

REVISIONS			
REV	DESCRIPTION	DATE	APPROVED
C	REVISED DETAILS AND COMPONENTS	04/14/26	R.L.

NOTES:

1. THE PRODUCT SHOWN HEREIN IS DESIGNED AND MANUFACTURED TO COMPLY WITH REQUIREMENTS OF THE FLORIDA BUILDING CODE INCLUDING THE HVHZ.
2. WOOD FRAMING, METAL STRUCTURE AND MASONRY OPENING TO BE DESIGNED AND ANCHORED TO PROPERLY TRANSFER ALL LOADS TO STRUCTURE. FRAMING AND MASONRY OPENING IS THE RESPONSIBILITY OF THE ARCHITECT OR ENGINEER OF RECORD.
3. WHERE SHIM OR BUCK THICKNESS IS LESS THAN 1-1/2" WINDOW UNITS MUST BE ANCHORED THROUGH THE FRAME IN ACCORDANCE WITH MANUFACTURER'S PUBLISHED INSTALLATION INSTRUCTIONS. ANCHORS SHALL BE SECURELY FASTENED DIRECTLY INTO MASONRY, CONCRETE OR OTHER STRUCTURAL SUBSTRATE MATERIAL.
4. WHERE WOOD BUCK THICKNESS IS 1-1/2" OR GREATER, BUCK SHALL BE SECURELY FASTENED TO MASONRY, CONCRETE OR OTHER STRUCTURAL SUBSTRATE. WINDOW UNITS MAY BE ANCHORED THROUGH FRAME TO SECURED WOOD BUCK IN ACCORDANCE WITH MANUFACTURER'S PUBLISHED INSTALLATION INSTRUCTIONS.
5. WHERE 1X BUCK IS NOT USED DISSIMILAR MATERIALS MUST BE SEPARATED WITH APPROVED COATING OR MEMBRANE. SELECTION OF COATING OR MEMBRANE IS THE RESPONSIBILITY OF THE ARCHITECT OR ENGINEER OF RECORD.
6. BUCKS SHALL EXTEND BEYOND WINDOW INTERIOR FACE SO THAT FULL FRAME SUPPORT IS PROVIDED.
7. SHIM AS REQUIRED AT EACH ANCHOR LOCATION WITH LOAD BEARING SHIM. SHIM WHERE SPACE OF 1/16" OR GREATER OCCURS. MAXIMUM ALLOWABLE SHIM STACK TO BE 3/8".
8. SHIMS SHALL BE LOCATED, APPLIED AND MADE FROM MATERIALS AND THICKNESS CAPABLE OF SUSTAINING APPLICABLE LOADS.
9. WIND LOAD DURATION FACTOR Cd=1.6 WAS USED FOR WOOD ANCHOR CALCULATIONS.
10. FRAME MATERIAL: EXTRUDED ALUMINUM 6063-T5 AND 6063-T6.
11. UNITS MUST BE GLAZED PER ASTM E1300, SEE SHEET 2 FOR GLASS DETAILS.
12. APPROVED IMPACT PROTECTIVE SYSTEM IS NOT REQUIRED FOR THIS PRODUCT IN WIND BORNE DEBRIS REGIONS.

13. FOR ANCHORING THROUGH FRAME INTO WOOD FRAMING OR 2X BUCK USE #14 WOOD SCREWS IN HEAD AND JAMBS AND #10 WOOD SCREWS IN SILL WITH SUFFICIENT LENGTH TO ACHIEVE A 1 1/4" MINIMUM EMBEDMENT INTO SUBSTRATE. LOCATE ANCHORS AS SHOWN IN ELEVATIONS AND INSTALLATION DETAILS.
14. FOR ANCHORING THROUGH FRAME INTO MASONRY/CONCRETE USE 3/16" AND 1/4" TAPCONS WITH SUFFICIENT LENGTH TO ACHIEVE A 1 1/4" MINIMUM EMBEDMENT INTO SUBSTRATE WITH 2" MINIMUM EDGE DISTANCE. LOCATE ANCHORS AS SHOWN IN ELEVATIONS AND INSTALLATION DETAILS.
15. FOR ANCHORING THROUGH FRAME INTO METAL STRUCTURE USE #14 SMS OR SELF DRILLING SCREWS IN HEAD AND JAMBS AND #10 SMS OR SELF DRILLING SCREWS IN SILL WITH SUFFICIENT LENGTH TO ACHIEVE 3 THREADS MINIMUM BEYOND STRUCTURE INTERIOR WALL. LOCATE ANCHORS AS SHOWN IN ELEVATIONS AND INSTALLATION DETAILS.
16. ALL FASTENERS TO BE CORROSION RESISTANT.
17. INSTALLATION ANCHORS SHALL BE INSTALLED IN ACCORDANCE WITH ANCHOR MANUFACTURER'S INSTALLATION INSTRUCTIONS AND ANCHORS SHALL NOT BE USED IN SUBSTRATES WITH STRENGTHS LESS THAN THE MINIMUM STRENGTH SPECIFIED BELOW:
 - 17.1. WOOD: MINIMUM SPECIFIC GRAVITY OF G=0.42
 - 17.2. CONCRETE: MINIMUM COMPRESSIVE STRENGTH OF 2,000 PSI.
 - 17.3. MASONRY: HOLLOW/FILLED BLOCK PER ASTM C90 WITH Fm=2,000PSI MINIMUM.
 - 17.4. METAL STRUCTURE: STEEL 18GA (.048") FY=33KSI/FU=52KSI OR ALUMINUM 6063-T5 FU=30KSI .125" THICK MINIMUM

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2	ELEVATION AND GLASS DETAILS
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SOLAR INNOVATIONS, INC.

31 ROBERTS ROAD
PINE GROVE, PA 17963

SERIES SI2000 THERMALLY-BROKEN AL FRENCH
DOOR ASSY W/STD & HIGH PRFM THR IMPACT
NOTES

DRAWN:
A.R.

DWG NO.
08-03153

REV
C

SCALE NTS

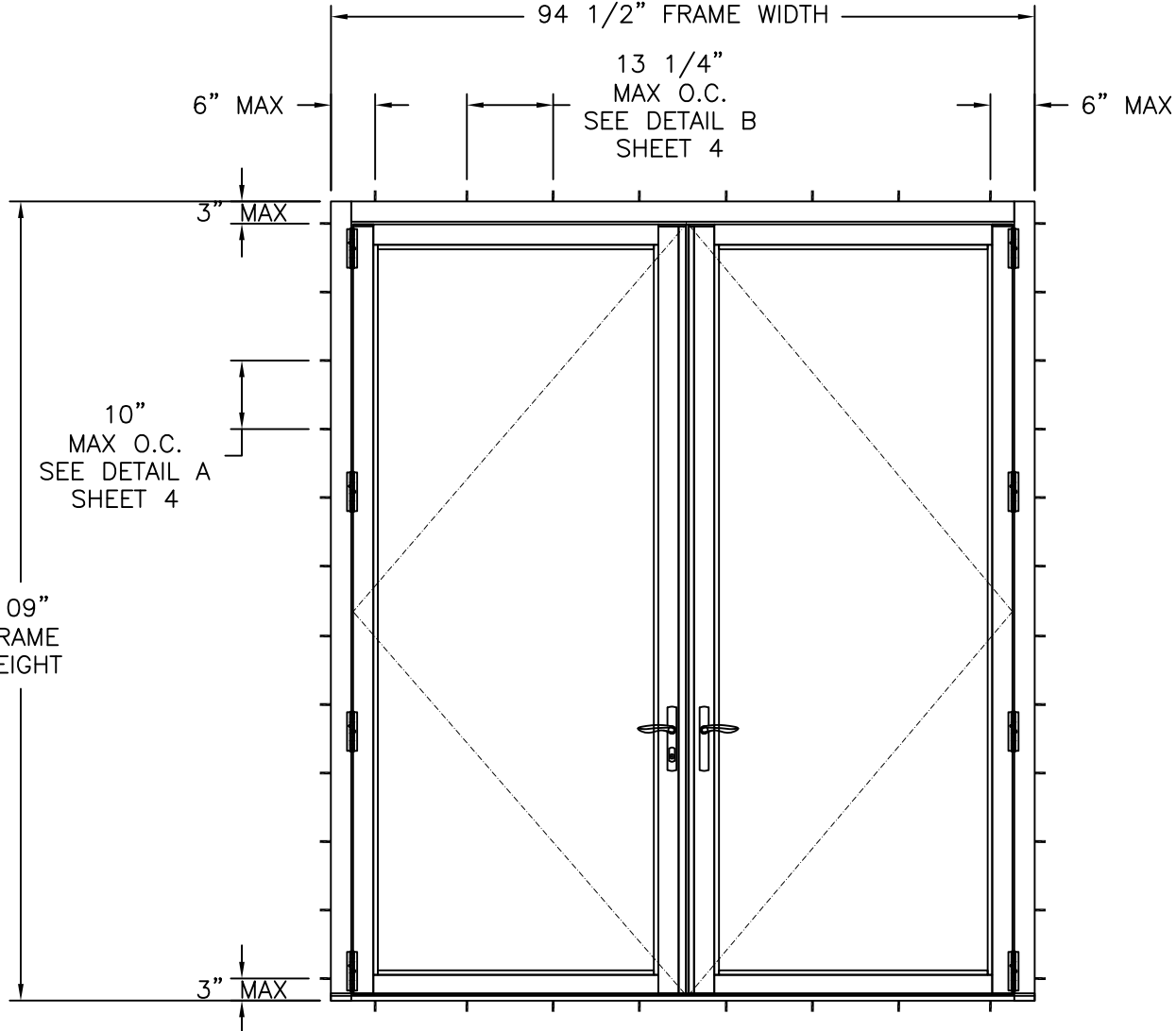
DATE 08/10/17

SHEET 1 OF 8

L. ROBERTO LOMAS P.E.
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434-688-0609 rllomas@lrlomaspe.com

SIGNED: 04/29/2026

Luis R. Lomas P.E.
FL No.: 62514



SERIES SI2000 THERMALLY BROKEN ALUMINUM FRENCH DOOR
EXTERIOR VIEW

DESIGN PRESSURE RATING	IMPACT RATING
±40.0PSF	LARGE AND SMALL MISSILE IMPACT

MISSILE LEVEL D, WIND ZONE 4, AND HVHZ
SEE CHART #1, THIS SHEET
94 1/2" X 109" UNIT SHOWN. OTHER SIZES APPROVED AS LONG AS
PANEL AREA DOES NOT EXCEED 31.81 FT²

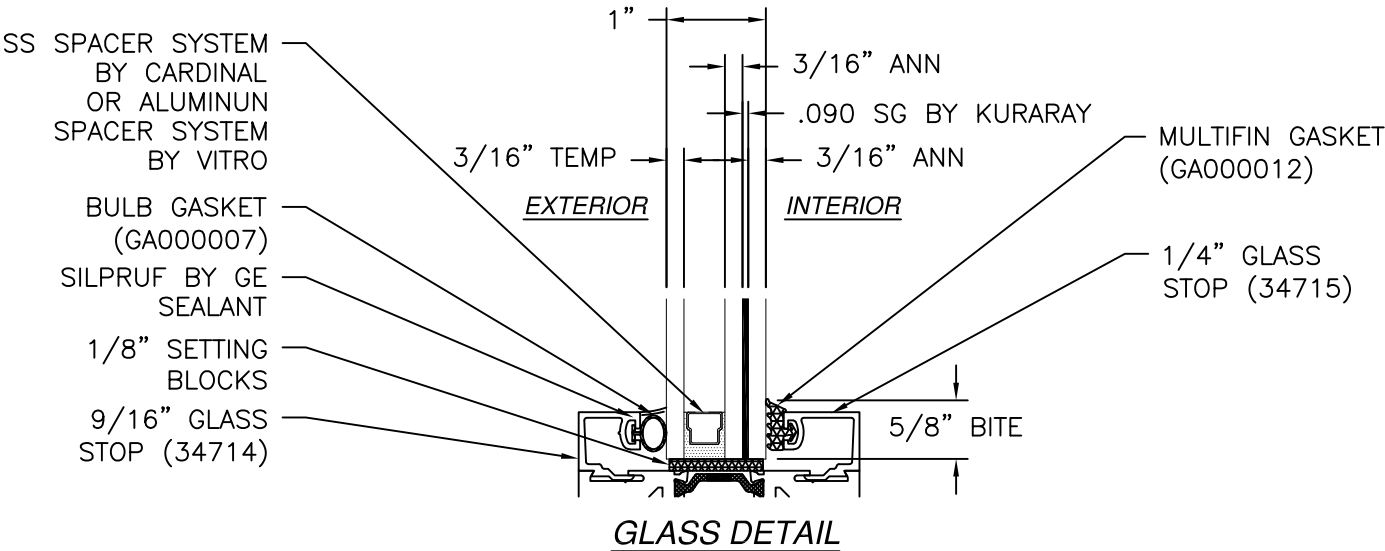
- NOTES:
- PANEL SIZE: 44" x 104 1/8"
 - D.L.O.: 36 1/4" x 97 1/4"

HARDWARE SCHEDULE

A.	(1) SINGLE HANDLE LOCKABLE SHOOT-BOLT WITH DEADBOLT, 34 1/2" FROM BOTTOM OF ACTIVE AND PASSIVE MEETING STILE
B.	3 POINT HOPPE HARDWARE AT ACTIVE PANEL
C.	2 POINT HOPPE HARDWARE AT INACTIVE PANEL
D.	(1) METAL KEEPER AT HEAD AND SILL FASTENED WITH 2 SCREWS AND 2 ADDITIONAL SCREWS AT EXTERIOR SIDE OF KEEPER
E.	(1) BUTT HINGE AT 3" AND 35 1/2" FROM EACH END OF HINGE STILE WITH CORRESPONDING HINGES AT HINGE JAMB

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Chart #1 Maximum Design pressure (psf)												
Panel Height (in)	Single Panel Width (in)											
	24.0		30.0		36.0		42.0		44.0		48.0	
	Pos	Neg	Pos	Neg	Pos	Neg	Pos	Neg	Pos	Neg	Pos	Neg
78.0	40.0	40.0	40.0	40.0	40.0	40.0	40.0	40.0	40.0	40.0	40.0	40.0
84.0	40.0	40.0	40.0	40.0	40.0	40.0	40.0	40.0	40.0	40.0	40.0	40.0
90.0	40.0	40.0	40.0	40.0	40.0	40.0	40.0	40.0	40.0	40.0	40.0	40.0
96.0	40.0	40.0	40.0	40.0	40.0	40.0	40.0	40.0	40.0	40.0	-	-
102.0	40.0	40.0	40.0	40.0	40.0	40.0	40.0	40.0	40.0	40.0	-	-
104.125	40.0	40.0	40.0	40.0	40.0	40.0	40.0	40.0	40.0	40.0	-	-
108.0	40.0	40.0	40.0	40.0	40.0	40.0	37.1	37.1	-	-	-	-
114.0	40.0	40.0	40.0	40.0	36.1	36.1	-	-	-	-	-	-
120.0	40.0	40.0	36.5	36.5	30.8	30.8	-	-	-	-	-	-
126.0	39.0	39.0	31.5	31.5	26.5	26.5	-	-	-	-	-	-
132.0	33.9	33.9	27.3	27.3	-	-	-	-	-	-	-	-
138.0	29.6	29.6	23.9	23.9	-	-	-	-	-	-	-	-
144.0	26.1	26.1	21.0	21.0	-	-	-	-	-	-	-	-
150.0	23.0	23.0	18.5	18.5	-	-	-	-	-	-	-	-
156.0	20.5	20.5	-	-	-	-	-	-	-	-	-	-



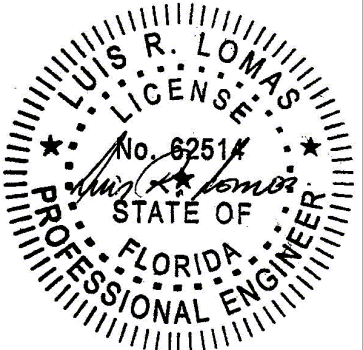
SOLAR INNOVATIONS, INC.
31 ROBERTS ROAD
PINE GROVE, PA 17963

SERIES SI2000 THERMALLY-BROKEN AL FRENCH
DOOR ASSY W/STD & HIGH PRFM THR IMPACT
ELEVATION AND GLASS DETAIL

DRAWN: A.R.	DWG NO. 08-03153	REV C
SCALE NTS	DATE 08/10/17	SHEET 2 OF 8

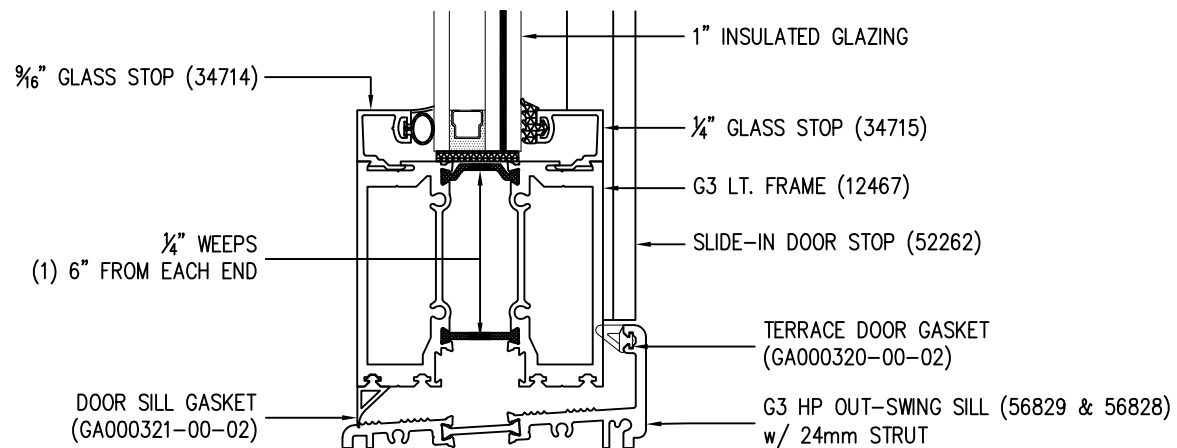
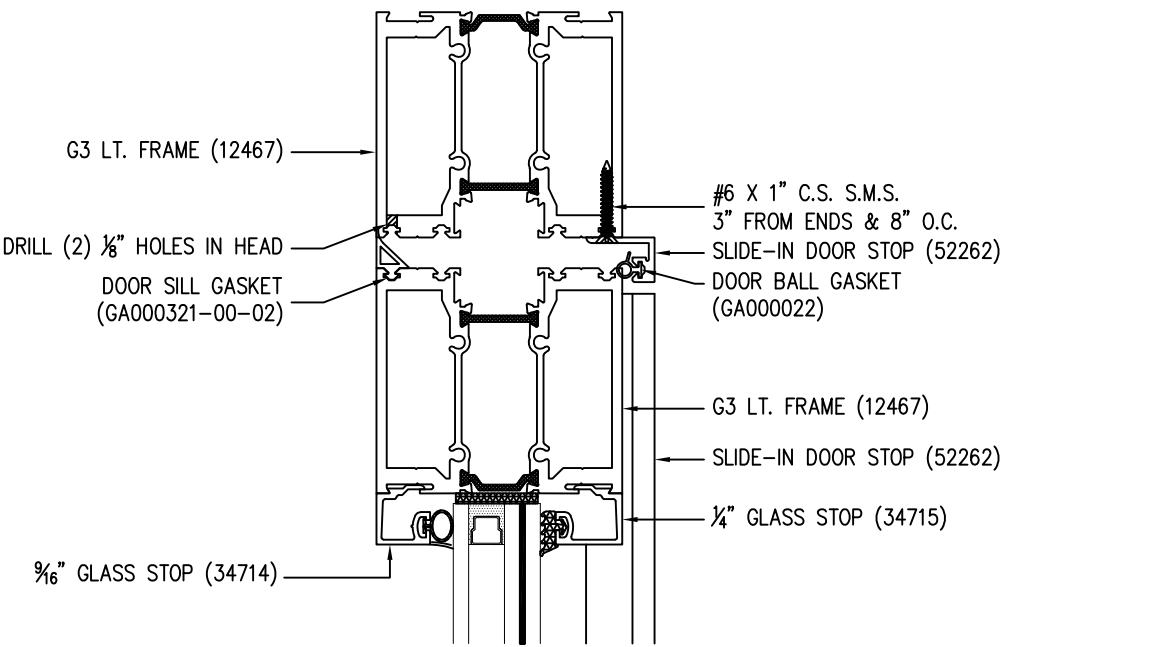
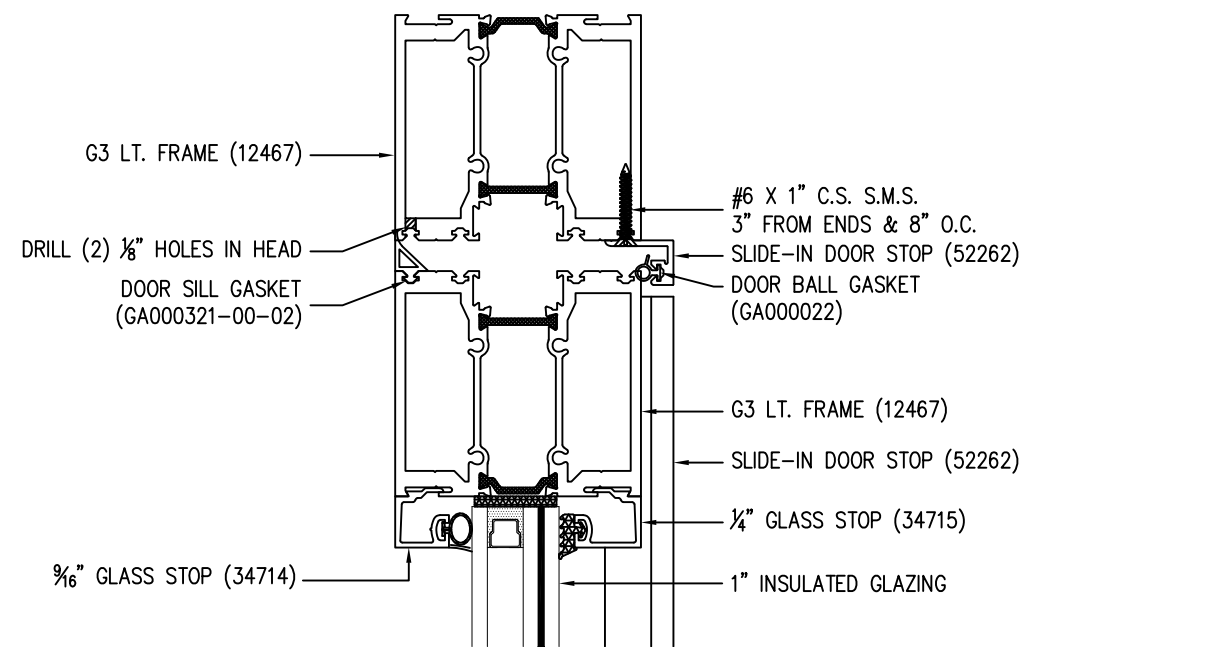
L. ROBERTO LOMAS P.E.
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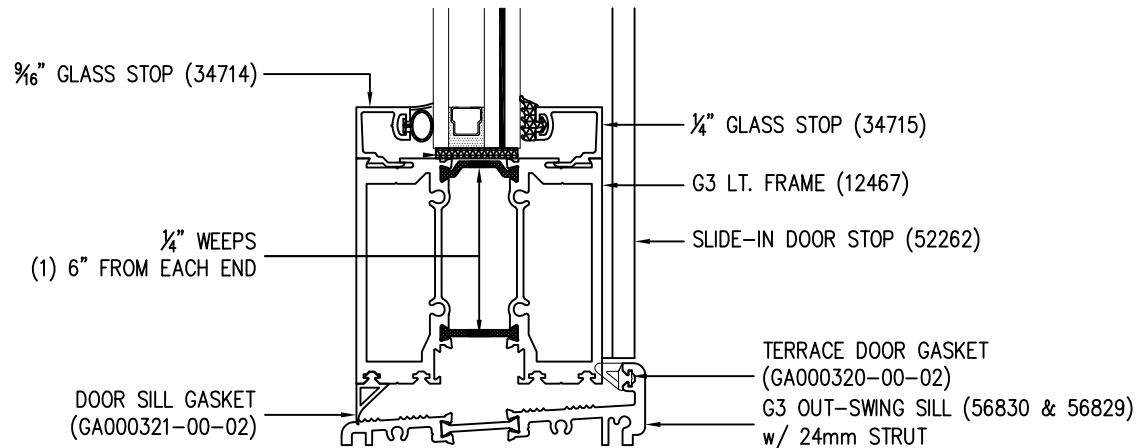


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VERTICAL CROSS SECTION
HIGH PERFORMANCE THRESHOLD



VERTICAL CROSS SECTION
STANDARD THRESHOLD

SOLAR INNOVATIONS, INC.

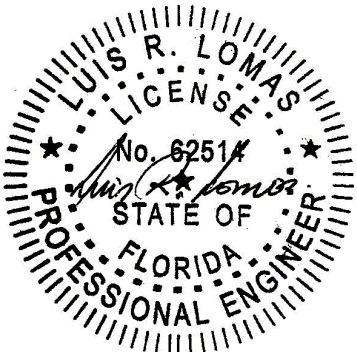
31 ROBERTS ROAD
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DOOR ASSY W/STD & HIGH PRFM THR IMPACT
VERTICAL CROSS SECTIONS

DRAWN: A.R.	DWG NO. 08-03153	REV C
SCALE NTS	DATE 08/10/17	SHEET 3 OF 8

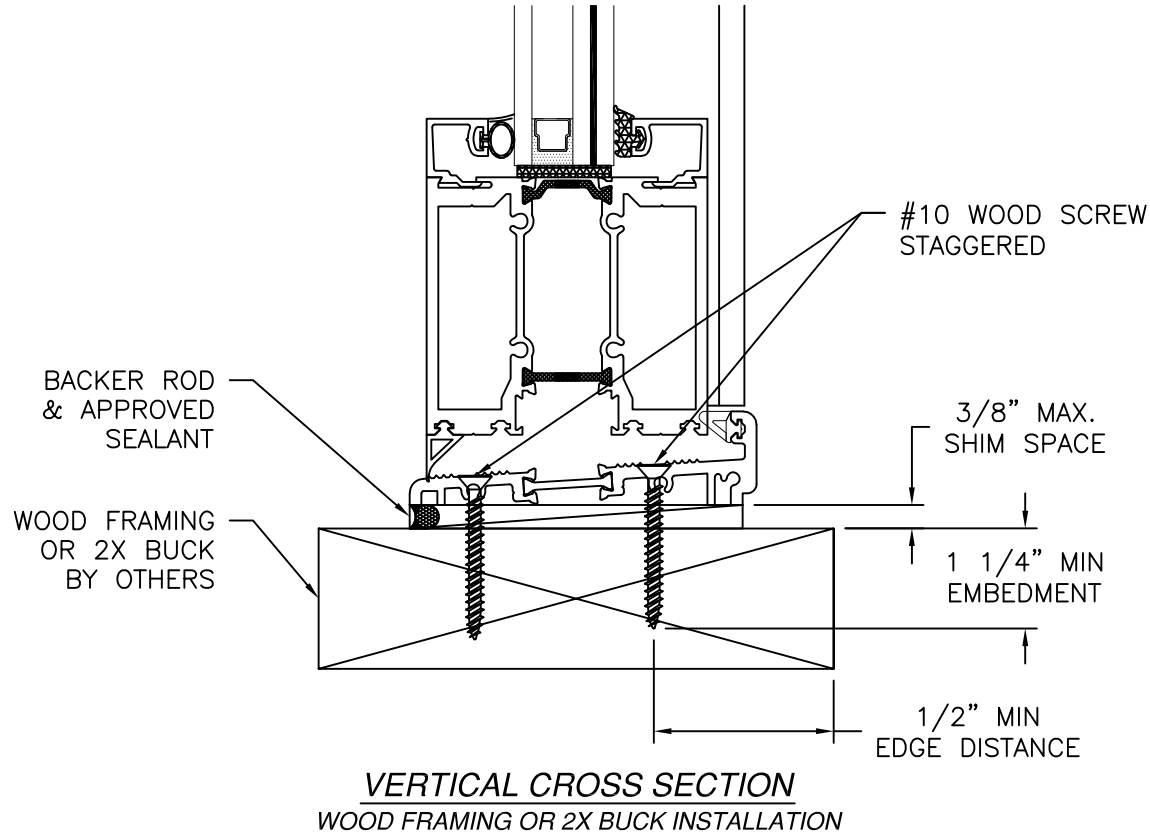
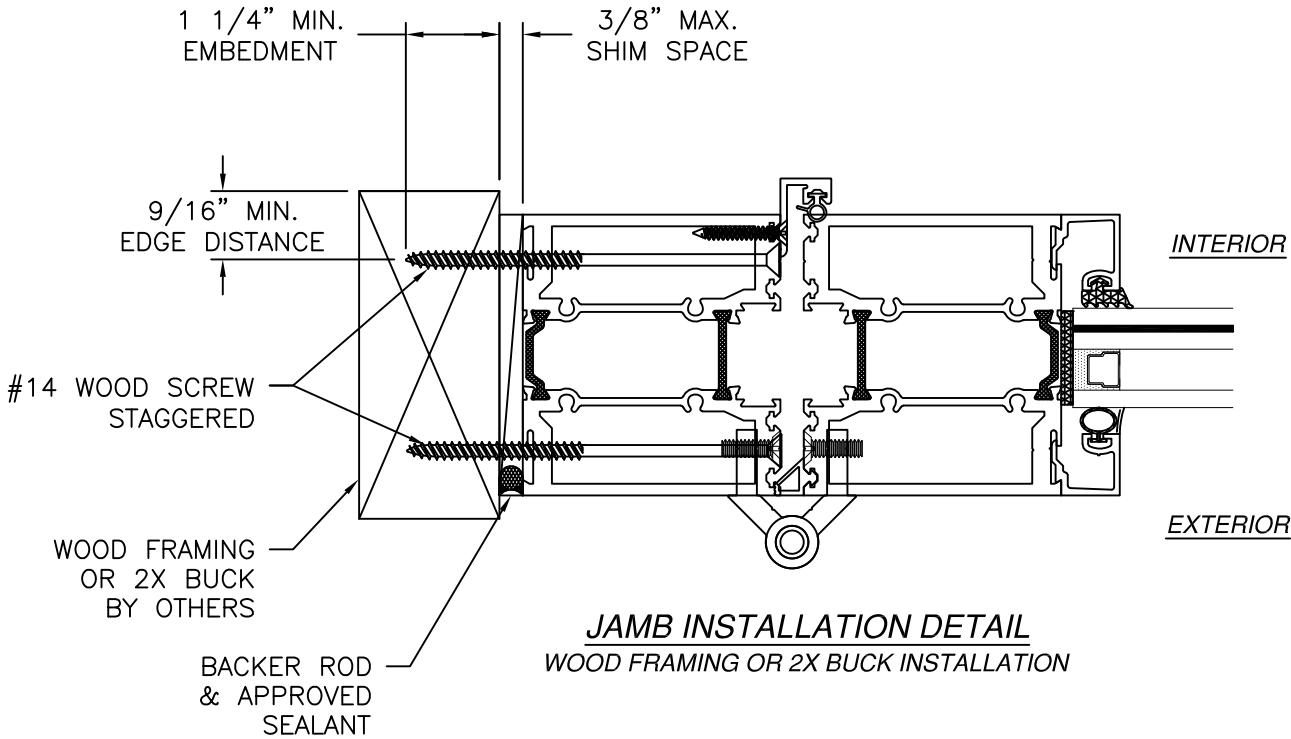
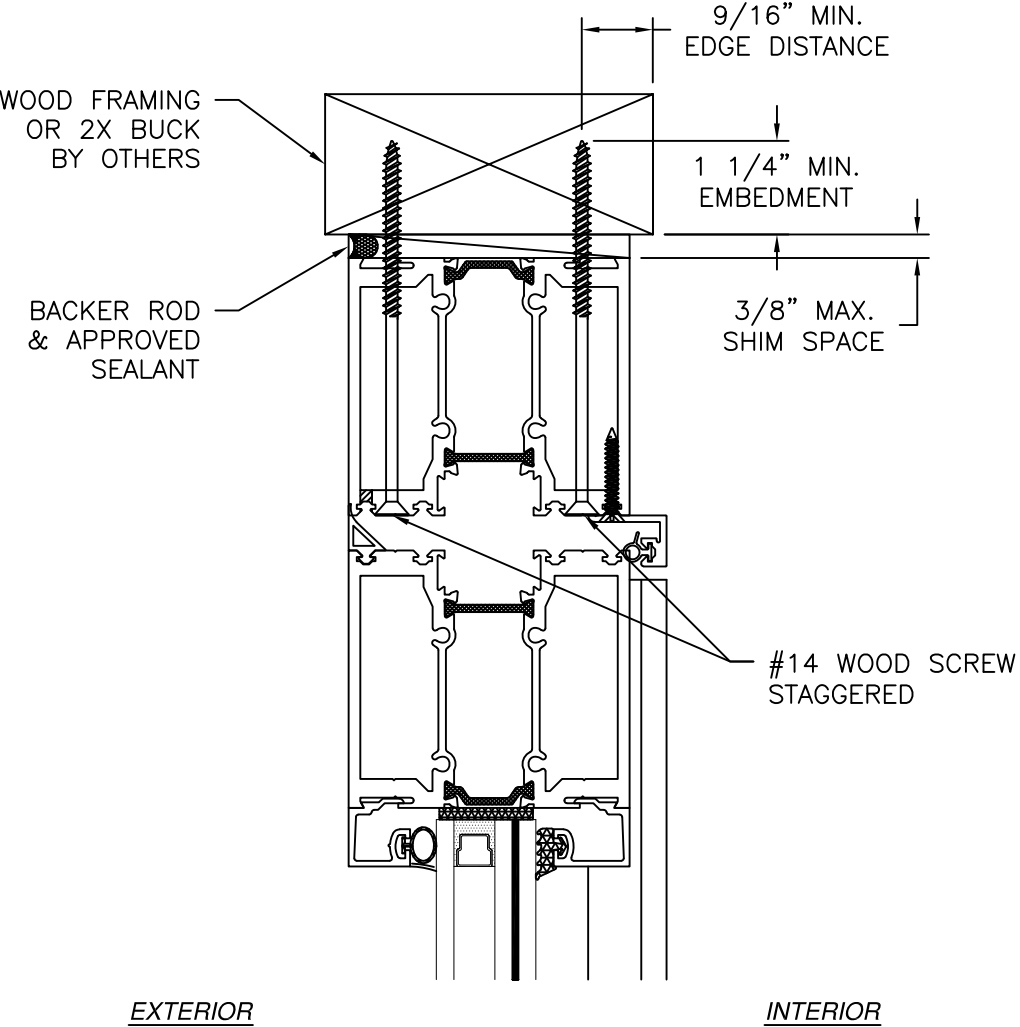
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- NOTES:
1. INTERIOR AND EXTERIOR FINISHES, BY OTHERS, NOT SHOWN FOR CLARITY.
 2. PERIMETER AND JOINT SEALANT BY OTHERS TO BE DESIGNED IN ACCORDANCE WITH ASTM E2112

SOLAR INNOVATIONS, INC.

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DOOR ASSY W/STD & HIGH PRFM THR IMPACT
INSTALLATION DETAILS

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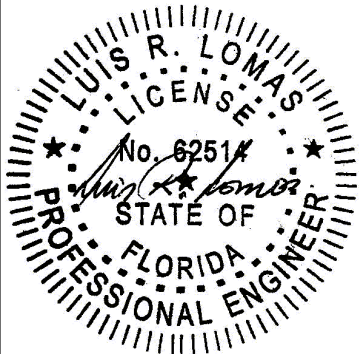
SCALE
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SHEET
5 OF 8

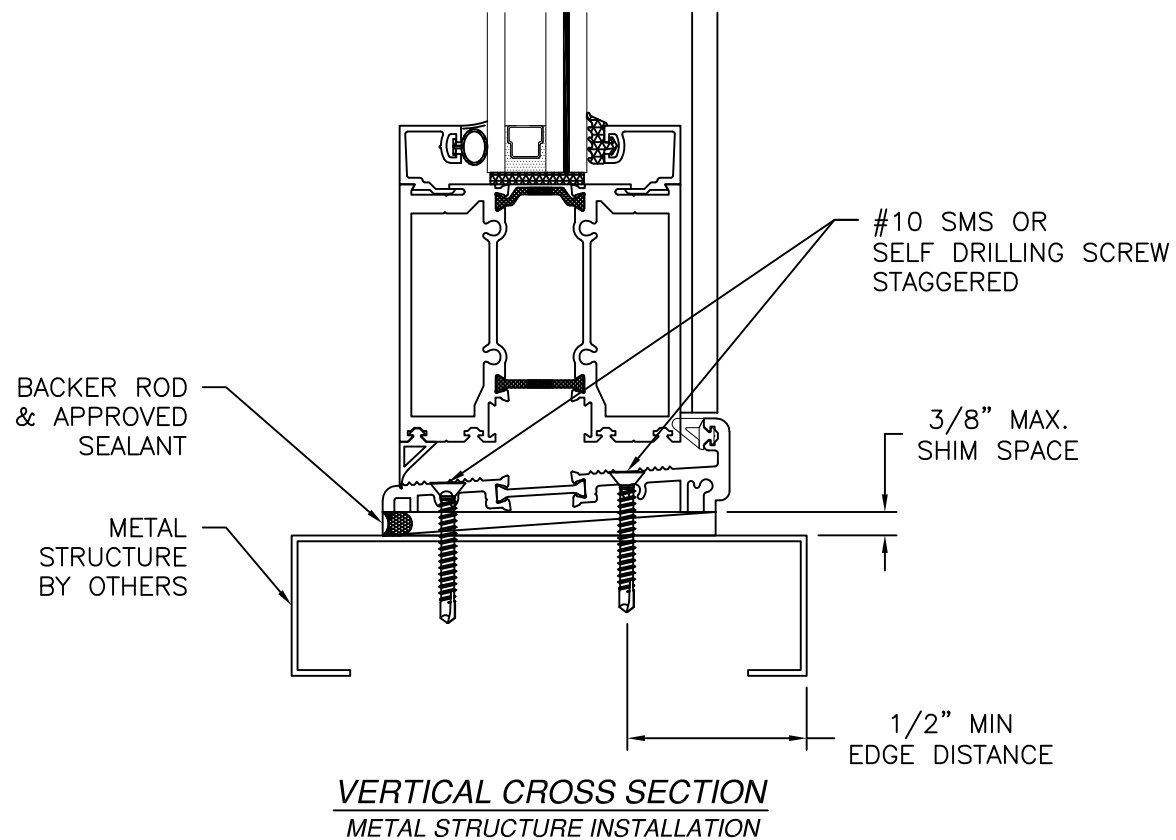
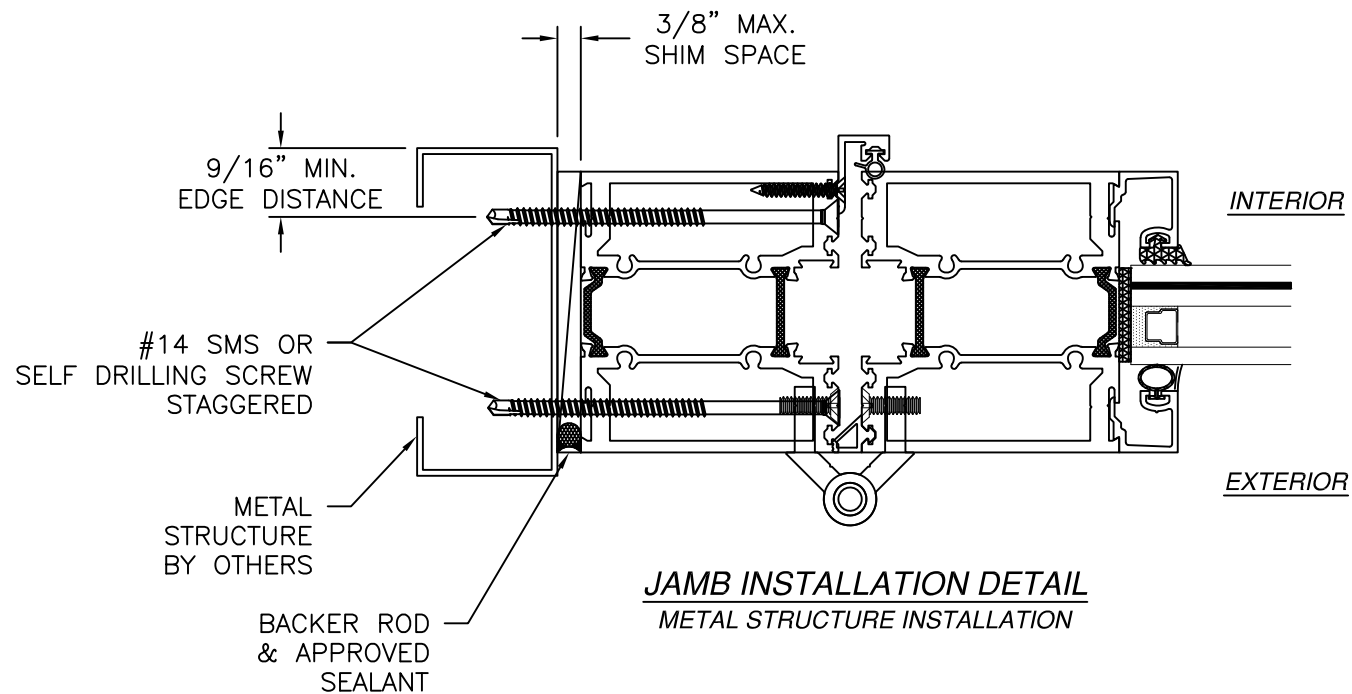
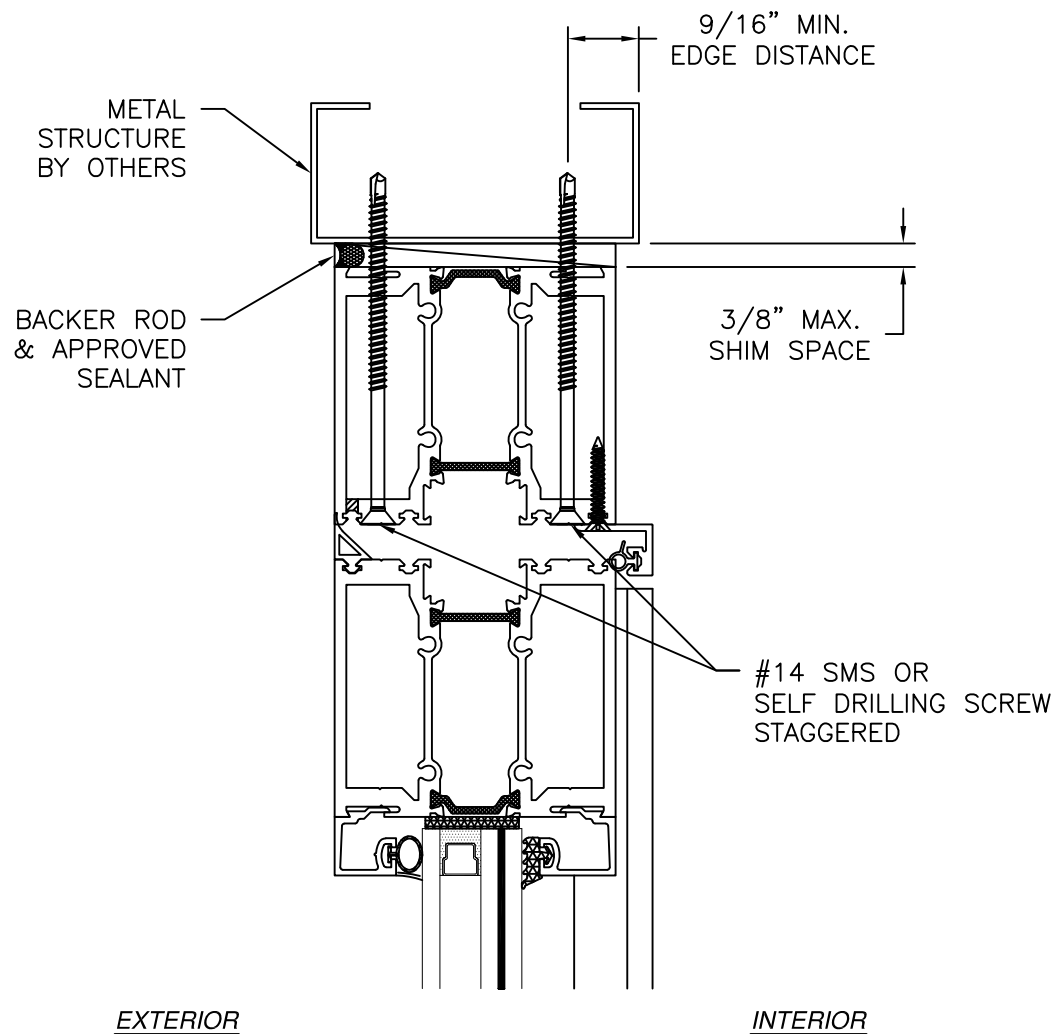
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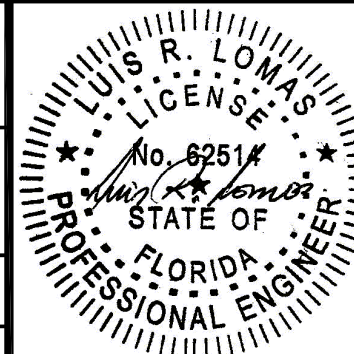
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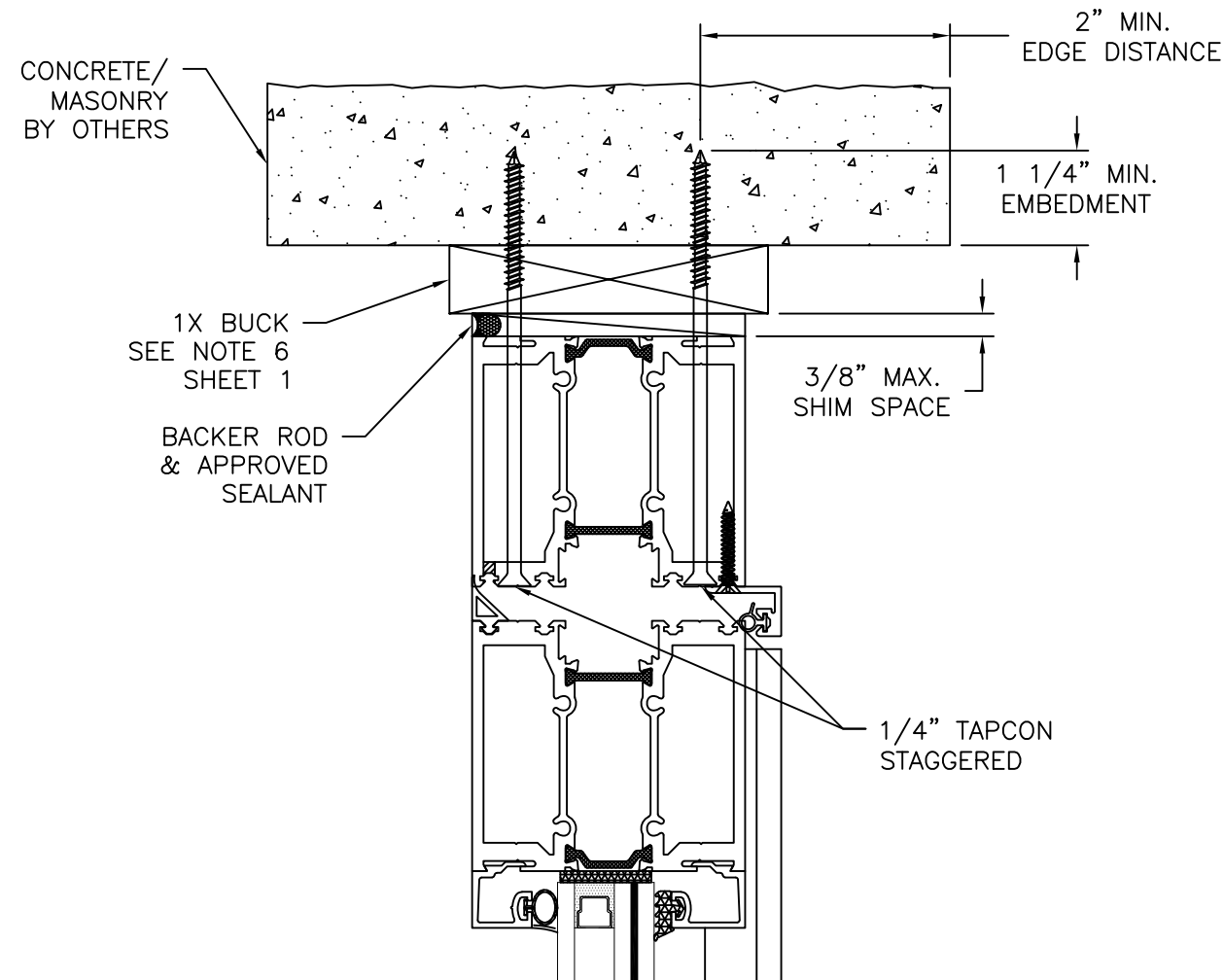
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SOLAR INNOVATIONS, INC. 31 ROBERTS ROAD PINE GROVE, PA 17963		
SERIES SI2000 THERMALLY-BROKEN AL FRENCH DOOR ASSY W/STD & HIGH PRFM THR IMPACT INSTALLATION DETAILS		
DRAWN: A.R.	DWG NO. 08-03153	REV C
SCALE NTS	DATE 08/10/17	SHEET 6 OF 8
L. ROBERTO LOMAS P.E. 208 7th Ave, INDIALANTIC, FL 32903 434-688-0609 rllomas@lrlomaspe.com		

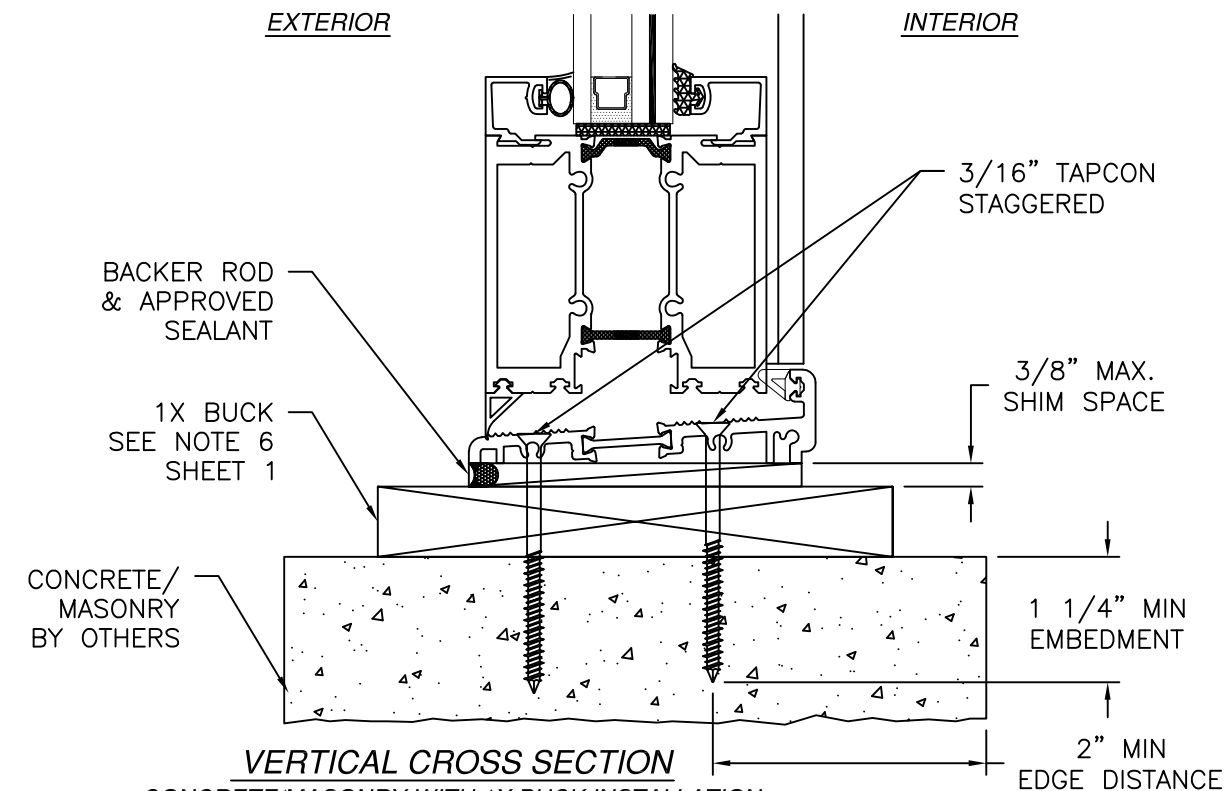


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EXTERIOR

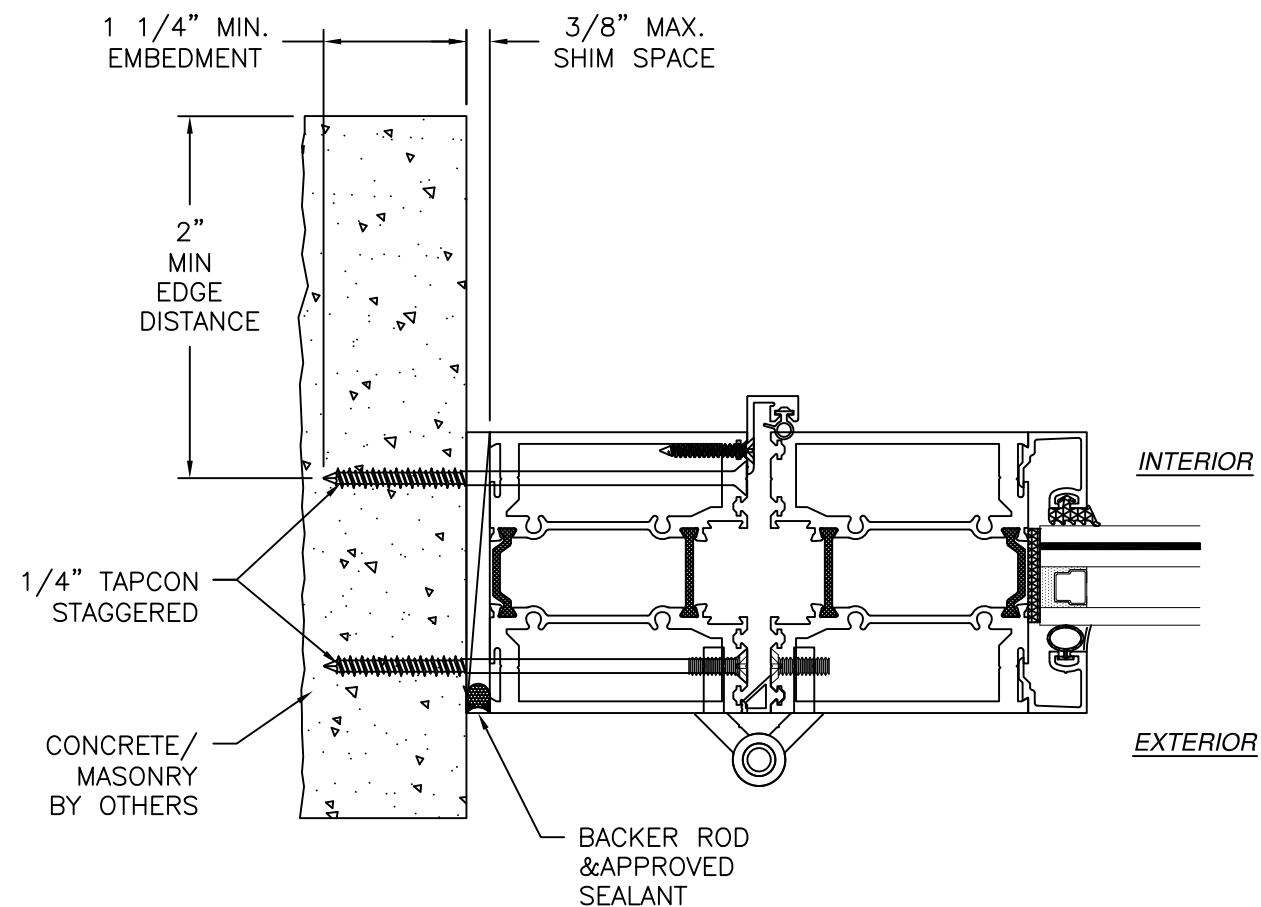
INTERIOR



VERTICAL CROSS SECTION

CONCRETE/MASONRY WITH 1X BUCK INSTALLATION
FOR CONCRETE/MASONRY WITHOUT 1X BUCK REFER TO
JAMB INSTALLATION DETAIL

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JAMB INSTALLATION DETAIL

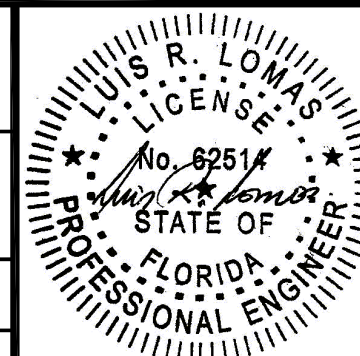
CONCRETE/MASONRY WITHOUT 1X BUCK INSTALLATION
FOR CONCRETE/MASONRY WITH 1X BUCK REFER TO
HEAD AND SILL INSTALLATION DETAILS

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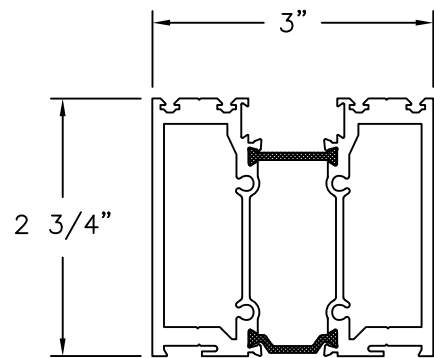
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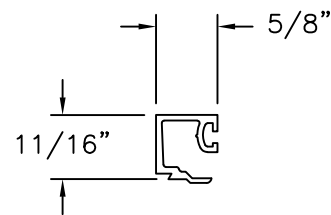


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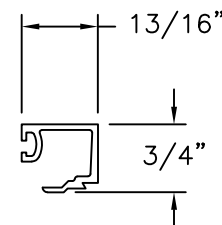
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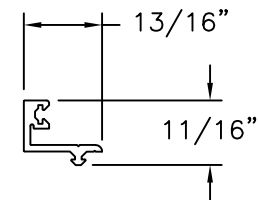
G3 LT. FRAME 12467
ALUMINUM 6063-T5 AND 6063-T6 (.125" THICK)



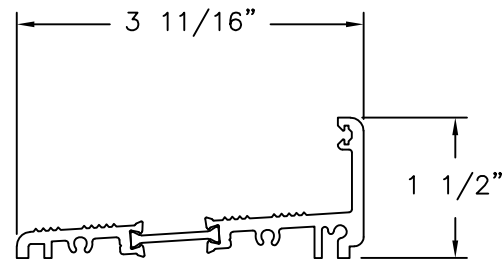
9/16" GLASS STOP 34714
ALUMINUM 6063-T5 AND 6063-T6 (.060" THICK)



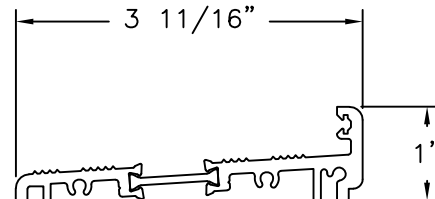
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ALUMINUM 6063-T5 AND 6063-T6 (.060" THICK)



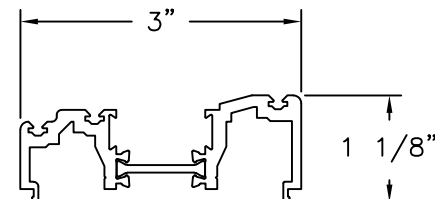
DOOR STOP CAP 52262
ALUMINUM 6063-T5 AND 6063-T6



G3 HP HIGH PERFORMANCE SILL 56829 & 56828
ALUMINUM 6063-T5 AND 6063-T6 (.129" THICK)



G3 STANDARD SILL 56830 & 56829
ALUMINUM 6063-T5 AND 6063-T6 (.129" THICK)



SWING DOOR ADAPTER 54092 & 54093
ALUMINUM 6063-T5 AND 6063-T6

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