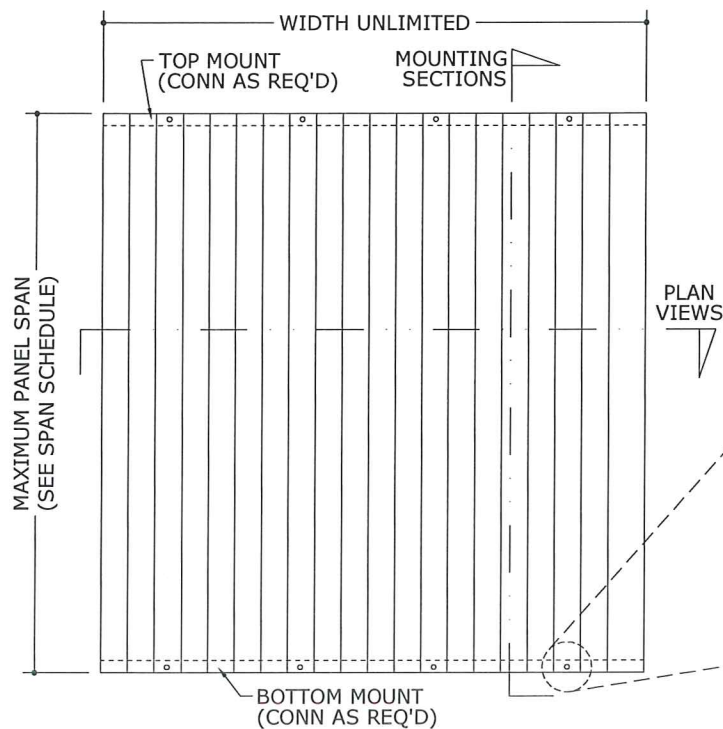
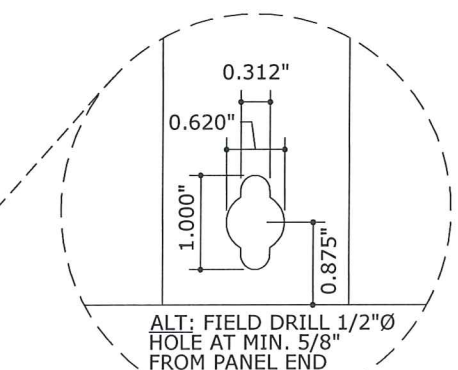


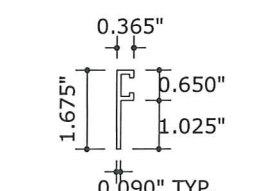
# 26ga GALV. STEEL STORM PANEL (NON-HVHZ)



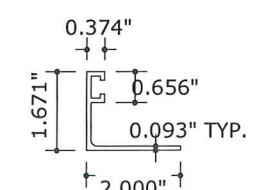
**1** TYPICAL ELEVATION  
1 N.T.S.



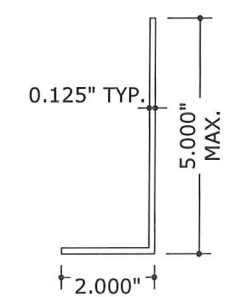
**1** KEYHOLE DETAIL  
1 N.T.S.



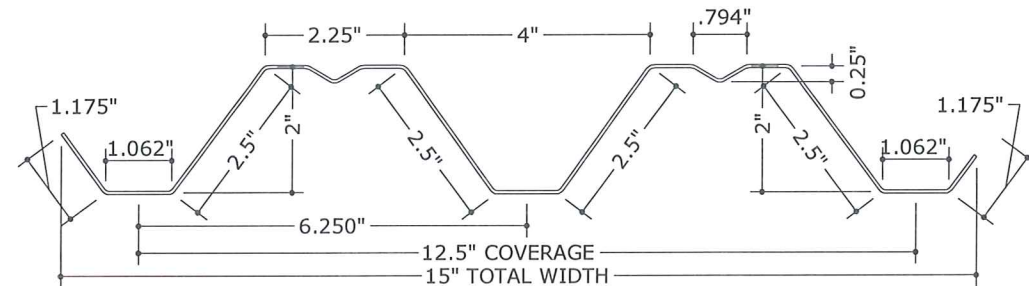
**2** STUDLESS FLAT TRACK  
3" = 1'-0"



**3** STUDLESS ANGLE TRACK  
3" = 1'-0"



**4** BUILDOUT ANGLE  
3" = 1'-0"



**1** STORM PANEL PROFILE  
4" = 1'-0" SECTION

## PANEL SPAN SCHEDULE:

| ALLOWABLE DESIGN LOAD | MAX PANEL SPAN |
|-----------------------|----------------|
| +/-25 PSF             | 8'-5"          |
| +/-35 PSF             | 7'-4"          |
| +/-40 PSF             | 6'-6"          |
| +/-45 PSF             | 5'-9"          |
| +/-50 PSF             | 5'-2"          |
| +/-55 PSF             | 4'-9"          |
| +/-60 PSF             | 4'-4"          |
| +/-65 PSF             | 4'-0"          |

## TABLE NOTES:

- SPANS SHOWN IN "PANEL SPAN SCHEDULE" ABOVE ARE MAXIMUM ALLOWABLE SPANS AT EACH RESPECTIVE DESIGN PRESSURE. THIS SCHEDULE MAY BE USED FOR ALL PANELS MOUNTED WITH ANY COMBINATION OF EXTRUSIONS OR DIRECTLY TO HOST STRUCTURE.
- TABLES ABOVE ARE VALID FOR PANELS MOUNTED HORIZONTALLY OR VERTICALLY.

## GLAZING SEPARATION SCHEDULE:

| MINIMUM GLAZING SEPARATION WITH 26ga GALVANIZED STEEL PANELS (WIND ZONE 4 & ESSENTIAL FACILITIES ONLY) |                      |                                |                                |
|--|----------------------|--------------------------------|--------------------------------|
| MAX PANEL SPAN   | POSITIVE DESIGN LOAD | INSTALLATIONS ≤30' ABOVE GRADE | INSTALLATIONS >30' ABOVE GRADE |
| 48"  | + 25 PSF             | 3.23"                          | 1.02"                          |
|  | + 40 PSF             | 3.23"                          | 1.04"                          |
|  | + 65 PSF             | 3.23"                          | 1.05"                          |
| 62"  | + 25 PSF             | 3.60"                          | 1.06"                          |
|  | + 40 PSF             | 3.60"                          | 1.10"                          |
|  | + 50 PSF             | 3.60"                          | 1.12"                          |
| 78"  | + 25 PSF             | 3.60"                          | 1.17"                          |
|  | + 40 PSF             | 3.60"                          | 1.27"                          |
| 101"   | + 25 PSF             | 3.60"                          | 1.59"                          |

## TABLE NOTES:

- SEPARATION FROM GLAZING IS REQUIRED ONLY IN ASTM WIND ZONE 4 AND ESSENTIAL FACILITIES.
- LINEAR INTERPOLATION BETWEEN SHUTTER SPANS IS NOT PERMITTED. FOR SPANS BETWEEN THOSE INDICATED ABOVE, THE SEPARATION FROM GLASS FOR THE NEXT HIGHER SPAN SHALL BE USED.

MAXIMUM ALLOWABLE DESIGN PRESSURES:  
NOTED IN SPAN SCHEDULE

## DESIGN NOTES

POSITIVE AND NEGATIVE DESIGN PRESSURES CALCULATED FOR USE WITH THIS SYSTEM SHALL BE DETERMINED BY OTHERS ON A JOB-SPECIFIC BASIS IN ACCORDANCE WITH THE GOVERNING CODE. SITE-SPECIFIC PRESSURE REQUIREMENTS AS DETERMINED IN ACCORDANCE WITH ASCE 7-10 AND CHAPTER 1609 OF THE 2010 FLORIDA BUILDING CODE SHALL BE LESS THAN OR EQUAL TO THE POSITIVE OR NEGATIVE DESIGN PRESSURE CAPACITY VALUES LISTED HEREIN FOR ANY ASSEMBLY AS SHOWN.

## GENERAL NOTES

- THIS SPECIFICATION HAS BEEN DESIGNED AND SHALL BE FABRICATED IN ACCORDANCE WITH THE REQUIREMENTS OF THE 2010 FLORIDA BUILDING CODE FOR USE OUTSIDE THE HVHZ ONLY, PER ASTM STANDARDS E330, E1886 & E1996, AND IS APPROVED FOR LARGE MISSILE IMPACT RESISTANCE. CONTRACTOR SHALL INVESTIGATE AND CONFORM TO ALL LOCAL BUILDING CODE AMENDMENTS WHICH MAY APPLY. DESIGN CRITERIA BEYOND AS STATED HEREIN MAY REQUIRE ADDITIONAL SITE-SPECIFIC SEALED ENGINEERING.
- NO 33-1/3% INCREASE IN ALLOWABLE STRESS HAS BEEN USED IN THE DESIGN OF THIS SYSTEM.
- THE ARCHITECT/ENGINEER OF RECORD FOR THE PROJECT SUPERSTRUCTURE WITH WHICH THIS DESIGN IS USED SHALL BE RESPONSIBLE FOR THE INTEGRITY OF ALL SUPPORTING SURFACES TO THIS DESIGN WHICH SHALL BE COORDINATED BY THE PERMITTING CONTRACTOR.
- SEPARATE 'SITE-SPECIFIC' SEALED ENGINEERING SHALL BE REQUIRED IN ORDER TO DEVIATE FROM LOADS, DEFLECTIONS, OR SPANS CONTAINED HEREIN. LINEAR INTERPOLATION OF THE ALLOWABLE SPAN TABLES LISTED HEREIN SHALL NOT BE PERMITTED. CONTACT THIS ENGINEER FOR ALTERNATE SPAN CALCULATIONS AS MAY BE REQUIRED.
- THE SYSTEM DETAILED HEREIN IS GENERIC AND DOES NOT PROVIDE INFORMATION FOR A SPECIFIC SITE. FOR SITE CONDITIONS DIFFERENT FROM THE CONDITIONS DETAILED HEREIN, A LICENSED ENGINEER OR REGISTERED ARCHITECT SHALL PREPARE SITE SPECIFIC DOCUMENTS FOR USE IN CONJUNCTION WITH THIS DOCUMENT.
- ALL FASTENERS TO BE 3/4"Ø OR GREATER SAE GRADE 5 UNLESS NOTED OTHERWISE. FASTENERS SHALL BE CADMIUM-PLATED OR OTHERWISE CORROSION-RESISTANT MATERIAL AND SHALL COMPLY WITH "SPECIFICATIONS FOR ALUMINUM STRUCTURES" SECTION 5.2.1 BY THE ALUMINUM ASSOCIATION, INC., & ANY APPLICABLE FEDERAL, STATE, AND/OR LOCAL CODES.
- USE OF KEYHOLE WASHERS IS OPTIONAL IN CONJUNCTION WITH ALL MOUNTING CONDITIONS, EXCEPT THAT DIRECT MOUNT INSTALLATIONS SHALL REQUIRE A KEYHOLE WASHER AT EACH ANCHOR. WASHER WINGNUTS SHALL HAVE 0.865" MINIMUM WASHER DIAMETER.
- ALL STORM PANELS SHALL BE ASTM A653, 50KSI MIN. WITH G60 GALVANIZED COATING & MIN. Fy=57.2KSI. STORM PANELS SHALL HAVE A MINIMUM GALVANIZED THICKNESS t=0.0201".
- ALL ALUMINUM EXTRUSIONS SHALL BE 6063-T6 ALUMINUM ALLOY, UNLESS NOTED OTHERWISE.
- CONCRETE ANCHORS NOTED HEREIN SHALL BE EMBEDDED TO UN-CRACKED CONCRETE ONLY. INSTALL ALL CONCRETE ANCHORS PER MANUFACTURE'S RECOMMENDATIONS.
- THE CONTRACTOR IS RESPONSIBLE TO INSULATE ALL MEMBERS FROM DISSIMILAR MATERIALS TO PREVENT ELECTROLYSIS, I.E. ALUMINUM PER F.B.C. 2003.8.4.
- ENGINEER SEAL AFFIXED HERE TO VALIDATES STRUCTURAL DESIGN AS SHOWN ONLY. USE OF THIS SPECIFICATION BY CONTRACTOR, et. al. INDEMNIFIES & SAVES HARMLESS THIS ENGINEER FOR ALL COST & DAMAGES INCLUDING LEGAL FEES & APPELLATE FEES RESULTING FROM MATERIAL FABRICATION, SYSTEM ERECTION, & CONSTRUCTION PRACTICES BEYOND THAT WHICH IS CALLED FOR BY LOCAL, STATE, & FEDERAL CODES & FROM DEVIATIONS OF THIS PLAN.
- EXCEPT AS EXPRESSLY PROVIDED HEREIN, NO ADDITIONAL CERTIFICATIONS OR AFFIRMATIONS ARE INTENDED.
- ALTERATIONS, ADDITIONS, HIGHLIGHTING, OR OTHER MARKINGS TO THIS DOCUMENT ARE NOT PERMITTED AND INVALIDATE THIS CERTIFICATION.
- PANELS SHALL BE PERMANENTLY LABELED WITH A MINIMUM OF (1) LABEL PER PANEL, CONTAINING THE FOLLOWING INFORMATION: METALS USA BLDG PRODUCTS GROVELAND, FLORIDA

FRANK L. BENNARDO, P.E.  
#PE0046549

12/16/2011

PROFESSIONAL ENGINEER

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METALS USA  
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7815 AMERICAN WAY  
GROVELAND, FL 34736

26 ga GALV. STEEL STORM PANEL  
NON-HVHZ COMPLIANT  
FLORIDA STATE PRODUCT APPROVAL-FL.#7344.1

| DRWN | CHKD | DATE     |
|------|------|----------|
| JEM  | CL   | 8/4/06   |
| KL   | CL   | 01/05/07 |
| CSL  | KL   | 12/05/11 |

REMARKS

INIT ISSUE

BUILDOUT BLOCK DETAIL

REV. FOR 2010 FBC

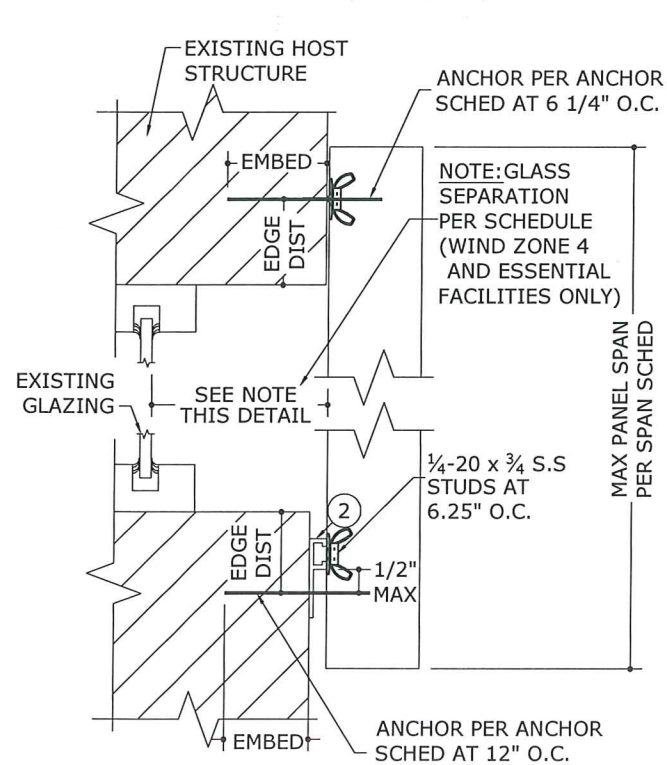
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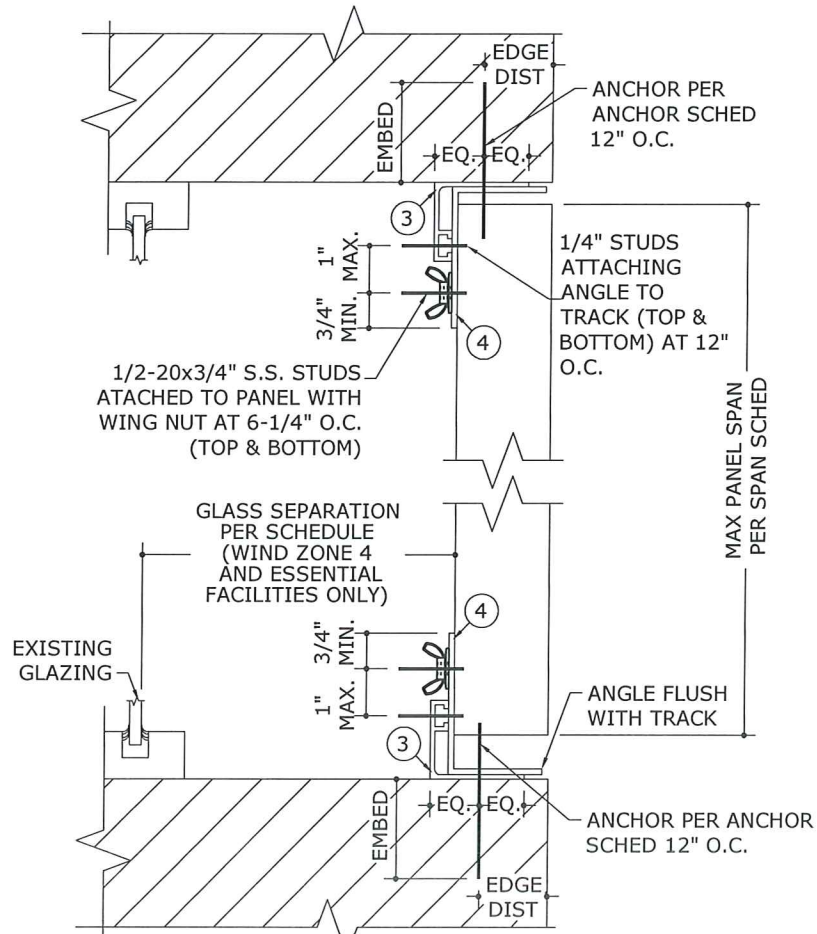
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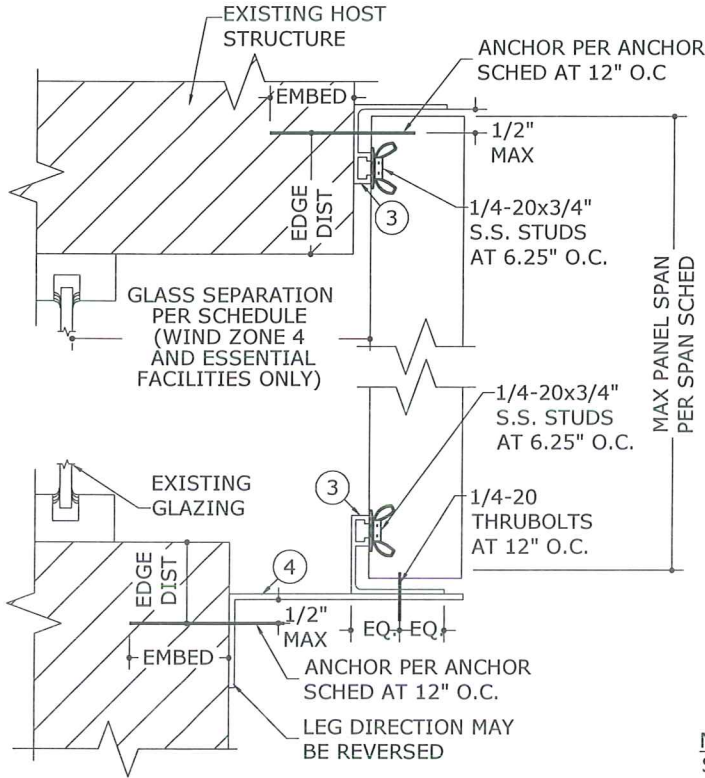




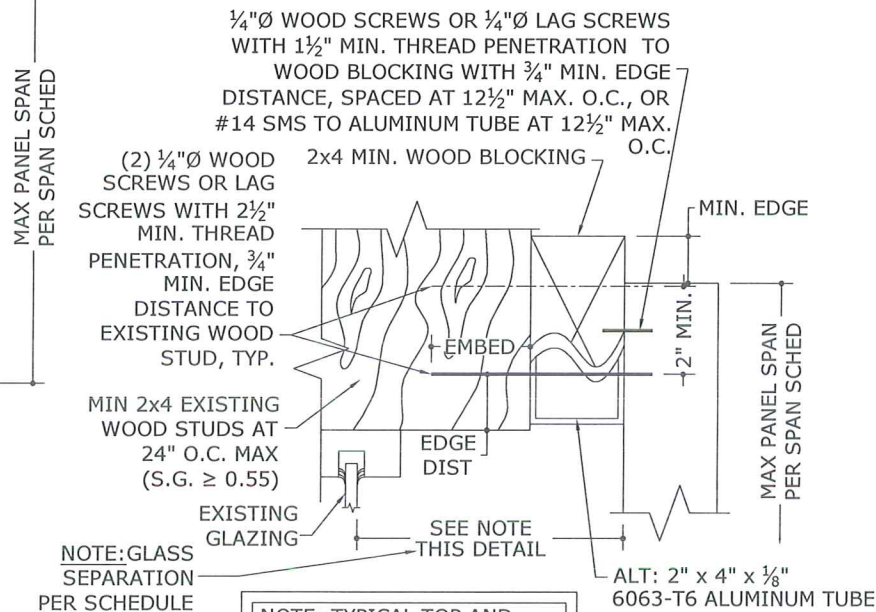
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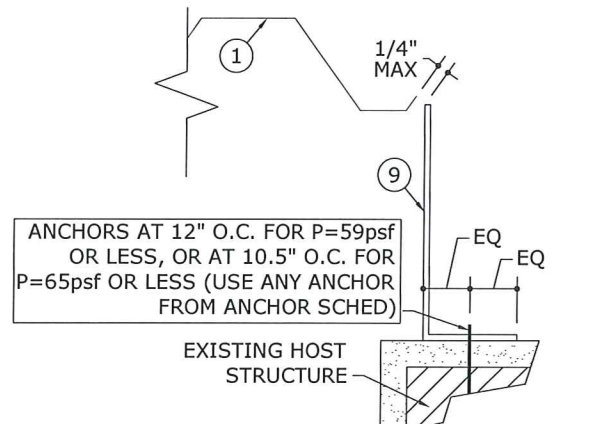
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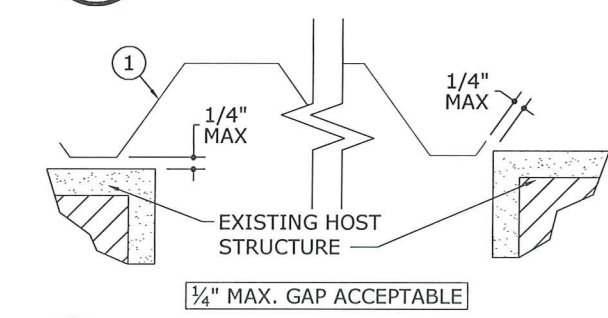
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**2** 3" = 1'-0" MOUNTING SECTION



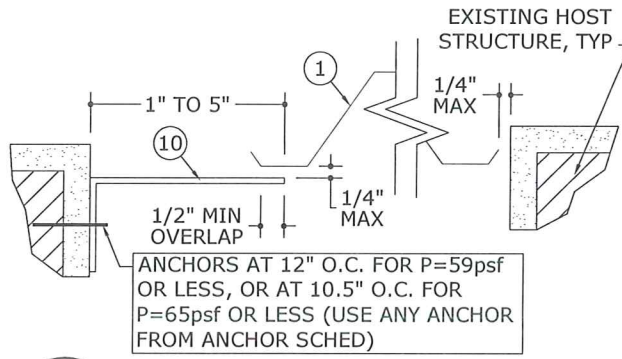
**4**  
**2** 3" = 1'-0" MOUNTING SECTION



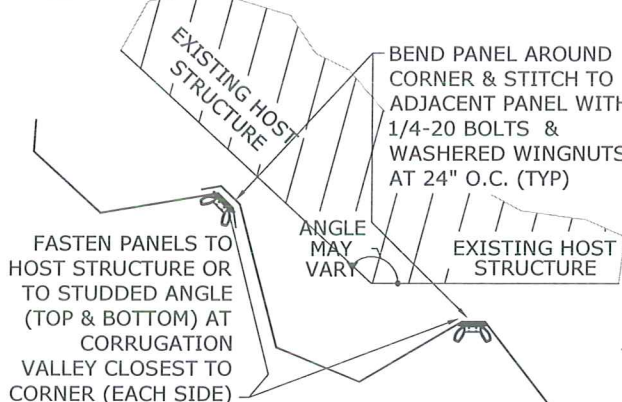
**5**  
**2** 3" = 1'-0" PLAN VIEW



**6**  
**2** 3" = 1'-0" PLAN VIEW



**7**  
**2** 3" = 1'-0" PLAN VIEW



**8**  
**2** N.T.S. PLAN VIEW

**ANCHOR SCHEDULE:**

- TO HOLLOW BLOCK OR CONCRETE:**
- 1/4"Ø TAPCONS (ELCO OR ITW) WITH 1-3/4" MIN. EMBED & 2-1/2" MIN. EDGE DISTANCE.
  - \* • 1/4"Ø ELCO PANELMATES (MALE, FEMALE, OR PLUS) WITH 1-3/4" MIN. EMBED. & 2-1/2" MIN. EDGE DISTANCE.
  - \* • 1/4-20 POWERS CALK-IN WITH 7/8" MIN. EMBED. & 2-1/2" MIN. EDGE DISTANCE.
  - \* • 1/4-20 ALL POINTS SOLID-SET ANCHOR WITH 7/8" MIN. EMBED. & 2-1/2" MIN. EDGE DISTANCE.
- TO WOOD:**
- 1/4"Ø TAPCONS (ELCO OR ITW) OR #14 WOOD SCREWS WITH 1-1/2" MIN. THREAD PENETRATION. & 3/4" MIN. EDGE DISTANCE.
  - 1/4" LAG SCREWS WITH 1-1/2" MIN. THREAD PENETRATION & 3/4" MIN. EDGE DISTANCE.
  - \* • 1/4" PANELMATES (MALE, FEMALE, OR PLUS) WITH 1-1/2" MIN. EMBED. & 3/4" MIN. EDGE DISTANCE.

**ANCHOR NOTES:**

1. ANCHORS SHALL BE INSTALLED IN ACCORDANCE WITH MANUFACTURERS' RECOMMENDATIONS.
2. TAPCONS MAY BE MANUFACTURED BY ELCO OR ITW. "ELCO PANELMATE" ANCHORS FOR USE IN CONCRETE, HOLLOW BLOCK, OR WOOD MAY BE MALE, FEMALE, OR PANELMATE PLUS.
3. ENSURE MINIMUM 2-1/2" EDGE DISTANCE FOR ALL ANCHORS TO CONCRETE & TO HOLLOW BLOCK.
4. WHERE ANCHORS FASTEN TO NARROW FACE OF STUD FRAMING, ANCHOR SHALL BE LOCATED IN CENTER OF NOMINAL 2x (MIN) WOOD STUD (i.e. 3/4" EDGE DISTANCE IS ACCEPTABLE FOR ANCHORS TO WOOD FRAMING).
5. WOOD HOST STRUCTURE SHALL BE "SOUTHERN PINE" G=0.55 OR GREATER DENSITY.
6. MINIMUM EMBEDMENT SHALL BE AS NOTED IN ANCHOR SCHEDULE. MINIMUM EMBEDMENT AND EDGE DISTANCE EXCLUDES STUCCO, FOAM, BRICK, AND OTHER WALL FINISHES.
7. CONCRETE ANCHORS SHALL BE INSTALLED TO NON-CRACKED CONCRETE ONLY.
8. WHERE EXISTING STRUCTURE IS WOOD FRAMING, EXISTING CONDITIONS MAY VARY. FIELD VERIFY THAT FASTENERS ARE INTO ADEQUATE WOOD FRAMING MEMBERS, NOT INTO PLYWOOD.
11. MACHINE SCREWS SHALL HAVE MINIMUM OF 1/2" ENGAGEMENT OF THREADS IN BASE ANCHOR AND MAY HAVE EITHER A PAN HEAD, TRUSS HEAD, OR WAFER HEAD ("SIDEWALK BOLT") U.N.O.
12. \* DESIGNATES ANCHORS WHICH ARE REMOVABLE AND MAY BE USED FOR DIRECT MOUNT INSTALLATIONS.

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7815 AMERICAN WAY  
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26 ga GALV. STEEL STORM PANEL  
NON-HVHZ COMPLIANT  
FLORIDA STATE PRODUCT APPROVAL-FL-7344.1

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