

# CHAPTER 29C

## WOOD ROUND TOP ULTIMATE DOUBLE HUNG IN-SASH WOOD ROUND TOP ULTIMATE DH MAGNUM

### Wood Round Top Ultimate Double Hung

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### **NOTE:**

Specifications and technical data are subject to change without notice.

Allow 1/16" (2) tolerance on all measurements.

Metric measurements are shown in parenthesis.

For accessories dimensions and applications see the Accessories section of this manual.

For technical assistance about Marvin products you may call our Architectural Hotline 1-800-346-3363 or visit our website: [www.Marvin.com](http://www.Marvin.com).

# WOOD ROUND TOP ULTIMATE DOUBLE HUNG

## UNIT FEATURES

### **Frame:**

- Pine wood interior and exterior standard. Optional mahogany or vertical grain Douglas fir
- Curved frames laminated using three to five pieces of pine
- Frame width: 4 9/16" (116)
- Frame thickness head and jamb: 1 1/16" (17)
- Sill Frame thickness: 1 7/16" (37)
- Subsill thickness: 1 3/32" (28)

### **Sash:**

- Pine wood interior and exterior standard. Optional mahogany or vertical grain Douglas fir
- Sash thickness: 1 5/8" (41)
- Picture Sash: 2" (51)
- Stile Width: 1 29/32" (48)
- Top and Bottom rail width: 1 25/32" (45), 3 9/16" (90)

### **Interior and exterior finish:**

- Treated bare wood or white primed (pine only)

### **Hardware:**

- Balance system: Coil spring block and tackle with nylon cord and fiber filled nylon clutch
- Jamb carrier: Vinyl extrusion with wood and aluminum inserts. Color: Beige
- Lock: High pressure zinc die-cast cam lock and keeper. Color: Satin Taupe. Optional: White, Brass, Satin Chrome, Antique Brass, Bronze, Oil Rubbed Bronze, Satin Nickel

### **Weatherstrip:**

- Operating units: Continuous, leaf weather strip at head jamb parting stop; dual durometer bulb at check rail; foam bulb type dual durometer weather strip on vertical sash edge; dual durometer bulb weather strip at bottom rail. Color Beige

### **Jamb Extensions:**

- Jamb extensions available for various wall thickness factory applied, finish to match interior

### **Insect Screens:**

- Aluminum screen: Standard full screen, optional half screen. Half screen covers bottom sash opening. Aluminum frame finish: Stone White, Bronze, Bahama Brown, Evergreen, or Pebble Gray. Select and custom colors available
- Screen mesh: 18 by 16 Charcoal fiberglass. Optional screen mesh: Charcoal aluminum wire, Black aluminum wire, Bright aluminum wire, Bright bronze wire

### **Removable Interior Grilles:**

- Bar: Pine wood, 3/4" (19) or 1 1/8" (29) wide
- Pattern: Rectangular, custom lite layouts available, contact your Marvin representative

### **Simulated Divided Lite (SDL):**

- Interior / Exterior bars: 7/8" (22) or 1 1/8" (29) wide bars. Pine wood standard, optional mahogany or vertical grain Douglas fir. Finish to match interior and exterior
- Pattern: Rectangular, custom lite layouts available, contact your Marvin representative
- Installation method: Factory applied with acrylic foam tape

### **Grilles-between-the-glass (GBG):**

- 1 1/16" (17mm) white contoured aluminum bar. Optional flat aluminum spacer bar, contact your Marvin representative

### **Authentic Divided Lite (ADL):**

- Bar (interior and exterior): single glazed 7/8" (22) wide bars, insulated glass 1 11/16" (43) wide bars: available in standard pine and optional mahogany or vertical grain Douglas fir. Finish to match interior and exterior
- Pattern: Rectangular, custom lite layouts available, contact your Marvin representative

### **Glass and Glazing:**

- Glazing method: Insulated or single glazed, single glazed with energy panel. Insulated glass hermetically sealed
- Glazing seal: Silicone glazed
- Glazing type: Clear glass, optional glass types: Low E II with argon, Laminated, Tempered, Obscure, Bronze tint, Gray tint, and Reflective Bronze tint Insulated glass will be altitude adjusted for higher elevations, argon gas not included

### **Accessories:**

- Installation brackets: 6 3/8" (162), 9 3/8" (238), or 15 3/8" (390)
- Masonry brackets: 6" (152) or 10" (254)
- Marvin SillGuard™
- Wood exterior mouldings: Brick Mould Casing, Flat casing, Mullion cover

### **NOTE:**

Values shown in parenthesis represent metric equivalents  
For product specifications please refer to the CSI Product Specifications, contact your Marvin representative

# WOOD ROUND TOP ULTIMATE DOUBLE HUNG

## NFRC VALUES

NFRC Unit Values					
Glazing Type	U-Factor	R-Value	Solar Heat Gain Coefficient	Visible Light Transmittance	Energy Star
<b>Wood Round Top Ultimate Double Hung In-Sash</b>					
<b>Size Tested</b>	<b>24 x 48</b>	<b>24 x 48</b>	<b>24 x 48</b>	<b>24 x 48</b>	
Single Glaze	0.92	1.09	0.63	0.65	-
Single Glaze ADL	0.92	1.09	0.57	0.58	-
Single Glaze with EP	0.45	2.22	0.56	0.59	-
Single Glaze with EP and ADL	0.46	2.17	0.51	0.53	-
Single Glaze with Low E EP	0.35	2.86	0.48	0.54	N, NC
Single Glaze with Low E EP and ADL	0.36	2.78	0.43	0.48	NC
Insulating glass	0.47	2.13	0.56	0.59	-
Insulating glass - ADL	0.53	1.89	0.46	0.47	-
Insulating glass - SDL with spacer bars	0.47	2.13	0.51	0.53	-
Insulating Low E II glass	0.34	2.94	0.31	0.52	N, NC, SC, S
Insulating Low E II glass - ADL	0.43	2.33	0.26	0.41	S
Insulating Low E II glass - SDL with spacer bars	0.34	2.94	0.28	0.46	N, NC, SC, S
Insulating Low E II glass - Argon	0.30	3.33	0.31	0.52	N, NC, SC, S
Insulating Low E II glass - Argon, ADL	0.41	2.44	0.26	0.41	S
Insulating Low E II glass - Argon, SDL with spacer bars	0.31	3.23	0.28	0.46	N, NC, SC, S
<b>Wood Round Top Ultimate Double Hung In-Sash Operator</b>					
<b>Size Tested</b>	<b>24 x 48</b>	<b>24 x 48</b>	<b>24 x 48</b>	<b>24 x 48</b>	
Single Glaze	0.89	1.12	0.59	0.60	-
Single Glaze ADL	0.89	1.12	0.54	0.55	-
Single Glaze with EP	0.46	2.17	0.52	0.54	-
Single Glaze with EP and ADL	0.46	2.17	0.48	0.50	-
Single Glaze with Low E EP	0.36	2.78	0.44	0.50	NC
Single Glaze with Low E EP and ADL	0.37	2.70	0.41	0.46	NC
Insulating glass	0.48	2.08	0.52	0.54	-
Insulating glass - SDL	0.48	2.08	0.48	0.50	-
Insulating glass - SDL with spacer bars	0.48	2.08	0.48	0.48	-
Insulating Low E II glass	0.36	2.78	0.29	0.48	NC, SC, S
Insulating Low E II glass - SDL	0.36	2.78	0.27	0.44	NC, SC, S
Insulating Low E II glass - SDL with spacer bars	0.36	2.78	0.27	0.44	NC, SC, S
Insulating Low E II glass - Argon	0.33	3.03	0.29	0.48	N, NC, SC, S
Insulating Low E II glass - Argon, SDL	0.33	2.94	0.27	0.44	N, NC, SC, S
Insulating Low E II glass - Argon, SDL with spacer bars	0.33	2.94	0.27	0.44	N, NC, SC, S
<b>Wood Round Top Ultimate Double Hung In-Sash Picture / Transom 2" Sash 1" IG</b>					
<b>Size Tested</b>	<b>24 x 48</b>	<b>24 x 48</b>	<b>24 x 48</b>	<b>24 x 48</b>	
Insulating glass	0.46	2.17	0.56	0.59	-
Insulating glass - SDL with spacer bars	0.46	2.17	0.51	0.53	-
Insulating Low E II glass	0.33	3.03	0.31	0.52	N, NC, SC, S
Insulating Low E II glass - SDL with spacer bars	0.34	2.94	0.28	0.46	N, NC, SC, S
Insulating Low E II glass - Argon	0.30	3.33	0.31	0.52	N, NC, SC, S
Insulating Low E II glass - Argon, SDL with spacer bars	0.31	3.23	0.28	0.46	N, NC, SC, S

**NOTE:**

Product Values are determined using the National Fenestration Rating Council (NFRC) Procedures for determining fenestration product values.

**U-Value:** (Btu/hr-sq ft-°F) Lower the U-Value, the greater the resistance to heat flow and better its insulating value.

**R-Value:** (1/U-Value) Higher the R-Value, the greater the resistance to heat flow and better its insulating value.

**Visible Light Transmittance (VLT):** Percentage of visible light transmitted through the unit.

**Solar Heat Gain Coefficient (SHGC):** The lower a window's SHGC, the less solar heat it transmits, and the greater its shading ability.

Capillary tubes are required for IG units at high elevations. Argon will not be furnished in units with capillary tubes.

Contact the Architectural Department Hotline at (800-346-3363) for additional NFRC Unit Values.

# WOOD ROUND TOP ULTIMATE DOUBLE HUNG

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## MEASUREMENT CONVERSIONS

Measurement Conversions - Wood Round Top Ultimate Double Hung In-Sash Operator													
Size Referenced	Daylight Opening		Glass Size		Frame Size		Rough Opening		Masonry Opening				
Daylight Opening	Dimension Needed												
	Daylight Opening	Width		+ 1 1/16" (27)	Width		+ 6 7/16" (164)	Width		+ 7 7/16" (189)	Width		+ 9 9/16" (243)
Height		+ 1 1/16" (27)	Height		DLO x 2 + 11 1/2" (192)	Height		DLO x 2 + 12" (305)	Height		DLO x 2 + 13 1/16" (332)		
Glass Size	Width	- 1 1/16" (27)			Width	+ 5 3/8" (137)	Width		+ 6 3/8" (162)	Width		+ 8 1/2" (216)	
	Height	- 1 1/16" (27)			Height	GS x 2 + 9 3/8" (238)	Height		GS x 2 + 9 7/8" (251)	Height		GS x 2 + 10 15/16" (278)	
Frame Size	Width	- 6 7/16" (164)	Width		- 5 3/8" (137)			Width	+ 1" (25)	Width		+ 3 1/8" (79)	
	Height	DLO x 2 - 11 1/2" (192)	Height		GS x 2 - 9 3/8" (238)			Height	+ 1/2" (13)	Height		+ 1 9/16" (40)	
Rough Opening	Width	- 7 7/16" (189)	Width		- 6 3/8" (162)	Width		- 1" (25)			Width	+ 2 1/8" (54)	
	Height	DLO x 2 - 12" (305)	Height		GS x 2 - 9 7/8" (251)	Height		- 1/2" (13)			Height	+ 1 1/16" (27)	
Masonry Opening	Width	- 9 9/16" (243)	Width		- 8 1/2" (216)	Width		- 3 1/8" (79)	Width		- 2 1/8" (54)		
	Height	DLO x 2 - 13 1/16" (332)	Height		GS x 2 - 10 15/16" (278)	Height		- 1 9/16" (40)	Height		- 1 1/16" (27)		

Measurement Conversions - Wood Magnum Double Hung In-Sash Round Top Operator													
Size Referenced	Daylight Opening		Glass Size		Frame Size		Rough Opening		Masonry Opening				
Daylight Opening	Dimension Needed												
	Daylight Opening	Width		+ 1 1/16" (27)	Width		+ 8 15/16" (227)	Width		+ 9 15/16" (252)	Width		+ 11 11/16" (319)
Height		+ 1 1/16" (27)	Height		DLO x 2 + 11 1/8" (283)	Height		DLO x 2 + 11 5/8" (295)	Height		DLO x 2 + 12 11/16" (327)		
Glass Size	Width	+ 1 1/16" (27)			Width	+ 7 7/8" (200)	Width		+ 8 7/8" (225)	Width		+ 10 5/8" (292)	
	Height	+ 1 1/16" (27)			Height	GS x 2 + 9" (224)	Height		GS x 2 + 9 1/2" (241)	Height		GS x 2 + 10 9/16" (274)	
Frame Size	Width	+ 8 15/16" (227)	Width		+ 7 7/8" (200)			Width	+ 1" (25)	Width		+ 2 3/4" (79)	
	Height	DLO x 2 + 11 1/8" (283)	Height		GS x 2 + 9" (224)			Height	+ 1/2" (13)	Height		+ 1 9/16" (40)	
Rough Opening	Width	+ 9 15/16" (252)	Width		+ 8 7/8" (225)	Width		- 1" (25)			Width	+ 1 3/4" (67)	
	Height	DLO x 2 + 11 5/8" (295)	Height		GS x 2 + 9 1/2" (241)	Height		- 1/2" (13)			Height	+ 1 1/16" (33)	
Masonry Opening	Width	+ 11 11/16" (319)	Width		+ 10 5/8" (292)	Width		+ 2 3/4" (79)	Width		- 1 3/4" (67)		
	Height	DLO x 2 + 12 11/16" (327)	Height		GS x 2 + 10 9/16" (274)	Height		+ 1 9/16" (40)	Height		- 1 1/16" (33)		

**NOTE:**  
For Magnum Historical unit conversions contact your Marvin representative.

# WOOD ROUND TOP ULTIMATE DOUBLE HUNG

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## MINIMUM AND MAXIMUM MEASUREMENTS / DESIGN PRESSURE / MULLING GUIDE

Minimum and Maximum Measurements	
<b>Wood Round Top In-Sash Ultimate Double Hung and Single Hung Operators</b>	
(The Maximums listed below are based on the square footage of Rectangular Rough Opening)	
Round Top Shape	Maximum Square Footage
RT2, RT6, RT30, RT9, RT10 RT21 thru RT24, RT33, RT34 RT45, RT 46	46 3/8" x 88 1/2" (1177 x 2247) <b>Maximum Square Feet of Rough Opening 28.5 (2.65)</b>
(The Minimums listed below are based on the square footage of Rectangular Rough Opening)	
RT2, RT6, RT30, RT9, RT10 RT21 thru RT24, RT33, RT34 RT45, RT46	15 3/8" x 25 3/8" (390 x 644) <b>Minimum Top Sash Daylight Opening Springline Height 8" (203)</b> <b>Minimum Frame Radius 11 1/4" (286)</b>
<b>Wood Round Top Magnum Double Hung and Single Hung Operators</b>	
(The Maximums listed below are based on the square footage of Rectangular Rough Opening)	
Round Top Shape	Maximum Square Footage
RT2, RT6, RT30, RT9, RT10 RT21 thru RT24, RT33, RT34 RT45, RT 46	68 7/8" x 129 1/2" (1749 x 3289) <b>not to exceed 18.5 sq ft per sash (1.72 Sq. Meters)</b>
(The Minimums listed below are based on the square footage of Rectangular Rough Opening)	
RT2, RT6, RT30, RT9, RT10 RT21 thru RT24, RT33, RT34 RT45, RT46	Sq. 20 7/8" x 33 1/2" (530 x 851) <b>minimum frame radius 11 13/16" (300)</b>
<b>NOTE:</b> RT6: If the distance from the springline to the top of the head jamb exceeds 1/3 of the R.O. width, the shape must be changed to RT2 to manufacture	

### Design Pressures

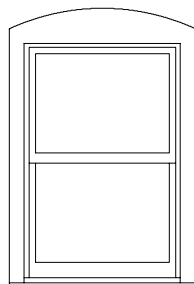
Wood Round Top Ultimate Double Hung are rated DP60 up to 6190.  
Wood Round Top Ultimate Double Hung Transoms are rated DP60 up to 7590.

Double Hung Round Tops Guide for Mulling to Standard Rectangular Units					
Unit Type	RT Call Number	RT Shape Number	Unit Type	RT Call Number	RT Shape Number
1W20 DH	RT25__DH DG WRT2015DHT In-Sash RT20__DHT In-Sash RT25__DH Operator	RT6 RT1 RT6 RT6	1W36 DH or 1W40 DHP	RT4120DH DG RT41__DH DG RT40__DHP In-Sash WRT3623DHT In-Sash RT36__DH In-Sash RT36__DH Operator	RT1 RT6 RT6 RT1 RT6 RT6
1W24 DH	RT2914DH DG RT29__DH DG WRT2417DHT In-Sash RT24__DH In-Sash RT24__DH Operator	RT1 RT6 RT1 RT6 RT6	1W40 DH	RT4522DH DG RT45__DH DG WRT4025DHT In-Sash RT40__DH In-Sash RT40__DH Operator	RT1 RT6 RT1 RT6 RT6
1W26 DH	RT3115DH DG RT31__DH DG WRT2618DHT In-Sash	RT1 RT6 RT6	2W20 DH	RT5025DH DG RT5118DH DG RT51__DH DG WRT5027DHT In-Sash RT50__DHT In-Sash	RT1 RT29 RT6 RT1 RT6
1W28 DH	RT3316DH DG RT33__DH DG WRT2819DHT In-Sash RT28__DHT In-Sash RT28__DH Operator	RT1 RT6 RT1 RT6 RT6	2W24DH	RT5828DH DG RT5918DH DG RT59__DH DG WRT5831DHT In-Sash RT58__DHT In-Sash	RT1 RT29 RT6 RT1 RT6
1W30 DH	RT3517DH DG RT35__DH DG WRT3020DHT In-Sash	RT1 RT6 RT6	2W28DH	RT6632DH RT6718DH RT67__DH WRT6635DHT In-Sash RT66__DHT In-Sash	RT1 RT29 RT6 RT1 RT6
1W32 DH	RT3718DH DG RT37__DH DG WRT3221DHT In-Sash RT32__DHT In-Sash RT32__DH Operator	RT1 RT6 RT1 RT6 RT6	2W32DH	RT7437DH DG RT7518DH DG RT75__DH DG WRT7439DHT In-Sash RT74__DHT In-Sash	RT1 RT29 RT6 RT1 RT6

# WOOD ROUND TOPS

## DOUBLE HUNG VARIATIONS / RT1 TRUE HALF ABOVE SPRINGLINE IN-SASH

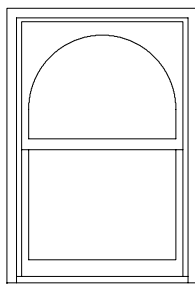
NOT TO SCALE



### Variation 3

Exterior View

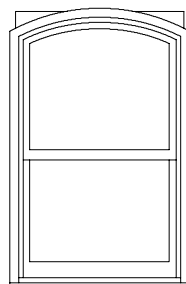
Radius Top Casing  
Ultimate Double/Hung  
Magnum Double/Hung



### Variation 5

Exterior View

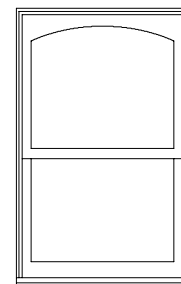
Curved Daylight Opening  
Ultimate Double Hung/Single Hung  
Magnum Double Hung/Single Hung



### Variation 6

Exterior View

Rectangular Sash, Casing,  
Blindstop, Curved Daylight Opening  
Ultimate Double/Single Hung  
Magnum Double/Single Hung



### Variation 6

Interior View

Rectangular Sash, Casing,  
Blindstop, Curved Daylight Opening  
Ultimate Double/Single Hung  
Magnum Double Hung/Single Hung

**CAUTION:** Marvin SillGuard™ is not recommended for these shapes.

## WOOD ULTIMATE DOUBLE HUNG SERIES RT1 - TRUE HALF ABOVE SPRINGLINE IN-SASH

Mas. Opg. Rgh. Opg. Rgh. Opg. Rad.	2-4 1/2 (724) 2-2 3/8 (670) 1-1 3/16 (335)	2-8 1/2 (826) 2-6 3/8 (772) 1-3 3/16 (386)	2-10 1/2 (876) 2-8 3/8 (822) 1-4 3/16 (411)	3-0 1/2 (927) 2-10 3/8 (873) 1-5 3/16 (437)	3-2 1/2 (978) 3-0 3/8 (924) 1-6 3/16 (462)
1-2 1/4 (362) 1-1 3/16 (335)	1-4 1/4 (413) 1-3 3/16 (386)	1-5 1/4 (438) 1-4 3/16 (411)	1-6 1/4 (464) 1-5 3/16 (437)	1-7 1/4 (489) 1-6 3/16 (462)	
	WRT2015 DHT	WRT2417 DHT	WRT2618 DHT	WRT2819 DHT	WRT3020 DHT
Mas. Opg. Rgh. Opg. Rgh. Opg. Rad.	3-4 1/2 (1029) 3-2 3/8 (975) 1-7 3/16 (487)	3-8 1/2 (1130) 3-6 3/8 (1076) 1-9 3/16 (538)	4-0 1/2 (1232) 3-10 3/8 (1178) 1-11 3/16 (589)	4-5 7/8 (1368) 4-3 3/4 (1314) 2-1 7/8 (657)	5-1 7/8 (1572) 4-11 3/4 (1518) 2-5 7/8 (759)
1-8 1/4 (514) 1-7 3/16 (487)	1-10 1/4 (565) 1-9 3/16 (583)	2-0 1/4 (616) 1-11 3/16 (589)	2-2 15/16 (684) 2-1 7/8 (657)	2-6 15/16 (786) 2-5 7/8 (759)	
	WRT3221 DHT	WRT3623 DHT	WRT4025 DHT	WRT5027 DHT	WRT5831 DHT
Mas. Opg. Rgh. Opg. Rgh. Opg. Rad.	3-9 7/8 (1775) 5-7 3/4 (1721) 2-9 7/8 (860)	6-5 7/8 (1978) 6-3 3/4 (1924) 3-1 7/8 (962)			
2-10 15/16 (887) 2-9 7/8 (860)	3-2 15/16 (989) 3-1 7/8 (962)				
	WRT6635 DHT	WRT7439 DHT			
Mas. Opg. Rgh. Opg.					

**NOTE:**

Units shown represent standard transoms without a subsill. Add 1 3/32" (28) to the Rough Opening and Masonry Opening heights for stand alone units.

# WOOD ROUND TOP ULTIMATE DOUBLE HUNG

ELEVATIONS: RT6 EYEBROW ABOVE SPRINGLINE ONE WIDE OPERATOR

NOT TO SCALE

**CAUTION:** It is recommended that a minimum of 1/4" be added to the rough opening height when using a rigid sill pan product such as Marvin SillGuard™. (SillGuard requires minimum of 6" RO springline).

## WOOD ULTIMATE DOUBLE HUNG SERIES

### RT6 - EYEBROW ABOVE SPRINGLINE STANDARD SIZES

#### 1 WIDE OPERATOR

Mas. Opg. 2-4 1/2 (724)	2-8 1/2 (826)	3-0 1/2 (927)	3-4 1/2 (1029)
Mas. Opg. Rad. 2-1 9/16 (649)	2-1 9/16 (649)	2-7 9/16 (802)	3-5 9/16 (1056)
Rgh. Opg. 2-2 3/8 (670)	2-6 3/8 (772)	2-10 3/8 (873)	3-2 3/8 (975)
Rgh. Opg. Rad. 2-0 1/2 (622)	2-0 1/2 (622)	2-6 1/2 (775)	3-4 1/2 (1029)
3-6 3/16 (1072) 3-1 3/4 (959) 3-5 1/8 (1045) 3-1 9/32 (947)	3-7 9/16 (1104) 3-1 3/4 (959) 3-6 17/32 (1080) 3-1 1/4 (946)	3-7 5/8 (1108) 3-1 13/16 (961) 3-6 9/16 (1081) 3-1 9/32 (947)	3-7 3/16 (1097) 3-1 13/16 (961) 3-6 1/8 (1070) 3-1 5/16 (948)
WRT2014DH-1W	WRT2414DH-1W	WRT2814DH-1W	WRT3214DH-1W
3-10 3/16 (1173) 3-5 3/4 (1061) 3-9 1/8 (1146) 3-5 9/32 (1049)	3-11 9/16 (1209) 3-5 3/4 (1061) 3-10 17/32 (1182) 3-5 1/4 (1048)	3-11 5/8 (1210) 3-5 13/16 (1062) 3-10 9/16 (1183) 3-5 9/32 (1049)	3-11 3/16 (1199) 3-5 13/16 (1062) 3-10 1/8 (1172) 3-5 5/16 (1049)
WRT2016DH-1W	WRT2416DH-1W	WRT2816DH-1W	WRT3216DH-1W
4-2 3/16 (1275) 3-9 3/4 (1162) 4-1 1/8 (1248) 3-9 9/32 (1150)	4-3 9/16 (1310) 3-9 3/4 (1162) 4-2 17/32 (1285) 3-9 1/4 (1149)	4-3 5/8 (1312) 3-9 13/16 (1164) 4-2 9/16 (1284) 3-9 9/32 (1150)	4-3 3/16 (1301) 3-9 13/16 (1164) 4-2 1/8 (1273) 3-9 5/16 (1151)
WRT2018DH-1W	WRT2418DH-1W	WRT2818DH-1W	WRT3218DH-1W
4-6 3/16 (1377) 4-1 3/4 (1264) 4-5 1/8 (1349) 4-1 9/32 (1252)	4-7 9/16 (1412) 4-1 3/4 (1264) 4-6 17/32 (1385) 4-1 1/4 (1251)	4-7 5/8 (1413) 4-1 13/16 (1265) 4-6 9/16 (1386) 4-1 9/32 (1252)	4-7 3/16 (1402) 4-1 13/16 (1265) 4-6 1/8 (1375) 4-1 5/16 (1253)
WRT2020DH-1W	WRT2420DH-1W	WRT2820DH-1W	WRT3220DH-1W
4-10 3/16 (1478) 4-5 3/4 (1365) 4-9 1/8 (1451) 4-5 9/32 (1353)	4-11 9/16 (1514) 4-5 3/4 (1365) 4-10 17/32 (1487) 4-5 1/4 (1353)	4-11 5/8 (1515) 4-5 13/16 (1367) 4-10 9/16 (1487) 4-5 9/32 (1353)	4-11 3/16 (1504) 4-5 13/16 (1367) 4-10 1/8 (1476) 4-5 5/16 (1354)
WRT2022DH-1W	WRT2422DH-1W	WRT2822DH-1W	WRT3222DH-1W
5-2 3/16 (1580) 4-9 3/8 (1467) 5-1 1/8 (1553) 4-9 9/32 (1455)	5-3 9/16 (1615) 4-9 3/8 (1467) 5-2 17/32 (1588) 4-9 1/4 (1454)	5-3 5/8 (1616) 4-9 13/16 (1469) 5-2 9/16 (1589) 4-9 9/32 (1455)	5-3 3/16 (1605) 4-9 13/16 (1469) 5-2 1/8 (1578) 4-9 5/16 (1456)
WRT2024DH-1W	WRT2424DH-1W	WRT2824DH-1W	WRT3224DH-1W
5-6 3/16 (1681) 5-1 3/4 (1569) 5-5 1/8 (1654) 5-1 9/32 (1557)	5-7 9/16 (1717) 5-1 3/4 (1569) 5-6 17/32 (1690) 5-1 1/4 (1556)	5-7 5/8 (1718) 5-1 13/16 (1570) 5-6 9/16 (1691) 5-1 9/32 (1557)	5-7 3/16 (1707) 5-1 13/16 (1570) 5-6 1/8 (1680) 5-1 5/16 (1557)
WRT2026DH-1W	WRT2426DH-1W	WRT2826DH-1W	WRT3226DH-1W
5-10 3/16 (1783) 5-5 3/4 (1670) 5-9 1/8 (1756) 5-5 9/32 (1658)	5-11 9/16 (1818) 5-5 3/4 (1670) 5-10 17/32 (1791) 5-5 1/4 (1657)	5-11 5/8 (1820) 5-5 13/16 (1672) 5-10 9/16 (1792) 5-5 9/32 (1658)	5-11 3/16 (1809) 5-5 13/16 (1672) 5-10 1/8 (1781) 5-5 5/16 (1659)
WRT2028DH-1W	WRT2428DH-1W	WRT2828DH-1W	WRT3228DH-1W
6-2 3/16 (1885) Mas. Opg. SpIn 5-9 3/4 (1772) Rgh. Opg. 6-1 1/8 (1857) Rgh. Opg. SpIn 5-9 9/32 (1760)	6-3 9/16 (1920) Mas. Opg. SpIn 5-9 3/4 (1772) Rgh. Opg. 6-2 17/32 (1893) Rgh. Opg. SpIn 5-9 1/4 (1759)	6-3 5/8 (1921) Mas. Opg. SpIn 5-9 13/16 (1773) Rgh. Opg. 6-2 9/16 (1894) Rgh. Opg. SpIn 5-9 9/32 (1760)	6-3 3/16 (1910) Mas. Opg. SpIn 5-9 13/16 (1773) Rgh. Opg. 6-2 1/8 (1883) Rgh. Opg. SpIn 5-9 5/16 (1761)
WRT2030DH-1W	WRT2430DH-1W	WRT2830DH-1W	WRT3230DH-1W

**NOTE:** For egress information contact your Marvin representative.

# WOOD ROUND TOP ULTIMATE DOUBLE HUNG

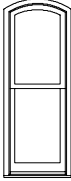



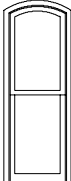



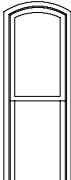







## ELEVATIONS: RT6 EYEBROW ABOVE SPRINGLINE 1 WIDE OPERATOR

NOT TO SCALE

**CAUTION:** It is recommended that a minimum of 1/4" be added to the rough opening height when using a rigid sill pan product such as Marvin SillGuard™. (SillGuard requires minimum of 6" RO springline).

### WOOD ULTIMATE DOUBLE HUNG SERIES

#### RT6 - EYEBROW ABOVE SPRINGLINE STANDARD SIZES 1 WIDE OPERATOR

Mas. Opp. 2-4 1/2 (724) Mas. Opp. Rad. 2-1 9/16 (649) Rgh. Opp. 2-2 3/8 (670) Rgh. Opp. Rad. 2-0 1/2 (622)		Mas. Opp. 2-8 1/2 (826) Mas. Opp. Rad. 2-1 9/16 (649) Rgh. Opp. 2-6 3/8 (772) Rgh. Opp. Rad. 2-0 1/2 (622)		Mas. Opp. 3-0 1/2 (927) Mas. Opp. Rad. 2-7 9/16 (802) Rgh. Opp. 2-10 3/8 (873) Rgh. Opp. Rad. 2-6 1/2 (775)		Mas. Opp. 3-4 1/2 (1029) Mas. Opp. Rad. 3-5 9/16 (1056) Rgh. Opp. 3-2 3/8 (975) Rgh. Opp. Rad. 3-4 1/2 (1029)	
6-6 3/16 (1986) 6-1 3/4 (1873) 6-5 1/8 (1959) 6-1 9/32 (7861)		6-7 9/16 (2022) 6-1 3/4 (1873) 6-6 17/32 (1995) 6-1 1/4 (1861)		6-7 5/8 (2023) 6-1 13/16 (1875) 6-6 9/16 (1995) 6-1 9/32 (1861)		6-7 3/16 (2012) 6-1 13/16 (1875) 6-6 1/8 (1984) 6-1 5/16 (1862)	
6-10 3/16 (2087) 6-5 3/4 (1975) 6-9 1/8 (2061) 6-5 9/32 (1963)		6-11 9/16 (2123) 6-5 3/4 (1975) 6-10 17/32 (2096) 6-5 1/4 (1962)		6-11 5/8 (2124) 6-5 13/16 (1977) 6-10 9/16 (2097) 6-5 9/32 (1963)		6-11 3/16 (2113) 6-5 13/16 (1977) 6-10 1/8 (2086) 6-5 5/16 (1964)	
Mas. Opp. 7-2 3/16 (2189) Mas. Opp. Spln 6-9 3/4 (2077) Rgh. Opp. 7-1 1/8 (2162) Rgh. Opp. Spln 6-9 9/32 (2065)		Mas. Opp. 7-3 9/16 (2225) Mas. Opp. Spln 6-9 3/4 (2077) Rgh. Opp. 7-2 17/32 (2198) Rgh. Opp. Spln 6-9 1/4 (2064)		Mas. Opp. 7-3 5/8 (2226) Mas. Opp. Spln 6-9 13/16 (2078) Rgh. Opp. 7-2 9/16 (2199) Rgh. Opp. Spln 6-9 9/32 (2065)		Mas. Opp. 7-3 3/16 (2215) Mas. Opp. Spln 6-9 13/16 (2188) Rgh. Opp. 7-2 1/8 (2188) Rgh. Opp. Spln 6-9 5/16 (2065)	

# WOOD ROUND TOP ULTIMATE DOUBLE HUNG

## ELEVATIONS: RT6 EYEBROW ABOVE SPRINGLINE ONE WIDE OPERATOR

NOT TO SCALE

**CAUTION:** It is recommended that a minimum of 1/4" be added to the rough opening height when using a rigid sill pan product such as Marvin SillGuard™. (SillGuard requires minimum of 6" RO springline).

### WOOD ULTIMATE DOUBLE HUNG SERIES RT6 - EYEBROW ABOVE SPRINGLINE STANDARD SIZES 1 WIDE OPERATOR

Mas. Opg. 3-8 1/2 (1130)	3-8 1/2 (1130)	4-0 1/2 (1232)	4-0 1/2 (1232)
Mas. Opg. Rad. 3-5 9/16 (1056)	3-5 9/16 (1056)	3-5 9/16 (1056)	3-5 9/16 (1056)
Rgh. Opg. 3-6 3/8 (1076)	3-6 3/8 (1076)	3-10 3/8 (1178)	3-10 3/8 (1178)
Rgh. Opg. Rad. 3-4 1/2 (1029)	3-4 1/2 (1029)	3-4 1/2 (1029)	3-4 1/2 (1029)
3-8 5/16 (1126) 3-1 13/16 (961) 3-7 9/32 (1099) 3-1 9/32 (947)	3-8 5/16 (1126) 5-1 13/16 (1570) 5-7 9/32 (1709) 5-1 9/32 (1557)	3-9 5/8 (1159) 3-1 13/16 (961) 3-8 9/16 (1132) 3-1 9/32 (947)	5-9 5/8 (1768) 5-1 13/16 (1570) 5-8 9/16 (1741) 5-1 9/32 (1557)
WRT3614DH-1W	WRT3626DH-1W	WRT4014DH-1W	WRT4026DH-1W
4-0 5/16 (1228) 3-5 13/16 (1062) 3-11 9/32 (1201) 3-5 9/32 (1049)	6-0 5/16 (1837) 5-5 13/16 (1672) 5-11 9/32 (1811) 5-5 9/32 (1658)	4-1 5/8 (1260) 3-5 13/16 (1062) 4-0 9/16 (1233) 3-5 9/32 (1049)	6-1 5/8 (1870) 5-5 13/16 (1672) 6-0 9/16 (1843) 5-5 9/32 (1658)
WRT3616DH-1W	WRT3628DH-1W	WRT4016DH-1W	WRT4028DH-1W
4-4 5/16 (1329) 3-9 13/16 (1164) 4-3 9/32 (1303) 3-9 9/32 (1150)	6-4 5/16 (1939) 5-9 13/16 (1773) 6-3 9/32 (1912) 5-9 9/32 (1760)	4-5 5/8 (1362) 3-9 13/16 (1164) 4-4 9/16 (1335) 3-9 9/32 (1150)	6-5 5/8 (1972) 5-9 13/16 (1773) 6-4 9/16 (1945) 5-9 9/32 (1760)
WRT3618DH-1W	WRT3630DH-1W	WRT4018DH-1W	WRT4030DH-1W
4-8 5/16 (1431) 4-1 13/16 (1265) 4-7 9/32 (1404) 4-1 9/32 (1252)	6-8 5/16 (2040) 6-1 13/16 (1875) 6-7 9/32 (2014) 6-1 9/32 (1861)	4-9 5/8 (1464) 4-1 13/16 (1265) 4-8 9/16 (1437) 4-1 9/32 (1252)	6-9 5/8 (2073) 6-1 13/16 (1875) 6-8 9/16 (2046) 6-1 9/32 (1861)
WRT3620DH-1W	WRT3632DH-1W	WRT4020DH-1W	WRT4032DH-1W
5-0 5/16 (1532) 4-5 13/16 (1367) 4-11 9/32 (1506) 4-5 9/32 (1355)	7-0 1/4 (2140) 6-5 13/16 (1977) 6-11 9/32 (2115) 6-5 9/32 (1963)	5-1 5/8 (1565) 4-5 13/16 (1367) 5-0 9/16 (1538) 4-5 9/32 (1353)	7-1 5/8 (2175) 6-5 13/16 (1977) 7-0 9/16 (2148) 6-5 9/32 (1963)
WRT3622DH-1W	WRT3634DH-1W	WRT4022DH-1W	WRT4034DH-1W
5-4 5/16 (1634) 4-9 13/16 (1469) 5-3 9/32 (1607) 4-9 9/32 (1455)	7-4 15/16 (2244) 6-9 13/16 (2078) 7-3 9/32 (2217) 6-9 9/32 (2065)	5-5 5/8 (1667) 4-9 13/16 (1469) 5-4 9/16 (1640) 4-9 9/32 (1455)	7-5 5/8 (2276) 6-9 13/16 (2078) 7-4 9/16 (2249) 6-9 9/32 (2065)
WRT3624DH-1W	WRT3636DH-1W	WRT4024DH-1W	WRT4036DH-1W

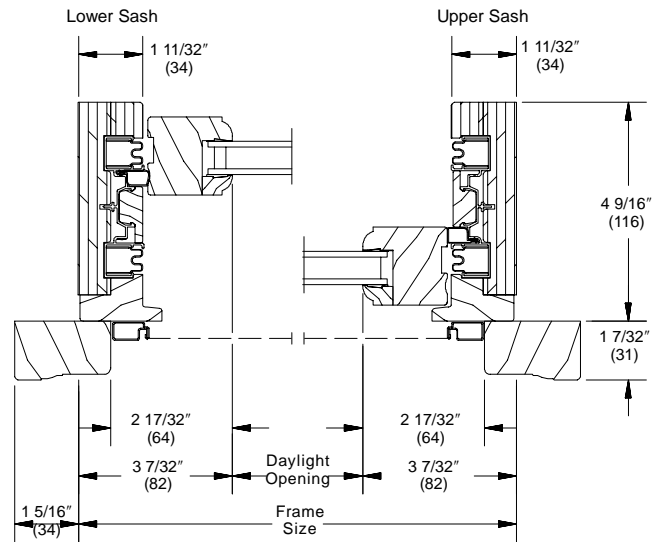
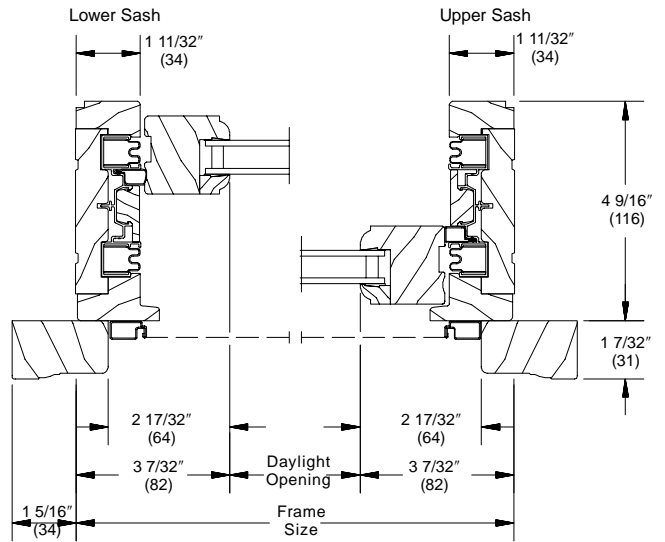
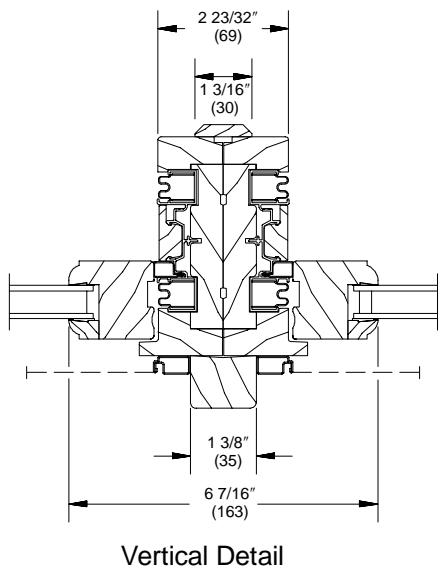
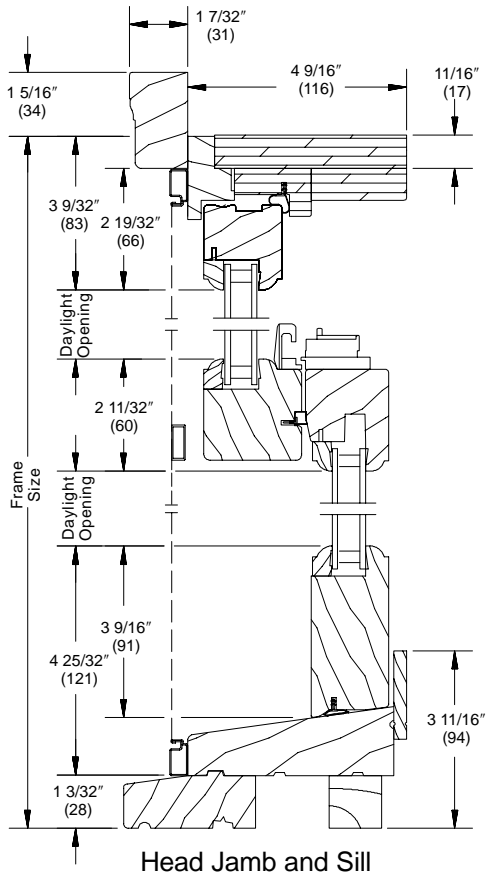
**NOTE:** For egress information contact your Marvin representative.

# WOOD ROUND TOP ULTIMATE DOUBLE HUNG

## SECTION DETAILS: DOUBLE HUNG

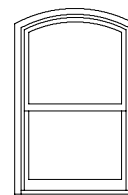
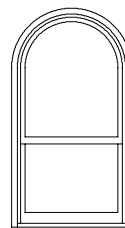
SCALE: 3" = 1' 0"

### Ultimate Double Hung



RT2 Shape

RT6 Shape



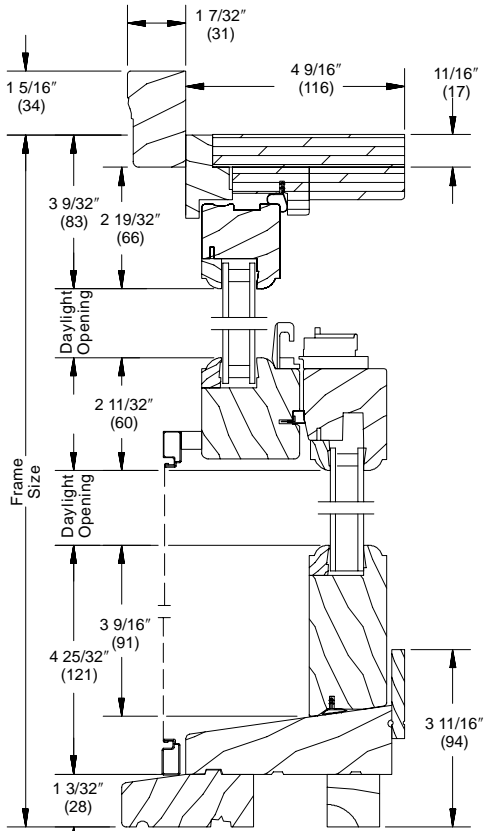
Wood Round Top Ultimate Double Hung

# WOOD ROUND TOP ULTIMATE DOUBLE HUNG

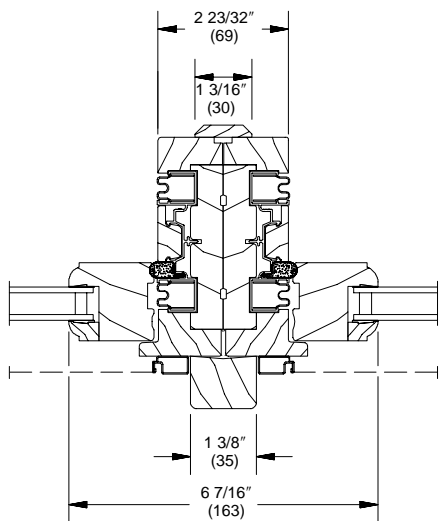
## SECTION DETAILS: SINGLE HUNG

SCALE: 3" = 1' 0"

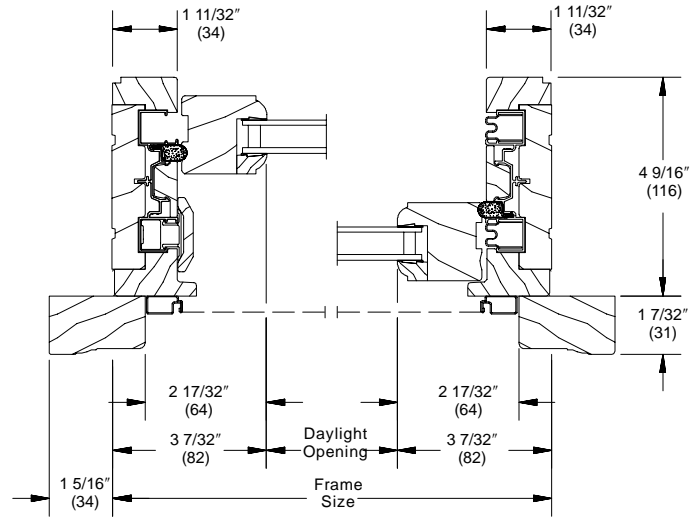
### Ultimate Single Hung



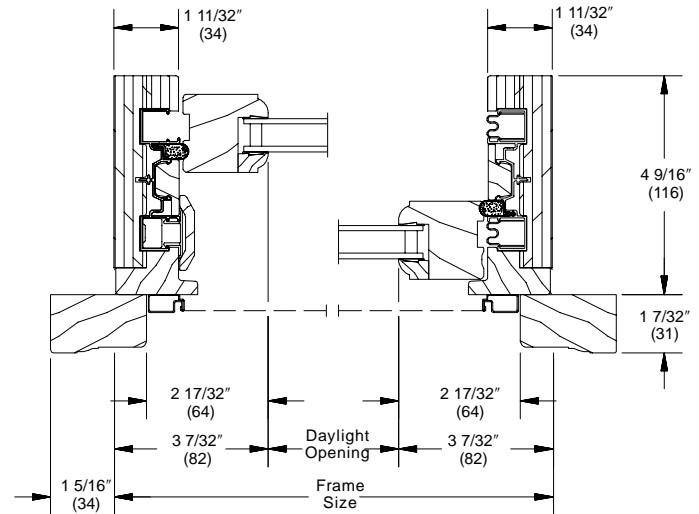
Head Jamb and Sill



Vertical Detail



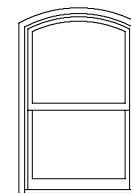
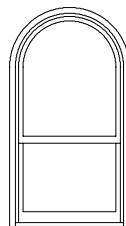
Jambs RT6



Jambs RT2

RT2 Shape

RT6 Shape



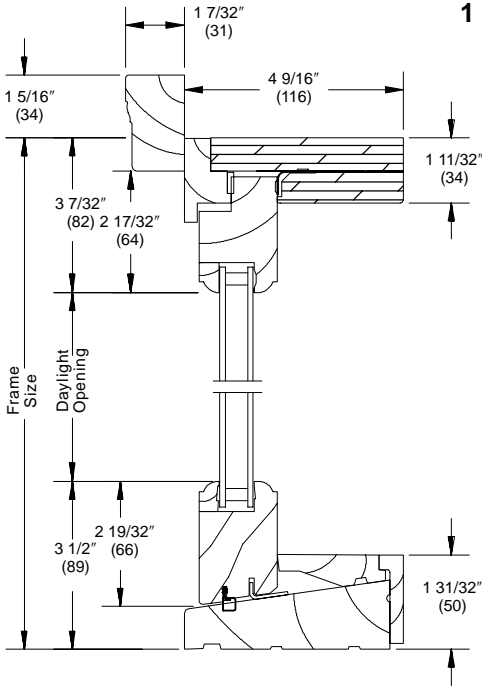
Wood Round Top Ultimate Single Hung

# WOOD ROUND TOP ULTIMATE DOUBLE HUNG

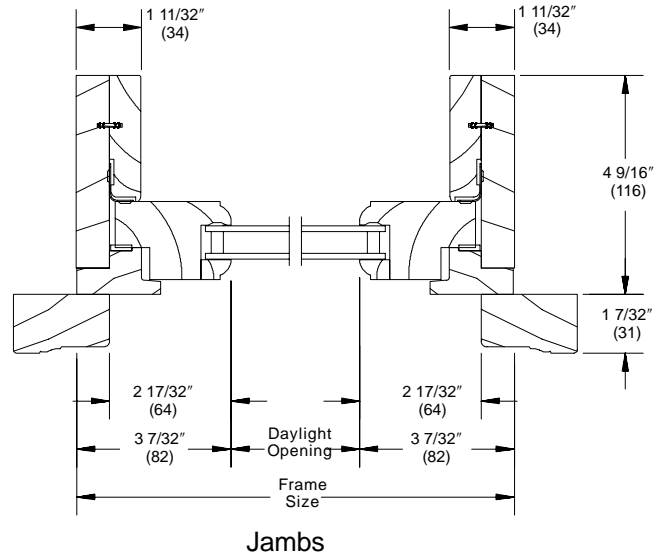
## SECTION DETAILS: 1 5/8" AND 2" TRANSOM

SCALE: 3" = 1' 0"

### Ultimate Double Hung 1 5/8" In-Sash Transom

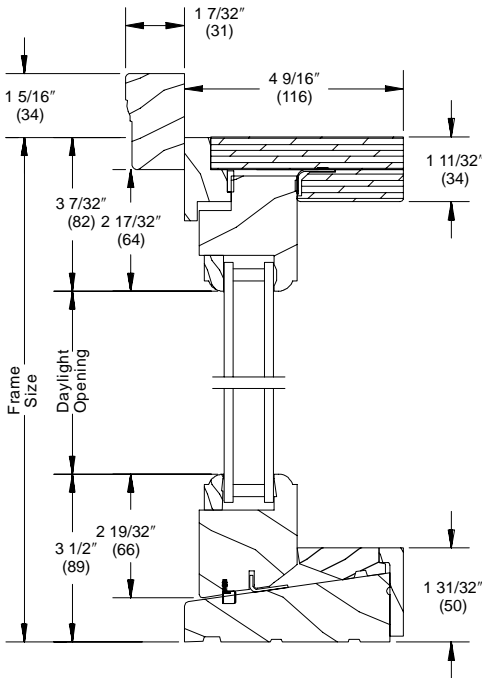


Head Jamb and Sill

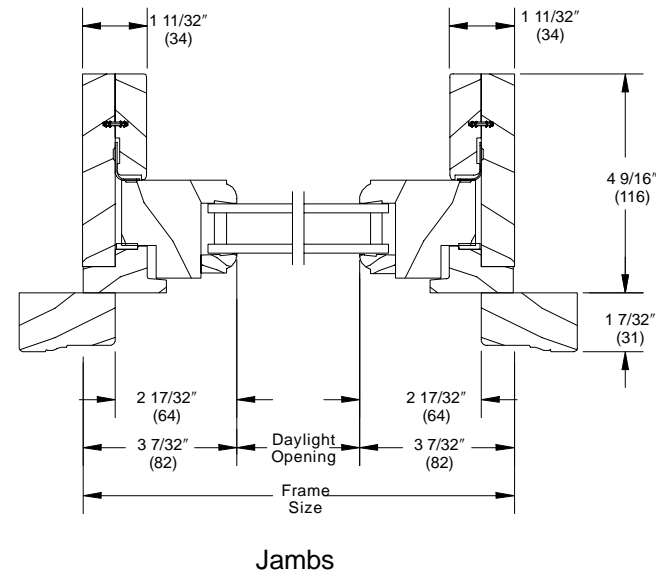


Jamba

### 2" In-Sash Transom



Head Jamb and Sill



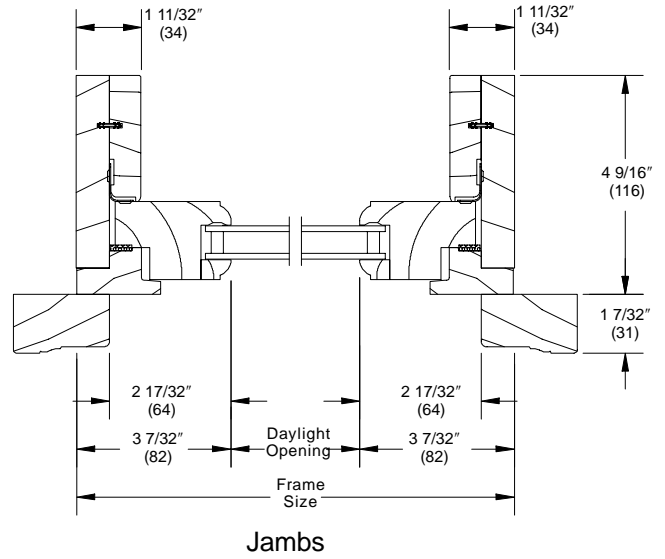
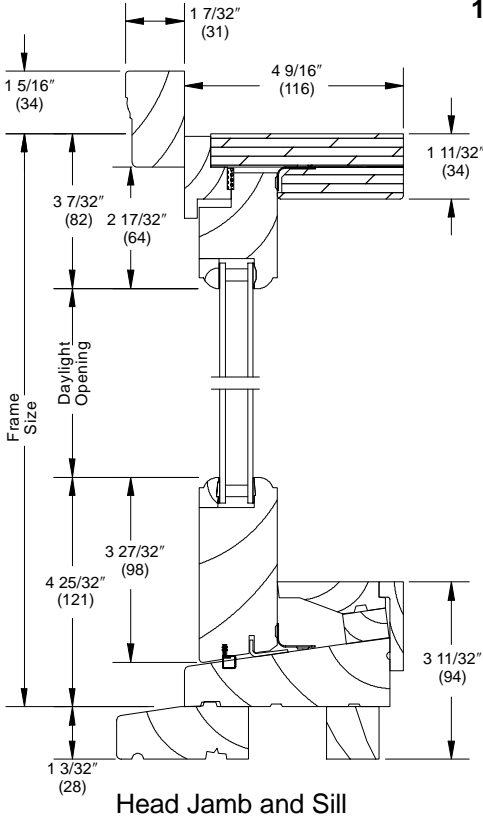
Jamba

# WOOD ROUND TOP ULTIMATE DOUBLE HUNG

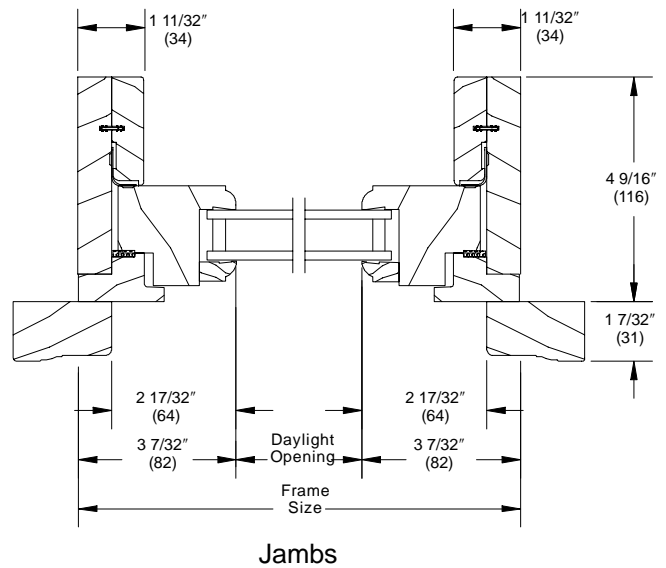
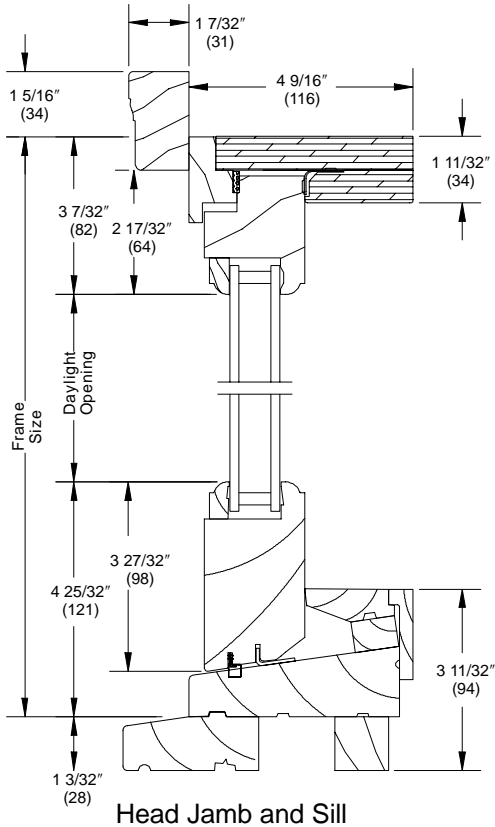
## SECTION DETAILS: 1 5/8" AND 2" PICTURE

SCALE: 3" = 1' 0"

### Ultimate Double Hung 1 5/8" In-Sash Picture



### 2" In-Sash Picture

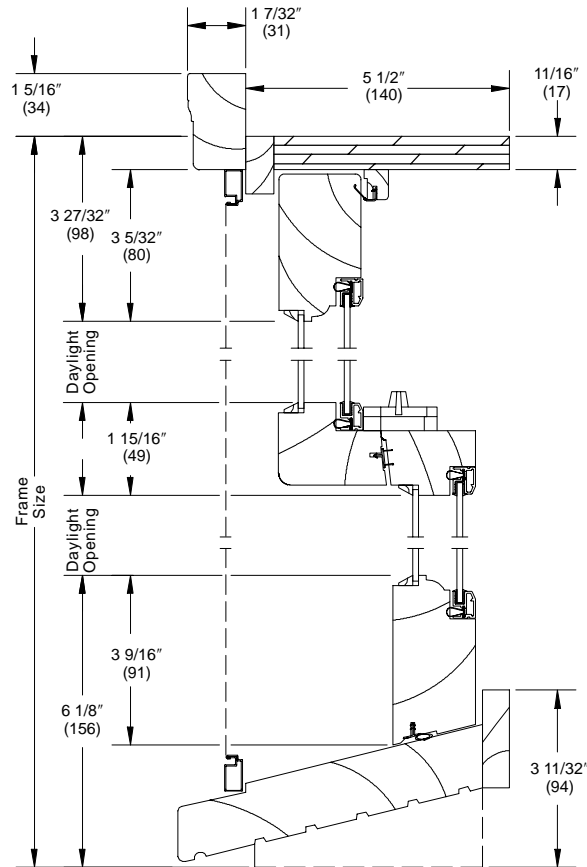


# WOOD MAGNUM DOUBLE HUNG ROUND TOPS

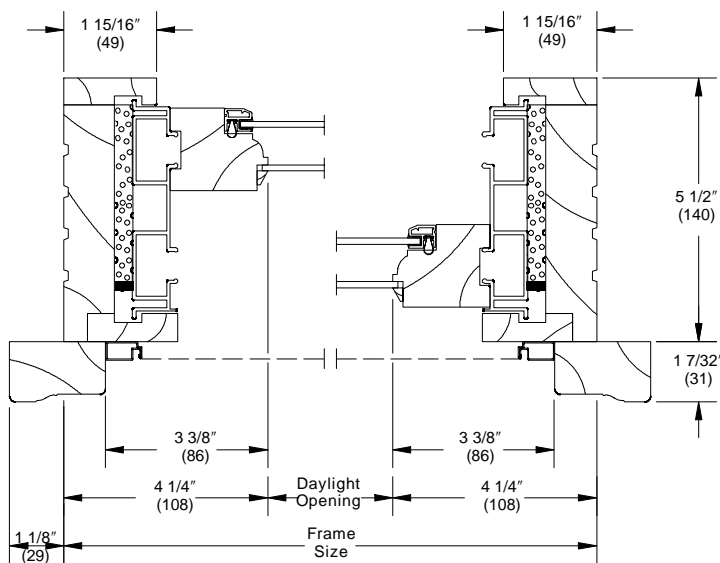
## SECTION DETAILS: RT6 MAGNUM HISTORICAL DOUBLE HUNG OPERATOR

SCALE: 3" = 1' 0"

### Magnum Historical Double Hung - RT6

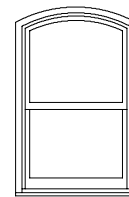


Head Jamb and Sill



Jambs - RT6

RT6 Shape



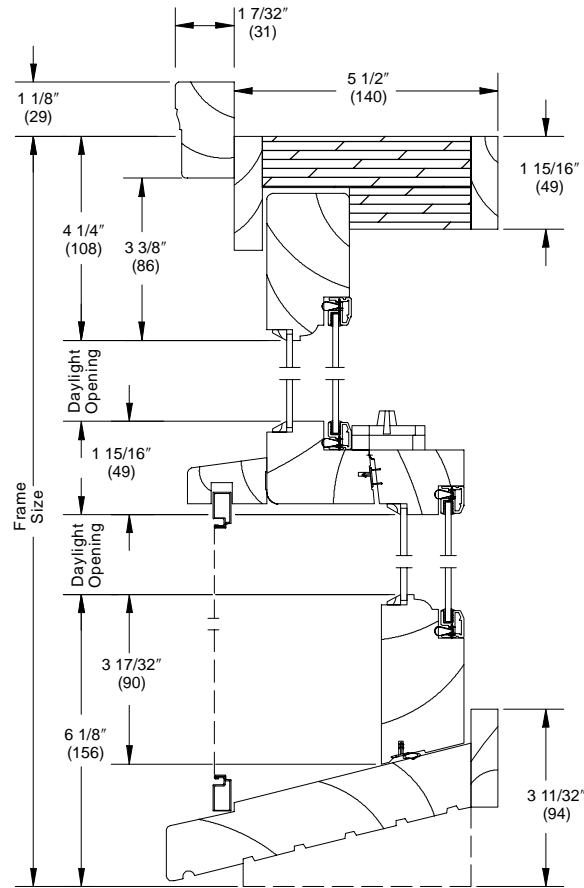
Magnum Historical Double Hung

# WOOD MAGNUM DOUBLE HUNG ROUND TOPS

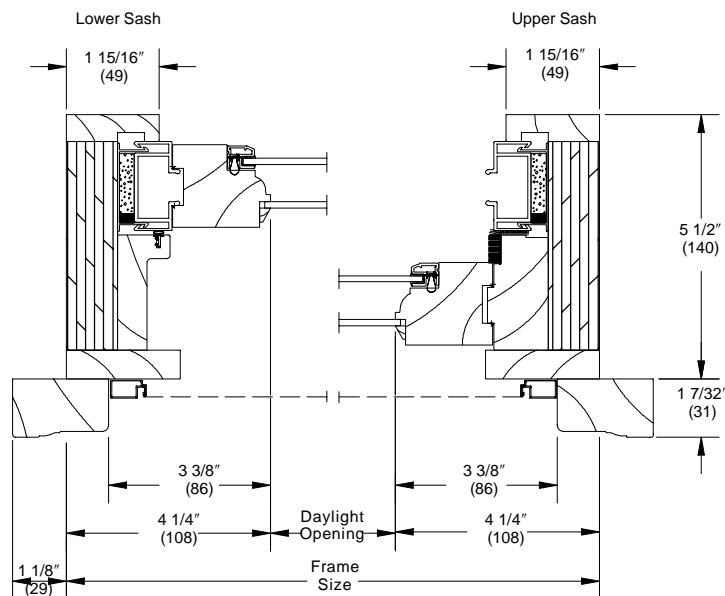
## SECTION DETAILS: RT2 MAGNUM HISTORICAL SINGLE HUNG OPERATOR

SCALE: 3" = 1' 0"

### Magnum Historical Single Hung - RT2



Head Jamb and Sill



Jams - RT2

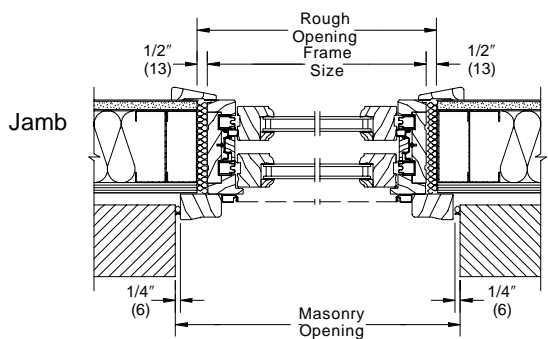
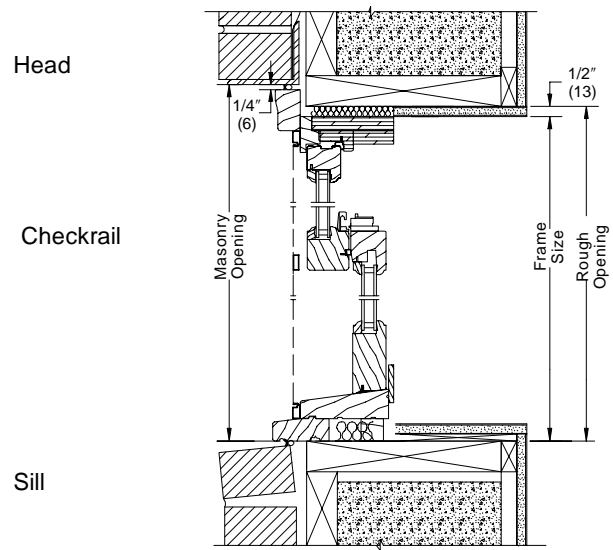
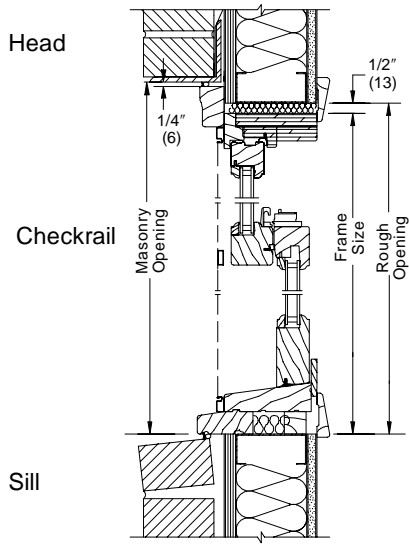
**NOTE:**

Refer to the Double Hung variations page for variation examples.

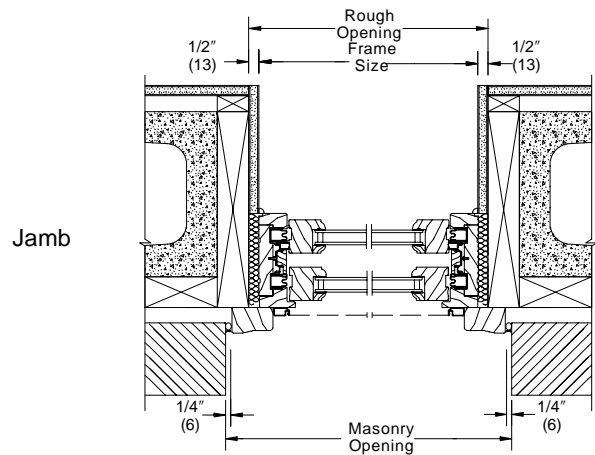
# WOOD ROUND TOP ULTIMATE DOUBLE HUNG

## SECTION DETAILS: CONSTRUCTION

NOT TO SCALE



Brick Veneer with Steel Stud Construction



Brick Veneer with Concrete Block Construction

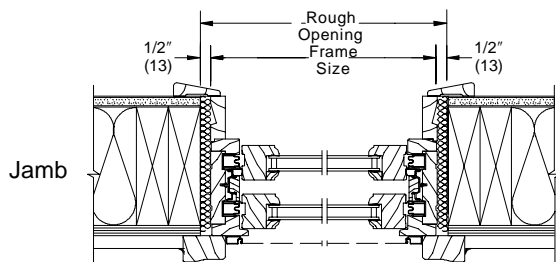
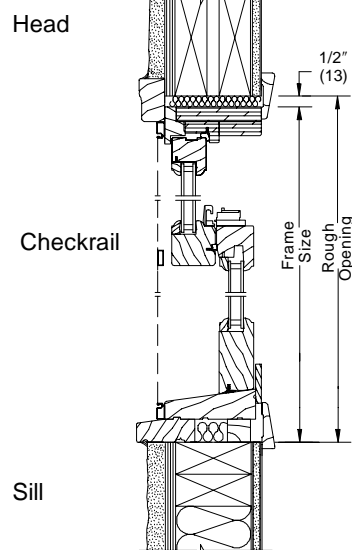
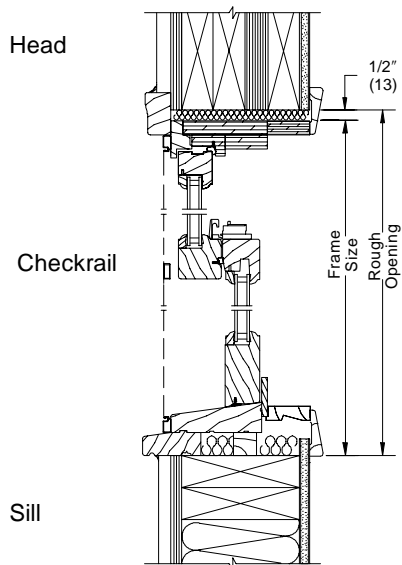
**NOTE:**

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.

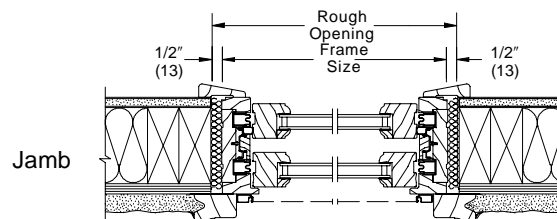
# WOOD ROUND TOP ULTIMATE DOUBLE HUNG

## SECTION DETAILS: CONSTRUCTION

NOT TO SCALE



Wood Siding with 2x6  
Frame Construction



Stucco with 2x4  
Frame Construction

**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.

# WOOD ROUND TOP ULTIMATE DH MAGNUM

## UNIT FEATURES

### **Frame:**

- Pine wood interior and exterior standard. Optional mahogany, vertical grain Douglas fir
- Frame thickness: 1 3/4" (44)
- Frame width: 4 9/16" (116)

### **Sash:**

- Pine wood interior and exterior standard. Optional mahogany, vertical grain Douglas fir
- Sash thickness: 1 5/8" (41)
- Operating Sash are removable for cleaning, service and finishing

### **Interior and Exterior finish:**

- Treated bare wood or white primed (pine only)

### **Hardware:**

- Sash lock and keeper: Surface mounted, open style crescent cam lock. Two locks on glass sizes of 36" (914) and wider. Color: Satin Taupe, Optional: White, Bronze, Brass, Antique Brass, Oil Rubbed Bronze, Satin Chrome, Satin Nickel
- Sash lift is optional: Color: Satin Taupe, Optional: White, Bronze, Brass, Antique Brass, Oil Rubbed Bronze, Satin Chrome, Satin Nickel
- Balance system: Spiral balance system

### **Weatherstripping:**

- Operating units: Foam filled bulb weatherstrip at head jamb, bulb weatherstrip at the check rail and bottom rail and foam filled bulb weatherstrip at the jambs Color: Beige

### **Jamb Extensions:**

- Jamb extensions available for various wall thickness factory applied, finished matching interior

### **Insect Screens:**

- Aluminum Screen: Full screen standard, half screen optional. Color: Stone white, Evergreen, Bronze, Bahama Brown or Pebble Gray, Select and Custom Colors
- Screen mesh: 18 by 16 charcoal fiberglass, optional screen mesh: charcoal aluminum wire, black aluminum wire, bright aluminum wire, bright bronze wire

### **Wood Combination Storm Sash and Screen:**

- Frame: Treated bare wood or white primed (pine only)
- Storm panel: Select quality glass in an extruded aluminum frame.
- Insect Screen: Screen mesh 18 by 16 charcoal fiberglass, optional screen mesh: charcoal aluminum wire, black aluminum wire, bright aluminum wire, bright bronze wire. Color: Stone White, Bahama Brown, Pebble Gray, Bronze and Evergreen
- Weatherstrip: Pile weatherstrip between operating panels and at the stiles of main frame
- Hardware: Spring loaded latches to secure storm panel

### **Wood Storm Sash:**

- Frame: Treated bare wood or white primed (pine only)
- Glazing: Select quality glass

### **Removable Interior Grilles:**

- Bar: Pine wood 3/4" (19) or 1 1/8" (29)
- Pattern: Rectangular, custom lite layouts available. Contact your Marvin representative.

### **Interior / Exterior Simulated Divided Lites (SDL):**

- Bar (interior and exterior): 7/8" (22) or 1 1/8" (29) wide. Pine wood standard. Optional: mahogany, vertical grain Douglas fir. Finish to match interior panel surface
- Insulating glass units available with or without aluminum spacer in airspace
- Pattern: rectangular. Custom lite layouts available. Contact your Marvin representative

### **Grilles-between-the-Glass (GBG):**

- 11/16" (17) white contoured aluminum bar. Optional flat aluminum bar.
- Rectangular lite layout

### **Glass and Glazing:**

- Glazing method: Insulating glass, single glaze, single glaze with energy panel
- Glazing seal: silicone glazed
- Glazing type: Clear, Low E II with argon, laminated, solar tints, tempered, obscure, bronze tint, gray tint, and reflective bronze
- Glazing will be altitude adjusted for higher elevations, argon gas not included

### **Accessories:**

- Masonry brackets: 6" (152), 10" (254)
- Marvin SillGuard™
- Exterior wood casings: brick mould casing, stucco casing or flat casing

### **Note:**

Values shown in parenthesis represent metric equivalents

For product specifications please refer to the CSI Product Specifications, contact your Marvin representative

# WOOD ROUND TOP ULTIMATE DH MAGNUM

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## NFRC VALUES

NFRC Unit Values					
Glazing Type	U-Factor	R-Value	Solar Heat Gain Coefficient	Visible Light Transmittance	Energy Star
<b>Double Hung / Single Hung Round Tops</b>					
<b>Size Tested</b>	<b>47 x 59</b>	<b>47 x 59</b>	<b>47 x 59</b>	<b>47 x 59</b>	
Single Glaze	0.84	1.19	0.61	0.63	-
Single Glaze with ADL	0.82	1.22	0.55	0.56	-
Single Glaze with EP	0.45	2.22	0.61	0.63	-
Single Glaze with EP and ADL	0.45	2.22	0.49	0.51	-
Single Glaze with Low E EP	0.35	2.86	0.46	0.53	NC
Single Glaze with Low E EP and ADL	0.36	2.78	0.41	0.47	NC
Insulating glass	0.46	2.18	0.55	0.58	-
Insulating glass - SDL	0.45	2.22	0.49	0.51	-
Insulating glass - SDL with spacer bars	0.45	2.22	0.49	0.51	-
Insulating Low E II glass	0.33	3.03	0.30	0.51	N, NC, SC, S
Insulating Low E II glass - SDL	0.33	3.03	0.27	0.45	N, NC, SC, S
Insulating Low E II glass - SDL with spacer bars	0.34	2.94	0.27	0.45	N, NC, SC, S
Insulating Low E II glass - Argon	0.30	3.33	0.29	0.51	N, NC, SC, S
Insulating Low E II glass - Argon, SDL	0.30	3.33	0.26	0.45	N, NC, SC, S
Insulating Low E II glass - Argon, SDL with spacer bars	0.31	3.23	0.26	0.45	N, NC, SC, S
<b>Picture - 1 5/8" Sash 3/4" IG Round Tops</b>					
<b>Size Tested</b>	<b>47 x 59</b>	<b>47 x 59</b>	<b>47 x 59</b>	<b>47 x 59</b>	
Single Glaze	0.85	1.18	0.64	0.67	-
Single Glaze with ADL	0.84	1.19	0.57	0.59	-
Single Glaze with EP	0.45	2.22	0.58	0.61	-
Single Glaze with EP and ADL	0.45	2.22	0.52	0.54	-
Single Glaze with Low E EP	0.45	2.22	0.58	0.61	-
Single Glaze with Low E EP and ADL	0.45	2.22	0.52	0.54	-
Insulating glass	0.45	2.22	0.57	0.61	-
Insulating glass - SDL	0.45	2.22	0.51	0.54	-
Insulating glass - SDL with spacer bars	0.45	2.22	0.51	0.54	-
Insulating Low E II glass	0.32	3.13	0.31	0.53	N, NC, SC, S
Insulating Low E II glass - SDL	0.32	3.13	0.28	0.45	N, NC, SC, S
Insulating Low E II glass - SDL with spacer bars	0.33	3.03	0.28	0.47	N, NC, SC, S
Insulating Low E II glass - Argon	0.28	3.57	0.31	0.53	N, NC, SC, S
Insulating Low E II glass - Argon, SDL	0.28	3.57	0.25	0.42	N, NC, SC, S
Insulating Low E II glass - Argon, SDL with spacer bars	0.29	3.45	0.28	0.47	N, NC, SC, S
<b>Picture - 2" Sash 1" IG Round Tops</b>					
<b>Size Tested</b>	<b>47 x 59</b>	<b>47 x 59</b>	<b>47 x 59</b>	<b>47 x 59</b>	
Insulating glass	0.45	2.22	0.55	0.60	-
Insulating glass - SDL	0.44	2.27	0.49	0.53	-
Insulating glass - SDL with spacer bars	0.44	2.27	0.49	0.53	-
Insulating Low E II glass	0.31	3.23	0.30	0.52	N, NC, SC, S
Insulating Low E II glass - SDL	0.31	3.27	0.27	0.46	N, NC, SC, S
Insulating Low E II glass - SDL with spacer bars	0.32	3.13	0.27	0.46	N, NC, SC, S
Insulating Low E II glass - Argon	0.28	3.57	0.30	0.52	N, NC, SC, S
Insulating Low E II glass - Argon, SDL	0.28	3.57	0.24	0.41	N, NC, SC, S
Insulating Low E II glass - Argon, SDL with spacer bars	0.29	3.45	0.27	0.46	N, NC, SC, S
<b>Transom 3/4" IG Round Tops</b>					
<b>Size Tested</b>	<b>47 x 59</b>	<b>47 x 59</b>	<b>47 x 59</b>	<b>47 x 59</b>	
Single Glaze	0.85	1.18	0.66	0.68	-
Single Glaze with ADL	0.84	1.19	0.59	0.61	-
Single Glaze with EP	0.44	2.27	0.60	0.62	-
Single Glaze with EP and ADL	0.45	2.22	0.53	0.56	-
Single Glaze with Low E EP	0.44	2.27	0.59	0.62	-
Single Glaze with Low E EP and ADL	0.45	2.22	0.53	0.55	-
Insulating glass	0.45	2.22	0.59	0.62	-
Insulating glass - SDL	0.45	2.22	0.53	0.55	-
Insulating glass - SDL with spacer bars	0.45	2.22	0.53	0.55	-
Insulating Low E II glass	0.31	3.23	0.32	0.54	N, NC, SC, S
Insulating Low E II glass - SDL	0.31	3.23	0.28	0.48	N, NC, SC, S
Insulating Low E II glass - SDL with spacer bars	0.32	3.13	0.28	0.48	N, NC, SC, S
Insulating Low E II glass - Argon	0.28	3.57	0.31	0.54	N, NC, SC, S
Insulating Low E II glass - Argon, SDL	0.28	3.57	0.28	0.48	N, NC, SC, S
Insulating Low E II glass - Argon, SDL with spacer bars	0.28	3.57	0.28	0.48	N, NC, SC, S

**NOTE:**

Product Values are determined using the National Fenestration Rating Council (NFRC) Procedures for determining fenestration product values.

**U-Factor:** (Btu/hr-sq ft-F) Lower the U-Factor, the greater the resistance to heat flow and better its insulating value.

**R-Value:** (1/U-Value) Higher the R-Value, the greater the resistance to heat flow and better its insulating value.

**Visible Light Transmittance (VLT):** Percentage of visible light transmitted through the unit.

**Solar Heat Gain Coefficient (SHGC):** The lower a window's SHGC, the less solar heat it transmits, and the greater its shading ability.

Capillary tubes are required for IG units at high elevations. Argon will not be furnished in units with capillary tubes.

Contact the Architectural Department Hotline at (800-346-3363) for additional NFRC Unit Values.

# WOOD ROUND TOP ULTIMATE DH MAGNUM

## MEASUREMENT CONVERSIONS

<b>WRTUDHM Measurement Conversion Factors</b>		
<b>**Operable Units</b>		
<b>To Convert from</b>	<b>Width</b>	<b>Height</b>
Masonry Opening to Rough Opening	- 2 1/8" (54)	- 1 1/16" (27)
OM of BMC to Rough Opening	- 1 5/8" (41)	- 13/16" (21)
OM of BMC to Masonry Opening	- 1/2" (13)	+ 1/4" (6)
OM of Frame to Rough Opening	+ 1" (25)	+ 1/2" (13)
<b>Operable Sash - Pair</b>		
<b>To Convert from</b>	<b>Width</b>	<b>Height</b>
Glass* to OM of Top Sash	+ 2 15/32" (63)	+ 2 13/16" (71)
Glass* to OM of Bottom Sash	+ 2 15/32" (63)	+ 4 5/8" (117)
Glass* to Daylight Opening	- 1 1/16" (27)	- 1 1/16" (27)
<b>Aluminum Frame Screen</b>		
<b>To Convert from</b>	<b>Width</b>	<b>Height</b>
Rough Opening to OM	- 2 15/32" (63)	- 2 11/32" (60)
Glass* to OM	+ 3 29/32" (99)	(glass height x 2) + 7 5/32" (182)
<b>Energy Panel</b>		
<b>To Convert from</b>	<b>Width</b>	<b>Height</b>
Glass* to OM	+ 1/16" (2)	+ 1/16" (2)
<b>Grilles</b>		
<b>To Convert from</b>	<b>Width</b>	<b>Height</b>
Glass* to Daylight Opening	- 1 1/16" (27)	- 1 1/16" (27)
<b>Combination</b>		
<b>To Convert from</b>	<b>Width</b>	<b>Height</b>
Rough Opening to OM	- 2 1/2" (64)	- 2 3/16" (56)
Glass* to OM	+ 3 7/8" (98)	(glass height x 2) + 7 5/16" (186)
* Glass size measurement conversion factors are valid for on-lite units only.		
** For equally divided glass height.		

<b>WRTUDHM Transom Unit Measurement Conversion Factors</b>		
<b>Unit</b>	<b>Width</b>	<b>Height</b>
<b>Frame Measurements</b>		
Masonry Opening to Rough Opening (without BMC)	+ 1/2" (13)	+ 1/4" (6)
Masonry Opening to Rough Opening (with BMC)	- 2 1/8" (54)	- 1 11/16" (43)
OM of Frame to Rough Opening	+ 1" (25)	+ 1/2" (13)
<b>Sash/Panel</b>		
Glass Size to Frame OM	+ 5 3/8" (137)	+ 5 3/8" (137)
Glass Size to Rough Opening	+ 6 3/8" (162)	+ 5 7/8" (149)
Glass Size to Daylight Opening	- 1 1/16" (27)	- 1 1/16" (27)

<b>WRTUDHM Picture Unit Measurement Conversion Factors</b>		
<b>Unit</b>	<b>Width</b>	<b>Height</b>
<b>Frame Measurements</b>		
Masonry Opening to Rough Opening (without BMC)	+ 1/2" (13)	+ 1/4" (6)
Masonry Opening to Rough Opening (with BMC)	- 2 1/8" (54)	- 1 11/16" (43)
OM of Frame to Rough Opening	+ 1" (25)	+ 1/2" (13)
<b>Sash/Panel</b>		
Glass Size to Frame OM	+ 5 1/4" (133)	+ 7 9/16" (192)
Glass Size to Rough Opening	+ 6 1/4" (159)	+ 7 15/16" (202)
Glass Size to Daylight Opening	- 1 1/16" (27)	- 1 1/16" (29)

# WOOD ROUND TOP ULTIMATE DH MAGNUM

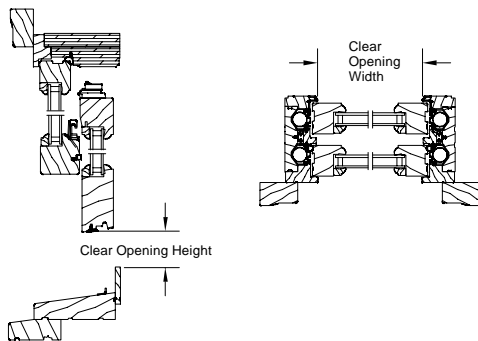
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## MINIMUM AND MAXIMUM MEASUREMENTS / DESIGN PRESSURE / EGRESS INFORMATION

Minimum and Maximum Measurements					
Glazing Type	Minimum RO Width	Minimum Springline RO Height	Maximum RO Width	Maximum RO Height	Maximum Glass Squared Off
<b>Double Hung / Single Hung Round Top</b>					
Insulating Glass	*26 3/8" (670)	*49 1/2" (1257)	66 3/8" (1686)	129 1/2" (3289)	25
Single Glaze	*26 3/8" (670)	*49 1/2" (1257)	66 3/8" (1686)	129 1/2" (3289)	25
<b>Round Top Transom</b>					
Insulating Glass	14 3/8" (365)	13 7/8" (352)	106" (2692)	60" (1524)	25
Single Glaze	14 3/8" (365)	13 7/8" (352)	106" (2692)	60" (1524)	38
<b>Round Top Picture</b>					
1" Insulating Glass	14 3/8" (365)	16 1/16" (408)	121" (3073)	129 1/2" (3289)	60
Insulating Glass	14 3/8" (365)	16 1/16" (408)	105" (2667)	105" (2667)	25
Single Glaze	14 3/8" (365)	16 1/16" (408)	105" (2667)	105" (2667)	50

\* Minimum RO width of 16 3/8" is available with a minimum RO springline height of 65 1/2".  
Minimum sash weight 10 lbs. Maximum sash weight 130 lbs.

Design Pressures		
Double Hung	Transom	Picture
DP H-C50 - up to RO 54 3/8" (1381) x 111 13/16" (2840) Maximum glass height bottom 48" Maximum glass height top 54"	DP -TR-LC50 - up to RO 74 3/8" (1889) x 22 3/16" (564)	DP F-C50 - up to RO 62 3/8" (1584) x 105 1/2" (2680)
DP H-C35 - up to RO 69 3/8" (1762) x 120 13/16" (3069) Maximum glass size height 56"	—	—



### International Building Code - 2000

Section 1009 Emergency Escape and Rescue

**1009.2 Minimum size:** Emergency escape and rescue openings shall have a minimum net clear opening of 5.7 square feet (0.53 m<sup>2</sup>). Exception: The minimum net clear opening for emergency escape and rescue openings on the ground level at grade is 5.0 square feet (0.46 m<sup>2</sup>).

**1009.2.1 Minimum dimensions:** The minimum net clear opening height dimension shall be 24 inches (610 mm). The net clear opening width dimension shall be 20 inches (508 mm). The net clear opening dimensions shall be the result of normal operation of the opening.

**1009.3 Maximum height from the floor:** Emergency escape and rescue opening shall have the bottom of the clear opening not greater than 44 inches (1118 mm) measured from the floor.

**1009.4 Operational constraints:** Emergency escape and rescue openings shall be operational from the inside of the room without the use of keys or tools. Bars, grilles, grates, or similar devices are permitted to be placed over emergency escape and rescue openings provided the minimum net clear opening size complies with Section 1009.2 and such devices shall be releasable or removable from the inside without the use of a key, tool, or force greater than that which is required for normal operation of the escape and rescue opening.

Code restrictions may vary depending on your local building codes.

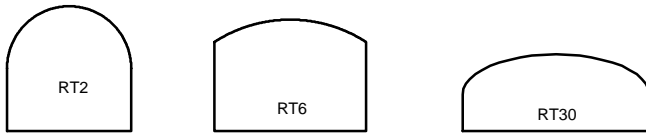
Egress Conversions		
Glass Size Width + 1 7/8" (48) = Egress Width Rough Opening Width - 4 1/2" (114) = Egress Width		
Glass Size Height	Rough Opening Springline Height	Egress Height
20" (508) to less than 28" (711)	49 1/2" (1257) to less than 65 1/2" (1664)	16 1/2" (419)
28" (711) to less than 38" (965)	65 1/2" (1664) to less than 85 1/2" (2172)	24 1/2" (622)
38" (965) to less than 49" (1245)	85 1/2" (2172) to less than 107 1/2" (2731)	34 1/2" (876)
49" (1245) to less than 60" (1524)	107 1/2" (2731) to less than 129 1/2" (3289)	45 1/2" (1156)

**NOTE:** Standard limited travel shown. Optional full travel available. Contact your Marvin representative.

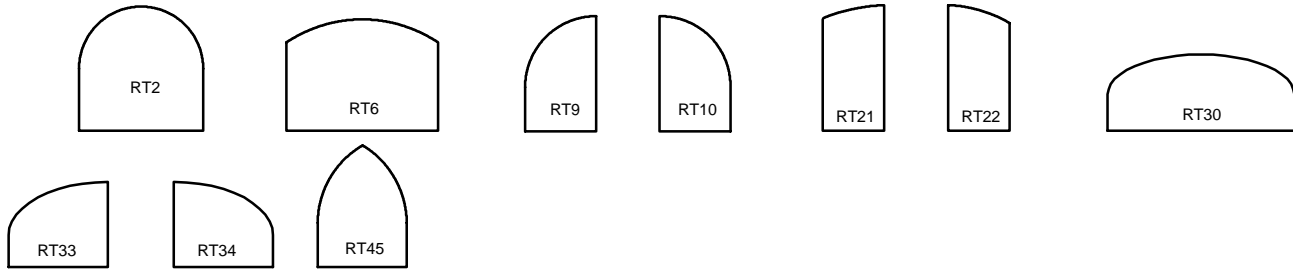
# WOOD ROUND TOP ULTIMATE DH MAGNUM

AVAILABLE SHAPES Subject to Approval

## Double Hung



## Single Hung



## Transom and Picture

RT1	RT2	RT5*	RT6	RT7*	RT8*	RT9
RT10	RT15*	RT16*	RT17*	RT18*	RT19*	RT20*
RT21	RT22	RT23	RT24	RT25	RT26	RT29*
RT30	RT31*	RT32*	RT33	RT34	RT36*	RT37
RT38*	RT39*	RT40	RT41	RT42*	RT43*	RT44*
RT45	RT46	RT47*	RT48	RT49*	RT50	RT51
RT52	RT53	RT54*	RT55*	RT56*	RT57*	RT58*
RT59	RT60	RT61				

\* Shapes are available in both transoms and pictures units, but have non-removable sash.

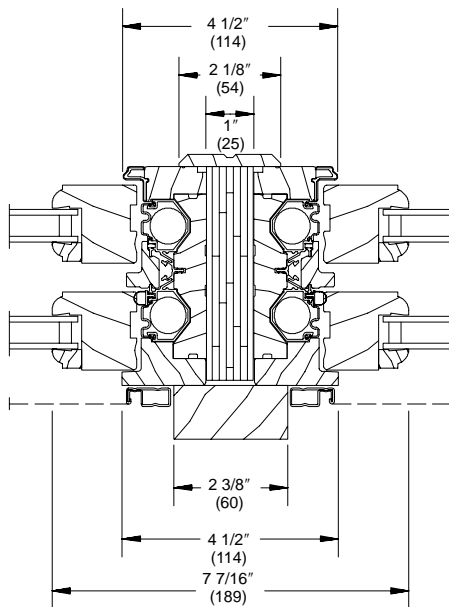
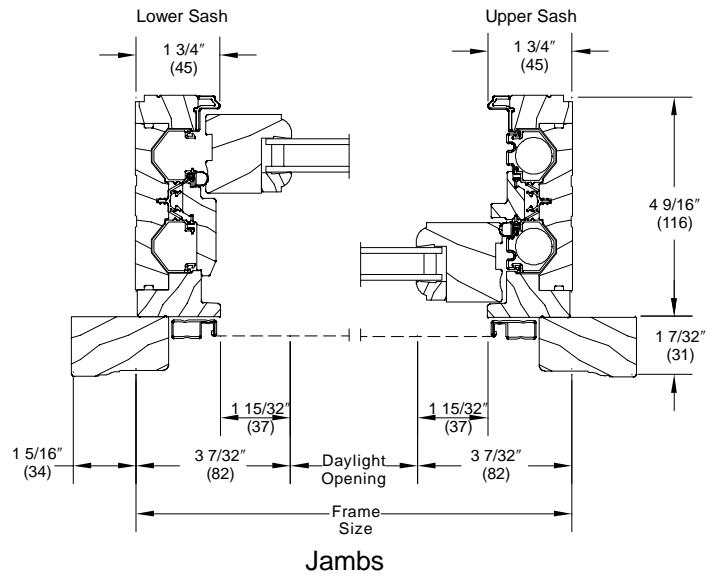
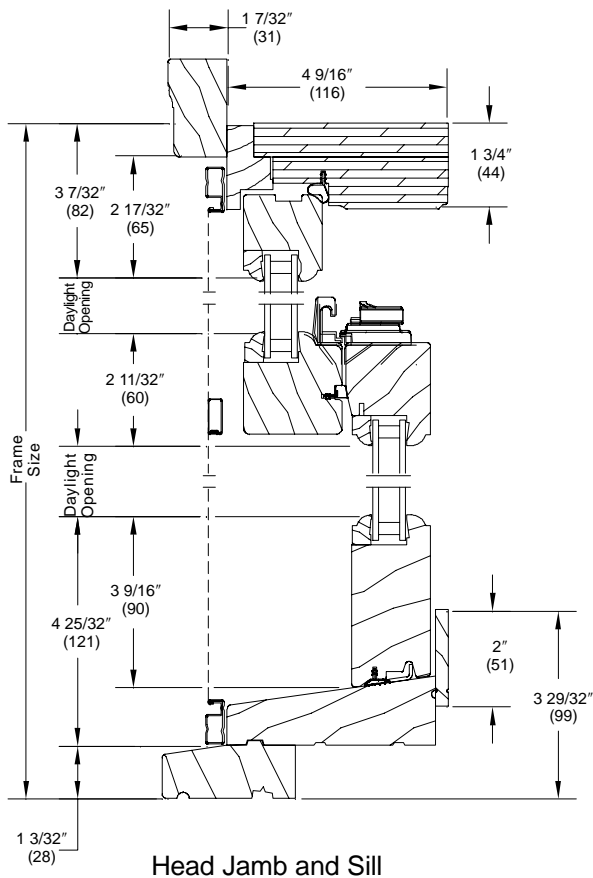


# WOOD ROUND TOP ULTIMATE DH MAGNUM

## SECTION DETAILS: SINGLE HUNG

SCALE: 3" = 1' 0"

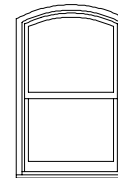
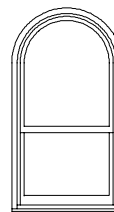
### Ultimate Single Hung Magnum Round Top



**Vertical Detail Solid Space Mull**

**RT2 Shape**

**RT6 Shape**



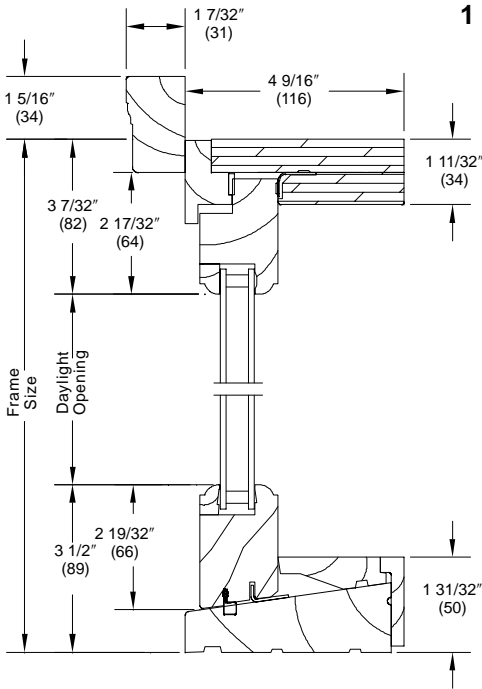
**Wood Round Top Ultimate Single Hung Magnum**

# WOOD ROUND TOP ULTIMATE DH MAGNUMS

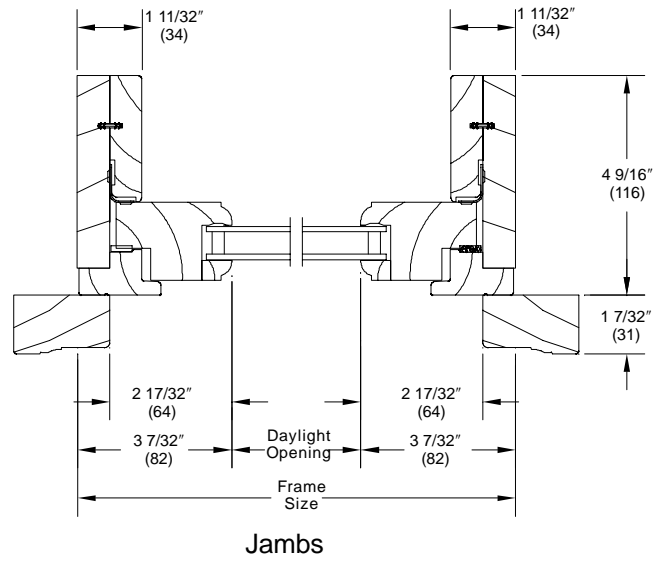
## SECTION DETAILS: 1 5/8" AND 2" TRANSOM

SCALE: 3" = 1' 0"

### Ultimate Double Hung Magnum Round Top 1 5/8" In-Sash Transom

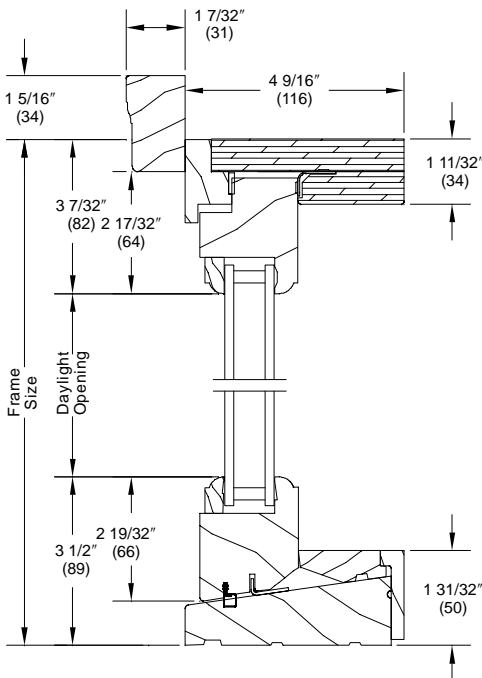


Head Jamb and Sill

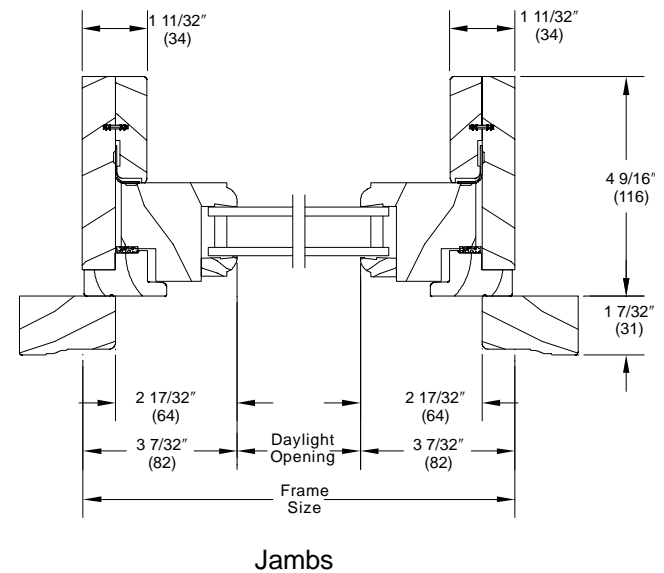


Jambs

### 2" In-Sash Transom



Head Jamb and Sill



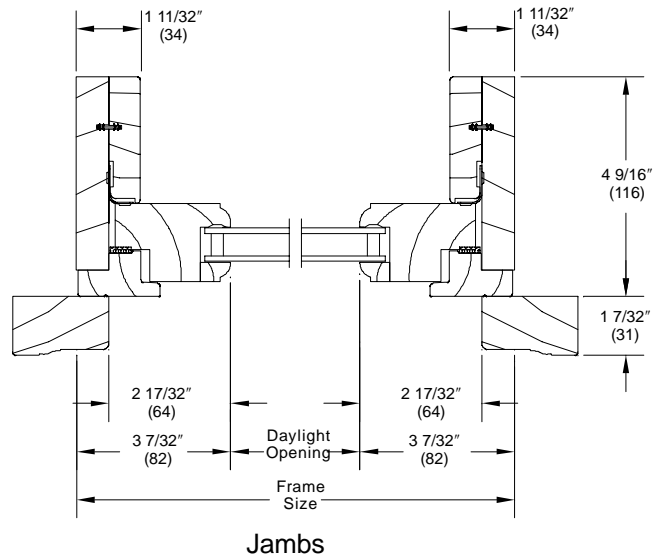
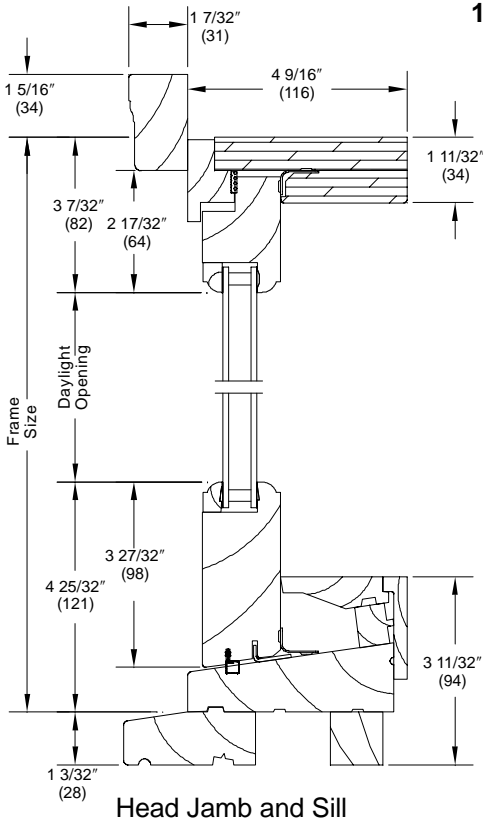
Jambs

# WOOD ROUND TOP ULTIMATE DH MAGNUM

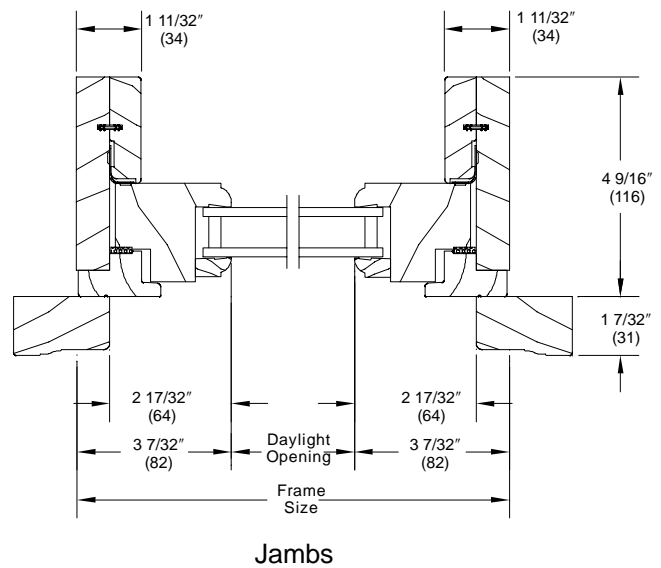
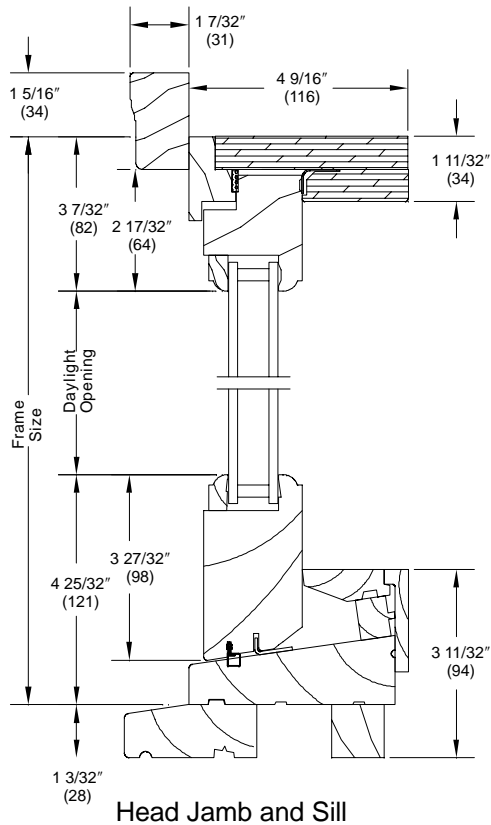
## SECTION DETAILS: 1 5/8" AND 2" PICTURE

SCALE: 3" = 1' 0"

### Ultimate Double Hung Magnum Round Top 1 5/8" In-Sash Picture



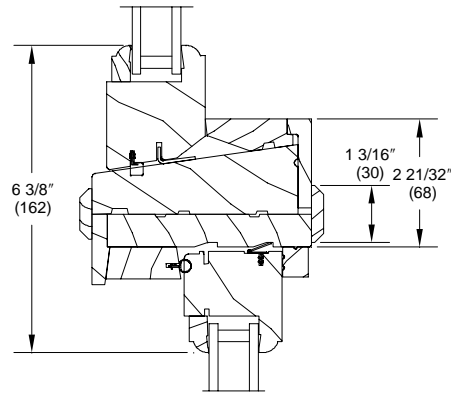
### 2" In-Sash Picture



# WOOD ROUND TOP ULTIMATE DH MAGNUM

## SECTION DETAILS: DIVIDED LITE OPTIONS

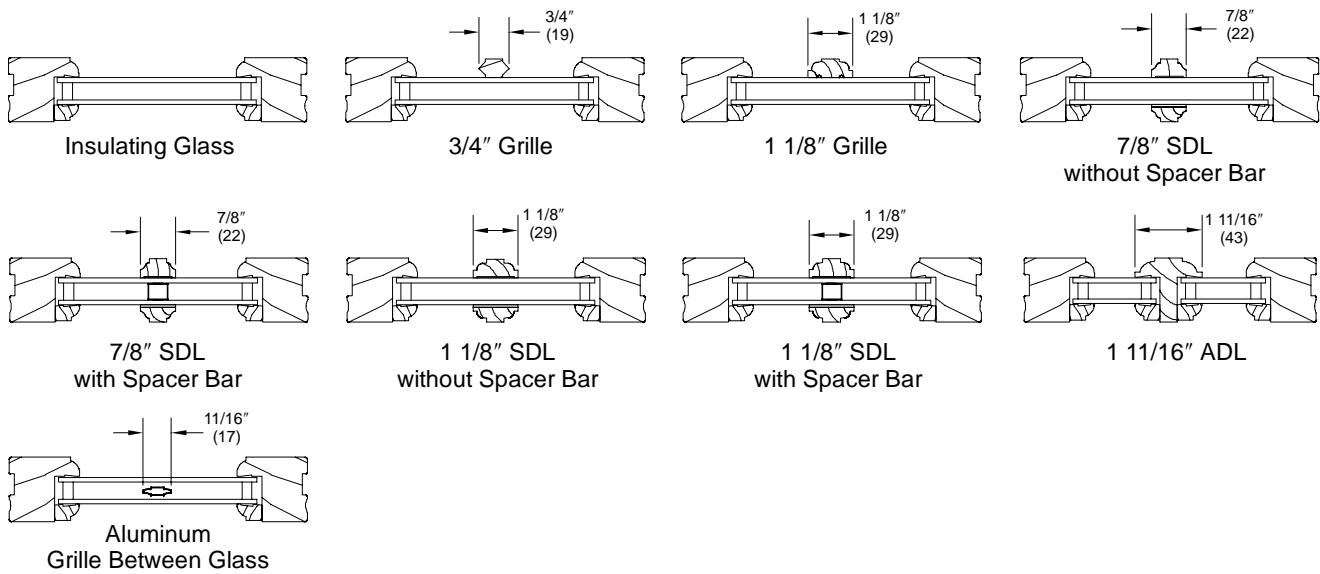
SCALE: 3" = 1' 0"



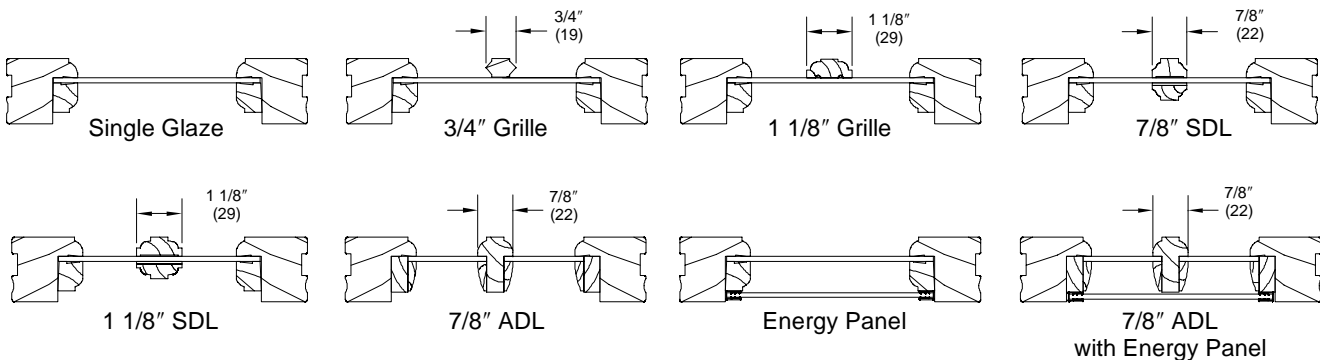
Wood Round Top Ultimate Double Hung  
Magnum In-Sash  
over Wood Ultimate Double Hung Magnum Picture

### Divided Lites

#### Ultimate DH Magnum Round Top 1 5/8\" Insulating Glass



#### Ultimate DH Magnum Round Top 1 5/8\" Single Glaze



**NOTE:**

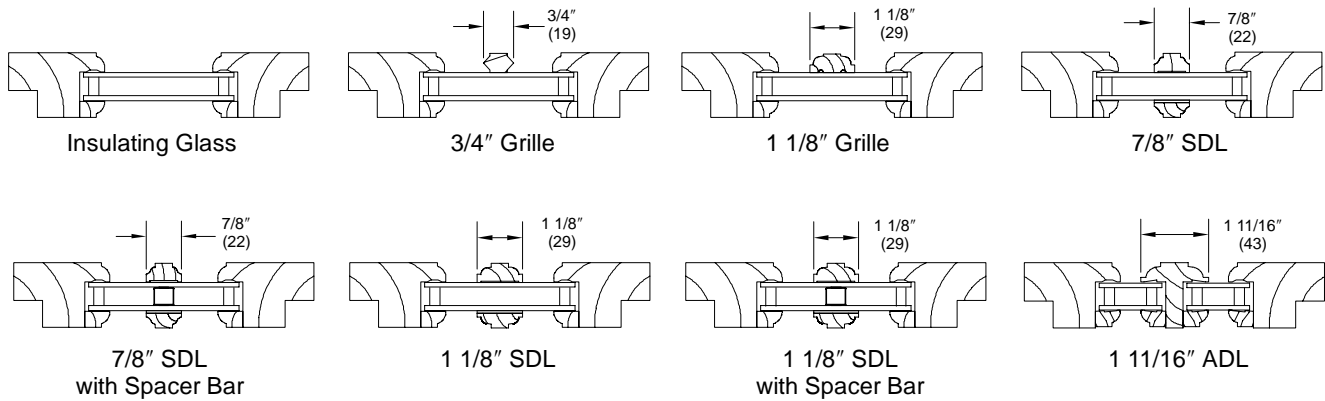
Grille = Removable interior divider  
SDL = Simulated divided lite  
ADL = Authentic divided lite

# WOOD ROUND TOP ULTIMATE DH MAGNUM

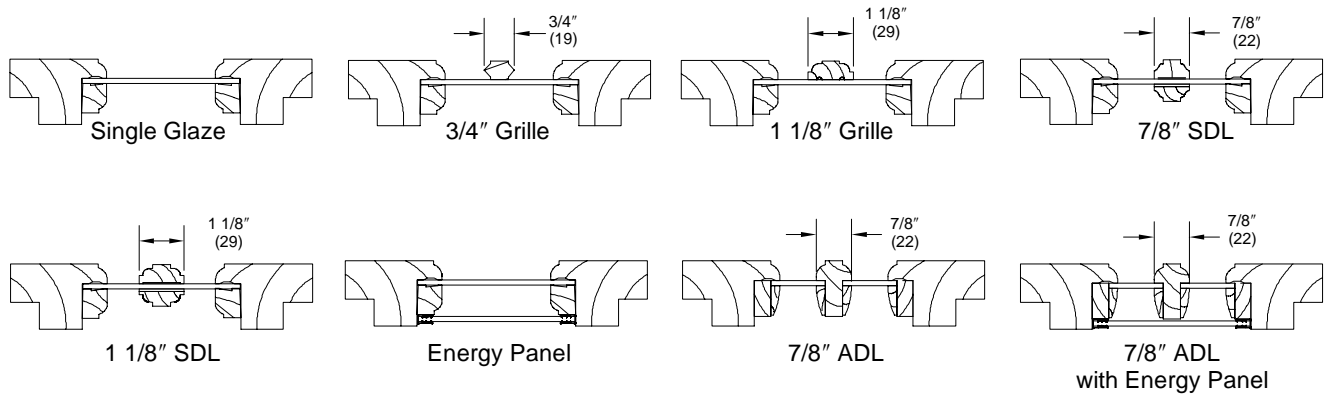
## SECTION DETAILS: DIVIDED LITE OPTIONS

SCALE: 3" = 1' 0"

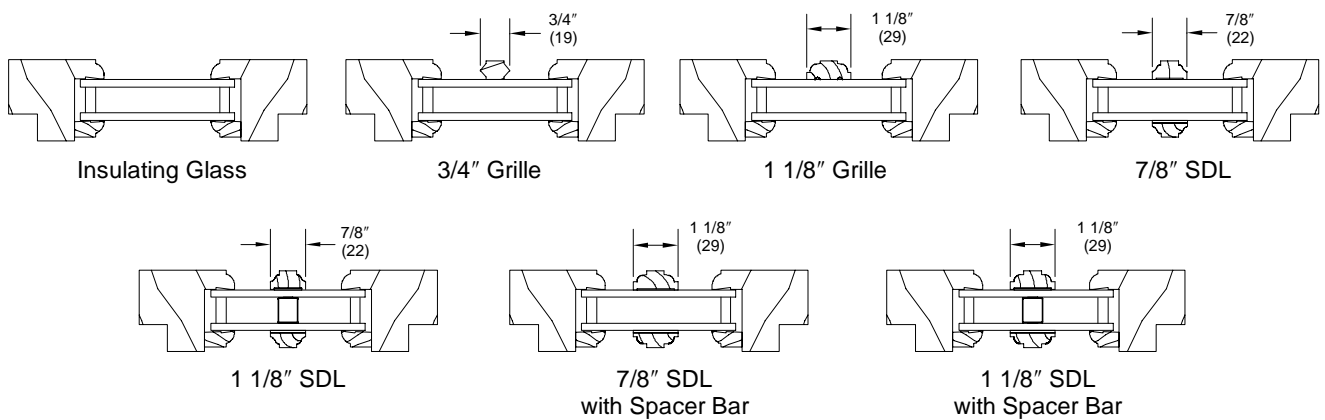
### Ultimate Double Hung Magnum Transom 1 5/8" Sash Round Top



### Ultimate Double Hung Magnum Transom - 1 5/8" Sash Round Top Single Glaze



### Ultimate Double Hung Magnum Transom 2" Sash Round Top Insulating Glass



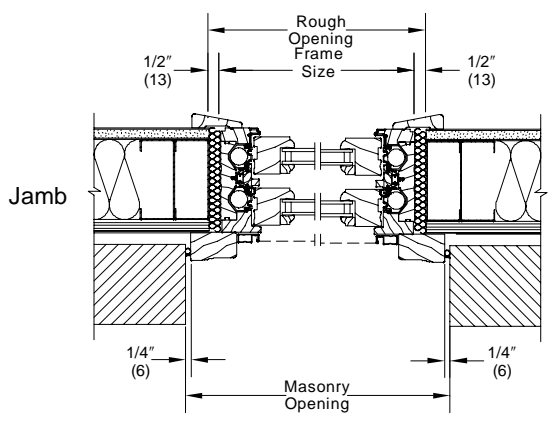
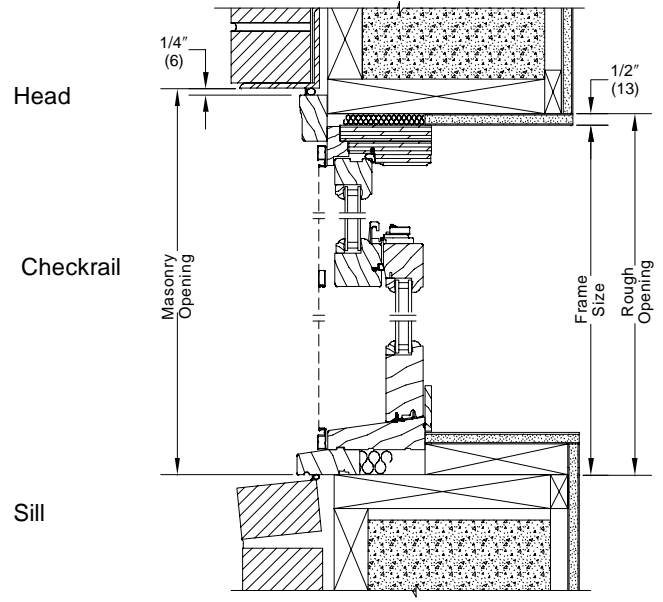
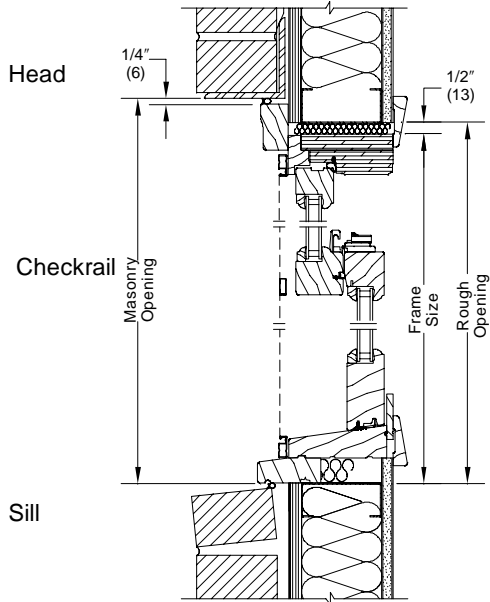
**NOTE:**

Grille = Removable interior divider  
 SDL = Simulated divided lite  
 ADL = Authentic divided lite

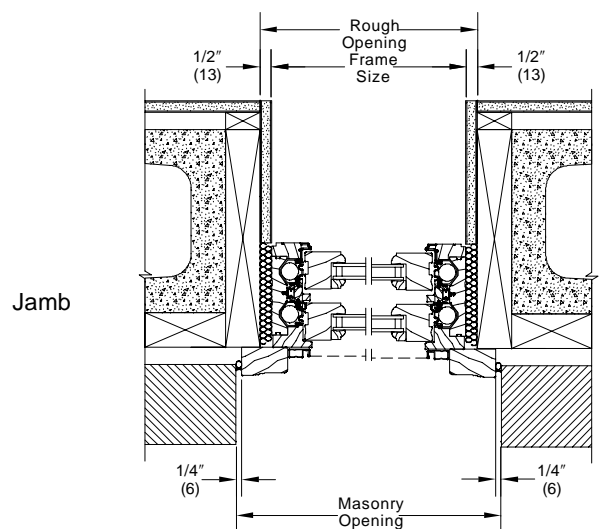
# WOOD ROUND TOP ULTIMATE DH MAGNUM

## SECTION DETAILS: CONSTRUCTION

NOT TO SCALE



Brick Veneer with Steel Stud Construction



Brick Veneer with Concrete Block Construction

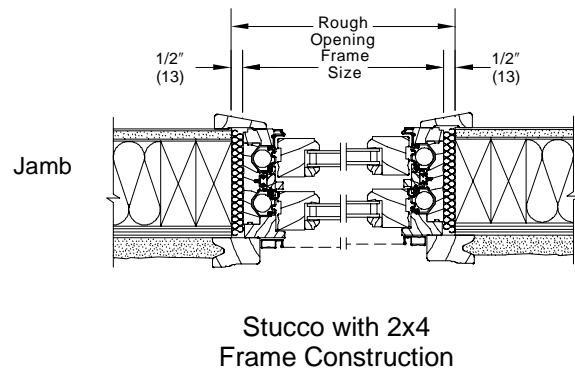
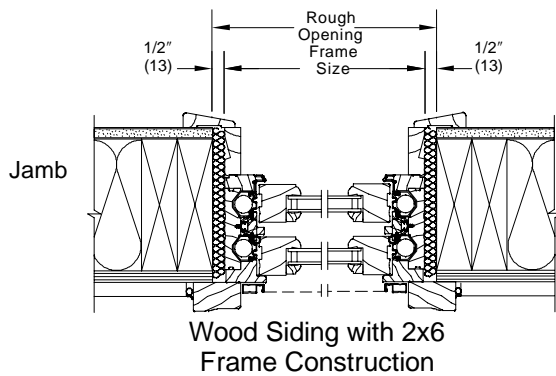
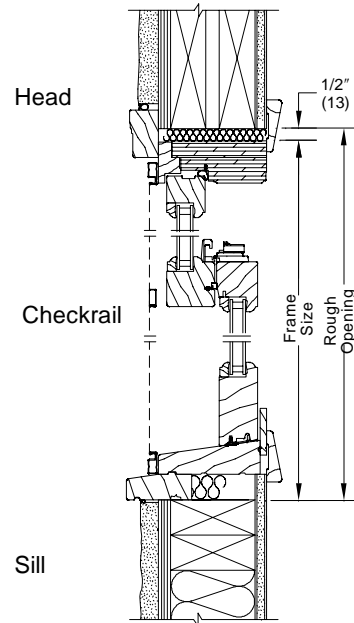
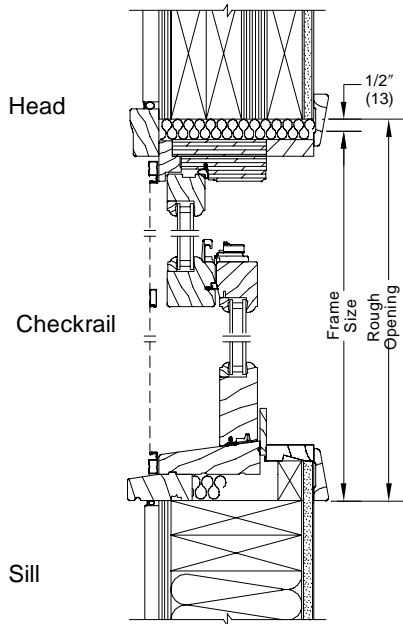
**NOTE:**

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.

# WOOD ROUND TOP ULTIMATE DH MAGNUM

## SECTION DETAILS: CONSTRUCTION

NOT TO SCALE



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