

To: Caroline O'Connor, Planning & Zoning Willistown Township
CC: Office @ [REDACTED]
Subject: 13 Fox Chase Rd: Building Permit Application Variance Request

We are seeking variance relief to permit the construction of a pool pavilion at 13 Fox Chase Rd.

The plan is to construct the pavilion adjacent to the pool and next to a heavily wooded area that runs along the property line. This plan is part of a larger project that includes pool repair and renovation to replace tile, coping and the existing pool deck which sustained damage from a downed tree. Three previously existing 10' x 12' sheds in the proposed location have been removed. The plan will not impact the allowable impervious surface area.

The property at 15 Fox Chase Rd, immediately adjacent to our lot is the only neighboring property which would be impacted by the proposed construction. We have shared the plan with our neighbors and they support the plan. The rear of the property is adjacent to a horse pasture and the proposed structure is approximately 240 feet from the rear property line.

The layout is such that the Northeast corner of the structure will encroach approximately 18 feet into the side yard setback, where a minimum side yard setback of 40 feet is otherwise required. This request will result in adjusting the aggregate side yard setback from 40 feet to approximately 20 feet.

Due to the unique shape of the property, the East side property line tapers in towards the rear of the property and the back yard slopes down towards the rear property line. Considering that, and the location of the pool, there is no other reasonable way to position the structure.

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To: Caroline O'Connor, Planning & Zoning Willistown Township
CC: Office @ [REDACTED]
Subject: 13 Fox Chase Rd: Building Permit Application

We have spoken to our neighbors, the Friedmans, and understand their plan to build a Pool Pavilion on their property at 13 Fox Chase Road as part of a project to repair and renovate their existing pool.

We are their direct neighbors at 15 Fox Chase Road, Willistown Township. Currently there is a 40' setback. The Friedman's pavilion requires a 20' setback at the Northern rear corner of the structure. They have our permission to utilize a 20' variance to accommodate the pavilion.

Thank you for your consideration in this matter.
If we can provide additional information, please let us know.

Thank You,
Bill and Kara McCrossan
[REDACTED]



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717-702-6498

Project Info

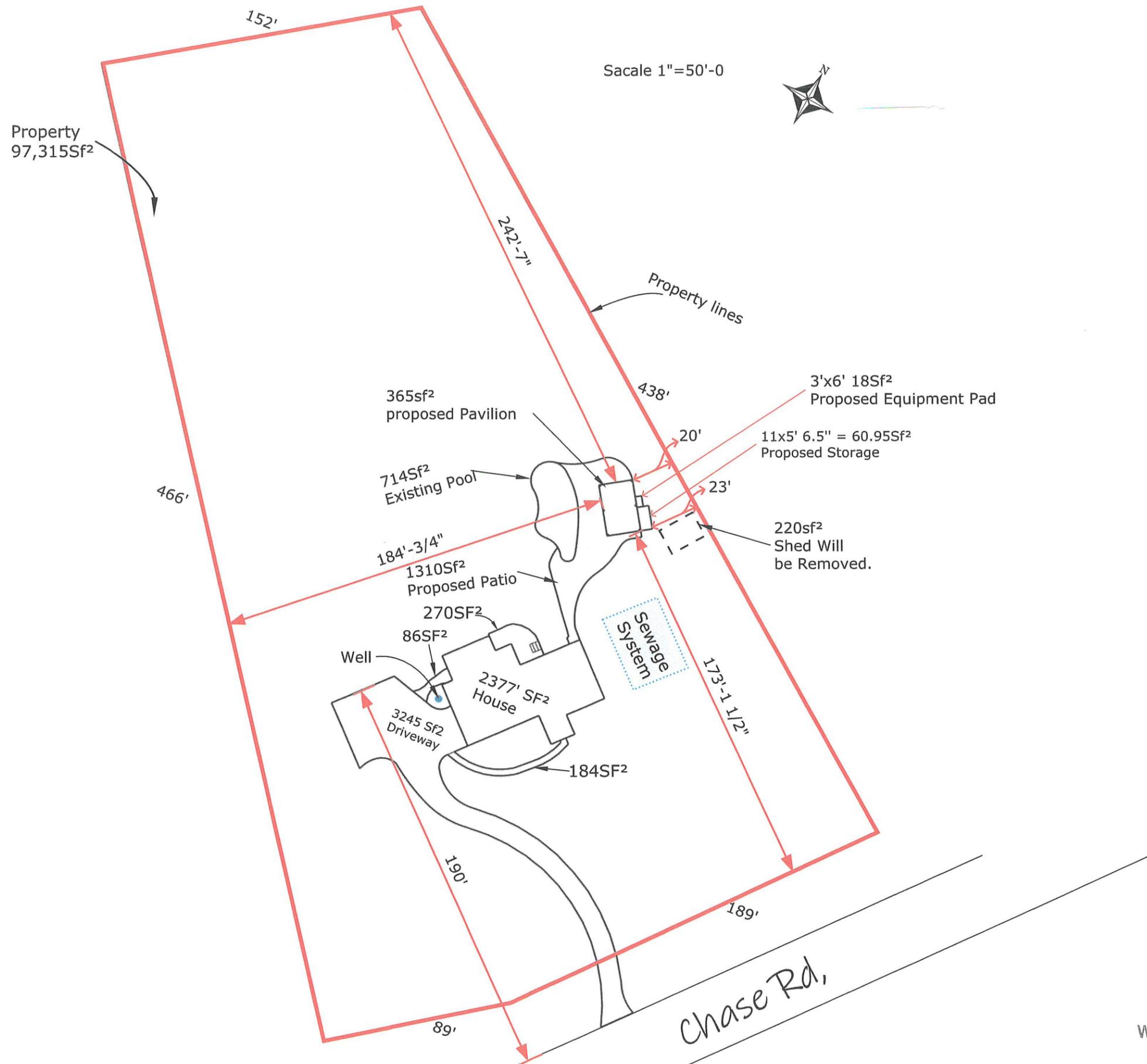
Friedman
Teddy & Barb

13 Fox Chase Rd,
Malvern, PA 19355

Date:
12/22/2025

Scale:
1" = 50'-0"

Notes



Scale 1"=50'-0



Property
97,315Sf²

Property lines

365sf²
proposed Pavilion

3'x6' 18Sf²
Proposed Equipment Pad

714Sf²
Existing Pool

11x5' 6.5" = 60.95Sf²
Proposed Storage

466'

1310Sf²
Proposed Patio

220sf²
Shed Will
be Removed.

270SF²
Well

Sewage
System

2377' SF²
House

3245 SF²
Driveway

184SF²

190'

173'-1 1/2"

89'

189'

Chase Rd,

A1

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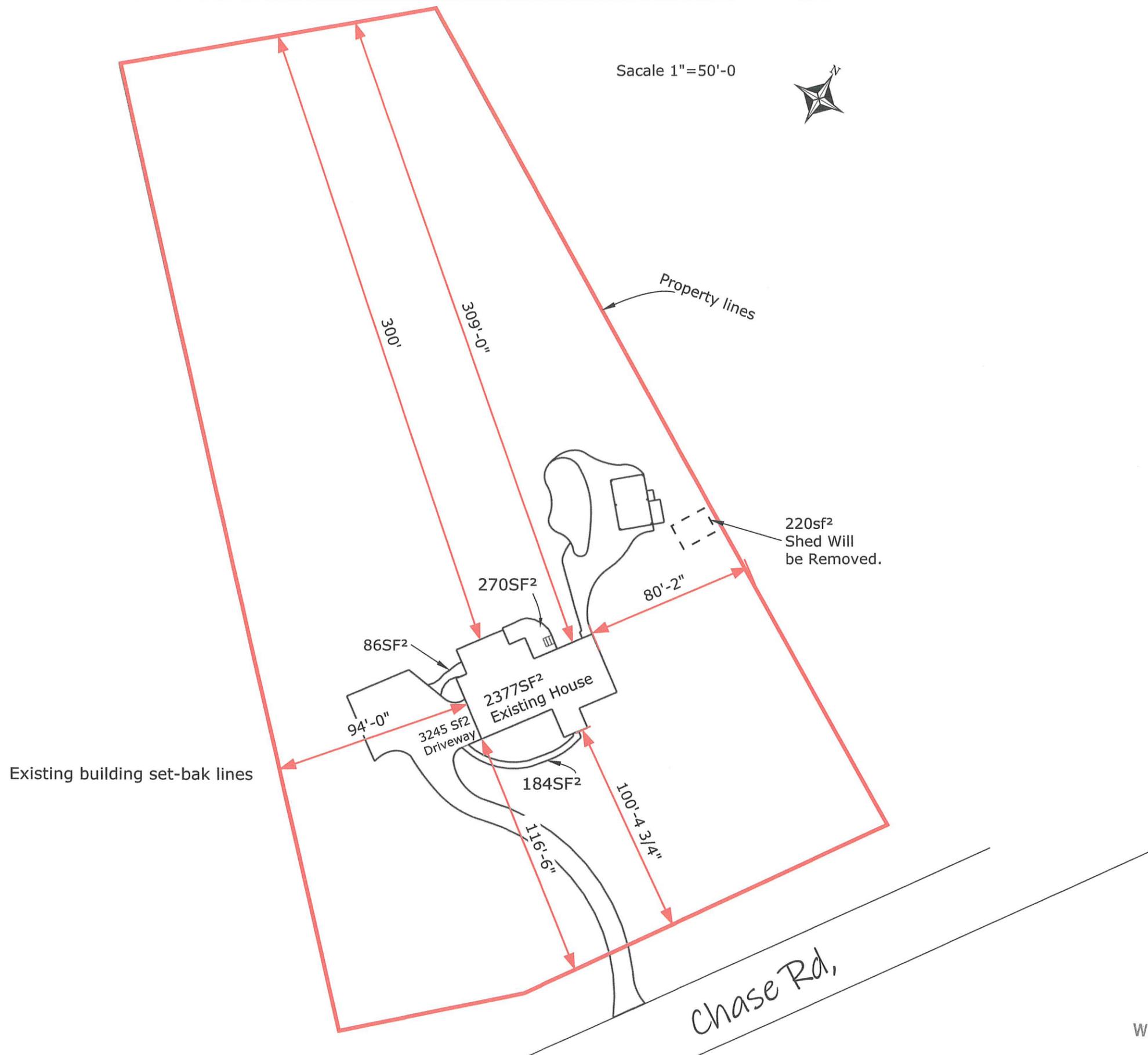
Friedman
Teddy & Barb

13 Fox Chase Rd,
Malvern, PA 19355

Date:
12/22/2025

Scale:
1" = 10'-0"

Notes



A2

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Project Info

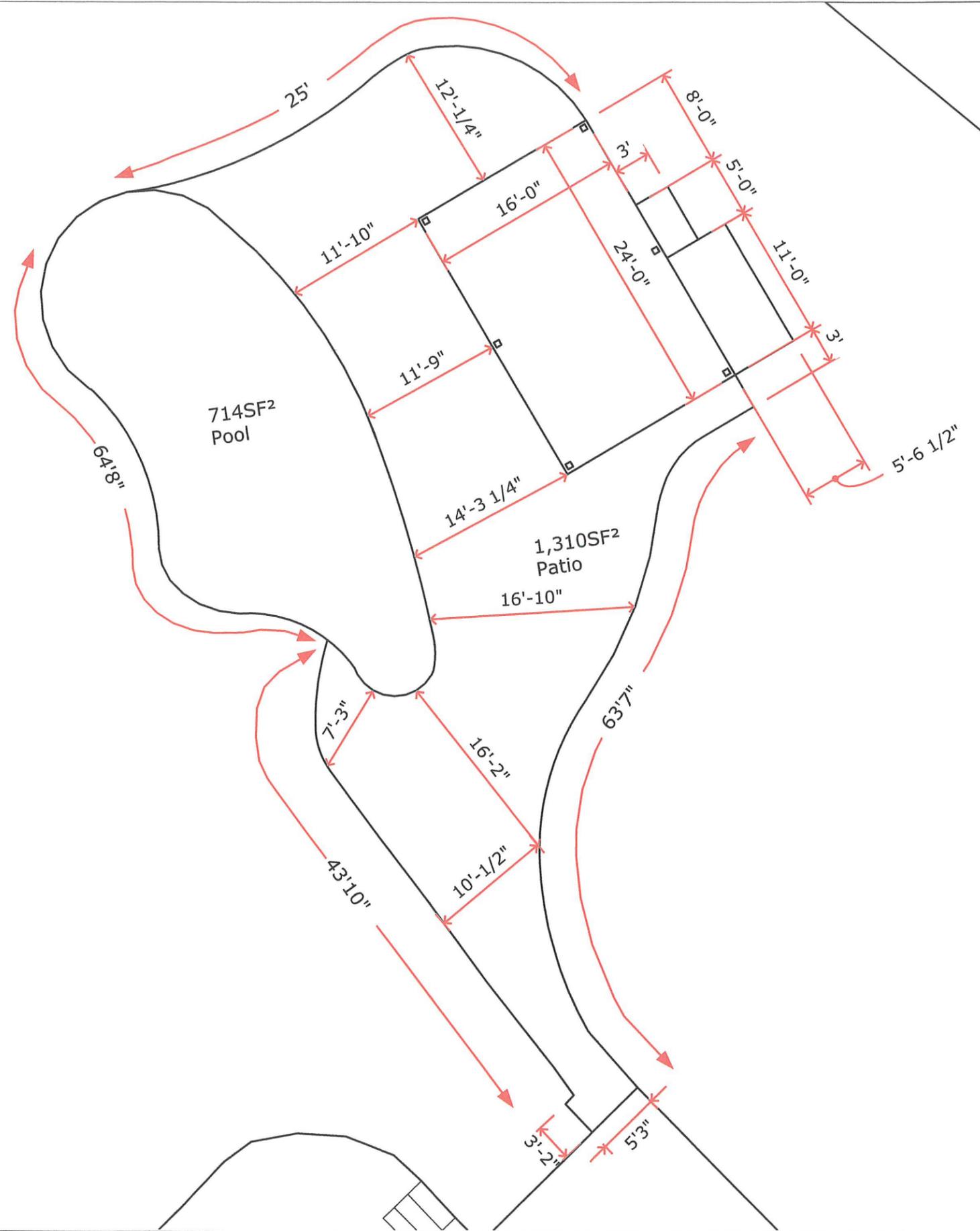
Friedman
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Date:
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Scale:
1" = 10'-0"

Notes



A3

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Friedman
Teddy & Barb

13 Fox Chase Rd,
Malvern, PA 19355

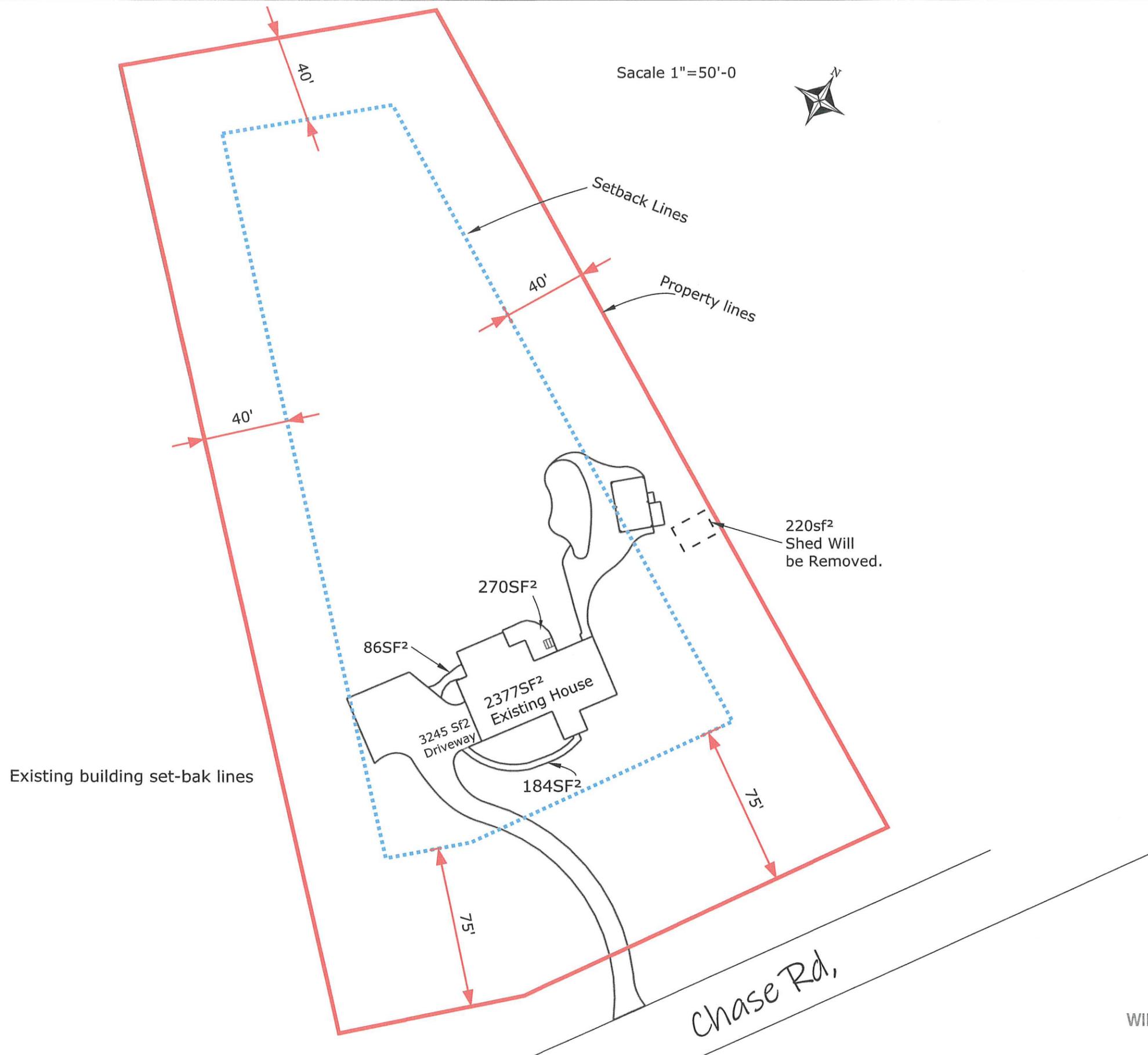
Date:
01/28/2026

Scale:
1" = 10'-0"

Notes

Setback area

A4

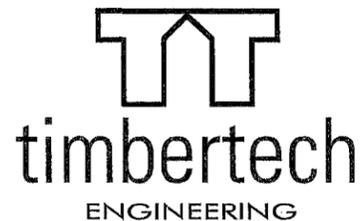


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16'x24' Vinyl A-Frame Pavilion

Teddy and Barb Friedman
13 Fox Chase Road
Malvern, PA 19355

DESIGN ENGINEER:



East: 22 Denver Road, Suite B Denver, PA 17517
717.335.2750 Fax: 717.335.2753

West: 406 S Main Street, PO Box 509 Kouts, IN 46347
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Drawing Index

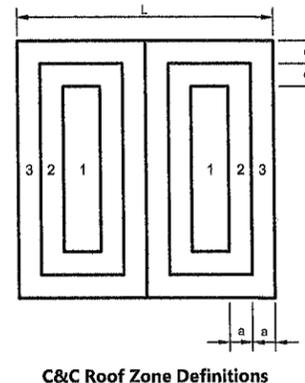
Cover Page	Notes
1	Elevations
2	Post Layout Plan
3	Roof Framing Plan
4	Cross Section A/A, Cross Section B/B, Detail A-A/A
5	Detail B-B/B
6	Detail C-C/C, Detail D-D/D, Detail E-E/E, Detail F-F/F, Base Angle Detail
7	Detail G-G/G, Angle "A2"
8	View 1 Detail G-G/G, View 2 Detail G-G/G, Plate "P2"
9	Detail H-H/H, Detail J-J/J, Detail K-K/K
10	Notes
F1	Foundation Plan
F2	Foundation Details
F3	Foundation Details
F4	Foundation Notes

GENERAL NOTES

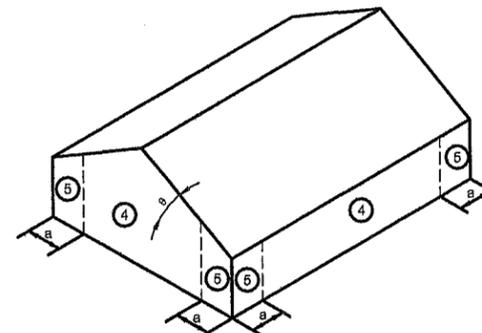
All notes do not necessarily apply due to different requirements on each project. This plan is intended to reflect only the structural design of this building. The contractor shall review all applicable local, state, and federal building codes prior to the start of construction to ensure building conformance. Timber Tech Engineering, LLC is not responsible for information pertaining to this project if not shown on drawings or listed below. Revisions to the plans shall be approved by engineer of record.

DESIGN REQUIREMENTS

- Governing Code:
Including, not limited to: IBC 2018 with state amendments
- Risk Category II
- Dead Loads:
 - A. Roof 10 psf
 - B. Floor n/a psf
- Live Loads:
 - A. Roof (See also note #5) 25 psf
 - B. Floor n/a psf
- Snow Loads:
 - A. Design Roof Snow Load (ASD) 25 psf
 - B. Ground Snow (P_g ASD) 30 psf
 - C. Flat Roof Snow (P_f ASD) 25 psf
 - D. Snow Exposure Factor (C_e) 1.0
 - E. Thermal Factor (C_t) 1.2
 - F. Slope Factor (C_s) 1.0
 - G. Snow Load Risk Factor (I) 1.0
 - H. Drift Surcharge Load (P_d) n/a
 - I. Drift Surcharge Width (W) n/a
 - J. Unbalanced snow loads have been considered
- Wind Loads (ASCE 7-22)
 - A. Basic Wind Speed (V) 115 mph
 - B. ASD Wind Speed ($V_{ASD} = V \cdot 0.8$) 89 mph
 - C. Wind Exposure Category C
 - D. Internal Pressure Coefficient (GC_{PI}) 0
 - E. Component & Cladding (C&C) Wind Load
 - i. Roof Zone 1, 2e +18, -41 psf
 - ii. Roof Zone 2n, 2r, 3e +18, -65 psf
 - iii. Roof Zone 3r +18, -78 psf
 - iv. Wall Zone 4 +28, -30 psf
 - v. Wall Zone 5 +28, -37 psf
 - vi. Dimension a 3'
- Earthquake Design Data:
 - A. Analysis based on equivalent lateral force procedure
 - B. Cantilevered Column: Timber Frame
 - C. Mapped and Design Spectral Response Acceleration
 - iv. S_s 0.185
 - ii. S_1 0.048
 - iii. S_{DS} 0.197
 - iv. S_{D1} 0.077
 - D. Occupancy Risk Factor, I_e 1.0
 - E. Site Class D
 - F. Seismic Design Category B
 - G. Response Modification Factor (R) 1.5
 - H. Deflection Amplification Factor (C_d) 1.5
 - I. Seismic Response Coefficient (C_s) 0.13
 - J. Design Seismic Base Shear (V) 560 lb
- Roof Rain Load
 - A. Rain Intensity (I) n/a in/hr



C&C Roof Zone Definitions



C&C Wall Zones for Enclosed, Partially Enclosed, or Fully Enclosed Buildings

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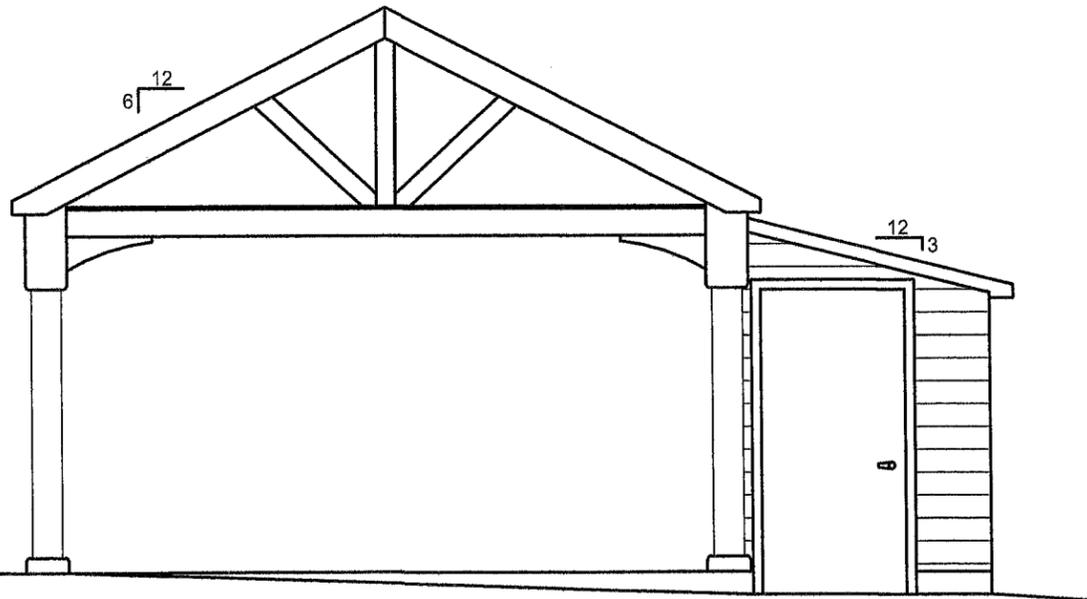
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TTE DRAWING NUMBER: E413-25

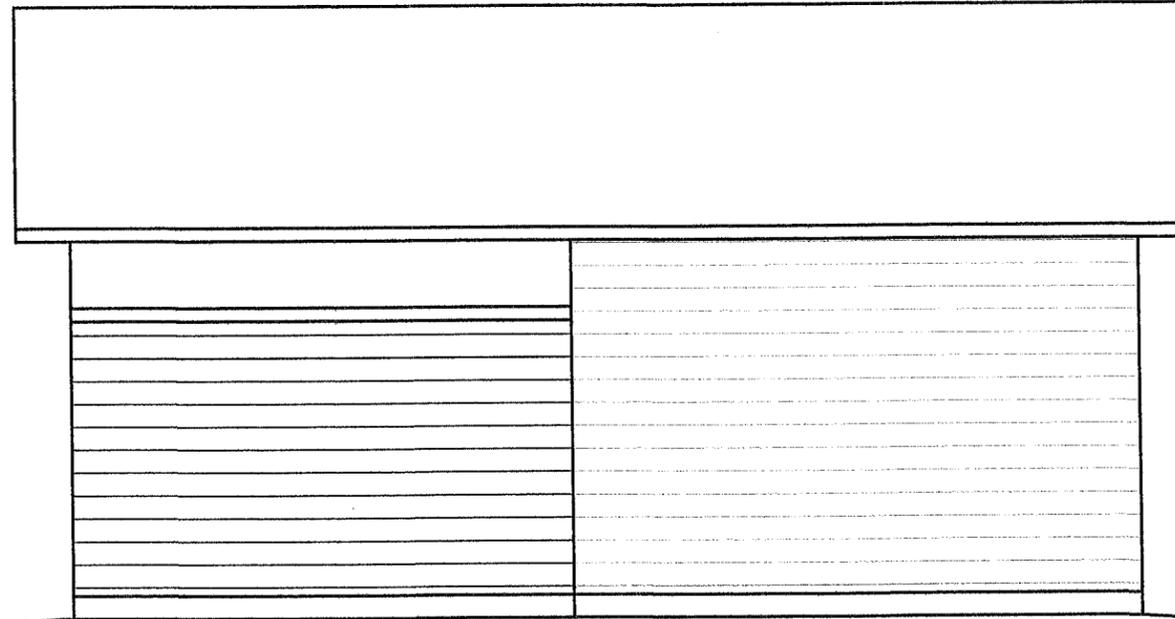


Timothy R. Royer, P.E. PA Eng. # 38662
Expiration Date: 09/30/2027



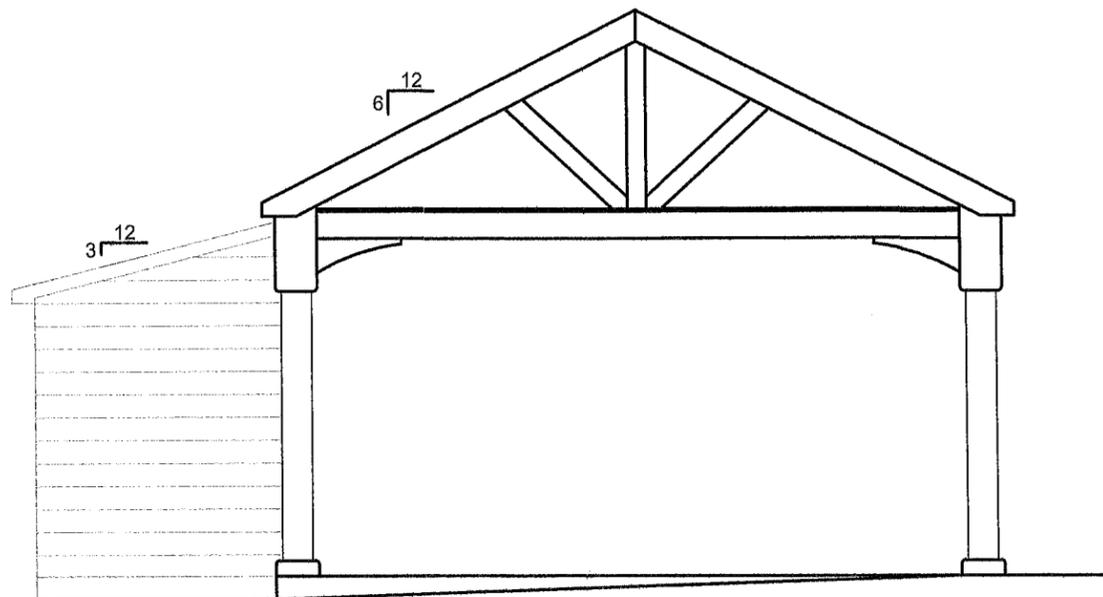
Left Elevation

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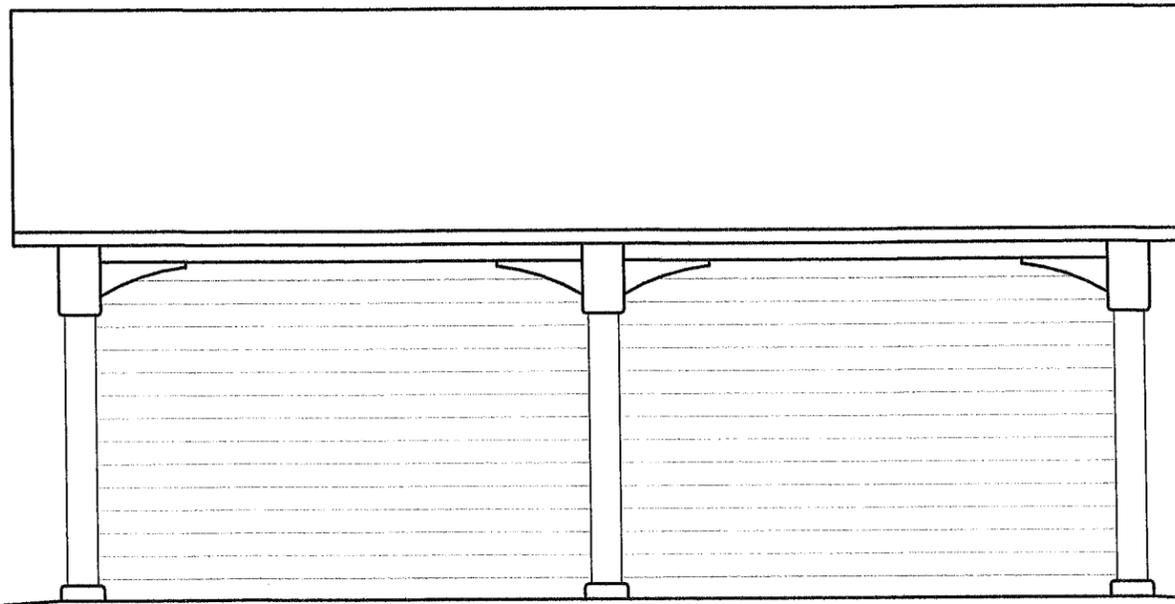
Front Elevation

Scale 1/4" = 1'-0"



Right Elevation

Scale 1/4" = 1'-0"



Back Elevation

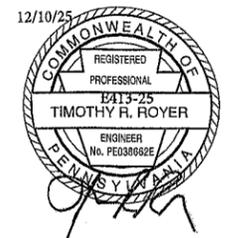
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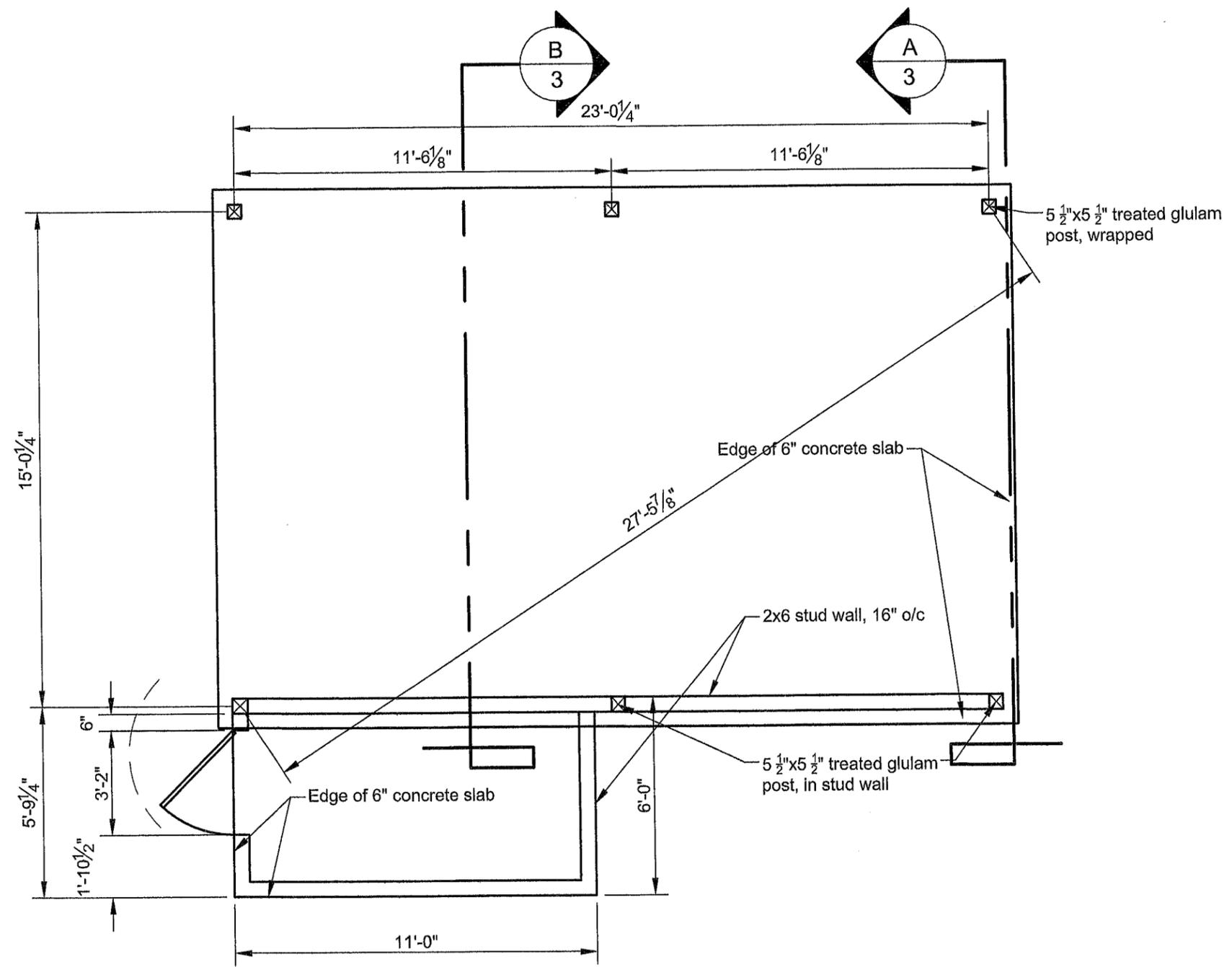
Contractor:
 Country Lane Woodworking
 540 Hollander Road
 New Holland, PA 17557
 PH: (717) 351-9250

Drawing Title:
 Elevations

Project:
 16'x24' Vinyl A-Frame Pavilion for
 Teddy and Barb Friedman
 13 Fox Chase Road
 Malvern, PA 19355

Revisions:	Date:	By:

Drawing Number: E413-25 Page: 1 of 10
 Engineered By: D. Reznik Start Date: 11/20/25
 Drafted By: K. Salver Certified Date: 12/10/25



Post Layout Plan

Scale 1/4" = 1'-0"

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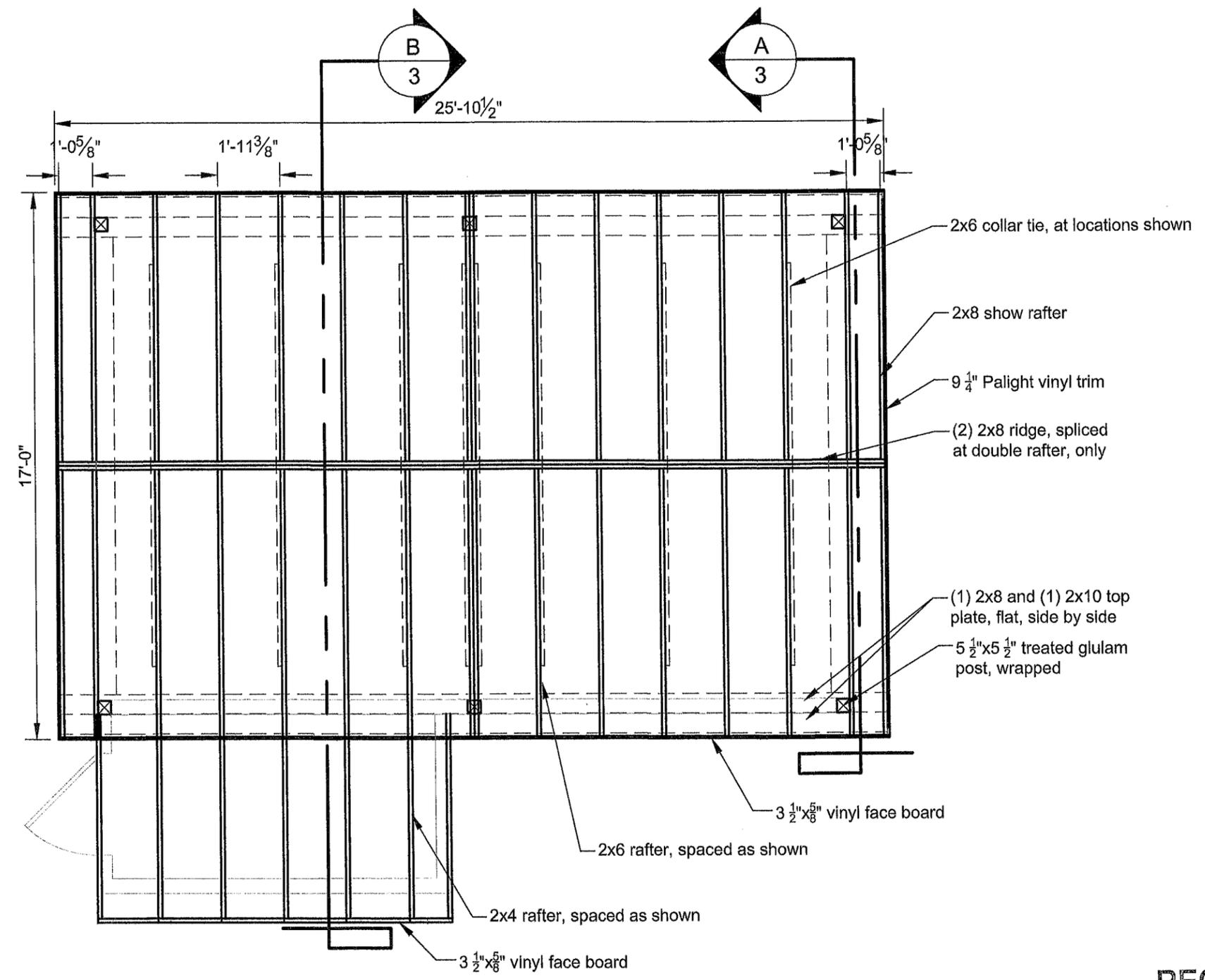
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Drawing Title:
 Roof Framing Plan

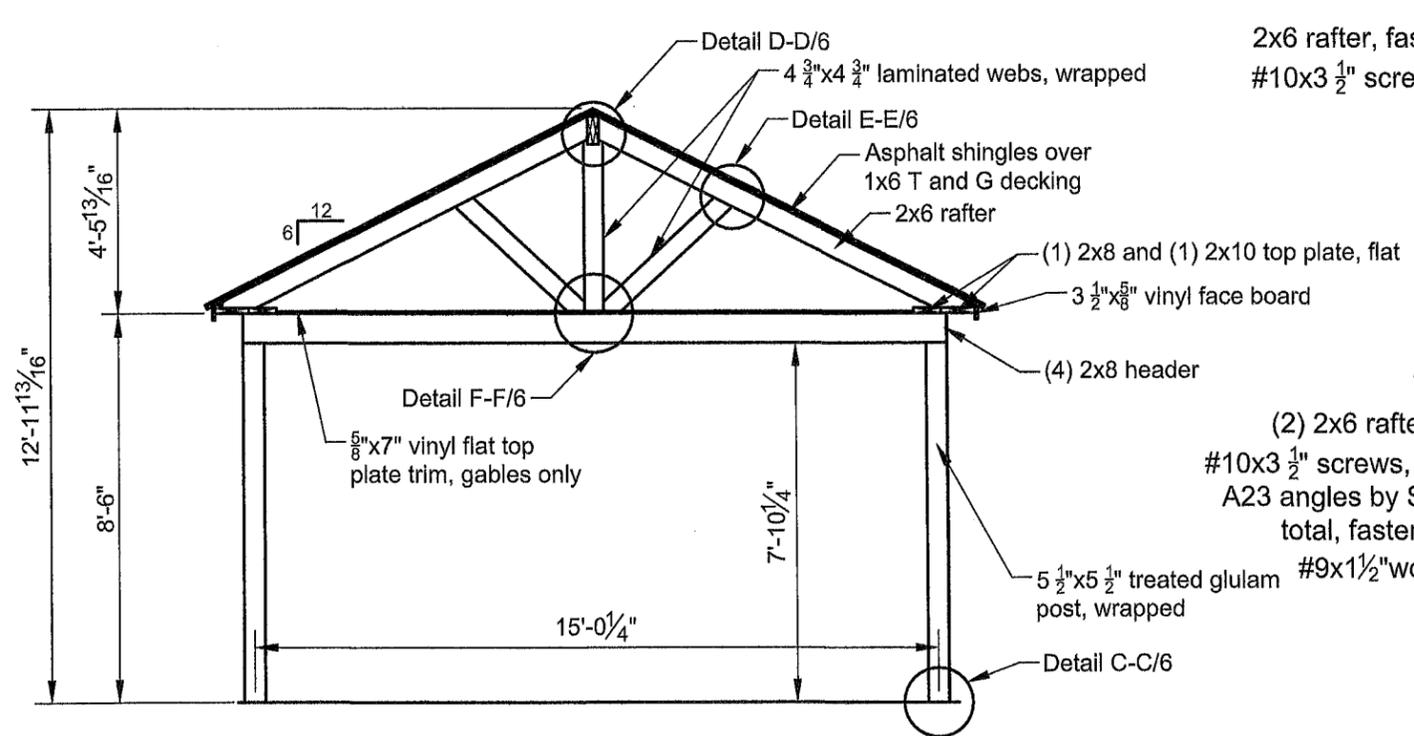
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Drawing Number: E413-25	Page: 3 of 10	
Engineered By: D. Reznik	Start Date: 11/20/25	
Drafted By: K. Salyer	Certified Date: 12/10/25	

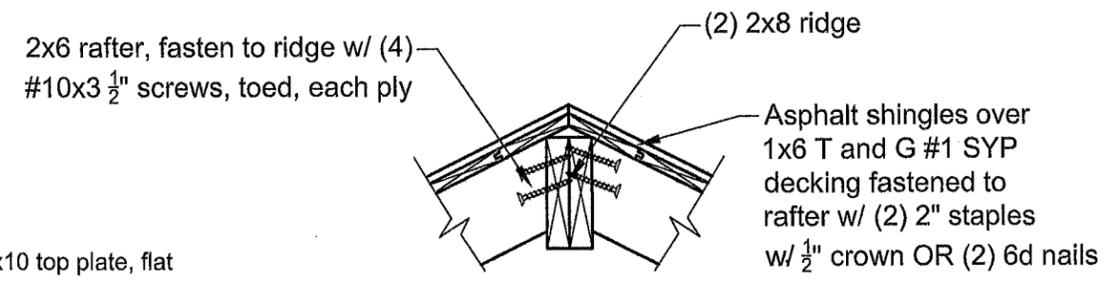


Roof Framing Plan Scale 1/4" = 1'-0"

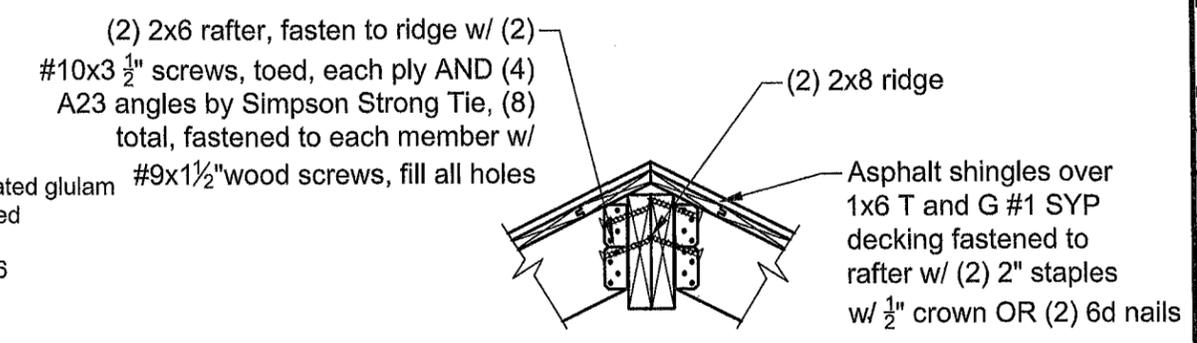
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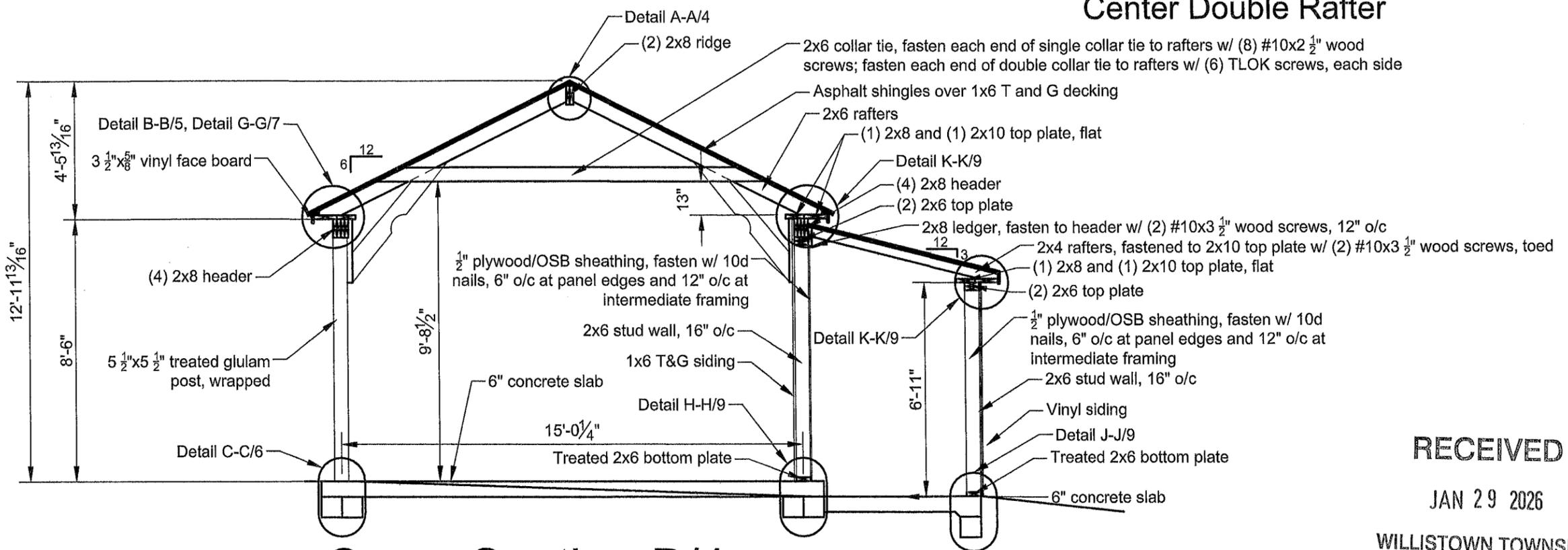
Cross Section A/4 Scale 1/4" = 1'-0"



Detail A-A/4 Scale 1" = 1'-0"



Detail A-A/4 Center Double Rafter Scale 1" = 1'-0"



Cross Section B/4 Scale 1/4" = 1'-0"

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Drawing Title:
 Cross Section A/4
 Cross Section B/4
 Detail A-A/4

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Drafted By: K. Salyer	Certified Date: 12/10/25	

Asphalt shingles over 1x6 T and G #1 SYP decking fastened to rafter w/ (2) 2" staples w/ 1/2" crown OR (2) 6d nails

(1) 2x8 and (1) 2x10 top plate, flat, fasten 2x8 to header w/ (3) 3/8"Øx4 1/2" lag screws, (2) close to rafter (1 each side of rafter), and (1) centered between rafters

3 1/2"x5/8" vinyl trim

3 1/2"x5/8" vinyl face board fasten to top plate w/ 2" wood screws

2x6 rafter, fasten to 2x8 top plate w/ (2) #10x3 1/2" screws, toed

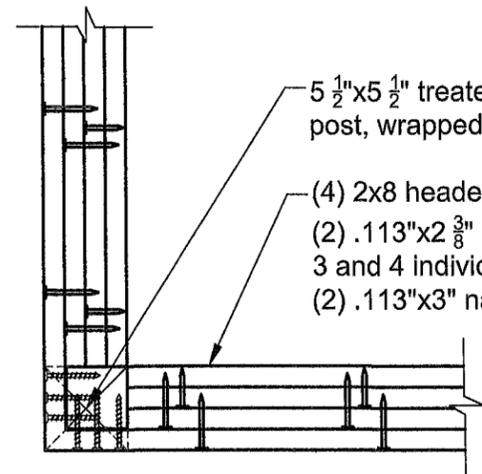
(4) 2x8 header, fasten ply 2 to ply 1 w/ (2) .113"x2 3/8" nails, 16" o/c. Fasten plies 3 and 4 individually to plies 1 and 2 w/ (2) .113"x3" nails, 16" o/c

7 1/8"x5/8" vinyl trim

5 1/2"x5 1/2" treated glulam post, wrapped

Detail B-B/5

Scale 1" = 1'-0"



5 1/2"x5 1/2" treated glulam post, wrapped

(4) 2x8 header, fasten ply 2 to ply 1 w/ (2) .113"x2 3/8" nails, 16" o/c. Fasten plies 3 and 4 individually to plies 1 and 2 w/ (2) .113"x3" nails, 16" o/c

View 2 Detail B-B/5

Scale 1" = 1'-0"

Fasten outside ply of 2x8 header to post w/ (8) TLOK04 screws

2x6 rafter

2x8 show rafter

2x6 rafter

2x6 rafter

9 1/4" Palight vinyl trim

(1) 2x8 and (1) 2x10 top plate, flat, fasten 2x8 to header w/ (3) 3/8"Øx4 1/2" lag screws, (2) close to rafter (1 each side of rafter), and (1) centered between rafters

(4) 2x8 header, fasten ply 2 to ply 1 w/ (2) .113"x2 3/8" nails, 16" o/c. Fasten plies 3 and 4 individually to plies 1 and 2 w/ (2) .113"x3" nails, 16" o/c.

2x4, flat, fasten to brace w/ (2) #10x3 1/2" wood screws and fasten to bottom of header w/ (6) TLOK04 screws

Post notched at top to accept outside ply of header from each direction

4x6, fasten to post w/ (2) TLOK010 screws, (2) TLOK08 screws and (2) TLOK06 screws, ensure 3" min. penetration into column; fasten to header w/ (4) TLOK06 screws and (2) TLOK08 screws, ensure 3" min. penetration into header

5/8" APA rated plywood sheathing on outside and inside face, fasten each around perimeter w/ #10x2 1/2" wood screws OR 10d nails, 3" o/c

5 1/2"x5 1/2" treated glulam post, wrapped

2x4 stud, fasten to brace w/ (2) #10x3 1/2" wood screws and fasten to column w/ (2) TLOK04 screws

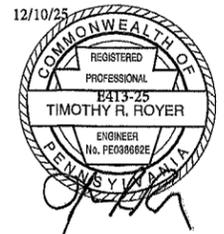
View 1 Detail B-B/5

Scale 1" = 1'-0"



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Drawing Title:
 Detail B-B/5

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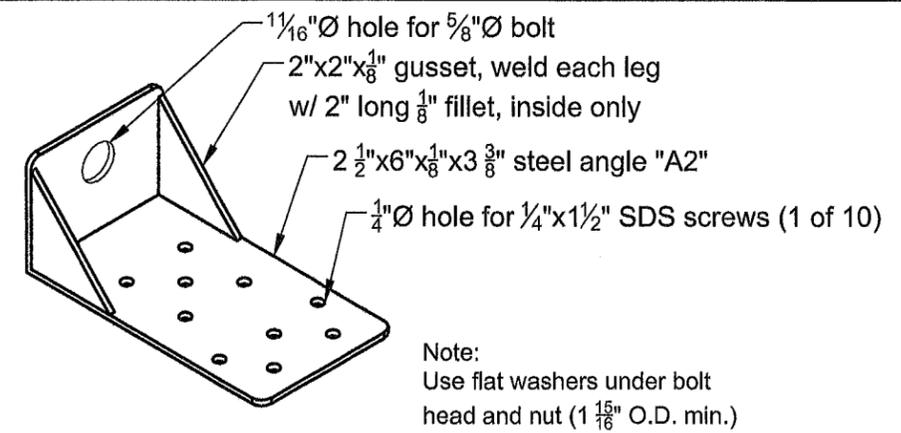
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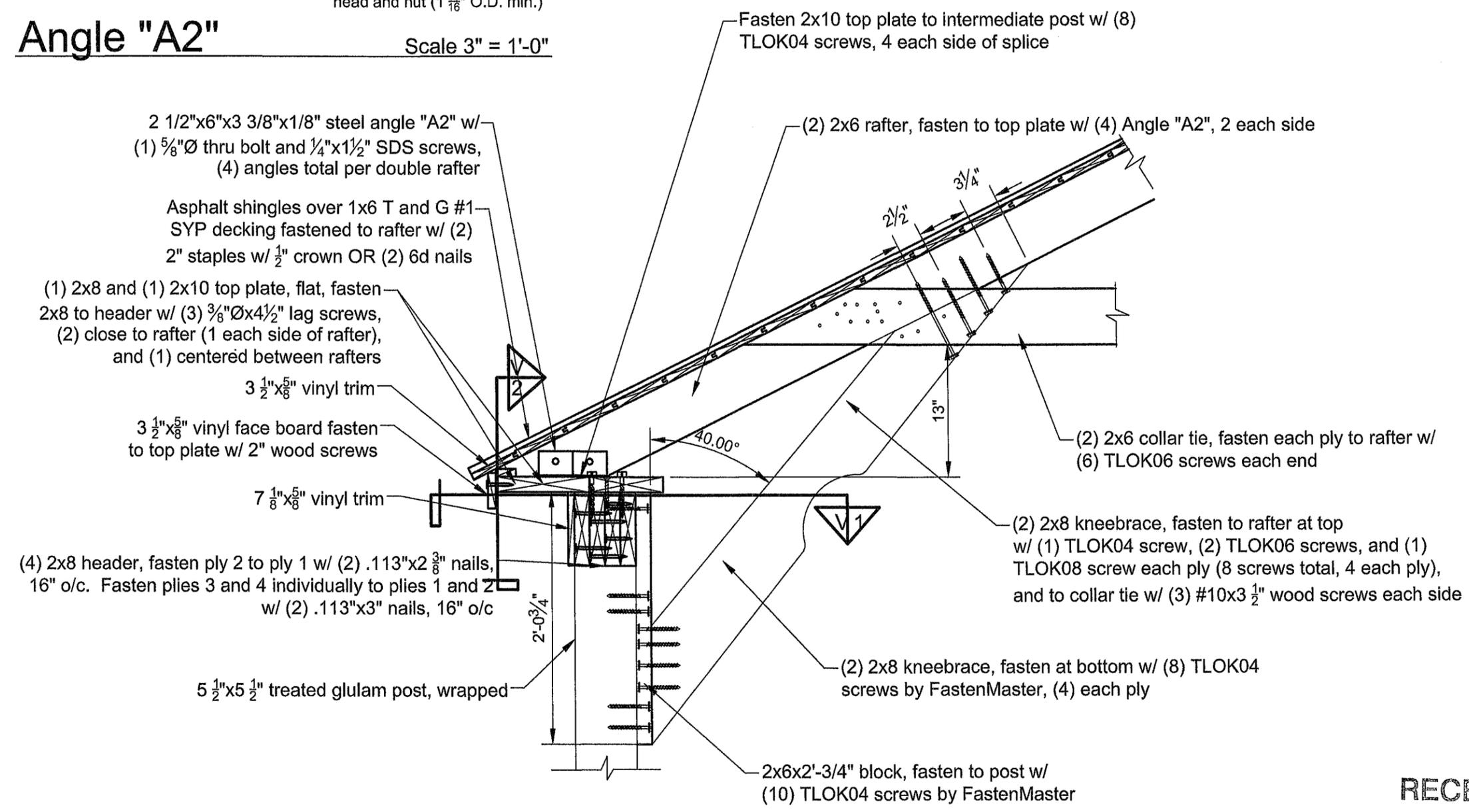
Drawing Title:
 Detail G-G/7
 Angle "A2"

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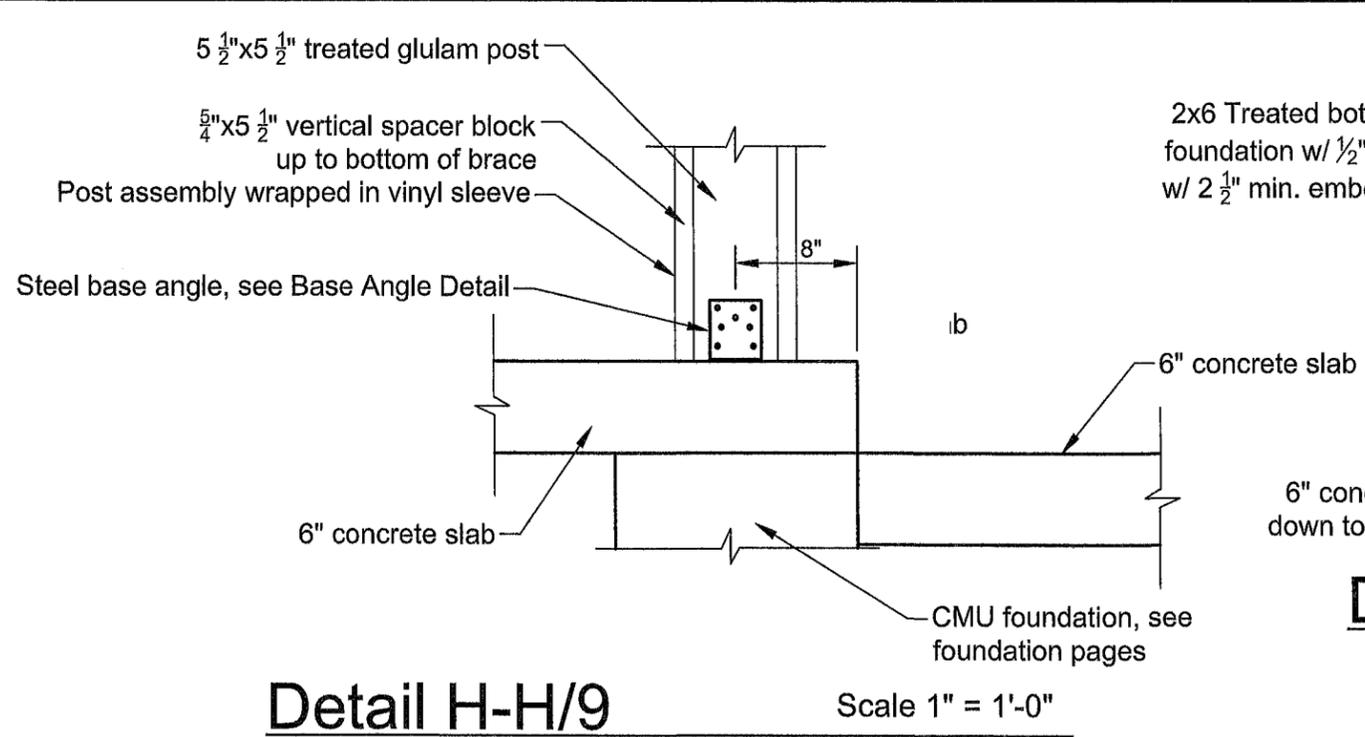
Angle "A2" Scale 3" = 1'-0"



Detail G-G/7
Center Double Rafter Scale 1" = 1'-0"

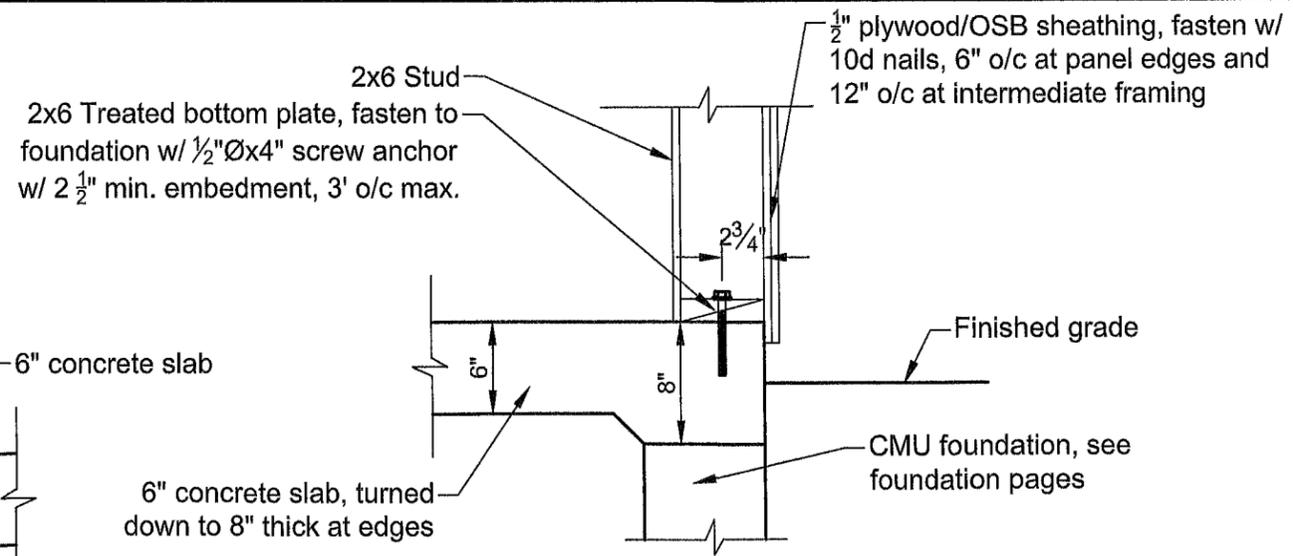
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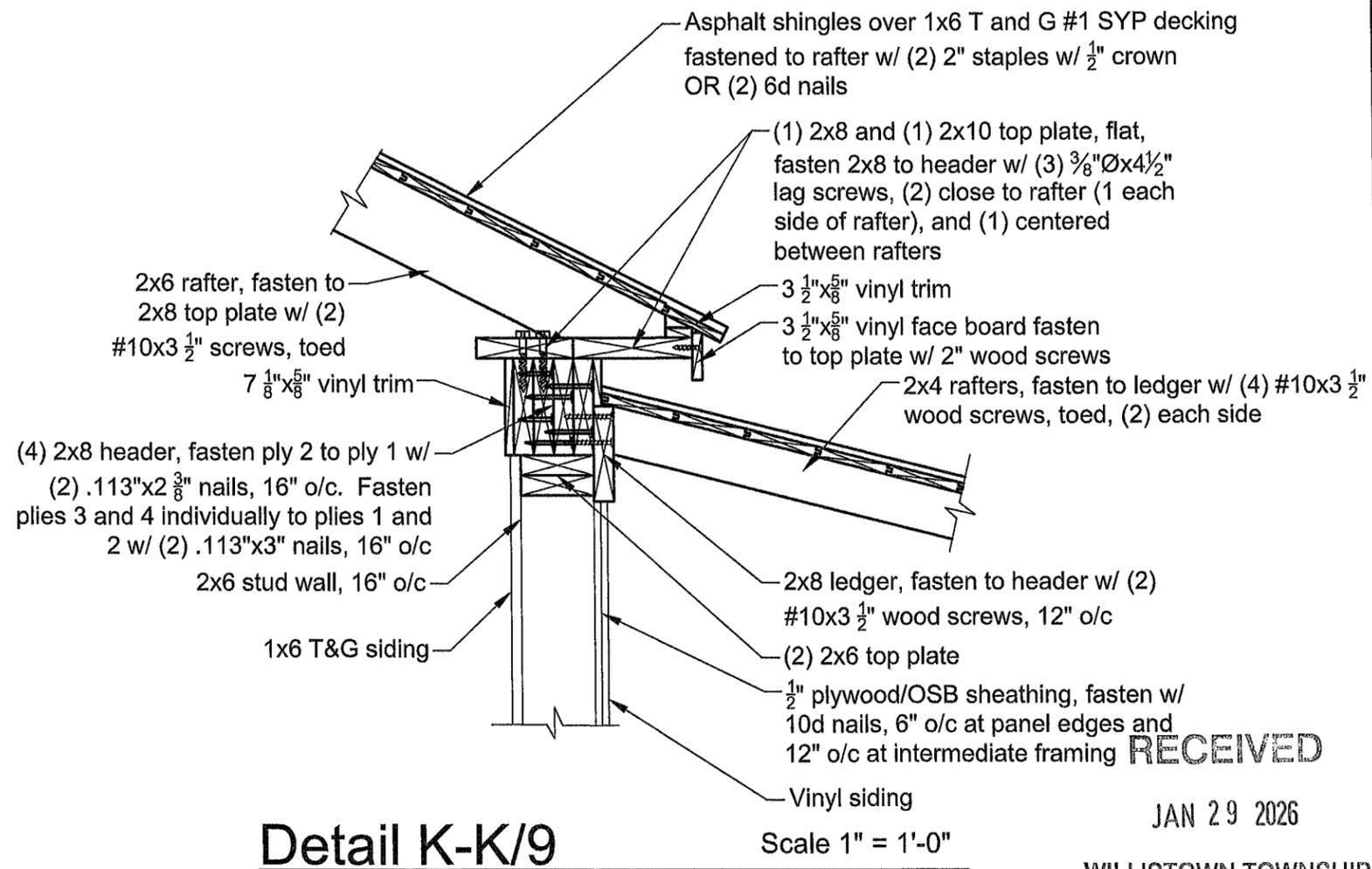
Detail H-H/9

Scale 1" = 1'-0"



Detail J-J/9

Scale 1" = 1'-0"



Detail K-K/9

Scale 1" = 1'-0"

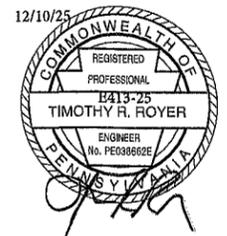
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Drawing Title:
 Detail H-H/9
 Detail J-J/9
 Detail K-K/9

Project:
 16'x24' Vinyl A-Frame Pavilion for
 Teddy and Barb Friedman
 13 Fox Chase Road
 Malvern, PA 19355

Revisions:	Date:	By:

Drawing Number: E413-25 Page: 9 of 10
 Engineered By: D. Reznik Start Date: 11/20/25
 Drafted By: K. Salyer Certified Date: 12/10/25

WOOD

1. General Requirements

- A. Structural wood members and connections shall be of sufficient size or capacity to carry all design loads without exceeding the allowable design values specified in "The National Design specification for Wood Construction" (NDS), and its "Supplement" by the American Wood Council (AWC).
- B. Wood members used for load supporting purposes shall have the grade mark of a lumber grading agency certified by the American Lumber Standards Committee.

2. Heavy Timbers

- A. Structural solid sawn timbers shall be designed, fabricated and installed in accordance with the NDS by AWC.
- B. Structural glued laminated soft wood timbers shall conform with the "American National Standard or Structural Glued Laminated Timber", (ANSI/AITC 190.1).
- C. Structural decking shall conform to the NDS.
- D. Glued laminated columns shall be manufactured with laminating combinations that will provide a minimum design value of 1,850 psi for compressive stress (Fc), and 2,200 psi for bending stress (Fb).

3. Dimension Lumber

- A. All lumber species, graded visually or mechanically, shall comply with the NDS by AWC, and the "American Softwood Lumber Standard" (PS 20) by the U.S. Department of Commerce.
- B. The minimum grade and species for posts, beams, headers, and other primary structural members shall be Dense Select Structural Southern Pine, unless specified otherwise.
- C. Lumber used for secondary framing shall be #1 Southern Yellow Pine (SYP) or better.
- D. Mechanically laminated columns shall conform with ANSI/ASAE EP 559.

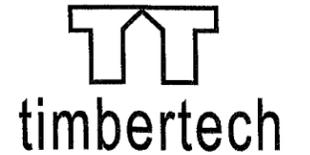
4. Pressure Preservative Treatment (PPT)

- A. Pressure treatment to be performed according to the American Wood Preservers' Association (AWPA) standards.
- B. Pressure treated members shall have the inspection mark of an agency accredited by the American Lumber Standards Committee.
- C. Preservative: Ammonia Copper Quaternary ammonia (ACQ) or Copper Boron Azole (CBA)
- D. Minimum waterborne treatment retention shall be 0.4 pcf for members above ground, and 0.6 pcf for members in contact with earth.
- E. Treat indicated items and the following:
 - 1. Wood members exposed to weather or insect infestation.
 - 2. Wood members in direct contact with earth or concrete.
 - 3. Wood members exposed to high moisture content (>19% for dimension lumber, >16% for glued laminated timber).
 - 4. Wood members less than 12 inches above grade.
 - F. Field treat newly exposed wood where cutting, drilling or notching pressure treated lumber.
 - G. Metal connectors used in treated wood shall be hot-dip galvanized as per ASTM A153.
- 5. Connections shall be designed and constructed according to the NDS by AWC and shall conform to the following:
 - A. The minimum connection shall be two #10x3 1/2" wood screws, or as detailed on the drawings.
 - B. Other connections as per standard construction practice.

Polyvinyl Chloride Compound (PVC)

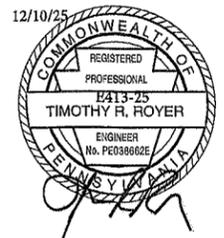
1. General Requirements

- A. PVC sleeve material used to wrap wood members to be supplied according to Certainteed corporation specifications or equivalent.
- B. PVC sleeve material to be 0.160" thick for posts, and 0.105" thick for other structural members



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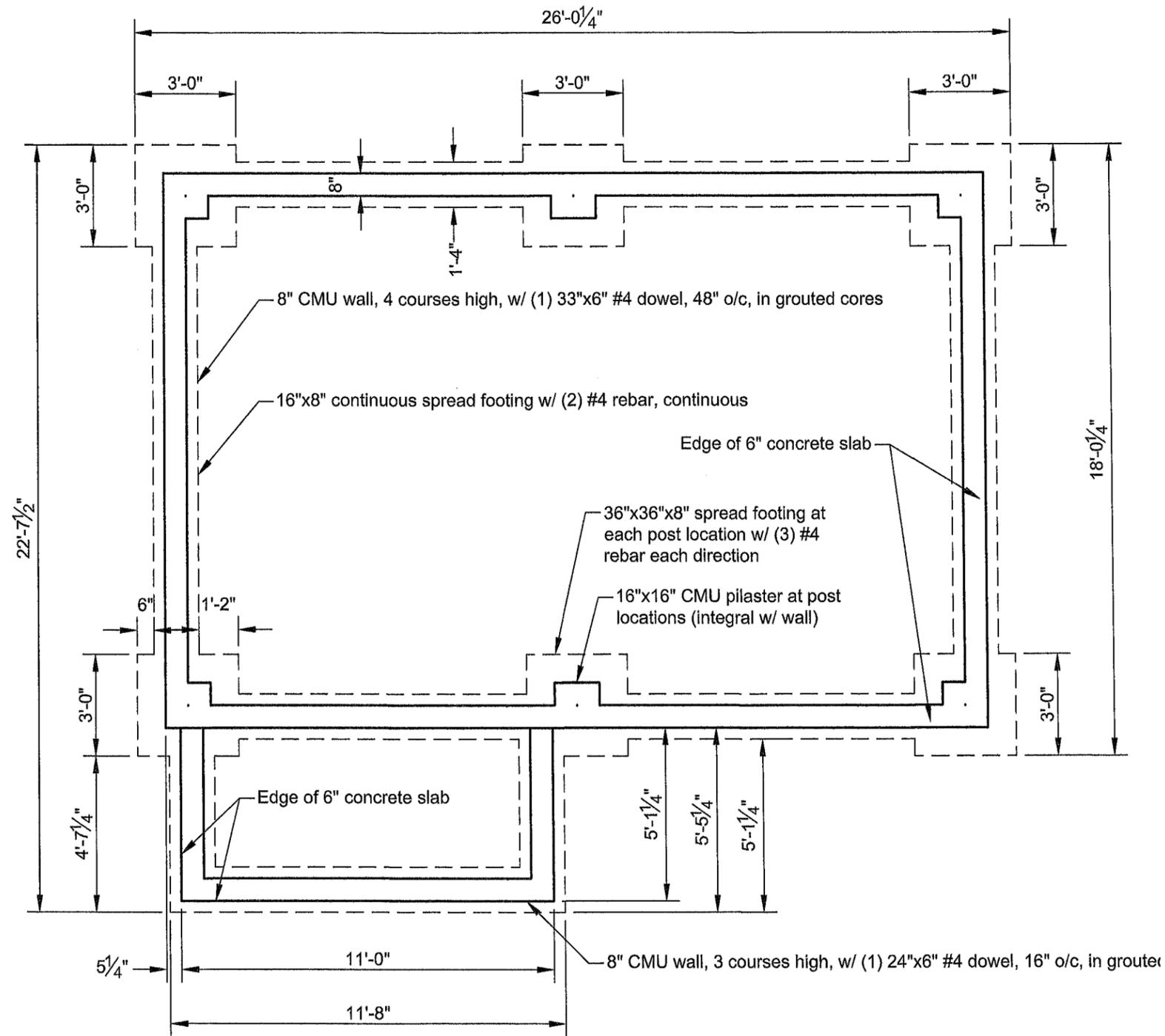
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Foundation Plan

Scale 1/4" = 1'-0"



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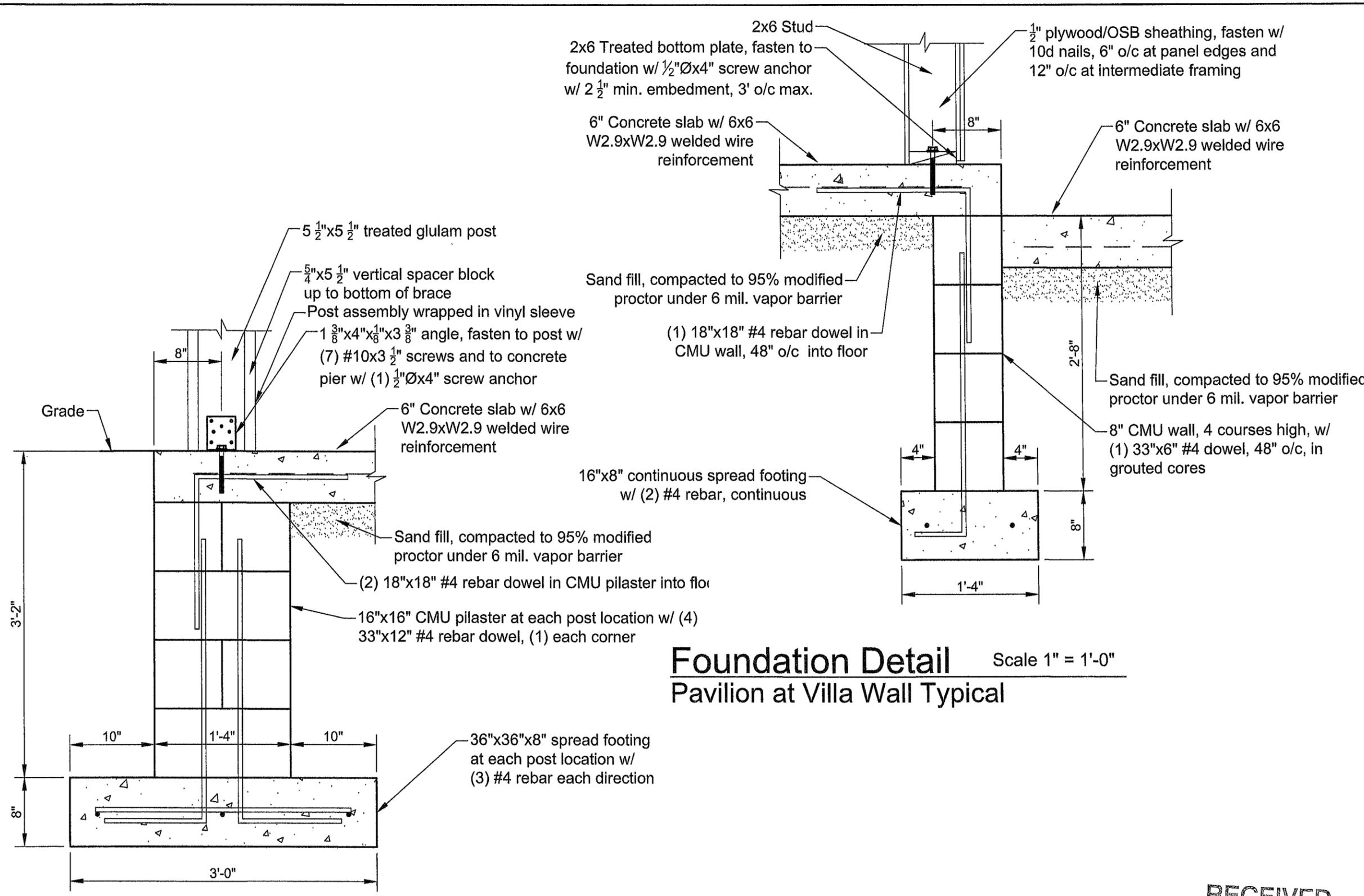
Drawing Title:
 Foundation Plan

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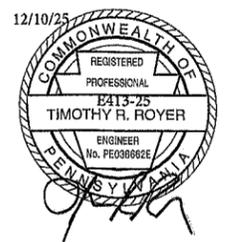
Foundation Detail Scale 1" = 1'-0"
Pavilion

Foundation Detail Scale 1" = 1'-0"
Pavilion at Villa Wall Typical



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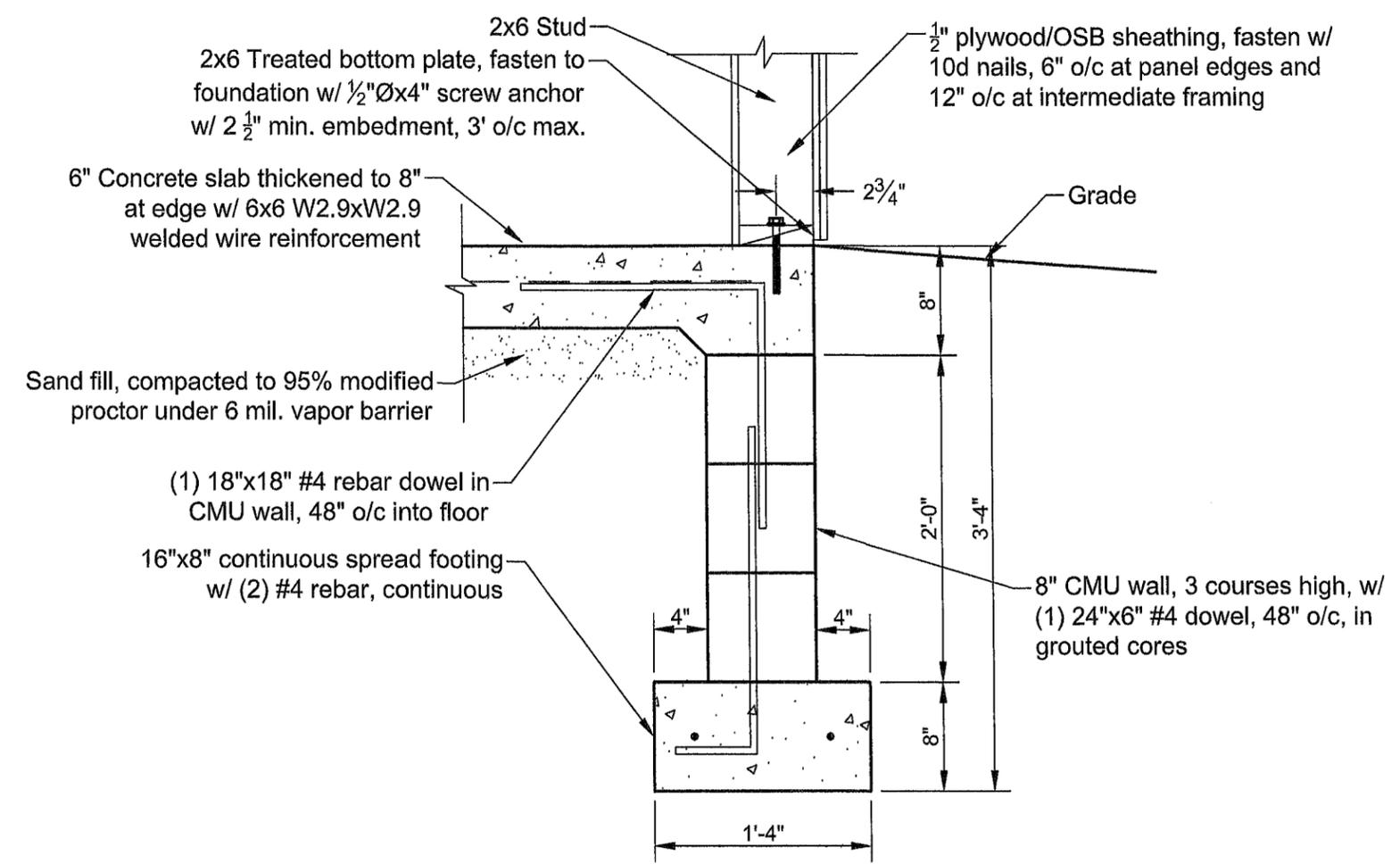
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Foundation Detail Scale 1" = 1'-0"
 Lean-To Villa Wall Typical

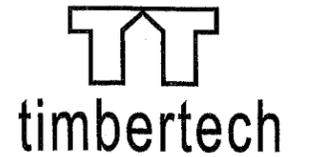
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EARTHWORK

1. Requirements
 - A. Provide a construction grade extending ten feet beyond building exterior walls or an alternative method per Section 1804 of the IBC.
 - B. Excavate for foundations to subgrade elevations regardless of character of materials and obstructions encountered, unless otherwise approved by the structural engineer.
 - C. Perform excavation work in compliance with applicable requirements of authorities having jurisdiction.
 2. Materials
 - A. Satisfactory soil: ASTM D2487 unified soil classification groups GW, GP, GM, SW, SP, and SM; free of rock or gravel larger than two inches in any dimension, debris, waste, frozen materials, vegetation, or other deleterious matter.
 - B. Unsatisfactory soil: ASTM D2487 unified soil classification groups GC, SC, ML, MH, CL, CH, OL, OH, and PT.
 - C. Backfill and fill: satisfactory soil materials.
 3. Execution
 - A. Footings have been designed for an assumed allowable loadbearing pressure of 2,000 psf. (No increases permitted.) The contractor shall verify this assumption, and shall immediately notify the structural engineer in writing of any deficiency.
 - B. Place backfill and fill in layers not more than eight inches in loose depth at optimum moisture content. Compact each layer under footings and slabs to a dry density of at least 95 percent of maximum dry density as determined by ASTM D1557.
 - C. Bottom of exterior footings shall be a minimum of 36 inches below finished grade, unless noted otherwise
- Masonry**
1. Concrete masonry units (C.M.U.) and brick shall conform to the following specifications:
 - A. Building Code Requirements/Specifications for Masonry Structures"(TMS-402) by the Masonry Society (TMS).
 - B. "Building Code Requirements for Concrete Masonry Structures" (ACI 530).
 - C. "Specifications for Masonry Structures" (ACI 530.1).
 2. C.M.U. shall have a minimum compressive strength (f'm) of 1,500 psi.
 3. Brick shall have a minimum compressive strength (f'm) of 1,250 psi.
 4. Mortar shall have materials and mix proportions according to ASTM C270.
 - A. Use type M mortar for C.M.U. below grade or in contact with earth.
 - B. Use type S mortar for all other masonry.
 5. Grout for filling cores of masonry units shall conform to TMS 602 / ACI 530.1 and have a minimum compressive strength of 2,500 psi.
 6. Horizontal joint reinforcement shall conform to TMS 602 / ACI 530.1 and the following:
 - A. Use truss or ladder type, standard class, single wythe "Dur-o-wall", or approved equal, joint reinforcement, zinc coated after fabrication.
 - B. Vertical spacing at 16" on center or as indicated on the drawings.
 7. Horizontal bond beam reinforcement shall conform to ASTM A615/A615M, grade 60, and shall have a minimum splice lap of 48 bar diameters.
 8. Vertical reinforcement shall conform to ASTM A615/A615M, grade 60 and the following:
 - A. Provide reinforcement of size and spacing as indicated on the drawings.
 - B. Place reinforcement in center of wall or as indicated on the drawings with a minimum tension lap splice of 48 bar diameters. Hold in position top and bottom at intervals of 200 bar diameters.
 - C. Grout all cells having bars, unless noted otherwise.
 9. Provide special shapes as required for lintels, corners, jambs, sash, control joints headers, bonding and other special conditions.

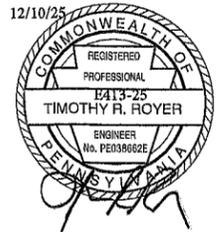
CAST-IN-PLACE CONCRETE

1. Concrete work shall conform to the following specifications by The American Concrete Institute (ACI).
 - A. "Building Code Requirements for Structural Concrete" (ACI 318).
 - B. "Hot Weather Concreting" (ACI 318).
 - C. "Cold Weather Concreting" (ACI 318).
 2. Materials used shall adhere to the following:
 - A. Portland Cement: ASTM C150, type 1.
 - B. Fly Ash: ACI 318.
 - C. Aggregates: ASTM C33, maximum aggregate size is one inch.
 - D. Fiberglass reinforcement: PCI MNL 128 Standard.
 - E. Air-entraining admixture: ACI 318.
 - F. Chemical admixtures: ASTM C494, water reducing. All concrete, except footings, shall contain a water reducing admixture. No admixtures containing calcium chloride are permitted. All other additives shall not be used without prior approval of the structural engineer.
 - G. Vapor retarder: Clear 8-mil thick polyethylene.
 3. Proportion normal-weight (145 pcf) concrete mixes to provide the following properties:
 - A. Compressive strength: 3,000 psi at 28 days (unless noted otherwise).
 - B. Slump limit: 4 inches (3 inches for slab-on-grade) at point of placement.
 - C. Water-cement ratio: 0.45 maximum at point of placement.
 - D. Air content: 5 to 7 percent for concrete exposed to freezing and thawing, 2 to 4 percent elsewhere.
 4. Reinforcing steel shall be fabricated, detailed and placed in accordance with the ACI 318, and shall conform to the following:
 - A. Deformed reinforcing bars: ASTM A615/A 615M with a minimum yield strength of 60,000 psi (grade 60).
 - B. Welded wire fabric (WWF): ASTM A1064, flat sheets, not rolls.
 - C. Ties/Stirrups: ASTM A615/A615M, grade 40.
 5. Concrete work shall be executed according to the following:
 - A. Maintain tolerances and surface irregularities within ACI 117 limits of class A for concrete exposed to view, and class C for other concrete surfaces. Floor slabs shall be screeded, floated and steel troweled to a smooth, dense and plane surface.
 - B. Accurately position, support, and secure reinforcement.
 1. Reinforcing bars shall lap 48 bar diameters at splices in concrete unless otherwise noted.
 2. Provide corner bars to match all continuous reinforcing in concrete and masonry.
 3. Reinforcing bar hooks shall be ACI standard.
 4. WWF shall have ends lapped one full mesh, and shall extend onto supporting walls.
 5. Chairs, bolsters, bar supports, and spacers shall be sized and shaped for strength and support of reinforcement during concrete placement.
 - C. Provide minimum concrete cover on reinforcing bars as follows:
 1. Cast against earth.....3"
 2. Exposed to earth or weather (#5 or smaller)...1 1/2"
 3. Exposed to earth or weather (#6 or larger).....2"
 4. Slabs and walls not exposed.....3/4"
 - D. The contractor shall be responsible for stability and integrity of all excavations and existing structures.
- Structural Steel**
1. Connections shall be designed and constructed according to AISC, and shall conform to the following:
 - A. Screw Anchors (exterior applications): Use screw anchors of the diameter and length indicated on the drawings as manufactured by Red Head or approved equal. Use LDT Stainless Steel bolts, or LDT bolts with EnvireX coating in concrete and CMU. Fill CMU cells at all bolt locations.
 - B. Connections exposed to weather or high relative humidity shall be hot-dip galvanized per ASTM A153 / A153M.



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