

GLAZED FIBERGLASS PATIO DOOR

DOUBLE

w/ or w/out SIDELITE(S)

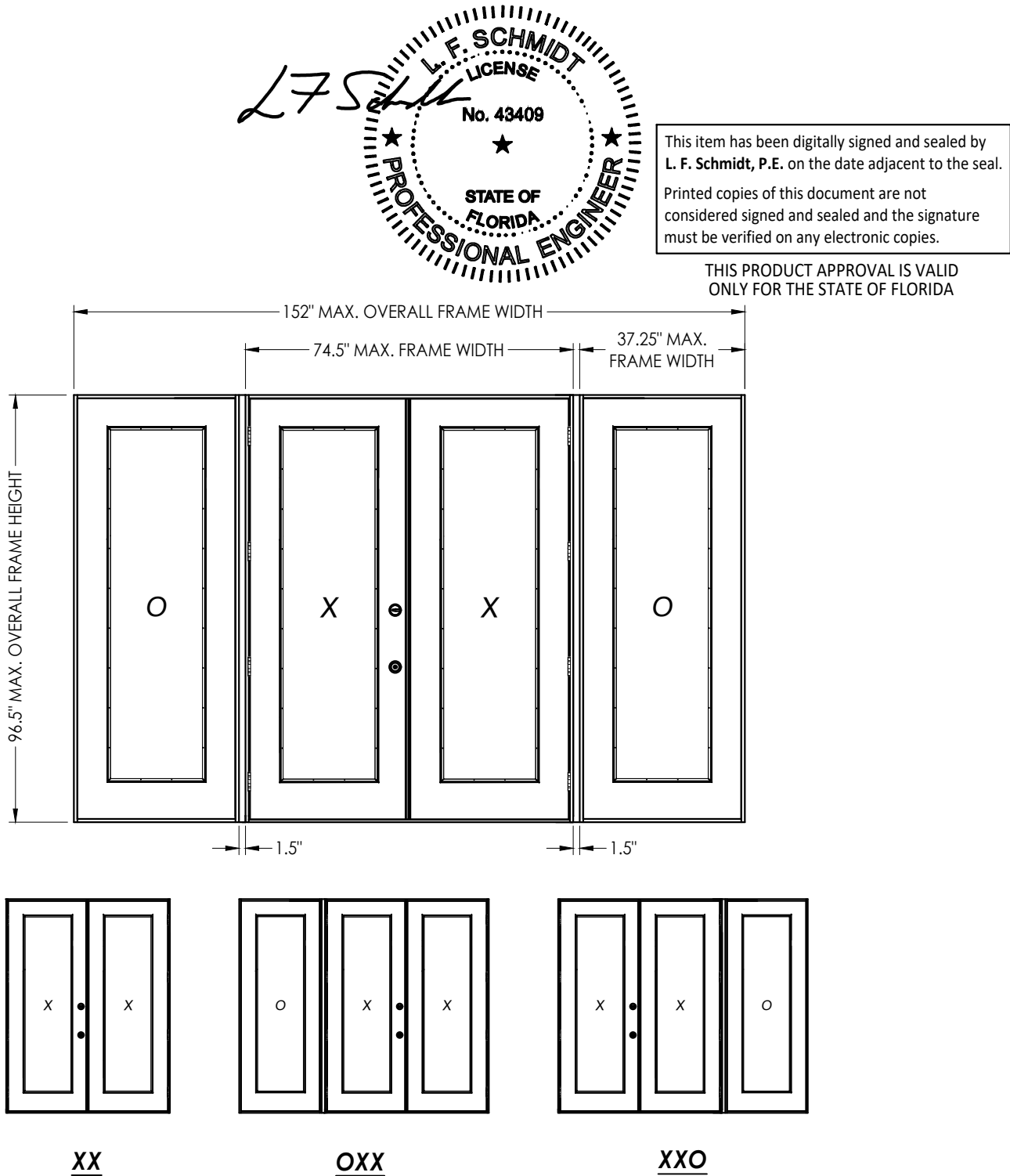
OUTSWING

"IMPACT"

GENERAL NOTES

1. This product evaluation drawing has been developed in compliance with the 8th Edition (2023) Florida Building Code (FBC) including the "High Velocity Hurricane Zone" (HVHZ).
2. Product anchors shall be as listed and spaced as shown on details. Anchor embedment to base material shall be beyond wall dressing or stucco.
3. When used in the "HVHZ", this product complies with Section 1626 of the FBC and does not require an impact resistant covering.
4. When used in areas outside of the "HVHZ" requiring wind borne debris protection, this product complies with FBC Sections 1609.1.2 & R301.2.1.2 and does not require an impact resistant covering. This product meets missile level "D" and includes Wind Zone 4 as defined in ASTM E 1996 and FBC Sections 1609.1.2.2 & R301.2.1.2.1.
5. For 2x stud framing construction, anchoring of these units shall be the same as that shown for 2x buck masonry construction.
6. Site conditions that deviate from the details of this drawing require further engineering analysis by a licensed engineer or registered architect.
7. This product meets the water infiltration requirements for the "HVHZ".

TABLE OF CONTENTS			
SHEET #	DESCRIPTION	SHEET #	
1	Typical Elevations, Design Pressures & General Notes	7	Horizontal & Vertical Cross Sections (1X Buck)
2	Door & Sidelite Panel Details	8	Horizontal & Vertical Cross Sections (Direct to Masonry)
3	Life Frame Glazing Details	9	Vertical Cross Sections (Thresholds)
4	Elevations	10	Buck Anchoring
5	Horizontal Cross Sections	11	Frame Anchoring & Hardware Details
6	Horizontal & Vertical Cross Sections (2X Buck)	12	Bill of Materials & Components



CONFIGURATION	MAX. FRAME DIMENSION	JAMB REINFORCEMENT	DESIGN PRESSURE (PSF) OUTSWING	
			POSITIVE	NEGATIVE
XX	74.5" x 96.5"	N/A	+45.0	-45.0
OXX, XXO	113.25" x 96.5"	2X	+45.0	-45.0
OXXO	152" x 96.5"	2X	+45.0	-45.0

SEE SHEET 3 FOR GLAZING DESIGN PRESSURE LIMITATIONS

Documents Prepared By:
Lyndon F. Schmidt
P.E. No. 43409

TRINITY

FIBERGLASS PATIO DOOR

"Impact"

PART OR ASSEMBLY:

TYPICAL ELEVATION, DESIGN PRESSURES & GENERAL NOTES

DATE

8/01/23

UPDATE TO 8TH ED. (2023) FBC

NO.

1

BY

LFS

REVISIONS

DATE: 6/13/23

SCALE: N.T.S.

DWG. BY: RW

CHK. BY: LFS

DRAWING NO.: FL-37184.4

SHEET 1 OF 12

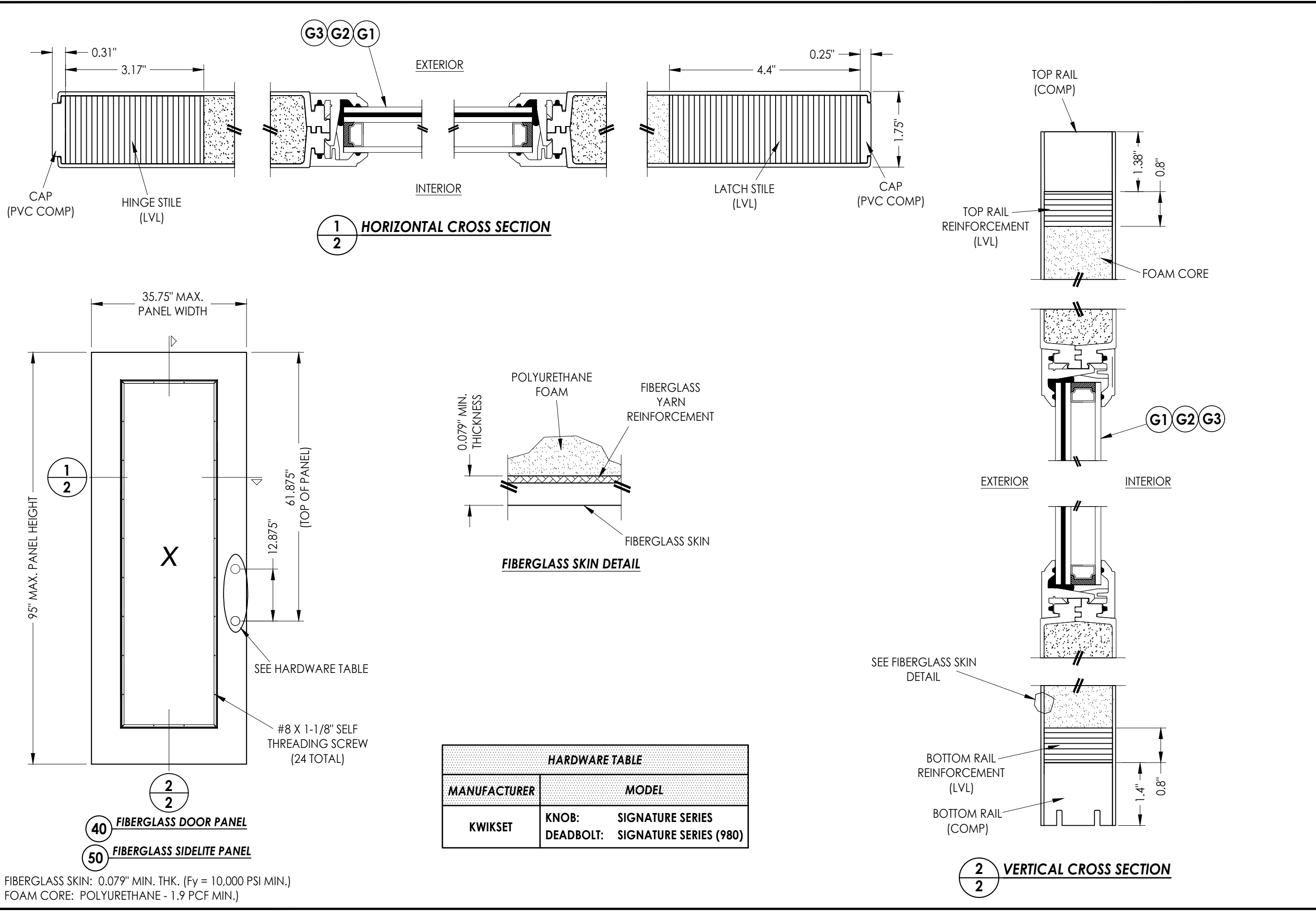
RW

BUILDING CONSULTANTS, INC.

P.O. Box 230, Valrico, FL 33595

Phone No.: 813.659.9197

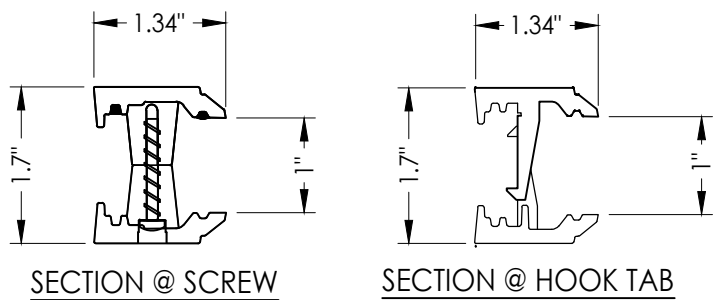
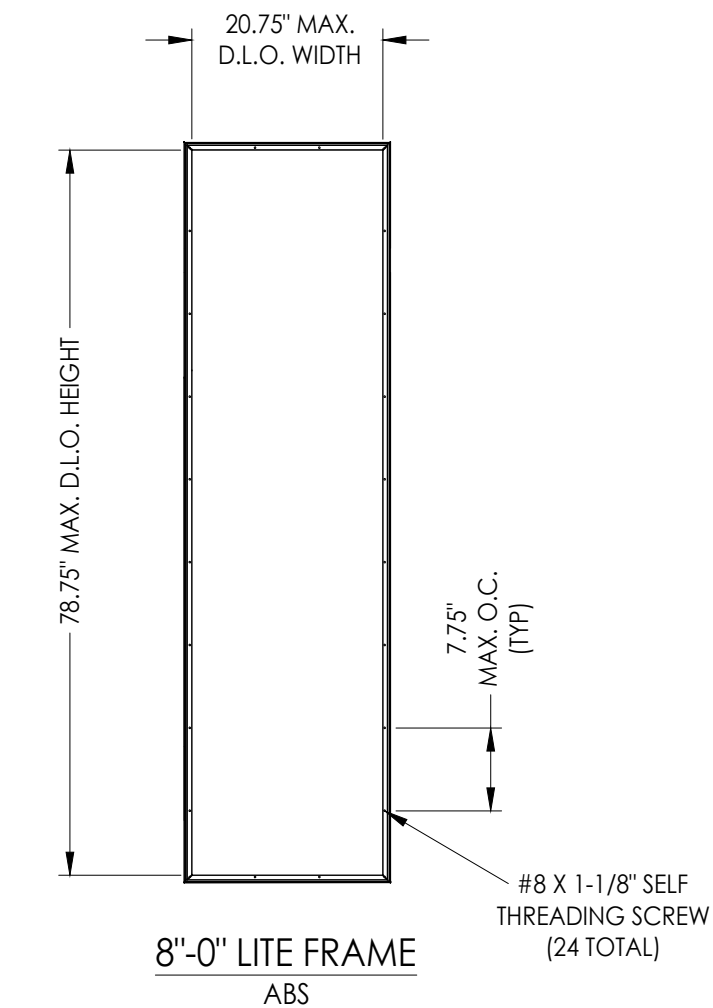
FBPE Registry No. 9813



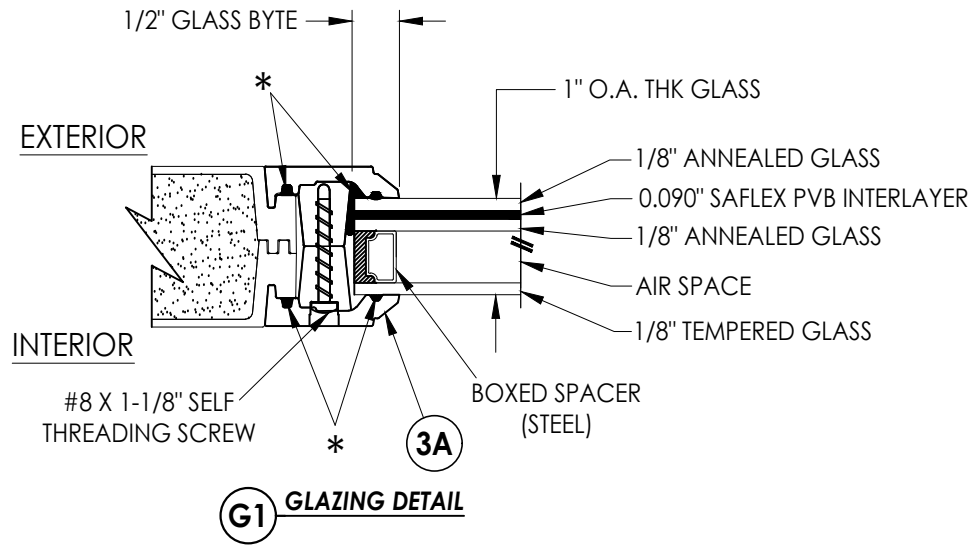
HARDWARE TABLE		
MANUFACTURER	MODEL	
KWIKSET	KNOB:	SIGNATURE SERIES
	DEADBOLT:	SIGNATURE SERIES (980)

[illegible]

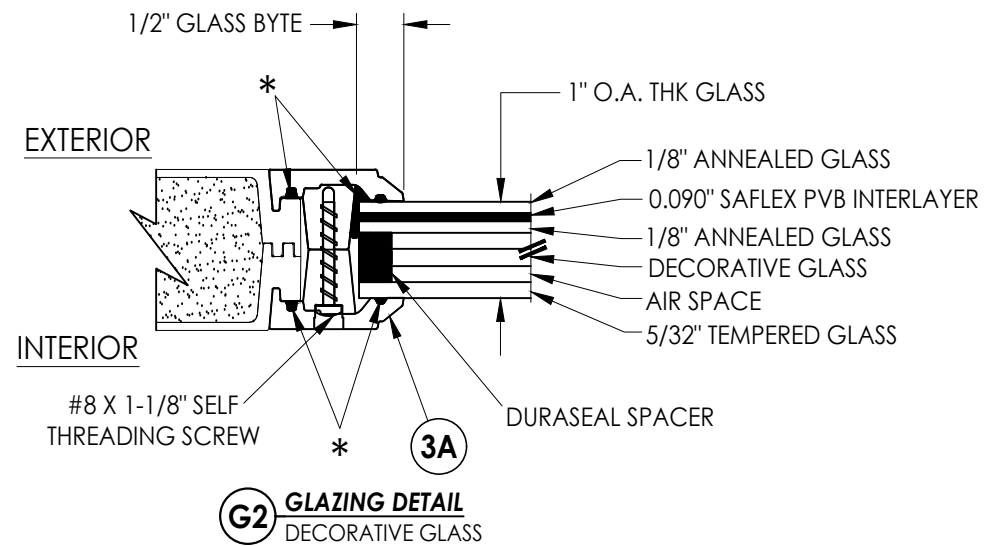
Z:\2023 FBC Drawings\Trinity Glass Int\FL-37184 R2\FL-37184.4.dwg



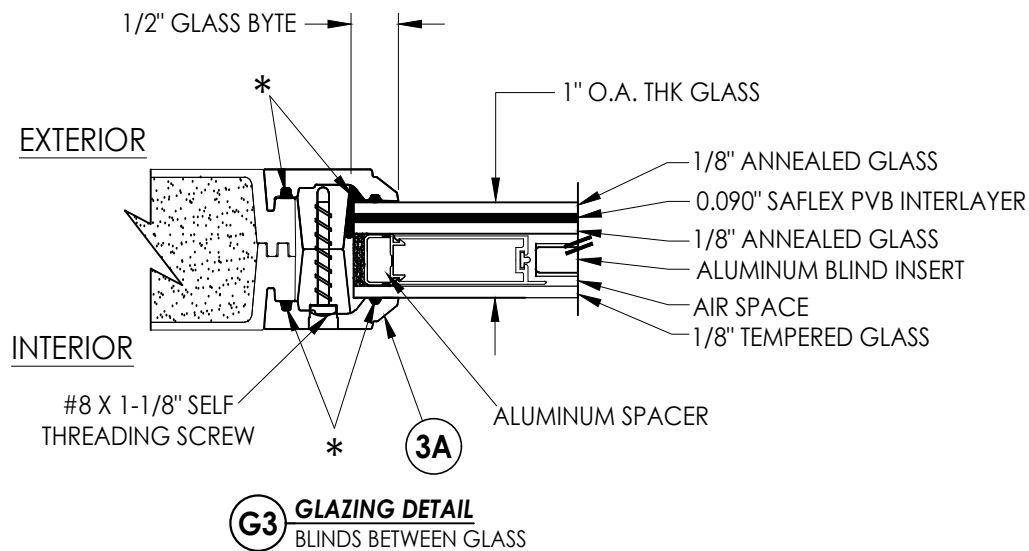
3A FLUSH GLAZING FRAME
ABS



* DOW 995 STRUCTURAL SEALANT



DECORATIVE GLASS
MAX. DESIGN PRESSURE = ±40 PSF



Documents Prepared By:
Lyndon F. Schmidt
P.E. No. 43409

RW BUILDING CONSULTANTS, INC.
P.O. Box 230, Valrico, FL 33595
Phone No.: 813.659.9197
FBPE Registry No. 9813

PRODUCT: TRINITY
FIBERGLASS PATIO DOOR
"Impact"

PART OR ASSEMBLY:
LITE FRAME
GLAZING DETAILS

NO.	DATE	DESCRIPTION	BY
1	8/01/23	UPDATE TO 8TH ED. (2023) FBC	LFS

REVISIONS

DATE: 6/13/23

SCALE: N.T.S.

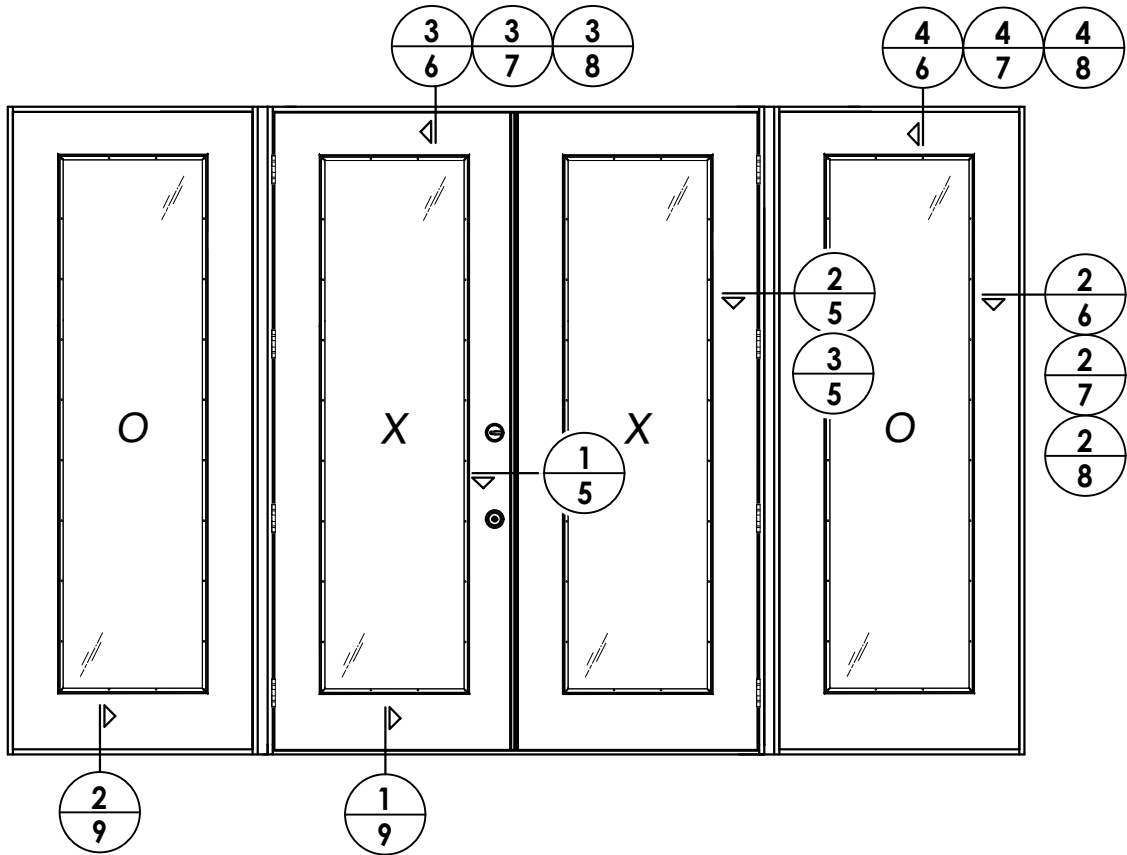
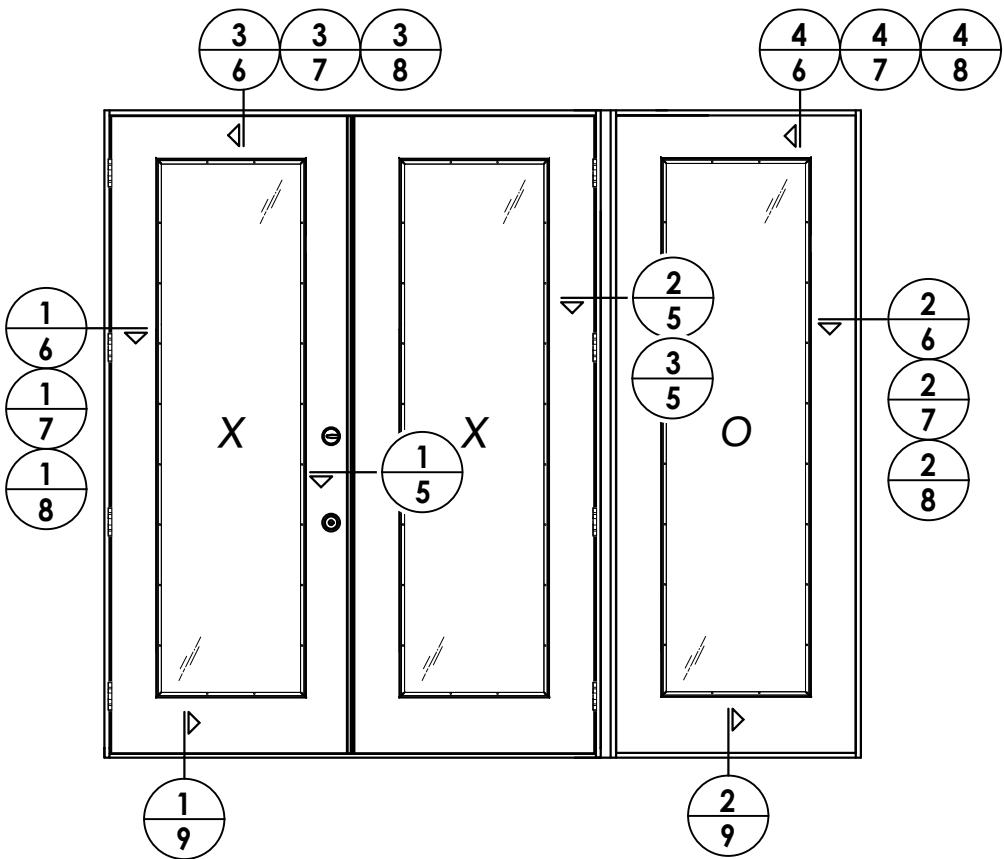
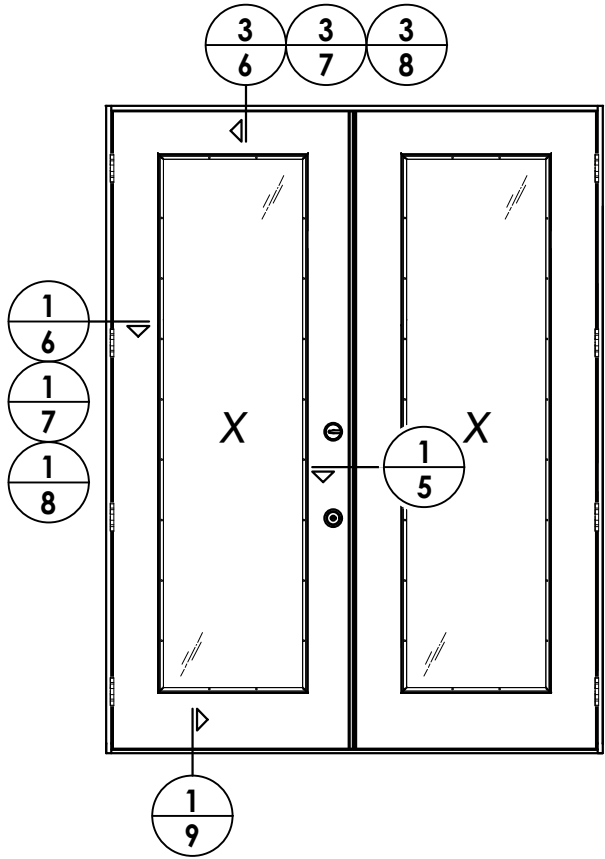
DWG. BY: RW

CHK. BY: LFS

DRAWING NO.: FL-37184.4

SHEET 3 OF 12

Z:\2023 FBC Drawings\Trinity Glass Int\FL-37184 R2\FL-37184.4.dwg



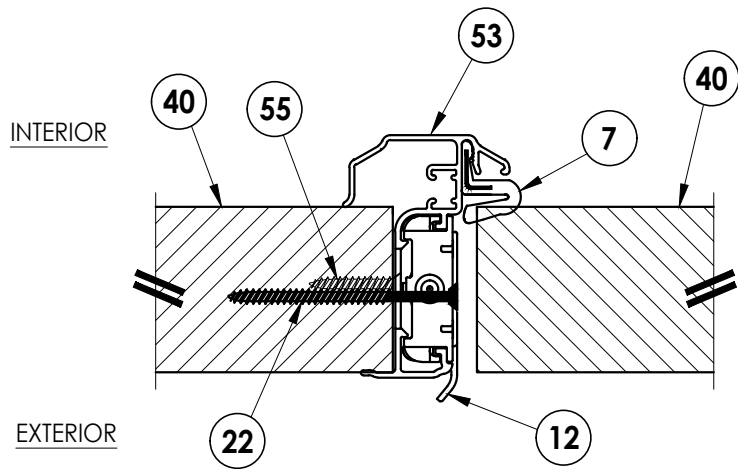
DATE: 6/13/23
SCALE: N.T.S.
DWG. BY: RW
CHK. BY: LFS
DRAWING NO.: FL-37184.4
SHEET 4 OF 12

NO	DATE	DESCRIPTION	BY
1	8/01/23	UPDATE TO 8TH ED. (2023) FBC	LFS

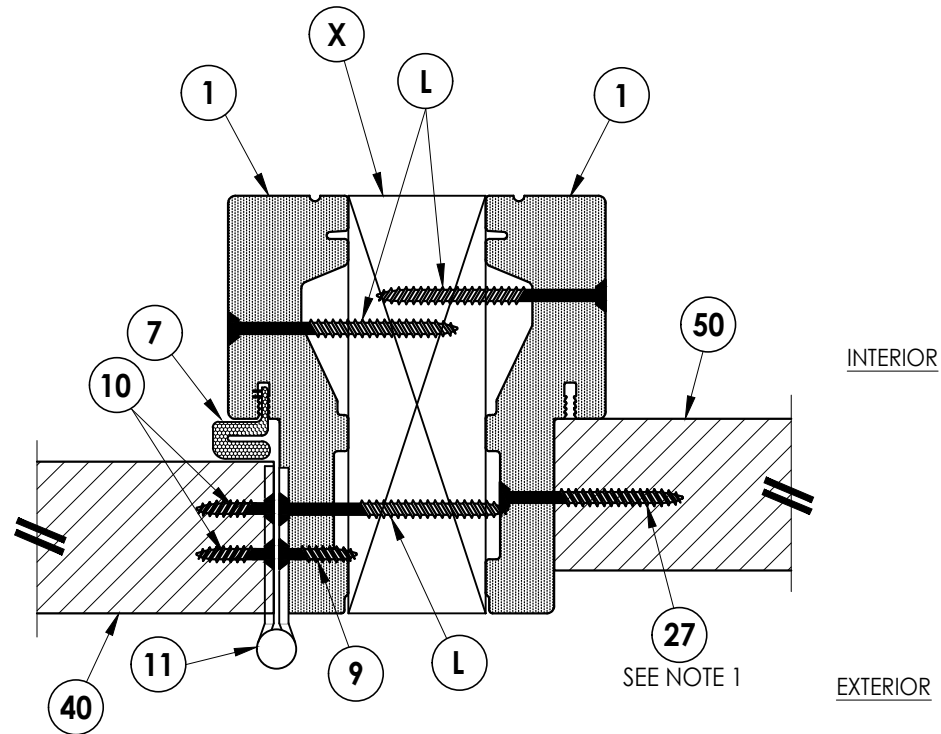
PRODUCT:	TRINITY FIBERGLASS PATIO DOOR "Impact"
PART OR ASSEMBLY:	ELEVATIONS

Documents Prepared By:
Lyndon F. Schmidt
P.E. No. 43409

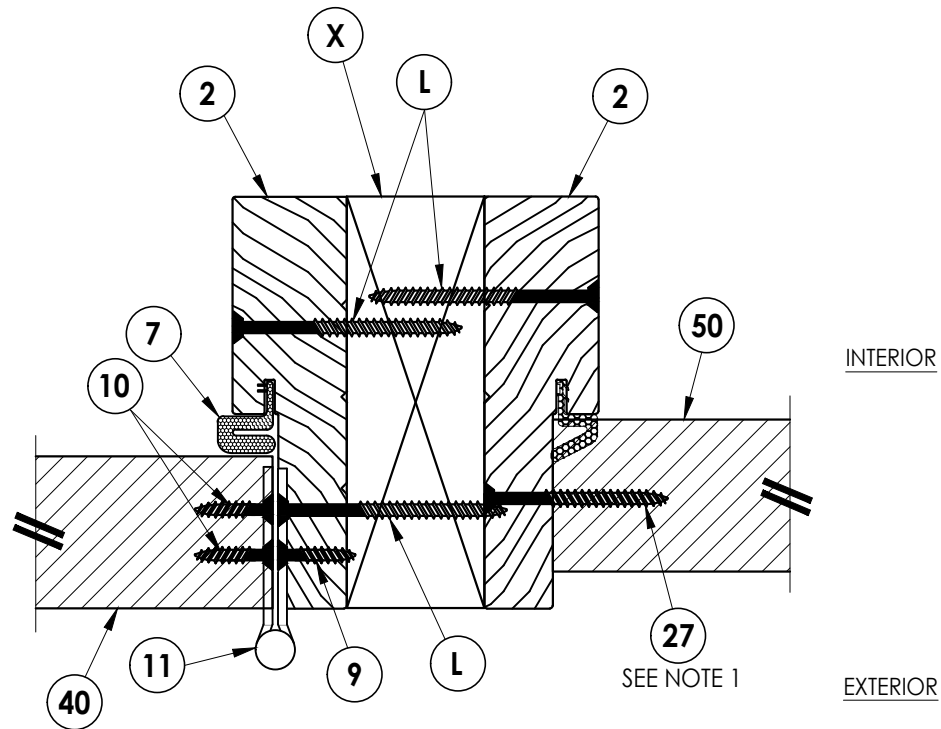
R.W. BUILDING CONSULTANTS, INC.
P.O. Box 230, Valrico, FL 33595
Phone No.: 813.659.9197
FBPE Registry No. 9813



1
5 **HORIZONTAL CROSS SECTION**



2
5 **HORIZONTAL CROSS SECTION**
SHOWN w/ PVC JAMBS



3
5 **HORIZONTAL CROSS SECTION**
SHOWN w/ WOOD JAMBS

Notes:

1. Sidelite assembly screws located 6" from each end and 5 more screws equally spaced between (7 screws total per side jamb).

Documents Prepared By:
Lyndon F. Schmidt
P.E. No. 43409

RW BUILDING CONSULTANTS, INC.
P.O. Box 230, Valrico, FL 33595
Phone No.: 813.659.9197
FBPE Registry No. 9813

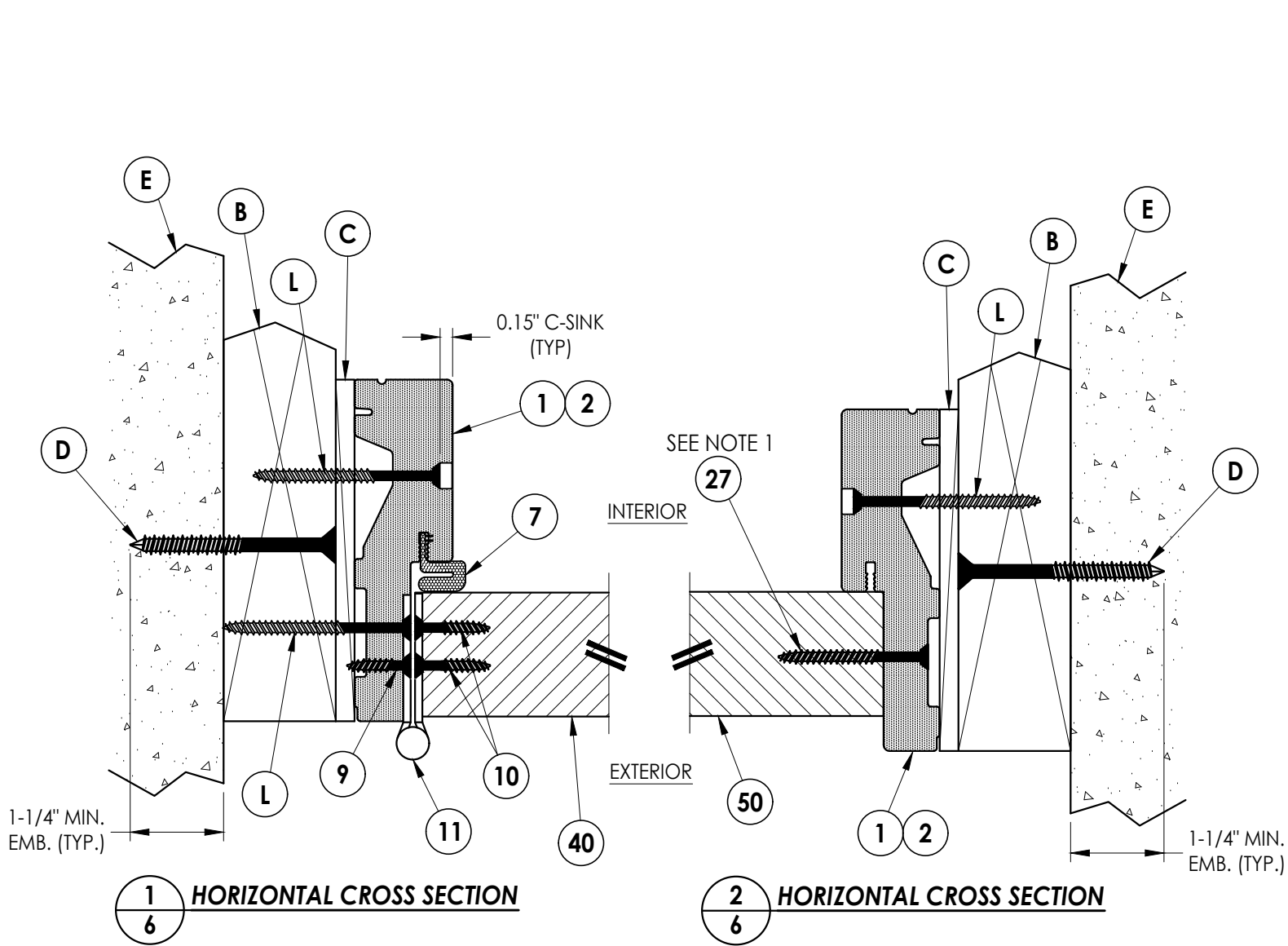
PRODUCT: TRINITY
FIBERGLASS PATIO DOOR
"Impact"

PART OR ASSEMBLY:
HORIZONTAL
CROSS SECTIONS

NO.	DATE	REVISIONS
1	8/01/23	UPDATE TO 8TH ED. (2023) FBC
		LFS
		BY

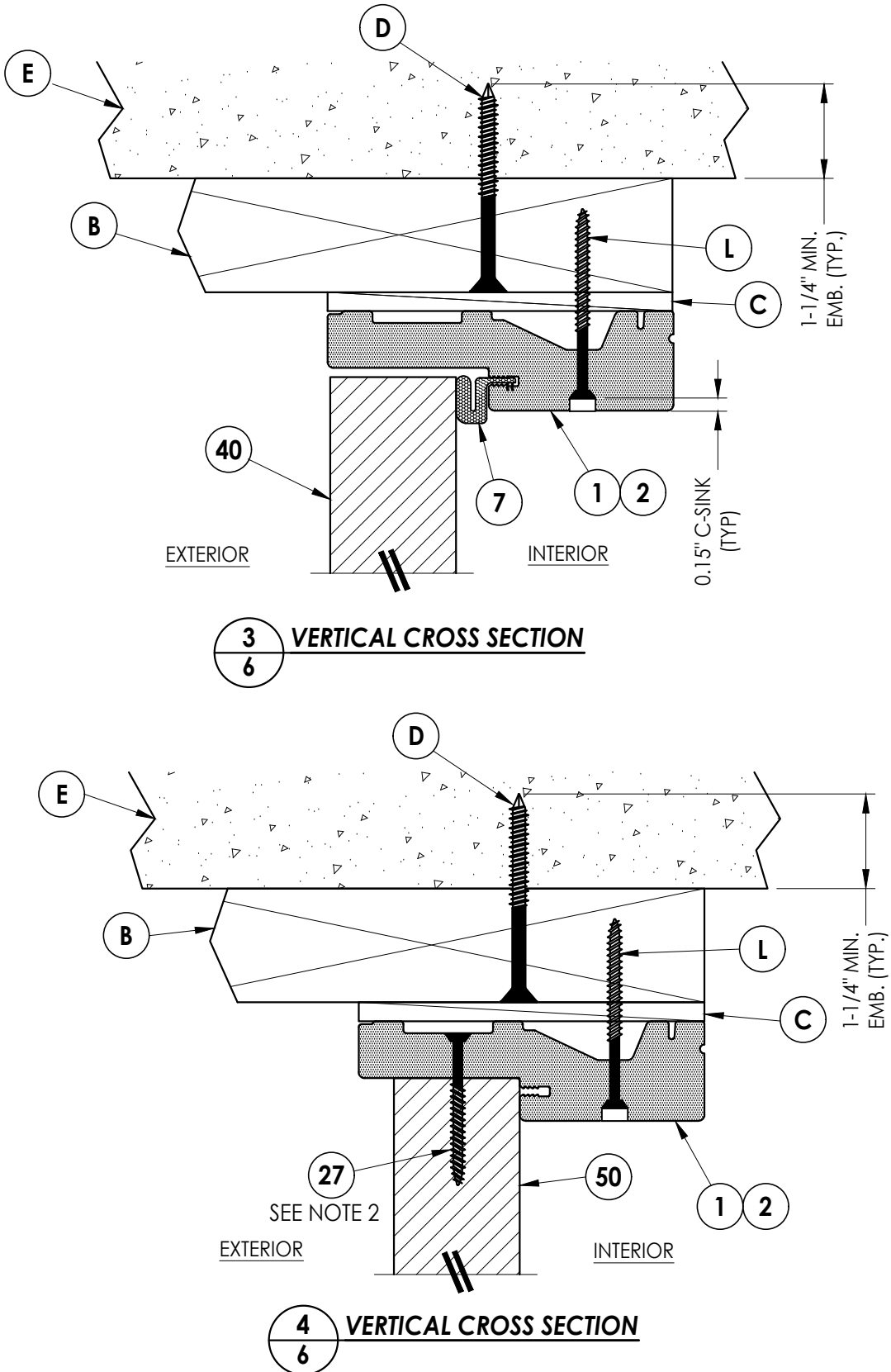
DATE: 6/13/23
SCALE: N.T.S.
DWG. BY: RW
CHK. BY: LFS
DRAWING NO.: FL-37184.4
SHEET 5 OF 12

Z:\2023 FBC Drawings\Trinity Glass Int\FL-37184 R2\FL-37184.4.dwg



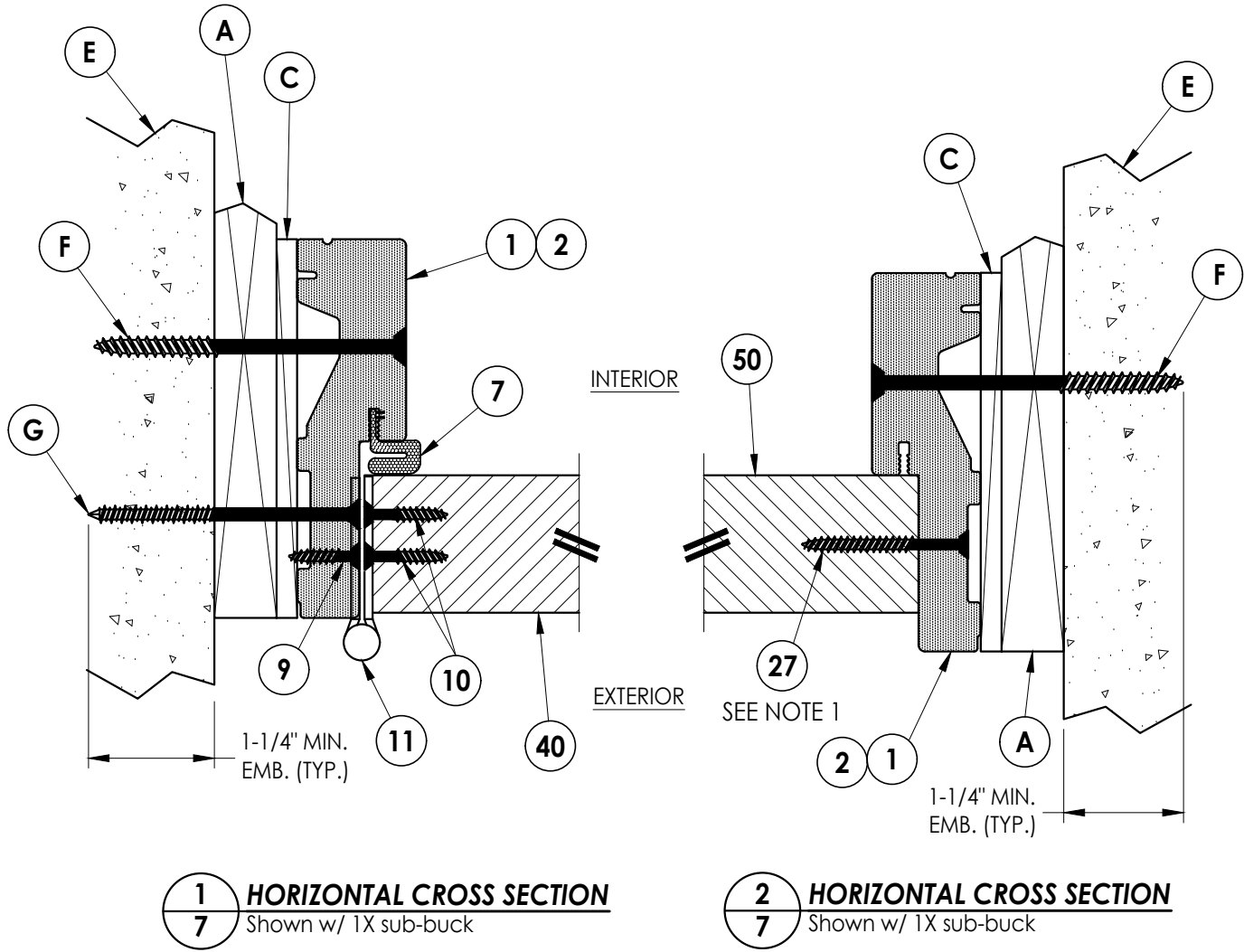
Notes:

1. Sidelite assembly screws located 6" from each end and 5 more screws equally spaced between (7 screws total per side jamb).
2. Sidelite assembly screws located 10" from each end (2 screws total along head & sill).

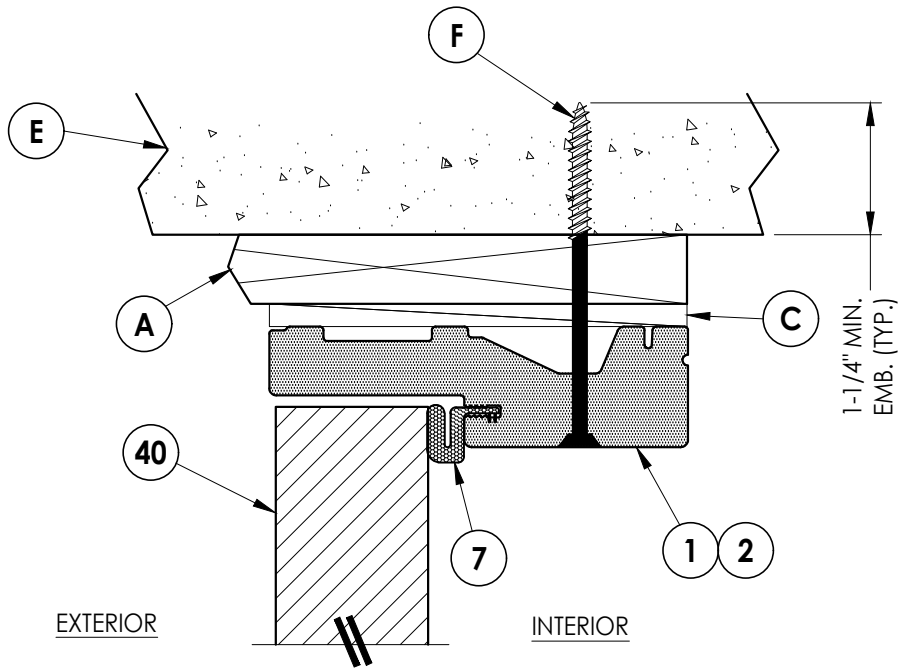


Documents Prepared By: Lyndon F. Schmidt P.E. No. 43409		BUILDING CONSULTANTS, INC. P.O. Box 230, Valrico, FL 33595 Phone No.: 813.659.9197 FBPE Registry No. 9813	
PRODUCT: TRINITY FIBERGLASS PATIO DOOR "Impact"		PART OR ASSEMBLY: HORIZONTAL & VERTICAL CROSS SECTIONS (2X BUCK)	
</			

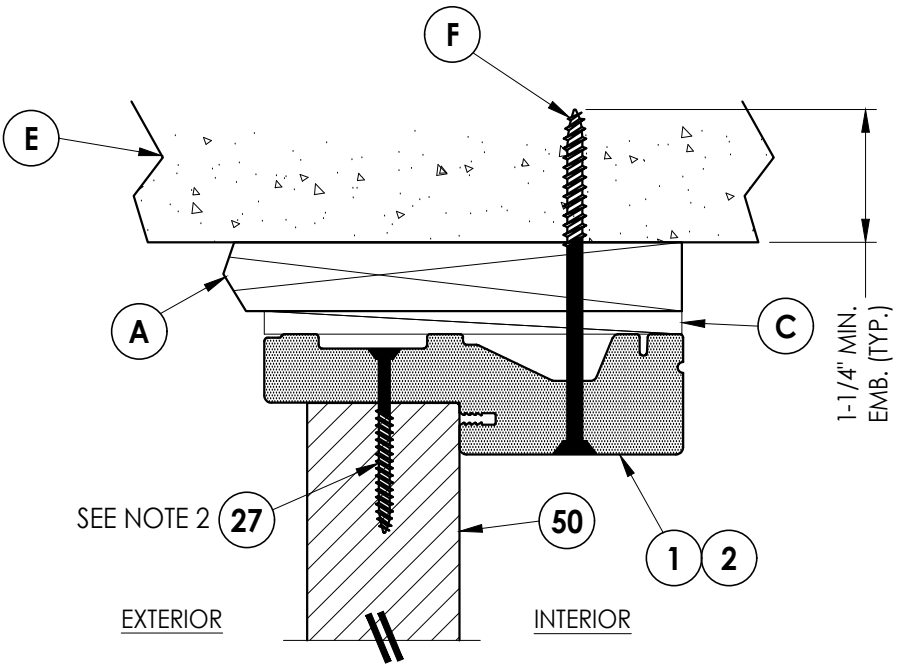
Z:\2023 FBC Drawings\Trinity Glass Int\FL-37184 R2\F-37184.4.dwg



- Notes:
1. Sidelite assembly screws located 6" from each end and 5 more screws equally spaced between (7 screws total per side jamb).
 2. Sidelite assembly screws located 10" from each end (2 screws total along head & sill).

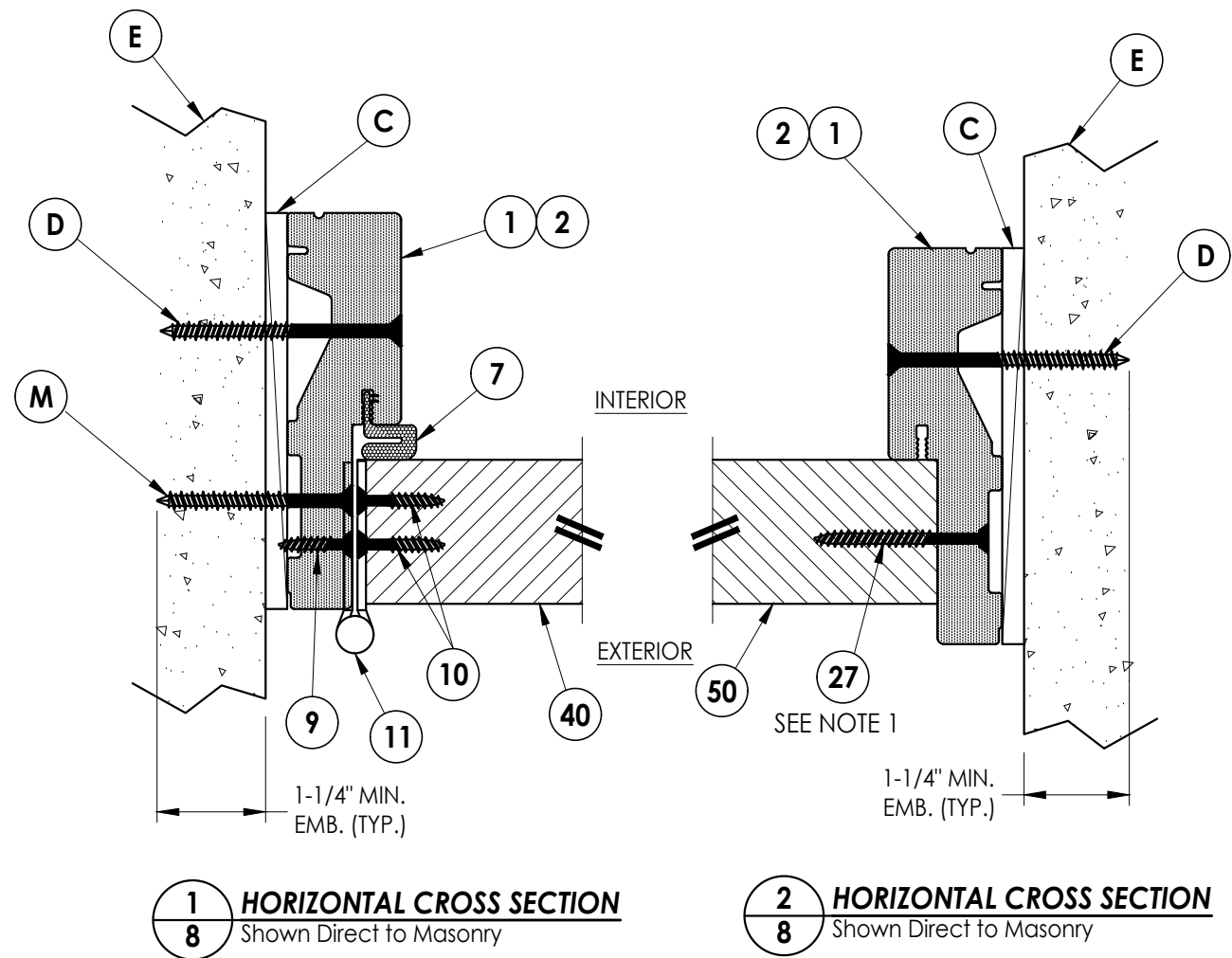


3 VERTICAL CROSS SECTION
7 Shown w/ 1X sub-buck



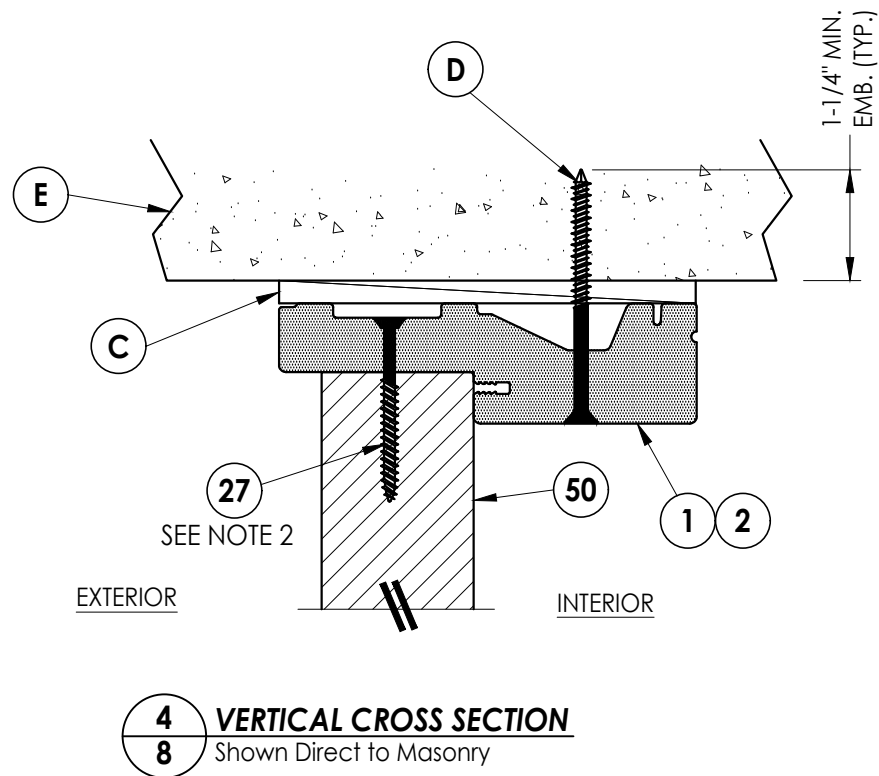
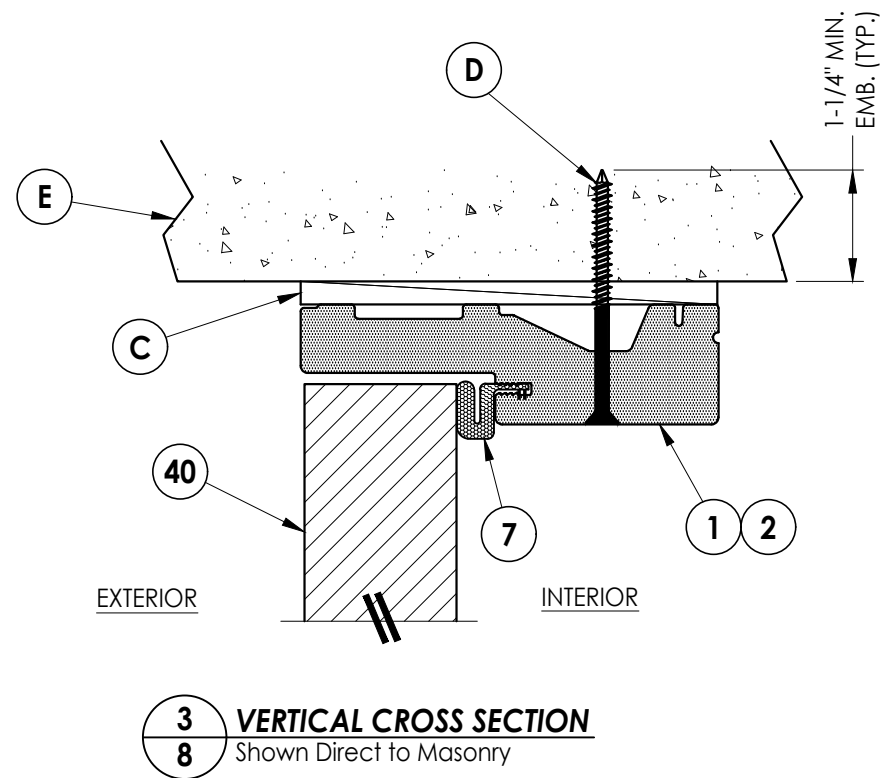
4 VERTICAL CROSS SECTION
7 Shown w/ 1X sub-buck

Documents Prepared By: Lyndon F. Schmidt P.E. No. 43409		BUILDING CONSULTANTS, INC. P.O. Box 230, Valrico, FL 33595 Phone No.: 813.659.9197 FBPE Registry No. 9813	
PRODUCT: TRINITY FIBERGLASS PATIO DOOR "Impact"		PART OR ASSEMBLY: HORIZONTAL & VERTICAL CROSS SECTIONS (1X BUCK)	



Notes:

1. Sidelite assembly screws located 6" from each end and 5 more screws equally spaced between (7 screws total per side jamb).
2. Sidelite assembly screws located 10" from each end (2 screws total along head & sill).

[illegible]

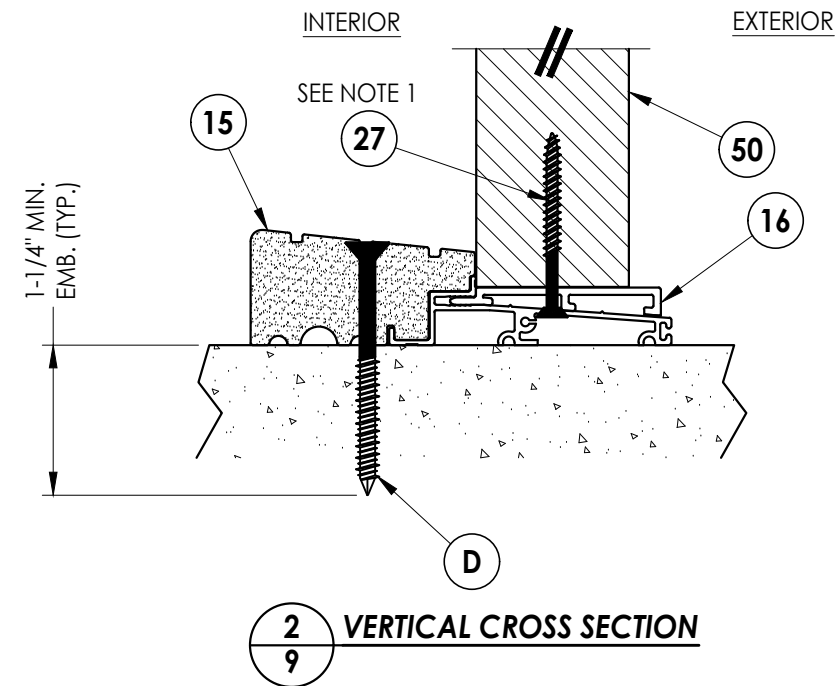
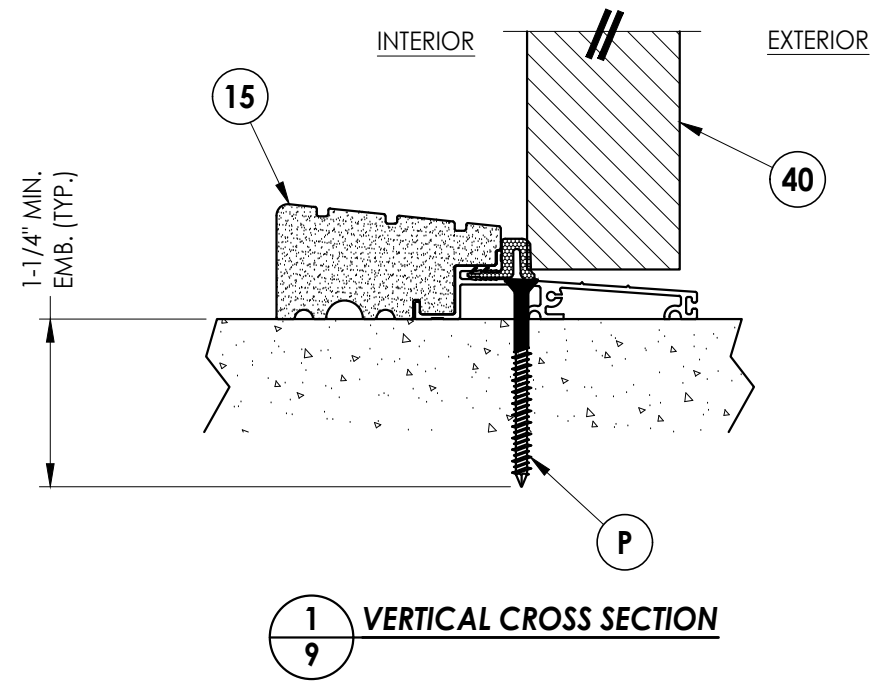
Documents Prepared By:
Lyndon F. Schmidt
P.E. No. 43409

Radiant BUILDING CONSULTANTS, INC.

P.O. Box 230, Valrico, FL 33595
Phone No.: 813.659.9197
FBPE Registry No. 9813

© 2023 R.W. BUILDING CONSULTANTS INC.

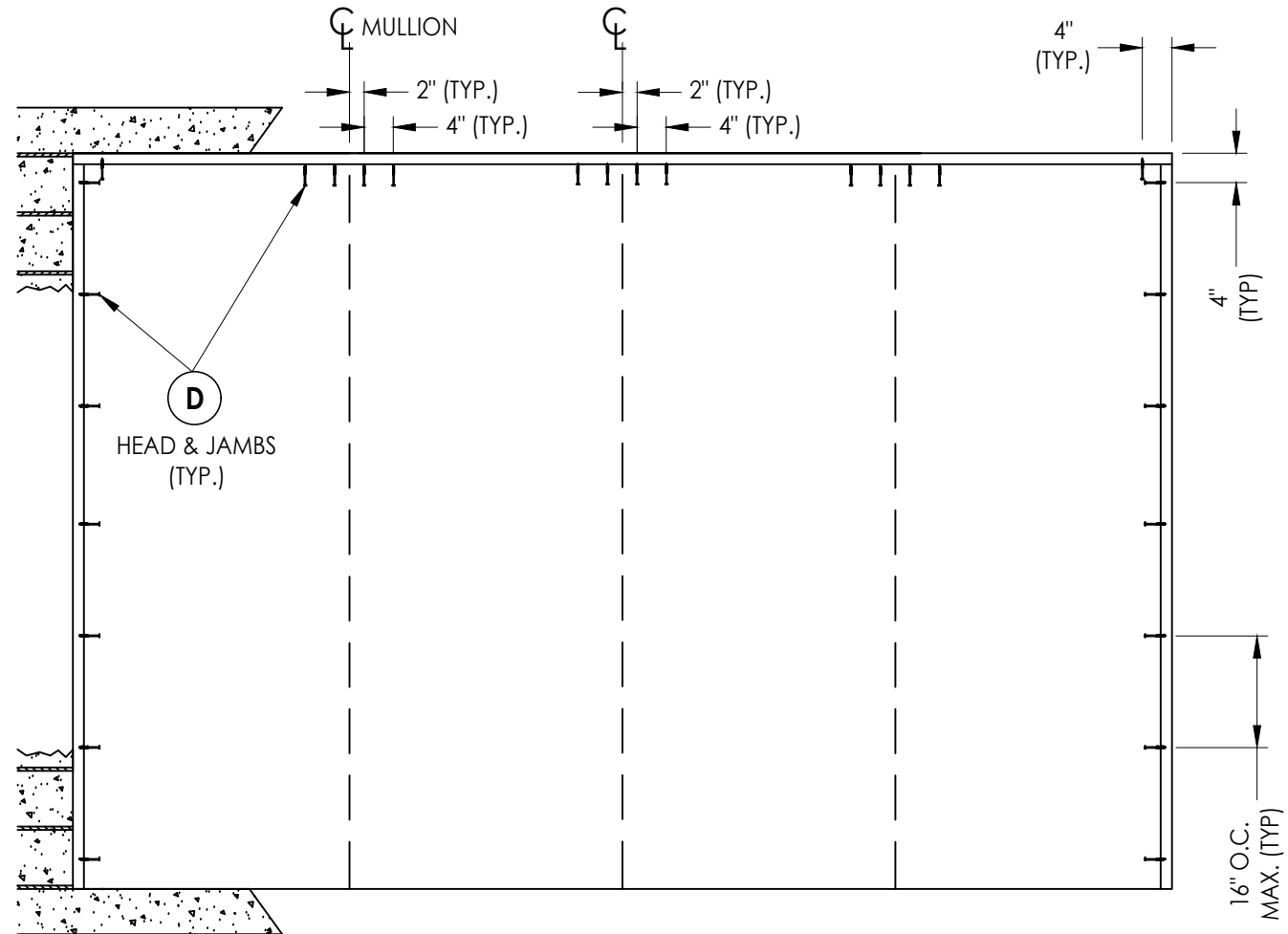
1. Sidelite assembly screws located 10" from each end (2 screws total along head & sill).

[illegible]

Documents Prepared By:
Lyndon F. Schmidt
P.E. No. 43409

R^W BUILDING CONSULTANTS, INC.
P.O. Box 230, Valrico, FL 33595
Phone No.: 813.659.9197
FBPE Registry No. 9813

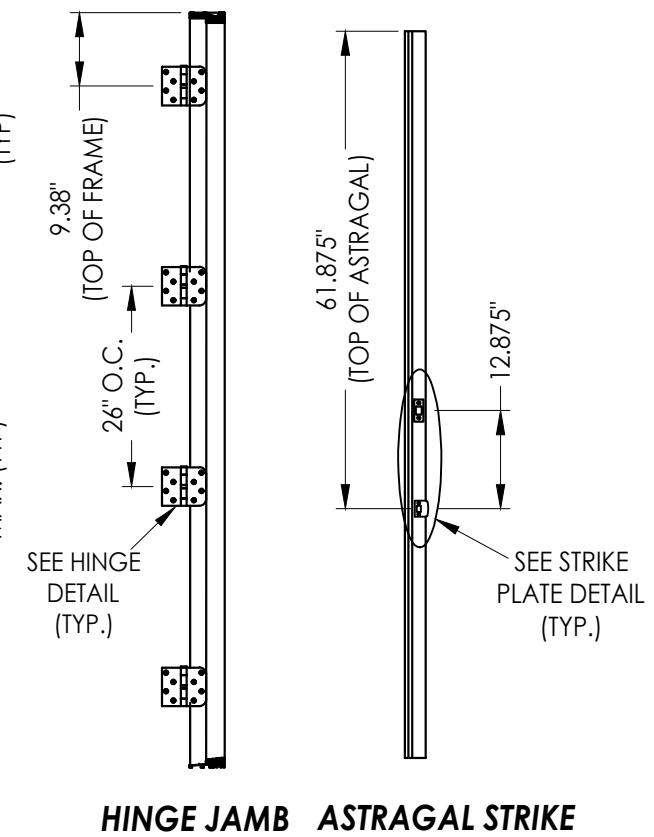
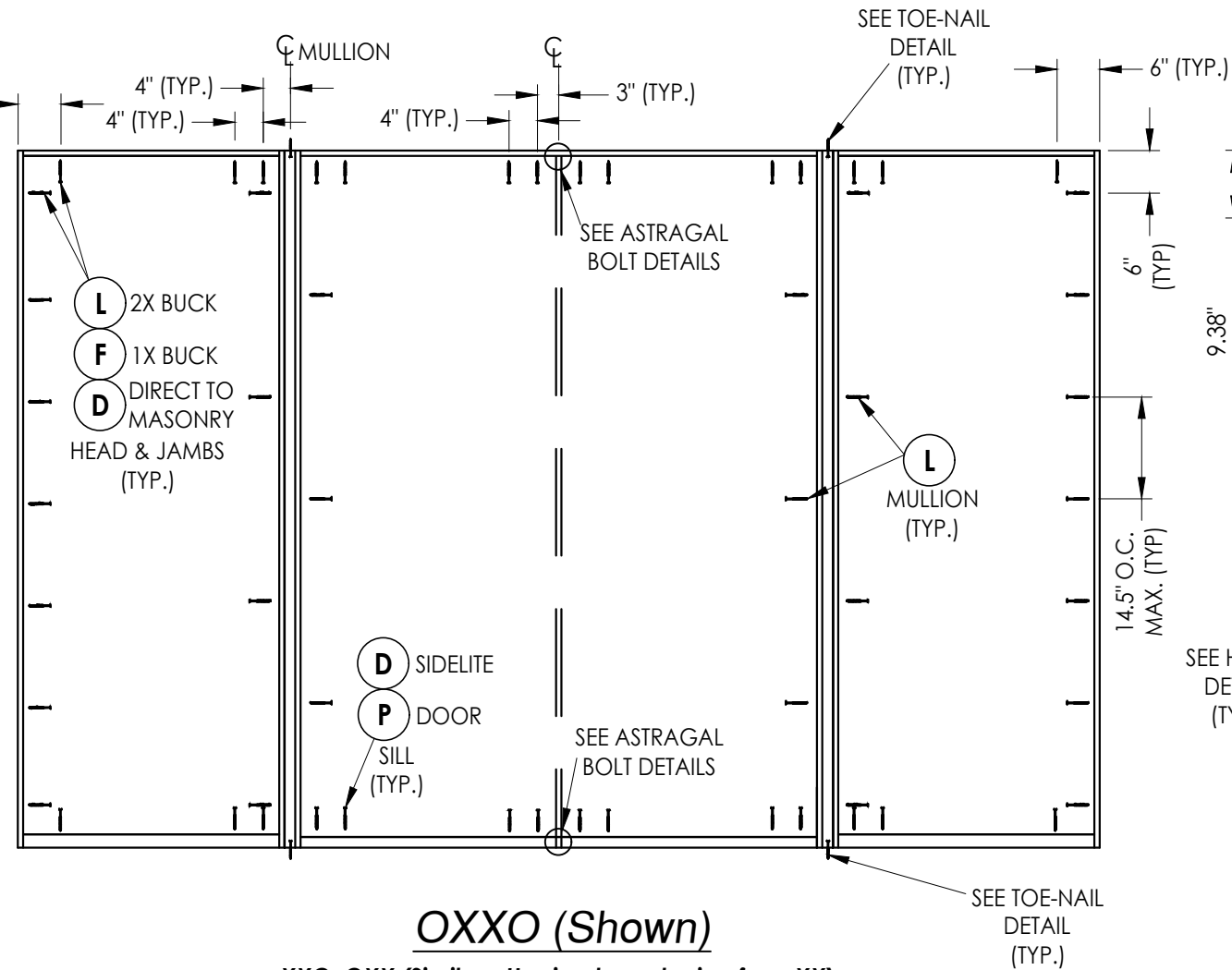
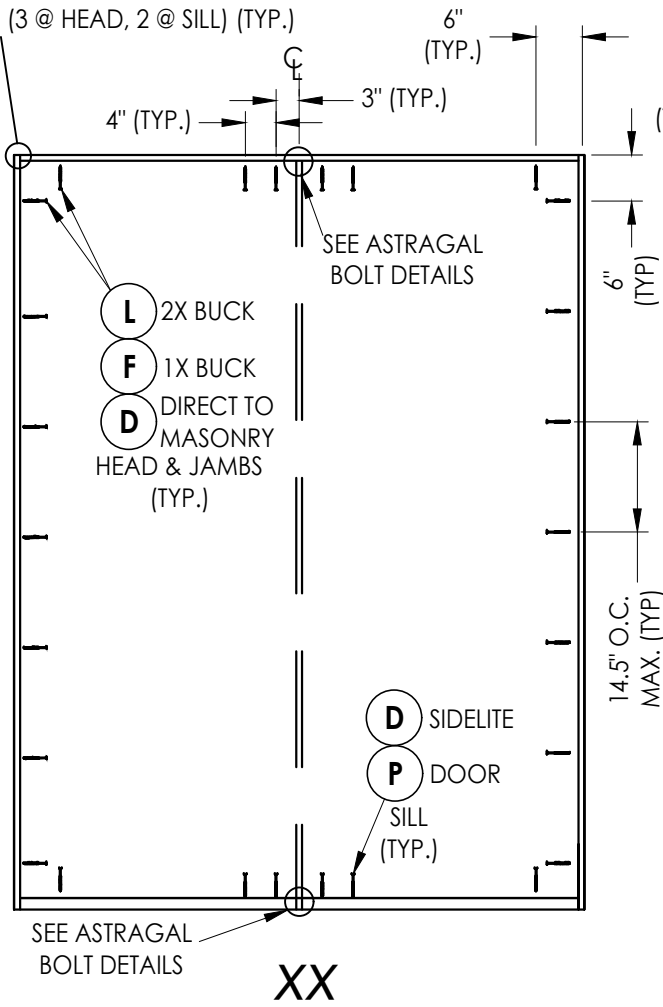
2X BUCK ANCHORING



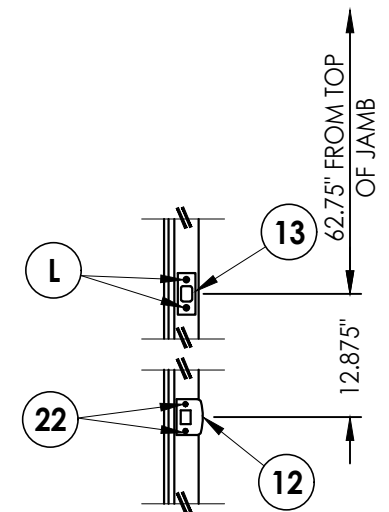
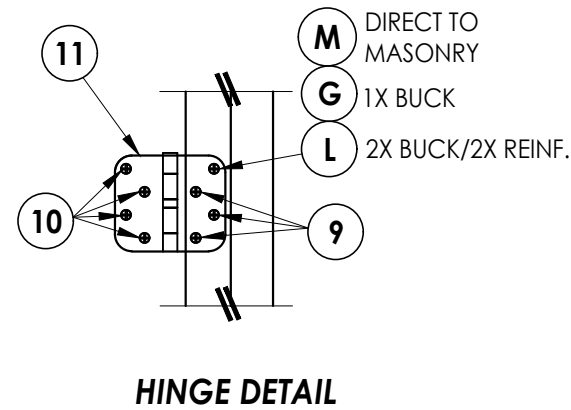
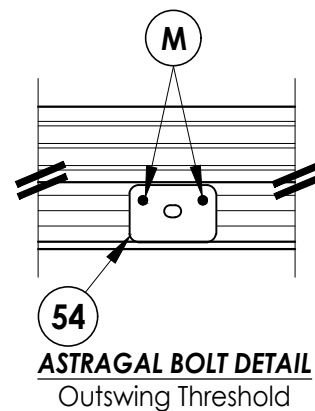
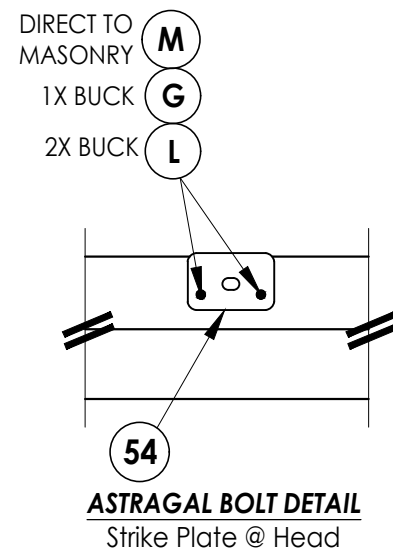
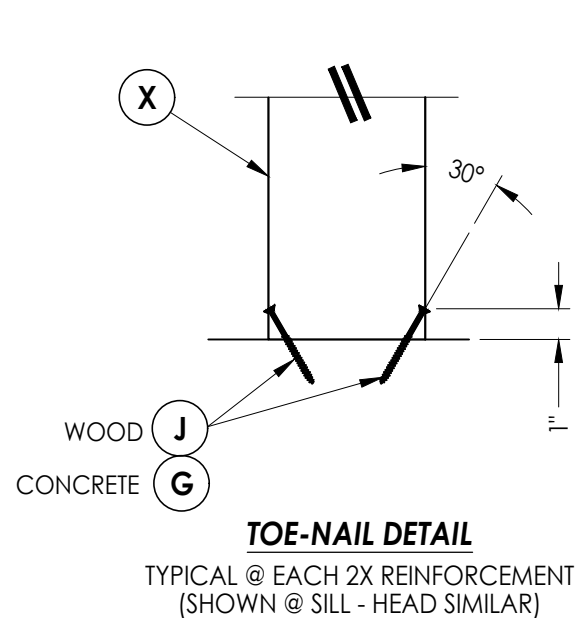
OXXO (Shown)
XXO, OXX (Similar)

[illegible]

ATTACH FRAME CORNERS w/ #8 X
2" COURSE THREAD DRYWALL
SCREWS (3 @ HEAD, 2 @ SILL) (TYP.)



FRAME ANCHORING



HARDWARE DETAILS

[illegible]

© 2023 K.W. BUILDING CONSULTANTS INC.

Z:\2023 FBC Drawings\Trinity Glass Int'\FL-37184 R2\FL-37184.4.dwg

BILL OF MATERIALS		
ITEM #	DESCRIPTION	MATERIAL
A	1X BUCK (G >= 0.42)	WOOD
B	2X BUCK (G >= 0.42)	WOOD
C	1/4" MAX. SHIM SPACE	-
D	1/4" X 2-3/4" PFH DeWALT OR ITW CONCRETE SCREW	STEEL
E	MASONRY - 3,000 PSI MIN. CONCRETE CONFORMING TO ACI 301 OR HOLLOW BLOCK CONFORMING TO ASTM C90	CONCRETE
F	1/4" X 3-3/4" PFH DeWALT OR ITW CONCRETE SCREW	STEEL
G	3/16" X 3-1/4" PFH ITW CONCRETE SCREW	STEEL
J	#10 X 3" PFH WOOD SCREW	STEEL
L	#10 X 2-1/2" PFH WOOD SCREW (1.15" MIN. EMB.)	STEEL
M	3/16" X 2-1/4" PFH ITW CONCRETE SCREW	STEEL
P	1/4" X 2-1/4" PFH DeWALT OR ITW CONCRETE SCREW	STEEL
X	2X REINFORCEMENT (SG = 0.55)	WOOD
1	PVC JAMB	COMP
2	WOOD JAMB	WOOD
7	WEATHERSTRIP	FOAM
9	#9 X 3/4" PFH WOOD SCREW	STEEL
10	#9 X 1" PFH WOOD SCREW	STEEL
11	4" X 4" HINGE	STEEL
12	LATCH STRIKE PLATE	STEEL
13	DEADBOLT STRIKE PLATE	STEEL
15	OUTSWING THRESHOLD	ALUM/COMP
16	OUTSWING SIDELITE ADAPTER	PVC
22	#8 X 2-1/2" PFH WOOD SCREW	STEEL
27	#10 X 2" PFH SMS	STEEL
40	DOOR PANEL	-
50	SIDELITE PANEL	-
53	ALUMINUM ASTRAGAL	ALUM
54	ASTRAGAL STRIKE PLATE	STEEL
55	#8 X 1" PFH WS	STEEL

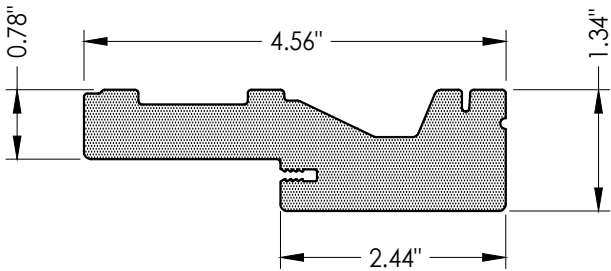
CONCRETE ANCHOR NOTES:

1. Concrete anchor locations at the corners may be adjusted to maintain the min. edge distance to mortar joints.
2. Concrete anchor locations noted as "MAX. ON CENTER" must be adjusted to maintain the min. edge distance to mortar joints, additional concrete anchors may be required to ensure the "MAX. ON CENTER" dimension are not exceeded.
3. Concrete anchor table:

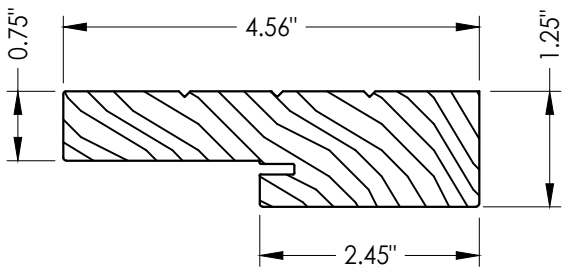
ANCHOR TYPE	ANCHOR SIZE	MIN. EMBEDMENT	MIN. CLEARANCE TO MASONRY EDGE	MIN. CLEARANCE TO ADJACENT ANCHOR
ITW BUILDEX TAPCON®	3/16"	1-1/4"	3"	1-1/2"
	1/4"	1-1/4"	2"	4"
DeWALT ULTRAON®+	1/4"	1-1/4"	1"	4"

WOOD SCREW INSTALLATION NOTES:

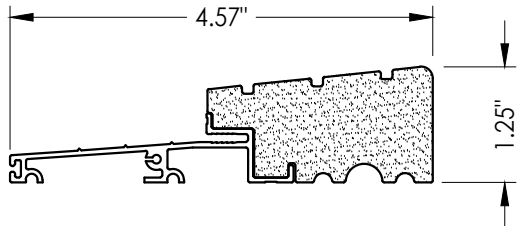
1. Maintain a minimum 5/8" edge distance, 1" end distance, & 1" o.c. spacing of wood screws to prevent the splitting of wood.



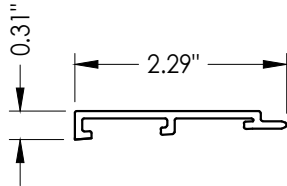
1 PVC JAMB



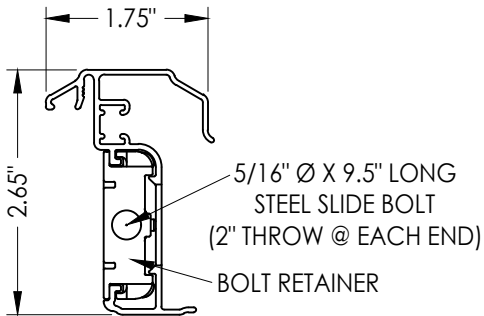
2 WOOD JAMB
FINGER JOINTED PINE



15 **OUTSWING THRESHOLD**
High-dam



16 OUTSWING SIDELITE ADAPTER



53 **ENDURA ASTRAGAL**
Ultimate Hurricane

DATE: 6/13/23		REVISIONS	
SCALE: N.T.S.			
DWG. BY: RW			
CHK. BY: LFS			
DRAWING NO.: FL-37184.4			
SHEET 12	OF 12		
1	8/01/23	UPDATE TO 8TH ED. (2023)	FBC
NO.	DATE		BY
PRODUCT: TRINITY		PART OR ASSEMBLY:	
FIBERGLASS PATIO DOOR		BILL OF MATERIALS	
"Impact"		& COMPONENTS	
Documents Prepared By:		BUILDING CONSULTANTS, INC.	
Lyndon F. Schmidt		P.O. Box 230, Valrico, FL 33595	
P.E. No. 43409		Phone No.: 813.659.9197	
		FBPE Registry No. 9813	