

REVISIONS			
REV	DESCRIPTION	DATE	APPROVED
A	REVISED PER NEW CODE	07/24/2024	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” 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. 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 UNIT FRAME 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 1/4”.
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: ALUMINUM 6063–T6.
11. UNITS MUST BE GLAZED PER ASTM E1300, SEE SHEET 8 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 1/4” LAG BOLT SCREWS WITH SUFFICIENT LENGTH TO ACHIEVE A 1 1/2” MINIMUM EMBEDMENT INTO SUBSTRATE. LOCATE ANCHORS AS SHOWN IN ELEVATIONS AND INSTALLATION DETAILS.
14. FOR ANCHORING THROUGH FRAME INTO GROUT FILLED MASONRY/CONCRETE USE 1/4” ELCO CRETE–FLEX WITH SUFFICIENT LENGTH TO ACHIEVE A 1 3/4” MINIMUM EMBEDMENT INTO SUBSTRATE WITH 1 3/4” 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 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: GROUT/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
18. GEOMETRIC SHAPES ARE ALSO APPROVED. APPROVED GEOMETRIC SHAPES DIMENSIONS SHALL NOT EXCEED INSCRIBED DIMENSIONS OF APPROVED RECTANGULAR ASSEMBLY SHOWN IN SHEET 2.

TABLE OF CONTENTS	
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8	COMPONENTS AND GLAZING DETAIL

BOVARD STUDIO, INC.

2281 BUSINESS HIGHWAY 34
FAIRFIELD, IA 52556

6000 SERIES FIXED WINDOW MULLED
IMPACT – HVHZ
NOTES

DRAWN:
A.R.

DWG NO.
08–03445

REV
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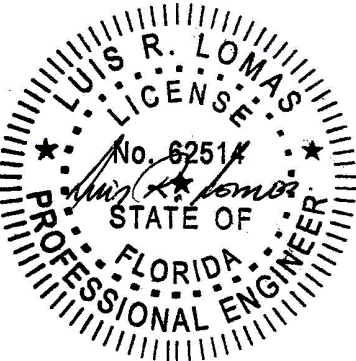
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DATE 04/25/19

SHEET 1 OF 8

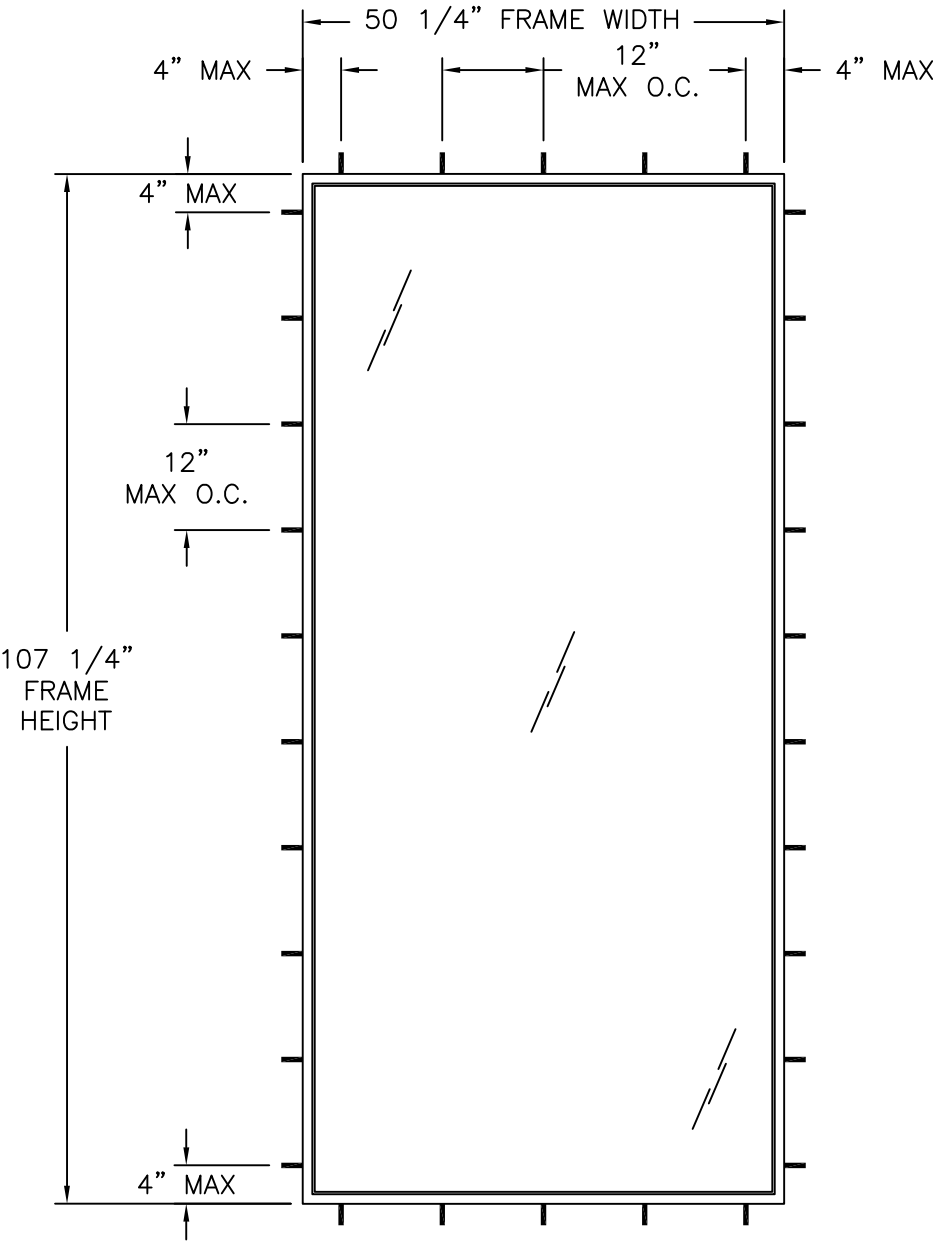
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SIGNED: 06/18/2025



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

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REV	DESCRIPTION	DATE	APPROVED
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DESIGN PRESSURE RATING	IMPACT RATING
±85.0PSF	LARGE AND SMALL MISSILE IMPACT

MISSILE LEVEL D, WIND ZONE 4, AND HVHZ
50 1/4" X 107 1/2" UNIT SHOWN. OTHER SIZES APPROVED AS LONG AS
FRAME AREA DOES NOT EXCEED 37.5 FT²
FOR OTHERS SIZES SEE CHART #1 THIS SHEET

- NOTES:
- UNIT FRAME SIZE: 50 1/4" X 107 1/4"
 - D.L.O.: 49 3/4" X 103 3/4"

Chart # 1 Maximum Design pressure (psf)																
Panel Height (in)	Single Panel Width (in)															
	24.0		30.0		36.0		42.0		48.0		50.25		54.0		60.0	
	Pos	Neg	Pos	Neg	Pos	Neg	Pos	Neg	Pos	Neg	Pos	Neg	Pos	Neg	Pos	Neg
60.0	85.0	85.0	85.0	85.0	85.0	85.0	85.0	85.0	85.0	85.0	85.0	85.0	85.0	85.0	85.0	85.0
66.0	85.0	85.0	85.0	85.0	85.0	85.0	85.0	85.0	85.0	85.0	85.0	85.0	85.0	85.0	85.0	85.0
72.0	85.0	85.0	85.0	85.0	85.0	85.0	85.0	85.0	85.0	85.0	85.0	85.0	85.0	85.0	85.0	85.0
78.0	85.0	85.0	85.0	85.0	85.0	85.0	85.0	85.0	85.0	85.0	85.0	85.0	85.0	85.0	85.0	85.0
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90.0	85.0	85.0	85.0	85.0	85.0	85.0	85.0	85.0	85.0	85.0	85.0	85.0	85.0	85.0	85.0	85.0
96.0	85.0	85.0	85.0	85.0	85.0	85.0	85.0	85.0	85.0	85.0	85.0	85.0	85.0	85.0	-	-
102.0	85.0	85.0	85.0	85.0	85.0	85.0	85.0	85.0	85.0	85.0	85.0	85.0	-	-	-	-
107.5	85.0	85.0	85.0	85.0	85.0	85.0	85.0	85.0	85.0	85.0	85.0	85.0	-	-	-	-
108.0	85.0	85.0	85.0	85.0	85.0	85.0	85.0	85.0	85.0	85.0	-	-	-	-	-	-
114.0	85.0	85.0	85.0	85.0	85.0	85.0	85.0	85.0	-	-	-	-	-	-	-	-
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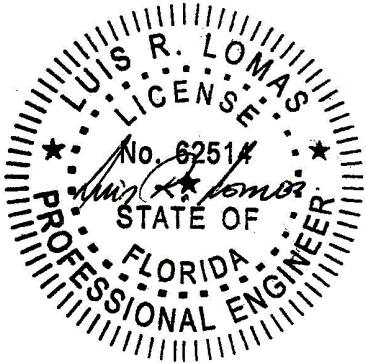
BOVARD STUDIO, INC.
2281 BUSINESS HIGHWAY 34
FAIRFIELD, IA 52556

6000 SERIES FIXED WINDOW MULLED
IMPACT – HVHZ
ELEVATION AND DESIGN PRESSURE CHART

DRAWN: A.R.	DWG NO. 08-03445	REV A
SCALE NTS	DATE 04/25/19	SHEET 2 OF 8

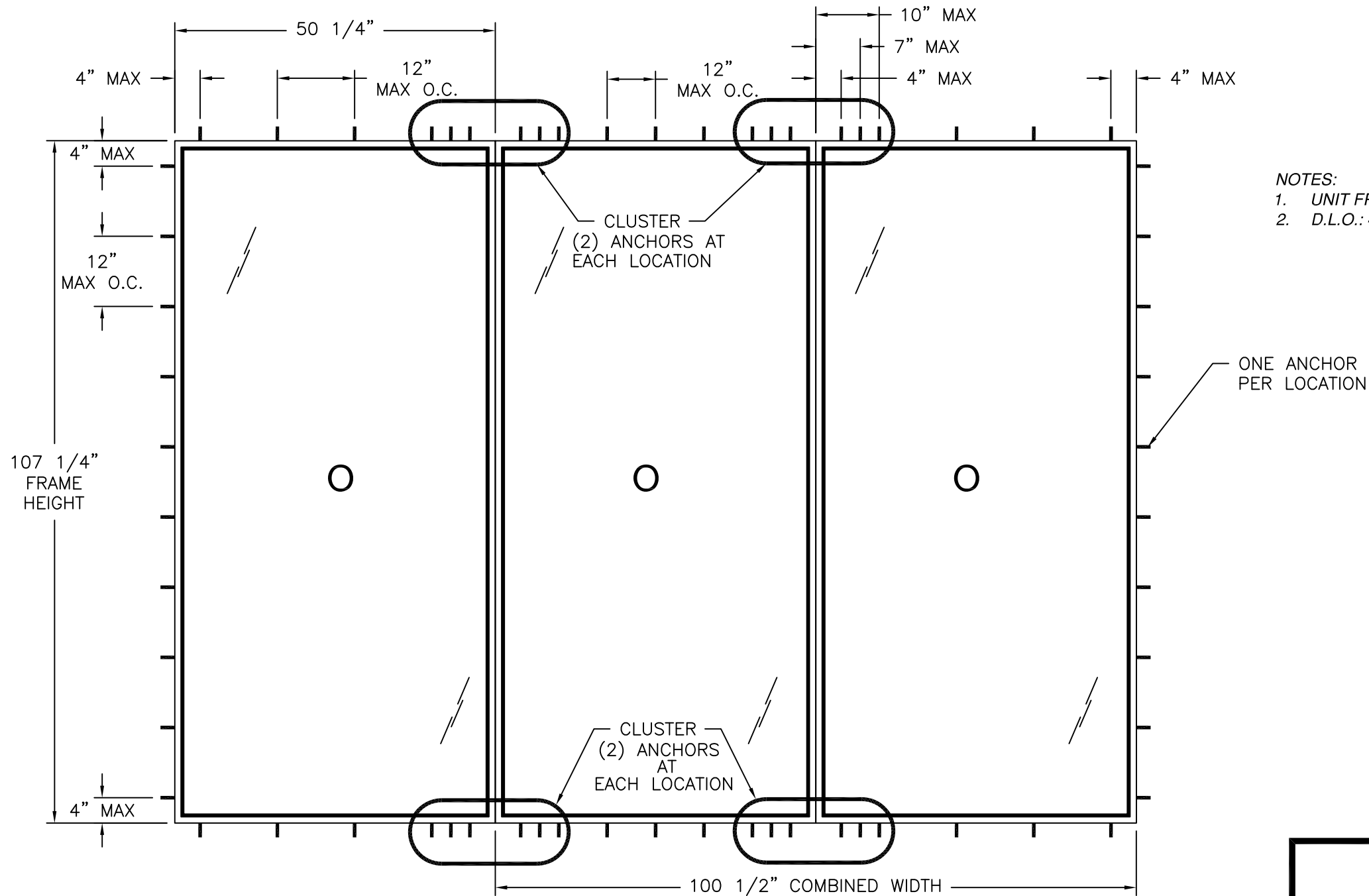
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- NOTES:
- UNIT FRAME SIZE: 50 1/4" X 107 1/4"
 - D.L.O.: 49 3/4" X 103 3/4"

6000 SERIES FIXED WINDOW MULLED, JAMB TO JAMB
EXTERIOR VIEW

DESIGN PRESSURE RATING	IMPACT RATING
±85.0PSF	LARGE AND SMALL MISSILE IMPACT

MISSILE LEVEL D, WIND ZONE 4, AND HVHZ
TRIPLE UNIT SHOWN, MULTIPLE PANELS MULLED TOGETHER ARE APPROVED AS LONG AS INDIVIDUAL PANEL AREA DOES NOT EXCEED 37.5 FT²
FOR OTHER SIZES SEE CHART #1, SHEET 2

BOVARD STUDIO, INC.
2281 BUSINESS HIGHWAY 34
FAIRFIELD, IA 52556

6000 SERIES FIXED WINDOW MULLED
IMPACT – HVHZ
ELEVATION FRAME INSTALLATION

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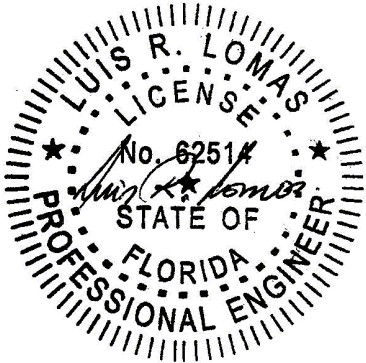
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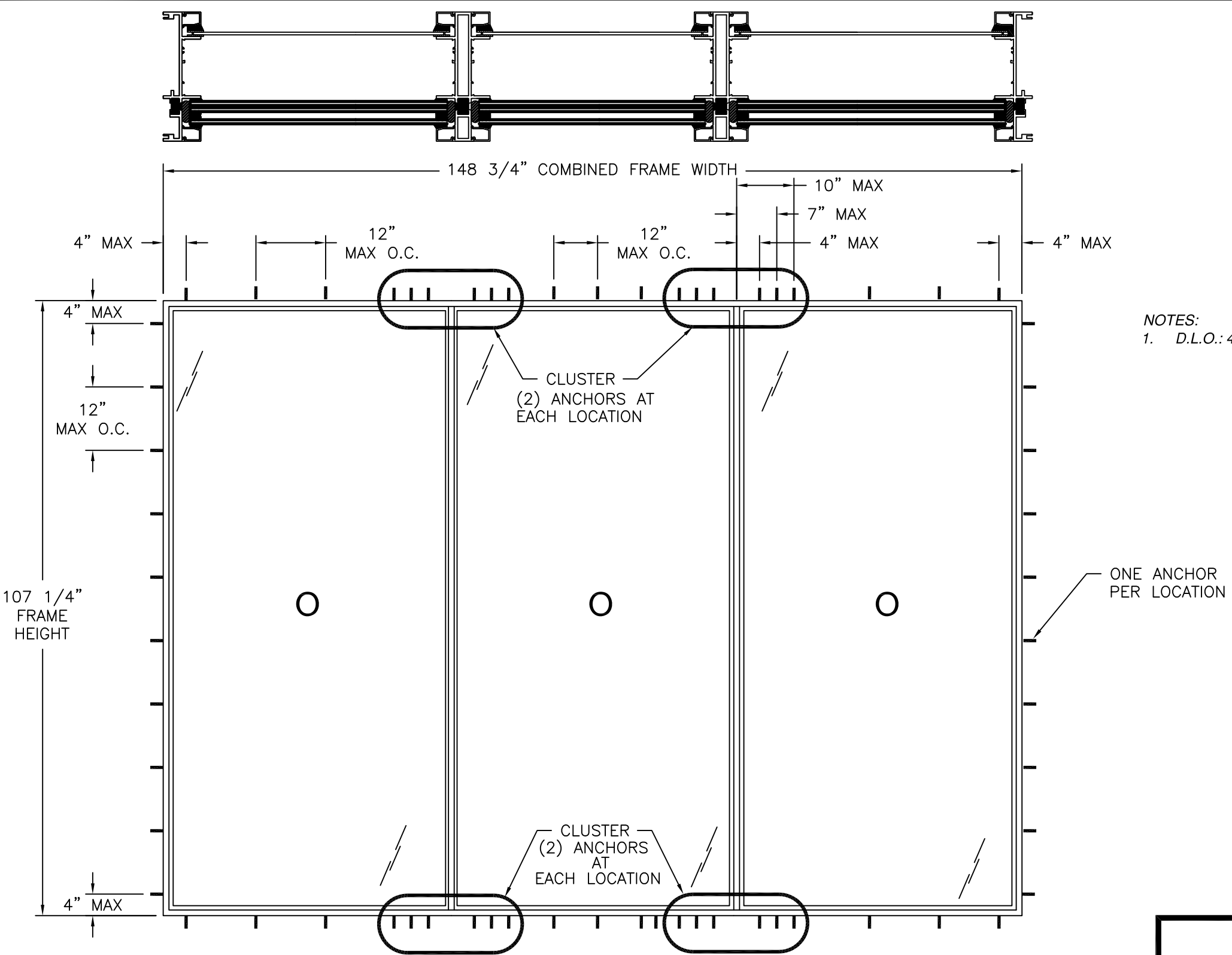
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NOTES:
1. D.L.O.: 49 3/4" X 103 3/4"

6000 SERIES FIXED WINDOW MULLED, WITH INTEGRAL MULLION
EXTERIOR VIEW

DESIGN PRESSURE RATING	IMPACT RATING
±85.0PSF	LARGE AND SMALL MISSILE IMPACT

MISSILE LEVEL D, WIND ZONE 4, AND HVHZ
TRIPLE UNIT SHOWN, MULTIPLE PANELS MULLED TOGETHER ARE APPROVED AS
LONG AS INDIVIDUAL PANEL AREA DOES NOT EXCEED 37.5 FT²
FOR OTHER SIZES SEE CHART #1, SHEET2

BOVARD STUDIO, INC.
2281 BUSINESS HIGHWAY 34
FAIRFIELD, IA 52556

6000 SERIES FIXED WINDOW MULLED
IMPACT – HVHZ
INTEGRAL MULLION ELEVATION

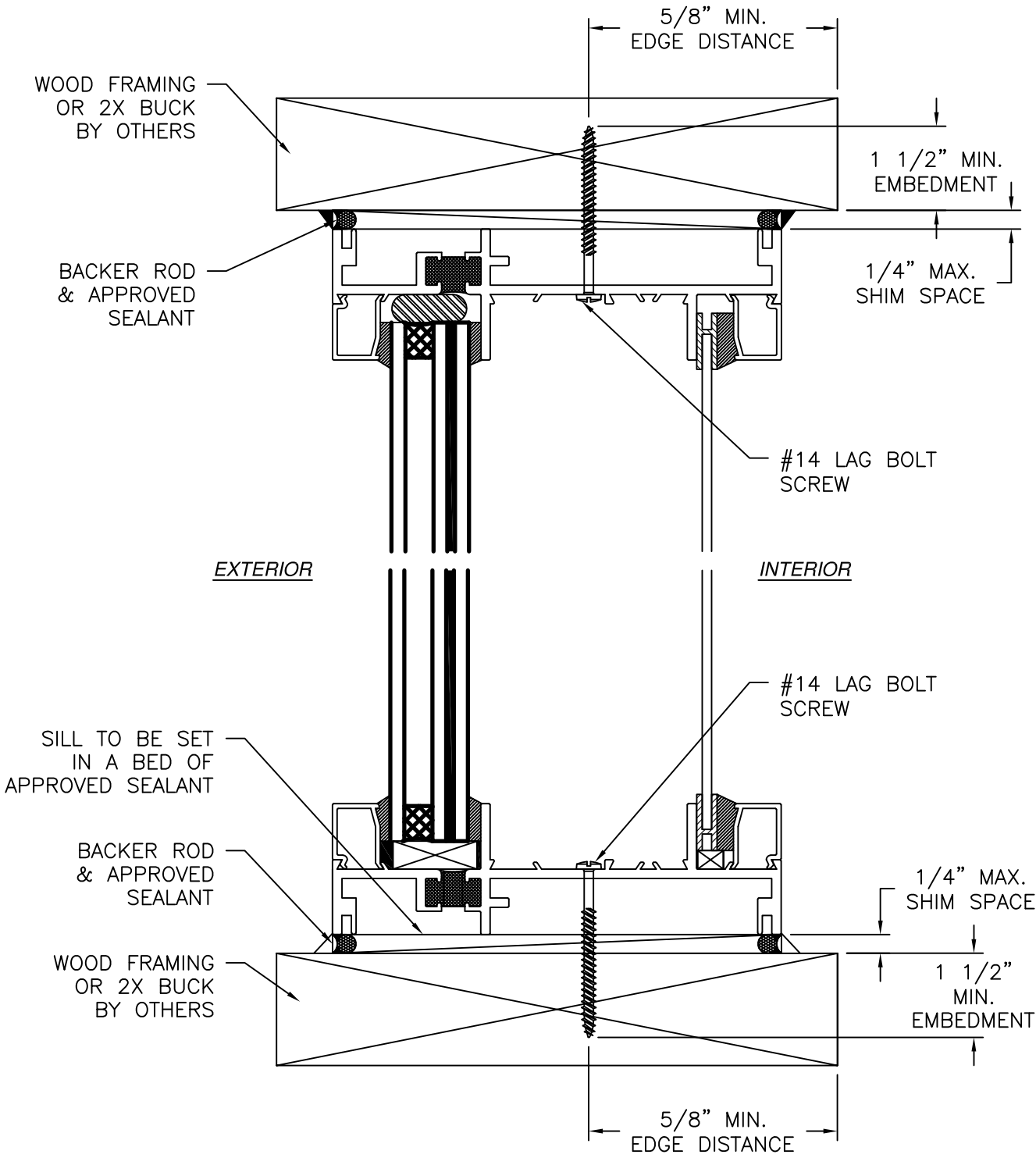
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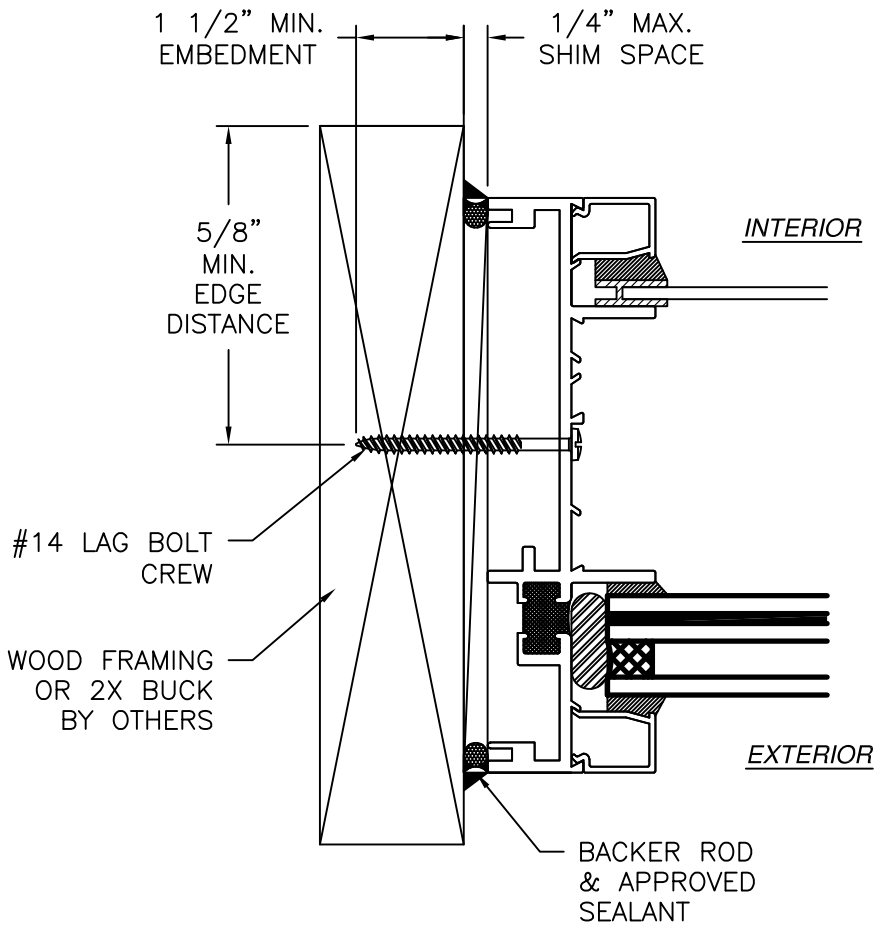
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VERTICAL CROSS SECTION
WOOD FRAMING OR 2X BUCK INSTALLATION



JAMB INSTALLATION DETAIL
WOOD FRAMING OR 2X BUCK INSTALLATION

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

SIGNED: 06/18/2025

BOVARD STUDIO, INC.

2281 BUSINESS HIGHWAY 34
FAIRFIELD, IA 52556

6000 SERIES FIXED WINDOW MULLED
IMPACT – HVHZ
INSTALLATION DETAILS

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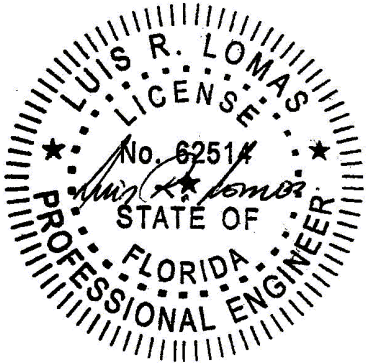
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SHEET 5 OF 8

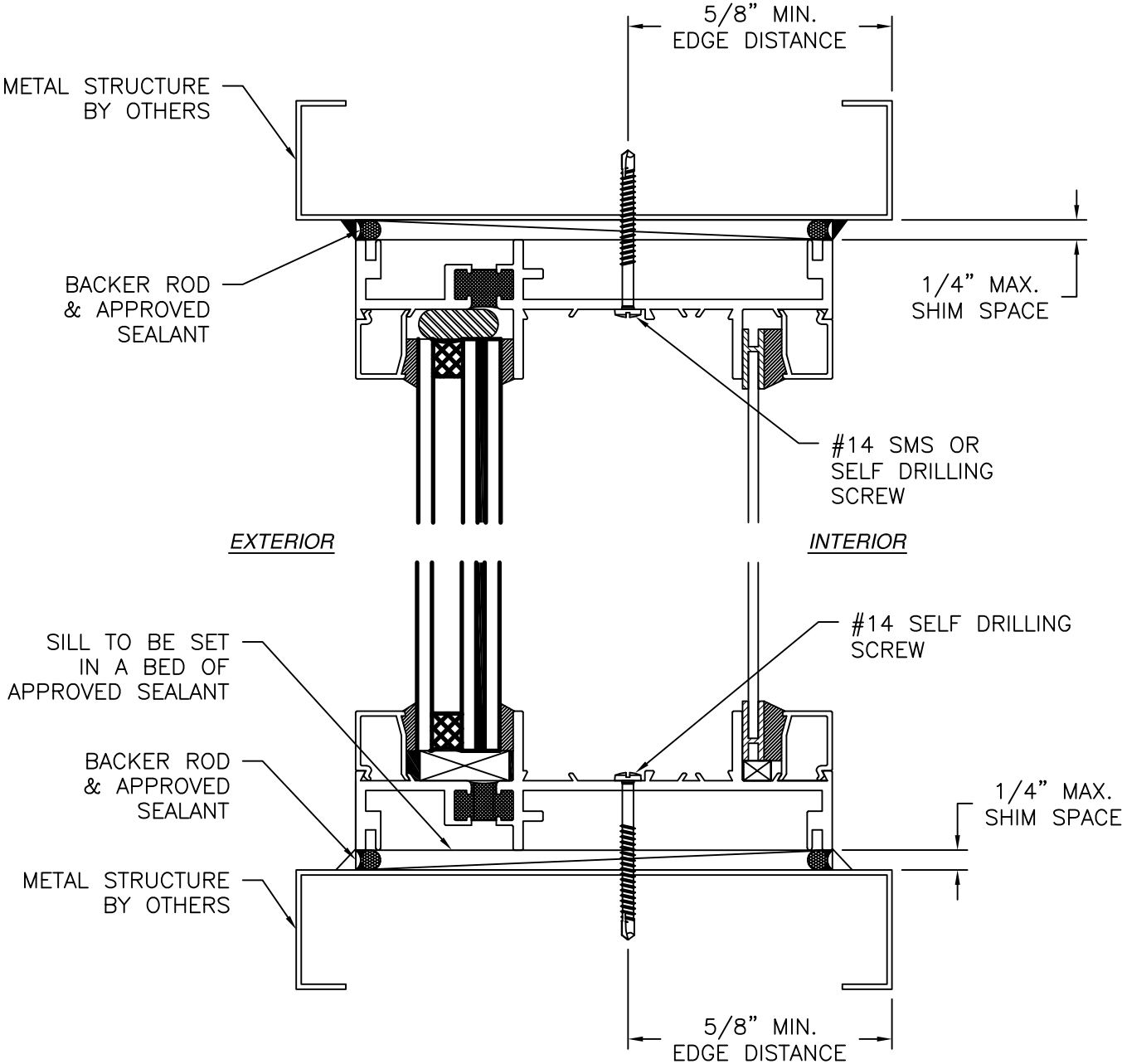
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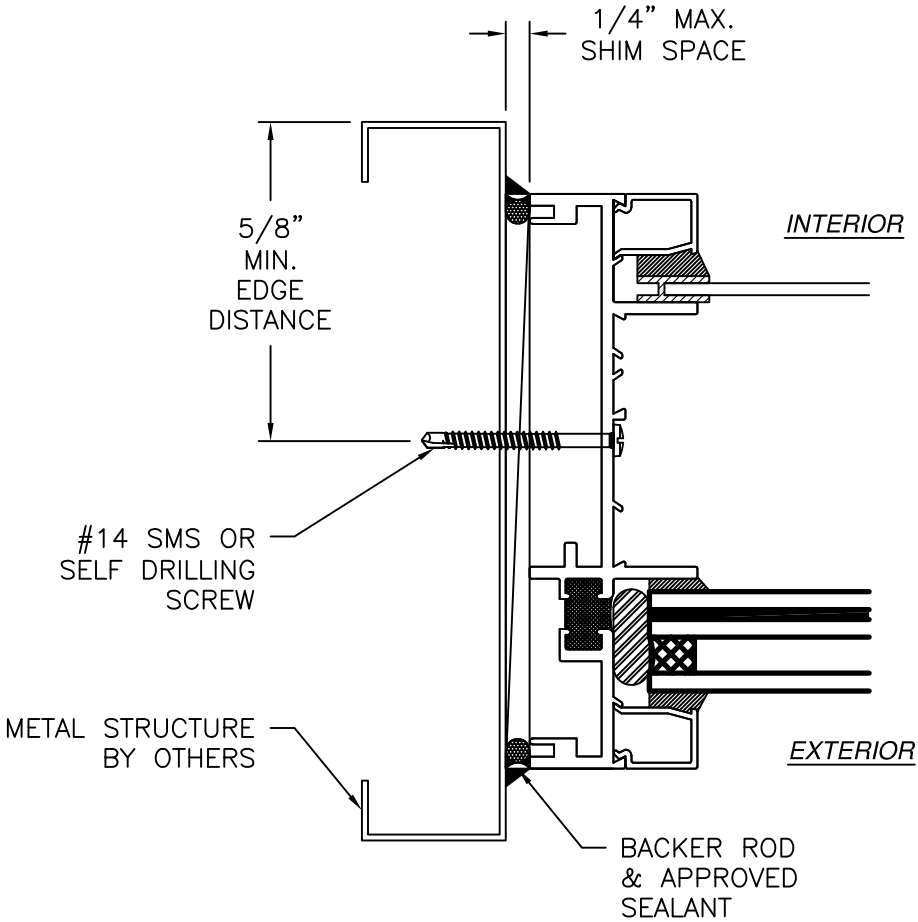


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VERTICAL CROSS SECTION
METAL STRUCTURE INSTALLATION



JAMB INSTALLATION DETAIL
METAL STRUCTURE INSTALLATION

- 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

SIGNED: 06/18/2025

BOVARD STUDIO, INC.
2281 BUSINESS HIGHWAY 34
FAIRFIELD, IA 52556

6000 SERIES FIXED WINDOW MULLED
IMPACT – HVHZ
INSTALLATION DETAILS

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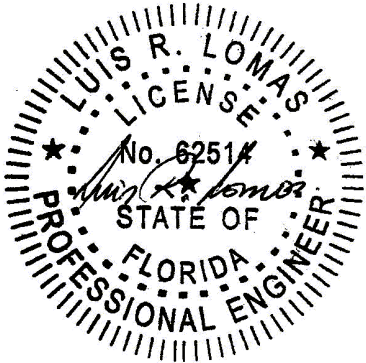
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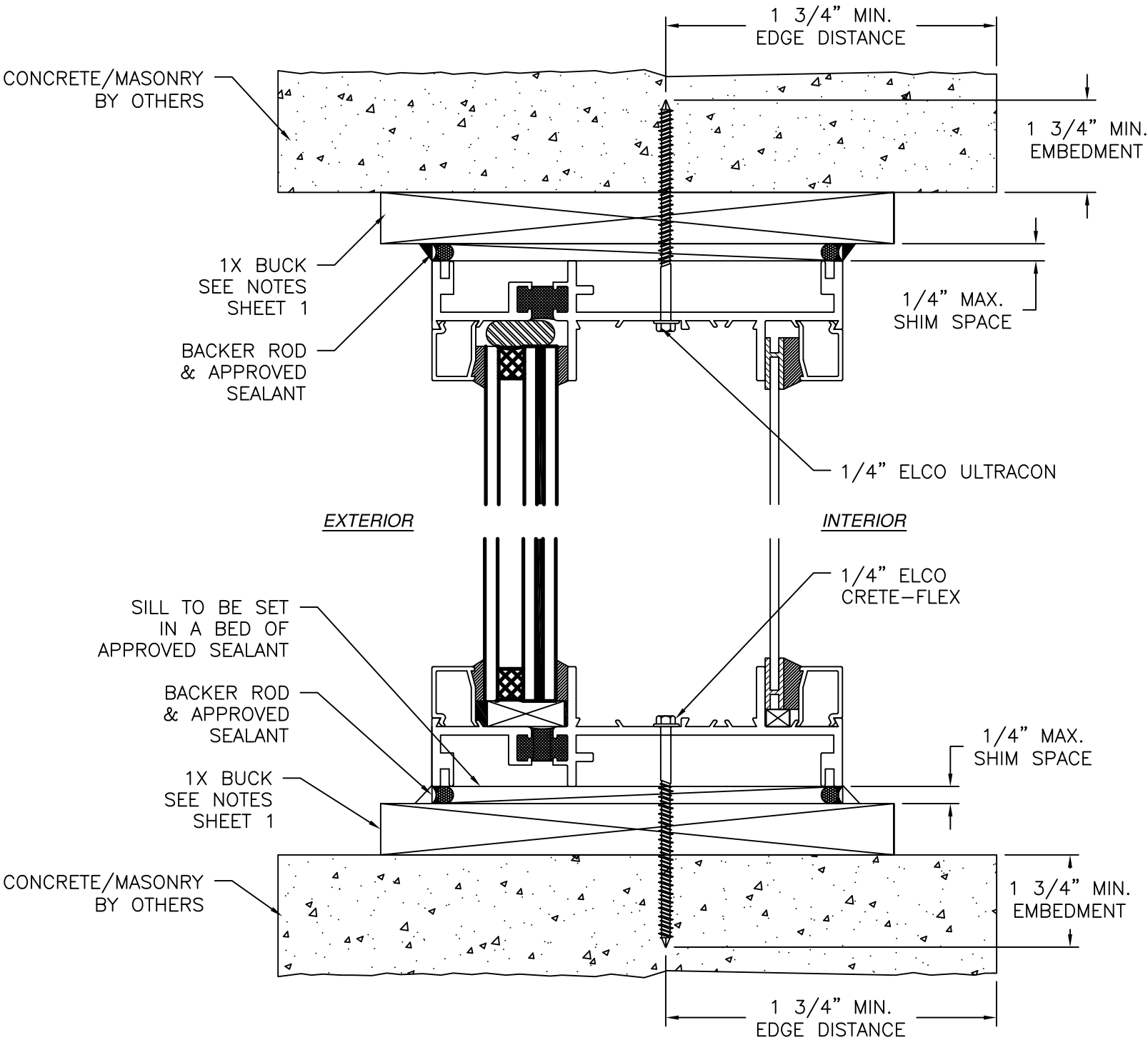
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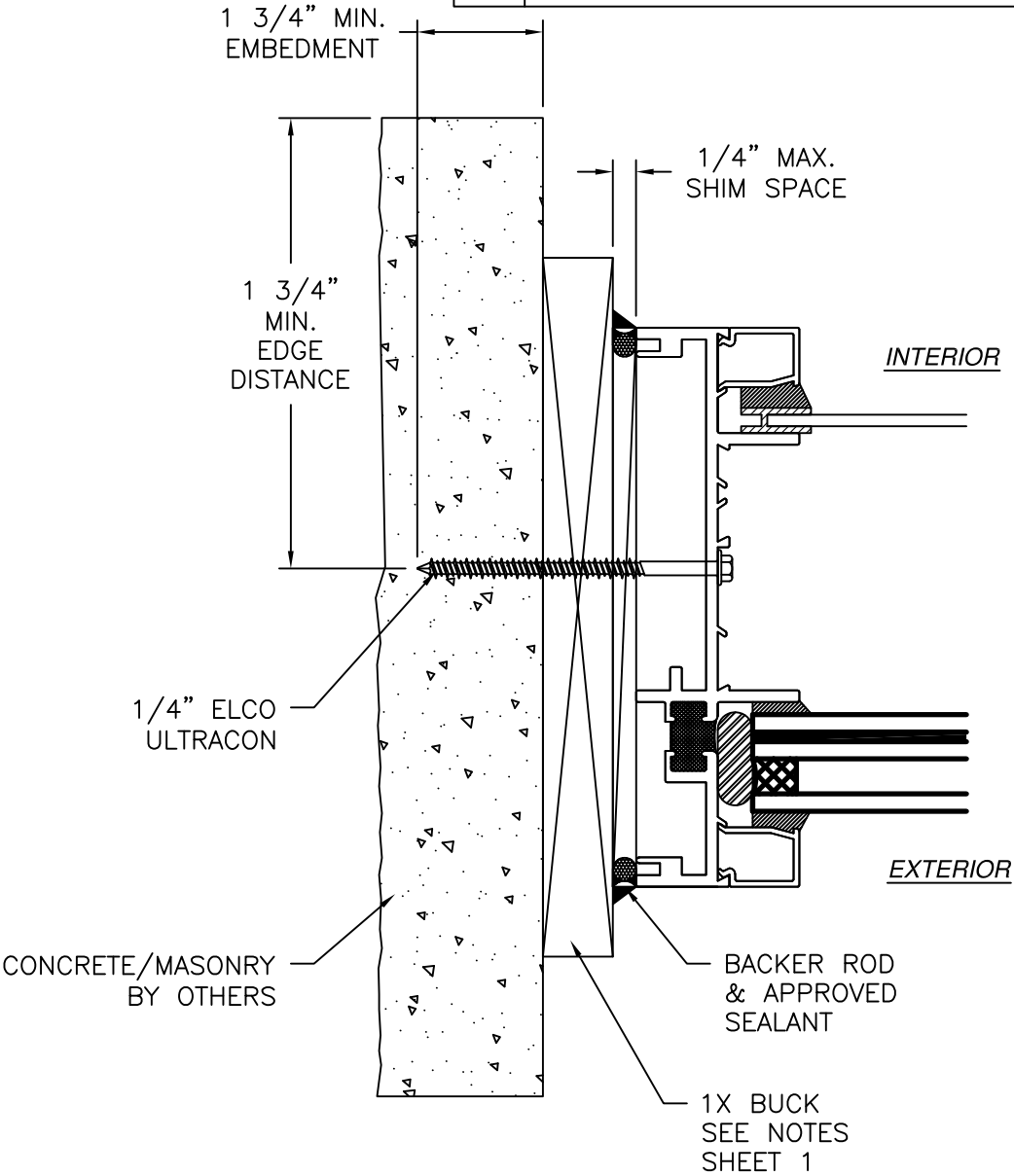
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VERTICAL CROSS SECTION
CONCRETE/MASONRY INSTALLATION

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



JAMB INSTALLATION DETAIL
CONCRETE/MASONRY INSTALLATION

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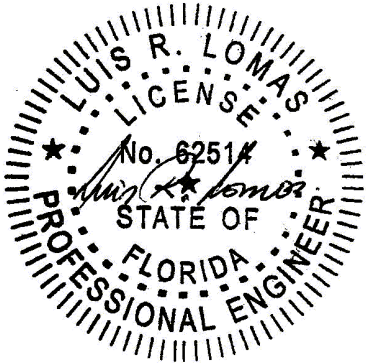
DATE
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SHEET
7 OF 8

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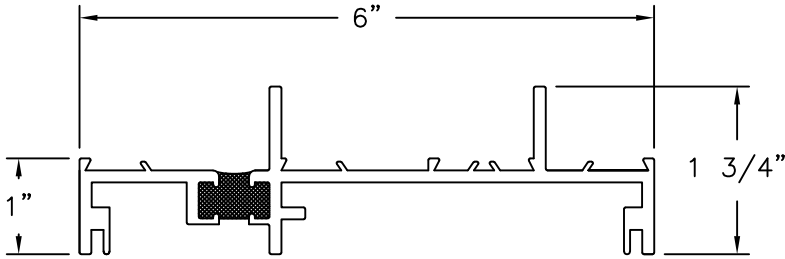
208 7th Ave, INDIALANTIC, FL 32903

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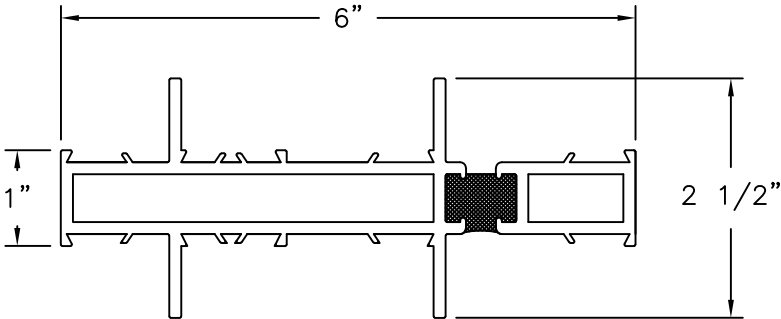


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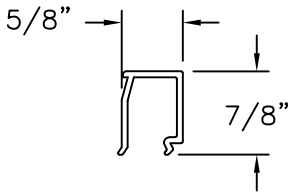
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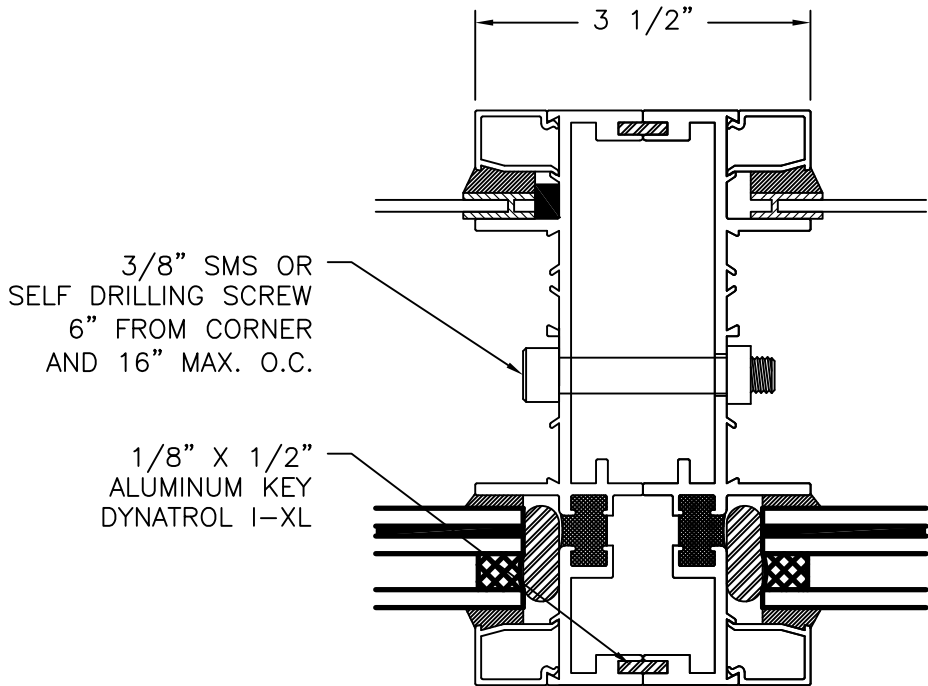
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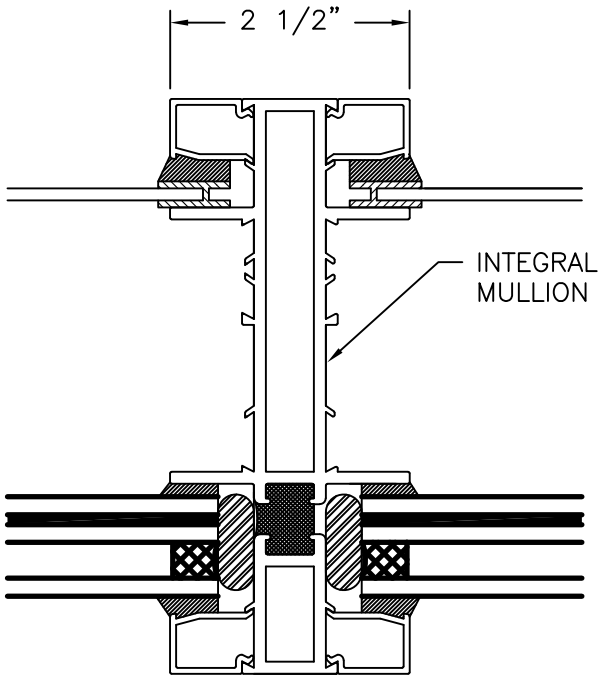
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ALUMINUM 6063-T6



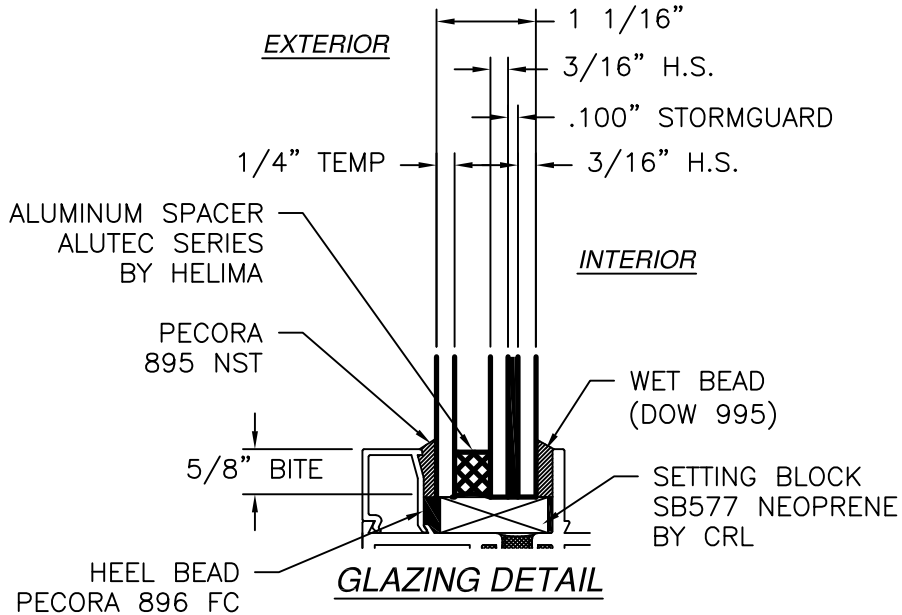
GLAZING BEAD
ALUMINUM 6063-T52



JAMB TO JAMB CONNECTION



INTEGRAL MULLION CONNECTION



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IMPACT – HVHZ
COMPONENTS AND GLAZING DETAIL

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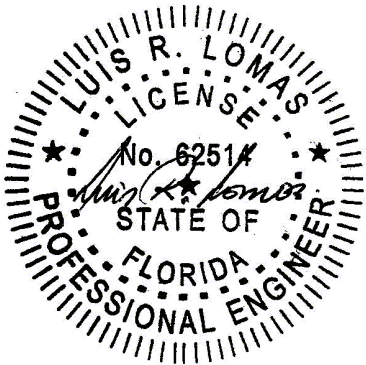
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