

# RENAISSANCE WINDOWS AND DOORS

## SERIES 8500 VINYL FIXED WINDOW

### INSTALLATION ANCHORAGE DETAILS

PROJECT # 419-0901				

RENAISSANCE WINDOWS AND DOORS 13340 INTERNATIONAL PARKWAY JACKSONVILLE, FL 32218	DRAWN BY: RJA	DATE: 12/5/19	DRAWING NO: RWD0002	SHEET: 1 OF 8
		SCALE: N.T.S.		
TITLE: SERIES 8500 VINYL FIXED WINDOW GENERAL NOTES, INSTALLATION NOTES & TABLE OF CONTENTS				
PREPARED BY: 				
PDC PRODUCT DESIGN GROUP, LLC Phone: 321.690.1788 PO BOX 520775 LONGWOOD, FL 32752 Fax: 321.690.1789 FLORIDA PROFESSIONAL ENGINEER License No. 49752 Email: info@pdc-corp.com				

**GENERAL NOTES:**

- THIS PRODUCT HAS BEEN TESTED, EVALUATED AND DESIGNED TO THE CURRENT EDITION OF THE FLORIDA BUILDING CODE. TESTING WAS CONDUCTED IN ACCORDANCE WITH AAMA/NWWDA 101/I.S.2-97 AND AAMA/WDMA/CSA 101/I.S.2/A440-05.
- THE PRODUCT DETAILS CONTAINED HEREIN ARE BASED UPON SIGNED AND SEALED TEST REPORT NO.77856.01-801-44 AND 02-46046.01 AND ASSOCIATED LABORATORY DRAWINGS BY ARCHITECTURAL TESTING, INC.
- THIS PRODUCT EVALUATION DOCUMENT IS NOT FOR USE IN THE HIGH VELOCITY HURRICANE ZONE (HVHZ).
- ADEQUACY OF THE EXISTING STRUCTURAL CONCRETE / MASONRY AND 2X FRAMING FRAMING SUBSTRATES AS A MAIN WIND FORCE RESISTING SYSTEM CAPABLE OF WITHSTANDING AND TRANSFERRING APPLIED PRODUCT LOADS TO THE FOUNDATION IS THE RESPONSIBILITY OF THE LICENSED PROFESSIONAL ENGINEER OR REGISTERED ARCHITECT ACTING AS THE DESIGN PROFESSIONAL OF RECORD FOR THE PROJECT OF INSTALLATION.
- 1X AND 2X BUCKS (WHEN USED) SHALL BE DESIGNED AND ANCHORED TO PROPERLY TRANSFER ALL LOADS TO THE STRUCTURE. BUCK DESIGN AND INSTALLATION IS THE RESPONSIBILITY OF THE LICENSED PROFESSIONAL ENGINEER OR REGISTERED ARCHITECT ACTING AS THE DESIGN PROFESSIONAL OF RECORD FOR THE PROJECT OF INSTALLATION.
- WHEN INSTALLED IN LOCATIONS WHERE WINDBORNE DEBRIS PROTECTION REQUIREMENTS EXIST, THIS PRODUCT REQUIRES OPENING PROTECTION IN ACCORDANCE WITH THE CURRENT EDITION OF THE FLORIDA BUILDING CODE USING AN APPROVED IMPACT PROTECTION DEVICE.
- SITE CONDITIONS NOT COVERED IN THIS PRODUCT EVALUATION DOCUMENT ARE SUBJECT TO ADDITIONAL ENGINEERING ANALYSIS BY A LICENSED PROFESSIONAL ENGINEER OR REGISTERED ARCHITECT AS REQUIRED BY THE AUTHORITY HAVING JURISDICTION.
- WINDOW FRAME MATERIAL: VINYL (PVC).
- GLASS MEETS THE REQUIREMENTS OF ASTM E1300-09a.
- DESIGNATION "O" STANDS FOR FIXED LITE.
- THESE DRAWINGS CERTIFY THE WINDOW INSTALLATION ONLY. WATER PROOFING OF THE INSTALLED WINDOW IS NOT PART OF THIS INSTALLATION CERTIFICATION. THAT RESPONSIBILITY SHALL BE THAT OF THE MANUFACTURER AND/OR THE INSTALLER.

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SHEET	SHEET DESCRIPTION
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4	NOMINAL 48" x 96" WINDOW ELEVATION & ANCHORING LAYOUT
5	CROSS SECTIONS - NAILING FIN INSTALLATION
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7	CROSS SECTIONS - SNAP-ON FLANGE THRU FRAME INSTALLATION
8	GLAZING DETAIL AND GLAZING NOTES /BILL OR MATERIALS

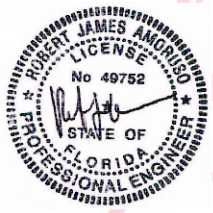
**INSTALLATION NOTES:**

- PRODUCT ANCHORS SHALL BE AS DESIGNATED AND LOCATED AS SHOWN IN THIS PRODUCT EVALUATION DOCUMENT. ANCHOR EMBEDMENT AND EDGE DISTANCE EXCLUDE WALL FINISHES, INCLUDING BUT NOT LIMITED TO STUCCO, FOAM, BRICK VENEER AND SIDING.
- SEE INSTALLATION ANCHOR SCHEDULE ON SHEET 2 FOR TYPE AND GRADE OF ANCHOR, AND/OR MANUFACTURER'S ANCHOR SPECIFICATIONS, INCLUDING MINIMUM NOMINAL SIZE, MINIMUM EMBEDMENT INTO SUBSTRATE AND MINIMUM EDGE DISTANCES.
  - EDGE DISTANCES SHALL BE MEASURED FROM CENTERLINE OF ANCHOR TO EDGE OF STRUCTURAL SUBSTRATE EITHER TO THE INTERIOR OR EXTERIOR OF THE FENESTRATION PRODUCT.
  - MINIMUM EMBEDMENT SHALL BE BASED ON PENETRATION INTO MAIN WIND FORCE RESISTING SYSTEM SUBSTRATE.
- SEE SHEETS 5 THROUGH 7 FOR SPECIFIC ANCHOR INSTALLATION DETAILS.
- ONE (1) INSTALLATION ANCHOR IS REQUIRED AT EACH ANCHOR LOCATION SHOWN.
- ANCHOR QUANTITIES AND SPACING / EMBEDMENT AND EDGE DISTANCE
  - THE NUMBER OF INSTALLATION ANCHORS IS BASED ON THE MAXIMUM END DISTANCE (ED) AND THE MAXIMUM ON CENTER (O.C.) SPACING PLACEMENT OF ANCHORS IN ACCORDANCE WITH ELEVATIONS ON SHEETS 3 AND 4.
  - END DISTANCES AND O.C. SPACINGS LESS THAN THAT SHOWN IN THE ELEVATIONS ON SHEETS 3 AND 4 ARE ACCEPTABLE.
  - FOR WINDOW SIZES SMALLER THAN THOSE SHOWN, ANCHOR QUANTITIES CAN BE REDUCED WHILE MAINTAINING EDGE DISTANCE AND O.C. SPACING REQUIREMENTS.
  - ANCHOR QUANTITIES AND SPACINGS SHOWN ARE BASED ON THE LOWER OF ANCHOR SPACING USED IN TESTING OR REQUIRED BY LOADING AT DESIGN PRESSURE.
  - SEE EMBEDMENT AND EDGE DISTANCE DESCRIPTION ON SHEET 2.
- MAXIMUM ALLOWABLE SHIM THICKNESS IS 1/4 INCH. SHIM WHERE SPACE OF 1/16 INCH OR GREATER OCCURS. SHIM(S) SHALL BE CONSTRUCTED OF WOOD COMPOSITE, HIGH DENSITY PLASTIC OR SIMILAR LOAD BEARING MATERIAL.
- FOR CONCRETE BLOCK APPLICATIONS DO NOT INSTALL INSTALLATION ANCHORS INTO MORTAR JOINTS.
- 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 IN THE INSTALLATION ANCHOR SCHEDULE ON SHEET 2.

PERFORMANCE RATING				
MAXIMUM WINDOW SIZE	ELEVATION	GLAZING DETAIL (SEE SHEET 8)	DESIGN PRESSURE (PSF)	IMPACT RATING
NOMINAL 48" x 96" (47-5/8" x 95-5/8")	SHEET 4 (NOTE 1)	A	+/- 47	NONE SEE NOTE 6
NOMINAL 48" x 93" (47-5/8" x 92-5/8")	SHEET 4 (NOTE 2)	A	+/- 50	
NOMINAL 60" x 78" (59-3/4" x 77-3/4")	SHEET 3 (NOTE 1)	B	+/- 29.7	
NOMINAL 60" x 78" (59-3/4" x 77-3/4")	SHEET 3 (NOTE 3)	A	+/-50	

NOTES:  
 1) AS-TESTED WINDOW SIZE AND GLAZING. DESIGN PRESSURES LIMITED BY GLAZING DETAIL.  
 2) REDUCED HEIGHT WINDOW SIZE TO OBTAIN TESTED DESIGN PRESSURE WITH TESTED GLAZING. ANCHOR QUANTITIES SHOWN ON SHEET 4 WILL BE MAINTAINED.  
 3) AS-TESTED WINDOW SIZE WITH ENHANCED GLAZING (UPSIZED FROM TEST) TO OBTAIN TESTED DESIGN PRESSURE.

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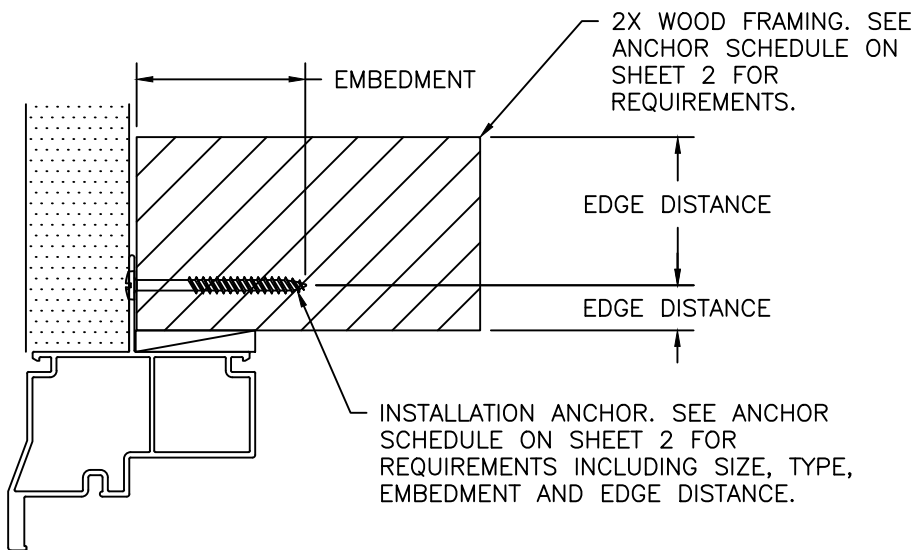
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**INSTALLATION ANCHOR SCHEDULE**

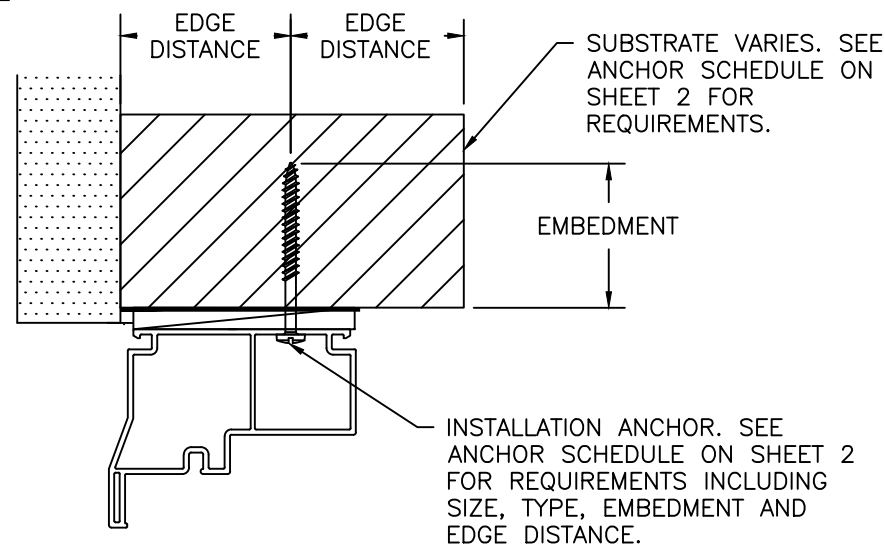
INSTALLATION TYPE	SECTION VIEW	FASTENER HEAD TYPE	FASTENER SIZE	SUBSTRATE	MANUFACTURER AND/OR SPECIFICATION	MIN. EMBEDMENT (IN)	MIN. EDGE DISTANCE (IN)	MIN. SPACING (IN) BETWEEN FRAME ANCHORS	ANCHOR CAPACITIES BASED ON
THROUGH FRAME ANCHOR	SECTION A, B & C (SHEET 6)	HEX HEAD	3/16"	CONCRETE	ITW TAPCONS (1)	1	1-1/8	3	MIN. 2000 PSI CONCRETE
				MASONRY (BLOCK/CMU)	ITW TAPCONS (1)	1	2	3	STRENGTH CONFORMANCE TO ASTM C-90, MEDIUM WEIGHT
		PAN HEAD	No. 10	WOOD	ANSI B18.6.1 (WOOD SCREW) (2) GRADE 2 EQUIVALENT ASME B18.6.4 (TAPPING SCREW) (2) GRADE 2 EQUIVALENT	1-3/8	3/4	2 1/2	WOOD WITH A MINIMUM SPECIFIC GRAVITY OF 0.42.
SNAP-ON FLANGE WITH THROUGH FRAME ANCHOR	SECTION A, B & C (SHEET 7)	PAN HEAD	No. 10	WOOD	ANSI B18.6.1 (WOOD SCREW) (2) GRADE 2 EQUIVALENT ASME B18.6.4 (TAPPING SCREW) (2) GRADE 2 EQUIVALENT	1-3/8	3/4	2 1/2	WOOD WITH A MINIMUM SPECIFIC GRAVITY OF 0.42.
					ANSI B18.6.1 (WOOD SCREW) (3) GRADE 2 EQUIVALENT ASME B18.6.4 (TAPPING SCREW) (3) GRADE 2 EQUIVALENT	1-5/8	1/4	1	WOOD WITH A MINIMUM SPECIFIC GRAVITY OF 0.42.
NAILING FIN ANCHOR	SECTION A, B & C (SHEET 5)	PAN WASHER HEAD (0.352" MIN. HEAD DIAMETER)	No. 8	WOOD	ANSI B18.6.1 (WOOD SCREW) (3) GRADE 2 EQUIVALENT ASME B18.6.4 (TAPPING SCREW) (3) GRADE 2 EQUIVALENT	1-5/8	1/4	1	WOOD WITH A MINIMUM SPECIFIC GRAVITY OF 0.42.

**NOTES:**

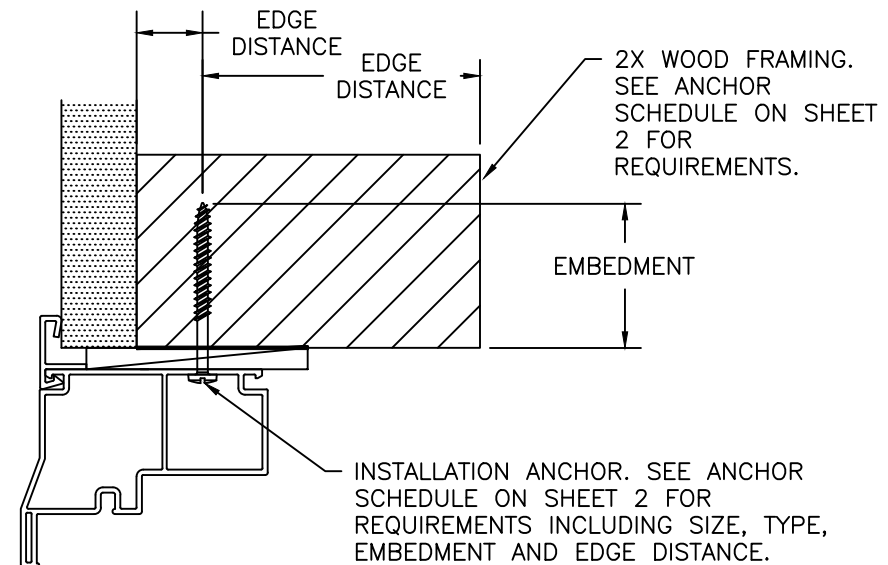
- 1) WHEN ITW TAPCONS ARE USED FOR CONCRETE/MASONRY INSTALLATION, THEY SHALL BE THE ADVANCED THREADFORM TECHNOLOGY TYPE.
- 2) FOR WOOD SCREW INSTALLATION INTO WOOD SUBSTRATE; IF SPLITTING IS A CONCERN, DRILL 0.090" PILOT HOLE (DRILL SIZE 43). FOR TAPPING SCREW INSTALLATION INTO WOOD SUBSTRATE; IF SPLITTING IS A CONCERN, DRILL 0.121" PILOT HOLE (DRILL SIZE 31).
- 3) FOR WOOD OR TAPPING SCREW INSTALLATION INTO WOOD SUBSTRATE; IF SPLITTING IS A CONCERN, DRILL 0.082" PILOT HOLE (DRILL SIZE 45).



**EMBEDMENT AND EDGE DISTANCE**  
NAILING FIN FRAME INSTALLATION



**EMBEDMENT AND EDGE DISTANCE**  
THROUGH-FRAME INSTALLATION



**EMBEDMENT AND EDGE DISTANCE**  
SNAP-ON FLANGE THROUGH-FRAME INSTALLATION

PROJECT # 419-0901

RENAISSANCE WINDOWS AND DOORS  
13340 INTERNATIONAL PARKWAY  
JACKSONVILLE, FL 32218

TITLE: ANCHOR SCHEDULE - EMBEDMENT & EDGE DISTANCE

DATE: 12/5/19

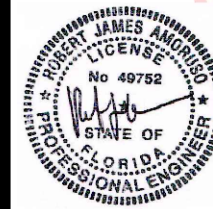
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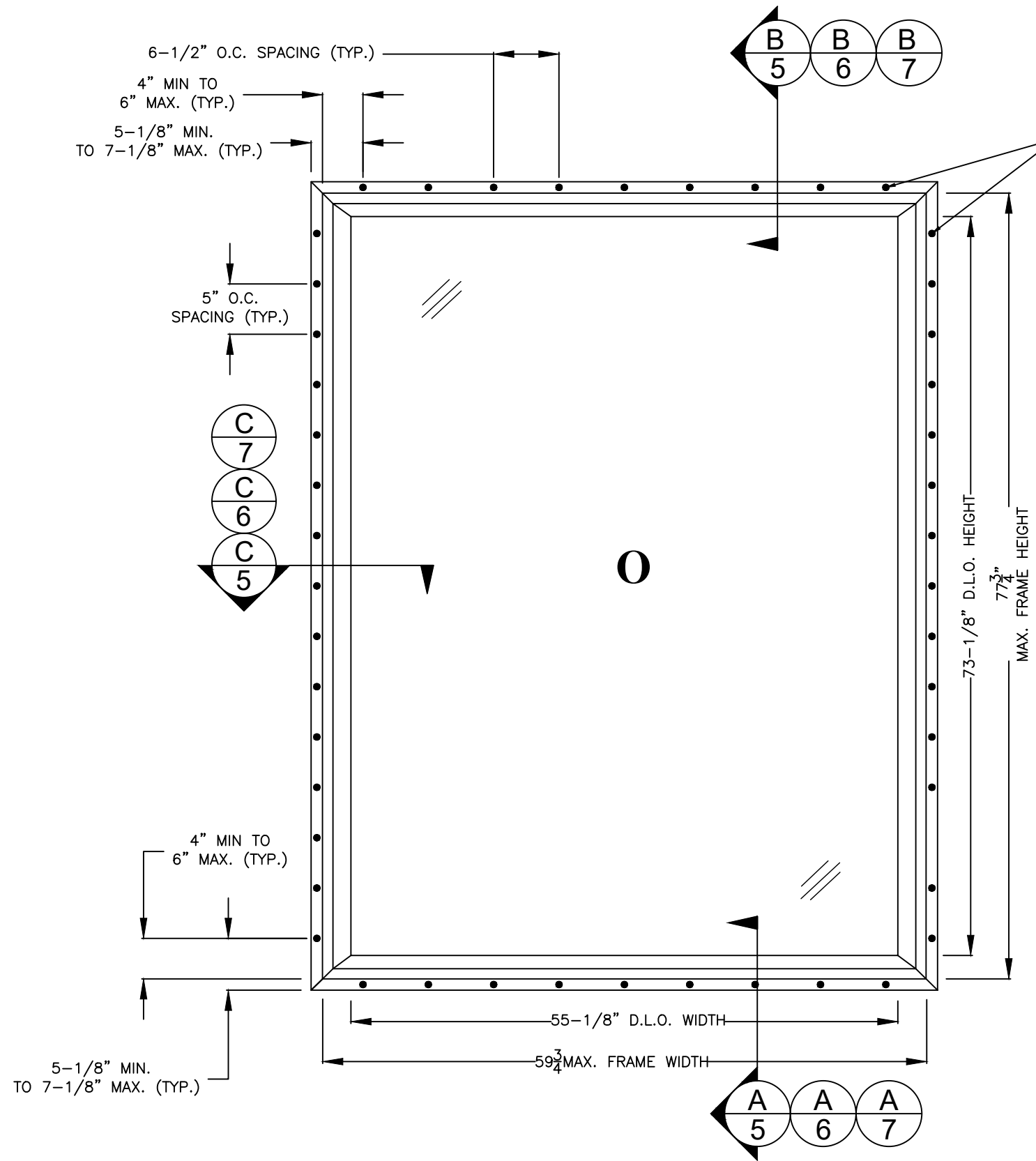
SHEET: 2 OF 8

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NAILING FIN INSTALLATION ANCHOR SHOWN. THRU-FRAME AND SNAP-ON FLANGE THRU-FRAME INSTALLATION ANCHOR QUANTITY AND SPACING SAME. SEE ANCHOR SCHEDULE ON SHEET 2.

**SERIES 8500 VINYL FIXED WINDOW**  
EXTERIOR VIEW (60" X 78" NOMINAL SIZE SHOWN)

PROJECT # 419-0901

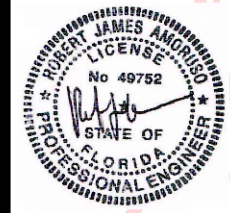
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13340 INTERNATIONAL PARKWAY  
JACKSONVILLE, FL 32218

TITLE: SERIES 8500 VINYL FIXED WINDOW  
NOMINAL 60" x 78" WINDOW ELEVATION & ANCHORING LAYOUT

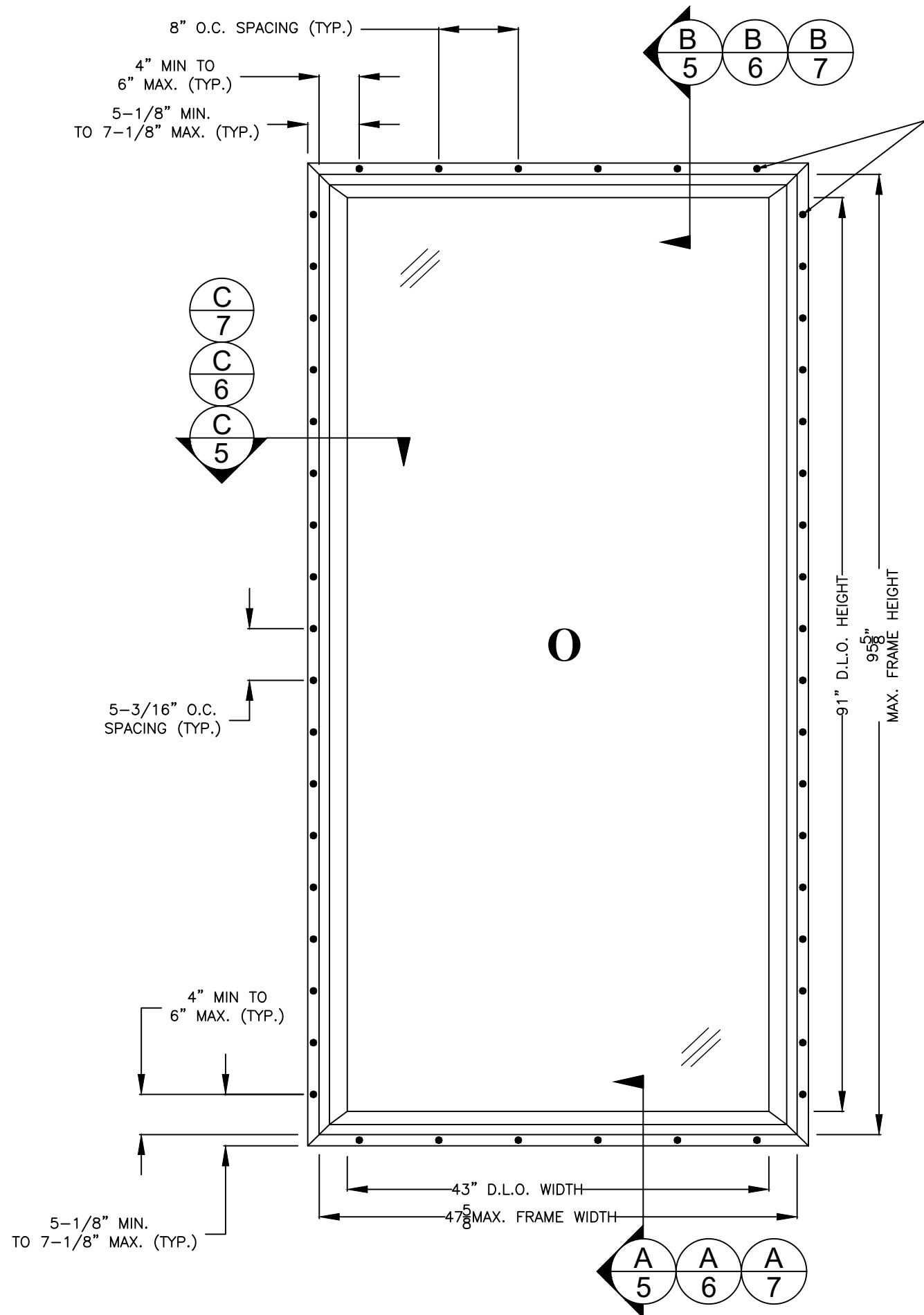
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SHEET:	3 OF 8

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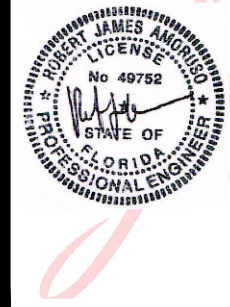


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NAILING FIN INSTALLATION ANCHOR SHOWN. THRU-FRAME AND SNAP-ON FLANGE THRU-FRAME INSTALLATION ANCHOR QUANTITY AND SPACING SAME. SEE ANCHOR SCHEDULE ON SHEET 2.

**SERIES 8500 VINYL FIXED WINDOW**  
EXTERIOR VIEW (48" X 96" NOMINAL SIZE SHOWN)



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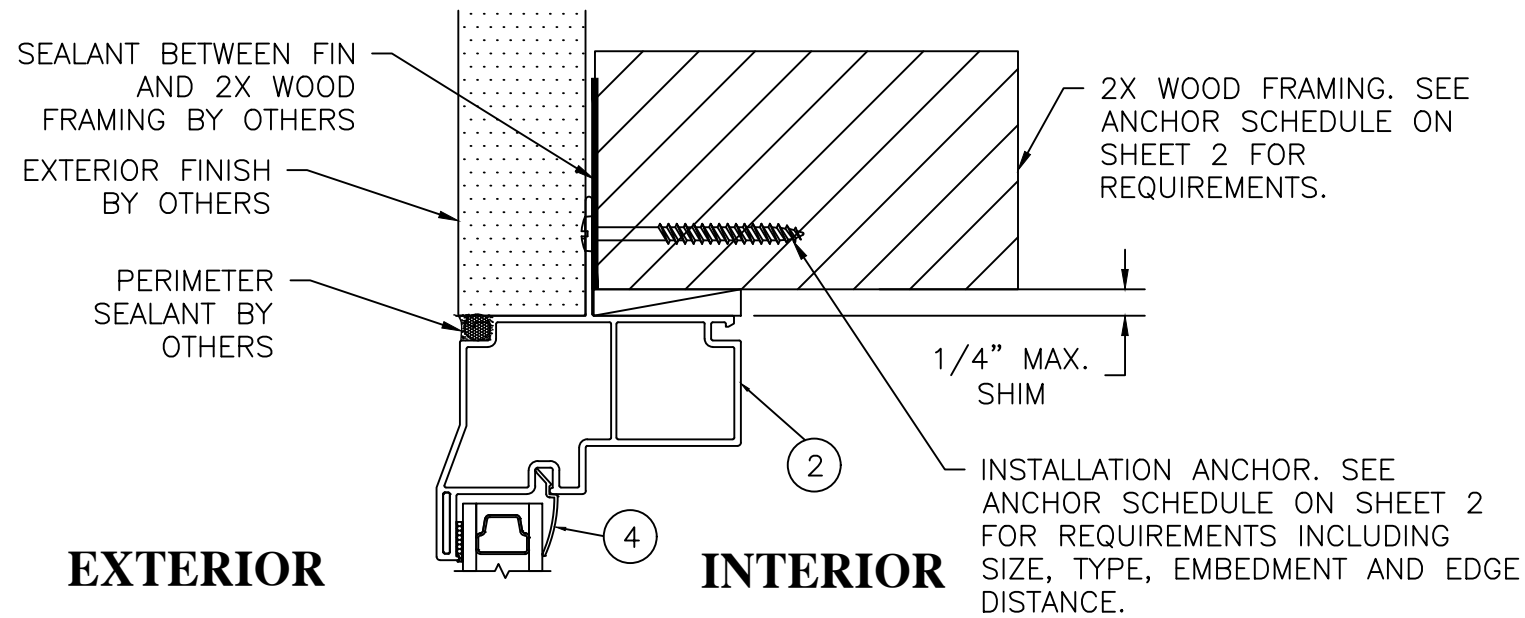
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NOMINAL 48" x 96" WINDOW ELEVATION & ANCHORING LAYOUT

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SCALE:	N.T.S.	DRAWING NO.:	RWD0002
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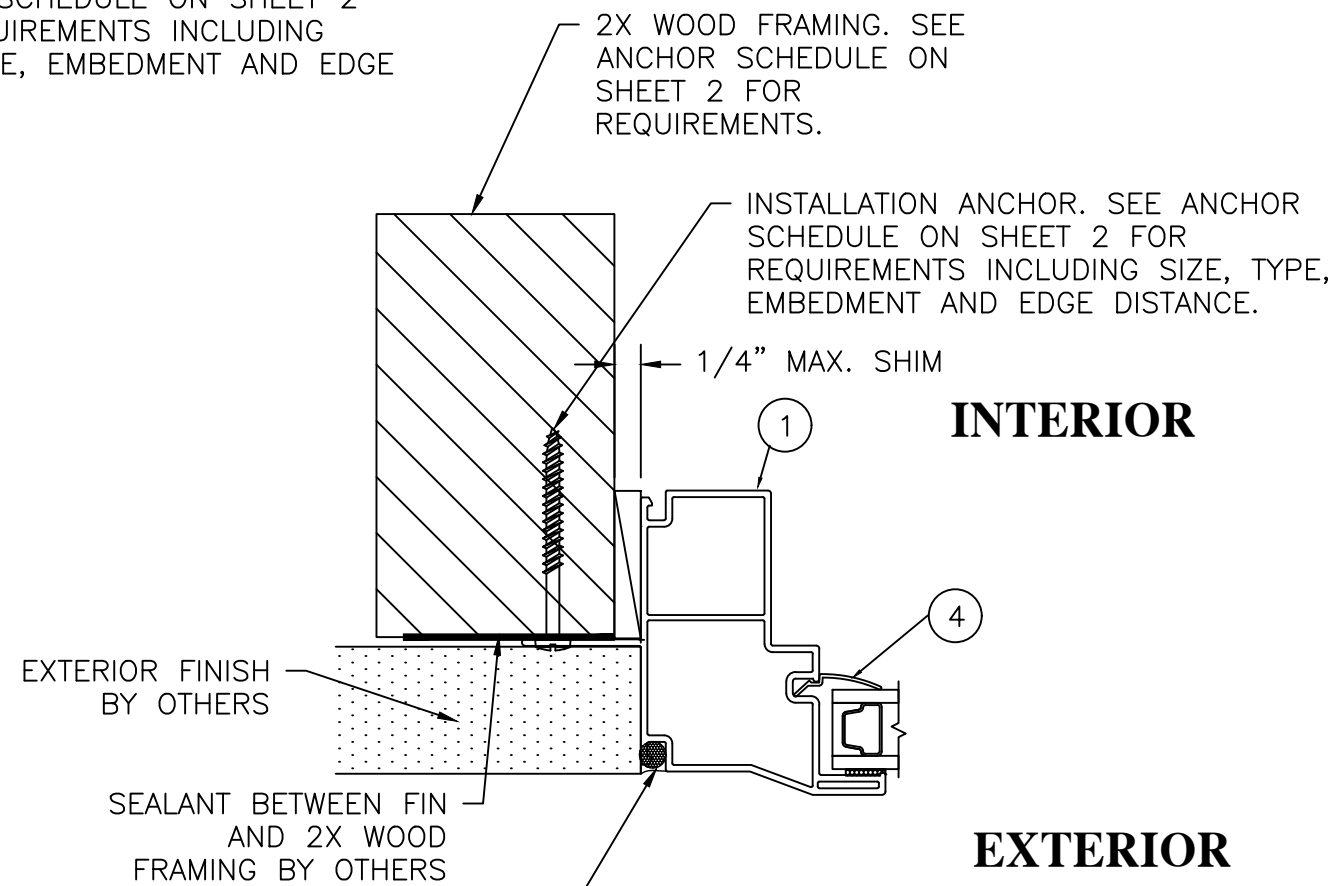
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			BY

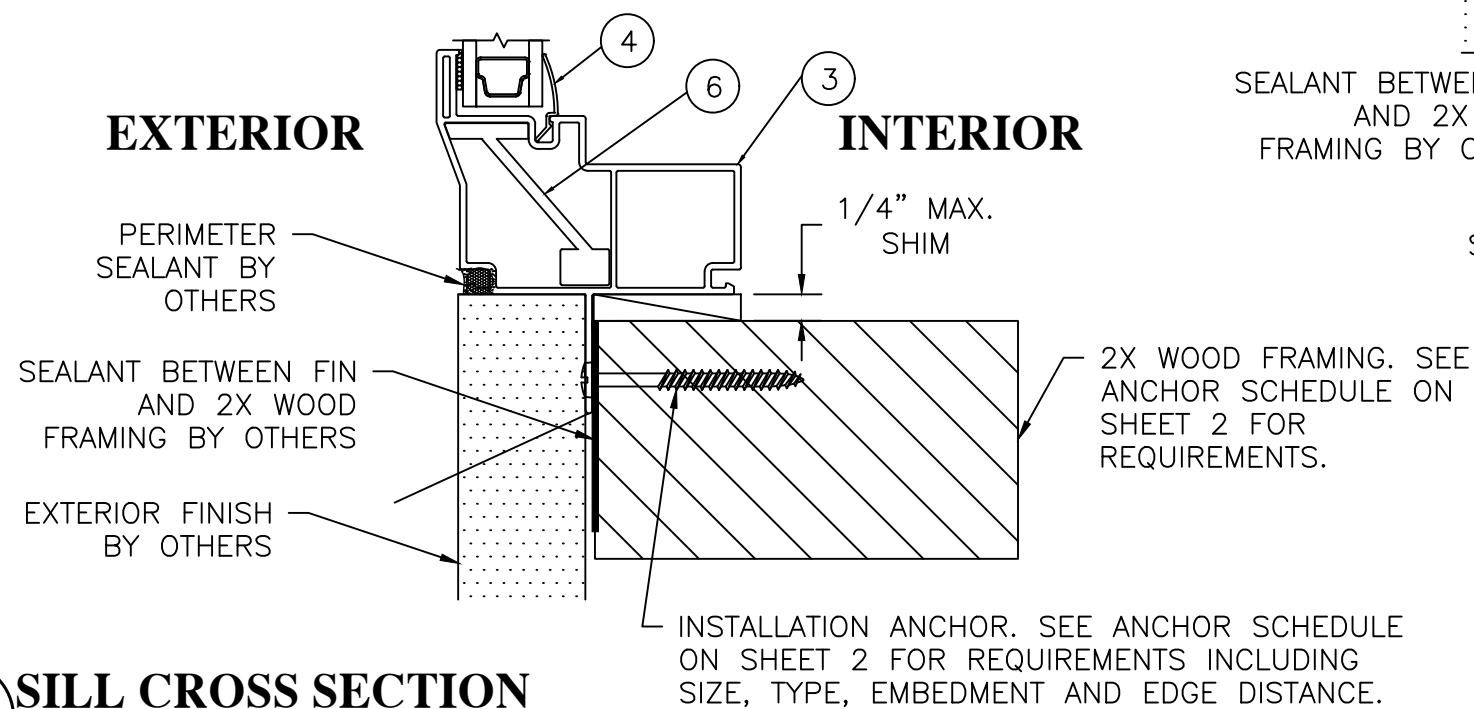




**B** HEAD CROSS SECTION  
**5** NAILING FIN FRAME INSTALLATION



**C** JAMB CROSS SECTION  
**5** NAILING FIN FRAME INSTALLATION



**A** SILL CROSS SECTION  
**5** NAILING FIN FRAME INSTALLATION

PROJECT # 419-0901

RENAISSANCE WINDOWS AND DOORS  
 13340 INTERNATIONAL PARKWAY  
 JACKSONVILLE, FL 32218

TITLE: SERIES 8500 VINYL FIXED WINDOW CROSS SECTIONS - NAILING FIN INSTALLATION

DATE: 12/5/19

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SCALE: N.T.S.

REV: First Issue

DESCRIPTION: RWD0002

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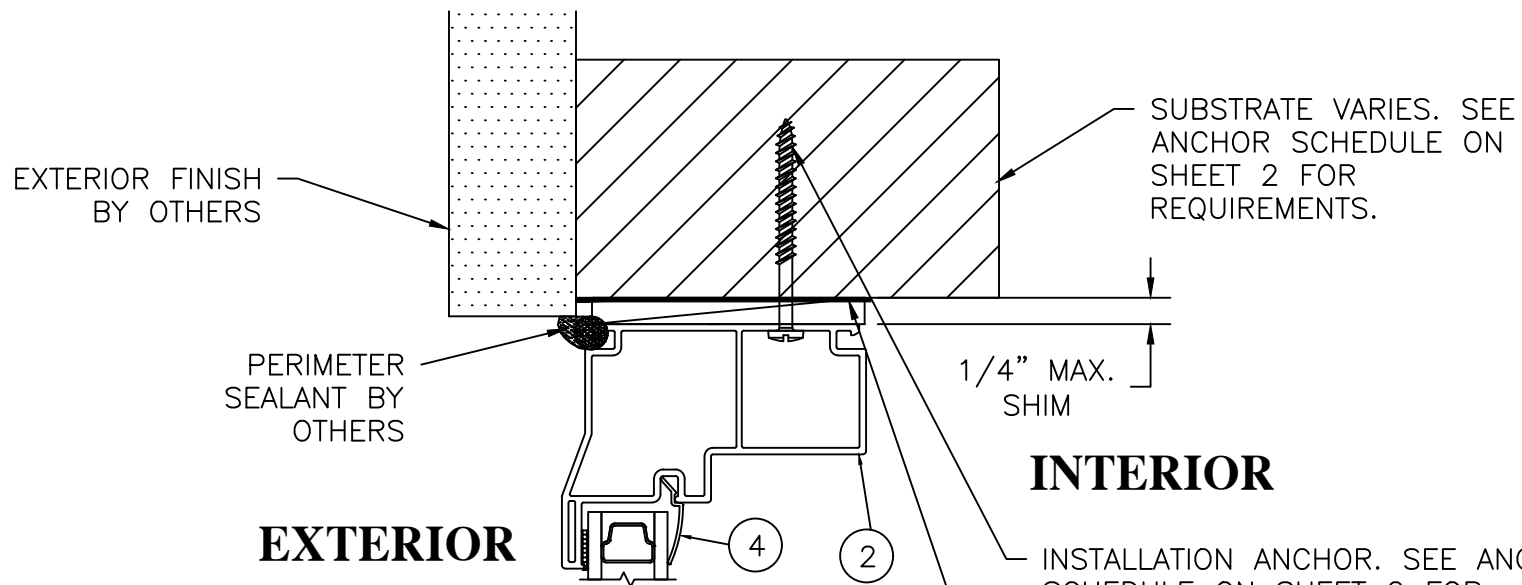
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**EXTERIOR**

**INTERIOR**

**B HEAD CROSS SECTION**  
6 THROUGH-FRAME INSTALLATION

INSTALLATION ANCHOR. SEE ANCHOR SCHEDULE ON SHEET 2 FOR REQUIREMENTS INCLUDING SIZE, TYPE, EMBEDMENT AND EDGE DISTANCE.

SEALANT BETWEEN FRAME AND SUBSTRATE BY OTHERS

SUBSTRATE VARIES. SEE ANCHOR SCHEDULE ON SHEET 2 FOR REQUIREMENTS.

INSTALLATION ANCHOR. SEE ANCHOR SCHEDULE ON SHEET 2 FOR REQUIREMENTS INCLUDING SIZE, TYPE, EMBEDMENT AND EDGE DISTANCE.

SEALANT BETWEEN FRAME AND SUBSTRATE BY OTHERS

1/4" MAX. SHIM

**INTERIOR**

**EXTERIOR**

**INTERIOR**

PERIMETER SEALANT BY OTHERS

1/4" MAX. SHIM

SEALANT BETWEEN FRAME AND SUBSTRATE BY OTHERS

EXTERIOR FINISH BY OTHERS

SUBSTRATE VARIES. SEE ANCHOR SCHEDULE ON SHEET 2 FOR REQUIREMENTS.

INSTALLATION ANCHOR. SEE ANCHOR SCHEDULE ON SHEET 2 FOR REQUIREMENTS INCLUDING SIZE, TYPE, EMBEDMENT AND EDGE DISTANCE.

**A SILL CROSS SECTION**  
6 THROUGH-FRAME INSTALLATION

EXTERIOR FINISH BY OTHERS

PERIMETER SEALANT BY OTHERS

**EXTERIOR**

**C JAMB CROSS SECTION**  
6 THROUGH-FRAME INSTALLATION

PROJECT # 419-0901

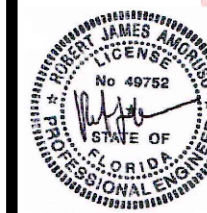
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JACKSONVILLE, FL 32218

TITLE: SERIES 8500 VINYL FIXED WINDOW CROSS SECTIONS - THRU FRAME INSTALLATION

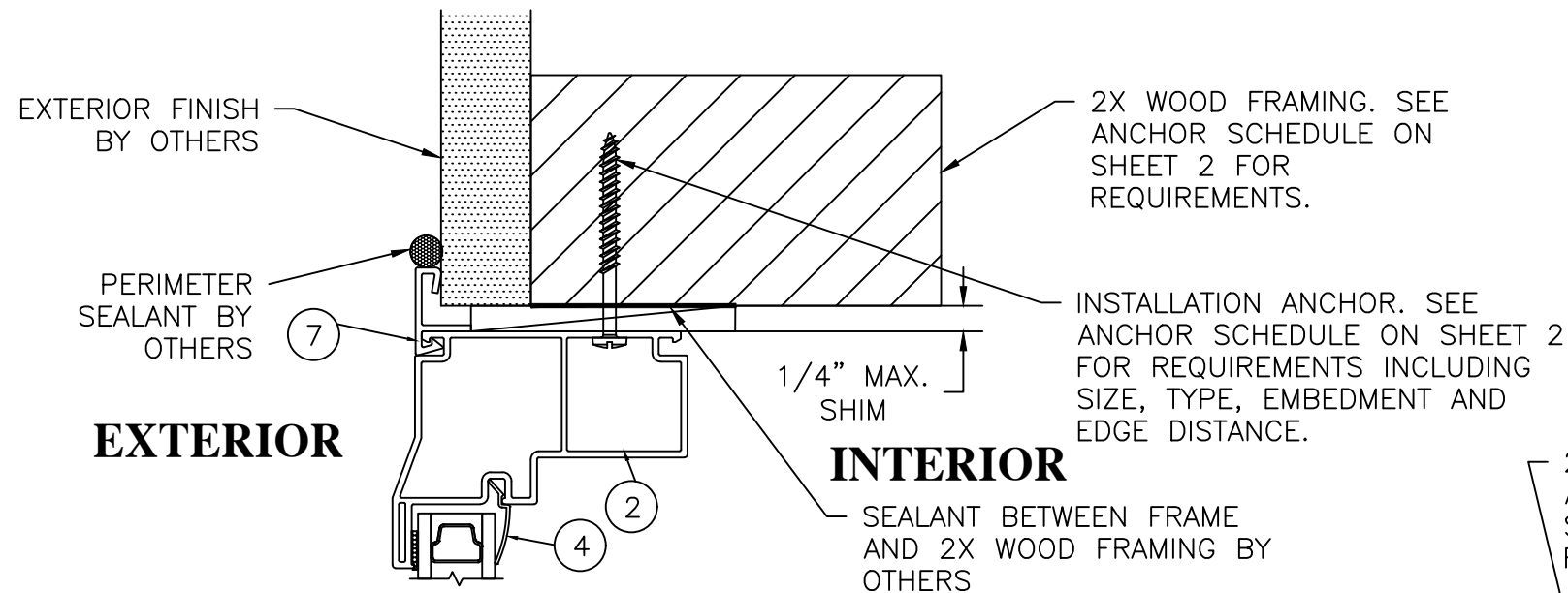
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PREPARED BY:	First Issue
DRAWN BY:	RJA

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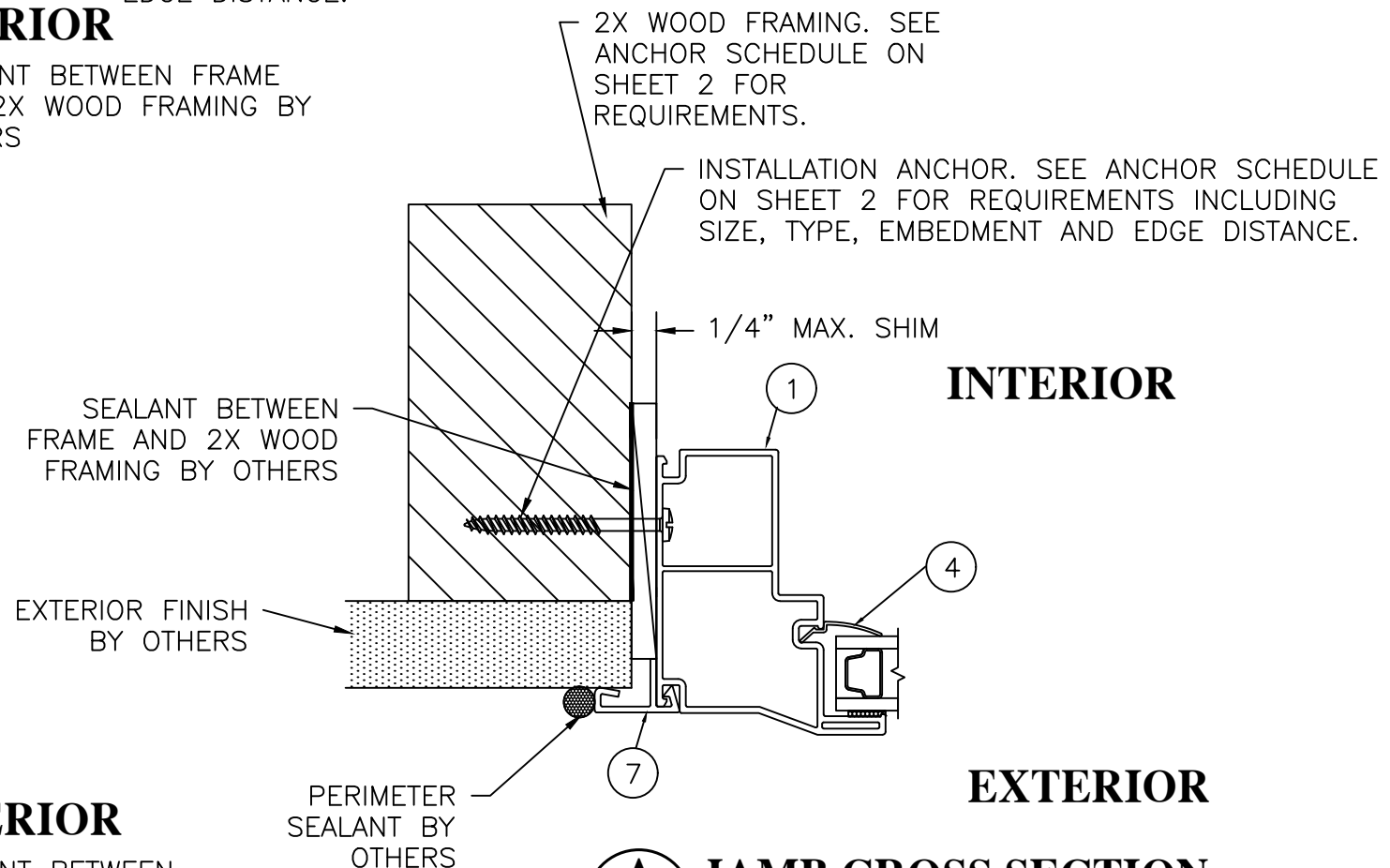


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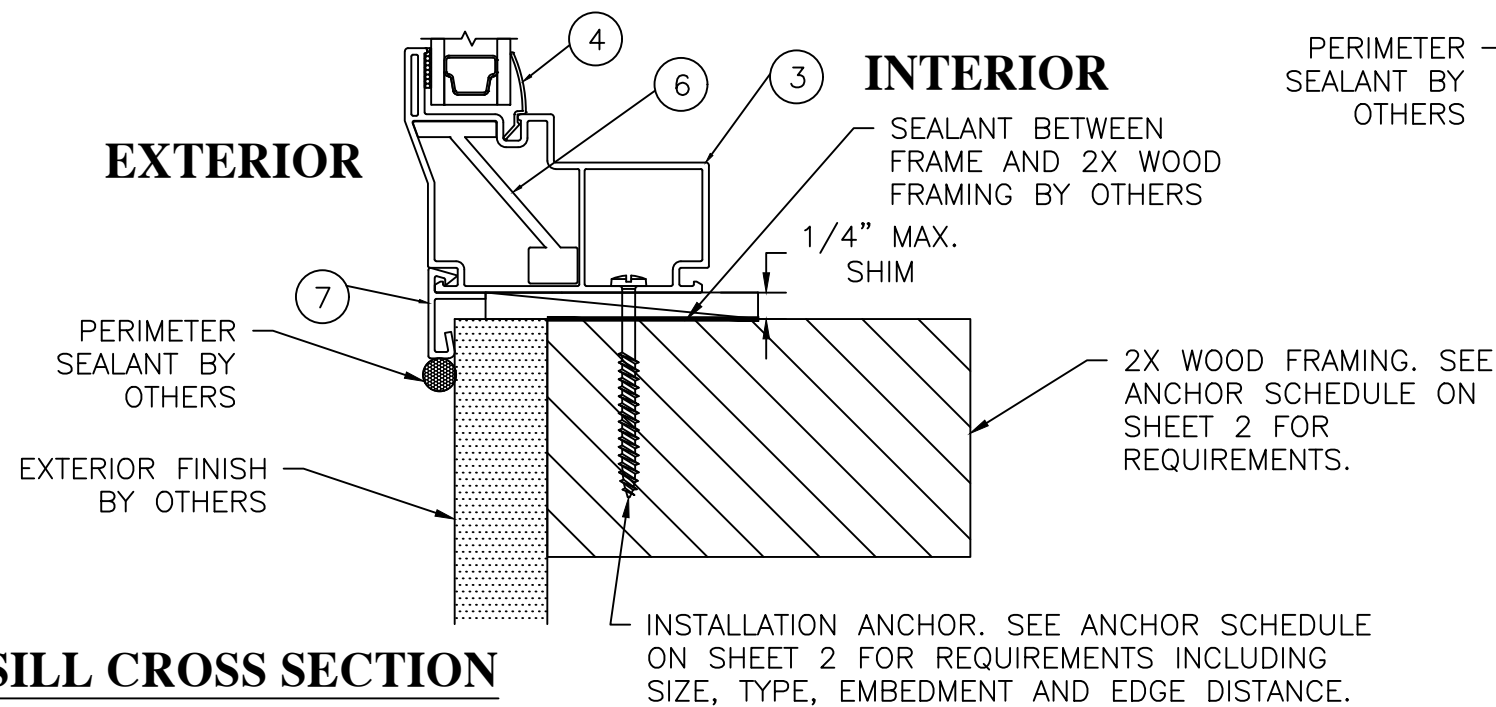
**A**  
**7**

**HEAD CROSS SECTION**  
SNAP-ON FLANGE  
THROUGH-FRAME INSTALLATION



**A**  
**7**

**JAMB CROSS SECTION**  
SNAP-ON FLANGE  
THROUGH-FRAME INSTALLATION



**A**  
**7**

**SILL CROSS SECTION**  
SNAP-ON FLANGE  
THROUGH-FRAME INSTALLATION

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RENAISSANCE WINDOWS AND DOORS  
13340 INTERNATIONAL PARKWAY  
JACKSONVILLE, FL 32218

TITLE: SERIES 8500 VINYL FIXED WINDOW  
CROSS SECTIONS - SNAP-ON FLANGE THRU FRAME INSTALL.

PREPARED BY: RJA

DATE: 12/5/19

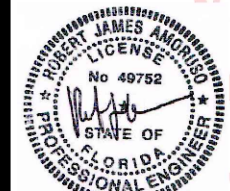
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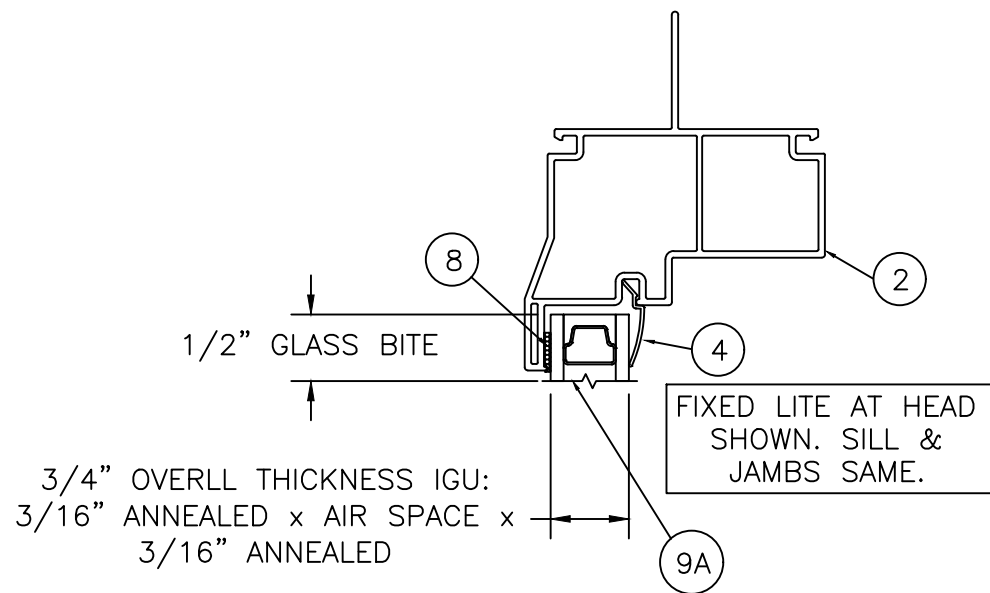
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REVISIONS: 7 OF 8

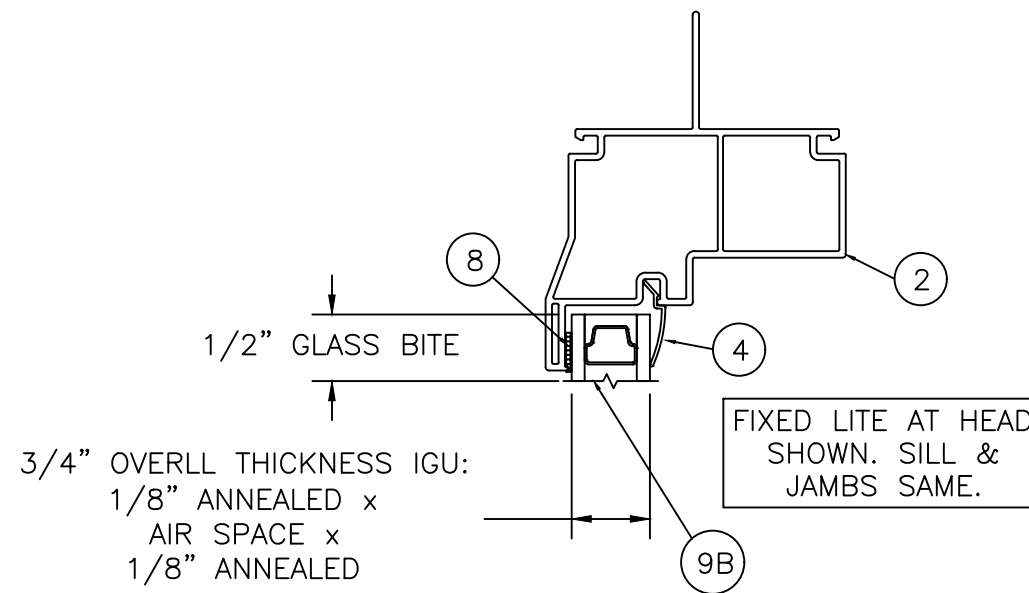
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**GLAZING DETAIL A**



**GLAZING DETAIL B**

**NOTES:**

1. A MINIMUM OF TWO (2) NEOPRENE SETTING BLOCKS WITH 70 TO 90 SHORE A DUROMETER HARDNESS ARE REQUIRED AT BOTTOM (SILL) OF GLAZING LITES MORE THAN 3 FEET IN WIDTH.
2. AS-TESTED IGU SYSTEM SHOWN. OTHER SUBSTITUTES ARE ALLOW WHILE MAINTAINING INDIVIDUAL LITE THICKNESS AND TEMPER. SEE SHEET 1 FOR DETAILS RELATED TO WINDOW SIZE / GLAZING DETAIL / DESIGN PRESSURE.

BOM NO.	PART NO.	DESCRIPTION	REMARKS
1	7868	JAMB	PVC
2	7868	HEAD	PVC
3	7868	SILL	PVC
4	6177	GLAZING BEAD	PVC
5	6555	SETTING BLOCK	NOT SHOWN
6		REINFORCEMENT	SEE NOTE 1
7	8461	SNAP-ON FLANGE	PVC
<b>GLAZING</b>			
8		WET GLAZING COMPOUND	SILICONE
9A	GLAZING DETAIL A	3/4" OVERLL THICKNESS IGU 3/16" ANNEALED X AIR SPACE X 3/16" ANNEALED	
9B	GLAZING DETAIL B	3/4" OVERLL THICKNESS IGU 1/8" ANNEALED X AIR SPACE X 1/8" ANNEALED	

**NOTES:**

1) ITEM NO. 6 REINFORCEMENT ONLY REQUIRED ON WINDOWS EXCEEDING 77-3/4" IN HEIGHT.

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13340 INTERNATIONAL PARKWAY  
JACKSONVILLE, FL 32218

TITLE: SERIES 8500 VINYL FIXED WINDOW  
GLAZING DETAILS AND NOTES / BILL OF MATERIALS

DATE:	12/5/19
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REV:	8 OF 8
REV:	First Issue

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