



● aluminium & plastics systems

AP

Polyamide Aluminium

AP 300 Bi Fold Door System

A-./.
B
C

Revisions

D
E
F



● aluminium & plastics systems

AP 300 Bi Fold Door System

<u>Index</u>	<u>Page No.</u>
<u>Specification</u>	
Scope	APB-1:1:1
Performance & Size Limitations	APB-1:2:1
Explanation of lxx and lyy values	APB-1:3:1
<u>Parts List</u>	
Profile Identification Chart	APB-2:1:1
Full Size Profiles	APB-2:2:1
Accessories	APB-2:3:1 to APB-2:3:5
<u>General Arrangements</u>	
Bi Fold Arrangements (Open In)	APB-3:1:1
Bi Fold Arrangements (Open Out)	APB-3:1:2
<u>Perimeter Fixing Details</u>	
Door Head (Open In - Glaze In)	APB-3:2:1
Door Cill (Open In - Glaze In) Fully Framed	APB-3:2:2
Door Jamb (Open In - Glaze In)	APB-3:2:3
Door Jamb (Open in Lock)	APB-3:2:3a
Door Head (Open Out - Glaze In)	APB-3:2:4
Door Cill (Open Out - Glaze In) Fully Framed	APB-3:2:5
Door Jamb (Open Out - Glaze In)	APB-3:2:6
Door Jamb (Open Out Lock)	APB-3:2:6a
Door Jamb Glazed into Curtain Wall Frame	APB-3:2:7
Door Head Glazed into Curtain Wall Frame	APB-3:2:8
Door Jamb Glazed into Curtain Wall Frame Open In	APB-3:2:9
Door Head Glazed into Curtain Wall Frame Open In	APB-3:2:10
<u>Glass & Glazing</u>	
Glazing Support	APB-4:1:1
Glazing Guide	APB-4:2:1
<u>Fabrication Details</u>	
3/3/0- 3/0/3 (Open In) Fabrication Formulas (Fully Framed)	APB-5:1:1
3/3/0- 3/0/3 (Open Out) Fabrication Formulas (Fully Framed)	APB-5:1:2
4/3/1- 4/1/3 (Open In) Fabrication Formulas (Fully Framed)	APB-5:1:3
4/3/1- 4/1/3 (Open Out) Fabrication Formulas (Fully Framed)	APB-5:1:4
5/5/0- 5/0/5 (Open In) Fabrication Formulas (Fully Framed)	APB-5:1:5
5/5/0- 5/0/5 (Open Out) Fabrication Formulas (Fully Framed)	APB-5:1:6
6/5/1- 6/1/5- 6/3/3 (Open In) Fabrication Formulas(Fully Framed)	APB-5:1:7
6/5/1- 6/1/5- 6/3/3 (Open Out)Fabrication Formulas(Fully Framed)	APB-5:1:8

Date 10.03.2014

Page

APB-Index:1

Rev. A

Date 12.12.18



● aluminium & plastics systems

AP 300 Bi Fold Door System

Index - (Cont)

Fabrication Details - (Cont)

Page No.

Drainage Details - Open Out Door	APB-5:2:1
Drainage Details - Open In Door	APB-5:2:2
Non Adjustable Hinge Prep	APB-5:3:1
Roller Hinge Prep	APB-5:3:2
AP 303-304 Door Leaf Crimping Prep	APB-5:4:1
AP 301-302 Frame Corner Joint	APB-5:4:2
AP 303-304 Door Leaf Mechanical Cleat Corner Prep	APB-5:4:3
Multi Point Lock Prep	APB-5:5:1
Shoot Bolt Gear Box Prep	APB-5:6:1
Shoot Bolt Bar and Cone Prep	APB-5:6:2
Adjuster Block Position and Fixing on Hinge Side	APB-5:7:1
Adjuster Block Position and Fixing on Door Lock Side	APB-5:7:2
AP 305-305 Adjuster End Prep	APB-5:8:1
Fitting the AP 306 Rebate Adaptor to the Sash	APB-5:9:1
Fitting the AP 306 Rebate Adaptor to the Door Frame	APB-5:9:2
Opening Sequence	APB-6:1:1
Ixx, Iyy Values	APB-7:1:1
Installation	APB-8:1:1
Finishing Off	APB-9:1:1
Routine Maintenance	APB-10:1:1
Dual Colour Order Forms	APB-11:1:1 & APB-11:1:2

A- mechanical cleat page added APB-5:4:3

B

C

Revisions

Date 10.03.2014

Page

APB-Index:2

Rev. A

Date 12.12.18



● aluminium & plastics systems

AP 300 Door System

Scope

All Doors shall be manufactured from the thermally broken Polyamide Window & Door Systems as supplied by Aluminium & Plastics Systems Limited

Materials

Aluminium Profiles are of extruded aluminium alloy 6060 or 6063 -T5 or T6 complying with the recommendations of BS EN 12020-2:2001 / BS 7559:2001

Assembly

All frame & opening profiles are mitre cut, with crimped and mechanically jointed aluminium corner cleats

Screws & Fixings

Please ensure only Stainless Steel Austenitic A2/A4 screws & fixings are used in APS products.

Recommended Hardware

Doors

Multi Point Locking Gear operated by lever handles
Shoot Bolts
APS hinges, top and bottom guides

Finishes

Polyester Powder Coating

All exposed surfaces shall be polyester powder coated to BS EN 12206 by approved applicators. The average film thickness to be 60 microns.

Marine Grade Painted Projects

As part of the paint warranty offered by the powder coating supplier, APS require all exposed aluminium edges to be touched in with paint to form a protective barrier, EG drainage holes, slots or cut edges of bead within the system used.

Standard White is Hipca RAL 9910 Satin

Protection & cleaning of finished materials

The responsibility for the protection & cleaning of the materials shall be that of the sub contractor until the installation is complete. The main contractor is responsible for the final clean down & protection thereafter. On going cleaning of finishes & maintenance of any hardware should be in accordance with manufactures recommendations to ensure guarantee validity

Profile Suite

The range of profiles available are as illustrated on page APB-2:1:1 of this manual. It is the policy of APS to revise, add too and improve the profile suite. This may be done without prior notice

Installation

Installation shall be carried out in accordance both the manufactures instructions & Architects details. The SUB Contractor shall be responsible for checking & re-adjusting if required

APS - This data sheet is issued subject to the condition that it shall not be reproduced without written consent from Aluminium and Plastics Systems Limited.

Date 10.03.14



● aluminium & plastics systems

Scope AP 300 Bi Fold Door System

Page **APB-1:1:1**

Rev B Date 17.08.20

D
E
F

A EN numbers added & notes changes
B. Screw & Fixings note added
C

Revisions



● aluminium & plastics systems

AP 300 Door System

Weather performance

The door systems are designed to comply with the current UK legislation, including the following :-

BS EN 1026: 2000 Air Permeability:

BS EN 1027: 2000 Watertightness:

BS EN 12211: 2000 Resistance to Wind Load:
1200 Pa

Thermal performance

The door system is designed to comply with the current UK Building Regulations, when combined with an appropriate glazing specification.

Thermal transmittance of the window & doors will vary with size and glazing specification.

Glazing

The door system is designed to accommodate 28-30mm, 32-34mm & 42, 44, 46 & 48mm double & triple glazed units.

The glazing is secured by Captive & Wedge gaskets fitted into the aluminium profiles & glazing beads.

Limitations

<u>Maximum Door Leaf Size / Weight</u>			
Door Leaf Configuration	Max Leaf Width (mm)	Max Leaf Height (mm)	Max Leaf Weight (Kg)
Hinged Door	1000	2400	100 Kg

<u>Mimimum Door Leaf</u>			
Door Leaf Configuration	Min Leaf Width (mm)	Min Leaf Height (mm)	*For a smaller door please speak to Technical Dept
Hinged Door	700	1900*	

APS - This data sheet is issued subject to the condition that it shall not be reproduced without written consent from Aluminium and Plastic Systems Limited.



● aluminium & plastics systems

Performance
AP 300 Bi Fold Door System

Scale NA Date 10.03.14

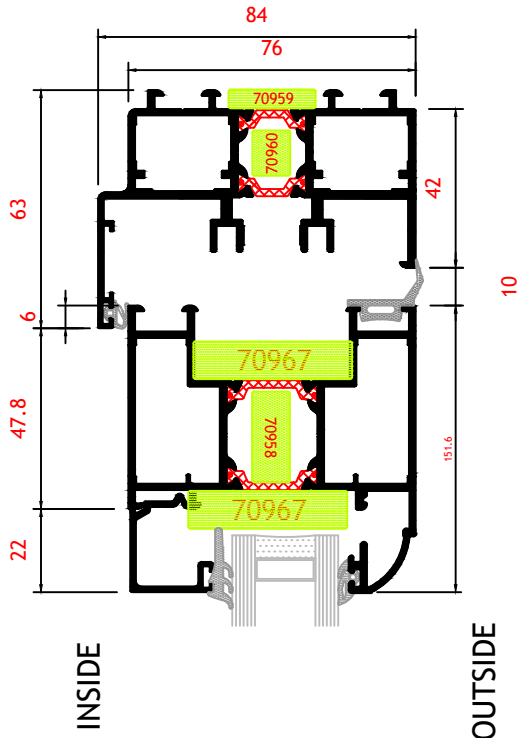
Page **APB-1:2:1**

Rev. A Date 16.09.21

D E F

A - Glazing sizes updated
B
C

Revisions



Weather performance

The door systems are designed to comply with the current UK legislation, including the following :

Air permeability - BS 6375 : Pt 1 : 2009
EN 1026:2000, EN 12207: 2000

Water tightness - BS 6375 : Pt 1 : 2009
EN 1027:2000, EN 12208:2000

Wind resistance - BS 6375 : Pt 1 : 2009
EN 12211:2000, EN 12210:2000

Thermal performance

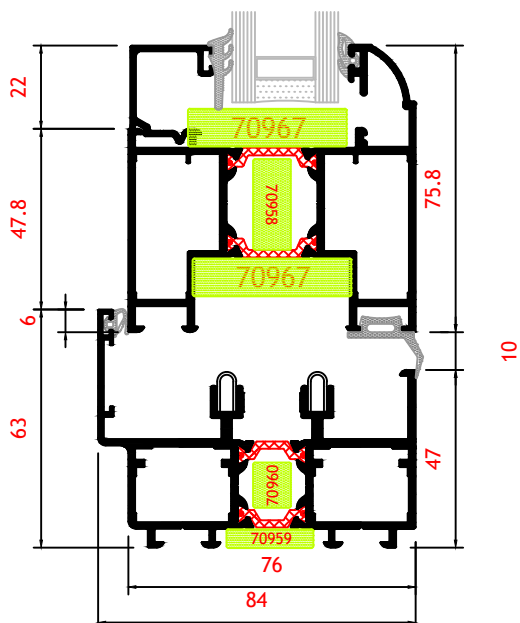
The door system is designed to comply with the current UK Building Regulations, when combined with an appropriate glazing specification. Thermal transmittance of the window & doors will vary with size and glazing specification. Values from $U = 1.1 \text{ Wm}^2/\text{k}$ are achievable with suitable triple glazed units

Glazing

The door system is designed to accommodate 28 - 48mm double & triple glazed units and is internally glazed. The glazing is secured by Captive & Wedge gaskets fitted into the aluminium profiles & glazing beads

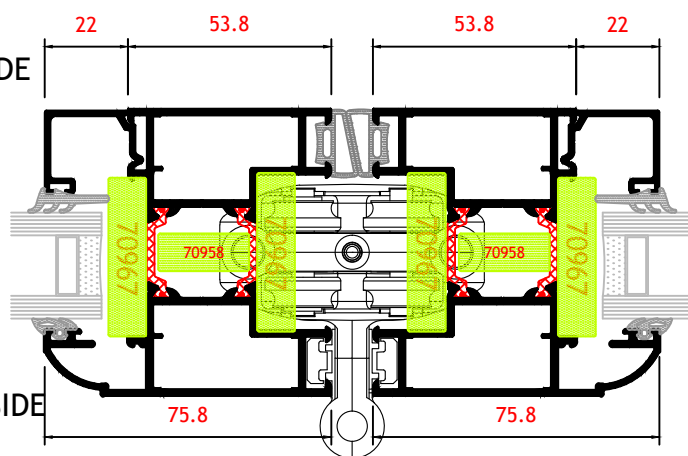
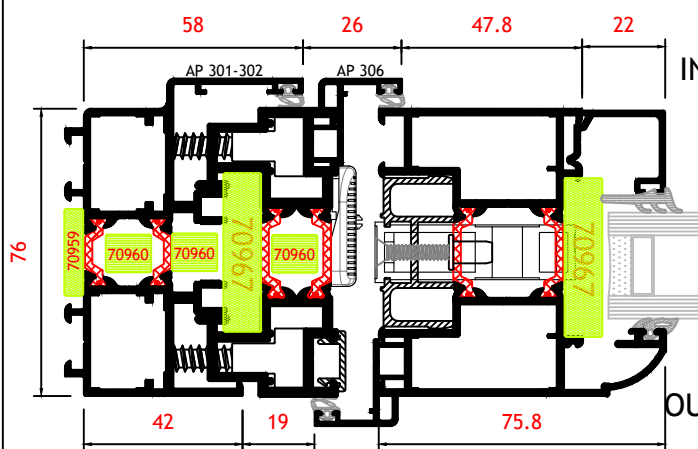
Configurations

These include 3, 4, 5 & 6 doors, open in or open out



Maximum Door Leaf Size / Weight

Door Leaf Configuration	Max Leaf Width (mm)	Max Leaf Height (mm)	Max Leaf Weight (Kg)
Hinged Door	1000	2400	100 Kg



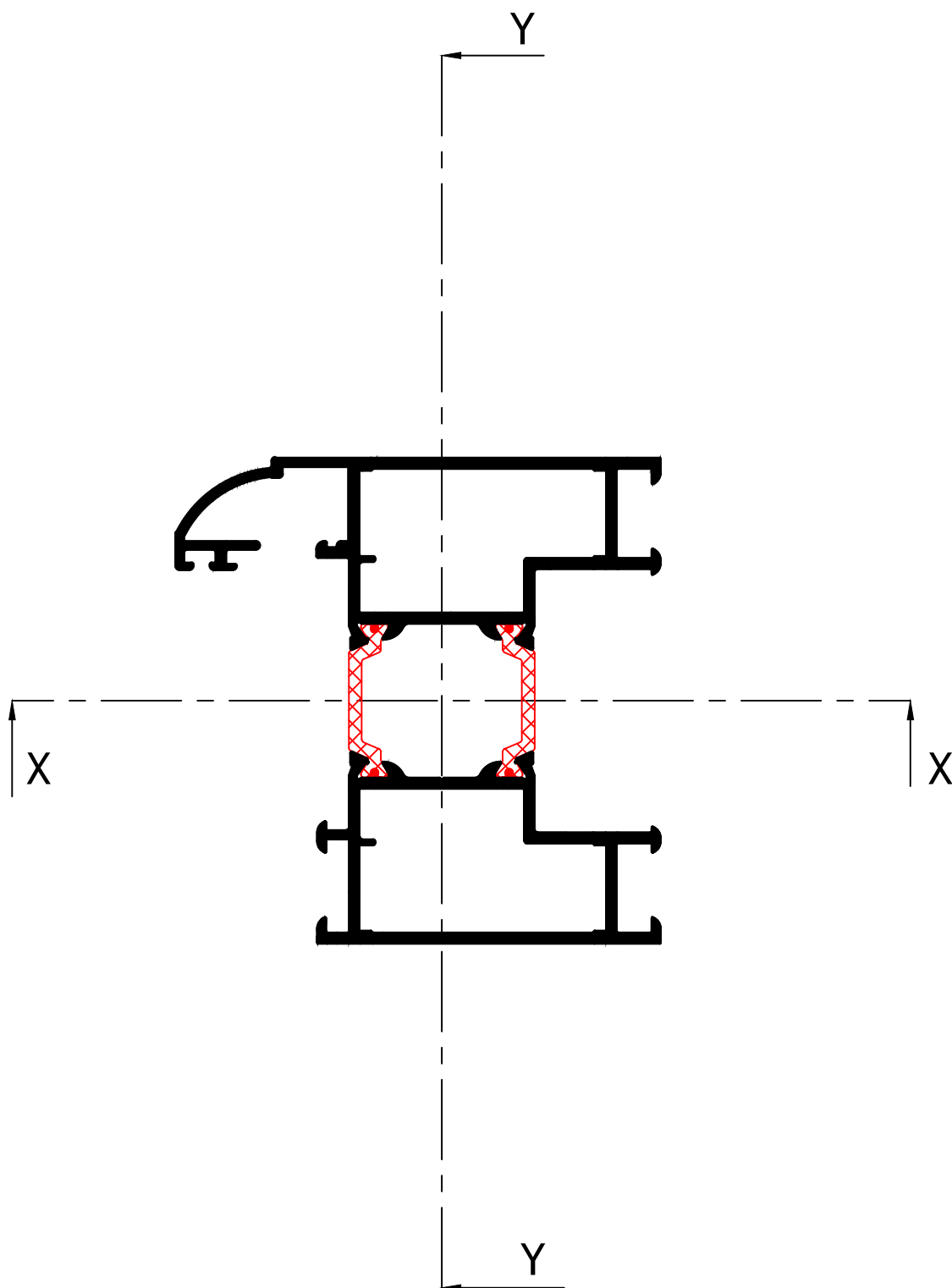
N.B - This data sheet is issued subject to the condition that it shall not be reproduced without written consent from Aluminium and Plastic Systems Limited.

Scale NA Date 01.02.24

Page **APB-1:4:1**

Rev. - Date -

Revisions



Explanation of I_{xx} and I_{yy} Values

AP 300 Bi Fold Door System



● aluminium & plastics systems

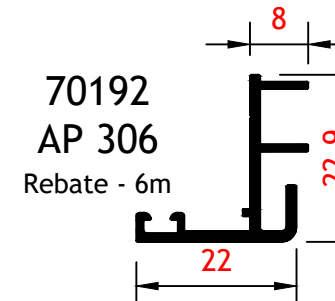
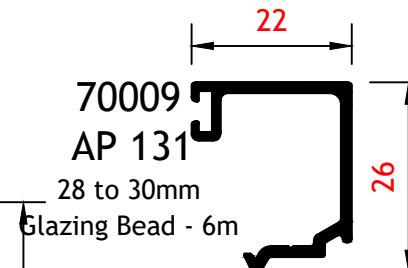
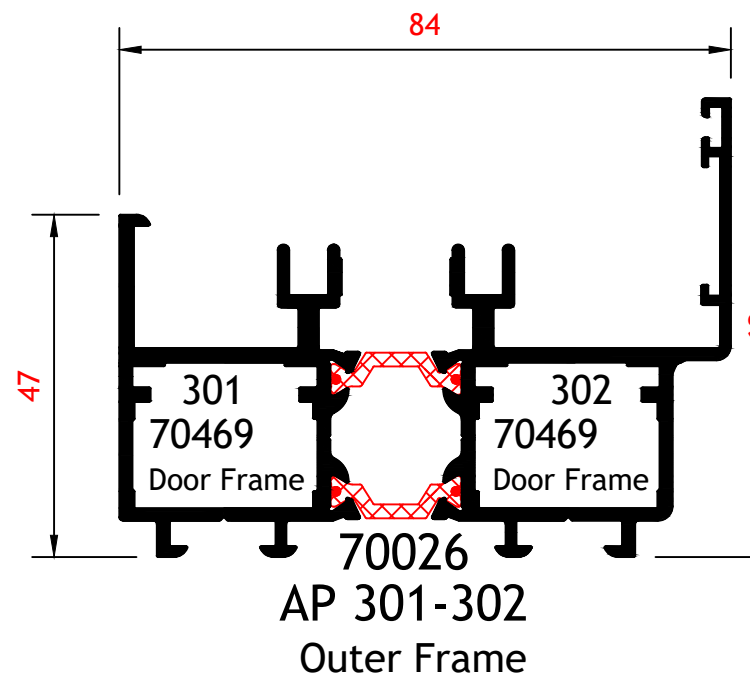
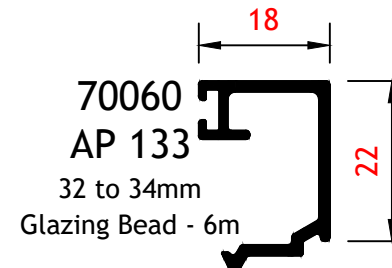
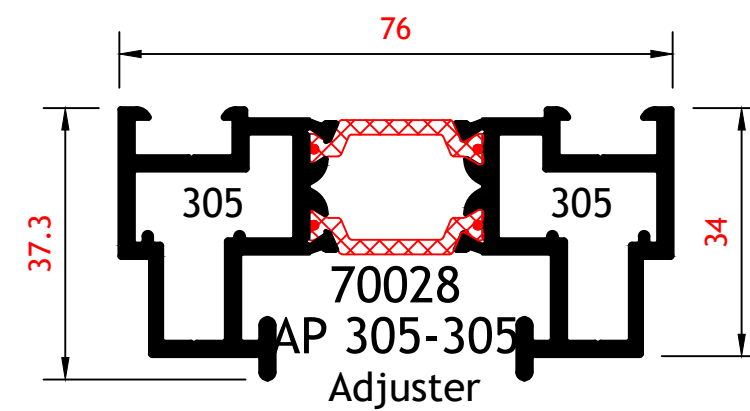
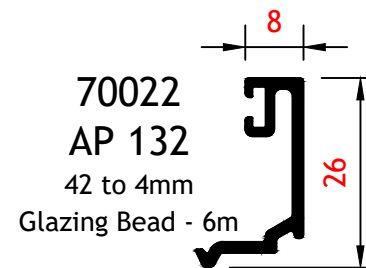
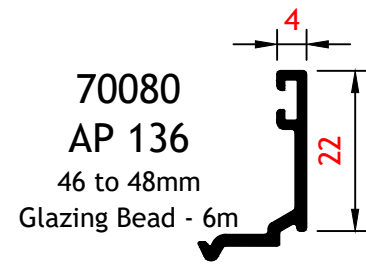
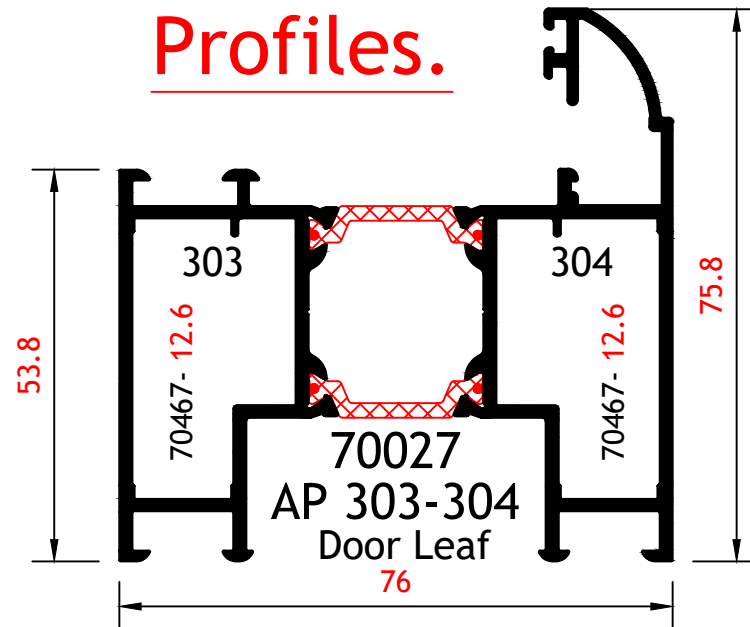
Scale 1:1 Date: 10.03.14

Page **APB-1:4:1**

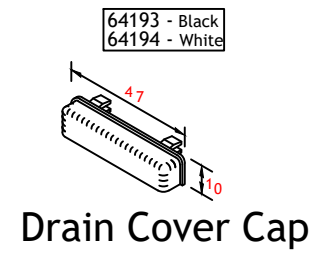
Rev - Date -

AP 300 Door System.

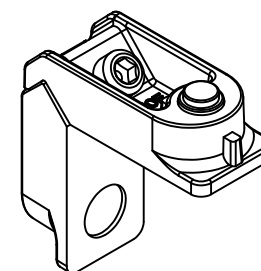
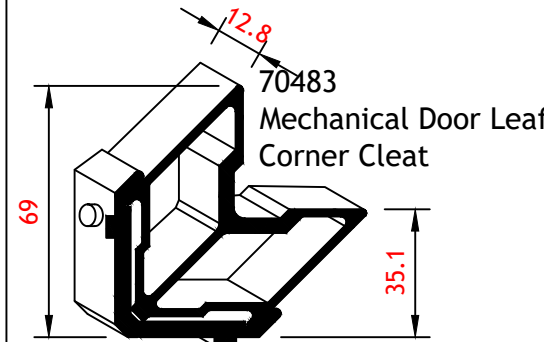
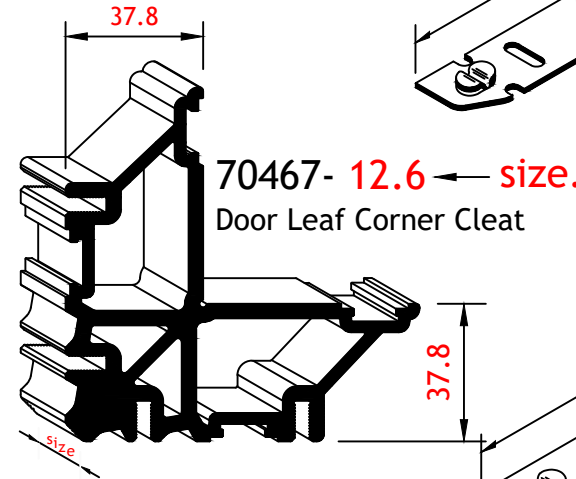
Profiles.



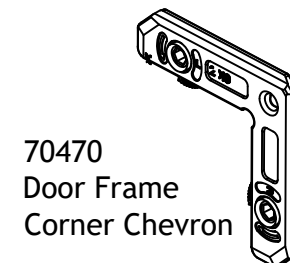
Accessories.



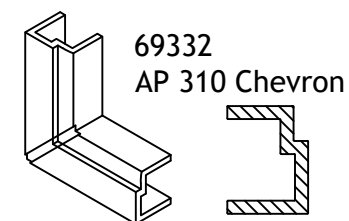
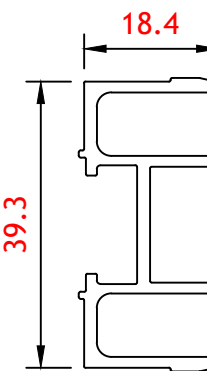
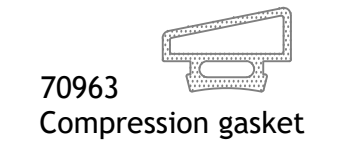
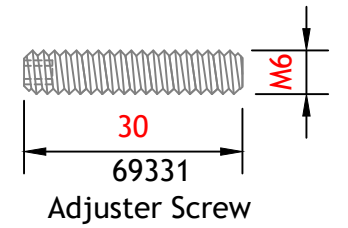
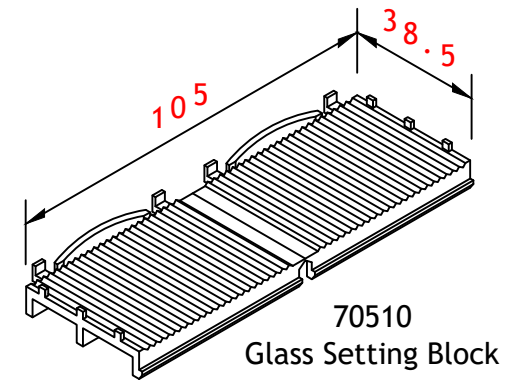
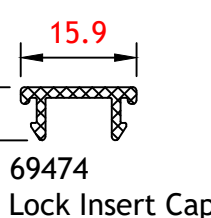
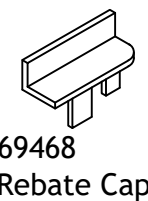
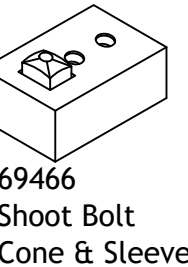
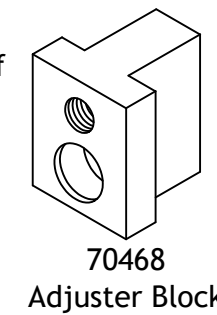
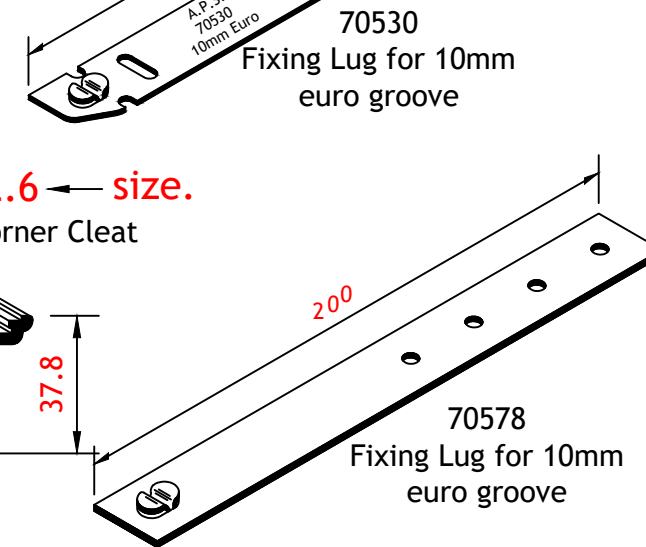
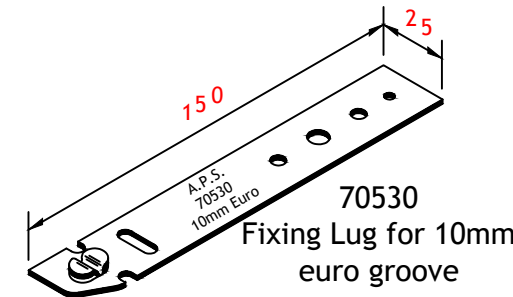
Drain Cover Cap



70469 Mechanical Door Frame Corner Cleat



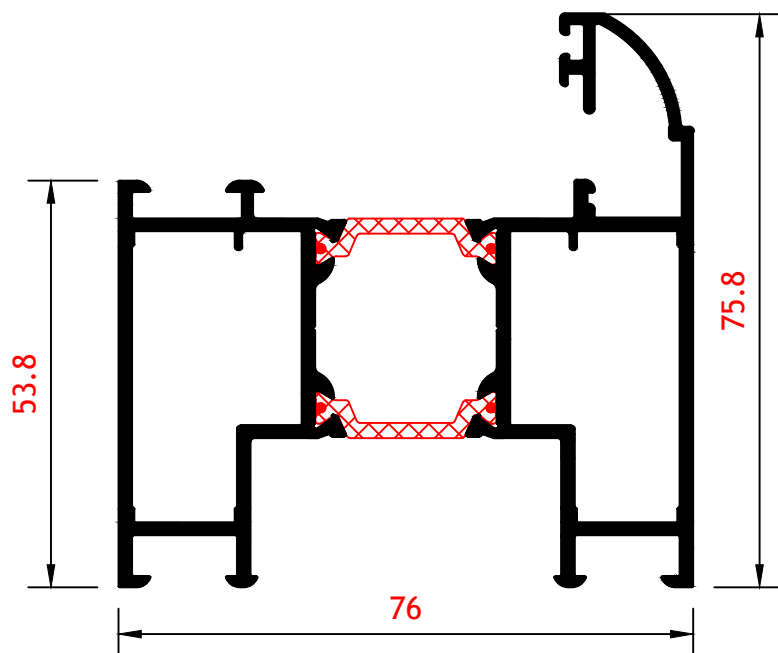
70470 Door Frame Corner Chevron



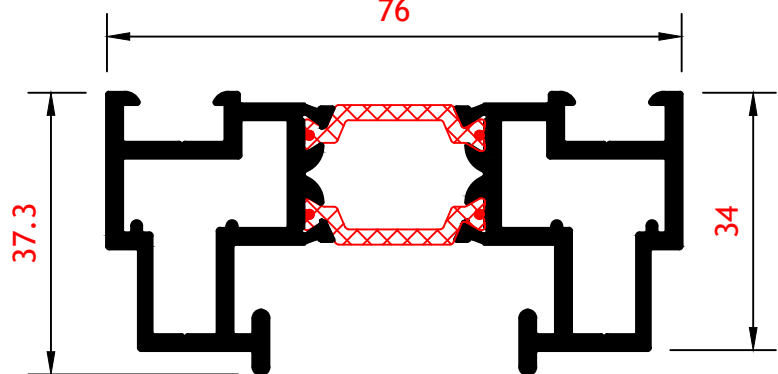
Scale 1:1/NTS Date 10.03.14

Page **APB-2:1:1**

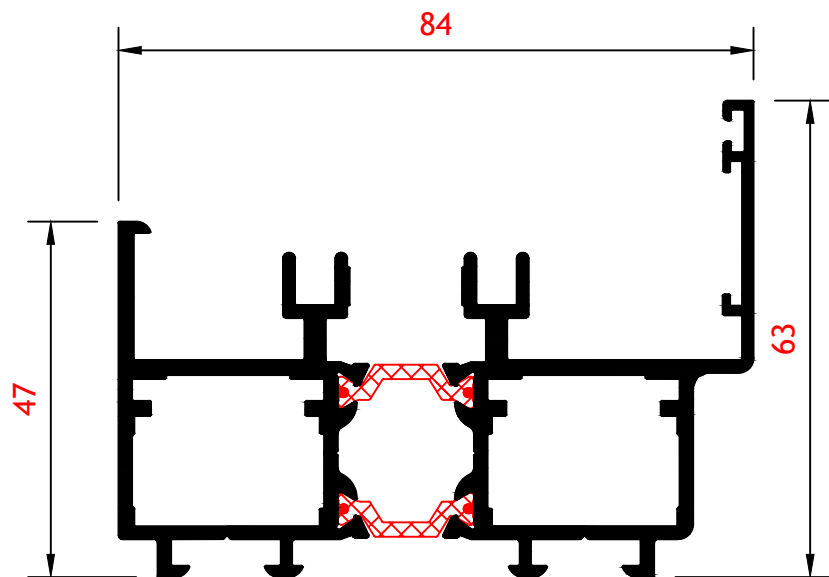
Rev B Date 01.02.23



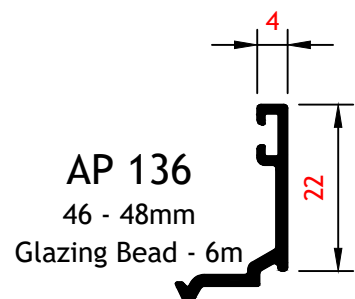
AP 303-304
Door Leaf



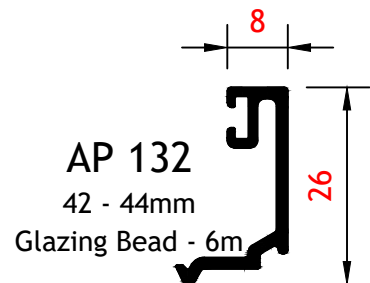
AP 305-305
Adjuster



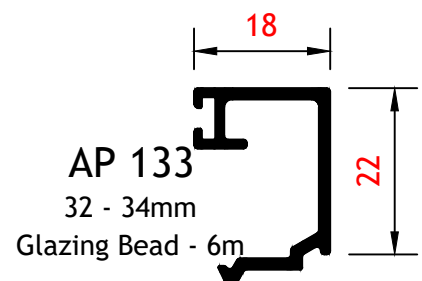
AP 301-302
Outer Frame



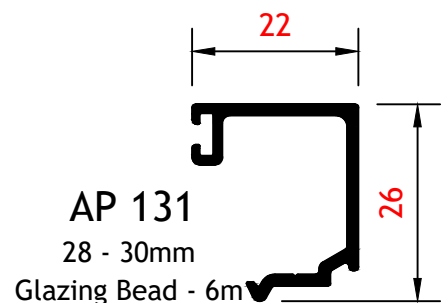
AP 136
46 - 48mm
Glazing Bead - 6m



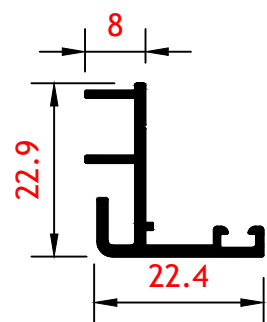
AP 132
42 - 44mm
Glazing Bead - 6m



AP 133
32 - 34mm
Glazing Bead - 6m



AP 131
28 - 30mm
Glazing Bead - 6m



AP 306
Rebate

A- AP 136 glazing bead added

B

C

D

E

F

Revisions

D

E

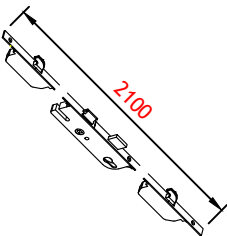




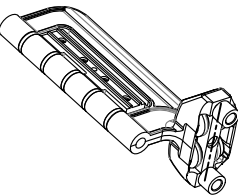
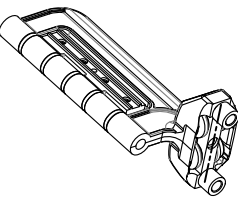
F

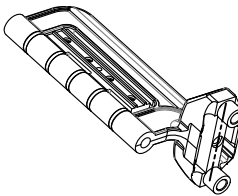
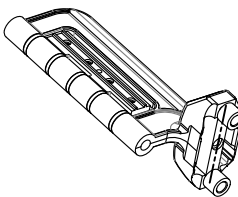
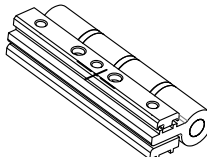
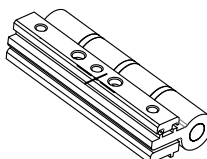
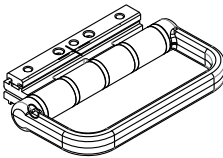
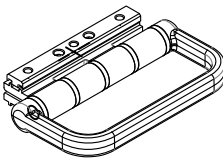
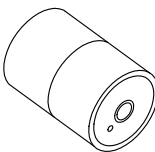
A-./.

B

C

Revisions

	Product Code	Quantity
	69414	1 No.
	5 Point Hook Lock 35mm B/Set	
		
	69470	1 No.
	Centre Keep "Left Hand" (for hook lock)	
	Product Code	Quantity
	69471	1 No.
	Centre Keep "Right Hand"	
	Product Code	Quantity
	69472	1 No.
	Hook and Roller Keep "Left Hand"	
	Product Code	Quantity
	69473	1 No.
	Hook and Roller Keep "Right Hand"	
	Product Code	Quantity
	69456	1 No.
	Bottom hinge roller guide white	
	Product Code	Quantity
	69455	1 No.
	Bottom hinge roller guide black	

	Product Code	Quantity
	69458	1 No.
	Top hinge guide white	
	Product Code	Quantity
	69457	1 No.
	Top hinge guide black	
	Product Code	Quantity
	69454	1 No.
	Hinge White	
	Product Code	Quantity
	69453	1 No.
	Hinge Black	
	Product Code	Quantity
	69460	1 No.
	Hinge with D handle White	
	Product Code	Quantity
	69459	1 No.
	Hinge with D handle Black	
	Product Code	Quantity
	69475	1 No.
	Door magnetic catch 60mm White	

D

E

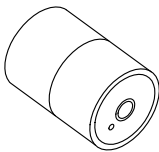
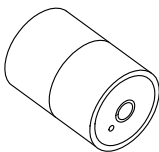
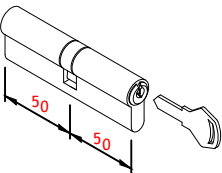
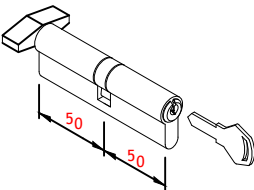
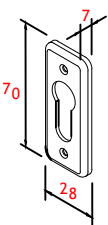
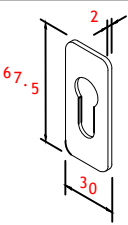
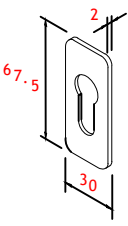
F

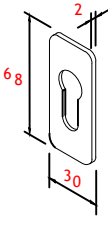
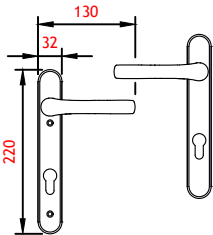
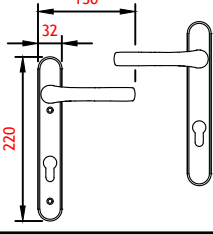
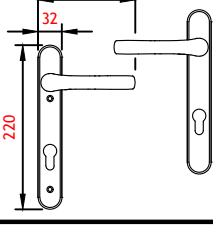
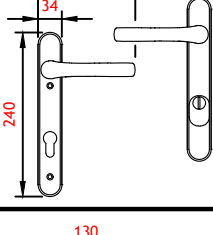
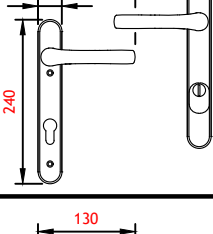
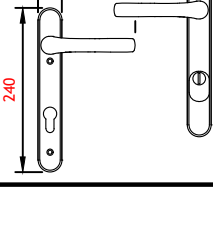
A-./.

B

C

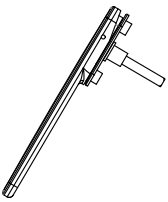
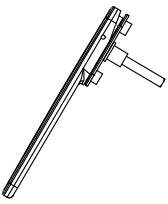
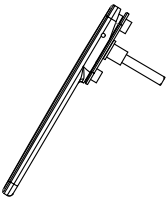
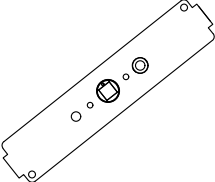
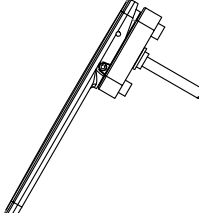
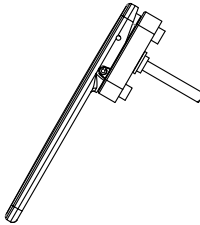
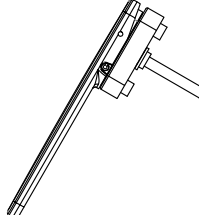
Revisions

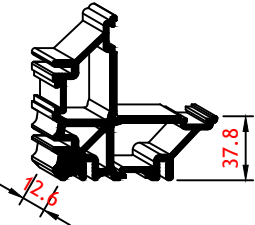
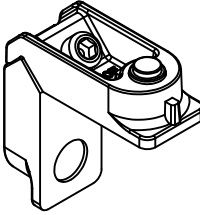
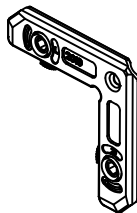
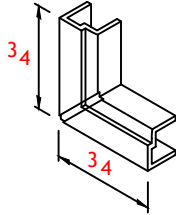
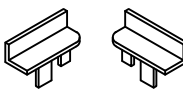
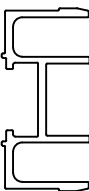
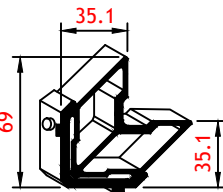
	Product Code	Quantity
	69476	1 No.
	Door magnetic catch 60mm Black	
	Product Code	Quantity
	69477	1 No.
	Door magnetic catch 60mm Silver Anodized	
	Product Code	Quantity
	65066	1 No.
	17mm Euro Profile SILVER 50 Cylinder / 50 Cylinder with 3 keys	
	Product Code	Quantity
	65067	1 No.
	17mm Euro Profile SILVER 50mm Thumbturn/50mm Cylinder with 3 keys	
	Product Code	Quantity
	65150	1 No.
	SILVER ANODISED Euro Escutcheon 17mm Screw On Type	
	Product Code	Quantity
	65151	1 No.
	BLACK Euro Escutcheon 17mm Stick On Type	
	Product Code	Quantity
	65152	1 No.
	WHITE Euro Escutcheon 17mm Stick On Type	

	Product Code	Quantity
	65153	1 No.
	SILVER ANODISED Euro Escutcheon 17mm Stick On Type	
	Product Code	Quantity
	69423	Pair
	BLACK PAINT satin finish Door Lever Handles (Handles not handed)	
	Product Code	Quantity
	69424	Pair
	WHITE PAINT satin finish Door Lever Handles (Handles not handed)	
	Product Code	Quantity
	69425	Pair
	SILVER ANODISED Door Lever Handles (Handles not handed)	
	Product Code	Quantity
	69452	1 No.
	BLACK PAS 24 Security Handles	
	Product Code	Quantity
	69451	1 No.
	WHITE PAS 24 Security Handles	
	Product Code	Quantity
	69450	1 No.
	SILVER ANODISED PAS 24 Security Handles	

A- mechanical sash cleat added
 B Deep base handles added
 C
 D
 E
 F

Revisions

	Product Code	Quantity
	69462	1 No
	Shoot bolts handle white	
	Product Code	Quantity
	69461	1 No
	Shoot bolts handle black	
	Product Code	Quantity
	69463	1 No
	Shoot bolts handle Silver Anodized	
	Product Code	Quantity
	69464	1 No
	Shoot bolts gear box	
	Product Code	Quantity
	69486	1 No
	Shoot bolts handle Deep Base Black	
	Product Code	Quantity
	69487	1 No
	Shoot bolts handle Deep Base White	
	Product Code	Quantity
	69488	1 No
	Shoot bolts handle Deep Base Satin Chrome	

	Product Code	Quantity
	70467	1 No
	70467- 12.6 Door Leaf Corner Cleat	
	Product Code	Quantity
	70469	Pair
	Outer Frame Corner Cleat	
	Product Code	Quantity
	70470	1 No
	Outer Frame Corner Chevron	
	Product Code	Quantity
	69332	1 No
	AP 310 Chevron	
	Product Code	Quantity
	69468	Pair
	Rebate cap	
	Product Code	Quantity
	69465	1 No.
	Lock Insert	
	Product Code	Quantity
	70483	1 No.
	Mechanical cleat for door leaf AP 303-304	

D

E

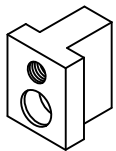
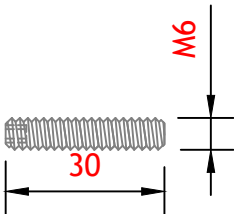
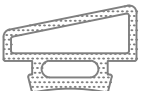
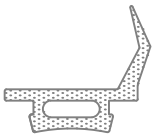



F


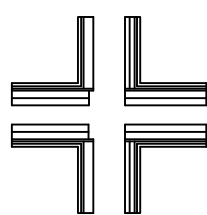

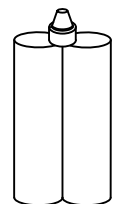
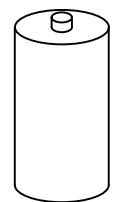
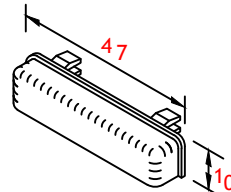
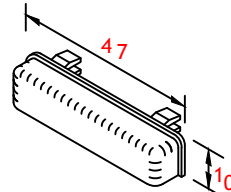
A-./.

B

C

Revisions

	Product Code	Quantity
	70468	1 No
	Adjuster Block	
	Product Code	Quantity
	69331	1 No
	Adjuster Screw	
	Product Code	Quantity
	70963	100 metre Coil
	Compression gasket	
	Product Code	Quantity
	70964	100 metre Coil
	Closure gasket	
	Product Code	Quantity
	70950	100 metre Coil
	3 to 4mm Captive Gasket	
	Product Code	Quantity
	70951	100 metre Coil
	4 to 5mm Wedge Gasket	
	Product Code	Quantity
	70952	100 metre Coil
	1 to 2mm captive Gasket	

	Product Code	Quantity
	69147	100 metre Coil
	Slam Gasket	
	Product Code	Quantity
	70965	Each
	AP 300 vulcanized corners	
	Product Code	Quantity
	69916	Each
	Nozzel for Cosmofen® Duo	
	Product Code	Quantity
	69915	550g
	Cosmofen® Duo 2 part epoxy adhesive for crimped corner assembly 550 g	
	Product Code	Quantity
	69920	1000 ml
	Cosfen® 60 Cleaner 1000 ml	
	Product Code	Quantity
	64193	Packed 100 No.
	BLACK Drain Cap Cover	
	Product Code	Quantity
	64194	Packed 100 No.
	WHITE Drain Cap Cover	

D

E

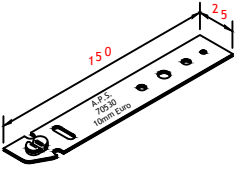
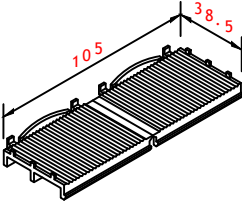
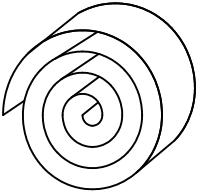
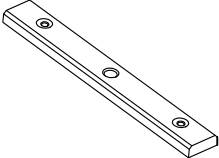

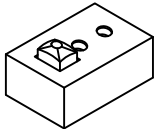
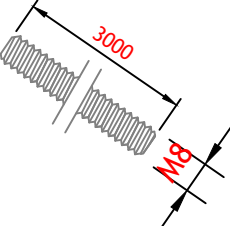
F

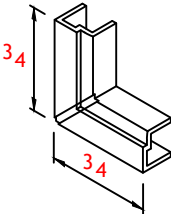
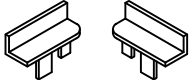
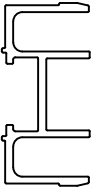
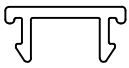
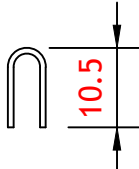
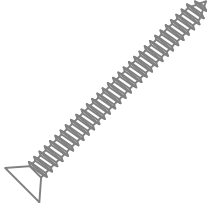
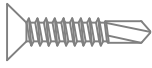
A- product shuffle

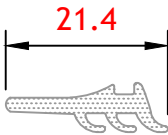
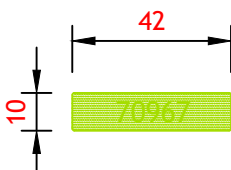
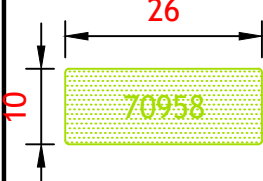
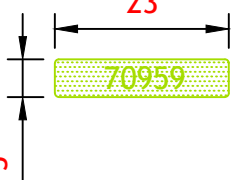
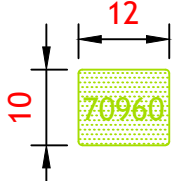
B

C

Revisions

	Product Code	Quantity
	70530	Each
	Fixing Lug	Box Qty 100 No.
	Product Code	Quantity
	70510	Each
	PVC Glazing Bridge	BLACK
	Product Code	Quantity
	69478	Roll 25m
	AP 300 Hinge Tape	BLACK
	Product Code	Quantity
	69479	Each
	Gearbox cover	BLACK
	Product Code	Quantity
	69480	Each
	Multi Point Lock Fixing	
	Product Code	Quantity
	69466	Each
	Shoot Bolt Cone & Sleeve	
	Product Code	Quantity
	69467	1 No
	Shoot bolts threaded bar	

	Product Code	Quantity
	69332	1 No
	AP 310 Chevron	
	Product Code	Quantity
	69468	Pair
	Rebate cap	
	Product Code	Quantity
	69465	1 No.
	Lock Insert	
	Product Code	Quantity
	69474	1 No.
	Lock Insert Cap	
	Product Code	Quantity
	69469	1 No
	Stainless steel track	
	Product Code	Quantity
	69318	Bag of 100
	No 8 X 45mm Csk head, pozi-drive, stainless steel self tapping screw	
	Product Code	Quantity
	69324	Bag of 100
	No 7 X 25mm Csk head, Pozi-drive, self-drilling, stainless steel screw	

	Product Code	Quantity
	70957	1X 50m Roll
	Therm+ gasket	
	Product Code	Quantity
	70967	6m Roll
	Therm+ frame foam	
	Product Code	Quantity
	70958	6m Roll
	Therm+ underglass foam	
	Product Code	Quantity
	70959	6m Roll
	Therm+ frame foam	
	Product Code	Quantity
	70960	6m Roll
	Therm+ frame foam	
	Product Code	Quantity
	Product Code	Quantity
	Product Code	Quantity

	Product Code	Quantity
	Product Code	Quantity
	Product Code	Quantity
	Product Code	Quantity
	Product Code	Quantity
	Product Code	Quantity

Date 02.08.23



● aluminium & plastics systems

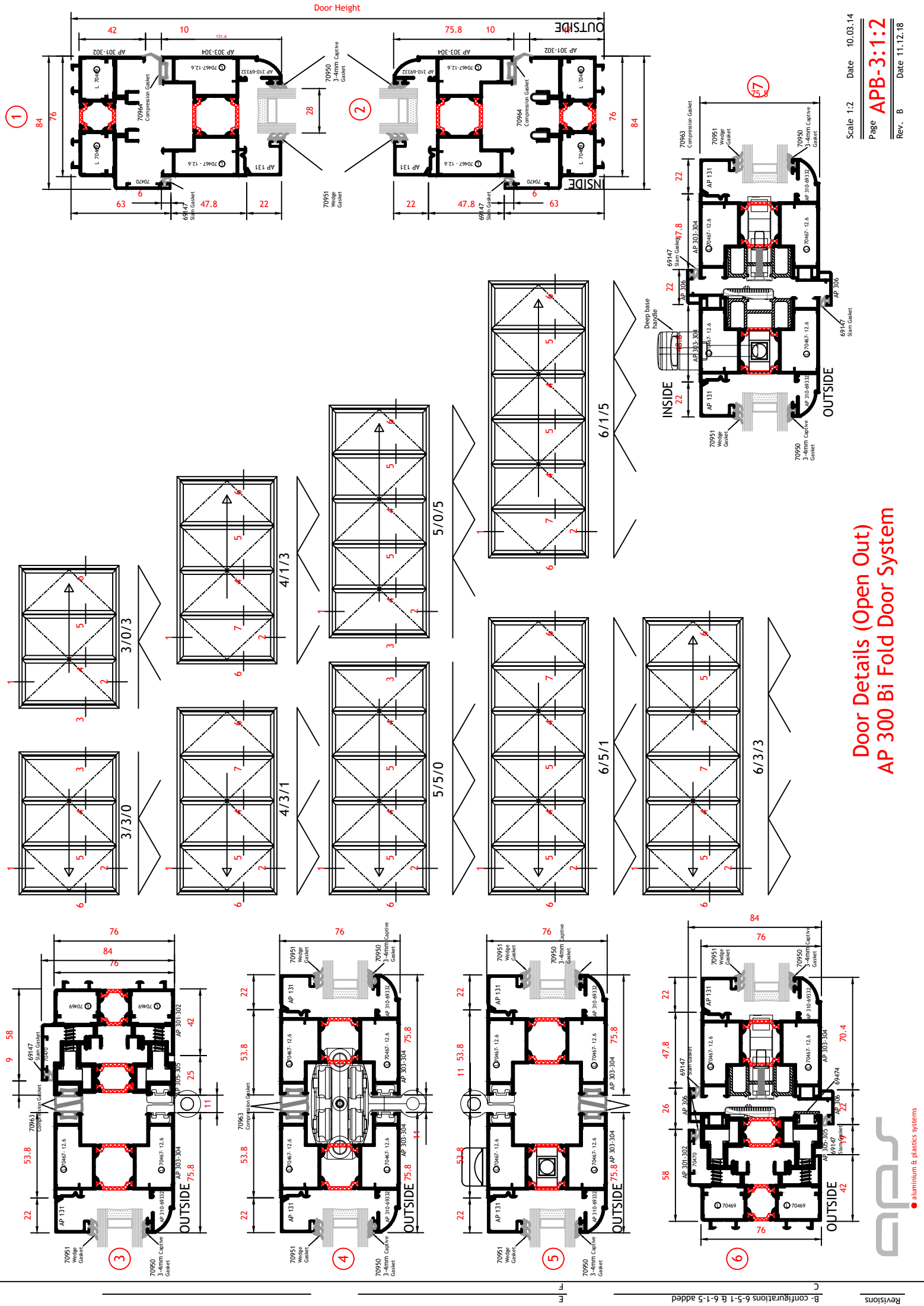
Accessories

AP 300 Bi-fold Door System

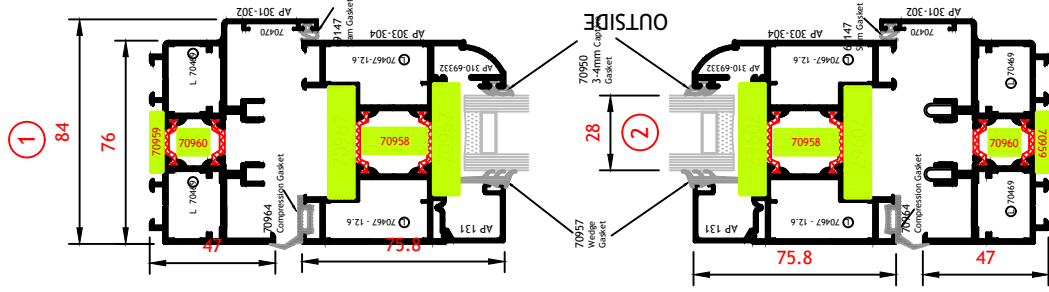
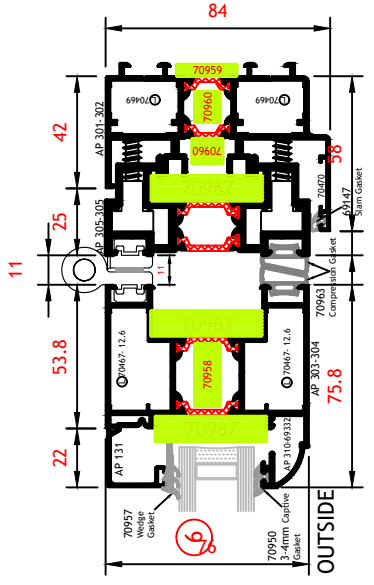
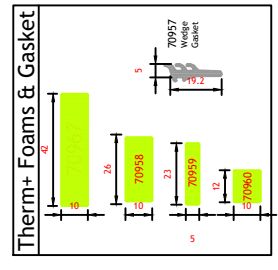
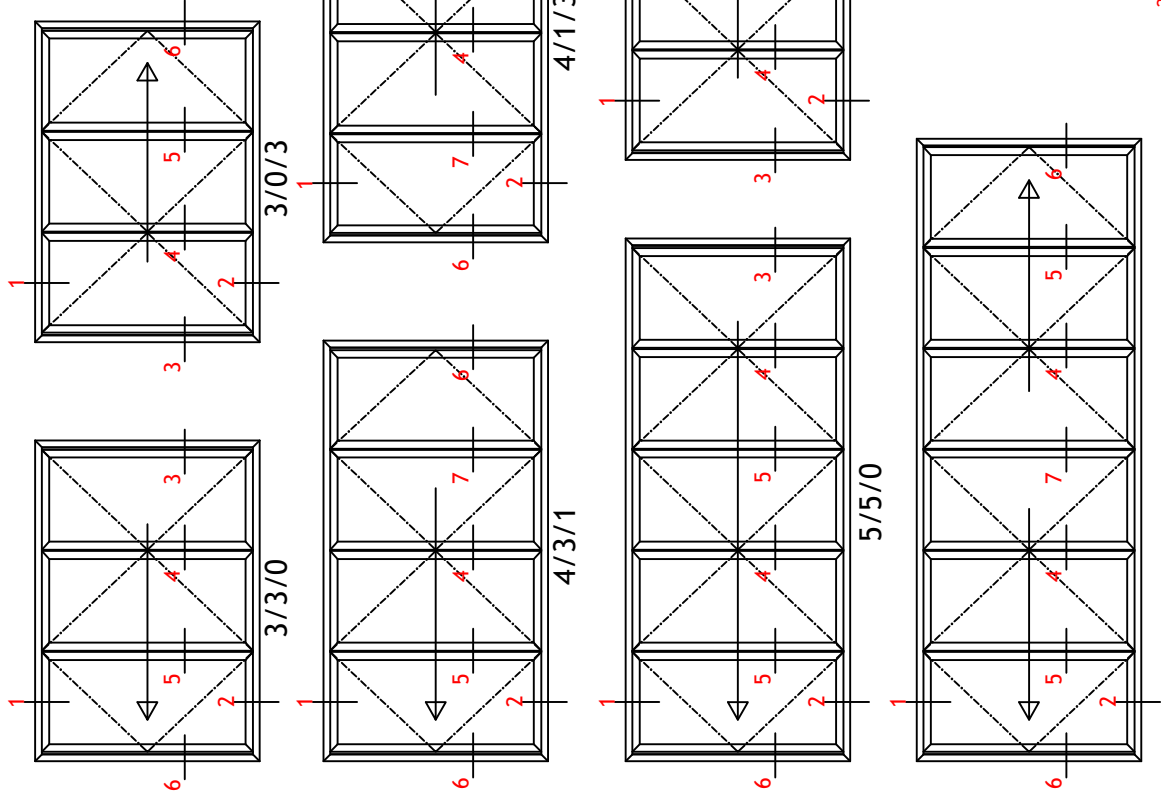
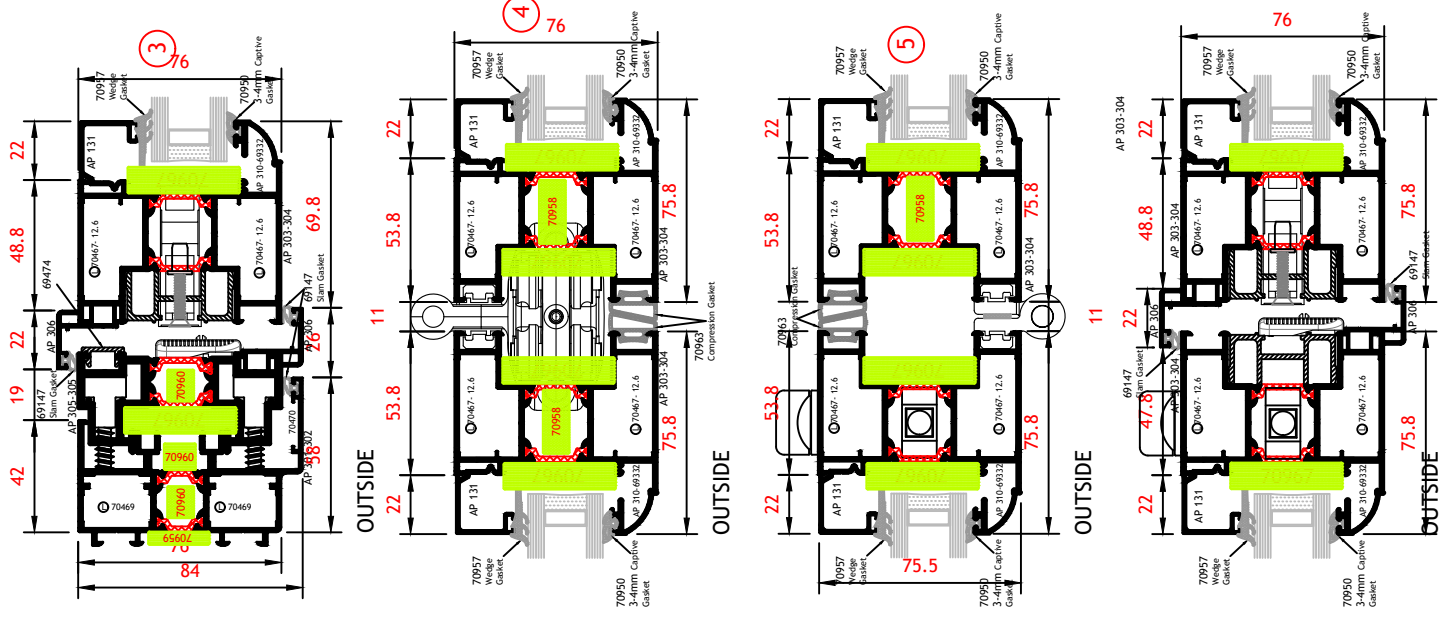
Page APS-2:3:6

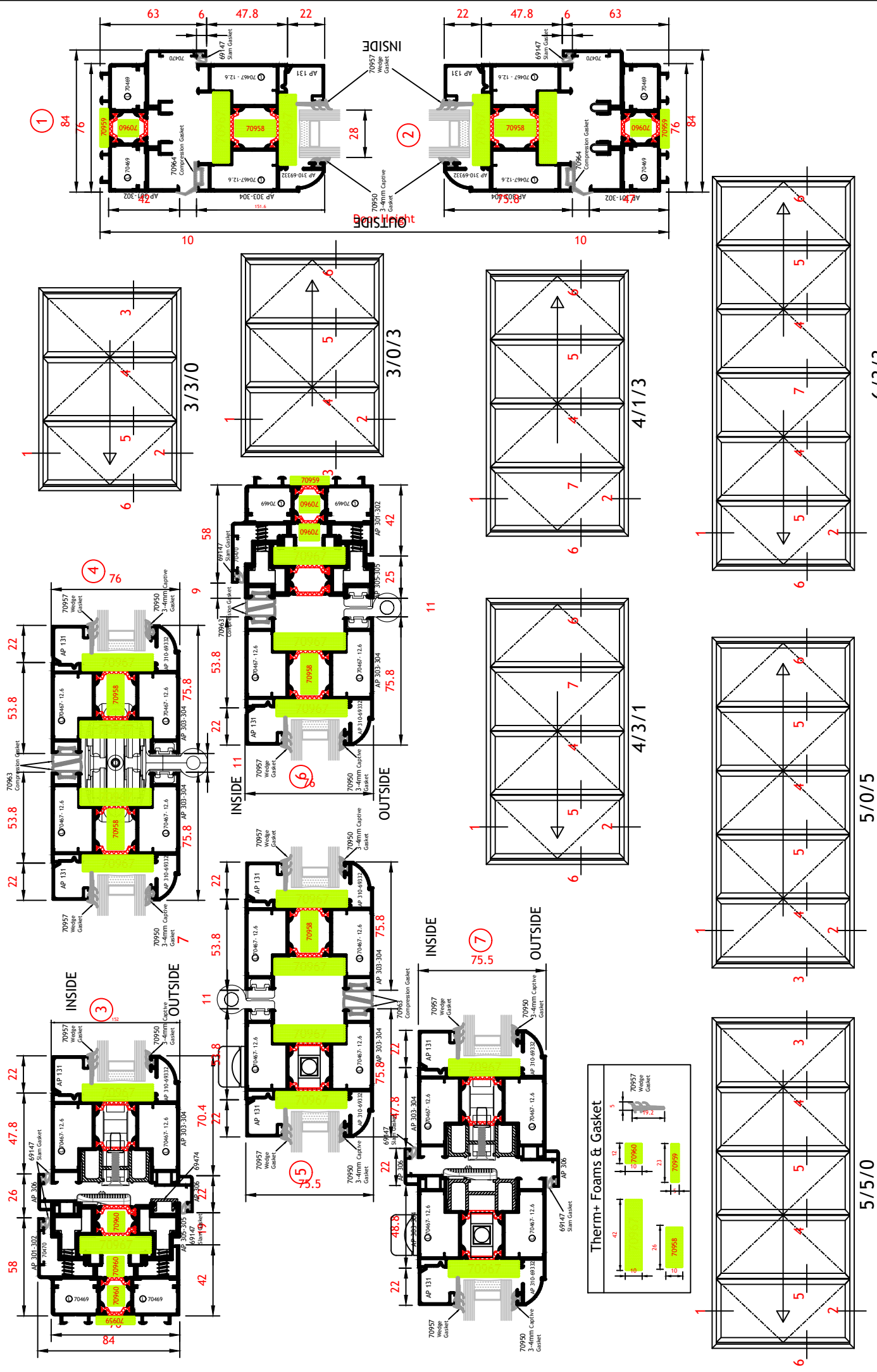
Rev. - Date -

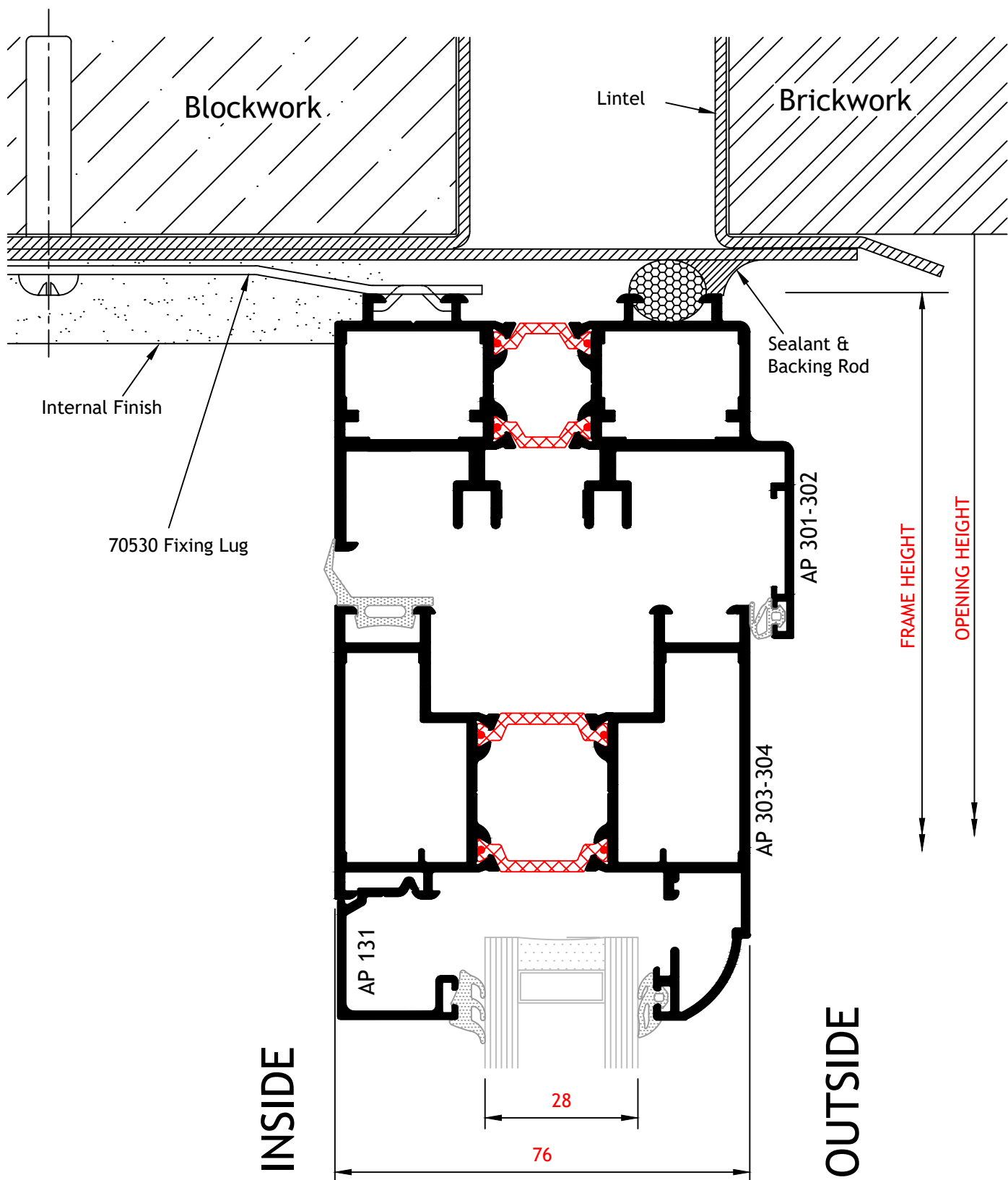




Door Details (Open Out) AP 300 Bi Fold Door System







Typical Door Head Detail Open In AP 300 Bi Fold Door System



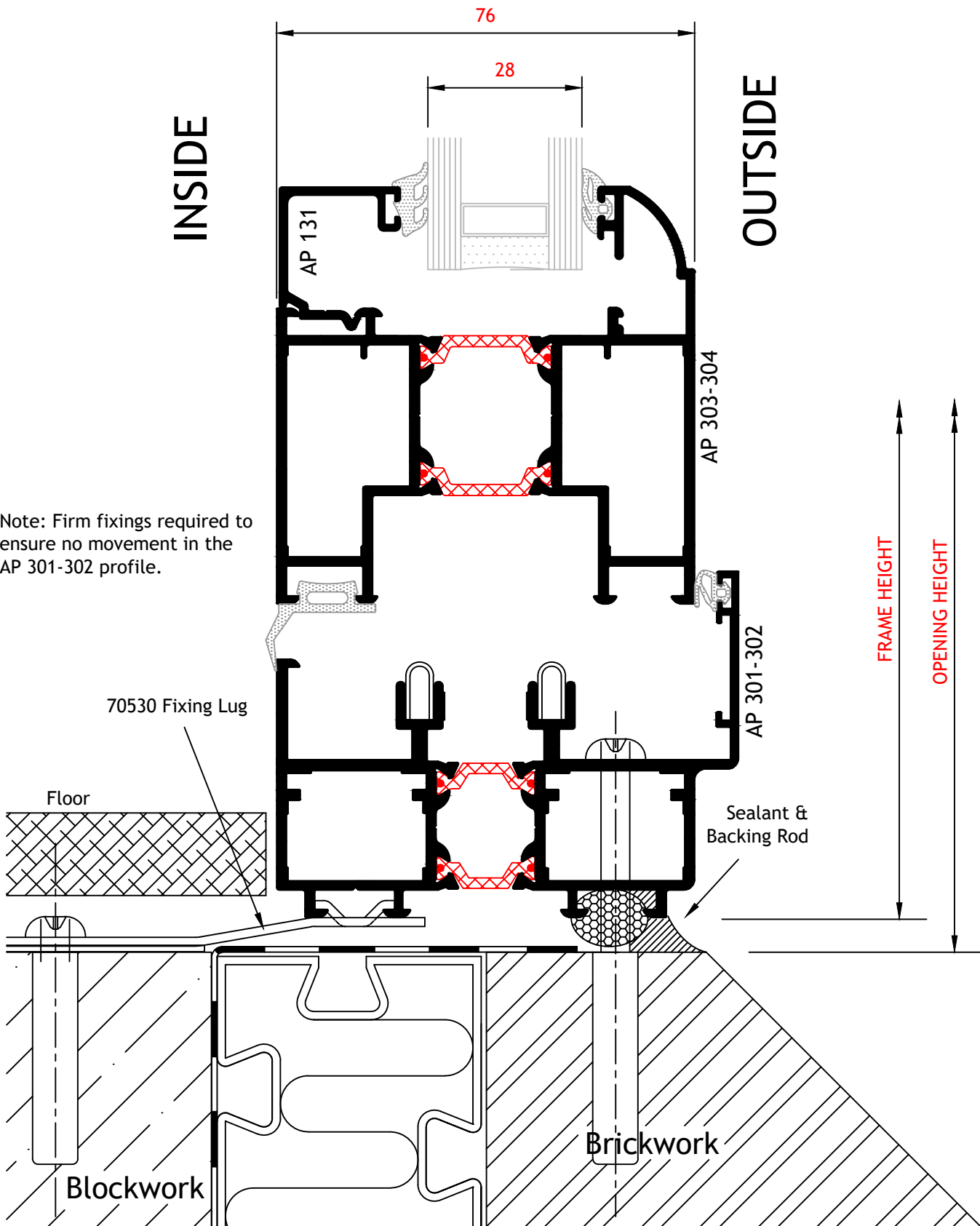
- aluminium & plastics systems

Scale 1:1 Date 10.03.14

Page **APB-3:2:1**

Rev - Date -

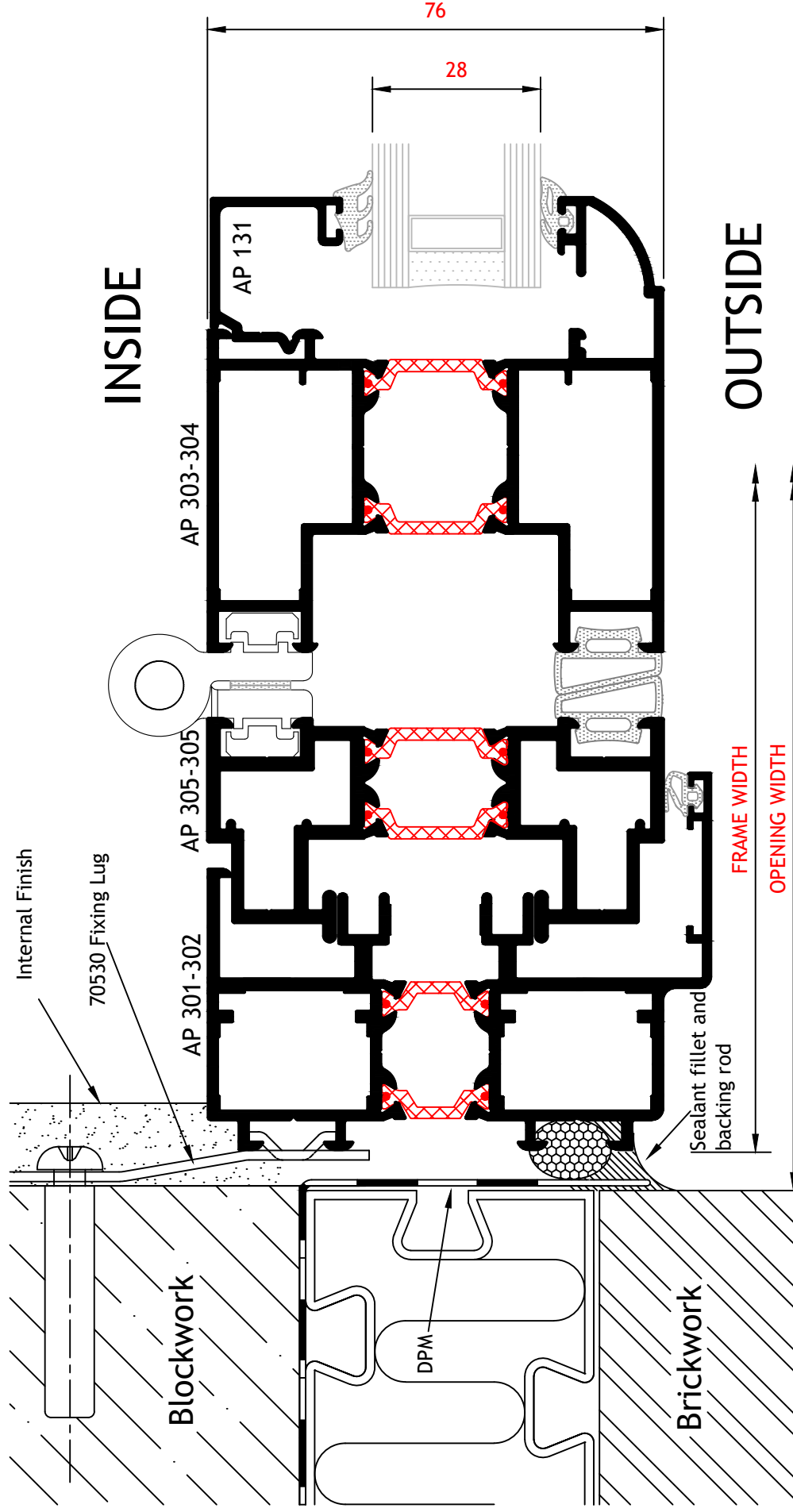
Revisions



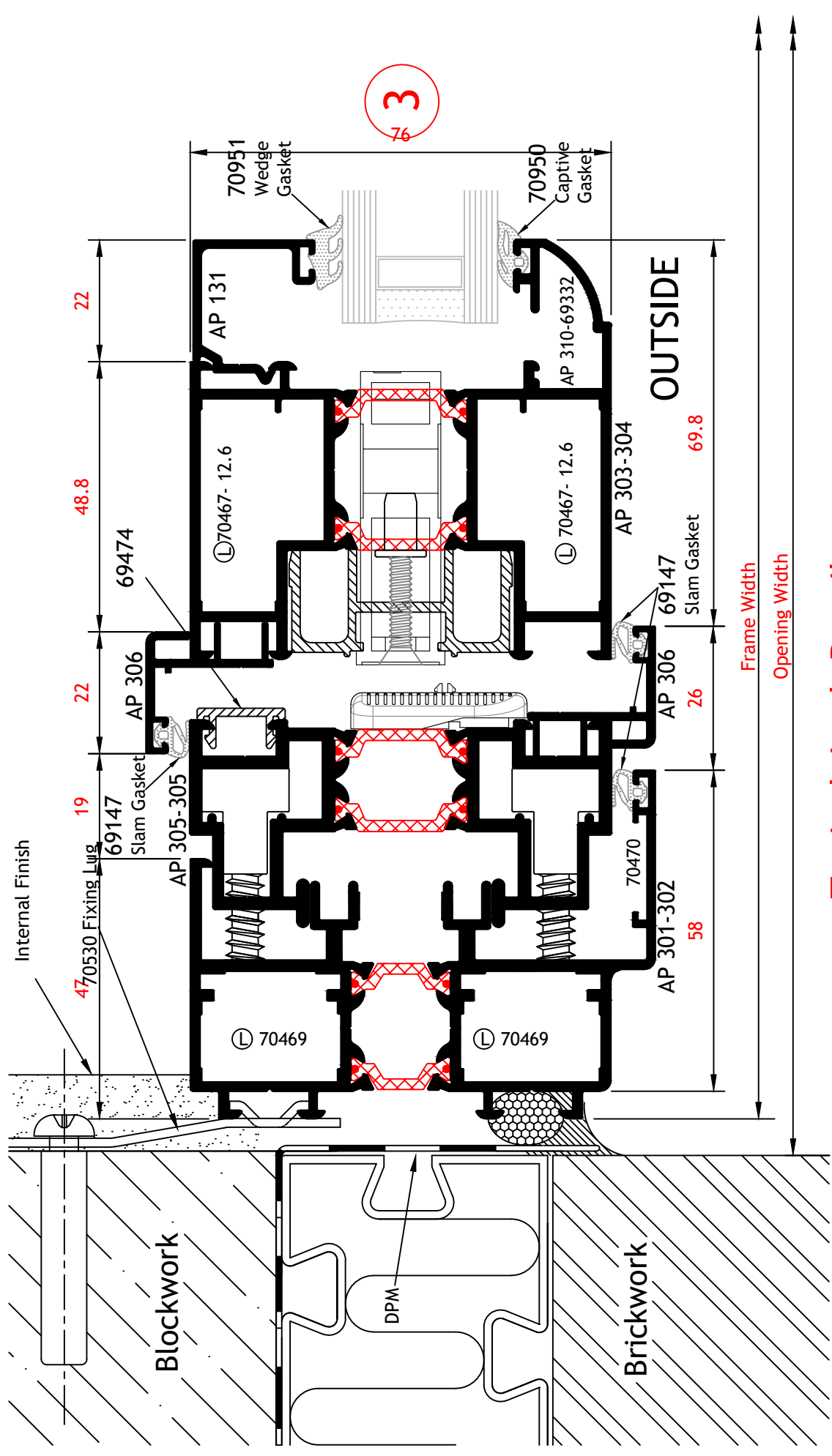
Note: Firm fixings required to ensure no movement in the AP 301-302 profile.

Typical Door Cill Detail Open In AP 300 Bi Fold Door System

Revisions	A	D
	B	E
	C	F



Typical Jamb Fixing Detail Open In AP 300 Bi Fold Door System



Typical Jamb Detail
 Open-in Lock
 AP 300 Bi Fold Door System

A-./.

B

C

D

E

F

Revisions



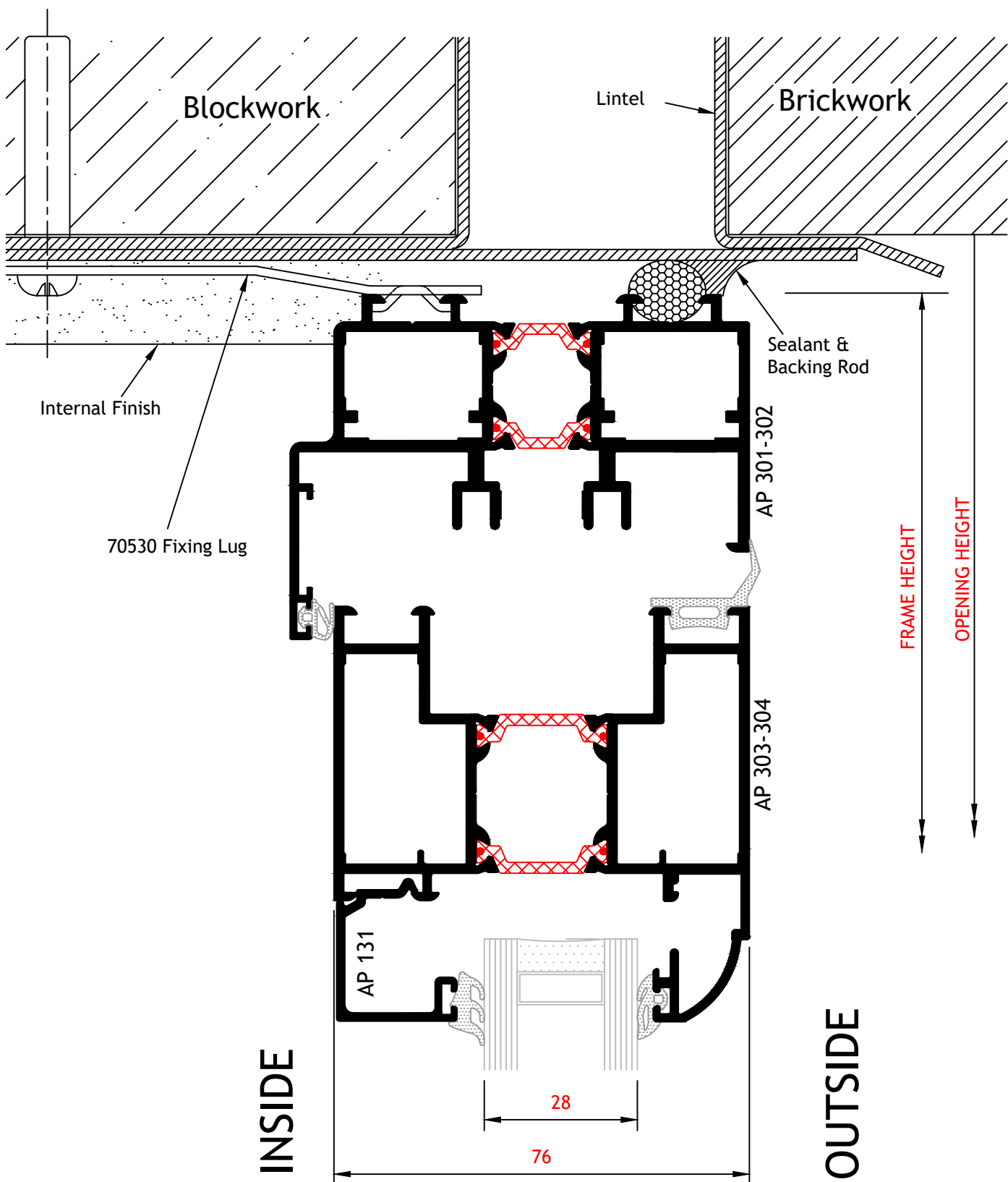
● aluminium & plastics systems

Typical Door Head Detail Open Out AP 300 Bi Fold Door System

Scale 1:1 Date 10.03.14

Page **APB-3:2:4**

Rev - Date -



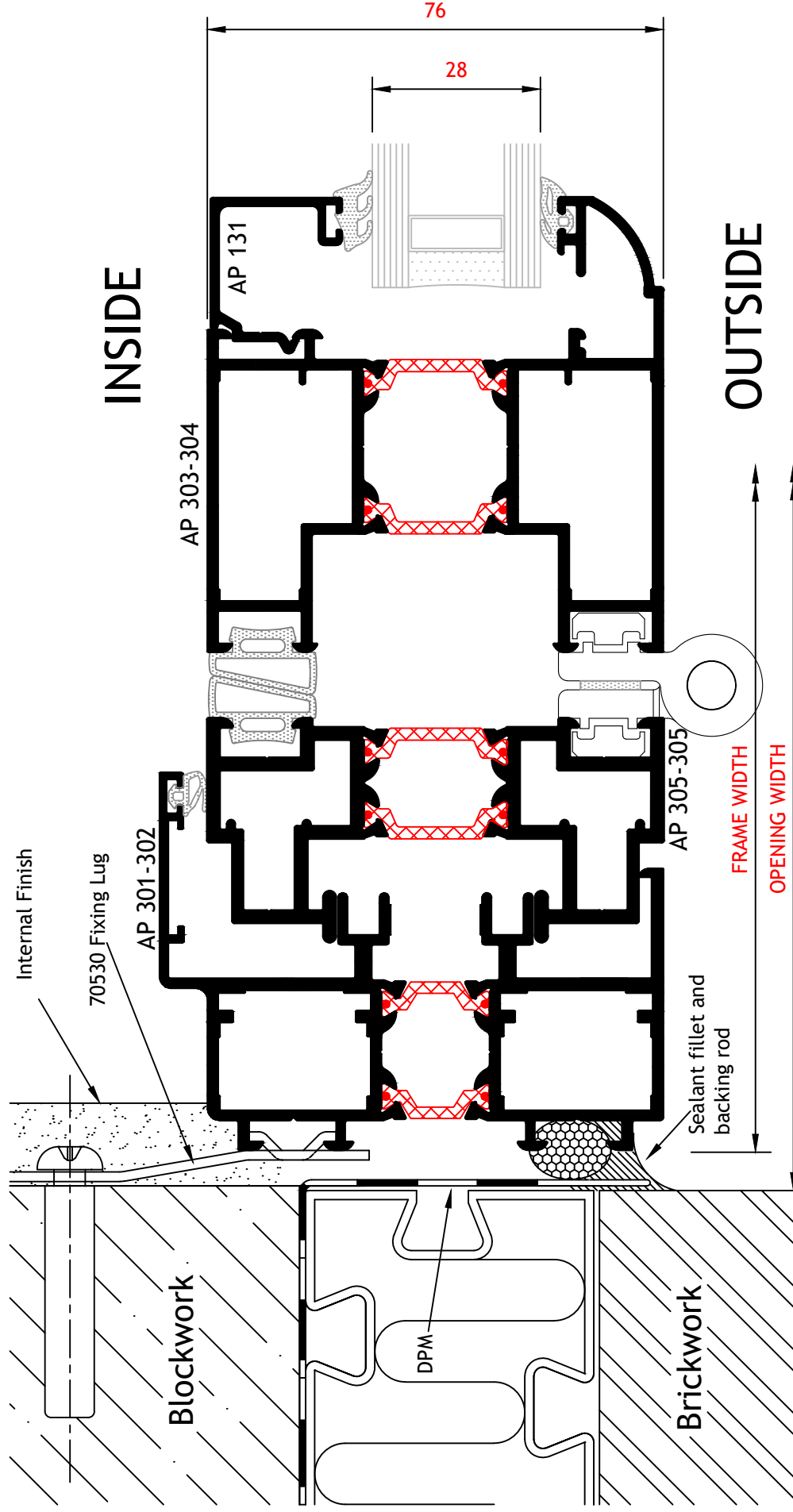
A-./.
B
C

aps
● aluminium & plastics systems



Rev - Date -

Revisions	A	
	B	
	C	
	D	
	E	
	F	



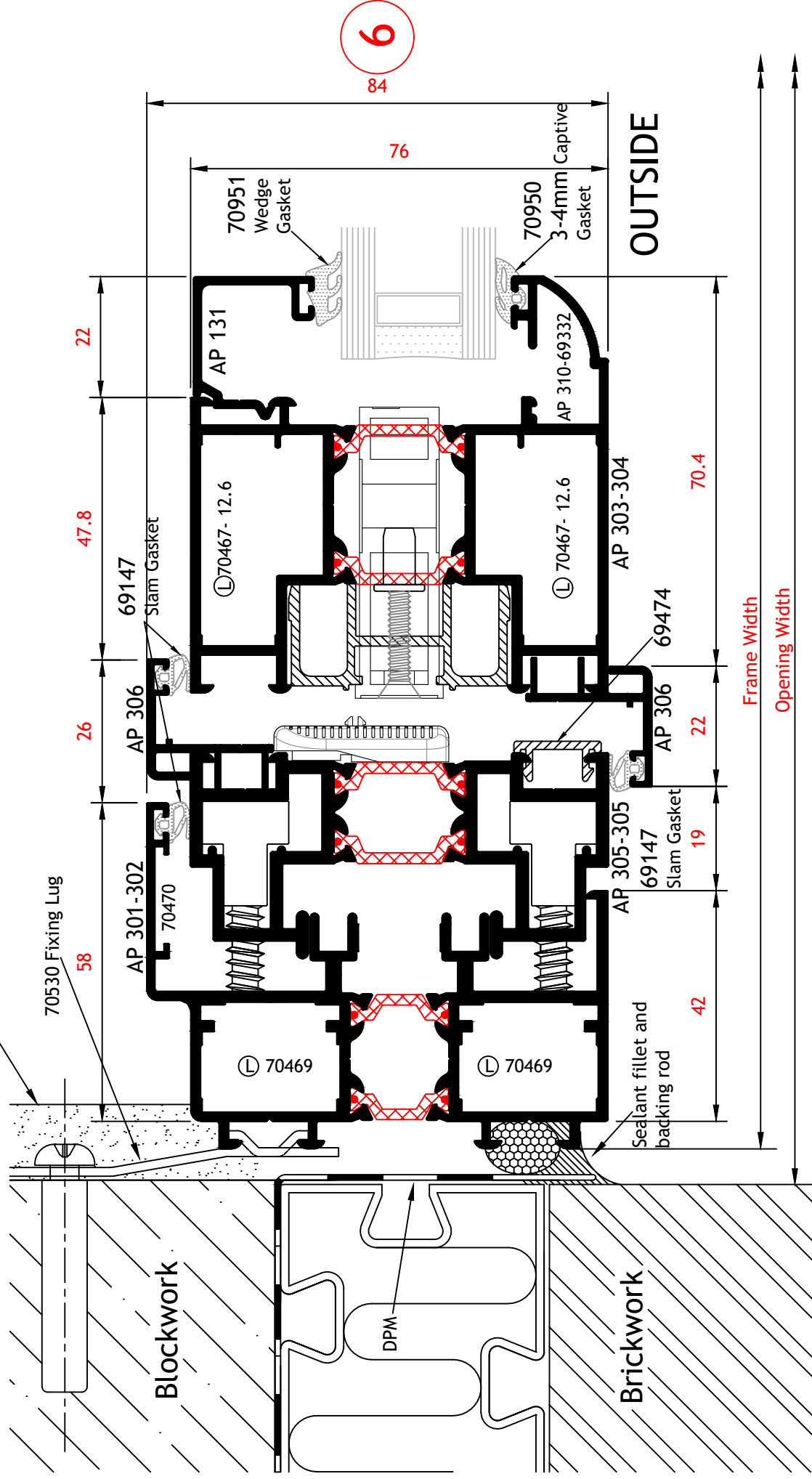
Typical Jamb Fixing Detail Open Out AP 300 Bi Fold Door System

Scale 1:1 Date 10.03.14

Page **APB-3:2:6**

Rev. - Date -

Internal Finish



Typical Jamb Detail Open Out Jamb Lock AP 300 Bi Fold Door System

Scale 1:1 Date 12.12.18

Page **APD-3:2:6a**

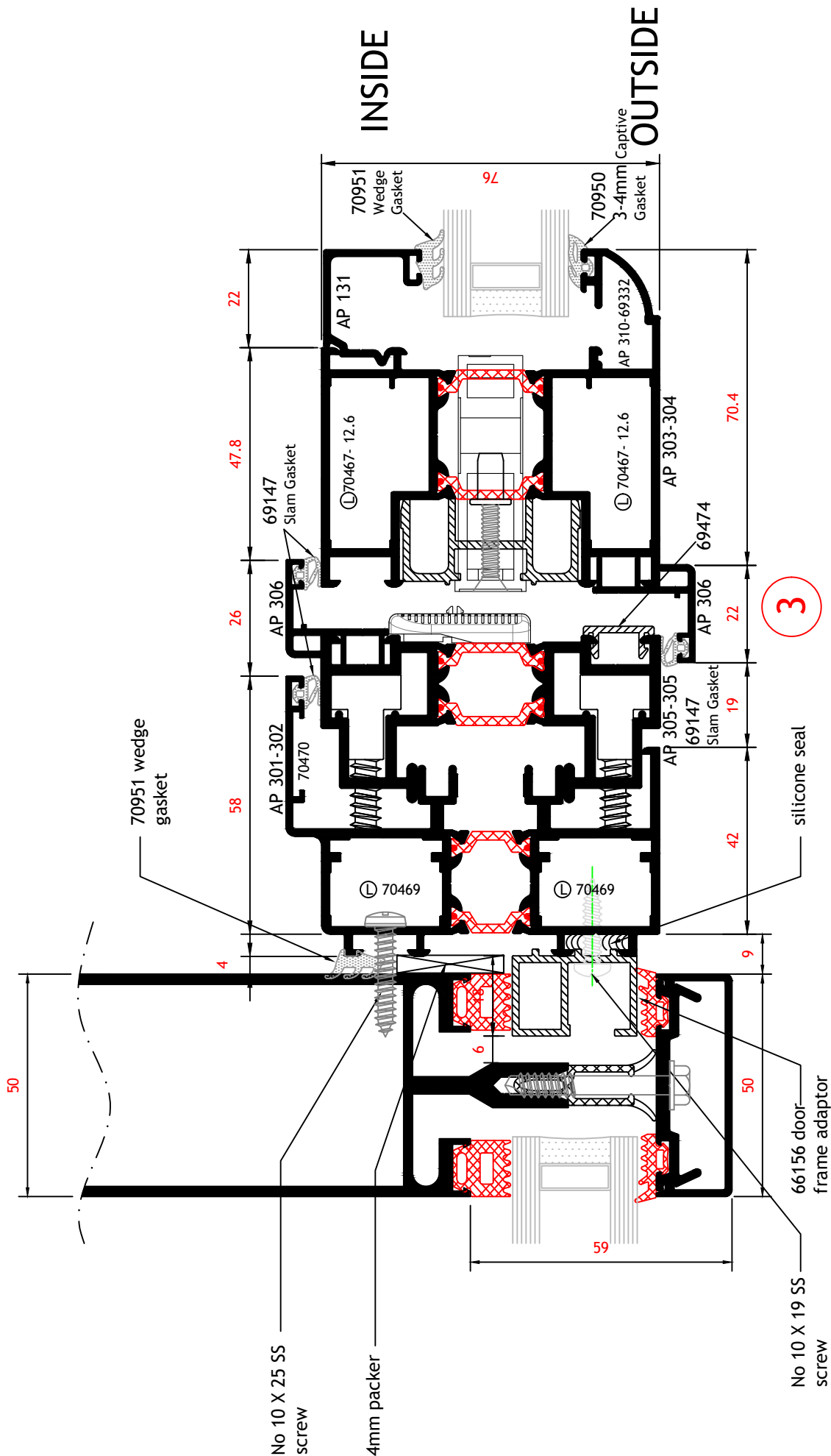
Rev. - Date -

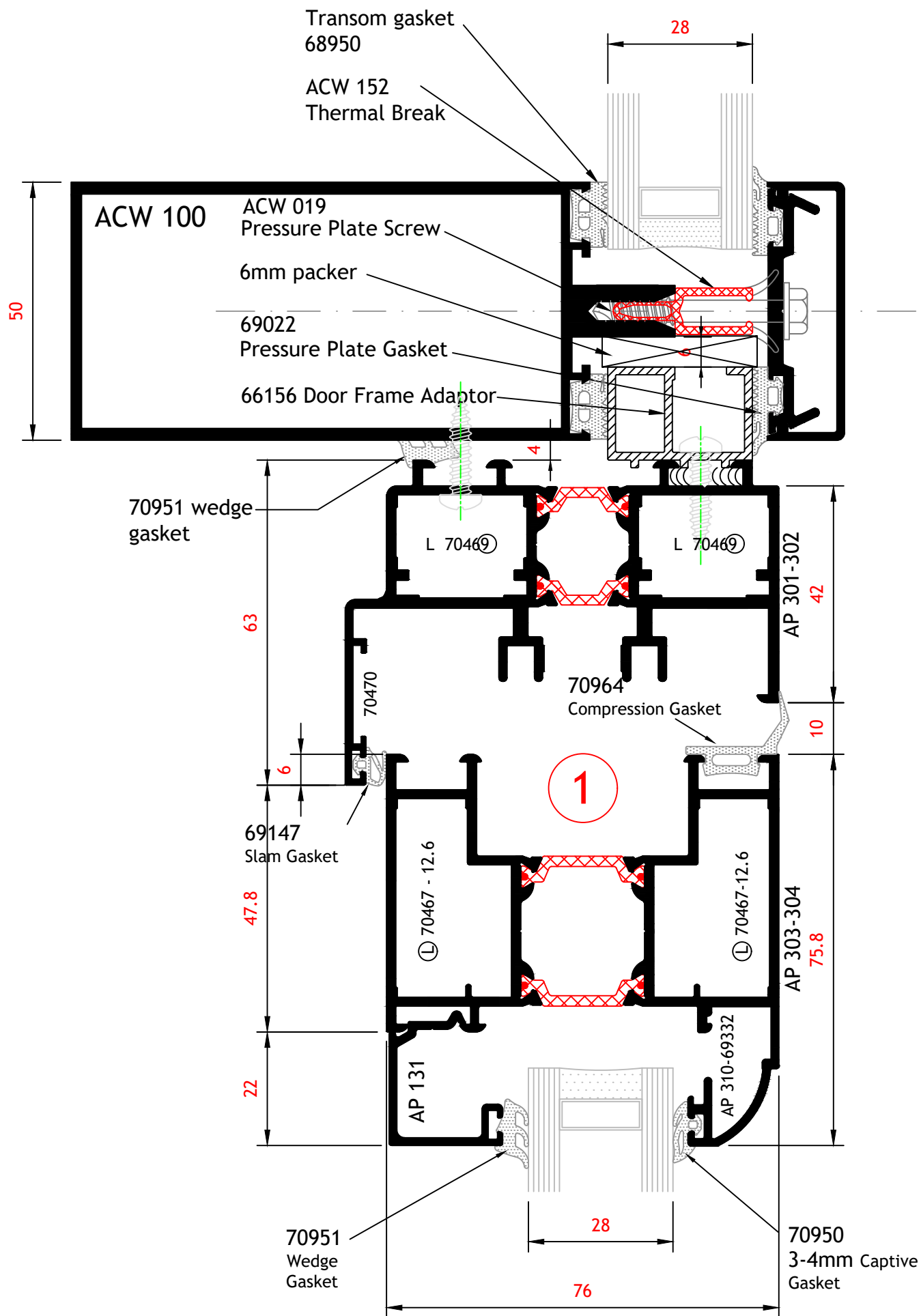


Typical Jamb Detail into

Curtain Wall System

AP 300 Bi Fold Door System



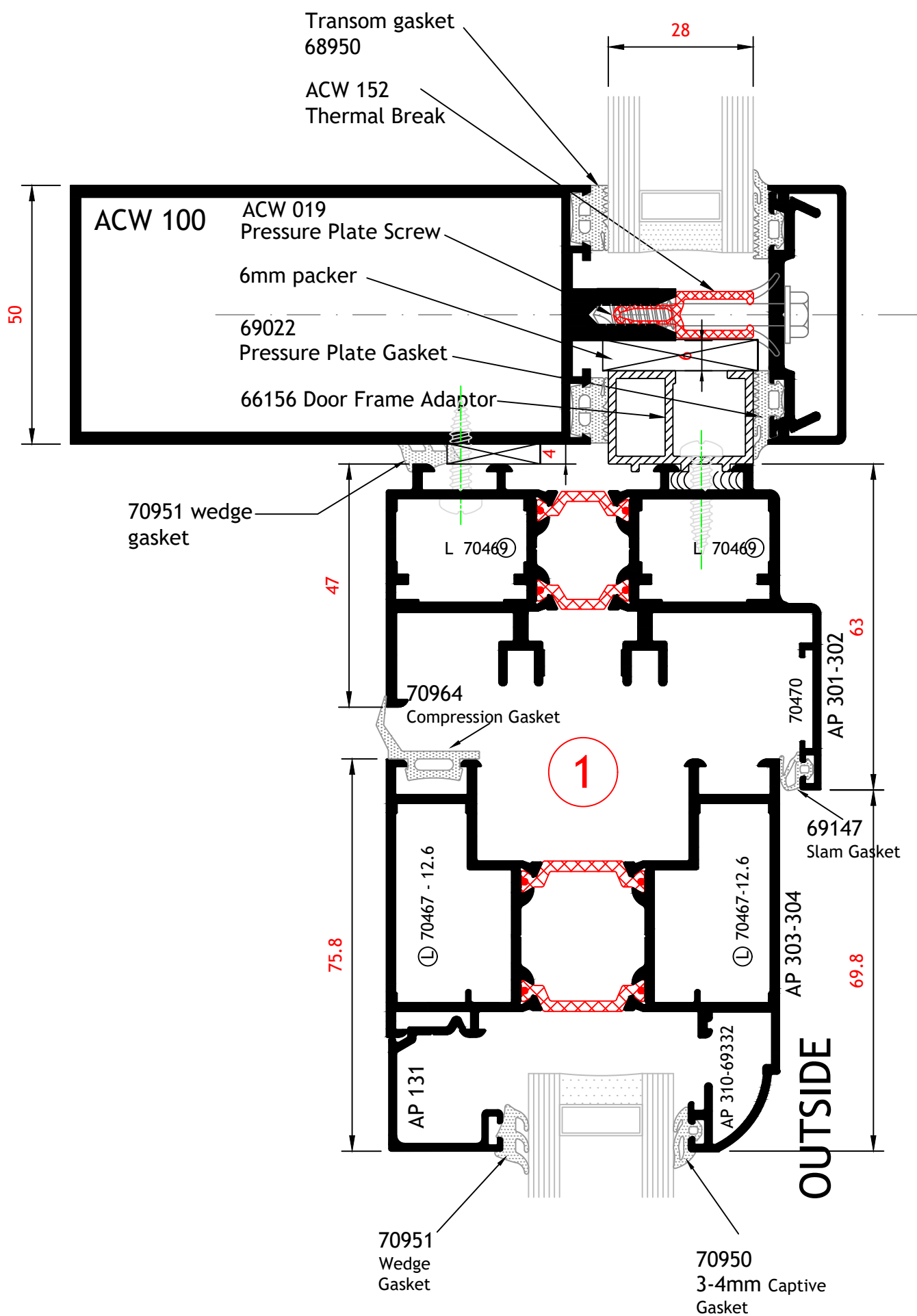




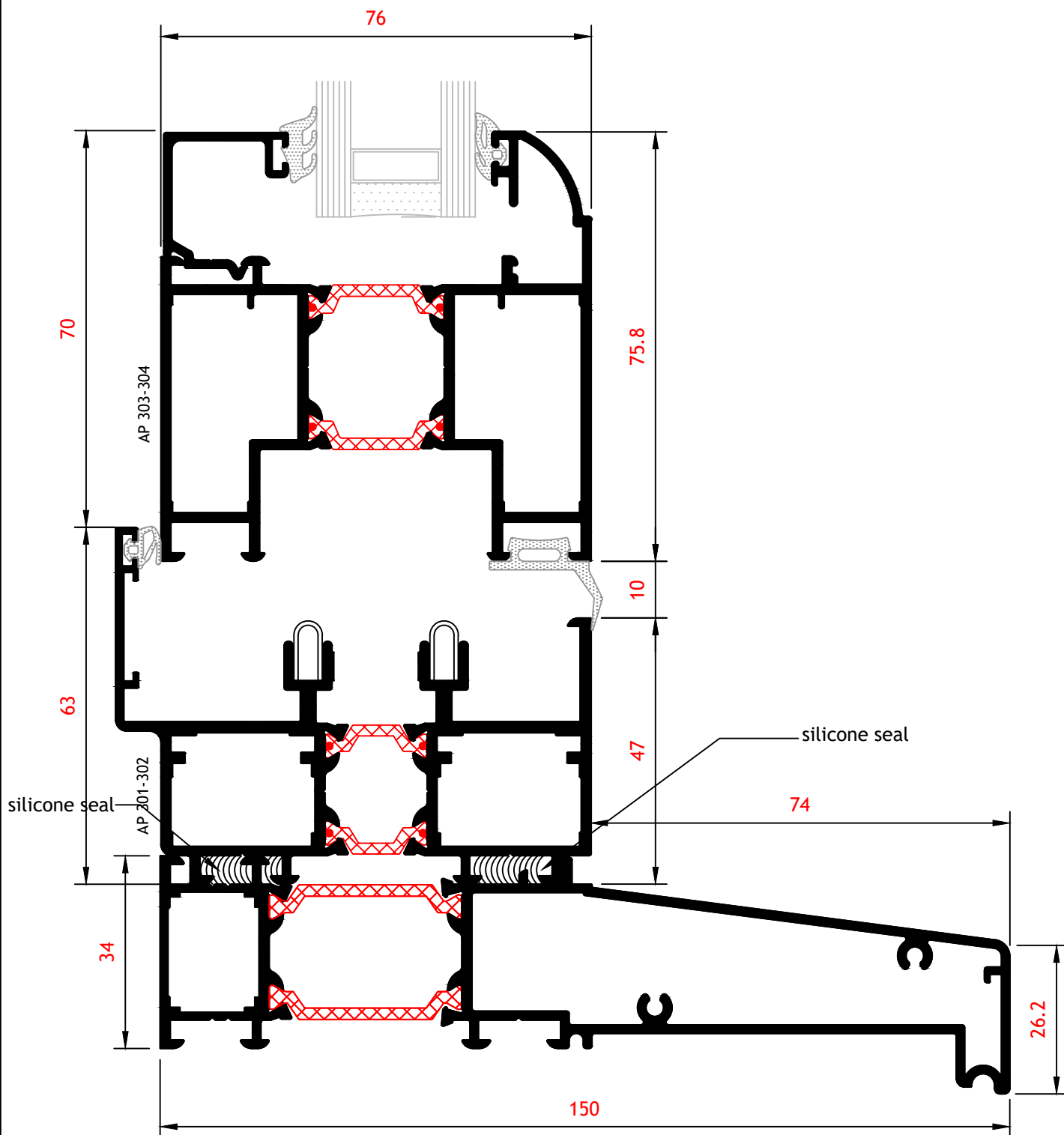
Scale NTS Date 12.12.18

Page **APB-3:2:9**

Rev. - Date -

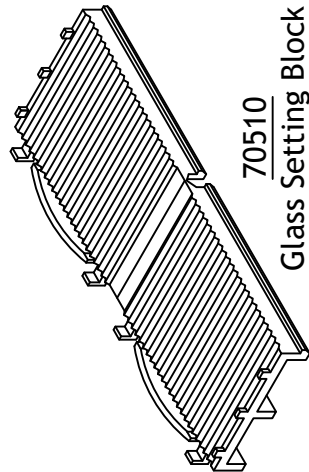
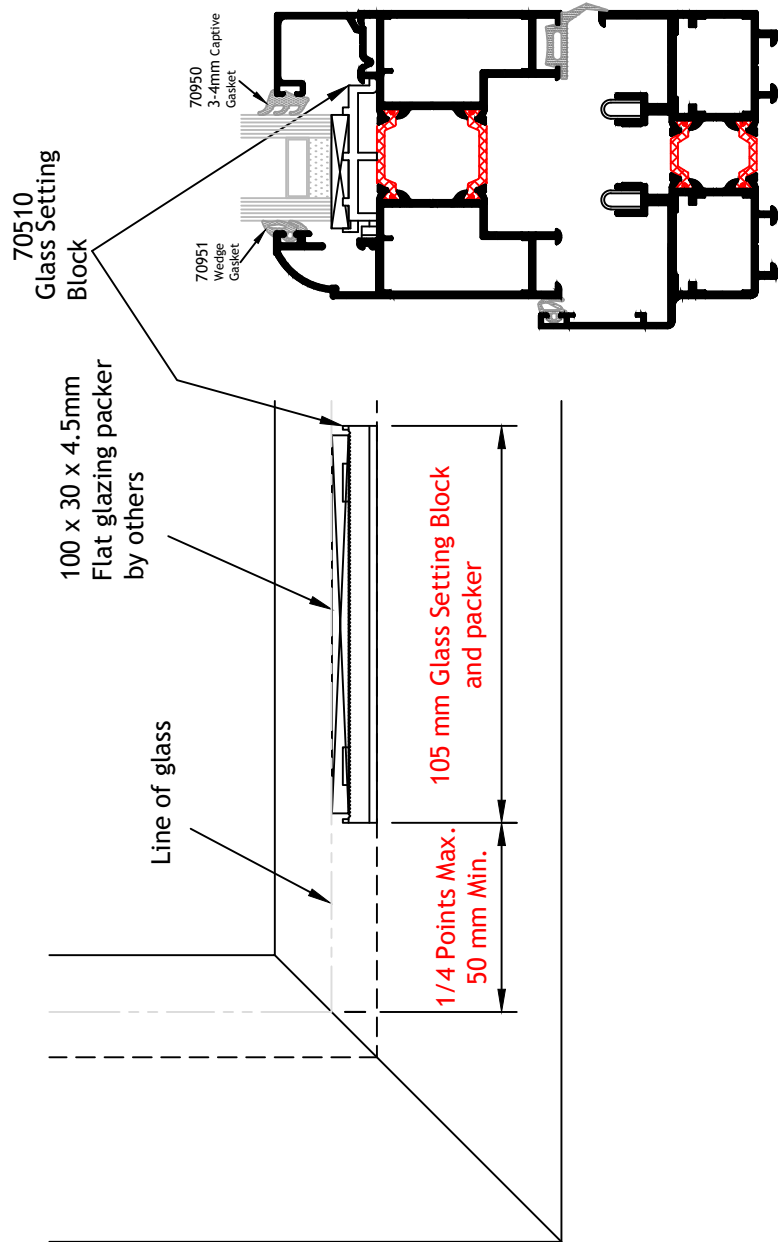


PVC end caps available in
Black or white see
Accessory page AP-2:3:7

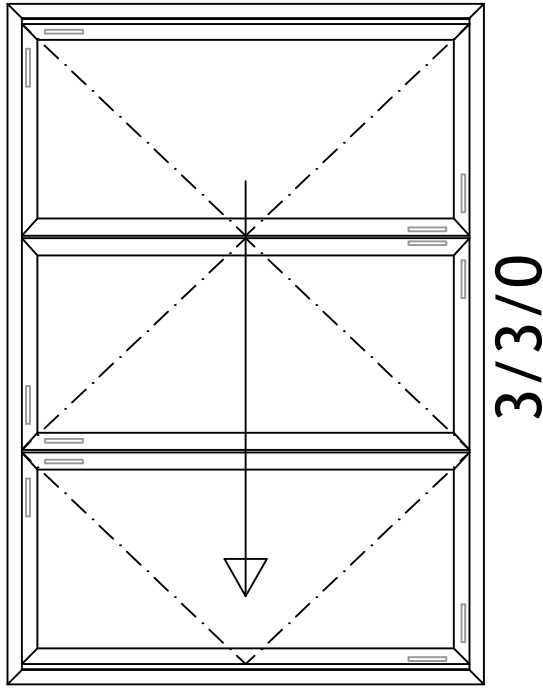


AP 100-150 Stub Sill

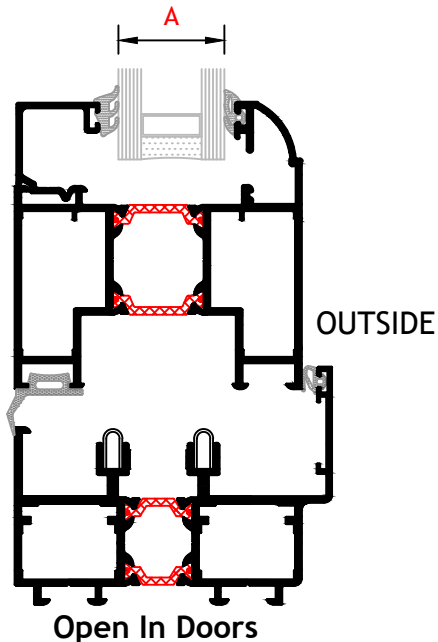
Revisions	A-./.	D
	B	E
	C	F



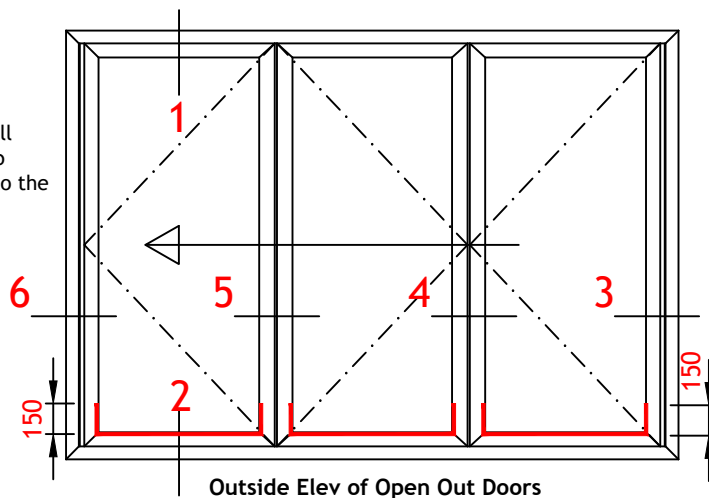
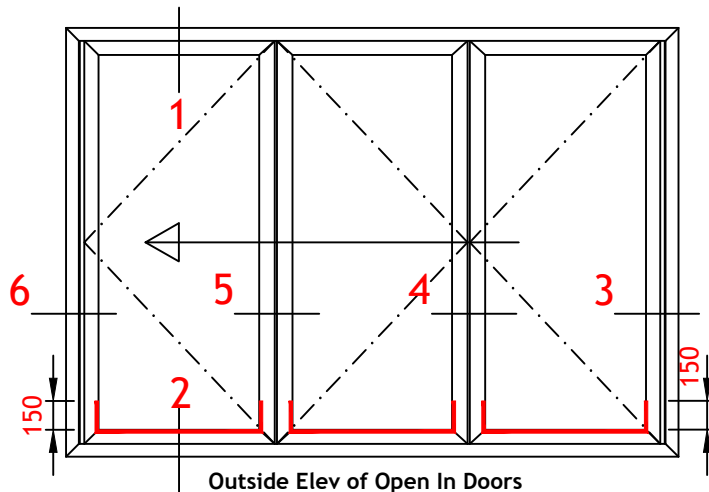
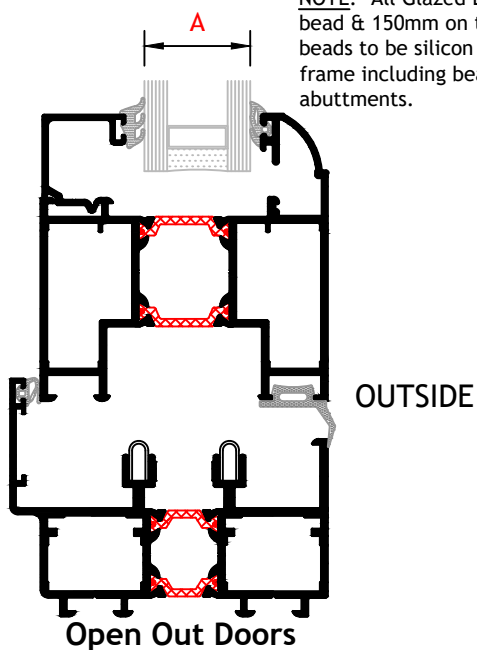
Glazing support blocks and packs must be fitted in accordance with BS 6262 : 1982 clause 7.4.2 & 7.4.3



Glazing Support Blocks & Pack Location AP 300 Door System



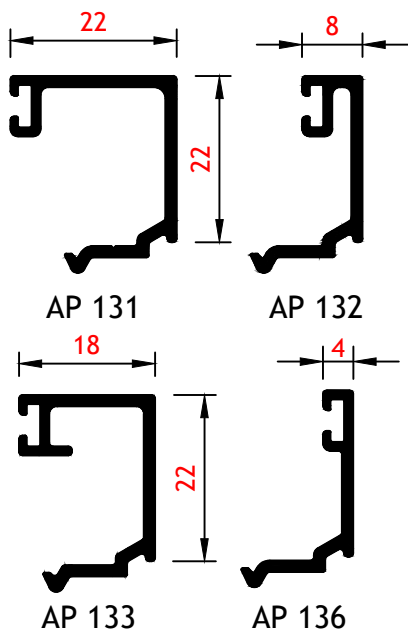
NOTE:- All Glazed Doors, Sill bead & 150mm on the jamb beads to be silicon sealed to the frame including bead abutments.



Gasket References

Captive Gasket 1 to 2	Captive Gasket 3 to 4	Wedge Gasket 4 to 5	Wedge Gasket 4 to 5	Wedge Gasket 6 to 7
70952 (100m)	70950 (100m)	70951 (100m)	70957 (100m)	70974 (100m)

Glazing Bead	Glass Thickness (mm) A	AP 131	AP 131	AP 131	AP 133	AP 133	AP 132	AP 132	AP 132	AP 136	AP 136
AP 131	26		●								
AP 131	28		●								
AP 131	30	●		●			●				
AP 133	32		●				●				
AP 133	34	●			●		●				
AP 132	40		●							●	
AP 132	42		●				●				
AP 132	44	●		●			●				
AP 136	46		●				●				
AP 136	48	●		●			●				



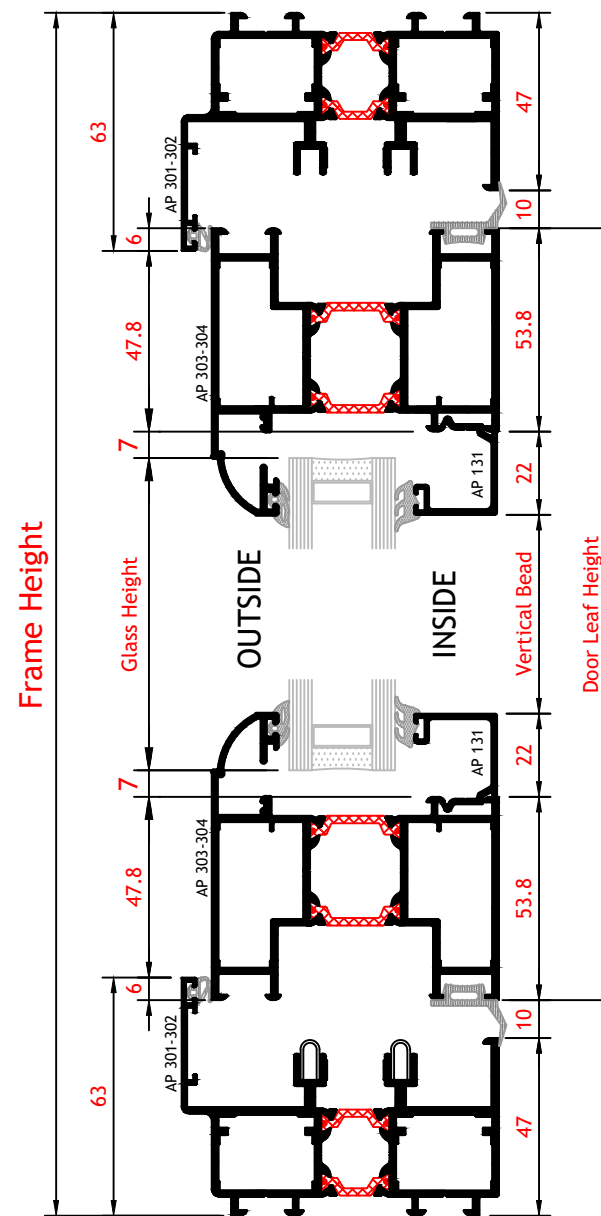
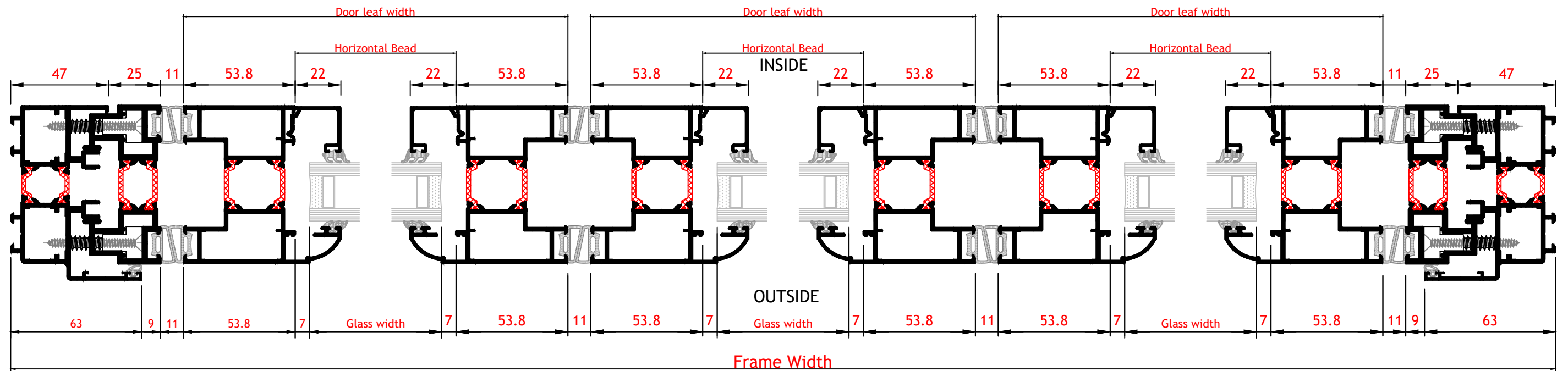
Scale 1:1.5,1-30 Date 1.1.2010

Page **APB-4:2:1**

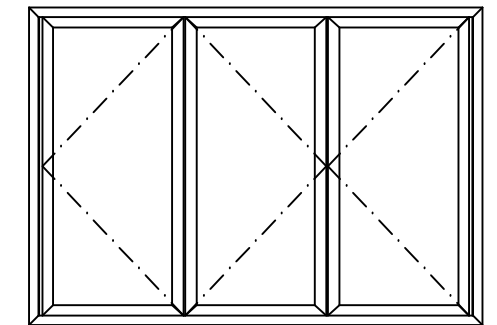
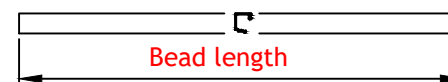
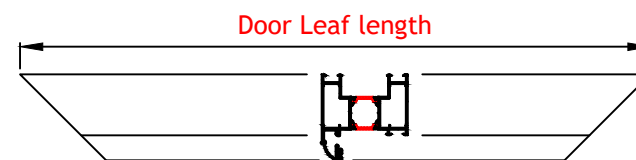
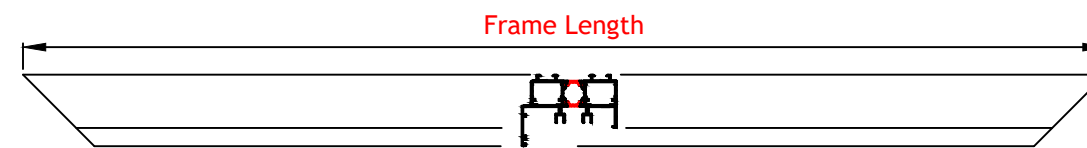
Rev - E Date - 01.02.23

Glazing Guide

AP300 Bi-fold Door System

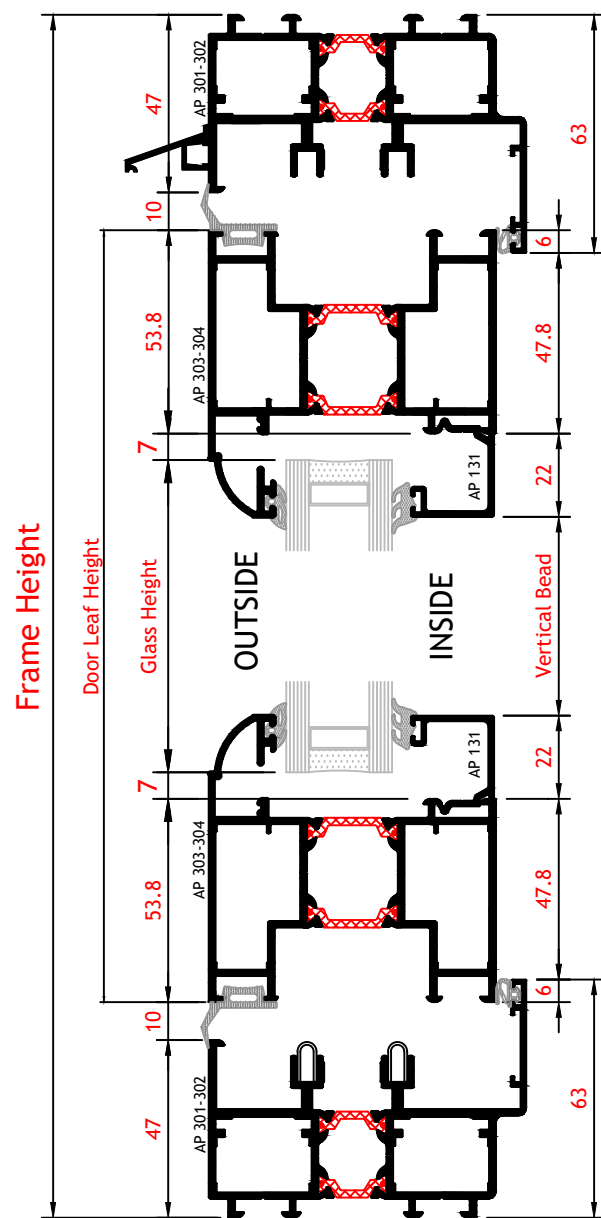
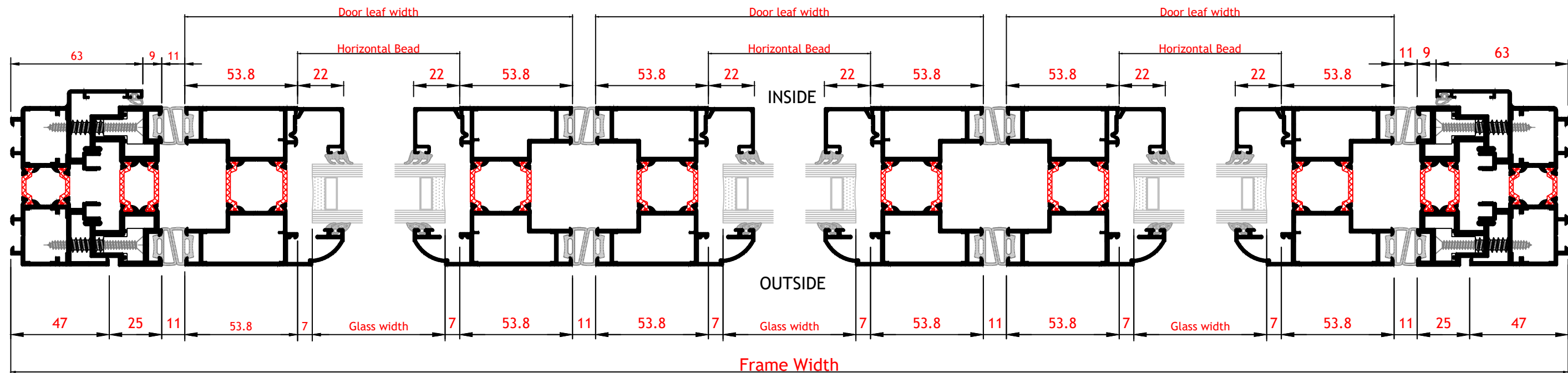


ITEM		SECTION	LENGTH	PREPERATION
Frame	(horizontal)	AP 301-302	Frame width	45° Mitre
Frame	(vertical)	AP 301-302	Frame heigth	45° Mitre
Door Leaf	(horizontal)	AP 303-304	$(\text{Frame width} - 191) \div 3$	45° Mitre
Door Leaf	(vertical)	AP 303-304	Frame height -114	45° Mitre
Adjuster	(vertical)	AP 305-305	(Frame height-60)	notch (APB 5:7:2)
External Rebate	(vertical)	AP 306	(Frame height -132)	Square Cut
Internal Rebate	(vertical)	AP 306	(Frame height -114)	Square Cut
Bead	(horizontal)	AP 131	$(\text{Frame width} - 510.8) \div 3$	Square Cut
Bead	(vertical)	AP 131	Frame height -265.6	Square Cut
Track	-	-	Frame width -86	Square Cut
Glass Width	-	-	$(\text{Frame width} - 552.8) \div 3$	-
Glass Height	-	-	Frame height -235.6	-

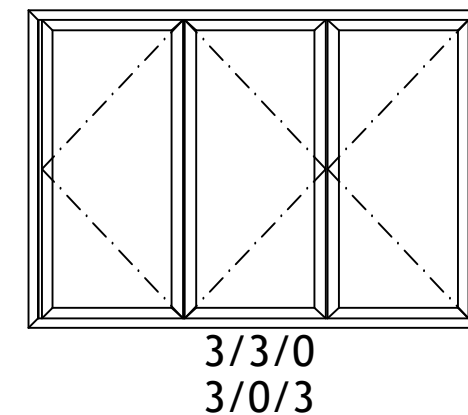
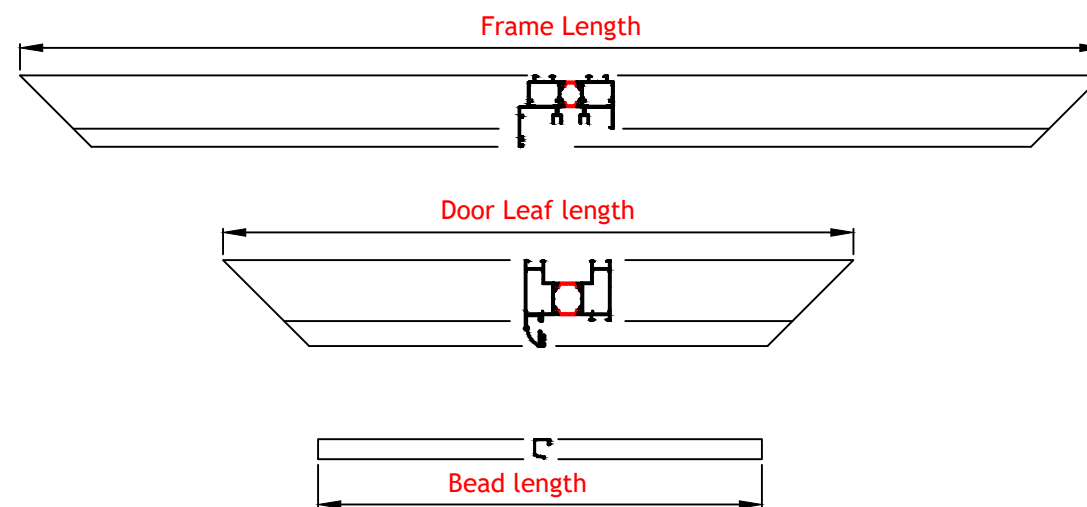


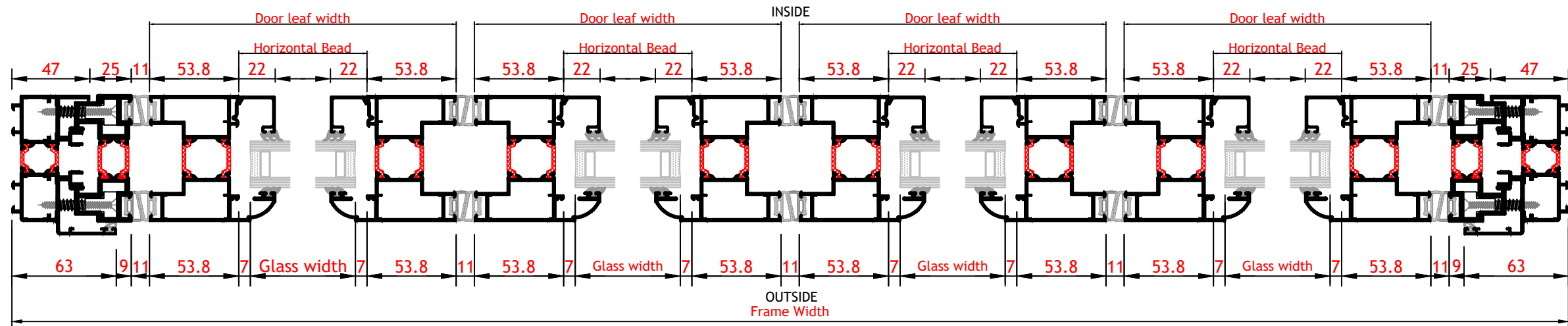
3/3/0
3/0/3

3/3/0- 3/0/3 (Open in) Fabrication & Glass Formula
Fully Framed
AP 300 Door System

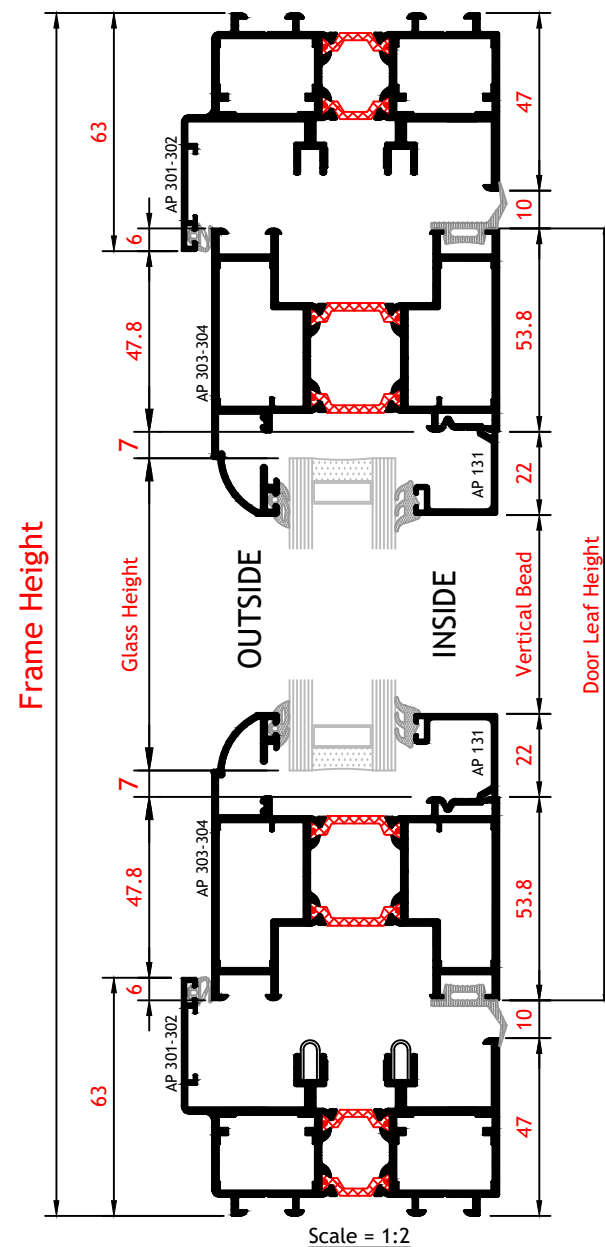


ITEM		SECTION	LENGTH	PREPERATION
Frame	(horizontal)	AP 301-302	Frame width	45° Mitre
Frame	(vertical)	AP 301-302	Frame height	45° Mitre
Door Leaf	(horizontal)	AP 303-304	$(\text{Frame width} - 191) \div 3$	45° Mitre
Door Leaf	(vertical)	AP 303-304	Frame height - 114	45° Mitre
Adjuster	(vertical)	AP 305-305	$(\text{Frame height} - 60)$	notch (APB 5:7:2)
Internal Rebate	(vertical)	AP 306	$(\text{Frame height} - 132)$	Square Cut
External Rebate	(vertical)	AP 306	$(\text{Frame height} - 114)$	Square Cut
Bead	(horizontal)	AP 131	$(\text{Frame width} - 510.8) \div 3$	Square Cut
Bead	(vertical)	AP 131	Frame height - 265.6	Square Cut
Drip Rail	-	AT 10	Frame width - 50	Square Cut
Track	-	-	Frame width - 86	Square Cut
Glass Width	-	-	$(\text{Frame width} - 552.8) \div 3$	-
Glass Height	-	-	Frame height - 235.6	-



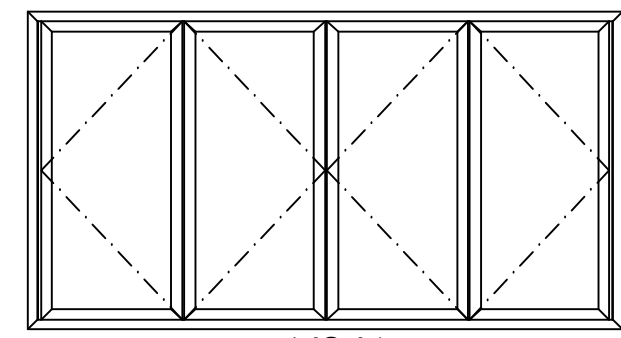
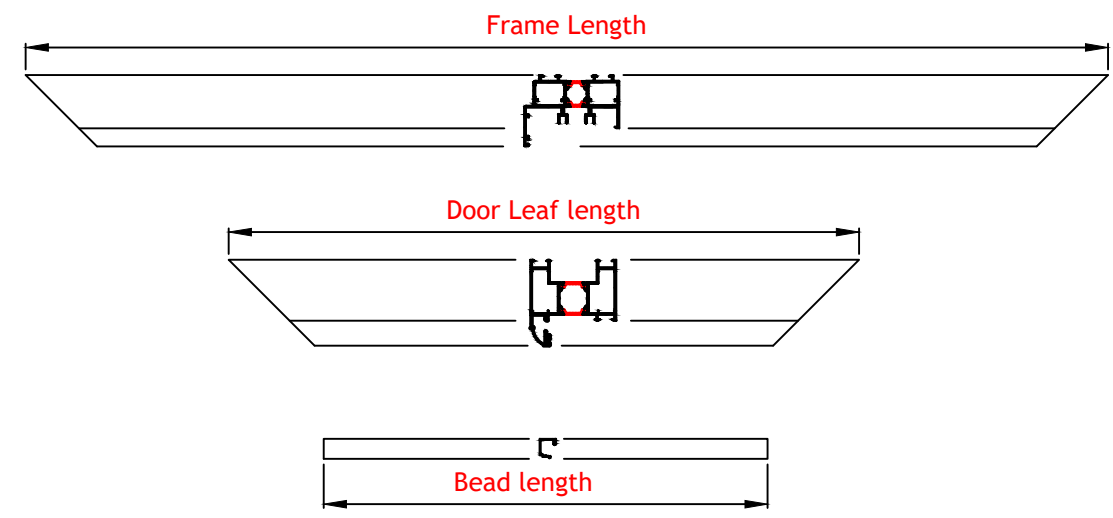


Scale = 1:3



Scale = 1:2

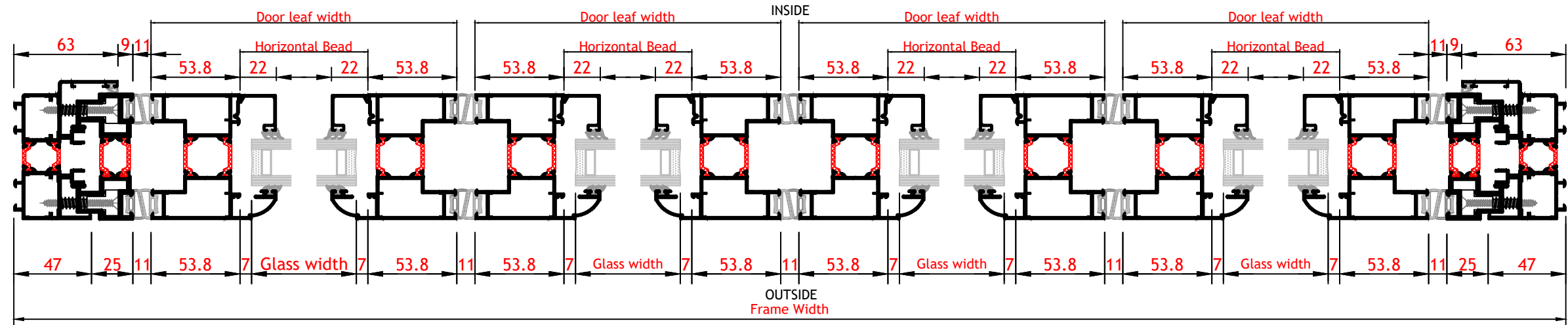
ITEM		SECTION	LENGTH	PREPERATION
Frame	(horizontal)	AP 301-302	Frame width	45° Mitre
Frame	(vertical)	AP 301-302	Frame heigth	45° Mitre
Door Leaf	(horizontal)	AP 303-304	$(\text{Frame width} - 203) \div 4$	45° Mitre
Door Leaf	(vertical)	AP 303-304	Frame height -114	45° Mitre
Adjuster	(vertical)	AP 305-305	$(\text{Frame height} - 60)$	notch (APB 5:7:2)
External Rebate	(vertical)	AP 306	$(\text{Frame height} - 132)$	Square Cut
Internal Rebate	(vertical)	AP 306	$(\text{Frame height} - 114)$	Square Cut
Bead	(horizontal)	AP 131	$(\text{Frame width} - 629.4) \div 4$	Square Cut
Bead	(vertical)	AP 131	Frame height -265.6	Square Cut
Track	-	-	Frame width -86	Square Cut
Glass Width	-	-	$(\text{Frame width} - 685.4) \div 4$	-
Glass Height	-	-	Frame height -235.6	-



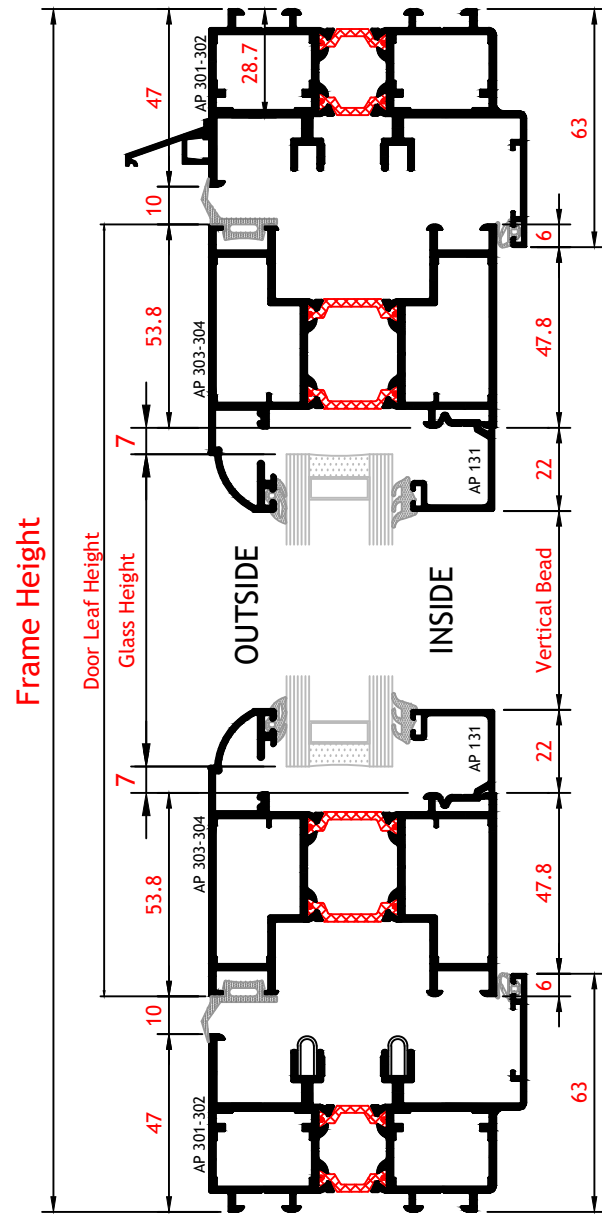
4/3/1
4/1/3

4/3/1- 4/1/3 (Open in) Fabrication & Glass Formula Fully Framed AP 300 Door System



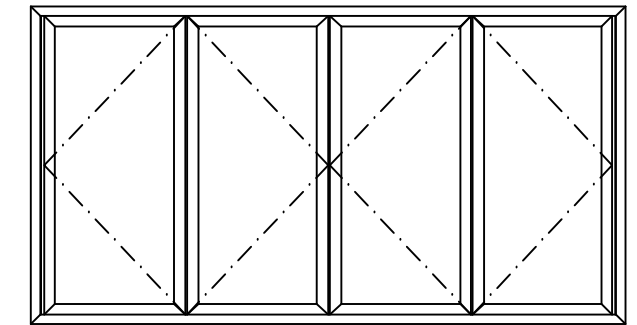
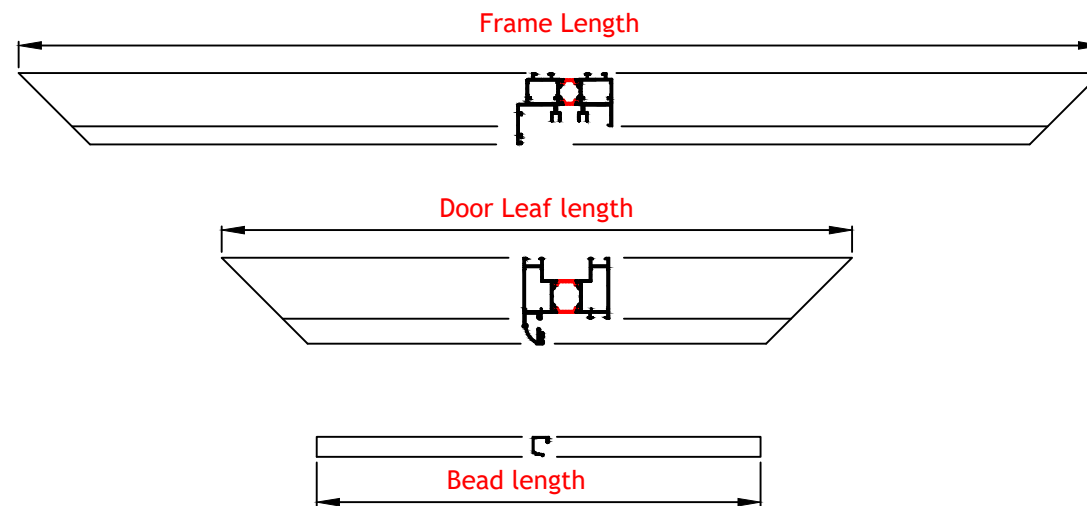


Scale = 1:3



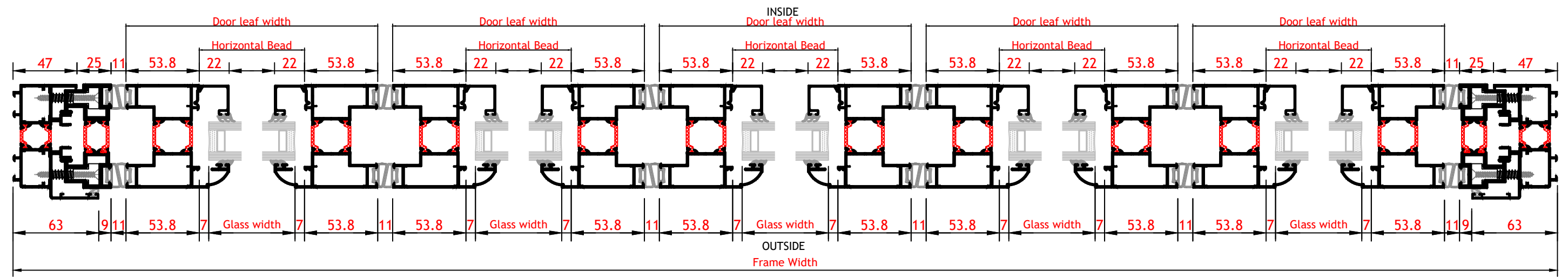
Scale = 1:2

ITEM		SECTION	LENGTH	PREPERATION
Frame	(horizontal)	AP 301-302	Frame width	45° Mitre
Frame	(vertical)	AP 301-302	Frame height	45° Mitre
Door Leaf	(horizontal)	AP 303-304	(Frame width -203) ÷ 4	45° Mitre
Door Leaf	(vertical)	AP 303-304	Frame height -114	45° Mitre
Adjuster	(vertical)	AP 305-305	(Frame height-60)	notch (APB 5:7:2)
Internal Rebate	(vertical)	AP 306	(Frame height-132)	Square Cut
External Rebate	(vertical)	AP 306	(Frame height-114)	Square Cut
Bead	(horizontal)	AP 131	(Frame width -629.4) ÷ 4	Square Cut
Bead	(vertical)	AP 131	Frame height -265.6	Square Cut
Drip Rail	-	AT 10	Frame width -50	Square Cut
Track	-	-	Frame width -86	Square Cut
Glass Width	-	-	(Frame width -685.4) ÷ 4	-
Glass Height	-	-	Frame height -235.6	-

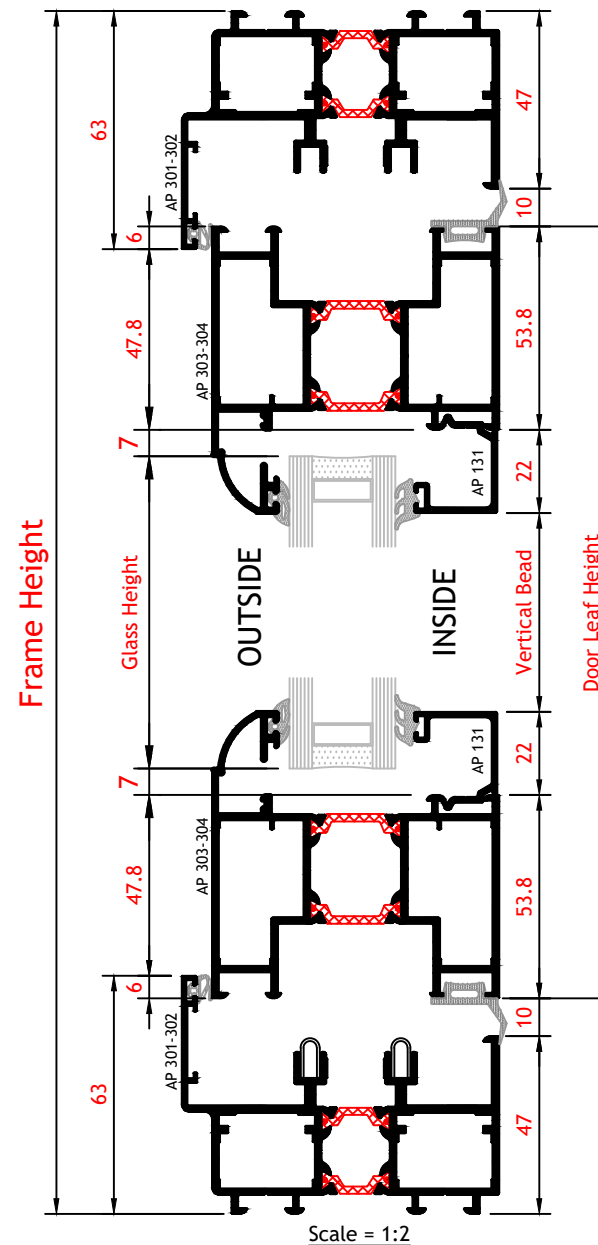


4/3/1
4/1/3

4/3/1- 4/1/3 (Open out) Fabrication & Glass Formula
Fully Framed
AP 300 Door System

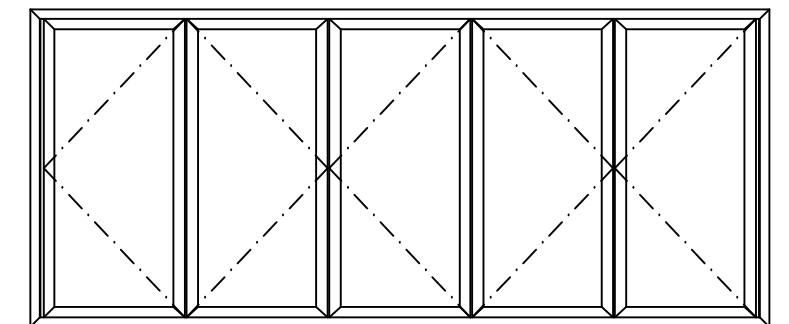
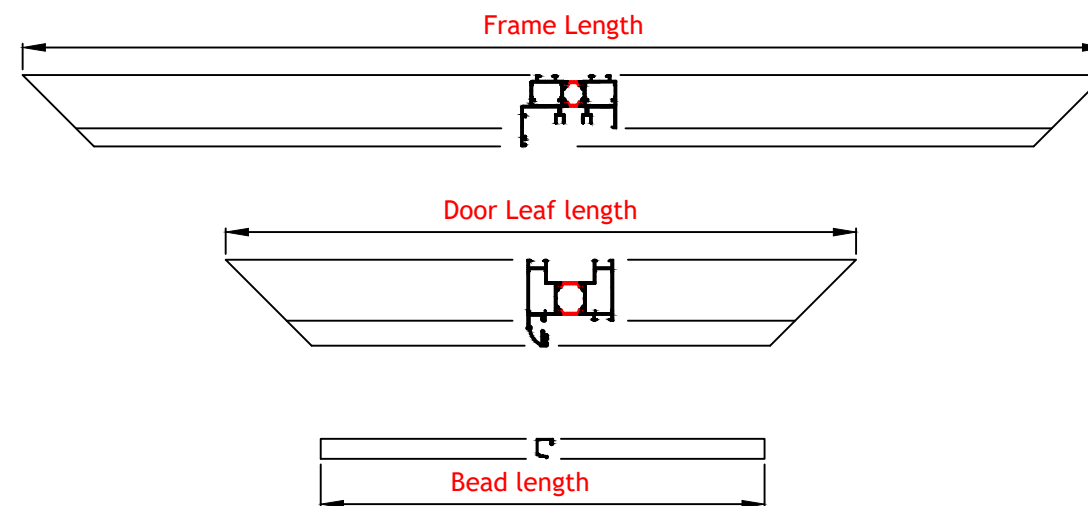


Scale = 1:3



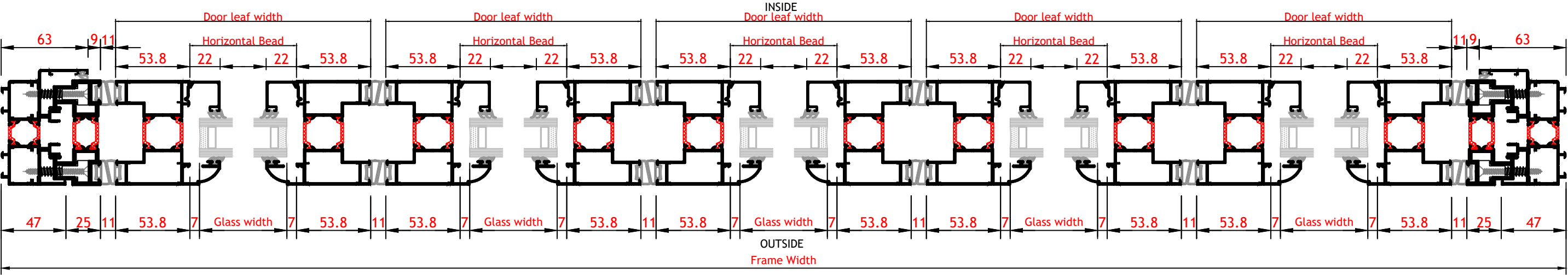
Scale = 1:2

ITEM		SECTION	LENGTH	PREPERATION
Frame	(horizontal)	AP 301-302	Frame width	45° Mitre
Frame	(vertical)	AP 301-302	Frame heigth	45° Mitre
Door Leaf	(horizontal)	AP 303-304	$(\text{Frame width} - 216) \div 5$	45° Mitre
Door Leaf	(vertical)	AP 303-304	Frame height -114	45° Mitre
Adjuster	(vertical)	AP 305-305	$(\text{Frame height} - 60)$	notch (APB 5:7:2)
External Rebate	(vertical)	AP 306	$(\text{Frame height} - 132)$	Square Cut
Internal Rebate	(vertical)	AP 306	$(\text{Frame height} - 114)$	Square Cut
Bead	(horizontal)	AP 131	$(\text{Frame width} - 748) \div 5$	Square Cut
Bead	(vertical)	AP 131	Frame height -265.6	Square Cut
Track	-	-	Frame width -86	Square Cut
Glass Width	-	-	$(\text{Frame width} - 818) \div 5$	-
Glass Height	-	-	Frame height -235.6	-

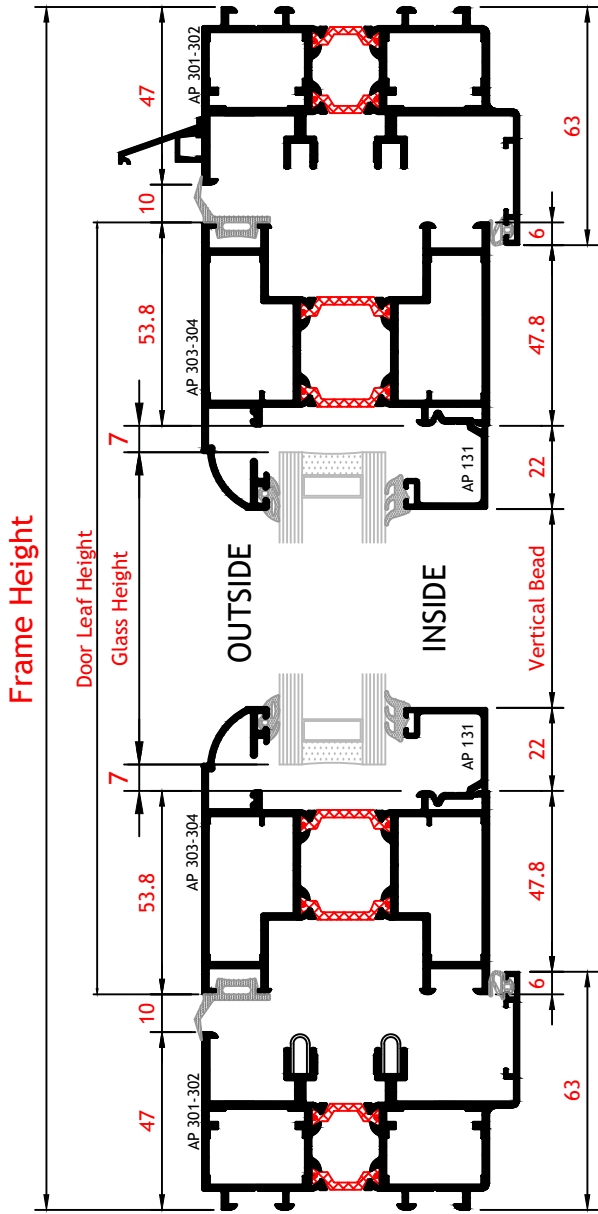


5/5/0
5/0/5

5/5/0- 5/0/5(Open in) Fabrication & Glass Formula
Fully Framed
AP 300 Door System

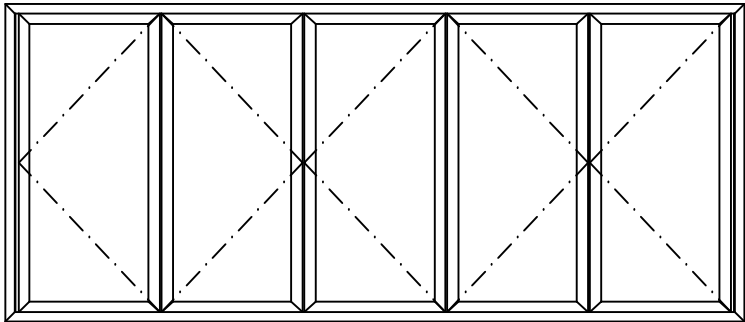
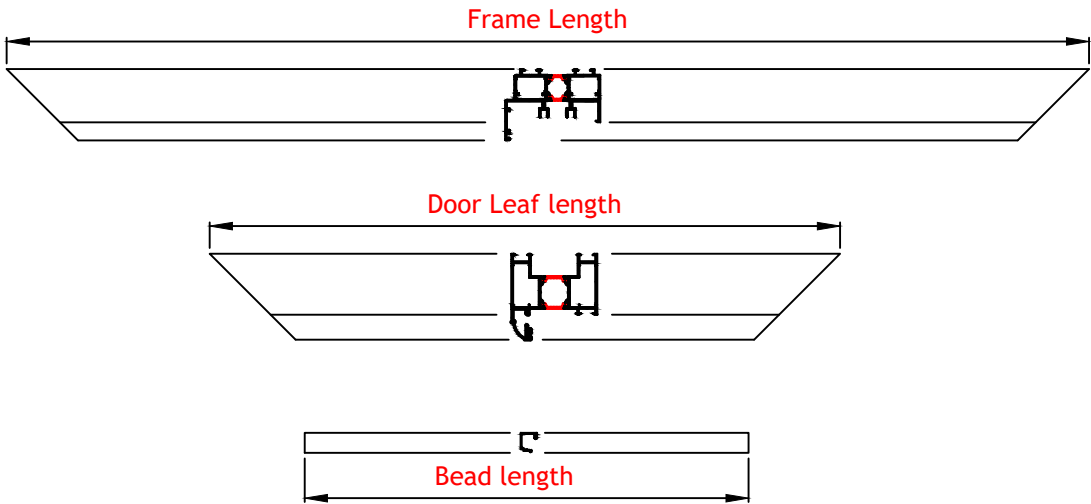


Scale = 1:3



Scale = 1:2

ITEM		SECTION	LENGTH	PREPERATION
Frame	(horizontal)	AP 301-302	Frame width	45° Mitre
Frame	(vertical)	AP 301-302	Frame heigth	45° Mitre
Door Leaf	(horizontal)	AP 303-304	$(\text{Frame width} - 216) \div 5$	45° Mitre
Door Leaf	(vertical)	AP 303-304	Frame height -114	45° Mitre
Adjuster	(vertical)	AP 305-305	$(\text{Frame height} - 60)$	notch (APD 5:7:2)
Internal Rebate	(vertical)	AP 306	$(\text{Frame height} - 132)$	Square Cut
External Rebate	(vertical)	AP 306	$(\text{Frame height} - 114)$	Square Cut
Bead	(horizontal)	AP 131	$(\text{Frame width} - 748) \div 5$	Square Cut
Bead	(vertical)	AP 131	Frame height -265.6	Square Cut
Drip Rail	-	AT 10	Frame width -50	Square Cut
Track	-	-	Frame width -86	Square Cut
Glass Width	-	-	$(\text{Frame width} - 818) \div 5$	-
Glass Height	-	-	Frame height -235.6	-

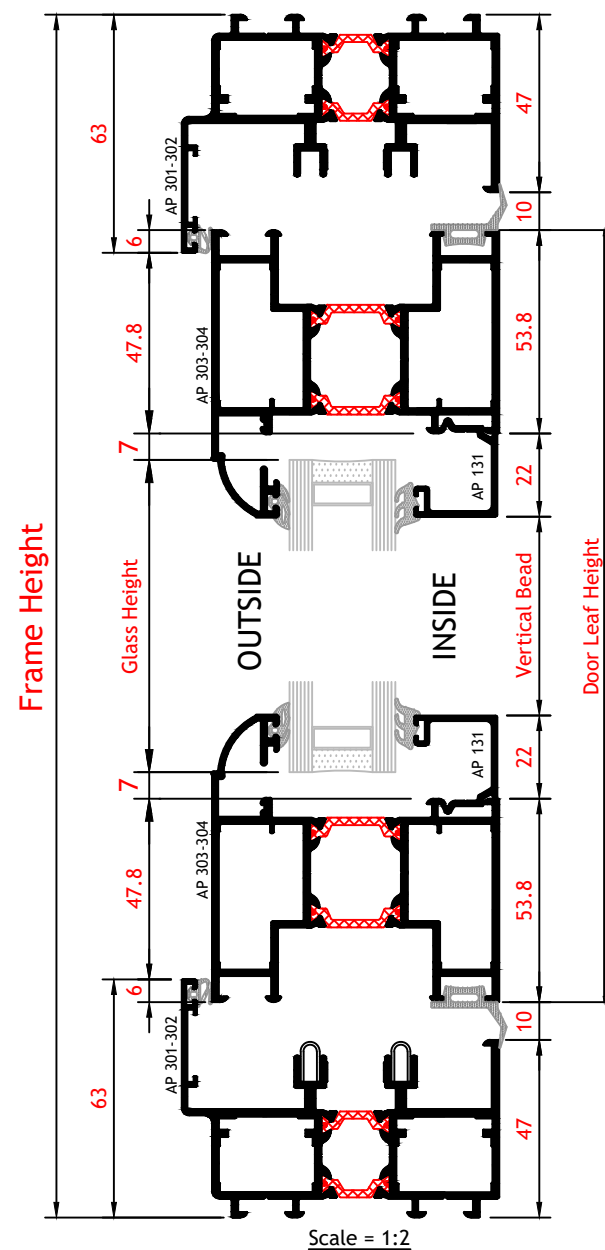
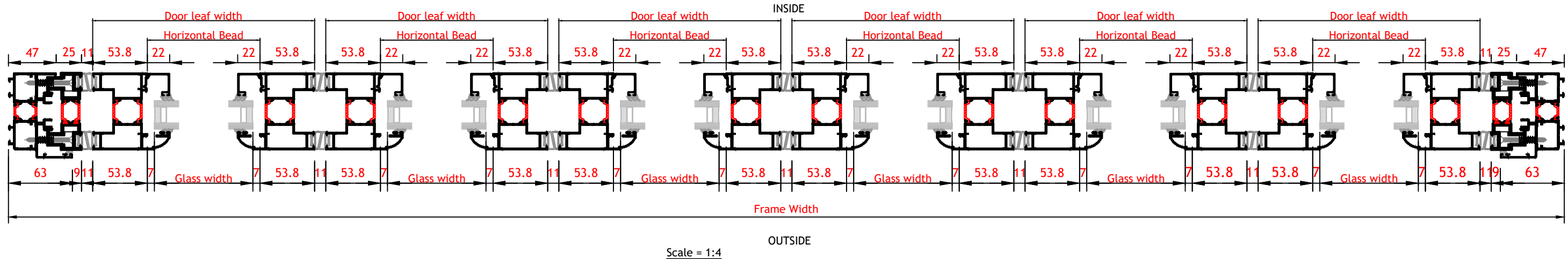


5/5/0- 5/0/5(Open out) Fabrication & Glass Formula
Fully Framed
AP 300 Door System

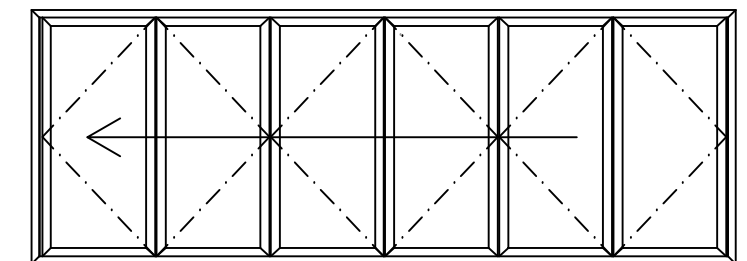
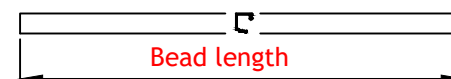
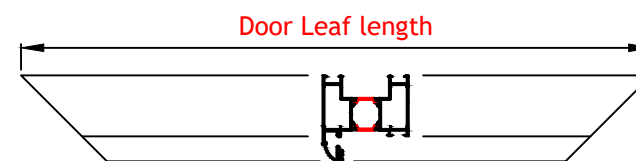
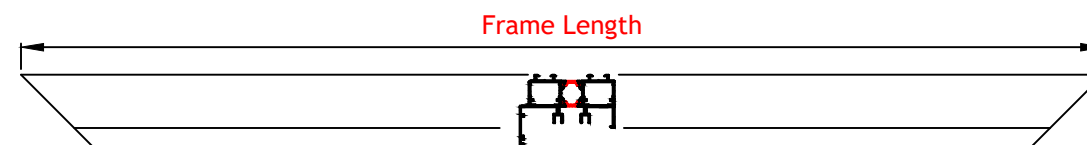
D
E
F

A- Leaf width adjusted by 7mm 13-02-15
B- configurations 6-5-1 & 6-1-5 added
C

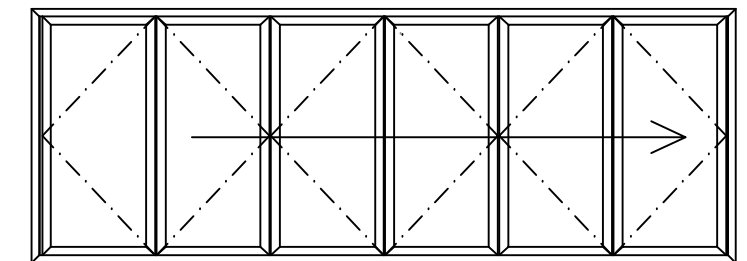
Revisions



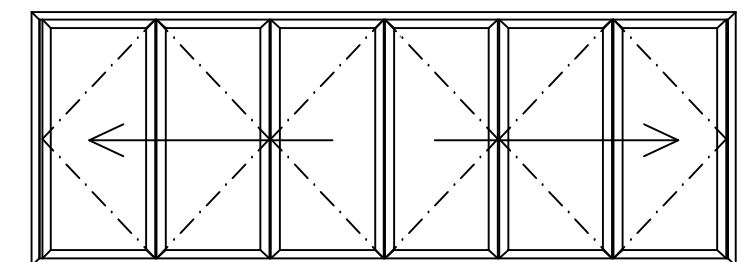
ITEM		SECTION	LENGTH	PREPERATION
Frame	(horizontal)	AP 301-302	Frame width	45° Mitre
Frame	(vertical)	AP 301-302	Frame height	45° Mitre
Door Leaf	(horizontal)	AP 303-304	(Frame width -228)÷6	45° Mitre
Door Leaf	(vertical)	AP 303-304	Frame height -114	45° Mitre
Adjuster	(vertical)	AP 305-305	(Frame height-60)	notch (APD 5:7:3)
External Rebate	(vertical)	AP 306	(Frame height -132)	Square Cut
Internal Rebate	(vertical)	AP 306	(Frame height -114)	Square Cut
Bead	(horizontal)	AP 131	(Frame width -866.6)÷6	Square Cut
Bead	(vertical)	AP 131	Frame height -265.6	Square Cut
Track	-	-	Frame width -86	Square Cut
Glass Width	-	-	(Frame width -950.6)÷6	-
Glass Height	-	-	Frame height -235.6	-



6/5/1



6/1/5

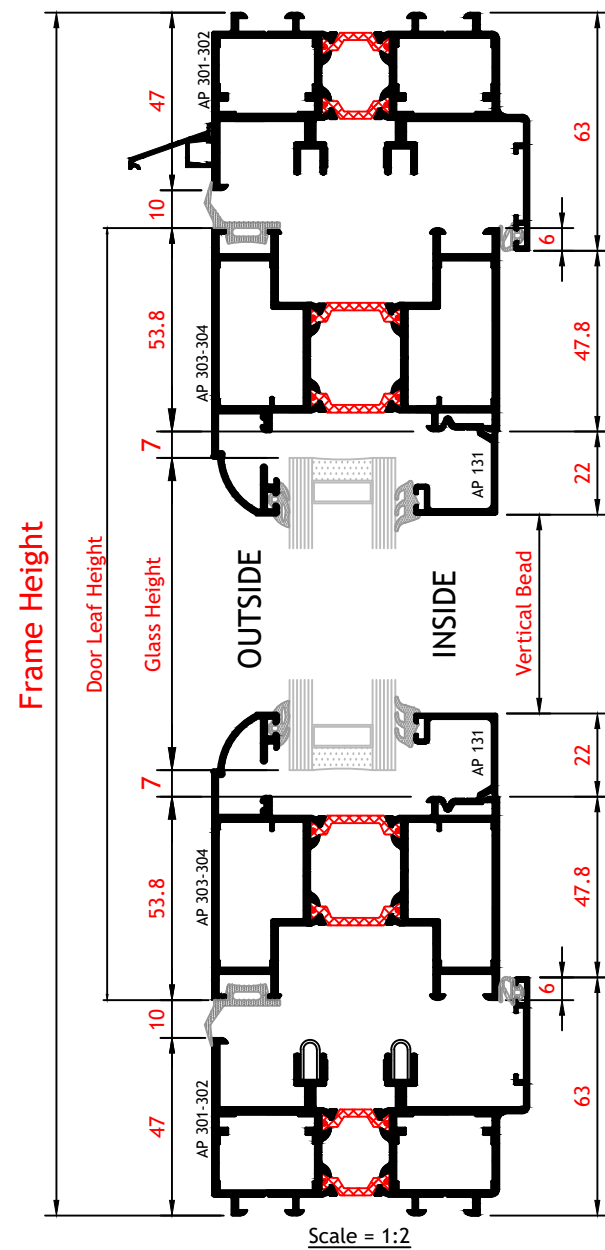
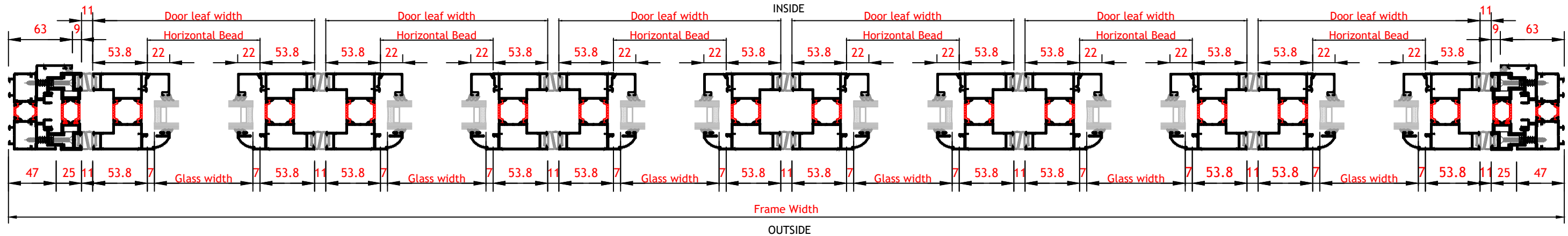


6/3/3

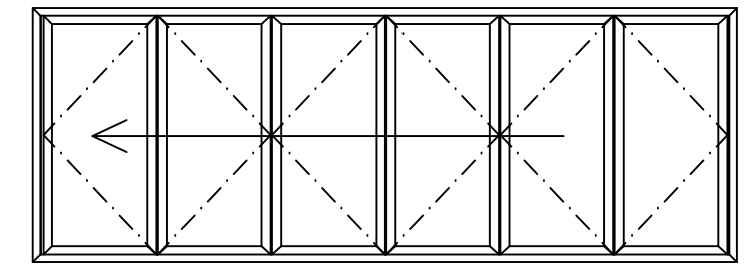
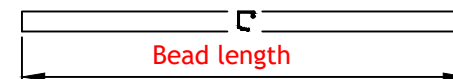
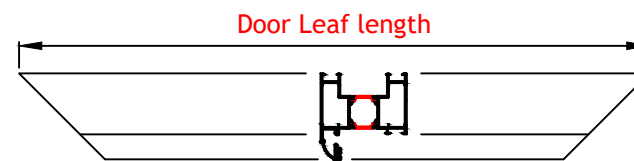
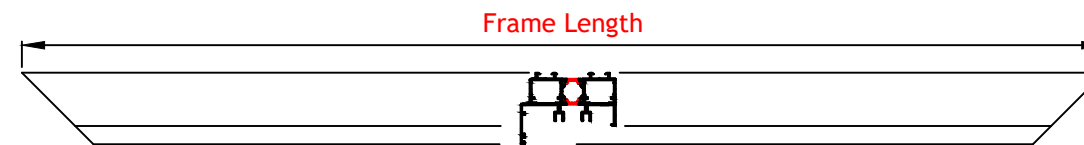
D
E
F

A- Leaf width adjusted by 7mm 13-02-15
B- configurations 6-5-1 & 6-1-5 added
C

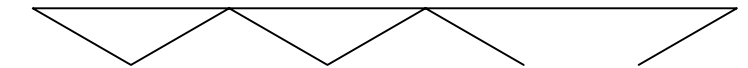
Revisions



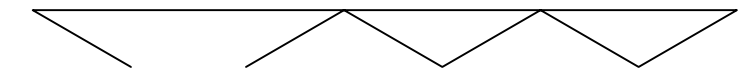
ITEM		SECTION	LENGTH	PREPERATION
Frame	(horizontal)	AP 301-302	Frame width	45° Mitre
Frame	(vertical)	AP 301-302	Frame height	45° Mitre
Door Leaf	(horizontal)	AP 303-304	(Frame width -228)÷6	45° Mitre
Door Leaf	(vertical)	AP 303-304	Frame height -114	45° Mitre
Adjuster	(vertical)	AP 305-305	(Frame height-60)	notch (APB 5:7:2)
Internal Rebate	(vertical)	AP 306	(Frame height -132)	Square Cut
External Rebate	(vertical)	AP 306	(Frame height -114)	Square Cut
Bead	(horizontal)	AP 131	(Frame width -866.6)÷6	Square Cut
Bead	(vertical)	AP 131	Frame height -265.6	Square Cut
Drip Rail		AT 10	Frame width -50	Square Cut
Track		-	Frame width -86	÷6 Square Cut
Glass Width		-	(Frame width -950.6)	-
Glass Height		-	Frame height -235.6	-



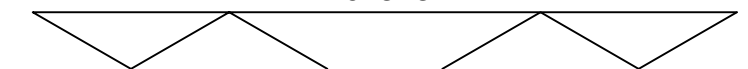
6/5/1

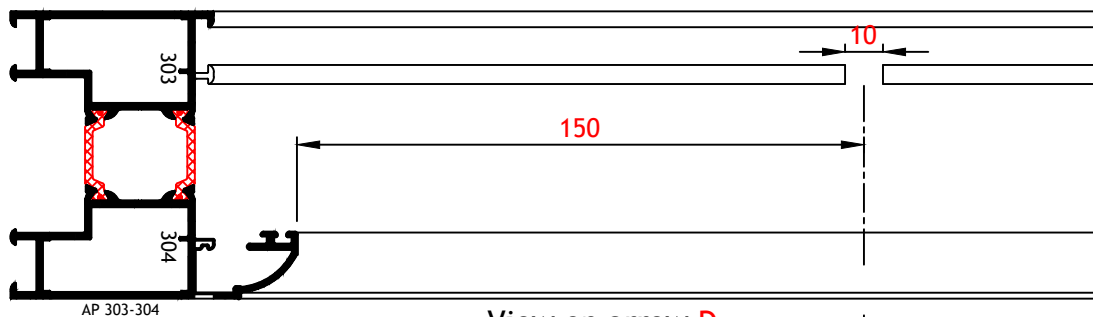


6/1/5

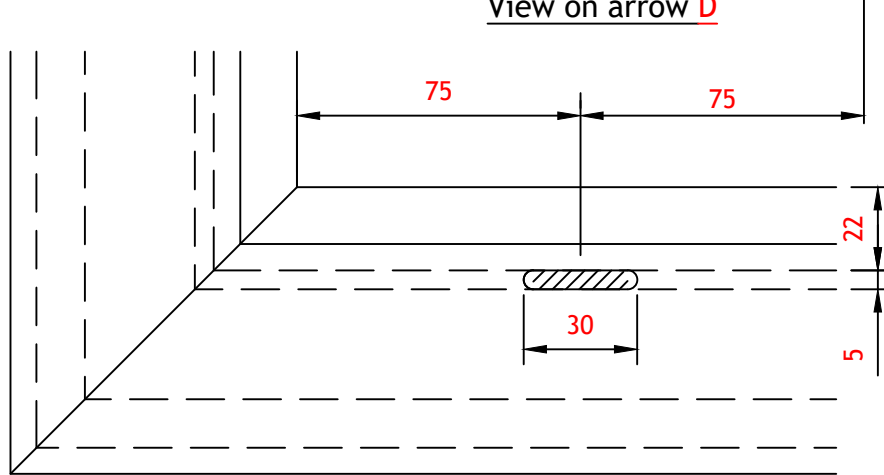


6/3/3



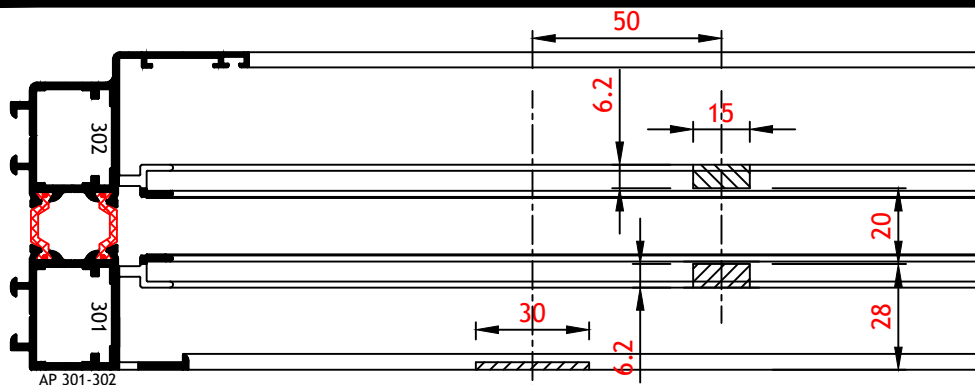
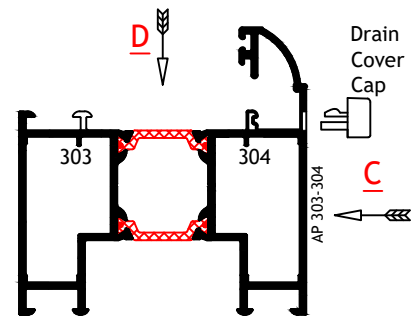


View on arrow **D**

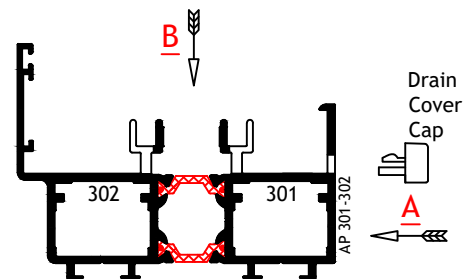
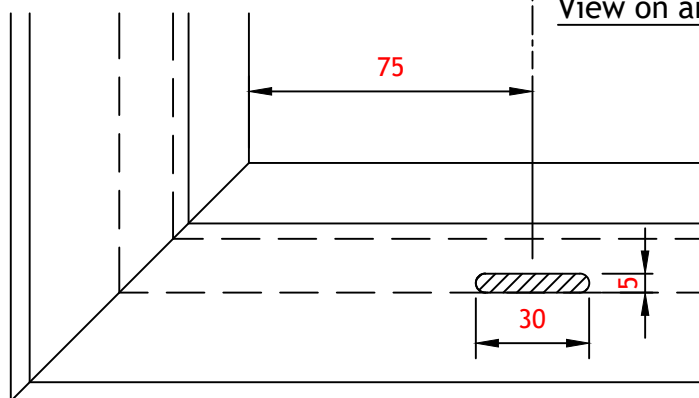


View on arrow **C**

Open Out Door Leaf



View on arrow **B**



Note: 1500mm maximum
distance between drainage
slot

View on arrow **A**
Open Out Door Outer Frame

Open Out Door Drainage Details AP 300 Door System



Scale 1:2 Date 10.03.14

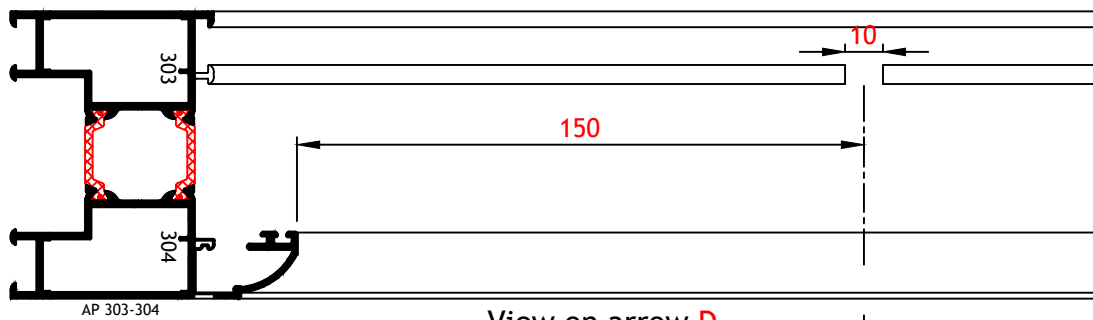
Page **APB-5:2:1**

Rev. - Date -

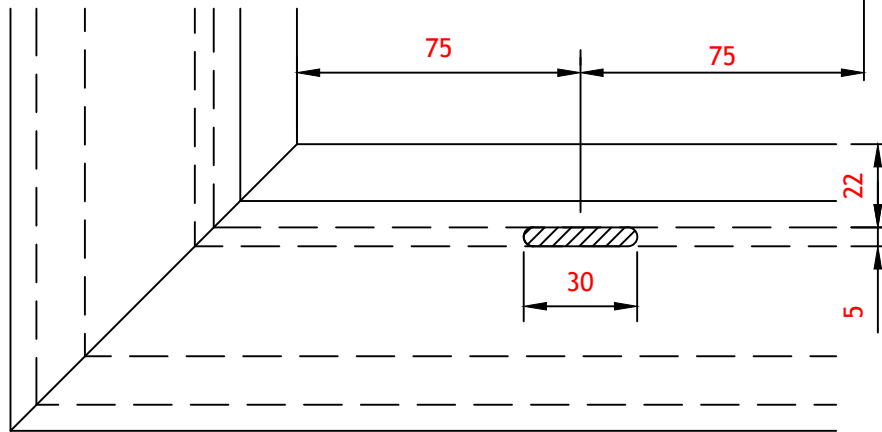
D
E
F

A-./.
B
C

Revisions

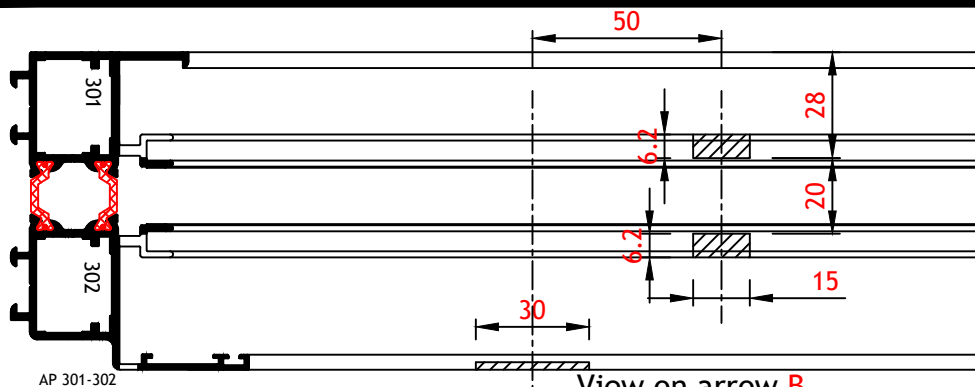
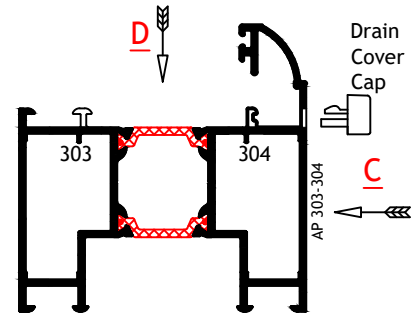


View on arrow **D**

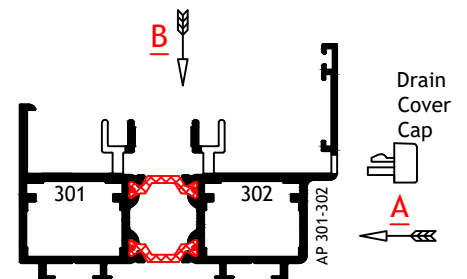
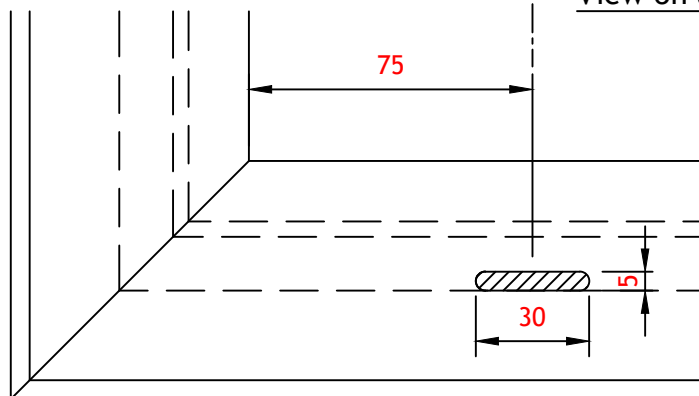


View on arrow **C**

Open Out Door Leaf



View on arrow **B**



Note: 1500mm maximum
distance between drainage
slot

View on arrow **A**
Open Out Door Outer Frame

Open In Door Drainage Details AP 300 Door System


Maximum Door leaf weight: 100kg

76

11.5 11.5

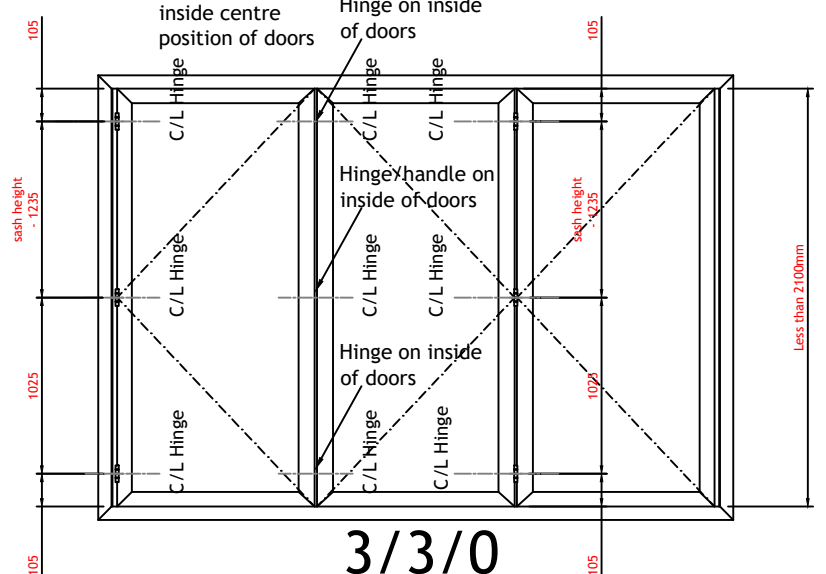
0.3 0.5

C/L of hinge



90mm Butt Hinge

Date 28.10.21



aps
● aluminium & plastics systems

- aluminium & plastics systems

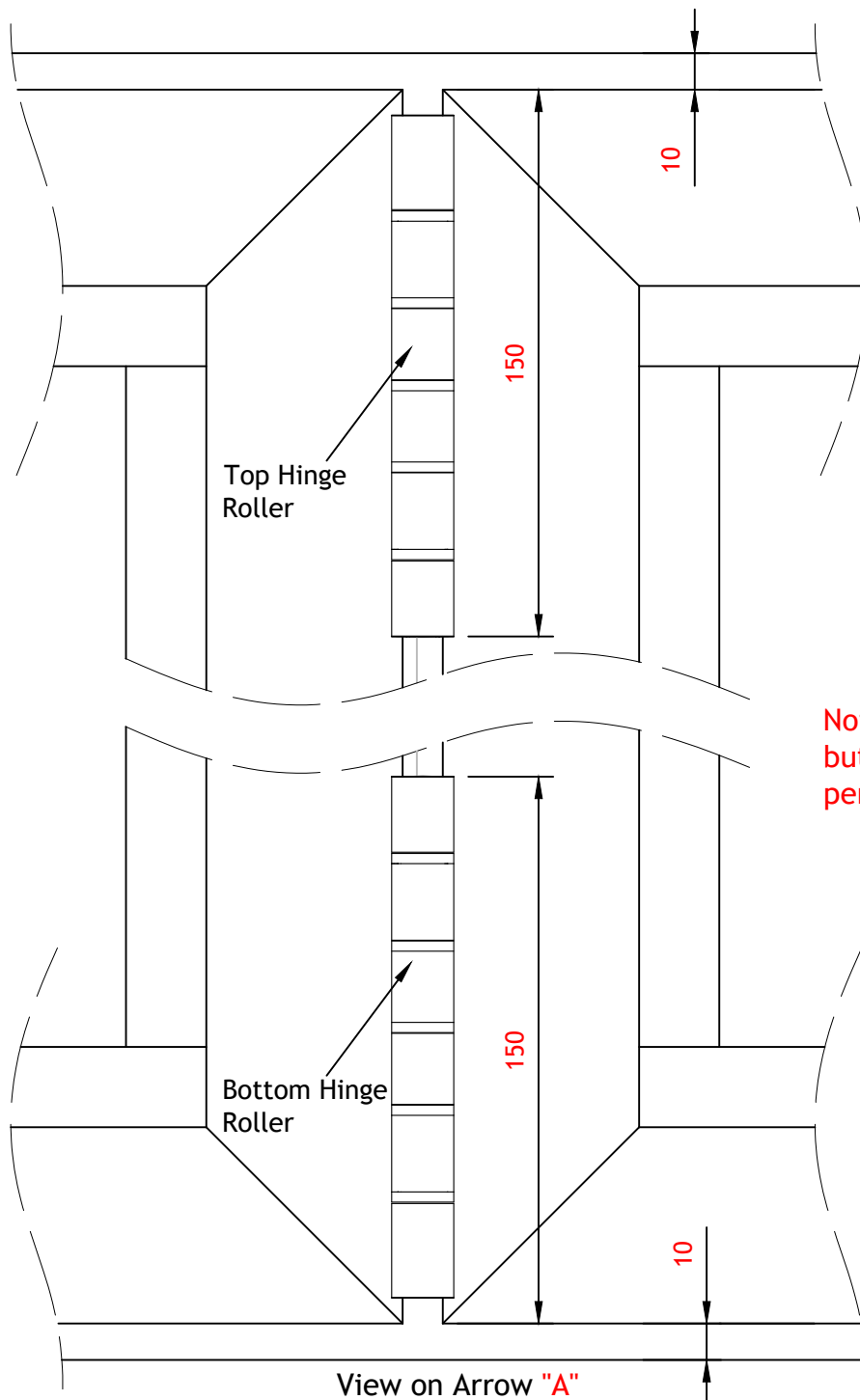
Revisions

D
E
F

D
E
F

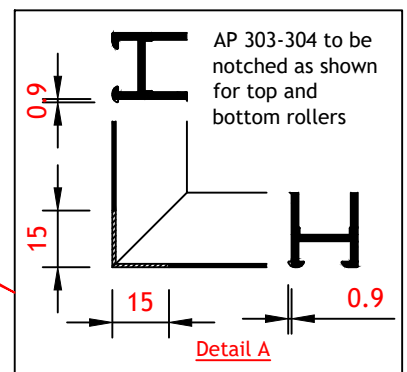
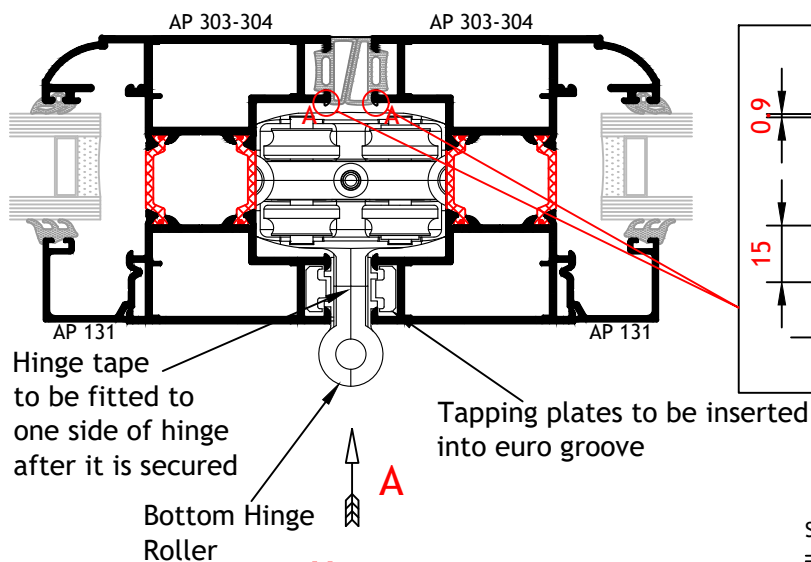
A-./.
B
C

Revisions



Note: Intermediary butt hinges fitted as per APB 5:3:1

View on Arrow "A"



CRIMPING PROCEDURE

1. Ensure all components are free from swarf and remove any grease and dirt with a suitable cleaning agent

2. Mix and apply Cosmofen AL 2 part epoxy adhesive to the cleat chambers and chevron grooves of both bars. Apply small gap sealant to the mating surface of one bar only

3. Install corner cleats and chevrons as shown below and push bars together ensuring the mitre joint is flush and angle is correct.

4. Crimp assembled components

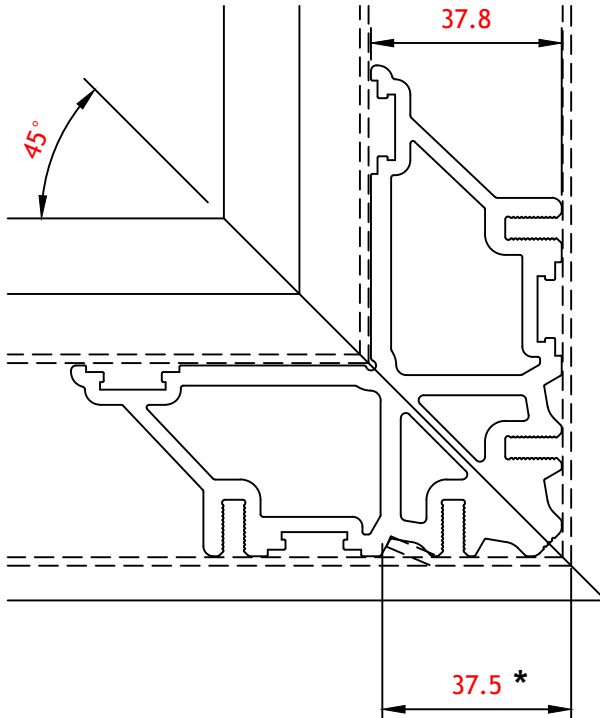
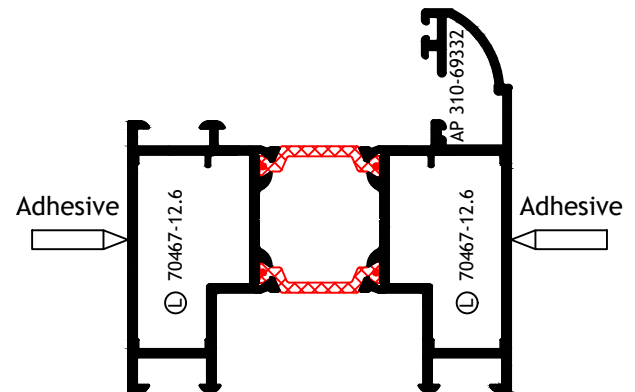
5. Check crimped mitre joint is flush, angle is correct and there is no movement within the joint. Clean excessive sealant off visible surfaces and apply silicone sealant to joint crimps

Note,

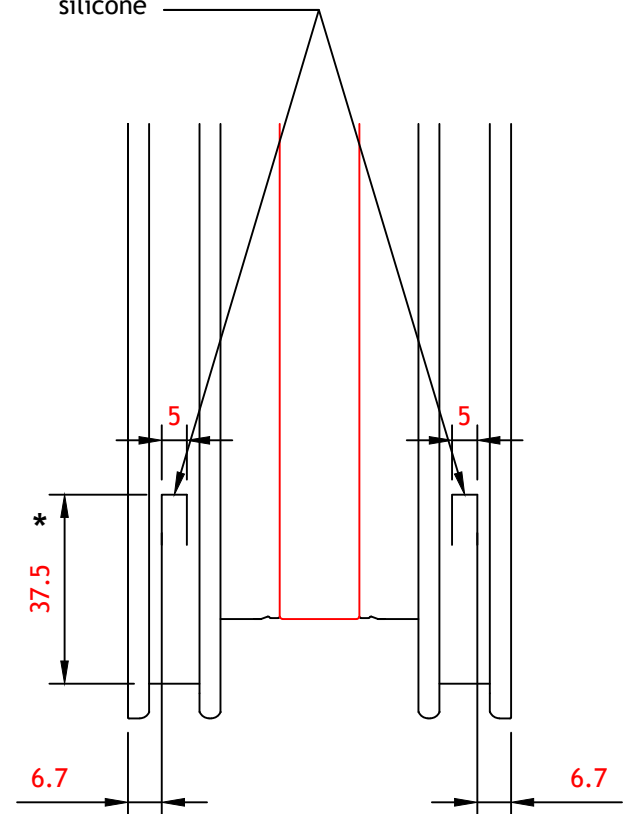
* 37.5mm dimension may require adjustment to ensure a tight joint.

APS recommend a trial corner be produced prior to commencing window manufacture

Section AP 303-304



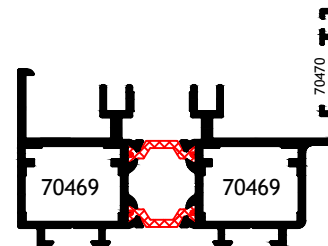
After crimping please ensure that the crimped holes are sealed with silicone



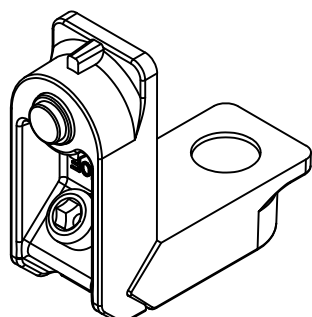
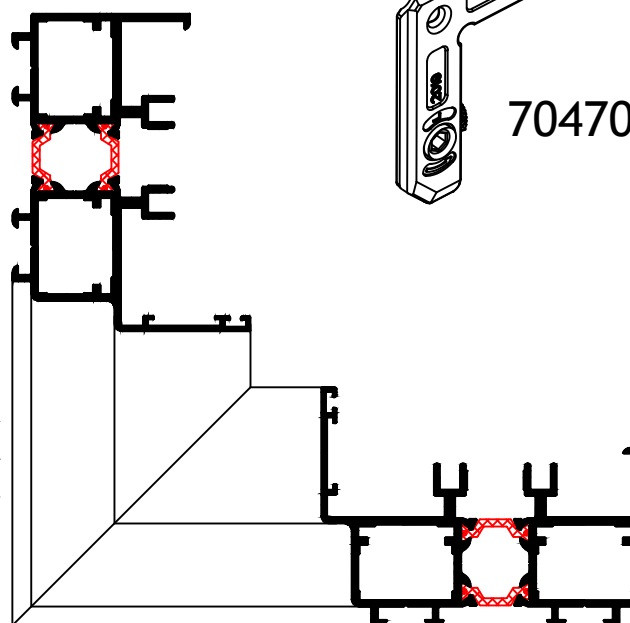
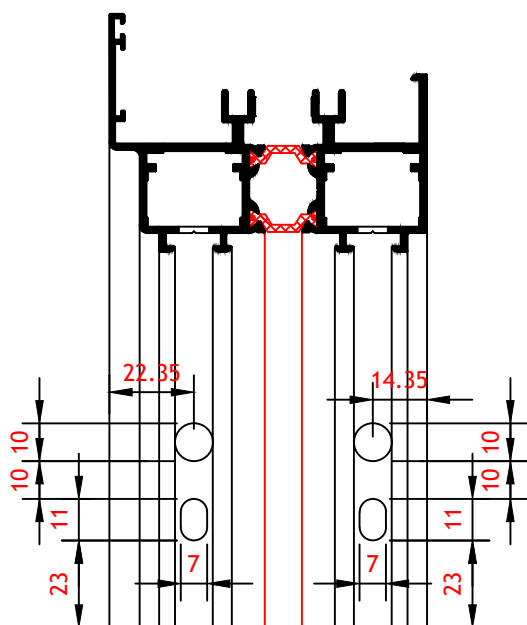
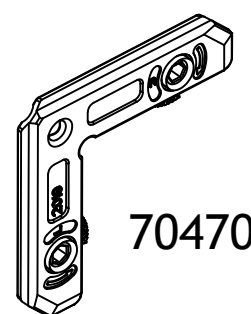
CORNER JOINING PROCEDURE

1. Ensure all components are free from swarf and remove any grease and dirt with a suitable cleaning agent
2. Apply small gap sealant to the mating surface of one bar only.
3. Install corner cleats and chevrons and push bars together ensuring the mitre joint is flush and angle is correct.
4. Use necessary allen key to tighten cleat and lock chevron into position.
5. Check mitre joint is flush, angle is correct and there is no movement within the joint. Clean excessive sealant off visible surfaces.

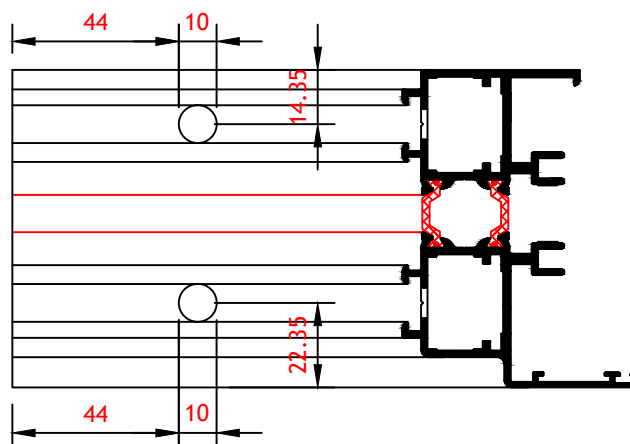
Note,
APS recommend a trial corner be produced prior to commencing frame manufacture



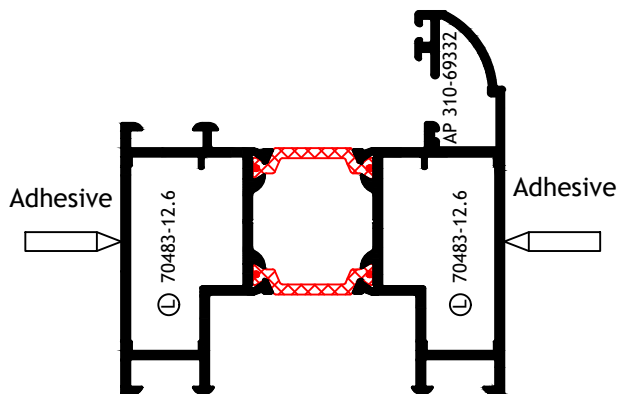
Section AP 301-302



70469

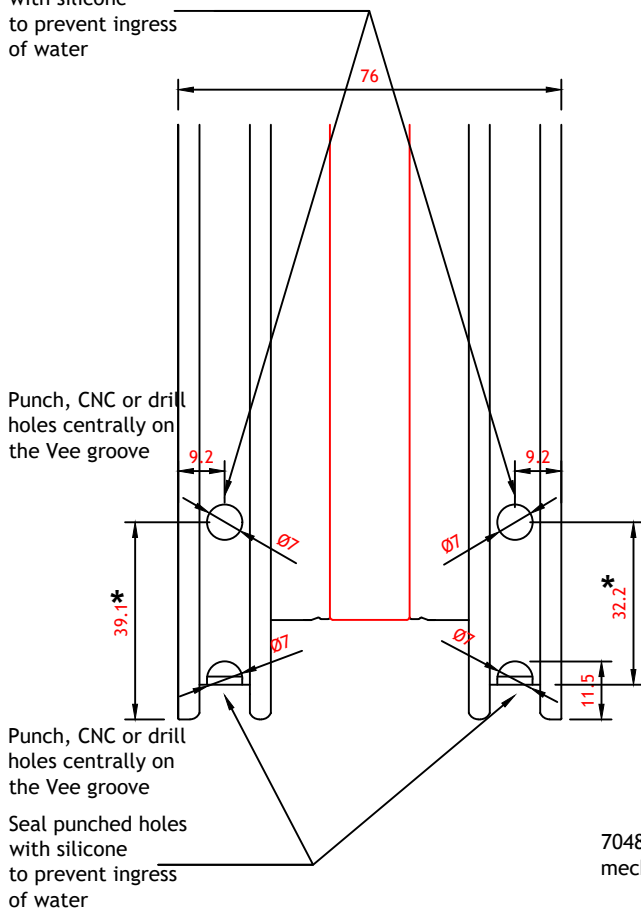


AP 301-302 Door Frame Frame Corner Joint AP 300 Door System



Section AP 303-304

Seal punched holes with silicone to prevent ingress of water



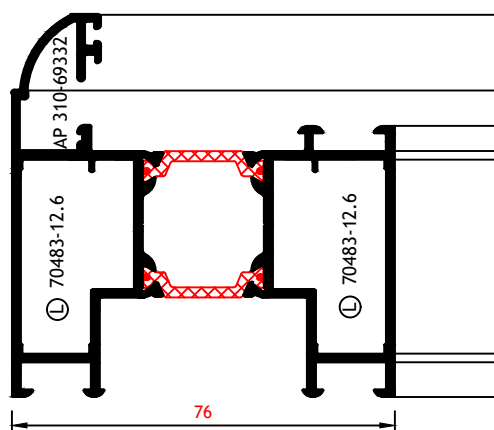
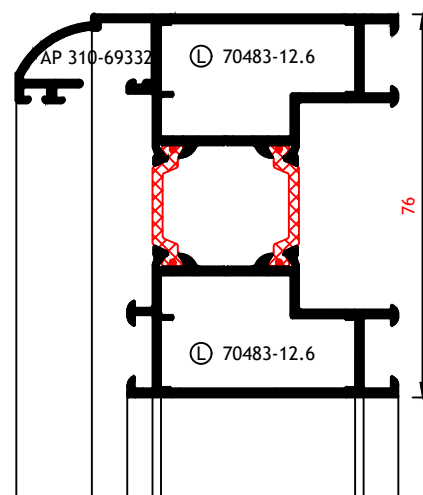
MECHANICAL JOINT PROCEDURE

1. Ensure all components are free from swarf and remove any grease and dirt with a suitable cleaning agent
2. Punch, drill or CNC 7mm diameter holes in the outer frame as indicated to allow the button on the cleat to locate
3. Mix and apply Cosmofen AL 2 part epoxy adhesive to the cleat chambers and chevron grooves of both bars. Apply small gap sealant to the mating surface of one bar only
4. Install corner cleats and chevrons as shown below and push bars together ensuring the mitre joint is flush and angle is correct
5. Tighten up the grub screw in the cleat with an allen key
6. Check mitre joint is flush, angle is correct and there is no movement within the joint. Clean excessive sealant off visible surfaces and apply silicone sealant to the punched holes

Note,

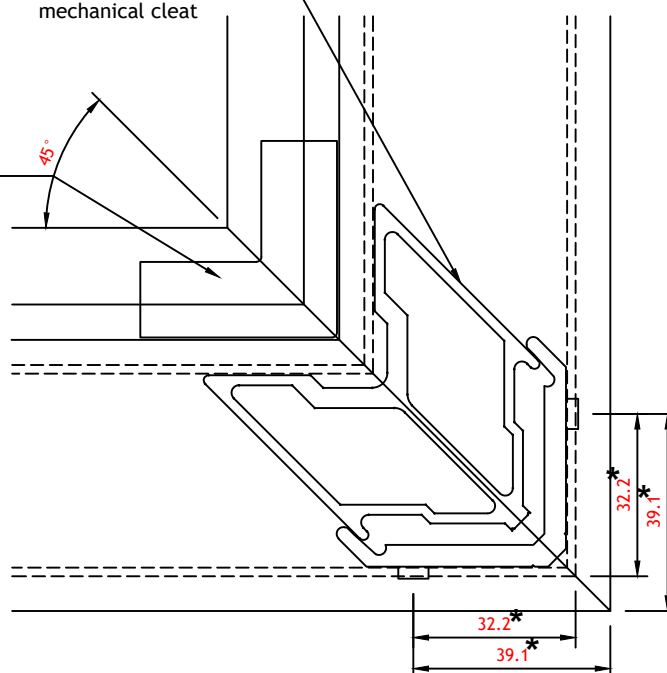
- * 39.1 mm dimension may require adjustment to ensure a tight joint.

APS recommend a trial corner be produced prior to commencing window manufacture

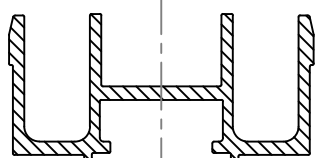
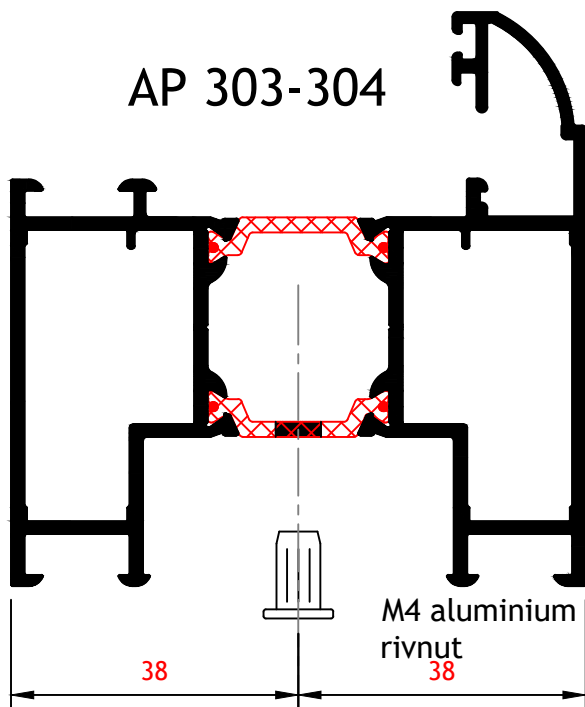


70483 mechanical cleat

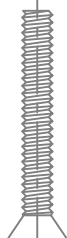
69332 cleat



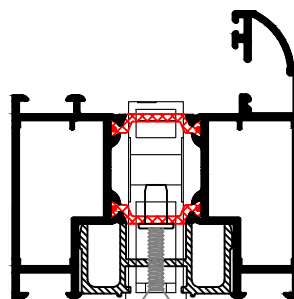
AP 303-304



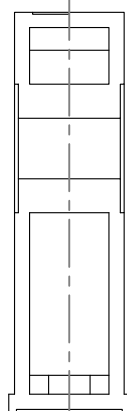
69465 PVC
lock insert



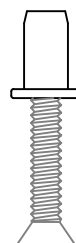
M4 X 30mm
machine screw



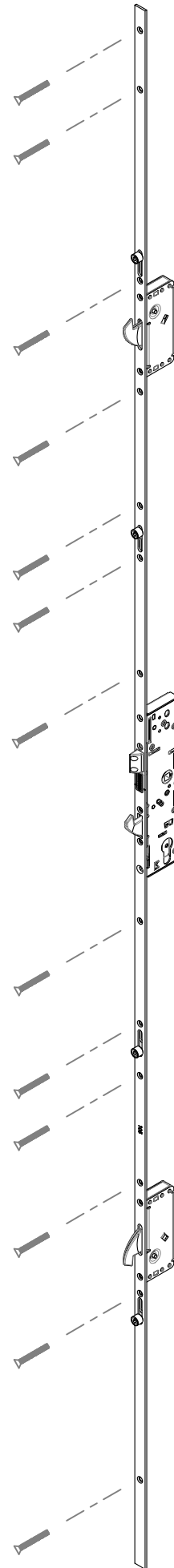
Lock in position

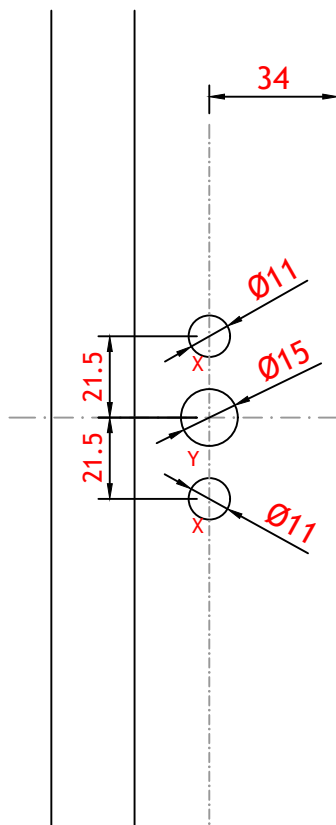


69414 lock

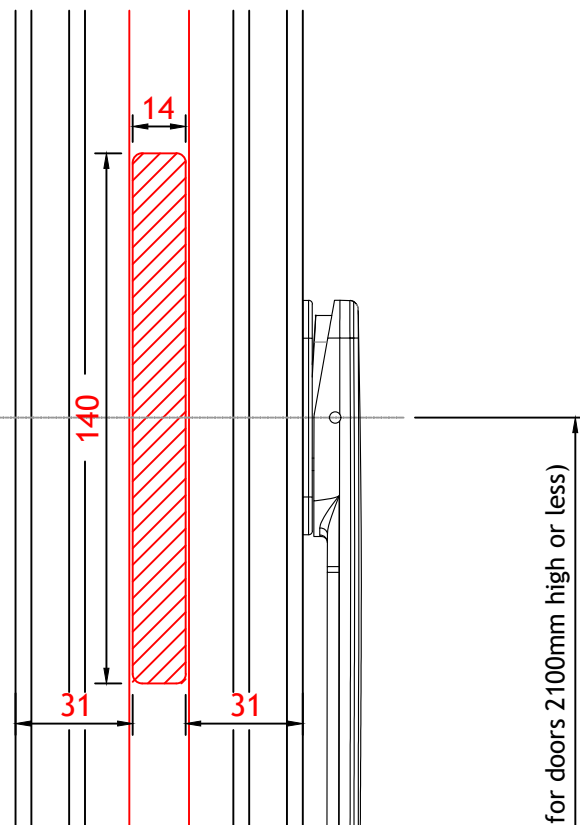


Note: Lock to be fitted
with AP 300 multi point
lock fixing 69480

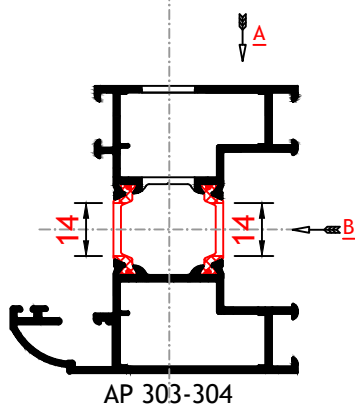




View on arrow **A**



View on arrow **B**

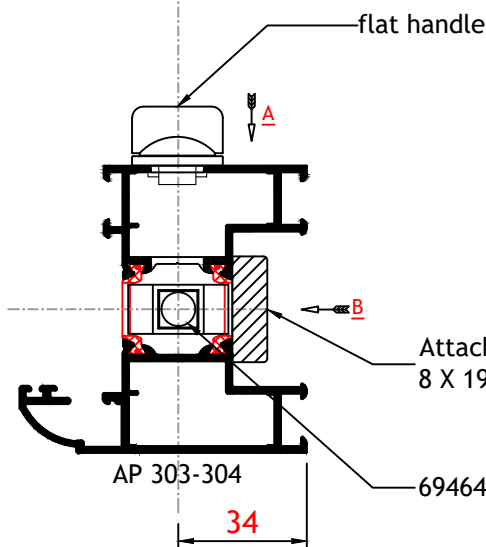


AP 303-304

Route out polyamide to dimensions indicated.

Drill holes X and Y as indicated.

Place the gear box in the prepared slot and attach the Bi Fold flush handle by screwing the two M5 x 45mm machine screws into place.

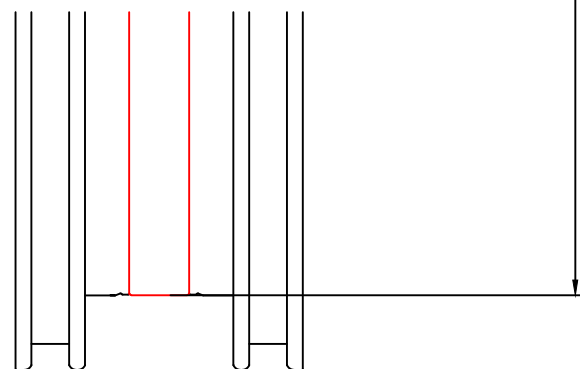


AP 303-304

Attach the 69479 gearbox cover with 2 X No 8 X 19 screws 69326

69464 gear box in place

1050 (900mm for doors 2100mm high or less)
lock height



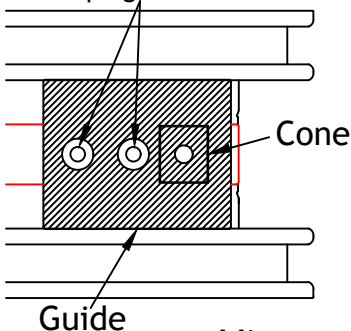
Shoot Bolt Gear Box Prep AP 300 Door System

Scale NTS Date 10.03.14

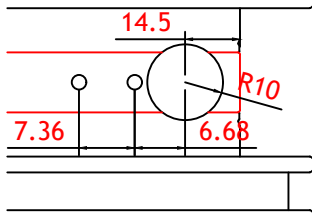
Page **APB-5:6:1**

Rev. - Date -

No 4 x 25mm long
csk head stainless steel
self tapping screw



Cone access position



View on arrow **C**

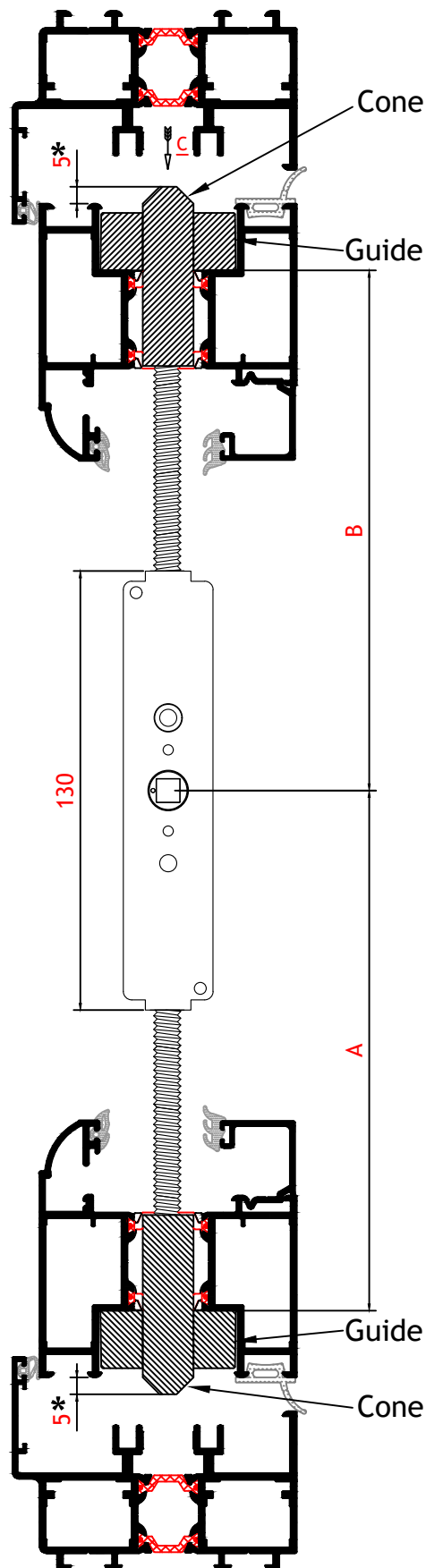
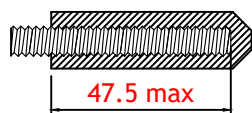
Formula for rod lengths

Bottom Rod length = **A** - 27mm

Top Rod length = **B** - 27mm

Cone fits 5mm above and below sash*
22mm throw on cone

Threaded rod must screw into cone
at least 42.5mm up to 47.5mm for
strength



Shoot Bolt Bar and Cone AP 300 Door System

Scale 1:2 Date 10.03.14

Page **APB-5:6:2**

Rev. - Date -



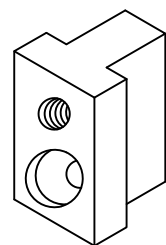
● aluminium & plastics systems

D
E
F

A-./.
B
C

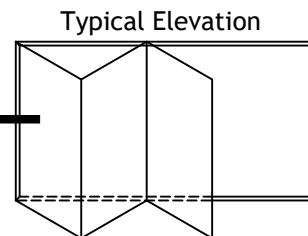
Revisions

69318 45mm long
csk head A2
self tapping screw



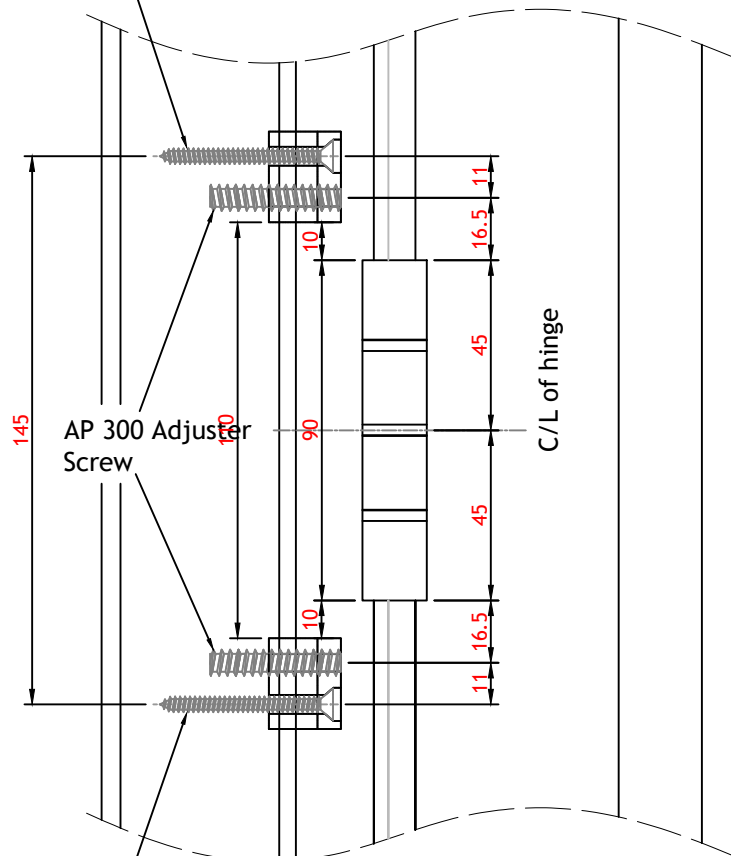
AP 300 Adjuster Block

Hinge Jamb
Preparation



Positioning and Fitting AP 300 Adjuster Blocks

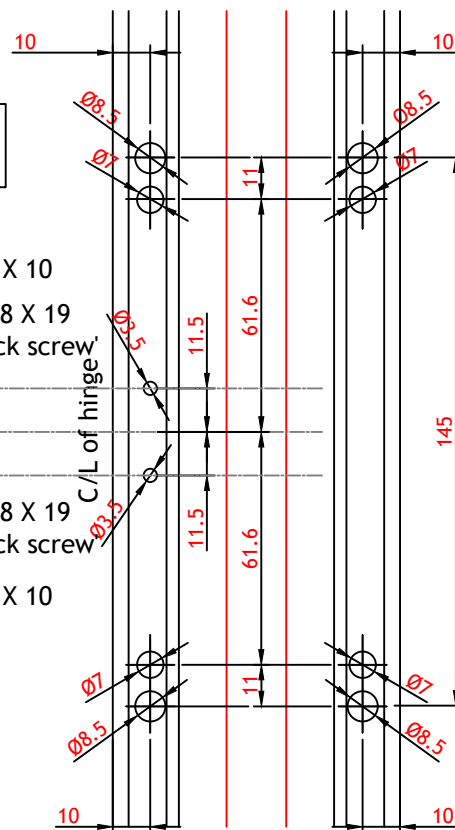
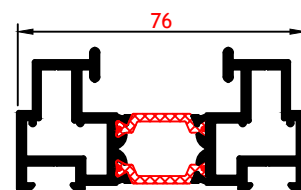
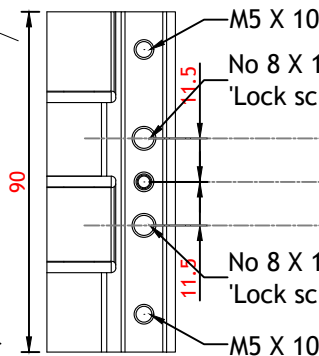
- 1) Position hinges on AP 305-305 as per APB-5:3:1.
- 2) Mark the drill positions for the adjuster blocks on the AP 305-305 profile as shown on view on arrow B below.
- 3) Drill the 8.5mm dia and 7mm dia holes.
- 4) Slide the adjuster blocks into position and fix the adjuster screw to keep blocks stationary.
- 5) Once the bi-fold is on site and any necessary adjustment is made. Fix securely through each adjuster block with the No 8 x 45mm csk self tapping screw.



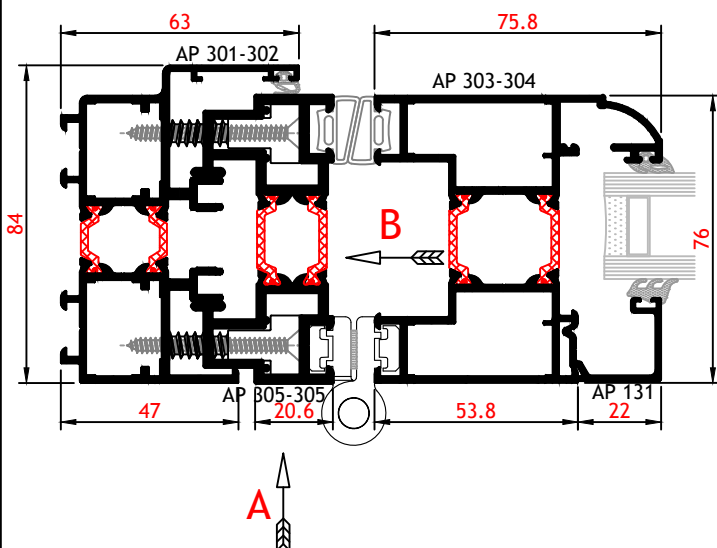
View on Arrow "A"

69318 45mm long
csk head A2
self tapping screw

No 5 X 10 machine &
No 8 X 19 'Lock
screw' supplied with
hinge



View on Arrow "B"



**AP 300 Adjuster block position
and fixing on hinge side
AP 300 Door System**



● aluminium & plastics systems

Scale 1:2

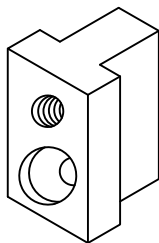
Date 10.03.14

Page

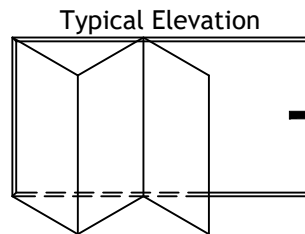
APB-5:7:1

Rev A

Date 28.10.21

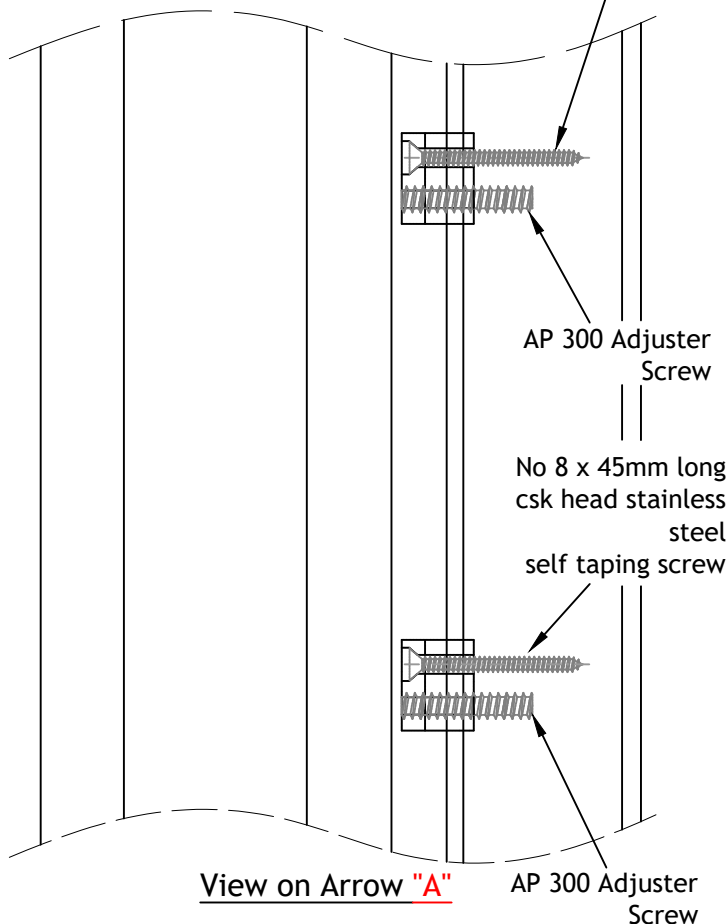


AP 300 Adjuster Block



Lock Jamb Preparation

No 8 x 45mm long
csk head stainless
steel
self tapping screw

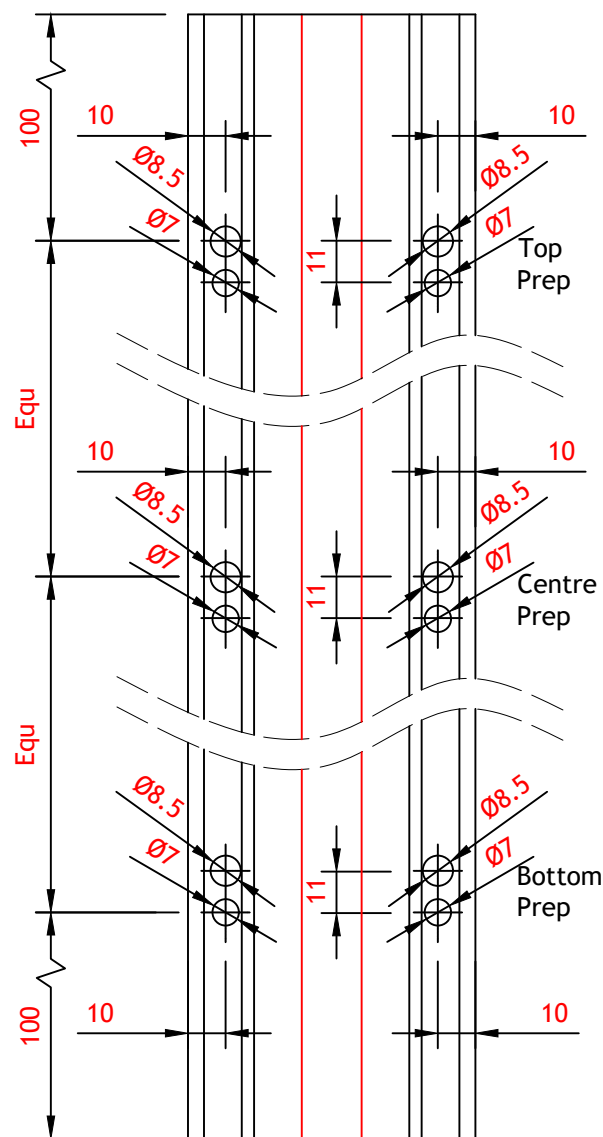


View on Arrow "A"

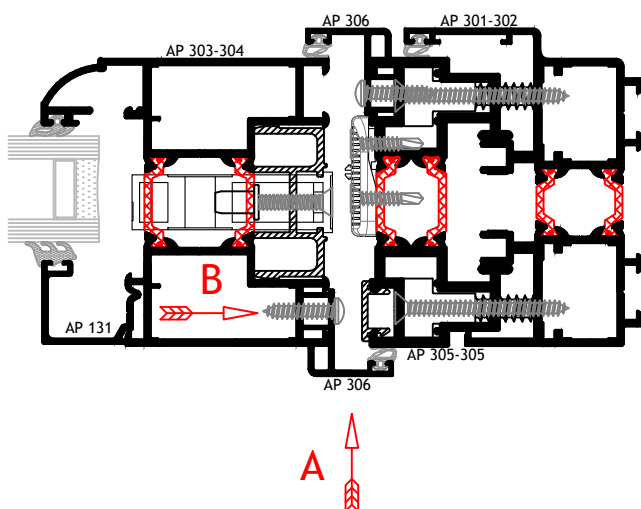
AP 300 Adjuster Screw

Positioning and Fitting AP 300 Adjuster Blocks

- 1) Mark the drill positions for the adjuster blocks on the AP 305-305 profile as shown on view arrow B below on door heights less than 2100mm. On doors greater than 2100mm an additional pair of adjusters are required- centre equally.
- 2) Drill the 8.5mm dia and 7mm dia holes
- 3) Slide the adjuster blocks into position and fix the adjuster screw to keep blocks stationary.
- 4) Once the bi-fold is on site and any necessary adjustment is made. Fix securely through each adjuster block with the No 8 x 45mm csk self tapping screw.



View on Arrow "B"



**AP 300 Adjuster block position
and fixing on door lock side
AP 300 Door System**

Scale 1:2

Date 10.03.14

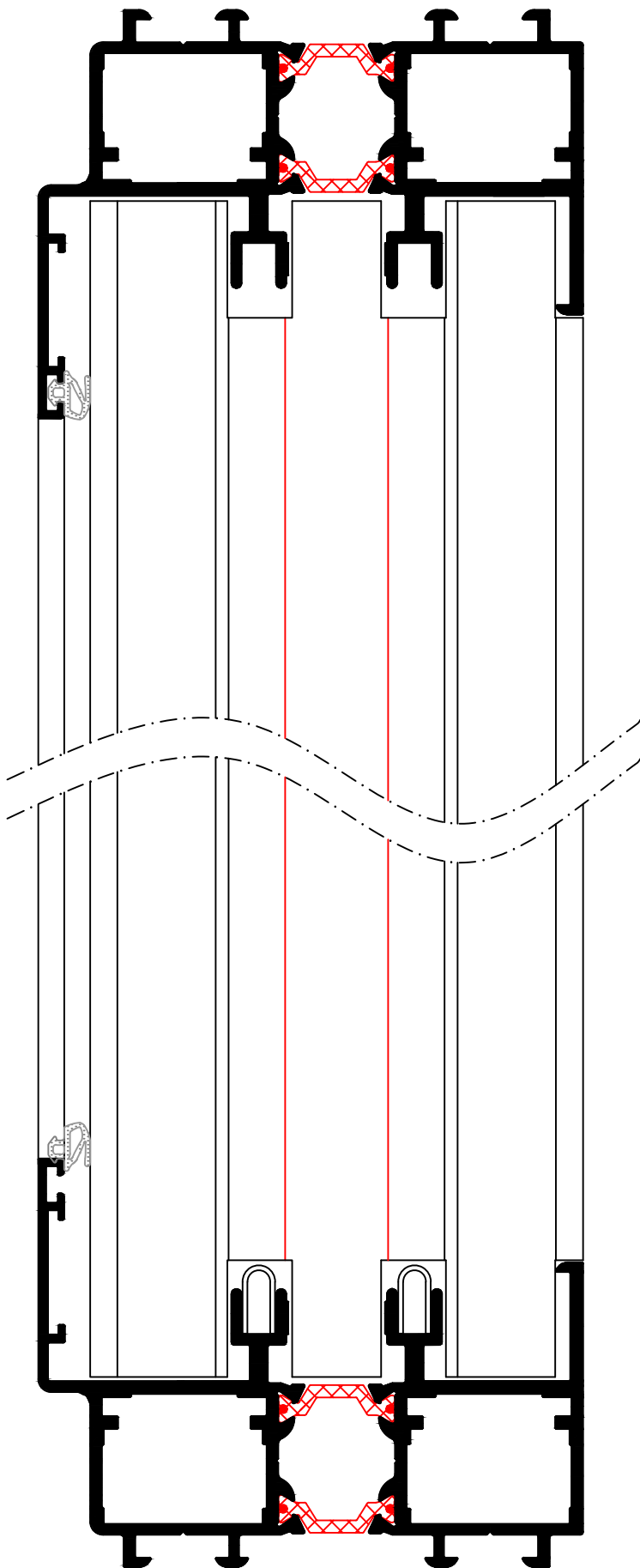
Page

APB-5:7:2

Rev -

Date -

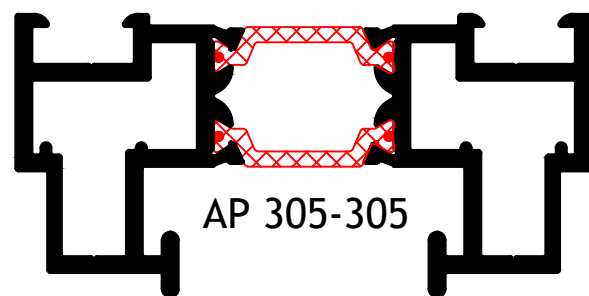
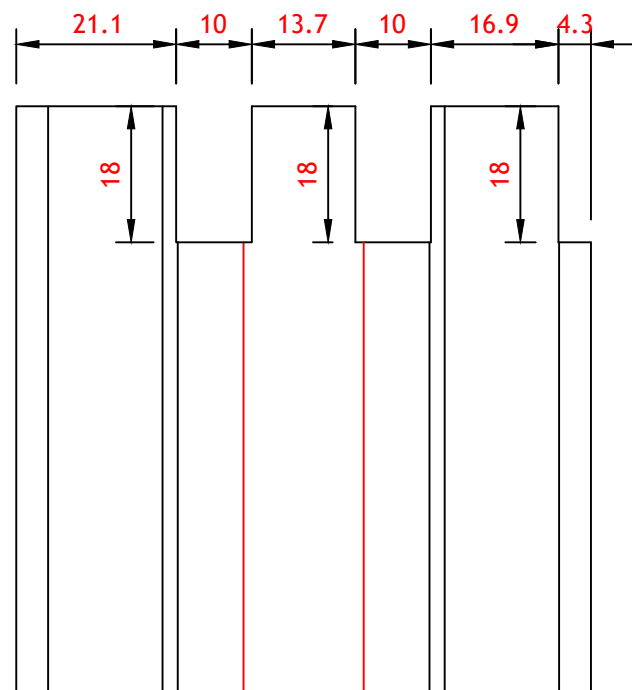
AP 301-302



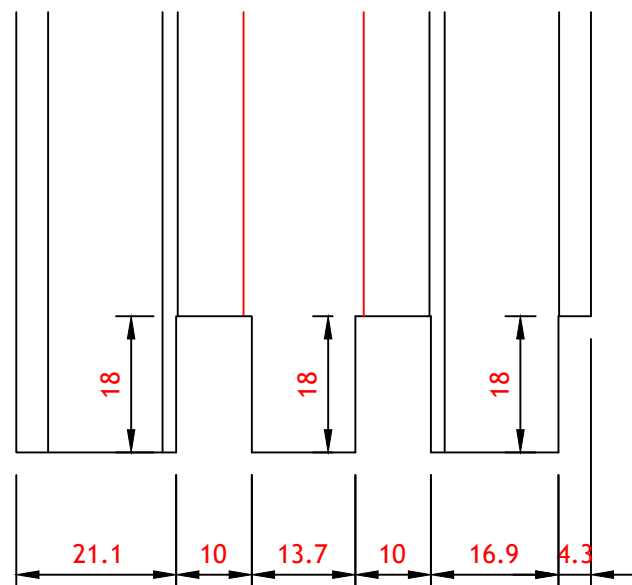
AP 301-302

Positioning of Adjuster

- 1) Cut the AP 305-305 to the fabrication instruction
- 2) Prep for adjuster blocks (See APB-5:7:1)
- 3) Notch the AP 305-305 at both ends as shown below
- 4) Lubricate the face of the 69147 slam gasket and slide the AP 305-305 profile into position



AP 305-305



AP 305-305 End Prep
AP 300 Door System



● aluminium & plastics systems

Scale 1:2 Date 10.03.14

Page **APB-5:8:1**

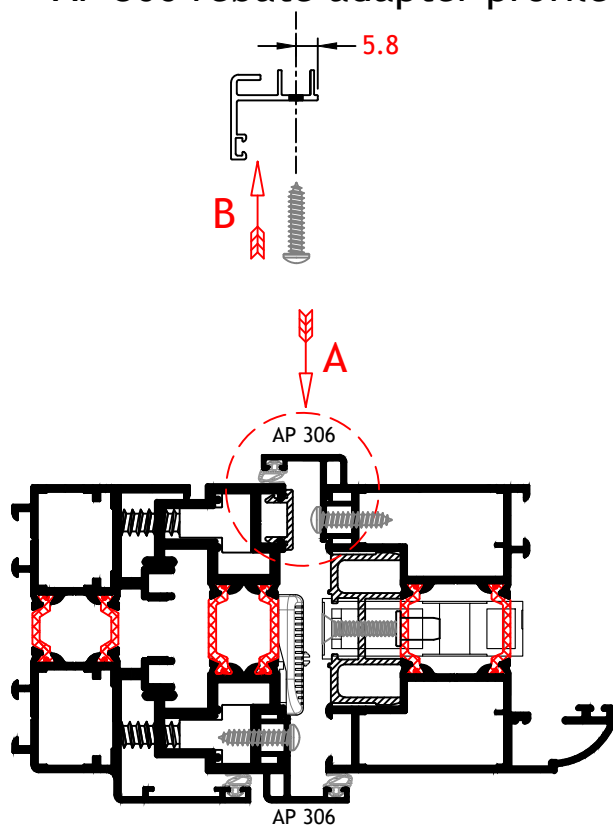
Rev - Date -

D
E
F

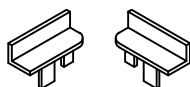
A-./.
B
C

Revisions

AP 306 rebate adapter profile

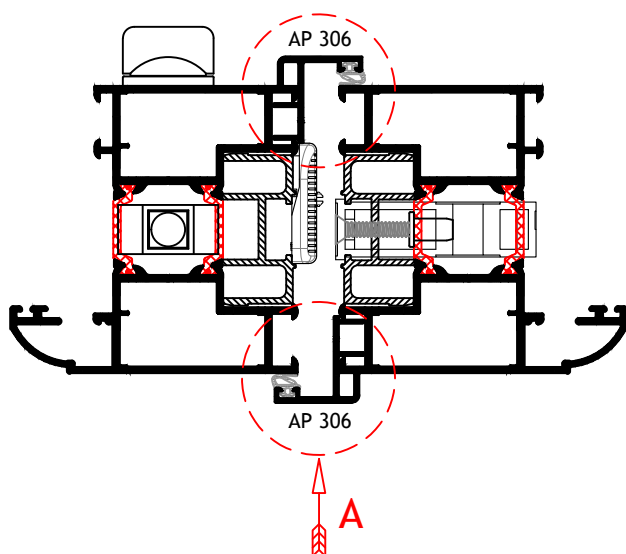


See separate page for
fitting to door frame

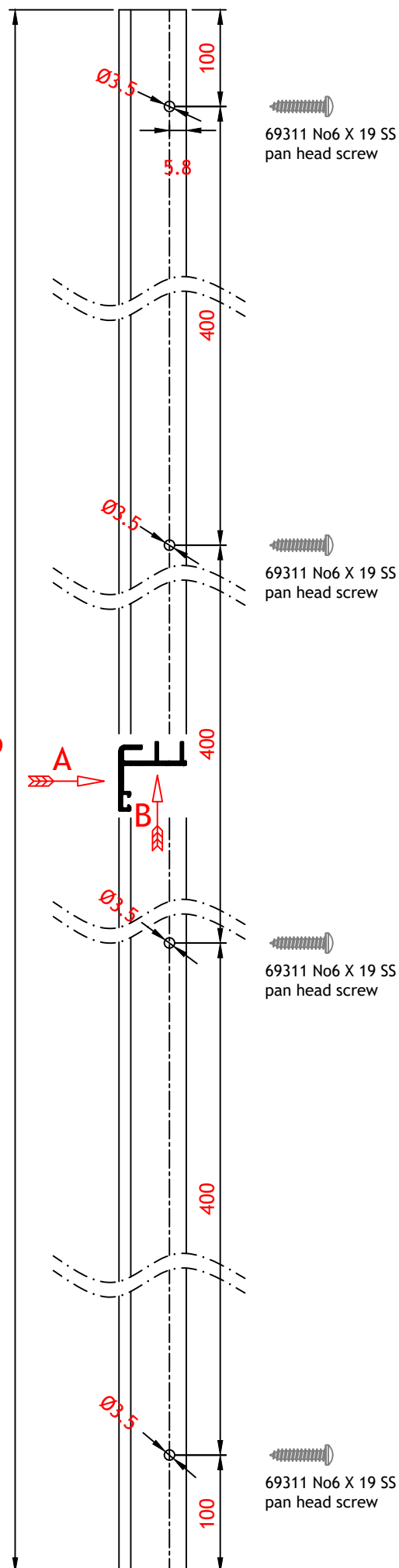


69468

Fit & glue rebate caps top
& bottom of rebate profile



Door Height



AP 306 Rebate Adaptor Preparation
Preparation onto Door Sash
AP 300 Door System

Scale NTS Date 01.11.24

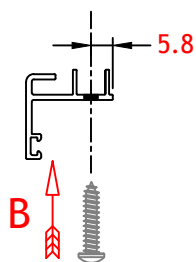
Page **APB-5:9:1**

Rev. - Date -

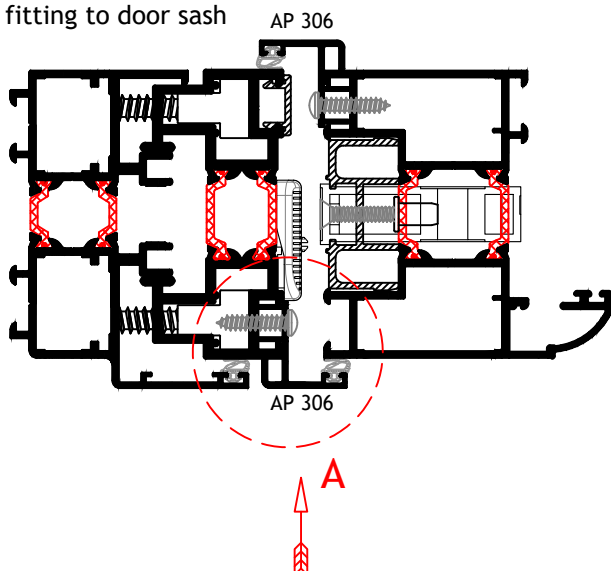
D E F

A- B C

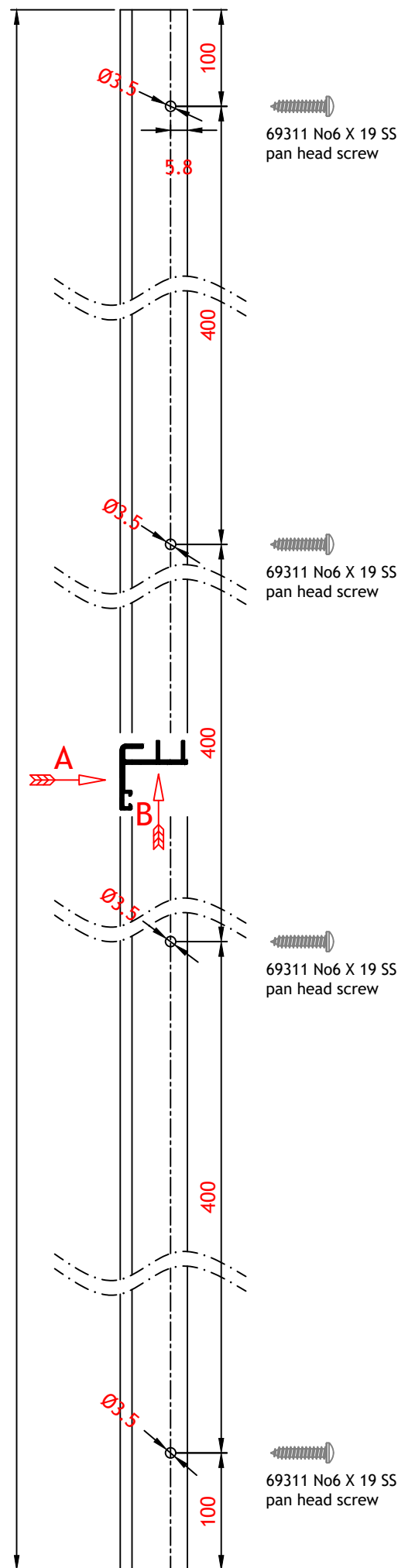
AP 306 rebate adapter profile



See separate page for fitting to door sash



Frame Height - 126mm



AP 306 Rebate Adaptor Preparation into Door Frame AP 300 Door System

Scale NTS Date 01.11.24

Page **APB-5:9:2**

Rev. - Date -

D

E

F

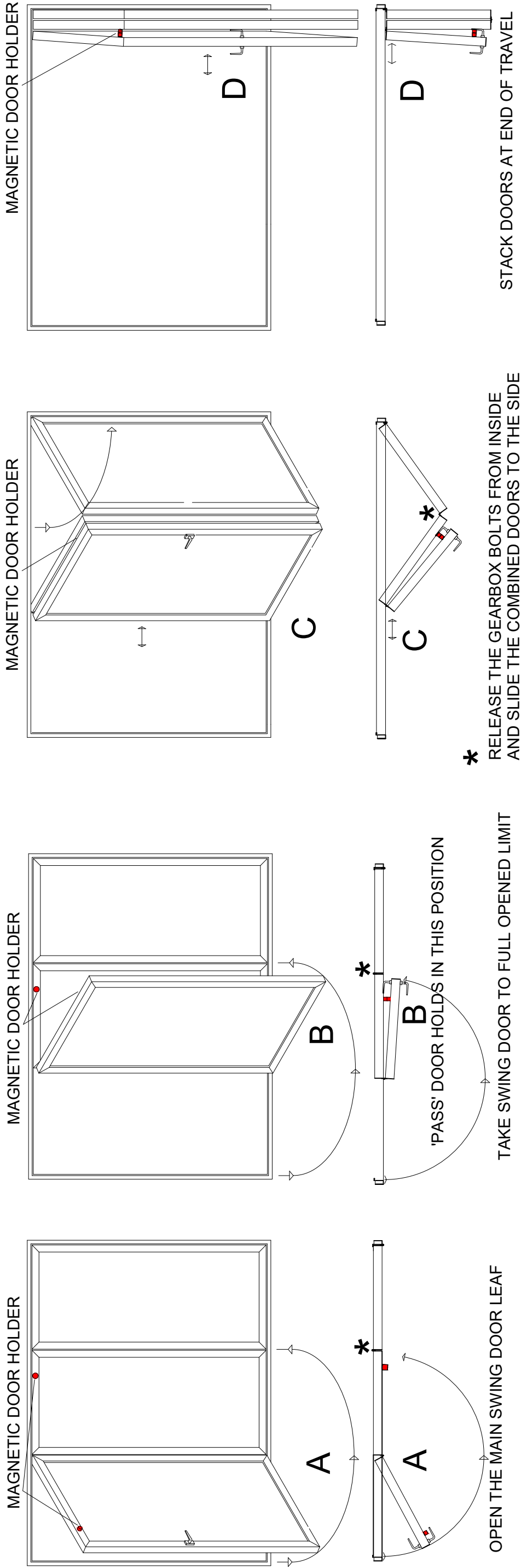
A -

B

C

Revisions

Revisions	A-./.	D
	B	E
	C	F



Note: Magnetic door holder to be fitted as per manufacture's instructions

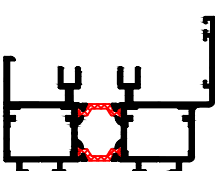
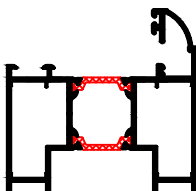
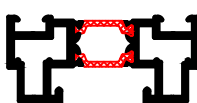
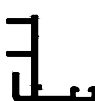
Opening Sequence

AP 300 Door System

D
E
F

A-./.
B
C

Revisions

	AP301-302 Door Outer Frame	Stock Length 6m	
		Stock	*
		IXX = 51.25 cm4	
		IYY = 14.94 cm4	
		Perim =	
		Area =	
		Weight = 2.043kg/m	
	AP303-304 Door Leaf	Stock Length 6m	
		Stock	*
		IXX = 50.97 cm4	
		IYY = 27.8 cm4	
		Perim =	
		Area =	
		Weight = 1.995kg/m	
	AP 305-305 Adjuster	Stock Length 6m	
		Stock	*
		IXX = 36.7 cm4	
		IYY = 7.27 cm4	
		Perim =	
		Area =	
		Weight = 1.696kg/m	
		Stock Length 6m	
		Stock	*
		IXX =	
		IYY =	
		Perim =	
		Area =	
		Weight = 0.243kg/m	
		Stock Length 6m	
		Stock	*
		IXX =	
		IYY =	
		Perim =	
		Area =	
		Stock Length 6m	
		Stock	*
		IXX =	
		IYY =	
		Perim =	
		Area =	

		Stock Length 6m	
		Stock	*
		IXX =	Perim =
		IYY =	Area =
		Stock Length 6m	
		Stock	*
		IXX =	Perim =
		IYY =	Area =
		Stock Length 6m	
		Stock	*
		IXX = 33.43 cm ⁴	Perim =
		IYY = 31.5 cm ⁴	Area =
		Stock Length 6m	
		Stock	*
		IXX =	Perim =
		IYY =	Area =
		Stock Length 6m	
		Stock	*
		IXX =	Perim =
		IYY =	Area =
		Stock Length 6m	
		Stock	*
		IXX =	Perim =
		IYY =	Area =

Installation

Installation

The following paragraphs deal with the overall dimensions and clearances relating to the outer frame of AP door system.

It is assumed that the installer has an adequate knowledge of building principles and that he can ensure that the frames are installed in accordance with good building practices, i.e., installed plumb, square and securely.

The same clearances apply to both open in and open out conditions.

Installation preliminaries

Check that the masonry opening is square, etc and the window will fit within the opening.

Ensure as far as is practical that all metal is protected from possible mortar or plaster dropping and splashings.

Installation into masonry

At survey or contract stage ensure that the position of fixings is not too close to the edge of the brickwork, etc or in the area of the DPC.

Allow a minimum of 5 mm clearance between masonry and aluminium at each jamb, head and cill, i.e.,

Work size = masonry opening - 10 mm

Consideration must be given to any special conditions, which will reduce the height of the work size.

Offer the door into opening, packing frame at fixing points to ensure frame is square in the opening. Fit polystyrene or equivalent 'mastic saver' material into 5mm gap between frame & structure around the perimeter of the door screen.

If using fixing lugs, which allow drilling through clearance holes, drill masonry and plug, fixing with minimum No. 10 x 2" pan head or round head screws. Ensure that the window frame is not distorted when fixing.

D E F

A-./.
B C

Revisions

Sealing & Finishing Off

Sealing

For the perimeter sealing of aluminium to masonry choose a permanently flexible material capable of forming an effective watertight contact on both aluminium and surround.

The material chosen must have a prolonged service life, i.e., be compatible with APS Limited products, which are extremely durable and require minimum maintenance.

Fit backing strip where necessary and apply sealant (by extruding or tooling) in minimum 6 x 6 mm cross-section or in accordance with the sealant manufacturer's recommendations.

Cleaning after installation

If excess sealant is to be cleaned off use cosmoform, ensure that the solvent will not damage any metal finishes, synthetic rubber or plastics, which may be present.

Warning

Take particular care if there is any cement or plaster on the aluminium. It is harmful to the metal finish and ideally should be washed off immediately whilst it is still wet.
DO NOT RUB or particles of grit will permanently damage the metal or paint finish.

Final checks

Check the operation of locks, handles, shoot bolts etc for smooth operation as necessary and ensure handles turn and lock effectively.

Make recommendations to the customer, which may prevent or simplify call back, e.g., advise on cleaning and maintenance, etc.

D E F

A-./.
B C

Revisions

Routine Cleaning

It is recommended that framing be cleaned every 3 to 6 months maximum using non-alkaline detergent and warm water applied with a soft cloth or sponge. A bristle brush or nylon pad should only be used with care where & when necessary.

Abrasive cleaners, solvents or other cleaning agents should not be used.

Hinges

The hinges in general and particularly the pivots, sliding shoe and track must be kept free from dirt, debris and any other obstructions.

Hinges and top and bottom guides are to be periodically lubricated with light engineering oil and fixing screw tightness and security are to be checked, all in line with manufacturers instructions.

Handles

The smooth operation of handles, locks and tightness of fixing screws to be periodically checked.

Multi point locking Gear

Multi point locking Gear should be periodically lubricated with light engineering oil and fixing screw tightness and security are to be checked, all in line with manufacturers instructions.

Drainage Slots

Drainage slots are to be kept free from dirt and debris.
Loose or missing drainage covers should be replaced.

D E F

A-./.
B C

Revisions

AP 304 - OUTSIDE

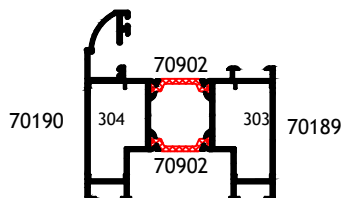
Quantity of 6 metre bars:-

Colour:- R A L

or

Other Colour Ref:-

Tick Required Colour Finishes:-	Gloss	Semi Gloss	Matt
	Marine Quality		
	YES	NO	

AP 303-304
Door Leaf**AP 303 - INSIDE**

Quantity of 6 metre bars:-

Colour:- R A L

or

Other Colour Ref:-

Tick Required Colour Finishes:-	Gloss	Semi Gloss	Matt
	Marine Quality		
	YES	NO	

AP 301 - OUTSIDE

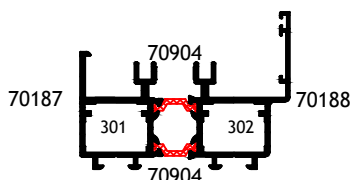
Quantity of 7 metre bars:-

Colour:- R A L

or

Other Colour Ref:-

Tick Required Colour Finishes:-	Gloss	Semi Gloss	Matt
	Marine Quality		
	YES	NO	

Opening OutAP 301-302
Door outer frame**AP 302 - INSIDE**

Quantity of 7 metre bars:-

Colour:- R A L

or

Other Colour Ref:-

Tick Required Colour Finishes:-	Gloss	Semi Gloss	Matt
	Marine Quality		
	YES	NO	

AP 302 - OUTSIDE

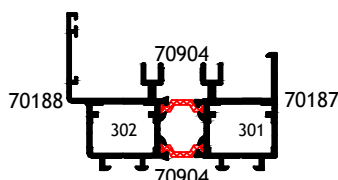
Quantity of 7 metre bars:-

Colour:- R A L

or

Other Colour Ref:-

Tick Required Colour Finishes:-	Gloss	Semi Gloss	Matt
	Marine Quality		
	YES	NO	

AP 301-302
Door outer frame**AP 301 - INSIDE**

Quantity of 7 metre bars:-

Colour:- R A L

or

Other Colour Ref:-

Tick Required Colour Finishes:-	Gloss	Semi Gloss	Matt
	Marine Quality		
	YES	NO	

AP 305 - OUTSIDE

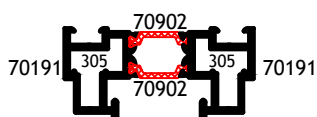
Quantity of 6 metre bars:-

Colour:- R A L

or

Other Colour Ref:-

Tick Required Colour Finishes:-	Gloss	Semi Gloss	Matt
	Marine Quality		
	YES	NO	

AP 305-305
Adjuster**AP 305 - INSIDE**

Quantity of 6 metre bars:-

Colour:- R A L

or

Other Colour Ref:-

Tick Required Colour Finishes:-	Gloss	Semi Gloss	Matt
	Marine Quality		
	YES	NO	

Quantity of 6 metre bars:-

Colour:- R A L

or

Other Colour Ref:-

Tick Required Colour Finishes:-	Gloss	Semi Gloss	Matt
	Marine Quality		
	YES	NO	

Quantity of 6 metre bars:-

Colour:- R A L

or

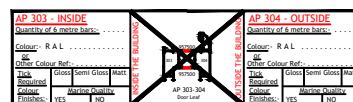
Other Colour Ref:-

Tick Required Colour Finishes:-	Gloss	Semi Gloss	Matt
	Marine Quality		
	YES	NO	

Fill in the following:- APS Estimate No.

Customer Order Number:-

Contract Title:-

Delete Non
Required Profiles
with an "X" as
indicated:-

Date 10.03.14

Page
APB-11:1:1

Rev A Date 28.08.24



aluminium & plastics systems

Dual Colour - Order Form
AP 300 Bi Fold Door System

D E F

A- / B C

AP 306 - OUTSIDE

Quantity of 6 metre bars:-

Colour:- R A L

or

Other Colour Ref:-

Gloss

Semi

Gloss

Matt

Required

Marine Quality

YES

Colour

Finish

70192

AP 306
Rebate

70192

AP 306
Rebate**AP 306 - INSIDE**

Quantity of 6 metre bars:-

Colour:- R A L

or

Other Colour Ref:-

Gloss

Semi

Gloss

Matt

Required

Marine Quality

YES

Colour

Finish

AP 131 - INSIDE

Quantity of 6 metre bars:-

Colour:- R A L

or

Other Colour Ref:-

Gloss

Semi

Gloss

Matt

Required

Marine Quality

YES

Colour

Finish

70009

AP 131
28mm to 30mm
Glazing Bead**AP 132 - INSIDE**

Quantity of 6 metre bars:-

Colour:- R A L

or

Other Colour Ref:-

Gloss

Semi

Gloss

Matt

Required

Marine Quality

YES

Colour

Finish

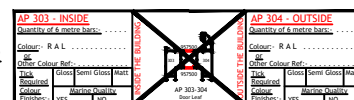
70022

AP 132
42mm to 44mm
Glazing Bead

Fill in the following:- APS Estimate No.

Customer Order Number:-

Contract Title:-

Delete Non
Required Profiles
with an "X" as
indicated:-

Scale NTS Date 10.03.14

Page **APB-11:1:2**

Rev A Date 28.08.24



● aluminium & plastics systems

Dual Colour - Order Form
AP 300 Bi Fold Door System

APS Architectural Aluminium Systems



AFTERCARE GUIDE

Rev 1



Maintenance of Windows and Doors

In order to maintain longevity of finishes, smooth operation of moving parts and the APS warranty on their products, it is important that the information in this booklet is followed carefully.

The below bullet points are a list of terms, guidance and advice that must be adhered to, in conjunction with the information on the page for the specific system supplied.

- A qualified technician must execute all major adjustments, replacements or maintenance works. Failure to carry out these actions without the correct resources or product awareness could result in personal injury or damage to the mechanism, which may result in the product being unsafe and the warranty being void.
- All products should be checked for defects regularly with particular attention paid to moving parts. Any damaged or faulty parts should be reported to the relevant person immediately and the window or door should be secured and not operated.
- Window, door and curtain walling frames, as well as associated hardware, must be fully protected during the building stage to prevent damage, dust, debris and building materials from contacting the frame and hardware surfaces.
- Life safety products (such as, but not limited to, escape/panic doors) may need to be checked and maintained more frequently than outlined within this document. The frequency of maintenance will depend on many factors from frequency of use, to location. A responsible person will need to assess products on a project specific basis and implement suitable maintenance intervals to ensure products are safe and operate as require and expected, in case of emergency.
- All cleaning, maintenance and operational checks must be carried out, as detailed within this document and at building handover stage. In addition to the cleaning frequencies contained in this document, if any surface contaminants are observed, cleaning and maintenance must be carried out as detailed within this document immediately. Aggressive environments, commonly defined as 5 kilometres from the coast, estuaries, tidal rivers or industrial areas, or products that are within spa facilities (swimming pools, saunas, etc.), as well as any other aggressive atmospheres or environments, may have differing cleaning, maintenance, warranty periods, methods. Some aspects of the window/ door/curtain walling may also need additional considerations, such as the use of certain material in certain environments. (See guidance chart enclosed.)
- Windows and doors should not be left in the open position unattended. This may allow the window/door to freely swing open or slam shut causing damage.
- Windows and doors should be opened and closed in a controlled manor. They should not be allowed to swing open or slammed shut in an uncontrolled manner. Do not leave windows open unattended and ensure they are fully closed in adverse weather conditions and when not in use.



● aluminium & plastics systems

We Require :-

- **Moving parts and fixings should be treated as follows:**

You carry out routine maintenance on your windows, doors at least three times a year. This may need to be done more frequently in areas of high exposure.

- A light application of oil, to keep the locking mechanism in good working order
- A suitable acid and resin free grease should be used on sliding bars, gears and face plates.
- Maintenance of friction stays is important and we recommend that you follow the guidelines for lubrication and adjustment.

Friction Hinges / Restrictor arms

Maintenance is important but straightforward. Keep the friction stay track free from dirt and grime and keep the hinge mechanism clean.

Lubricate the metal parts regularly with light oil, concentrating on the pivot points.

Friction can be increased or decreased by adjustments of a screw. Turn in a clockwise direction to increase friction. Take care not to over tighten.



Window and Door Locking Mechanisms

Maintenance of locking systems is simple: apply light oil to the moving parts twice a year. Similarly, a little grease should be applied to the locking keep slots to facilitate smooth running.

- Any parts that are exposed when the window and doors are open, should simply be wiped clean, removing any grime, dirt, insect remains or old lubricant.

Window and Door Locking Mechanisms cont'd

- Avoid any cleaning agents that have ammonia in them or that are abrasive, particularly on handles and other metal fittings.
- Special attention is paid to keep drainage channels clear and free from any blockages.

This information is designed to help you take care of your APS windows and doors.

Note: Hardware should be operated and maintained strictly in accordance with manufacturers instructions.

Door Hinges

- Clean all hinges and fastenings with neutral soap and water using only a soft cloth. The accumulation of contaminants on the components, when combined with water, can ruin the surface finish. As such parts may need cleaning more frequently at the first sign of contaminant build-up.
- Hinges should be wiped clean and all moving parts lubricated using 3 in 1 multi-purpose oil or similar type lubricant. Hinges should be checked for ease of movement and, if you feel resistance when opening or closing the doors, stop and inspect the hinges for any debris, obstructions or misalignment.
- Doors should also be checked that they are fully in alignment with the frame. Hinges may have dropped and need to be adjusted to allow doors to operate correctly. Only an approved engineer can carry out this adjustment.

Door closers

- Clean all surface mounted door closers with neutral soap and water using only a soft cloth. The accumulation of contaminants on the components can ruin the surface finish. As such parts may need cleaning more frequently at the first sign of contaminant build-up.
- Closers should also be checked that all fixings remain tight and the closer operates correctly. The closer may need to be re-adjusted to allow doors to operate correctly. Only an approved engineer can carry out this adjustment.

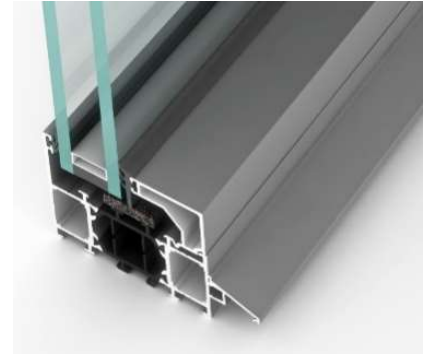
Panic Gear

- Clean all panic gear surfaces with neutral soap and water using only a soft cloth. The accumulation of contaminants on the components, when combined with water or grease can ruin the surface finish. As such parts may need cleaning more frequently at the first sign of contaminant build-up.
- Panic gear should also be checked that all fixings remain tight and that the gear operates correctly. Re-adjusted of the gear or door alignment may be required at times to allow doors to operate correctly. Only an approved engineer can carry out this adjustment.

● Maintenance of POWDER COATING

Powder Coatings are organic coatings that need to be cleaned and maintained regularly to ensure that the decorative and protective properties of the coating are retained.

For any particular location there may be local regulations or local requirements to be met in order to achieve conformance to certain published quality labels or standards. It is the users' responsibility to be aware of such standards.



Frequency

The frequency of such cleaning will depend on many factors including:

- The geographical location of the building
- The environment surrounding the building, i.e., marine, swimming pool, industrial, or a combination of these environments, etc.
- Levels of atmospheric pollution
- Prevailing wind
- Protection of the building by other buildings
- Possibility of airborne debris e.g., sand/dust etc. causing erosive wear of the coating
- If the environmental circumstances change during the lifetime of the building (e.g., rural becomes industrial)

The frequency of cleaning depends in part on the standard of appearance that is required and also the requirements to remove deposits that could, during prolonged contact with either the powder film or the metal substrate (if exposed) cause damage. (A good example of this is salt build up in coastal locations)

In hazardous environments the normal frequency of cleaning should be at a maximum of two monthly intervals. However, where there is high atmospheric pollution or an extremely hazardous atmosphere (i.e. a coastal area) the period between cleaning should be reduced. (See cleaning frequency chart)

Where the atmosphere is deemed to be non-hazardous, e.g., rural or a “normal” urban environment, then the period between cleaning can be extended up to a maximum of 4 months. However, if heavy soiling occurs, more regular cleaning is required.

Typical Cleaning and Inspection Frequencies

Environment	Frequency
Normal	4 months
Marine (any powder coating within 5km of sea should be Marine grade)	1.5 months
Marine within 1.5Km of Sea	1 month
Industrial	2 months
Swimming Pools	2 months

Records of all cleaning schedules and frequencies should be kept and maintained.

Method

The best method of cleaning is by regular washing of the coating using a solution of warm water and mild detergent. All surfaces should be cleaned using a soft cloth or sponge, using nothing harsher than natural bristle brushes. Cleaning of window sections etc. can be conveniently carried out at the same time as glazing cleaning.

CAUTION. On many occasions window cleaners clean the glass but do not properly clean the actual window or door frame. They also do not tend to use soapy water. This is a requirement for the frames!

If the atmospheric pollution has resulted in heavy soiling of the coating, then nothing harsher than white spirit should be used for cleaning.

Do not under any circumstances use strong solvents or solutions containing:

- Chlorinated Hydrocarbons
- Esters
- Ketones
- Abrasive Cleaner or polish

Note

Failure to carry out all of the guidance within brochure will not only be detrimental to the operation and aesthetics of the windows and doors but will void any warranties applied.

