the last two of the four-digits indicate the minimum aluminium percentage. These digits are the same as the two digits to the right of the decimal comma in the minimum aluminium percentage when it is expressed to the nearest 0.01 percent.

The second digit indicates modifications in impurity limits or alloying elements. If the second digit is zero, it indicates unalloyed aluminium having natural impurity limits;

Integers 1 - 9 indicate special control of one or more individual impurities or alloying elements.

In the 2XXX to 8XXX groups, the last two digits have no special significance other then to identify different aluminium alloys in the group. The second digit indicates alloy modifications. If the second digit is zero it indicates the original alloy;

Integers 1 - 9 indicate consecutive alloy modifications.

DEFINITION OF ALLOY GROUP				
Wrought Alloy Designations	Principal Alloying Elements			
1000 Series	99.000% Minimum Aluminium			
2000 Series	Соррег			
3000 Series	Manganese			
4000 Series	Silicon			
5000 Series	Magnesium			
6000 Series	Magnesium & Silicon			
7000 Series	Zinc			

### Temper Designation System

This system defines the sequence of basic treatments used to achieve the various tempers. The temper designation follows four-digit Aluminium Alloy Designation, the two being separated by a hyphen.

The basic temper designation consists of a letter. Sub-divisions of the basic temper are indicated by one or more digits following the letter.

THE BASIC TEMPER DESIGNATIONS			
Letter	Meaning		
F	As Fabricated - Applies to product of a forming process in which no special control over thermal or strain hardening conditions are employed.		
0	Annealed - Applies to products which have been heated to produce the lowest strength condition to improve ductility and dimensional stability.		
Н	Strain Hardened - Applies to products which are strengthened through cold-working. The strain hardening may be followed by supplementary thermal treatment, which produces some reduction in strength. The "H" is always followed by two or more digits.		
W	Solution Heat-Treated - An unstable temper applicable only to alloys which age spontaneously at room temperature after solution heat treatment.		

### The first digit after the H indicates a basic operation:

H1 - Strain Hardened Only.

H2 - Strain Hardened and Partially Annealed.

H3 - Strain Hardened and Stabilized.

H4 - Strain Hardened and Lacquered or Painted.

### The second digit after the H indicates the degree of strain hardening:

HX2 - Quarter Hard HX4 - Half Hard HX6 - Three-Quarters Hard

HX8 - Full Hard HX9 - Extra Hard

### Subdivisions of T Temper - Thermally Treated:

T1 - Naturally aged after cooling from an elevated temperature shaping process, such as extruding.

- T2 Cold worked after cooling from an elevated temperature shaping process and then naturally aged.
- T3 Solution heat treated, cold worked and naturally aged.
- T4 Solution heat treated and naturally aged.
- T5 Artificially aged after cooling from an elevated temperature shaping process.
- T6 Solution heat treated and artificially aged.
- T7 Solution heat treated and stabilized (over-aged).
- T8 Solution heat treated, cold worked and artificially aged.
- T9 Solution heat treated, artificially aged and cold worked.
- T10 Cold worked after cooling from an elevated temperature shaping process.

### **Aluminium Sheet Specifications**

### 5005H34

Aluminium alloy 5005 is a medium strength alloy with very good resistance to atmospheric corrosion and very good weldability that is highly suitable for decorative anodising.

PLEASE NOTE: that whilst alloy 5005 is suitable for anodising, streaks can occur - if the finish you are seeking is critical, please specify 'special anodising quality' at time of order.

Alloy 5005 is typically used in:

- Buildings Roofing, Cladding, Corrugated Sheet
- Signage, Road Signs & Name Plates
- Food & Chemical Equipment
- Furniture
- Anodised Parts
- HVAC Equipment
- Packaging
- Pipe and Tube
- Can Bodies

Generic Physical Properties		
Physical Property	Value	
Density	2.70 g/cm³	
Melting Point	655°C	
Thermal Expansion	23.5 x 10-6 /K	
Modulus of Elasticity	69.5 GPa	
Thermal Conductivity	201 W/m.K	
Electrical Resistivity	52% IACS	
Electrical Resistivity	0.033 x10-6 <b>Ω</b> .m	

Mechanical Properties	
Aluminium Sheet - 0.2mm to 12.5mm	BS EN 485-2:2008
Mechanical Property	Value
Proof Stress	110 Min MPa
Tensile Strength	145 - 185 MPa
Hardness Brinell	47 HB

### 5052H32

Aluminium alloy 5052 in H32 temper has very good corrosion resistance to seawater and marine and industrial atmosphere. It also has very good weldability and good cold formability. It is a medium to high strength alloy with a strength slightly higher than 5251 and a medium to high fatigue strength.

Alloy 5052-H32 has a range of useful properties:

Decorative Finish		Low Maintenance
Hard Wearing		Anti-Static
Non-Slip		Light-weight
Corrosion Resistant		Applications
	Hard Wearing Non-Slip	Hard Wearing Non-Slip

Alloy 5052 is typically used in:

DZ IS	typically used in:	
	Treadplate	Welded Tubes
	Boiler making	Chemical Industry
	Containers	Irrigation
	Nameplates	Desalination units
	Road Signs	Pressure Vessels
	Architectural Paneling	Rivets

### **TEMPER TYPES**

The most common tempers for 5052 aluminium is:

H32 - Work hardened by rolling then stabilised by low-temperature heat treatment to quarter hard.

Generic Physical Properties	
Physical Property	Value
Density	2.68 g/cm³
Melting Point	605 °C
Thermal Expansion	23.7 x10-6 /K
Modulus of Elasticity	70 GPa
Thermal Conductivity	138 W/m.K
Electrical Resistivity	$0.0495\mathrm{x}10$ -6 $\Omega$ .m

Mechanical Properties	
Sheet & Treadplate - 0.2mm to 6.00mm	BS EN 485-2:2008
Mechanical Property	Value
Proof Stress	130 Min MPa
Tensile Strength	210 - 260 MPa
Hardness Brinell	61 HB

The properties above are for material in the H32 condition.

### **WELDABILITY**

Weldability - Gas: Good

Weldability - Arc: Very Good

Weldability - Resistance: Very Good

Brazability: Acceptable

Solderability: Not recommended

### **FABRICATION**

Workability - Cold: Good

Machinability: Acceptable

### 5083H321/116

Aluminium 5083 is known for exceptional performance in extreme environments. 5083 is highly resistant to attack by both seawater and industrial chemical environments.

Alloy 5083 also retains exceptional strength after welding. It has the highest strength of the non-heat treatable alloys but is not recommended for use in temperatures in excess of 65°C.

Alloy 5083 is typically used in:

- Shipbuilding
- Rail cars
- Vehicle bodies
- Tip truck bodies
- Mine skips and cages
- Pressure vessels

Mechanical Properties shown are for 0/H111 temper.

### **TEMPER TYPES**

The most common tempers for 5083 aluminium are:

- O Soft.
- H111 Some work hardening imparted by shaping processes but less than required for H11 temper
- H32 Work hardened by rolling then stabilised by low-temperature heat treatment to quarter hard

Generic Physical Properties	
Physical Property	Value
Density	2.65 g/cm³
Melting Point	570 °C
Thermal Expansion	25 x 10-6 /K
Modulus of Elasticity	72 GPa
Thermal Conductivity	121 W/m.K
Electrical Resistivity	0.058 x10-6 <b>Ω</b> .m

Mechanical Properties	
Sheet - 0.2mm to 6.30mm	BS EN 485-2:2008
Mechanical Property	Value
Proof Stress	125 Min MPa
Tensile Strength	275 - 350 MPa
Hardness Brinell	75 HB

Mechanical Properties	
Plate - 6.3mm to 80mm	BS EN 485-2:2008
Mechanical Property	Value
Proof Stress	115 Min MPa
Tensile Strength	270 - 345 MPa
Hardness Brinell	75 HB

Mechanical Properties	
Sheet & Treadplate - 0.2mm to 6.00mm	BS EN 485-2:2008
Mechanical Property	Value
Proof Stress	110 Min MPa
Tensile Strength	260 Min MPa
Hardness Brinell	70 HB
Elongation A	12 Min %

The properties above are for material in the Soft O/H111 condition.

### WELDABILITY

When welding 5083 to itself or another alloy from the same sub-group, the recommended filler metal is 5183. Other suitable fillers are 5356 and 5556.

Weldability - Gas: **Average**Weldability - Arc: **Excellent** 

Weldability - Resistance: Excellent

Brazability: **Poor**Solderability: **Poor** 

### **FABRICATION**

Workability - Cold: **Average**Machinability: **Poor** 

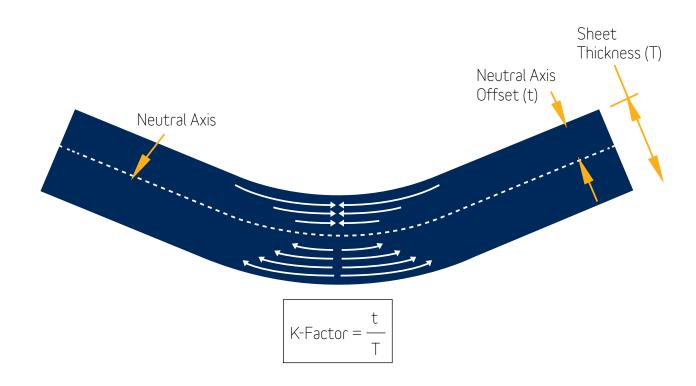
### SHEET METAL K-FACTOR

When you bend a piece of sheet metal, one portion of its section undergoes compression and the other one undergoes tension. Compression occurs in the part of the section which besides the inside radius and the tension occurs in the part which besides outside radius. There is a line in the section where neither compression nor tension takes place. This line is called the neutral axis. The transition from compression to tension takes place from this neutral axis.

The neutral axis is exactly in the middle of the section when the sheet is flat or unbent. But when you bend it, the neutral axis moves towards the inside bend. Hence this relocation of the neutral axis causes a change in its distance from the inside bend. But the length of the neutral axis remains the same even after the bend.

### WHAT IS THE K-FACTOR IN SHEET METAL?

K-Factor is actually the ratio of the offset (t) of the neutral axis from the inside bend and the thickness of the sheet (T) when a piece of sheet metal is bent. As I have shown in the images below.



### SHEET METAL K-FACTOR

It is a very important term used in sheet metal design. It is used to calculate Bend Allowance and Bend Deduction which are further used to calculate the flat pattern. Hence all of the sheet metal designing software use K-Factor, in order to provide an accurate design of the flat pattern of the sheet metal component.

The location of the neutral axis is not the same in all cases. Hence, the K-Factor is different for different cases. And it depends on some factors like:

- Material Thickness
- Inside Bend Radius
- Material's Physical Properties
- Sheet Metal Forming Method

Hence the value of the K-Factor is different for the different material, inside bend radius, method of forming and different thickness. It ranges from 0 to 0.5. But practically, it is found to be between 0.3 and 0.5 in usual cases.

### K-FACTOR CALCULATOR

You can use a K Factor Chart to collect the value of K-Factor for the given case. But if you want to calculate it by yourself, you can make a trial on some sample pieces. You can try on 3-5 samples. Follow the following steps as your K Factor Calculator:

- Prepare 5 sample blanks of the same size (same width and length)
- Bend the sample pieces by using the tooling which you are going to use in the actual forming of the final pieces.
- Now, accurately measure the flange lengths of all of the samples of the sheet metal pieces. Take an average dimension out of them.
- Also, take accurate measurements of the inside bend radii of all of the bend components. [Note: You should use some devices like an **optical comparator** to measure the inside bend radius precisely.]

- As you have got the measurement of the flange lengths and the inside bend radii of the bend samples now, you can calculate the leg length easily. To calculate the leg lengths, you just have to deduct or subtract the inside bend radius and the material thickness from the flange lengths, if the bend angle is 90 degree.
- Now it's time to calculate the Bend Allowance. To calculate it, you just have to subtract your leg lengths from the length of the flat pattern.
- At last, when you have got the value for the Bend Allowance, you can use a formula to calculate the K-Factor. The formula, I have shared below.

### K-FACTOR CALCULATOR FORMULA

You can use the following K Factor Formula to calculate the K-Factor for your available material, tooling, etc:

$$K = \frac{180 * BA}{\pi * B * T} - \frac{R}{T}$$

Here in this formula, BA = Bend Allowance

B = Bend Angle in degree

T = Material Thickness

R = Inside Bend Radius

### WHY DO I NEED TO RESTRAIN MY LOAD?

### To be safe

Loads that aren't restrained properly can injure or kill and can cause significant property damage.

- If the load falls off it endangers the lives of other road users through a direct collision or by causing other drivers to swerve to avoid it
- If the load moves forwards it can pierce the cabin and injure or kill the driver or passenger.
- If the load makes the vehicle unstable it can cause an incident, especially when taking corners

### It's good for business

Your corporate reputation and your financial position can suffer if you're involved in a load restraint incident due to:

- Adverse publicity
- Loss of contracts due to damaged goods
- Insurance excess payments
- Increase in insurance premiums

### Unrestrained loads may move

- Forces from changes in speed, direction or slope may cause a load to shift
- These forces result from normal driving conditions including braking, accelerating, cornering, road surfaces and air flow
- The weight of a load is not enough to hold it in place
- A heavy load is just as likely to fall off as a light load because the heavier the load, the higher the forces it experiences

### LOAD RESTRAINT

You are legally responsible for restraining your load so that:

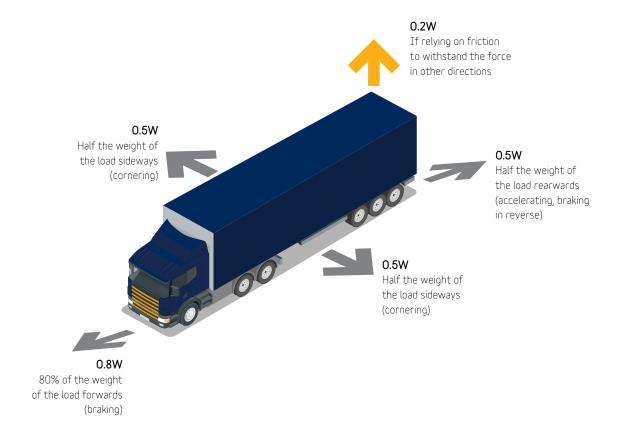
It does not come of your vehicle under normal driving conditions, including heavy braking and minor collisions. If it comes off, this is evidence you have breached the law

- It does not negatively affect the stability of the vehicle, which can cause the vehicle to roll over or swerve uncontrollably, and cause an accident
- It does not stick out of the vehicle in a way that could injure people, damage property or obstruct others' paths

You must pick up any fallen load if it is safe to do so, or arrange for someone to retrieve it.

### PERFORMANCE STANDARDS FOR LOAD RESTRAINT

The Performance Standards set out the minimum amount of force a restraint system must be able to withstand in each direction. For every vehicles, these forces are:



If a load is restrained to meet the Performance Standards it will not fall off or affect stability of the vehicle under expected driving conditions. This includes emergency braking and minor collisions.

Refer to the "Load Restraint Guide", National Transport Commission (www.ntc.gov.au).

### CARE + MAINTENANCE

Aluminium is a proven construction material for buildings, vehicles, appliances and products, both as a framing and cladding material. In the building industry, it is by far the most common material used for window and door joinery, curtain walls and shop fronts. It is widely used in every aspect of the transport, leisure, boating and household appliance industries. Its selection is based on many criteria one being its ease of fabrication to provide visual appeal and easy maintenance.

Aluminium has natural beauty and luster of its own, yet its surface can be treated in various ways to protect and enhance its appearance, which can be maintained with regular, low maintenance attention.

The surface of fabricated aluminium, whether untreated, anodised or coated, can be spoiled by improper care. Here, we briefly summarize the methods of maintaining good appearance of aluminium surfaces after installation. Usually this care is no more than periodic cleaning, as in e.g.: window glass. Anodising treatment will substantially enhance appearance, render the surface more resistant to various forms of attack and facilitate cleaning and maintenance.

Grime which causes deterioration cannot be prevented from settling on exposed surfaces. If cleaned reasonably frequently then the mildest methods of washing will produce satisfactory results. There are many ways to clean aluminium, from using plain water to harsh abrasives. The type of cleaning that should be used is governed by the finish, degree of soiling, and the size, shape and location of the surface to be cleaned. The mildest method possible should be used, particularly for aluminium which has been anodised

With anodised aluminium, surface deterioration occurs as a result of grime deposition and contaminated moisture attack. In coastal environments it is caused by airborne chlorides, in industrial or urban environments by sulfur compounds. Grime deposits absorb contaminated moisture like a sponge, assisting attack on the film, which cannot be restored without removal. Cleaning frequency depends on accessibility and environmental severity. In rural areas, cleaning may be needed only every six months. In industrial and marine environments, cleaning is recommended at least every three months, preferably monthly.

The following cleaning materials and procedures are listed in order from mild to harsh. The mildest treatment should be tried on a small area and if not satisfactory only then should the next be examined:

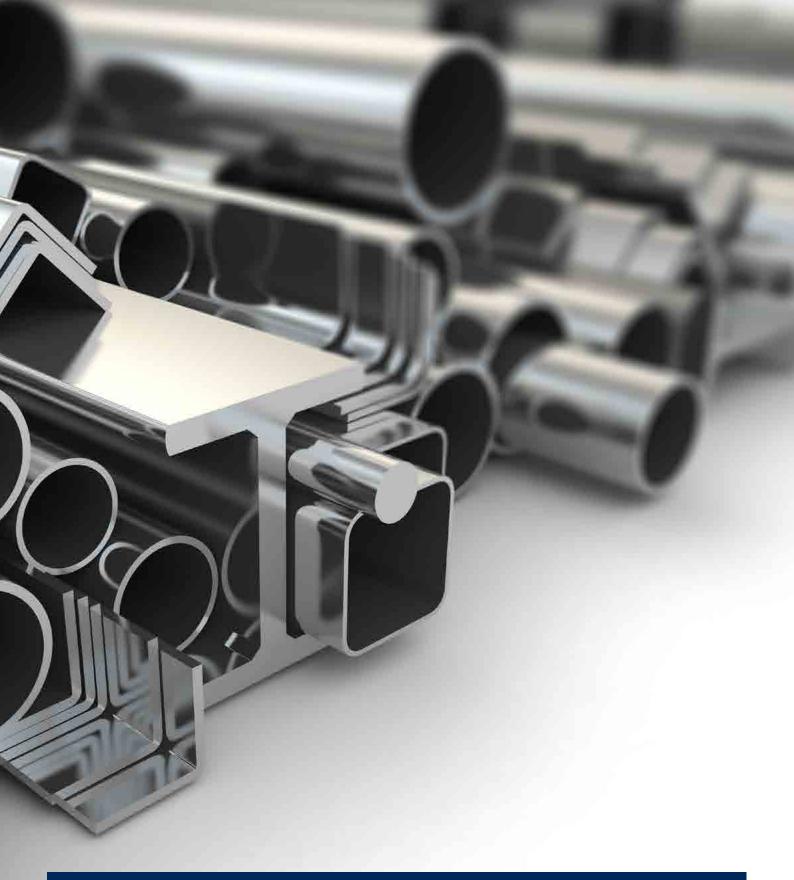
- Plain water
- Water with mild soap or detergent
- Solvents, e.g. kerosene, turpentine, white spirit
- Non-etching chemical cleaner
- Wax-based polish
- Abrasive wax
- Abrasives

After applying cleaning agents, the surface should be washed down thoroughly and dried with a clean cloth to prevent streaking. There should be no concentration of cleaning agents at the bottom edges of the aluminium. If using proprietary cleaning solutions, manufacturers' recommendations should be obtained and followed carefully.

If abrasives are used, the appearance of the aluminium finish may be altered. If there is a grain in the finish, cleaning action should always be with the grain. If the condition of the surface indicates the use of abrasive or etching materials, it is advisable to consult a cleaning specialist. If all other methods fail it may be necessary to resort to heavy-duty cleaning. This involves cleaning methods using strong etching chemicals or coarser abrasives.

### ALUMINIUM MAINTENANCE/CLEANING CHART

ENVIRONMENT	MAINTENANCE/ CLEANING	ENVIRONMENT DEFINITION
Extreme	2-4 Weeks	Up to 1km from salt water/heavy industrial
Severe	1 Month	Between 1km-5km from salt water/heavy industrial
Moderate	3 Months	Between 5km-10km from salt water/heavy industrial
Mild	4 Months	Between 10km-50km from salt water/heavy industrial
Low	6 Months	Over 50km from salt water/heavy industrial



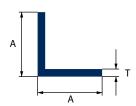
### **DISCLAIMER**

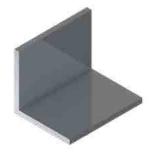
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ANGLES HAVE LEGS OF EQUAL LENGTH AND OF EQUAL THICKNESS.

CUSTOM LENGTHS AVAILABLE UPON REQUEST

MILL RUN ONLYIN STOCK





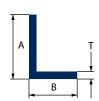
Angles - Available in Mill Finish, Anodised and Powder Coated

Part Number	Arigies Available II	1 1411(( 1 111131	1, / 11100130	0 0110 1 0	voer Coateo								
A12123MI65L       120       30       6500       6060T5       0.858       ○        ○       ○       ○       ○       ○       ○       ○       ○       ○       ○       ○ <td< th=""><th>Part Number</th><th></th><th></th><th>_</th><th>Alloy/Temper</th><th></th><th>ÓLD</th><th>NSW</th><th>VIC</th><th>SA</th><th>TAS</th><th>W</th><th>۲</th></td<>	Part Number			_	Alloy/Temper		ÓLD	NSW	VIC	SA	TAS	W	۲
A161616MI65L       160       16       6500       6060T5       1527       ●	A12121.6MI6.5L	12.0	1.6	6500	6060T5	0.630							
A16163M165L       160       30       6500       6060T5       15277       ● ● ● ● ● ● ● ● ● ● ● ● ● ● ● ● ● ● ●	A12123MI6.5L	12.0	3.0	6500	6060T5	1.111							
A202016M165L         200         16         6500         6060T5         1079         0 </td <td>A16161.6MI6.5L</td> <td>16.0</td> <td>1.6</td> <td>6500</td> <td>6060T5</td> <td>0.858</td> <td></td> <td>•</td> <td></td> <td></td> <td>•</td> <td></td> <td></td>	A16161.6MI6.5L	16.0	1.6	6500	6060T5	0.858		•			•		
A20203MI6.5L         20.0         3.0         6500         6060T5         1.956         ● <td< td=""><td>A16163MI6.5L</td><td>16.0</td><td>3.0</td><td>6500</td><td>6060T5</td><td>1.527</td><td></td><td></td><td></td><td></td><td>•</td><td></td><td></td></td<>	A16163MI6.5L	16.0	3.0	6500	6060T5	1.527					•		
A252516MI65L       250       16       6500       6000T5       2483       ● ● ● ● ● ● ● ● ● ● ● ● ● ● ● ● ● ● ●	A20201.6MI6.5L	20.0	1.6	6500	6060T5	1.079							
A25253MI6.5L       250       30       6500       6060T5       2483       ●	A20203MI6.5L	20.0	3.0	6500	6060T5	1.956							
A25256MI6.5L       25.0       6.0       6500       6600T5       4.647       •       <	A25251.6MI6.5L	25.0	1.6	6500	6060T5	1.365							
A323216MI65L       320       16       6500       6060T5       1.748       • <td< td=""><td>A25253MI6.5L</td><td>25.0</td><td>3.0</td><td>6500</td><td>6060T5</td><td>2.483</td><td></td><td></td><td></td><td></td><td></td><td></td><td></td></td<>	A25253MI6.5L	25.0	3.0	6500	6060T5	2.483							
A32323MI65L       320       30       6500       6060T5       3211       ●	A25256MI6.5L	25.0	6.0	6500	6060T5	4.647	•						
A404016MI65L       400       1.6       6500       6060T5       2210       •	A32321.6MI6.5L	32.0	1.6	6500	6060T5	1.748							
A40403MI6.5L       40.0       3.0       6500       6060T5       4.069       • <t< td=""><td>A32323MI6.5L</td><td>32.0</td><td>3.0</td><td>6500</td><td>6060T5</td><td>3.211</td><td></td><td></td><td></td><td></td><td></td><td></td><td></td></t<>	A32323MI6.5L	32.0	3.0	6500	6060T5	3.211							
A40404MI6.5L       40.0       4.0       6500       6060T5       5.356       • <t< td=""><td>A40401.6MI6.5L</td><td>40.0</td><td>1.6</td><td>6500</td><td>6060T5</td><td>2.210</td><td></td><td></td><td></td><td></td><td></td><td></td><td></td></t<>	A40401.6MI6.5L	40.0	1.6	6500	6060T5	2.210							
A40406MI6.5L       40.0       6.0       6500       6060T5       7.819       • <t< td=""><td>A40403MI6.5L</td><td>40.0</td><td>3.0</td><td>6500</td><td>6060T5</td><td>4.069</td><td></td><td></td><td></td><td></td><td></td><td></td><td></td></t<>	A40403MI6.5L	40.0	3.0	6500	6060T5	4.069							
A50501.6MI6.5L       50.0       1.6       6500       6060T5       2.769       •	A40404MI6.5L	40.0	4.0	6500	6060T5	5.356							
A50503MI6.5L       50.0       3.0       6500       6060T5       5.128       • <t< td=""><td>A40406MI6.5L</td><td>40.0</td><td>6.0</td><td>6500</td><td>6060T5</td><td>7.819</td><td></td><td></td><td></td><td></td><td></td><td></td><td></td></t<>	A40406MI6.5L	40.0	6.0	6500	6060T5	7.819							
A50504MI6.5L       50.0       4.0       6500       6060T5       6.740       • <t< td=""><td>A50501.6MI6.5L</td><td>50.0</td><td>1.6</td><td>6500</td><td>6060T5</td><td>2.769</td><td></td><td></td><td></td><td></td><td></td><td></td><td></td></t<>	A50501.6MI6.5L	50.0	1.6	6500	6060T5	2.769							
A50506MI6.5L 50.0 6.0 6500 6060T5 9.899 9 0 0 0 0 0 0 0 0 0 0 0 0 0 0 0 0 0	A50503MI6.5L	50.0	3.0	6500	6060T5	5.128							
A60603MI6.5L       60.0       3.0       6500       6060T5       6.155       • <t< td=""><td>A50504MI6.5L</td><td>50.0</td><td>4.0</td><td>6500</td><td>6060T5</td><td>6.740</td><td></td><td></td><td></td><td></td><td></td><td></td><td></td></t<>	A50504MI6.5L	50.0	4.0	6500	6060T5	6.740							
A60606MI6.5L       60.0       6.0       6500       6060T5       12.051       •       <	A50506MI6.5L	50.0	6.0	6500	6060T5	9.899							
A75753MI6.5L       75.0       3.0       6500       6060T5       7.767       • <t< td=""><td>A60603MI6.5L</td><td>60.0</td><td>3.0</td><td>6500</td><td>6060T5</td><td>6.155</td><td>•</td><td></td><td></td><td></td><td></td><td></td><td></td></t<>	A60603MI6.5L	60.0	3.0	6500	6060T5	6.155	•						
A76766.35MI5.5NL       76.2       6.35       5500       6061T6       13.953       •	A60606MI6.5L	60.0	6.0	6500	6060T5	12.051							
A76769.5MI5.5NL       76.2       9.52       5500       6061T6       20.273       •	A75753MI6.5L	75.0	3.0	6500	6060T5	7.767					•		
A80804MI6.5L       80.0       4.0       6500       6060T5       10.952       •       <	A76766.35MI5.5NL	76.2	6.35	5500	6061T6	13.953							
A80806MI6.5L       80.0       6.0       6500       6060T5       16.276       •       <	A76769.5MI5.5NL	76.2	9.52	5500	6061T6	20.273							
A1001006MI6.5L     100.0     6.0     6500     6060T5     20.429     •<	A80804MI6.5L	80.0	4.0	6500	6060T5	10.952							
A10010010MT6.5L 100.0 10.0 6500 6060T5 33.442 • • • • •	A80806MI6.5L	80.0	6.0	6500	6060T5	16.276							
	A1001006MI6.5L	100.0	6.0	6500	6060T5	20.429							
A1501506MI6.5L 150.0 6.0 6500 6060T5 31.089 • • • • •	A10010010MI6.5L	100.0	10.0	6500	6060T5	33.442							
	A1501506MI6.5L	150.0	6.0	6500	6060T5	31.089							•••••

ANGLES HAVE LEGS OF UNEQUAL LENGTH BUT OF EQUAL THICKNESS.

CUSTOM LENGTHS AVAILABLE UPON REQUEST

MILL RUN ONLYIN STOCK





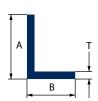
Angles - Available in Mill Finish, Anodised and Powder Coated

Part Number	A mm	B mm	T mm	L mm	Alloy/ Temper	Nominal Mass/Piece	ОГD	NSW	VIC	SA	TAS	WA	۲
A20121.6MI6.5L	20.0	12.0	1.6	6500	6060T5	0.851							
A25121.6MI6.5L	25.0	12.0	1.6	6500	6060T5	1.001							
A25123MI6.5L	25.0	12.0	3.0	6500	6060T5	1.794							
A25201.6MI6.5L	25.0	20.0	1.6	6500	6060T5	1.215							
A25203MI6.5L	25.0	20.0	3.0	6500	6060T5	2.223							
A32201.6MI6.5L	32.0	20.0	1.6	6500	6060T5	1.417							
A32203MI6.5L	32.0	20.0	3.0	6500	6060T5	2.580							
A32253MI6.5L	32.0	25.0	3.0	6500	6060T5	2.840							
A40121.6MI6.5L	40.0	12.0	1.6	6500	6060T5	1.417							
A40201.6MI6.5L	40.0	20.0	1.6	6500	6060T5	1.644							
A40203MI6.5L	40.0	20.0	3.0	6500	6060T5	3.009							
A40251.6MI6.5L	40.0	25.0	1.6	6500	6060T5	1.787							
A40253MI6.5L	40.0	25.0	3.0	6500	6060T5	3.276							
A50123MI6.5L	50.0	12.0	3.0	6500	6060T5	3.107							
A50201.6MI6.5L	50.0	20.0	1.6	6500	6060T5	1.930							
A50203MI6.5L	50.0	20.0	3.0	6500	6060T5	3.542							
A50251.6MI6.5L	50.0	25.0	1.6	6500	6060T5	2.067							
A50253MI6.5L	50.0	25.0	3.0	6500	6060T5	3.802							
A50403MI6.5L	50.0	40.0	3.0	6500	6060T5	4.582							
A60253MI6.5L	60.0	25.0	3.0	6500	6060T5	4.316							
A60404MI6.5L	60.0	40.0	4.0	6500	6060T5	6.714							
A70201.6MI6.5L	70.0	20.0	1.6	6500	6060T5	2.489							
A70251.6MI6.5L	70.0	25.0	1.6	6500	6060T5	2.613							
A70401.6MI6.5L	70.0	40.0	1.6	6500	6060T5	3.042							
A75251.6MI6.5L	75.0	25.0	1.6	6500	6060T5	2.762							
A75253MI6.5L	75.0	25.0	3.0	6500	6060T5	5.128							
A76506.3MI5.5NL	76.2	50.8	6.35	5500	6061T6	11.522							
A76555MI6.5L	76.0	55.0	5.0	6500	6060T5	11.056							
A80203MI6.5L	80.0	20.0	3.0	6500	6060T5	5.102							
A80406MI6.5L	80.0	40.0	6.0	6500	6060T5	12.005							

ANGLES HAVE LEGS OF UNEQUAL LENGTH BUT OF EQUAL THICKNESS.

CUSTOM LENGTHS AVAILABLE UPON REQUEST

MILL RUN ONLY
IN STOCK





Angles - Available in Mill Finish, Anodised and Powder Coated

Part Number	A mm	B mm	T mm	L mm	Alloy/ Temper	Nominal Mass/Piece	ОГD	NSW	VIC	SA	TAS	WA	K
A80502.5MI6.5L	80.0	50.0	2.5	6500	6060T5	5.596							
A90401.6MI6.5L	90.0	40.0	1.6	6500	6060T5	3.614							
A100503MI6.5L	100.0	50.0	3.0	6500	6060T5	7.767							
A100504MI6.5L	100.0	50.0	4.0	6500	6060T5	10.250							
A100506MI6.5L	100.0	50.0	6.0	6500	6060T5	15.216							
A1008010MI6.5L	100.0	80.0	10.0	6500	6060T5	29.945							
A125503MI6.5L	125.0	50.0	3.0	6500	6060T5	9.054							
A150756MI6.5L	150.0	75.0	6.0	6500	6060T5	23.146							
A1508010MI6.5L	150.0	80.0	10.0	6500	6060T5	38.590							

### STRUCTURAL ANGLES

# STANDARD GEOMETRICS

ANGLES HAVE LEGS OF EQUAL LENGTH AND OF EQUAL THICKNESS. THE INSIDE CORNER RADIUS IS GREATER THAN 5mm.

CUSTOM LENGTHS AVAILABLE UPON REQUEST

MILL RUN ONLYIN STOCK





Structural Angles - Available in Mill Finish, Anodised and Powder Coated

Part Number	A mm	B mm	T mm	R mm	L mm	Alloy/ Temper	Normal Mass/Piece	ÓLD	NSW	VIC	SA	TAS	WA	۲
A38384.75MI5.5NL	38.1	38.1	4.75	0.30	5500	6061T6	5.060							
A40123MI6L	40.0	12.0	3.0	0.30	6000	6060T5	2.382							
SA51516.4MI5.5NL	50.8	50.8	6.35	6.10	5500	6061T6	9.097							
A64646.35MI5.5IL	63.5	63.5	6.35	-	5500	6082T6	11.418							
A76766.35MI5.5NL	76.2	76.2	6.35	7.62	5500	6061T6	13.953							
A76769.5MI5.5NL	76.2	76.2	9.52	7.60	5500	6061T6	20.273							
A76506.3MI5.5NL	76.2	50.8	6.35	6.86	5500	6061T6	11.522							

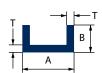
\*\* NOTE: RADIUS ABBREVIATED WITH [-] CONTACT YOUR LOCAL BRANCH FOR SPECIFICATIONS

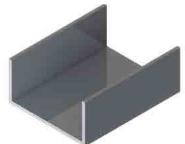
CHANNELS ARE SOMETIME REFERRED TO AS 'C-CHANNELS' HAVE THE WEB AND FLANGES OF UNIFORM THICKNESS.

CUSTOM LENGTHS AVAILABLE UPON REQUEST

MILL RUN ONLY







Channels - Available in Mill Finish, Anodised and Powder Coated

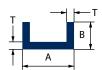
		•											
Part Number	A mm	B mm	T mm	L mm	Alloy/ Temper	Nominal Mass/Piece	ОГD	NSW	VIC	SA	TAS	WA	본
C10101.6MI6.5L	10.0	10.0	1.6	6500	6060T5	0.754							
C12101.6MI6.5L	12.0	10.0	1.6	6500	6060T5	0.806							
C12121.6MI6.5L	12.0	12.0	1.6	6500	6060T5	0.923							
C16121.6MI6.5L	16.0	12.0	1.6	6500	6060T5	1.033							
C16161.6MI6.5L	16.0	16.0	1.6	6500	6060T5	1.274							
C16163MI6.5L	16.0	16.0	3.0	6500	6060T5	2.210							
C20161.6MI6.5L	20.0	16.0	1.6	6500	6060T5	1.378							
C20201.6MI6.5L	20.0	20.0	1.6	6500	6060T5	1.592							
C20203MI6.5L	20.0	20.0	3.0	6500	6060T5	2.853							
C22223MI5L	22.0	22.0	3.0	5000	6060T5	2.440							
C25123MI6.5L	25.0	12.0	3.0	6500	6060T5	2.262							
C25201.6MI6.5L	25.0	20.0	1.6	6500	6060T5	1.742							
C25202.5MI6.5L	25.0	20.0	2.5	6500	6060T5	2.632							
C25251.6MI6.5L	25.0	25.0	1.6	6500	6060T5	2.021							
C25253MI6.5L	25.0	25.0	3.0	6500	6060T5	3.646							
C25403MI6.5L	25.0	40.0	3.0	6500	6060T5	5.232							
C32161.6MI6.5L	32.0	16.0	1.6	6500	6060T5	1.703							
C32253MI6.5L	32.0	25.0	3.0	6500	6060T5	3.997							
C40203MI6.5L	40.0	20.0	3.0	6500	6060T5	3.913							
C40253MI6.5L	40.0	25.0	3.0	6500	6060T5	4.439							
C40403MI6.5L	40.0	40.0	3.0	6500	6060T5	6.025							
C40506MI6.5L	40.0	50.0	6.0	6500	6060T5	13.481					•••••		
C50253MI6.5L	50.0	25.0	3.0	6500	6060T5	4.966							
C50503MI6.5L	50.0	50.0	3.0	6500	6060T5	7.579							
C53251.6MI6.5L	53.0	25.0	1.5	6500	6060T5	2.626							

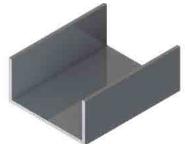
### CHANNELS

# STANDARD GEOMETRICS

CHANNELS ARE SOMETIME REFERRED TO AS 'C-CHANNELS' HAVE THE WEB AND FLANGES OF UNIFORM THICKNESS.







Channels - Available in Mill Finish, Anodised and Powder Coated

Part Number	A mm	B mm	T mm	L mm	Alloy/Temper	Nominal Mass/Piece	٥٦٥	NSW	VIC	SA	TAS	WA	LN L
C60323MI6.5L	60.0	32.0	3.0	6500	6060T5	6.233							
C70302.5MI6.5L	70.0	30.0	2.5	6500	6060T5	5.512							
C80253MI6.5L	80.0	25.0	3.0	6500	6060T5	6.552							
C80403MI6.5L	80.0	40.0	3.0	6500	6060T5	8.105							
C80404MI6.5L	80.0	40.0	4.0	6500/6	6060T5/6106T6	10.712							
C100253MI6.5L	100.0	25.0	3.0	6500	6060T5	7.611							
C100503MI6.5L	100.0	50.0	3.0	6500	6060T5	10.250							
C100505MI6.5L	100.0	50.0	5.0	6500	6060T5	16.854							

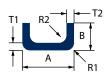
# STRUCTURAL CHANNELS

# STANDARD GEOMETRICS

STRUCTURAL CHANNELS ARE SOMETIME REFERRED TO AS 'C-CHANNELS' HAVE THE WEB AND FLANGES OF DIFFERENT THICKNESSES WITH TWO INTERNAL AND EXTERNAL RADIUS CORNERS.

MILL RUN ONLY IN STOCK

CUSTOM LENGTHS AVAILABLE UPON REQUEST





Structural Channel - Available in Mill Finish, Anodised and Powder Coated

Part Number	A mm	B mm	T1 mm	T2 mm	R1 mm	R2 mm	L mm	Alloy/ Temper	Normal Mass/Piece	ÓLD	NSW	VIC	SA	TAS	W	۲
C56.531.84.5MI6.1DGL	56.5	31.8	4.5	4.5	-	-	6100	6005T5	8.491							
C76387.9MI5.5NL	76.2	38.1	6.35	7.92	0.4	7.62	5500	6061T6	15.020							
C80406MI6.5QL	80.0	40.0	6.0	6.0	0.4	4.0	6500	6106T6	15.704							
C100505MI6.5L	100.0	50.0	5.0	5.0	0.4	5.0	6500	6060T5	16.854							
C102516.3MI5.5NL	101.6	50.8	6.35	7.90	0.5	9.0	5500	6061T6	20.520							
C1276396MI5.5NL	127.0	63.5	6.35	9.53	0.4	10.67	5500	6061T6	28.875	•	•	-	•			
C152648MI5.5IL	152.4	63.5	6.35	7.90	0.4	10.67	5500	6082T6	28.704							
C152648MI6.5IL	152.4	63.5	6.35	7.90	0.4	10.67	6500	6082T6	33.923							
C177766.35MI3.7QL	177.8	76.2	6.35	6.35	0.4	0.2	3700	6106T6	20.139							
C20090108MI8QL	200.0	90.0	8.0	10.0	10.0	4.0	8000	6082/6061	69.2							
C20090108MI6.5NL	200.0	90.0	8.0	10.0	10.0	4.0	6500	6082/6061	56.225	•					_	
C30090108MI6.5QL	300.0	90.0	8.0	10.0	15.0	-	6500	6106T6	70.538							

\*\* NOTE: RADIUS ABBREVIATED WITH [-] CONTACT YOUR LOCAL BRANCH FOR SPECIFICATIONS

FLAT BARS HAVE UNIFORM THICKNESS WITHOUT CORNER RADII.

CUSTOM LENGTHS AVAILABLE UPON REQUEST





Flat Bar - Available in Mill Finish, Anodised and Powder Coated

Part Number	A mm	B mm	L mm	Alloy/Temper	Nominal Mass/ Piece	ÓLD	NSW	VIC	SA	TAS	W	K
F103MI4L	10.0	3.0	4000	6060T5	0.324							
F121.6MI4L	12.0	1.6	4000	6060T5	0.208							
F123MI4L	12.0	3.0	4000	6060T5	0.392			•				
F126MI4L	12.0	6.0	4000	6060T5	0.780							
F163MI4L	16.0	3.0	4000	6060T5	0.520							
F201.6MI4L	20.0	1.6	4000	6060T5	0.348			•				•
F203MI4L	20.0	3.0	4000	6060T5	0.652							
F204MI4L	20.0	4.0	4000	6060T5	0.868				•			<u>.</u>
F206MI4L	20.0	6.0	4000	6060T5	1.300				•			
F2010MI4L	20.0	10	4000	6060T5	2.160							
F2012MI4L	20.0	12	4000	6060T5	2.592							
F251.6MI4L	25.0	1.6	4000	6060T5	0.432							
F253MI4L	25.0	3.0	4000	6060T5	0.812							
F254MI4L	25.0	4.0	4000	6060T5	1.080			•		•		<u>.</u>
F256MI4L	25.0	6.0	4000	6060T5	1.628							
F2510MI4L	25.0	10.0	4000	6060T5	2.712							
F2512MI4L	25.0	12.0	4000	6060T5	3.252							
F2520MI4L	25.0	20.0	4000	6060T5	5.400							
F323MI4L	32.0	3.0	4000	6060T5	1.072				•	•		
F326MI4L	32.0	6.0	4000	6060T5	2.080							
F3210MI4L	32.0	10.0	4000	6060T5	3.456							•
F403MI4L	40.0	3.0	4000	6060T5	1.300	•			•		•	
F404MI4L	40.0	4.0	4000	6060T5	1.724							
F405MI4L	40.0	5.0	4000	6060T5	2.168							
F406MI4L	40.0	6.0	4000	6060T5	2.600						•	
F4010MI4L	40.0	10.0	4000	6060T5	4.336							
F4012MI4L	40.0	12.0	4000	6060T5	5.204							
F4016MI4L	40.0	16.0	4000	6060T5	6.912							
F4025MI4L	40.0	25.0	4000	6060T5	10.84							

FLAT BARS HAVE UNIFORM THICKNESS WITHOUT CORNER RADII.

CUSTOM LENGTHS AVAILABLE UPON REQUEST





Flat Bar - Available in Mill Finish, Anodised and Powder Coated

Part Number	A mm	B mm	L mm	Alloy/Temper	Nominal Mass/ Piece	ÓLD	NSW	VIC	SA	TAS	WA	۲
F503MI4L	50.0	3.0	4000	6060T5	1.624							
F504MI4L	50.0	4.0	4000	6060T5	2.168							
F505MI6L	50.0	5.0	6000	6060T5	4.068							
F506MI4L	50.0	6.0	4000	6060T5	3.252							
F5010MI4L	50.0	10.0	4000	6060T5	5.420							
F5012MI4L	50.0	12.0	4000	6060T5	6.504							
F5020MI4L	50.0	20.0	4000	6060T5	10.800							
F5025MI4L	50.0	25.0	4000	6060T5	13.552							
F603MI4L	60.0	3.0	4000	6060T5	1.944							
F606MI4L	60.0	6.0	4000	6060T5	3.884							
F6010MI4L	60.0	10.0	4000	6060T5	6.504							
F6012MI4L	60.0	12.0	4000	6060T5	7.804							
F801.6MI3.6L	80.0	1.6	3600	6060T5	1.249							
F803MI4L	80.0	3.0	4000	6060T5	2.600							
F806MI4L	80.0	6.0	4000	6060T5	5.204							
F808MI6IL	80.0	8.0	6000	6082T6	10.368							
F8010MI4L	80.0	10.0	4000	6060T5	8.636							
F8012MI4L	80.0	12.0	4000	6060T5	10.368							
F8016MI4L	80.0	16.0	4000	6060T5	13.824							
F8025MI4L	80.0	25.0	4000	6060T5	21.600							
F1001.5MI3.75L	100.0	1.5	3750	6060T5	1.526							
F1003MI4L	100.0	3.0	4000	6060T5	3.252							
F1006MI4L	100.0	6.0	4000	6060T5	6.504							
F1008MI6TL	100.0	8.0	6000	6082T5	13.008							
F10010MI4L	100.0	10.0	4000	6060T5	10.840							
F10012MI4L	100.0	12.0	4000	6060T5	13.008							
F10020MI4L	100.0	20.0	4000	6060T5	21.600							
F10025MI4L	100.0	25.0	4000	6060T5	27.100							
F12010MI4L	120.0	10.0	4000	6060T5	12.960							

FLAT BARS HAVE UNIFORM THICKNESS WITHOUT CORNER RADII.

CUSTOM LENGTHS AVAILABLE UPON REQUEST





Flat Bar - Available in Mill Finish, Anodised and Powder Coated

Part Number	A mm	B mm	L mm	Alloy/Temper	Nominal Mass/ Piece	ОГD	NSW	VIC	SA	TAS	WA	۲
F1508MI8.4NL	150.0	8.0	8400	6061T6	27.316							
F15010MI2.85DCL	150.0	10.0	2850	6005AT5	11.542							
F1606MI4L	160.0	6.0	4000	6060T5	10.408							
F16010MI4L	160.0	10.0	4000	6060T5	17.276							
F16012MI4L	160.0	12.0	4000	6060T5	20.812							
F16025MI4L	160.0	25.0	4000	6060T5	43.200							
F2006MI4L	200.0	6.0	4000	6060T5	12.956							
F20010MI4L	200.0	10.0	4000	6060T5	21.596							

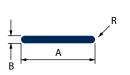
### FLAT BAR WITH RADIUS CORNERS

## STANDARD GEOMETRICS

FLAT BARS HAVE UNIFORM THICKNESS WITH CORNER RADII. OF MORE THAN 1mm.

CUSTOM LENGTHS AVAILABLE UPON REQUEST

MILL RUN ONLY
IN STOCK





Flat Bar with Rounded Corners - Available in Mill Finish, Anodised and Powder Coated

Part Number	A mm	B mm	R mm	L mm	Alloy/ Temper	Normal Mass/Piece	ÓΓD	NSW	VIC	SA	TAS	W	۲
FR2510MI400L	25.0	10.0	5.0	4000	6063T5	2.476	•						
FR444MI4L	44.45	3.96	1.0	4000	6060T5	1.868							
FR506MI4L	50.0	6.0	1.0	4000	6060T5	3.252							
FR506MI5.85L	50.0	6.0	1.0	5850	6060T5	4.756							
FR606MI4L	60.0	6.0	4.0	4000	6060T5	3.804							
FR806MI4L	80.0	6.0	1.0	4000	6060T5	5.204							
FR1008MI6TL	100.0	8.0	1.0	6000	6082T5	12.942							
FR1508MI8.4NL	150.0	8.0	1.0	8400	6061T6	27.199							

\*\* NOTE: RADIUS ABBREVIATED WITH [-] CONTACT YOUR LOCAL BRANCH FOR SPECIFICATIONS

AN EXTRUDED ROD, OR ROUND BAR, IS A SOLID WHICH IS CIRCULAR IN SHAPE.

CUSTOM LENGTHS AVAILABLE UPON REQUEST

MILL RUN ONLYIN STOCK





### Round Rod - Available in Mill Finish, Anodised and Powder Coated

Part Number	Diameter	L	Allow/Tomoso	Normal Mass/	ОГD	NSN	VIC	⋖	TAS	⋖	<b>—</b>
Part Number	mm	mm	Alloy/Temper	Piece	ō	SN	5	S		<b>&gt;</b>	Z
RDR4.76MI3.6L	4.76	3600	6060T5	0.172							
RDR6.35MI5L	6.35	5000	6060T5	0.430							
RDR7.94MI5L	7.94	5000	6060T5	0.670							
RDR10.00MI4L	10.00	4000	6060T5	0.852							
RDR12.00MI4L	12.00	4000	6060T5	1.220							
RDR15.88MI4NL	15.88	4000	6061T6	2.148							
RDR16.00MI4L	16.00	4000	6060T5	2.180							
RDR20.00MI4L	20.00	4000	6060T5	3.408							
RDR25.00MI4L	25.00	4000	6060T5	5.30							•
RDR25.40MI4L	25.40	4000	6060T5	5.496							
RDR30.00MI4NL	30.00	4000	6061T6	7.840							
RDR33.00MI4NL	33.00	4000	6061T6	9.236							
RDR39.00MI4L	39.00	4000	6060T5	12.960							
RDR50.00MI4L	50.00	4000	6061T6	21.204		•					
RDR50.80MI4NL	50.80	4000	6061T6	21.988							
RDR60.33MI4NL	60.33	4000	6061T6	31.012							
RDR75.00MI3.6DL	75.00	3600	2011T6	44.848							
RDR76.20MI2NL	76.20	2000	6061T6	24.736							
RDR90.00MI0.25DL	90.00	250	2011T6	4.485							
RDR101.6MI2NL	101.60	2000	6061T6	43.942							
RDR127.00MI3NL	127.00	3000	6061T6	103.065							
RDR150.00MI1NL	150.00	1000	6061T6	47.925							

A SQUARE BAR IS A SOLID WITH ALL FOUR SIDES EQUAL IN LENGTH. IT IS IDENTIFIED BY THE SIZE MEASUREMENT ACROSS THE FLATS.

CUSTOM LENGTHS AVAILABLE UPON REQUEST

MILL RUN ONLY







Square Rod - Available in Mill Finish, Anodised and Powder Coated

Part Number	Diameter mm	L mm	Alloy/Temper	Normal Mass/ Piece	ÓLD	NSW	VIC	SA	TAS	W	۲
SQR6.00MI4L	6.0	4000	6060T5	0.388							
SQR10.00MI4L	10.0	4000	6060T5	1.08							
SQR12.00MI4L	12.0	4000	6060T5	1.556							
SQR16.00MI4L	16.0	4000	6060T5	2.776							
SQR20.00MI4L	20.0	4000	6060T5	4.320							
SQR25.00MI4L	25.0	4000	6060T5	6.752							
SQR40.00MI4L	40.0	4000	6060T5	17.024							
SQR50.00MI4IL	50.0	4000	6082T6	28.100							
SQR50.00MI4NL	50.0	4000	6061T6	28.100							
SQR65.00MI2L	65.0	2000	6060T5	22.816							

A HALF ROUND IS A SOLID WHICH IS CIRCULAR IN THE SHAPE. OF A SEMI CIRCLE.

CUSTOM LENGTHS AVAILABLE UPON REQUEST





Half Rod - Available in Mill Finish, Anodised and Powder Coated

Part number	Diameter mm	T mm	L mm	Alloy/Temper	Normal Mass/ Piece	٥٦٥	NSW	VIC	SA	TAS	WA	K
HR12.54.54.1MI4L	12.5	4.5	4000	6060T5	0.416							
HR164.53.7MI4EL	16.0	4.5	4000	6060T1	0.480							
HR194.52.9MI4L	19.0	4.5	4000	6060T5	0.452							
HR25.54.52.9MI4L	25.5	4.5	4000	6060T5	0.596					•		
HR3864.4MI4L	38.0	6.0	4000	6060T5	1.300							
HR516MI4ZL	51.0	6.0	4000	6060T4	2.312							

A RECTANGULAR HOLLOW IS A HOLLOW OF UNIFORM THICKNESS IN THE SHAPE OF A RECTANGLE.





CUSTOM LENGTHS AVAILABLE UPON REQUEST

MILL RUN ONLY
IN STOCK

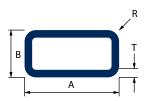
Rectangular Hollow Section - Available in Mill Finish, Anodised and Powder Coated

				,									
Part Number	A mm	B mm	T mm	L mm	Alloy/ Temper	Nominal Mass/Piece	ÓLD	NSW	VIC	SA	TAS	WA	F
RH38252MI6.5L	38.0	25.0	2.0	6500	6060T5	4.160			•				
RH38252.5MI6L	38.1	25.4	2.54	6000	6060T5	4.806							
RH40201.6MI6.5L	40.0	20.0	1.6	6500	6060T5	3.204							
RH40203MI6.5L	40.0	20.0	3.0	6500	6060T5	5.687							
RH40252.5MI6.5L	40.0	25.0	2.5	6500	6060T5	5.265							
RH50252.5MI6.5L	50.0	25.0	2.5	6500	6060T5	6.168							
RH50253MI6.5L	50.0	25.0	3.0	6500	6060T5	7.293							
RH50403MI6.5L	50.0	40.0	3.0	6500	6060T5	8.879							
RH60403MI6.5L	60.0	40.0	3.0	6500	6060T5	9.932							
RH75251.6MI6.6L	75.0	25.0	1.6	6600	6060T5	5.517							
RH75503MI6.5L	75.0	50.0	3.0	6500	6060T5	12.577							
RH76252.4MI6.5L	76.2	25.4	2.4	6500	6060T5	8.157							
RH80253MI6.5L	80.0	25.0	3.0	6500	6060T5	10.426							
RH80403MI6.5L	80.0	40.0	3.0	6500	6060T5	12.005							
RH80503MI6.5L	80.0	50.0	3.0	6500	6060T5	13.058							
RH100251.6MI6.5L	100.0	25.0	1.6	6500	6060T5	6.851							
RH100252.5MI6.5L	100.0	25.0	2.5	6500	6060T5	10.530							
RH100403MI6.5L	100.0	40.0	3.0	6500	6060T5	14.111							
RH100501.6MI6.5L	100.0	50.0	1.6	6500	6060T5	8.242							
RH100502MI6.5L	100.0	50.0	2.0	6500	6060T5	10.250							
RH100503MI6.5L	100.0	50.0	3.0	6500	6060T5	15.164							
RH125403MI6.5L	125.0	40.0	3.0	6500	6060T5	16.744							
RH125503MI6.5L	125.0	50.0	3.0	6500	6060T5	17.862							
RH150503MI6.5L	150.0	50.0	3.0	6500	6060T5	20.429							
RH200503MI6.5L	200.0	50.0	3.0	6500	6060T5	25.688		•					
RH250503MI6.5L	250.0	50.0	3.0	6500	6060T5	30.959							

### RECTANGULAR HOLLOW SECTION WITH RADIUS CORNERS

### STANDARD GEOMETRICS

A RECTANGULAR HOLLOW IS A HOLLOW OF UNIFORM THICKNESS IN THE SHAPE OF A RECTANGLE. WITH FOUR INTERNAL AND EXTERNAL RADIUS CORNERS.





CUSTOM LENGTHS AVAILABLE UPON REQUEST

MILL RUN ONLYIN STOCK

Rectangular Hollow Section with Round Corners - Available in Mill Finish, Anodised and Powder Coated

9							,							
Part Number	A mm	B mm	R mm	T mm	L mm	Alloy/ Temper	Normal Mass/Piece	ОГD	NSN	VIC	SA	TAS	W	본
RR38161.2MI6.5L	38.0	16.0	1.8	1.2	6500	6060T5	2.093						•	
RR38251.5MI6L	38.0	25.0	3.0	1.5	6000	6060T5	2.820							
RR38252.5MI6.5L	38.0	25.0	3.0	2.5	6500	6060T5	5.005							
RR40202MI6.5L	40.0	20.0	2.0	2.0	6500	6060T5	3.880							
RR40253MI6.5L	40.0	25.0	3.0	3.0	6500	6060T5	6.090							
RR50101.3MI6L	50.0	10.0	2.0	1.3	6000	6060T5	2.442							
RR50251.6MI6.5L	50.0	25.0	1.6	1.6	6500	6060T5	3.991							•
RR50252MI6.5L	50.0	25.0	3.0	2.0	6500	6060T5	4.881							
RR50252.5MI6L	50.0	25.0	3.0	2.5	6000	6060T5	5.550							
RR50253MI6.5L	50.0	25.0	4.0	3.0	6500	6060T5	7.039							
RR60402.1MI6.5L	60.0	40.0	3.0	2.1	6500	6060T5	6.935							
RR65161.2MI6.50L	65.0	16.0	3.0	1.2	6500	6063T6	3.224							•
RR65161.4MI6.50L	65.0	16.0	3.0	1.4	6500	6063T6	3.744							
RR70302MI6.500L	70.0	30.0	3.0	2.0	6500	6063T5	6.643							
RR70303MI6.5L	70.0	30.0	1.4	3.0	6500	6060T5	9.873							
RR75503MI6.5L	75.0	50.0	4.45	3.0	6500	6060T5	12.831							
RR75506MI6.5NL	75.0	50.0	4.0	6.0	6500	6061T6	23.887							
RR80404MI6.5IL	80.0	40.0	6.0	4.0	6500	6082T6	15.515							
RR100503MI6.5L	100.0	50.0	4.6	3.0	6500	6060T5	14.885							
RR100506MI6.5L	100.0	50.0	4.6	6.0	6500	6060T5	28.743							
RR102762MI6.5L	101.6	76.2	2.3	2.3	6500	6060T5	14.033							
RR1501005MI6.5IL	150.0	100.0	1.0	5.0	6500	6082T6	41.613							
RR1501005MI6L	150.0	100.0	1.0	5.0	6000	6060T5	38.412							
RR152766.4MI6.5NL	152.0	76.0	6.0	6.4	6500	6061T6	47.996							
RR1601066MI6NL	160.0	106.0	6.4	6.0	6000	6061T6	48.81							

\*\* NOTE: RADIUS ABBREVIATED WITH [-]
CONTACT YOUR LOCAL BRANCH FOR SPECIFICATIONS

### RECTANGULAR HOLLOW SECTION WITH RADIUS CORNERS

### STANDARD GEOMETRICS

A RECTANGULAR HOLLOW IS A HOLLOW OF UNIFORM THICKNESS
IN THE SHAPE OF A RECTANGLE. WITH FOUR INTERNAL AND EXTERNAL RADIUS CORNERS.

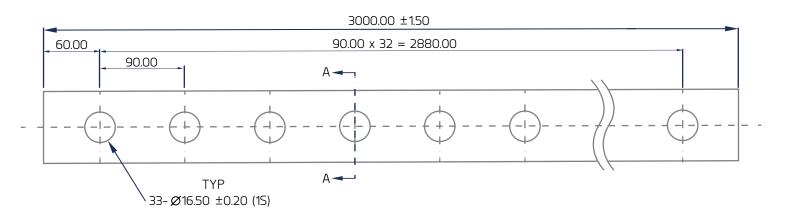
CUSTOM LENGTHS AVAILABLE UPON REQUEST MILL RUN ONLY

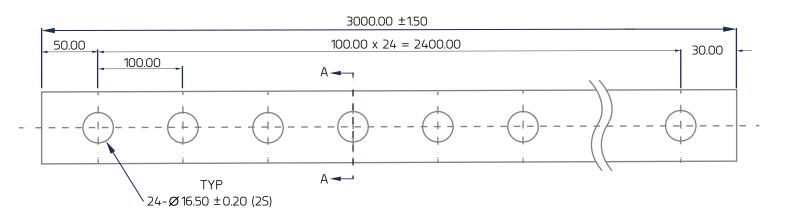
MILL RUN ONLY

IN STOCK

Rectangular Hollow Section with Round Corners - Available in Mill Finish, Anodised and Powder Coated

Part Number	Description	ÓΓD	NSW	VIC	SA	TAS	W W	۲
RR38251.5MI2.48QLD	REC HOLLOW 38X25X1.5MM RAD CN MILL FINISH 16.5DIA 2S 50+100CTR							
RR38251.5MI2.48QLP	REC HOLLOW 38X25X1.5MM RAD CN MILL FINISH 16.5DIA 1S 50+100CTR							
RR38251.5MI2.48QLW	REC HOLLOW 38X25X1.5MM RAD CN MILL FINISH 16.5DIA 1S 60+90CTR	•						
RR38251.5MI2.48QLX	REC HOLLOW 38X25X1.5MM RAD CN MILL FINISH 16.5DIA 2S 60+90CTR	•						
RR38251.5MI3QLD	REC HOLLOW 38X25X1.5MM RAD CN MILL FINISH 16.5DIA 2S 50+100CTR							
RR38251.5MI3QLP	REC HOLLOW 38X25X1.5MM RAD CN MILL FINISH 16.5DIA 1S 50+100CTR							
RR38251.5MI3QLW	REC HOLLOW 38X25X1.5MM RAD CN MILL FINISH 16.5DIA 1S 60+90CTR							
RR38251.5MI3QLX	REC HOLLOW 38X25X1.5MM RAD CN MILL FINISH 16.5DIA 2S 60+90CTR							





### SQUARE HOLLOW SECTION

## STANDARD GEOMETRICS

A SQUARE HOLLOW IS A HOLLOW OF UNIFORM THICKNESS IN THE SHAPE OF A SQUARE.

CUSTOM LENGTHS AVAILABLE UPON REQUEST

MILL RUN ONLYIN STOCK





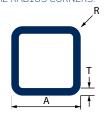
Square Hollow Section - Available in Mill Finish, Anodised and Powder Coated

Part Number	A mm	T mm	L mm	Alloy/Temper	Nominal Mass/ Piece	ÓLD	NSW	VIC	SA	TAS	W	K
SH121.6MI6.5L	12.0	1.6	6500	6060T5	1.17							
SH191.2MI6.5L	19.05	1.2	6500	6060T5	1.508							
SH201.6MI6.5L	20.0	1.6	6500	6060T5	2.060							
SH203MI6.5L	20.0	3.0	6500	6060T5	3.575							
SH251.6MI6.5L	25.0	1.6	6500	6060T5	2.613							
SH252MI6.5L	25.0	2.0	6500	6060T5	3.224							
SH253MI6.5L	25.0	3.0	6500	6060T5	4.634							
SH322MI6.5L	32.0	2.0	6500	6060T5	4.225							
SH323MI6.5L	32.0	3.0	6500	6060T5	6.129							
SH382MI7.20L	38.0	2.0	7200	6063T6	5.594							
SH401.6MI6.5L	40.0	1.6	6500	6060T5	4.309							
SH402MI6.5L	40.0	2.0	6500	6060T5	5.336							
SH403MI6.5L	40.0	3.0	6500	6060T5	7.793							
SH501.6MI6.5L	50.0	1.6	6500	6060T5	5.434							
SH502MI6.5L	50.0	2.0	6500	6060T5	6.766							
SH503MI6.5L	50.0	3.0	6500	6060T5	9.899							
SH652.5MI6.5L	65.0	2.5	6500	6060T5	11.011							
SH65.51.6MI6L	65.5	1.6	6000	6060T5	6.612							
SH753MI6.5L	75.0	3.0	6500	6060T5	15.216							
SH1003MI6.5L	100.0	3.0	6500	6060T5	20.429							

### SQUARE HOLLOW SECTION WITH RADIUS CORNERS

### STANDARD GEOMETRICS

A SQUARE HOLLOW IS A HOLLOW OF UNIFORM THICKNESS IN THE SHAPE OF A SQUARE. WITH FOUR INTERNAL AND EXTERNAL RADIUS CORNERS.





CUSTOM LENGTHS AVAILABLE UPON REQUEST

MILL RUN ONLY IN STOCK

Square Hollow with Round Corners - Available in Mill Finish, Anodised and Powder Coated

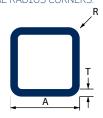
Part Number	A mm	R mm	T mm	L mm	Alloy/ Temper	Normal Mass/Piece	ÓLD	NSW	VIC	SA	TAS	W <sub>A</sub>	۲
SR161.5MI6.5L	16.0	2.0	1.5	6500	6060T5	1.469						•	
SR191.5MI6.5L	19.0	2.0	1.5	6500	6060T5	1.787							
SR203MI6.5L	20.0	3.0	3.0	6500	6060T5	3.581							
SR252MI6.5L	25.0	1.6	2.0	6500	6060T5	3.230							
SR253MI6.5L	25.0	3.0	3.0	6500	6060T5	4.634							
SR25.41.2MI6.5L	25.4	2.8	1.2	6500	6060T5	1.956							
SR323MI6.5L	32.0	3.0	3.0	6500	6060T5	5.973							
SR37.352.5MI6.5L	37.35	3.0	2.5	6500	6060T5	5.999							
SR382MI7L	38.0	2.8	2.0	7000	6060T5	5.327							
SR402MI6.5L	40.0	2.4	2.0	6500	6060T5	5.245							
SR403MI6.5L	40.0	3.0	3.0	6500	6060T5	7.657							
SR405MI6.2L	40.0	2.5	5.0	6200	6060T5	11.631							
SR501.6MI6.6QL	50.0	6.3	1.6	6600	6106T6	5.253							
SR502MI6.5L	50.0	6.0	2.0	6500	6060T5	6.435							
SR503MI6.5L	50.0	3.0	3.0	6500	6060T5	9.899							
SR504MI5.8GL	50.0	6.0	4.0	5800	6351T6	11.095							
SR505MI6.5QL	50.0	3.0	5.0	6500	6106T6	15.665							
SR50.83.2MI6.5L	50.8	3.0	3.2	6500	6060T5	10.692							
SR511.9MI1.8QL	50.8	6.3	1.85	1800	6106T6	1.677							
SR511.9MI6.5L	50.8	6.3	1.85	6500	6060T5	6.058							

\*\* NOTE: RADIUS ABBREVIATED WITH [-] CONTACT YOUR LOCAL BRANCH FOR SPECIFICATIONS

### SQUARE HOLLOW SECTION WITH RADIUS CORNERS

## STANDARD GEOMETRICS

A SQUARE HOLLOW IS A HOLLOW OF UNIFORM THICKNESS IN THE SHAPE OF A SQUARE. WITH FOUR INTERNAL AND EXTERNAL RADIUS CORNERS.





CUSTOM LENGTHS AVAILABLE UPON REQUEST

MILL RUN ONLYIN STOCK

Square Hollow with Round Corners - Available in Mill Finish, Anodised and Powder Coated

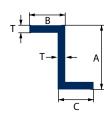
Part Number	A mm	R mm	T mm	L mm	Alloy/ Temper	Normal Mass/Piece	ΟΓD	NSW	VIC	SA	TAS	WA	K
SR625MI6.8DCL	62.0	2.0	5.0	6800	6005AT5	20.427							
SR653MI6.5L	65.0	5.0	3.0	6500	6060T5	13.058							
SR753MI6.5L	75.0	4.45	3.0	6500	6060T5	15.463							
SR76.26.35MI6.5QL	76.2	15.9	6.35	6500	6106T6	28.704							
SR1003MI6.5L	100.0	1.4	3.0	6500	6060T5	20.397							
SR1003.2MI6.6L	100.0	6.35	3.2	6600	6060T5	21.694							
SR1006MI6L	100.0	12.0	6.0	6000/6500	6060T5	35.046							
SR101.66.35MI6.5L	101.6	12.7	6.35	6500	6060T5	40.638							
SR1789MI7.2TL	178.0	8.0	9.0	7200	6082T5	117.619							

\*\* NOTE: RADIUS ABBREVIATED WITH [-]
CONTACT YOUR LOCAL BRANCH FOR SPECIFICATIONS

Z-SECTIONS ARE PROFILES IN THE SHAPE OF A "Z" WITH A UNIFORM THICKNESS THROUGHOUT.

CUSTOM LENGTHS AVAILABLE UPON REQUEST

MILL RUN ONLY
IN STOCK





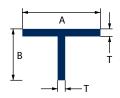
ZED Sections - Available in Mill Finish, Anodised and Powder Coated

Part Number	A mm	B mm	C mm	T mm	L mm	Alloy/ Temper	Normal Mass/Piece	ОГD	NSW	VIC	SA	TAS	WA	۲
Z2020253MI5L	25.0	20.0	20.0	3.0	5000	6060T5	2.39							
Z4125201.6MI6.5L	25.5	20.0	41.6	1.6	6500	6060T5	2.346							

### TEE SECTION

## STANDARD GEOMETRICS

TEE SECTIONS ARE PROFILES IN THE SHAPE OF A "T" TEE WITH A UNIFORM THICKNESS THROUGHOUT. THE HEAD AND BODY OF THE TEE MAY NOT BE EQUAL IN LENGTH.





CUSTOM LENGTHS AVAILABLE UPON REQUEST

TEE Sections - Available in Mill Finish, Anodised and Powder Coated

Part Number	A mm	B mm	T mm	L mm	Alloy/ Temper	Normal Mass/Piece	ОГD	NSW	VIC	SA	TAS	W W	۲
T20201.6MI5L	20.0	20.0	1.6	5000	6060T5	0.835							
T20203MI4L	20.0	20.0	3.0	4000	6060T5	1.204							
T25251.6MI6.5L	25.0	25.0	1.6	6500	6060T5	1.365							
T25253MI6.5L	25.0	25.0	3.0	6500	6060T5	2.483							
T36361.2MI5L	36.0	36.0	1.2	5000	6060T5	1.26							
T40201.6MI6.5L	40.0	20.0	1.6	6500	6060T5	1.534							
T40401.6MI6.5L	40.0	40.0	1.6	6500	6060T5	2.21							
T40403MI6.5L	40.0	40.0	3.0	6500	6060T5	4.069							
T50251.6MI6.5L	50.0	25.0	1.6	6500	6060T5	2.060							
T50503MI6.5L	50.0	50.0	3.0	6500	6060T5	5.109							
T100506MI5.50L	100.0	50.0	6.0	5500	6063T6	12.826							
T180100106MI2.4L	100.0	180.0	10.0/6.0	2400	6060T5	13.365							
UA10326MI6L	70.0	22.0	2.0	6000	6060T5	2.892							

AN EXTRUDED TUBE IS A HOLLOW OF UNIFORM THICKNESS IN THE SHAPE OF A CIRCLE.

CUSTOM LENGTHS AVAILABLE UPON REQUEST

MILL RUN ONLY
IN STOCK





Part Number	Diameter mm	T mm	L mm	Alloy/ Temper	Nominal Mass/Piece	ОГD	NSW	VIC	SA	TAS	WA	K
RT6.351.42MI5L	6.35	1.42	5000	6060T5	0.300	•	_	,	•			
RT9.531.43MI5L	9.53	1.43	5000	6060T5	0.495							
RT101.2MI6.5L	10.0	1.2	6500	6060T5/6063	0.585							
RT101.6MI6.5L	10.0	1.6	6500	6060T5	0.734							
RT121.6MI6L	12.0	1.6	6000	6060T5	0.846							
RT15.881.2MI6.1QL	15.88	1.2	6100	6106T6	0.915							
RT161.2MI6.1QL	16.0	1.2	6100	6106T6	0.921	_						
RT161.6MI6L	16.0	1.6	6000	6060T5	1.176							
RT191.2MI6.1L	19.0	1.2	6100	6060T5	1.110							
RT191.6MI6.5L	19.0	1.6	6500	6060T5	1.540							
RT201.6MI6.5L	20.0	1.6	6500	6060T5	1.631							
RT203MI6.5L	20.0	3.0	6500	6060T5	2.814							
RT221.5MI6L	22.0	1.5	6000	6060T5	1.566							
RT22.25.99MI6NL	22.20	5.99	6000	6061T6	4.968							
RT25.41.2MI5L	25.40	1.2	5000	6060T5	1.235							
RT251.6MI6.5L	25.0	1.6	6500	6060T5	2.073							
RT253MI6.5L	25.0	3.0	6500	6060T5	3.653							
RT28.581.42MI5L	28.58	1.42	5000	6060T5	1.64							
RT321.6MI6L	32.0	1.6	6000	6060T5	2.484							
RT323MI6.5L	32.0	3.0	6500	6060T5	4.816							
RT33.43MI5.20L	33.4	3.0	5200	6063T6	4.024							

### HOLLOW TUBE SECTION

## STANDARD GEOMETRICS

AN EXTRUDED TUBE IS A HOLLOW OF UNIFORM THICKNESS IN THE SHAPE OF A CIRCLE.

CUSTOM LENGTHS AVAILABLE UPON REQUEST

MILL RUN ONLY IN STOCK





Part Number	Diameter mm	T mm	L mm	Alloy/ Temper	Nominal Mass/Piece	ОГD	NSW	VIC	SA	TAS	WA	K
RT34.931.42MI5L	34.93	1.42	5000	6060T5	2.025							
RT38.12MI6L	38.1	2.0	6000	6060T5	3.672							
RT38.13MI6ZL	38.1	3.0	6000	6060T4	5.376							
RT38.13.25MI6.5L	38.1	3.25	6500	6060T5	6.266							
RT401.6MI6L	40.0	1.6	6000	6060T5	3.126							
RT403MI6.5L	40.0	3.0	6500	6060T5	6.142							
RT44.451.42MI5L	44.45	1.42	5000	6060T5	2.600							
RT44.453.25MI6.4PL	44.45	3.25	6400	6060T591	7.296							
RT463.5MI6.5L	46.0	3.5	6500	6060T1	7.566							
RT463.5MI6.5L	46.0	3.5	6500	6060T5	8.229							
RT48.44.47MI6.5NL	48.40	4.47	6500	6061T6	10.868							
RT501.6MI6.5L	50.0	1.6	6500	6060T5	4.283							
RT502MI6.5L	50.0	2.0	6500	6060T5	5.310							
RT503MI6.5L	50.0	3.0	6500	6060T5	7.800							
RT504MI6.5QL	50.0	4.0	6500	6106T6	10.179							
RT504MI6PL	50.0	4.0	6000	6060T591	9.396							
RT505MI6ZL	50.0	5.0	6000	6060T4	11.454							
RT506MI6L	50.0	6.0	6000	6060T5	13.434							
RT50.81.4MI5L	50.8	1.42	5000	6060T5	2.985							
RT50.81.63MI6.5L	50.8	1.63	6500	6060T5	4.42							
RT602MI6L	60.0	2.0	6000	6060T5	5.922							
RT603MI6.5L	60.0	3.0	6500	6060T5	9.464							
RT604MI6PL	60.0	4.0	6000	6060T591	11.442							
RT605MI6PL	60.0	5.0	6000	6060T591	13.998							
RT606MI6.5EL	60.0	6.0	6500	6060T1	17.862							

AN EXTRUDED TUBE IS A HOLLOW OF UNIFORM THICKNESS IN THE SHAPE OF A CIRCLE.

CUSTOM LENGTHS AVAILABLE UPON REQUEST

MILL RUN ONLY
IN STOCK





Part Number	Diameter mm	T mm	L mm	Alloy/ Temper	Nominal Mass/Piece	٥٦ò	NSW	VIC	SA	TAS	WA	K
RT60.34.5MI6NL	60.3	4.5	6000	6061/6063	12.708							
RT63.53.25MI6.4EL	63.5	3.25	6400	6060T1	10.630							
RT63.53.96MI5L	63.5	3.96	5000	6060T5	9.975							
RT63.56.35MI6L	63.5	6.35	6000	6060T5	18.468							
RT754.5MI5L	75.0	4.5	5000	6060T5	13.505							
RT766MI6.5EL	76.0	6.0	6500	6060T1	23.237							
RT76.23.25MI6.4EL	76.2	3.25	6400	6060T1	12.870							
RT76.23.8MI6.0XL	76.2	3.8	6000	6063T52	14.052							
RT76.24.75MI6.8VAL	76.2	4.75	6800	6063T4	19.577							
RT802MI6L	80.0	2.0	6000	6060T5	7.968							
RT803MI6L	80.0	3.0	6000	6060T5	11.754							
RT903MI5L	90.0	3.0	5000	6060T5	11.11							
RT1001.6MI6L	100.0	1.6	6000	6060T5	8.04							
RT1002MI6.5L	100.0	2.0	6500	6060T5	10.842							
RT1003MI6L	100.0	3.0	6000	6060T5	14.862							

### HOLLOW TUBE SECTION

## STANDARD GEOMETRICS

AN EXTRUDED TUBE IS A HOLLOW OF UNIFORM THICKNESS IN THE SHAPE OF A CIRCLE.

CUSTOM LENGTHS AVAILABLE UPON REQUEST

MILL RUN ONLYIN STOCK

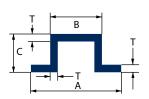




Part Number	Diameter mm	T mm	L mm	Alloy/ Temper	Nominal Mass/Piece	ÓΓD	NSW	VIC	SA	TAS	WA	۲
RT101.61.8MI6L	101.6	1.8	6000	6060T5	9.144							
RT101.66.35MI6.4EL	101.6	6.35	6400	6060T1	32.832							
RT1503MI6L	150.0	3.0	6000	6060T5	22.446							
RT152.43.25MI6L	152.4	3.25	6000	6060T5	24.672							
RT16010MI6IL	160.0	10.0	6000	6082T6	76.338							
RT203.23MI4.8L	203.2	3.0	4800	6060T5	24.451							

CHANNELS ARE SOMETIMES REFERRED TO AS "TOP HATS". THE WEB AND FLANGES ARE OF UNIFORM THICKNESS THROUGHOUT.

CUSTOM LENGTHS AVAILABLE UPON REQUEST





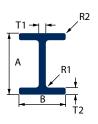
Top Hat Sections - Available in Mill Finish, Anodised and Powder Coated

Part Number	A mm	B mm	C mm	T mm	Alloy/ Temper	Normal Mass/Piece	ÓΓD	NSW	VIC	SA	TAS	W	LN L
TH5025161.5MI5L	50.0	25.0	16.0	1.5	6060T5	1.600							
TH5724282.3MI6L	57.0	24.0	28.0	2.3	6060T5	4.050							
TH63.531.753MI4.86PL	63.5	31.75	31.75	3.0	6063T591	4.811							
TH6331.752.8MI5PL	63.5	31.75	31.75	2.8	6060T591	4.740							
TH11066283MI2.5IL	110.0	66.0	28.0	3.0	6082T6	3.250							

#### I SECTION

## STANDARD GEOMETRICS

I - SECTIONS MAY HAVE WEB AND FLANGES OF DIFFERENT THICKNESSES.





CUSTOM LENGTHS AVAILABLE UPON REQUEST

MILL RUN ONLYIN STOCK

I Sections - Available in Mill Finish, Anodised and Powder Coated

1 30000013 7 (10000	0 (0		O, 7		0.10		0. 0000.									
Part Number	A mm	B mm	T1 mm	T2 mm	R1 mm	R2 mm	L mm	Alloy/ Temper	Normal Mass/Piece	ОГD	NSW	VIC	SA	TAS	WA	K
I4034.21.6MI5.8L	40.0	34.2	1.6	-	-	-	5800	6060T5	2.789							
I40403MI5L	40.0	40.0	3.0	-	0.3	0.3	5000	6060T5	4.635			_				
I100756.44.8MI6.5NL	100.0	75.0	6.4	-	-	-	6500	6061T6	23.978							
I101.676.24.75MI6NL	101.6	76.2	4.7	-	-	-	6000	6061T6	23.748							
CEM2060MI8IL	101.6	76.2	6.3	-	-	-	8000	6082T6	31.664							
UA10016MI6.5QL	117.9	80.0	6.0	8.0	-	-	6500	6106T6	33.260							
I1308056MI6.5IL	130.0	80.0	4.7	6.3	-	-	6500	6082T6	27.547							
I140908MI5.5TL	140.0	90.0	8.0	-	-	-	5500	6082T5	36.019							
I150100610MI10IL	150.0	100.0	6.0	10.0	-	-	10000	6082T6	76.18							
I1501009.5MI6IL	150.0	100.0	7.1	9.5	11.1	0.5	6000	6082T6	47.556							
I1501009.5MI6.5IL	150.0	100.0	7.1	9.5	11.1	0.5	6500	6082T6	51.519							
I1521017.99.5MI8IL	152.4	101.6	7.9	9.5	3.2	0.8	8000	6082T6	64.624							
I1768085MI4.5DCL	176.0	80.0	8.0	-	5.0	-	4500	6005AT5	25.510							
I1768085MI5DCL	176.0	800	8.0	-	5.0	-	5000	6005AT5	28.345							
I1768085MI6IL	176.0	80.0	8.0	-	5.0	-	6000	6082T6	34.014							
I1768085MI6.5DCL	176.0	80.0	8.0	-	5.0	-	6500	6005AT5	36.848							
I17815313MI12IL	178.0	153.0	13.0	-	5.0	-	12000	6082T6	178.812							
I19111169MI8.53L	190.5	111.1	5.8	8.9	-	-	8530	6060T5	69.212							
UN01287MI6IL	216.0	80.0	5.0	-	8.0	-	6000	6082T6	38.196							
UN01287MI8IL	216.0	80.0	5.0	-	8.0	-	8000	6082T6	50.928							
I22010010MI6IL	220.0	100.0	5.0	-	10.0	-	6000	6082T6	48.822							
I22010010MI6.5IL	220.0	100.0	5.0	-	10.0	-	6500	6082T6	52.890							
I27010066MI6IL	270.0	100.0	6.0	-	-	-	6000	6082T6	57.018							
I27010066MI7IL	270.0	100.0	6.0	-	-	-	7000	6082T6	66.521							

\*\* NOTE: RADIUS ABBREVIATED WITH [-] CONTACT YOUR LOCAL BRANCH FOR SPECIFICATIONS

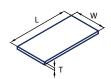
## ROLLED PRODUCTS

ALUMINIUM COIL AND SHEET PRODUCTS ARE MANUFACTURED TO SUIT THE REQUIREMENTS OF DISTRIBUTORS, STOCKISTS, AND SELECTED END USERS.

CUSTOM LENGTHS AVAILABLE UPON REQUEST

MILL RUN ONLY

IN STOCK





### Aluminium Sheet 5005 - Mill Finish

Part Number	T mm	W mm	L mm	Alloy/ Temper	Finish	Nominal Mass/Piece	ÓLD	NSW	VIC	SA	TAS	W	K
S0.612002400MI2FD	0.6	1200	2400	5005-H34	Mill Finish	4.682							
S0.812002400MI2FD	0.8	1200	2400	5005-H34	Mill Finish	6.243							
S1.012002400MI2FD	1.0	1200	2400	5005-H34	Mill Finish	7.804							
S1.012003000MI2FD	1.0	1200	3000	5005-H34	Mill Finish	9.756							
S1.212002400MI2FD	1.2	1200	2400	5005-H34	Mill Finish	9.365							
S1.212003000MI2FD	1.2	1200	3000	5005-H34	Mill Finish	11.707							
S1.212003600MI2FD	1.2	1200	3600	5005-H34	Mill Finish	14.048							
S1.215003000MI2FD	1.2	1500	3000	5005-H34	Mill Finish	14.634							
S1.612002400MI2FD	1.6	1200	2400	5005-H34	Mill Finish	12.487							
S1.612003000MI2FD	1.6	1200	3000	5005-H34	Mill Finish	15.609							
S1.612003600MI2FD	1.6	1200	3600	5005-H34	Mill Finish	18.731							
S1.615003000MI2FD	1.6	1500	3000	5005-H34	Mill Finish	19.512							
S1.615003600MI2FD	1.6	1500	3600	5005-H34	Mill Finish	23.414							
S2.012002400MI2FD	2.0	1200	2400	5005-H34	Mill Finish	15.609							
S2.012003000MI2FD	2.0	1200	3000	5005-H34	Mill Finish	19.512							
S2.012003600MI2FD	2.0	1200	3600	5005-H34	Mill Finish	23.414							
S2.015003000MI2FD	2.0	1500	3000	5005-H34	Mill Finish	24.39							
S2.015003600MI2FD	2.0	1500	3600	5005-H34	Mill Finish	29.268							
S2.512002400MI2FD	2.5	1200	2400	5005-H34	Mill Finish	19.512							
S2.512003000MI2FD	2.5	1200	3000	5005-H34	Mill Finish	24.39							
S2.512003600MI2FD	2.5	1200	3600	5005-H34	Mill Finish	29.268							
S2.515003000MI2FD	2.5	1500	3000	5005-H34	Mill Finish	30.487							
S3.012002400MI2FD	3.0	1200	2400	5005-H34	Mill Finish	23.414			•				
S3.012003000MI2FD	3.0	1200	3000	5005-H34	Mill Finish	29.268							

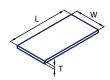
### ALUMINIUM SHEET

## **ROLLED PRODUCTS**

ALUMINIUM COIL AND SHEET PRODUCTS ARE MANUFACTURED TO SUIT THE REQUIREMENTS OF DISTRIBUTORS, STOCKISTS, AND SELECTED END USERS.

CUSTOM LENGTHS AVAILABLE UPON REQUEST

MILL RUN ONLY IN STOCK





#### Aluminium Sheet 5005 - Mill Finish

Part Number	T mm	W mm	L mm	Alloy/ Temper	Finish	Nominal Mass/Piece	ÓΓD	NSW	VIC	SA	TAS	WA	۲
S3.012003600MI2FD	3.0	1200	3600	5005-H34	Mill Finish	35.121							
S3.015003000MI2FD	3.0	1500	3000	5005-H34	Mill Finish	36.585							
S3.015003600MI2FD	3.0	1500	3600	5005-H34	Mill Finish	43.902							
S4.012002400MI2FD	4.0	1200	2400	5005-H34	Mill Finish	31.219							
S4.015003000MI2FD	4.0	1500	3000	5005-H34	Mill Finish	48.78							
S4.012002400MI2FD	4.0	1200	2400	5005-H34	Mill Finish	31.219							
S5.012002400MI2FD	5.0	1200	2400	5005-H34	Mill Finish	38.304							
S5.015003000MI2FD	5.0	1500	3000	5005-H34	Mill Finish	59.85							
P6.012002400MI2FD	6.0	1200	2400	5005-H34	Mill Finish	45.964							
P6.015003000MI2FD	6.0	1500	3000	5005-H34	Mill Finish	71.82							
P8.012002400MI2FD	8.0	1200	2400	5005-H34	Mill Finish	61.286							

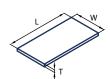
## **ROLLED PRODUCTS**

ALUMINIUM COIL AND SHEET PRODUCTS ARE MANUFACTURED TO SUIT THE REQUIREMENTS OF DISTRIBUTORS, STOCKISTS, AND SELECTED END USERS.

CUSTOM LENGTHS AVAILABLE UPON REQUEST

MILL RUN ONLY







#### PVC Coated Sheet & Finished Sheet

Part Number	T mm	W mm	L mm	Alloy/Temper	Finish	Nominal Mass/Piece	ΟTÒ	NSW	VIC	SA	TAS	W	۲
S0.612002400EM2FD	0.6	1200	2400	5005-H34	EM2FD	4.682							
S0.812202490VP1FD	0.8	1220	2490	5005-H34	VP1FD	6.586							
S0.812202490VR1FD	0.8	1220	2490	5005-H34	VR1FD	6.586							
S1.012002400CQ1FD	1.0	1200	2400	5005-H34	CQ1FD	7.804							
S1.012002400CS1FD	1.0	1200	2400	5005-H34	CS1FD	7.804							
S1.012002400EM2FD	1.0	1200	2400	5005-H34	EM2FD	7.804							
S1.012002400MR1FD	1.0	1200	2400	5005-H34	MR1FD	7.804							
S1.012002400PV1FD	1.0	1200	2400	5005-H34	PV1FD	7.804			•				
S1.012002400PZ1FD	1.0	1200	2400	5005-H34	PZ1FD	7.804							
S1.012003600CQ1FD	1.0	1200	3600	5005-H34	CQ1FD	11.707							
S1.012003600PV1FD	1.0	1200	3600	5005-H34	PV1FD	11.707							
S1.212002400CP1FD	1.2	1200	2400	5005-H34	CP1FD	9.365							
S1.212002400CQ1FD	1.2	1200	2400	5005-H34	CQ1FD	9.365							
S1.212002400PV1FD	1.2	1200	2400	5005-H34	PV1FD	9.365				•			
S1.612002400CL1FD	1.6	1200	2400	5005-H34	CL1FD	12.487						<u>.</u>	
S1.612002400CP1FD	1.6	1200	2400	5005-H34	CP1FD	12.487	•	•				<b>.</b>	
S1.612002400CQ1FD	1.6	1200	2400	5005-H34	CQ1FD	12.487						<b>.</b>	
S1.612002400EM2FD	1.6	1200	2400	5005-H34	EM2FD	12.487						<u>.</u>	
S1.612002400PV1FD	1.6	1200	2400	5005-H34	PV1FD	12.487		•	•	•	•	•	
S1.612002400PZ1FD	1.6	1200	2400	5005-H34	PZ1FD	12.487						<b>.</b>	
S1.612003000CP1FD	1.6	1200	3000	5005-H34	CP1FD	15.609						<u>.</u>	
S1.612003600PV1FD	1.6	1200	3600	5005-H34	PV1FD	18.731						<u>.</u>	
S2.012002400CQ1FD	2.0	1200	2400	5005-H34	CQ1FD	15.609							
S2.012002400CP1FD	2.0	1200	2400	5005-H34	CP1FD	15.609						<u>.</u>	
S2.012002400PV1FD	2.0	1200	2400	5005-H34	PV1FD	15.609							
S2.012002400PZ1FD	2.0	1200	2400	5005-H34	PZ1FD	15.609						<u>.</u>	
S2.012003000PV1FD	2.0	1200	3000	5005-H34	PV1FD	19.512						<u>.</u>	
S2.015003000PV1FD	2.0	1500	3000	5005-H34	PV1FD	24.39							
S2.512001800PV1FD	2.5	1200	1800	5005-H34	PV1FD	14.634							
S2.512002400PV1FD	2.5	1200	2400	5005-H34	PV1FD	19.512			•	•			
S2.512002400PZ1FD	2.5	1200	2400	5005-H34	PZ1FD	19.512							
S2.515002400PV1FD	2.5	1500	2400	5005-H34	PV1FD	24.39						<b>.</b>	
S3.012002400CL1FD	3.0	1200	2400	5005-H34	CL1FD	23.414							

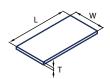
### ALUMINIUM SHEET

## **ROLLED PRODUCTS**

ALUMINIUM HEAVY GAUGE SHEET PRODUCTS ARE MANUFACTURED TO SUIT THE REQUIREMENTS OF DISTRIBUTORS, STOCKISTS, AND SELECTED END USERS.

CUSTOM LENGTHS AVAILABLE UPON REQUEST

MILL RUN ONLYIN STOCK





#### PVC Coated Sheet & Finished Sheet

Part Number	T mm	W mm	L mm	Alloy/Temper	Finish	Nominal Mass/Piece	ОГD	NSW	VIC	SA	TAS	W	۲
S3.012002400CP1FD	3.0	1200	2400	5005-H34	CP1FD	23.414							
S3.012002400PV1FD	3.0	1200	2400	5005-H34	PV1FD	23.414							
S3.012002400PX1FD	3.0	1200	2400	5005-H34	PX1FD	23.414							
S3.012002400PZ1FD	3.0	1200	2400	5005-H34	PZ1FD	23.414							
S3.012003000PV1FD	3.0	1200	3000	5005-H34	PV1FD	29.268							
S3.015003000PV1FD	3.0	1500	3000	5005-H34	PV1FD	36.585							
S3.015003000PZ1FD	3.0	1500	3000	5005-H34	PZ1FD	36.585							
S5.015003000PZ1FD	5.0	1500	3000	5005-H34	PZ1FD	59.85							

EM2FD - Stucco Mill Finish

**VP1FD** - Vilotone White + PVC

**CQ1FD** - Clear Anodised 15UM

CS1FD - Clear Anodised 20UM

MR1FD - RIB'D Mill Finish

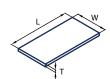
# ROLLED PRODUCTS

ALUMINIUM COIL AND SHEET PRODUCTS ARE MANUFACTURED TO SUIT THE REQUIREMENTS OF DISTRIBUTORS, STOCKISTS, AND SELECTED END USERS.

CUSTOM LENGTHS AVAILABLE UPON REQUEST

PURCHASE ORDER

IN STOCK





Coils - Available in Mill Finish, Anodised and Powder Coated

Cons / Workerte II / W											
Part Number	A mm	B mm	Alloy/Temper	Nominal Mass/ Piece	ОГD	NSW	VIC	SA	TAS	WA	۲
C0.551220MI2TJ	0.55	1220	3105-H26								
C0.61200EM2FD	0.60	1200	5005-H34								
C0.61200MI2FD	0.60	1200	5005-H34								
C0.71200MI2FD	0.70	1200	5005-H34								
C0.81200MI2FD	0.80	1200	5005-H34								
C0.82515MI2TA	0.80	2515	3003-H16								
C0.82515MI2TAM	0.80	2515	3003-H16								
C0.91200MI2FD	0.90	1200	5005-H34								
C0.91200MI2FW	0.90	1200	5005-H16								
C1.01200MI2FD	1.0	1200	5005-H34								
C1.01200MI2FI	1.0	1200	5052-H32								
C1.21200AG2FD	1.20	1200	5005-H34								
C1.21200MI2FI	1.20	1200	5052-H32								
C1.21200MI2FI	1.20	1200	5052-H32								
C1.61200MI2FD	1.60	1200	5005-H34								
C1.61200MI2FI	1.60	1200	5052-H32								
C2.01200MI2FD	2.0	1200	5005-H34								
C2.01200MI2FI	2.0	1200	5052-H32								
C3.01200MI2FI	3.0	1200	5052-H32								
C3.01200PV1FD	3.0	1200	5005-H34								
C3.01500PV1FD	3.0	1500	5005-H34								

### ALUMINIUM SHEET

## **ROLLED PRODUCTS**

ALUMINIUM HEAVY GAUGE SHEET PRODUCTS ARE MANUFACTURED TO SUIT THE REQUIREMENTS OF DISTRIBUTORS, STOCKISTS, AND SELECTED END USERS.

CUSTOM LENGTHS AVAILABLE UPON REQUEST

MILL RUN ONLYIN STOCK





Aluminium Sheet & PVC Coated 5052 - Mill Finish

7 ((011)) 110111 311666 (4		.000002	1411((1 1111)	/									
Part Number	T mm	W mm	L mm	Alloy/ Temper	Finish	Nominal Mass/Piece	ОГD	NSW	VIC	SA	TAS	WA	F
S1.012002400MI2FI	1.0	1200	2400	5052-H32	Mill	7.804							
S1.612002400MI2FI	1.6	1200	2400	5052-H32	Mill	12.487							
S1.612002400PV1FI	1.6	1200	2400	5052-H32	PV1	12.487							
S1.612002400PZ1FI	1.6	1200	2400	5052-H32	PZ1	12.487		•		•			
S2.012002400MI2FI	2.0	1200	2400	5052-H32	Mill	15.609							
S2.012002400PV1FI	2.0	1200	2400	5052-H32	PV1	15.609							
S2.012002400PZ1FI	2.0	1200	2400	5052-H32	PZ1	15.609							
S2.512002400MI2FI	2.5	1200	2400	5052-H32	Mill	19.512							
S2.512002400PV1FI	2.5	1200	2400	5052-H32	PV1	19.512							
S2.512002400PX1FI	2.5	1200	2400	5052-H32	PX1	19.512							
S2.512006000PZ1FI	2.5	1200	6000	5052-H32	PZ1	48.78							
S2.512206000MI2FI	2.5	1220	6000	5052-H32	Mill	49.593							
S2.515003000MI2FI	2.5	1500	3000	5052-H32	Mill	30.487							
S2.515003000PX1FI	2.5	1500	3000	5052-H32	PX1	30.487							
S3.012002400MI2FI	3.0	1200	2400	5052-H32	Mill	23.414							
S3.012002400PV1FI	3.0	1200	2400	5052-H32	PV1	23.414							
S3.012002400PX1FI	3.0	1200	2400	5052-H32	PX1	23.414							
S3.012002400PZ1FI	3.0	1200	2400	5052-H32	PZ1	23.414							
S3.012003000MI2FI	3.0	1200	3000	5052-H32	Mill	29.268							
S3.012004700MI2FI	3.0	1200	4700	5052-H32	Mill	45.853							
S3.015003000MI2FI	3.0	1500	3000	5052-H32	Mill	36.585							
S3.015253000MI2FI	3.0	1525	3000	5052-H32	Mill	37.194							
S3.018502400PX1FI	3.0	1850	2400	5052-H32	PX1	36.097							
S4.012002400MI2FI	4.0	1200	2400	5052-H32	Mill	31.219							

PV1 - 40/50 Micron Blue or Clear

PX1 - 80 Micron - Black 1 side, White the other

**PZ1** - 100 Micron Laser Film - Black 1 side, White the other

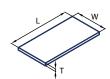
## **ROLLED PRODUCTS**

ALUMINIUM HEAVY GAUGE SHEET PRODUCTS ARE MANUFACTURED TO SUIT THE REQUIREMENTS OF DISTRIBUTORS, STOCKISTS, AND SELECTED END USERS.

CUSTOM LENGTHS AVAILABLE UPON REQUEST

MILL RUN ONLY







Marine Plate 5083 - Mill Finish

101011116 1 1016 3003	IVIII												
Part Number	T mm	W mm	L mm	Alloy/Temper	Finish	Nominal Mass/Piece	ОГD	NSW	VIC	SA	TAS	WA	K
S3.012002400MI2FQ	3.0	1200	2400	5083H321/116	Mill Finish	23.414							
S3.012006100MI2FQ	3.0	1200	6100	5083H321/116	Mill Finish	59.511							
S3.015256100MI2FQ	3.0	1525	6100	5083H321/116	Mill Finish	75.629							
S3.018306100MI2FQ	3.0	1830	6100	5083H321/116	Mill Finish	90.755							
S4.012002400MI2FQ	4.0	1200	2400	5083H321/116	Mill Finish	31.219							
S4.012006100MI2FQ	4.0	1200	6100	5083H321/116	Mill Finish	79.348							
S4.015256100MI2FQ	4.0	1525	6100	5083H321/116	Mill Finish	100.839							
S4.018306100MI2FQ	4.0	1830	6100	5083H321/116	Mill Finish	121.006							
S5.012002400MI2FQ	5.0	1200	2400	5083H321/116	Mill Finish	38.304							
S5.015256100MI2FQ	5.0	1525	6100	5083H321/116	Mill Finish	123.723							
S5.018306100MI2FQ	5.0	1830	6100	5083H321/116	Mill Finish	148.467							
P6.012002400MI2FQ	6.0	1200	2400	5083H321/116	Mill Finish	45.964							
P6.015256100MI2FQ	6.0	1525	6100	5083H321/116	Mill Finish	148.467							
P6.018306100MI2FQ	6.0	1830	6100	5083H321/116	Mill Finish	178.161							
P6.019806100MI2FQ	6.0	1980	6100	5083H321/116	Mill Finish	192.764							
P6.022009000MI2FQ	6.0	2200	9000	5083H321/116	Mill Finish	316.008							
P8.012002400MI2FQ	8.0	1200	2400	5083H321/116	Mill Finish	61.286							
P8.018306100MI2FQ	8.0	1830	6100	5083H321/116	Mill Finish	237.548							
P8.019806100MI2FQ	8.0	1980	6100	5083H321/116	Mill Finish	257.019							
P10.012002400MI2FQ	10.0	1200	2400	5083H321/116	Mill Finish	76.608							
P10.012006100MI2FQ	10.0	1200	6100	5083H321/116	Mill Finish	194.712							
P10.018306100MI2FQ	10.0	1830	6100	5083H321/116	Mill Finish	296.935							
P12.012002400MI2FQ	12.0	1200	2400	5083H321/116	Mill Finish	91.929				•			
P16.012002400MI2FQ	16.0	1200	2400	5083H321/116	Mill Finish	122.572							
P20.012002400MI2FQ	20.0	1200	2400	5083H321/116	Mill Finish	153.216							
P25.012002400MI2FQ	25.0	1200	2400	5083H321/116	Mill Finish	191.52							
P32.012002400MI2FQ	32.0	1200	2400	5083H321/116	Mill Finish	245.145							
P40.012002400MI2FQ	40.0	1200	2400	5083H321/116	Mill Finish	306.432							

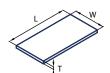
### ALUMINIUM SHEET

## **ROLLED PRODUCTS**

ALUMINIUM HEAVY GAUGE SHEET PRODUCTS ARE MANUFACTURED TO SUIT THE REQUIREMENTS OF DISTRIBUTORS, STOCKISTS, AND SELECTED END USERS.

CUSTOM LENGTHS AVAILABLE UPON REQUEST

MILL RUN ONLY IN STOCK





#### Aluminium Plate 6061 - Mill Finish

Part Number	T mm	W mm	L mm	Alloy/Temper	Finish	Nominal Mass/Piece	ÓГD	NSW	VIC	SA	TAS	W	۲
P6.012502450MI2M	6.0	1250	2450	6061T651	Mill	48.877							
P8.012502450MI2M	8.0	1250	2450	6061T651	Mill	65.17							
P10.012502450MI2M	10.0	1250	2450	6061T651	Mill	81.462							
P12.712502450MI2M	12.7	1250	2450	6061T651	Mill	103.457							

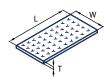
# **ALUMINIUM TREADPLATE**

ALUMINIUM TREAD PLATE PRODUCTS ARE MANUFACTURED TO SUIT THE REQUIREMENTS OF DISTRIBUTORS, STOCKISTS, AND SELECTED END USERS.

CUSTOM LENGTHS AVAILABLE UPON REQUEST

MILL RUN ONLY







5-Bar Treadplate - Mill Finish

Part Number	T mm	W	L	Alloy/Temper	Finish	Nominal Mass/Piece	ÓLD	NSW	VIC	SA	TAS	W	۲
TP0.912002400FB1FW	0.9	1200	2400	1100-H114	Mill Finish	7.776							
TP1.412002400FB1FU	1.4	1200	2400	5052-0	Mill Finish	12.620							
TP1.412002400PCBKFU	1.4	1200	2400	5052-0	PCBK	12.620							
TP1.612002400FB1FU	1.6	1200	2400	5052-0	Mill Finish	14.423							
TP1.615003600FB1FU	1.6	1500	3600	5052-0	Mill Finish	27.043							
TP2.012002400FB1FU	2.0	1200	2400	5052-0	Mill Finish	17.28							
TP2.015002400FB1FU	2.0	1500	2400	5052-0	Mill Finish	21.6							
TP2.015003000FB1FU	2.0	1500	3000	5052-0	Mill Finish	27.0							
TP2.512002400FB1FU	2.5	1200	2400	5052-0	Mill Finish	21.6							
TP2.515002400FB1FU	2.5	1500	2400	5052-0	Mill Finish	27.0							
TP2.515003000FB1FU	2.5	1500	3000	5052-0	Mill Finish	33.75							
TP3.012002400FB1FU	3.0	1200	2400	5052-0	Mill Finish	25.660							
TP3.012003000FB1FU	3.0	1200	3000	5052-0	Mill Finish	32.076							
TP3.012003600FB1FU	3.0	1200	3600	5052-0	Mill Finish	38.491							
TP3.015002400FB1FU	3.0	1500	2400	5052-0	Mill Finish	32.076							
TP3.015003000FB1FU	3.0	1500	3000	5052-0	Mill Finish	40.095							
TP3.015003600FB1FU	3.0	1500	3600	5052-0	Mill Finish	48.114							
TP4.012002400FB1FU	4.0	1200	2400	5052-0	Mill Finish	34.905							
TP4.018503000FB1FU	4.0	1850	3000	5052-0	Mill Finish	67.266							
TP5.012002400FB1FU	5.0	1200	2400	5052-0	Mill Finish	42.624							
TP5.018502400FB1FU	5.0	1850	2400	5052-0	Mill Finish	65.712							
TP5.018503000FB1FU	5.0	1850	3000	5052-0	Mill Finish	82.14							
TP6.012002400FB1FU	6.0	1200	2400	5052-0	Mill Finish	51.84							
TP6.015003000FB1FU	6.0	1500	3000	5052-0	Mill Finish	81.0							

### TREADPLATE

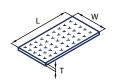
# **ALUMINIUM TREADPLATE**

ALUMINIUM TREAD PLATE PRODUCTS ARE MANUFACTURED TO SUIT THE REQUIREMENTS OF DISTRIBUTORS, STOCKISTS, AND SELECTED END USERS.

CUSTOM LENGTHS AVAILABLE UPON REQUEST

MILL RUN ONLY







Propeller Pattern Treadplate - Bright Polish Finish

Part Number	T mm	W mm	L mm	Alloy/Temper	Finish	Nominal Mass/Piece	ОГD	NSW	VIC	SA	TAS	WA	۲
TP1.612002400PP2TI	1.6	1200	2400	3003-H224	Mill Finish	14.423							
TP1.612003000PP2TI	1.6	1200	3000	3003-H224	Mill Finish	18.028							
TP1.612003600PP2TI	1.6	1200	3600	3003-H224	Mill Finish	21.634							
TP2.012002400PP2TI	2.0	1200	2400	3003-H224	Mill Finish	17.28							
TP3.012002400PP2TI	3.0	1200	2400	3003-H224	Mill Finish	25.660							
TP5.09003600PP2TI	5.0	900	3600	3003-H224	Mill Finish	47.952							
TP5.012002400PP2TI	5.0	1200	2400	3003-H224	Mill Finish	42.624							





Options for both single and double glazing pockets allow for a wide range of glazing from 5mm to 28mm thickness and our 6063 T6 alloy improves the fabrication processes and overall product strength.









Ulltrasafe Security window and door screens are manufactured using stainless steel woven mesh, high grade innovatively designed Aluminium framing and high security hardware. When all these elements are combined they exceed all Australian standards.

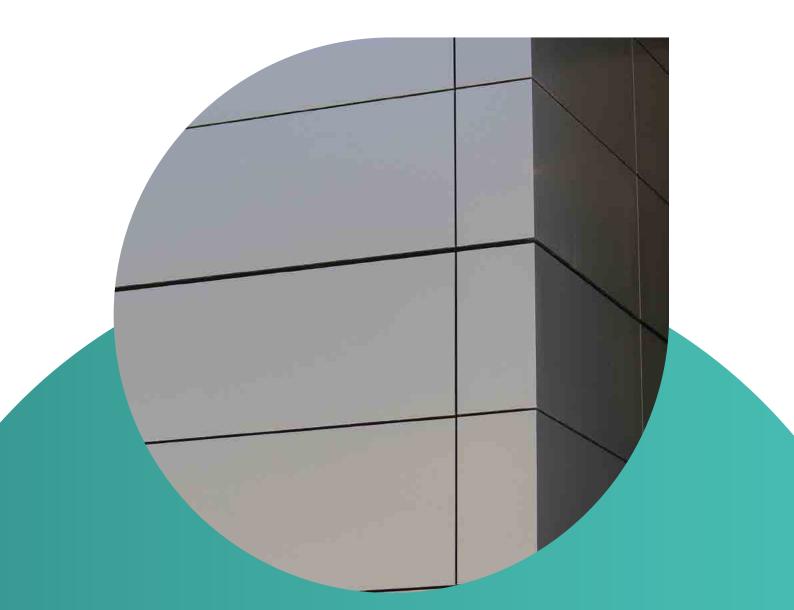
Wintec Systems Ulltrasafe security products are designed and tested to withstand the harshest of Australian conditions including cyclonic debris requirements allowing you to secure your home without losing the luxury of openness.





# HIGH PERFORMANCE, NON-COMBUSTIBLE FACADE CLADDING





- >> NON-COMBUSTIBLE
- >> 15 YEAR WARRANTY
- >> HIGH QUALITY MARINE GRADE
- >>> SUSTAINABLE
- >> 100% RECYCLABLE

- >> OUTSTANDING DURABILITY
- >> ABRASIVE RESISTANT
- >> NO VISIBLE EXTERNAL JOINTS
- >> WEATHER PROOF
- >> AS1530.1 CERTIFIED

#### ALYCLAD® TECHNICAL DATA SHEET



PROPERTIES	UNITS	VALUES
Alloy		5052
Temper		H32
Standard thickness	mm	3
Raw density	kg/m³	2680
Indicative minimum radius	mm	4.5



Tensile strength	MPa	216
0.2% Proof stress	MPa	169
Elongation	%	13
Linear thermal expansion		2.38mm at 100° temperature difference
Hardness	Brinell	60



Melting range	°C	607-650
Modulus of elasticity - Tension	GPa	69.3 @ 20°c
Modulus of elasticity - Torsion	GPa	25.9 @ 20°c
Modulus of elasticity – Compression	GPa	70.7 @ 20°c



Electrical resistivity	micro-ohm.m	70.7 @ 20°c
Electrical conductivity - Equal volume	MS/m	20 @ 20°c
Electrical conductivity - Equal weight	MS/m	67 @ 20°c



Sound absorbtion factor	Noise Reduction Co-efficient	0.05
Sound reflection	%	95



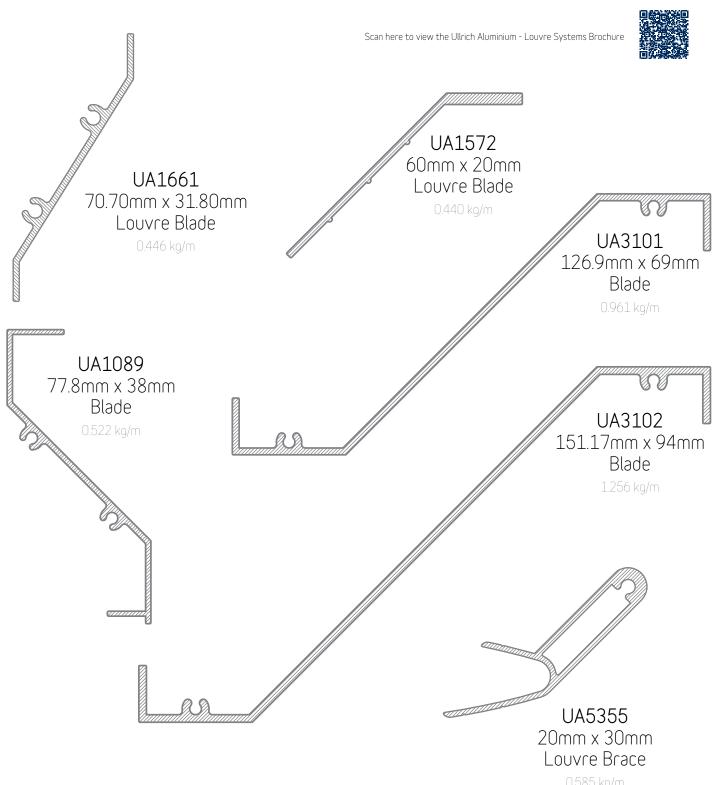
### FIRE PERFORMANCE

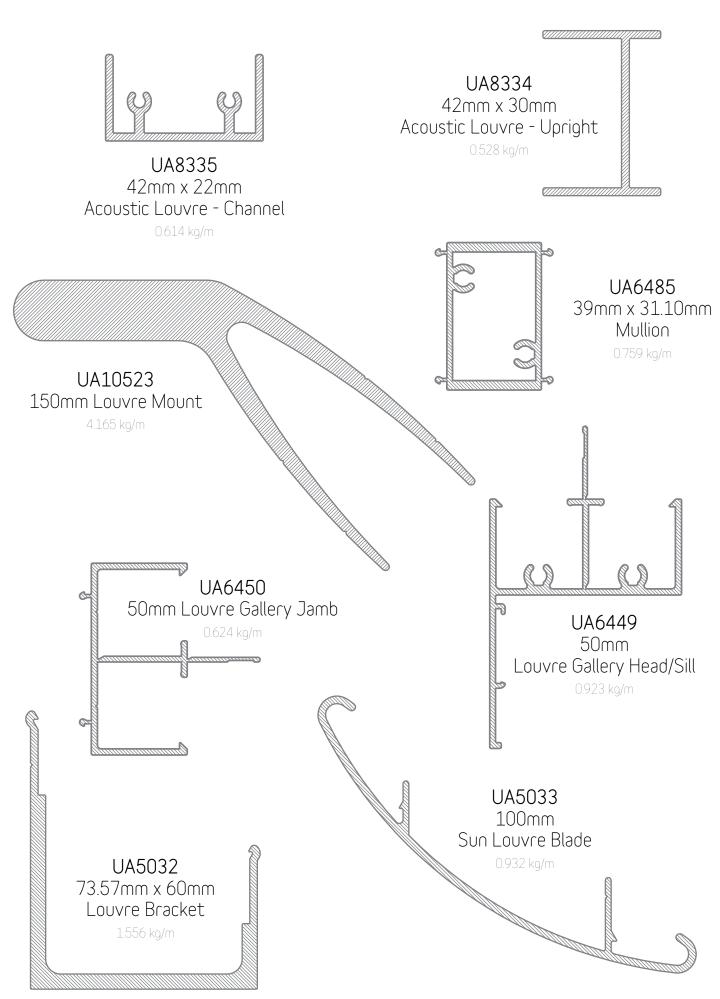
Test Standard	Result
AS1530.1	Non-combustible

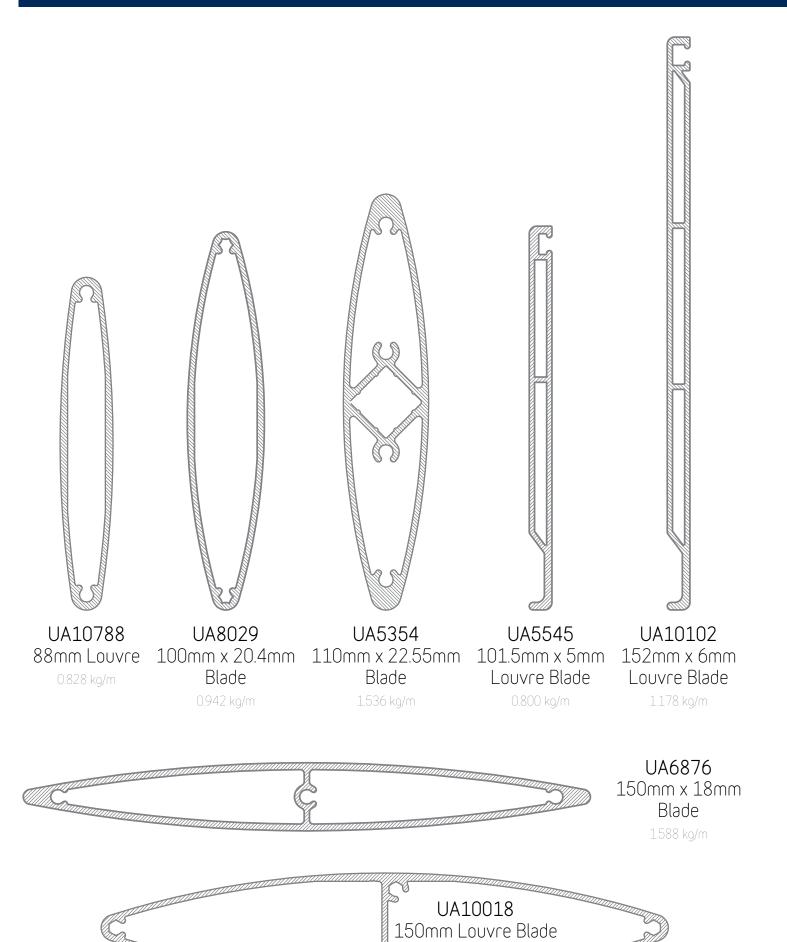


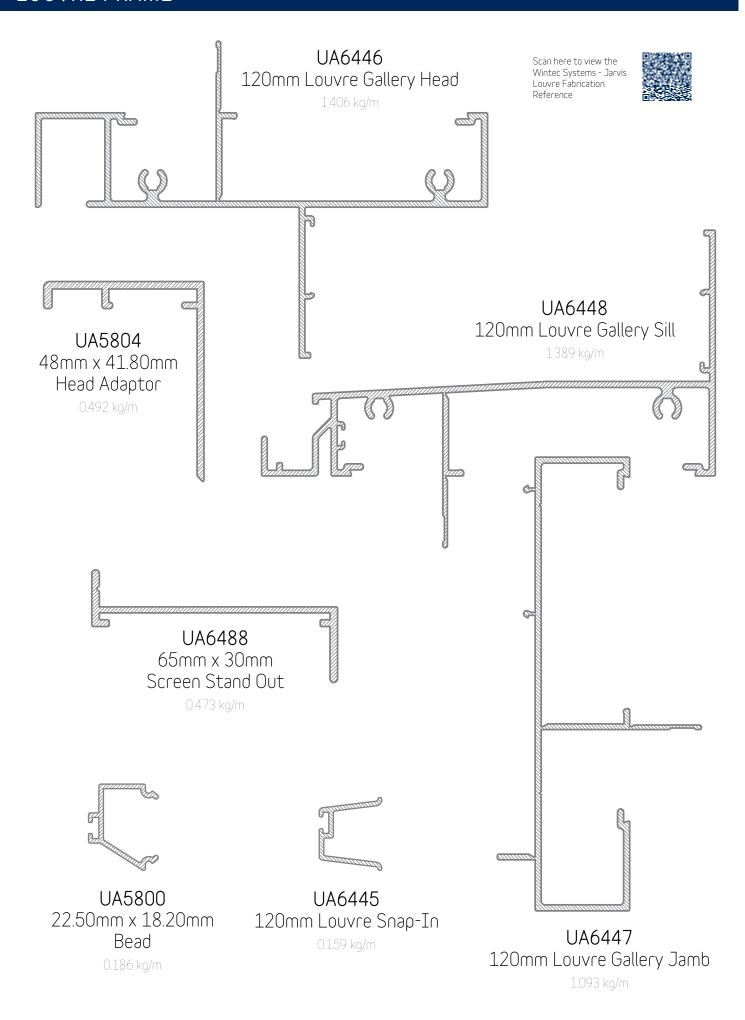


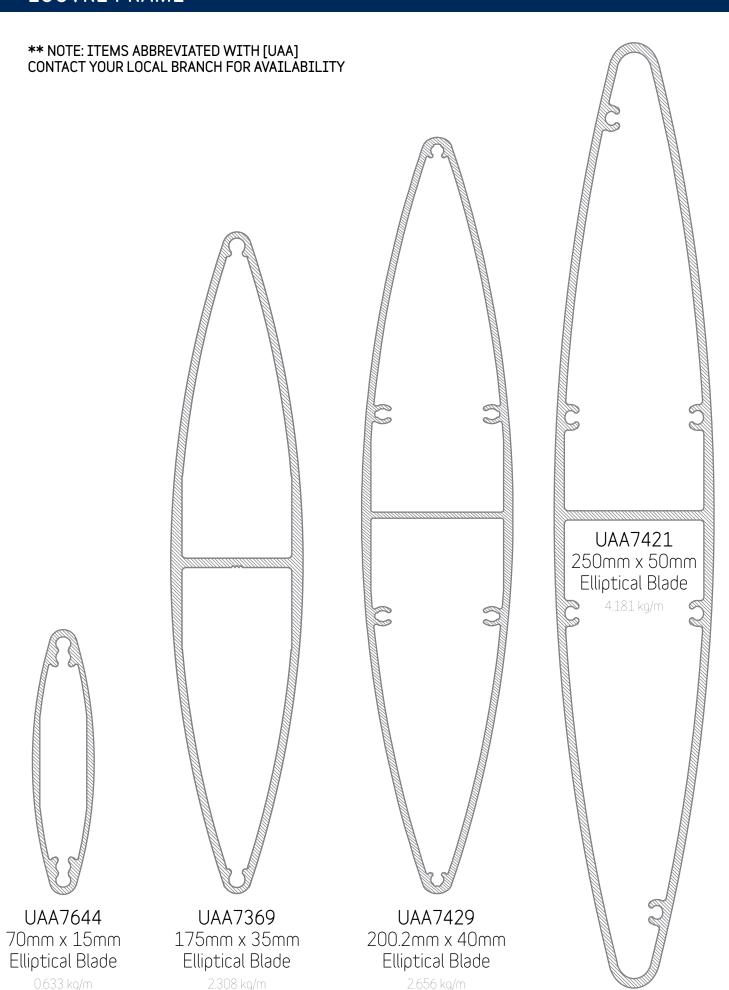


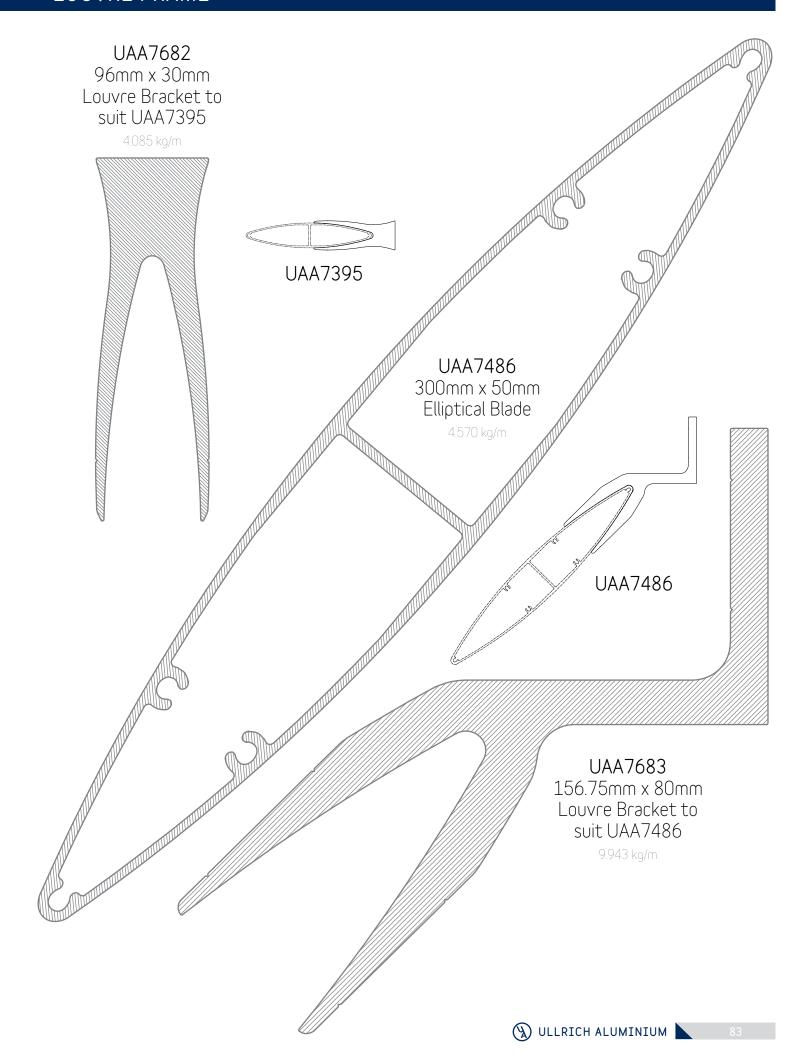


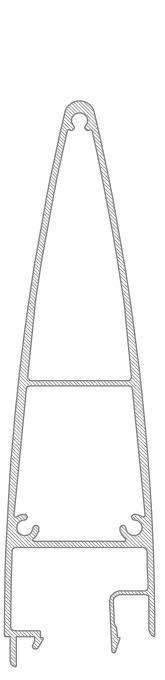






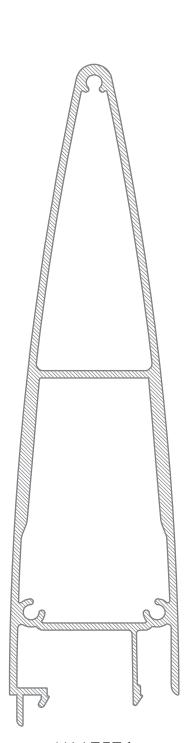






UAA7551 300mm x 40mm Elliptical Blade Half End Blade \*half size

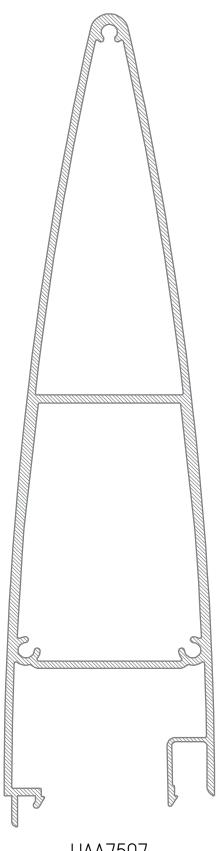
2.168 kg/m



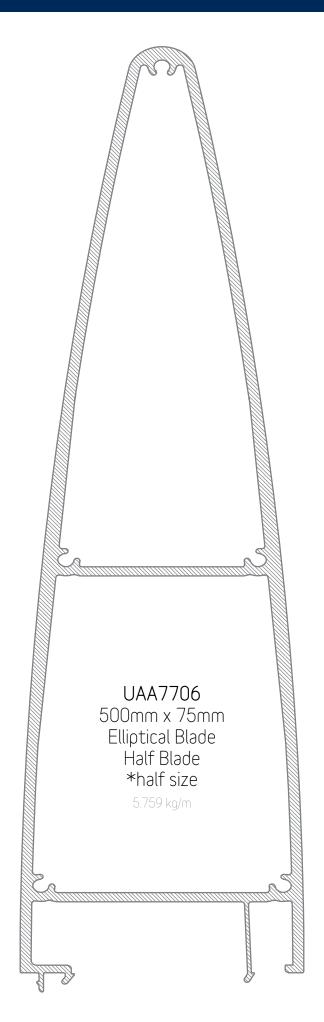
UAA7576 350mm x 45mm Elliptical Blade Half Blade \*half size

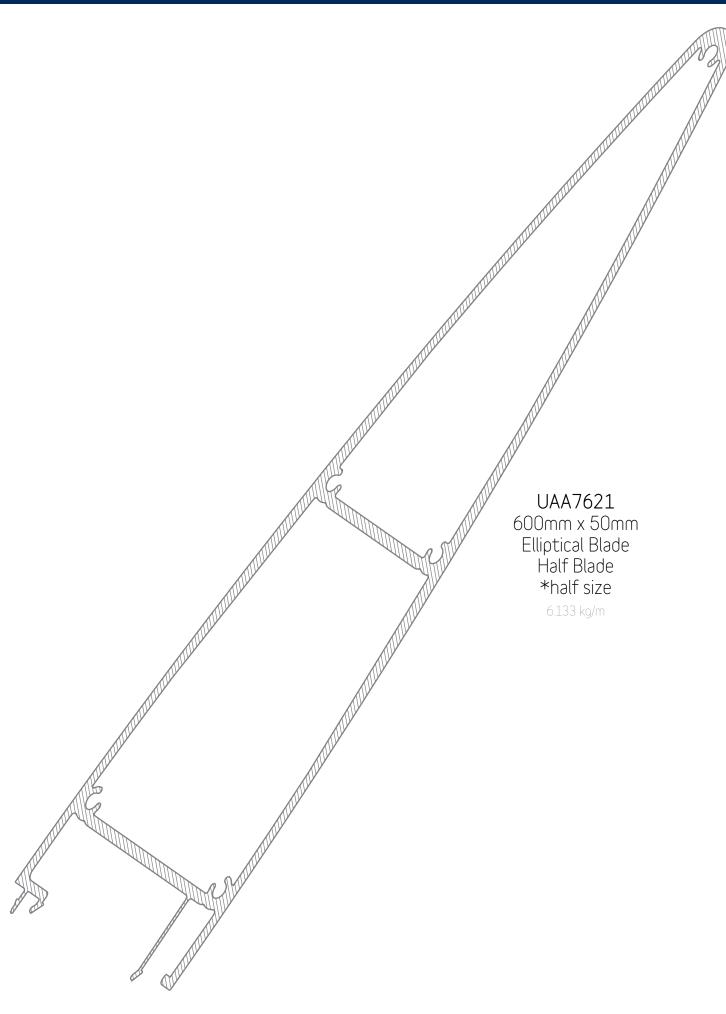


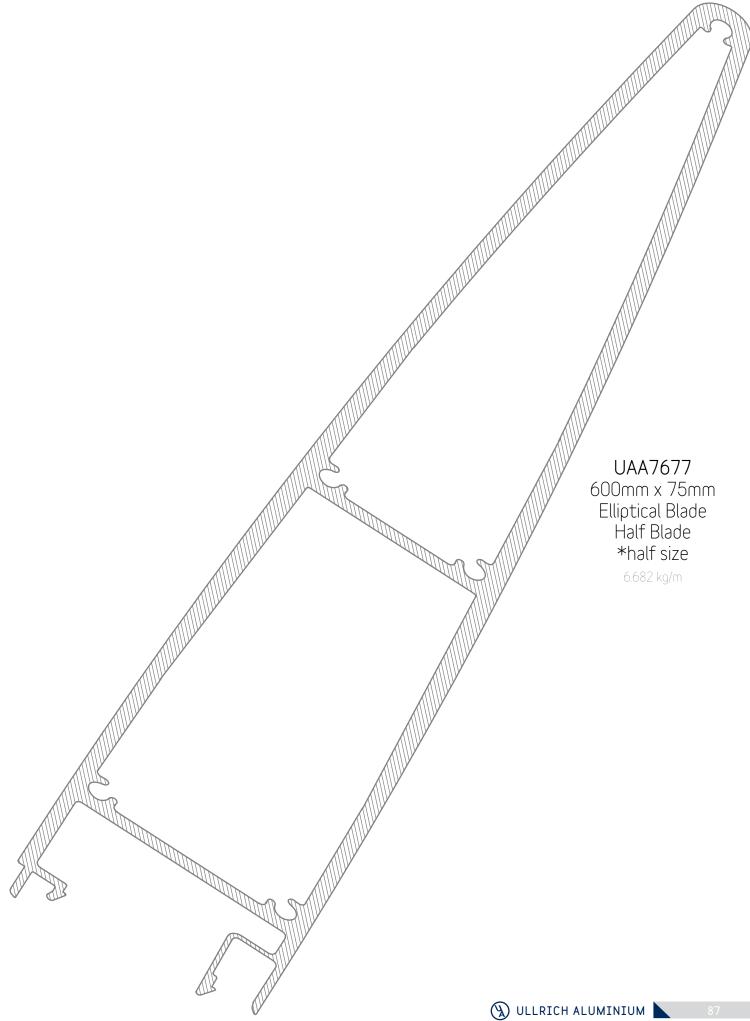




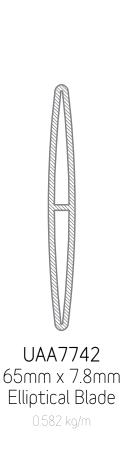
UAA7507 430mm x 55mm Elliptical Blade Half Blade \*half size

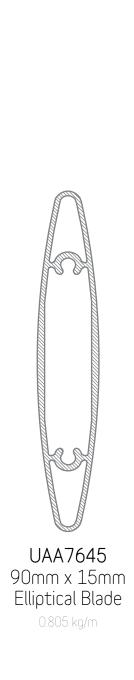


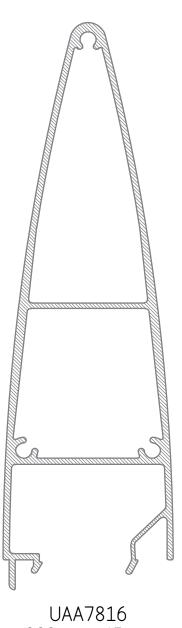




# \*\* NOTE: ITEMS ABBREVIATED WITH [UAA] CONTACT YOUR LOCAL BRANCH FOR AVAILABILITY





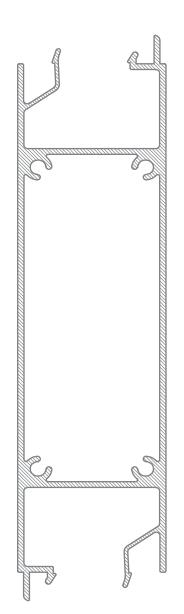


UAA7816 300mm x 45mm Elliptical Blade Half Blade \*half size

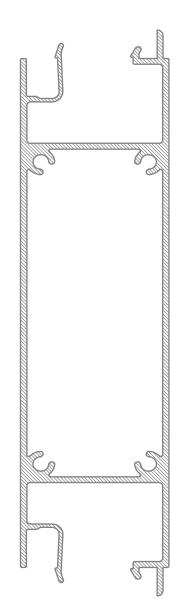


UAA7714 Wall Receiver to suit 40mm Suit

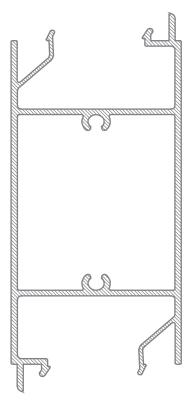
UAA7719 Wall Receiver to suit 45mm Suite



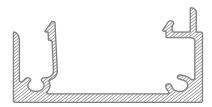
**UAA7547** 150mm x 40mm Self Mating Centre Blade 2.334 kg/m



**UAA7819** 150mm x 40mm Self Mating Centre Blade 2.356 kg/m

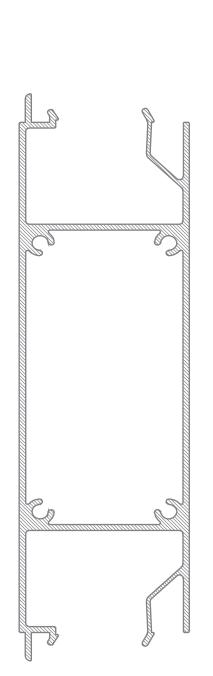


**UAA7820** 100mm x 45mm Self Mating Centre Blade

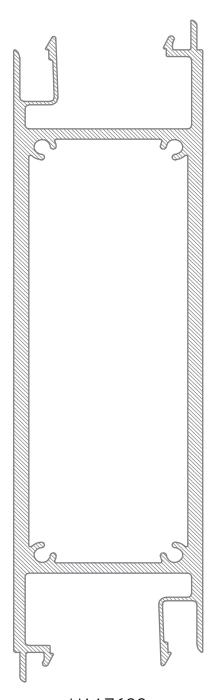


UAA7622 Self Mating End Cap to suit 50mm Suite

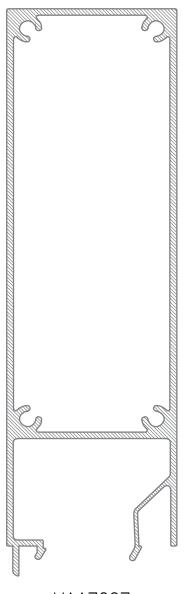
0.928 kg/m



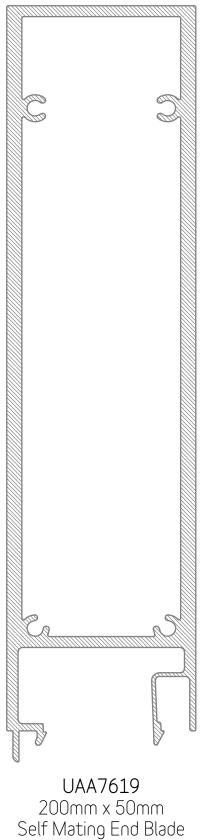
UAA7805 150mm x 45mm Self Mating Centre Blade

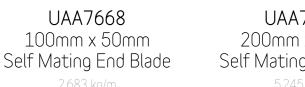


UAA7620 175mm x 50mm Self Mating Centre Blade



UAA7807 150mm x 45mm Self Mating End Blade 2.316 kg/m





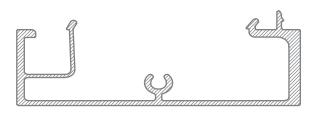




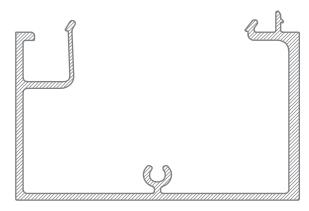








UAA7679 Self Mating End Cap to suit 75mm Suite



**UAA7793** Self Mating End Cap to suit 75mm Suite 1.361 kg/m

## **FENCE & GATE**



Scan here to view the Ullrich Aluminium - Fence & Gate System Brochure



UA10080 50mm - 1 Way Post Square Corners

 $1.253 \, \text{kg/m}$ 

UA10079 50mm - 2 Way Post Square Corners

1 469 kg/m

UA10082

50mm - 1 Way Post Radius Corners

1.206 kn/m

UA10081

50mm - 2 Way Post Radius Corners

1.422 kg/m

UA10180

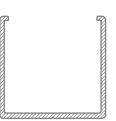
50mm - Corner Post Radius Corners

1.253 kg/m



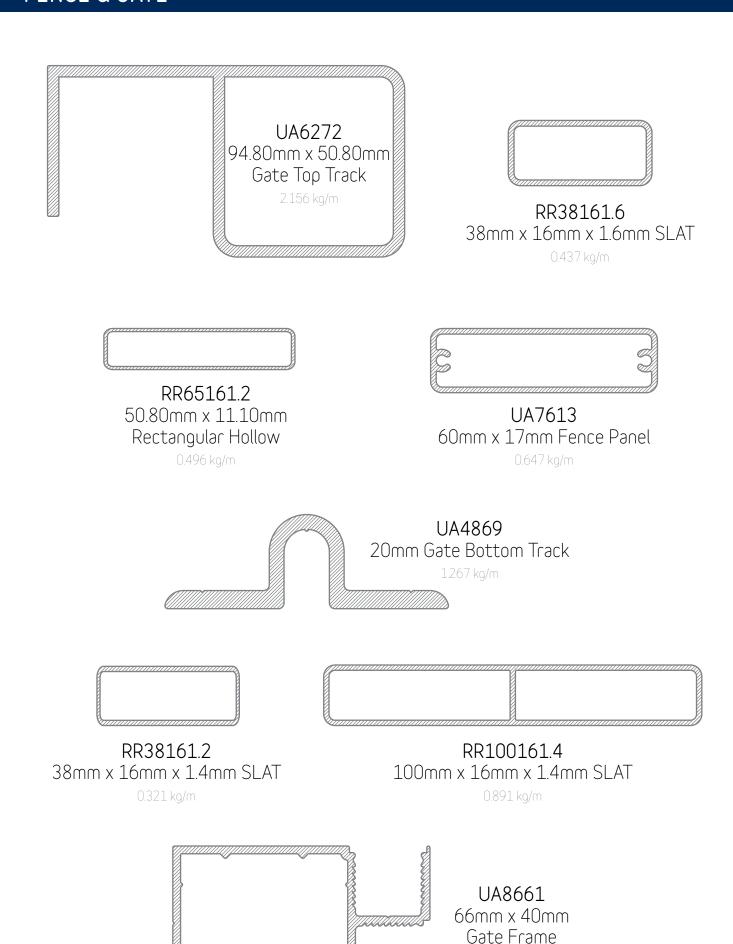
**UA10616** 24.60mm x 23.80mm SLAT Infill

0.250 kg/m

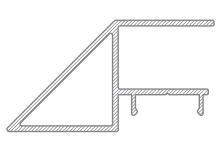


UA10615 28mm x 27mm SLAT Channel

0.276 kg/m

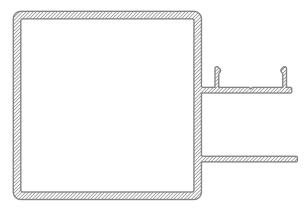


1.222 kg/m

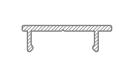


UFDPLMI6.000L 55.10mm x 29.60mm Diagonal Post - Left

0.617 kg/m

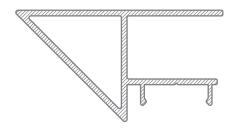


UFGW1WMI6.000L 50mm x 50mm Fencing Post - 1 Way & Gate Frame



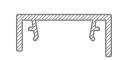
UFMSMI6.000L 24mm x 7mm Midrail Support

0.128 kn/m



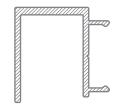
UFDPRMI6.000L 55.10mm x 29.60mm Diagonal Post - Right

 $0.617 \, \text{kn/m}$ 



UFIMI6.000L 25.40mm x 9.80mm Infill

0.209 kg/m



UFCMI6.000L 24mm x 19.80mm One Way Channel

0.322 kg/m



EP8026 50mm x 10mm Fluted SLAT

 $0.529 \, \text{kg/m}$ 



UA2949 50mm x 2mm Square Hollow

1.037 kg/m

UA1202 100mm x 50mm x 3mm Rectangular Hollow

2333 kg/m

UA6465 100mm x 50mm x 1.60mm Rectangular Hollow

1.268 kg/m

UA4707 150mm x 50mm x 3mm Rectangular Hollow

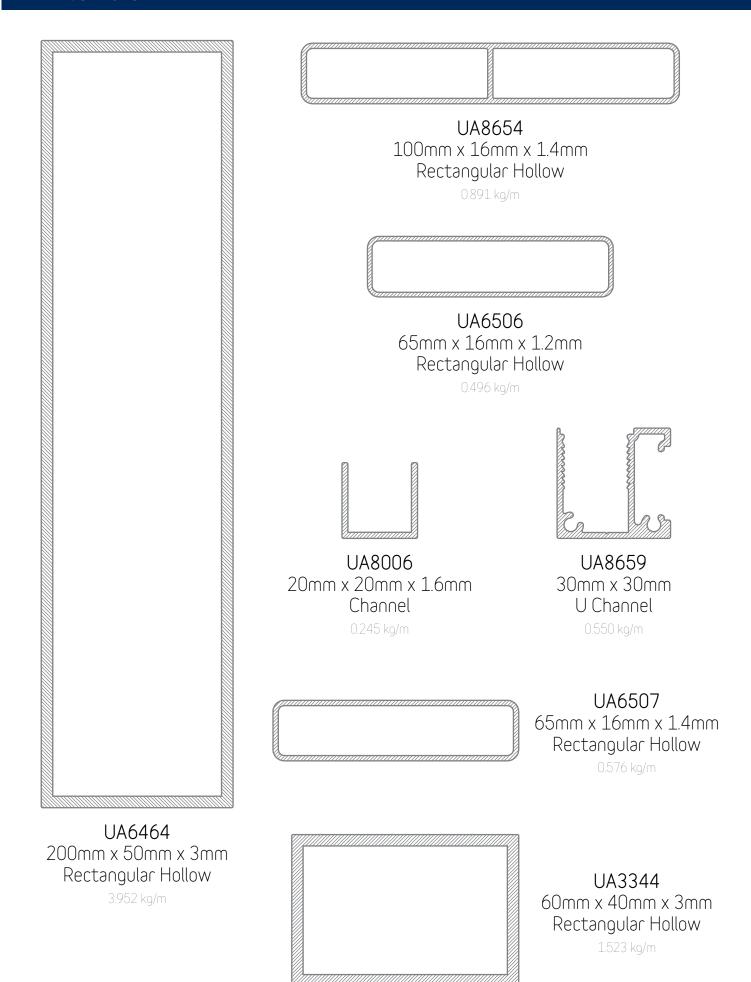
3.143 kg/m

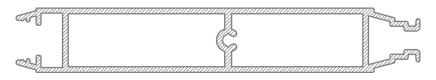
UA5719 80mm x 40mm x 3mm Rectangular Hollow

1.847 kg/m

UA4664 65mm x 3mm Square Hollow

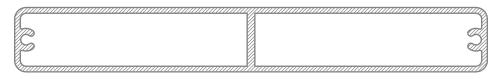
2.009 kg/m





UA6857 106.80mm x 17mm Tongue & Groove Plank

1.099 kg/m



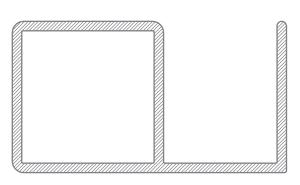
UA7694 125mm x 17mm Fence Panel

1.253 ka/m



UA1855 50mm x 44mm Fence SLAT

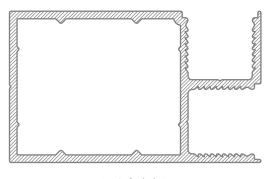
0.480 kn/m



UA10413 72.50mm x 40mm Gate Top Track

1468 kg/m

# FENCE & GATE



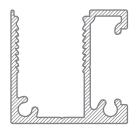
UA8661 66.50mm x 40mm Gate Frame - Fencing

1.222 kg/m



KWINFS 19.60mm x 6mm Gate Infill

 $0.105 \, \text{kg/m}$ 

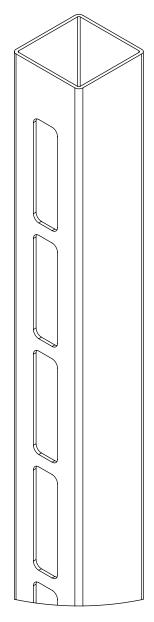


UA8659 30mm x 30mm U Channel - Fencing

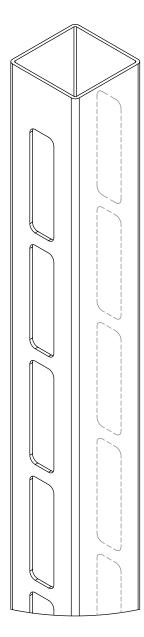
 $0.550 \, \text{kg/m}$ 

UA1213 100mm x 3mm Square Hollow 3.143 kg/m

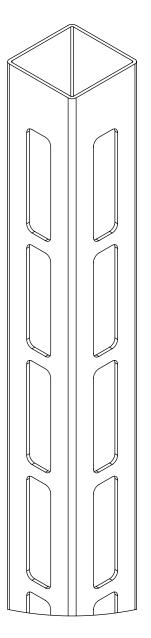
## FENCE & GATE - ALUMINIUM SLOTTED POST STRAIGHT 8mm GAP



PSP508GSS One Side to Suit 65mm x 16mm Slat



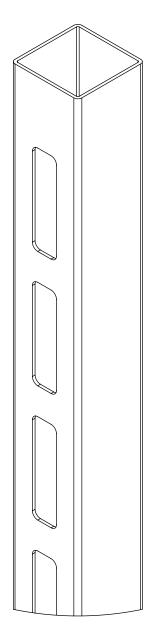
PSP508GM Mullion to Suit 65mm x 16mm Slat



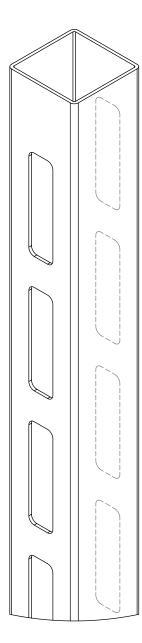
PSP508GCS Corner to Suit 65mm x 16mm Slat

\*\* NOTE: Post Dimension 50 x 50 x 1.6mm (UA6462)

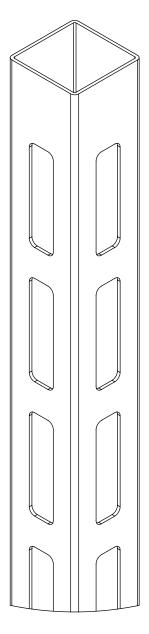
## FENCE & GATE - ALUMINIUM SLOTTED POST STRAIGHT 20mm GAP



PSP5020GSS One Side to Suit 65mm x 16mm Slat



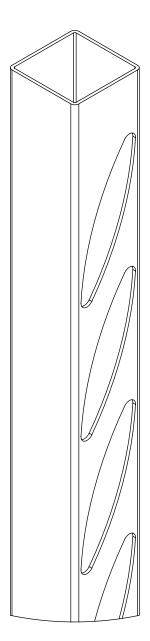
PSP5020GM Mullion to Suit 65mm x 16mm Slat



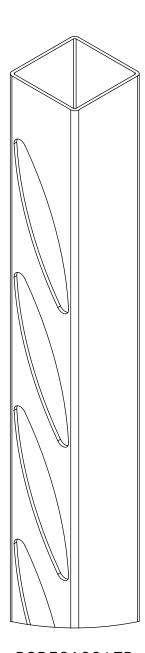
PSP5020GCS Corner to Suit 65mm x 16mm Slat

\*\* NOTE: Post Dimension 50 x 50 x 1.6mm (UA6462)

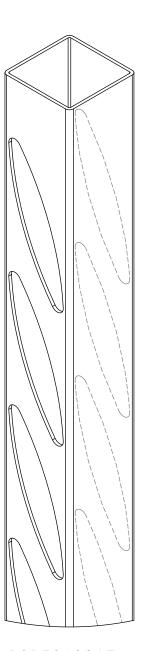
## FENCE & GATE - ALUMINIUM SLOTTED POST ANGLED 10mm OVERLAP



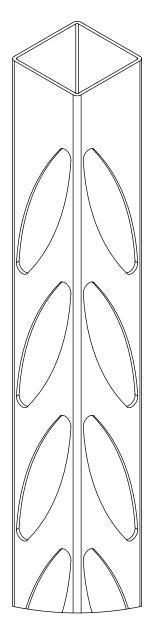
PSP50100AEL Left hand to Suit 100mm x 20mm Elliptical Blade



PSP50100AER
Right hand to Suit
100mm x 20mm
Elliptical Blade



PSP50100AEM Mullion to Suit 100mm x 20mm Elliptical Blade



PSP50100CNR Corner External to Suit 100mm x 20mm Elliptical Blade

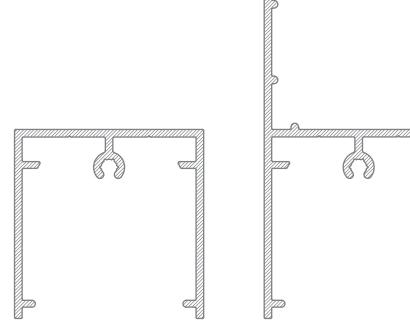
\*\* NOTE: Post Dimension 50 x 50 x 1.6mm (UA6462)

# ULLTRA BATTEN



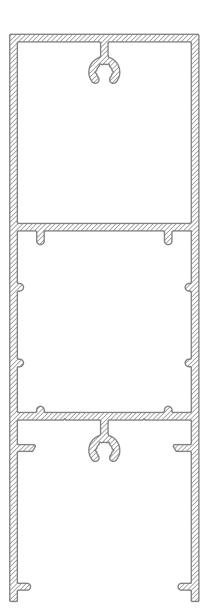




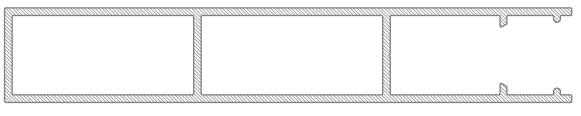




UB050100 50mm x 100mm Batten Outer



UB050150 50mm x 150mm Batten Outer

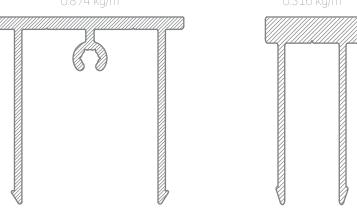


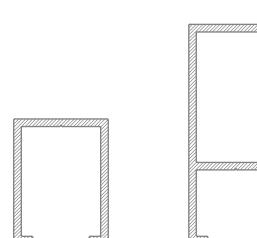
UB025150 25mm x 150mm Batten Outer

UBI5050 50mm x 50mm Batten Inner

0.874 kg/m

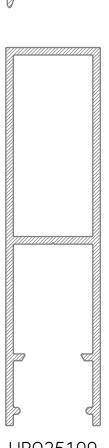




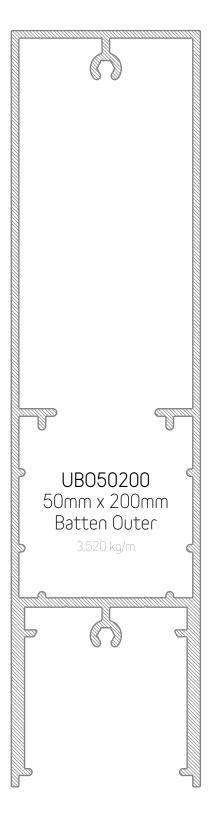


UBO2550 25mm x 50mm Batten Outer

UBO2575 25mm x 75mm Batten Outer

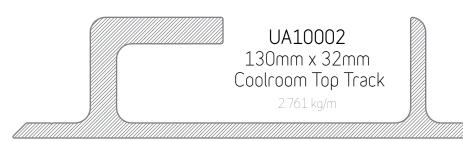


UB025100 25mm x 100mm Batten Outer



# COOLROOM







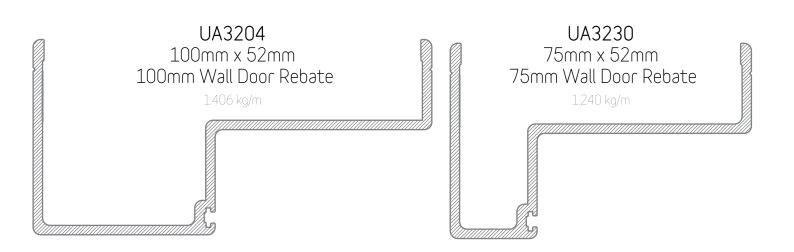
UA1454 16mm 3mm External



UA1458 16mm 5mm External



UA4413 30mm 13mm Jointer



UA5895 103mm x 38mm Coolroom Door Channel

 $0.755 \, \text{kn/m}$ 

UA6460 55mm x 30mm Coolroom Channel

0.506 kg/m

UA5896 78mm x 38mm Coolroom Door Channel

0.647 kg/m

UA5900 53mm x 23mm Coolroom Door Channel

0.325 kg/m

UA5897 92mm x 25mm Coolroom Door Channel

0.976 kg/m

UA6617 78mm x 25mm Coolroom Channel

0.538 kg/m

UA5898 168mm x 25mm Coolroom Door Channel

1.634 kg/m

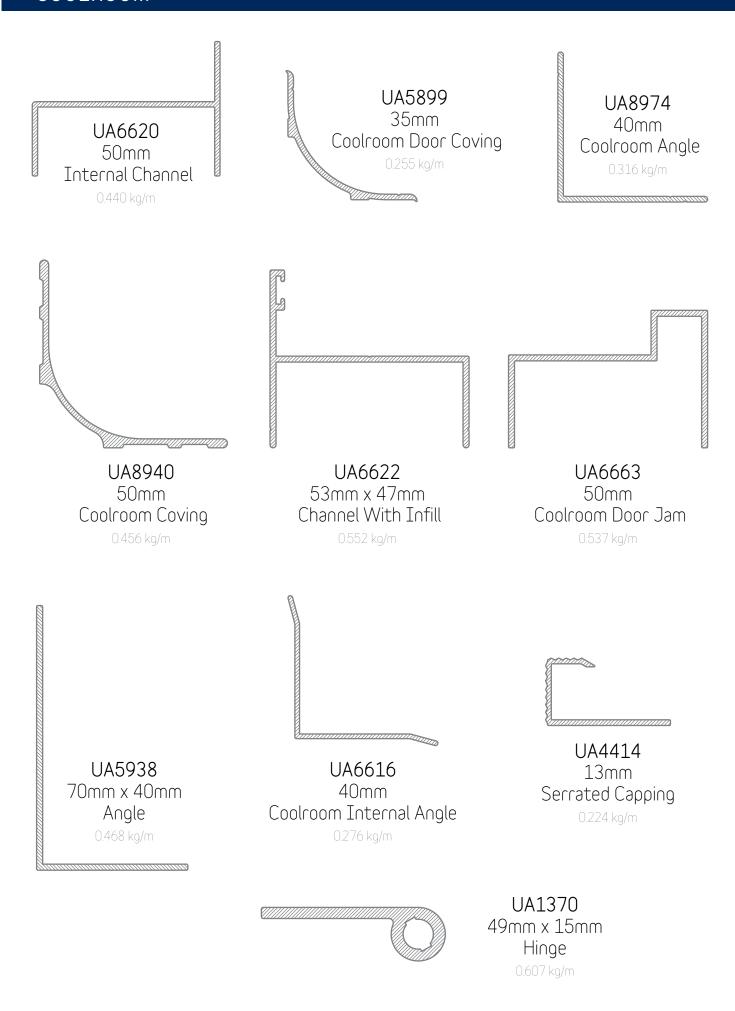
UA6458 117mm x 25mm Coolroom Channel

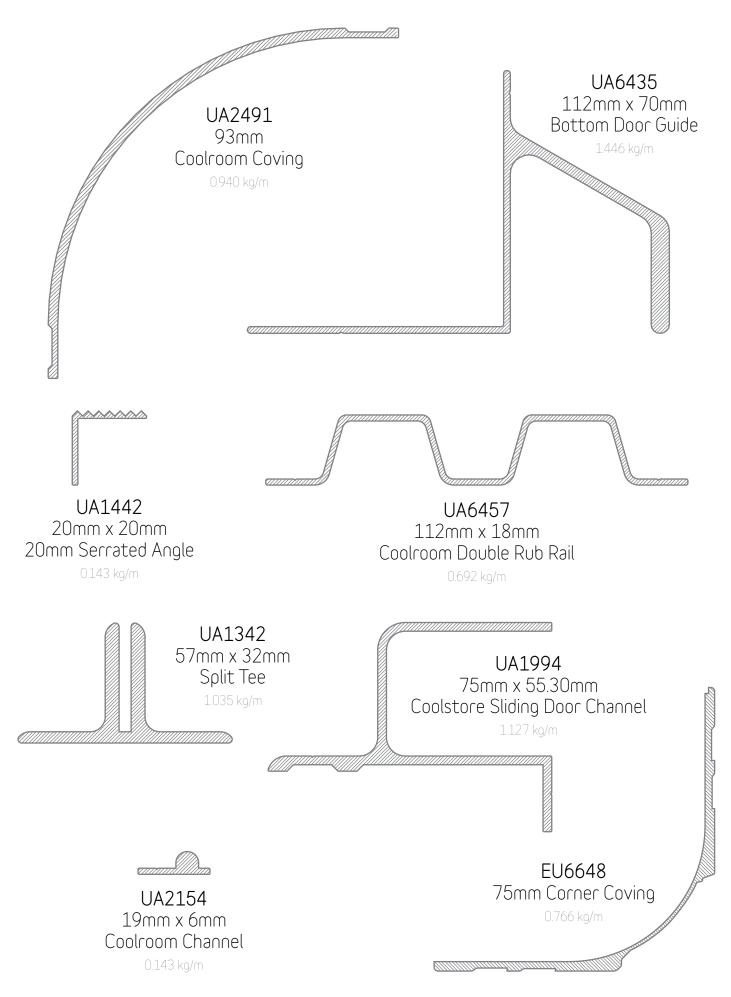
0976 kn/m

UA6907 40mm Coolroom Channel

0.391 kn/m

## COOLROOM





### WALL BOARDS



**UA1623** 18mm x 5mm 1.6mm Capping

0.083 kg/m

UA1451 21mm x 6mm 3mm Capping

0.088 kg/m

UA1455 21mm x 8mm 5mm Capping

0.094 kg/m

UA1624 27mm x 5mm 1.6mm Jointer

 $0.130 \, \text{kg/m}$ 

UA1452 27mm x 7mm 3mm Jointer

0.117 kg/m

UA1456 27mm x 8mm 5mm Jointer

0.120 kg/m

UA1460 27mm x 10mm 7mm Jointer

0.134 kg/m



UA1453 23mm x 18mm 3mm Internal Corner

0.143 kg/r



UA1465 23mm x 12mm 9.5mm Capping

0.115 kg/m



UA1622 24mm x 19mm 6.5mm Internal Corner

 $0.172 \, \text{kg/m}$ 

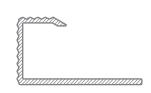


UA1459 16mm x 14mm 6.5mm External Corner

0.144 kg/m

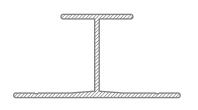
UA1461

21mm x 9mm 6.5mm Capping



UA4414 13mm Serrated Capping

 $0.224 \, \text{kg/m}$ 



UA1629 18.5mm Jointer

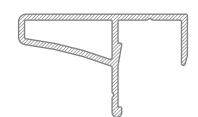
0.275 kg/m

### **MOULDS & TRIMS**





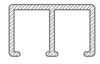
UA1351 17mm x 12mm Curtain Track



UA6556 55.45mm x 45.50mm Shelf Stiffener



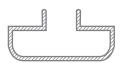
UA1350 15mm x 12mm Top Fix Curtain Track



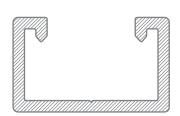
UA1353 23mm x 14mm Sliding Glass Top Track



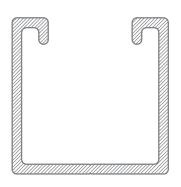
UA1354 23mm x 8mm Sliding Glass Base Track 0.179 kg/m



UN00320 28mm x 13.5mm Slatwall 0.183 kg/m



UA10134 41.30mm x 25mm Strut Channel



UA8288 41.30mm x 41.30mm Strut Channel



UA10622 31.75mm x 16.25mm Caravan J Mould

### MOULDS & TRIMS



ET2436 31.75mm x 4.94mm Ticket Strip

0.178 kg/m



UA1414 21.50mm x 12.50mm "J" Drip Mould

0.146 kg/m



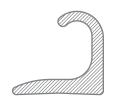
ALCG2500 29.36mm x 5.92mm Table Edge

0.13 kg/m



UA2482 38.2mm Ticket Section

0.153 kg/m



UA1413 24mm x 22mm Heavy Bus Drip Mould

 $0.431 \, \text{kg/m}$ 



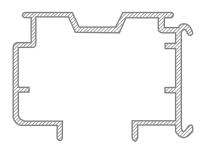
UA1347 22mm Ticket Section

0.069 kg/m



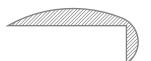
UA1500 23.8mm x 8.26mm Cope Mould

0.149 kg/m



SP3160 47.5mm x 34mm Vertical Blind Track

0.502 kg/m



UA1499 34.43mm x 14.53mm Cope Mould

0.346 kg/m



Threshold

### **GLAZING & PARTITIONS**

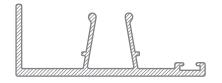




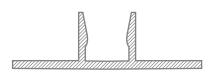




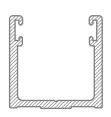
UA10279 50mm x 16.66mm St Leonards Snap Cover



UA10280 50mm x 19mm St Leonards Snap Infill

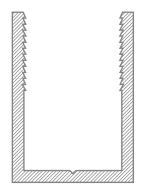


AS7706 50mm x 15mm St Leonards Adaptor



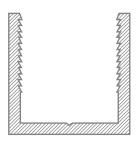
ME10386 24.50mm x 24.50mm Channel

0.365 kg/m



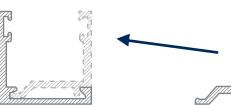
AS10383 45mm x 32mm Deep Glazing Channel

0.966 kg/m



AS10384 32mm x 32mm Glazing Channel

 $0.757 \, \text{kg/m}$ 



AS10385 24.50mm x 24.50mm Adaptor

0.25 kg/m





#### STAIRS & STAIR NOSING



Scan here to view the Ullrich Aluminium - Z-Stair Brochure



UA1498 52.20mm x 28mm Moulding

0.378 kg/m

UA1575

24.30mm x 3mm Flooring Edge

0.140 kg/m

UA2323 20.50mm x 6.50mm Formica Edging

 $0.091 \, \text{kg/m}$ 

UA2197 70mm x 40mm Stair Nosing

UA1433 30mm Serrated Step Angle

0.228 kg/m

UA1442 20mm Serrated

> Step Angle 0.143 kg/m

UA1432 50mm x 27mm Serrated Nosing

0.405 kg/m

UA1436 57.50mm x 42mm Castellated Nosing

0.466 kg/m

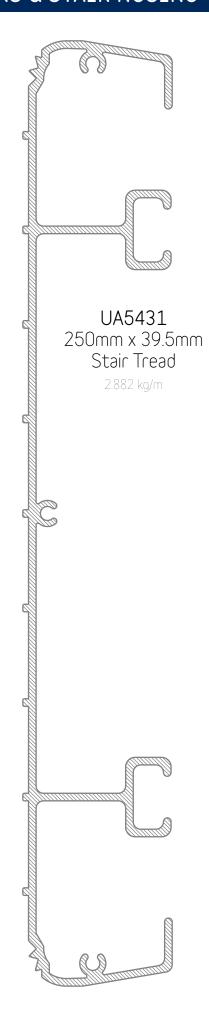
UA1495 87.60mm x 28mm Stair Tread

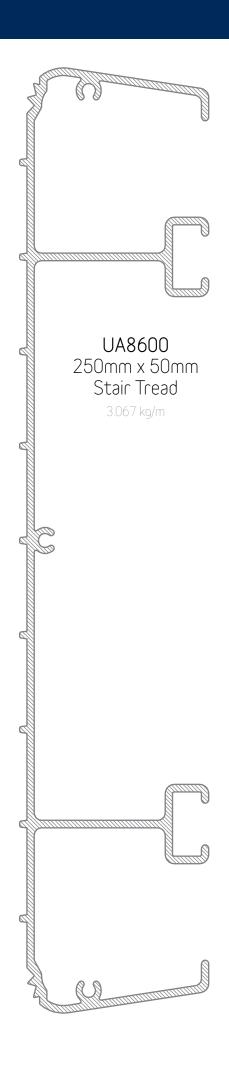
 $0.558 \, \text{kg/m}$ 

UA1496 87.60mm x 28mm Stair Tread

).566 kg/m

# STAIRS & STAIR NOSING





### MDF BOARD JOINERS



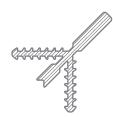






UMDF90DMT 90° Mitre Joiner

0.280 kg/m



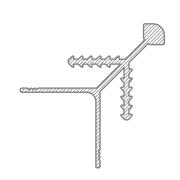
UMDF90DSN 90° Square Nose Joiner

 $0.310 \, \text{kg/m}$ 



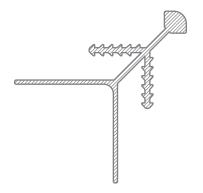
UMDF180DSN 180° Square Nose Joiner

0.214 kg/m



UMDF16BRD
Joiner for 16mm Board

0.39 / kg/m



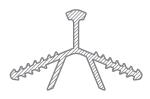
UMDF18BRD
Joiner for 18mm Board

0.448 kg/m



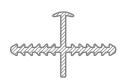
UMDF135DBN 135° Bull Nose Joiner

 $0.280 \, \text{kg/m}$ 



UMDF135DMT 135° Mitre Joiner

∩ 291 kn/m

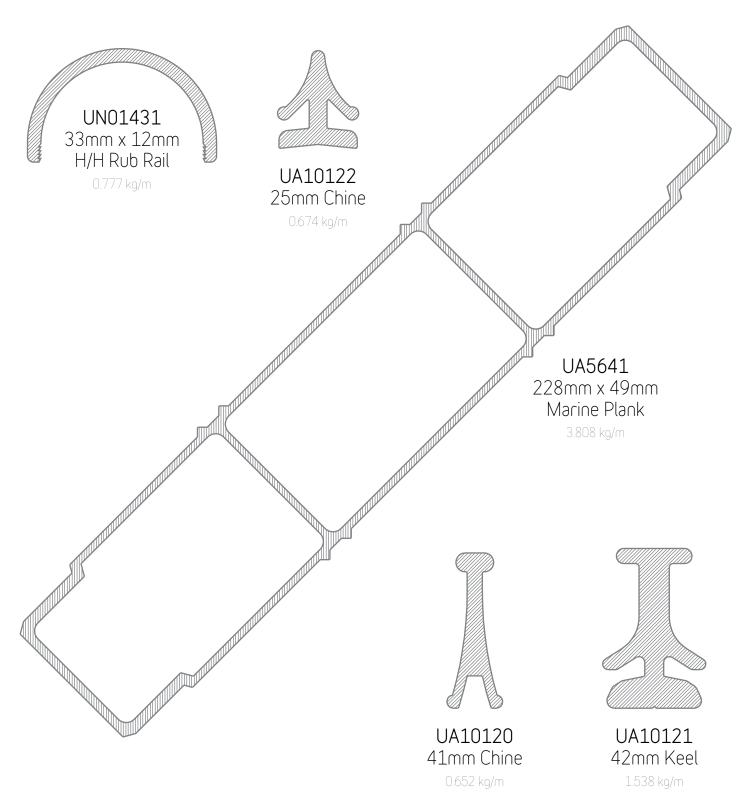


UMDF180DBN 180° Bull Nose Joiner

1202 ko/m

# MARINE





#### **MARINE**



UA1414 22mm x 13mm J Mould

0.146 kg/m



UA1425 22mm x 8mm Sail Track

0.213 kg/m



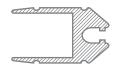
UA1424 32mm x 12mm Sail Track

0.478 kg/m



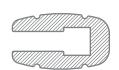
UA1417 33mm x 12mm H/H Rub Rail

0.271 kg/m



UA1418 26mm x 15mm Upright Bracket

0.434 ka/m



UA1419 26mm x 15mm Top Cap

0.538 kg/m



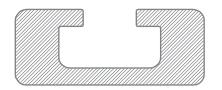
UA1416 17mm x 6mm H/H Joiner

 $0.119 \, \text{kg/m}$ 



UA1605 13mm x 5mm Marine Bracket

0.077 kg/m



UA7177 50mm x 20mm Lipped Channel

1.717 kg/m



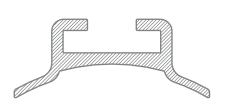
UA1431 40mm x 9mm Herzim

0.291 kg/m



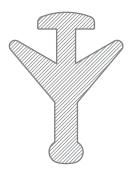
UA1430 30mm x 4mm Herzim

0120 kg/m



UA1423 52mm x 21mm Sail Track

 $0.712 \, \text{kn/m}$ 



UA3811 30mm x 40mm Keel

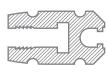
1 169 kn/m



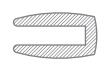
**UA5237** 12.70mm x 9.40mm Perspec Cap

0.175 kg/m





UA1420 25.50mm x 14mm H/H Pillar Cap



UA1421 22mm x 12mm Perspex Sheet Cap



UA1422 12mm x 9mm Fibreglass Cap



UA1427 30mm Serrated Herzim



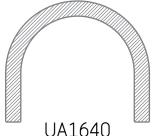
**UA1428** 40mm Herzim



UA1429 25mm Herzim



UA1606 13mm x 4.50mm Lipped Herzim



38mm x 32mm Channel

UA2687 47mm x 33mm Gunnel



UA2785 22mm x 12mm Boat Windscreen



UA2972 76.20mm x 19mm Boat Rigs

UA3079 50mm x 35mm Channel

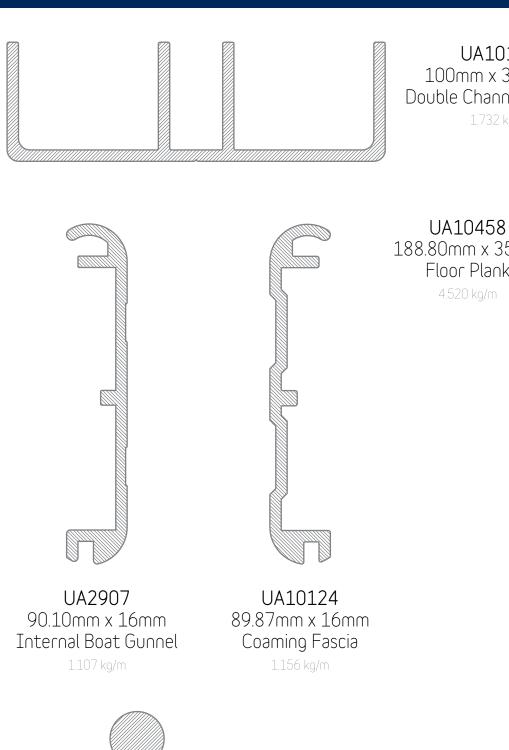


UA3212 38.70mm x 29.55mm

Keel

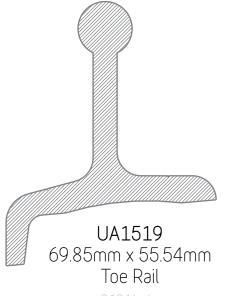




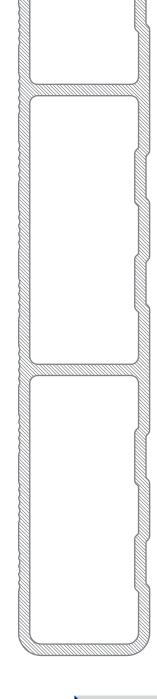


UA10127 100mm x 31.50mm Double Channel Transom

UA10458 188.80mm x 35mm Floor Plank





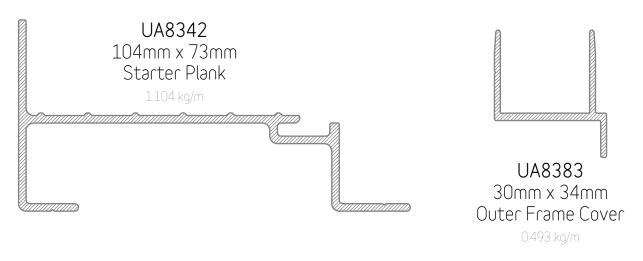


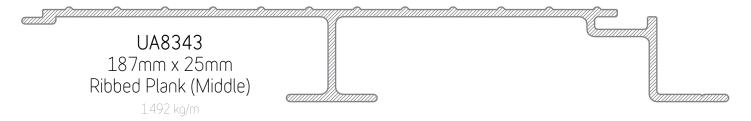
## **UTE TRAY**



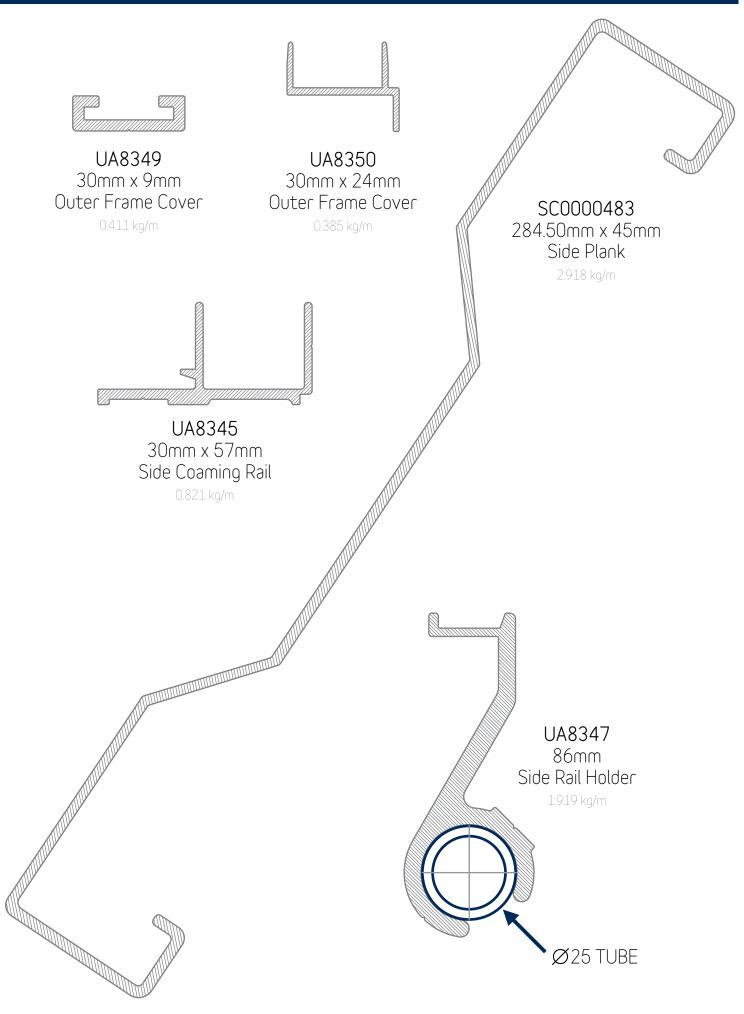


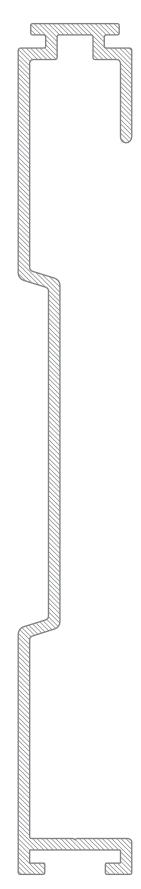




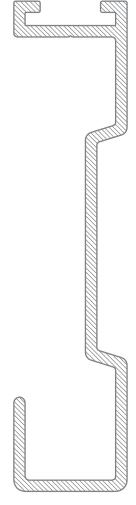








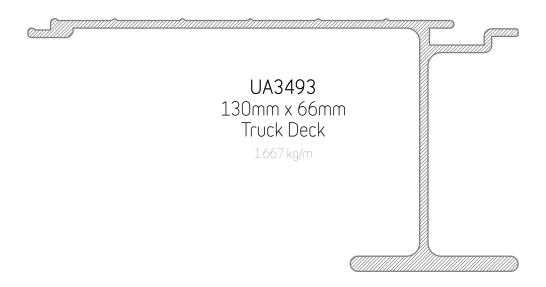
UA8346 225mm x 30mm Outer Frame

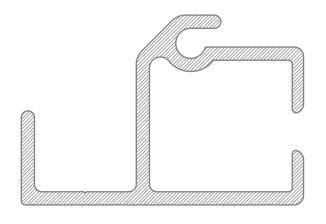


UA8348 130mm Outer Frame

1.865 kg/m



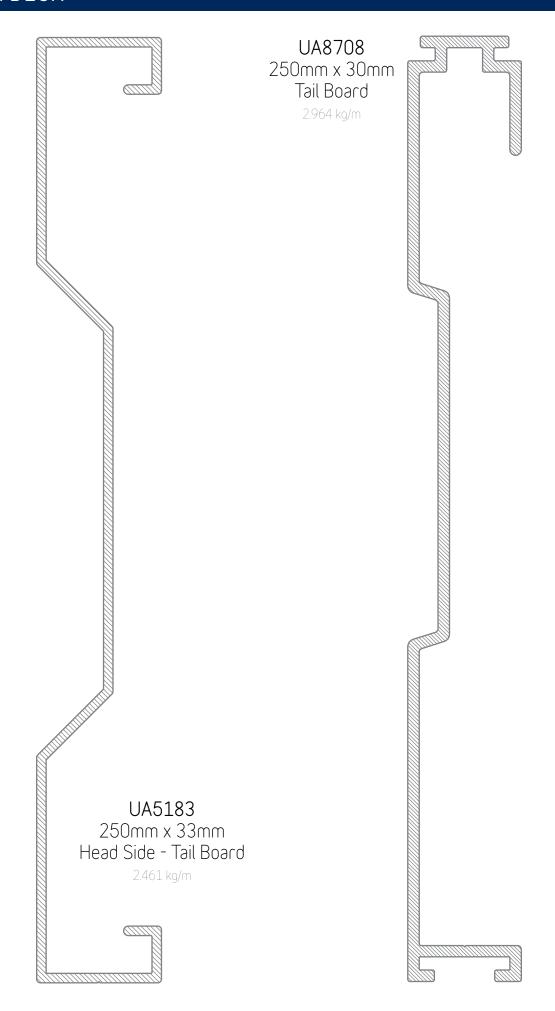




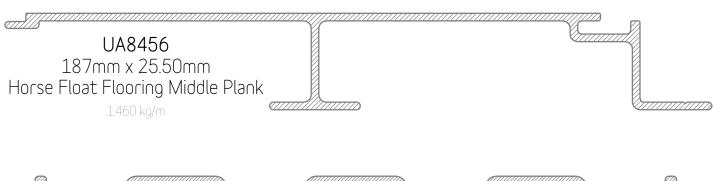
UA5250 75mm x 50mm Truck Boby Flap Runner 2.066 kg/m

UA8816 100mm Transport Side Angle

1 567 kg/m

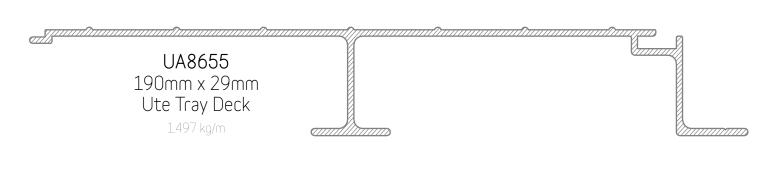




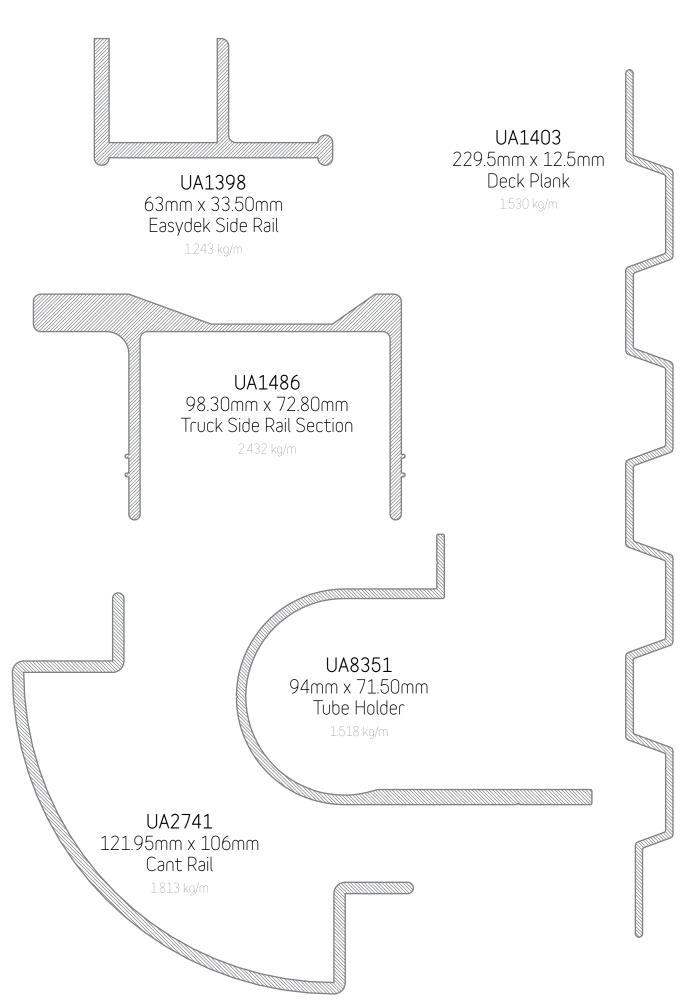


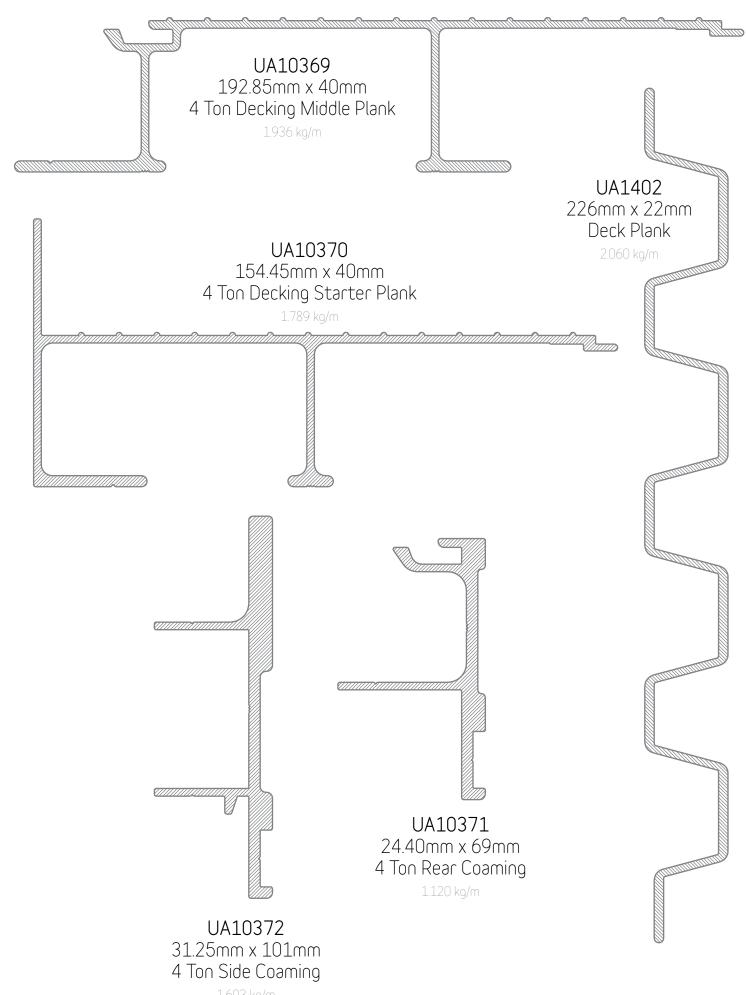


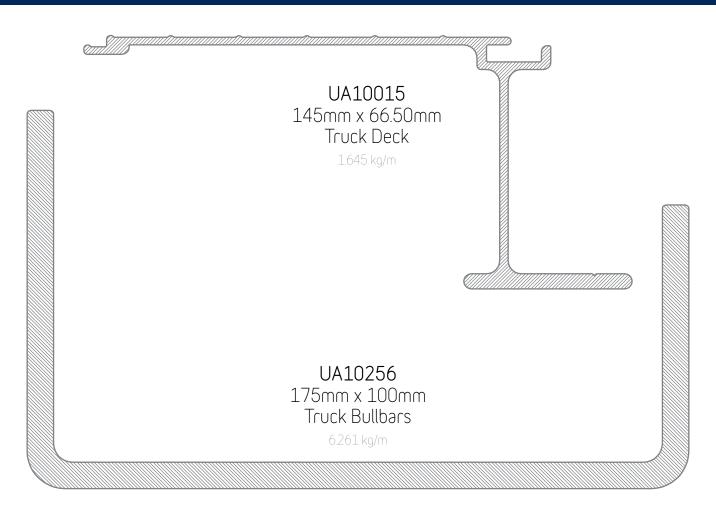
Stock Crate Siding

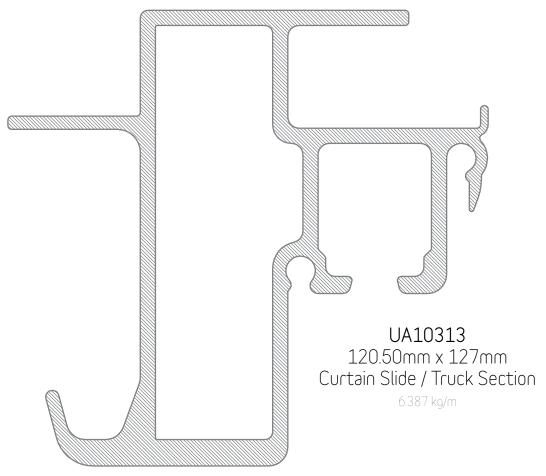


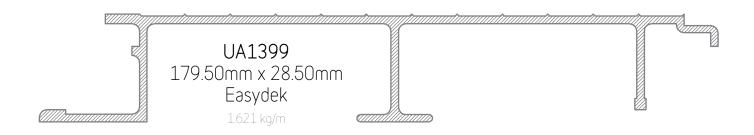
UA6244 145mm x 14mm Rub Rail

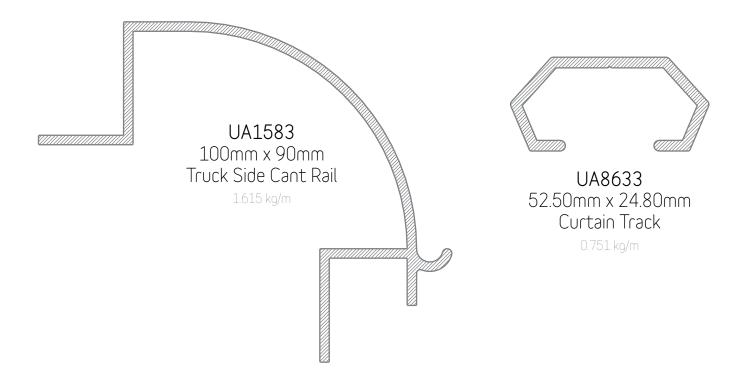










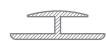


### SIGNAGE AND ANNEX TRACK





UA6596 4mm Signboard Cap



UA6597 4mm Signboard Jointer

0.165 kg/m



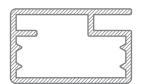
UA1452 3mm Jointer

0.117 kg/m



UA6598 4mm Signboard Corner Int/Ext

0 198 kg/m



UA6599 4mm Ulltrasign Frame

0.471 kg/m



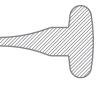
UA1453 3mm Internal Corner

0.143 kg/m



UA10230 150mm Sign Blade

1665 kg/m





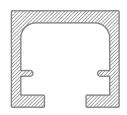
**UA8362** 27.50mm x 12.20mm Rope Rail

0.2 /2 kg/m



UA5287 45mm x 11.61mm Double Flange Sail Track

-0.29 / kg/m

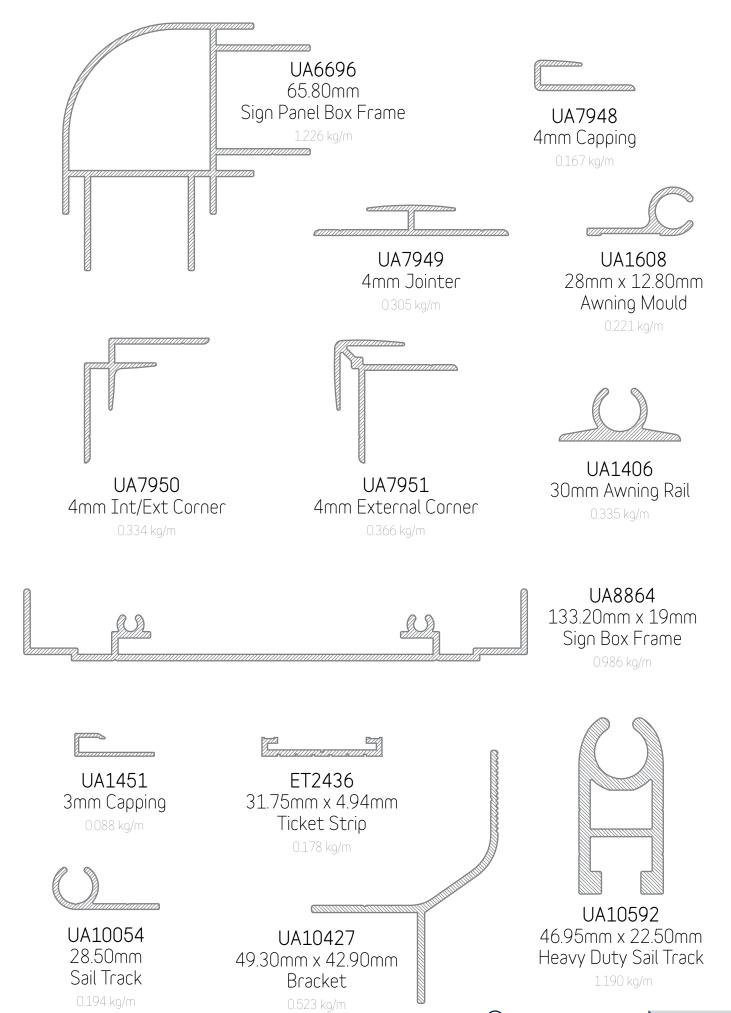


UA6490 28.50mm x 25.50mm Sign C Channel

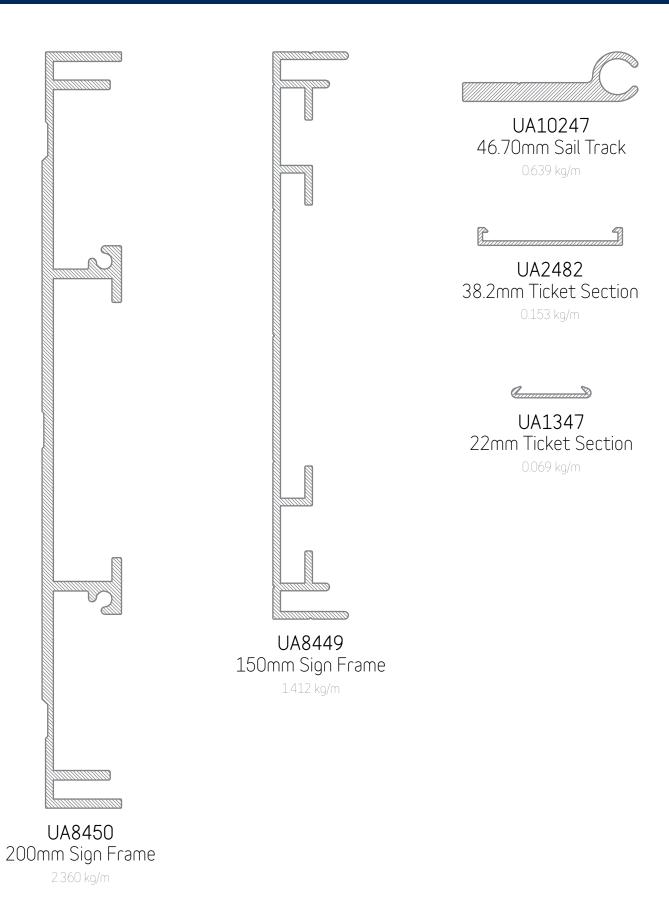
0.698 kn/m

UA10229 200mm Sign Blade 1.962 kg/m

#### SIGNAGE AND ANNEX TRACK



## SIGNAGE AND ANNEX TRACK

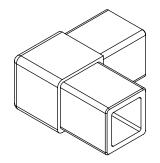


### **MODULAR SYSTEM**

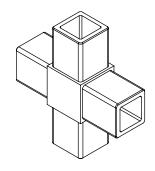


Scan here to view the Ullrich Aluminium - Modular Systems Brochure

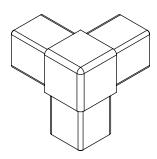




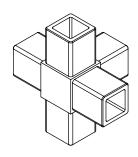
KL4048 2 Way Corner Jointer



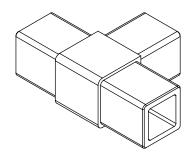
KL4062 4 Way X Shape Jointer



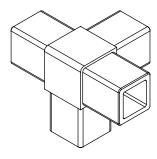
KL4055 3 Way Y Shape Corner Jointer



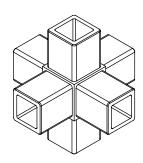
KL4065 5 Way Jointer



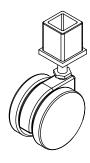
KL4050 3 Way T Shape Jointer



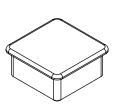
KL4060 4 Way Y Shape Corner Jointer



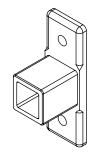
KL4070 6 Way Jointer



KL4080 25mm Castors & Insert

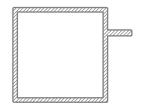


KL4075 End Cap



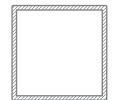
HMENDBRK25BL Mounting Bracket

### **MODULAR SYSTEM**



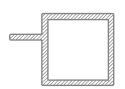
UA1641 31.90mm x 25.40mm 1" Space Module Section

 $0.341 \, \text{kg/m}$ 



UA1642 25.40mm x 23mm 1" Space Module

0.313 kg/m



UA1372 27.50mm x 19mm H/M Horizontal

0.318 kg/m



**SR25.41.2MI** SHS - 25.40mm

 $0.301 \, \text{kg/m}$ 

The Modular Furniture systems employs an adaptable aluminium tube and polymer jointer for modular construction.

Design and create your own furniture, shelving, storage and display units for domestic or office use.

The Modular Furnitures strength and light weight gives you unlimited design options.

Available in a range of colours and with a variety of accessories, the only limit is your imagination!

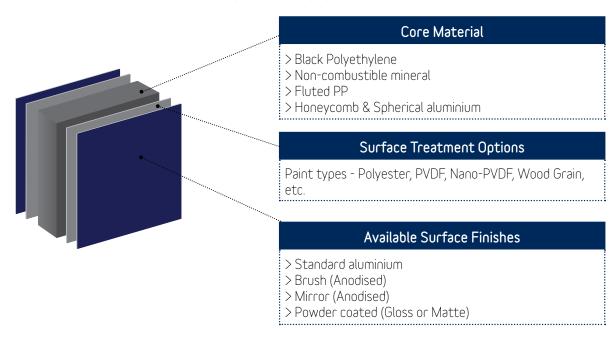
### **ULLTRA SIGN COMPOSITE PANEL**



Ulltra Panel sign grade is a sandwiched panel consisting of low-density polyethylene core bonded to two thin coil-coated aluminium sheets. The core is typically black.

Ulltra Panel Fire Retardant is composed of non-combustible mineral core with a small amount of low-density polyethylene sandwiched between two aluminium sheets. The core is white or grey.

Topside of ACM is coated with different kinds of paint such as polyester, PVDF, Nano-PVDF, etc.



Part Number	Part Description	Panel Thickness	Panel Width	Panel Length	Finish Colour
ACP3.012202440		3mm	1220mm	2400mm	
ACP3.012203000		3mm	1220mm	3000mm	
ACP3.012203600		3mm	1220mm	3600mm	
ACP4.012202400		4mm	1220mm	2400mm	_
ACP4.012203000	ALUMINIUM	4mm	1220mm	3000mm	Contact your local Ullrich
ACP4.012203600	COMPOSITE PANFI	4mm	1220mm	3600mm	Aluminium
ACP4.015002400	ULLTRASIGN	4mm	1500mm	2400mm	Branch for Colour Options
ACP4.015003000		4mm	1500mm	3000mm	
ACP4.015003600		4mm	1500mm	3600mm	
ACP4.015004000		4mm	1500mm	4000mm	
ACP4.020004000		4mm	2000mm	4000mm	

# ULLTRA SIGN COMPOSITE PANEL



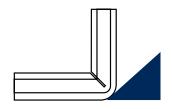
**SAWING** 



**CUTTING** 



**BENDING** 



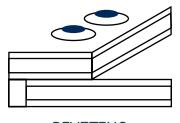
**FOLDING** 



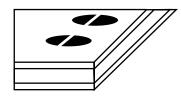
**DRILLING** 



**PUNCHING** 



**RIVETING** 



**SCREWING** 



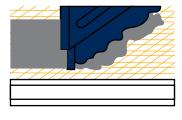
WELDING



**GLUEING** 



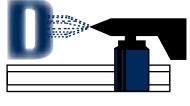
**DECORATIVE WORK** 



**SCREEN PRINTING** 



PHOTO MOUNTING



**SPRAYING** 











Aluminium Trestle			
ID Code	Weight	Size	Rating
TRE1.20	11Kg	1.80m	210Kg
TRE1.80	15Kg	1.80m	210Kg
TRE2.40	19Kg	2.40m	210Kg
TRE3.00	24Kg	3.00m	210Kg
TRE3.60	28Kg	3.60m	210Kg
TRE4.20	33Kg	4.20m	210Kg
TRE4.80	38Kg	4.80m	210Kg

Aluminium Plank			
ID Code	Weight	Size	Rating
TP2.4	10.0Kg	2.4m	210Kg
TP3.0	12.4Kg	3.0m	210Kg
TP3.6	14.8Kg	3.6m	210Kg
TP4.0	16.4Kg	4.0m	210Kg
TP5.0	20.4Kg	5.0m	210Kg
TP6.0	24.4Kg	6.0m	210Kg



Aluminium Trestle Handrail System		
ID Code Component		
LS101	Intermediate Post	
LS102	Corner Post	
LS103	Handrail 2.7m	
LS104	End Barrier	



SL Series - Single Aluminium Ladders					
SLS2	SLS2 double screwed rungs				
Part Number	Imperial	Metric			
SLS2/03	3ft	0.9m			
SLS2/06	6ft	1.8m			
SLS2/08	8ft	2.4m			
SLS2/10	10ft	3.0m			
SLS2/12	12ft	3.6m			
SLS2/14	14ft	4.2m			
SLS2/16	16ft	4.8m			
SLS2/18	18ft	5.4m			
SLS2/20	20ft	6.0m			



Doubled Sided Step Ladder			
Part Number	Imperial	Metric	
DST02	2ft	0.6m	
DST03	3ft	0.9m	
DST04	4ft	1.2m	
DST05	5ft	1.5m	
DST06	6ft	1.8m	
DST07	7ft	2.1m	
DST08	8ft	2.4m	
DST09	9ft	2.7m	
DST10	10ft	3.0m	



Double Extension Ladder			
Part Number	Imperial	Metric	
DES1/0808	08ft-14ft	2.4m-4.2m	
DES1/1010	10ft-18ft	3.0m-5.4m	
DES1/1212	12ft-20ft	3.6m-6.0m	
DES1/1414	14ft-24ft	4.2m-7.3m	
DES1/1616	16ft-28ft	4.8m-8.5m	





Heavy Duty Double Sided Step Ladder			
Part Number	Imperial	Metric	
HDD03	3ft	0.9m	
HDD04	4ft	1.2m	
HDD06	6ft	1.8m	
HDD07	7ft	2.1m	
HDD08	8ft	2.4m	
HDD10	10ft	3.0m	
HDD12	12ft	3.6m	
HDD14	14ft	4.2m	
HDD16	16ft	4.8m	

Doubled Sided Step Ladder			
Part Number Imperial Metric			
DST2800	2ft	0.6m x 800mm	
DST3800	3ft	0.9m x 800mm	



Hook Pole Ladder			
Part Number	Imperial	Metric	
HSL/1.6	5ft	1.5m	
HSL/2.2	7ft	2.1m	
HSL/2.4	8ft	2.4m	
HSL/2.9	10ft	3.0m	
HSL/3.4	11ft	3.3m	
HSL/3.6	12ft	3.6m	
HSL/3.9	13ft	3.9m	
HSL/4.2	14ft	4.2m	
HSL/4.4	15ft	4.5m	
HSL/4.9	16ft	4.8m	
HSL/5.4	18ft	5.4m	
HSL/6.0	20ft	6.0m	



Hinged Platform Ladder				
Part Number	Imperial	Metric		
PFS1/03	3ft	0.9m		
PFS1/04	4ft	1.2m		
PFS1/05	5ft	1.5m		
PFS1/06	6ft	1.8m		
PFS1/07	7ft	2.1m		
PFS1/08	8ft	2.4m		
PFS1/09	9ft	2.7m		



Double Extension Ladder			
Part Number	Imperial	Metric	
DES2/1010	10ft-18ft	3.0m-5.4m	
DES2/1212	12ft-20ft	3.6m-6.0m	
DES2/1414	14ft-24ft	4.2m-7.3m	



Saw Horse Foldable				
Part Number	Imperial	Metric		
SH1.6	5ft	1.5m		
SH2.0	7ft	2.1m		
SH2.4	8ft	2.4m		
SH2.7	9ft	2.7m		
SH3.0	10ft	3.0m		

Saw Horse Fixed				
Part Number	Imperial	Metric		
SHF1.6	5ft	1.5m		
SHF2.0	7ft	2.1m		
SHF2.4	8ft	2.4m		



Combination Ladder				
Part Number	Imperial	Metric		
CS04	4ft	1.2m		
CS05	5ft	1.5m		
CS06	6ft	1.8m		
CS07	7ft	2.1m		
CS08	8ft	2.4m		
CS09	9ft	2.7m		
CS10	10ft	3.0m		



Fixed Platform Ladder				
Part Number	Imperial	Metric		
MP1.2	4ft	1.2m		
MP1.5	5ft	1.5m		
MP1.8	6ft	1.8m		
MP2.1	7ft	2.1m		
MP2.4	8ft	2.4m		
MP3.0	10ft	3.0m		

## SEATING & SETTING



Scan here to view the Ullrich Aluminium - Seating & Setting Brochure



## **SETTING WITH BACK SUPPORT**



## **BENCH SEAT WITH BACK REST**



## STACKABLE BENCH SEATS



# **SURFACE MOUNT SETTING**



# FREE STANDING SETTING



# PEDESTAL SETTING



**GRANDSTAND SEATING** 

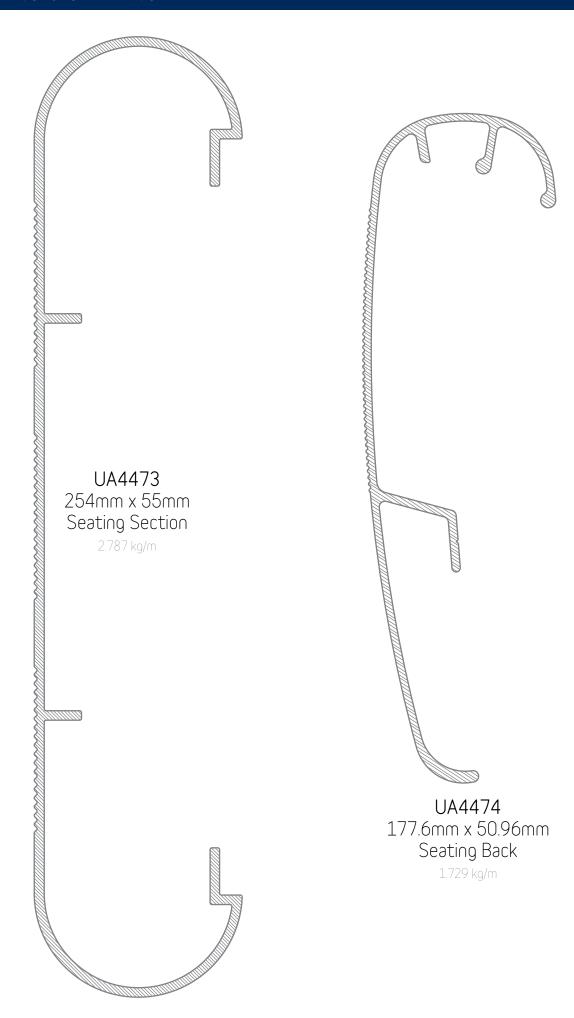


# **SURFACE MOUNTED BENCH SEAT**

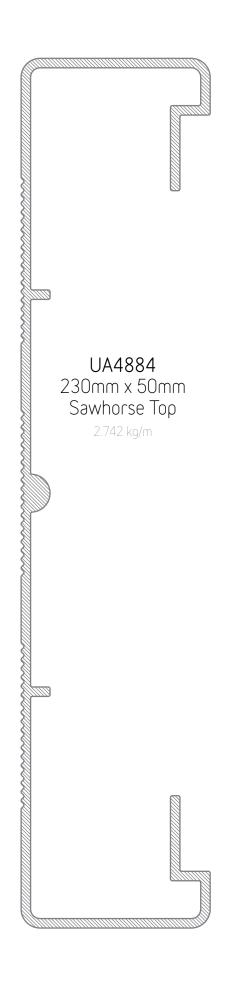




# SEATING & SETTING



# SEATING & SETTING





# STANCHIONS





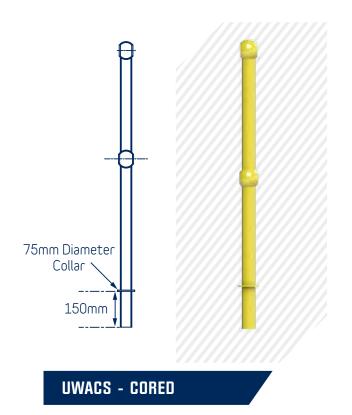


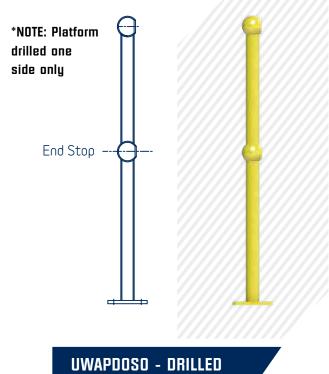
### **AVAILABLE SURFACES**

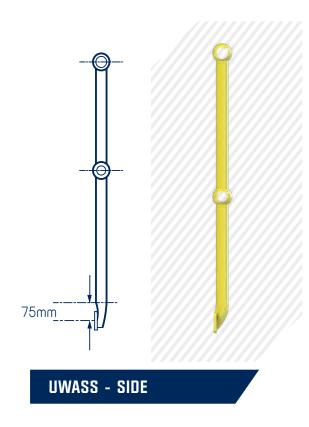
**ALUMINIUM MILL FINISH** 

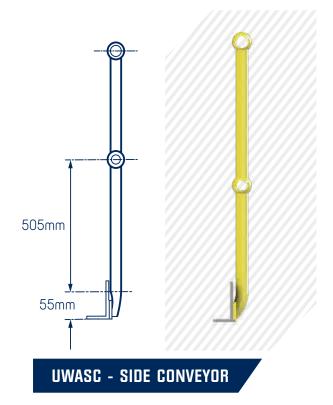
POWDER COATED FINISH

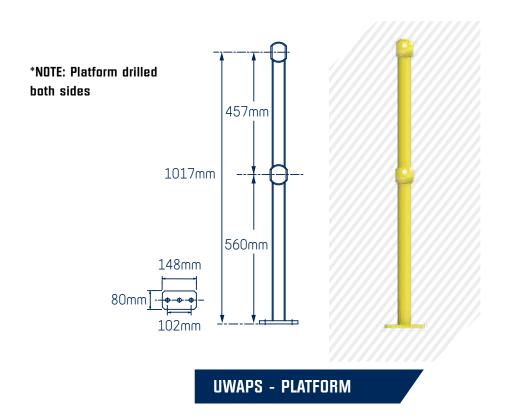
PART NUMBER	STANCHION TYPE
UWAC2S	CORED THROUGH
UWACS	DRILLED ONE SIDE
UWAPS	PLATFORM
UWAPC	PLATFORM CORNER
UWASS	TYPE SIDE 38.1 MID
UWASC	SIDE CONVEYOR
UWASOS	SIDE OFFSET
UWAWS	WELDED

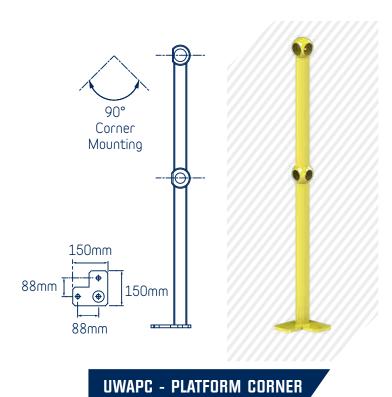


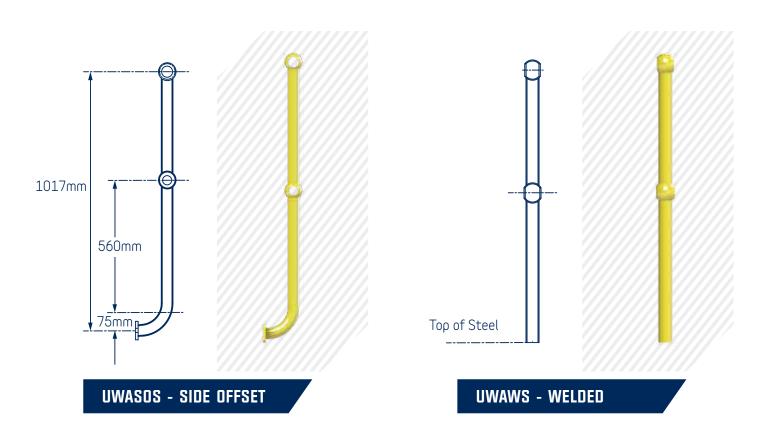




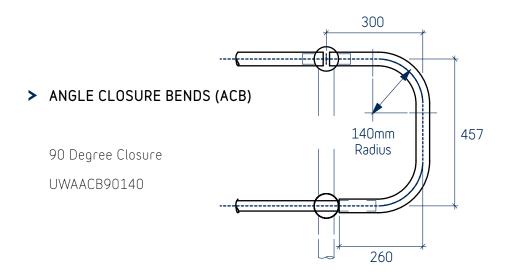


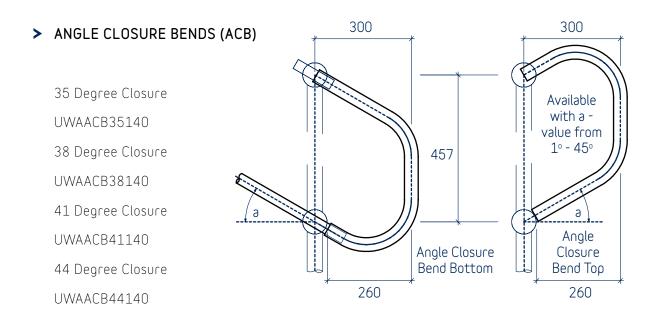


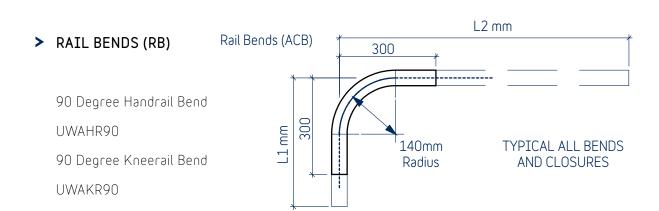


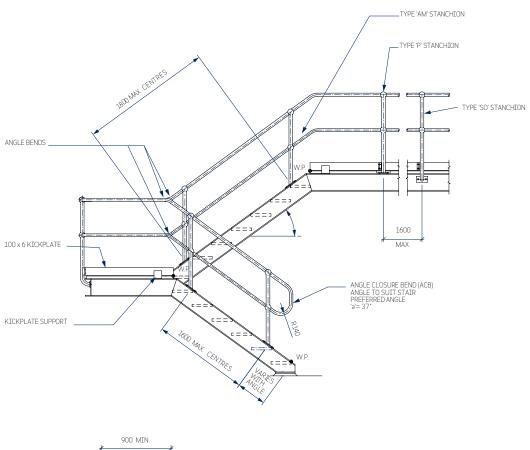


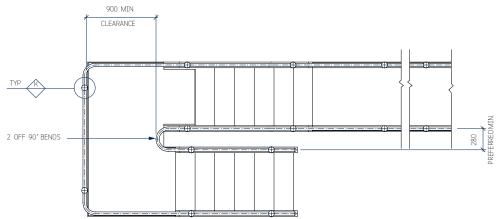
### Closures Bends & Slip Joints



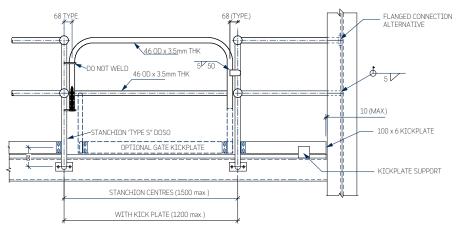








TYPICAL STAIR & PLATFORM HANDRAIL DETAILS



SELF CLOSING GATE







SERIES	length (mm)	width (mm)	weight (kg)	apertures
UWG13	6000	600	28.0kg/ panel 7.756kg/m²	25
UWG22	6000	600	35.0kg/ panel 9.757kg/m²	SERIES 13 & 22

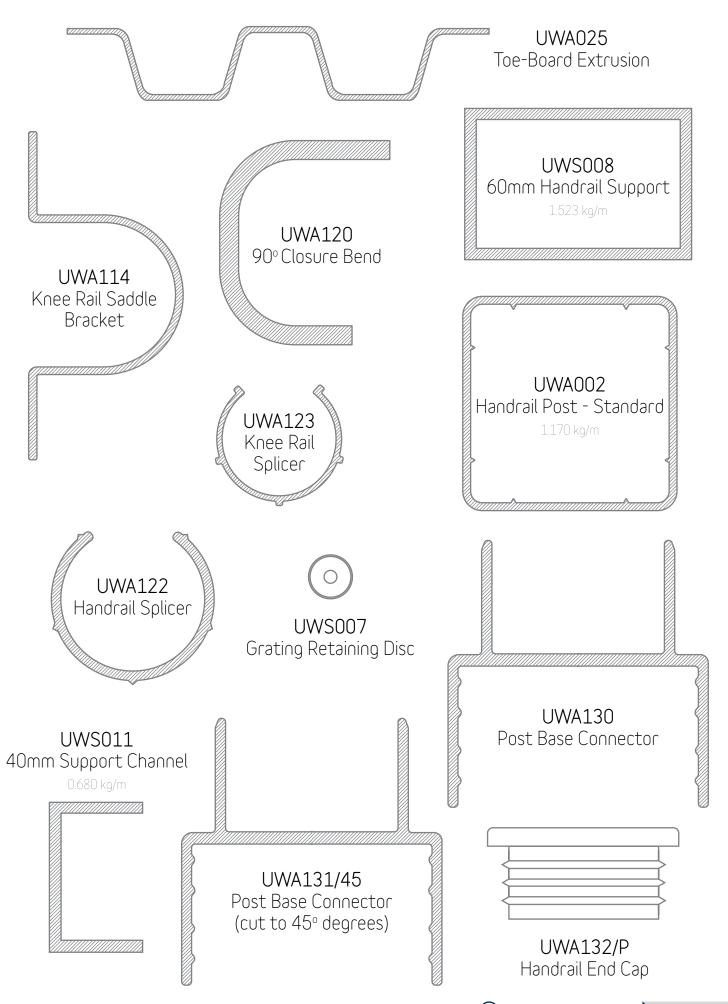
SERIES	length (mm)	width (mm)	weight (kg)	apertures
UWG30  100 111 2 16 18.5 03.5 7.5 12.5 89 10.5	6000	500	46.7kg/ panel 15.56kg/m²	25 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1
UWG40  100 111 2 16 18.5 7.5 225 89 10.5	6000	500	51.8kg/ panel 17.27kg/m²	SERIES 30 & 40

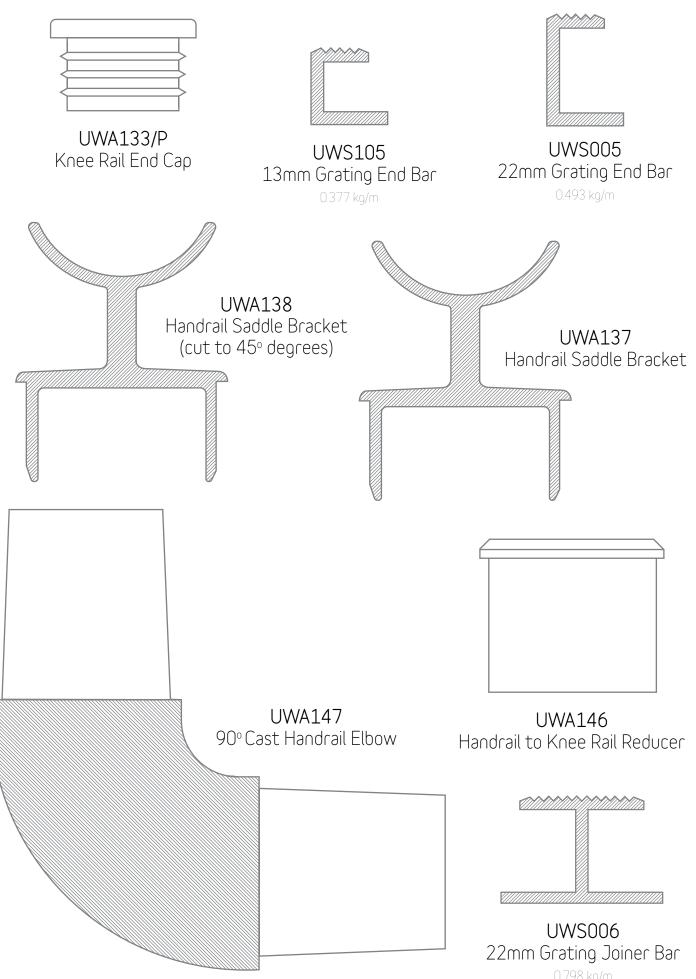
SERIES	length (mm)	width (mm)	weight (kg)	apertures
UWG30/SL  50.5  50.5  41  8  41	6000	250	28.2kg/ panel 18.8kg/m²	SERIES 30/SL

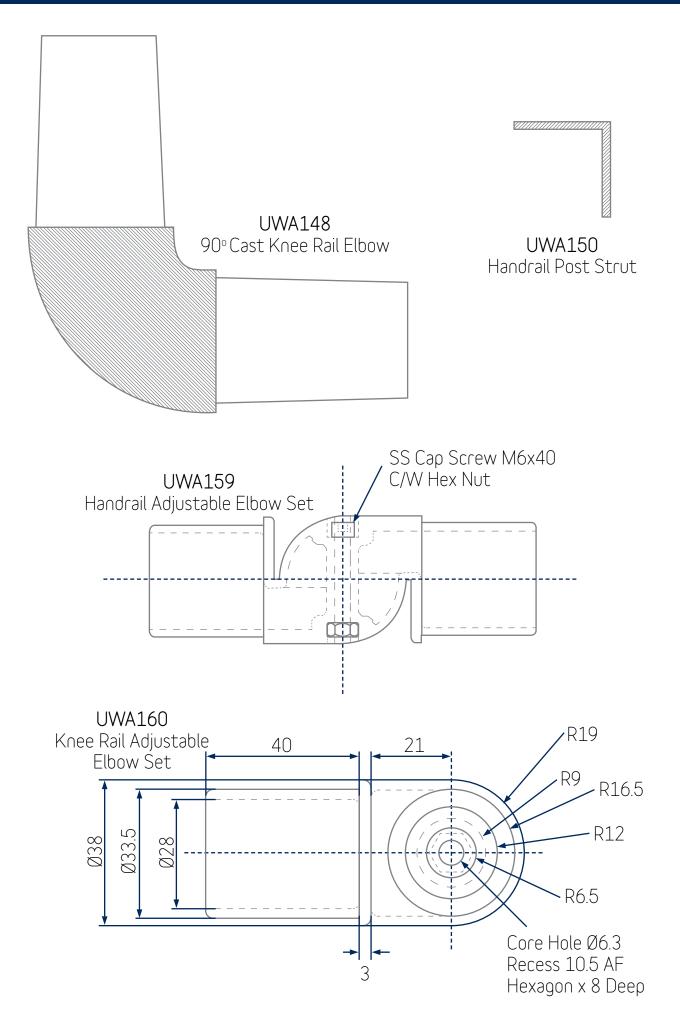




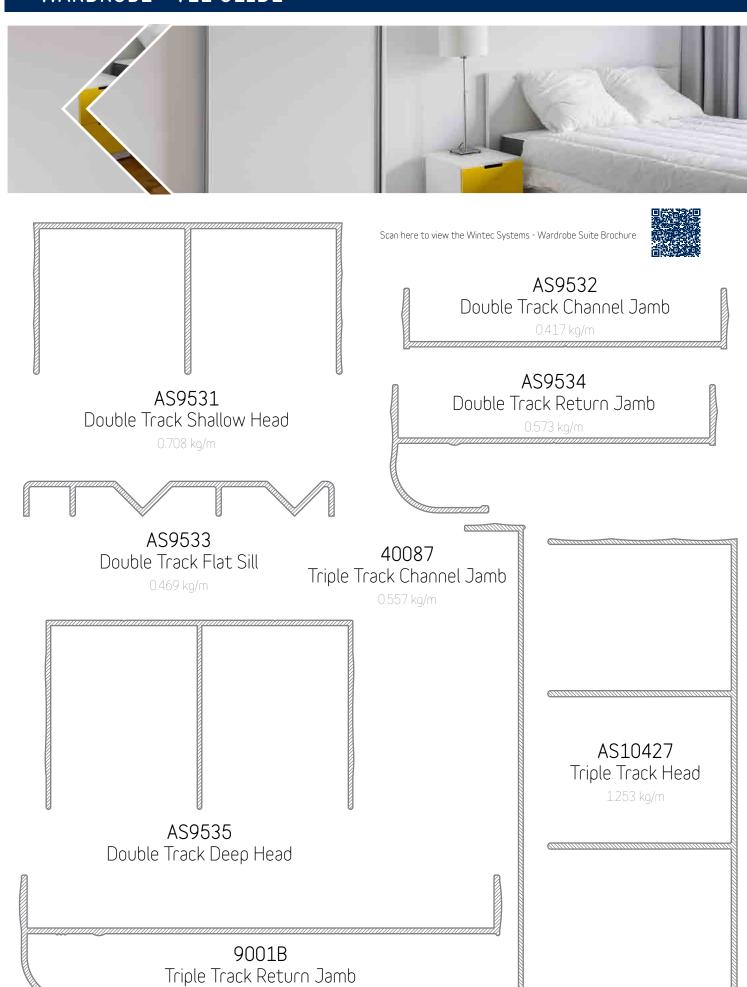




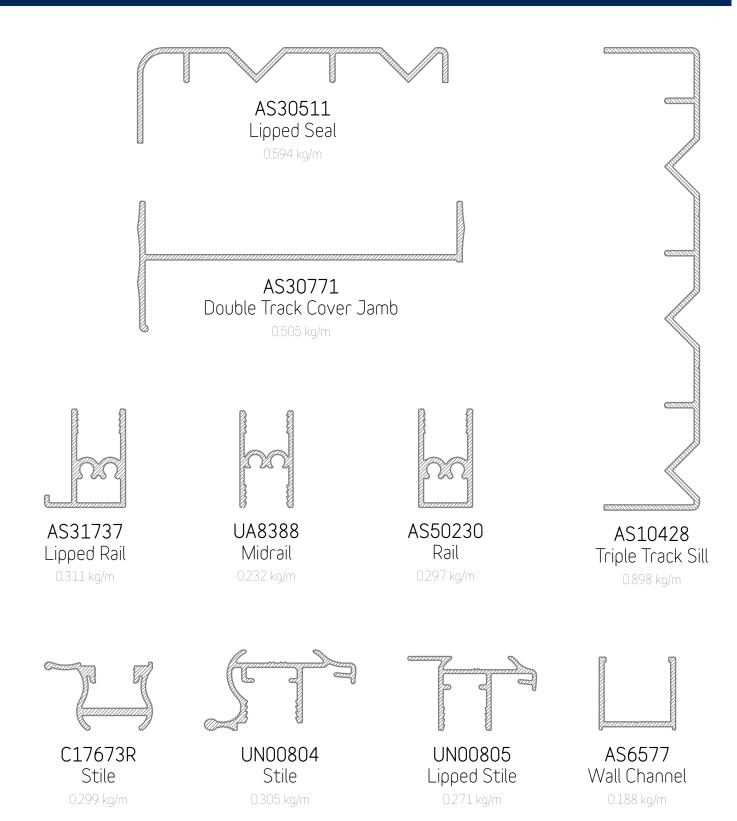




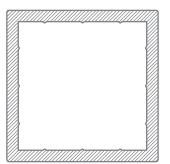
## WARDROBE - VEE GLIDE



# WARDROBE - VEE GLIDE







Scan here to view the Ullrich Aluminium - Balustrade - 40 & 50 Series Product Guide



UA8956 40mm Post

1.203 ka/m



UA8163 Round Tube 19ø

 $0.237 \, \text{kg/m}$ 



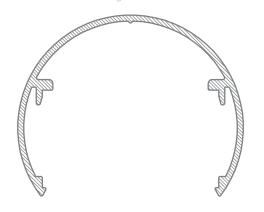
UA8955 16mm Square Tube

0.226 kn/m



UA1869 19mm Square Tube

0.275 kg/m



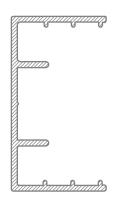
UA8989 60mmø Handrail

0.684 kg/m



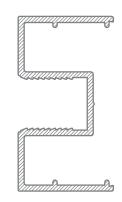
UA8990 43.35mm Filler

0.188 ka/m



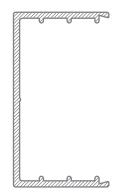
UA8991 46.55mm x 25.40mm Channel

0.486 kg/m



UA8992 46.55mm x 25.40mm Glazing Channel

0.580 kg/m



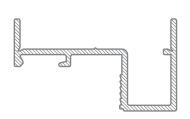
UA8993 46.55mm x 25.40mm Top/Bottom Rail

 $0.421 \, \text{kg/m}$ 



UA8995 15.13mm x 14.60mm Clip In Bead

0.159 ka/m

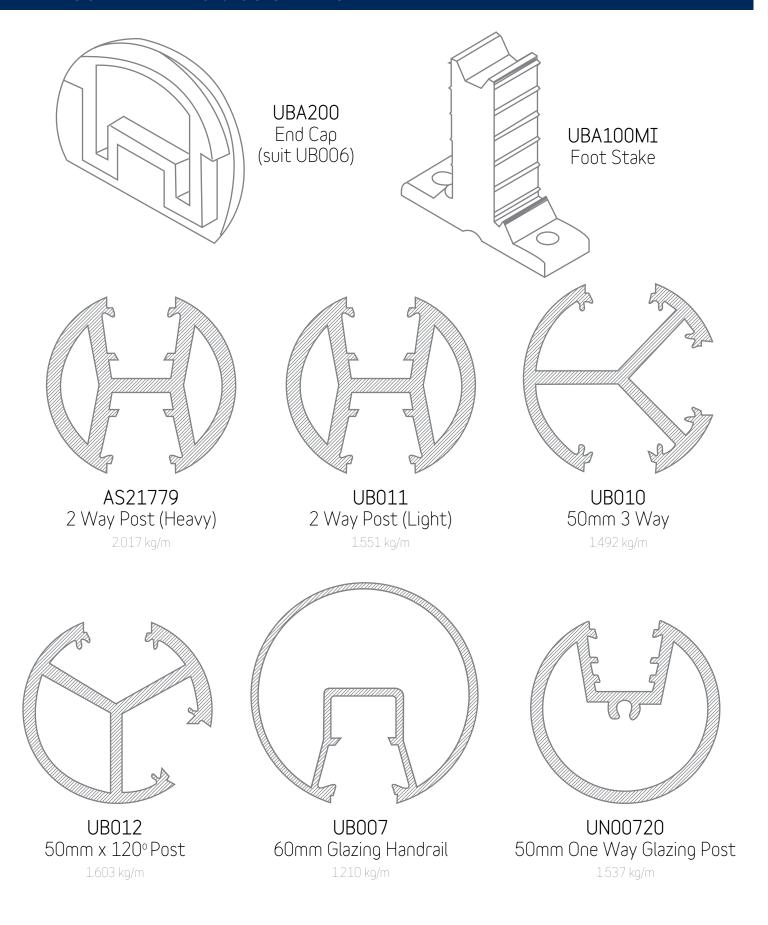


UA8994 43.25mm x 24.50mm Clip In Glazing Channel

0.406 kg/n



UBA209 End Cap (suit UN00200)

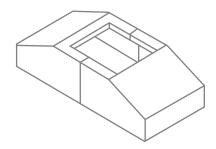




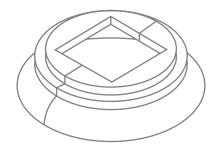
UA5570 16mm Fluted Balustrade 0.262 kg/m



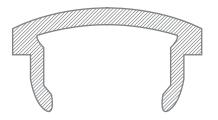
Single Glazed Rubber 32-88 Black (suit 6.38mm Glass)



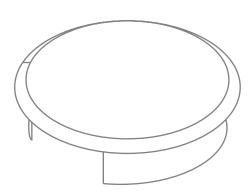
UBA201BK Foot Cover-Plastic



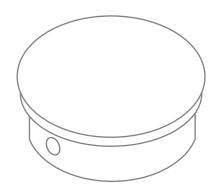
UBA203BK Foot Cover (suit UB017)



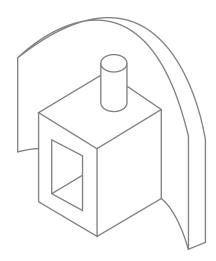
UB019 Glazing Infill 0.133 kg/m



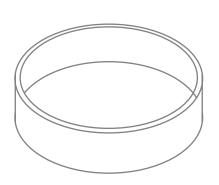
UBA103MI 60x2 Alum End Cap (suit Handrail UB007)



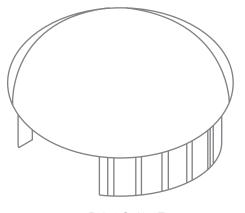
UBA105MI 50x3 Alum Raised End Cap (suit 50mm Post)



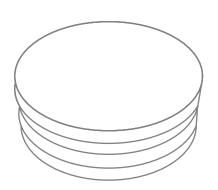
UBA208BK Plastic Glass Stop



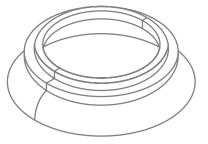
UBA101MI End Cap - Alum (suit 50mm Post)



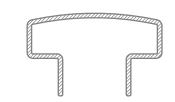
UBA104MI 60x2 Alum Raised End Cap (suit handrail UB007)



UBA204BK 50mm Plastic Plug for Tube (suit 50mm Post)



UBA207BK Foot Cover



UA8214 36mm x 22mm Wardrobe Stile

0.287 kg/m



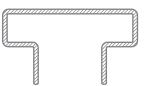
UA6461 75mm x 16mm Railing

0.776 kg/m



UA2097 35mm Channel Lid

 $0.162 \, \text{kg/m}$ 



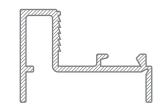
UA8233 36mm x 10mm Wardrobe Stile

0.285 kg/m



UA2096 38.10mm x 25.40mm Handrail Channel

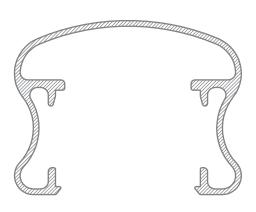
0394 kn/m



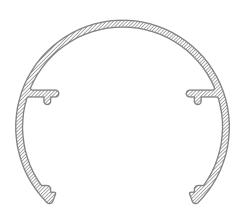
**UA2102** 34.75mm x 24.50mm Glazing Bar

0.373 kn/m



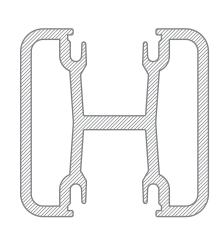


UA10353 60mm x 46mm Lady Waist Handrail



**UA10354** 56.50mm x 48.50mm Circle Handrail

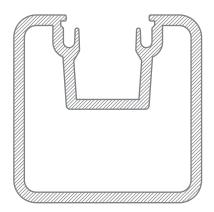
0.758 kg/m



UA6501 50mm Glazing Post







UA6500 50mm Glazing Post

1.718 kg/m



J.

## **ULLTRA LIGHT**





### **EXCRO1 - CORNER PROFILE**

SKU - ORDER CODE		
EXTRUSION	END CAP	MOUNTING BRACKET
EXCR01	ECCR01/ECCR01H	FBCR01



### **EXCRO2 - CORNER PROFILE**

SKU - ORDER CODE			
EXTRUSION	END CAP	MOUNTING BRACKET	
EXCR02	ECCR02 / ECCR02H	FBCR02	



### **EXLPO2 - LINEAR PROFILE**

	SKU - ORDER CODE	
EXTRUSION	END CAP	MOUNTING BRACKET
EXLP02	EXLP / ECLP02H	FBLP02



### **EXLPO3 - LINEAR PROFILE**

SKU - ORDER CODE			
EXTRUSION	END CAP	MOUNTING BRACKET	
EXLP03	ECLP03 / ECLP03H	FBLP03	



### **EXRSO1 - RECESSED PROFILE**

SKU - ORDER CODE			
EXTRUSION	END CAP	MOUNTING BRACKET	
EXRS01	ECRS01/ECRS01H	-	



## **EXRSO3 - RECESSED PROFILE**

SKU - ORDER CODE				
EXTRUSION	MOUNTING BRACKET			
EXRS03	ECRS03 / ECRS03H	-		

# **EXPANDED GRILLE**

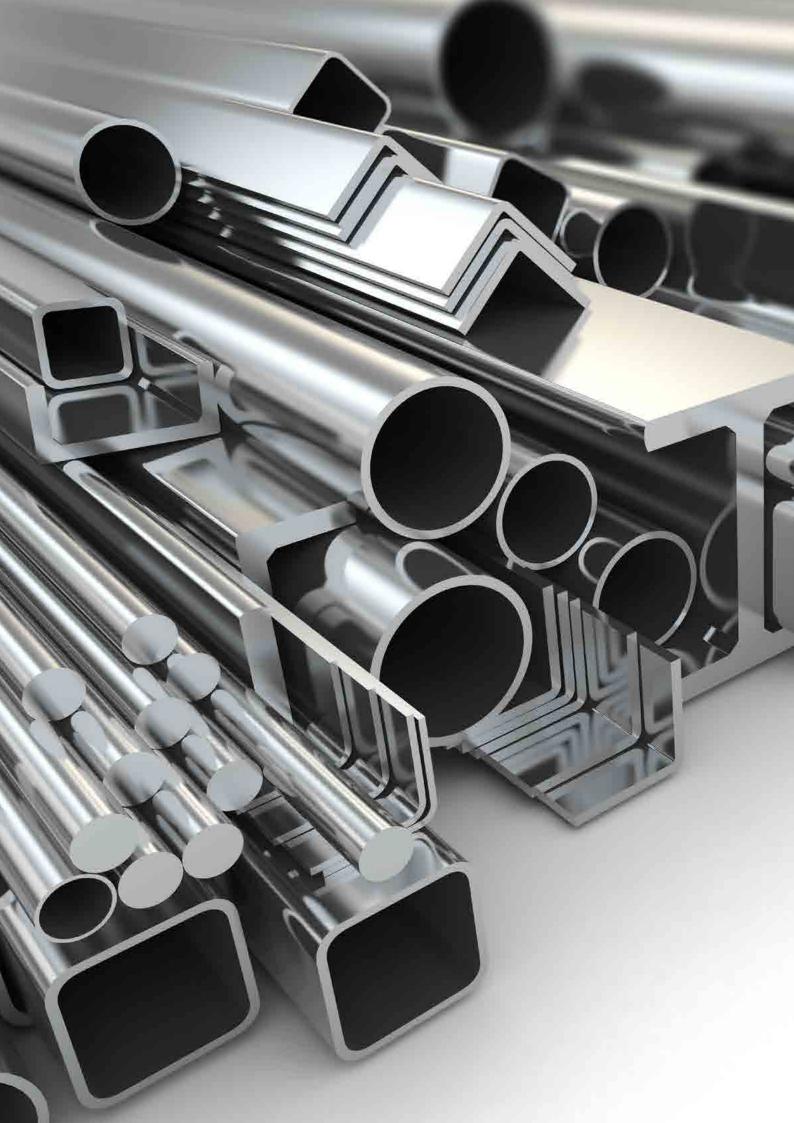


#### 7MM EXPANDED SECURITY GRILLES

Part Number	Finish	Width (mm)	Length (mm)
G007D2MI	MILL FINISH	1250	2050
G007D25MI	MILL FINISH	1250	2450
G007D6MI	MILL FINISH	1250	6222
G007G2MI	MILL FINISH	778	2121
G007G25MI	MILL FINISH	778	2525
G007G6MI	MILL FINISH	778	6262
G007H2MI	MILL FINISH	945	2121
G007H25MI	MILL FINISH	945	2480
G007H6MI	MILL FINISH	945	6190

#### 9MM EXPANDED SECURITY GRILLES

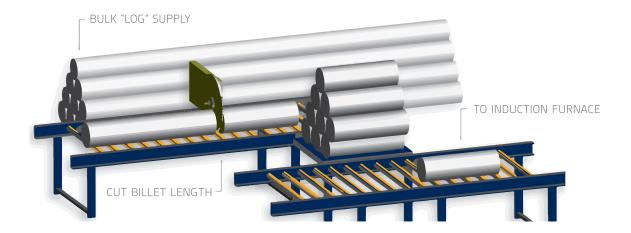
Part Number	Finish	Width (mm)	Length (mm)
G009D2MI	MILL FINISH	1160	2050
G009D62MI	MILL FINISH	1250	6245



1

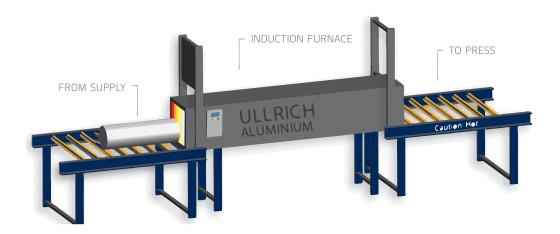
The aluminium process begins with the design process. The function of the profile will determine the shape of the die and the alloy required to form the extrusion.

Aluminium billet is stocked for the extrusion process, it is cut from a longer length of alloyed aluminium log.



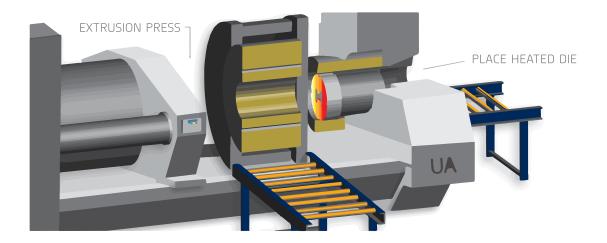
2

The cut bullets are softened in a heating induction furnace at approximately 660°C.



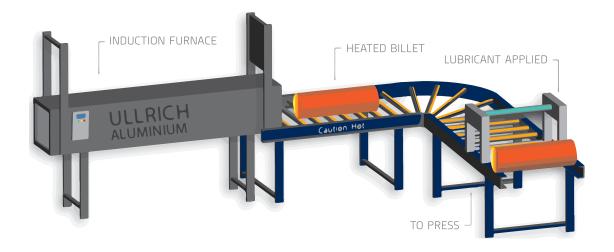


The extrusion process takes place with the bullet heated between  $375^{\circ}\text{C}$  -  $500^{\circ}\text{C}$  depending on the alloy being used. The extrusion tools and dies are preheated .



4

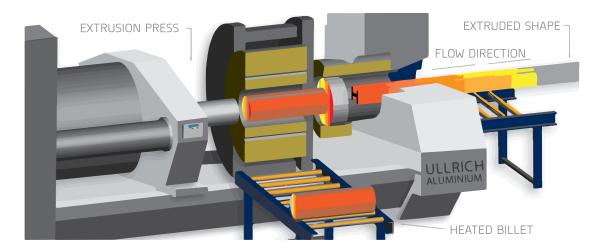
The aluminium alloys for extrusion need to be heated to 450°C it is vital that a release agent or lubricant is applied between the aluminium billet and the dummy block.



5

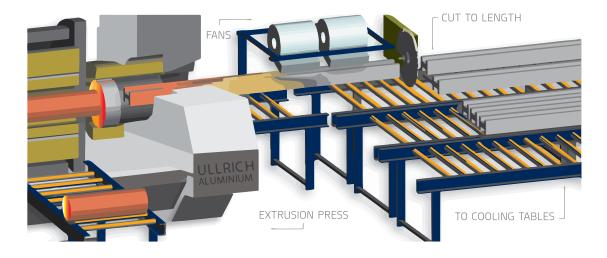
The extrusion process begins when the ram starts applying around 15,000 tons of pressure to the billet.

Extrusion rates vary depending on the alloy used and the shape of the extrusion.



6

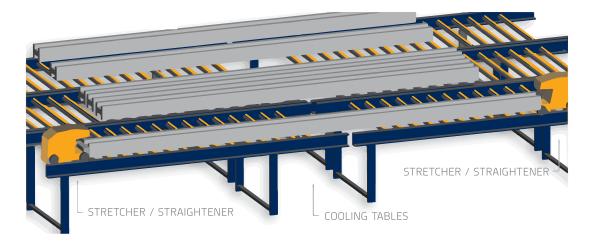
Depending on the billet size and die opening, a continuous extrusion as much as 40m long may be produced.



7

Depending on the alloy, the extrusion is cooled naturally or through the use of air or water.

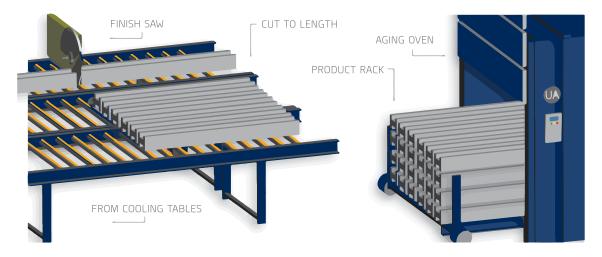
The extrusion is then transferred to a cooling table where a stretcher and/ or a straighter is applied.





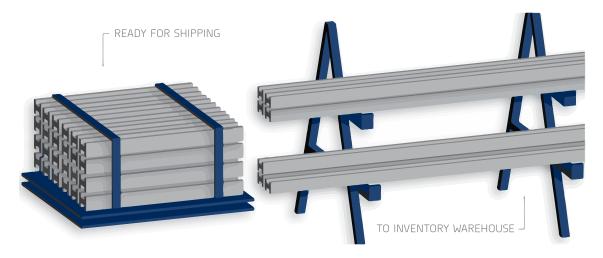
A finish cut saw is used to cut the profile to the specified commercial length.

Some extrusion alloys reach their optimal strength through the process of aging also known as precipitation heat treatment.





The profiles are moved to other areas of the plant for finishing or fabricating or packed and prepared for shipment.



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