



DATA SPECIFICATION

APL | ARCHITECTURAL SERIES

MAIN FEATURES

- A high performance and aesthetically pleasing series of windows and doors ideal for architecturally designed houses and apartments.
- Designs reflect the contemporary preference for clean, flush surfaces and square shapes.
- The box-shaped window frame resembles a deluxe commercial system such as a flushglaze frame.
- The awning sash sits flush with the frame rather than overlapping it.
- There are no fins projecting out on window mullions and transoms - stiffening boxes project inwards.
- The range includes:
 - Awning and casement windows
 - Sliding windows
 - Bi-fold windows
 - Hinged doors
 - French doors
 - Bi-fold doors
 - Sliding doors (including Minima Sliders)
- Windows and doors have been designed for the predominant use of square - rather than sloped - glazing beads.
- Doors can be made to suit full height glass designs increasingly favoured by designers.
- Tall heights are possible in 'very high' and 'Specific Design' wind zones.
- Windows and doors are generally designed to be suitable for 'Specific Design' applications in wind pressures of 2.2kPa serviceability (3.4kPa ultimate wind pressure), provided they do not exceed recommended size guidelines.
- Sliding doors slide on an outside track and can meet at 90° corners without the need for a corner post. For most configurations a fixed side panel is required. However, a bypass slider option is available where two or three panels move.
- The sliding door system has also been designed for convenient use as a cavity slider or for sliding back over a wall.
- Minima sliding doors have the frame recessed into floor, walls and ceiling for clear sightlines. The track system is completely hidden, with only a 22mm-high bottom rail visible. The glass line is flush with the frame at jambs and head.
- Bi-fold doors are bottom rolling with the weight carried on the sill.
- For bi-folds a unique split stile feature ensures that the doors move smoothly when built in large sizes.
- Matching depth window frames and hinged and sliding door frames allow a continuous edge on the inside when products are coupled together.
- Windows and doors can accept glass thicknesses from 4 - 28mm.

FINISH / COLOUR

Powder Coated in a wide range of colours.

Anodised silver and bronze as standard, 20 micron thickness. Other colours and thicknesses are available.

GLASS

Double glazing to a maximum of 28mm thickness can be used. Glass thickness and type to be used is covered by the Human Impact Safety requirements of NZS 4223.

DOORS

Hinged Doors are open-out and open-in. The open-out door is available in the two frame options below while the open-in door is available in the 106mm frame only.

1. The 106mm frame (08711) for coupling with the 106mm awning window frame (08700).
2. The 158mm frame (08712) for coupling with the 158mm awning window frame (08701). Both frames have facing adaptors available (08730 / 08732) to provide 25mm of weather cover if required. Hinged door panels are 50mm deep and are bead glazed externally on all sides for glass thicknesses of 4 - 28mm.

Sliding Doors slide on an external track with a fixed sidelight (except in the bypass configuration where no sidelight is required). Three frame options are available:

(a) a 106mm two-panel slider (08740 / 08741), (b) a 158mm three-panel slider (08742 / 08743) and (c) a 210mm four-panel slider (08782 / 08783 / 08744). Each option has a matching sub-sill section available. Sliding door panels are 40mm deep and all door stile stiffening boxes project outwards. Sliding doors and sidelights are bead glazed internally for glass thicknesses 4 - 28mm.

Minima Sliding Doors have a hidden track recessed below floor level with bottom rollers not seen. Interlocker fins are deep but narrow (28mm wide), with two different sizes to suit the application. They project internally and externally. Pocket glazed with 38mm IGU's as standard

Bi-Fold Doors are open-out and have a 106mm frame (08721 / 08722 / 08723). The doors are carried on a bottom roller with top guide. The roller and guide are pivoting inserts within the door stiles thus optimising overall ease of operation. Facing adaptors (08730 / 08738) are available to provide 25mm of weather cover if required. Door panels are 50mm deep and are bead glazed externally on all sides for glass thicknesses of 4 - 28mm.

GLAZING BEADS

Square glazing beads are available with the double glazed bead flush with the door face.

GLASS

Glass to a minimum 4mm thickness and double glazing to a maximum of 26mm thickness can be used (38mm for Minima Sliders). Glass thickness and type to be used is covered by the Human Impact Safety requirements of NZS 4223. For glass panels over 0.5m² Grade A safety glazing must be used.

PERFORMANCE

Complies with NZS 4211: 2008 Performance of Windows. Certificates can be provided on request. Doors in the APL ARCHITECTURAL SERIES designed to be suitable for 'Specific Design' applications in wind pressures of 2.2kPa serviceability (3.4kPa ultimate wind pressure) provided they do not exceed recommended size guidelines. For specific cases consult your local VANTAGE manufacturer to determine engineering requirements.

A guarantee for all VANTAGE products is provided under normal conditions of use against failure of materials and workmanship for five years from the date of practical completion.

SIZES

APL ARCHITECTURAL SERIES sliding doors are generally suitable for 'Specific Design' applications in wind pressures of 2.2kPa serviceability (3.4kPa ultimate wind pressure) provided they do not exceed recommended size guidelines. Other door types are designed for high wind pressures.

A maximum hinged door of 2700mm high x 900mm wide is recommended in 'very high' wind zones, with larger sizes possible when multi-point locking is used. French doors are recommended to a maximum panel size of 2700mm high x 900mm wide.

For sliding doors a maximum panel size of 3000mm high x 2500mm wide is recommended in 'very high' wind zones. Larger heights or widths may be possible with different aspect ratios or in lower wind zones. Sliding door rollers are rated to 150kg each. Check glass size availability for large panels.

For Minima Sliders a maximum panel of 4000mm high and widths as wide as glass availability allows. Due to heavy panel weight and the need for perfectly level sills floor sag cannot be tolerated; ground level applications are optimum. Geotechnical engineering is important. Installation to be by an approved installer.

For bi-folds a maximum panel height of 2700mm is recommended in 'very high' wind zones. Taller doors may be possible in lower wind zones. A maximum panel width of 1000mm is recommended. A maximum panel weight of 100kg applies.

HARDWARE

Hinged doors are fitted with Miro, Urbo or Icon lever lockset furniture and multi-point locking in the door stile. In French door sets the lazy door panel has a twin bolt lock with locking rods at the head and sill. The active door also has Miro, Urbo or Icon furniture with four-point locking - at head, sill and mid-point.

For hinged doors, purpose made butt hinges are used with three or four per door (depending on panel weight and height).

Sliding door locks are fitted with Miro or Icon mortice locks securing to the jamb. Large Miro or Icon D handles are fitted with separately mounted key cylinders operated by key or turn. Flush pulls can also be used in lieu of D handles.

Minima Sliders are locked at the interlocker stiles, rather than at the jamb, with a Minima flush lock.

Bi-fold doors have a swivel operator with locking pins at head and sill. A D-handle / hinge is also used. The bogies for roller and top guide are made from extruded aluminium and the roller has 2 or 4 wheels depending on bi-fold configuration.

Miro and Urbo are available in a standard range of 26 powder coat colours. Icon is available in a stainless steel finish.