Elevate Direct Glaze Polygon

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Unit Features

Elevate Direct Glaze Polygon: ELDG (P3, P4, P5, P8) Elevate Direct Glaze Polygon IZ3: ELDG (P3, P4, P5, P8) IZ3 Elevate Direct Glaze Rectangle: ELDG RECT

For applicable certification and code information, refer to the Introduction and Product Performance chapter.

Frame and Sash:

- The frame exterior is made of Ultrex, an advanced fiber reinforced material that is resistant to thermal conductance.
- Exterior colors: Stone White, Pebble Gray, Bronze, Cashmere, Gunmetal, or Ebony.
- Ultrex frame is .080" (2) thick.
- The interior is non finger-jointed pine, kiln dried to a moisture content of 6-12% at time of fabrication.
- Water-repellent, preservative treated.
- Interior wood is available as pine bare wood or factory applied White, Clear, or Designer Black finishes.
- Composite frame thickness is 2 1/16" (52). Frame width is 4 9/16" (116).
- 4/4 non finger-jointed pine interior stop is applied to all units.

Jamb Extension:

- Extension Thickness: 9/16" (14)
- Multiple depths available from 1/8" (3), 1/4"(6), and depths varying between 1/2"(13) and 4"(102) at 1/16" (2) increments
- Maximum jamb depth is 8 9/16" (217).
- 6 9/16" (167) or 6 13/16" (173) jamb extension factory-applied
- All other jamb depth options are available shipped loose.
- Material: Bare Pine
- Option: factory applied white, designer black and clear lacquer interior finish

Installation:

- Factory applied folding nailing fin and drip cap system
- Optional installation brackets available for Polygons without nailing fin intended for masonry application
- Installation clips are required on IZ3 units.

Glazing:

- Dual-pane units are manufactured with an 11/16" (17) IG with Low E2, E3, E3/ERS or E1 coatings including argon gas fill.
- Tripane units are manufactured with a glass thickness varying from 1 1/8" (29) to 1 1/2" (38) IG with a combination coating consisting of Low E2 on surface 2 and Low E1 on surface 5 including argon gas fill.
- Tempered glass and/or obscure glass, and California Fire glass (annealed exterior and tempered interior glazing configuration) are available as an option.
- The glazing seal is a silicone bedding on the exterior surface with glazing tape on the interior.
- STC/OITC values are available for standard 3.1 mm thickness glass.
- Optional 3.1/4.7 STC/OITC Upgrade glass is available. See Product Performance chapter for STC and OITC ratings.
- Decorative glass options include frost, glue chip, rain, reed, narrow reed, and tinted (bronze, gray or green). Decorative glass is
 not available with Low E1, Low E3/ERS, tripane or STC/OITC options.
- See the Product Performance chapter for values.

IZ3 Glazing:

- Optional IZ3 available on selected sizes. Zone 3 for winds up to 140 miles per hour.
- Glass is laminated insulated Low E2 or E3 Argon, consisting of tempered glass exterior and laminated glass interior.
- The laminated glass is comprised of two pieces of glass with either a SGP or PVB laminate layer between.
- The glazing seal is a silicone bedding on the exterior surface with glazing tape on the interior.



Unit Features Continued

RECTANGLES ONLY:

Interior / Exterior Simulated Divided Lites (SDL):

- Interior bar: 7/8", (22) wide bars. Pine bare wood or optional white, clear, or designer black interior finish.
- Exterior bar: Ultrex, 7/8" (22) wide bars, finish to match exterior. Pattern: Rectangular, Prairie or Cottage style cuts.
- Special size Direct Glaze Rectangle units will default to a 10" (254) daylight opening with a minimum 4" (102) daylight opening available. Due to size limitation, 6 or 9 lite Prairie cut may apply. Default is 9 lite for stand alone units.
- Simulated check rail option: 2 11/32" (60). Pattern available: simulated rail in standard center or center specified location with 7/ 8" patterns above, below or both in patterns of rectangular equal lite or prairie lite cuts.
- SDL with spacer bar available in standard rectangle only with standard lite patterns.
- For tripane units, the spacer bar is located in the exterior space between surfaces 2 and 3.
- SDL is unavailable with rain, reed and narrow reed decorative glass. Glue chip requires tempered glass. Tinted glass is not available with spacer bar.

Grilles-Between-The-Glass (GBG):

- Interior bar: 23/32" (18) contoured aluminum bar placed between two panes of glass.
- Pattern: rectangular, 6 or 9 lite Prairie cut, or Cottage style cut. Due to size limitation, 6 or 9 lite Prairie cut may apply. Default is 9 lite for stand alone units.
- Exterior color: Stone White, Pebble Gray, Bronze, Cashmere, Gunmetal, or Ebony.
- Interior Color: White, Bronze, or Ebony. For tripane units, the spacer bar is located in the exterior space between surfaces 2 and 3. GBGs are not available on IZ3 or tinted glazed units.

Exterior Casing:

- Non-integral to the unit. Fastened to the exterior wall with barb and kerf
- 2" (51) brick mould as a full surround or with sill nosing.
- 3 ¹/₂" (89) flat casing available as full surround or with sill nosing.
- Also available with 1" (25) ranch style sill and header overhang.
- Available on rectangle units only.

Direct Glaze Rectangle Size Chart

Elevate Direct Glaze Measurements								
			Width					
Unit Type	Masonry Rough Opening Opening		Frame Size		Daylight Opening			
	ft-in	mm	ft-in	mm	ft-in	mm	ft-in	mm
30 Doors	3-0 13/16	(935)	3-1 5/16	(948)	3-0 5/16	(923)	2-8 3/16	(818)
60 Doors	5-11 1/2	(1816)	6-0	(1829)	5-11	(1803)	5-6 7/8	(1699)
90 ELSFD & ELSPD	8-11	(2718)	8-11 1/2	(2731)	8-10 1/2	(2705)	8-6 3/8	(2600)
30-60, 60-30 ELIFD & ELOFD	8-11 13/16	(2739)	9-0 5/16	(2751)	8-11 5/16	(2726)	8-7 3/16	(2621)
ELCA	6-0 1/2	(1842)	6-1	(1854)	6-0	(1829)	5-7 7/8	(1724)
			Height					
Unit Type		onry ning		ugh ning		ime ze	Daylight	Opening
	ft-in	mm	ft-in	mm	ft-in	mm	ft-in	mm
30 Doors	1-4	(406)	1-4 1/4	(413)	1-3 3/4	(400)	0-11 5/8	(295)
60 Doors	1-4	(406)	1-4 1/4	(413)	1-3 3/4	(400)	0-11 5/8	(295)
90 ELSFD & ELSPD	1-4	(406)	1-4 1/4	(413)	1-3 3/4	(400)	0-11 5/8	(295)
30-60, 60-30 ELIFD & ELOFD	1-4	(406)	1-4 1/4	(413)	1-3 3/4	(400)	0-11 5/8	(295)
ELCA	1-4	(406)	1-4 1/4	(413)	1-3 3/4	(400)	0-11 5/8	(295)
	E	levate IZ3 D	irect Glaze	Measureme	ents	I	1	
			Width					
Unit Type		onry ning		ugh ning	Frame Size		Daylight Opening	
	ft-in	mm	ft-in	mm	ft-in	mm	ft-in	mm
30 ELOFD	3-0 13/16	(935)	3-1 5/16	(948)	3-0 5/16	(923)	2-8 3/16	(818)
60 ELOFD & ELSFD	5-11 1/2	(1816)	6-0	(1829)	5-11	(1803)	5-6 7/8	(1699)
ELCA	6-0 1/2	(1842)	6-1	(1854)	6-0	(1829)	5-7 7/8	(1724)
			Height					
Unit Type		onry ning		ugh ning		ime ze	Daylight	Opening
	ft-in	mm	ft-in	mm	ft-in	mm	ft-in	mm
30 ELOFD	1-4	(406)	1-4 1/4	(413)	1-3 3/4	(400)	0-11 5/8	(295)
60 ELOFD & ELSFD	1-4	(406)	1-4 1/4	(413)	1-3 3/4	(400)	0-11 5/8	(295)
ELCA	1-4	(406)	1-4 1/4	(413)	1-3 3/4	(400)	0-11 5/8	(295)



Mulling Guidelines- Standard

Multiple assemblies can be factory mulled:

Direct Glaze unit for ELCA/ELAWN:

up to 7 units wide by 1 unit high **MAXIMUM ROUGH OPENING** not to exceed 113" (2870) X 71 5/8" (1819) up to 4 units wide by 5 units high **MAXIMUM ROUGH OPENING** not to exceed 85" (2159) X 94 3/4" (2407)

Direct Glaze unit for ELDH:

up to 5 units wide by 1 unit high **MAXIMUM ROUGH OPENING** not to exceed 113 1/2" (2883) X 76 1/4" (1937) up to 3 units wide by 5 units high **MAXIMUM ROUGH OPENING** not to exceed 84" (2134) X 92" (2337)

Direct Glaze for ELGL:

up to 3 units wide by 1 unit high **MAXIMUM ROUGH OPENING** not to exceed 113 1/2" (2883) X 60 1/4" (1530)

Direct Glaze unit for ELSPD/ELSFD:

up to 1 unit wide by 2 units high **MAXIMUM ROUGH OPENING** not to exceed 72" (1829) X 100 1/2" (2553)

Direct Glaze for ELIFD:

up to 3 units wide by 1 unit high **MAXIMUM ROUGH OPENING** not to exceed 109 15/16" (2792) X 96" (2438) up to 2 units wide by 2 units high **MAXIMUM ROUGH OPENING** not to exceed 73 5/8" (1870) X 100 1/2" (2553)

Rough Opening Calculations for Direct Glaze Rectangle assembles

WIDTH: Single unit Rough Opening width MINUS 1" (25) = Frame width ADD all frame widths PLUS 1" (25) = Total Rough Opening width

HEIGHT: Single unit Rough Opening height MINUS 1/2" (13) = Frame height ADD all frame heights PLUS = 1/2" (13)Total Rough Opening height

NOTE: Field mulling window assemblies beyond the above limitations is not recommended.

Field mulling door assemblies beyond 110"" (2794) X 112" (2845) is not recommended Assemblies using DG Rectangle units with 6 9/16" (167) or 6 13/16" (173) jambs for ELDH/ELGL/DR: ADD 1/4" (6) to width and 1/8" (3) to height of Rough Opening Polygon shapes are unavailable factory mulled



Certified Frame to Frame Mulling Guidelines

Certified Mull Limits: WDMA Hallmark certified to AAMA 450

- If assemblies have individual units that have a lower design pressure than the mull, the entire assembly is rated at the lower design pressure.
- Mull certification includes 4" mull clips (nail fin installation) or mull brackets (structural bracket installation) at all mull joints.
- Items not included in certified mulls: Stepped mulls, Palladians, Polygon Shapes, Through Jamb, Narrow Frame and Insert Products

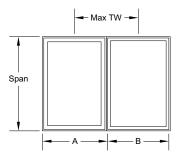
Mull Limits						
Product	Configuration	Max Span	Max TW or TH	Max RO	DP	Max ELDH P height of lower unit
Product	Configuration	iviax span		IVIAX KU	DP	lower unit
Aluminum Direct Glaze Round Top Casement – Horizontal Continuous LVL Mulling with a Single ELALDG RT on top A–level row	1 - 3W x 2H	72" (1829)	53 11/32" (1355)	73" x 107-9/16" (1854 x 2732)	50	N/A
Aluminum Direct Glaze Round Top Casement – Horizontal Continuous LVL Mulling with RT 7 & 8 on Top A-level row	2W x 2H	72" (1829)	53 11/32" (1355)	73" x 107-9/16" (1854 x 2732)	50	N/A

Max TH

Span

B

• Tributary Width or Height = (A+B)/2



Frame to Frame Mulling Samples

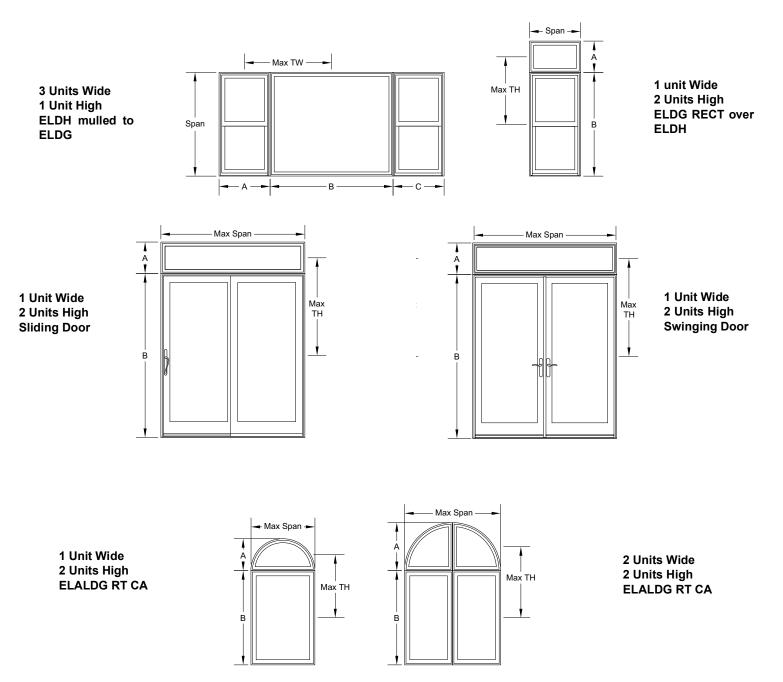


Certified Frame to Frame Mulling Guidelines

Certified Mull Limits:

Frame to Frame Mulling examples continued.

• Tributary Width or Height = (A+B)/2



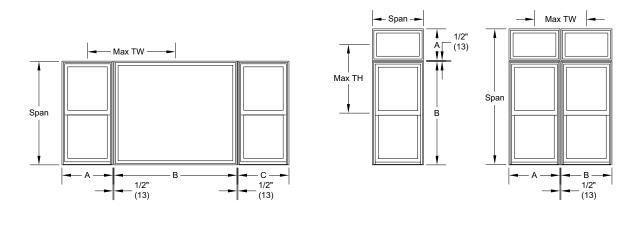
Certified 1/2" MRF Mulling Guidelines

Certified Mull Limits:

- If assemblies have individual units that have a lower design pressure than the mull; the entire assembly is rated at the lower design pressure.
- Mull certification includes 4" mull clips (nail fin installation) or mull brackets (structural installation) at all mull joints.
- Items not included in certified mulls: Stepped mulls, Palladians, Polygon Shapes, Through Jamb, Narrow Frame and Insert Products

Mull Limits						
						Max ELDH P height of
Product	Configuration	Max Span	Max TW or TH	Max RO	DP	lower unit
Aluminum Direct Glaze Round Top Double Hung – Horizontal Continuous 1/2 MRF Mulling with a Single ELALDG RT on top A-level row	1 - 3W x 2H	83" (2108)	53 11/32" (1355)	73" x 107-9/16" (1854 x 2732)	50	N/A
Aluminum Direct Glaze Round Top Double Hung – Horizontal Continuous 1/2" MRF Mulling with RT 7 & 8 on Top A-level row	2W x 2H	72" (1829)	53 11/32" (1355)	73" x 107-9/16" (1854 x 2732)	50	N/A

• Tributary Width or Height = (A+B+1/2)/2



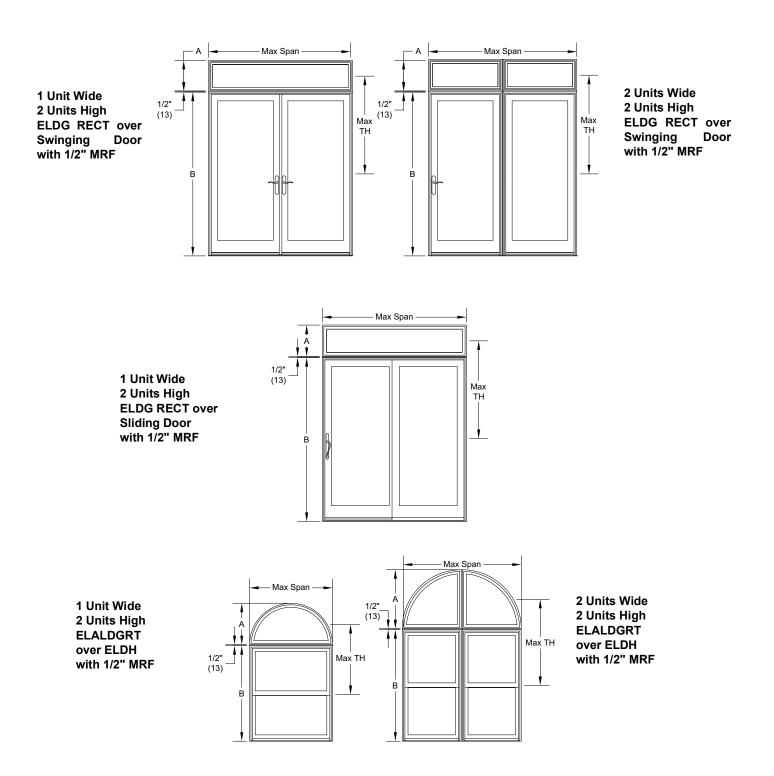
3 Units Wide 1 Unit High ELDH mulled to ELDG with 1/2" MRF 1 Unit Wide 2 Units High ELDG RECT over ELDH with 1/2" MRF 2 Units Wide 2 Units High ELDG RECT over ELDH with 1/2" MRF

Certified 1/2" MRF Mulling Guidelines

Certified Mull Limits:

1/2" MRF Mulling examples continued.

• Tributary Width or Height = (A+B+1/2)/2



Measurement Conversions and Sizing Guidelines

Measurement Conversions - DIRECT GLAZE RECTANGLE UNITS ONLY							
POLYGON	WI	OTH	HEI	GHT			
Rough Opening to	Imperial	Metric	Imperial	Metric			
Masonry Opening	-1/2"	-13	-1/4"	-6			
OM of Frame	-1"	-25	-1/2"	-13			
Interior Daylight Opening	-5 3/8"	-137	-4 7/8"	-124			
OM of Glass	-3 13/16"	-97	-3 5/16"	-84			

STANDARD UNIT MAXIMUM R.O. 110" (2794) in width or 109 1/2" (2781) height not to exceed 49 square feet frame size. Units with rough opening larger than 32.3 sq. ft. may require tempered glass. All shapes shall be defined by the enclosed rectangle.

STANDARD UNIT MAXIMUM R.O. (Tripane): 103 13/16" (2637) in width or 103 5/16" (2624) height not to exceed 44.160 square feet frame size. Units with rough opening larger than 32.3 sq. ft. may require tempered glass. All shapes shall be defined by the enclosed rectangle.

MINIMUM UNIT R.O. Width: 13 7/8" (352), Height: 13 3/8" (340).

MINIMUM SHORT LEG R.O. 8" (203) for P4-5, P4-6, P5-1.

MINIMUM P8 R.0. 19 1/8" (486) x 19 1/8" (486) - minimum F/S short leg 7 1/2" (191)

ANGLE PITCHES Available pitches for the following shapes: P3 = 4/12 to 36/12. P4, P5 = Maximum Pitch 36/12.



Mulling Guidelines / Sizing Guidelines / Measurement Conversion - IZ3

Factory Mulling

- Direct Glaze IZ3 units limited to only mulling above various IZ3 product types
- · All ELCA products (ELCA / ELAWN / ELCAP / ELCATR)
- All ELDH products (ELDH / ELDHP / ELDHTR)
- ELOFD
- ELSFD
- Refer to lower assembly unit(s) for detailed RO assembly mull limits

DIRECT GLAZE POLYGON RECTANGLES - IZ3 Measurement						
Conversion						
Polygon	W	Width* Height*				
Rough Opening to	Imperial (in.)	Metric (mm)	Imperial (in.)	Metric (mm)		
Masonry	-1/2"	-12.7	-1/4"	-6.4		
OSM of Frame	-1"	-25.4	-1/2"	-12.7		
O.S. Daylight Opening	-5 1/8"	-130.2	-4 5/8"	-117.5		
I.S. Daylight Opening	-5 3/8"	-136.5	-4 7/8"	-123.8		
OSM of Glass	-4"	-101.7	-3 1/2"	-89		

NOTE: Add 1/4" (6) to R.O. width and 1/8" (3) to R.O. height for all Double Hung and Door style Direct Glaze and Polygon units.

Minimum and Maximum Sizes - Polygon

Maximum frame long dimension: 95" (2413) Maximum frame short dimension: 71 1/2" (1816) Maximum frame area: 47.170 sq. ft. All shapes shall be defined by the enclosed rectangle. Minimum unit frame size dimensions: 12 7/8" (327) x 12 7/8" (327) Minimum frame short dimension for P4-5, P4-6, P5-1: 7 1/2" (191)

Minimum Frame Angle: 15 degrees

STANDARD SIZE DIRECT GLAZE RECTANGLES - IZ3						
Call #	Unit Type	Frame Size OSM Width	Frame Size OSM Height			
ICADG7316	Casement/Awning	72" (1829)	15 3/4" (400)			
IOFDDG3616	Outswing French Door	36 5/16" (923)	15 3/4" (400)			
IOFDDG7216	Outswing French Door	71" (1803)	15 3/4" (400)			

Slope to Angle and Angle to Pitch Conversion

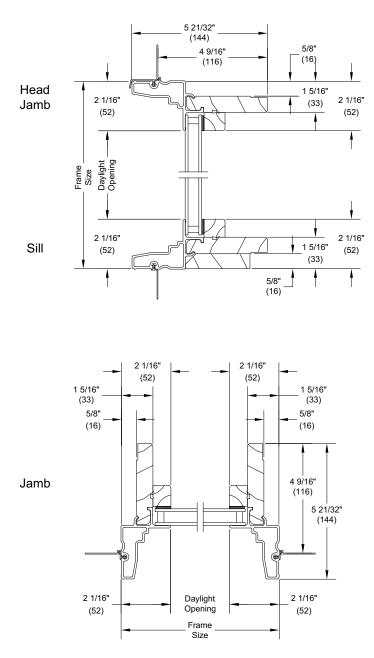
Slope to Angle /Degree Conversions						
Slope	Angle	Degree / Minutes				
1/12	4.76	4 degree 46'				
2/12	9.46	9 degree 28'				
3/12	14.04	14 degree 2'				
4/12	18.43	18 degree 26'				
5/12	22.62	22 degree 37'				
6/12	26.57	26 degree 34'				
7/12	30.26	30 degree 15'				
8/12	33.69	33 degree 41'				
9/12	36.87	36 degree 52'				
10/12	39.81	39 degree 48'				
11/12	42.51	42 degree 31'				
12/12	45.00	45 degree 0'				
13/12	47.29	47 degree 14'				
14/12	53.13	49 degree 24'				
15/12	54.78	51 degree 20'				
16/12	56.31	53 degree 8'				
17/12	54.78	54 degree 47'				
18/12	56.31	56 degree 19'				
19/12	57.72	57 degree 43'				
20/12	59.04	59 degree 2'				
21/12	60.26	60 degree 15'				
22/12	61.39	61 degree 23'				
23/12	62.45	62 degree 27'				
24/12	63.43	63 degree 26'				

Angle to Pitch conversions						
Angle	Pitch	Angle	Pitch	Angle	Pitch	
1	0.21/12	31	7.21/12	61	21.65/12	
2	0.42/12	32	7.50/12	62	22.57/12	
3	0.63/12	33	7.79/12	63	23.55/12	
4	0.84/12	34	8.09/12	64	24.60/12	
5	1.05/12	35	8.40/12	65	25.73/12	
6	1.26/12	36	8.72/12	66	26.95/12	
7	1.47/12	37	9.04/12	67	28.27/12	
8	1.69/12	38	9.38/12	68	29.70/12	
9	1.90/12	39	9.72/12	69	31.26/12	
10	2.12/12	40	10.07/12	70	32.97/12	
11	2.33/12	41	10.43/12	71	34.85/12	
12	2.55/12	42	10.80/12	72	36.93/12	
13	2.77/12	43	11.19/12	73	39.25/12	
14	2.99/12	44	11.59/12	74	41.85/12	
15	3.22/12	45	12.00/12	75	44.78/12	
16	3.44/12	46	12.43/12	76	48.13/12	
17	3.67/12	47	12.87/12	77	51.98/12	
18	3.90/12	48	13.33/12	78	56.56/12	
19	4.13/12	49	13.80/12	79	61.73/12	
20	4.37/12	50	14.30/12	80	68.06/12	
21	4.61/12	51	14.82/12	81	75.77/12	
22	4.85/12	52	15.36/12	82	85.38/12	
23	5.09/12	53	15.92/12	83	97.73/12	
24	5.34/12	54	16.52/12	84	114.17/12	
25	5.60/12	55	17.14/12	85	137.16/12	
26	5.85*12	56	17.79/12	86	171.61/12	
27	6.11/12	57	18.48/12	87	228.97/12	
28	6.38/12	58	19.20/12	88	343.64/12	
29	6.65/12	59	19.97/12	89	687.48/12	
30	6.93/12	60	20.78/12			

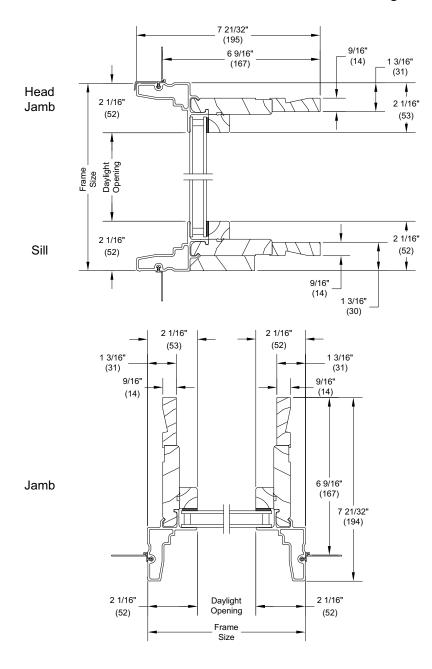


DIRECT GLAZE CASEMENT/AWNING

POLYGON STAND ALONE - 4 9/16" - Standard Glazing



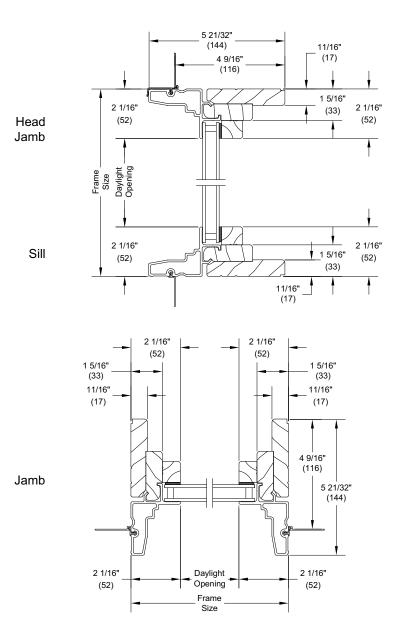
MARVIN®



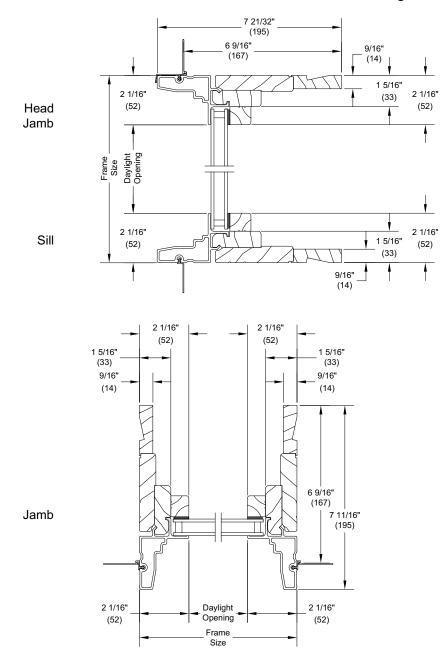
DIRECT GLAZE CASEMENT/AWNING POLYGON STAND ALONE - 6 9/16" - Standard Glazing



DIRECT GLAZE DOUBLE HUNG, GLIDER, DOORS POLYGON STAND ALONE - 4 9/16" - Standard Glazing



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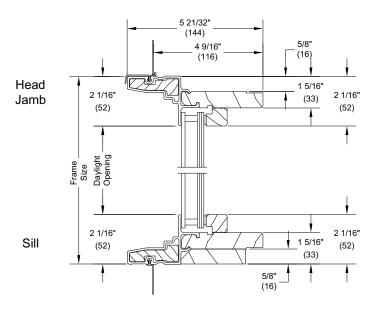


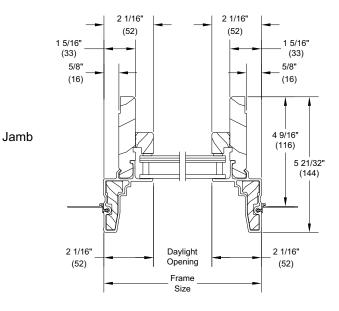
DIRECT GLAZE DOUBLE HUNG, GLIDER, DOORS POLYGON STAND ALONE - 6 9/16" - Standard Glazing



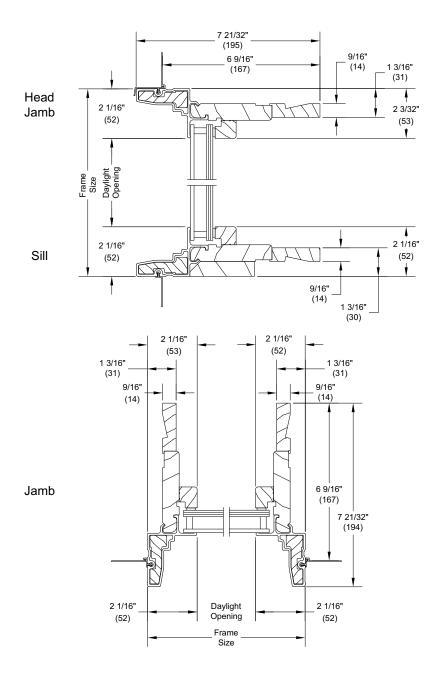
Section Details: IZ3 Glazing

DIRECT GLAZE CASEMENT/AWNING POLYGON STAND ALONE - 4 9/16" - IZ3 Glazing





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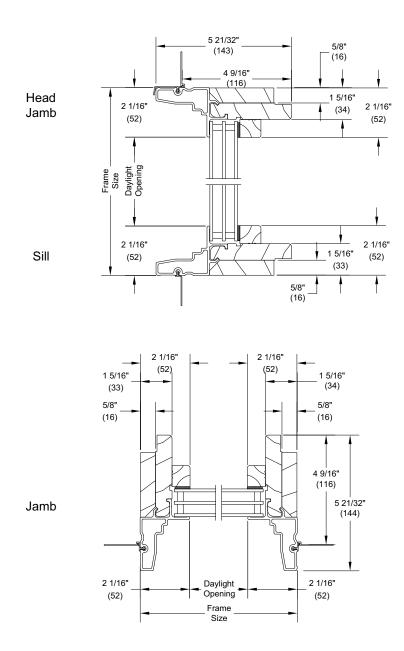
DIRECT GLAZE CASEMENT/AWNING POLYGON STAND ALONE - 6 9/16" - IZ3 Glazing



Section Details: Tripane Glazing

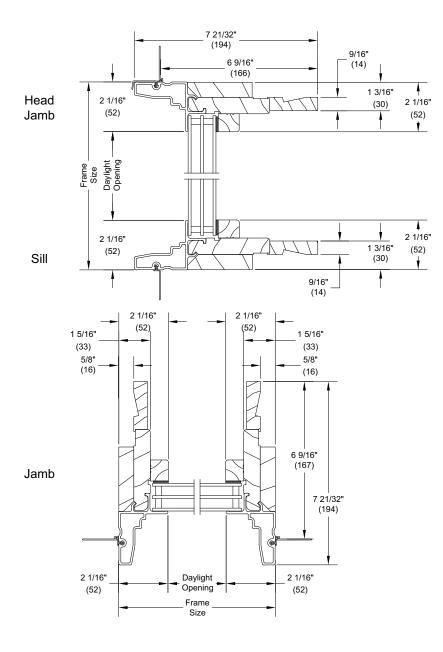
DIRECT GLAZE CASEMENT/AWNING

POLYGON STAND ALONE - 4 9/16" - Tripane Glazing



Section Details: Tripane Glazing

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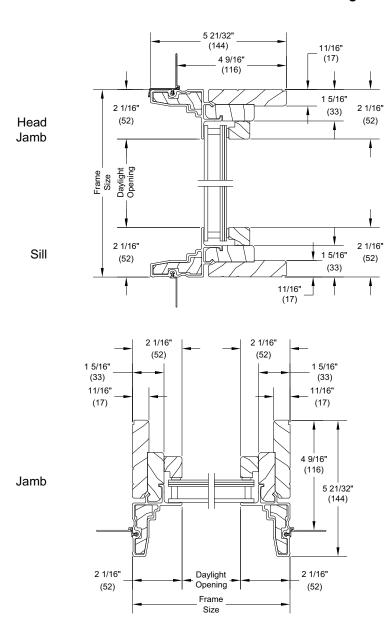


DIRECT GLAZE CASEMENT/AWNING POLYGON STAND ALONE - 6 9/16" - Tripane Glazing



Section Details: IZ3 Glazing

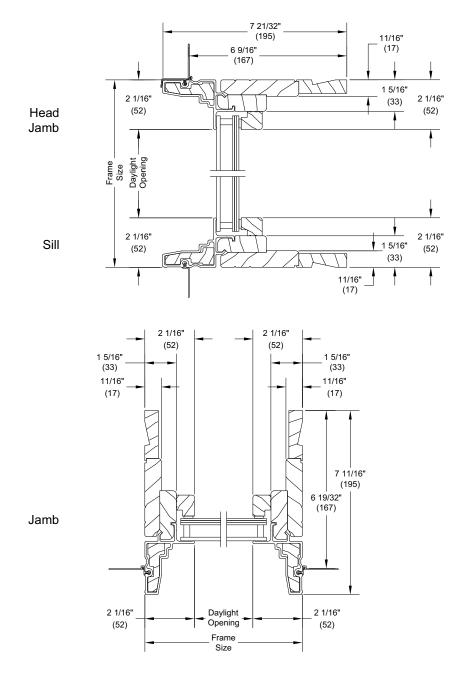
DIRECT GLAZE DOUBLE HUNG, GLIDER, DOORS POLYGON STAND ALONE - 4 9/16" - IZ3 Glazing



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Section Details: IZ3 Glazing

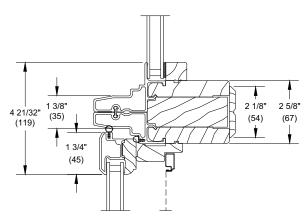


DIRECT GLAZE DOUBLE HUNG, GLIDER, DOORS POLYGON STAND ALONE - 6 9/16" - IZ3 Glazing

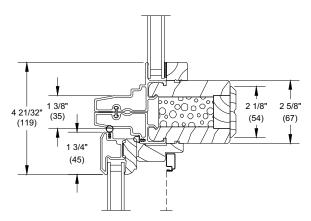


Section Details: Horizontal Mullions

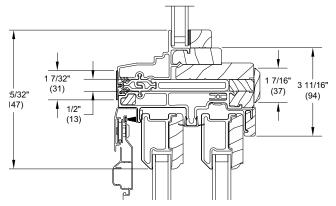
Scale: 3" = 1' 0"



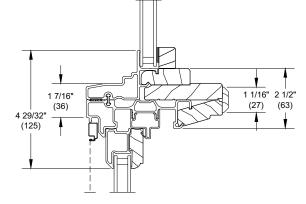
Direct Glaze Polygon over Casement with Mull Reinforcement



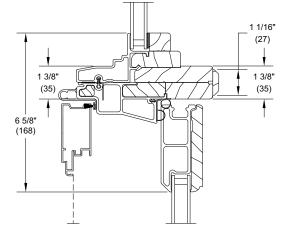
Direct Glaze Polygon over Casement



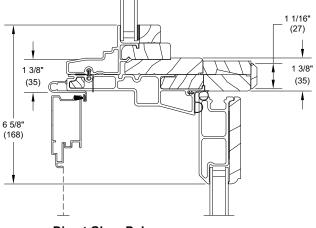
Direct Glaze Polygon over Sliding Patio Door



Direct Glaze Polygon over Double Hung



Direct Glaze Polygon over 4 9/16" Inswing French Door

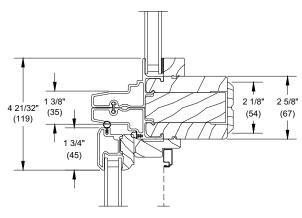


Direct Glaze Polygon over 6 9/16" Inswing French Door

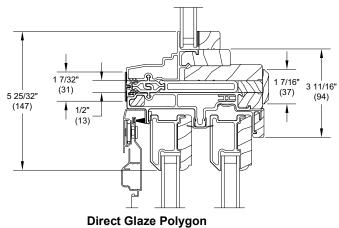


Section Details: Horizontal LVL and 1/2" MRF Mullions

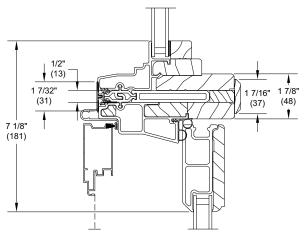
Scale: 3" = 1' 0"



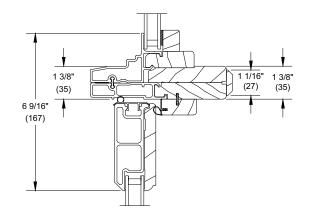
Direct Glaze Polygon over Casement/Awning with LVL support



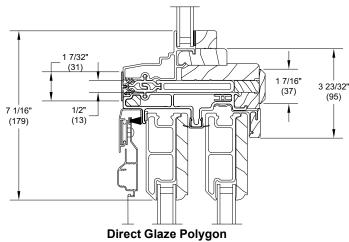
over Sliding Patio Door 4 9/16" Jamb with 1/2" MRF



Direct Glaze Polygon over Inswing French Door with 1/2" MRF



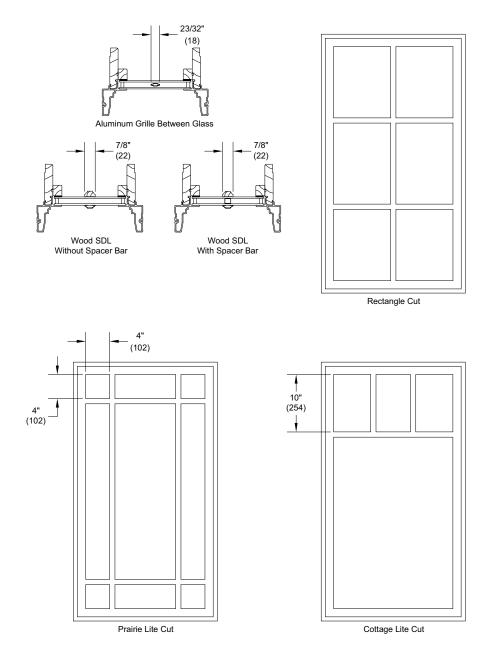
Direct Glaze Polygon over ELOFD with 1/2" MRF



over ELSFD 4 9/16" with 1/2" MRF



Divided Lite Options - Direct Glaze Rectangle



NOTE: Only rectangle shape polygons are available with SDL or GBG.

Divided Lite Options

Lite Cut	Minimum DLO
GBG	
Rectangular	3"
9-Lite Prairie	4"
6-Lite Top or Bottom Prairie	4"
6-Lite LH or RH Prairie	4"
Cottage 1H or 2H	3"
SDL	
Rectangular	4"
9-Lite Prairie	4"
6-Lite Top or Bottom Prairie	4"
6-Lite LH or RH Prairie	4"
Cottage 1H	8"
Cottage 2H	4"

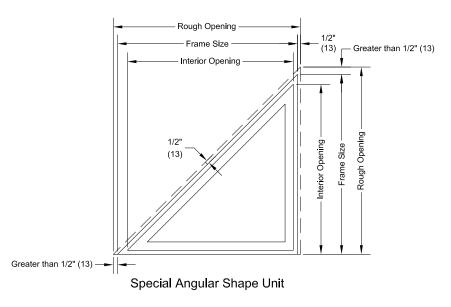
- NOTE: Due to the inherent qualities of tempered glass, daylight gaps may be seen when using simulated divided lite bars. Daylight gaps could be visible between the internal spacer bar and surface applied bars when viewing from an acute angle to the glass on the following applications:
 - Tempered glass over 91" high while using 7/8" SDL bars.
 - GBGs and SDL are available on Rectangle shape Polygons only.
 - Available GBG and SDL lite cuts are rectangular equal lites, Prairie patterns, and Cottage Style patterns.
 - Special size direct glaze rectangle with rectangular lite cuts will have equally spaced lites and may not align with the standard unit rectangular GBG or SDL unless specified at the time of the order.
 - Prairie GBG and SDL available in 9 lite and 6 lite top, bottom, left, and right patterns.
 - Special size direct glaze rectangle with Prairie lite cuts will default to 4" Daylight Opening (DLO) corners and may not align with the standard unit Prairie GBG or SDL unless specified at the time of the order.
 - Special size direct glaze rectangle with Cottage lite cuts will default to 10" Daylight Opening (DLO) height and may not align with the standard unit Cottage GBG or SDL unless specified at the time of the order.
 - Maximum number of lites wide and high for equal lite SDL option is 11 lites.
 - Simulated Rail: Rectangular, Prairie 6-Lite and 9-Lite SDL patterns are available with Simulated Rail.
 - Simulated Rail: Custom ratio and specified DLO are available with Simulated Rail and will be validated by OMS.
 - GBGs are not available on IZ3.
 - GBGs are not available with an unsupported bar length > 72".

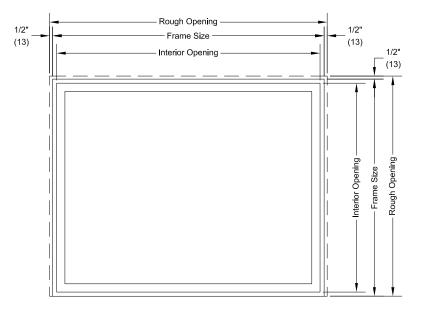
Conversion Formula:

Total DLO – Total bar width Number of lites = Individual DLO



Measurement Information





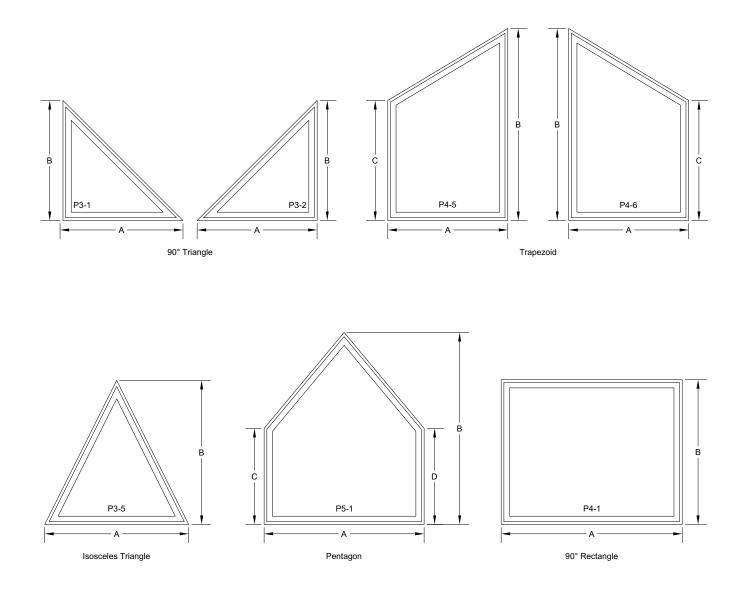


NOTE: On all units, we maintain our clearance or conversion dimension perpendicular to the frame. For this reason, standard rectangular conversions cannot be used for any unit involving angles. These must be calculated on an individual basis. If any dimension is critical (such as frame measurement to match lower unit) then order should be placed with that dimension. The order will be converted to the accurate rough opening. When calculating Angular shapes, contact your Marvin Representative.

Rough opening tolerance is 1/2 (13) perpendicular to frame. Masonry opening tolerance is 1/4 (6) perpendicular to frame Minimum angle on any shape is 15 degrees.



Measurement Information

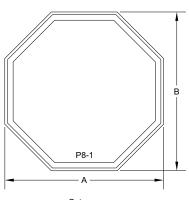


How to Specify Dimensions:

When ordering a trapezoid, triangle, or rectangle window, provide a sketch of the unit as viewed from the exterior, also include key rough opening dimensions. Specify casement or other.

Example:

To order a window of a trapezoid opening, provide the measurements of A, B, and C as indicated. For other shapes, give the dimensions shown.

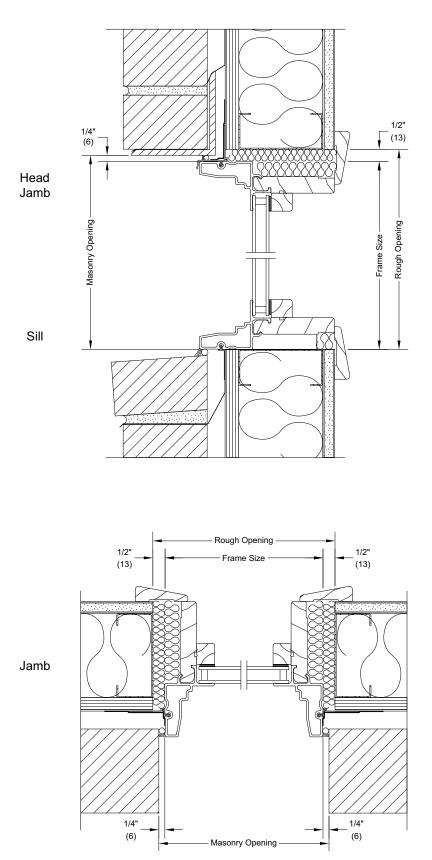


Ver 2019.3 2019-07-29



Section Details: Installation Suggestion - Brick Veneer With Steel Frame Construction

Scale: 3" - 1' 0"

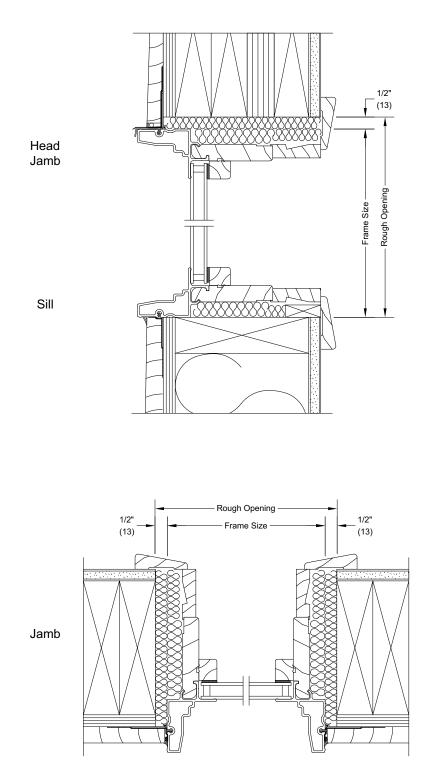


NOTE: The above wall sections represent typical wall conditions, these details are not intended as installation instructions. Please refer to the installation instructions provided with the purchased units.



Section Details: Installation Suggestion - Wood Siding With 2x6 Frame Construction

Scale: 3" - 1' 0"

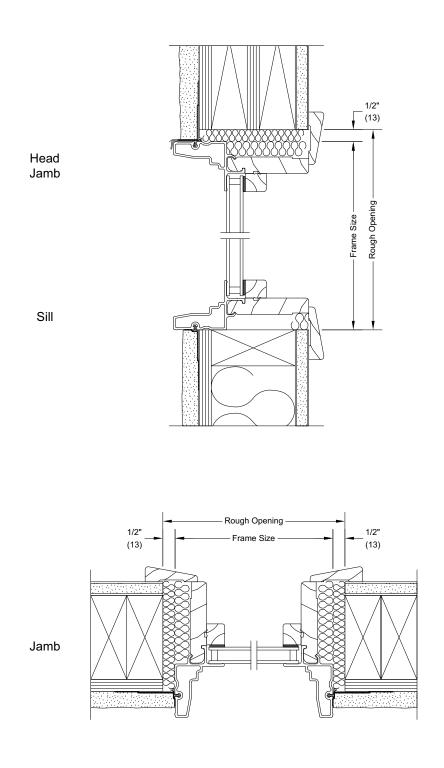


NOTE: The above wall sections represent typical wall conditions, these details are not intended as installation instructions. Please refer to the installation instructions provided with the purchased units.



Section Details: Installation Suggestion - Stucco With 2x4 Frame Construction

Scale: 3" - 1' 0"



NOTE: The above wall sections represent typical wall conditions, these details are not intended as installation instructions. Please refer to the installation instructions provided with the purchased units.