

**CODE CRITERIA:**

THE CONTRACTOR/MANUFACTURER SHALL COMPLY WITH THE FOLLOWING CODES AND ALL APPLICABLE AMENDMENTS/SUPPLEMENTS:

- 1. INTERNATIONAL BUILDING CODE, 2015

5. STRUCTURES ARE DESIGNED FOR LOCATIONS THAT HAVE A 3 SECOND WIND GUST OF 150 MPH (MAX). STRUCTURES SHOULD NOT BE USED IN OTHER LOCATIONS.

6. STRUCTURES ARE DESIGNED FOR LOCATIONS WITH A SURFACE ROUGHNESS CATEGORY B AND A TOPOGRAPHICAL FACTOR OF 1.0. STRUCTURES SHOULD NOT BE USED IN OTHER LOCATIONS.

7. STRUCTURES SHOULD HAVE METAL ROOF OR OPTIONAL 25 YEAR RATED FIBERGLASS/ASPHALT SHINGLES WITH 1 LAYER OF 15 LB ROOFING FELT.

8. ALL STUDS, RAFTERS, COLLAR TIES, AND TRUSS CHORDS ARE SPF #2, U.N.O.

9. ALL EXTERIOR DIMENSIONAL WOOD IS TO BE PRESSURE TREATED.

10. ALL ROOF DECKING IS TO BE 7/16" O.S.B.

11. ALL SIDING IS TO BE 19/32 T-111 OR DURATEMP SIDING W/ 50 YR LTD MFG WARRANTY.

12. ALL FLOOR JOISTS ARE TO BE P.T. SYP #2.

13. ALL EXTERIOR NAILS ARE TO BE HOT DIPPED GALVANIZED.

14. ALL INTERIOR FLOOR DECKING IS TO BE 5/8" PLYWOOD. EXTERIOR TO BE 5/4" P.T.

15. ALL SKIDS ARE TO BE 4x6 P.T. SYP, RATED FOR GROUND CONTACT.

16. THE STRUCTURE HAS BEEN DESIGNED TO RESIST LOADS AS A COMPLETED STRUCTURE ONLY. APPLICATION OF CONSTRUCTION LOADS TO THE PARTIALLY COMPLETED STRUCTURE SHALL BE CONSIDERED BY THE CONTRACTOR AND INCLUDED IN THE DESIGN OF SHORING, BRACING, FORM WORK, AND OTHER SUPPORTING ELEMENTS PROVIDED FOR CONSTRUCTION OF THE STRUCTURE.

17. NO FIELD SUPERVISION OR CONSTRUCTION ADMINISTRATION WILL BE PROVIDED BY THE ENGINEER.

**DESIGN CRITERIA:**

1. INTERNATIONAL BUILDING CODE 2015

2. DEAD LOADS:  
FLOOR: 10 PSF  
LOFT: 5 PSF  
ROOF: 10 PSF

3. LIVE LOADS:  
FLOOR: 40 PSF  
LOFT: 10 PSF  
ROOF: 20 PSF (REDUCIBLE)

4. SNOW LOADS:  
GROUND SNOW LOAD, Pg=25psf  
FLAT ROOF SNOW LOAD, Pf=20psf  
SNOW EXPOSURE FACTOR, Ce=1.2  
SNOW LOAD IMPORTANCE FACTOR, I=0.8  
THERMAL FACTOR, Ct=1.2

5. WIND LOADS:  
BASIC WIND SPEED, V=150 MPH  
RISK CATEGORY = I  
WIND EXPOSURE C  
WIND LOAD IMPORTANCE FACTOR = 1.0  
C&C ROOF-ZONE 1=23.3, -37.0 psf  
C&C ROOF-ZONE 2=23.3, -64.5 psf  
C&C ROOF-ZONE 3=23.3, -95.4 psf  
C&C WALL-ZONE 4=40.5, -43.9 psf  
C&C WALL-ZONE 5=40.5, -54.2 psf

6. SEISMIC LOADS:  
THIS STRUCTURE IS EXEMPT FROM SEISMIC DESIGN PER EXEMPTION 3 OF ASCE 7-10, SECTION 11.1.2

**ITEMS BY OTHERS:**

THE FOLLOWING ITEMS ARE NOT PROVIDED BY RAILROAD CONSULTANTS, PLLC AND ARE TO BE DESIGNED BY OTHERS IF APPLICABLE AND ARE TO BE SUPPLIED AND INSTALLED BY OTHERS. THESE ITEMS MAY BE SUBJECT TO LOCAL JURISDICTION APPROVAL. RAILROAD CONSULTANTS, PLLC IS NOT RESPONSIBLE THESE ITEMS.

- 1. RAMPS, STAIRS, AND GENERAL ACCESS
- 2. ELECTRICAL SERVICE HOOKUP

**BUILDING SIZES:**

<u>8' WIDTH</u> 8'x12'	<u>14' WIDTH*</u> *NOTE:(13'-0 ACTUAL) 14'x16' 14'x20' 14'x24' 14'x28' 14'x32' 14'x36' 14'x40'
<u>10' WIDTH</u> 10'x12'      10'x20' 10'x16'      10'x24'	<u>16' WIDTH***</u> ***NOTE:(15'-0 ACTUAL) 16'x20' 16'x24' 16'x28' 16'x32' 16'x36' 16'x40'
<u>12' WIDTH**</u> **NOTE:(11'-2 ACTUAL) 12'x12' 12'x16' 12'x20' 12'x24' 12'x28' 12'x32' 12'x40'	

**INDEX OF SHEETS:**

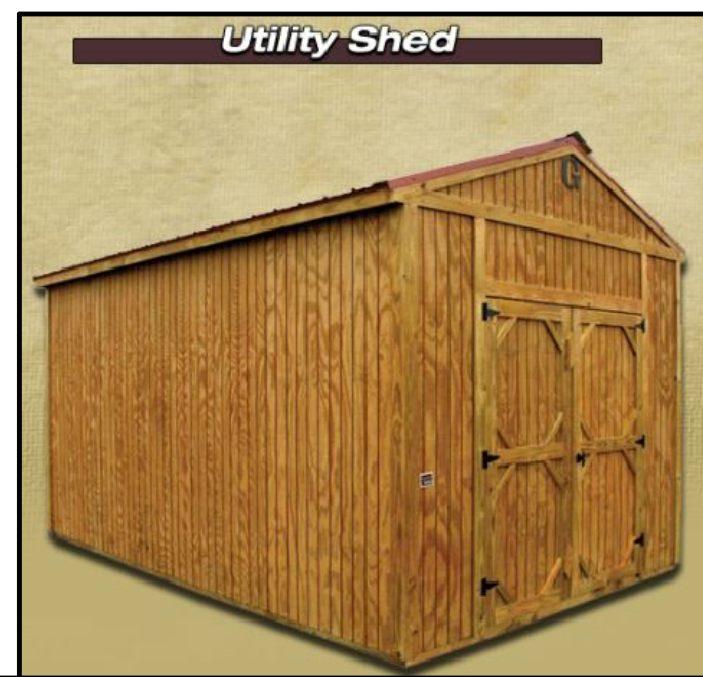
- S-0-UT - COVER SHEET
- S-1-UT - FOUNDATION PLAN
- S-2-UT - UPLIFT ANCHORAGE
- S-3-UT - FRAMING PLAN
- S-4-UT - BUILDING SECTIONS
- S-5-UT - ELEVATIONS
- S-6-UT - NAILING PATTERN
- S-7-UT - DETAILS
- S-8-UT - DETAILS

**PROJECT NOTE:**

THIS BUILDING IS NOT DESIGNED FOR HUMAN HABITATION AND DOES NOT HAVE WATER, SEWER, ELECTRICAL OR HVAC SYSTEMS. THIS BUILDING IS DESIGNED AS A MINOR STORAGE OCCUPANCY ONLY.

**GENERAL NOTES:**

- 1. STRUCTURE HAS BEEN DESIGNED IN ACCORDANCE WITH THE INTERNATIONAL BUILDING CODE, 2012.
- 2. ALL MATERIALS AND LABOR SHALL BE IN ACCORDANCE WITH THE ABOVE CODE AND ALL OTHER APPLICABLE LOCAL CODES AT THE TIME OF MANUFACTURE.
- 3. DRAWINGS SHALL NOT BE SCALED FOR DIMENSIONS.
- 4. STRUCTURES ARE CLASSIFIED AS "MINOR STORAGE FACILITIES" (OCCUPANCY CATEGORY I) AND SHOULD NOT BE USED FOR HUMAN HABITATION.



**UTILITY--LA --V=150MPH--IBC 2015**



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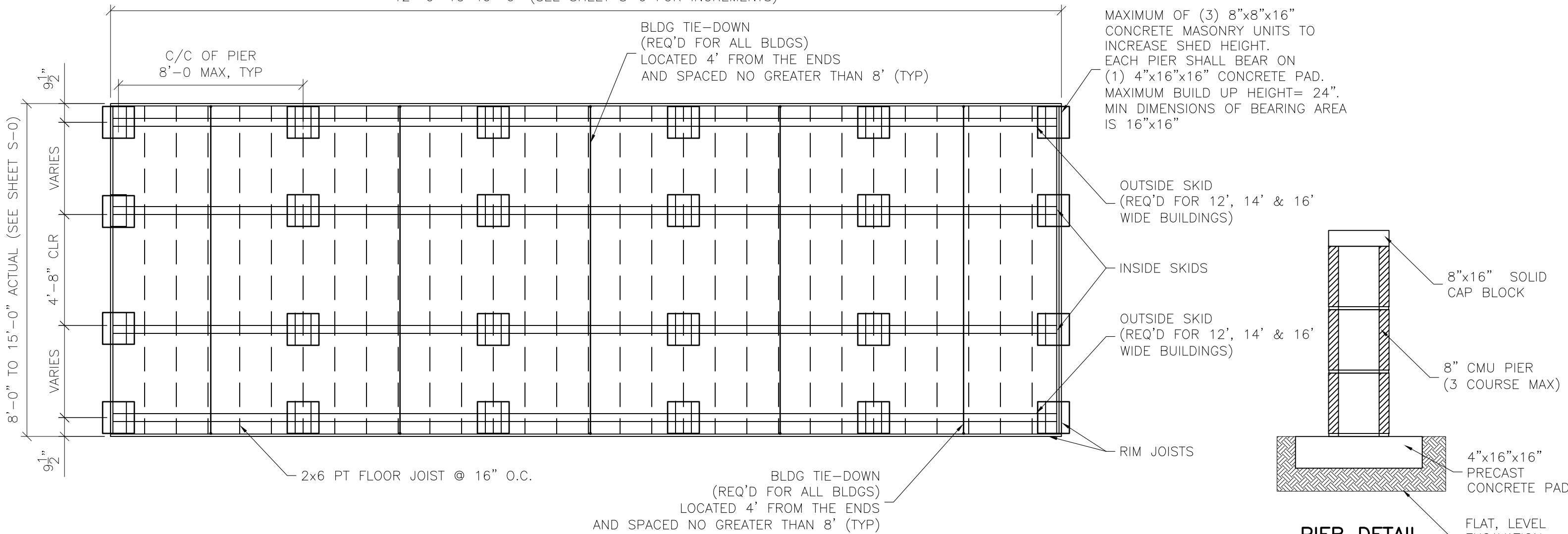


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6807 HWY 62 WEST  
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PROJECT NO:	14017
DATE:	08-23-16
DRAWN BY:	JGG
CHECKED BY:	DBG
REVISION:	01

SHEET NUMBER  
**S-0-UT**  
SCALE: 1/4"=1'-0

12'-0" TO 40'-0" (SEE SHEET S-0 FOR INCREMENTS)



**FOUNDATION PLAN**

**PIER DETAIL**

**FOUNDATION:**

1. ANCHORS ARE SPECIFIED ON SHEET S-2 AND SHALL BE INSTALLED PER MANUFACTURE'S RECOMMENDATIONS PER THE BUILDING CODE.
2. ANCHORS AND STRAPS INCLUDING THE INSTALLATION SHALL MEET THE REQUIREMENTS OF APPENDIX E OF THE INTERNATIONAL RESIDENTIAL BUILDING CODE.
3. THE MINIMUM ALLOWABLE SOIL BEARING CAPACITY OF 2500 psf HAS BEEN ASSUMED FOR FOOTING DESIGN. CONTRACTOR TO HAVE THIS CAPACITY VERIFIED PRIOR TO CONSTRUCTION.
4. IF A MINIMUM ALLOWABLE SOIL BEARING CAPACITY OF 1500 psf IS USED, THEN THE PIER SPACING SHALL BE NO GREATER THAN 4'-0".
5. FOOTINGS SHALL BE CARRIED TO AN ELEVATION LOWER THAN THOSE SHOWN ON THE DRAWINGS IF REQUIRED TO REACH SUITABLE SOIL.
6. FOOTINGS SHALL BE PLACED ON SUITABLE SOIL THAT MEETS DESIGN ASSUMPTIONS.
7. FOUNDATION MATERIALS AND LABOR IS PROVIDED BY CUSTOMER.
8. TIE DOWNS SHALL BE PLACED AT EACH OUTER PIER.
9. SHED IS DESIGNED TO ALSO BE PLACED ON FLAT, LEVEL GROUND DIRECTLY ON THE SKIDS.

**MASONRY:**

- CMU f'm = 1,500 PSI
- MORTAR f'm = 1,900 PSI
- GROUT f'm = 3,500 PSI

**CONCRETE:**

1. MATERIALS (COMPRESSIVE STRENGTH AT 28 DAYS)  
 FOOTINGS 3,000 PSI  
 FOOTINGS AND EXTERIOR CONCRETE SHALL BE AIR-ENTRAINED



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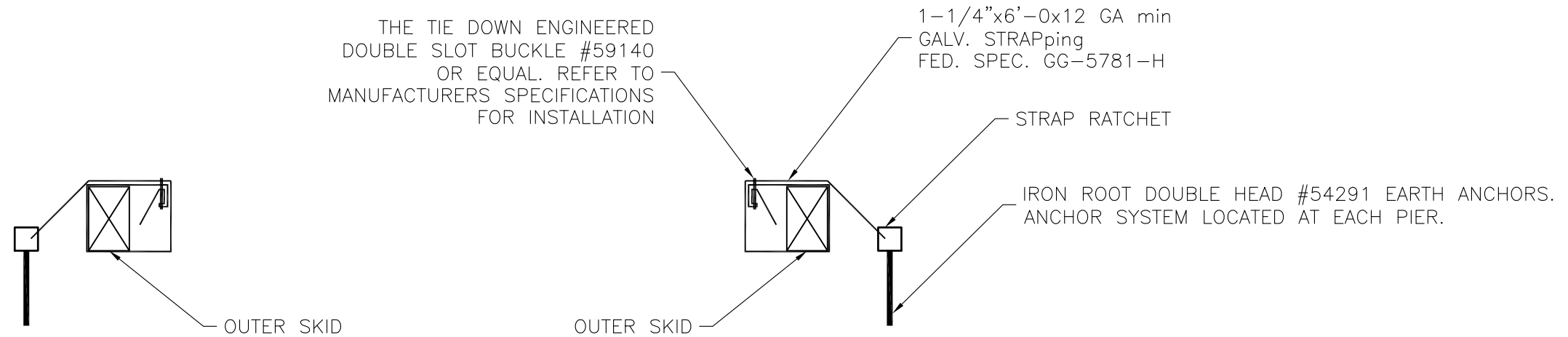
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 SCALE: 1/4"=1'-0"



ANCHOR TIE DOWN DETAIL

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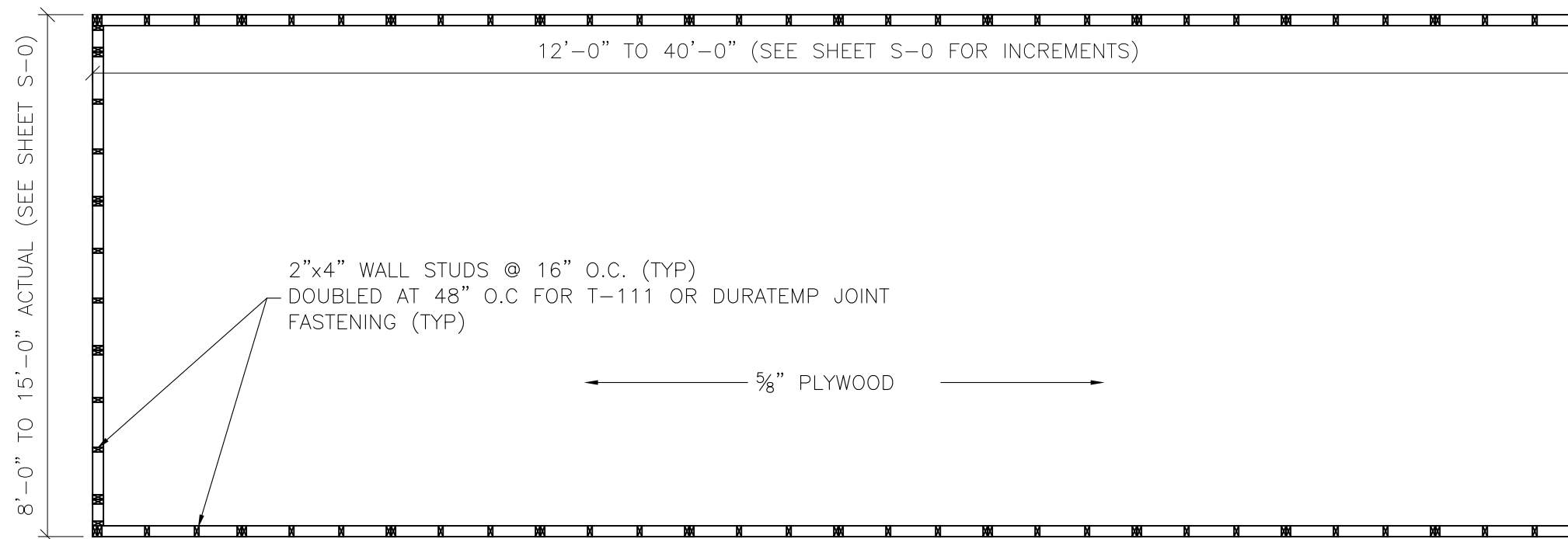
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SHEET NUMBER

**S-2-UT**

SCALE: 1/4"=1'-0





**FLOOR PLAN NOTES:**

- 1) INSTALL 5/8" FLOOR SHEATHING WITH LONG DIMENSION SPANNING JOISTS, STAGGER JOINTS.
- 2) FASTEN 5/8" FLOOR SHEATHING WITH 2" RING-SHANK NAILS @ 6" O.C.

**OTHER FRAMING NOTES:**

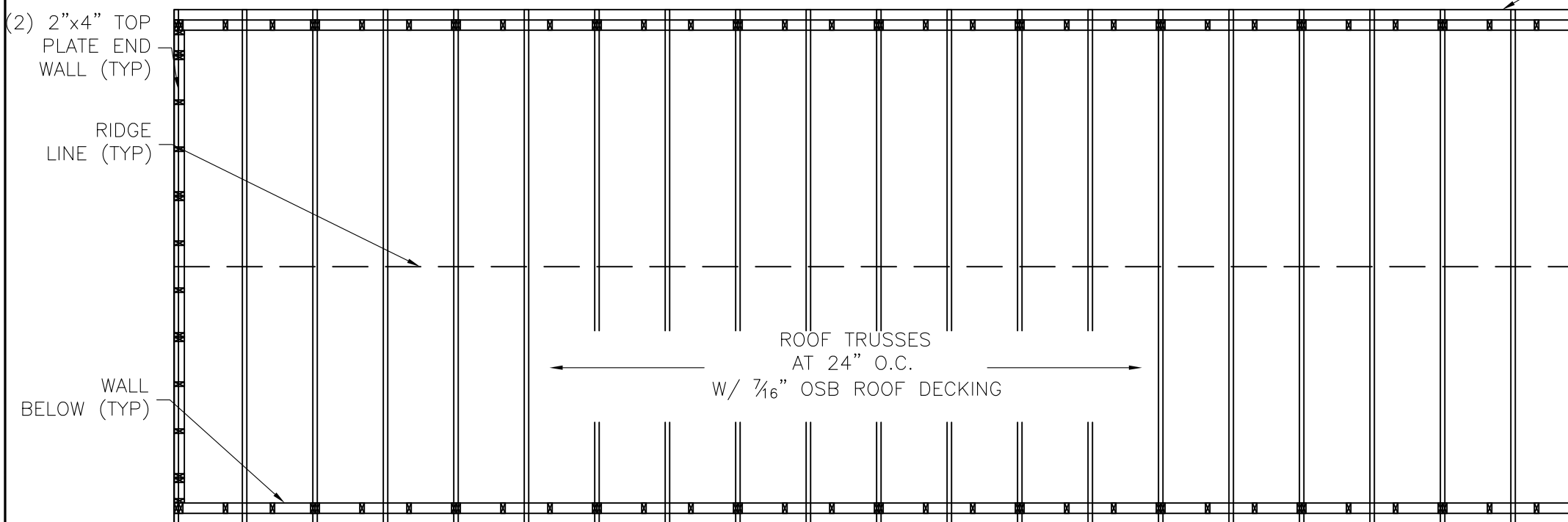
- 1) 2x4 UPPER TOP PLATE W/ (2) 3"x0.120Ø NAILS AT 16" O.C. TO 2x4 LOWER TOP PLATE.

**FLOOR PLAN**

(2) 2x4 TOP PLATE SIDE WALLS

**ROOF FRAMING NOTES:**

- 1) INSTALL 7/16" ROOF SHEATHING WITH LONG DIMENSION SPANNING TRUSSES.
- 2) FASTEN 7/16" ROOF SHEATHING WITH 2" RING-SHANK NAILS @ 6" O.C.



**ROOF FRAMING**

(2) 3'-0 x 6'-0 CUSTOM BUILT DOORS

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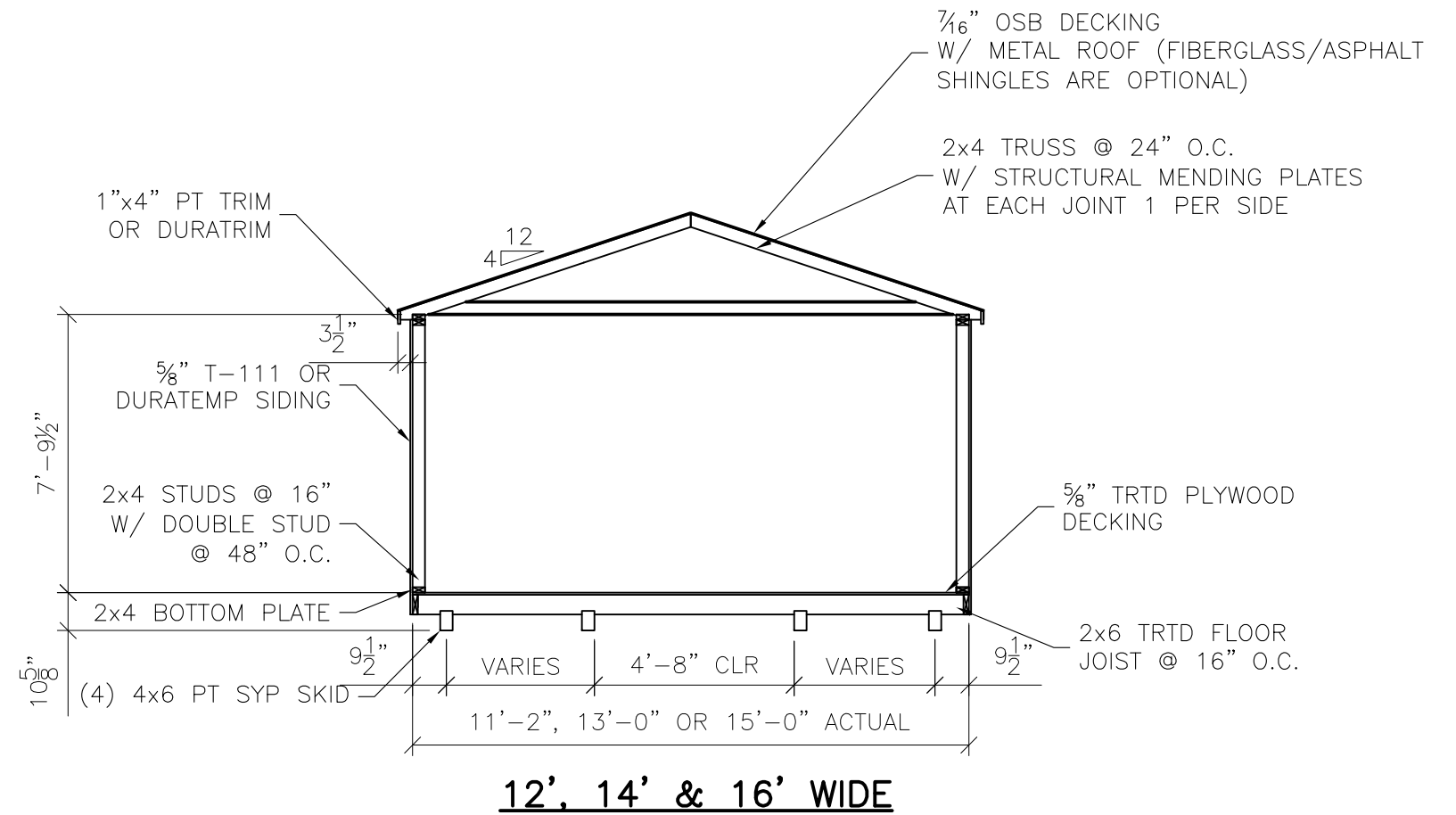
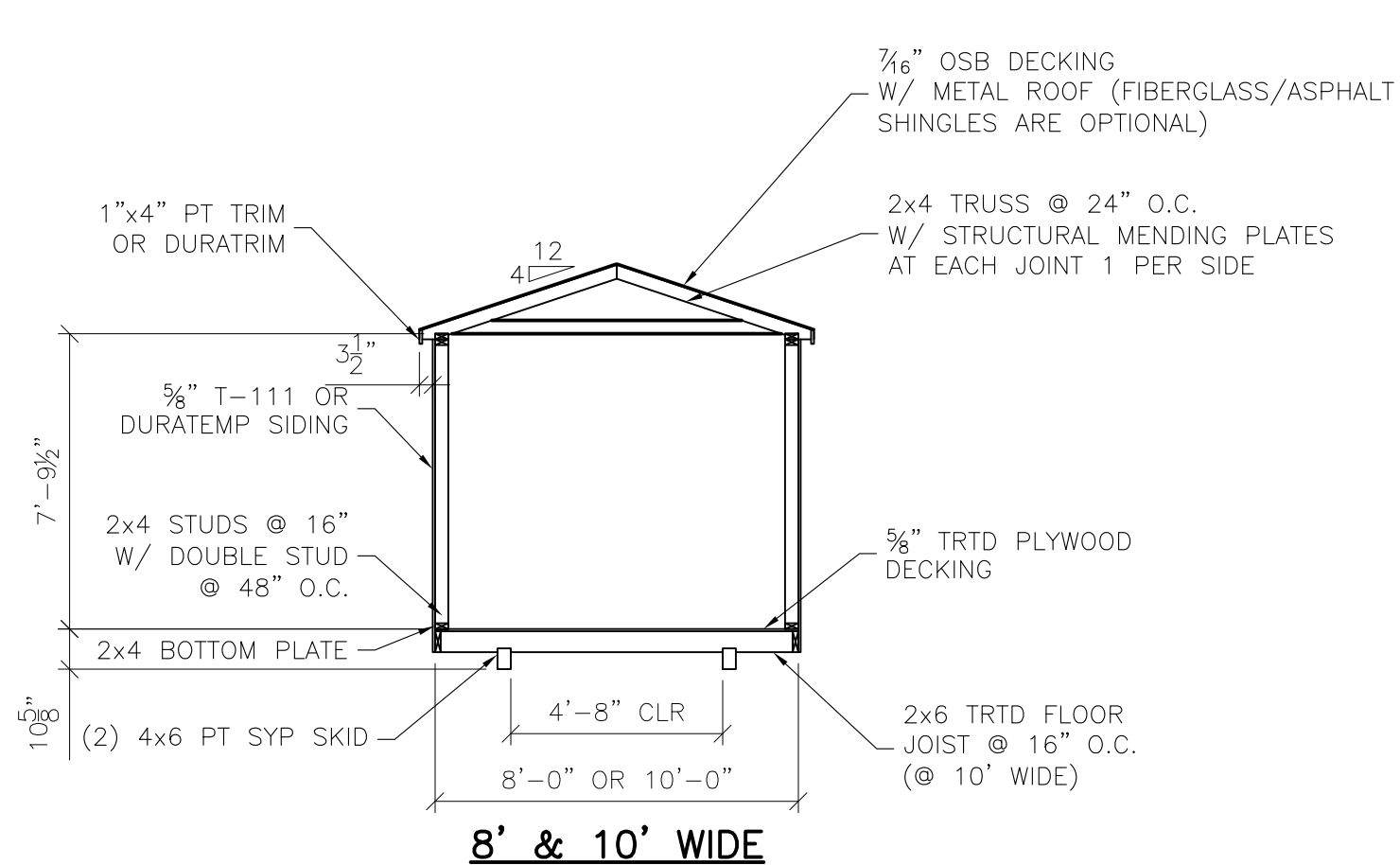
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**S-3-UT**  
SCALE: 1/4"=1'-0"



**BUILDING SECTIONS**

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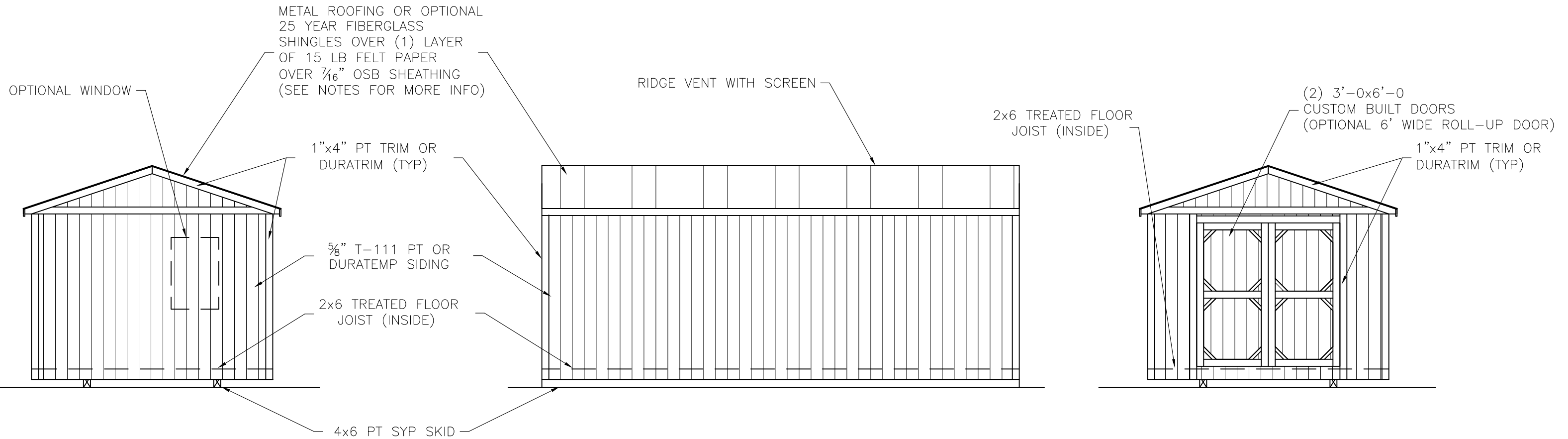
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**S-4-UT**  
SCALE: 1/4"=1'-0"



**END WALL ELEVATION**

**SIDE WALL ELEVATION**

**END WALL ELEVATION 2**

ROOFING AND UNDERLAYMENT NOTES:

- 1) PROVIDE A RIDGE VENT TYPICAL WITH INSECT SCREEN.
- 2) METAL ROOFING SHALL BE 29 GAUGE METAL IN ACCORDANCE WITH ASTM A 924 OR ASTM A 924M OVER OSB SHEATHING.
- 3) PROVIDE 29 GAUGE RIDGE CAP, EAVE TRIM AND RAKE TRIM.
- 4) INSTALL AND FASTEN METAL ROOFING PER MANUFACTURER'S INSTRUCTIONS FOR WIND LOADING.
- 5) OPTIONAL SHINGLES SHALL BE IN ACCORDANCE WITH ASTM D 7158 TYPE H OR ASTM D 3161F TYPICAL.
- 6) INSTALL 1 LAYER OF 15 LB ROOFING FELT, START WITH A 19" WIDE STRIP PARALLEL WITH AND STARTING AT EAVES FASTENED SECURELY TO HOLD IN PLACE. START AT EAVE WITH A 38" WIDE SHEET WITH OVERLAPPING SUCCESSIVE SHEETS BY 19". FASTEN UNDERLAYMENT WITH CORROSION-RESISTANT FASTENERS PER MAUFACTURER'S INSTRUCTIONS AND SPACED A MAXIMUM OF 36" APART.

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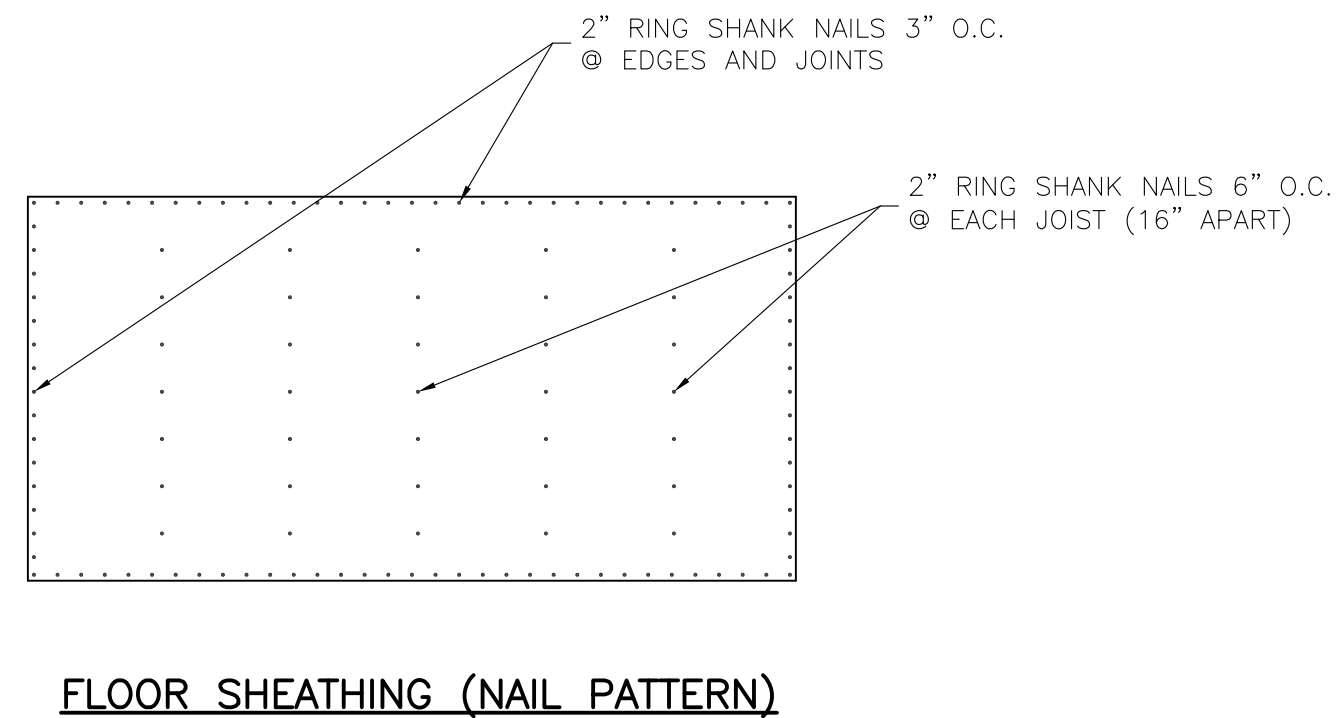
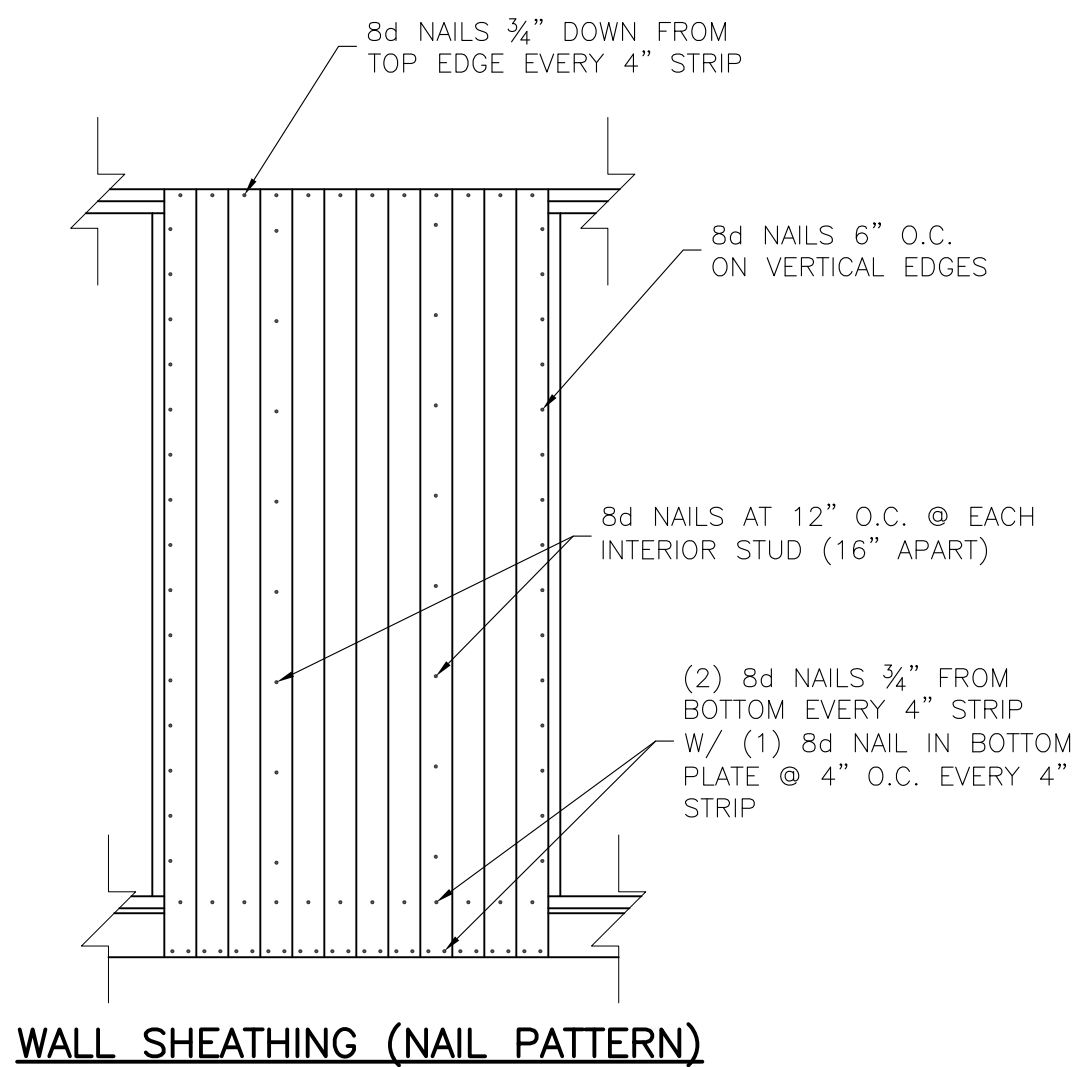
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SHEET NUMBER  
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 SCALE: 1/4"=1'-0"



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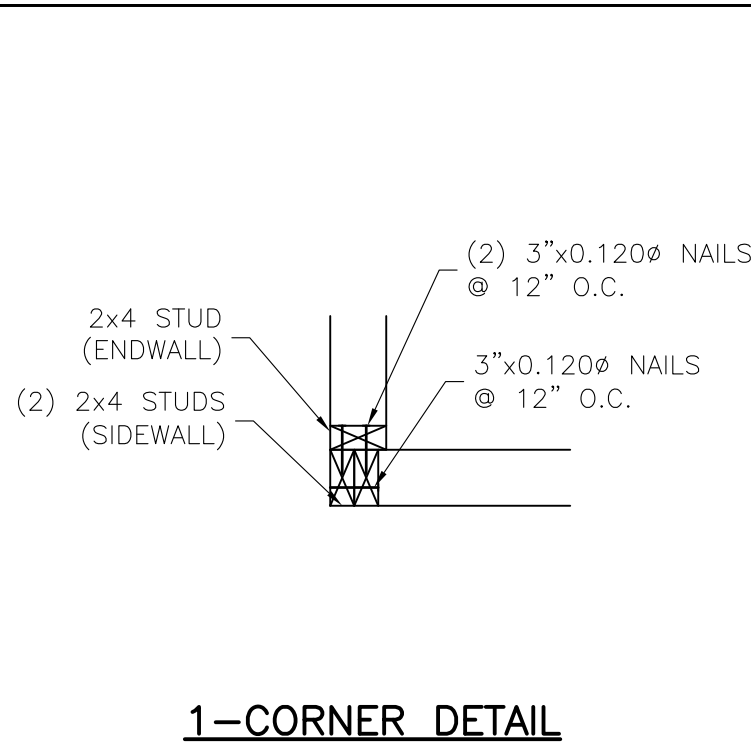


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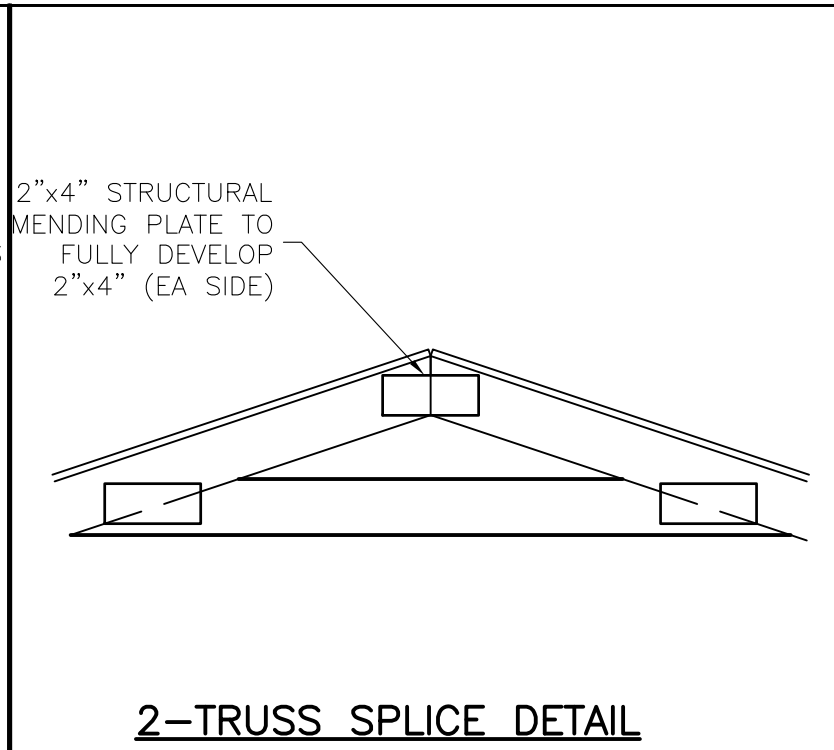
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SHEET NUMBER  
**S-6-UT**  
SCALE: 1/2"=1'

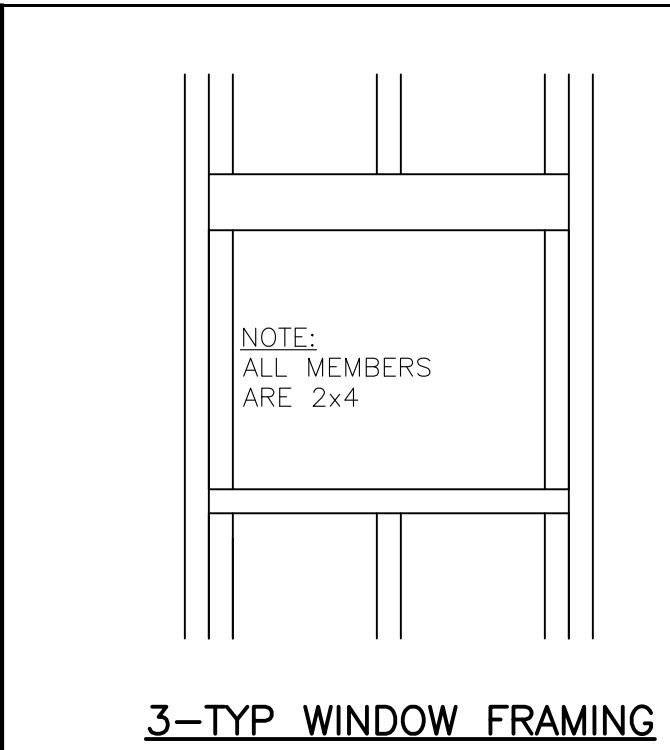




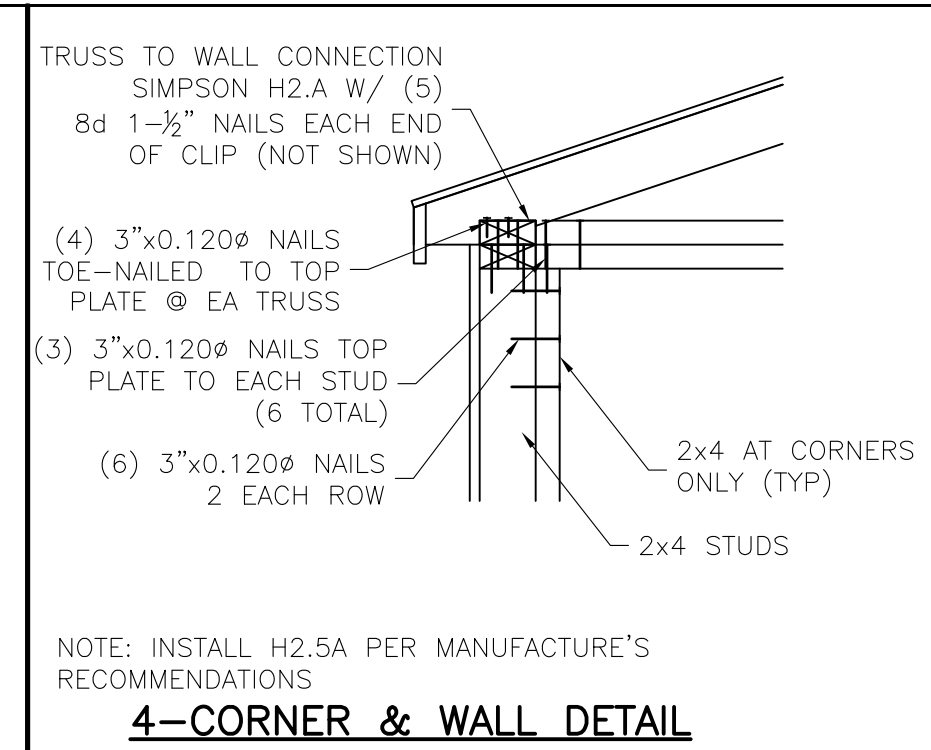
**1-CORNER DETAIL**



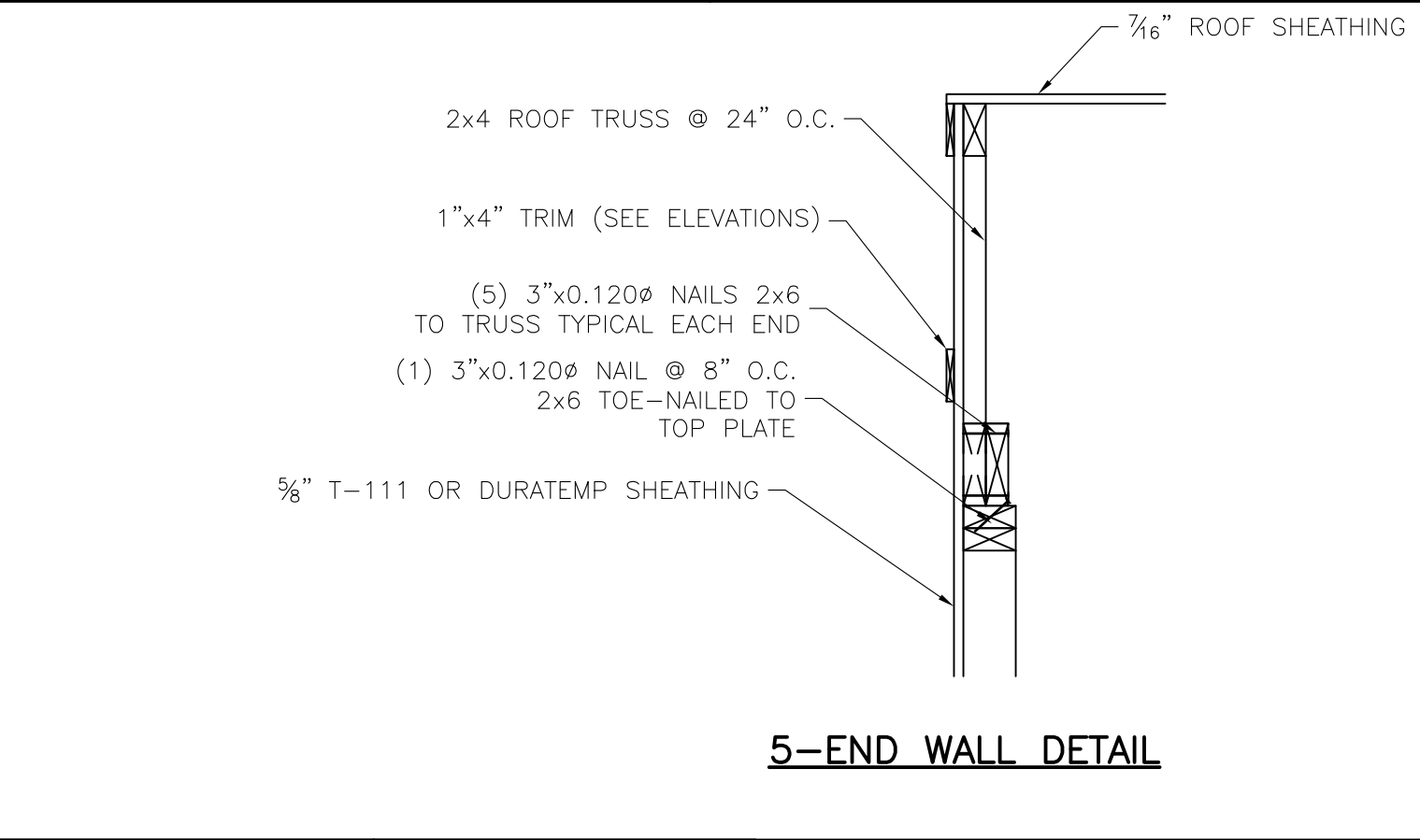
**2-TRUSS SPLICE DETAIL**



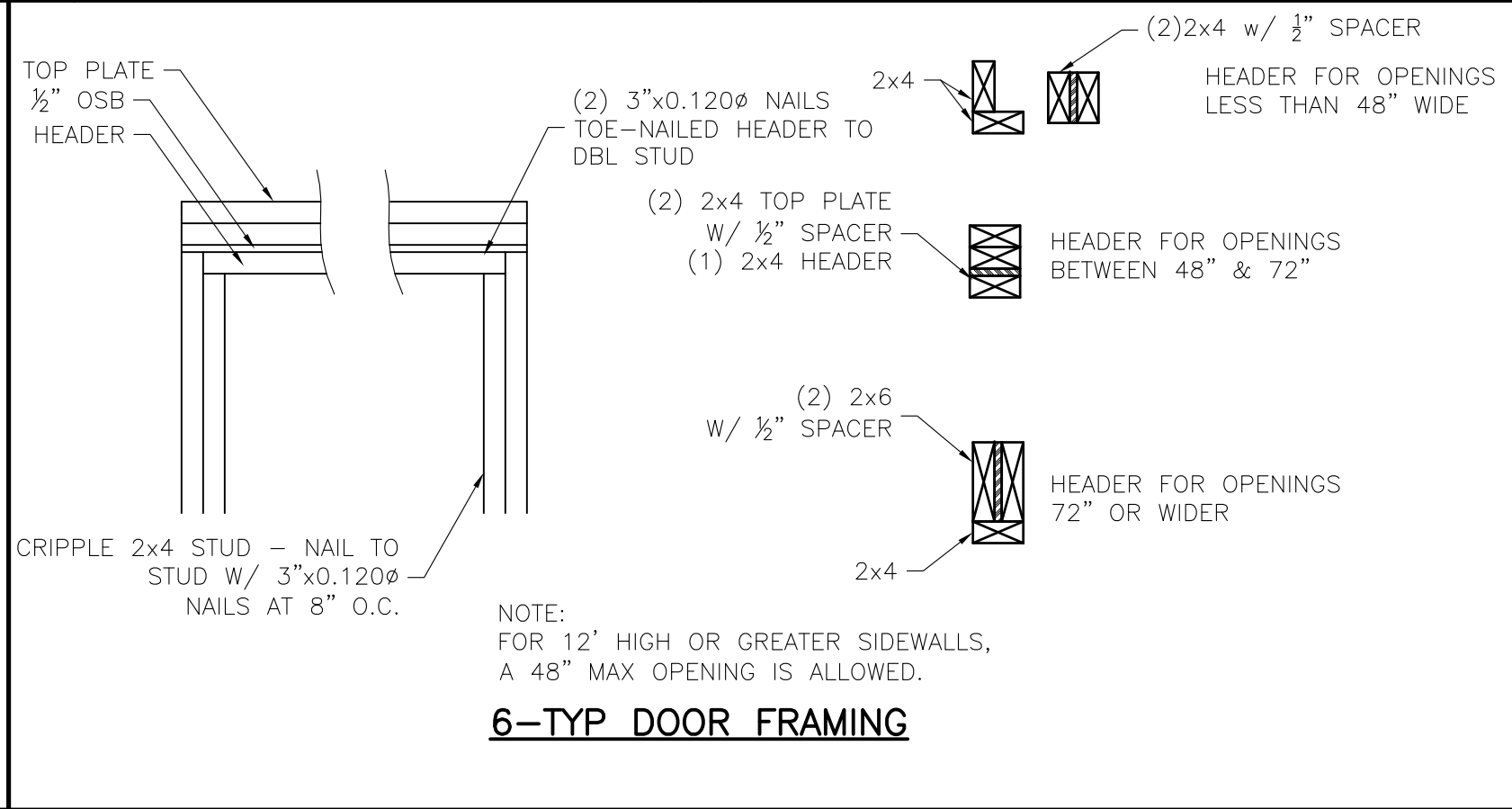
**3-TYP WINDOW FRAMING**



**4-CORNER & WALL DETAIL**



**5-END WALL DETAIL**



**6-TYP DOOR FRAMING**



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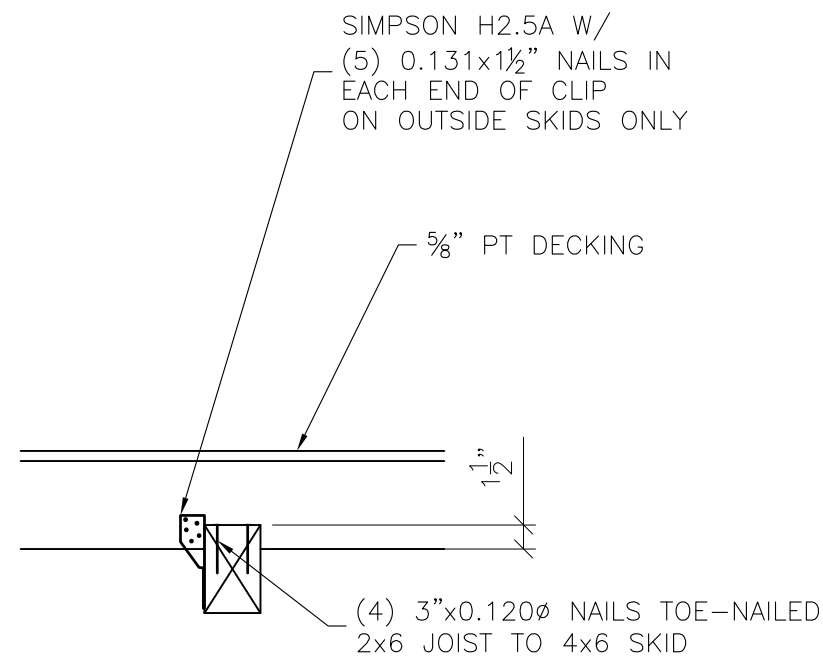


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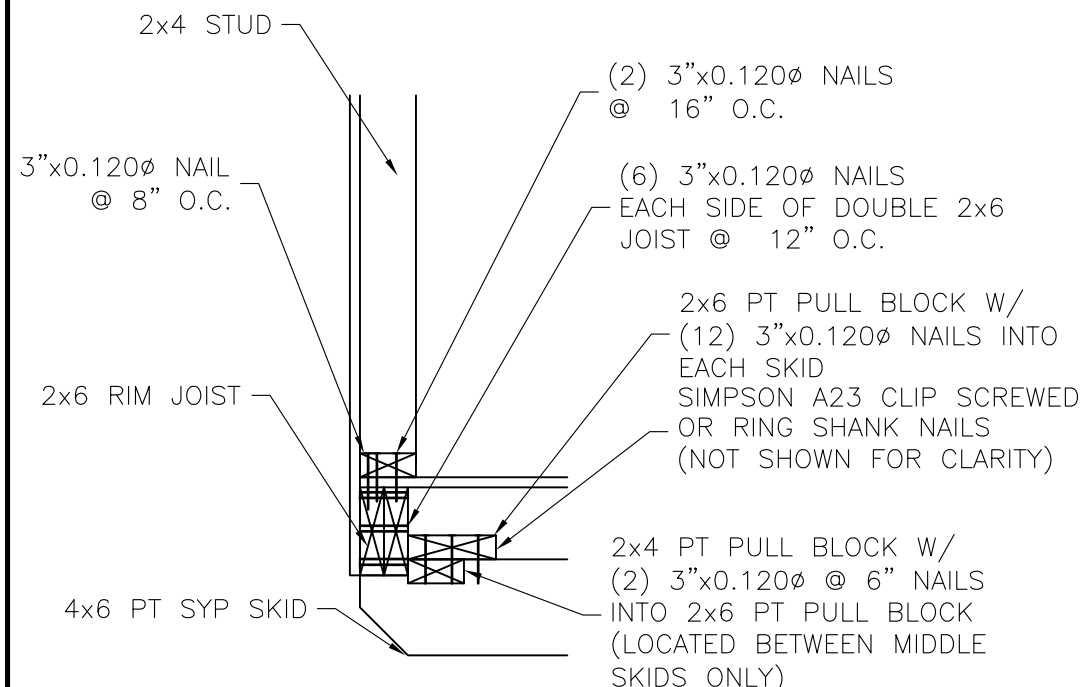
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SCALE: 1"=1'

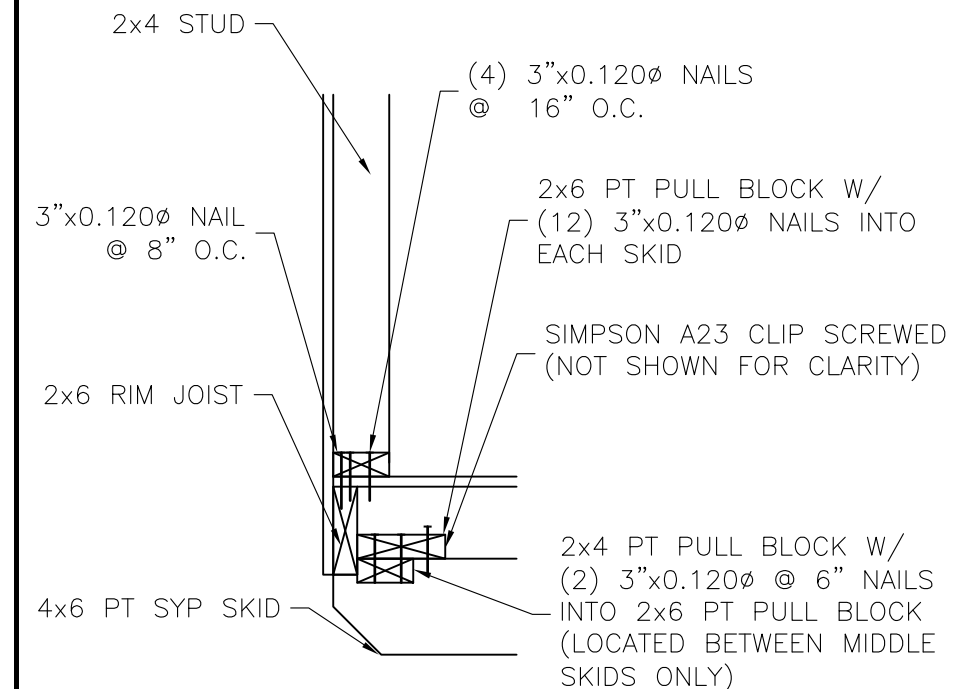




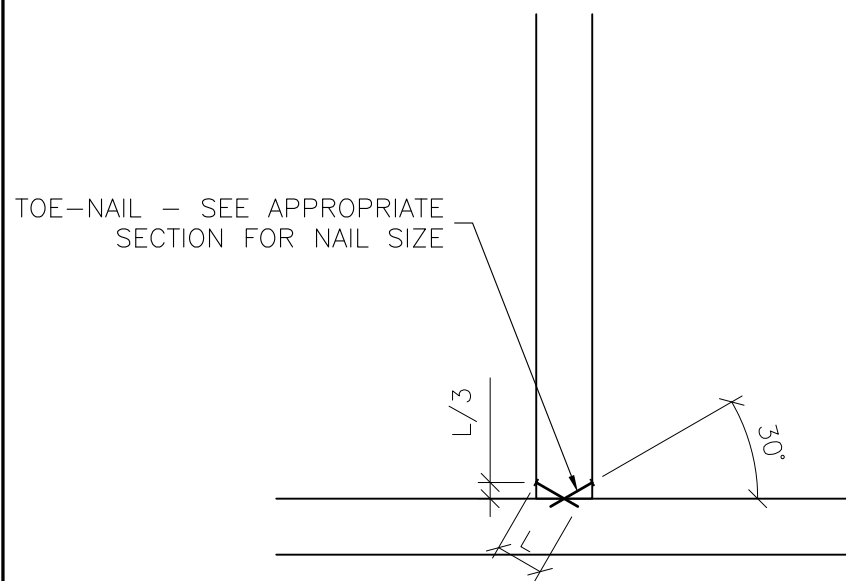
**1-INNER & OUTER SKID DETAIL @ EVERY JOIST**



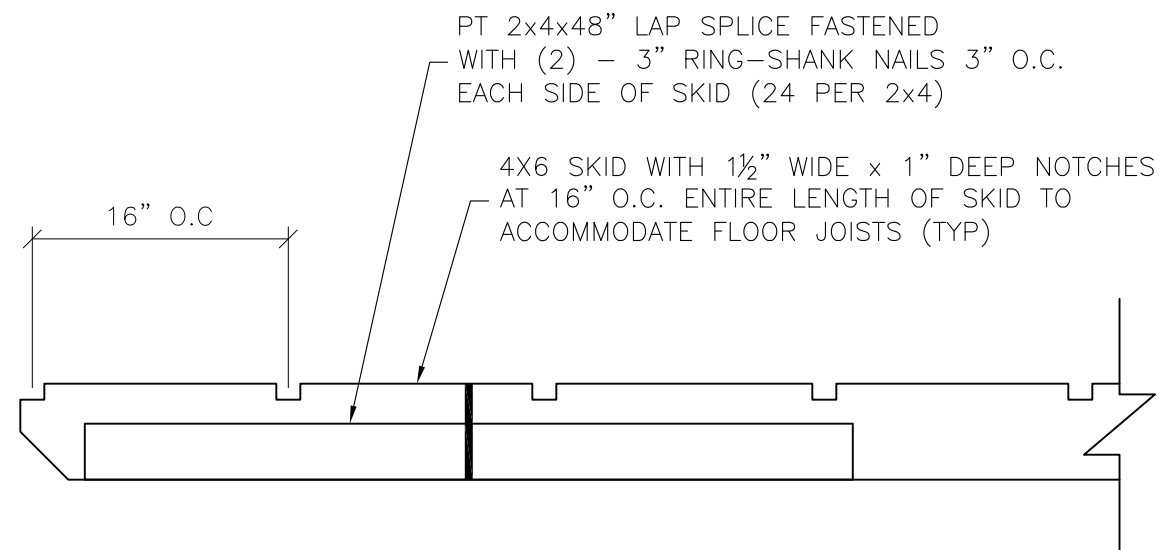
**2-ENTRY DOOR ENDWALL JOIST DETAIL**



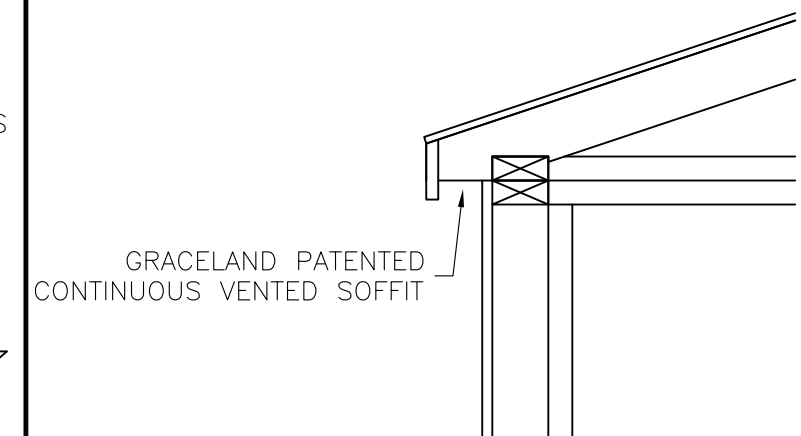
**3-REAR ENDWALL JOIST DETAIL**



**4-TOE-NAIL DETAIL**



**5-SKID DETAIL**



**6-SOFFIT VENTS**

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