

CUSTOMER TECHNICAL MEMO # 133

Subject: View-max Sliding Window & Double Hung Technical Manuals

Date: 15/12/11

From: Product Development

Please note the revised View-max Sliding Window and Double Hung Technical Manuals are now available for your use.

View-max Sliding Window Technical Manual is a complete revised version for re-printing and replacing of your existing Technical Manual.

View-max Double Hung Technical Manual is an updated version from our earlier release in April 2011.

The pages following have been revised and should replace the existing pages in your current Tech Manual, dated April 2011. If your current Tech Manual is not dated April 2011 we recommend re-printing the complete Tech Manual found on the ALSPEC website. (Please ensure your printer is set to double sided printing. The pages containing these revisions have been created to allow you to easily replace the pages in your existing Tech Manual).

To print a copy of the complete revised View-max Sliding Window and Double Hung Technical Manuals you can log onto our website, www.alspec.com.au and download the manual from the Windows and Doors, View-max links. Alternatively you can speak with your ALSPEC Area Manager who may provide you with a copy.

If you have any questions please do not hesitate to contact your local Area Manager or Sales Office.

ALSPEC ALUMINIUM SYSTEMS

TECHNICAL MANUAL

VIEW-MAX double hung

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Also, interpretation of standards or codes within this manual is Aluminium Specialties Group Pty Limited interpretation for such codes. Responsibility for code compliance remains with the user of this manual. In some cases product dimensions may vary or be changed without notice. The user of this manual should not act or rely upon on any information contained in this manual without first obtaining appropriate professional advice relating to their particular circumstances.

Aluminium Specialties Group Pty Limited disclaims all liability for loss or damage suffered by any party who acts or fails to act in reliance of this manual.

Issued to:

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ALSPEC contact:

Date:

Manual reference number: VM-DH - DEC 2011

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Section 1.0

TECHNICAL MANUAL RELEASE NOTES

This page is intended to record all changes to the **VIEW-MAX DOUBLE HUNG** technical manual pages. It is therefore critical that all changes are recorded in the below AMENDMENTS box prior to release to our customer.

Changes or additions to this manual will be itemised with a brief description and date when the amendments were made.

It is important that a copy of this page be issued with the update and inserted as the first page in the customers technical manual.

DATE	AMENDMENT DESCRIPTION	REMOVE PAGE	INSERT NEW PAGE
01 / 03 / 2008	<i>Technical manual initial release</i>	~	~
28 / 05 / 2008	<i>Part number reference corrected in the example</i>	3.2.4	3.2.4
28 / 05 / 2008	<i>Glass height cut size corrected & rail number corrected</i>	3.5.3	3.5.3
28 / 05 / 2008	<i>Glass height cut size corrected</i>	3.5.4	3.5.4
28 / 05 / 2008	<i>Glass height cut size corrected</i>	3.5.5	3.5.5
31 / 07 / 2008	<i>Full re-issue with new profiles and format</i>	All	All
01 / 02 / 2009	<i>Technical manual release notes amended</i>	1.0	1.0
01 / 02 / 2009	<i>Specification amended</i>	2.1	2.1
01 / 02 / 2009	<i>Loading table explanation page added</i>	2.2	2.2
01 / 02 / 2009	<i>Test report page updated</i>	2.3	2.3
01 / 02 / 2009	<i>Hardware components pages amended</i>	3.2.1 to 3.2.3	3.2.1 to 3.2.3
01 / 02 / 2009	<i>Max sash height amended</i>	3.2.4	3.2.4
01 / 02 / 2009	<i>Page number amended</i>	3.2.5	3.2.5
01 / 02 / 2009	<i>Mohair deleted</i>	3.4.1, 3.4.3, 3.4.5, 3.4.7, 3.4.9, 3.4.12	3.4.1, 3.4.3, 3.4.5, 3.4.7, 3.4.9, 3.4.12
01 / 02 / 2009	<i>Jamb preparation amended</i>	3.6.1	3.6.1
01 / 02 / 2009	<i>Diameter symbols amended</i>	3.6.2 & 3.6.3	3.6.2 & 3.6.3
01 / 02 / 2009	<i>Sash stop note amended</i>	3.6.9	3.6.9
01 / 02 / 2009	<i>Jamb assembly amended</i>	3.6.10	3.6.10
01 / 02 / 2009	<i>Installation steps amended</i>	3.6.15 to 3.6.18	3.6.15 to 3.6.18
01 / 07 / 2009	<i>Contents page 1 amended</i>	~	~
01 / 07 / 2009	<i>Technical Manual Release Notes Amended</i>	1.0	1.0
01 / 07 / 2009	<i>New page added</i>	~	1.1
01 / 07 / 2009	<i>Window Stop notes and dimension added</i>	3.6.1	3.6.1

ALSPEC ALUMINIUM SYSTEMS

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VIEW-MAX double hung

Section 2.0

SPECIFICATION

ALUMINIUM

Aluminium frames should be manufactured using ALSPEC's View-max Double Hung Commercial Window.

The maximum sash height shall be 1190mm.

The minimum sash height shall be 426mm.

The maximum sash width shall be 1200mm.

The minimum sash width shall be 300mm.

The maximum sash weight shall be 20kg.

HARDWARE

- Glazing wedges, channels and seals shall be ALSPEC's wedges, channels and seals for View-max Double Hung Window to suit standard glazing options.
- All other hardware as per ALSPEC Technical Manual.

FINISHES

- All powder coated material shall be produced to AS3715
- All anodised material shall be produced to AS1231

TESTING

Products have a test report to compliance to AS2047.

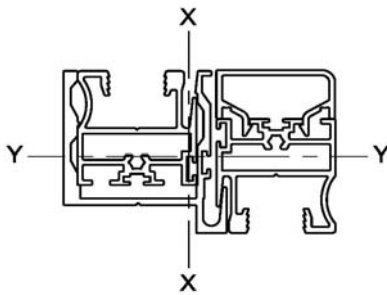
Products have been WERS certified.

Product shall be Acoustic Tested to AS1991:2002.

All products are available from ALSPEC (A.B.N. 63 001 252 259) as detailed in the "ALSPEC" Catalogue or on the Internet at www.alspec.com.au . All such framing is to be constructed, assembled and fixed to meet the requirements of AS2047 (windows in buildings), AS1170 (loading code). All glass, glazing rubbers, seals and gaskets shall be applied in accordance with the requirements of AS1288 (glass in buildings – selection and installation).

Fabricators of the View-max Double Hung Commercial Window should seek confirmation of design wind pressures and deflection criteria from the building designer.

DH MEETING RAILS VM32 + 2 X VM3 + VM42



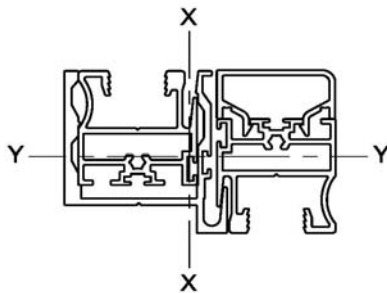
DH Meeting Rails VM32 + 2 x VM3 + VM42
$I_{xx} = 80.4 \times 10^3 \text{ mm}^4$
Max Stress = 110 Mpa
S = Serviceability limit state I/180
U = Ultimate limit state

L/180

Window Height	Maximum Design Pressure (Pa)					
		800	900	1000	1100	1200
2400	S	3000	3000	3000	2750	1920
	U	6000	6000	5780	4340	3350
2300	S	3000	3000	3000	2730	1920
	U	6000	6000	5780	4340	3350
2200	S	3000	3000	3000	2720	1940
	U	6000	6000	5780	4340	3380
2100	S	3000	3000	3000	2730	1960
	U	6000	6000	5780	4360	3420
2000	S	3000	3000	3000	2750	1990
	U	6000	6000	5780	4400	3480
1900	S	3000	3000	3000	2790	2030
	U	6000	6000	5810	4460	3560
1800	S	3000	3000	3000	2840	2080
	U	6000	6000	5870	4560	3660
1700	S	3000	3000	3000	2910	2140
	U	6000	6000	5980	4680	3780
1600	S	3000	3000	3000	3000	2220
	U	6000	6000	6000	4840	3930
1500	S	3000	3000	3000	3000	2310
	U	6000	6000	6000	5030	4100
1400	S	3000	3000	3000	3000	2430
	U	6000	6000	6000	5260	4310
1300	S	3000	3000	3000	3000	2560
	U	6000	6000	6000	5550	4570
1200	S	3000	3000	3000	3000	2730
	U	6000	6000	6000	5900	4870
1100	S	3000	3000	3000	3000	2920
	U	6000	6000	6000	6000	5230
1000	S	3000	3000	3000	3000	3000
	U	6000	6000	6000	6000	5680
900	S	3000	3000	3000	3000	3000
	U	6000	6000	6000	6000	6000
800	S	3000	3000	3000	3000	3000
	U	6000	6000	6000	6000	6000
Window Width		800	900	1000	1100	1200

This table is based on theoretical section properties

DH MEETING RAILS VM32 + 2 X VM3 + VM42



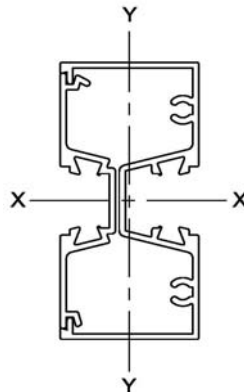
DH Meeting Rails VM32 + 2 x VM3 + VM42
$I_{xx} = 80.4 \times 10^3 \text{ mm}^4$
Max Stress = 110 Mpa
S = Serviceability limit state I/250
U = Ultimate limit state

L/250

Window Height	Maximum Design Pressure (Pa)					
		800	900	1000	1100	1200
2400	S	3000	3000	2870	1960	1380
	U	6000	6000	5780	4340	3350
2300	S	3000	3000	2870	1960	1380
	U	6000	6000	5780	4340	3350
2200	S	3000	3000	2870	1960	1390
	U	6000	6000	5780	4340	3380
2100	S	3000	3000	2870	1960	1410
	U	6000	6000	5780	4360	3420
2000	S	3000	3000	2870	1980	1430
	U	6000	6000	5780	4400	3480
1900	S	3000	3000	2880	2000	1460
	U	6000	6000	5810	4460	3560
1800	S	3000	3000	2910	2040	1500
	U	6000	6000	5870	4560	3660
1700	S	3000	3000	2950	2090	1540
	U	6000	6000	5980	4680	3780
1600	S	3000	3000	3000	2160	1600
	U	6000	6000	6000	4840	3930
1500	S	3000	3000	3000	2240	1670
	U	6000	6000	6000	5030	4100
1400	S	3000	3000	3000	2330	1750
	U	6000	6000	6000	5260	4310
1300	S	3000	3000	3000	2450	1840
	U	6000	6000	6000	5550	4570
1200	S	3000	3000	3000	2600	1960
	U	6000	6000	6000	5900	4870
1100	S	3000	3000	3000	2780	2100
	U	6000	6000	6000	6000	5230
1000	S	3000	3000	3000	3000	2280
	U	6000	6000	6000	6000	5680
900	S	3000	3000	3000	3000	2500
	U	6000	6000	6000	6000	6000
800	S	3000	3000	3000	3000	2780
	U	6000	6000	6000	6000	6000
Window Width		800	900	1000	1100	1200

This table is based on theoretical section properties

MULLION DETAIL AS51C, AS554



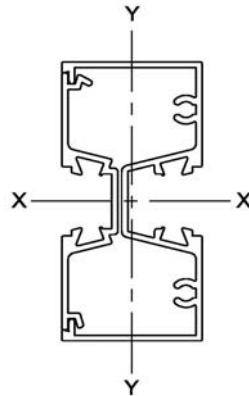
Mullion Detail AS51C, AS554
$I_{xx} = 325.00 \times 10^3 \text{ mm}^4$
Max Stress = 110 Mpa
S = Serviceability limit state I/180
U = Ultimate limit state

L/180

Window Height	Maximum Design Pressure (Pa)					
		800	900	1000	1100	1200
2400	S	2750	2470	2260	2080	1940
	U	3850	3460	3150	2900	2690
2300	S	3000	2820	2580	2380	2230
	U	4210	3780	3450	3180	2960
2200	S	3000	3000	2970	2750	2570
	U	4620	4150	3790	3500	3260
2100	S	3000	3000	3000	3000	2990
	U	5090	4590	4190	3880	3620
2000	S	3000	3000	3000	3000	3000
	U	5640	5090	4660	4320	4040
1900	S	3000	3000	3000	3000	3000
	U	6000	5690	5220	4840	4550
1800	S	3000	3000	3000	3000	3000
	U	6000	6000	5880	5480	5160
1700	S	3000	3000	3000	3000	3000
	U	6000	6000	6000	6000	5910
1600	S	3000	3000	3000	3000	3000
	U	6000	6000	6000	6000	6000
1500	S	3000	3000	3000	3000	3000
	U	6000	6000	6000	6000	6000
1400	S	3000	3000	3000	3000	3000
	U	6000	6000	6000	6000	6000
1300	S	3000	3000	3000	3000	3000
	U	6000	6000	6000	6000	6000
1200	S	3000	3000	3000	3000	3000
	U	6000	6000	6000	6000	6000
1100	S	3000	3000	3000	3000	3000
	U	6000	6000	6000	6000	6000
1000	S	3000	3000	3000	3000	3000
	U	6000	6000	6000	6000	6000
900	S	3000	3000	3000	3000	3000
	U	6000	6000	6000	6000	6000
800	S	3000	3000	3000	3000	3000
	U	6000	6000	6000	6000	6000
Mullion Centres		800	900	1000	1100	1200

This table is based on theoretical section properties

MULLION DETAIL AS51C, AS554



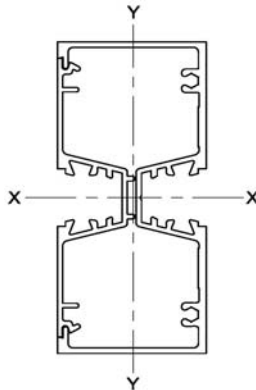
Mullion Detail AS51C, AS554
Ixx = 325.00 X 10 ³ mm ⁴
Max Stress = 110 Mpa
S = Serviceability limit state I/250
U = Ultimate limit state

L/250

Window Height	Maximum Design Pressure (Pa)					
		800	900	1000	1100	1200
2400	S	1980	1780	1620	1500	1400
	U	3850	3460	3150	2900	2690
2300	S	2260	2030	1860	1720	1600
	U	4210	3780	3450	3180	2960
2200	S	2590	2340	2140	1980	1850
	U	4620	4150	3790	3500	3260
2100	S	3000	2710	2480	2300	2150
	U	5090	4590	4190	3880	3620
2000	S	3000	3000	2900	2690	2530
	U	5640	5090	4660	4320	4040
1900	S	3000	3000	3000	3000	3000
	U	6000	5690	5220	4840	4550
1800	S	3000	3000	3000	3000	3000
	U	6000	6000	5880	5480	5160
1700	S	3000	3000	3000	3000	3000
	U	6000	6000	6000	6000	5910
1600	S	3000	3000	3000	3000	3000
	U	6000	6000	6000	6000	6000
1500	S	3000	3000	3000	3000	3000
	U	6000	6000	6000	6000	6000
1400	S	3000	3000	3000	3000	3000
	U	6000	6000	6000	6000	6000
1300	S	3000	3000	3000	3000	3000
	U	6000	6000	6000	6000	6000
1200	S	3000	3000	3000	3000	3000
	U	6000	6000	6000	6000	6000
1100	S	3000	3000	3000	3000	3000
	U	6000	6000	6000	6000	6000
1000	S	3000	3000	3000	3000	3000
	U	6000	6000	6000	6000	6000
900	S	3000	3000	3000	3000	3000
	U	6000	6000	6000	6000	6000
800	S	3000	3000	3000	3000	3000
	U	6000	6000	6000	6000	6000
Mullion Centres		800	900	1000	1100	1200

This table is based on theoretical section properties

MULLION DETAIL AS1C, AS4C



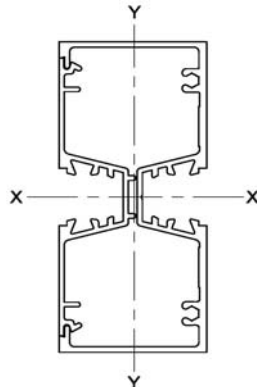
Mullion Detail AS1C, AS4C
$I_{xx} = 885.3 \times 10^3 \text{ mm}^4$
Max Stress = 110 Mpa
S = Serviceability limit state I/180
U = Ultimate limit state

L/180

Window Height	Maximum Design Pressure (Pa)					
		800	900	1000	1100	1200
2400	S	3000	3000	3000	3000	3000
	U	6000	6000	6000	5910	5500
2300	S	3000	3000	3000	3000	3000
	U	6000	6000	6000	6000	6000
2200	S	3000	3000	3000	3000	3000
	U	6000	6000	6000	6000	6000
2100	S	3000	3000	3000	3000	3000
	U	6000	6000	6000	6000	6000
2000	S	3000	3000	3000	3000	3000
	U	6000	6000	6000	6000	6000
1900	S	3000	3000	3000	3000	3000
	U	6000	6000	6000	6000	6000
1800	S	3000	3000	3000	3000	3000
	U	6000	6000	6000	6000	6000
1700	S	3000	3000	3000	3000	3000
	U	6000	6000	6000	6000	6000
1600	S	3000	3000	3000	3000	3000
	U	6000	6000	6000	6000	6000
1500	S	3000	3000	3000	3000	3000
	U	6000	6000	6000	6000	6000
1400	S	3000	3000	3000	3000	3000
	U	6000	6000	6000	6000	6000
1300	S	3000	3000	3000	3000	3000
	U	6000	6000	6000	6000	6000
1200	S	3000	3000	3000	3000	3000
	U	6000	6000	6000	6000	6000
1100	S	3000	3000	3000	3000	3000
	U	6000	6000	6000	6000	6000
1000	S	3000	3000	3000	3000	3000
	U	6000	6000	6000	6000	6000
900	S	3000	3000	3000	3000	3000
	U	6000	6000	6000	6000	6000
800	S	3000	3000	3000	3000	3000
	U	6000	6000	6000	6000	6000
Mullion Centres		800	900	1000	1100	1200

This table is based on theoretical section properties

MULLION DETAIL AS1C, AS4C



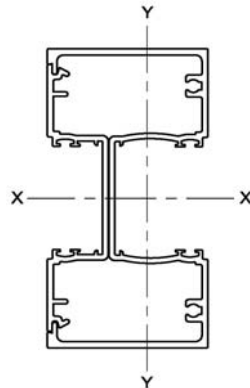
Mullion Detail AS1C, AS4C
$I_{xx} = 885.3 \times 10^3 \text{ mm}^4$
Max Stress = 110 Mpa
S = Serviceability limit state I/250
U = Ultimate limit state

L/250

Window Height	Maximum Design Pressure (Pa)					
		800	900	1000	1100	1200
2400	S	3000	3000	3000	3000	3000
	U	6000	6000	6000	5910	5500
2300	S	3000	3000	3000	3000	3000
	U	6000	6000	6000	6000	6000
2200	S	3000	3000	3000	3000	3000
	U	6000	6000	6000	6000	6000
2100	S	3000	3000	3000	3000	3000
	U	6000	6000	6000	6000	6000
2000	S	3000	3000	3000	3000	3000
	U	6000	6000	6000	6000	6000
1900	S	3000	3000	3000	3000	3000
	U	6000	6000	6000	6000	6000
1800	S	3000	3000	3000	3000	3000
	U	6000	6000	6000	6000	6000
1700	S	3000	3000	3000	3000	3000
	U	6000	6000	6000	6000	6000
1600	S	3000	3000	3000	3000	3000
	U	6000	6000	6000	6000	6000
1500	S	3000	3000	3000	3000	3000
	U	6000	6000	6000	6000	6000
1400	S	3000	3000	3000	3000	3000
	U	6000	6000	6000	6000	6000
1300	S	3000	3000	3000	3000	3000
	U	6000	6000	6000	6000	6000
1200	S	3000	3000	3000	3000	3000
	U	6000	6000	6000	6000	6000
1100	S	3000	3000	3000	3000	3000
	U	6000	6000	6000	6000	6000
1000	S	3000	3000	3000	3000	3000
	U	6000	6000	6000	6000	6000
900	S	3000	3000	3000	3000	3000
	U	6000	6000	6000	6000	6000
800	S	3000	3000	3000	3000	3000
	U	6000	6000	6000	6000	6000
Mullion Centres		800	900	1000	1100	1200

This table is based on theoretical section properties

DG MULLION ECO201, ECO204



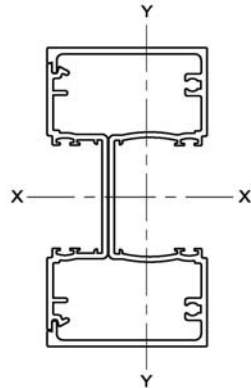
DG Mullion ECO201, ECO204
$I_{xx} = 1052.4 \times 10^3 \text{ mm}^4$
Max Stress = 110 Mpa
S = Serviceability limit state I/180
U = Ultimate limit state

L/180

Window Height	Maximum Design Pressure (Pa)					
		800	900	1000	1100	1200
2400	S	3000	3000	3000	3000	3000
	U	6000	6000	6000	6000	6000
2300	S	3000	3000	3000	3000	3000
	U	6000	6000	6000	6000	6000
2200	S	3000	3000	3000	3000	3000
	U	6000	6000	6000	6000	6000
2100	S	3000	3000	3000	3000	3000
	U	6000	6000	6000	6000	6000
2000	S	3000	3000	3000	3000	3000
	U	6000	6000	6000	6000	6000
1900	S	3000	3000	3000	3000	3000
	U	6000	6000	6000	6000	6000
1800	S	3000	3000	3000	3000	3000
	U	6000	6000	6000	6000	6000
1700	S	3000	3000	3000	3000	3000
	U	6000	6000	6000	6000	6000
1600	S	3000	3000	3000	3000	3000
	U	6000	6000	6000	6000	6000
1500	S	3000	3000	3000	3000	3000
	U	6000	6000	6000	6000	6000
1400	S	3000	3000	3000	3000	3000
	U	6000	6000	6000	6000	6000
1300	S	3000	3000	3000	3000	3000
	U	6000	6000	6000	6000	6000
1200	S	3000	3000	3000	3000	3000
	U	6000	6000	6000	6000	6000
1100	S	3000	3000	3000	3000	3000
	U	6000	6000	6000	6000	6000
1000	S	3000	3000	3000	3000	3000
	U	6000	6000	6000	6000	6000
900	S	3000	3000	3000	3000	3000
	U	6000	6000	6000	6000	6000
800	S	3000	3000	3000	3000	3000
	U	6000	6000	6000	6000	6000
Mullion Centres		800	900	1000	1100	1200

This table is based on theoretical section properties

DG MULLION ECO201, ECO204



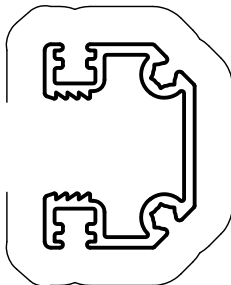
DG Mullion ECO201, ECO204
$I_{xx} = 1052.4 \times 10^3 \text{ mm}^4$
Max Stress = 110 Mpa
S = Serviceability limit state I/250
U = Ultimate limit state

L/250

Window Height	Maximum Design Pressure (Pa)					
		800	900	1000	1100	1200
2400	S	3000	3000	3000	3000	3000
	U	6000	6000	6000	6000	6000
2300	S	3000	3000	3000	3000	3000
	U	6000	6000	6000	6000	6000
2200	S	3000	3000	3000	3000	3000
	U	6000	6000	6000	6000	6000
2100	S	3000	3000	3000	3000	3000
	U	6000	6000	6000	6000	6000
2000	S	3000	3000	3000	3000	3000
	U	6000	6000	6000	6000	6000
1900	S	3000	3000	3000	3000	3000
	U	6000	6000	6000	6000	6000
1800	S	3000	3000	3000	3000	3000
	U	6000	6000	6000	6000	6000
1700	S	3000	3000	3000	3000	3000
	U	6000	6000	6000	6000	6000
1600	S	3000	3000	3000	3000	3000
	U	6000	6000	6000	6000	6000
1500	S	3000	3000	3000	3000	3000
	U	6000	6000	6000	6000	6000
1400	S	3000	3000	3000	3000	3000
	U	6000	6000	6000	6000	6000
1300	S	3000	3000	3000	3000	3000
	U	6000	6000	6000	6000	6000
1200	S	3000	3000	3000	3000	3000
	U	6000	6000	6000	6000	6000
1100	S	3000	3000	3000	3000	3000
	U	6000	6000	6000	6000	6000
1000	S	3000	3000	3000	3000	3000
	U	6000	6000	6000	6000	6000
900	S	3000	3000	3000	3000	3000
	U	6000	6000	6000	6000	6000
800	S	3000	3000	3000	3000	3000
	U	6000	6000	6000	6000	6000
Mullion Centres		800	900	1000	1100	1200

This table is based on theoretical section properties

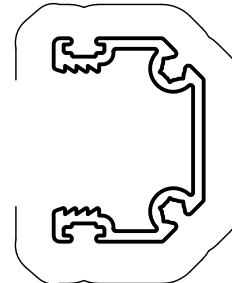
EXTRUSIONS



VISIBLE SURFACE

VM1
SINGLE GLAZED
RAIL

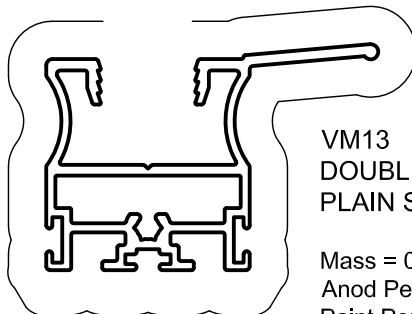
Mass = 0.364 kg/m
Anod Per = 203
Paint Per = 127



VISIBLE SURFACE

VM2
DOUBLE GLAZED
RAIL

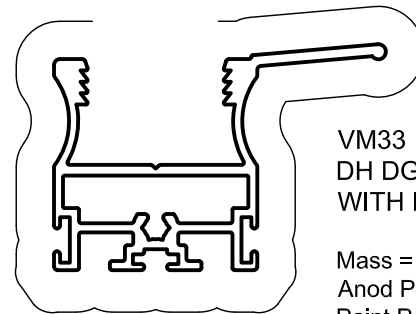
Mass = 0.319 kg/m
Anod Per = 171
Paint Per = 100



VISIBLE SURFACE

VM13
DOUBLE HUNG
PLAIN SASH RAIL

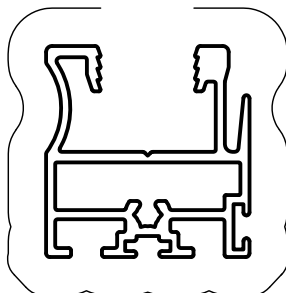
Mass = 0.608 kg/m
Anod Per = 274
Paint Per = 192



VISIBLE SURFACE

VM33
DH DG SASH
WITH HANDLE

Mass = 0.598 kg/m
Anod Per = 248
Paint Per = 189

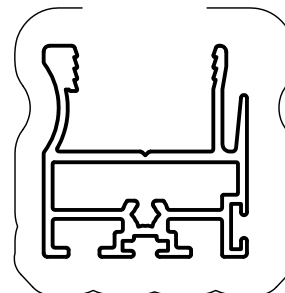


VISIBLE SURFACE

VM3
SINGLE GLAZED
INTERLOCK STILE

Mass = 0.553 kg/m
Anod Per = 236
Paint Per = 168

$I_{xx} = 17.08 \times 10^3 \text{mm}^4$
 $I_{yy} = 15.12 \times 10^3 \text{mm}^4$

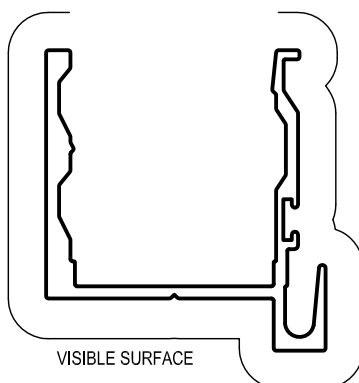


VISIBLE SURFACE

VM4
DOUBLE GLAZED
INTERLOCK STILE

Mass = 0.512 kg/m
Anod Per = 212
Paint Per = 160

$I_{xx} = 16.60 \times 10^3 \text{mm}^4$
 $I_{yy} = 12.10 \times 10^3 \text{mm}^4$

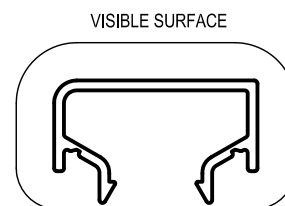


VISIBLE SURFACE

VM32
INTERLOCK MULLION

Mass = 0.601 kg/m
Anod Per = 247
Paint Per = 153

$I_{xx} = 46.20 \times 10^3 \text{mm}^4$
 $I_{yy} = 28.70 \times 10^3 \text{mm}^4$

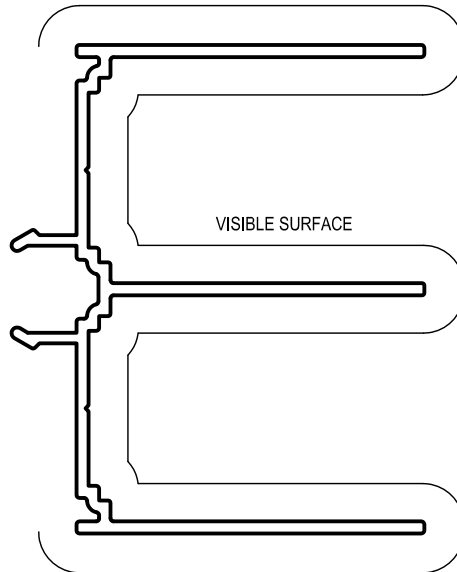


VISIBLE SURFACE

VM42
DH SASH CAPPING

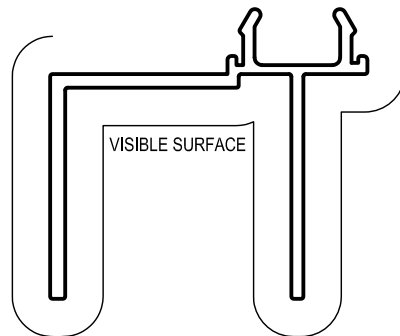
Mass = 0.243 kg/m
Anod Per = 140
Paint Per = 100

EXTRUSIONS



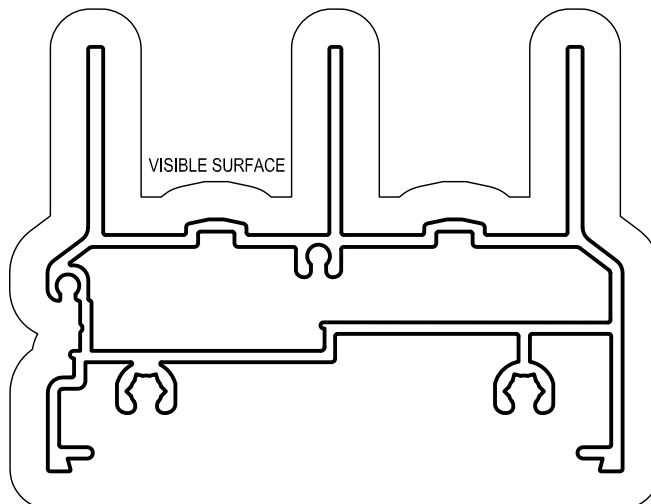
VM40
DH SG JAMB
ADAPTOR

Mass = 0.958 kg/m
Anod Per = 444
Paint Per = 351



VM11
SASH RECEIVER
ADAPTOR

Mass = 0.535 kg/m
Anod Per = 236
Paint Per = 163

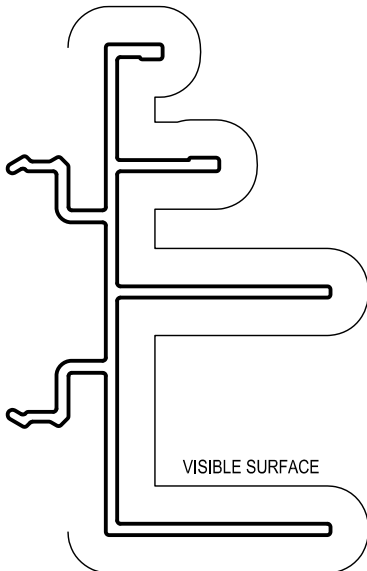


VM10S
76mm SLIDING
WINDOW SILL

Mass = 1.533
Anod Per = 497
Paint Per = 305

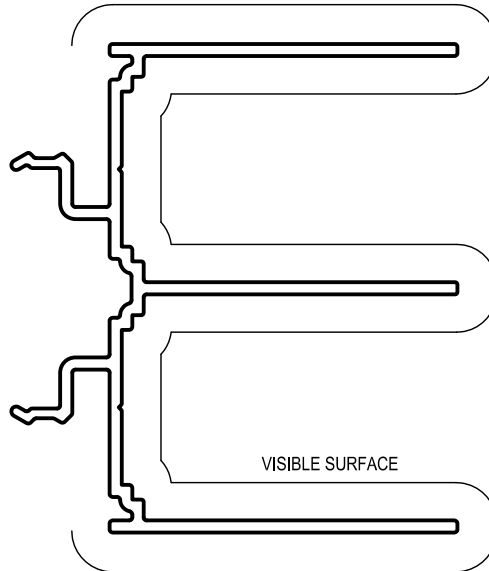
$I_{xx} = 387.17 \times 10^3 \text{mm}^4$
 $I_{yy} = 103.97 \times 10^3 \text{mm}^4$

EXTRUSIONS



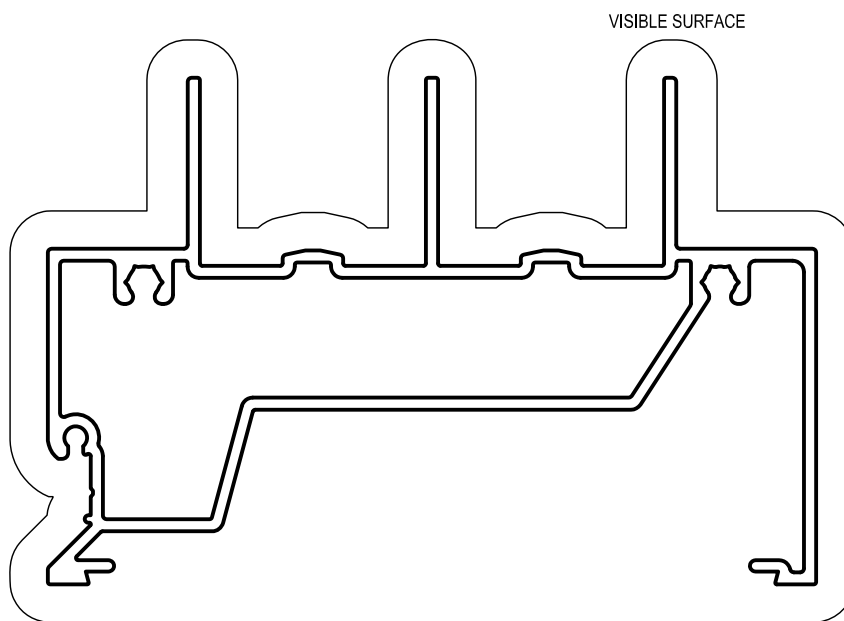
VM27
DG JAMB ADAPTOR

Mass = 0.738 kg/m
Anod Per = 358
Paint Per = 219



VM41
DG DH JAMB ADAPTOR

Mass = 1.047 kg/m
Anod Per = 484
Paint Per = 351

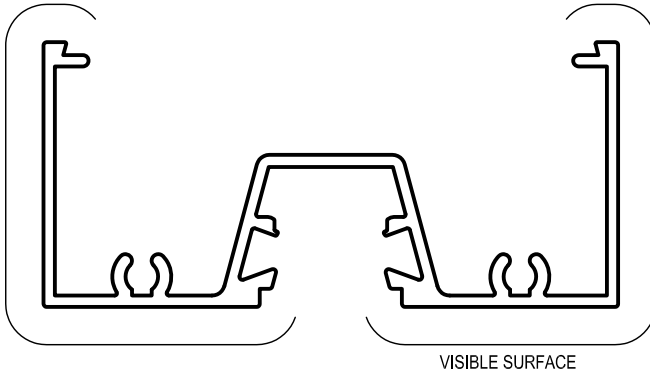


VM34S
101.6mm SILL

Mass = 1.855 kg/m
Anod Per = 563
Paint Per = 365

$I_{xx} = 823.44 \times 10^3 \text{ mm}^4$
 $I_{yy} = 183.98 \times 10^3 \text{ mm}^4$

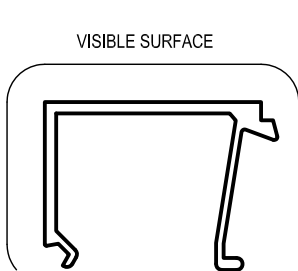
EXTRUSIONS



AS51C
76mm CAPTIVE
MAIN FRAME

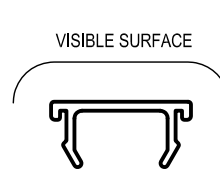
Mass = 0.991 kg/m
Anod Per = 440
Paint Per = 133

$I_{xx} = 251.60 \times 10^3 \text{mm}^4$
 $I_{yy} = 39.20 \times 10^3 \text{mm}^4$



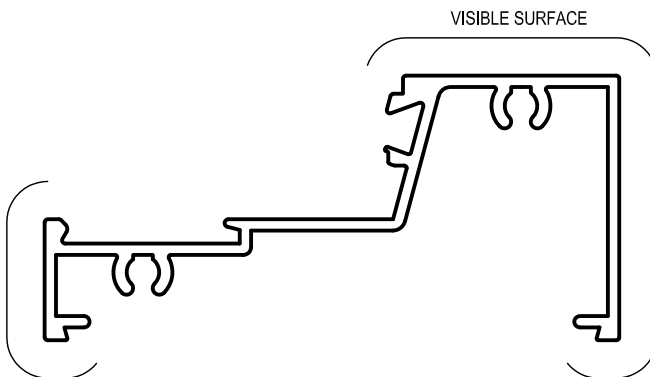
AS53
76mm SILL BEAD

Mass = 0.295 kg/m
Anod Per = 155
Paint Per = 100



AS8C
MULTI PURPOSE
POCKET INFILL

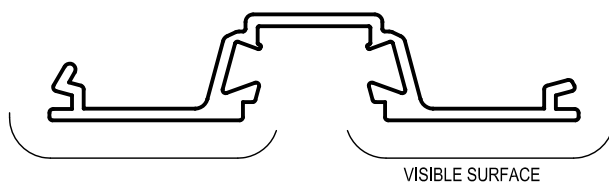
Mass = 0.113 kg/m
Anod Per = 100
Paint Per = 100



AS52C
76mm CAPTIVE SILL

Mass = 0.814 kg/m
Anod Per = 366
Paint Per = 100

$I_{xx} = 205.70 \times 10^3 \text{mm}^4$
 $I_{yy} = 34.80 \times 10^3 \text{mm}^4$

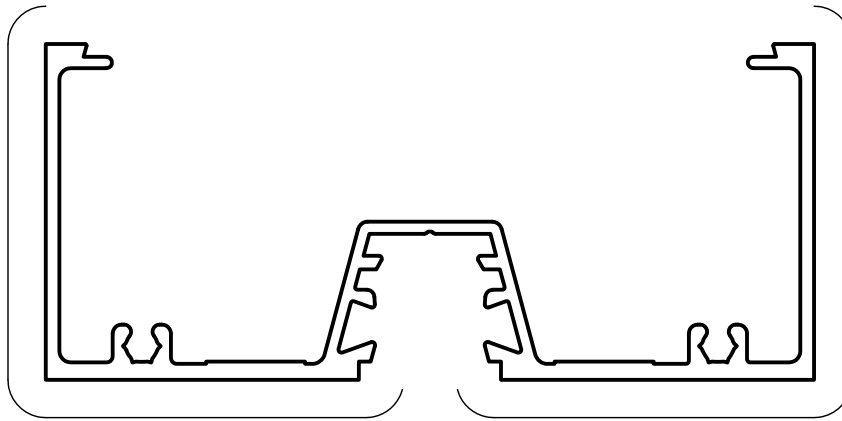


AS554
DERWENT GLAZING
ADAPTOR

Mass = 0.533 kg/m
Anod Per = 233
Paint Per = 100

$I_{xx} = 73.40 \times 10^3 \text{mm}^4$
 $I_{yy} = 4.30 \times 10^3 \text{mm}^4$

EXTRUSIONS

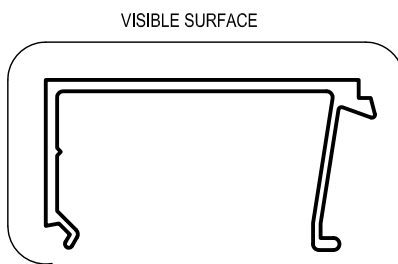


**AS1C
CAPTIVE MAIN FRAME**

Mass = 1.465 kg/m
Anod Per = 540
Paint Per = 182

$I_{xx} = 720.01 \times 10^3 \text{mm}^4$
 $I_{yy} = 102.01 \times 10^3 \text{mm}^4$

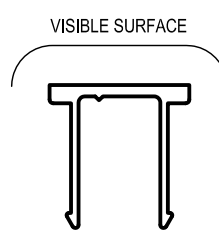
VISIBLE SURFACE



VISIBLE SURFACE

**AS3
SILL BEAD**

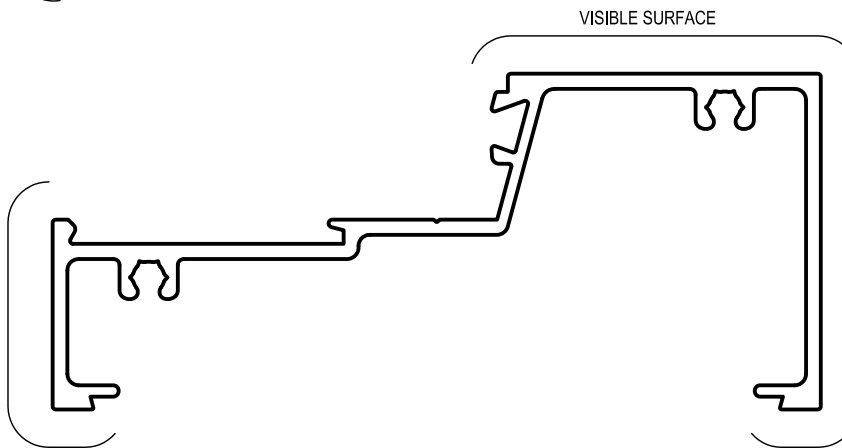
Mass = 0.351 kg/m
Anod Per = 181
Paint Per = 100



VISIBLE SURFACE

**AS8
POCKET FILLER**

Mass = 0.186 kg/m
Anod Per = 109
Paint Per = 100

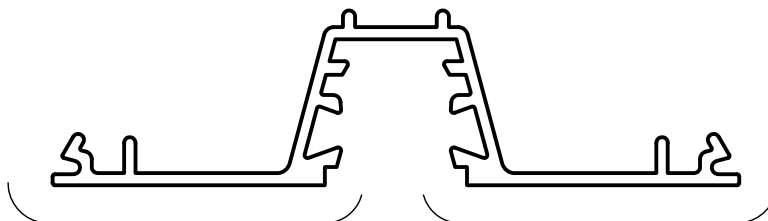


VISIBLE SURFACE

**AS2C
CAPTIVE SILL**

Mass = 1.258 kg/m
Anod Per = 455
Paint Per = 122

$I_{xx} = 630.50 \times 10^3 \text{mm}^4$
 $I_{yy} = 83.00 \times 10^3 \text{mm}^4$



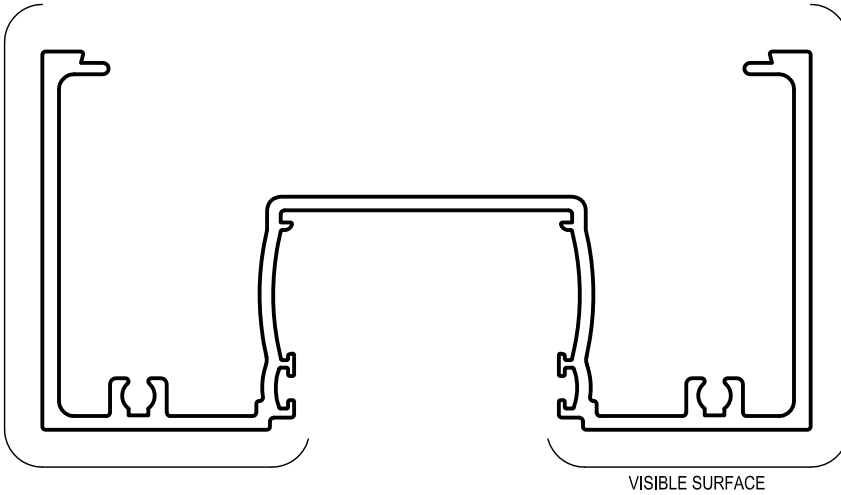
VISIBLE SURFACE

**AS4C
CAPTIVE GLAZING
ADAPTOR**

Mass = 0.778 kg/m
Anod Per = 335
Paint Per = 100

$I_{xx} = 165.31 \times 10^3 \text{mm}^4$
 $I_{yy} = 14.68 \times 10^3 \text{mm}^4$

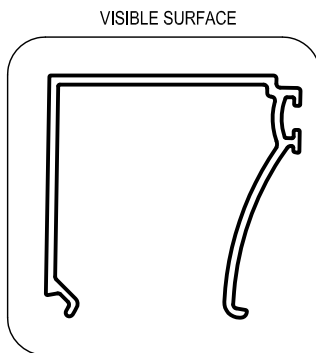
EXTRUSIONS



ECO201
ECOFRAME
100 DG FRAME

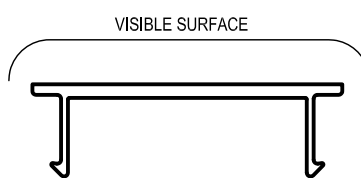
Mass = 1.592 kg/m
Anod Per = 602
Paint Per = 180

$I_{xx} = 858.76 \times 10^3 \text{mm}^4$
 $I_{yy} = 142.04 \times 10^3 \text{mm}^4$



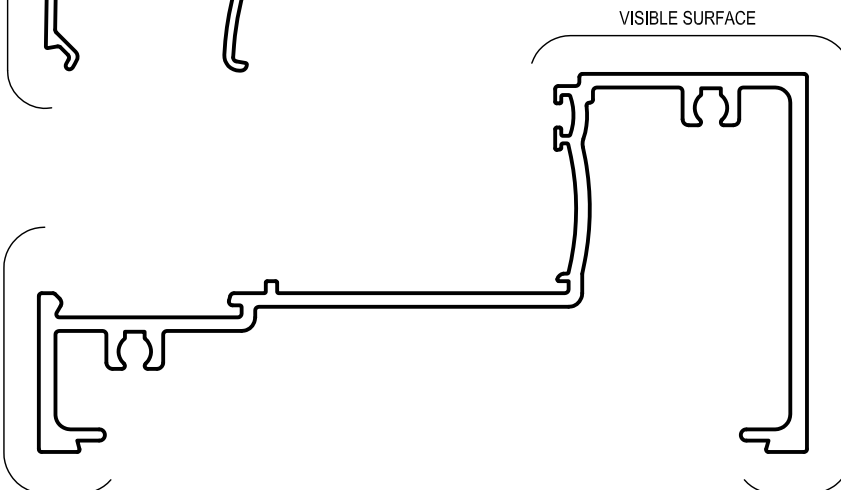
ECO203
ECOFRAME 100
DG SILL BEAD

Mass = 0.334 kg/m
Anod Per = 207
Paint Per = 100



ECO208
100 DG FLUSH INFILL

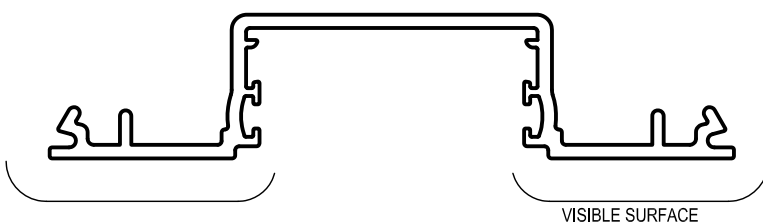
Mass = 0.247 kg/m
Anod Per = 128
Paint Per = 100



ECO202
ECOFRAME 100
DG SILL

Mass = 1.297 kg/m
Anod Per = 490
Paint Per = 122

$I_{xx} = 660.98 \times 10^3 \text{mm}^4$
 $I_{yy} = 108.43 \times 10^3 \text{mm}^4$



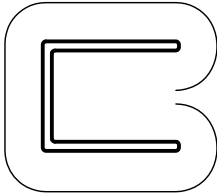
ECO204
ECO 100 DG
POCKET INFILL

Mass = 0.741 kg/m
Anod Per = 320
Paint Per = 100

$I_{xx} = 193.60 \times 10^3 \text{mm}^4$
 $I_{yy} = 14.18 \times 10^3 \text{mm}^4$

EXTRUSIONS

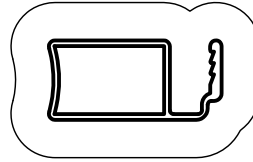
VISIBLE SURFACE



L3455
SINGLE TOP TRACK
(FLYSCREEN CHANNEL)

Mass = 0.158 kg/m
Anod Per = 100
Paint Per = 100

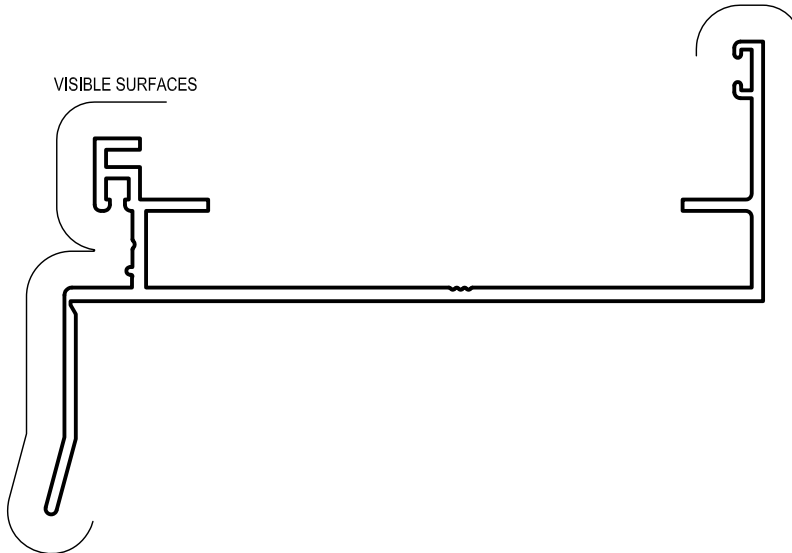
VISIBLE SURFACE



FS2
25mm EXTRUDED
FLYSCREEN

Mass = 0.144 kg/m
Anod Per = 100
Paint Per = 100

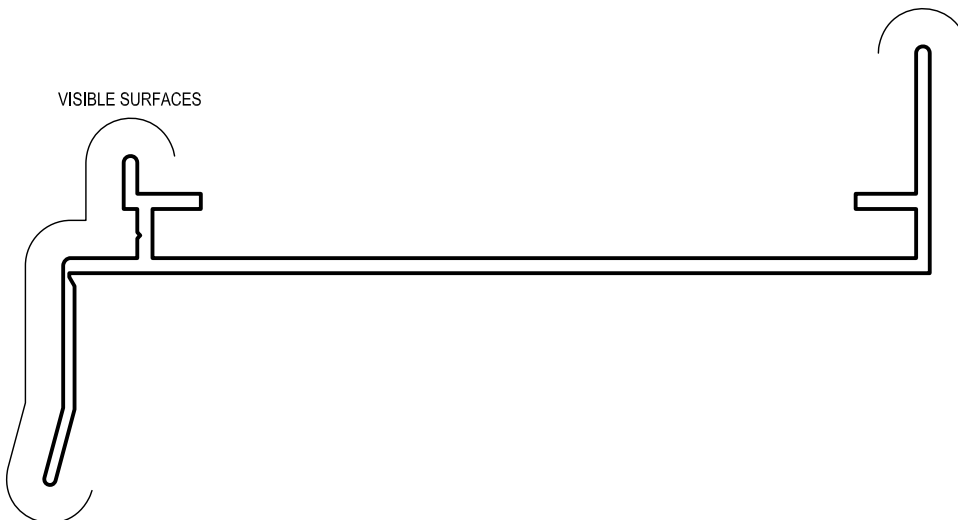
VISIBLE SURFACES



AS506s
76mm SUB SILL

Mass = 0.911 kg/m
Anod Per = 418
Paint Per = 116

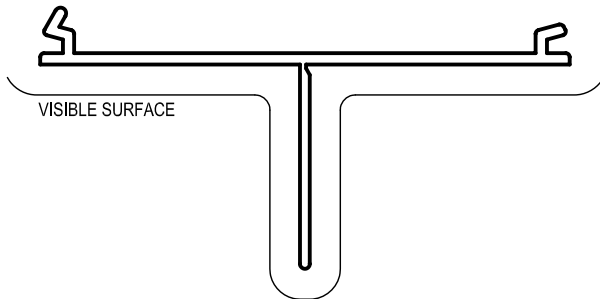
VISIBLE SURFACES



AS106s
SUB SILL

Mass = 1.023 kg/m
Anod Per = 404
Paint Per = 100

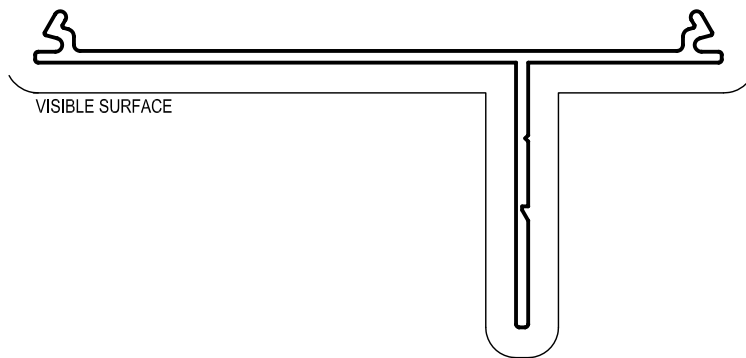
EXTRUSIONS



AS551
76mm FLASHING ADAPTOR

Mass. = 0.432 kg/m
Anod. Per. = 222
Paint Per = 127

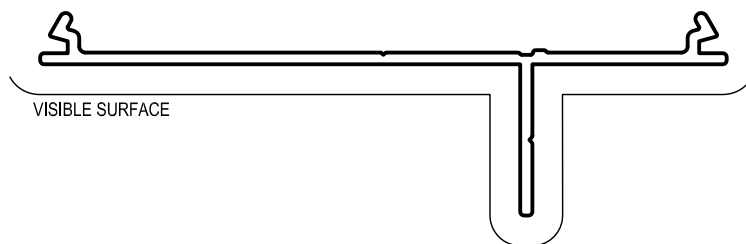
$I_{xx} = 63.50 \times 10^3 \text{ mm}^4$
 $I_{yy} = 8.27 \times 10^3 \text{ mm}^4$



AS21
FLASHING ADAPTOR

Mass = 0.589 kg/m
Anod. Per = 279
Paint Per = 165

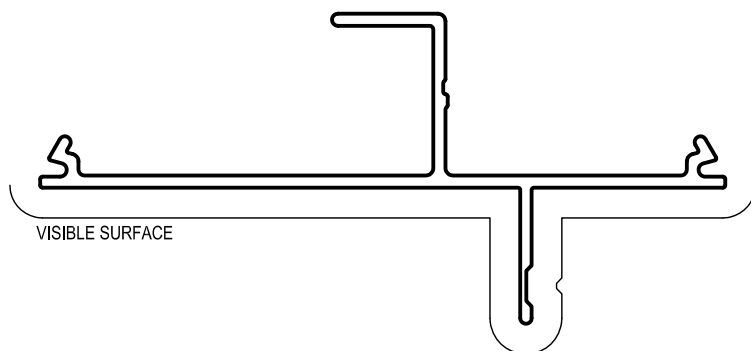
$I_{xx} = 149.10 \times 10^3 \text{ mm}^4$
 $I_{yy} = 20.24 \times 10^3 \text{ mm}^4$



AS221
20mm REVEAL ADAPTOR

Mass = 0.522 kg/m
Anod. Per = 250
Paint Per = 131

$I_{xx} = 141.90 \times 10^3 \text{ mm}^4$
 $I_{yy} = 4.62 \times 10^3 \text{ mm}^4$

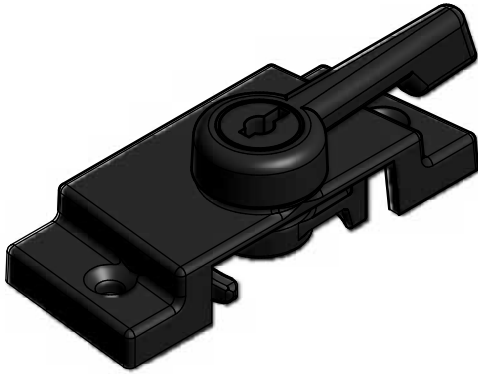


AS221F
REVEAL ADAPTOR

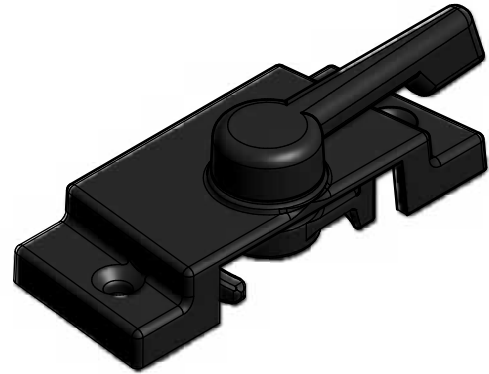
Mass = 0.664 kg/m
Anod. Per = 311
Paint Per = 127

$I_{xx} = 144.20 \times 10^3 \text{ mm}^4$
 $I_{yy} = 16.30 \times 10^3 \text{ mm}^4$

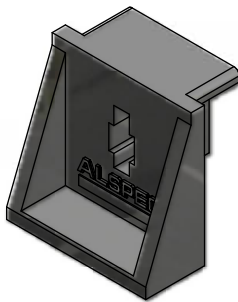
HARDWARE COMPONENTS



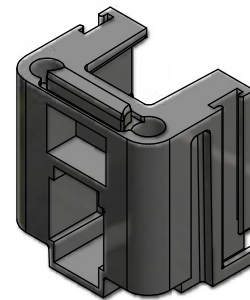
VMA10 TRIMLINE CAMLOCK LOCKING
Part # 378040
Finish: Black
Qty: Each



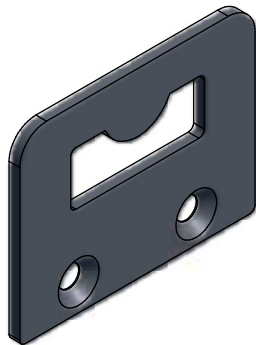
VMA11 TRIMLINE CAMLOCK NON LOCKING
Part # 378041
Finish: Black
Qty: Each



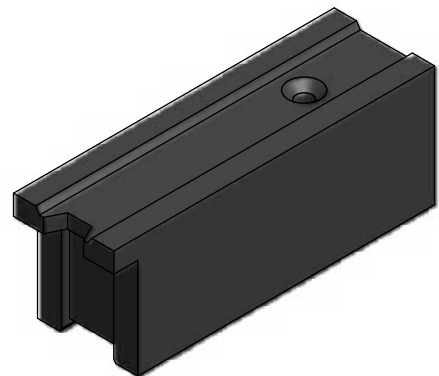
VMA14 DOUBLE HUNG CAM BRACKET
Part # 378122
Finish: Black plastic
Qty: Each



VMA6 MAGI-CORNER
Part # 378036
Finish: Black plastic
Qty: Each

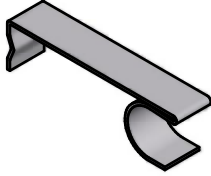


VMA12 DOUBLE HUNG KEEPER DG
Part # 378120
Finish: Black
Qty: Each

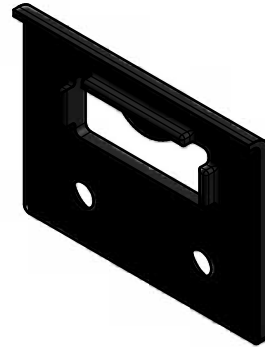


VMA9 WINDOW STOP
Part # 378039
Finish: Black rubber
Qty: Each

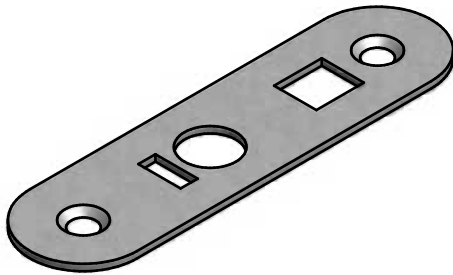
HARDWARE COMPONENTS



TAKE OUT CLIP
Part # 348243
Finish: Galvanised
Qty: Each



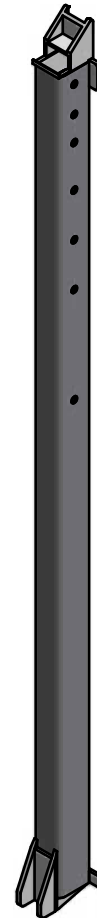
VMA16 DOUBLE HUNG KEEPER SG
Part # 378124
Finish: Black
Qty: Each



SERIES 100 MOUNT PLATE
Part # 348244
Finish: Stainless steel
Qty: Each



PBF48-475-2B FINSEAL
Part # 377300
Finish: Black
Qty: 500 mtrs



SERIES 100 BALANCES
Part # 348150 - 348242 (Refer page 3.2.6)
Finish: Galvanised
Qty: Each

HARDWARE COMPONENTS



GR59 4mm GLAZING CHANNEL	
Part # 376028	Part # 376030
Finish: Black	Finish: Black
Qty: 100mtrs	Qty: mtr



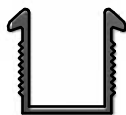
GR60 5mm GLAZING CHANNEL	
Part # 376033	Part # 376037
Finish: Black	Finish: Black
Qty: 100mtrs	Qty: mtr



GR61 6 - 6.38mm GLAZING CHANNEL	
Part # 376044	Part # 376032
Finish: Black	Finish: Black
Qty: 100 mtrs	Qty: mtr



GR62 8mm GLAZING CHANNEL	
Part # 376029	Part # 376034
Finish: Black	Finish: Black
Qty: 100 mtrs	Qty: mtr

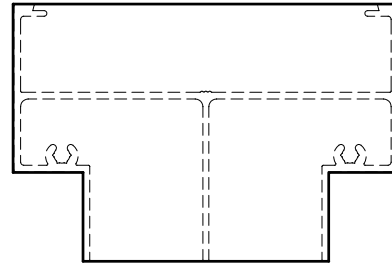
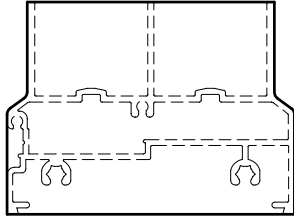


GR63 10~10.38mm GLAZING CHANNEL	
Part # 376035	Part # 376038
Finish: Black	Finish: Black
Qty: 100mtrs	Qty: mtr



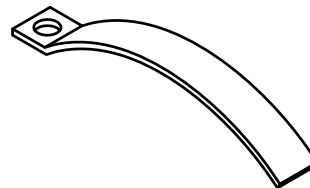
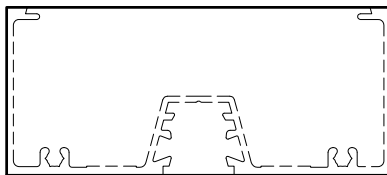
GRS16 16mm GLAZING CHANNEL	
Part # 376093	
Finish: Black	
Qty: 100mtrs	

HARDWARE COMPONENTS



VMA25 SILL JOINT GASKET FOR VM10S
Part # 378135
Colour : Black (034) or Grey (036)
Qty : Each

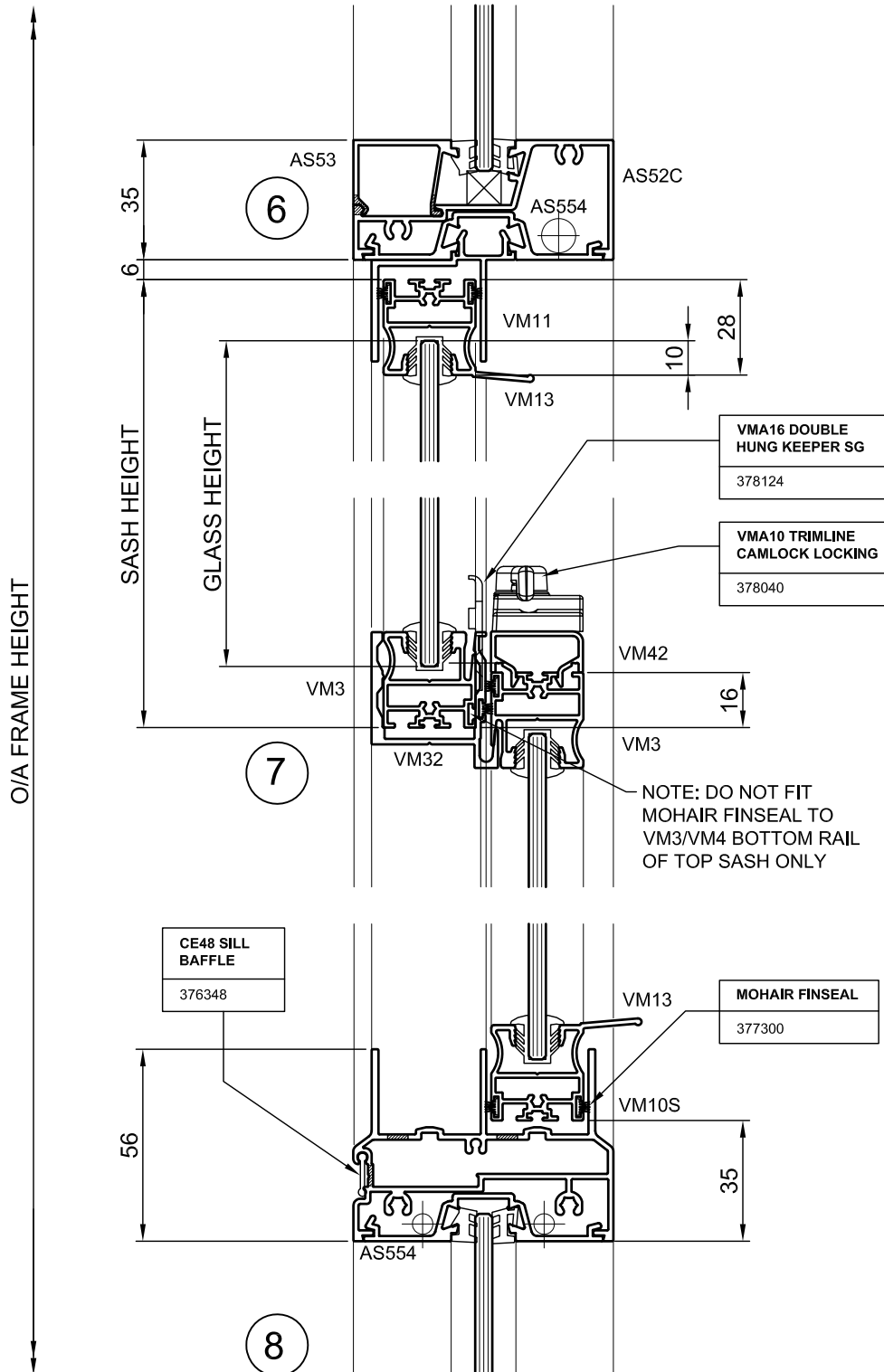
VMA22 JOINT GASKET FOR VM28 & VM34S
Part # 378131
Colour : Black (034) or Grey (036)
Qty : Each



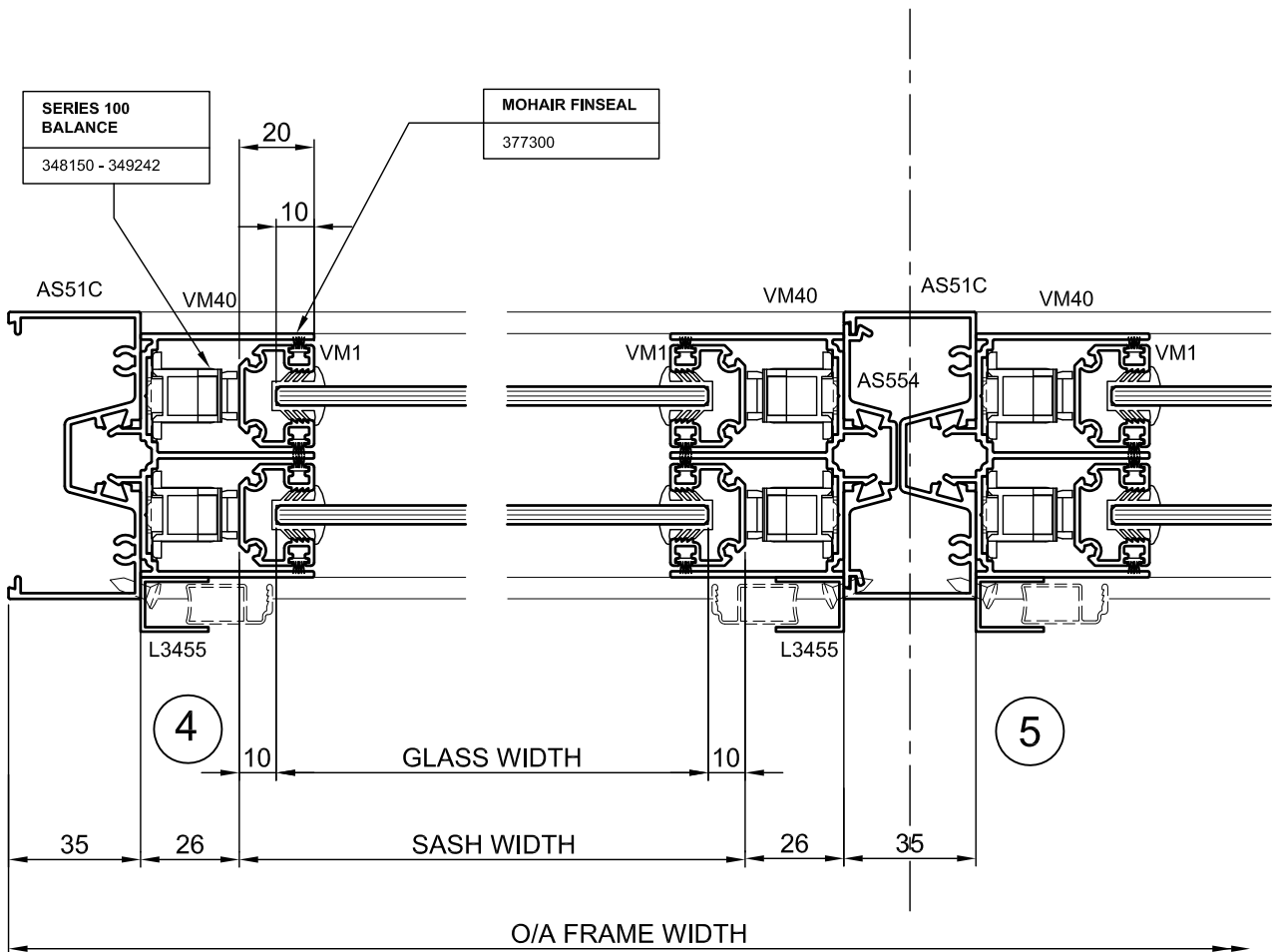
HEAD JOINT GASKET (All head details)
Part # 385512
Colour : Black (034) or Grey (036)
Qty : 45.7 Metre roll

FLYSCREEN RETAINER CLIP
Part # 320019
Colour : Stainless Steel
Qty : 200 per Bag

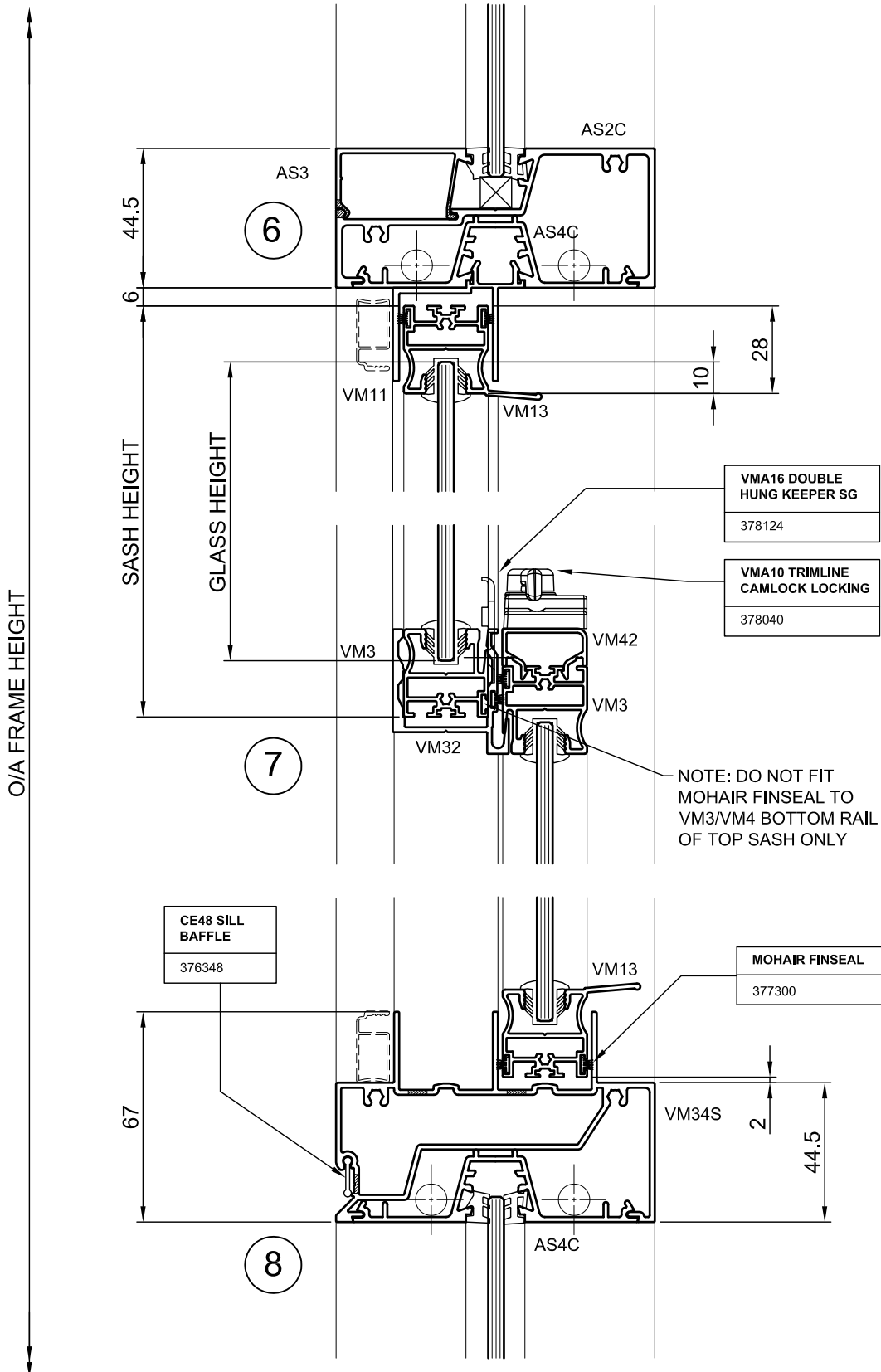
VERTICAL DETAIL OF 76mm FRAMING HIGHLITE/LOWLITE



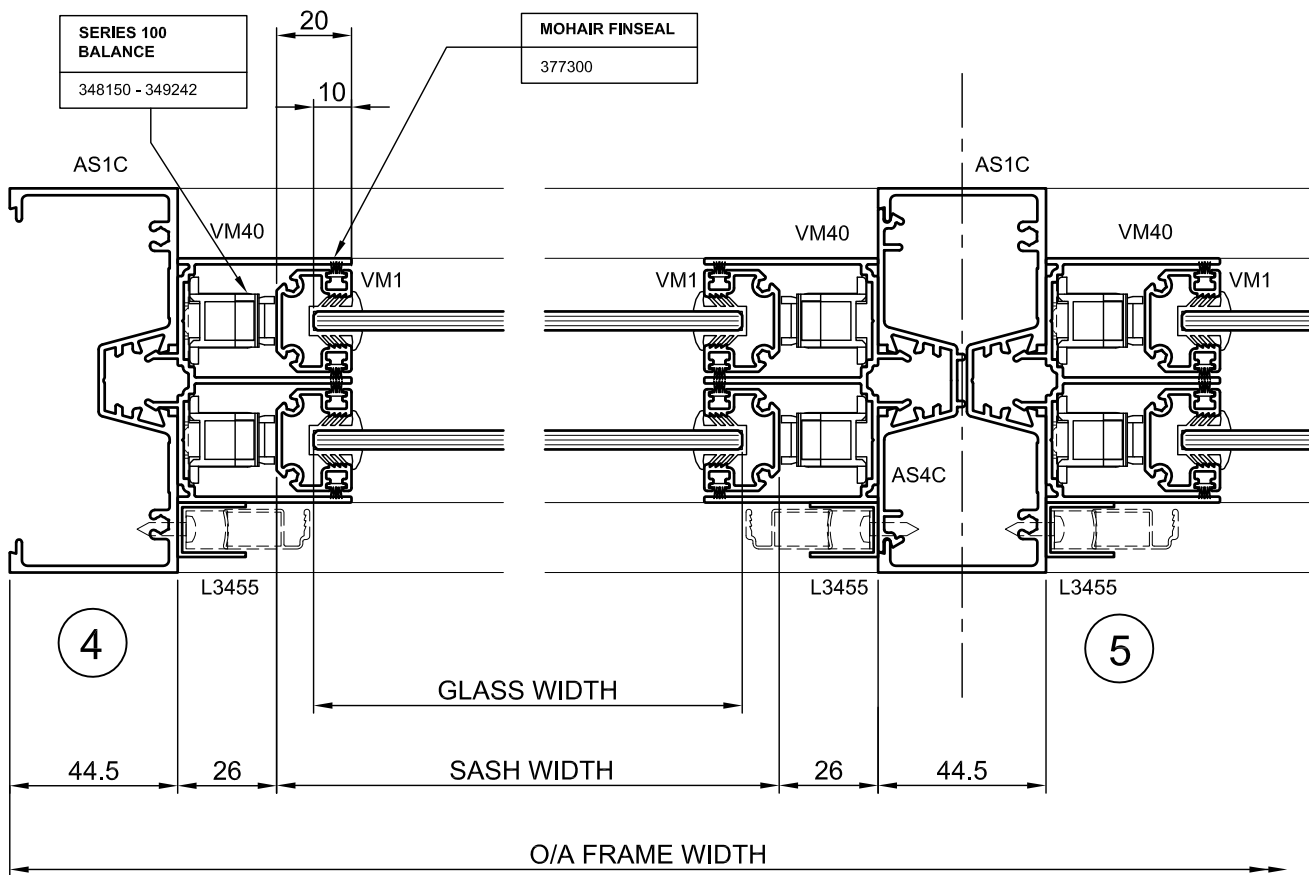
HORIZONTAL MULLION DETAIL OF 76mm FRAMING



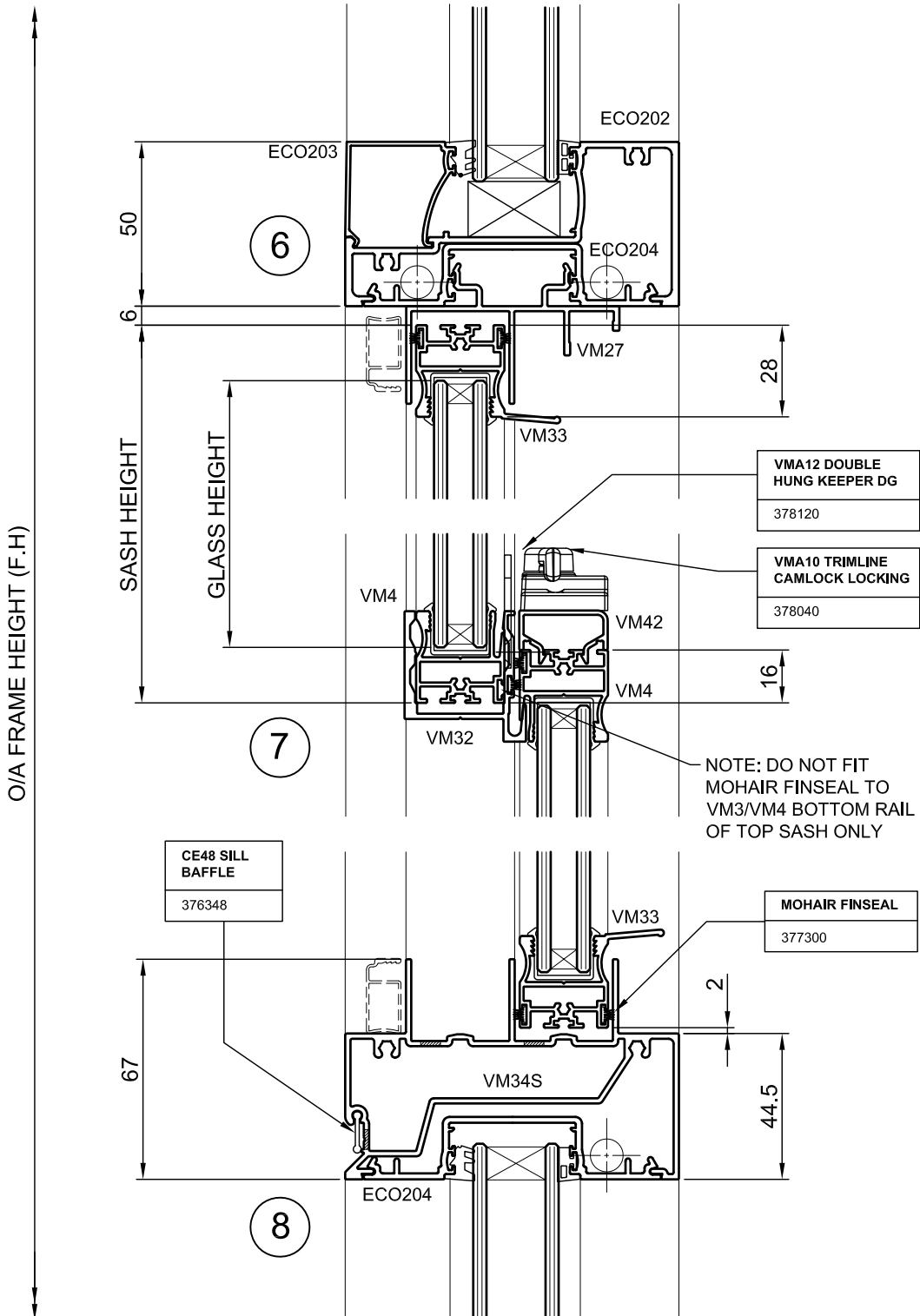
VERTICAL DETAIL OF 101.6mm FRAMING HIGHLIGHTE/LOWLITE



HORIZONTAL MULLION DETAIL OF 101.6mm FRAMING



VERTICAL DG DETAIL OF 101.6mm FRAMING HIGHLITE/LOWLITE



HORIZONTAL DG JAMB & MULLION DETAIL

