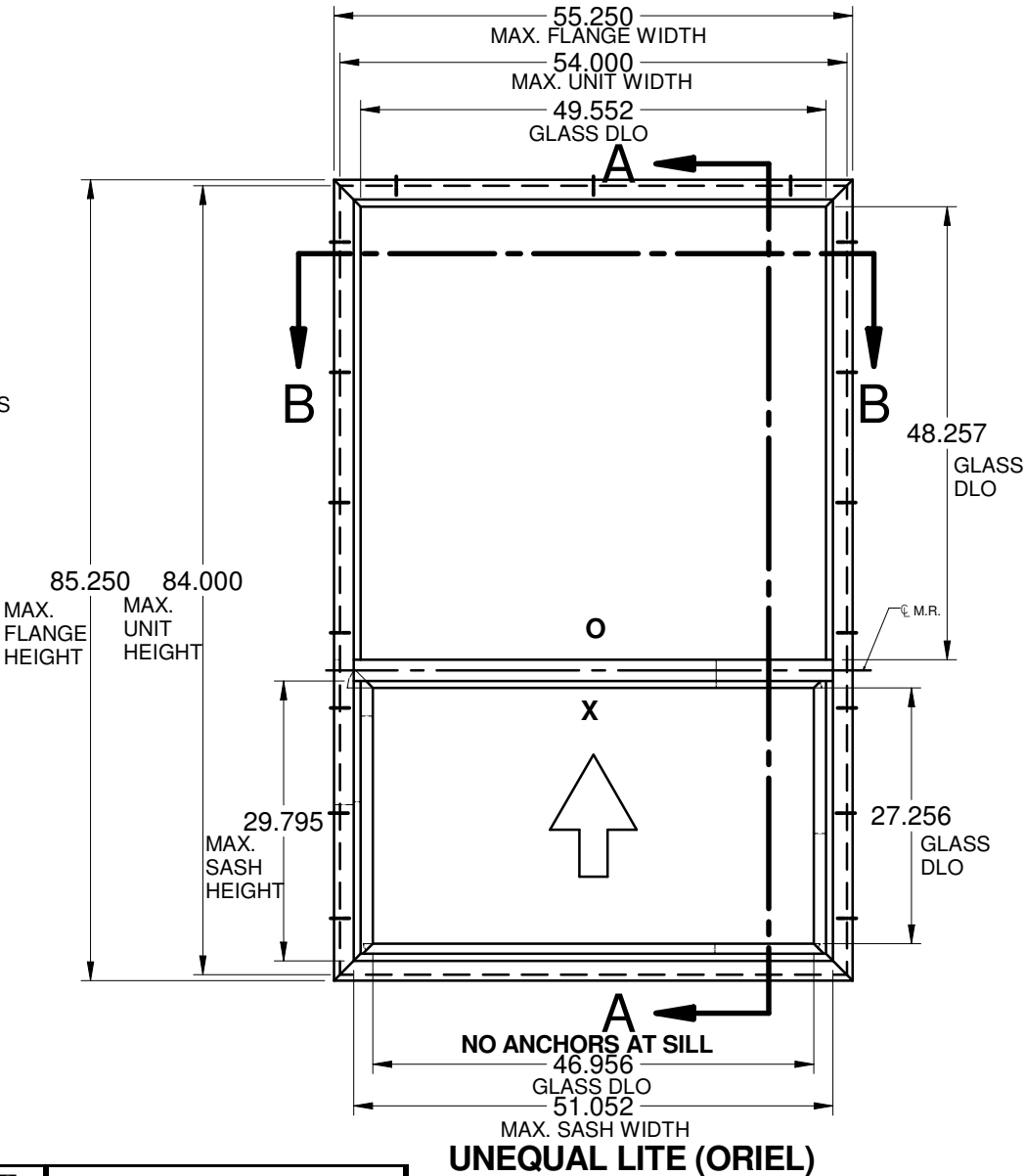
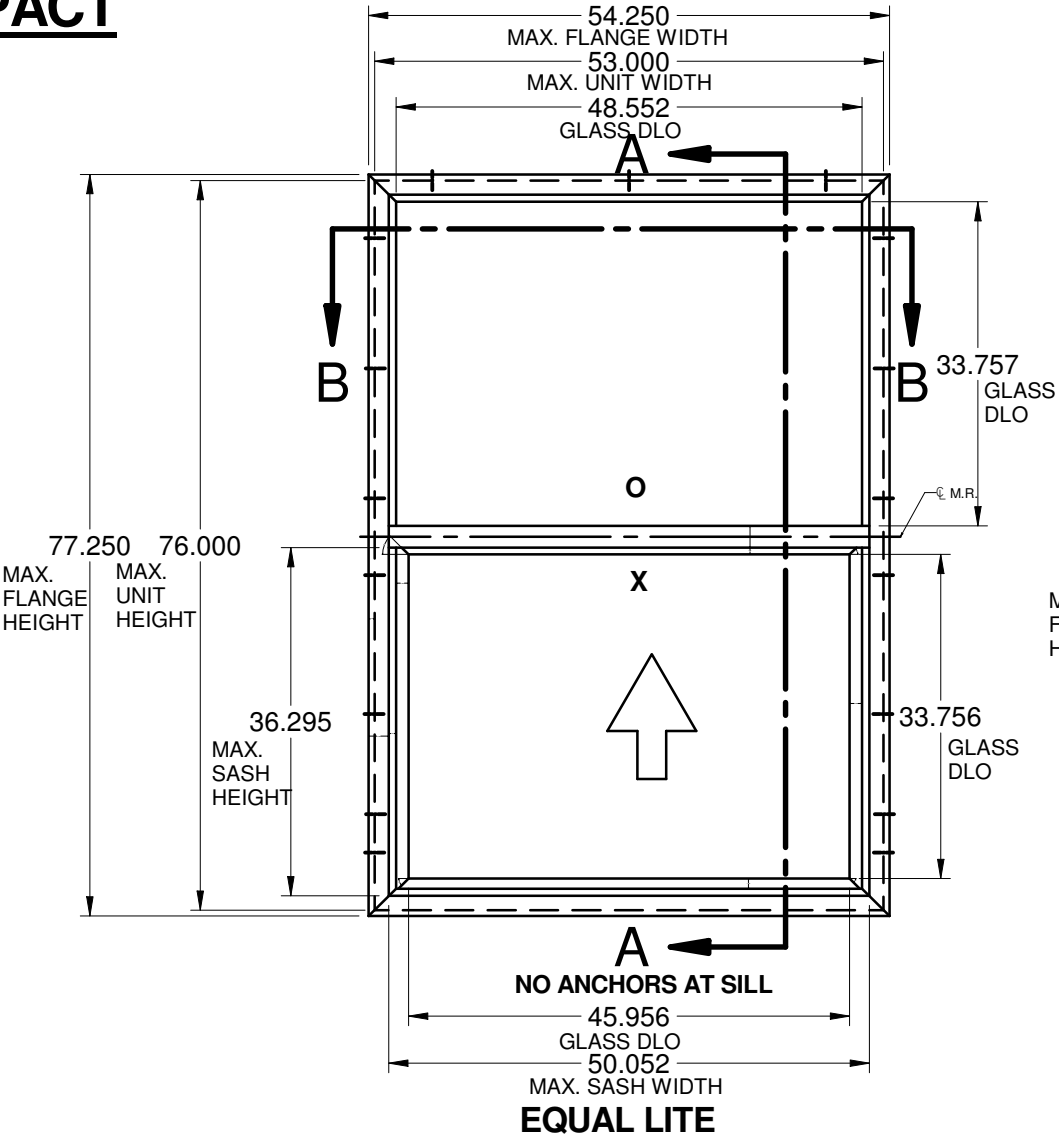
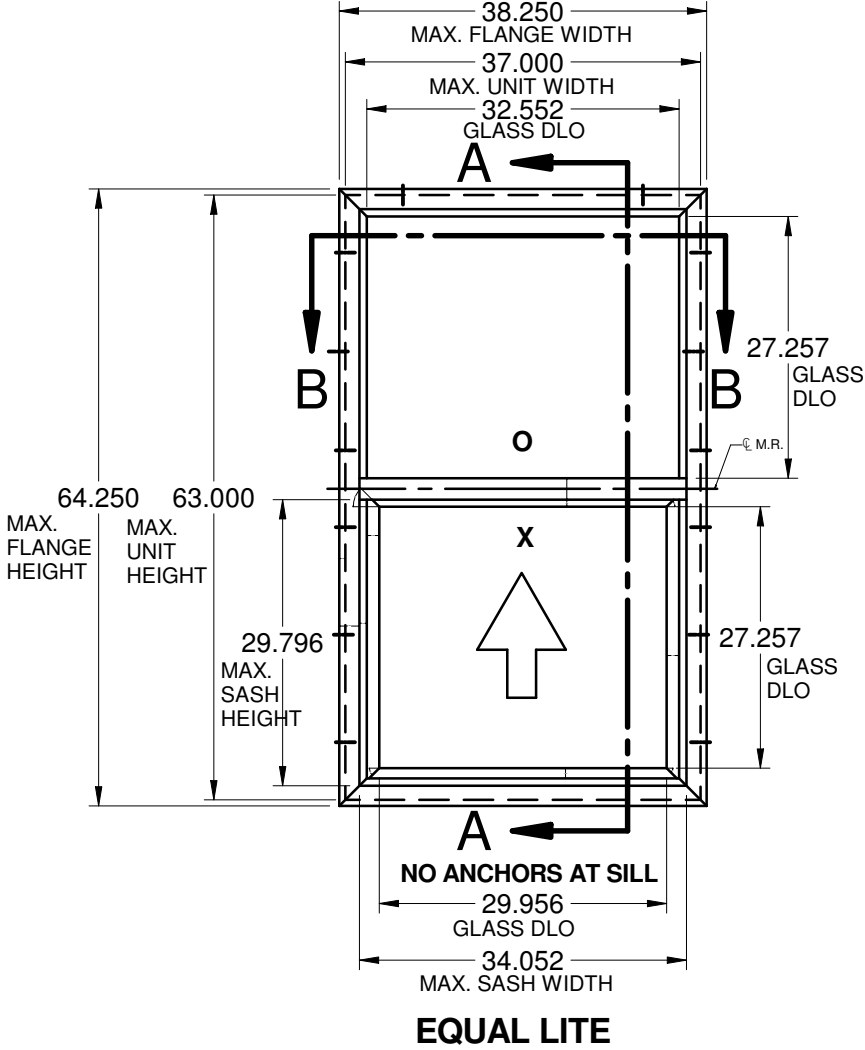


SINGLE HUNG - LARGE MISSILE IMPACT



GENERAL NOTES:

- 1.) THE PRODUCT SHOWN HEREIN IS DESIGNED AND MANUFACTURED TO COMPLY WITH THE FLORIDA BUILDING CODE (FBC),CURRENT EDITION INCLUDING THE HIGH VELOCITY HURRICANE ZONE (HVHZ).
- 2.) GLAZING OPTIONS: (SEE SHT. 4)
- 3.) CONFIGURATIONS: "O/X"
- 4.) DESIGN PRESSURE RATING:
-NEGATIVE DESIGN LOADS BASED ON TESTED PRESSURE AND GLASS TABLES ASTM E-1300-04/09.
-POSITIVE DESIGN LOADS BASED ON TESTED PRESSURE, WATER INFILTRATIONTEST RESSURE AND ASTM E-1300-04/09.
- 5.) ANCHORAGE: THE 33 1/3% STRESS INCREASE HAS NOT BEEN USED IN THE DESIGN OF THIS PRODUCT. SEE SHEET 10 FOR ANCHOR DETAILS. WINDLOAD DURATION FACTOR Cd=1.6 WAS USED FOR WOOD ANCHOR CALCULATIONS.
- 6.) THIS PRODUCT IS IMPACT RESISTANT. IMPACT PROTECTIVE SYSTEM IS NOT REQUIRED IN WINDBORNE DEBRIS REGIONS, INCLUDING HIGH VELOCITY HURRICANE ZONE (HVHZ).
- 7.) ALL FRAMES AND VENTS FULLY WELDED. SMALL JOINT SEALANT USED AT FIXED MEETING RAIL AND JAMB.
- 8.) SERIES / MODEL DESIGNATION: SH-1150.
- 9.) THE DESIGNATION "X" OR "O" STAND FOR THE FOLLOWING:
"X" = OPERABLE SASH, "O" = FIXED.
- 10.) SECTION CALLOUTS APPLY TO ALL ELEVATIONS IN A SIMILAR LOCATION.

MAX. UNIT SIZE	DESIGN PRESSURE RATING	IMPACT RATING
37" x 63"	+ 70.0 / - 70.0 PSF	LARGE MISSILE
53" x 76"	+ 65.0 / - 65.0 PSF	LARGE MISSILE
54" x 84"	+ 50.0 / - 50.0 PSF	LARGE MISSILE

TABLE OF CONTENTS:

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INSTALLATION DETAILS, FIN.....	10

Lucas Turner
2020.10.01
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LUCAS A. TURNER, FL. P.E. 58201

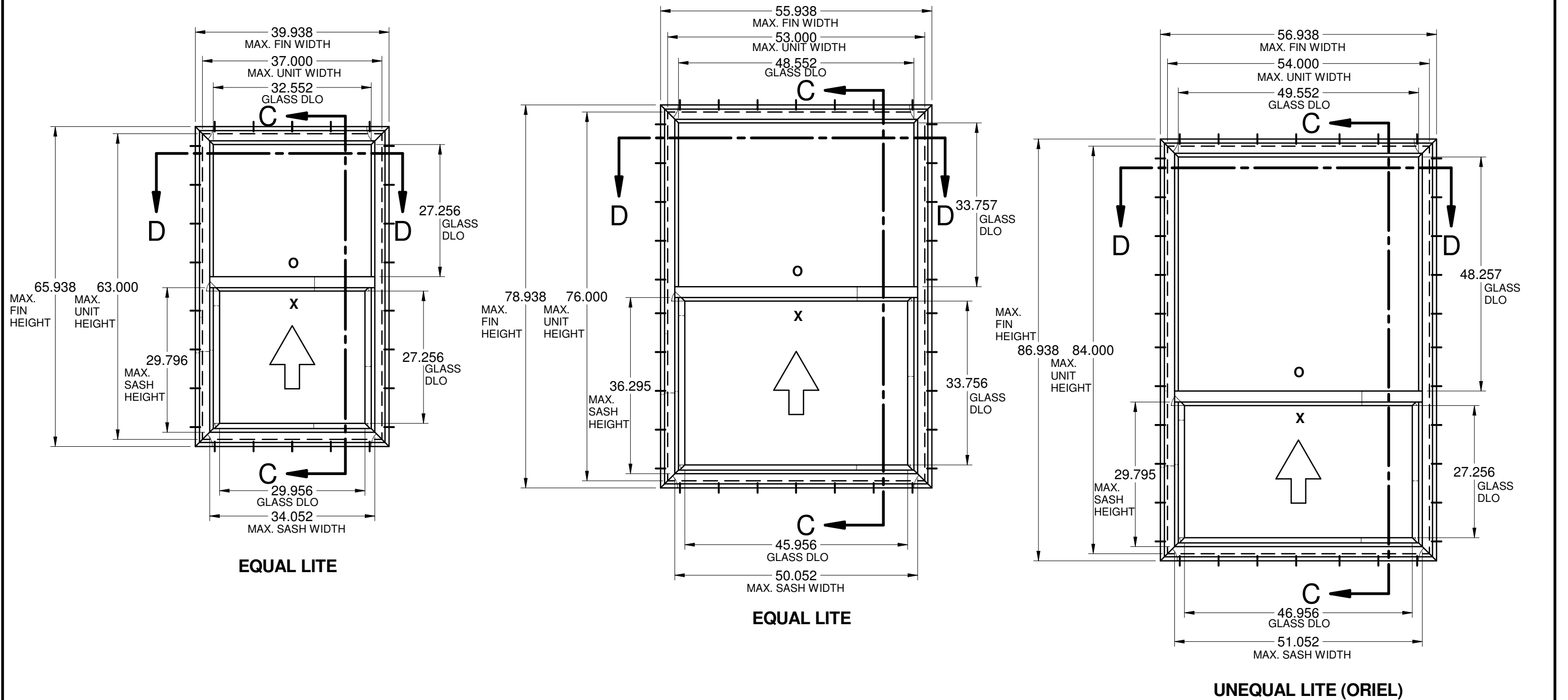
ZZ
10/1/2020
Lucas A. Turner, FLPE #58201
Turner Eng. & Cons., Inc.
FBPE COA #29779
2428 Old Natchez Trc. Trl.
Camden, TN 38320
Ph. 941-380-1574



8501 N. W. 90th Street
Medley, FL 33166

TITLE: GENERAL NOTES & FLANGE ELEVATIONS

SERIES: SH-1150	DRAWN BY: MCL	DATE: 05/29/2019
MODEL:	SCALE: N.T.S.	DWG. NO. L-1150-1901
	REV. LETTER:	SHEET SHT 1 of 10



MAX. UNIT SIZE	DESIGN PRESSURE RATING	IMPACT RATING
37" x 63"	+ 70.0 / - 70.0 PSF	LARGE MISSILE
53" x 76"	+ 65.0 / - 65.0 PSF	LARGE MISSILE
54" x 84"	+ 50.0 / - 50.0 PSF	LARGE MISSILE



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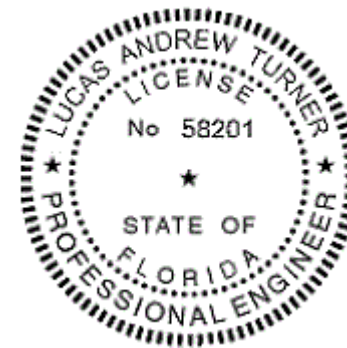
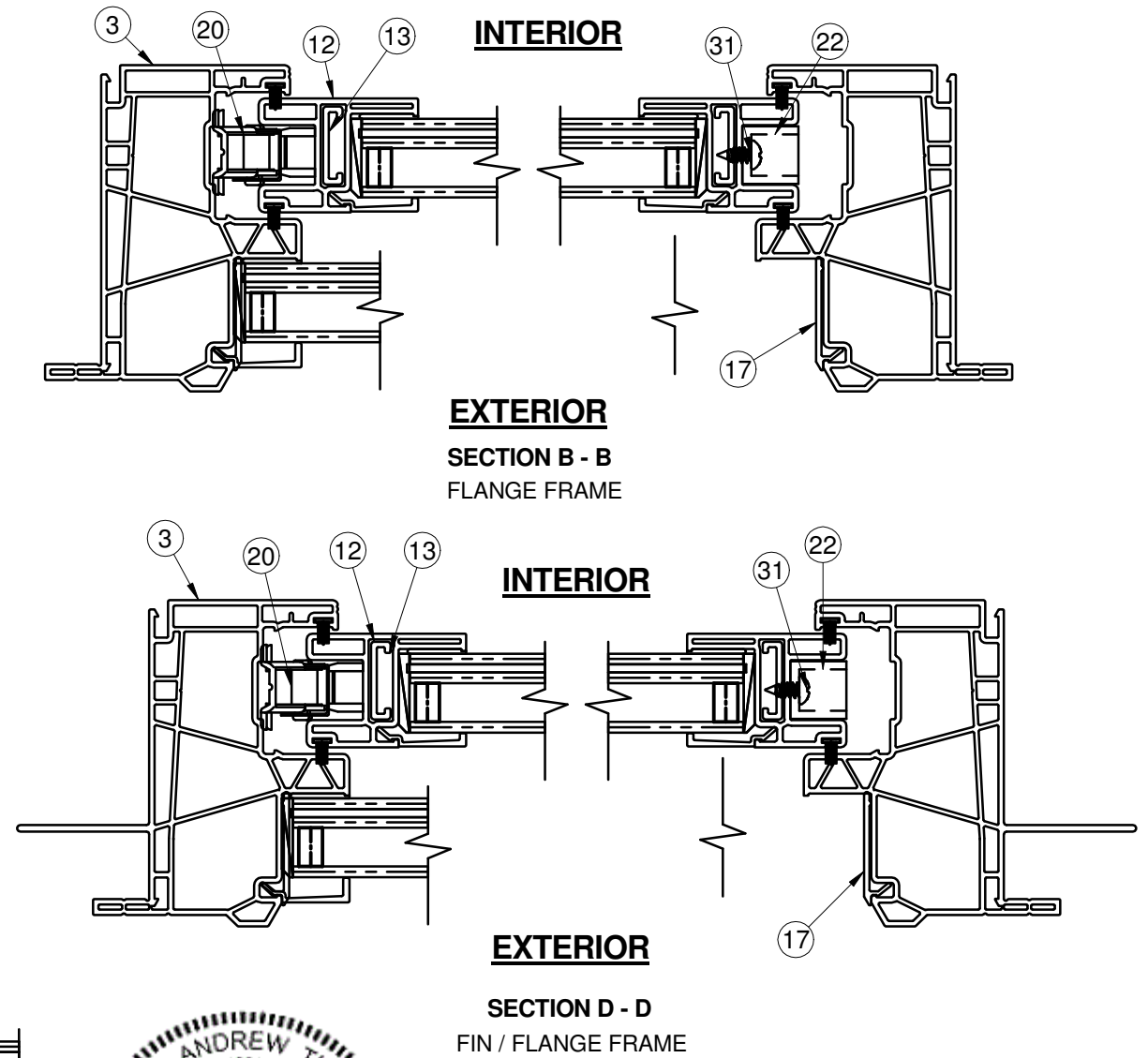
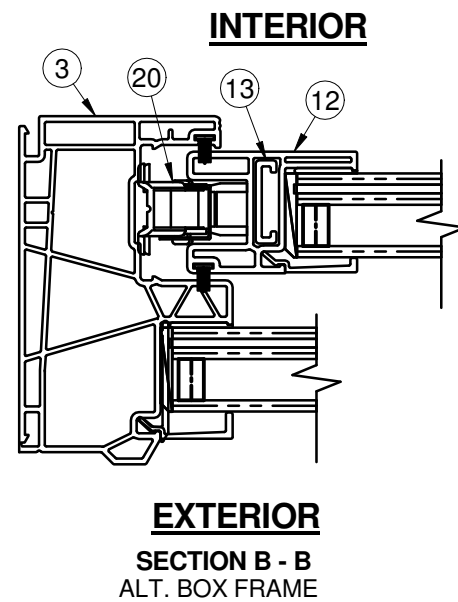
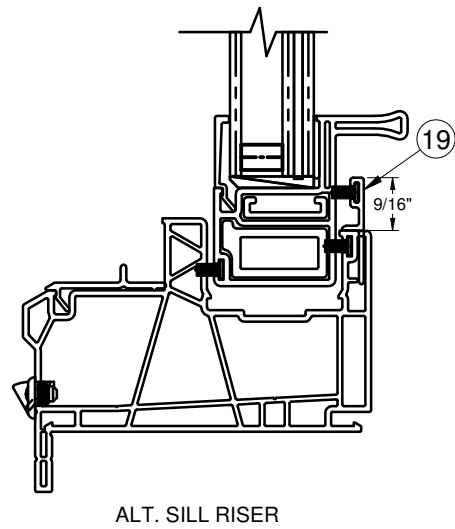
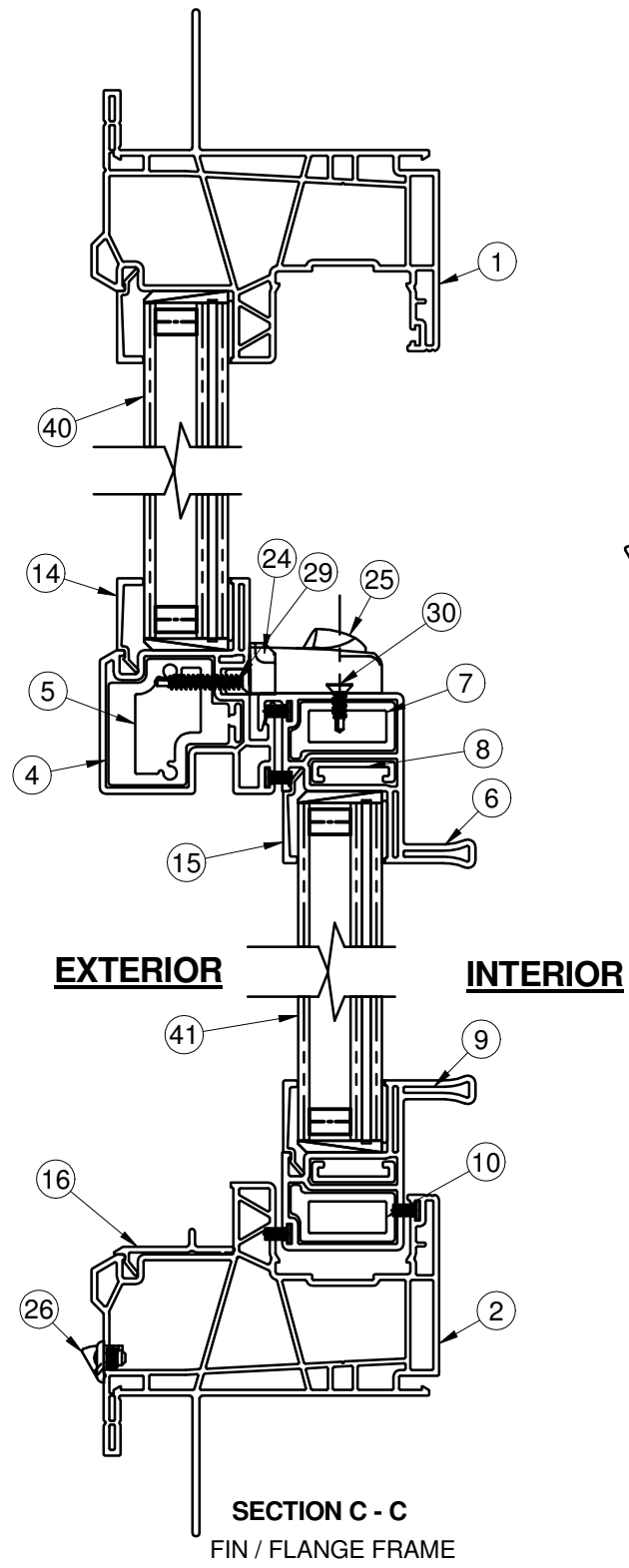
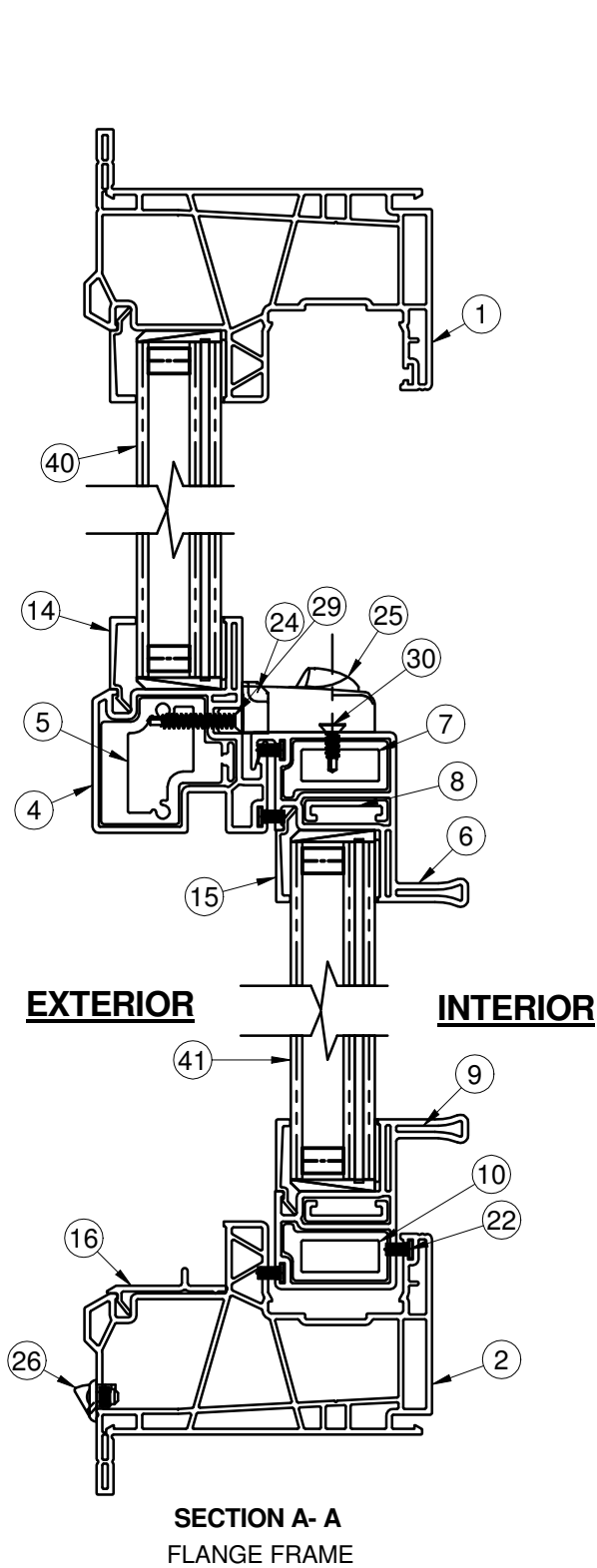


LAWSON
INDUSTRIES, INC.

8501 N. W. 90th Street
 Medley, FL 33166

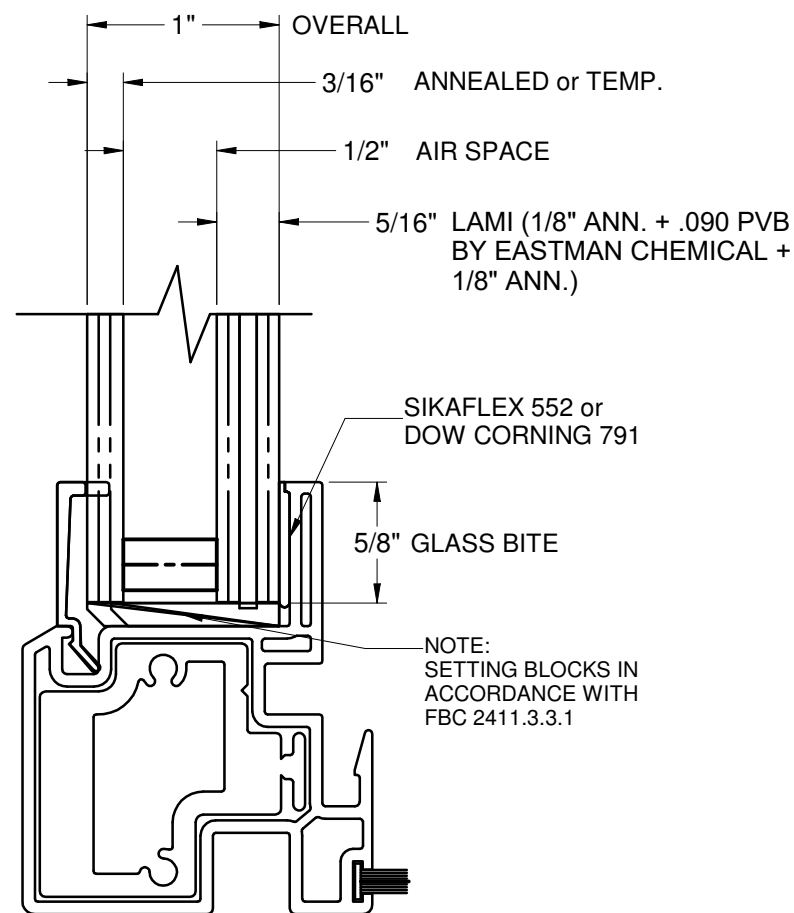
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MODEL:	SCALE: N.T.S.	DWG. NO. L-1150-1901
	REV. LETTER:	SHEET SHT 2 of 10

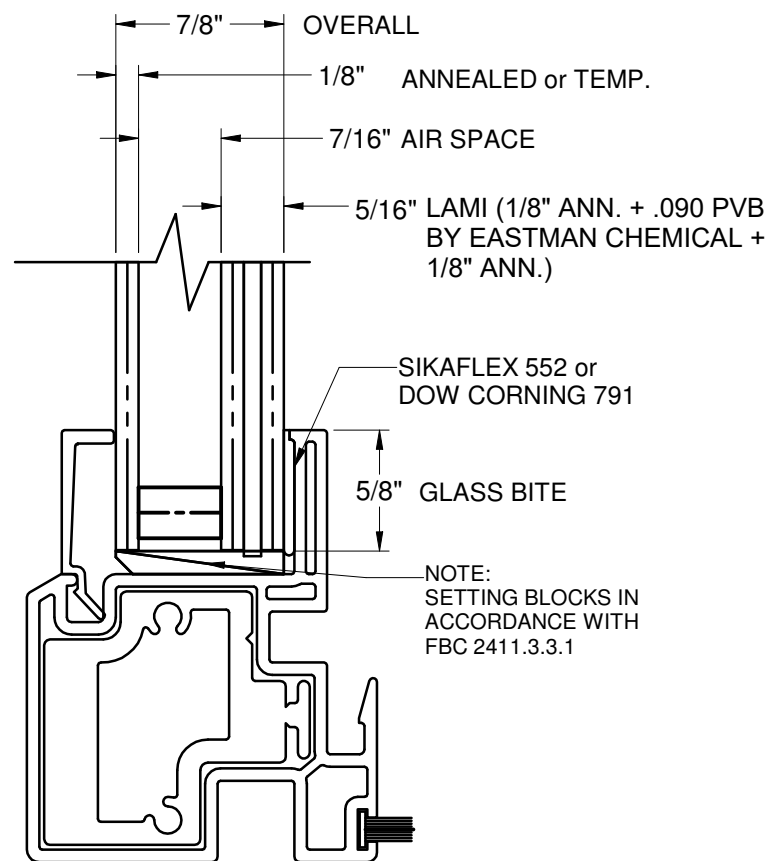


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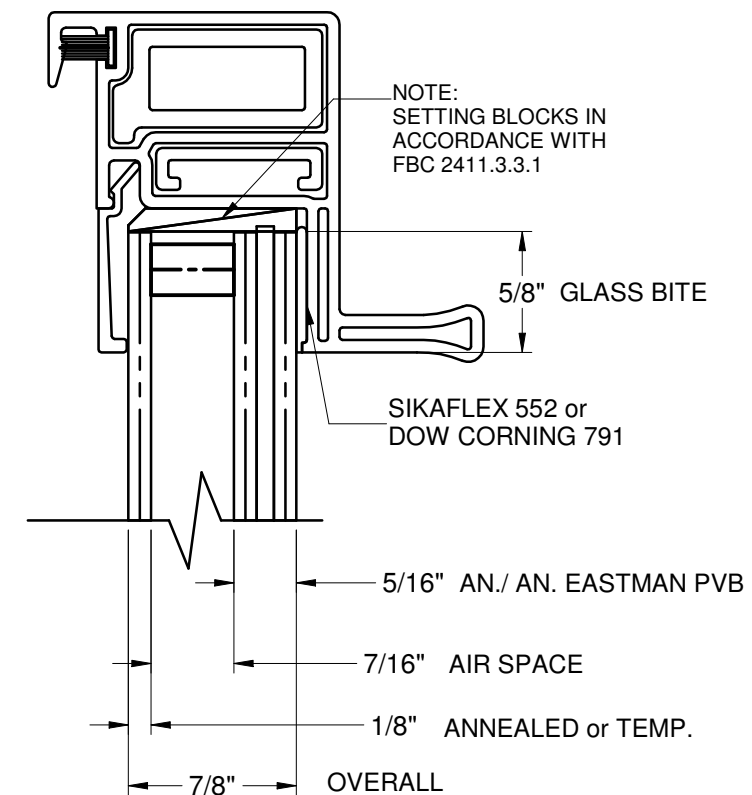
ZZ 10/1/2020 Lucas A. Turner, FLPE #58201 Turner Eng. & Cons., Inc. FBPE COA #29779 2428 Old Natchez Trc. Trl. Camden, TN 38320 Ph. 941-380-1574	LAWSON INDUSTRIES, INC. 8501 N. W. 90th Street Medley, FL 33166		
	TITLE: SECTION VIEWS		
	SERIES: SH-1150	DRAWN BY: MCL	DATE: 05/29/2019
	MODEL:	SCALE: N.T.S.	DWG. NO. L-1150-1901
		REV. LETTER:	SHEET SHT 3 of 10



GLASS TYPE A
FIXED LITE



GLASS TYPE B
FIXED LITE



GLASS TYPE C
SASH LITE

MAX. UNIT SIZE	DESIGN PRESSURE RATING	FIXED GLASS TYPE	SASH GLASS TYPE
37" x 63"	+ 70.0 / - 70.0 PSF	B	C
53" x 76"	+ 65.0 / - 65.0 PSF	B	C
54" x 84"	+ 50.0 / - 50.0 PSF	A	C



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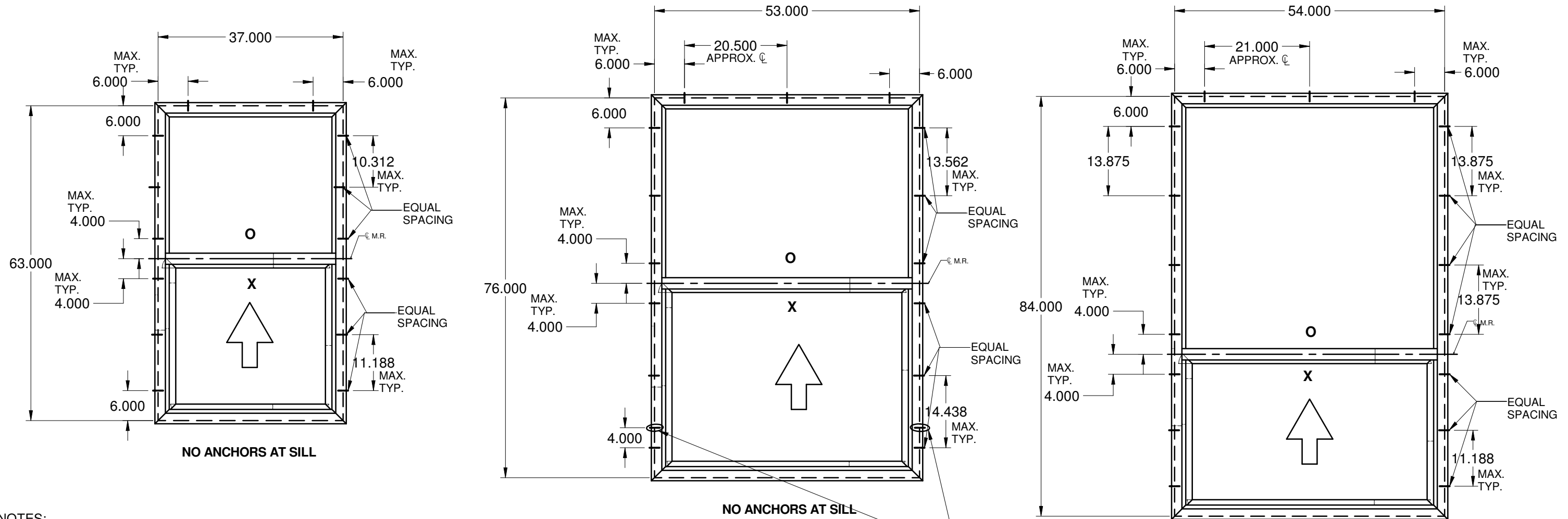
ZZ
10/1/2020
Lucas A. Turner, FLPE #58201
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2428 Old Natchez Trc. Trl.
Camden, TN 38320
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8501 N. W. 90th Street
Medley, FL 33166

TITLE: GLAZING DETAILS

SERIES: SH-1150	DRAWN BY: MCL	DATE: 05/29/2019
MODEL:	SCALE: N.T.S.	DWG. NO. L-1150-1901
	REV. LETTER:	SHEET SHT 4 of 10



- NOTES:
- 1.) INSTALL ONE ANCHOR AT EACH INSTALLATION LOCATION. NO ANCHORS REQUIRED AT SILL.
 - 2.) SHIM AS REQUIRED AT EACH INSTALLATION ANCHOR USING LOAD BEARING SHIMS. MAX. ALLOWABLE SHIM STACK TO BE $\frac{1}{4}$ ".
USE SHIMS WHERE SPACE GREATER THAT $\frac{1}{16}$ " IS PRESENT. LOAD BEARING SHIMS SHALL BE CONSTRUCTED OF HIGH DENSITY PLASTIC OR BETTER. WOOD SHIMS ARE NOT ALLOWED.
 - 3.) ANCHOR TYPE, SIZE, SPACING AND EMBEDMENT SHALL BE AS SPECIFIED IN THESE DRAWINGS, SEE TABLE 1, SHEET 10.
 - 4.) ALL INSTALLATIN ANCHORS MUST BE MADE OF OR PROTECTED WITH A CORROSION RESISTANT MATERIAL OR COATING. DISSIMILAR METALS OR MATERIALS IN CONTACT WITH PRESSURE TREATED WOOD MUST BE PROTECTED TO PREVENT REACTION.
 - 5.) INSTALLATION ANCHORS SHALL BE IN ACCORDANCE WITH ANCHOR MANUFACTURER'S INSTALLATION INSTRUCTIONS, AND ACNHORS SHALL NOT BE USED IN SUBSTRATES WITH STRENGTHS LESS THAN THE MINIMUM SPECIFIED IN TABLE 1, SHEET 10.
 - 6.) ANCHOR EMBEDMENT TO SUBSTRATE SHALL BE BEYOND WALL DRESSING OR STUCCO. FOR CONCRETE / CMU OPENINGS, EMBEDMENT SHALL BE BEYOND WOOD BUCKS, IF USED, INTO SUBSTRATE. INSTALLATIONS INTO SOLID CONCRETE OR GROUT-FILLED CMU MAY INCLUDE, BUT DO NOT REQUIRE 1X WOOD BUCKS BETWEEN THE PRODUCT AND THE SUBSTRATE. INSTALLATIONS INTO HOLLOW CMU REQUIRE THE USE OF 1X BUCKS BETWEEN THE PRODUCT AND SUBSTRATE.
 - 7.) A MINIMUM CENTER-TO-CENTER SPACING SHALL BE MAINTAINED BETWEEN ALL FASTENERS: 3" FOR MASONRY, 1" FOR WOOD AND METAL.
 - 8.) WOOD OR MASONRY OPENINGS, BUCKS AND BUCK FASTENERS SHALL BE PROPERLY DESIGNED BY THE ARCHITECT OR ENGINEER OF RECORD AND INSTALLED TO TRASFER WIND LOADS TO THE STRUCTURE. SUBSTRATES SHALL MEET THE MINIMUM STRENGTH REQUIREMENTS AS SHOWN IN TABLE 1, SHEET 11. CONCRETE AND MASONRY SUBSTRATES MAY NOT BE CRACKED.
 - 9.) SEALING AND FLASHING STRATEGIES FOR OVERALL WATER RESISTANCE OF INSTALLATION SHALL BE DONE BY OTHER FOLLOWING THE CURRENT VERSION OF THE REFERENCED DOCUMENTS: FMA/AAMA 100 (FIN WINDOWS), FMA/AAMA 200 (FLANGE WINDOWS), FMA/WDMA 250 (BOX WINDOWS), FMA/AAMA/WDMA 300 (EXTERIOR DOORS).

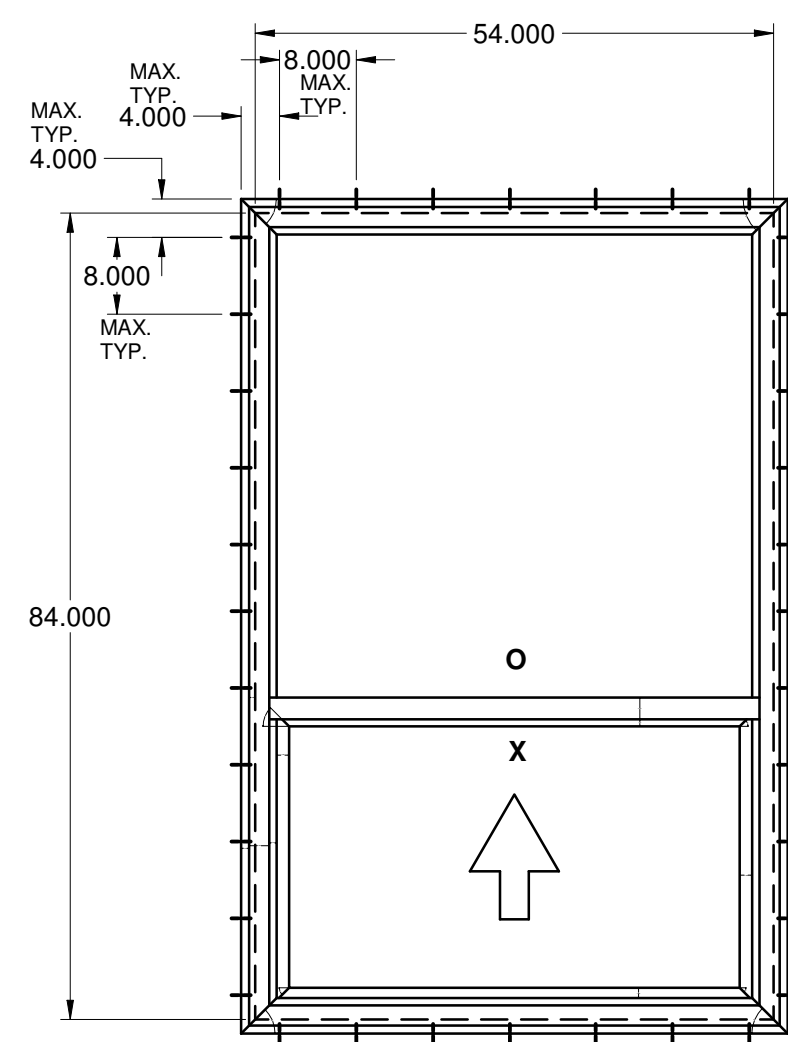
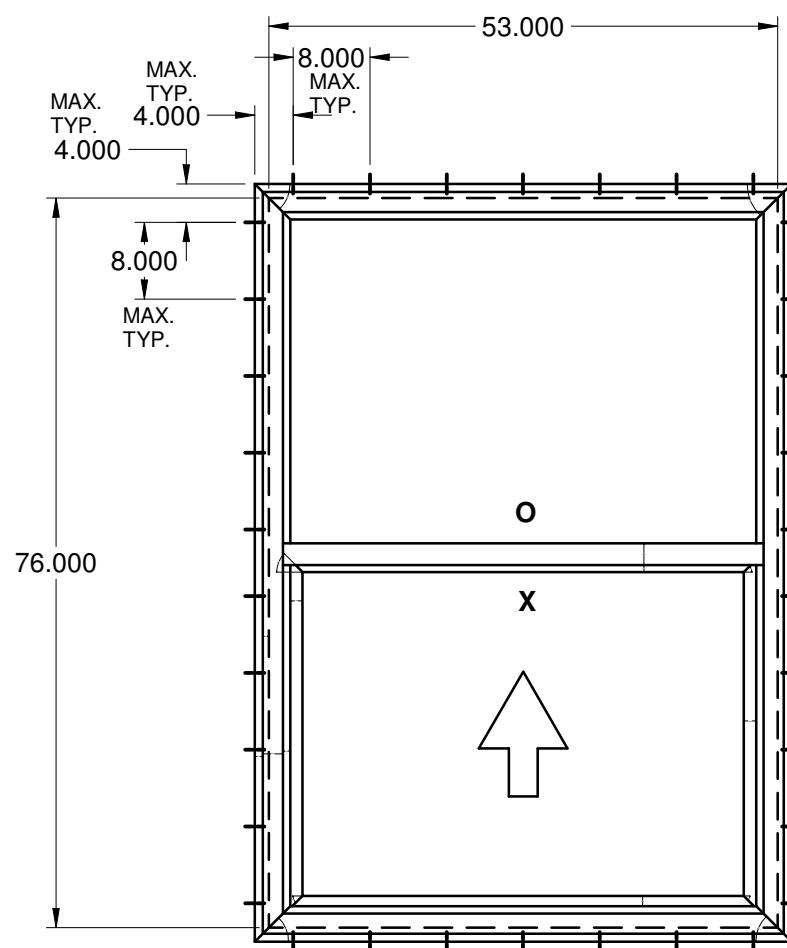
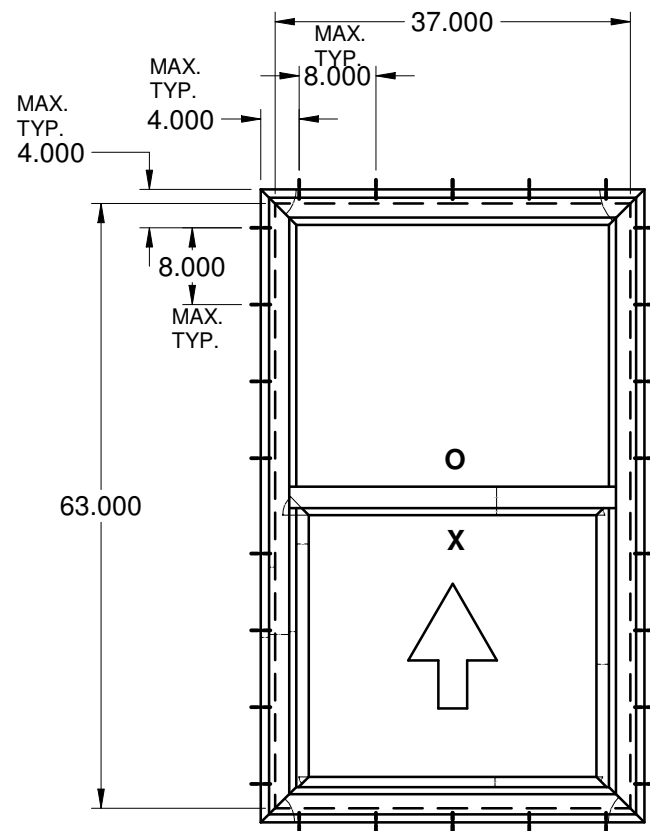
NOTE:
ADDITIONAL ANCHOR REQUIRED
ON WIDTHS 51.875 AND GREATER
AND HEIGHTS 72.000 AND GREATER.



		8501 N. W. 90th Street Medley, FL 33166	
		TITLE: ANCHOR SCHEDULE & NOTES, FLANGE & BOX	
SERIES: SH-1150	DRAWN BY: MCL	DATE: 05/29/2019	
MODEL:	SCALE: N.T.S.	DWG. NO. L-1150-1901	
	REV. LETTER:	SHEET SHT 5 of 10	

LT

10/1/2020
 Lucas A. Turner, FLPE #58201
 Turner Eng. & Cons., Inc.
 FBPE COA #29779
 2428 Old Natchez Trc. Trl.
 Camden, TN 38320
 Ph. 941-380-1574



NOTES:

- 1.) INSTALL ONE ANCHOR AT EACH INSTALLATION LOCATION. NO ANCHORS REQUIRED AT SILL.
- 2.) SHIM AS REQUIRED AT EACH INSTALLATION ANCHOR USING LOAD BEARING SHIMS. MAX. ALLOWABLE SHIM STACK TO BE $\frac{1}{4}$ ".
USE SHIMS WHERE SPACE GREATER THAT $\frac{1}{16}$ " IS PRESENT. LOAD BEARING SHIMS SHALL BE CONSTRUCTED OF HIGH DENSITY PLASTIC OR BETTER. WOOD SHIMS ARE NOT ALLOWED.
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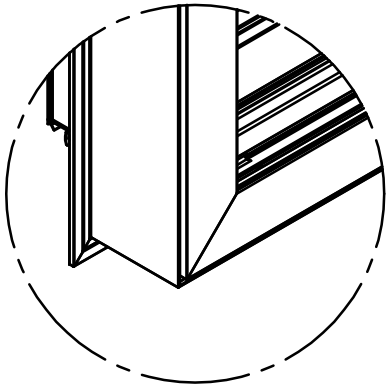
8501 N. W. 90th Street
Medley, FL 33166

TITLE: ANCHOR SCHEDULE & NOTES, NAILING FIN

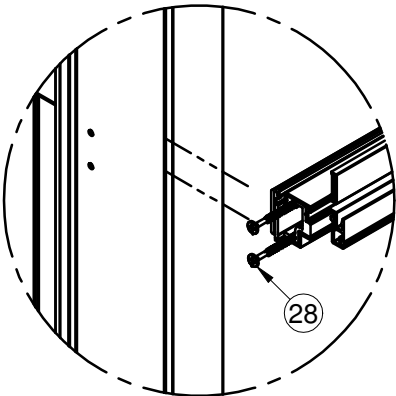
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MODEL:	SCALE: N.T.S.	DWG. NO. L-1150-1901
	REV. LETTER:	SHEET SHT 6 of 10

BILL OF MATERIALS				
Item	Description	Material	Vendor	Vendor #
1	Frame, Head	Rigid PVC	MIKRON	10244
2	Frame, Sill	Rigid PVC	MIKRON	10244
3	Frame, Jamb	Rigid PVC	MIKRON	10244
4	Fixed Meeting Rail	Rigid PVC	MIKRON	10245
5	Reinf., FMR	Alum.	KEYMARK	FH-10090
6	Sash Meeting Rail	Rigid PVC	MIKRON	10247
7	Reinf., SMR	Alum.	KEYMARK	FH-10091
8	Reinf., SSR	Alum.	PROFILE	LII-195
9	Lift Rail	Rigid PVC	MIKRON	10246
10	Reinf., Lift Rail	Alum.	KEYMARK	FH-10091
11	Reinf., SSR	Alum.	PROFILE	LII-195
12	Vent Stile	Rigid PVC	MIKRON	10248
13	Reinf., Vent Stile	Alum.	PROFILE	LII-195
14	Glazing Bead, 7/8' (Fixed)	Rigid PVC	MIKRON	10276
15	Glazing Bead, 7/8' (Sash)	Rigid PVC	MIKRON	10249
16	Adapter, Screen w/ Nib	Rigid PVC	MIKRON	10251
17	Adapter, Screen w/o Nib	Rigid PVC	MIKRON	10253
18	Cover/ Sash Stop	Rigid PVC	MIKRON	10255
19	Sill Riser	Alum.	PROFILE	LII-228
20	Balance, Block & Tackle		VARIES	
21	Take Out Clip/ ECO Guide		CALDWELL	
22	Sash Cam		LAWSON	
23	Lock		INTERLOCK	
24	Keeper		INTERLOCK	
25	Cover, Lock		INTERLOCK	
26	Weep Assembly		PREFERRED ENG.	
27	Wstp., 0.270 x 0.187 back			
28	#8 x 2.500, PhTrWashHd, SMS			
29	#6 x 1.000, PhFh, TEK			
30	#6 x 0.500, PhFh, TEK			
31	#8 x 0.500, PhPh, SMS			

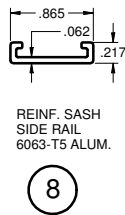
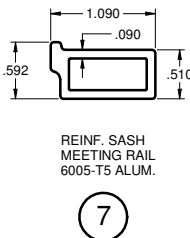
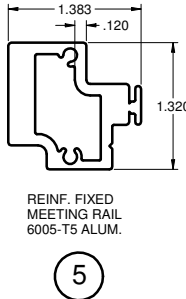
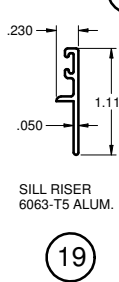
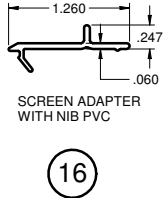
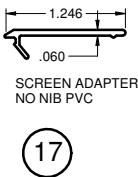
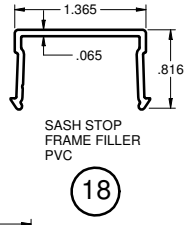
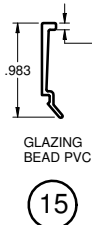
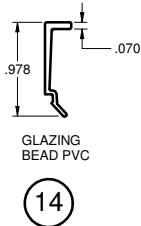
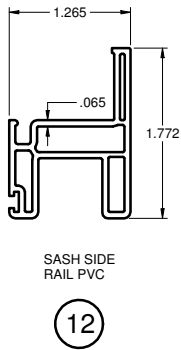
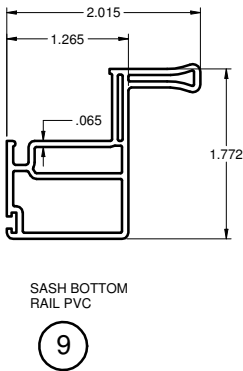
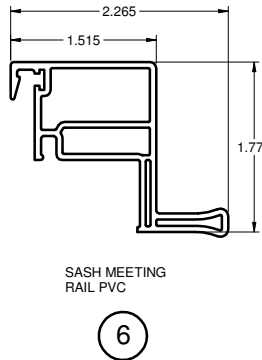
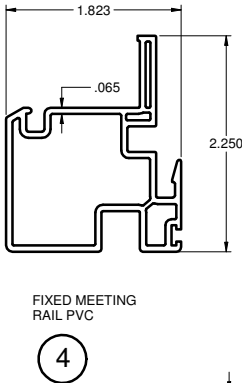
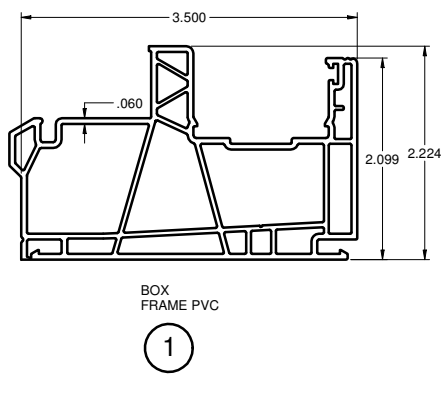
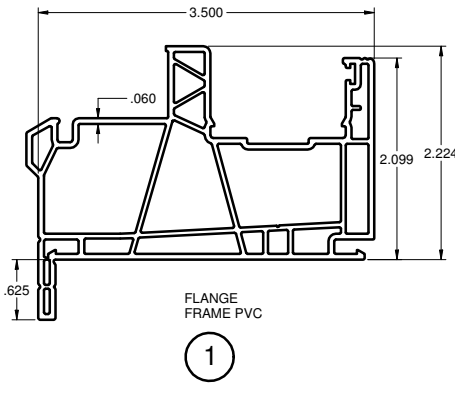
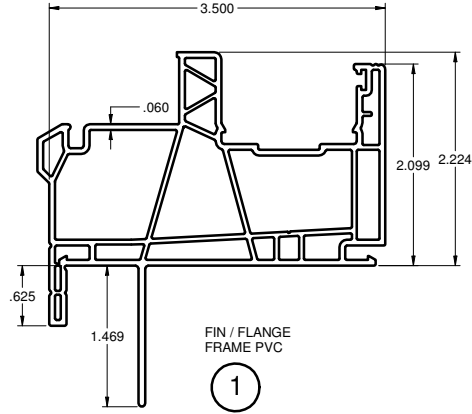
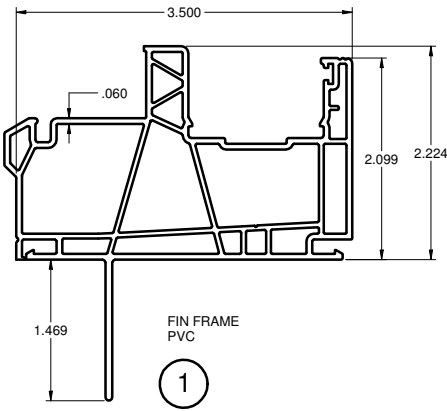
FRAME CORNER CONSTRUCTION



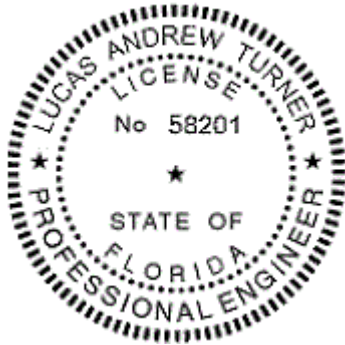
CORNER WELD
ALL FOUR SIDES



FIXED MEETING RAIL
SCREWED TO FRAME



LUCAS A. TURNER, FL. P.E. 58201



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10/1/2020
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FBPE COA #29779
2428 Old Natchez Trc. Trl.
Camden, TN 38320
Ph. 941-380-1574



8501 N. W. 90th Street
Medley, FL 33166

TITLE: EXTRUSIONS & B.O.M.

SERIES: SH-1150

DRAWN BY: MCL

DATE: 05/29/2019

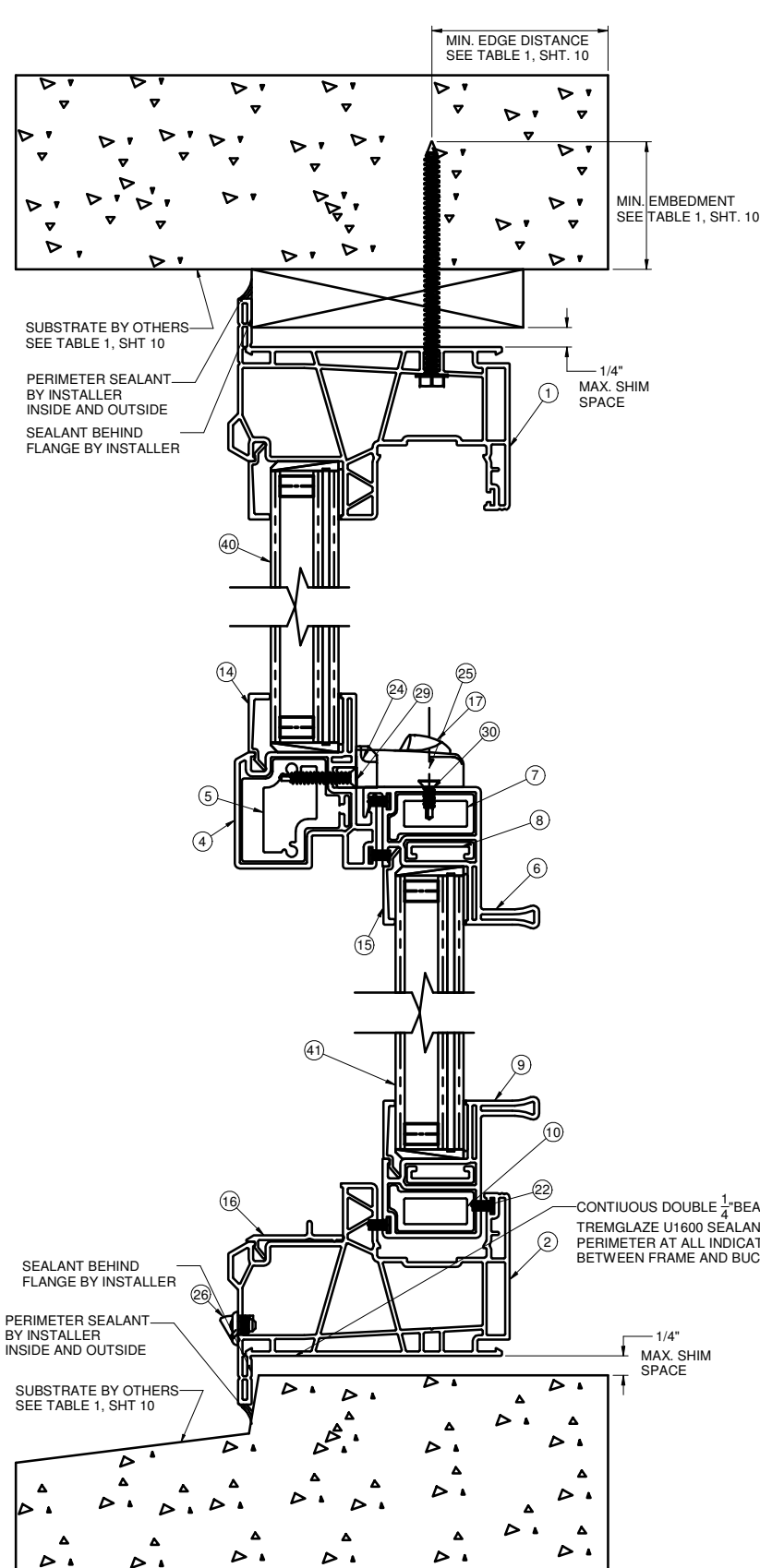
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SCALE: N.T.S.

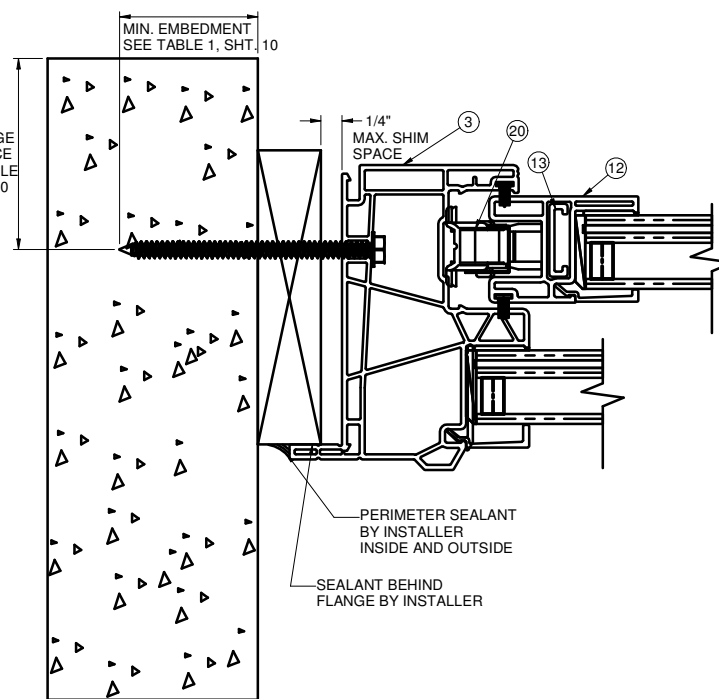
DWG. NO. L-1150-1901

REV. LETTER:

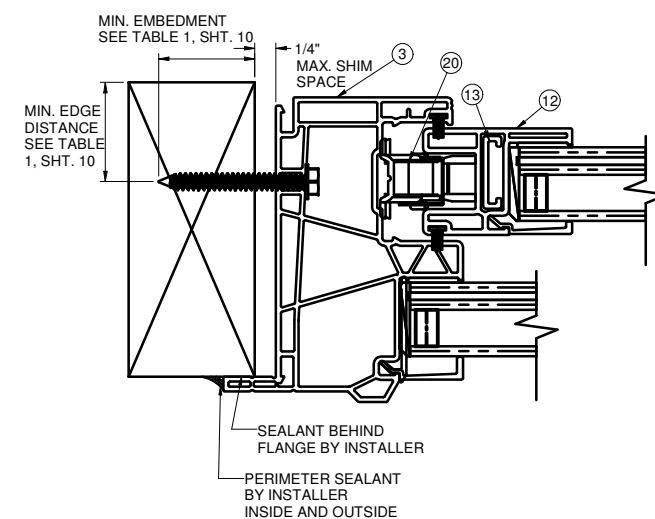
SHEET SHT 7 of 10



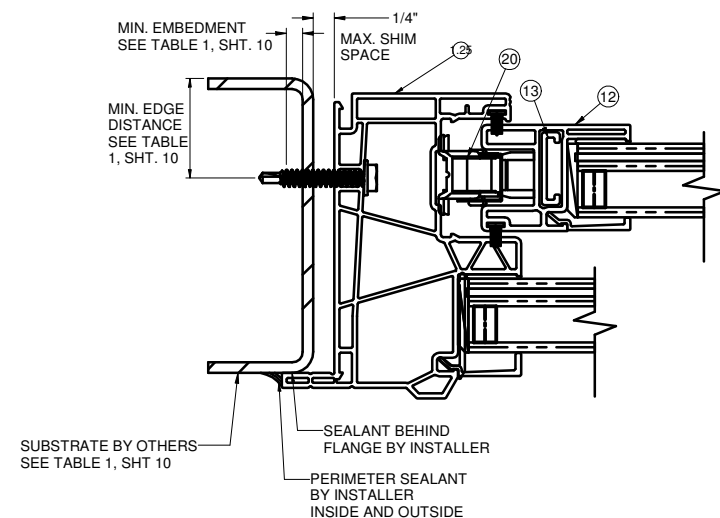
A
9
VERTICAL SECTION
TYPICAL SILL & HEAD ANCHORAGE
THRU-FRAME
FLANGE CONCRETE / CMU



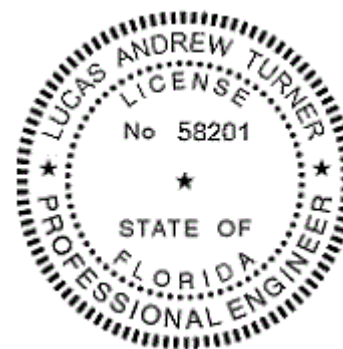
B
9
HORIZONTAL SECTION
TYPICAL JAMB ANCHORAGE
THRU-FRAME
FLANGE CONCRETE / CMU



C
9
HORIZONTAL SECTION
TYPICAL JAMB ANCHORAGE
THRU-FRAME
FLANGE WOOD FRAMING
HEAD & SILL DETAILS SIMILAR



D
9
HORIZONTAL SECTION
TYPICAL JAMB ANCHORAGE
THRU-FRAME
FLANGE METAL FRAMING
HEAD & SILL DETAILS SIMILAR



LUCAS A. TURNER, FL. P.E. 58201

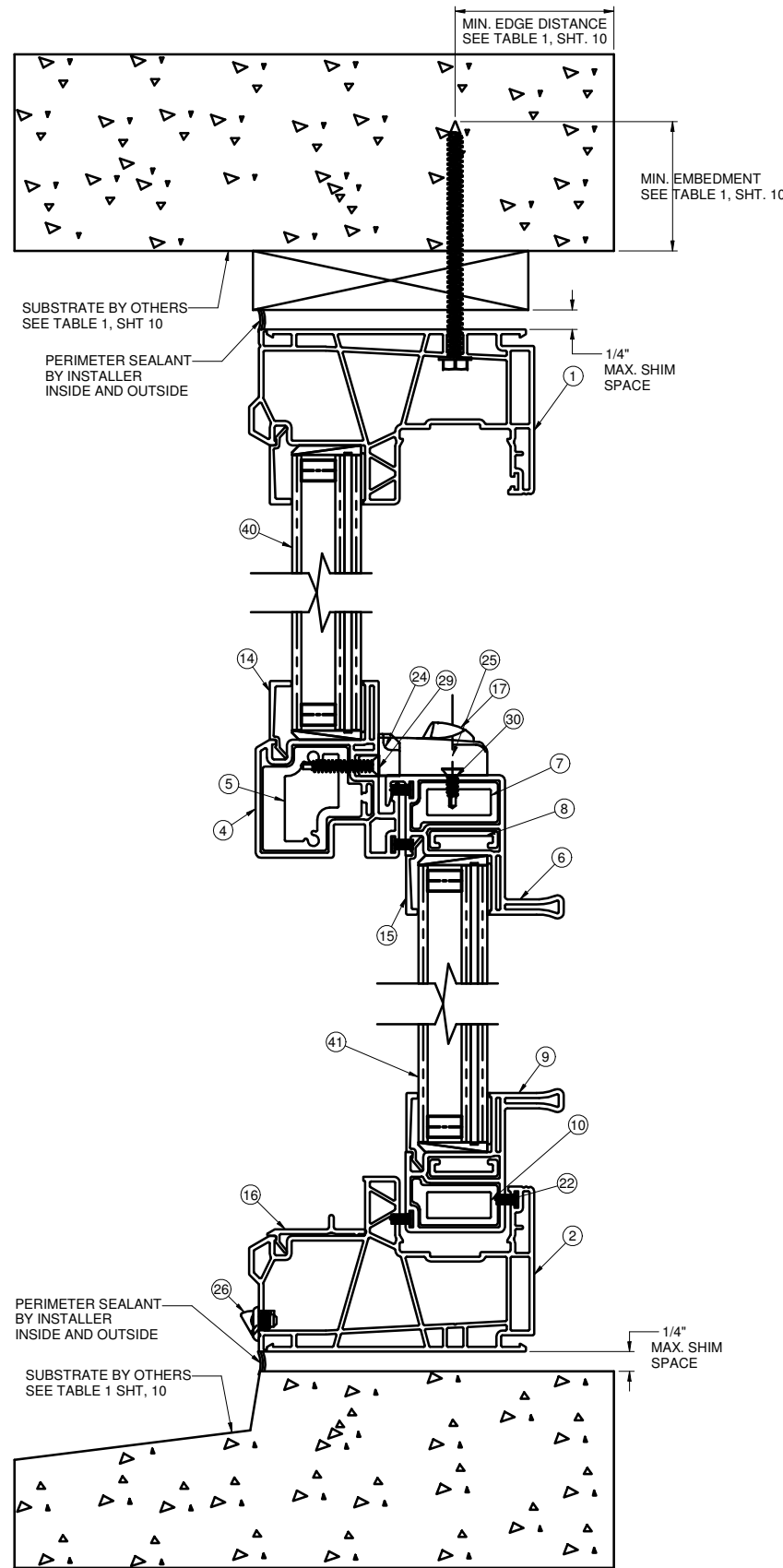
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10/1/2020
Lucas A. Turner, FLPE #58201
Turner Eng. & Cons., Inc.
FBPE COA #29779
2428 Old Natchez Trc. Trl.
Camden, TN 38320
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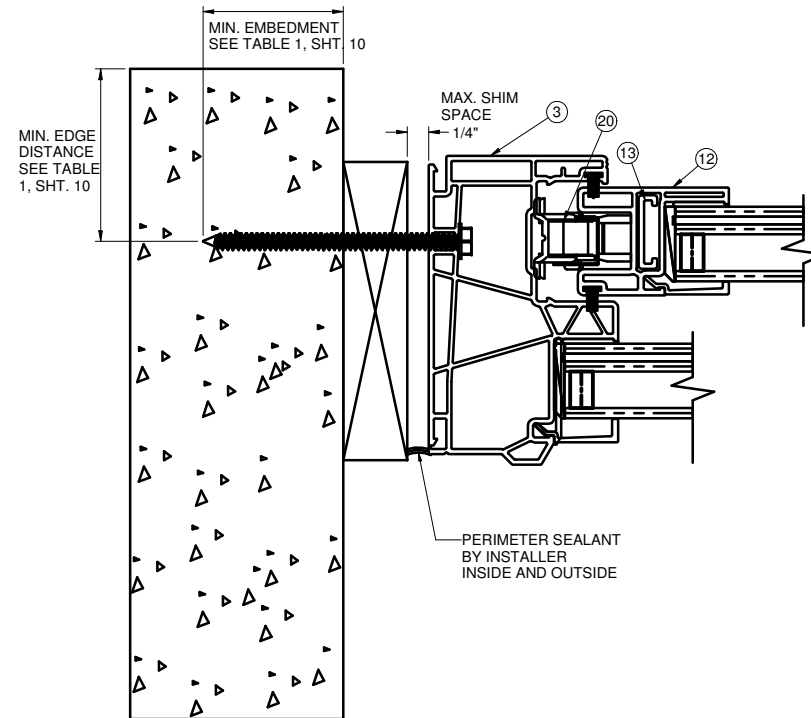
8501 N. W. 90th Street
Medley, FL 33166

TITLE: INSTALLATION DETAILS, FLANGE

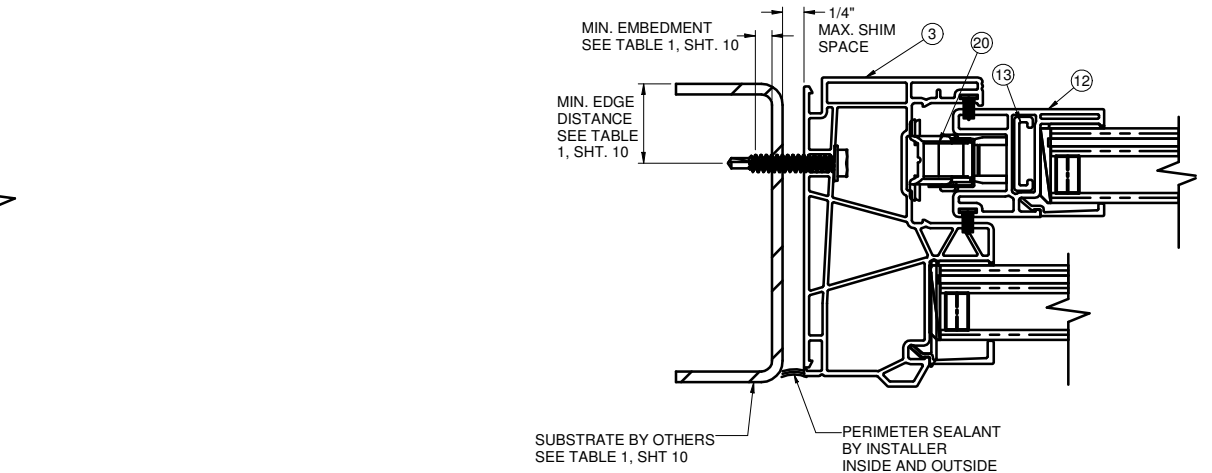
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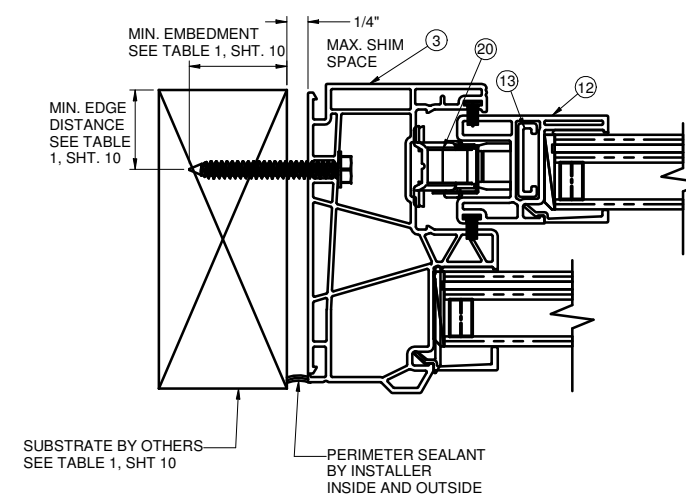
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10 VERTICAL SECTION
TYPICAL SILL & HEAD ANCHORAGE
THRU-FRAME
BOX CONCRETE / CMU



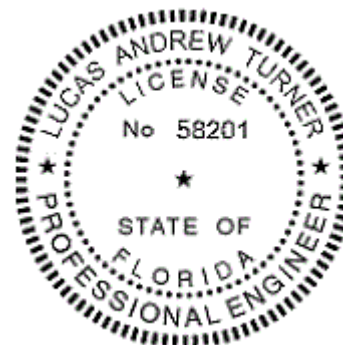
B
10 HORIZONTAL SECTION
TYPICAL JAMB ANCHORAGE
THRU-FRAME
BOX FRAME CONCRETE / CMU



D
10 HORIZONTAL SECTION
TYPICAL JAMB ANCHORAGE
THRU-FRAME
BOX FRAME METAL FRAMING
HEAD & SILL DETAILS SIMILAR



C
10 HORIZONTAL SECTION
TYPICAL JAMB ANCHORAGE
THRU-FRAME
BOX WOOD FRAMING
HEAD & SILL DETAILS SIMILAR



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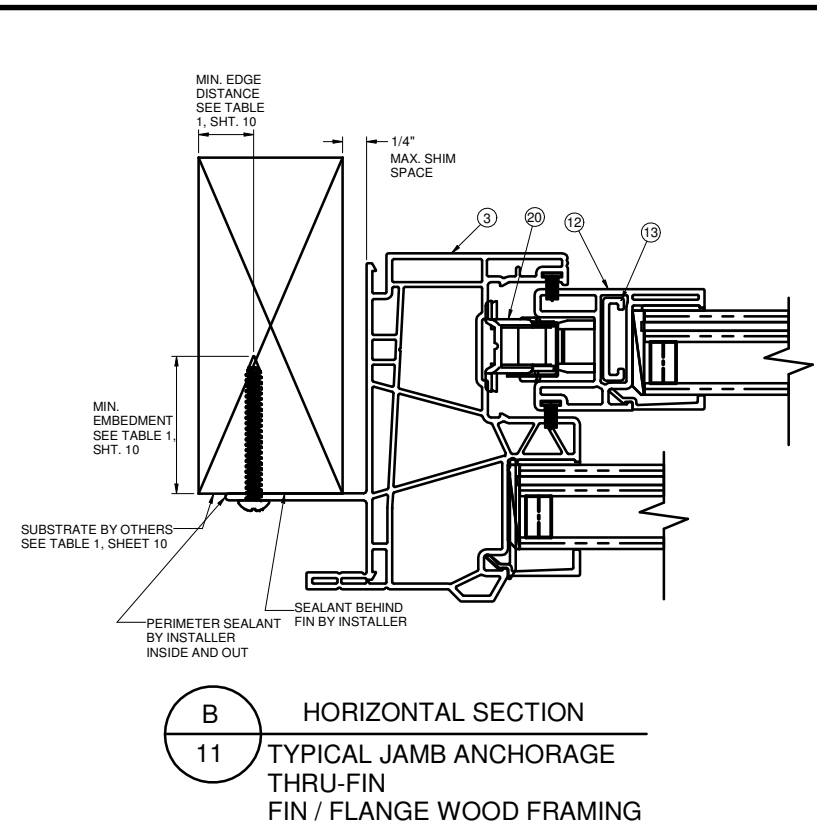
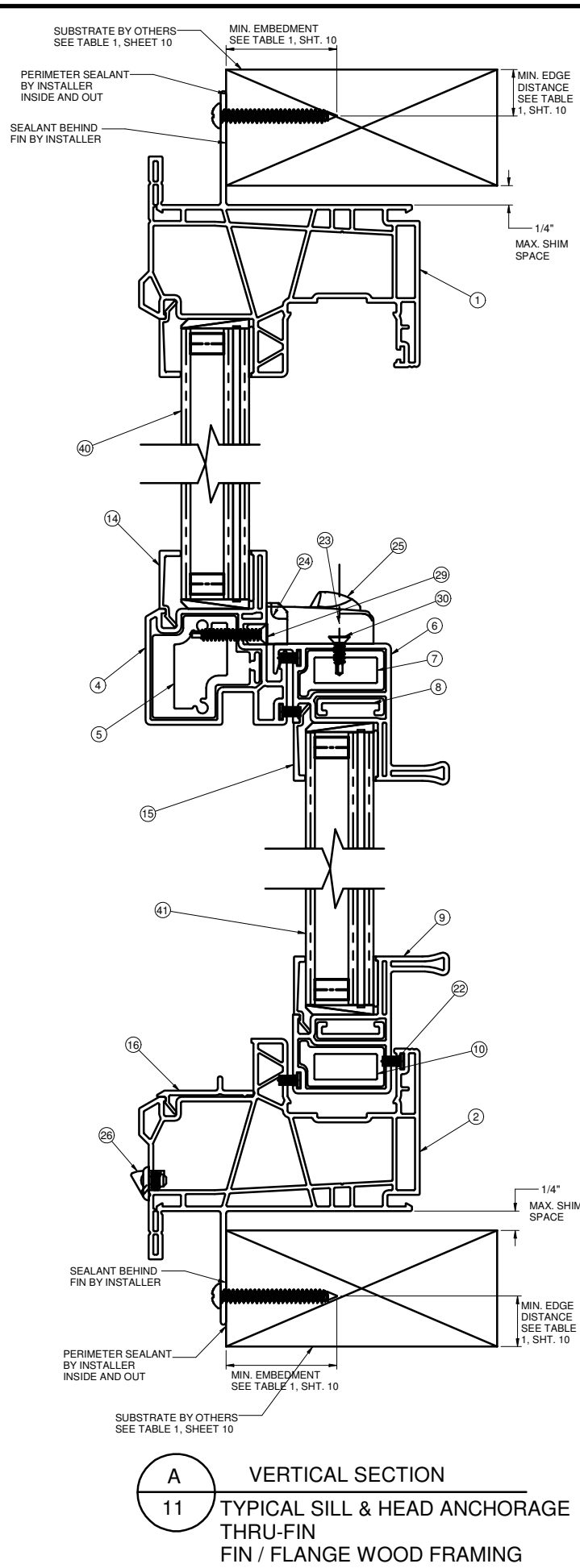
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B HORIZONTAL SECTION
11 TYPICAL JAMB ANCHORAGE
THRU-FIN
FIN / FLANGE WOOD FRAMING

TABLE 1: APPROVED INSTALLATION FASTENERS				
THRU	SUBSTRATE TYPE	ANCHOR TYPE	MIN. EMBEDMENT	MIN. EDGE DIST.
FRAME	CONCRETE (2.0 KSI MIN.)	3/16" ITW TAPCON	1 1/2"	1 1/8"
FRAME	HOLLOW OR GROUT-FILLED CMU (117 PCF MIN.)	3/16" ITW TAPCON	1 "	2 "
FRAME	CONCRETE (2.85 KSI MIN.)	3/16" ELCO ULTRACON	1 "	1 "
FRAME	GROUT-FILLED CMU (ASTM C-90)	3/16" ELCO ULTRACON	1 1/4"	2 1/2"
FRAME	2x MIN. SOUTHERN PINE (G-0.55)	3/16" ITW TAPCON OR ELCO ULTRACON	1 3/8"	7/8"
FRAME	2x MIN. SOUTHERN PINE (G-0.55)	#10 WOOD SCREW	1 3/8"	7/8"
FRAME	16 GAUGE (0.060) MIN. STEEL STUD (33 KSI YIELD MIN.)	#10-16 HILTI KWIK-FLEX OR ITW TEKS-SELF DRILLING SCREW	FULL THREAD THRU 0.060	1/2"
FRAME	1/8" ALUM. (6063-T5 MIN.) OR 1/8" STEEL (33 KSI MIN.)	#10 GRADE 5 SELF-TAPPING / DRILLING SCREW	FULL THREAD THRU 0.125	1/2"
FIN	2x MIN. SOUTHERN PINE (G=0.55)	#8 WOOD SCREW	1 3/8"	1/2"



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