# STONEFIELD-RALE

RALEIGH - LOT 00.0072 BLAKE POND SF (MODEL# 1635)

ELEVATION 7 - GR

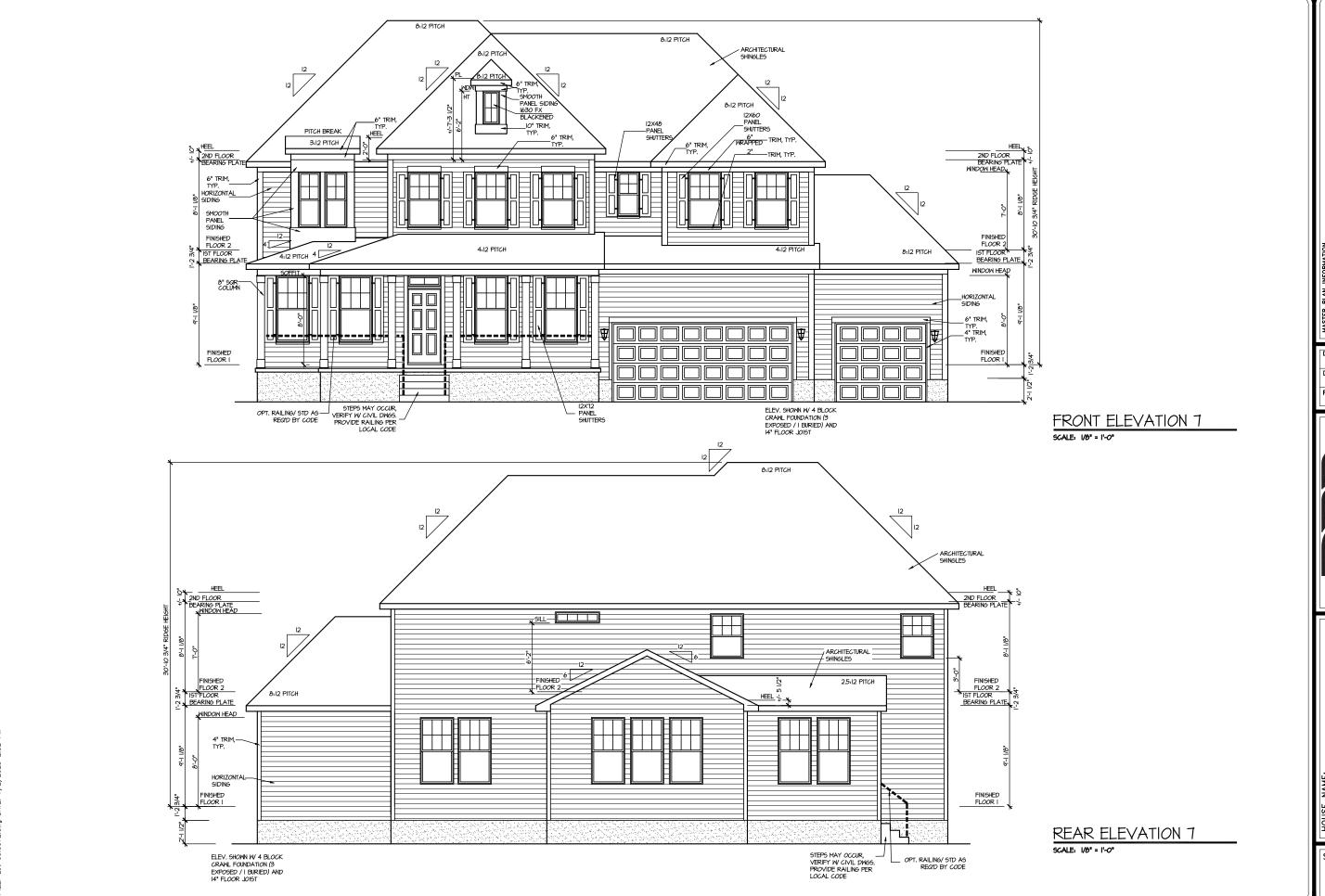


| AREA CALCULATIONS  ELEVATION 7 FIRST FLOOR GARAGE FRONT PORCH - ELEVATION 7  SECOND FLOOR  OPTIONS EXT. BEKFST W / EXT. OWNER'S SUITE BED 5 W / BATH 3  MORNING ROOM  TOTAL  TOTAL  TOTAL  COVERED / UNHEATED UNCOVERED  |                   |         |           |           |
|--|-------------------|---------|-----------|-----------|
| ELEVATION 7 HEATED UNHEATED UNCOVERED  FIRST FLOOR  GARAGE 496 SF  FRONT PORCH - ELEVATION 7 214 SF  SECOND FLOOR 1622 SF  OPTIONS  EXT. BRKFST W/ EXT. OWNER'S SUITE 186 SF  3RD CAR GARAGE +264 SF  BED 5 W/ BATH 3 +55 SF -55 SF  MORNING ROOM 140 SF   | ADEA CALCULATIONS |         |           |           |
| ELEVATION 7 FIRST FLOOR GARAGE GARAGE FRONT PORCH — ELEVATION 7  SECOND FLOOR OPTIONS EXT. BRKFST W/ EXT. OWNER'S SUITE 3RD CAR GARAGE BED 5 W/ BATH 3 MORNING ROOM  140 SF  UNHEATED U | AREA CALCULATIONS |         | COVERED / |           |
| GARAGE   | ELEVATION 7       | HEATED  | UNHEATED  | UNCOVERED |
| GARAGE   | FIRST FLOOR       | 1542 SF |           |           |
| FRONT PORCH — ELEVATION 7 214 SF  SECOND FLOOR 1622 SF  OPTIONS  EXT. BRKFST W/ EXT. OWNER'S SUITE 186 SF  3RD CAR GARAGE +264 SF  BED 5 W/ BATH 3 +55 SF -55 SF  MORNING ROOM 140 SF  |                   |         | 496 SF    |           |
| SECOND FLOOR   |                   |         |           |           |
| OPTIONS  EXT. BRKFST W/ EXT. OWNER'S SUITE  3RD CAR GARAGE  BED 5 W/ BATH 3  +55 SF  MORNING ROOM  140 SF  |                   |         | 27.7.5.   |           |
| OPTIONS  EXT. BRKFST W/ EXT. OWNER'S SUITE  3RD CAR GARAGE  BED 5 W/ BATH 3  +55 SF  MORNING ROOM  140 SF  | SECOND FLOOR      | 1622 SF |           |           |
| EXT. BRKFST W/ EXT. OWNER'S SUITE 186 SF  3RD CAR GARAGE +264 SF  BED 5 W/ BATH 3 +55 SF -55 SF  MORNING ROOM 140 SF   |                   |         |           |           |
| EXT. BRKFST W/ EXT. OWNER'S SUITE 186 SF  3RD CAR GARAGE +264 SF  BED 5 W/ BATH 3 +55 SF -55 SF  MORNING ROOM 140 SF   | OPTIONS           |         |           |           |
| 3RD CAR GARAGE       +264 SF         BED 5 W/ BATH 3       +55 SF       -55 SF         MORNING ROOM       140 SF   |                   | 186 SF  |           |           |
| BED 5 W/ BATH 3 +55 SF -55 SF  MORNING ROOM 140 SF   | ,                 |         | +264 SF   |           |
| MORNING ROOM 140 SF  |                   | +55 SF  |           |           |
|  |                   |         |           |           |
| TOTAL 3545 SF 919 SF   |                   | 1.00    |           |           |
| TOTAL 3545 SF 919 SF   |                   |         |           |           |
|  | TOTAL             | 3545 SF | 919 SF    |           |
|  | 1017/12           |         | 0.00      |           |
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# 86 Biscayne Court

|          | SPECIFIC     |  |
|----------|--------------|--|
|          | LOT 00.0072  | BLAKE POND SF                          |
|          |              | STONEFIELD REV. RALE-3 ELEVATION 7     |
| 2        | ADDRESS      | 86 BISCAYNE COURT LILLINGTON, NC 27546 |
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AASTER PLAN INFORMATION

REVISION DATE

3-RALE 07-31-2024

04-30-2024

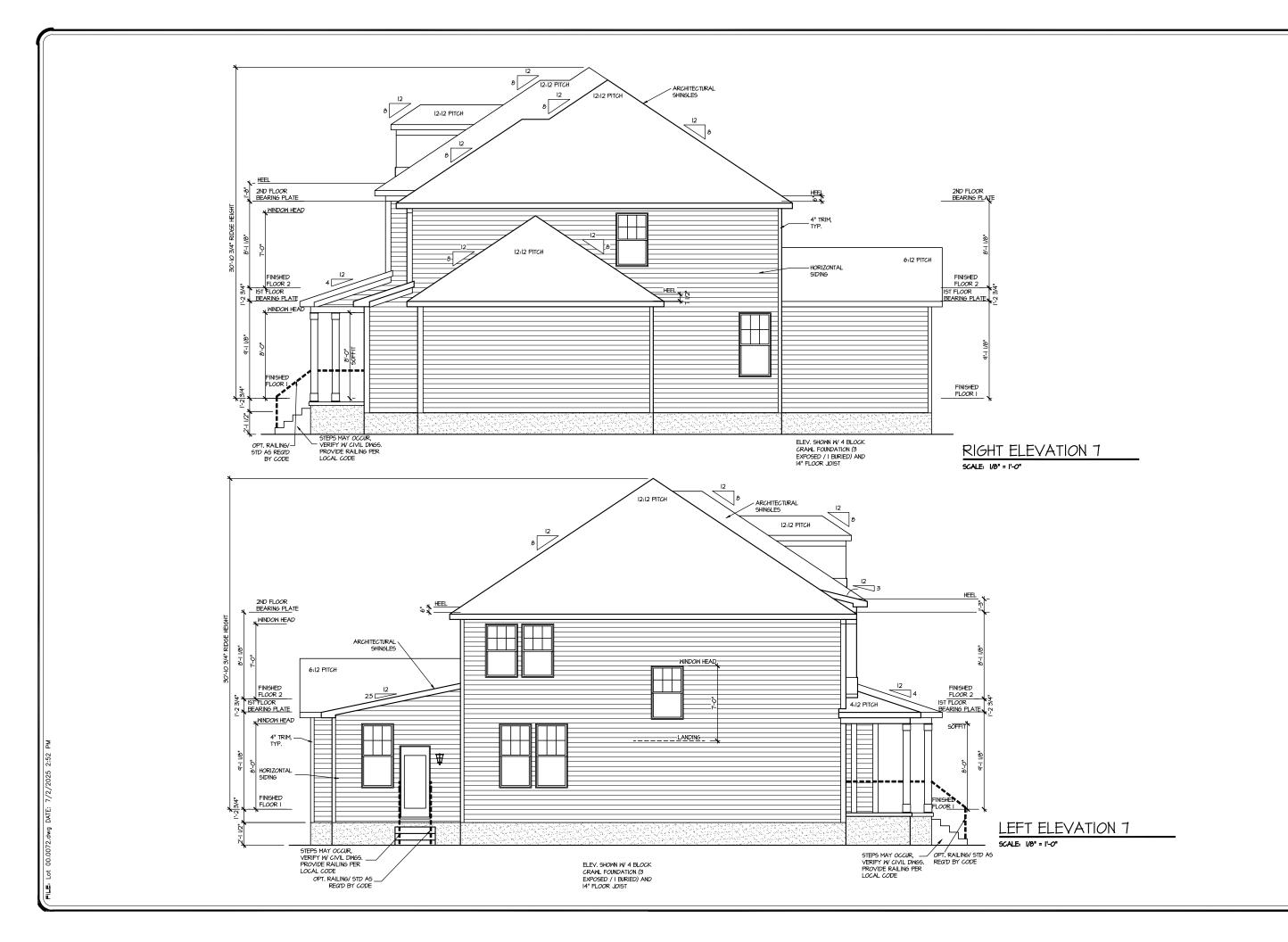
DRAWN BY: ITS DATE: 07/02/2025 PLAN NO. 1635



HOUSE NAME:
STONEFIELD
DRAWING TITLE
FRONT & REAR ELEVATIONS

SHEET No.

A|.|



DRAWN BY: ITS

DATE: 07/02/2025

PLAN NO.
1635

HOUSE NAME:
STONEFIELD
DRAWING TITLE
RIGHT & LEFT ELEVATIONS

SHEET No.

UPPER ROOF VENTILATION CALCULATIONS: ROOF AREA I = 1784 50, FT.
OVERALL REQUIRED VENTILATION.
I TO 150 = 11.427 50, FT.
I TO 300 = 5.463 50, FT.
50% IN TOP THIRD = 2.46 50, FT. (1 TO 300)

NET FREE AREA OF VENTED SOFFIT = 5.7 SQ, IN / LINEAR FT, NET FREE AREA OF RIDGE VENT = 18 SQ, IN LINEAR FT, LONER VENTING: (BOTTOM 2/3 RDS). 82 LINEAR FEET OF SOFFIT X 5.7 SQ. IN. = 3.245 SQ. FT.

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UPPER ROOF VENTILATION CALCULATIONS:

ROOF AREA 3 = 45 50, FT. OVERALL REQUIRED VENTILATION: 1 TO 150 = 0.63 50, FT. 1 TO 300 = 0.311 50, FT. 50% IN TOP THIRD = 0.158 50, FT. (1 TO 300)

NET FREE AREA OF VENTED SOFFIT = 5.1 SQ. IN / LINEAR FT. NET FREE AREA OF RIDGE VENT = 18 SQ. IN/ LINEAR FT.

LONER VENTING: (BOTTOM 2/3 RDS) 23 LINEAR FEET OF SOFFIT X 5.1 SQ, IN, = 0.41 SQ, FT. 25 LINEAR FEET OF SOFHT X 5.1 SOL IN. = 0.11 SOL UPPER VEHING. (TOP 1/3 RD)

6 LINEAR FEET OF RIDGE X 18 SOL IN = 1 SOL FT. 1 SOL FT. BETWEEN 50% (1 TO 300 ALLONED)

UPPER ROOF VENTILATION CALCULATIONS:

ROOF AREA 5 = 144 SQ. FT.

OVERALL REQUIRED VENTILATION:

1 TO 150 = 0.76 SQ. FT.

1 TO 300 = 0.46 SQ. FT.

50% IN TOP THIRD = 0.24 SQ. FT. (1 TO 300) NET FREE AREA OF VENTED SOFFIT = 5.7 SQ. IN / LINEAR FT. NET FREE AREA OF RIDGE VENT = 18 SQ. IN/ LINEAR FT.

LONER VENTING: (BOTTOM 2/3 RDS) IO LINEAR FEET OF SOFFIT X 5.7 SQ. IN. = 0.39 SQ. FT. 

UPPER ROOF VENTILATION CALCULATIONS:

ROOF AREA 2 = 252 50. FT. OVERALL REQUIRED VENTILATION: I TO 150 = 160 50. FT. I TO 300 = 0.04 50. FT. 50% IN TOP THIRD = 0.42 50. FT. (I TO 300)

NET FREE AREA OF VENTED SOFFIT = 5.7 SQ. IN / LINEAR FT. NET FREE AREA OF RIDGE VENT = 18 SQ. IN/ LINEAR FT.

LOHER VENTING. (BOTTOM 2/3 RDG)

II LINEAR FIET OF SOFFIT X 5.1 SQ. IN. = 0.435 SQ. FT.

PERE VENTING. (DOF 1/3 D)

4 LINEAR FIET OF RIDGE X IB SQ. IN = 0.5 SQ. FT.

0.5 SQ. FT. AT SQA.

(1 TO 300 ALLOYED)

UPPER ROOF VENTILATION CALCULATIONS: ROOF AREA 4 = 208 50, FT. OVERALL REQUIRED VENTILATION: 1 TO 150 = 0.643 50, FT. 1 TO 300 = 1.367 50, FT. 50% IN TOP THIRD = 0.347 50, FT. (1 TO 300) NET FREE AREA OF VENTED SOFFIT = 5.7 SQ. IN / LINEAR FT. NET FREE AREA OF RIDGE VENT = 10 SQ. IN/ LINEAR FT.

LOPER VENTINS. (BOTTOM 2/3 RDs)
20 LINEAR PEET OF SOFFIT X 5.1 50. IN. = 0.7M 50. FT.
UPER VENTING. (TOP 1/3 RD)
5 LINEAR PEET OF RIDGE X ID 50. IN. = 150. FT.
150. FT. AT 50%
(1 TO 300 ALLOWED)
10 TOTAL ROOF VENTILATION L.7M 50. FT. > 0.32 50. FT. (R0D)

UPPER ROOF VENTILATION CALCULATIONS: ROOF AREA 6 = 234 50. FT.

OVERALL REQUIRED VENTILATION.

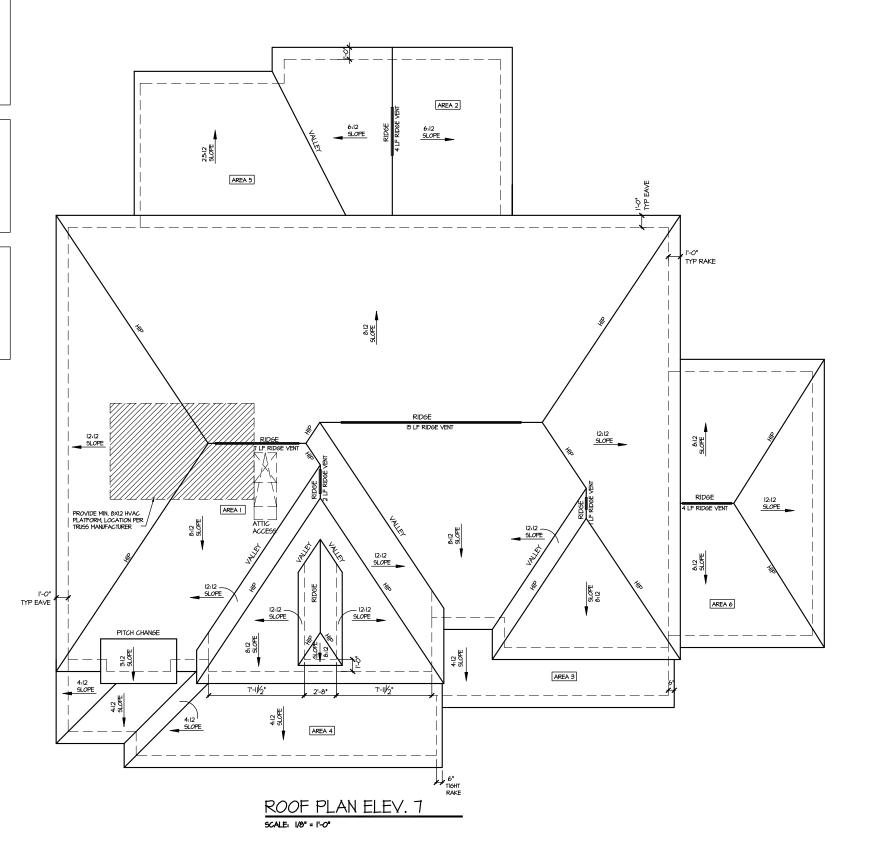
1 TO 150 = 1,56 50. FT.

1 TO 300 = 0,76 50. FT.

50% IN TOP THIRD = 0,34 50. FT. (1 TO 300) NET FREE AREA OF VENTED SOFFIT = 5.7 SQ. IN / LINEAR FT. NET FREE AREA OF RIDGE VENT = 18 SQ. IN/ LINEAR FT.

LOWER VENTING: (BOTTOM 2/3 RD5)
IO LINEAR FEET OF SOFFIT X 5.7 SQ. IN. = 0.346 SQ. FT. IO LINEAR FEET OF SOTTH A STATE OF SOLINE OF S

NOTE: ROOF PLANS SHOWN W/ MIN. REQ'D RIDGE VENT LOCATIONS. ACTUAL RIDGE VENT LOCATIONS AND QUANTITY PER BUILDER



SHEET No.

HOUSE NAME:
STONEFIELD
DRAWING TITLE

DRAWN BY:

DATE: 07/02/2025 PLAN NO. 1635

AI.3

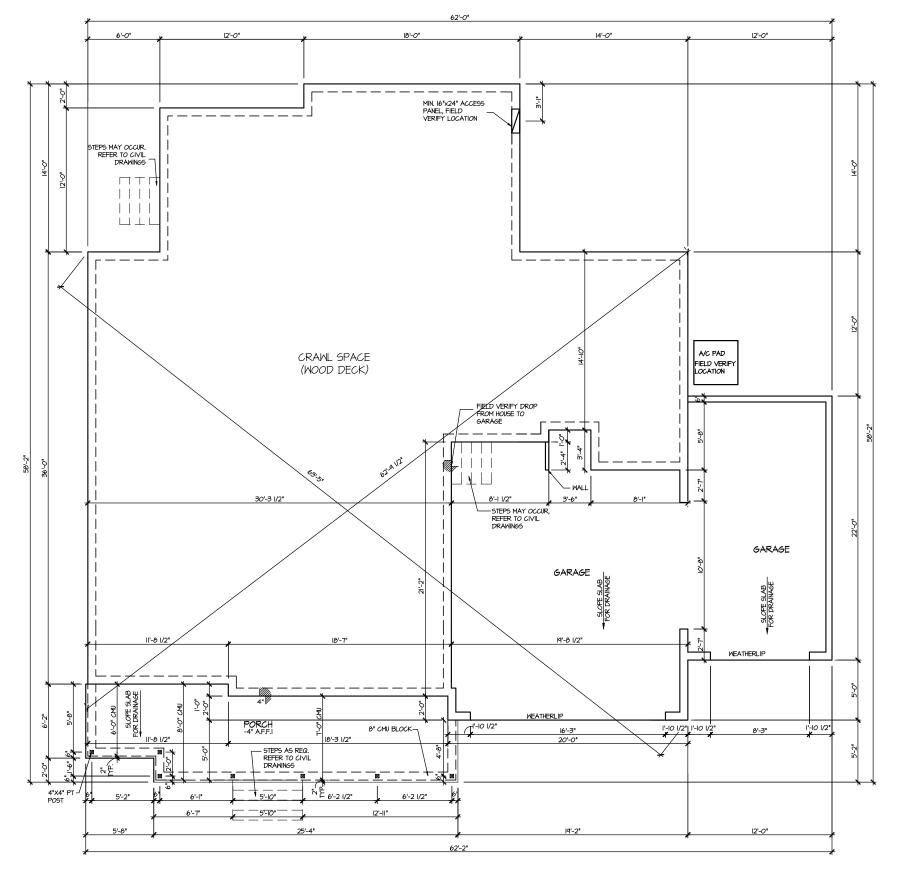
CRAWL SPACE VENT CALCULATIONS: ELEV 7 CRAWL AREA = 1542 SQ. FT. OVERALL REQUIRED VENTILATION:

I SQ. IN. PER I SQ. FT. = 1542 SQ. IN.

NET FREE AREA OF VENT = 72 SQ. IN. PER VENT WITTEN AUTOMATIC VENT OAL-I OR EQUAL

<u>VENTING REQUIREMENT:</u> 1542 SQ. IN. / 72 SQ. IN. = 21.4 VENTS = 22 VENTS

ONLY VENTS ON THE FRONT ELEVATION ARE SHOWN. ALL OTHERS TO BE FIELD LOCATED. YENTS SHALL BE INSTALLED PER R322.2.2 - R322.2.2.1



ELEVATION 7 CRAWL SLAB PLAN SCALE: 1/8" = 1'-0"

SHEET No.

HOUSE NAME:
STONEFIELD
DRAWING TITLE

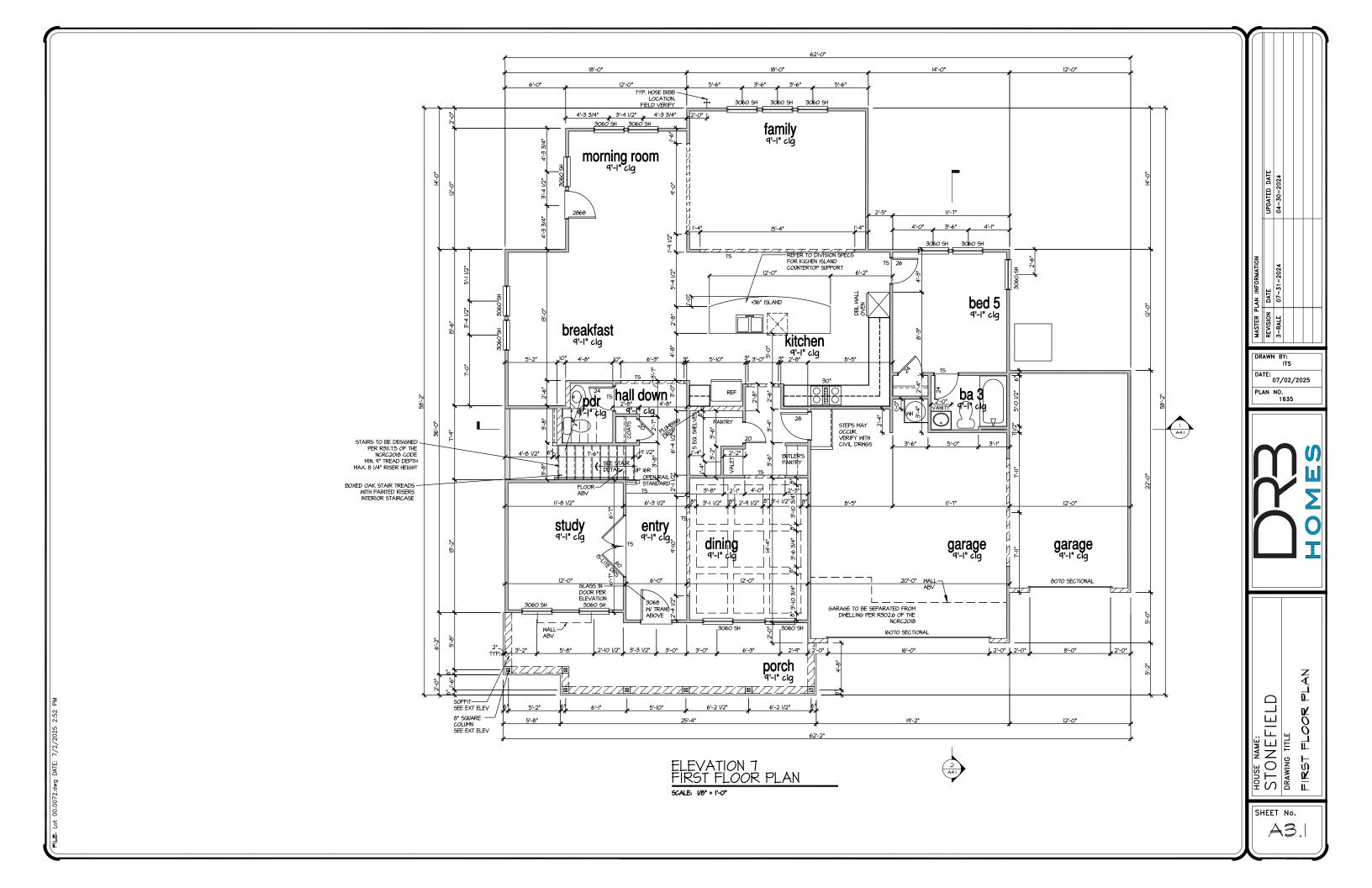
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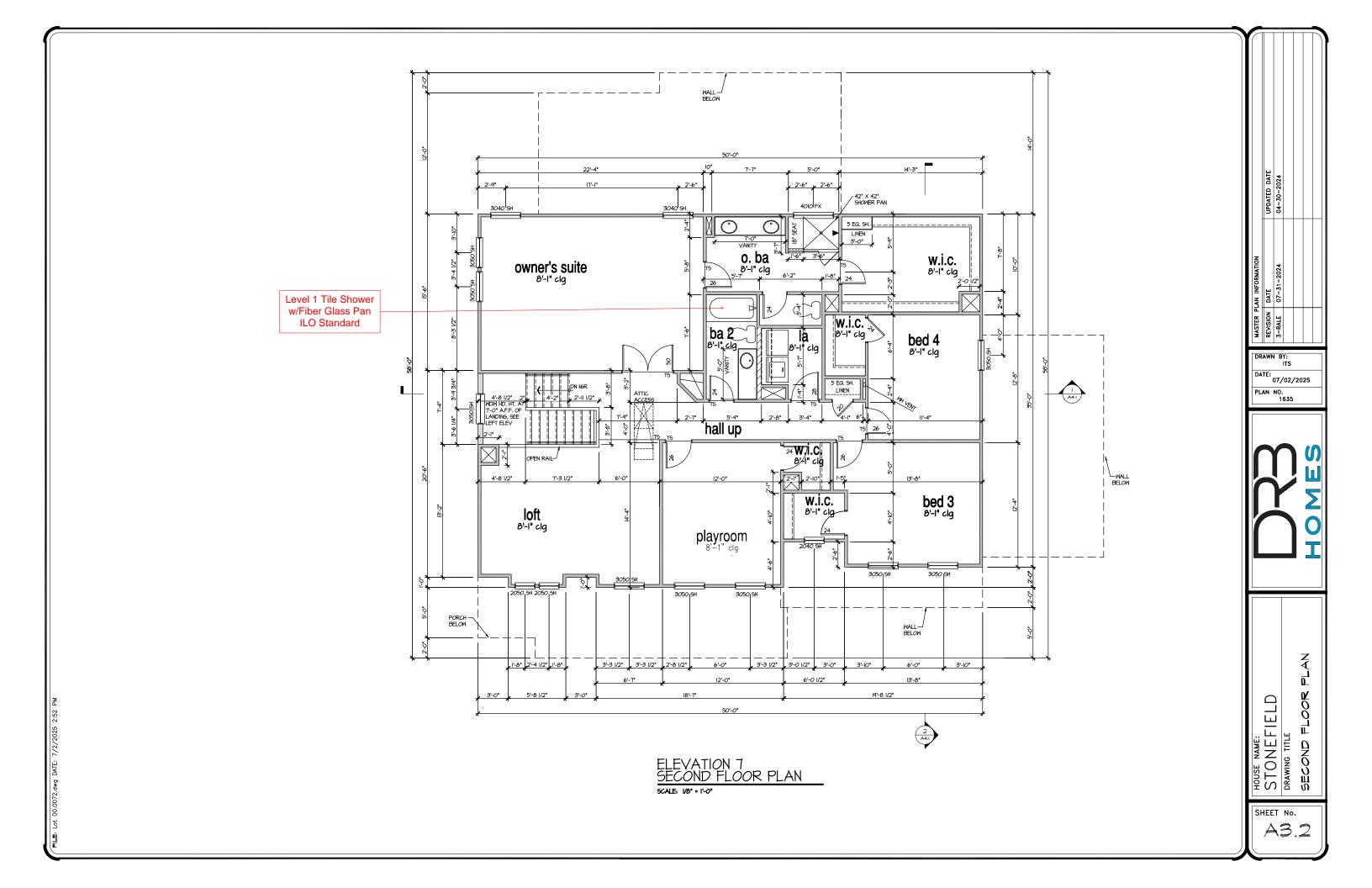
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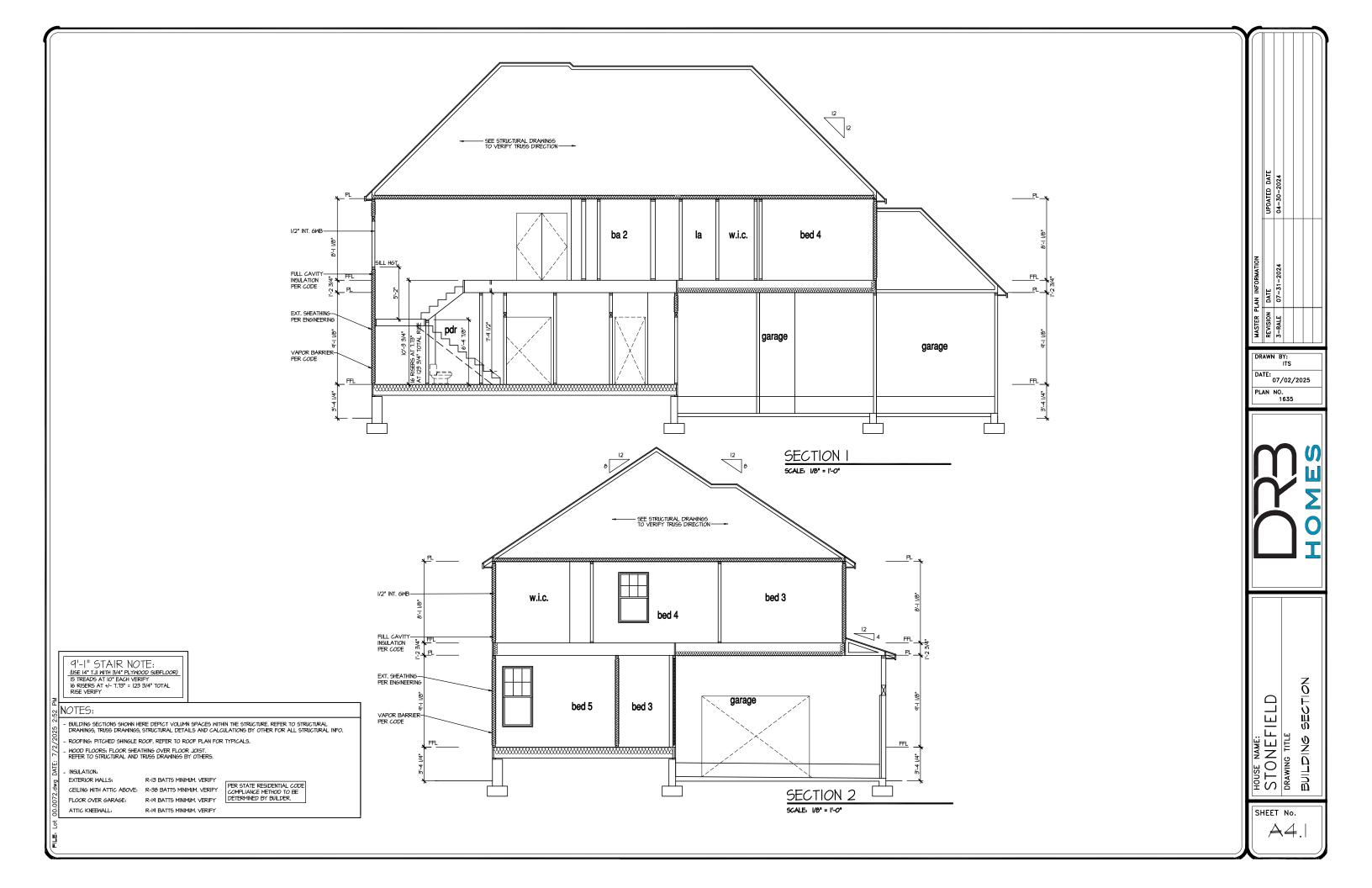
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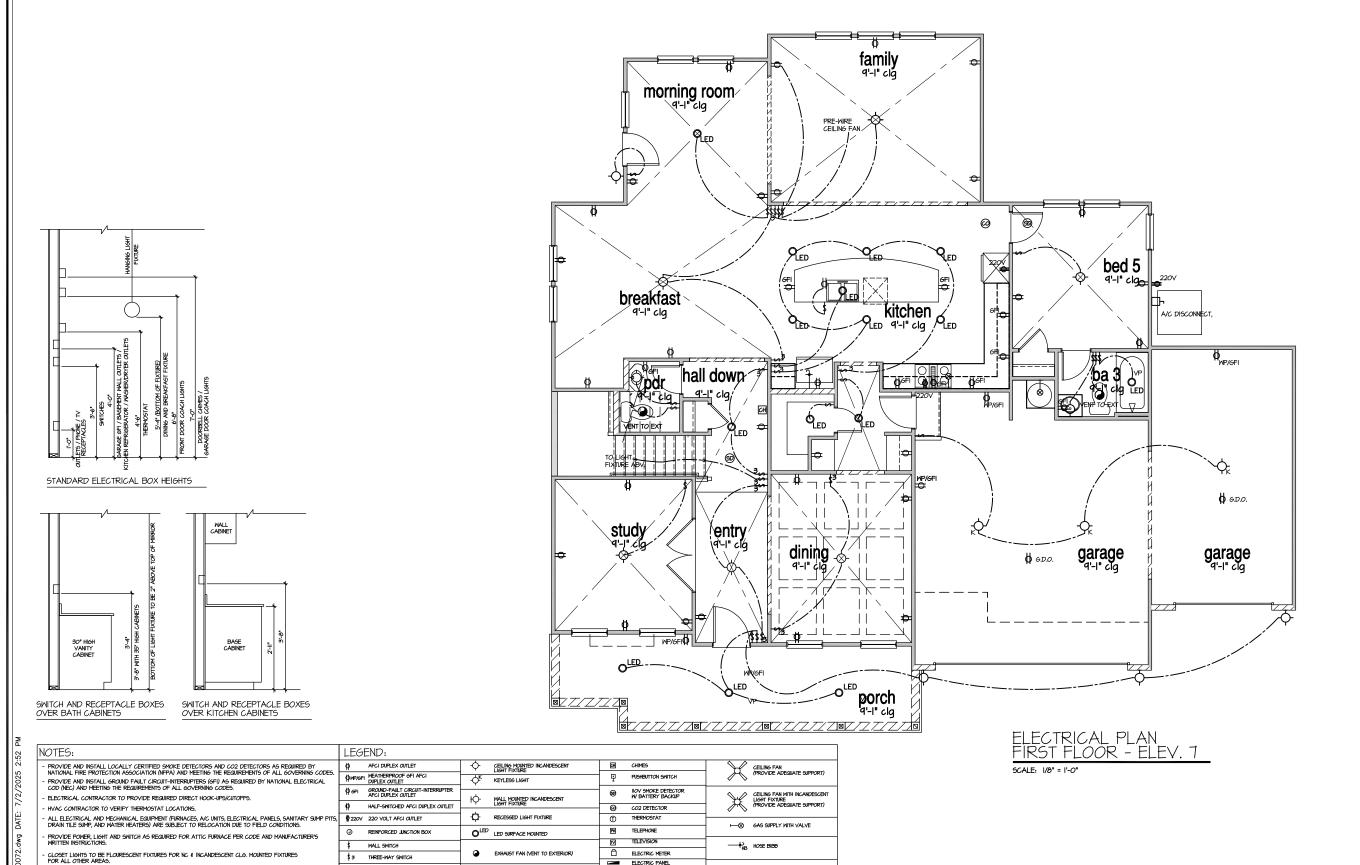
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A2.









ELECTRIC PANEL

DISCONNECT SWITCH

-+CM 1/4" WATER STUB OUT

EXHAUST FANLIGHT COMBINATION (VENT TO EXTERIOR)

TECH HUB SYSTEM

\$4 FOUR-WAY SMITCH

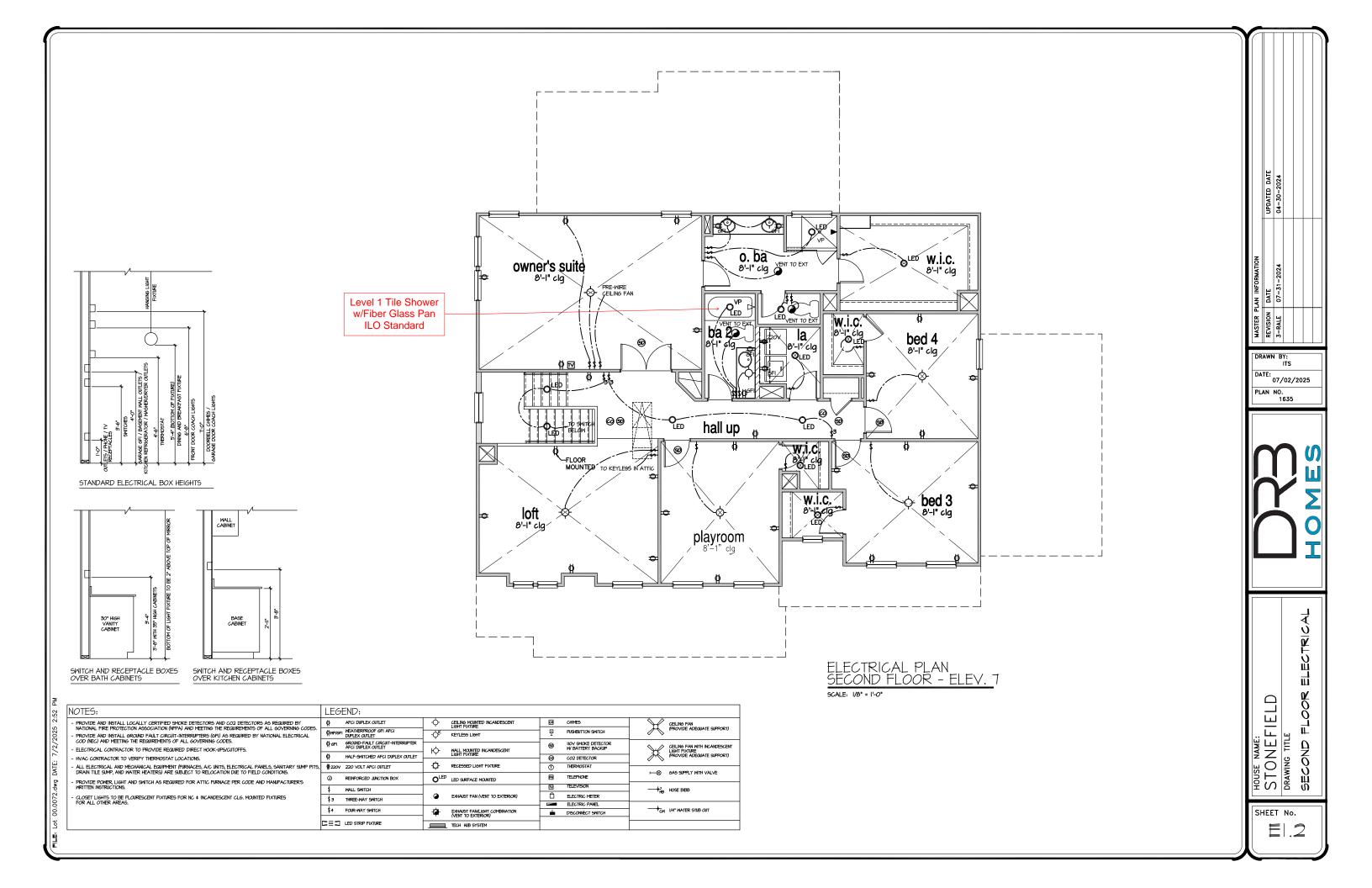
□□□ LED STRIP FIXTURE

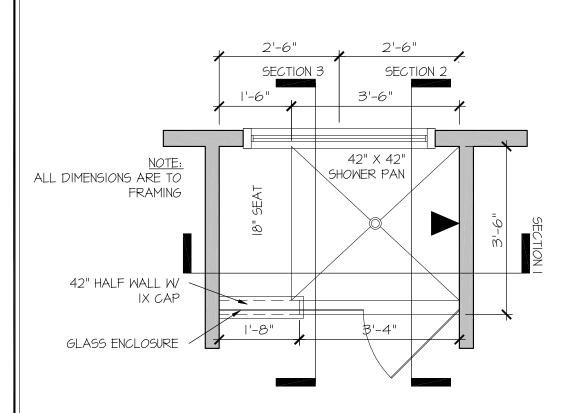
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HOUSE NAME:
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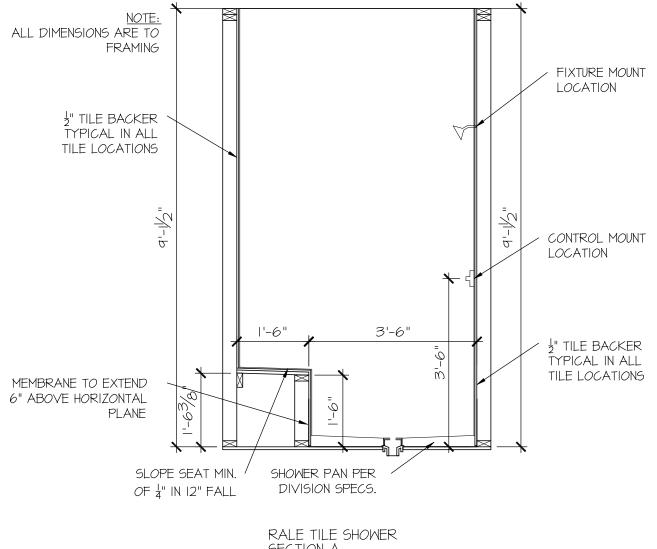
SHEET No.





RALE TILE SHOWER 42" X 42" W 18" SEAT

SCALE: 1/2" = 1'-0"



SECTION A

SCALE: 1/2" = 1'-0"

CONSULTANT LOGO

DRAWN BY: L. BEAVERS DATE: 9/1/22 PLAN NO.

11 X 17 SCALE

24 X 36 SCALE



DETAIL SHOWER RALE

SHEET No.



SEAL

DRAWN BY:
L. BEAVERS
DATE: 9/1/22

PLAN NO.

24 X 36 SCALE

~ "

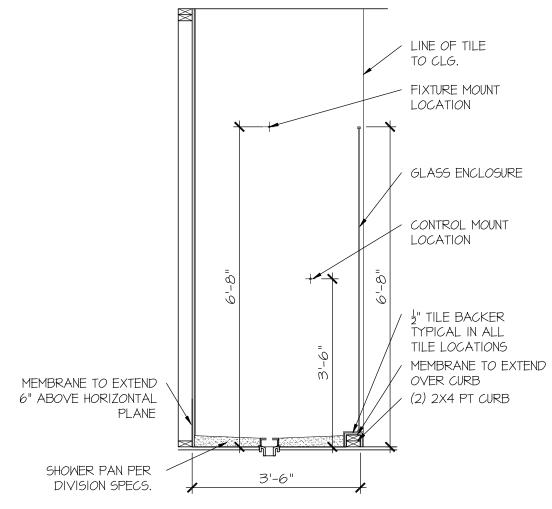


E ILE SHOWER DETAIL

OUSE NAME:

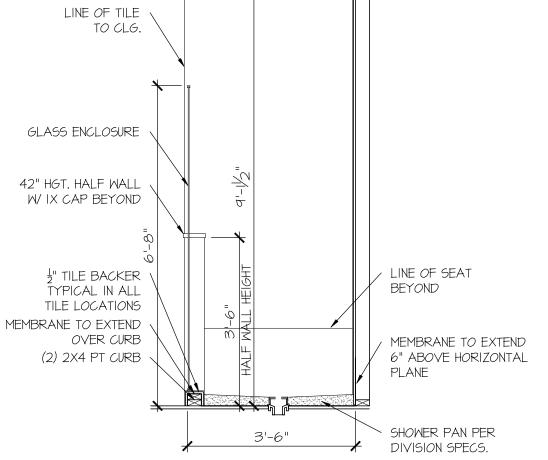
SHEET No.

P||.2



SCALE: 1/2" = 1'-0"





SCALE: 1/2" = 1'-0"

| DESCRIPTION OF BLDG. ELEMENT                                | 3"x0.131" NAILS          | 3"x0.120" NAILS           |
|---|--------------------------|---------------------------|
| JOIST TO SOLE PLATE   | (3) TOENAILS             | (3) TOENAILS*             |
| SOLE PLATE TO JOIST/BLK'G.                                  | (3) NAILS 🛭 4" O.C.      | (3) NAILS 💇 4" o.c.       |
| STUD TO SOLE PLATE  | (2) TOENAILS             | (3) TOENAILS*             |
| TOP OR SOLE PLATE TO STUD                                   | (2) NAILS                | (3) NAILS                 |
| RIM TO TOP PLATE  | TOENAILS • 8" O.C.       | TOENAILS @ 6" o.c.*       |
| BLK'G. BTWN. JOISTS TO TOP PL.                              | (3) TOENAILS             | (3) TOENAILS*             |
| DOUBLE STUD   | NAILS <b>⊘</b> 24" O.C.  | NAILS @ 16" O.C.          |
| DOUBLE TOP PLATE  | NAILS @ 24" o.c.         | NAILS @ 16" O.C.          |
| DOUBLE TOP PLATE LAP SPLICE                                 | (9) NAILS IN LAPPED AREA | (II) NAILS IN LAPPED AREA |
| TOP PLATE LAP <b>②</b> CORNERS <b>\$</b> INTERSECTING WALLS | (2) NAILS                | (2) NAILS                 |
|   |                          |                           |

\* 2½"x0.113 IS AN ACCEPTABLE ALTERNATIVE TO A 3"x0.120", SAME SPACING OR NUMBER OF NAILS. (ONLY ACCEPTABLE WHERE \* ARE SHOWN)

#### MEANS & METHODS NOTES

THE STRUCTURE IS DESIGNED TO BE SELF SUPPORTING AND STABLE AFTER THE BUILDING IS SPECIFICATIONS HAVE BEEN COMPLETED. IT IS THE CONTRACTOR'S SOLE RESPONSIBILITY TO DETERMINE THE ERECTION PROCEDURES AND SEQUENCE TO INSURE THE SAFETY OF THE BUILDING AND ITS COMPONENTS DURING CONSTRUCTION. THIS INCLUDES, BUT IS NOT LIMITED TO, THE ADDITION OF BRACING, GUYS, AND TIE-DOWNS, CONTRACTOR SHALL BE RESPONSIBLE FOR ALL SHORING AND BRACING REQUIRED TO STABILIZE AND PROTECT EXISTING AND ADJACENT STRUCTURES AND SYSTEMS DURING COURSE OF DEMOLITION AND CONSTRUCTION OF THE PROJECT.

STRUCTURAL DESIGN AND SPECIFICATIONS ASSUME THAT ALL SUPPORTING AND NON-SUPPORTING ELEMENT IN CONTACT WITH FLOOR FRAMING ARE LEVEL INCLUDING, BUT NOT LIMITED TO; FOUNDATIONS, SLABS ON GRADE, BEAMS, WALLS, AND NON-BEARING ELEMENTS. IT IS THE CONTRACTOR'S RESPONSIBILITY TO VERIFY LEVELNESS AND MAKE ADJUSTMENTS AS NECESSARY, INCLUDING CONSIDERATION OF THOSE AREAS THAT MAY BE WITHIN CONTRACTUAL, INDUSTRY OR WARRANTY TO FRANCES

#### ADDITIONAL NOTES FOR TRUSS & I-JOIST MANUFACTURER

ROOF TRUSS, FLOOR TRUSS AND ENGINEERED JOISTS SHALL BE DESIGNED TO MEET THE DIFFERENTIAL DEFLECTION CRITERIA BELOW, UNLESS IOTED OTHERWISE ON PLAN

TRUSSES/JOISTS SHALL BE DESIGNED SO THAT DIFFERENTIAL DEFLECTION BETWEEN ADJACENT PARALLEL TRUSSES/JOISTS OR GIRDER TRUSSES/FLUS BEAMS DO NOT EXCEED THE FOLLOWING:

- I/4" DEAD LOAD
- FLOOR TRUSSES, ATTIC TRUSSES, & I-JOISTS:
- 1/8" DEAD LOAD FLOOR TRUSSES & ATTIC TRUSSES ADJACENT TO
- FLOOR FRAMING BY OTHERS: LIMIT ABSOLUTE TRUSS DEFLECTION TO 3/16" DEAD LOAD. (NOT DIFFERENTIAL DEFLECTION)

#### GENERAL STRUCTURAL NOTES

- DESIGN IS BASED ON 2018 NORTH CAROLINA STATE BUILDING CODE:
- WOOD FRAME ENGINEERING IS BASED ON NDS, "NATIONAL DESIGN SPECIFICATION FOR WOOD CONSTRUCTION" - LATEST EDITION.

#### DESIGN LOADS:

ROOF DEAD = 7 PSF T.C., 10 PSF B.C.

LOAD DURATION FACTOR = 1.25

LIVE = 40 PSF (30 PSF @ SLEEPING AREAS) DEAD = 10 PSF (I-JOISTS & SOLID SAWN) (ADD'L IO PSF @ TILE)

LATERAL 120 MPH, EXPOSURE B. SEISMIC A/B.

2,000 PSF ASSUMED ALLOWABLE BEARING PRESSURE (TO BE VERIFIED BY BUILDER)

#### GENERAL FRAMING

- ALL TYP, NAIL FASTENER REQUIREMENTS ARE NOTED IN STANDARD CONNECTIONS TABLE OR ON PLANS. ALL NAILS SPECIFIED ARE MIN DIAMETER AND LENGTH REQUIRED FOR CONNECTION, ALL HANGER NAILS SHALL BE INSTALLED PER MANUFACTURER'S REQUIREMENTS FOR MAX CHARTED CAPACITY. NOTE: HANGERS USE COMMON NAIL DIAMETERS NOT TYPICAL FRAMING GUN NAILS.
- REFER TO FASTENING SCHEDULE TABLE R602.3(1) FOR ALL CONNECTIONS, TYP. U.N.O.
- EXT. & INT. BRG WALLS SHALL BE 2x4 OR 2x6 (AS SHOWN ON PLANS,
   I6" O.C. SPF OR SYP "STUD" GRADE LUMBER, OR BETTER, U.N.O. . WALLS OVER 12' TALL SHALL BE PER PLAN.
- ALL HEADERS, BEAMS & OTHER STRUCTURAL MEMBERS SHALL BE SPRICE-PINE-FIR #2 (SPE) OR SOUTHERN PINE #2 (SYP) LUMBER, OR BETTER (KILN-DRIED), ALL HEADERS HAVE BEEN DESIGNED BASED ON CALCULATED LOADS & SIZED ACCORDINGLY. CODE TABLES HAVE NOT BEEN USED.
- ALL NON-BEARING INTERIOR STUD WALLS SHALL BE CONSTRUCTED WITH 2x 'STUD' GRADE MEMBERS SPACED @ 16" O.C. (MAX. UN.O.) . HEADERS IN NON-LOAD BEARING WALLS SHALL BE:
- (I)2x4/6 FLAT @ OPENINGS UP TO 4', (2)2x4/6 FLAT UP TO 8' ALL FRAMING LUMBER SHALL BE DRIED TO 15% MC (KD-15).
- ENGINEERED LUMBER BEAMS TO MEET OR EXCEED THE FOLLOWING
- 'LSL' Fb=2325 psi; Fv=3i0 psi; E=1.55xi0^6 psi
- 'LVL' Fb=2600 psi; Fv=265 psi; E=2.0x10^6 psi 'PSL' - FB=2400 PSI; FV=240 PSI; E=2.0XIO^6 PSI
- M+K SHALL BE FILLY INDEMNIFIED FOR ANY AND ALL ISSUES OWNER DOES NOT SUBMIT THE COMPONENT SHOP DRAWINGS TO M+K FOR STRUCTURAL REVIEW PRIOR TO FABRICATION, DELIVERY, OR INSTALL ATION.
- FOR 2 \$ 3 PLY BEAMS OF EQUAL WIDTH, FASTEN PLIES TOGETHER WITH 3 ROWS OF 3"x0.120" NAILS @ 8" O/C OR 2 ROWS 1/4"x31/5" SIMPSON SDS SCREMS (OR 3½" TRUSSLOK SCREMS) & 16" O/C. USE A MINIMUM OF 3 ROMS FOR BEAM DEPTHS OF 14" OR GREATER. APPLY FASTENING AT BOTH FACES FOR 3-PLY CONDITION, LOCATE TOP & BOTTOM NAIL S/SCREWS 2" FROM FDGE SOLID 3 K" OR 5 K" BEAMS ARE ACCEPTABLE. USE 2 ROWS OF NAILS FOR 2x6 \$ 2x8 MEMBERS.
- FOR 4 PLY BEAMS OF EQUAL WIDTH, FASTEN PLIES TOGETHER WITH 3 ROMS OF  $\frac{1}{4}$ "x6" SIMPSON SDS SCREMS (OR 6  $\frac{3}{4}$ " TRUSSLOK SCREMS) • 16" O/C. USE A MINIMUM OF 4 ROMS FOR BEAM DEPTHS OF 14" OR GREATER, APPLY FASTENING AT BOTH FACES (ONE SIDE ONLY FOR TRUSSLOK SCREWS). LOCATE TOP AND BOTTOM SCREWS 2" FROM EDGE. A SOLID 7" BEAM IS ACCEPTABLE
- ALL HEADERS SHALL BE SUPPORTED BY (1)2x JACK STUD & (1)2x KING STUD, MINIMUM.
- THE NUMBER OF STUDS SPECIFIED AT A SUPPORT INDICATES THE NUMBER OF JACK STUDS REQUIRED, U.N.O.,
- ALL MULTI-PLY STUDS TO BE FASTENED TOGETHER w/ 3"X0.131" NAILS @ 24" O.C. (MIN.), EACH PLY.
- PROVIDE SOLID BLOCKING IN FLOOR SYSTEM UNDER ALL POSTS CONTINUOUS TO FND/BEARING. BLOCKING TO MATCH POST ABOVE FASTEN 2x WOOD PLATES TO TOP FLANGE OF STEEL BEAMS WITH
- P.A.F.'s ('HILTI' X-CF PINS OR EQUAL) @ 16" O.C. STAGGERED, OR I/2" DIA. BOLTS @ 48" O.C. STAGGERED.
- ALL EXTERIOR 4x4 WOOD POSTS SHALL HAVE SIMPSON BCS2-2/4 CAP & ABW44Z BASE, U.N.O.

#### FLOOR FRAMING

- I-JOISTS/TRUSSES SHALL BE DESIGNED BY MANUF. TO MEET OR EXCEED L/480 LIVE LOAD DEFLECTION CRITERIA. (EXCLUDES MARBLE FLOORS - CONTACT MEK FOR MARBLE FLOOR DESIGNS)
- AT I-JOIST FLOORS, PROVIDE I 1/8" MIN. OSB RIM BOARD.
- METAL HANGERS SHALL BE SPECIFIED BY MANUFACTURER, U.N.O.
- FLOOR SHEATHING SHALL BE 23/32" A.P.A. RATED 'STURD-I-FLOOR' 24" O.C. EXPOSURE I (OR APPROVED EQUAL) WITH TONGUE AND GROOVE EDGES. FASTEN TO FRAMING MEMBERS W GLUE AND
- 2 1 x 0.131" NAILS @ 6"04. @ PANEL EDGES & @ 12"04. FIELD.
- 2 🖣 × 0.120" NAILS 4" O.C. PANEL EDGES € 8" O.C. FIELD. - 2 3" x 0.113" NAILS @ 3" O.C. @ PANEL EDGES & @ 6" O.C. IN FIELD.
- #6 x 2" MIN, SCREMS @ 6" O.C. @ PANEL EDGES & @ 12" O.C. FIELD.

#### ROOF FRAMING

- BAY WINDOWS & SHED ROOFS (UP TO 6' SPAN) CAN BE 2x4 OR 2x6 RAFTERS & CEILING JOISTS @ 16/24" O.C.
- FASTEN FACH ROOF TRUSS TO TOP PLATE W/ SIMPSON H2.5T CLIP (OR APPROVED EQUAL) • ALL BEARING POINTS. PROVIDE (2) H2.5T CLIPS AT 2-PLY GIRDER TRUSSES (3) H25T CLIPS AT 3-PLY GIRDER TRUSSES & ROOF BEAMS - AT ALL BEARING POINTS.
- METAL HANGERS SHALL BE SPECIFIED BY THE MANUFACTURER, U.N.O.
- ERECT AND INSTALL ROOF TRUSSES PER WTCA & TPI'S BCSI I-08 "GUIDE TO GOOD PRACTICE FOR HANDLING, INSTALLING & BRACING OF METAL PLATE CONNECTED WOOD TRUSSES."
- SUPPORT PORCH & SHORT SPAN ROOF TRUSSES (MAX 7' SPAN) W 2x4 LEDGER FASTENED TO:
  - RIM BOARD w/ (2) 3"x0.131" NAILS @ 16" O.C. MAX. (1-JOISTS) - TRUSS VERTICALS w/ (3) 3"x0.131" NAILS • 19.2" O.C. MAX. (FLOOR TRUSSES)
- ROOF SHEATHING SHALL BE 7/16" A.P.A. RATED SHEATHING 24/16 EXPOSURE I (OR APPROVED EQUAL). FASTEN TO FRAMING MEMBERS - W/ 2 ½" × 0.131" NAILS • 6"o.c. • PANEL EDGES € • 12" O.C. FIELD.
- w/ 2 3 × 0.120" NAILS 4"o.c. PANEL EDGES € 8" O.C. FIELD.
- W/ 2 3" x 0.113" NAILS @ 3"0.c. @ PANEL EDGES \$ @ 6" O.C. FIELD.

## VENEER LINTEL SCHEDULE

| SPAN<br>(MAX)     | HEIGHT OF VENEER<br>ABOVE LINTEL | Steel angle size |
|-------------------|----------------------------------|------------------|
| 3'-0"             | 20 FT. MAX                       | L3"x3"x/4"       |
| 6'-0"             | 3 FT. MAX                        | L3"x3"x/4"       |
|                   | I2 FT. MAX                       | L4"x3"x1/4"      |
|                   | 20 FT. MAX                       | L5"x3½"x¾"       |
| ð'-O"             | 3 FT, MAX                        | L4"x4"x¼" *      |
|                   | I2 FT. MAX                       | L5"x3½"x¾"       |
|                   | I6 FT. MAX                       | L6"x3%"x%"       |
| 4'-6"             | I2 FT. MAX                       | L6"x3%"x%"       |
| 16'-0"            | 2 FT. MAX                        | L7"x4"x½" **     |
|                   | 3 FT, MAX                        | L8"x4"x½" **     |
| 4.1.1. 1.15 tests | 1.6                              |                  |

## SHALL SUPPORT 2 3/8" - 3 1/2" VENEER W/ 40 paf MAXIMUM WEIGHT < 16' SHALL HAVE 4" MIN. BEARING

- = 16' SHALL HAVE 8" MIN, BEARING ( 16' SHALL NOT BE FASTENED BACK TO HEADER.
- 16' SHALL BE FASTENED BACK TO WOOD HEADER IN WALL @48"O. W/5" DIA. x 3 %" LONG LAG SCRENG IN 2" LONG VERTICALLY SLOTTED HOLES.
- MAX, VENEER HT. APPLIES TO ANY PORTION OF BRICK OVER THE
- ALL LINTELS SHALL BE LONG LEG VERTICAL.
  WHEN SUPPORTING VENEER < 3" WIDE THE EXTERIOR TOE OF THE HORIZONTAL LEG MAY BE CUT IN THE FIELD TO BE 3 1/2" WIDE OVER THE BEARING LENGTH ONLY. THIS IS TO ALLOW FOR MORTAR JOINT
- FINE-THIS.

  SEE STRUCTURAL PLANS FOR ANY LINTEL CONDITION NOT BICOMPASSED BY THE ABOVE PARAMETERS, FOR ANY LINTEL FASTENED BACK TO BEAM, FASTENERS SHALL MAINTAIN A 25' (MINIMAN) CLEAR DISTANCE ROYAL BOTTOM OF BEAM.
- FOR QUEEN VENEER USE L4x3x FOR 3%" VENEER ONLY, SEE PLAN FOR VENEER SUPPORT IF

SD2.I REFERS TO SD2.IA FOR LVL/PSL/LSL BEAMS OR SD2.IB FOR FLITCH BEAMS OR SD2.IC FOR STEEL BEAMS

### LATERAL BRACING & SHEAR WALL SHEATHING SPECIFICATIONS

THIS MODEL HAS BEEN DESIGNED TO RESIST LATERAL FORCES RESULTING FROM: 20 MPH WIND IN 2018 NCSBC:RO

(120 MPH WIND SPEED IN ASCE 7-10 WIND MAP, PER IRC R301211) EXP. B, RISK CAT. 2 & SEISMIC CAT. A/B.

THE DESIGN WAS COMPLETED PER 2015 IBC (SECTION 1609) & ASCE 7-10, AS PERMITTED BY R30113 OF THE 2018 NOSEC-RC OR THE SIMPLIFIED PRESCRIPTIVE PROCEDURE IN ACCORDANCE WITH THE 2015 IRC IF THE PARAMETERS OF SECTION R602.12 COMPLY ACCORDINGLY, THIS MODEL, AS DOCUMENTED AND DETAILED HEREWITHIN, IS ADEQUATE TO RESIST THE CODE REQUIRED LATERAL FORCES.

DESIGN WIND UPLIFT LOADS HAVE BEEN CALCULATED UTILIZING ASCE 7-10 (ACCEPTED ENGINEERING PRACTICE) AS ALLOWED PER 2018 NCSBC:RC SECTION R802.II.I. THIS MODEL HAS BEEN DETAILED WHERE REQUIRED & ENGINEERED TO RESIST THE WIND UPLIFT LOAD PATH PER SECTIONS R602 3 5& R802 II

#### EXT. WALL SHEATHING SPECIFICATION

- 1/16" OSB OR 15/32" PLYWOOD: FASTEN SHEATHING W 2 3/8"x0.II3" NAILS @ 6" O.C. AT EDGES \$ @ 12" O.C. IN THE PANEL FIELD. TYP, UN.C.
- HORIZONTAL BLOCKING OF EXT. WALL/SHEAR WALL PANEL EDGES IS NOT REQUIRED BY THIS DESIGN EXCEPT FOR THOSE AREAS SPECIFICALLY NOTED.
- ALL EXT. WALLS SHALL BE CONTINUOUSLY SHEATHED AND ARE CONSIDERED SHEAR WALLS.
- ・ALT. STAPLE CONNECTION SPEC: 1 名" 16 GA STAPLES (1/6" CROWN) @ 3" O.C. AT EDGES & @ 6" O.C IN FIELD.

#### BLOCKED PANEL EDGES

AT DESIGNATED AREAS - FASTEN SHEATHING w/ 2 3/8" x 0.113" NAILS @ 6" O.C. AT ALL PANEL EDGES AND 12" O.C. IN THE PANEL FIELD OR 1 3/4" 16 GA STAPLES (1/6" CROWN) @ 3" O.C. AT EDGES & @ 6 O.C IN FIELD, ALL SHEATHING PANELS SHALL BE ORIENTED AND INSTALLED FULL HEIGHT OF SHEAR WALL OR 2x HORIZONTAL BLOCKING SHALL BE PROVIDED TO SUPPORT ALL UNSUPPORTED PANEL EDGES & EDGE FASTENING.

#### 3" O.C. EDGE NAILING

AT DESIGNATED AREAS - FASTEN PANEL EDGES OF WOOD STRUCTURAL WALL SHEATHING TO FRAMING W 8d NAILS @ 3" O.C. NO STAPLE ALTERNATIVE AVAILABLE AT THIS SPEC, ALL SHEATHING PANELS SHALL BE ORIENTED AND INSTALLED FULL HEIGHT OF SHEAR WALL OR 2x HORIZONTAL BLOCKING SHALL BE PROVIDED TO SUPPORT UNSUPPORTED PANEL EDGES AND 3" O.C. EDGE FASTENING

- SEE CONNECTION SPECIFICATIONS CHART FOR STANDARD SHEAR TRANSFER DETAILING, IF ADDITIONAL CAPACITY IS REQUIRED BY DESIGN. IT WILL BE SPECIFICALLY NOTED ON PLAN.
- \* DESIGN ASSUMES 16" O.C MAX. STUD SPACING, U.N.O.
- ALL STRUCTURAL PANELS ARE TO BE DIRECTLY APPLIED TO STUD FRAMING
- <u>PRE-MANUFACTURED PANELIZED WALLS:</u> FASTEN TOGETHER END STUDS OF WALL PANELS SHEATHED W/ OSB OR PLYWOOD W/ 3" x 0.120" NAILS @ 4" O.C. (THRU ONE SIDE ONLY)

INDICATES EXTENT OF INT. OSB SHEARWAL OR 3" O.C. OSB SHEARWALL.

► INDICATES HOLDOWN BELOW

### GENERAL STRUCTURAL NOTES

#### **FOUNDATION**

- DESIGN IS BASED ON 2018 NORTH CAROLINA STATE BUILDING CODE: RESIDENTIAL CODE.
- FOOTING DESIGN 2,000 PSF ALLOWABLE SOIL BEARING PRESSURE IS ASSUMED, BUILDER/CONTRACTOR MUST VERIFY.
- FASTEN 2x SILL PLATES TO FND WITH A MINIMUM OF 2 ANCHORS PER PLATE, 12" MAX, FROM PLATE ENDS - UTILIZING
- 1/2" DIA. ANCHOR BOLTS 6'-0" O.C, 7" MIN. EMBEDMENT (CONC), 15" MIN, EMBEDMENT (CMU)
- SIMPSON MASA ANCHOR STRAPS @ 6'-0" O.C. (CONC)
- SIMPSON MAB23 ANCHOR STRAPS 2'-8" O.C. (CMU) (REFER TO DETAILS FOR IO' TALL WALL ANCHOR REQUIREMENTS)
- ALL LUMBER EXPOSED TO WEATHER OR IN CONTACT W CONCRETE OR CMU SHALL BE PRESERVATIVE TREATED SOUTHERN PINE #2.
- BUILDER TO VERIEY CORROSION-RESISTANCE COMPATIBILITY OF HARDWARE & FASTENERS IN CONTACT W/ PRESERVATIVE-TREATED WOOD, CONTACT LUMBER & HARDWARE SUPPLIERS TO COORD.
- BASEMENT INTERIOR BEARING WALLS & EXTERIOR WALK-OUT BASEMENT WALLS SHALL BE 2x6 € 16" O.C. SPF OR SYP, "STUD" GRADE OR BETTER.
- CONCRETE DESIGN BASED ON ACI 318, CONCRETE SHALL ATTAIN THE FOLLOWING MIN. COMPRESSIVE STRENGTHS IN 28 DAYS, U.N.O.: 4,000 psi: ...... FOUNDATION WALLS 2,500 psi: ...... FOOTINGS & INTERIOR SLABS ON GRADE
- 3,000 psi: ...... GARAGE & EXTERIOR SLABS ON GRADE 60,000 psi
- BASEMENT FOUNDATION WALL DESIGN BASED ON:
- 9' OR 10' HEIGHT (AS NOTED ON PLANS) - TALLER WALLS MUST BE ENGINEERED.
- NOMINAL WIDTH (91/3" FOR 10" THICK WALL).
- BASEMENT WALL DESIGN IS BASED ON 60 PCF BACKFILL SOIL TYPE CLASSIFICATIONS (SC, ML-CL, OR CL).
- BASEMENT WALLS SHALL BE BRACED PRIOR TO BACKELLING BY ADEQUATE TEMPORARY BRACING OR INSTALL IST FLOOR DECK.
- PROVIDE (2) #5 BARS AROUND ALL SIDES OF OPENINGS IN CONCRETE BSMT. FND. WALL WITH 2" CLEAR. REINFORCEMENT SHALL EXTEND 12" PAST CORNER OF OPENING IN ALL DIRECTIONS.
- FOR OPENINGS UP TO 36", PROVIDE MINIMUM 10" CONCRETE DEPTH OVER OPENING OR (3)2x10 w/ (2)2x6 JACK STUDS, U.N.O
- LARGER OPENINGS SHALL BE PER PLAN. • ALL CONCRETE EXPOSED TO THE WEATHER SHALL NOT HAVE LESS
- THAN 5% OR MORE THAN 7% AIR ENTRAINMENT ALL FOOTINGS SHALL BEAR AT LEAST 12" BELOW FINISH GRADE.
- FOOTINGS AND SLABS ON GRADE SHALL BEAR ON VIRGIN SOIL OR 95% COMPACTED FILL.
- \* PROVIDE CONTROL JOINTS AT ALL INSIDE CORNERS OF SLAB EDGES, AND OTHER LOCATIONS WHERE SLAB CRACKS ARE LIKELY TO DEVELOP.
  - JOINTS SHALL BE LOCATED 10'-0" O.C. (RECOMMENDED) OR 15'-O" OC (MAXIMUM)
  - JOINT GRID PATTERN SHALL BE AS CLOSE TO SQUARES AS POSSIBLE (I.I RATIO), WITH A MAXIMUM OF I.I.5 RATIO · CONTROL JOINTS SHALL NOT BE INSTALLED IN STRUCTURAL
- CONCRETE MASONRY UNITS (CMU) SHALL BE ASTM C90 WITH A MIN. COMPRESSIVE STRENGTH OF 1900 psi (Fim=1500 psi). MORTAR SHALL BE ASTM C270, TYPE 5. CMU DESIGN PER ACI 530 \$ 530.I.
- CMU FOUNDATION WALLS SHALL HAVE 'DUR-O-WALL' HORIZONTAL JOINT REINFORCEMENT (OR EQUAL) - 9 GA. MINIMUM @ 16" O.C.
- PROVIDE 2x6 (MIN.) x 16" LONG P.T. PLATE ON TOP OF ALL CRAWL SPACE PIERS. ALL PIERS SHALL BE FASTENED PER ANCHORAGE SPECIFICATIONS NOTED ABOVE. TOP 2 COURSES (MIN.) OF PIER TO BE GROUTED SOLID (8 COURSE MAX, PIER HEIGHT).
- PROVIDE 2x6 P.T. PLATE ON INTERIOR CRAWL SPACE WALLS, FASTENED PER ANCHORAGE SPECIFICATION NOTED ABOVE. TOP 2 COURSES (MIN.) OF WALL TO BE GROUTED SOLID (8 COURSE MAX. WALL HEIGHT)
- \* DIMENSIONS BY OTHERS, BUILDER TO VERIFY.
- BUILDER TO VERIFY THAT MODEL HAS BEEN ADEQUATELY TREATED BY A LICENSED AND BONDED PEST CONTROL COMPANY FOR BE DETERMINED BY PEST CONTROL COMPANY.

## HOLD-DOWN SCHEDULE

| 5YMBOL | SPECIFICATION  |
|--------|--|
| ► HD-I | SIMPSON HTT4 HOLD-DOWN * (%" DIA. ANCHOR)  |
| HD-2   | SIMPSON MSTC66 STRAP TIE (CENTER STRAP ON FLOOR<br>SYSTEM UN.O.) -OR- MSTC66B3 ALTERNATE |
| ▶ нр-з | SIMPSON STHDI4/STHDI4RJ  |

\* UTILIZE THE SSTB24 ANCHOR BOLT @ ALL MONOSLAB & INTERIOR RAISED SLAB (I.E. THICKENED SLABS, FOOTINGS) CONDITIONS, MINIMUM 24" MIN. OOTING THICKNESS REQUIRED.

EPOXY-SET ALTERNATE FOR MONOSLAB & INTERIOR RAISED SLAB CONDITIONS ONLY: UTILIZE SIMPSON 'SET' EPOXY SYSTEM TO FASTEN
THREADED ROD INTO CONCRETE FOUNDATION, PROVIDE 10" (FOR 5/8" DIA.) OR 15" (FOR 7/8" DIA.) MIN. EMBEDMENT INTO CONCRETE, INSTALL PER MANUF, INSTRUCTIONS, MINIMUM 16" FOOTING THICKNESS REQ'D.

DO NOT LOCATE ANCHORS WITHIN I 3/4" OF EDGE OF CONCRETE

al: 7/24/25 CAR NOFESSIO, O'

SEPH T. R



l&K project numbe 126-2306

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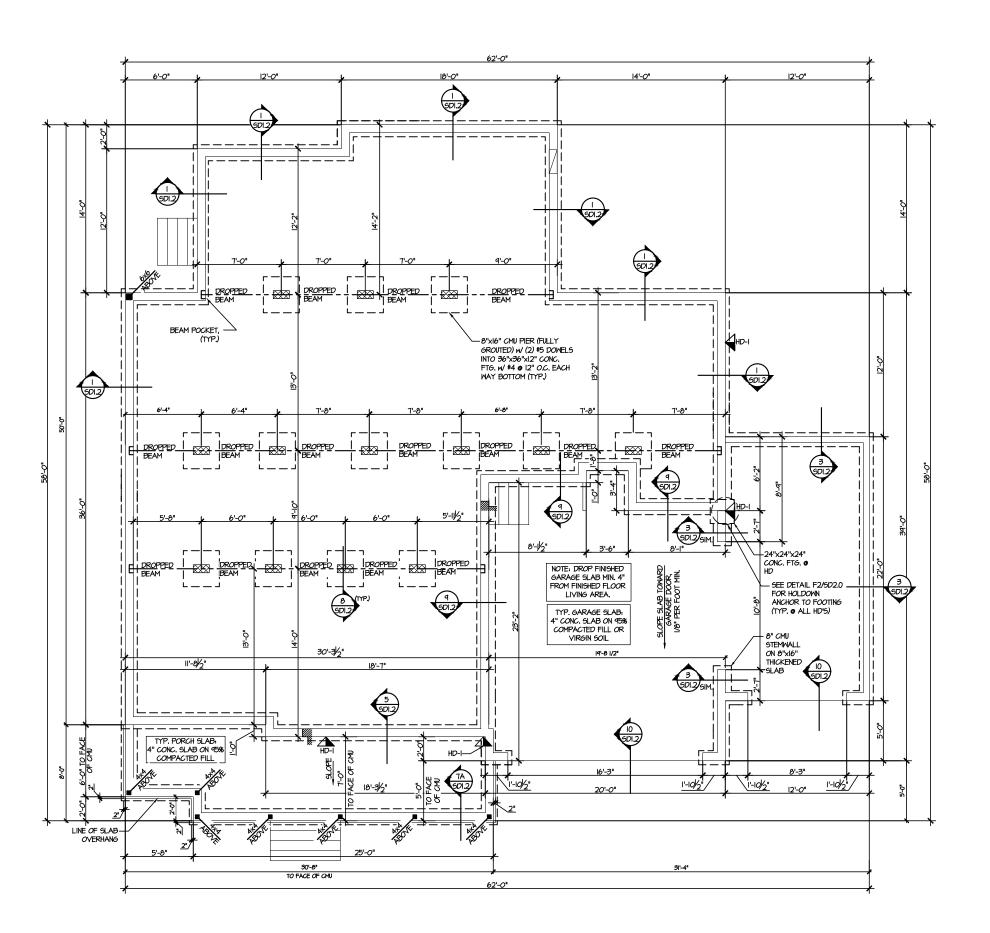
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M&K project number 126-2306

JTR drawn by: issue date: 07-24-25

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BLAKE POND COMMUNIT Lot 72 - Stonefield 7 Raleigh, nc

OUNDATION PL

JL METAL HANGER

\* INDICATES POST ABOVE. PROVIDE SOLID BLOCKING UNDER POST OR JAMB ABOVE.

== INDICATES SHEAR WALL & EXTENT • EXTENT OF OVERFRAMING

LEGEND

• INTERIOR BEARING WALL

● □===□ BEARING WALL ABOVE • ---- BEAM / HEADER

INDICATES HOLD-DOWN OR STRAP. REFER TO SCHEDULE.

TYPICAL STRUCTURAL NOTES & SCHEDULES

REFER TO SO.O FOR

CRAWL SPACE FOUNDATION PLAN SCALE. 1/8'=1'-0'

IST FLOOR FRAMING PLAN SCALE: 1/8"=1'-0"

#### LEGEND

- IIIIIIII INTERIOR BEARING WALL
- □===□ BEARING WALL ABOVE
- ---- BEAM / HEADER
- = = INDICATES SHEAR WALL & EXTENT
- EXTENT OF OVERFRAMING
- JL METAL HANGER
- \* INDICATES POST ABOVE. PROVIDE SOLID BLOCKING UNDER POST OR JAMB ABOVE.
- INDICATES HOLD-DOWN OR STRAP. REFER TO SCHEDULE.

REFER TO SO.O FOR TYPICAL STRUCTURAL NOTES & SCHEDULES

ENGINEERED BEAM MATERIAL SCHEDULE PSL OPTION STEEL OPTION LSL OPTION FLITCH OPTION (2)2xl2 + (I) %"xIK" STEEL FLITCH PLATES - D 3%"xl6" - D N/A WI2xI4 - D (2)2xl2 + (I) ¼\*xll¼\* STEEL FLITCH PLATES - D 3½"xII%" - D (3)134"x1136" - D W12x14 - D (2)2x12 + (1) ¼"xI¼" STEEL FLITCH PLATES - F (2)13/4"x14" - F WI2xI4 - F (2)2xl2 + (I) %"xl以" STEEL FLITCH PLATES - F (3)13/4"x14" - F WI2xI4 - F

(3)2xl2 + (2) ¼"xll¼" STEEL FLITCH PLATES - D

(2)2xl2 + (I) ¼"xll¼" STEEL FLITCH PLATES - F

W12x14 - D

WI2xI4 - F

003 (2)134"x14" - F 004 (2)13/4"x14" - F 3½"x14" - F (3)2x12 + (2) %"x114" STEEL FLITCH PLATES - F 005 (3)13/4"x18" - FT WI2x26 - F 5½"xi8" - FT 006 (3)13/4"x18" - FT NΑ WI2x26 - F 5¼"xl8" - FT (2)2xl2 + (I) ¼"xll¼" STEEL FLITCH PLATES - F 001 (2)13/4"x14" - F 3½"xl4" - F (2)13/4"×14" - F (2)2xl2 + (I) ¼"xll¼" STEEL FLITCH PLATES - F 008 (2)13/4"×14" - F 3½"x14" - F (2)|3/4"x|4" - F WI2xI4 - F (2)2x10 + (1) ¼"x4¼" STEEL FLITCH PLATES - D 009 (2)134"×944" - D MIOxI2 - D (2)134"×94" - D 3K"x9¼" - D (3)2xl2 + (2) 火"xlik" Steel Flitch Plates - H 010 (2)134"x16" - H 3½"x16" - H N/A (2)2x12 + (1) ¼"xII¼" STEEI FLITCH PLATES - D OII (2)134"x1136" - D 3½"xII%" - D (3)134"x1136" - D W12x14 - D (3)2xi2 + (2) ½"xil¼" STEEL FLITCH PLATES - D 012 (4)|%"x|6" - D (3)134"x16" - D 5½"x16" - D WI2xI9 - D (2)2xl2 + (l) ¼"xll¼" STEEL FLITCH PLATES - D 013 (2)13/4"×113/4" - D 3½"xII%" - D (3)13/4"x113/4" - D WI2xI4 - D (3)2x12 + (2) %"x114" STEEL FLITCH PLATES - D (2)13/4"x16" - D (3)13/4"x16" - D WI2xI4 - D 3½"x16" - D

(3)134"x1136" - D

(3)134"x1136" - F

(3)134"x1136" - D

(2)134"×1136" - F

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LVL OPTION

(2)13/4"x16" - D

(2)134"x1136" - D

001

002

- BEAM NOTATION: "F" INDICATES FLUSH BEAM
- "FT" INDICATES FLUSH TOP BEAM "FB" INDICATES FLUSH BOTTOM BEAM
- "D" INDICATES DROPPED BEAM

PLATES IN SUCCESSION w/ (2) 3"x0.120" NAILS . 8" O.C.

N/A

3½"xII%" - F

- "p" INDICATES DROPPED BEAM
   "IN" INDICATES DROPPED OPENING HEADER
  REFER TO DETAIL DYSD2.0 FOR TYPICAL FLITCH BEAM CONNECTIONS
  REFER TO DETAIL DYSD2.0 FOR TYPICAL STEEL BEAM CONNECTIONS
  REFER TO DETAIL BYSD2.0 FOR TYPICAL STEEL BEAM CONNECTIONS
  FOR FLUSH TOP BEAMS PROVIDE 2X STACKED PLATES BENEATH BEAM AS REQ'D, FASTEN
  PLATES IN SUCCESSION W (2) 3"X01.20" NAILS 0" 8" O'C.
  FOR FLUSH BOTTOM BEAMS PROVIDE 2X STACKED PLATES ATOP BEAM AS REQ'D, FASTEN
  TATES ATOP BEAM AS REQ'D. FASTEN
  THE ATTER STACKED PLATES ATOP BEAM AS REQ'D. FASTEN
- \*\*\* SEE PLAN FOR EXTENT OF 3-PLY BEAM

MULHERN+KUL RESIDENTIAL STRUCTURAL ENGINEERI

al: 7/24/25

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SEPH T. R

l&K project number:

126-2306 roject mgr: **JTR** 

frawn by: issue date: 07-24-2

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OR

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SD2.I REFERS TO SD2.IA FOR LVL/PSL/LSL BEAMS OR SD2.IB FOR FLITCH BEAMS OR SD2.IC FOR STEEL BEAMS

#### LEGEND

- INTERIOR BEARING WALL
- □===□ BEARING WALL ABOVE
- ---- BEAM / HEADER
- = = INDICATES SHEAR WALL & EXTENT
- EXTENT OF OVERFRAMING
- \* INDICATES POST ABOVE, PROVIDE SOLID BLOCKING UNDER POST OR JAMB ABOVE.
- INDICATES HOLD-DOWN OR STRAP. REFER TO SCHEDULE.

REFER TO SO.O FOR TYPICAL STRUCTURAL NOTES & SCHEDULES

#### LVL OPTION STEEL OPTION PSL OPTION LSL OPTION FLITCH OPTION 2)2x12 + (1) %"xIK" STEEL FLITCH PLATES - D (2)|%"x|6" - D 3%"x16" - D N/A WI2vI4 - D (2)2xi2 + (i) 以"xi以" STEEL FLITCH PLATES - D (2)13/4"x113/4" - D (3)134"x1134" - D WI2xI4 - D 3%"xII%" - D (2)2xi2 + (i) ¼\*xi¼\* Steel Flitch Plates - F (2)13/4"×14" - F (2)13/4"×14" - F WI2xI4 - F 3½"xl4" - F (2)2x12 + (1) %"x114" STEE1 FLITCH PLATES - F (2)134"x14" - F 3½"x|4" - F (3)13/4"×14" - F (3)2xl2 + (2) %"xll4" STEEL FLITCH PLATES - 1 (3)13/4"x18" - FT 5½"vi8" - FT N/A (3)2xl2 + (2) %"xll4" STEEL FLITCH PLATES - F (3)134"×18" - FT 5¼"xi8" - FT N/A (2)2xi2 + (i) 从"xi以" STEEL FLITCH PLATES - F (2)13/4"x14" - F (2)13/4"x14" - F 3½"xl4" - F

ENGINEERED BEAM MATERIAL SCHEDULE

003 004 WI2xl4 - F 005 WI2x26 - F 006 WI2x26 - F 001 WI2xI4 - F (2)2xl2 + (I) 从"xll以" STEEI FLITCH PLATES - F 008 (2)1¾"x14" - F (2)13/4"×14" - F 3½"x|4" - F (2)2x10 + (1) ¼"x4¼" STEE FLITCH PLATES - D 009 (2)13/4"x91/4" - D (2)|%"xq\s" - D WIOxI2 - D 3%"x9%" - D (3)2xi2 + (2) 点"xii以" STEEL FLITCH PLATES - H 010 (2)13/4"x16" - H (3)13/4"×16" - + N/Α 3/5"x16" - H (2)2x12 + (1) ¼\*x1¼\* STEE1 FLITCH PLATES - D (2)134"x1136" - D (3)134"x1136" - D WI2xI4 - D 3½"xII%" - D 3)2xl2 + (2) ½"xll½" STEEL FLITCH PLATES - D 012 (3)13/4"x16" - D (4)13/4"x16" - D (2)2xi2 + (i) 从"xii以" STEEL FLITCH PLATES - D 013 (2)13/4"x117/4" - D 兆"x||%" - D (3)13/4"x113/4" - D WI2xI4 - D 3)2xi2 + (2) %"xilk" Steel Flitch Plates - D 014 (2)134"x16" - D (3)134"x16" - D WI2xI4 - D 3½"x16" - D (3)2x12 + (2) ¼"x11¼" STEEL FLITCH PLATES - D

(3)1¾"x11%" - D

(3)134"x11%" - F

(2)2xl2 + (I) 从"xlik" STEEL FLITCH PLATES - F

WI2xI4 - F

016

001

002

(3)1¾"x11¾" - D

(2)134"x1136" - F

- BEAM NOTATION:
   "F" INDICATES FLUSH BEAM
   "FT" INDICATES FLUSH TOP BEAM
   "FB" INDICATES FLUSH BOTTOM BEAM

3½"xII%" - F

- "D' INDICATES DROPPED BEAM
   "H" INDICATES DROPPED OPENING HEADER
  REFER TO DETAIL D/SD2.0 FOR TYPICAL FLITCH BEAM CONNECTIONS
- REFER TO DETAIL E/SD2.0 FOR TYPICAL STEEL BEAM CONNECTIONS FOR FLUSH TOP BEAMS PROVIDE 2X STACKED PLATES BENEATH BEAM AS REQ'D. FASTEN
- PLATES IN SUCCESSION W (2) 3"XO.120" NAILS @ 8" O.C. FOR FLUSH BOTTOM BEAMS PROVIDE 2x STACKED PLATES ATOP BEAM AS REQ'D. FASTEN PLATES IN SUCCESSION w/ (2) 3"x0.120" NAILS • 8" O.C.
- \*\*\* SEE PLAN FOR EXTENT OF 3-PLY BEAM

SEPH T. R

CAR

al: 7/24/25

MULHERN+KUL RESIDENTIAL STRUCTURAL ENGINEERI

l&K project number 126-23061

**JTR** rawn by:

ssue date: 07-24-2 FVISIONS

initial:

POND COMMUNIT Stonefield 7 . NC LOT 72 - S RALEIGH, BLAKE 1 OT 72 - §  $\overline{O}$ 

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MULHERN+KUL
RESIDENTIAL STRUCTURAL ENGINEERI

M&K project number: 126-23061

JTR drawn by: **GTK** issue date: 07-24-2

initial:

ROOF FRAMING

LEGEND

• == INDICATES SHEAR WALL & EXTENT EXTENT OF OVERFRAMING

\* INDICATES POST ABOVE, PROVIDE SOLID BLOCKING UNDER POST OR JAMB ABOVE.

REFER TO SO.O FOR TYPICAL STRUCTURAL NOTES & SCHEDULES

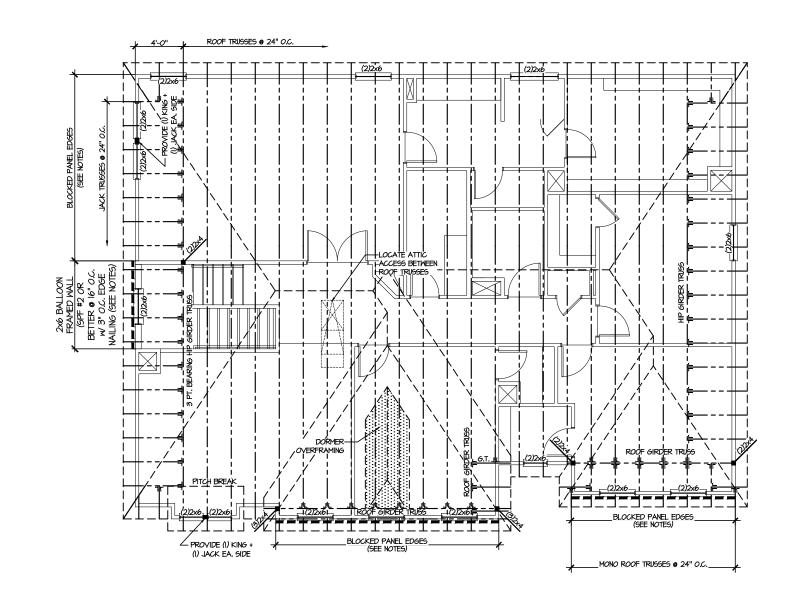
INDICATES HOLD-DOWN OR STRAP. REFER TO SCHEDULE.

INTERIOR BEARING WALL

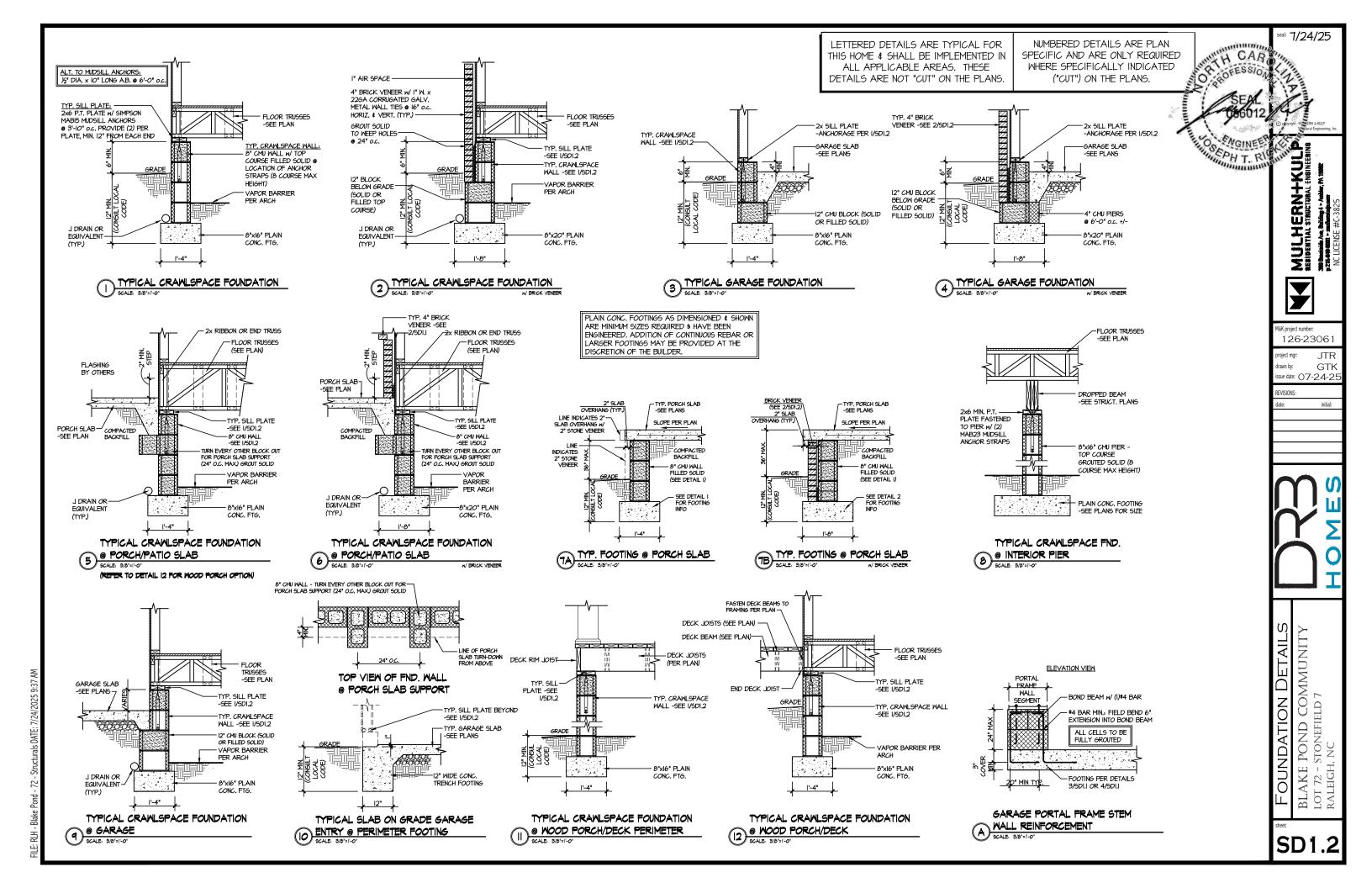
● □===□ BEARING WALL ABOVE BEAM / HEADER

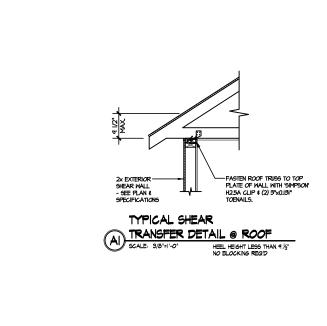
JL METAL HANGER

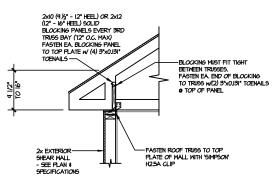
BLAKE POND COMMUNITY LOT 72 - STONEFIELD 7 RALEIGH, NC



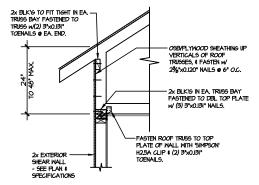




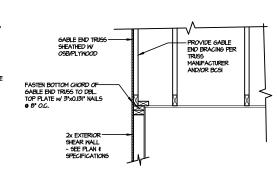




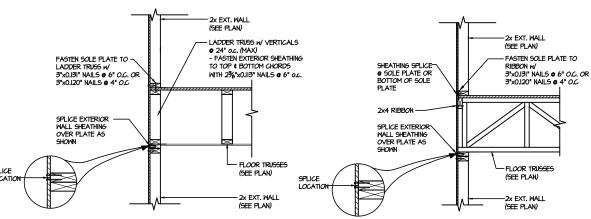
## TYPICAL SHEAR TRANSFER DETAIL @ ROOF SCALE: 9/8"=1"-0" HEEL HEIGHT BETWEEN 9. HEEL HEIGHT BETWEEN 9½" - 16" BLOCKING REQ'D





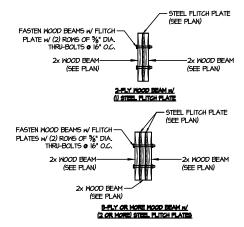




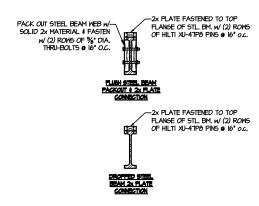




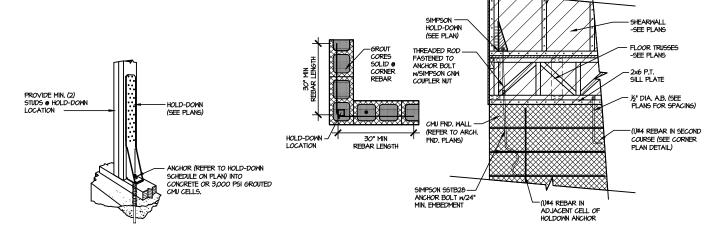








TYPICAL STEEL BEAM CONNECTION DETAIL



TYPICAL HOLD DOWN INSTALLATION

TYPICAL CORNER FOUNDATION HOLD-DOWN INSTALLATION

LETTERED DETAILS ARE TYPICAL FOR THIS HOME & SHALL BE IMPLEMENTED IN ALL APPLICABLE AREAS. THESE DETAILS ARE NOT "CUT" ON THE PLANS.

NUMBERED DETAILS ARE PLAN SPECIFIC AND ARE ONLY REQUIRED WHERE SPECIFICALLY INDICATED ("CUT") ON THE PLANS.

BLAKE POND COMMUNIT Lot 72 - Stonefield 7 Raleigh, nc DETAILS Ŋ

eal: 7/24/25

MULHERN+KULP
RESIDENTIAL STRUCTURAL ENGINERRINS

1&K project number 126-23061

issue date: 07-24-2

frawn by:

REVISIONS

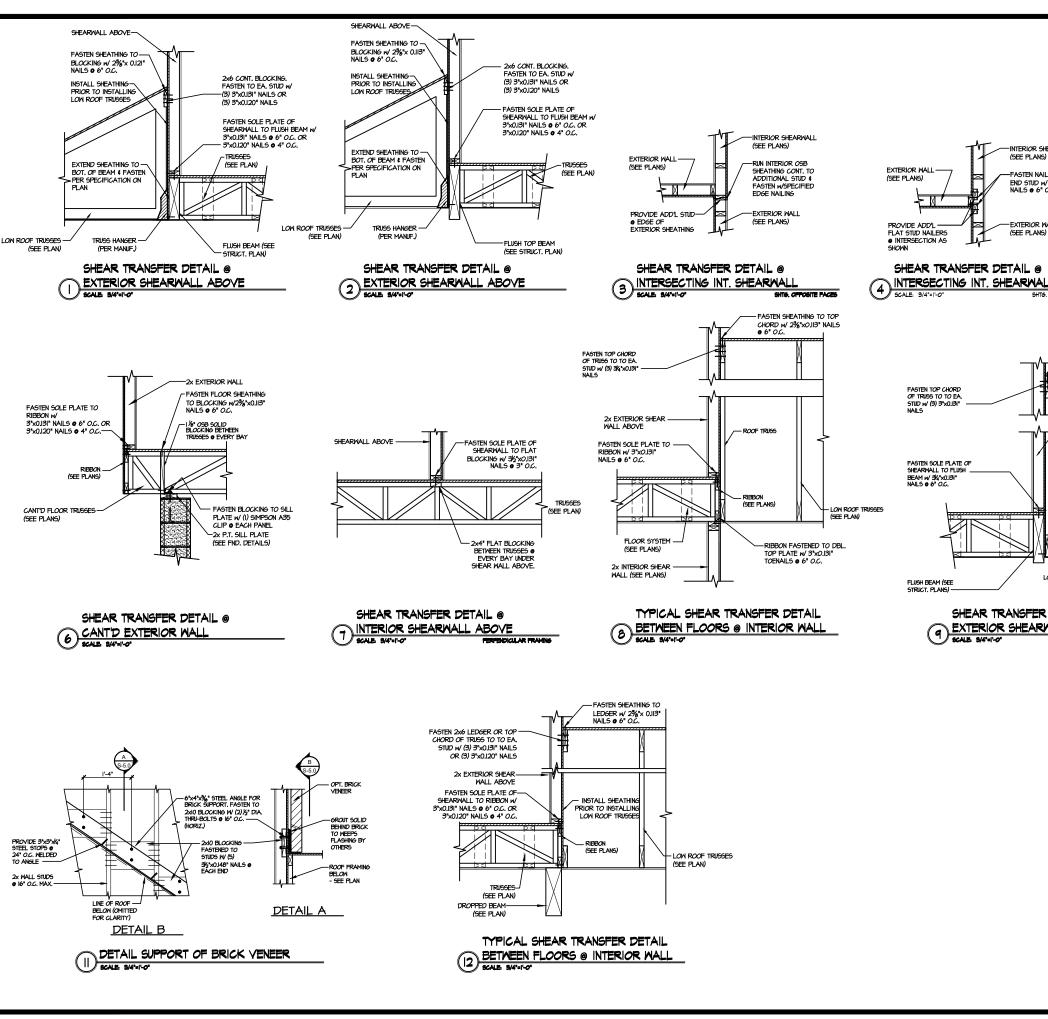
**JTR** 

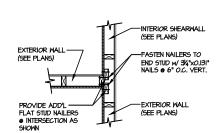
GTK

initial:

TH CAR

SEPH T. R





RIBBON (SEE PLANS) CANT'D TRUSSES (SEE PLANS)

- FASTEN SHEATHING TO TOP

TYP, SHTG. SPLICE

SHEAR TRANSFER DETAIL BETWEEN

FLOORS @ CANT'D EXT. WALL

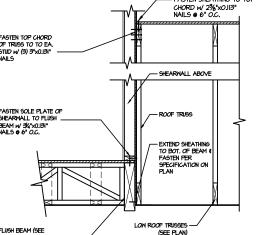
- FASTEN FI COR SHEATHING

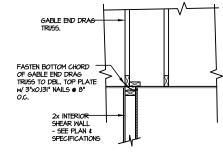
2%"x0.113" NAIL5 € 6" O.C.

- FASTEN OSB BLOCKING TO DBL. TOP PLATE W (I) SIMPSON A35 CLIP @ EACH PANEL

-2x EXTERIOR WALL

- 1 1/8" OSB SOLID BLOCKING BETWEEN TRUSSES @ EVERY BAY





SHEAR TRANSFER DETAIL @ EXTERIOR SHEARWALL ABOVE

INTERIOR GABLE END DETAIL

BLAKE POND COMMUNI Lot 72 - Stonefield 7 raleigh, nc 'AIL Ü

eal: 7/24/25

ERN+KULP STRECTURAL ENGINEERING

MULTI RESPENTALS

M&K project number

roject mgr:

frawn by:

FVISIONS

126-23061

issue date: 07-24-2

**JTR** 

GTK

initial:

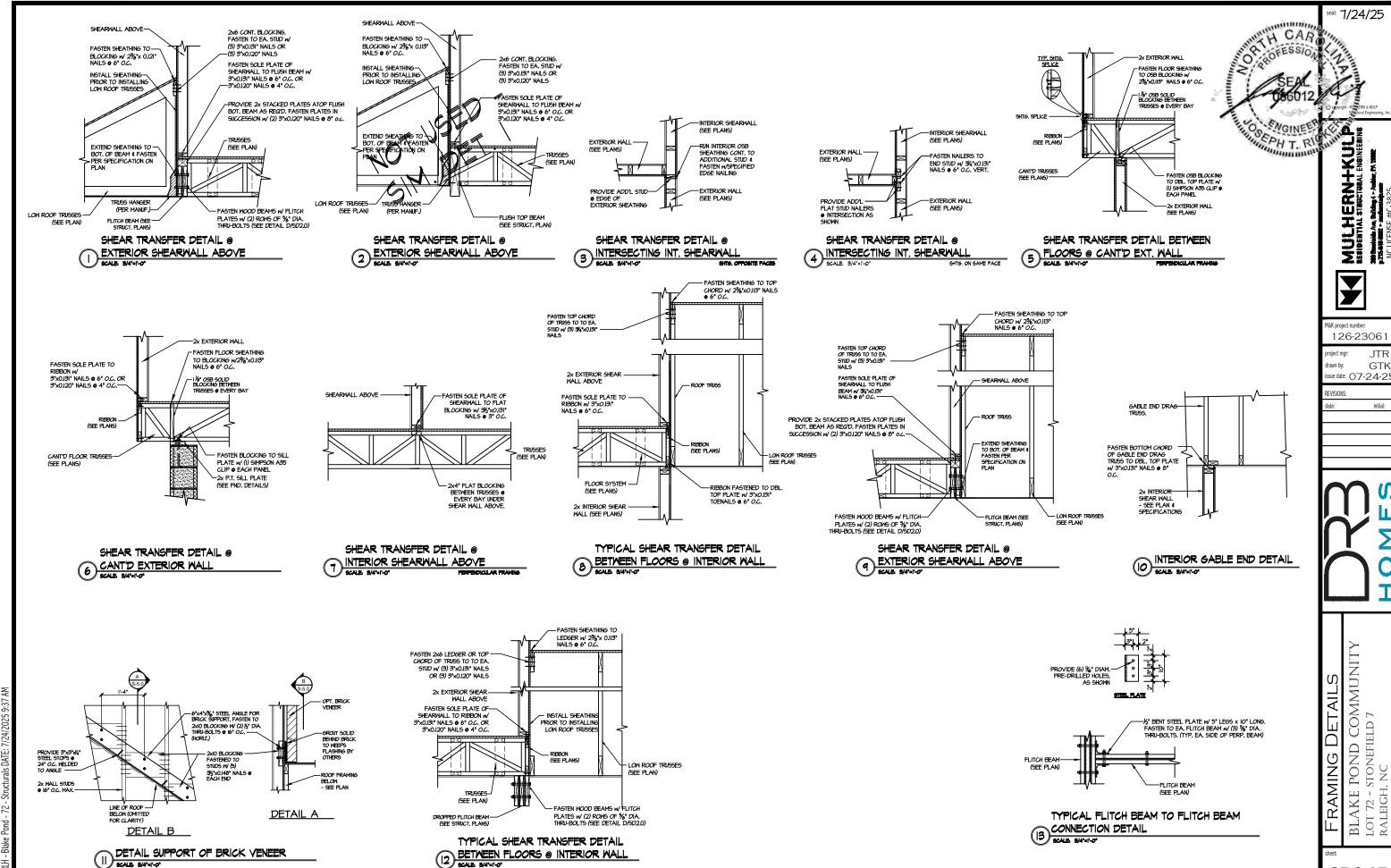
TH CAR

Y ROFESSION

SEPHT. R

OR.

SD2.1A

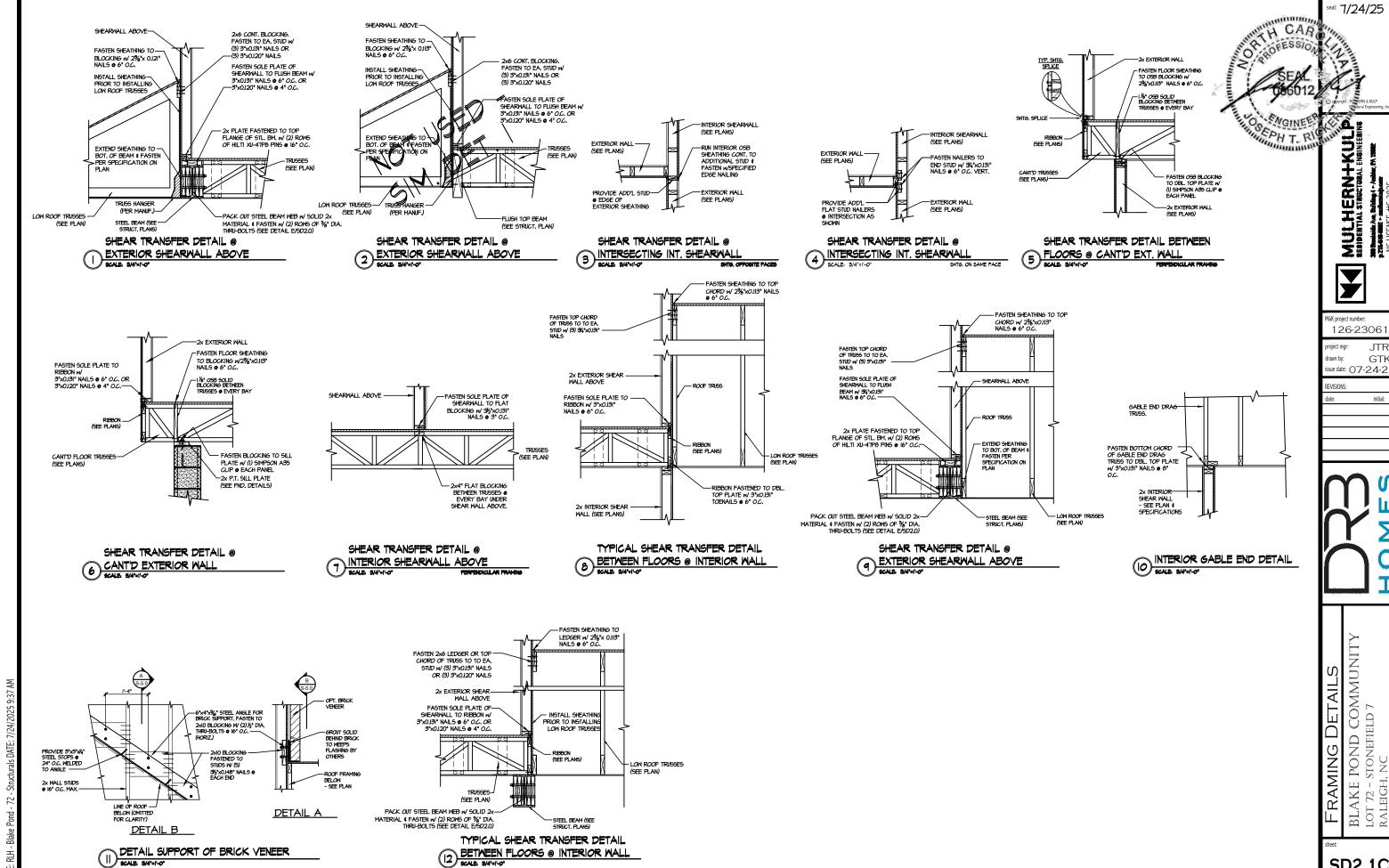


SD2.1B

JTR

GTH

initial:



LOT 72 - S RALEIGH, BLAKE

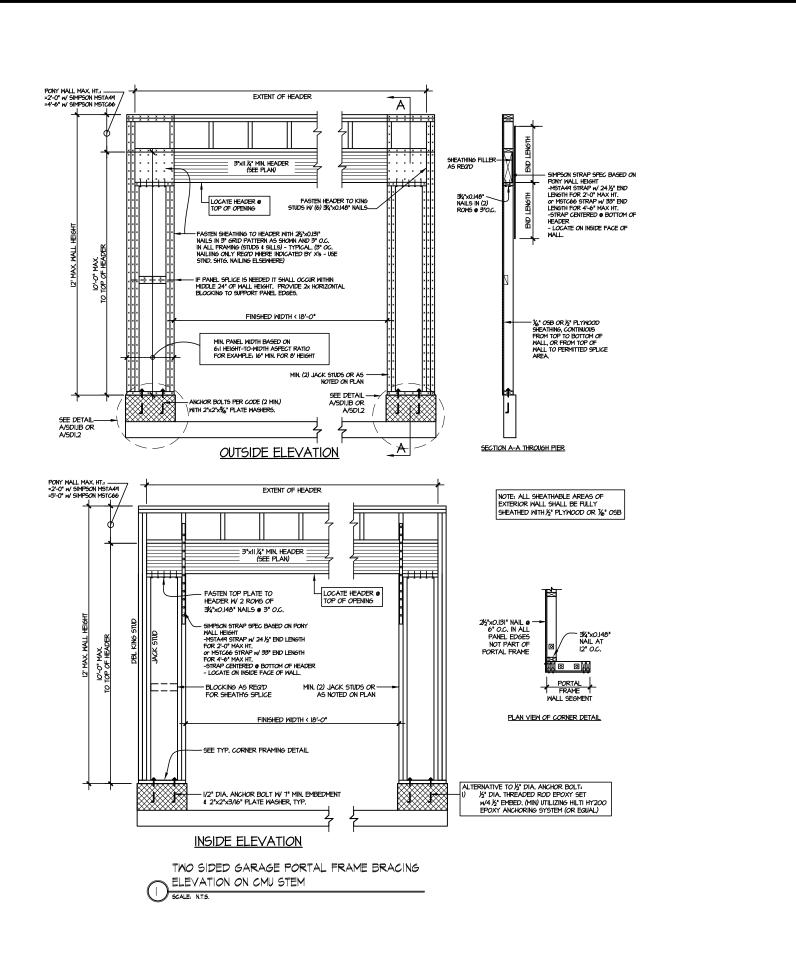
POND COMMUNI Stonefield 7

**JTR** 

GTK

initial:

SD2.1C



eal: 7/24/25 MOR OFES OSEPH T. R

MULHERN+KUL RESIDENTIAL STRUCTURAL ENSINEERIN **Y** 

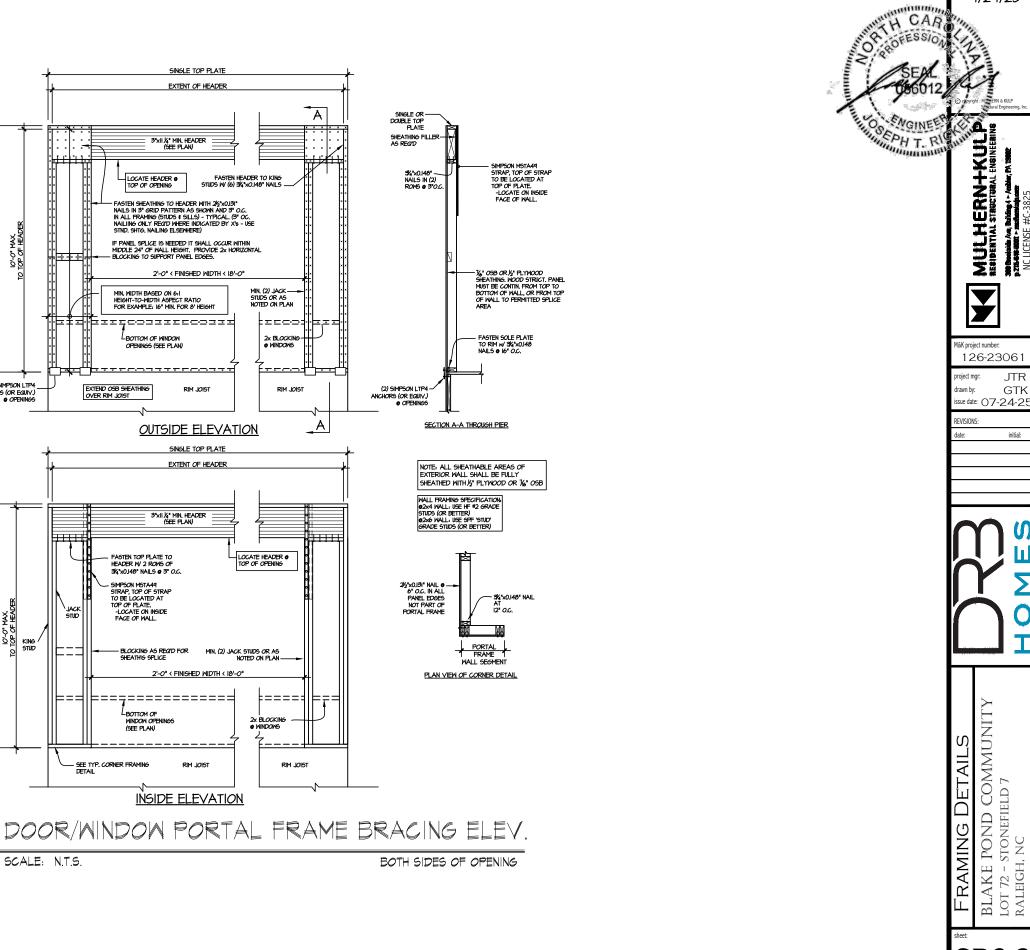
M&K project number: 126-23061

roject mgr: **JTR** drawn by: **GTK** issue date: 07-24-25

REVISIONS:

initial:

BLAKE POND COMMUNITY Lot 72 - Stonefield 7 Raleigh, nc FRAMING DETAILS



10'-0" MAX. TO TOP OF HEADER

(2) SIMPSON LTP4 ANCHORS (OR EQUIV.) @ OPENINGS

2' MAX, WALL HEIG 10'-0" MAX. TO TOP OF HEADE GAN

eal: 7/24/25

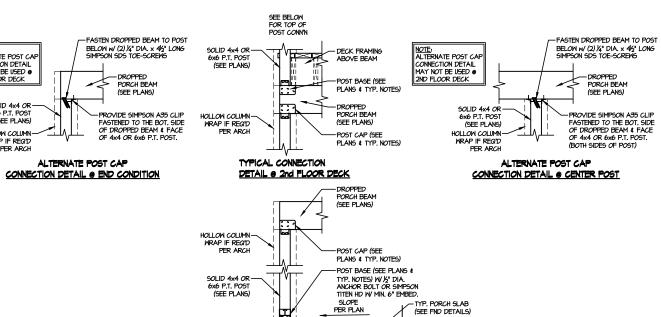
JTR

**GTK** 

initial:

**SD2.3** 





-CONC. TRENCH FOOTING

TYPICAL PORCH 3 POST CONNECTION DETAIL
SCALE: NONE SL

NOTE: ALTERNATE POST CAP CONNECTION DETAIL MAY NOT BE USED @ 2ND FLOOR DECK

SOLID 4x4 OR-6x6 P.T. POST (SEE PLANS)

HOLLOW COLUMN— WRAP IF REQ'D PER ARCH

PORCH BEAM (SEE PLANS)

FRAMING DETAILS

JTR

**GTK** 

initial:

**SD3.0** 

**OWF TRUSS LAYOUT** SCALE: NTS



Structural, LLC 201 Poplar Avenue Thurmont, MD 21788 Phone: 301-271-7591

> OWF Pond Lot 00.0072

Blake 00.0072

Stonefield

Raleigh

Model Name:

ot

NOTE:

TPI Plant W974

IT IS THE RESPONSIBILITY OF THE BUILDING DESIGNER OR ARCHITECT TO PROVIDE AN APPROPRIATE CONNECTION FOR FOR MECHANICAL EQUIPMENT AND/OR PLUMBING (AND THEIR CONNECTIONS) IN TRUSS SPACE MUST BE DIAGRAMMED BY BUILDER ON APPROVED TRUSS LAYOUT PRIOR TO

THIS COMPANY IS A TRUSS MANUFACTURER WHOSE RESPONSIBILITIES ARE LIMITED TO THOSE DESCRIBED IN WTCA 1-1995 "DESIGN RESPONSIBILITIES". ACCORDINGLY, IT DISCLAIMS ANY RESPONSIBILITIES AND/OR LIABILITY FOR TH CONSTRUCTION DESIGN, DRAWINGS, DOCUMENTS INCLUDING THE INSTALLATION, AND BRACING OF TRUSSES

**WARNING:** 

CONVENTIONAL FRAMING, ERECTION AND/OR PERMANENT BRACING IS NOT THE RESPONSIBILITY OF THE TRUSS CAUTIONED TO SEEK PROFESSIONAL ADVICE REGARDING TH **ERECTION BRACING WHICH IS ALWAYS REQUIRED TO PREVEN** TOPPLING AND DOMINOING DURING ERECTION; AND PERMANENT BRACING WHICH MAY BE REQUIRED IN SPECIFIC APPLICATIONS. SEE "BRACING WOOD TRUSSES COMMENTARY AND RECOMMENDATIONS" (BCSI 1) FOR FURTHER

TRUSSES SHALL BE INSTALLED IN A STRAIGHT AND PLUMB POSITION WHERE NO SHEATHING IS APPLIED DIRECTLY TO TOP SPCIFIED ON THE ENGINEERED DESIGN. TRUSSES SHALL BE HANDLED WITH REASONABLE CARE DURING ERECTION TO PREVENT DAMAGE OR PERSONAL INJURY.

2507-1777

Roger Espinoza

Robbie Zarobinski

**OWF TRUSS LAYOUT** SCALE: NTS



Structural, LLC 201 Poplar Avenue Thurmont, MD 21788 Phone: 301-271-7591

> OWF 00.0072

Lot Pond Blake 00.0072

Stonefield

Raleigh

Model Name: iot Iot

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