



DEPARTMENT OF REGULATORY AND ECONOMIC RESOURCES (RER)
BOARD AND CODE ADMINISTRATION DIVISION
NOTICE OF ACCEPTANCE (NOA)

MIAMI-DADE COUNTY
PRODUCT CONTROL SECTION
11805 SW 26 Street, Room 208
Miami, Florida 33175-2474
T (786) 315-2590 F (786) 315-2599
www.miamidade.gov/economy

S&P Air Control, LLC
3005 South Hickory Street
Chattanooga, TN 37407

SCOPE:

This NOA is being issued under the applicable rules and regulations governing the use of construction materials. The documentation submitted has been reviewed and accepted by Miami-Dade County RER-Product Control Section to be used in Miami Dade County and other areas where allowed by the Authority Having Jurisdiction (AHJ).

This NOA shall not be valid after the expiration date stated below. The Miami-Dade County Product Control Section (In Miami Dade County) and/or the AHJ (in areas other than Miami Dade County) reserve the right to have this product or material tested for quality assurance purposes. If this product or material fails to perform in the accepted manner, the manufacturer will incur the expense of such testing and the AHJ may immediately revoke, modify, or suspend the use of such product or material within their jurisdiction. RER reserves the right to revoke this acceptance, if it is determined by Miami-Dade County Product Control Section that this product or material fails to meet the requirements of the applicable building code.

This product is approved as described herein and has been designed to comply with the Florida Building Code, including the High Velocity Hurricane Zone.

DESCRIPTION: Model FL-D-4 Aluminum Louver System

APPROVAL DOCUMENT: Drawing No. **25-058**, titled "Aluminum Louver System Model FL-D-4", sheets 1 through 16 of 16, dated 07/07/2025, prepared by Tilteco, Inc, signed and sealed by Walter A. Tillit, Jr., P.E., bearing the Miami-Dade County Product Control renewal stamp with the Notice of Acceptance number and expiration date by the Miami-Dade County Product Control Section.

MISSILE IMPACT RATING: Large and Small Missile Impact Resistant

LABELING: A permanent label with the manufacturer's name or logo, Chattanooga, TN or Hartford, AL, model/series, and following statement: "Miami-Dade County Product Control Approved", is to be located on each unit.

LIMITATION: This louver has not been evaluated for compliance with the impact testing standard ANSI/AMCA 540.

RENEWAL of this NOA shall be considered after a renewal application has been filed and there has been no change in the applicable building code negatively affecting the performance of this product.

TERMINATION of this NOA will occur after the expiration date or if there has been a revision or change in the materials, use, and/or manufacture of the product or process. Misuse of this NOA as an endorsement of any product, for sales, advertising or any other purposes shall automatically terminate this NOA. Failure to comply with any section of this NOA shall be cause for termination and removal of NOA.

ADVERTISEMENT: The NOA number preceded by the words Miami-Dade County, Florida, and followed by the expiration date may be displayed in advertising literature. If any portion of the NOA is displayed, then it shall be done in its entirety.

INSPECTION: A copy of this entire NOA shall be provided to the user by the manufacturer or its distributors and shall be available for inspection at the job site at the request of the Building Official.

This NOA **renews NOA # 25-0805.04** and consists of this page 1 and evidence pages E-1, E-2, E-3 and E-4, as well as approval document mentioned above.

The submitted documentation was reviewed by **Carlos M. Utrera, P.E.**



05/18/26

NOA No. 26-0428.02
Expiration Date: January 17, 2032
Approval Date: May 28, 2026
Page 1

NOTICE OF ACCEPTANCE: EVIDENCE SUBMITTED

1. EVIDENCE SUBMITTED UNDER PREVIOUS NOA's

A. DRAWINGS “Submitted under NOA # 15-0420.03”

1. Drawing No. **15-024**, titled “Aluminum Louver System Model FL-D-4”, sheets 1 through 15 of 15, dated 03/16/2015, prepared by Tilteco, Inc, signed and sealed by Walter A. Tillit, Jr., P.E. on 03/31/2015.

B. TESTS “Submitted under NOA # 11-0104.02”

1. Test reports on 1) Uniform Static Air Pressure Test, Loading per FBC, TAS 202-94
2) Large Missile Impact Test per FBC, TAS 201-94
3) Cyclic Wind Pressure Loading per FBC, TAS 203-94
along with marked-up drawings and installation diagram of a Model FLD-4 Aluminum Louver System, prepared by American Test Lab of South Florida, Test Report No. **1207.01-10**, dated 12/22/2010, signed and sealed by Julio E. Gonzalez, P.E.

C. CALCULATIONS “Submitted under NOA # 15-0420.03”

1. Revision to aluminum louver system Model FL-D-4 prepared by Tilteco Inc, dated 03/16/2015, signed and sealed by Walter A. Tillit Jr., P.E.

“Submitted under NOA # 15-0107.03”

2. Revision to aluminum louver system Model FL-D-4 prepared by Tilteco Inc, dated 12/09/2014, signed and sealed by Walter A. Tillit Jr., P.E.

“Submitted under NOA # 08-0902.08”

3. Revision to Aluminum Louver System Model FL-D-4, prepared by Tilteco Inc, dated 08/08/2008, sheets 1 through 139 of 139, complying with F.B.C. 2007, signed and sealed by Walter A. Tillit Jr., P.E.

D. QUALITY ASSURANCE

1. Miami-Dade Department of Regulatory and Economic Resources (RER)

E. MATERIAL CERTIFICATIONS “Submitted under NOA # 11-0104.03”

1. Test report on Tensile Test per ASTM E8, issued by QC Metallurgical, Inc., dated 12/21/2010, signed and sealed by Frank E. Grate Jr., P.E.



Carlos M. Utrera, P.E.
Product Control Examiner
NOA No. 26-0428.02
Expiration Date: January 17, 2032
Approval Date: May 28, 2026

NOTICE OF ACCEPTANCE: EVIDENCE SUBMITTED

F. STATEMENTS “Submitted under NOA # 15-0420.03”

1. Statement letter of code conformance to the 5th edition (2014) FBC issued by Tilteco, Inc, dated 03/31/2015, signed and sealed by Walter A. Tillit Jr., P.E.

“Submitted under NOA # 12-0120.05”

2. Statement letter of code conformance to 2010 FBC, issued by Tilteco, Inc, dated 01/16/2012, signed and sealed by Walter A. Tillit Jr., P.E.

“Submitted under NOA # 11-0104.02”

2. Statement letter of no financial interest issued by Tilteco, Inc, dated 12/23/2010, signed and sealed by Walter A. Tillit Jr., P.E.

2. EVIDENCE SUBMITTED UNDER NOA #17-0823.06

A. DRAWINGS

1. Drawing No. 17-128, titled “Aluminum Louver System Model FL-D-4”, sheets 1 through 15 of 15, dated 08/02/2017, prepared by Tilteco, Inc., signed and sealed by Walter A. Tillit, Jr., P.E.

B. TESTS

1. None.

C. CALCULATIONS

1. Revision to aluminum louver system Model FL-D-4 prepared by Tilteco Inc., dated 08/15/2017, signed and sealed by Walter A. Tillit Jr., P.E.

D. QUALITY ASSURANCE

1. Miami-Dade Department of Regulatory and Economic Resources (RER)

E. MATERIAL CERTIFICATIONS

1. None.

F. STATEMENTS

1. Statement letter of code conformance to 6th Edition (2017) FBC, issued by Tilteco, Inc., dated 08/02/2017, signed and sealed by Walter A. Tillit Jr., P.E.



Carlos M. Utrera, P.E.
Product Control Examiner
NOA No. 26-0428.02
Expiration Date: January 17, 2032
Approval Date: May 28, 2026

NOTICE OF ACCEPTANCE: EVIDENCE SUBMITTED

3. EVIDENCE SUBMITTED UNDER NOA # 20-0115.03

A. DRAWINGS

1. Drawing No. 17-128, titled “Aluminum Louver System Model FL-D-4”, sheets 1 through 15 of 15, dated 08/02/2017, with revision 2 dated 11/08/2019, prepared by Tilteco, Inc., signed and sealed by Walter A. Tillit, Jr., P.E.

B. TESTS

1. None.

C. CALCULATIONS

1. None.

D. QUALITY ASSURANCE

1. Miami-Dade Department of Regulatory and Economic Resources (RER)

E. MATERIAL CERTIFICATIONS

1. None.

F. STATEMENTS

1. Letter requesting the company name change from “United Enertech Corp.” to its parent company, “United Enertech Holdings, LLC”, issued by Winstead PC, dated 01/31/2020, signed by Andrew J. Ostapko, Attorney.
2. Certificate of merger between “United Enertech Corp.” and “Enertech Acquisition Corp.”, issued by the State of Delaware, dated 01/04/2017.
3. Amended and restated certificate of incorporation of “United Enertech Corp.” (F/K/A “Enertech Acquisition Corp.”, issued by the State of Delaware, dated 12/30/2016.
4. Certificate of formation of “United Enertech Holdings, LLC”, issued by the State of Delaware, dated 12/02/2016.



Carlos M. Utrera, P.E.
Product Control Examiner
NOA No. 26-0428.02
Expiration Date: January 17, 2032
Approval Date: May 28, 2026

NOTICE OF ACCEPTANCE: EVIDENCE SUBMITTED

4. EVIDENCE SUBMITTED UNDER NOA # 25-0805.04 AND NEW

A. DRAWINGS

1. Drawing No. **25-058**, titled “Aluminum Louver System Model FL-D-4”, sheets 1 through 16 of 16, dated 07/07/2025, prepared by Tilteco, Inc, signed and sealed by Walter A. Tillit, Jr., P.E.

B. TESTS

1. Test reports on 1) Uniform Static Air Pressure Test, Loading per FBC, TAS 202-94
2) Large Missile Impact Test per FBC, TAS 201-94
3) Cyclic Wind Pressure Loading per FBC, TAS 203-94
along with marked-up drawings and installation diagram of a Model FLD-4 Aluminum Louver System, prepared by PRI Construction Materials Technologies LLC, Test Report No. **1697T0008**, dated 02/13/2026, signed and sealed by Zachary R. Priest, P.E.

C. CALCULATIONS

1. None.

D. QUALITY ASSURANCE

1. Miami-Dade Department of Regulatory and Economic Resources (RER).

E. MATERIAL CERTIFICATIONS

1. None.

F. STATEMENTS

1. Statement letter of code conformance to 8th Edition (2023) of the FBC, issued by Tilteco, Inc., dated 07/07/2025, signed and sealed by Walter A. Tillit Jr., P.E.
2. Amended Sales Agreement made by S&P Air Control, LLC, dated April 8th, 2024.



Carlos M. Utrera, P.E.
Product Control Examiner
NOA No. 26-0428.02
Expiration Date: January 17, 2032
Approval Date: May 28, 2026

The following pages in this document were submitted by the manufacturer (third party) to represent the product being approved and establish the limits of use. The pages may include technical drawings, schematics and installation details.

GENERAL NOTES:

1. ALUMINUM LOUVER SYSTEM SHOWN ON THIS PRODUCT APPROVAL DOCUMENT (P.A.D.) HAS BEEN VERIFIED FOR CODE COMPLIANCE IN ACCORDANCE WITH THE **2023 (8th EDITION) AND 2020 (7th EDITION)** OF THE FLORIDA BUILDING CODE. THIS PRODUCT MAY BE INSTALLED WITHIN HIGH VELOCITY HURRICANE ZONES (HVHZ).

DESIGN WIND LOADS SHALL BE DETERMINED AS PER SECTION 1620 OF THE ABOVE MENTIONED CODE, USING **ASCE 7-22 (FBC 2023) & ASCE 7-16 (FBC 2020)** AND SHALL NOT EXCEED THE MAXIMUM (A.S.D.) DESIGN PRESSURE RATINGS INDICATED ON THIS SHEET.

IN ORDER TO VERIFY THE ABOVE CONDITION, ULTIMATE DESIGN WIND LOADS DETERMINED PER **ASCE 7-22 & ASCE 7-16** SHALL BE FIRST REDUCED TO A.S.D. DESIGN WIND LOADS BY MULTIPLYING THEM BY 0.6 IN ORDER TO COMPARE THESE W/MAX. (A.S.D) DESIGN PRESSURE RATINGS INDICATED ON THIS SHEET.

IN ORDER TO VERIFY THAT COMPONENTS AND ANCHORS ON THIS P.A.D AS TESTED WERE NOT OVER STRESSED, A 33% INCREASE IN ALLOWABLE STRESS FOR WIND LOADS WAS **NOT** USED IN THEIR ANALYSIS. A DURATION FACTOR $CD=1.60$ WAS USED FOR VERIFICATION OF FASTENERS SPACINGS IN WOOD, PER N.D.S 2018.

ALUMINUM LOUVER SYSTEM'S ADEQUACY FOR IMPACT AND FATIGUE RESISTANCE HAS BEEN VERIFIED IN ACCORDANCE WITH SECTION 1626 OF THE ABOVE MENTIONED CODE AS PER AMERICAN TESTING LAB OF SOUTH FLORIDA REPORTS # 0604.01-01 AND 1207.01-10 AS PER TAS-201, TAS-202 & TAS-203 PROTOCOLS, AS WELL AS PER ANSI/AMCA IMPACT STANDARD 540, PERINTERTEK/ARCHITECTURAL TESTING REPORT # E 0370.01-550-18.

2. ALL ALUMINUM EXTRUSIONS SHALL BE 6063-T6 ALLOY (UNLESS OTHERWISE NOTED). ALL ALUMINUM EXTRUSIONS IN CONTACT WITH DISSIMILAR MATERIALS SHALL COMPLY WITH SECTION III-6 OF THE 2020 & 2015 ALUMINUM DESIGN MANUAL.

3. ALL SCREWS TO BE STAINLESS STEEL 304 OR 316 SERIES W/ 50 ksi YIELD STRENGTH AND 90 ksi TENSILE STRENGTH OR CORROSION RESISTANT COATED CARBON STEEL AS PER DIN 50018. THRU BOLTS AT MULLION TO BE ASTM A-307 GALVANIZED STEEL OR AISI 304 SERIES STAINLESS STEEL. SCREWS AND BOLTS SHALL COMPLY W/ FLORIDA BUILDING CODE SECTION 2411.3.3.4.

4. ALL ALUMINUM COMPONENTS FRAMING SHALL BE WELDED IN ACCORDANCE WITH AWS D1.2 ,PER THE AMERICAN WELDING SOCIETY LATEST EDITION REGULATIONS USE CERTIFIED WELDERS. USE ER-5356 ELECTRODES.

5. **JAMB ANCHOR REQUIREMENTS** : EMBEDMENT AND EDGE DISTANCE ARE BEYOND ANY FINISH.

(A) TO EXISTING POURED CONCRETE: (MIN. $f'_c = 3192$ psi), MIN. EDGE DISTANCE (E.D.) = $2 \frac{1}{2}"$.
- $1 \frac{1}{4}" \varnothing$ TAPCON ANCHORS W/ $1 \frac{3}{4}"$ MIN. EMBEDMENT, AS MANUFACTURED BY ITW BUILDEX.

(B) TO EXISTING A.S.T.M. C-90 CONCRETE BLOCK WALL. MIN. EDGE DISTANCE (E.D.) = $2 \frac{1}{2}"$.
- $1 \frac{1}{4}" \varnothing$ TAPCON ANCHORS W/ $1 \frac{1}{4}"$ MIN. EMBEDMENT, AS MANUFACTURED BY ITW BUILDEX.

(C) TO EXISTING 2x P.T. WOOD BUCK. MIN. EDGE DISTANCE (E.D.) = $1 \frac{1}{2}"$.
- $1 \frac{1}{4}" \varnothing$ LAG SCREWS W/ $1 \frac{1}{2}"$ MIN. EMBEDMENT, AS PER N.D.S. 2018.

(D) TO EXISTING MIN. $1 \frac{1}{8}"$ THICK STEEL MEMBER (ASTM A-500, A-653 OR A-36) MIN. EDGE DISTANCE (E.D.) = $1 \frac{1}{2}"$.
- $1 \frac{1}{4}" \varnothing \times 3 \frac{3}{4}"$, AS MANUFACTURED BY ITW BUILDEX.

(E) ANCHORS SHALL BE INSTALLED FOLLOWING ALL OF THE RECOMMENDATIONS AND SPECIFICATIONS OF THE ANCHOR'S MANUFACTURER.

6. **ANCHORS REQUIRED FOR MULLION CONNECTIONS** SHALL BE AS SPECIFIED ON APPLICABLE SECTIONS SHOWN ON SHEETS 13, 14 & 15.

PRODUCT RENEWED
as complying with the Florida
Building Code
NOA-No. **26-0428.02**

Expiration Date **01/17/2032**

By 
Miami-Dade Product Control

ANCHORS SHALL BE INSTALLED FOLLOWING ALL OF THE RECOMMENDATIONS AND SPECIFICATIONS OF THE ANCHOR'S MANUFACTURER.

7. THIS LOUVER SHALL BE ONLY INSTALLED IN A LOCATION WHERE THE ROOM BEHIND THE LOUVER IS DESIGNED TO DRAIN WATER PENETRATING INTO THE ROOM, AND THE ROOM WILL HOUSE WATER RESISTENT/WATER PROOF EQUIPMENT, COMPONENTS OR SUPPLIES.

8. IT SHALL BE RESPONSIBILITY OF THE CONTRACTOR TO VERIFY THE SOUNDNESS OF THE STRUCTURE WHERE LOUVER SYSTEM IS TO BE ATTACHED TO INSURE PROPER ANCHORAGE.

9. WOOD BUCKS BY OTHERS, MUST BE ANCHORED PROPERLY TO TRANSFER LOADS TO THE BUILDING STRUCTURE. WOOD BUCKS MUST BE SOUTHERN PINE, $G = 0.55$.

10. (A) THIS PRODUCT APPROVAL DOCUMENT (P.A.D.) PREPARED BY THIS ENGINEER IS GENERIC AND DOES NOT PROVIDE INFORMATION FOR A SITE SPECIFIC PROJECT; i.e. WHERE THE SITE CONDITIONS DEVIATE FROM THE P.A.D.

(B) CONTRACTOR TO BE RESPONSIBLE FOR THE SELECTION INCLUDING LIFE SAFETY, PURCHASE AND INSTALLATION OF THIS PRODUCT BASED ON THIS PRODUCT APPROVAL PROVIDED HE/SHE DOES NOT DEVIATE FROM THE CONDITIONS DETAILED ON THIS DOCUMENT. CONSTRUCTION SAFETY AT SITE IS THE CONTRACTOR'S RESPONSIBILITY.

(C) THIS PRODUCT APPROVAL DOCUMENT WILL BE CONSIDERED INVALID IF MODIFIED.

(D) SITE SPECIFIC PROJECTS SHALL BE PREPARED BY A FLORIDA REGISTERED ENGINEER OR ARCHITECT WHICH WILL BECOME THE PROFESSIONAL OF RECORD (P.O.R) FOR THE PROJECT AND WHO WILL BE RESPONSIBLE FOR THE PROPER USE OF THE P.A.D.

(E) ORIGINAL P.A.D SHALL BEAR THE DATE AND ORIGINAL SEAL AND SIGNATURE OF THE PROFESSIONAL ENGINEER OR RECORD THAT PREPARED IT.

11. PRODUCT MANUFACTURER'S LABEL SHALL BE LOCATED ON A READILY VISIBLE LOCATION AT PRODUCT IN ACCORDANCE WITH SECTION 1703.5 OF FLORIDA BUILDING CODE. ONE LABEL SHALL BE PLACED FOR EVERY OPENING.

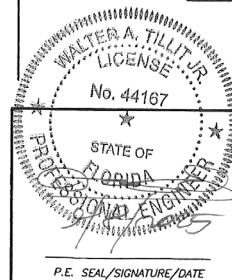
MAXIMUM A.S.D. DESIGN PRESSURE RATING
+150.0, -150.0 psf.
LARGE MISSILE IMPACT RESISTANCE.

THIS DRAWING SHALL ONLY BE USED TO
OBTAIN PERMITS IN THE STATE OF FLORIDA

PRODUCT REVISED
as complying with the Florida
Building Code
NOA-No. **25-0805.04**

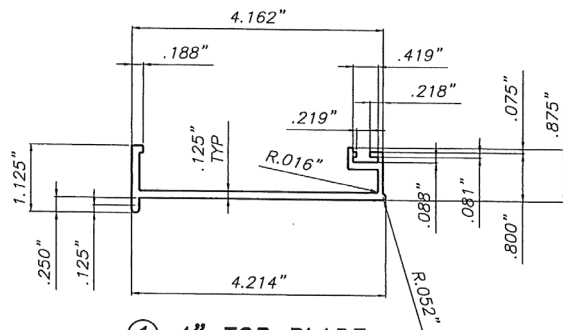
Expiration Date **01/17/2027**

By 
Miami-Dade Product Control

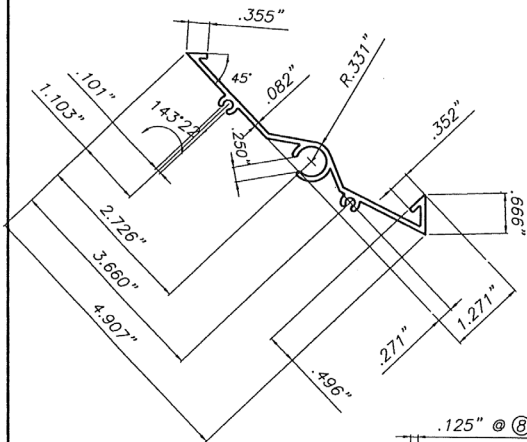


FLORIDA BUILDING CODE (HIGH VELOCITY HURRICANE ZONE)

TILTECO INC.				ALUMINUM LOUVER SYSTEM MODEL FL-D-4		W.H. DRAWN BY
TILTECO INC. 6355 N.W. 36th St., Ste. 305, VIRGINIA GARDENS, FL 33166 Phone: (305)871-1530 Fax: (305)871-1531 e-mail: tilteco@aol.com CA-0006719 WALTER A. TILLIT Jr., P.E. FLORIDA Lic. # 44167				S&P AIR CONTROL, LLC. 3005 SOUTH HICKORY ST. CHATTANOOGA, TN 37407 159 GENCO DRIVE HARTFORD, AL 36344 PHONE: (423)698-7715 FAX:(423)698-6629		07/07/2025 DATE
REV. No	DESCRIPTION	DATE	REV. No	DESCRIPTION	DATE	25-058 DRAWING No
1	OLD 23-072	07/07/25	2	-	-	SHEET 1 OF 16
2	-	-	4	-	-	



① 4" TOP BLADE
SCALE: 3/8"=1"



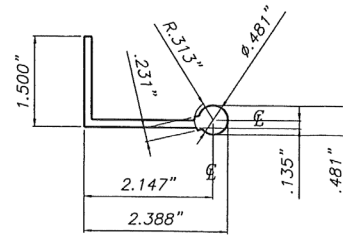
② 4" BLADE
SCALE: 3/8"=1"

PRODUCT RENEWED
as complying with the Florida
Building Code
NOA-No. **26-0428.02**

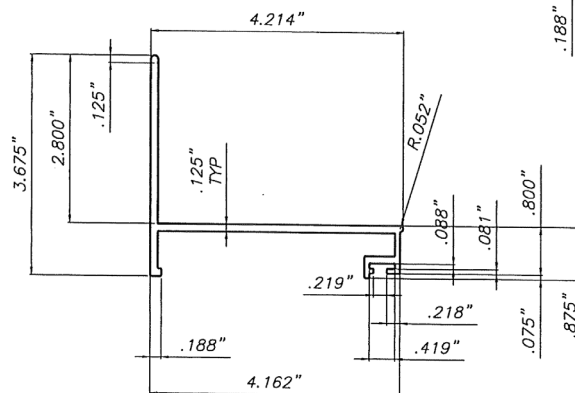
Expiration Date **01/17/2032**

By *[Signature]*
Miami-Dade Product Control

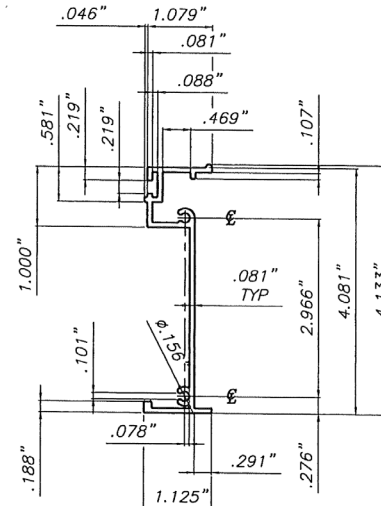
⑧ & ⑧A ALUMINUM SLEEVES
(OPTIONAL)
3003-H14 ALLOY



③ 4" BLADE SUPPORT
SCALE: 3/8"=1"

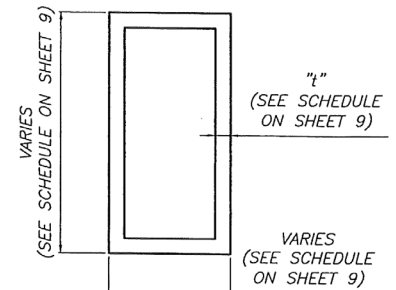


④ 4" BOTTOM BLADE
SCALE: 3/8"=1"

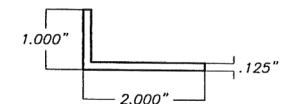


⑤ 4" SIDE JAMB
SCALE: 3/8"=1"

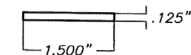
**⑥ LOUVER
IMPACT STRAP**
6463-T6 ALLOY
SCALE: 3/8"=1"



⑦ MULLION
6063-T6 ALLOY
SCALE: 3/8"=1"



⑨ JAMB ANGLE

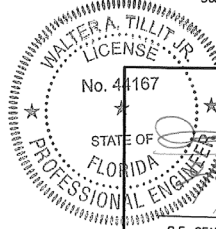


**⑩ HORIZONTAL
MULLION STRIP**

PRODUCT REVISED
as complying with the Florida
Building Code
NOA-No. **25-0805.04**
Expiration Date **01/17/2027**
By *[Signature]*
Miami-Dade Product Control

COMPONENTS

SCALE: 3/8"=1"



P.E. SEAL/SIGNATURE/DATE

FLORIDA BUILDING CODE (HIGH VELOCITY HURRICANE ZONE)

© 2025 TILTECO, INC

TILTECO INC.
TILLIT TESTING & ENGINEERING COMPANY
6355 N.W. 36th St., Ste. 302, VIRGINIA GARDENS, FL 33166
Phone: (305)871-1530, Fax: (305)871-1531
e-mail: tilteco@tilteco.com
CA-0006719
WALTER A. TILLIT Jr., P.E.
FLORIDA Lic. # 44167

**ALUMINUM LOUVER SYSTEM
MODEL FL-D-4**

S&P AIR CONTROL, LLC.

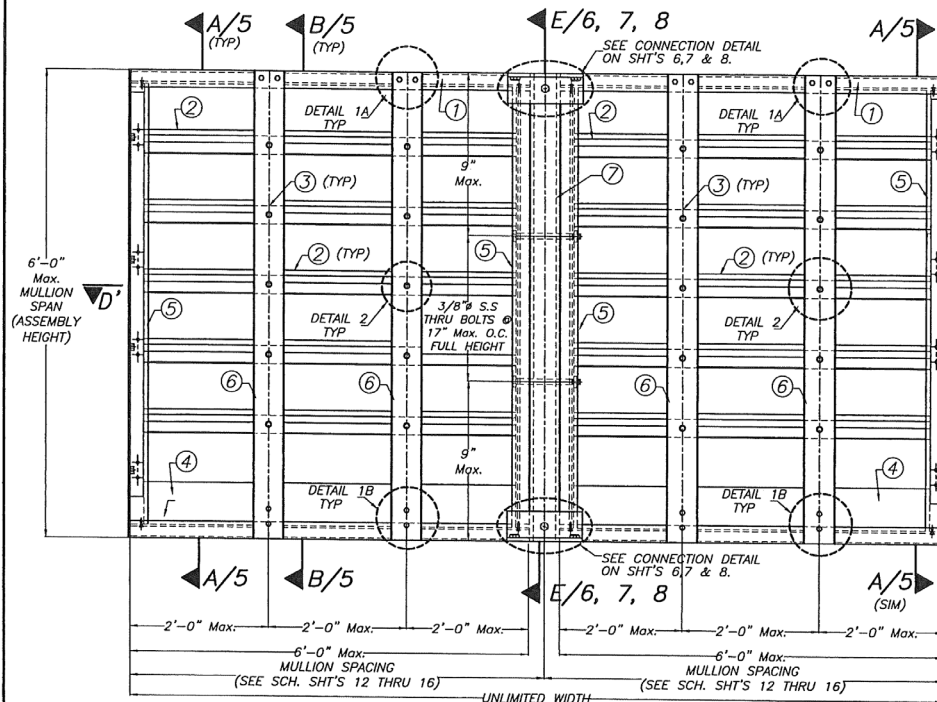
3005 SOUTH HICKORY ST. 159 GENCO DRIVE
CHATTANOOGA, TN 37407 HARTFORD, AL 36344
PHONE: (423)698-7715 FAX: (423)698-6629

W.H.
DRAWN BY
07/07/2025
DATE

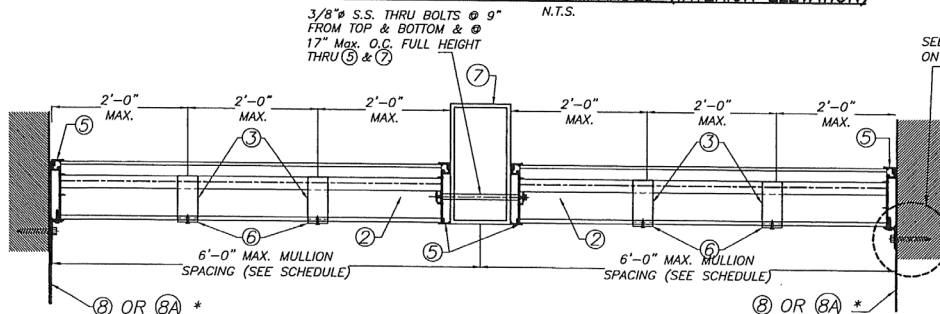
25-058
DRAWING No

REV. No	DESCRIPTION	DATE	REV. No	DESCRIPTION	DATE
1	OLD 23-072	07/07/25	3		
2			4		

SHEET 2 OF 16



MULTIPLE UNITS HORIZONTALLY EXPANDED (INTERIOR ELEVATION)



PRODUCT RENEWED
as complying with the Florida Building Code
NOA-No. **26-0428.02**

Expiration Date **01/17/2032**

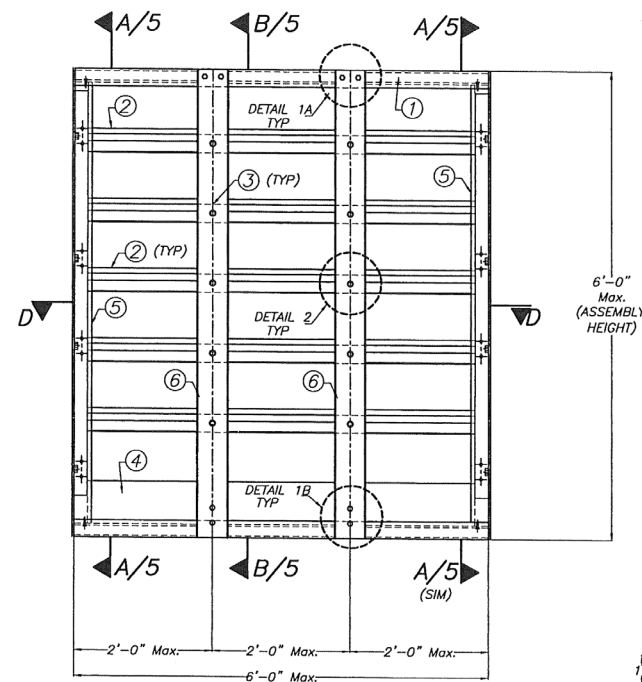
By *[Signature]*
Miami-Dade Product Control

* 8 OR 8A ARE OPTIONAL

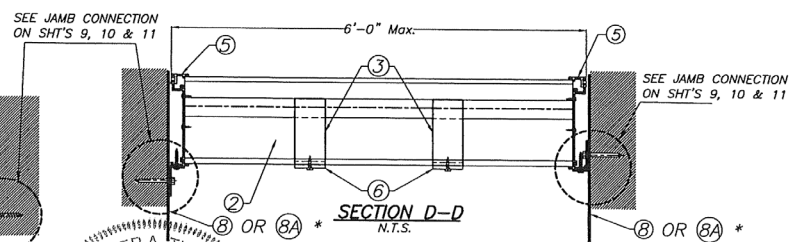
PRODUCT REVISED
as complying with the Florida Building Code
NOA-No. **25-0805.04**

Expiration Date **01/17/2027**

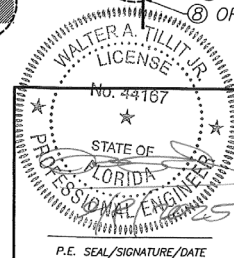
By *[Signature]*
Miami-Dade Product Control



SINGLE UNIT (INTERIOR ELEVATION)



FLORIDA BUILDING CODE (HIGH VELOCITY HURRICANE ZONE)



© 2025 TILTECO, INC.

TILTECO INC.

TILLIT TESTING & ENGINEERING COMPANY
6355 N.W. 36th St., Ste. 305, VIRGINIA GARDENS, FL 33166
Phone: (305)871-1530, Fax: (305)871-1531
e-mail: tilteco@tdc.com
CA-0006719
WALTER A. TILLIT JR., P.E.
FLORIDA Lic. # 44187

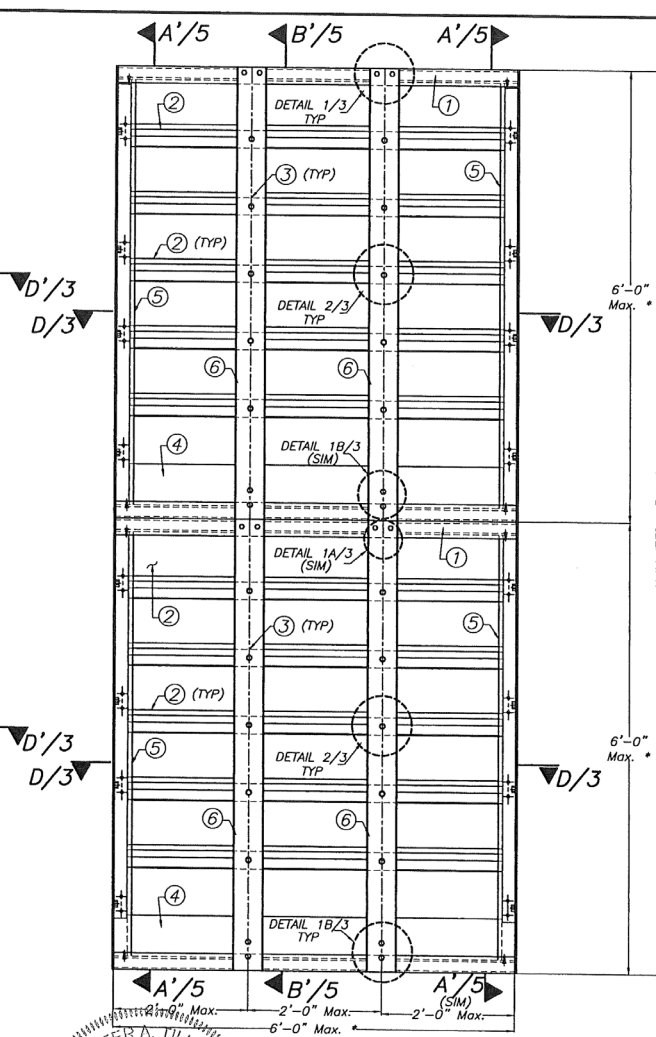
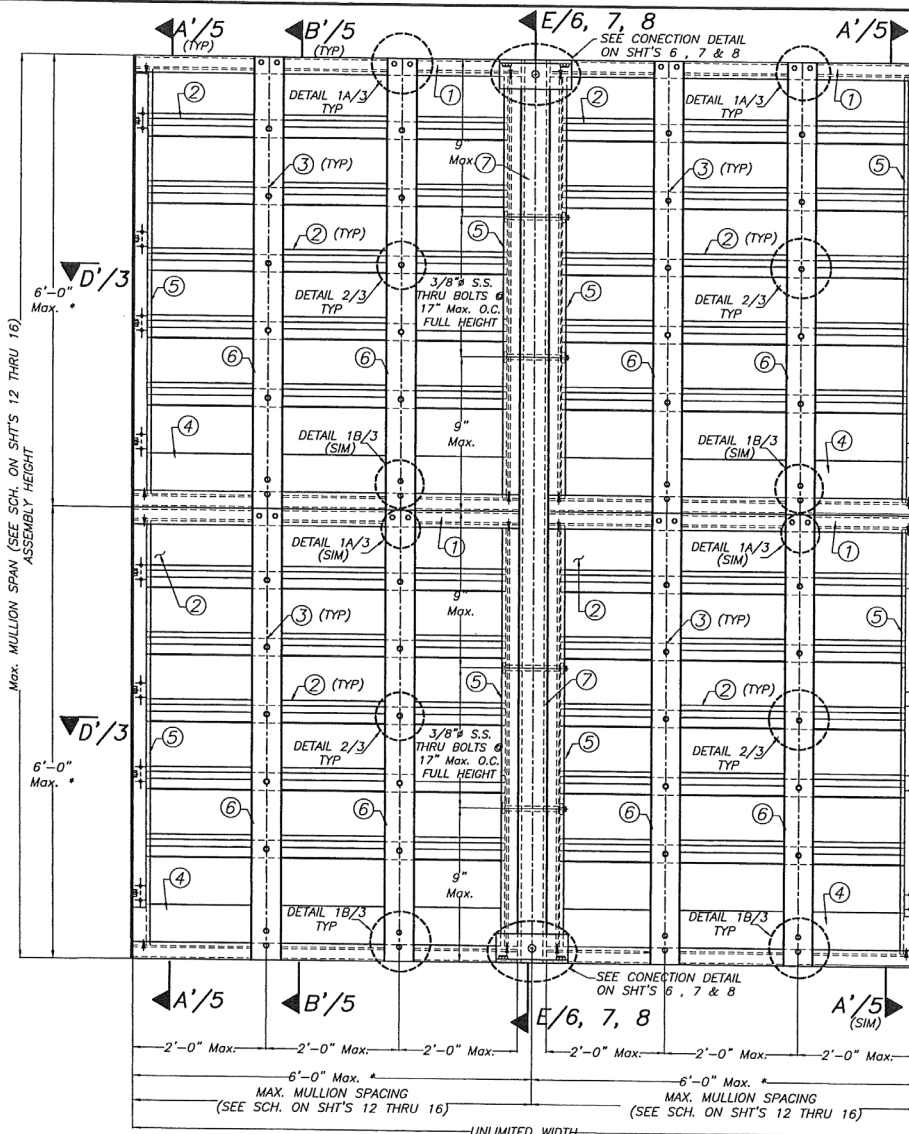
**ALUMINUM LOUVER SYSTEM
MODEL FL-D-4**

S&P AIR CONTROL, LLC.

3005 SOUTH HICKORY ST. 159 GENCO DRIVE
CHATTANOOGA, TN 37407 HARTFORD, AL 36344
PHONE: (423)698-7715 FAX: (423)698-6629

REV. No	DESCRIPTION	DATE	REV. No	DESCRIPTION	DATE
1	OLD 23-072	07/07/25	2	-	-
2	-	-	4	-	-

W.H.
DRAWN BY
07/07/2025
DATE
25-058
DRAWING No
SHEET 3 OF 16



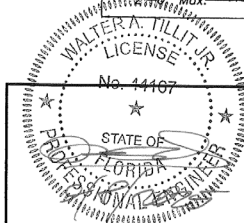
* NUMBER OF LOUVER PANEL UNITS NEEDED TO ACHIEVE THE OPENING HEIGHT AND WIDTH MAY VARY HOWEVER MAXIMUM UNIT HEIGHT AND WIDTH SHALL NO EXCEED 6'-0".

PRODUCT RENEWED
as complying with the Florida Building Code
NOA-No. **26-0428.02**
Expiration Date **01/17/2032**
By *[Signature]*
Miami-Dade Product Control

PRODUCT REVISED
as complying with the Florida Building Code
NOA-No. **25-0805.04**
Expiration Date **01/17/2027**
By *[Signature]*
Miami-Dade Product Control

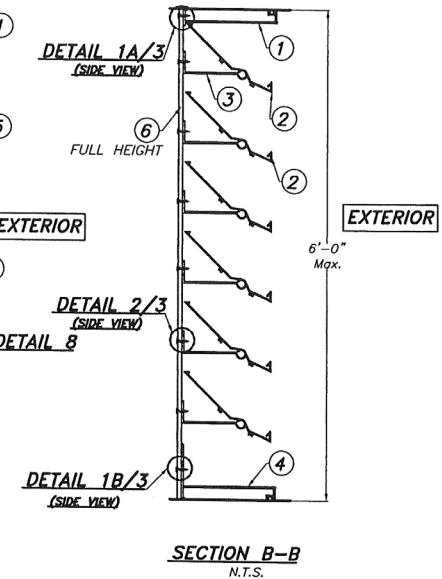
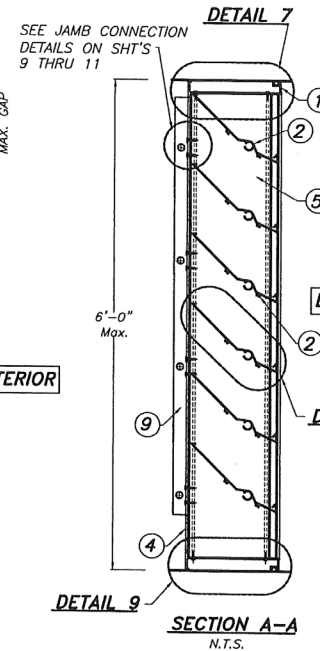
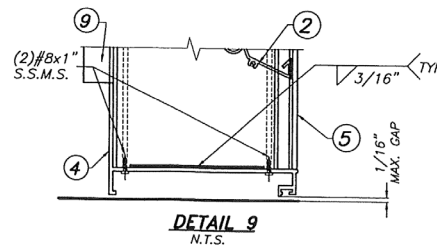
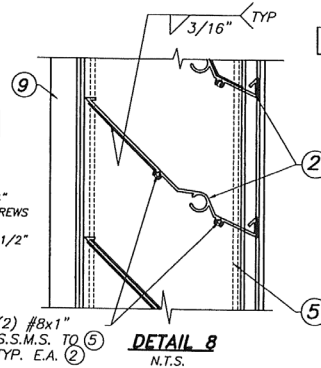
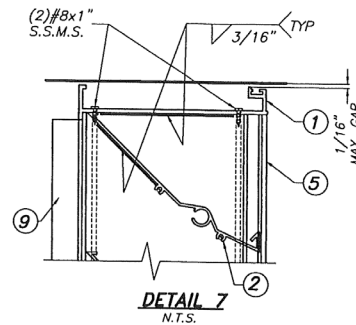
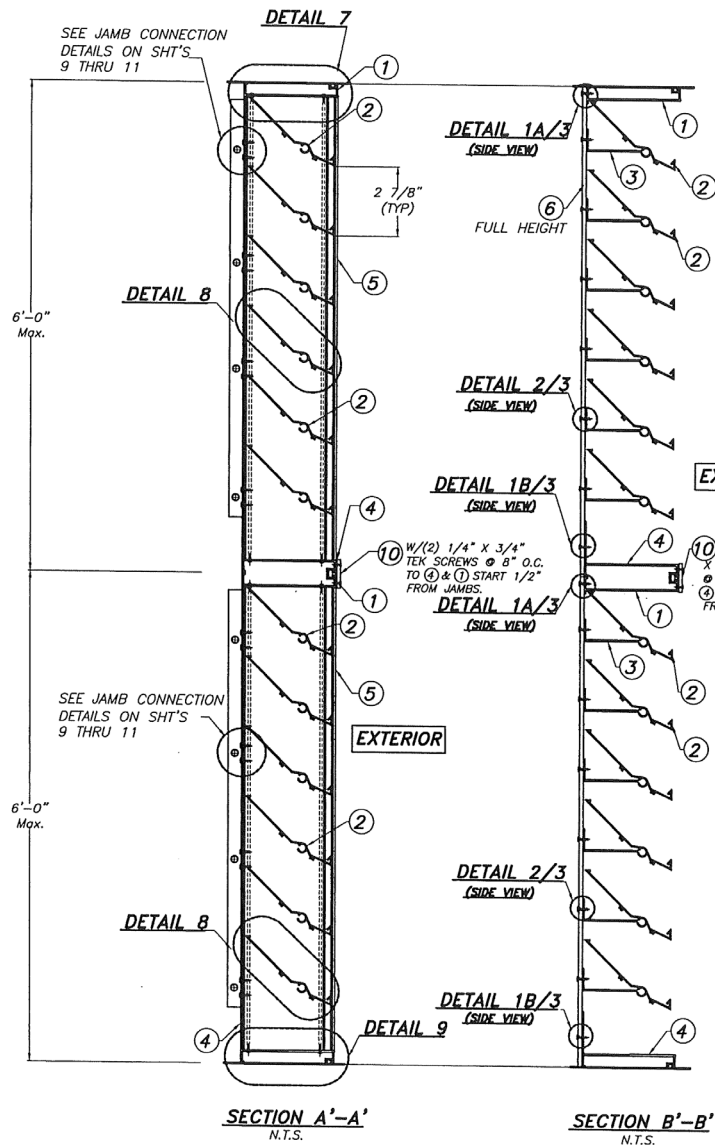
SINGLE UNIT (INTERIOR ELEVATION)
N.T.S.

FLORIDA BUILDING CODE (HIGH VELOCITY HURRICANE ZONE)



© 2025 TILTECO, INC.
TILTECO INC.
TILLIT TESTING & ENGINEERING COMPANY
6355 N.W. 36th St., Ste. 305, VIRGINIA GARDENS, FL 33166
Phone: (305)871-1530 Fax: (305)871-1531
e-mail: tilteco@tillit.com
CA-0006719
WALTER A. TILLIT JR., P.E.
FLORIDA Lic. # 44167

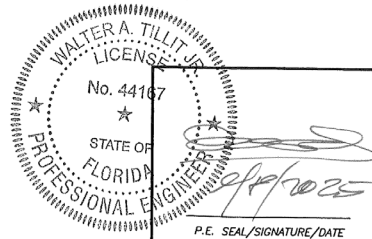
ALUMINUM LOUVER SYSTEM MODEL FL-D-4					W.H. DRAWN BY
S&P AIR CONTROL, LLC.					07/07/2025 DATE
3005 SOUTH HICKORY ST. 159 GENCO DRIVE CHATTANOOGA, TN 37407 HARTFORD, AL 36344 PHONE: (423)698-7715 FAX:(423)698-6629					25-058 DRAWING No
REV. No	DESCRIPTION	DATE	REV. No	DESCRIPTION	DATE
1	OLD 23-072	07/07/25	2	-	-
2	-	-	4	-	-



PRODUCT REVISED
as complying with the Florida
Building Code
NOA-No. **25-0805.04**
Expiration Date **01/17/2027**
By *RFT*
Miami-Dade Product Control

PRODUCT RENEWED
as complying with the Florida
Building Code
NOA-No. **26-0428.02**
Expiration Date **01/17/2032**
By *RFT*
Miami-Dade Product Control

FLORIDA BUILDING CODE (HIGH VELOCITY HURRICANE ZONE)



© 2025 TILTECO, INC.

TILTECO INC.
TILIT TESTING & ENGINEERING COMPANY
6355 N.W. 36th St., Ste. 305, VIRGINIA GARDENS, FL 33166
Phone: (305)871-1530 Fax: (305)871-1531
e-mail: tilteco@aol.com
CA-0006719
WALTER A. TILIT, JR., P.E.
FLORIDA Lic. # 44167

**ALUMINUM LOUVER SYSTEM
MODEL FL-D-4**

S&P AIR CONTROL, LLC.

3005 SOUTH HICKORY ST. CHATTANOOGA, TN 37407
159 GENCO DRIVE HARTFORD, AL 36344
PHONE: (423)698-7715 FAX: (423)698-6629

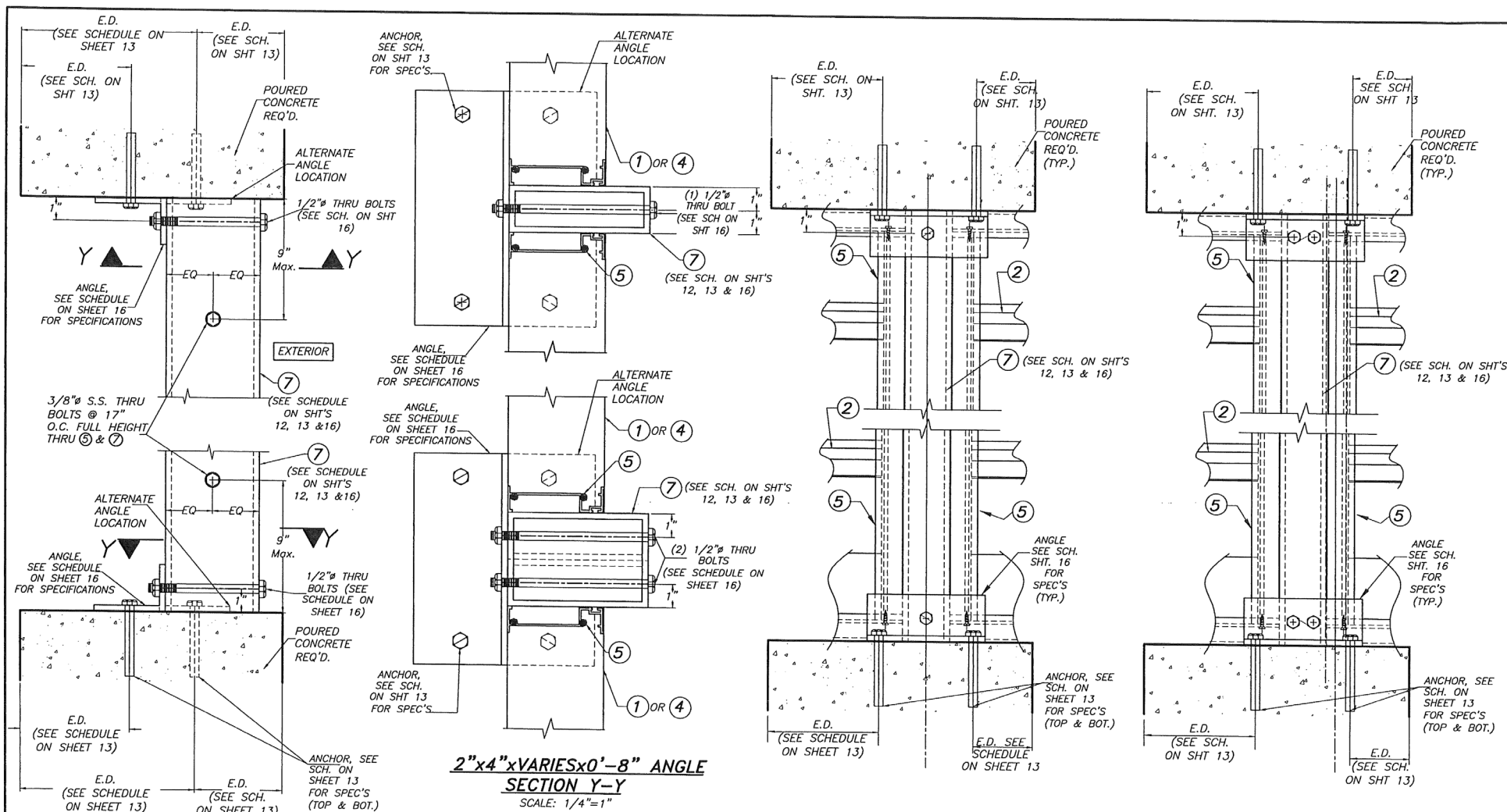
W.H.
DRAWN BY

07/07/2025
DATE

25-058
DRAWING No

SHEET 5 OF 16

REV. No.	DESCRIPTION	DATE	REV. No.	DESCRIPTION	DATE
1	OLD 23-072	07/07/25	3	-	-
2	-	-	4	-	-



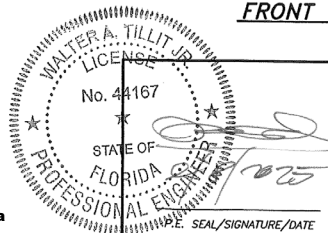
PRODUCT REVISED
as complying with the Florida
Building Code
NOA-No. **25-0805.04**
Expiration Date **01/17/2027**
By *[Signature]*
Miami-Dade Product Control

MULLION INSTALLATION INTO POURED CONCRETE

PRODUCT RENEWED
as complying with the Florida
Building Code
NOA-No. **26-0428.02**

Expiration Date **01/17/2032**

By *[Signature]*
Miami-Dade Product Control



© 2025 TILTECO, INC.

TILTECO INC.

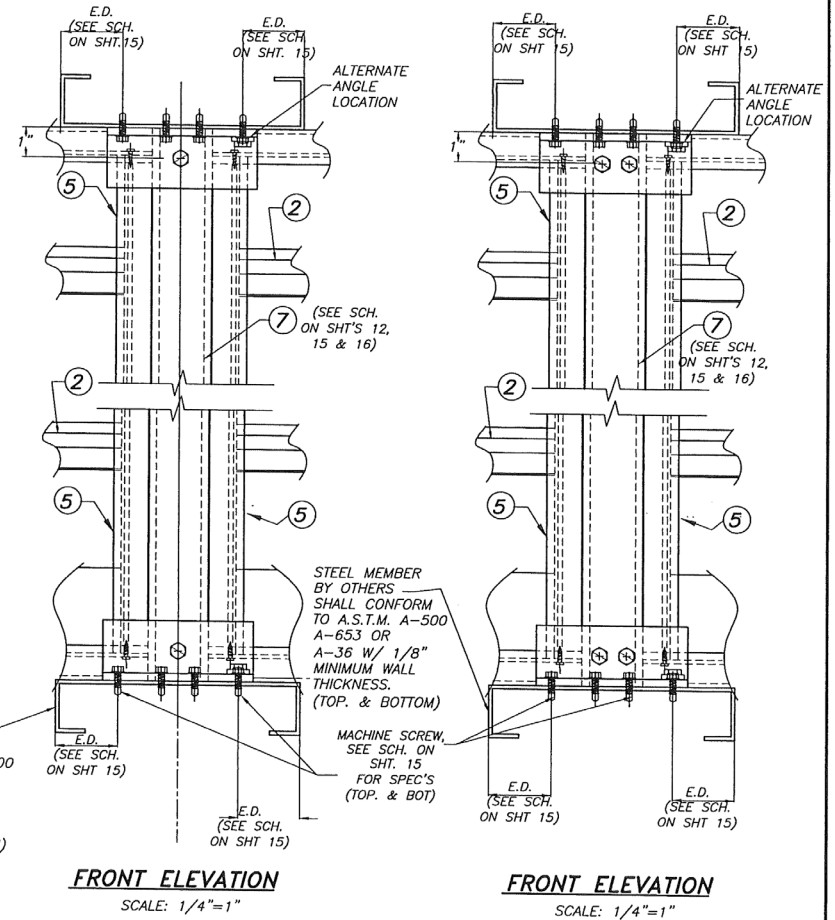
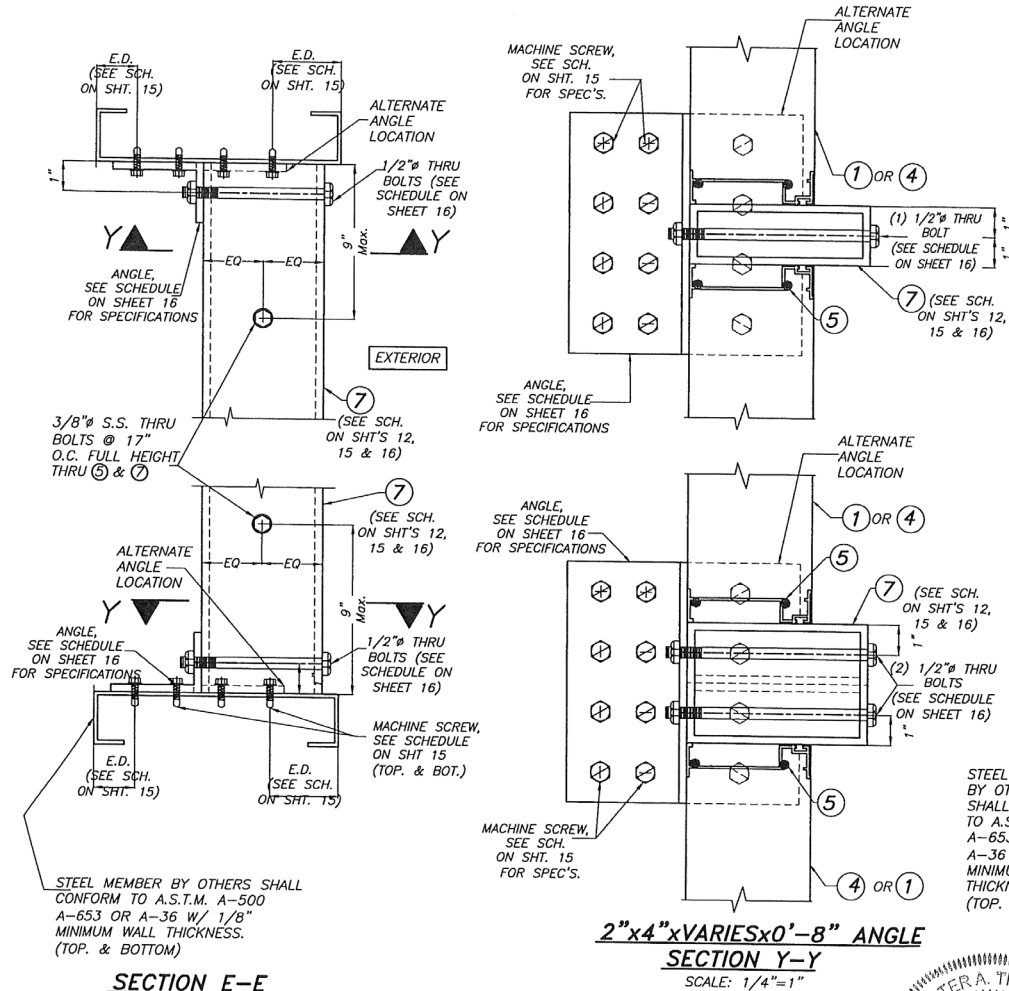
TILLIT TESTING & ENGINEERING COMPANY
6355 N.W. 36th St., Ste. 305, VIRGINIA GARDENS, FL 33166
Phone: (305)871-1530, Fax: (305)871-1531
e-mail: tilteco@aol.com
CA-0006719
WALTER A. TILLIT JR., P.E.
FLORIDA Lic. # 44167

ALUMINUM LOUVER SYSTEM MODEL FL-D-4						W.H. DRAWN BY
S&P AIR CONTROL, LLC.						07/07/2025 DATE
3005 SOUTH HICKORY ST. CHATTANOOGA, TN 37407 PHONE: (423)698-7715						25-058 DRAWING No
159 GENCO DRIVE HARTFORD, AL 36344 FAX: (423)698-6629						SHEET 6 OF 16
REV. No.	DESCRIPTION	DATE	REV. No.	DESCRIPTION	DATE	
1	OLD 23-072	07/07/25	2			
2			4			

PRODUCT RENEWED
as complying with the Florida
Building Code
NOA-No. 26-0428.02

Expiration Date 01/17/2032

By 
Miami-Dade Product Control

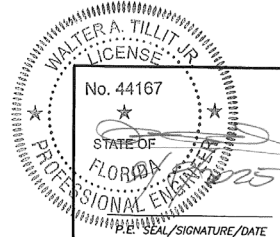


PRODUCT REVISED
as complying with the Florida
Building Code
NOA-No. 25-0805.04

Expiration Date 01/17/2027

By 
Miami-Dade Product Control

**MULLION INSTALLATION
INTO 1/8" THICK MIN. STEEL**



© 2025 TILTECO, INC

TILTECO INC.
TILLIT TESTING & ENGINEERING COMPANY
6355 N.W. 30th St., Ste. 305, MIRAMAR OAKS, FL 33166
Phone: (305)871-1530 Fax: (305)871-1531
e-mail: tilteco@aol.com
CA-0006719
WALTER A. TILLIT Jr. P.E.
FLORIDA Lic. # 44167

FLORIDA BUILDING CODE (HIGH VELOCITY HURRICANE ZONE)

**ALUMINUM LOUVER SYSTEM
MODEL FL-D-4**

S&P AIR CONTROL, LLC.

3005 SOUTH HICKORY ST. 159 GENCO DRIVE
CHATTANOOGA, TN 37407 HARTFORD, AL 36344
PHONE: (423)698-7715 FAX: (423)698-6629

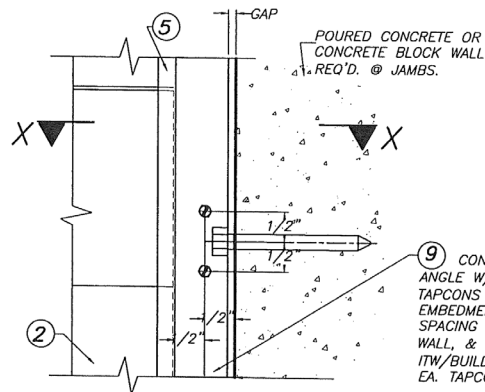
W.H.
DRAWN BY

07/07/2025
DATE

25-058
DRAWING No

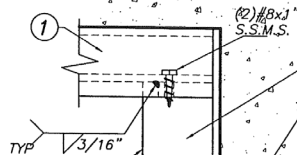
REV. No	DESCRIPTION	DATE	REV. No	DESCRIPTION	DATE
1	OLD 23-072	07/07/25	3	-	-
2	-	-	4	-	-

SHEET 8 OF 16



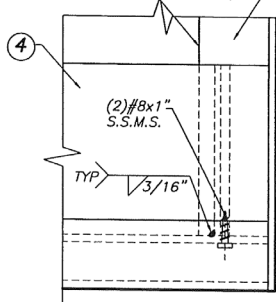
DETAIL 3

SCALE: 1/2"=1"



DETAIL 5

SCALE: 1/2"=1"



DETAIL 6

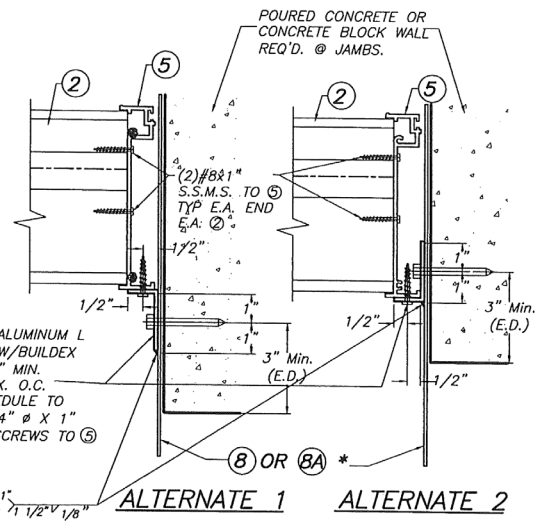
SCALE: 1/2"=1"

JAMB INSTALLATION INTO POURED CONCRETE OR CONCRETE BLOCK.

PRODUCT RENEWED
as complying with the Florida
Building Code
NOA-No. 26-0428.02

Expiration Date **01/17/2032**

By *[Signature]*
Miami-Dade Product Control



SECTION X-X

SCALE: 1/4"=1"

* (8) OR (8A) ARE OPTIONAL

MAXIMUM TAPCON SPACING AT JAMBS*

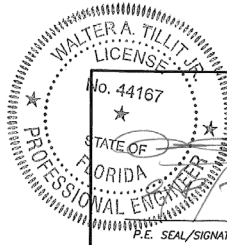
A.S.D. DESIGN PRESSURE RATING (psf)	MAX. O.C. SPACING CONCRETE	BLOCK
UP TO 150.0	7" O.C.	3" O.C.

* START FIRST TAPCON AT 5" FROM TOP & BOTTOM

PRODUCT REVISED
as complying with the Florida
Building Code
NOA-No. 25-0805.04

Expiration Date **01/17/2027**

By *[Signature]*
Miami-Dade Product Control



FLORIDA BUILDING CODE (HIGH VELOCITY HURRICANE ZONE)

© 2025 TILTECO, INC.

TILTECO INC.
TILLIT TESTING & ENGINEERING COMPANY
6355 N.W. 35th St., Ste. 305, VIRGINIA GARDENS, FL 33166
Phone : (305)871-1530, Fax : (305)871-1531
e-mail: tilteco@aol.com
C#-0006719
WALTER A. TILLIT JR. P.E.
FLORIDA Lic. # 44167

**ALUMINUM LOUVER SYSTEM
MODEL FL-D-4**

S&P AIR CONTROL, LLC.

3005 SOUTH HICKORY ST. CHATTANOOGA, TN 37407
159 GENCO DRIVE HARTFORD, AL 36344
PHONE: (423)698-7715 FAX: (423)698-6623

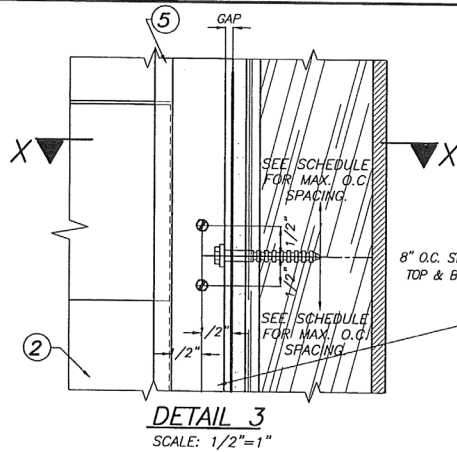
REV. No	DESCRIPTION	DATE	REV. No	DESCRIPTION	DATE
1	OLD 23-072	07/07/25	3	-	-
2	-	-	4	-	-

W.H.
DRAWN BY

07/07/2025
DATE

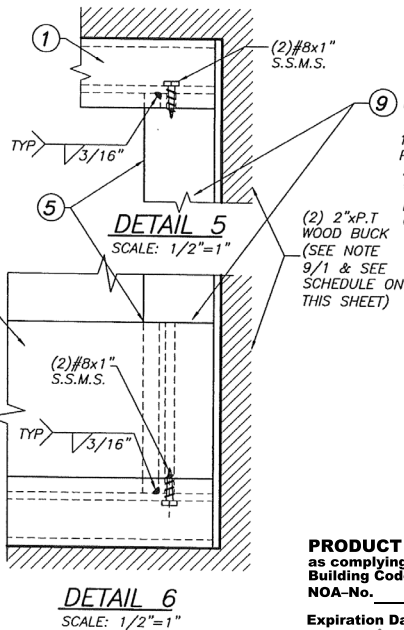
25-058
DRAWING No

SHEET 9 OF 16



PRODUCT RENEWED
as complying with the Florida
Building Code
NOA-No. **26-0428.02**
Expiration Date **01/17/2032**
By *[Signature]*
Miami-Dade Product Control

9 CONTINUOUS ALUMINUM ANGLE
W/ 1/4" LAG SCREW W/
1 1/2" Min. THREADED
PENETRATION @ Max. O.C.
SPACING PER SCHEDULE TO
WALL & W/ (2) 1/4"x1" (ITW
BUILDEX) TEK SCREWS. TO 5
@ EA. LAG SCREW.



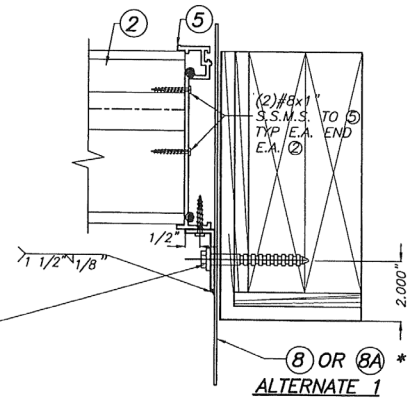
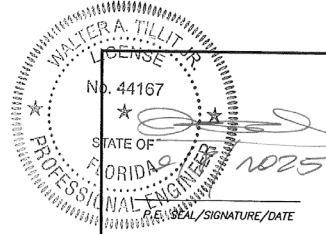
PRODUCT REVISED
as complying with the Florida
Building Code
NOA-No. **25-0805.04**
Expiration Date **01/17/2027**
By *[Signature]*
Miami-Dade Product Control

JAMB INSTALLATION INTO WOOD

**MAXIMUM LAG SCREW
SPACING AT JAMBS***

A.S.D. DESIGN PRESSURE RATING (psf)	MAX. O.C. SPACING
UP TO 50	8"
>50 TO 70	7"
>70 TO 90	5 1/2"
>90 TO 110	4 1/2"
>110 TO 130	3 1/2"
>130 TO 150	3"

* START FIRST LAG SCREW AT
5" FROM TOP & BOTTOM



9 CONTINUOUS ALUMINUM ANGLE
W/ 1/4" LAG SCREW W/
1 1/2" Min. THREADED
PENETRATION @ Max. O.C.
SPACING PER SCHEDULE TO
WALL & W/ (2) 1/4"x1" (ITW
BUILDEX) TEK SCREWS. TO 5
@ EA. TAPCON.

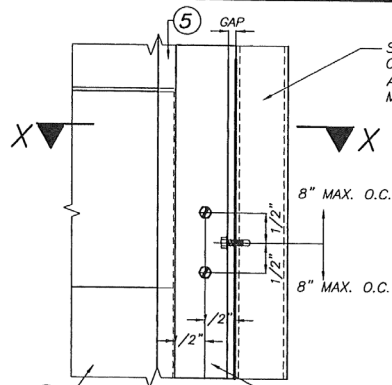
**ALTERNATE 2
SECTION X-X**
SCALE: 1/4"=1"

* 8 OR 8A ARE OPTIONAL

FLORIDA BUILDING CODE (HIGH VELOCITY HURRICANE ZONE)

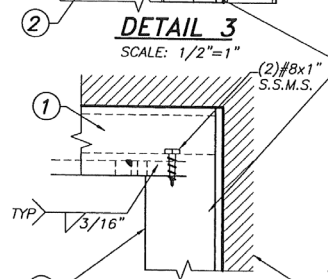
© 2025 TILTECO, INC.		ALUMINUM LOUVER SYSTEM MODEL FL-D-4				W.H. DRAWN BY	
TILTECO INC. TILLIT TESTING & ENGINEERING COMPANY 6355 N.W. 36th St., Ste. 305, VIRGINIA GARDENS, FL 33186 Phone: (305)871-1530, Fax: (305)871-1531 e-mail: tilteco@tilteco.com CA-0006719 WALTER A. TILLIT JR. P.E. FLORIDA LIC. # 44167		S&P AIR CONTROL, LLC.				07/07/2025 DATE	
		3005 SOUTH HICKORY ST. 159 GENCO DRIVE CHATTANOOGA, TN 37407 HARTFORD, AL 36344 PHONE: (423)698-7715 FAX: (423)698-6629				25-058	
						DRAWING No	
						SHEET 10 OF 16	
REV. No	DESCRIPTION	DATE	REV. No	DESCRIPTION	DATE		
1	OLD 23-072	07/07/25	3	-	-		
2	-	-	4	-	-		

SHEET 10 OF 16

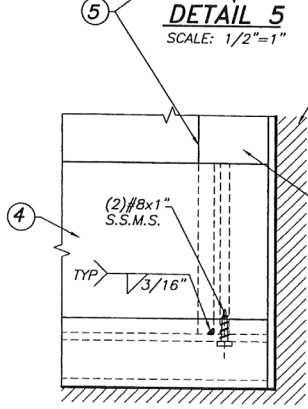


PRODUCT RENEWED
as complying with the Florida
Building Code
NOA-No. **26-0428.02**

Expiration Date **01/17/2032**
By *[Signature]*
Miami-Dade Product Control



⑨ CONTINUOUS ALUMINUM ANGLE W/
1/4" x 3/4" (ITW BUILDEX) TEK
SCREWS AT MAX. O.C. SPACING
PER SCHEDULE TO STEEL & W/
(2) 1/4" x 1" (ITW BUILDEX) TEK
SCREWS. TO ⑤ @ EA. TEK SCREW.



STEEL MEMBER BY OTHERS
SHALL CONFORM TO
A.S.T.M. A-500 A-653 OR
A-36 W/ 1/8" MINIMUM
WALL THICKNESS.

⑨ CONTINUOUS ALUMINUM ANGLE W/
1/4" x 3/4" (ITW BUILDEX) TEK
SCREWS AT MAX. O.C. SPACING
PER SCHEDULE TO STEEL & W/
(2) 1/4" x 1" (ITW BUILDEX) TEK
SCREWS. TO ⑤ @ EA. TEK SCREW.

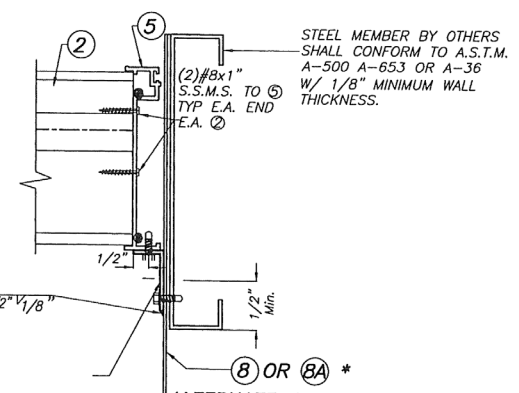
**MAXIMUM TEK SCREW
SPACING AT JAMBS***

A.S.D. DESIGN PRESSURE RATING (psf)	MAX.O.C. SPACING
UP TO 150.0	8"

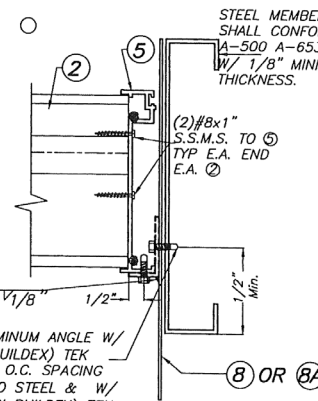
* START FIRST TEK SCREW AT
5" FROM TOP & BOTTOM

PRODUCT REVISED
as complying with the Florida
Building Code
NOA-No. **25-0805.04**
Expiration Date **01/17/2027**
By *[Signature]*
Miami-Dade Product Control

**JAMB INSTALLATION INTO
1/8" THICK MIN. STEEL**



ALTERNATE 1

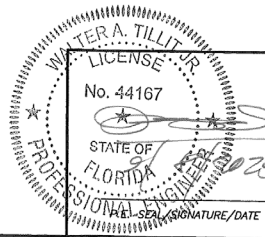


ALTERNATE 2

SECTION X-X
SCALE: 1/4"=1"

* ⑧ OR ⑧A ARE OPTIONAL

FLORIDA BUILDING CODE (HIGH VELOCITY HURRICANE ZONE)



© 2025 TILTECO, INC.

TILTECO INC.

TILLIT TESTING & ENGINEERING COMPANY
6355 N.W. 38th St., Ste. 305, VERO BEACH, FL 33166
Phone: (305) 971-1530, Fax: (305) 971-1531
e-mail: Uteco@aol.com
CA-0006719

WALTER A. TILLIT, JR., P.E.
FLORIDA Lic. # 44167

ALUMINUM LOUVER SYSTEM MODEL FL-D-4				W.H. DRAWN BY	
S&P AIR CONTROL, LLC.				07/07/2025 DATE	
3005 SOUTH HICKORY ST. CHATTANOOGA, TN 37407 PHONE: (423) 698-7715				25-058 DRAWING No	
159 GENCO DRIVE HARTFORD, AL 36344 FAX: (423) 698-6629				SHEET 11 OF 16	
REV. No.	DESCRIPTION	DATE	REV. No.	DESCRIPTION	DATE
1	OLD 23-072	07/07/25	3	-	-
2	-	-	4	-	-

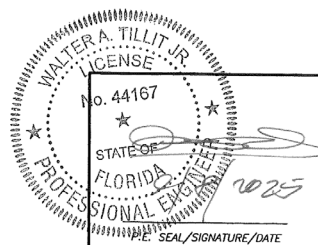
MAXIMUM MULLION SPAN SCHEDULE FOR A GIVEN A.S.D. DESIGN PRESSURE RATING (psf) AND MULLION SPACING *

A.S.D. DESIGN PRESSURE RATING	MULLIONS																ASSEMBLY HEIGHT
	2"x4"x1/4"				2"x6"x1/4"				4"x6"x1/4" OR (2) 2"x6"x1/4"				4"x8"x1/4"				
	MULLION SPACING				MULLION SPACING				MULLION SPACING				MULLION SPACING				
	3'	4'	5'	6'	3'	4'	5'	6'	3'	4'	5'	6'	3'	4'	5'	6'	
30	8'-0"	8'-0"	8'-0"	8'-0"	10'-0"	10'-0"	10'-0"	10'-0"	12'-0"	12'-0"	12'-0"	12'-0"	12'-0"	12'-0"	12'-0"	12'-0"	
50	8'-0"	8'-0"	8'-0"	8'-0"	10'-0"	10'-0"	10'-0"	10'-0"	12'-0"	12'-0"	12'-0"	12'-0"	12'-0"	12'-0"	12'-0"	12'-0"	
70	8'-0"	8'-0"	8'-0"	8'-0"	10'-0"	10'-0"	10'-0"	10'-0"	12'-0"	12'-0"	12'-0"	11'-10"	12'-0"	12'-0"	12'-0"	12'-0"	
90	8'-0"	8'-0"	8'-0"	7'-9"	10'-0"	10'-0"	10'-0"	9'-5"	12'-0"	12'-0"	11'-7"	10'-11"	12'-0"	12'-0"	12'-0"	12'-0"	
100	8'-0"	8'-0"	7'-11"	7'-5"	10'-0"	10'-0"	9'-8"	9'-0"	12'-0"	12'-0"	11'-2"	10'-6"	12'-0"	12'-0"	12'-0"	12'-0"	
110	8'-0"	8'-0"	7'-8"	7'-3"	10'-0"	10'-0"	9'-4"	8'-7"	12'-0"	11'-8"	10'-10"	10'-2"	12'-0"	12'-0"	12'-0"	12'-0"	
120	8'-0"	8'-0"	7'-5"	7'-0"	10'-0"	9'-9"	9'-0"	8'-2"	12'-0"	11'-4"	10'-6"	9'-11"	12'-0"	12'-0"	12'-0"	12'-0"	
130	8'-0"	7'-10"	7'-3"	6'-8"	10'-0"	9'-6"	8'-7"	7'-10"	12'-0"	11'-0"	10'-3"	9'-8"	12'-0"	12'-0"	12'-0"	12'-0"	
140	8'-0"	7'-8"	7'-1"	6'-5"	10'-0"	9'-3"	8'-4"	7'-7"	11'-10"	10'-9"	10'-0"	9'-5"	12'-0"	12'-0"	12'-0"	11'-11"	
150	8'-0"	7'-5"	6'-10"	6'-0"	10'-0"	9'-0"	8'-0"	7'-4"	11'-7"	10'-6"	9'-9"	9'-2"	12'-0"	12'-0"	12'-0"	11'-6"	

* SEE ADDITIONAL LIMITATIONS FOR MAXIMUM MULLION SPAN (ASSEMBLY HEIGHT) ON SHEETS 13 THRU 16 FOR A MULLION CONNECTION TYPE. MAXIMUM FINAL MULLION SPAN (ASSEMBLY HEIGHT) SHALL BE THE MINIMUM VALUE BETWEEN THIS SCHEDULE AND ANY OTHER SCHEDULE GIVEN ON ABOVE MENTIONED SHEETS.

PRODUCT RENEWED
as complying with the Florida
Building Code
NOA-No. **26-0428.02**
Expiration Date **01/17/2032**
By *[Signature]*
Miami-Dade Product Control

PRODUCT REVISED
as complying with the Florida
Building Code
NOA-No. **25-0805.04**
Expiration Date **01/17/2027**
By *[Signature]*
Miami-Dade Product Control



FLORIDA BUILDING CODE (HIGH VELOCITY HURRICANE ZONE)

© 2025 TILTECO, INC.		ALUMINUM LOUVER SYSTEM MODEL FL-D-4		W.H. DRAWN BY
 TILTECO INC. TILLIT TESTING & ENGINEERING COMPANY 6355 N.W. 36th St., Ste. 305, VIRGINIA GARDENS, FL 33166 Phone: (305) 871-1530, Fax: (305) 871-1531 e-mail: tillitco@aol.com CA-0006719 WALTER A. TILLIT JR., P.E. FLORIDA Lic. # 44167		S&P AIR CONTROL, LLC. 3005 SOUTH HICKORY ST. CHATTANOOGA, TN 37407 159 GENCO DRIVE HARTFORD, AL 36344 PHONE: (423) 698-7715 FAX: (423) 698-6629		07/07/2025 DATE
REV. No		DESCRIPTION		25-058 DRAWING No
1		OLD 23-072		DATE
2		-		DATE

SHEET 12 OF 16

MAX. MULLION SPAN (L ft) FOR A GIVEN A.S.D. DESIGN PRESSURE RATING (psf) & MULLION SPACING FOR TYPE 1 CONNECTION*

A.S.D. DESIGN PRESSURE RATING	MULLION SPACING				ASSEMBLY HEIGHT
	3	4	5	6	
30	12'-0"	12'-0"	12'-0"	12'-0"	
50	12'-0"	12'-0"	12'-0"	12'-0"	
70	12'-0"	12'-0"	12'-0"	11'-3"	
90	12'-0"	12'-0"	10'-6"	8'-9"	
100	12'-0"	12'-0"	9'-5"	7'-10"	
110	12'-0"	12'-0"	8'-7"	7'-2"	
120	12'-0"	12'-0"	7'-10"	6'-7"	
130	12'-0"	12'-0"	7'-3"	6'-1"	
140	12'-0"	8'-5"	6'-9"	5'-7"	
150	10'-6"	7'-10"	6'-3"	5'-3"	

TYPE 1 CONNECTION TO POURED CONCRETE:

2 - 1/2" Ø KWIK BOLT TZ (HILTI, INC.) W/ 4" Min. EMBEDMENT & 8" MIN. MEMBER THICKNESS. W/ 3" MIN. E.D & 6" MIN. SPACING

MAX. MULLION SPAN (L ft) FOR A GIVEN A.S.D. DESIGN PRESSURE RATING (psf) & MULLION SPACING FOR TYPE 3 CONNECTION*

A.S.D. DESIGN PRESSURE RATING	MULLION SPACING				ASSEMBLY HEIGHT
	3	4	5	6	
30	12'-0"	12'-0"	12'-0"	12'-0"	
50	12'-0"	12'-0"	12'-0"	12'-0"	
70	12'-0"	12'-0"	12'-0"	11'-11"	
90	12'-0"	12'-0"	11'-1"	9'-3"	
100	12'-0"	12'-0"	10'-0"	8'-4"	
110	12'-0"	11'-4"	9'-1"	7'-7"	
120	12'-0"	10'-5"	8'-4"	6'-11"	
130	12'-0"	9'-7"	7'-8"	6'-5"	
140	11'-11"	8'-11"	7'-2"	5'-11"	
150	11'-1"	8'-4"	6'-8"	5'-7"	

TYPE 3 CONNECTION TO POURED CONCRETE:

2 - 1/2" Ø KWIK BOLT TZ (HILTI, INC.) W/ 4" Min. EMBEDMENT & 8" MIN. MEMBER THICKNESS. W/ 3" MIN. E.D. & 6" MIN. SPACING

MAX. MULLION SPAN (L ft) FOR A GIVEN A.S.D. DESIGN PRESSURE RATING (psf) & MULLION SPACING FOR TYPE 2 CONNECTION*

A.S.D. DESIGN PRESSURE RATING	MULLION SPACING				ASSEMBLY HEIGHT
	3	4	5	6	
30	12'-0"	12'-0"	12'-0"	12'-0"	
50	12'-0"	12'-0"	12'-0"	12'-0"	
70	12'-0"	12'-0"	12'-0"	12'-0"	
90	12'-0"	12'-0"	12'-0"	10'-0"	
100	12'-0"	12'-0"	10'-10"	9'-0"	
110	12'-0"	12'-0"	9'-10"	8'-2"	
120	12'-0"	11'-3"	9'-0"	7'-6"	
130	12'-0"	10'-5"	8'-4"	6'-11"	
140	12'-0"	9'-8"	7'-9"	6'-5"	
150	12'-0"	9'-0"	7'-2"	6'-0"	

TYPE 2 CONNECTION TO POURED CONCRETE:

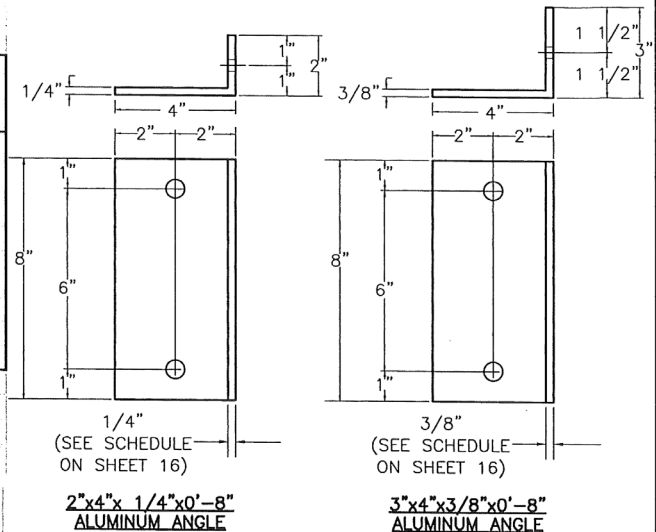
2 - 5/8" Ø KWIK BOLT TZ (HILTI, INC.) W/ 5" Min. EMBEDMENT & 8" MIN. MEMBER THICKNESS W/ 3" MIN. E.D & 6" MIN. SPACING.

MAX. MULLION SPAN (L ft) FOR A GIVEN A.S.D. DESIGN PRESSURE RATING (psf) & MULLION SPACING FOR TYPE 4 CONNECTION*

A.S.D. DESIGN PRESSURE RATING	MULLION SPACING				ASSEMBLY HEIGHT
	3	4	5	6	
30	12'-0"	12'-0"	12'-0"	12'-0"	
50	12'-0"	12'-0"	12'-0"	12'-0"	
70	12'-0"	12'-0"	12'-0"	12'-0"	
90	12'-0"	12'-0"	12'-0"	10'-0"	
100	12'-0"	12'-0"	10'-10"	9'-0"	
110	12'-0"	12'-0"	9'-10"	8'-2"	
120	12'-0"	11'-3"	9'-0"	7'-6"	
130	12'-0"	10'-5"	8'-4"	6'-11"	
140	12'-0"	9'-8"	7'-9"	6'-5"	
150	12'-0"	9'-0"	7'-2"	6'-0"	

TYPE 4 CONNECTION TO POURED CONCRETE:

2 - 1/2" Ø KWIK BOLT TZ (HILTI, INC.) W/ 4" Min. EMBEDMENT & 8" MIN. MEMBER THICKNESS. W/ 6" MIN. E.D & 6" MIN. SPACING



PRODUCT RENEWED
as complying with the Florida Building Code
NOA-No. 26-0428.02

Expiration Date 01/17/2032

By *[Signature]*
Miami-Dade Product Control

**SCHEDULE FOR
MULLION
CONNECTION TO
POURED CONCRETE**
(Min. f'c = 3 ksi)

PRODUCT REVISED
as complying with the Florida Building Code
NOA-No. 25-0805.04
Expiration Date 01/17/2027

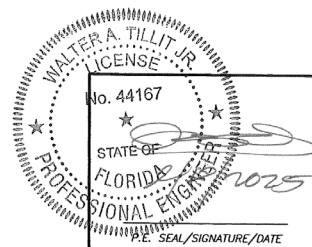
By *[Signature]*
Miami-Dade Product Control

FLORIDA BUILDING CODE (HIGH VELOCITY HURRICANE ZONE)

*** NOTES:**

(1) SEE SHEETS 12 & 16 FOR ADDITIONAL MAXIMUM MULLION SPAN LIMITATIONS FOR A GIVEN A.S.D. DESIGN PRESSURE RATING AND MAXIMUM SPACING. MAXIMUM MULLION SPAN SHALL BE THE MINIMUM BETWEEN SCHEDULES ON SHEETS 12, 16 AND THIS SHEET FOR A CONNECTION TYPE.

(2) SEE SHEET 16 FOR ANGLE SCHEDULE INDICATING MAXIMUM ALLOWABLE A.S.D. DESIGN PRESSURE RATING, MULLION SPACING AND MULLION SPAN FOR 1/4" THICK & 3/8" THICK ALUMINUM ANGLES USED TOP & BOTTOM FOR MULLION CONNECTION TO SUBSTRATE.



ALUMINUM LOUVER SYSTEM MODEL FL-D-4				W.H. DRAWN BY	
S&P AIR CONTROL, LLC.				07/07/2025 DATE	
3005 SOUTH HICKORY ST. CHATTANOOGA, TN 37407 PHONE: (423) 698-7715				25-058 DRAWING No	
159 GENCO DRIVE HARTFORD, AL 36344 FAX: (423) 698-6629				SHEET 13 OF 16	
REV. No	DESCRIPTION	DATE	REV. No	DESCRIPTION	DATE
1	OLD 23-072	07/07/25	3	-	-
2	-	-	4	-	-

MAX. MULLION SPAN (L ft) FOR A GIVEN A.S.D. DESIGN PRESSURE

RATING & MULLION SPACING FOR TYPE 5 CONNECTION *

A.S.D. D.P.R. (psf)	MULLION SPACING				ASSEMBLY HEIGHT
	3	4	5	6	
50	12' - 0"	9' - 9"	7' - 9"	6' - 6"	
60	10' - 0"	8' - 1"	6' - 6"	5' - 5"	
70	9' - 0"	6' - 11"	5' - 7"	4' - 8"	
90	7' - 0"	5' - 5"	4' - 4"	3' - 7"	

TYPE 5 CONNECTION W/ 3/8" THICK ALUMINUM ANGLE TO WOOD

8 - 3/8"Ø LAG SCREWS W/ 1.5" Min. THREADED PENETRATION

((1) 2" x BUCK REQ'D.) W/ 1.50" E.D & 2" SPACING

MAX. MULLION SPAN (L ft) FOR A GIVEN A.S.D. DESIGN PRESSURE

RATING & MULLION SPACING FOR TYPE 6 CONNECTION *

A.S.D. D.P.R. (psf)	MULLION SPACING				ASSEMBLY HEIGHT
	3	4	5	6	
50	12' - 0"	12' - 0"	12' - 0"	12' - 0"	
60	12' - 0"	12' - 0"	12' - 0"	12' - 0"	
70	12' - 0"	12' - 0"	12' - 0"	10' - 5"	
90	12' - 0"	12' - 0"	9' - 9"	8' - 2"	
120	12' - 0"	9' - 2"	7' - 4"	6' - 1"	

TYPE 6 CONNECTION W/ 3/8" THICK ALUMINUM ANGLE TO WOOD

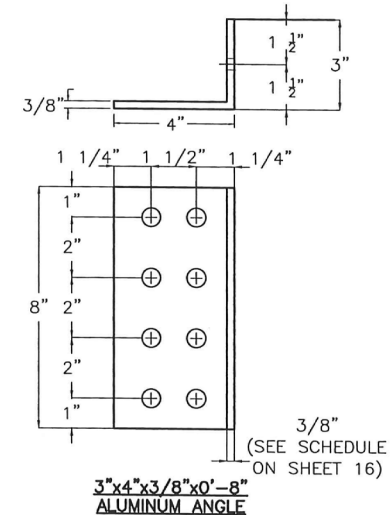
8 - 3/8"Ø LAG SCREWS W/ 3" Min. THREADED PENETRATION

((2) 2" x BUCK REQ'D.) W/ 1.50" E.D & 2" SPACING

PRODUCT RENEWED
as complying with the Florida
Building Code
NOA-No. 26-0428.02

Expiration Date 01/17/2032

By *[Signature]*
Miami-Dade Product Control



**SCHEDULE FOR MULLION
CONNECTION TO WOOD**

(Min. G=0.55)

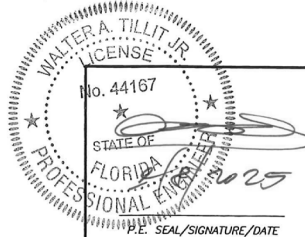
PRODUCT REVISED
as complying with the Florida
Building Code
NOA-No. 25-0805.04

Expiration Date 01/17/2027

By *[Signature]*
Miami-Dade Product Control

*** NOTES:**

(1) SEE SHEETS 12 & 16 FOR ADDITIONAL MAXIMUM MULLION SPAN LIMITATIONS FOR A GIVEN A.S.D. DESIGN PRESSURE RATING AND MAXIMUM SPACING. MAXIMUM MULLION SPAN SHALL BE THE MINIMUM BETWEEN SCHEDULES ON SHEETS 12, 16 AND THIS SHEET FOR A CONNECTION TYPE.



FLORIDA BUILDING CODE (HIGH VELOCITY HURRICANE ZONE)

© 2025 TILTECO, INC.		ALUMINUM LOUVER SYSTEM MODEL FL-D-4				W.H. DRAWN BY	
		S&P AIR CONTROL, LLC.				07/07/2025 DATE	
TILLIT TESTING & ENGINEERING COMPANY 6355 N.W. 36th St., Ste. 303, VIRGINIA GARDENS, FL 33166 Phone : (305)871-1530, Fax : (305)871-1531 e-mail: tilteco@aol.com CA-0006719 WALTER A. TILLIT Jr., P.E. FLORIDA Lic. # 44167		3005 SOUTH HICKORY ST. CHATTANOOGA, TN 37407 PHONE: (423)698-7715				159 GENCO DRIVE HARTFORD, AL 36344 FAX:(423)698-6629	
						25-058 DRAWING No	
REV. No	DESCRIPTION	DATE	REV. No	DESCRIPTION	DATE		
1	OLD 23-072	07/07/25	3	-	-		
2	-	-	4	-	-	SHEET 14 OF 16	

SHEET 14 OF 16

MAX. MULLION SPAN (L ft) FOR A GIVEN A.S.D. DESIGN PRESSURE

RATING & MULLION SPACING FOR TYPE 7 CONNECTION *

A.S.D. D.P.R. (psf)	MULLION SPACING				ASSEMBLY HEIGHT
	3	4	5	6	
30	12' - 0"	12' - 0"	12' - 0"	12' - 0"	
50	12' - 0"	12' - 0"	12' - 0"	12' - 0"	
70	12' - 0"	12' - 0"	12' - 0"	12' - 0"	
90	12' - 0"	12' - 0"	12' - 0"	12' - 0"	
100	12' - 0"	12' - 0"	12' - 0"	12' - 0"	
110	12' - 0"	12' - 0"	12' - 0"	12' - 0"	
120	12' - 0"	12' - 0"	12' - 0"	12' - 0"	
130	12' - 0"	12' - 0"	12' - 0"	12' - 0"	
140	12' - 0"	12' - 0"	12' - 0"	12' - 0"	
150	12' - 0"	12' - 0"	12' - 0"	12' - 0"	

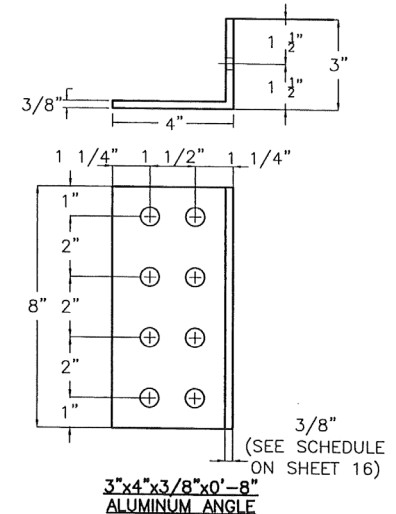
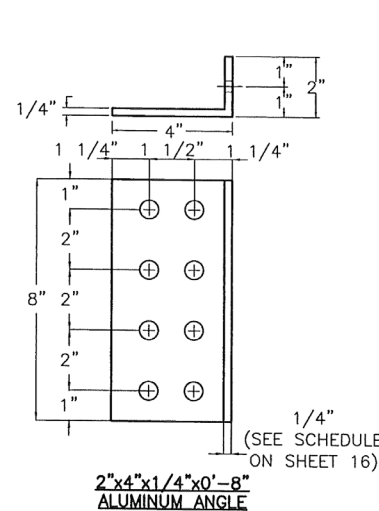
TYPE 7 CONNECTION W/ 1/4" THICK ALUMINUM ANGLE* TO STEEL
8 - 3/8"Ø-16 MACHINE SCREWS W/ 1/8" MIN. MEMBER THICKNESS

MAX. MULLION SPAN (L ft) FOR A GIVEN A.S.D. DESIGN PRESSURE

RATING & MULLION SPACING FOR TYPE 8 CONNECTION *

A.S.D. D.P.R. (psf)	MULLION SPACING				ASSEMBLY HEIGHT
	3	4	5	6	
30	12' - 0"	12' - 0"	12' - 0"	12' - 0"	
50	12' - 0"	12' - 0"	12' - 0"	12' - 0"	
70	12' - 0"	12' - 0"	12' - 0"	12' - 0"	
90	12' - 0"	12' - 0"	12' - 0"	12' - 0"	
100	12' - 0"	12' - 0"	12' - 0"	12' - 0"	
110	12' - 0"	12' - 0"	12' - 0"	12' - 0"	
120	12' - 0"	12' - 0"	12' - 0"	12' - 0"	
130	12' - 0"	12' - 0"	12' - 0"	12' - 0"	
140	12' - 0"	12' - 0"	12' - 0"	12' - 0"	
150	12' - 0"	12' - 0"	12' - 0"	12' - 0"	

TYPE 8 CONNECTION W/ 3/8" THICK ALUMINUM ANGLE* TO STEEL
8 - 3/8"Ø-16 MACHINE SCREWS W/ 1/8" MIN. MEMBER THICKNESS



SCHEDULE FOR MULLION CONNECTION TO STEEL (Min. Fy=33 ksi)

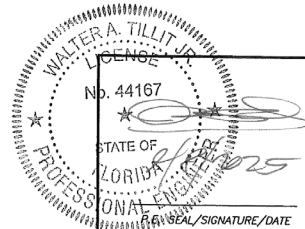
* NOTES:

(1) SEE SHEETS 12& 16 FOR ADDITIONAL MAXIMUM MULLION SPAN (ASSEMBLY HEIGHT) LIMITATIONS FOR A GIVEN A.S.D. DESIGN PRESSURE RATING AND MAXIMUM SPACING. MAXIMUM MULLION SPAN SHALL BE THE MINIMUM BETWEEN SCHEDULES ON SHEETS 12 , 16 AND THIS SHEET FOR A CONNECTION TYPE.

(2) SEE SHEET 16 FOR ANGLE SCHEDULE INDICATING MAXIMUM ALLOWABLE A.S.D. DESIGN PRESSURE RATING, MULLION SPACING AND MULLION SPAN (ASSEMBLY HEIGHT) FOR 1/4" THICK & 3/8" THICK ALUMINUM ANGLES USED TOP & BOTTOM FOR MULLION CONNECTION TO SUBSTRATE.

PRODUCT REVISED
as complying with the Florida
Building Code
NOA-No. **25-0805.04**
Expiration Date **01/17/2027**
By *[Signature]*
Miami-Dade Product Control

PRODUCT RENEWED
as complying with the Florida
Building Code
NOA-No. **26-0428.02**
Expiration Date **01/17/2032**
By *[Signature]*
Miami-Dade Product Control



FLORIDA BUILDING CODE (HIGH VELOCITY HURRICANE ZONE)

© 2025 TILTECO, INC.		ALUMINUM LOUVER SYSTEM MODEL FL-D-4		W.H. DRAWN BY	
 TILTECO INC. TILLIT TESTING & ENGINEERING COMPANY 6355 N.W. 35th St., Ste. 305, VIRGINIA GARDENS, FL 33166 Phone: (305)871-1530 Fax: (305)871-1531 e-mail: tilteco@tillit.com CA-0006719 WALTER A. TILLIT Jr. P.E. FLORIDA Lic. # 44167		S&P AIR CONTROL, LLC.		07/07/2025 DATE	
		3005 SOUTH HICKORY ST. CHATTANOOGA, TN 37407 PHONE: (423)698-7715		159 GENCO DRIVE HARTFORD, AL 36344 FAX:(423)698-6629	
				25-058 DRAWING No	
REV. No	DESCRIPTION	DATE	REV. No	DESCRIPTION	DATE
1	OLD 23-072	07/07/25	3	-	-
2	-	-	4	-	-
				SHEET 15 OF 16	

SHEET 15 OF 16

**SCHEDULE FOR MAX. MULLION SPAN FOR A GIVEN A.S.D. DESIGN PRESSURE
RATING & MULLION SPACING IN ORDER TO USE 1/4" THICK ALUMINUM
ANGLE FOR MULLION CONNECTION TO SUBSTRATE ***

A.S.D. D.P.R. (psf)	MULLION SPACING (ft)				ASSEMBLY HEIGHT
	3	4	5	6	
30	12' - 0"	12' - 0"	12' - 0"	12' - 0"	
50	12' - 0"	12' - 0"	12' - 0"	12' - 0"	
70	12' - 0"	12' - 0"	12' - 0"	12' - 0"	
90	12' - 0"	12' - 0"	12' - 0"	10' - 0"	
100	12' - 0"	12' - 0"	10' - 10"	9' - 0"	
110	12' - 0"	12' - 0"	9' - 10"	8' - 2"	
120	12' - 0"	11' - 3"	9' - 0"	7' - 6"	
130	12' - 0"	10' - 5"	8' - 4"	6' - 11"	
140	12' - 0"	9' - 8"	7' - 9"	6' - 5"	
150	12' - 0"	9' - 0"	7' - 2"	6' - 0"	

PRODUCT RENEWED
as complying with the Florida
Building Code
NOA-No. **26-0428.02**
Expiration Date **01/17/2032**
By *[Signature]*
Miami-Dade Product Control

*** NOTES:**

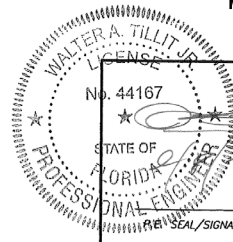
(1) ANY MULLION SPACING OR MULLION SPAN (ASSEMBLY HEIGHT) LARGER THAN THE ONES INCLUDED ON THIS SCHEDULE WILL REQUIRE A 3" X 4" X 3/8" THICK ALUMINUM ANGLE INSTEAD OF 2" X 4" X 1/4" THICK ALUMINUM ANGLE

(2) SEE SHEETS 12 THRU 15 FOR ADDITIONAL MAXIMUM MULLION SPAN LIMITATIONS FOR A GIVEN A.S.D. DESIGN PRESSURE RATING AND MAXIMUM SPACING. MAXIMUM MULLION SPAN SHALL BE THE MINIMUM BETWEEN SCHEDULES ON SHEETS 12 THRU 15 FOR A GIVEN CONNECTION TYPE, AND SCHEDULE ON THIS SHEET FOR THE TYPE OF ANGLE USED AT MULLION CONNECTION.

**1/2" Ø THRU BOLT REQUIREMENTS FOR CONNECTION OF
ALUMINUM ANGLE TO MULLION FOR MULLION
END CONNECTION TO SUBSTRATE.**

MULLION TYPE	1/2" Ø THRU BOLT REQUIRED
2"x4" & 2"x6"	(1) REQUIRED
(2) 2"x6"	(2) REQUIRED & (1) EACH TUBE
4"x6" & 4"x8"	(2) REQUIRED

PRODUCT REVISED
as complying with the Florida
Building Code
NOA-No. **25-0805.04**
Expiration Date **01/17/2027**
By *[Signature]*
Miami-Dade Product Control



FLORIDA BUILDING CODE (HIGH VELOCITY HURRICANE ZONE)

© 2025 TILTECO, INC.		ALUMINUM LOUVER SYSTEM MODEL FL-D-4		W.H. DRAWN BY
TILTECO INC. TILLIT TESTING & ENGINEERING COMPANY 6355 N.W. 36th St., Ste. 305, VIRGINIA GARDENS, FL 33166 Phone: (305)871-1530, Fax: (305)871-1531 e-mail: tilteco@aol.com CA-0006719 WALTER A. TILLIT Jr., P.E. FLORIDA Lic. # 44167		3005 SOUTH HICKORY ST. 159 GENCO DRIVE CHATTANOOGA, TN 37407 HARTFORD, AL 36344 PHONE: (423)698-7715 FAX: (423)698-6629		07/07/2025 DATE
		S&P AIR CONTROL, LLC.		25-058 DRAWING No
REV. No	DESCRIPTION	DATE	REV. No	DESCRIPTION
1	OLD 23-072	07/07/25	2	-
2	-	-	4	-