

TRILLIUM H&H HOMES

PLAN REVISIONS

1) ADDED BASEMENT PLAN (10-09-19) 1) UPDATED TO SC 2018 IRC (10-0-19)

REVISION DATE: 2-10-20

1) UPDATED OWNER'S BATH LAYOUT, CHANGED THE TUB FROM 5'-6" TO 5'-0"

2) CHANGED THE WALL BEHIND THE VANITIES IN THE OWNER'S BATH FROM A 2X6 TO A 2-2X6 AND SHIFTED THE VANITIES 5 1/2" INTO THE OWNER'S BATH. HIS IS TO ALLOW MORE ROOM FOR THE DOOR TO THE LAUNDRY.

3) UPDATED THE 2ND FLOOR WINDOW HEADERS FROM 6'-8" TO 7'-0"

SQUARE FOOTAGES	
AREA	ELEV 'A'
1st FLOOR	1717 5
2nd FLOOR	962 5
TOTAL LIVING	2679 5
GARAGE	422 9
PORCH	113 5
OPT. COVERED PATIO	+130 5
OPT, LOFT / BONUS RM	+258 5
OPT. WRAP-AROUND PORCH	+102 5
OPT, 3-CAR GARAGE	240 5
OPT.BASEMENT	1525 5

SQUARE FOOT	AGES
AREA	ELEV 'B'
lst FLOOR	IIII ∮ F
2nd FLOOR	953 SF
TOTAL LIVING	2670 SF
GARAGE	42 2 5F
PORCH	132 SF
OPT. COVERED PATIO	+130 FF
OPT. LOFT / BONUS RM	+258 5
OPT, WRAP-AROUND PORCH	+108 SF
OPT. 3-CAR GARAGE	240 SF
OPT.BASEMENT	1525 SF

SQUARE FOOTAGES		
AREA	ELEV 'C'	
st FLOOR	1717 SF	
2nd FLOOR	960 SF	
TOTAL LIVING	26TT 5F	
SARAGE	422 SF	
PORCH	146 SF	
OPT. COVERED PATIO	+130 SF	
OPT. LOFT / BONUS RM	+258 SF	
OPT, WRAP-AROUND PORCH	+108 SF	
OPT, 3-CAR GARAGE	240 SF	
PT.BASEMENT	1525 SF	

*JOB NUMBER 27187.07 *
CAD FILE NAME TRILLIUM
ISSUED 09-18-19
REMISED 02-10-20

DRAWINGS ON II"xTT" SHEET ARE ONE HALF THE SCALE NOTED

GARAGE TRILLIUM H&H

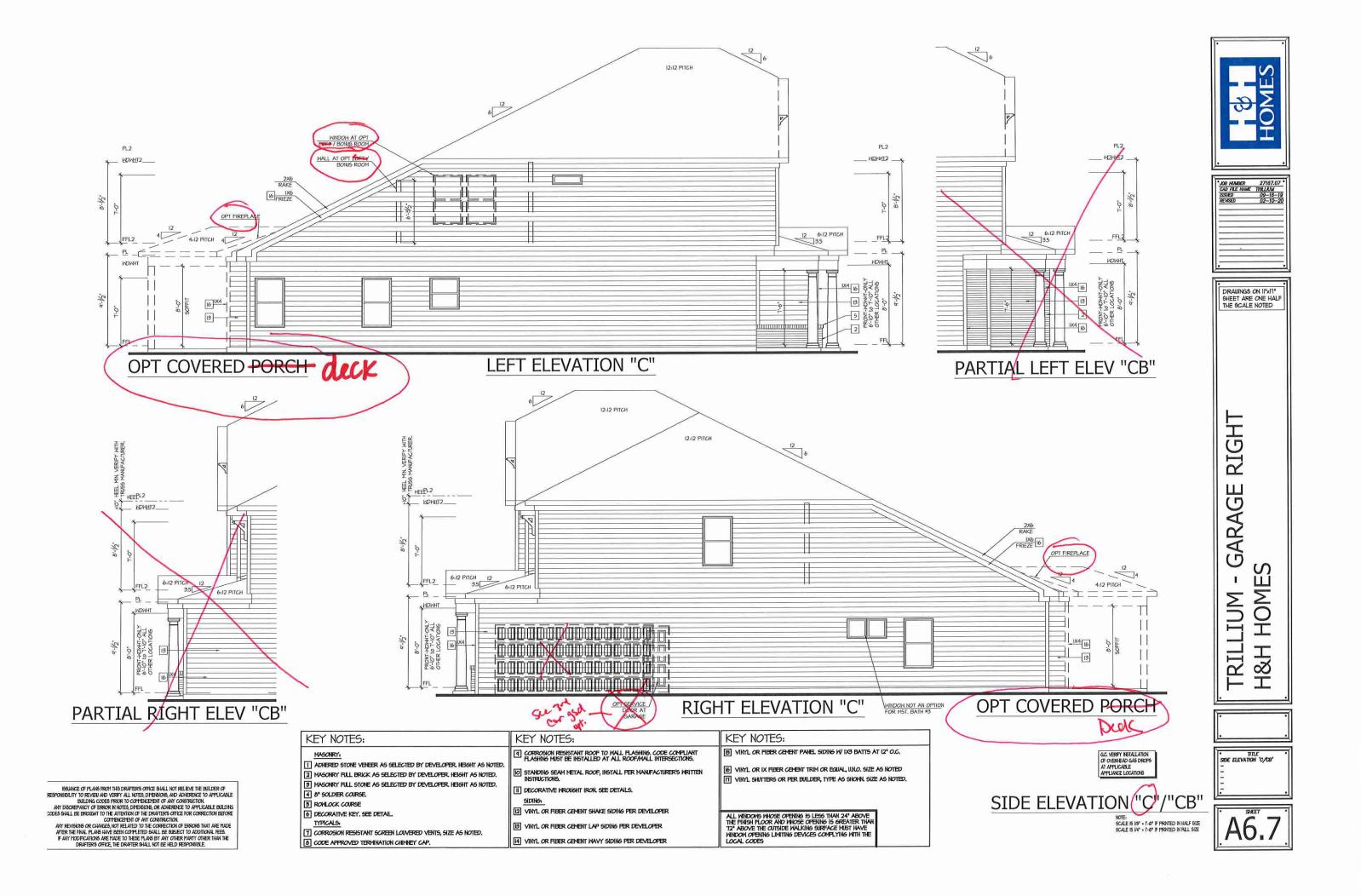
RIGHT

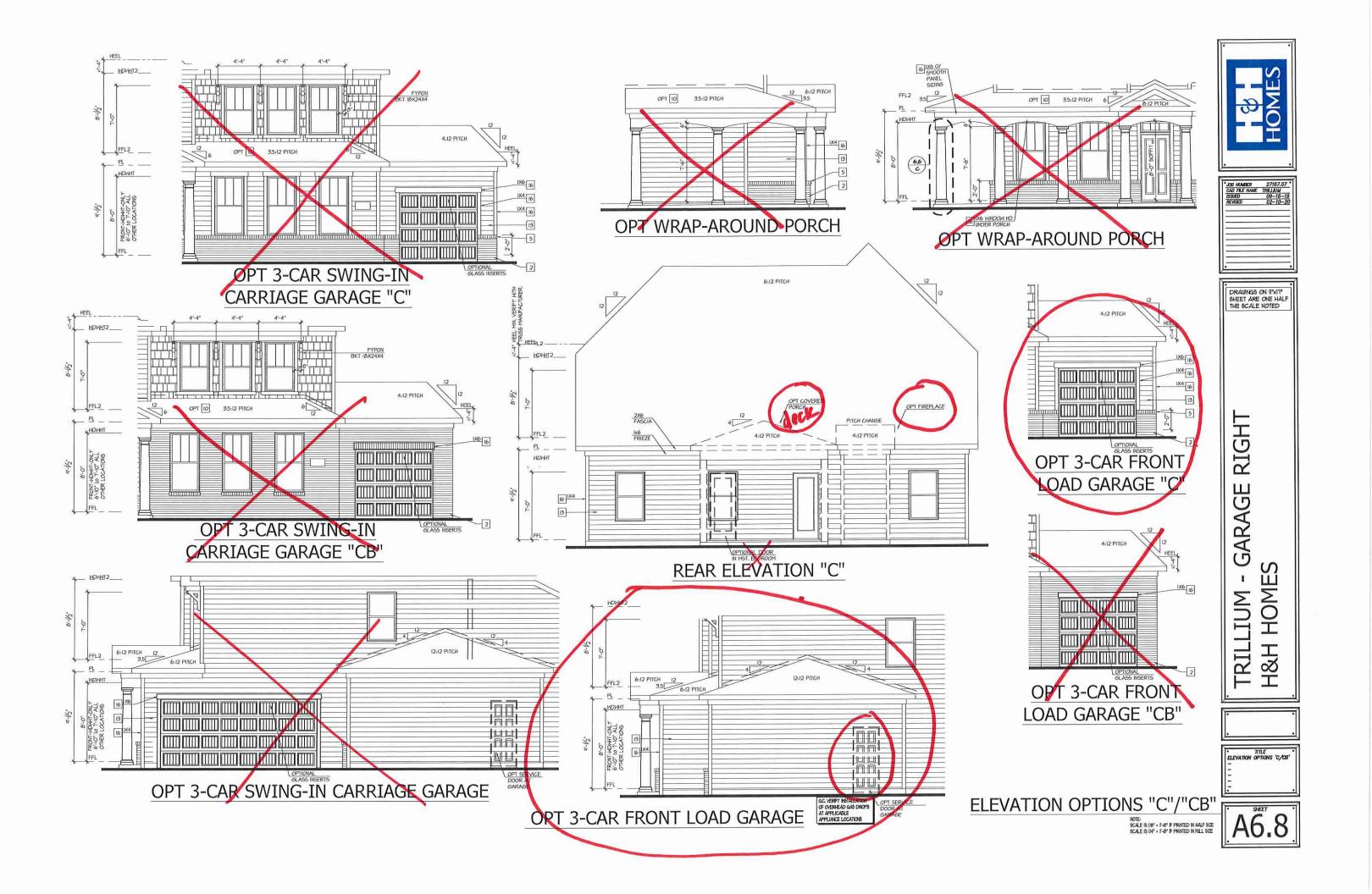


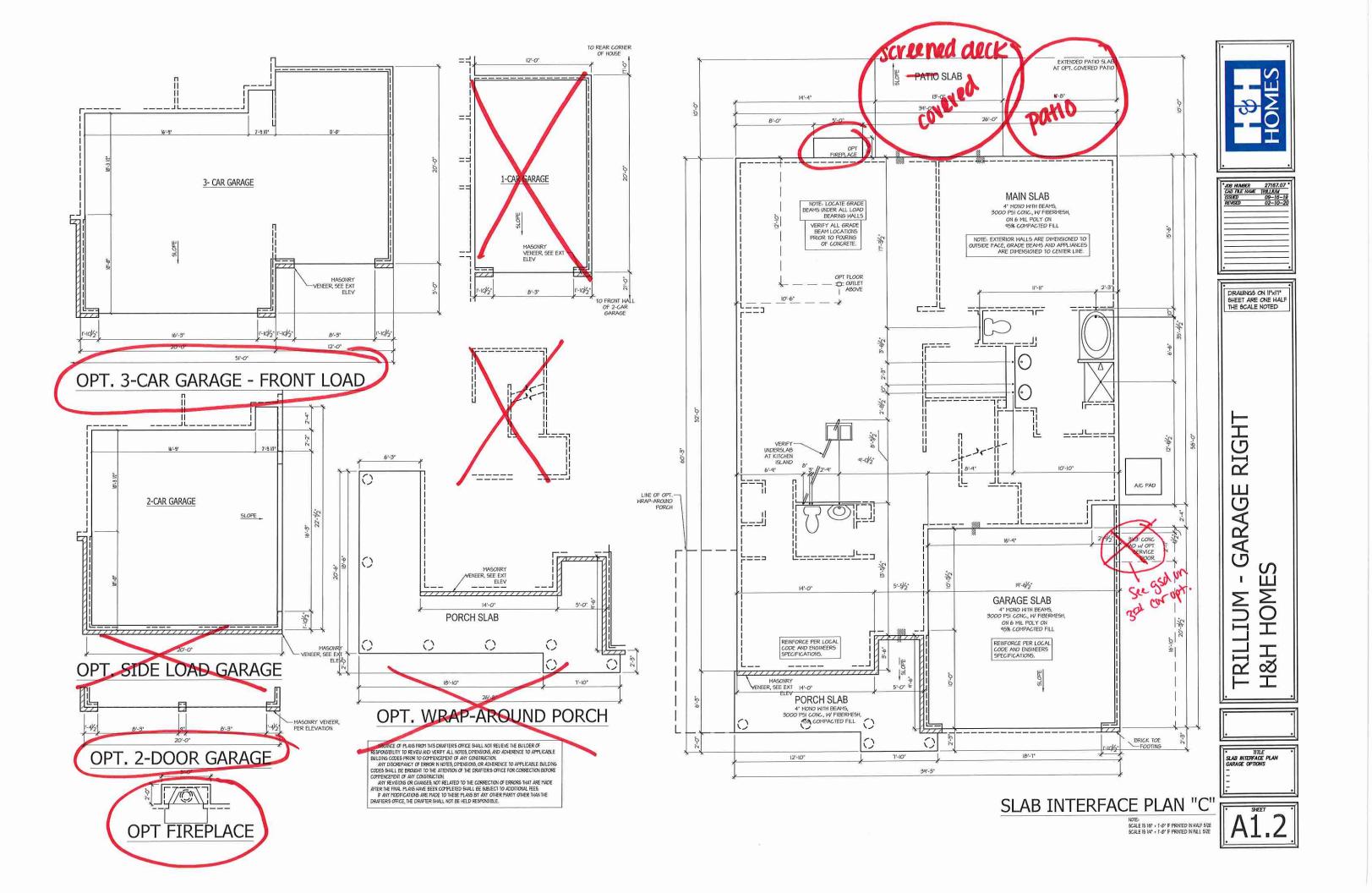
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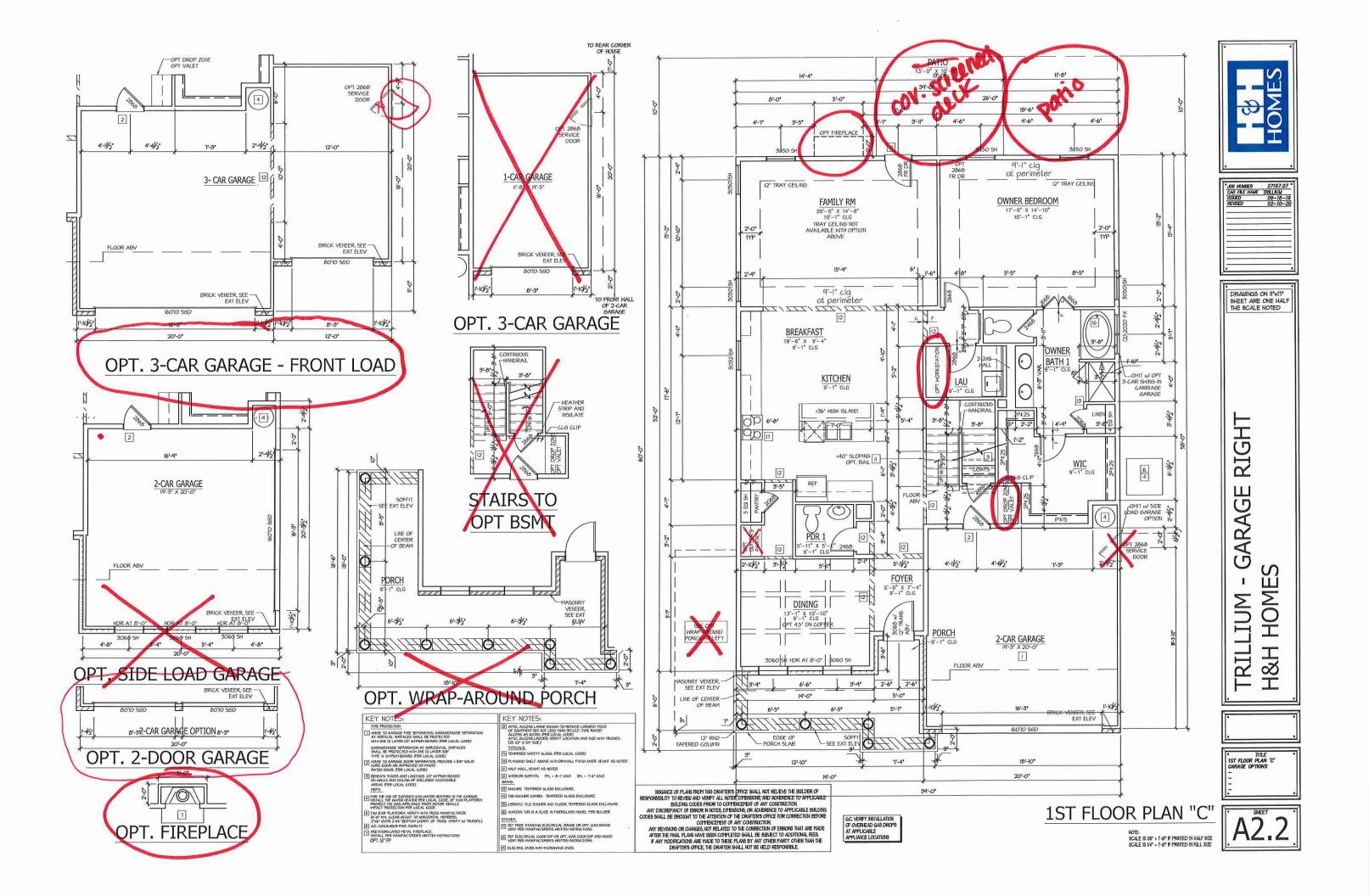
ANY DISCORPANCY OF ERROR INJURIES, DIFFSHOOKS, OR ADHERRICE TO APPLICABLE BUILDING CODES HAVIL BE BROUGHT TO THE ATTRIBUTION OF THE DRAFTER'S OTHCE FOR CORRECTION BEFORE CONFEDERATIO OF ANY CONFIDENCIAL OF ANY REVISION OF CHANGES, NOT RELATED TO THE CORRECTION OF BROOKS THAT ARE MADE AFTER THE TRUE. IT AND HAVE BEEN CONFIDENCIAL BE BUILDED TO OTHER PARTY OTHER THAN THE PARTY OTHER THAN THE PARTY OTHER PARTY OTHER THAN THE PARTY OTHER THAN THE PRAFTER'S OFFICE, THE DRAFTER SHALL NOT BE HELD RESPONSIBLE.

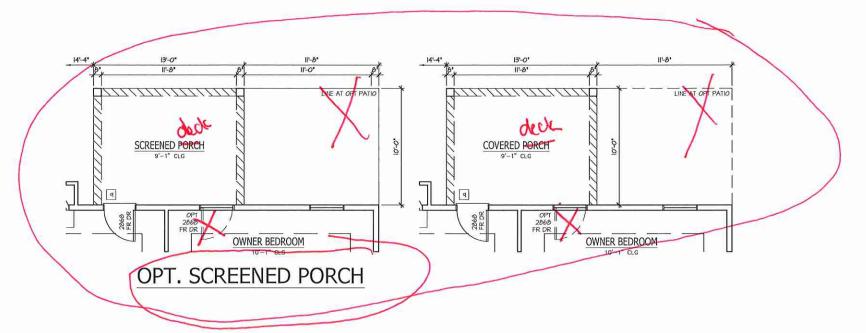


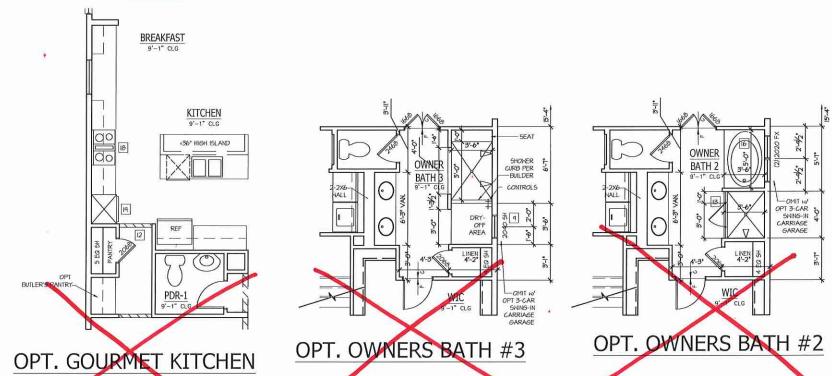


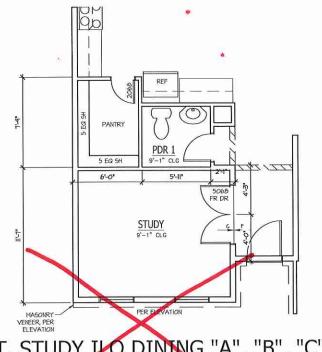




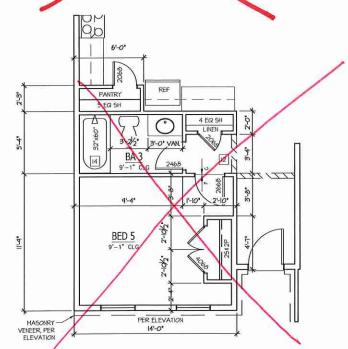












OPT. BED 5/ BATH 3 ILO DINING "A", "B", "C"

ISSUANCE OF PLANS FROM THIS DRAFTER'S CITICE SHALL NOT RELEVE THE BUILDER OF RESPONSIBILITY TO REVEN AND VERREY ALL NOTES, DYENDROIS, AND ADVERBICE TO APPLICABLE BUILDING CODES FROM TO COPTENCE THE NUTSE, DYENDROIS, OR ADVERBICE OF APPLICABLE BUILDING CODES SHALL BE BROUGHT TO THE ATTENTION OF THE DRAFTER'S CITICE FOR CORRECTION BEFORE CONTINUED OF ANY COMBINITION OF THE DRAFTER'S CITICE FOR CORRECTION BEFORE CONTINUED OF ANY COMBINITION AND THE DRAFTER'S CITICE THAT ARE MODE ATTENT THE FINAL PLANS HAVE BEEN COPTEINED BHALL BE BIBLECT TO ADDITIONAL FLESS. IF ANY HOUGH ATTEN THE FINAL PLANS HAVE DEED TO THE THE BRAIL BE BIBLECT TO THE THAN THE DRAFTER'S CITICE, THE DRAFTER SHALL NOT BE HELD RESPONSIBLE.

GC, VERFY INSTALLATION OF OVERNEAD GAS DROPS AT APPLICABLE APPLIANCE LOCATIONS

NOTE: SCALE IS US' = 1'-0' IF PRINTED IN HALF SIZE SCALE IS US' = 1'-0' IF PRINTED IN FILL SIZE

* TITLE 1ST FLOOR PLAN OPTIONS

ELECTRICAL PLAN ON PLAN OPTIONS

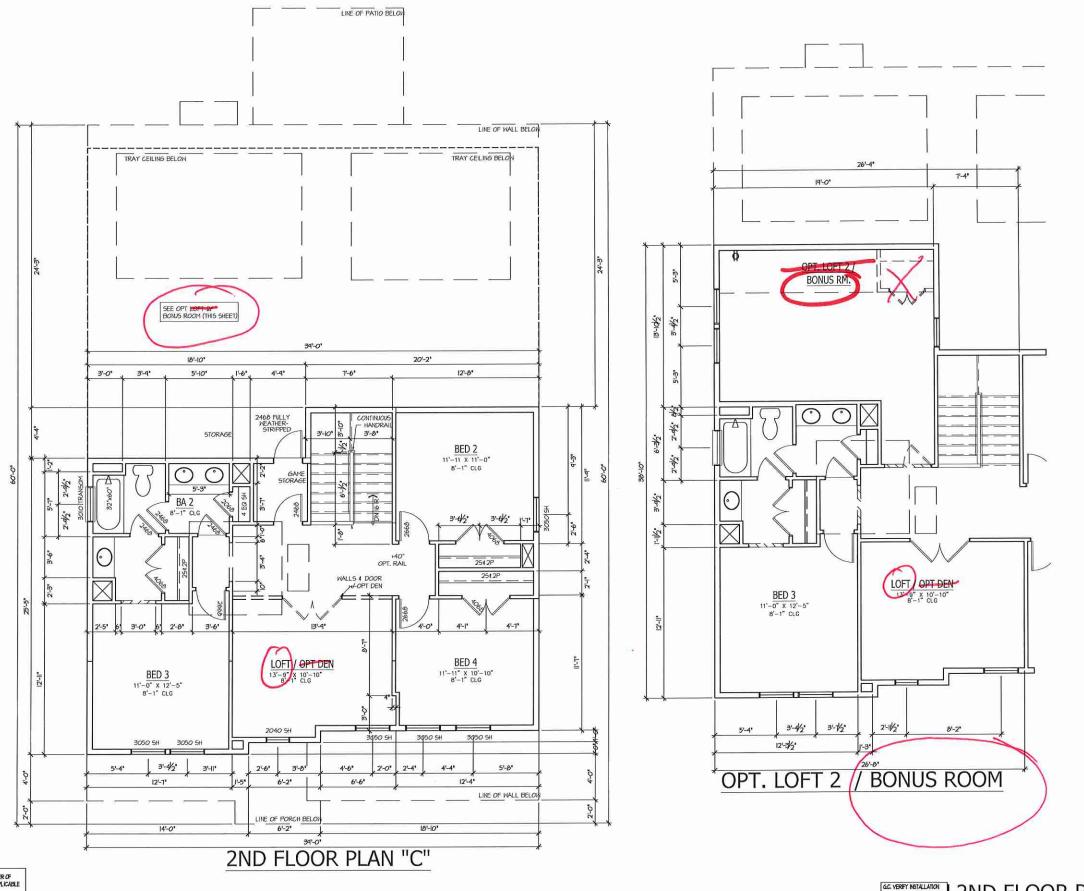




DRAWINGS ON II'XIT" SHEET ARE ONE HALF THE SCALE NOTED

RIGHT

GARAGE HOMES TRILLIUM H&H



EQUACE OF FLAS FROM THIS DRAFTERS OFFICE SHALL NOT RELEVE THE BUILDER OF RESPONSIBILITY TO RENYIN AND VERREY ALL NOTES, DYENSIONS, AND ADMERSINE TO APPLICABLE BUILDING CODES FROM TO CONTENCION.

ANY DISCREPANCY OF BREAK INDIRED, DYENSIONS, OR ADMERSIZE TO APPLICABLE BUILDING CODES SHALL BE BROAKHT TO THE ATTENTION OF THE DRAFTERS OFFICE FOR CORRECTION BEFORE COPYRED OF THE ATTENTION OF THE DRAFTERS OFFICE FOR CORRECTION BEFORE COPYRED OF THE CONTENCION BEFORE COPYRED OF THE ATTENTION OF THE ATT

2ND FLOOR PLAN "C"

NOTE: SCALE IS 1/8" : 1"-0" F PRNTED IN HALF SIZE SCALE IS 1/4" : 1"-0" F PRNTED IN FALL SIZE

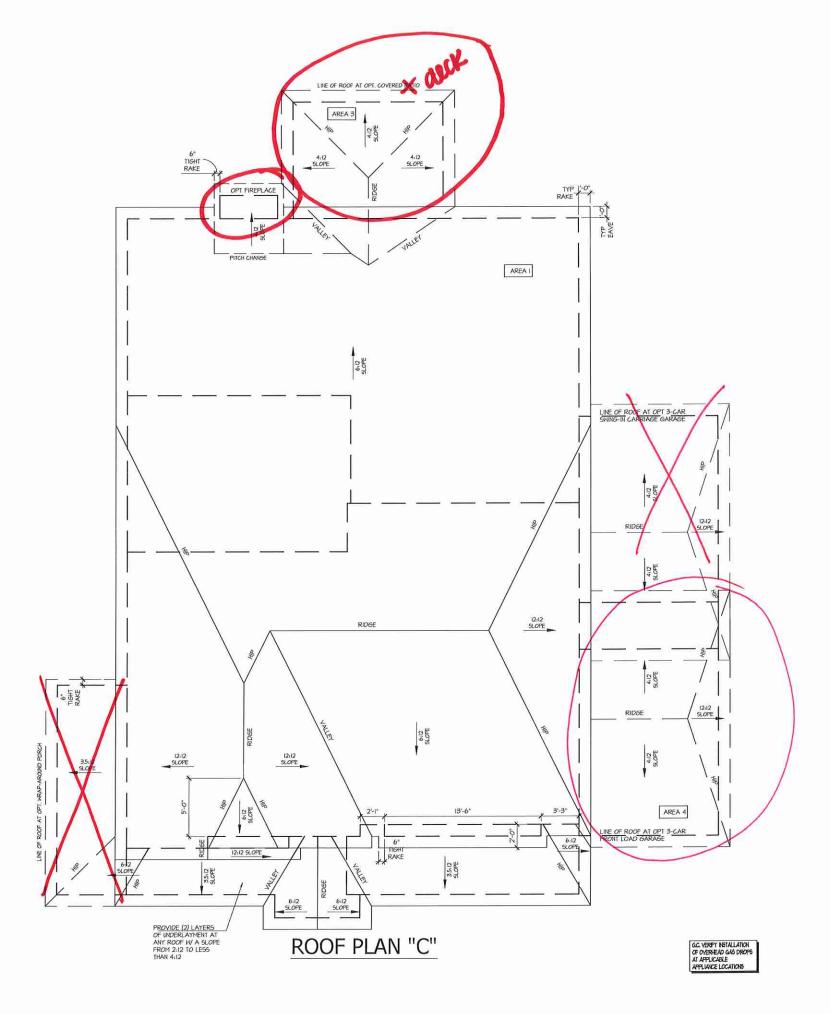




DRAWINGS ON II"XIT" SHEET ARE ONE HALF THE SCALE NOTED

RIGHT GARAGE H&H HOMES TRILLIUM

* TITLE 2ND FLOOR PLAN 'C' BONUS ROOM OPTION



TOTAL UNDER ROOF AREA: VENTING AREA REQUIRED: TOTAL REQUIREMENTS:

LOWER AREA VENTING SOFFIT VENT

UPPER AREA VENTING RIDGE VENT

TOTAL AREA PROVIDED SOFFIT AND RIDGE VENT

1984 SQ FT. / 300 = 1984 SQ FT. LOWER: 3.30 UPPER: 3.30 SQ FT.

| SIZE: | PER UNIT: | + UNITS: | PROVIDED: | - | .125 SP/LF | | 32-0' | | 4.0 | | UPPER AREA VENTING PROVIDED: | - |





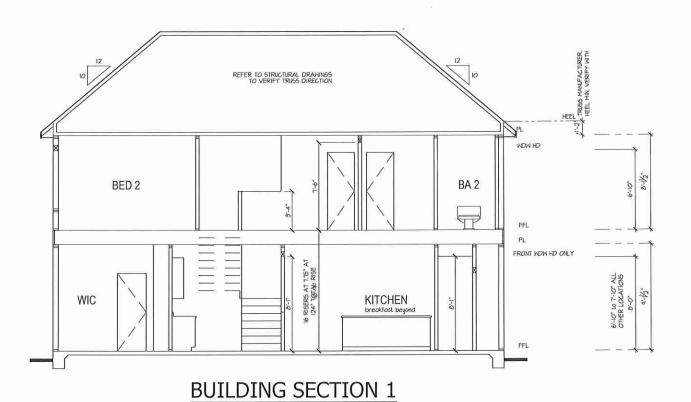
DRAWINGS ON II"xi1" SHEET ARE ONE HALF THE SCALE NOTED

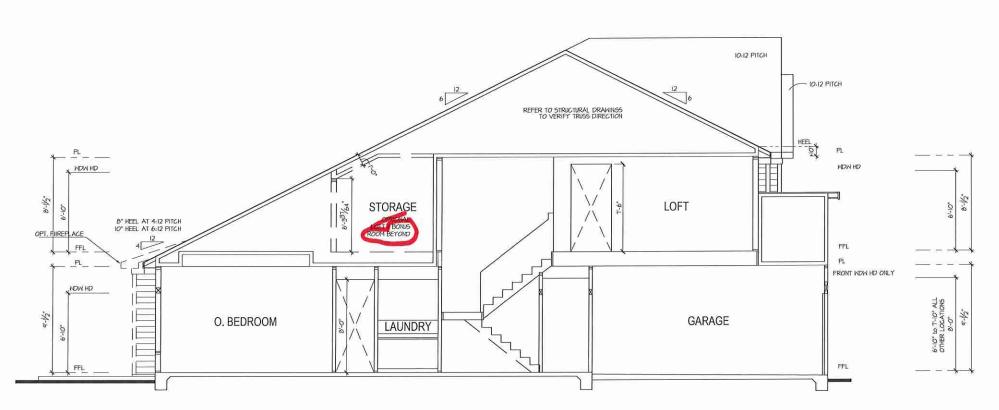
RIGHT GARAGE H&H HOMES TRILLIUM



ROOF PLAN "C"

A4.2 NOTE: SCALE IS V8" : 1'-0" F PRINTED IN HALF SIZE SCALE IS V4" : 1'-0" F PRINTED IN HALF SIZE





BUILDING SECTION 2

GC YERFY NSTALLATION OF OVERNEAD GAS DROPS AT AFFLICABLE APPLIANCE LOCATIONS **BUILDING SECTION**

NOTE: 5CALE IS VO' • 1-6' IF PRINTED IN HALF SIZE 5CALE IS VV' • 1-6' IF PRINTED IN FULL SIZE

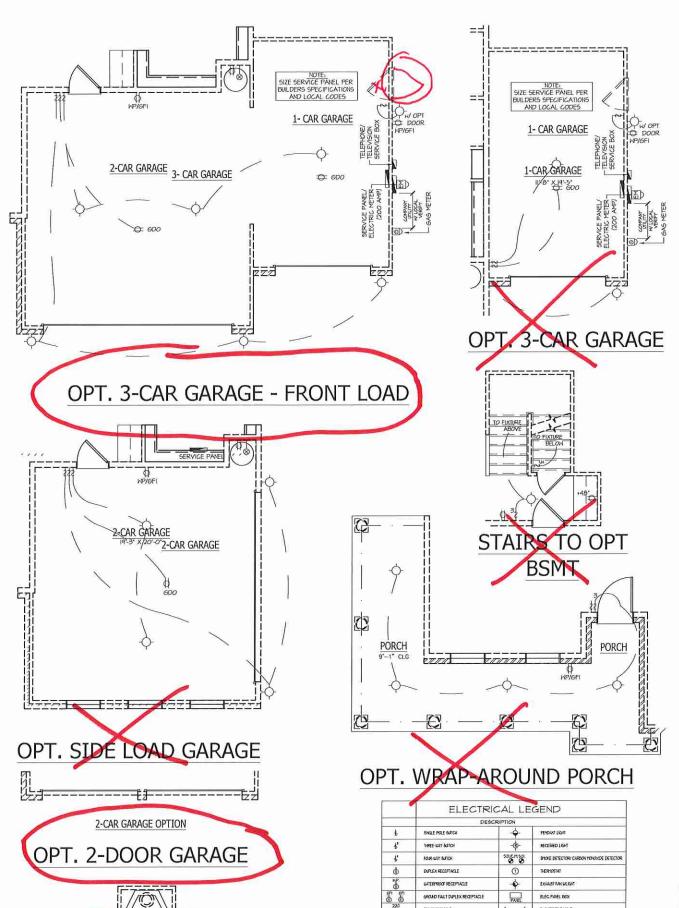




DRAWINGS ON II"x17" SHEET ARE ONE HALF THE SCALE NOTED

TRILLIUM - GARAGE RIGHT H&H HOMES

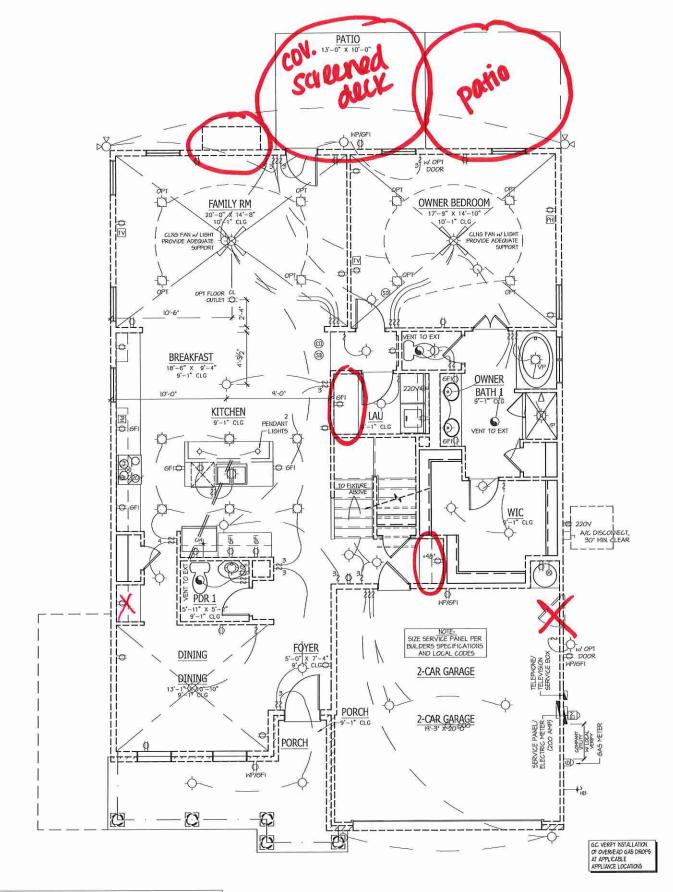
A5.0



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OPT FIREPLACE



ISSUACE OF PLAS FROM 1145 DRAFERS OFFICE SHALL NOT RELIEVE THE BUILDER OF RESPONSIBILITY TO REVIEU AND VERFY ALL NOTES, DYENSIONS, AND ADHERENCE TO APPLICABLE BUILDING CODES FROM TO CONTRICTION.

ANY DISCREPANCY OF ERROR NOTES, DYENSIONS, OR ADHERENCE TO APPLICABLE BUILDING CODES SHALL BE BROUGHT TO THE ATTENTION OF THE DRAFFERS OFFICE FOR CORRECTION BEFORE CONTRICTIONS OR CHAYEES, NOT THE ATTENTION OF THE DRAFFERS OFFICE FOR CORRECTION BEFORE CONTRICTIONS OR CHAYEES, NOT THE LABED TO THE CORRECTION OF ERRORS THAT ARE PLADE AFTER THE FIALL PLANS HAVE BEEN CONFIDENCE BUILDING SUBJECT TO ADDITIONAL THESE. IF ANY TOOFICATIONS ARE PLACET OTHERS PLANS BY ANY OTHER PLASTY OTHER THAN THE DRAFFERS OFFICE, THE DRAFFER SHALL NOT BE HELD RESPONSIBLE.

ELECTRICAL PLAN "C"

*JOB MUMBER 27167.07 *
CAD FILE NAME TRILLIUM
ISSUED 09-16-19
REVISED 02-10-20

DRAWINGS ON II"XIT" SHEET ARE ONE HALF THE SCALE NOTED

RIGH

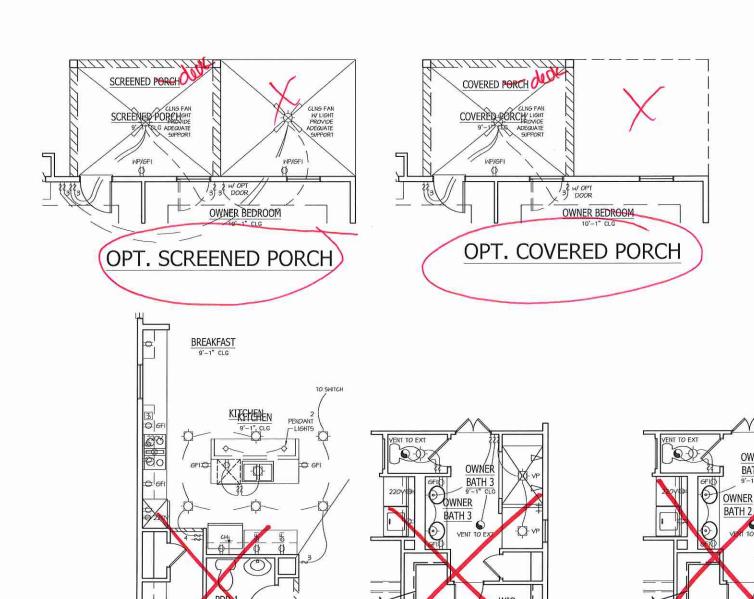
GARAGE

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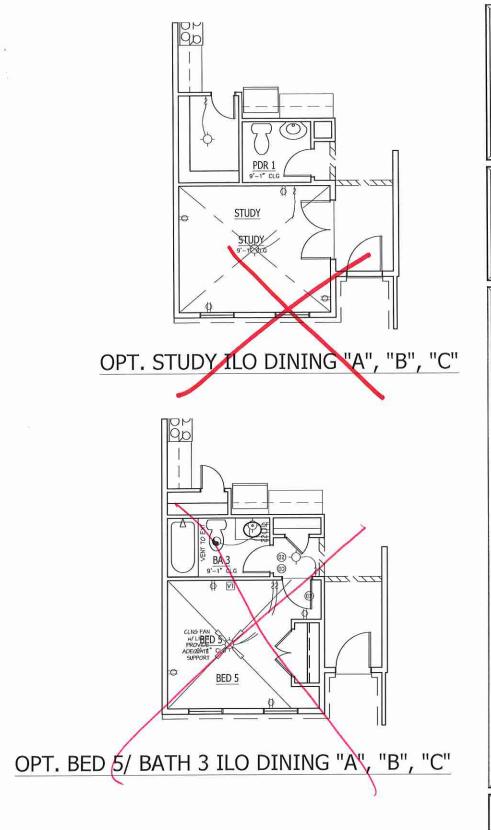


OPT. GOURMET KITCHEN

ISSUANCE OF PLANS FROM THIS DRAFTER'S OFFICE SHALL NOT RELIEVE THE BUILDER OF

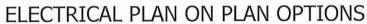
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OPT. OWNER BATH #3





OPT. OWNER BATN #2



NOTE: SCALE IS 1/8" + 1'-0" F PRINTED IN HALF SIZE SCALE IS 1/4" + 1'-0" F PRINTED IN FULL SIZE

TITLE ELECTRICAL 2ND PLAN '8'

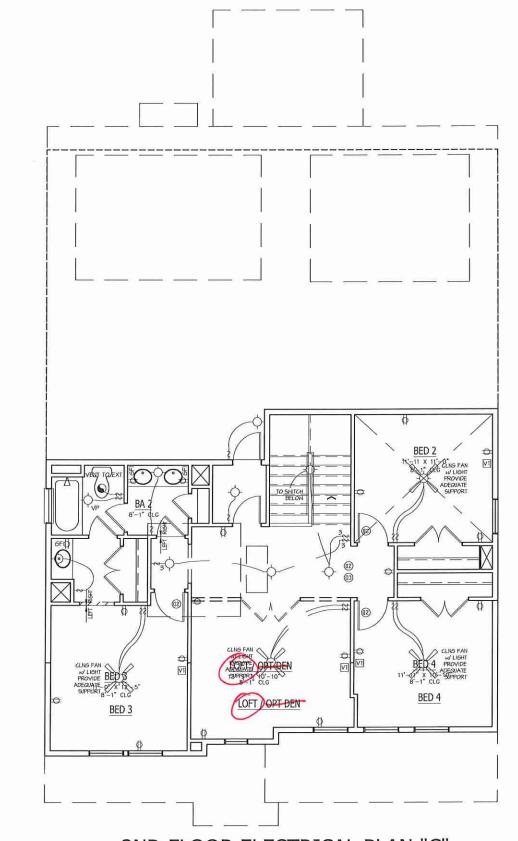
H&H HOMES

DRAWINGS ON II"XIT" SHEET ARE ONE HALF THE SCALE NOTED

RIGHT

GARAGE

TRILLIUM



2ND FLOOR ELECTRICAL PLAN "C"

ISSUANCE OF PLAYS FROM THIS DRAFTER'S CITICE SHALL NOT RELIEVE THE BUILDER OF RESPONSIBILITY TO REVIEW AND VERETY ALL NOTES, DIVENSIONS, AND ADJERENCE TO APPLICABLE BUILDING CODES PROOR TO COTHENCIPION OF ANY CONSTRUCTION.

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ELECTRICAL LEGEND

DUPLEX RECEPTACLE

no receptacle

SCONCERUALL LIGHT

CEILING FIXTURE PENDANT LIGHT

RECESSED LIGHT

THERMOSTAT

EXHAUST FAN UK KGHT

ELEC, PANEL BOX

OPT. CEILING FAN FLOURESCENT LIGHT

CEILING/ FAN LIGHT COMBO

SMOKE DETECTOR/ CARBON MONOXIDE DETECTOR

LIATERPROOF RECEPTAGLE GROUND FAULT DUPLEX RECEPTACLE

CEILING DUPLEX RECEPTACLE FLOOR DUPLEX RECEPTACLE

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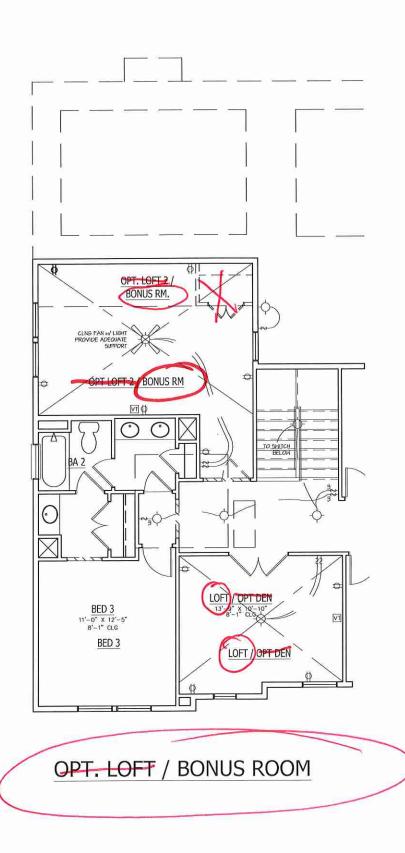
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DRAWINGS ON II"x11" SHEET ARE ONE HALF THE SCALE NOTED

RIGH⁻ GARAGE H&H HOMES TRILLIUM

GC, VERFY INSTALLATION OF OVER-EAD GAS DROPS AT APPLICABLE APPLIANCE LOCATIONS

2ND FLOOR ELECTRICAL PLAN "C" E2.2

TITLE ELECTRICAL 2ND PLAN 'C'



1900 AM DRIVE, SUITE 201, QUAKERTOWN, PA 18951 www.kse-eng.com (215) 804 - 4449

TRILLIUM

NORTH CAROLINA

THESE DRAWINGS ARE TO BE USED IN CONJUNCTION WITH AND COORDINATED WITH THE ARCHITECTURAL, CIVIL, MECHANICAL, ELECTRICAL, AND PLUMBING DRAWINGS. THIS COORDINATION IS NOT THE RESPONSIBILITY OF THE STRUCTURAL ENGINEER OF RECORD (SER). SHOULD ANY DISCREPANCIES BECOME APPARENT, THE CONTRACTOR SHALL NOTIFY KSE ENGINEERING. P.C. BEFORE CONSTRUCTION BEGINS. IT IS THE INTENT OF THE ENGINEER LISTED ON THESE DOCUMENTS THAT THESE DOCUMENTS BE ACCURATE, PROVIDING LICENSED PROFESSIONALS CLEAR INFORMATION. EVERY ATTEMPT HAS BEEN MADE TO PREVENT ERROR. THE BUILDER AND ALL SUBCONTRACTORS ARE REQUIRED TO REVIEW ALL OF THE INFORMATION CONTAINED IN THESE DOCUMENTS PRIOR TO THE COMMENCEMENT OF ANY WORK. THE ENGINEER IS NOT RESPONSIBLE FOR ANY PLAN ERRORS, OMISSIONS, OR MISINTERPRETATIONS UNDETECTED AND NOT REPORTED TO THE ENGINEER PRIOR TO CONSTRUCTION. ALL CONSTRUCTION MUST BE IN ACCORDANCE TO THE INFORMATION FOUND IN THESE DOCUMENTS.

DESIGN SPECIFICATIONS:

DESIGN BUILDING CODE (REFERRED TO HEREIN AS 'THE BUILDING CODE'):

· 2018 NORTH CAROLINA RESIDENTIAL CODE. WALL BRACING PER INTERNATIONAL RESIDENTIAL CODE 2015 EDITION.

DESIGN LIVE LOADS:

- NOTE LOADS:

 ROOF = 20 PSF (LOAD DURATION FACTOR=1.25)

 UNINHABITABLE ATTICS WITH LIMITED STORAGE = 20 PSF (WHERE SPECIFIED ON PLANS)

 HABITABLE ATTICS AND ATTICS SERVED WITH FIXED STAIRS = 30 PSF

- FLOOR (SLEEPING AREAS) = 30 PSF
- DECK = 40 PSF
- BALCONY = 40 PSF
- STAIRS = 40 PSF

DESIGN DEAD LOADS:

- ROOF TRUSS = 17 PSF (TC=7, BC=10)
- FLOOR TRUSS = 15 PSF (TC=10, BC=5)
- FLOOR JOIST = 10 PSF
- · QUEEN ANNE BRICK = 25 PSF

NOTE: STRUCTURAL FRAMING HAS NOT BEEN DESIGNED FOR TILE, GRANITE, MARBLE OR OTHER MATERIALS HEAVIER THAN THE ABOVE LOADING UNLESS SPECIFICALLY NOTED ON PLANS..

- ULTIMATE WIND SPEED = Up to 130 MPH
- EXPOSURE CATEGORY = B

ASSUMED SOIL BEARING CAPACITY = 2000 PSF

ASSUMED LATERAL SOIL PRESSURE = 45 PCF

FROST DEPTH = 12"

SEISMIC DESIGN CATEGORY = B

ENGINEERED LUMBER SHALL HAVE THE FOLLOWING MINIMUM DESIGN VALUES:

- TJI 210 SERIES (SERIES AND SPACING PER PLANS)
- LSL: E=1,550,000 PSI, F_8 =2,325 PSI, F_V =310 PSI, F_C =900 PSI
- LVL: E=2,000,000 PSI, F_B =2,600 PSI, F_V =285 PSI, F_C =750 PSI PSL: E=2,100,000 PSI, F_B =2,900 PSI, F_V =290 PSI, F_C =625 PSI

THIS PLAN HAS BEEN DESIGNED PER THE 2018 EDITION OF THE NC RESIDENTIAL CODE. WHERE FRAMING, FOUNDATION, OR OTHER STRUCTURAL ITEMS DO NOT COMPLY WITH THE PRESCRIPTIVE METHODS OF THE CODE, THOSE ITEMS HAVE BEEN DESIGNED IN ACCORDANCE WITH ACCEPTED ENGINEERING PRACTICE PER NCRC R301.1.3.





Model 120 M.P.H. North Caroli Trillium

Sheet

Carolina

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Cover Project #: 105-16011 Designed By: KRK Checked By:

ssue Date: 4/8/19 Re-Issue: 12/3/19 Scale: 1/8"=1'-0" @ 11x17

1/4"=1'-0" @ 22x34

GENERAL STRUCTURAL NOTES:

- THE DESIGN PROFESSIONAL WHOSE SEAL APPEARS ON THESE DRAWINGS IS THE STRUCTURAL ENGINEER OF RECORD (SER) FOR THIS PROJECT. THE SER BEARS THE RESPONSIBILITY OF THE PRIMARY STRUCTURAL ELEMENTS AND THE PERFORMANCE OF THIS STRUCTURE. NO OTHER PARTY MAY REVISE, ALTER, OR DELETE ANY STRUCTURAL ASPECTS OF THESE CONSTRUCTION DOCUMENTS WITHOUT WRITTEN CONSENT OF KSE ENGINEERING, P.C. OR THE SER. FOR THE PURPOSES OF THESE CONSTRUCTION DOCUMENTS. THE SER AND KSE ENGINEERING SHALL BE CONSIDERED THE SAME ENTITY
- THE STRUCTURE IS ONLY STABLE IN ITS COMPLETED FORM. THE CONTRACTOR SHALL PROVIDE ALL REQUIRED TEMPORARY BRACING DURING CONSTRUCTION TO STABILIZE THE STRUCTURE
- THE SER IS NOT RESPONSIBLE FOR CONSTRUCTION SEQUENCES. METHODS, OR TECHNIQUES IN CONNECTION WITH THE CONSTRUCTION OF THIS STRUCTURE. THE SER WILL NOT BE HELD RESPONSIBLE FOR THE CONTRACTOR'S FAILURE TO CONFORM TO THE CONTRACT DOCUMENTS, SHOULD ANY NON-CONFORMITIES OCCUR.
- 4. THE SER DOES NOT CERTIFY DIMENSIONAL ACCURACY OR ARCHITECTURAL LAYOUT INCLUDING ROOF GEOMETRY. THE SER ASSUMES NO LIABILITY FOR CHANGES MADE TO THESE PLANS BY OTHERS, OR FOR CONSTRUCTION METHODS, OR FOR ANY DEVIATION FROM THE PLANS. THE SER SHALL BE NOTIFIED PRIOR TO CONSTRUCTION IF ANY DISCREPANCIES ARE NOTED ON THE PLANS.
- ANY STRUCTURAL ELEMENTS OR DETAILS NOT FULLY DEVELOPED ON THE CONSTRUCTION DRAWINGS SHALL BE COMPLETED UNDER THE DIRECTION OF A LICENSED PROFESSIONAL ENGINEER. THESE SHOP DRAWINGS SHALL BE SUBMITTED TO KSE ENGINEERING FOR REVIEW BEFORE ANY CONSTRUCTION BEGINS. THE SHOP DRAWINGS WILL BE REVIEWED FOR OVERALL COMPLIANCE AS IT RELATES TO THE STRUCTURAL DESIGN OF THIS PROJECT, VERIFICATION OF THE SHOP DRAWINGS FOR DIMENSIONS, OR FOR ACTUAL FIELD CONDITIONS, IS NOT THE RESPONSIBILITY OF THE SER OR KSE ENGINEERING, P.C.
- 6. VERIFICATION OF ASSUMED FIELD CONDITIONS IS NOT THE RESPONSIBILITY OF THE SER. THE CONTRACTOR SHALL VERIFY THE FIELD CONDITIONS FOR ACCURACY AND REPORT ANY DISCREPANCIES TO KSE ENGINEERING, P.C. BEFORE CONSTRUCTION BEGINS.
- 7. THE SER IS NOT RESPONSIBLE FOR ANY SECONDARY STRUCTURAL ELEMENTS OR NON-STRUCTURAL ELEMENTS, EXCEPT FOR THE FLEMENTS SPECIFICALLY NOTED ON THE STRUCTURAL DRAWINGS
- THIS STRUCTURE AND ALL CONSTRUCTION SHALL CONFORM TO ALL APPLICABLE SECTIONS OF THE BUILDING CODE AND ANY LOCAL CODES OR RESTRICTIONS.
- DO NOT SCALE DRAWINGS. WRITTEN DIMENSIONS TAKE PRECEDENCE OVER SCALED DIMENSIONS, ALL DIMENSIONS ARE TO FACE OF STUD OR TO FACE OF FRAMING UNLESS OTHERWISE NOTED.
- 10. PROVIDE MOISTURE PROTECTION AND FLASHING PER ARCHITECTURAL

FOUNDATIONS:

- FOUNDATIONS SHALL BE CONSTRUCTED IN ACCORDANCE WITH CHAPTER 4 OF THE BUILDING CODE.
- 2. CONTRACTOR IS SOLELY RESPONSIBLE FOR VERIFYING THE SUITABILITY OF THE SITE SOIL CONDITIONS AT THE TIME OF CONSTRUCTION. THE BUILDER SHALL FURNISH ANY AND ALL REPORTS RECEIVED FROM THE GEOTECHNICAL ENGINEER ON THE STUDY OF THE PROPOSED SITE TO THE DESIGNER, STRUCTURAL ENGINEER, AND GENERAL CONTRACTOR.
- MAXIMUM DEPTH OF UNBALANCED FILL AGAINST MASONRY WALLS TO BE AS SPECIFIED IN THE BUILDING CODE.
- THE SER HAS NOT PERFORMED A SUBSURFACE INVESTIGATION. VERIFICATION OF THE ASSUMED VALUE IS THE RESPONSIBILITY OF THE OWNER OR THE CONTRACTOR, SHOULD ANY ADVERSE SOIL CONDITION BE ENCOUNTERED. THE SER MUST BE CONTACTED BEFORE PROCEEDING
- 5. THE BOTTOM OF ALL FOOTINGS SHALL EXTEND BELOW THE FROST LINE FOR THE REGION IN WHICH THE STRUCTURE IS TO BE CONSTRUCTED, BUT NOT LESS THAN A MINIMUM OF 12" BELOW GRADE. ALL FOOTINGS TO HAVE A MINIMUM PROJECTION OF 2" ON EACH SIDE OF FOUNDATION WALLS. MAXIMUM FOOTING PROJECTION SHALL NOT EXCEED THE THICKNESS OF THE FOOTING.
- WOOD SILL PLATES SHALL BE ANCHORED TO THE FOUNDATION WITH 1/2" ANCHOR BOLTS WITH MINIMUM 7" EMBEDMENT, SPACED A MAXIMUM OF 6'-0" O.C. INSTALL MINIMUM 2 ANCHOR BOLTS PER SECTION, 12" MAXIMUM FROM CORNERS. X'' DIAMETER \times 8" LONG SIMPSON TITEN HD 1. OR USP SCREW-BOLT+ SCREWS MAY BE SUBSTITUTED ON A 1 FOR 1
- 7. ANY FILL SHALL BE PLACED UNDER THE DIRECTION OR RECOMMENDATION OF A LICENSED PROFESSIONAL ENGINEER. THE RESULTING SOIL SHALL BE COMPACTED TO A MINIMUM OF 95%
- 8. EXCAVATIONS OF FOOTINGS SHALL BE LINED TEMPORARILY WITH A 6 MIL POLYETHYLENE MEMBRANE IF PLACEMENT OF CONCRETE DOES NOT OCCUR WITHIN 24 HOURS OF EXCAVATION
- NO CONCRETE SHALL BE PLACED AGAINST ANY SUBGRADE CONTAINING WATER, ICE, FROST, OR LOOSE MATERIAL.
- 10. PROVIDE FOUNDATION WATERPROOFING AND DRAIN WITH POSITIVE SLOPE TO OUTLET AS REQUIRED BY SITE CONDITIONS (SEE ARCHITECTURAL PLANS AND DETAILS).
- 11. NONE OF THE FOUNDATION DESIGNS IN THESE DOCUMENTS ARE SUITABLE FOR INSTALLATION IN SHRINK/SWELL CONDITIONS, REFER TO GEOTECHNICAL ENGINEER FOR APPROPRIATE DESIGN.
- 12. LOTS SHALL BE GRADED TO DRAIN SURFACE WATER AWAY FROM FOUNDATION WALLS. THE GRADE SHALL FALL A MINIMUM OF 6 INCHES WITHIN THE FIRST TEN FEET.
- 13. CRAWL SPACE TO BE GRADED LEVEL AND CLEAR OF ALL DEBRIS
- 14, PROVIDE MINIMUM 6 MIL APPROVED VAPOR BARRIER. ALL JOINTS TO BE LAPPED MINIMUM 12" AND SEALED.

CONCRETE & REINFORCING

- CONCRETE DESIGN BASED ON ACI 318 AND ACI 318.1 OR ACI 332. CONCRETE SHALL HAVE A NORMAL WEIGHT AGGREGATE AND A MINIMUM COMPRESSIVE STRENGTH (f'c) = 3.000 PSI MINIMUM AT 28 DAYS PER CODE (VARIES W/ WEATHER). UNLESS OTHERWISE NOTED ON THE PLAN
- CONCRETE SHALL BE PROPORTIONED, MIXED, AND PLACED IN ACCORDANCE WITH THE LATEST EDITIONS OF ACI 318: "BUILDING CODE REQUIREMENTS FOR REINFORCED CONCRETE" AND ACI 301: "SPECIFICATIONS FOR STRUCTURAL CONCRETE FOR BUILDINGS"
- AIR ENTRAINED CONCRETE MUST BE USED FOR ALL STRUCTURAL ELEMENTS EXPOSED TO FREEZE/THAW CYCLES AND DEICING CHEMICALS. AIR ENTRAINMENT AMOUNTS (IN PERCENT) SHALL BE WITHIN -1% TO +2% OF 5% FOR FOOTINGS AND EXTERIOR SLARS.
- NO ADMIXTURES SHALL BE ADDED TO ANY STRUCTURAL CONCRETE WITHOUT WRITTEN PERMISSION OF THE SER, WATER ADDED TO CONCRETE ON SITE SHALL NOT EXCEED THAT ALLOWED BY THE MIX
- 5. CONCRETE SLABS-ON-GRADE SHALL BE CONSTRUCTED IN ACCORDANCE WITH ACI 302.1R: "GUIDE FOR CONCRETE SLAB AND SLAB CONSTRUCTION".
- CONTROL OR SAW CUT JOINTS (CUT OR TOOLED) SHALL BE SPACED IN INTERIOR SLABS-ON-GRADE AT A MAXIMUM OF 15'-0" O.C. AND IN EXTERIOR SLARS-ON-GRADE AT A MAXIMUM OF 10'-0" UNLESS. OTHERWISE NOTED. CARE SHALL BE TAKEN TO AVOID RE-ENTRAN CORNERS
- CONTROL OR SAW CUT JOINTS SHALL BE PRODUCED USING CONVENTIONAL CUT OR TOOLED PROCESSES WITHIN 4 TO 12 HOURS AFTER THE SLAB HAS BEEN FINISHED.
- ALL WELDED WIRE FABRIC (W.W.F.) FOR CONCRETE SLABS-ON-GRADE SHALL BE PLACED AT MID-DEPTH OF SLAB. THE W.W.F. SHALL BE SECURELY SUPPORTED DURING THE CONCRETE POUR FIBROUS CONCRETE REINFORCEMENT, OR POLYPROPYLENE FIBERS MAY BE USED IN LIEU OF W.W.F. APPLICATION OF POLYPROPYLENE FIBERS PER CUBIC YARD OF CONCRETE SHALL BE PER MANUFACTURER AND COMPLY WITH ASTM C1116, ANY LOCAL BUILDING CODE REQUIREMENTS AND SHALL MEET OR EXCEED CURRENT INDUSTRY STANDARD.
- POLYPROPYLENE REINFORCING TO BE 100% VIRGIN, CONTAINING NO REPROCESSED OLEFIN MATERIALS AND SPECIFICALLY MANUFACTURED FOR USE AS CONCRETE SECONDARY REINFORCEMENT.
- 10. STEEL REINFORCING BARS SHALL BE NEW BILLET STEEL CONFORMING TO ASTM A615, GRADE 60.
- 11. DETAILING, FABRICATION, AND PLACEMENT OF REINFORCING STEEL SHALL BE IN ACCORDANCE WITH THE LATEST EDITION OF ACI 315: "MANUAL OF STANDARD PRACTICE FOR DETAILING CONCRETE STRUCTURES".
- 12. HORIZONTAL FOOTING AND WALL REINFORCEMENT SHALL BE CONTINUOUS AND SHALL HAVE 90* BENDS, OR CORNER BARS WITH
- THE SAME SIZE/SPACING AS THE HORIZONTAL REINFORCEMENT. 13. PROVIDE REINFORCEMENT LAP AS NOTED BELOW, UNLESS NOTED OTHERWISE:

#4 BARS - 30" LENGTH #5 BARS - 38" LENGTH

- #6 BARS 45" LENGTH WHERE REINFORCING DOWELS ARE REQUIRED. THEY SHALL BE EQUIVALENT IN SIZE AND SPACING TO THE VERTICAL REINFORCEMENT THE DOWEL SHALL EXTEND 48 BAR DIAMETERS VERTICALLY AND 20 BAR DIAMETERS INTO THE FOOTING, SEE KSE FOUNDATION DETAILS.
- 15. WHERE FOOTING BOTTOMS ARE TO BE STEPPED AT SLOPING GRADE CONDITIONS, PROVIDE CONTINUOUS REINFORCING WITH Z BARS (TO MATCH FOOTING REINFORCING) AS REQUIRED.
- BAR SUPPORT ACCESSORIES SHALL BE PROVIDED IN ACCORDANCE WITH THE LATEST ACI MANUAL OF STANDARD PRACTICE FOR DETAILING REINFORCED CONCRETE STRUCTURES, EXCEPT THAT REINFORCING SHALL BE CHAIRED ON THE BOTTOM AND/OR THE SIDES ON BOLSTERS SPACED NOT MORE THAN 4 FFFT ON CENTER, NO ROCKS, CMU, CLAY TILE, OR BRICK SHALL BE USED TO SUPPORT REINFORCING
- 17. FOR GRADE SUPPORTED SLABS, SLAB REINFORCING SHALL BE HELD IN PLACE BY BAR SUPPORTS AND ACCESSORIES AS DESCRIBED IN THE CRSI MANUAL OF STANDARD PRACTICE. BAR SUPPORTS SHALL BE SPACED A MAXIMUM OF 4'-0" O.C. BOTH WAYS IN STRAIGHT LINES ON THE MESH GRID.

MASONRY

- ALL MASONRY SHALL CONFORM TO ASTM C-90, F'm=1500 PSI, ALL BRICK SHALL CONFORM TO ASTM C-216, F'm=1500 PSI. ALL MORTAR SHALL BE TYPE 'S' (TYPE 'M' BELOW GRADE) AND CONFORM TO ASTM C-270. COARSE CROUT SHALL CONFORM TO ASTM C-476 WITH A MAXIMUM AGGREGATE SIZE OF 36" AND A MINIMUM COMPRESSIVE STRENGTH OF 2,000
- ALL MASONRY WORK SHALL BE IN ACCORDANCE WITH "BUILDING CODE REQUIREMENTS FOR MASONRY STRUCTURES" ACI 530/ASCE 5/TMS 402 AND "SPECIFICATIONS FOR MASONRY STRUCTURES" ACI 530.1/ ASCE 6/TMS 602.
- THE UNSUPPORTED HEIGHT OF SOLID MASONRY PIERS SHALL NOT EXCEED TEN TIMES THEIR LEAST DIMENSION, LINEILLED HOLLOW PIERS MAY BE USED IF THE UNSUPPORTED HEIGHT IS NOT MORE THAN FOUR TIMES THEIR LEAST DIMENSION.
- EACH CRAWL SPACE PIER SHALL BEAR IN THE MIDDLE THIRD OF ITS RESPECTIVE FOOTING AND EACH GIRDER SHALL BEAR IN THE MIDDLE THIRD OF THE PIERS, PILASTERS TO BE BONDED TO PERIMETER
- TOP COURSE OF MASONRY SHALL BE GROUTED SOLID.
- HORIZONTAL WALL JOINT REINFORCEMENT SHALL BE STANDARD 9 GAGE GALVANIZED LADDER OR TRUSS TYPE SPACED AT 16" O.C., UNLESS SHOWN OTHERWISE ON THE DRAWINGS.
- SPLICED WIRE REINFORCEMENT SHALL BE LAPPED AT LEAST 6" AND CONTAIN AT LEAST ONE CROSS WIRE OF EACH PIECE OF REINFORCEMENT WITHIN THE 6". LAP WITH STANDARD 'T' AND 'L' SHAPED PIECES AT INTERSECTIONS AND CORNERS.

WOOD FRAMING:

- SOLID SAWN WOOD FRAMING MEMBERS SHALL CONFORM TO THE SPECIFICATIONS LISTED IN THE LATEST EDITION OF THE "NATIONAL DESIGN SPECIFICATION FOR WOOD CONSTRUCTION": (NDS). UNLESS OTHERWISE NOTED, ALL WOOD FRAMING MEMBERS ARE DESIGNED TO
- SPRUCE-PINE-FIR (SPF) WITH THE FOLLOWING MINIMUM DESIGN VALUES:
- E=1,400,000 PSI, $F_b=875$ PSI, $F_v=135$ PSI 1.1. FRAMING: SPF #2.
- 1.2 PLATES: SPE #2
- 1.3. STUDS: SPF STUD GRADE.
- WALL STUD SPACING, (MAXIMUM 10' NOMINAL PLATE HEIGHT): 1 & 2 STORY EXTERIOR AND INTERIOR BEARING:
- 2x4 @ 16" O.C. OR 2x6 @ 24" O.C., U.N.O. BOTTOM OF 3 STORIES EXTERIOR AND INTERIOR BEARING: 2x6 @ 16" O.C., U.N.O.
- INTERIOR NON-BEARING: 2x @ 24" O.C., U.N.O.
- 3. ALL LUMBER EXPOSED TO WEATHER OR IN CONTACT WITH CONCRETE SHALL BE PRESERVATIVE TREATED SOUTHERN YELLOW PINE #2 OR BETTER.
- ANCHOR SILL PLATES IN ACCORDANCE W/ GENERAL STRUCTURAL NOTES.
- ALL BEAMS SPECIFIED ARE MINIMUM SIZES ONLY, LARGER MEMBERS MAY BE SUBSTITUTED AS NEEDED FOR EASE OF CONSTRUCTION. NAILS SHALL BE COMMON WIRE NAILS UNLESS OTHERWISE NOTED.
- BOLT HOLES AND LEAD HOLES FOR LAG SCREWS SHALL BE IN ACCORDANCE WITH NDS SPECIFICATIONS
- INDIVIDUAL STUDS FORMING A COLUMN SHALL BE ATTACHED WITH (2) ROWS 10d NAILS @ 6" O.C. STAGGERED, THE STUD COLUMN SHALL BE FULLY BLOCKED AT ALL FLOOR LEVELS TO ENSURE PROPER LOAD RANSFER. WALL SHEATHING SHALL BE NAILED TO EDGE OF EACH STUD.
- FACE NAIL ALL MULTI-PLY BEAMS AND HEADERS WITH (2) ROWS 16d COMMON NAILS @ 16" O.C., STAGGERED, OR PER MANUFACTURER'S SPECIFICATIONS FOR ENGINEERED LUMBER. APPLY NAILING FROM BOTH FACES FOR (3) OR MORE PLIES.
- 10. FASTEN 4-PLY BEAMS WITH (1) 1/2" DIAMETER THROUGH BOLT W/ NUTS AND WASHERS AT 12" O.C. STAGGERED TOP AND BOTTOM, 13" MINIMUM FDGF DISTANCE. (UNLESS OTHERWISE NOTED)
- 11. ALL BEAMS AND HEADERS SHALL HAVE (1)2x JACK STUD & (1)2x KING STUD UNLESS OTHERWISE NOTED. THE NUMBER OF STUDS INDICATED ON PLANS ARE THE TOTAL NUMBER OF JACK STUDS REQUIRED, UNLESS OTHERWISE NOTED.
- 12. PROVIDE KING STUDS AT EACH END OF HEADERS AS NOTED BELOW. (1) STUD UP TO 6' OPENING
- (2) STUDS UP TO 8' OPENING (3) STUDS UP TO 9' OPENING
- ALL BEAMS TO BE CONTINUOUSLY SUPPORTED LATERALLY AND SHALL BEAR FULL WIDTH ON THE SUPPORTING WALLS OR COLUMNS INDICATED WITH A MINIMUM OF TWO STUDS, UNLESS OTHERWISE NOTED. ALL BEAM SPLICES SHALL OCCUR OVER SUPPORTS.
- SOLID BLOCKING TO BE PROVIDED AT ALL POINT LOADS THROUGH FLOOR LEVELS TO THE FOUNDATION OR TO OTHER STRUCTURAL COMPONENTS.
- 15. ALL LUMBER SPECIFIED ON DRAWINGS IS INTENDED FOR DRY USE ONLY (MOISTURE CONTENT <19%) UNLESS OTHERWISE NOTED. 16. ALL WATERPROOFING AND FIRE SAFETY SYSTEMS ARE THE
- RESPONSIBILITY OF THE CONTRACTOR AND ARE TO BE DESIGNED AND DETAILED BY OTHERS. 17. ANY WOOD FRAME INTERIOR BEARING WALL STUDS THAT HAVE HOLES IN
- THE CENTER OF THE STUD UP TO 1" DIAMETER SHALL HAVE STUD PROTECTION SHIELDS. ALL HOLES OVER 1" IN DIAMETER FOR PLUMBING LINES, FTC. SHALL BE REPAIRED WITH SIMPSON HSS2 OR USP STS1. STUD SHOES, TYPICAL, UNLESS OTHERWISE NOTED.
- BEARING WALLS SHALL BE SHEATHED ON NOT LESS THAN ONE SIDE WITH OSB OR GYPSUM BOARD, BRIDGING SHALL BE INSTALLED NO GREATER THAN 4 FEET APART MEASURED VERTICALLY FROM EITHER END OF THE STUD IN LIFU OF SHEATHING.
- 19. DIAGONAL BRACING SHALL BE INSTALLED AT EACH END OF BASEMENT BEARING WALLS AND NOT MORE THAN 20' ON CENTER.

EXTERIOR WOOD FRAMED DECKS:

- DECKS ARE TO BE FRAMED IN ACCORDANCE WITH APPLICABLE BUILDING CODES AND AS REFERENCED ON THE STRUCTURAL PLANS, EITHER THROUGH CODE REFERENCES OR CONSTRUCTION DETAILS. PRESERVATIVE TREATED WOOD FRAMING TO BE SOUTHERN YELLOW
- PINE #2 OR BETTER. GUARD RAILS REQUIRED AT DECKS. DESIGN BY OTHERS TO MEET MINIMUM CODE REQUIREMENTS.
- PROVIDE DECK LATERAL LOAD AND BRACING CONNECTIONS PER BUILDING

RAFTER FRAMED ROOF CONSTRUCTION:

- PROVIDE 2x4x4'-0" RAFTER TIES AT 48" O.C.
- RAFTERS SHALL BE SUPPORTED BY PURLINS AND PURLIN BRACES AS SHOWN ON THE PLAN, PURLIN BRACES SHALL NOT BEAR ON ANY CEILING JOIST, STRONGBACK OR HEADER UNLESS SPECIFICALLY SHOWN ON PLAN. RAFTERS MAY BE SPLICED AT PURLIN LOCATIONS
- 3. CEILING JOISTS SHALL HAVE LATERAL SUPPORT W/ 1x4 FLAT BRACING ON TOP EDGE OF JOIST AT LOOSE JOIST ENDS (WHERE JOISTS NOT FASTENED TO RAFTERS) OR FULL DEPTH BLOCKING. FASTEN END OF BRACING TO RAFTER OR GABLE END FRAMING.
- FASTEN RAFTER AND CEILING JOIST WITH (6) 12d NAILS UNLESS
- PROVIDE VERTICAL 2x6 STRONGBACKS AT CEILING JOISTS @ 8'-0" O.C. TIE STRONGBACK ENDS TO GABLE STUDS OR RAFTERS WHERE POSSIBLE. PROVIDE BLOCKING BETWEEN TOP PLATES AND STRONGBACKS. PROVIDE 2x4 FLAT FASTENED TO EACH JOIST WITH (2) 12d NAILS, FASTEN STRONGBACK TO 2x4 FLAT WITH 12d NAILS @ 12" O.C. AND FASTENED TO EACH JOIST WITH (1) 12d TOENAIL.

WOOD TRUSSES (FLOOR & ROOF):

- THE WOOD TRUSS MANUFACTURER/FABRICATOR IS RESPONSIBLE FOR THE DESIGN OF THE WOOD TRUSSES. SUBMIT SEALED SHOP DRAWINGS AND SUPPORTING CALCULATIONS TO THE SER FOR REVIEW PRIOR TO FABRICATION. THE SER SHALL HAVE A MINIMUM OF (5) DAYS FOR REVIEW. THE REVIEW BY THE SER SHALL BE FOR OVERALL COMPLIANCE OF THE DESIGN DOCUMENTS. THE SER SHALL ASSUME NO RESPONSIBILITY FOR THE CORRECTNESS OF THE STRUCTURAL DESIGN FOR THE WOOD TRUSSES.
- 2. THE WOOD TRUSSES SHALL BE DESIGNED FOR ALL REQUIRED LOADINGS AS SPECIFIED IN THE LOCAL BUILDING CODE, THE ASCE STANDARD "MINIMUM DESIGN LOADS FOR BUILDINGS AND OTHER STRUCTURES. (ASCE 7), AND THE LOADING REQUIREMENTS SHOWN ON THESE SPECIFICATIONS. THE TRUSS DRAWINGS SHALL BE COORDINATED WITH ALL OTHER CONSTRUCTION DOCUMENTS AND PROVISIONS PROVIDED FOR LOADS SHOWN ON THESE DRAWINGS INCLUDING BUT NOT LIMITED TO HVAC EQUIPMENT, PIPING, AND ARCHITECTURAL FIXTURES ATTACHED TO THE TRUSSES.
- THE TRUSSES SHALL BE DESIGNED, FABRICATED, AND ERECTED IN ACCORDANCE WITH THE LATEST EDITION OF THE ANSI/TPI 1: "NATIONAL DESIGN STANDARD FOR METAL PLATE CONNECTED WOOD TRUSS
- THE TRUSS MANUFACTURER SHALL PROVIDE ADFOLIATE BRACING INFORMATION IN ACCORDANCE WITH "BUILDING COMPONENT SAFETY INFORMATION GUIDE TO GOOD PRACTICE FOR HANDLING, INSTALLING, RESTRAINING & BRACING OF METAL PLATE CONNECTED WOOD TRUSSES" (BCSI). THIS BRACING, BOTH TEMPORARY AND PERMANENT, SHALL BE SHOWN ON THE SHOP DRAWINGS, ALSO, THE SHOP DRAWINGS SHALL SHOW THE REQUIRED ATTACHMENTS FOR THE TRUSSES.
- THE CONTRACTOR IS RESPONSIBLE FOR INSTALLING TEMPORARY BRACING AND SHORING FOR THE FLOOR AND ROOF TRUSSES AS REQUIRED DURING CONSTRUCTION, AT A MINIMUM, CONTRACTOR SHALL FOLLOW THE REQUIREMENTS OF THE LATEST BCSI. THE CONTRACTOR SHALL KEEP A COPY OF THE BCSI SUMMARY SHEETS ON SITE.
- THE CONTRACTOR IS RESPONSIBLE FOR INSTALLING ALL PERMANENT TRUSS BRACING SHOWN IN THE STRUCTURAL DRAWINGS AND IN THE TRUSS DESIGNS, ALL CONTINUOUS LATERAL BRACING OF WEBS REQUIRES BRACES. REFER TO BCSI SUMMARY SHEET B3 FOR TYPES OF DIAGONAL BRACES TO PROVIDE AT EACH CONTINUOUS LATERAL BRACE LINE, SUCH DIAGONAL BRACES SHALL NOT BE SPACED MORE THAN 20 FEET O.C. DIAGONAL BRACES SHALL BE FASTENED TO EACH TRUSS WEB WITH A MINIMUM OF TWO 10d FACE NAILS. WHERE CONTINUOUS LATERAL BRACING CANNOT BE INSTALLED, DUE TO A MINIMUM OF THREE ADJACENT TRUSSES NOT BEING IDENTICAL. THE CONTRACTOR SHALL COORDINATE WITH THE TRUSS SPECIALTY ENGINEER/MANUFACTURER TO DETERMINE WHAT TYPE OF ALTERNATE BRACE (I.E., T OR L BRACE, ETC.) IS REQUIRED.
- ANY CHORDS OR TRUSS WEBS SHOWN ON THESE DRAWINGS HAVE BEEN SHOWN AS A REFERENCE ONLY. THE FINAL DESIGN OF THE TRUSSES SHALL RE PER THE MANUFACTURER
- TRUSS LAYOUT AND PLACEMENT BY MANUFACTURER TO COINCIDE WITH THE SUPPORT LOCATIONS SHOWN ON THE SEALED STRUCTURAL DRAWINGS, TRUSS PROFILES TO BE SEALED BY THE TRUSS MANUFACTURER. TRUSS PLANS TO BE COORDINATED WITH THE SEALED STRUCTURAL DRAWINGS.
- TRUSS MANUFACTURER TO PROVIDE REQUIRED UPLIFT CONNECTORS FOR ALL TRUSSES.
- 10. PROVIDE SIMPSON H2.5A, USP RT7 OR EQUIVALENT AT EACH TRUSS TO TOP PLATE CONNECTION, UNLESS OTHERWISE NOTED.

WOOD STRUCTURAL PANELS:

- 1. FABRICATION AND PLACEMENT OF STRUCTURAL WOOD SHEATHING SHALL BE IN ACCORDANCE WITH THE APA DESIGN/CONSTRUCTION GUIDE "RESIDENTIAL AND COMMERCIAL," AND ALL OTHER APPLICABLE APA STANDARDS
- ALL REQUIRED WOOD SHEATHING SHALL BEAR THE MARK OF THE
- WOOD WALL SHEATHING SHALL COMPLY WITH THE REQUIREMENTS OF LOCAL BUILDING CODES FOR THE APPROPRIATE STATE AS INDICATED ON THESE DRAWINGS, REFER TO WALL BRACING NOTES IN PLAN SE FOR MORE INFORMATION. EXTERIOR WALLS TO BE FULLY SHEATHED USING 1/6" OSB OR PLYWOOD MINIMUM. AT BRACED WALL PANELS, PROVIDE BLOCKING AT ALL SHEET EDGES NOT FALLING ON STUDS OR PLATES.
- ROOF SHEATHING SHALL BE APA RATED SHEATHING EXPOSURE 1 OR 2. ROOF SHEATHING SHALL BE CONTINUOUS OVER TWO SUPPORTS MINIMUM AND ATTACHED TO ITS SUPPORTING ROOF FRAMING WITH Bd NAILS AT 6" O.C. AT PANEL EDGES AND AT 12" O.C. IN PANEL FIELD UNLESS OTHERWISE NOTED ON THE PLANS. SHEATHING SHALL BE APPLIED WITH THE LONG DIRECTION PERPENDICULAR TO FRAMING. SHEATHING SHALL HAVE A SPAN RATING CONSISTENT WITH THE FRAMING SPACING. PROVIDE SUITABLE EDGE SUPPORT BY USE OF PLYWOOD CLIPS OR LUMBER BLOCKING UNLESS OTHERWISE NOTED PANEL END JOINTS SHALL OCCUR OVER FRAMING, ROOF SHEATHING TO BE 1/6" OSB MINIMUM.
- WOOD FLOOR SHEATHING SHALL BE APA RATED SHEATHING EXPOSURE 1 OR 2. ATTACH SHEATHING TO ITS SUPPORTING FRAMING WITH (1) 10d NAIL AT 6" O.C. AT PANEL EDGES AND AT 12" O.C. IN PANEL FIELD UNLESS OTHERWISE NOTED ON THE PLANS. SHEATHING SHALL BE APPLIED PERPENDICULAR TO FRAMING. SHEATHING SHALL HAVE A SPAN RATING CONSISTENT WITH THE FRAMING SPACING. PROVIDE SUITABLE EDGE SUPPORT BY USE OF T&G PLYWOOD OR LUMBER BLOCKING UNLESS OTHERWISE NOTED. PANEL END JOINTS SHALL OCCUR OVER FRAMING.
- SHEATHING SHALL HAVE A 1/8" GAP AT PANEL ENDS AND EDGES AS RECOMMENDED IN ACCORDANCE WITH THE APA.

STRUCTURAL FIBERBOARD PANELS:

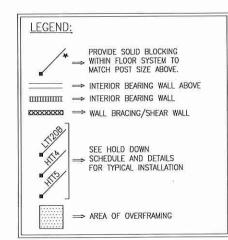
- STRUCTURAL FIBERBOARD SHEATHING SHALL ONLY BE USED WHERE SPECIFICALLY NOTED ON THE STRUCTURAL PLANS.
- FABRICATION AND PLACEMENT OF STRUCTURAL FIBERBOARD SHEATHING SHALL BE IN ACCORDANCE WITH THE APPLICABLE AFA STANDARDS
- FIBERBOARD WALL SHEATHING SHALL COMPLY WITH THE REQUIREMENTS OF LOCAL BUILDING CODES FOR THE APPROPRIATE STATE AS INDICATED ON THESE DRAWINGS. REFER TO WALL BRACING NOTES IN PLAN SET FOR MORE INFORMATION.
- SHEATHING SHALL HAVE A X" GAP AT PANEL ENDS AND EDGES AS RECOMMENDED IN ACCORDANCE WITH THE AFA.

STRUCTURAL STEEL:

- STRUCTURAL STEEL SHALL BE FABRICATED AND ERECTED IN ACCORDANCE WITH THE AMERICAN INSTITUTE OF STEEL CONSTRUCTION "CODE OF STANDARD PRACTICE FOR STEEL BUILDINGS AND BRIDGES" AND OF THE MANUAL OF STEEL CONSTRUCTION "LOAD RESISTANCE FACTOR DESIGN" LATEST EDITIONS.
- ALL STEEL SHALL HAVE A MINIMUM YIELD STRESS (F,) OF 50 KSI UNLESS OTHERWISE NOTED.
- WELDING SHALL CONFORM TO THE LATEST EDITION OF THE AMERICAN WELDING SOCIETY'S STRUCTURAL WELDING CODE AWA D1.1. ELECTRODES FOR SHOP AND FIELDING WELDING SHALL BE CLASS E70XX. ALL WELDING SHALL BE PERFORMED BY A CERTIFIED WELDER PER THE ABOVE STANDARDS.
- ALL STEEL BEAMS TO BE SUPPORTED AT EACH END WITH A MINIMUM BEARING LENGTH OF 31/2" AND FULL FLANGE WIDTH UNLESS OTHERWISE NOTED. BEAMS MUST BE ATTACHED AT EACH END WITH A MINIMUM OF FOUR 16d NAILS OR (2) 1/2" x 4" LAG SCREWS
- INSTALL 2x WOOD PLATE ON TOP OF STEEL BEAMS, RIPPED TO MATCH BEAM WIDTH. FASTEN PLATE TO BEAM W/ HILTI X-DNI 52 P8 PINS AT 12" O.C. STAGGERED OR 1/2" DIAMETER BOLTS AT 24"

MECHANICAL FASTENERS:

- ALL METAL HARDWARE AND FASTENERS TO BE SIMPSON STRONG-TIE OR APPROVED FOLIVALENT
- ALL HARDWARE AND FASTENERS IN CONTACT WITH PRESERVATIVE PRESSURE TREATED LUMBER SHALL BE HOT DIPPED GALVANIZED IN ACCORDANCE WITH ASTM A 153, G-185.
- MANY OF THE NEW PRESSURE TREATED WOODS USE CHEMICALS THAT ARE CORROSIVE TO STEEL. IT IS THE CONTRACTOR'S RESPONSIBILITY TO VERIFY THE TYPE OF WOOD TREATMENT AND SELECT APPROPRIATE CONNECTORS THAT WILL RESIST THE APPLICABLE CORROSIVE CHEMICALS



SPAN	LINTEL SIZE	END BEARING
UP TO 3'-0"	3½"x3½"x¼"	4"
UP TO 6'-3"	5"x3½"x¾6" L.L.V.	8"
UP TO 9'-6"	6"x3½"x¾6" L.L.V.	12"

SPANS OVER 4'-0" SHALL BE SHORED UP UNTIL CURED.



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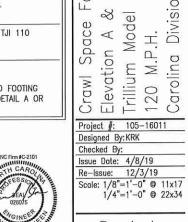
LEGEND PROVIDE SOLID BLOCKING ⇒ WITHIN FLOOR SYSTEM TO MATCH POST SIZE ABOVE. ⇒ BEARING WALL ABOVE ПШШПП ⇒ INTERIOR BEARING WALL ⇒ BRACED WALL PANEL 48" WSP (SEE KSE STRUCTURAL DETAIL SHEETS FOR BRACED WALL PANEL SHEATHING FASTENING & BLOCKING DETAILS)

REFER TO KSE STRUCTURAL DETAILS SHEETS FOR GENERAL STRUCTURAL NOTES AND TYPICAL DETAILS

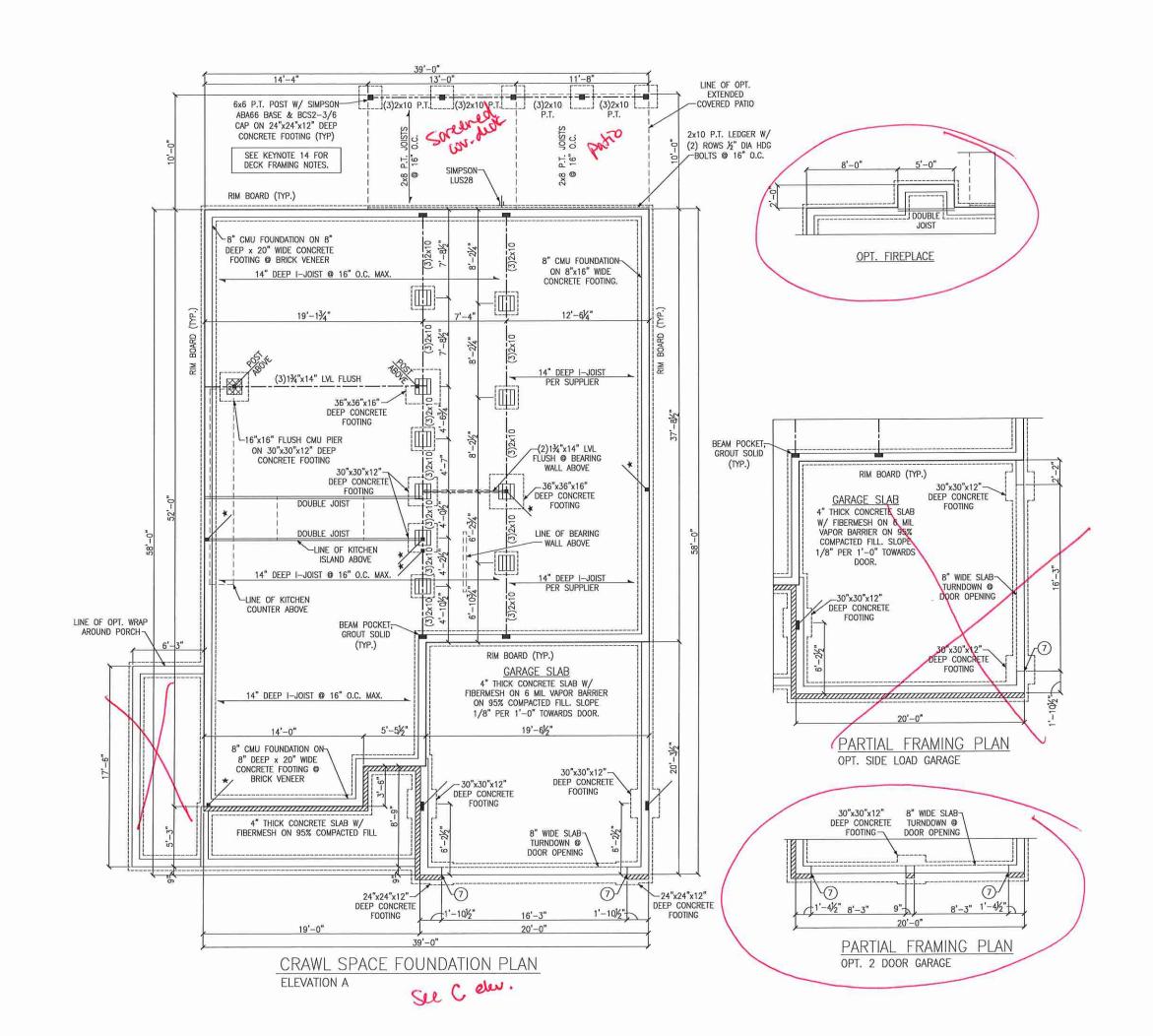
FLOOR FRAMING TO BE 14" DEEP TJI 110 SERIES OR EQUAL, SPACING PER MANUFACTURER.

KEYNOTES

(7) REINFORCE 8" CMU WALL AND FOOTING UNDER PORTAL FRAME PER DETAIL A OR







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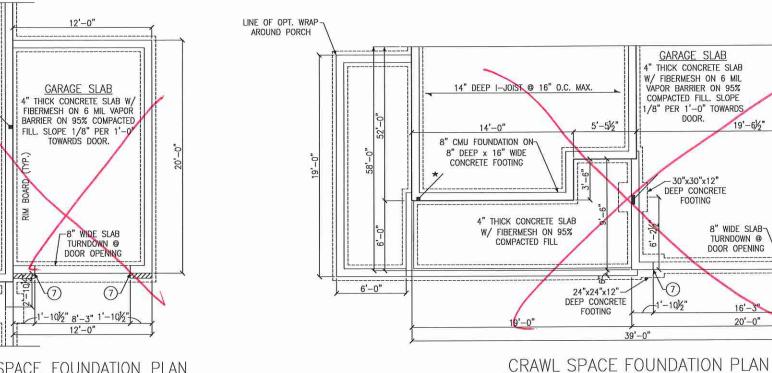
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Project #: 105-16011 Designed By: KRK

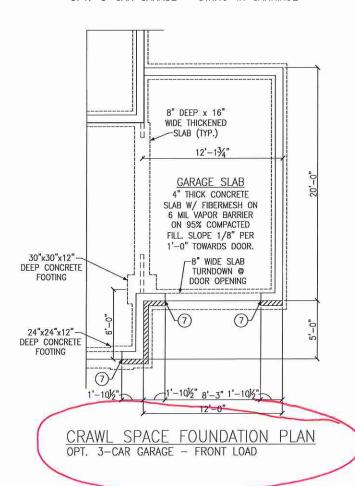
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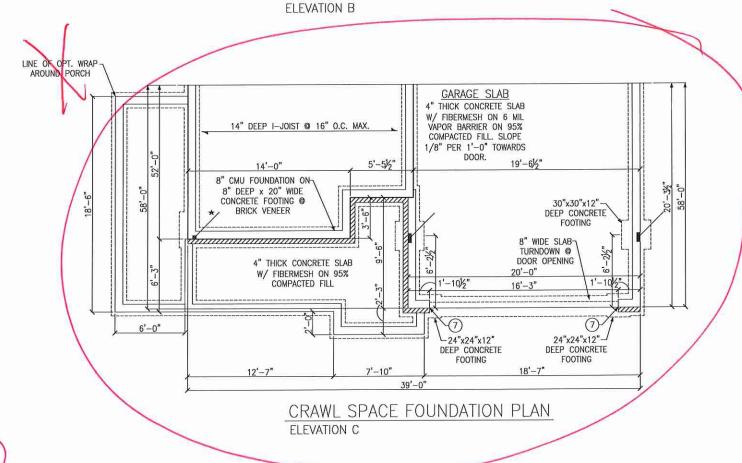
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CRAWL SPACE FOUNDATION PLAN OPT. 3-CAR GARAGE - SWING-IN CARRIAGE





30"x30"x12"-

1'-10%"

20'-0"

-24"x24"x12" DEEP CONCRETE

FOOTING

DEEP CONCRETE FOOTING

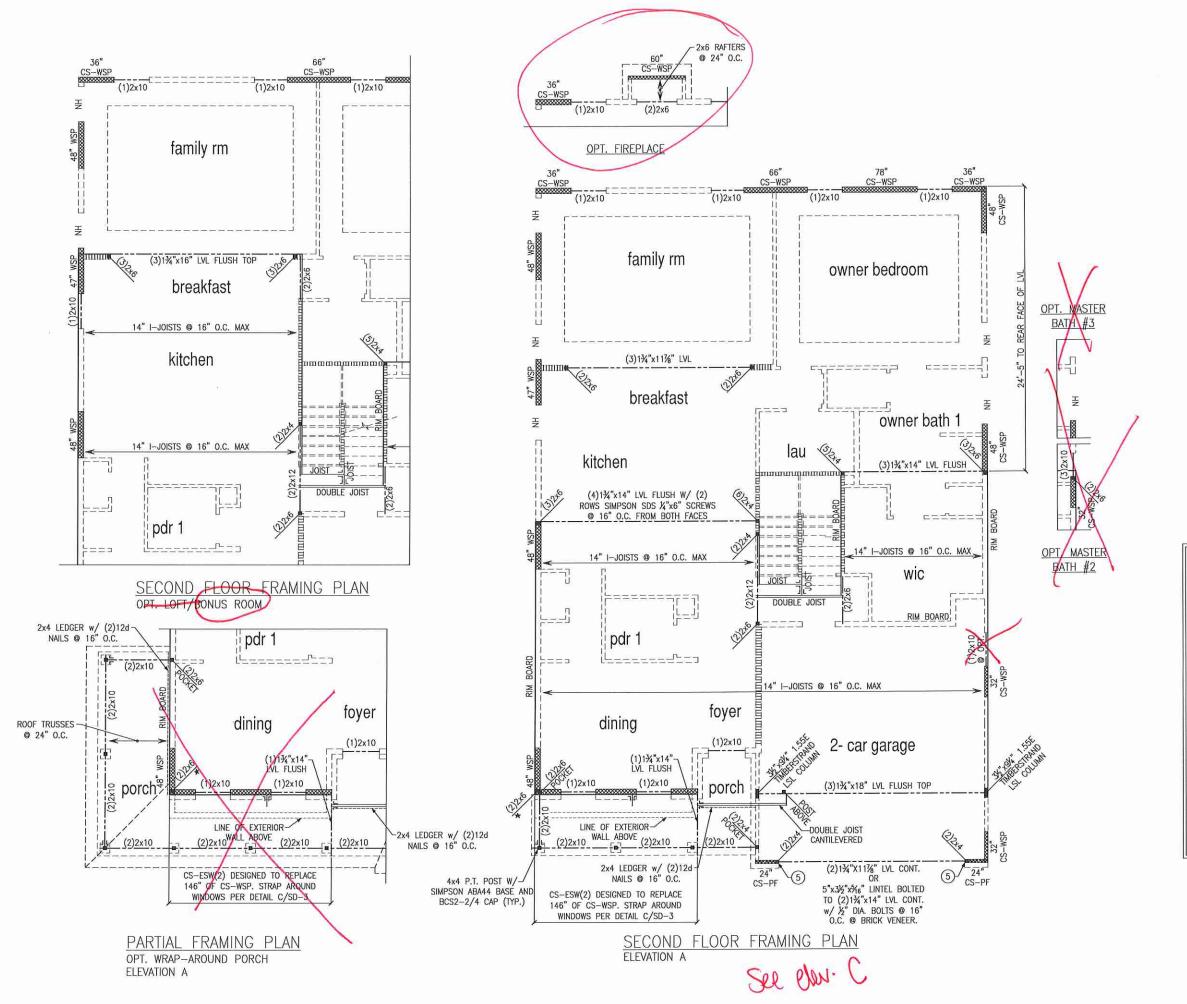
> **LEGEND** PROVIDE SOLID BLOCKING WITHIN FLOOR SYSTEM TO MATCH POST SIZE ABOVE. ⇒ BEARING WALL ABOVE ПШШШІ ⇒ INTERIOR BEARING WALL BRACED WALL PANEL 48" WSP (SEE KSE STRUCTURAL DETAIL SHEETS FOR BRACED WALL PANEL SHEATHING FASTENING & BLOCKING DETAILS) REFER TO KSE STRUCTURAL DETAILS SHEETS FOR GENERAL STRUCTURAL NOTES AND TYPICAL DETAILS

FLOOR FRAMING TO BE 14" DEEP TJI 110 SERIES OR EQUAL, SPACING PER MANUFACTURER.

KEYNOTES:

(7) REINFORCE 8" CMU WALL AND FOOTING UNDER PORTAL FRAME PER DETAIL A OR









LEGEND

PROVIDE SOLID BLOCKING ⇒ WITHIN FLOOR SYSTEM TO MATCH POST SIZE ABOVE.

⇒ BEARING WALL ABOVE TOTODIOIC 48" WSP

⇒ INTERIOR BEARING WALL (SEE KSE STRUCTURAL DETAIL SHEETS FOR BRACED WALL PANEL SHEATHING FASTENING

& BLOCKING DETAILS) REFER TO KSE STRUCTURAL DETAILS SHEETS FOR GENERAL STRUCTURAL NOTES AND TYPICAL DETAILS

PLAN DESIGNED WITH 9' WALL PLATES

FLOOR FRAMING TO BE 14" DEEP TJI 110 I-JOISTS @ 19.2" O.C. MAXIMUM OR EQUAL

- (4) INSTALL ONE PANEL CS-PF PORTAL FRAME PER DETAIL A OR B/SD-4.
- (5) INSTALL TWO PANEL CS-PF PORTAL FRAME PER DETAIL A OR B/SD-4.



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Plans

Framing 2 Options — RH

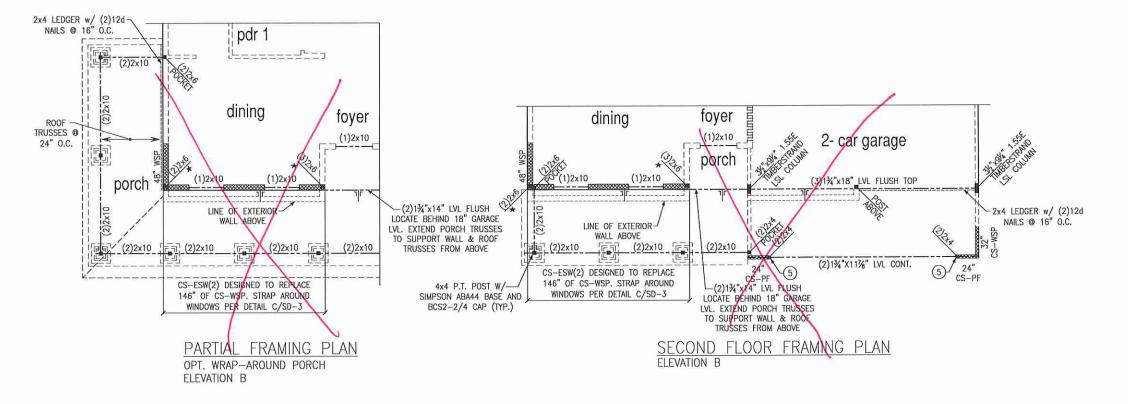
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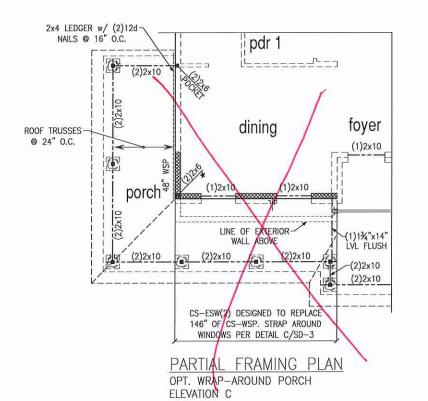
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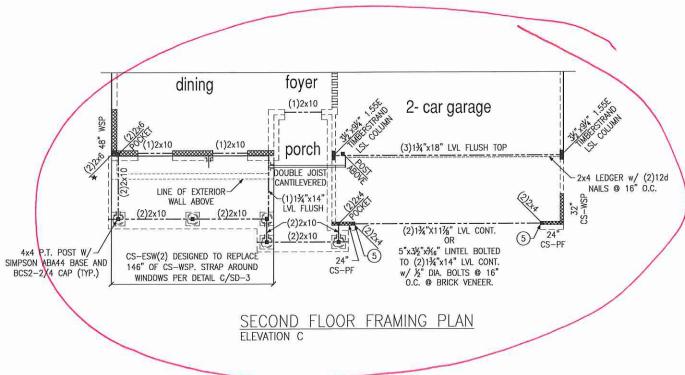


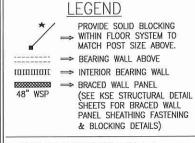












REFER TO KSE STRUCTURAL DETAILS SHEETS FOR GENERAL STRUCTURAL NOTES AND TYPICAL DETAILS

PLAN DESIGNED WITH 9' WALL PLATES

FLOOR FRAMING TO BE 14" DEEP TJI 110 I-JOISTS @ 19.2" O.C. MAXIMUM OR EQUAL

- (4) INSTALL ONE PANEL CS-PF PORTAL FRAME PER DETAIL A OR B/SD-4.
- (5) INSTALL TWO PANEL CS-PF PORTAL FRAME PER DETAIL A OR B/SD-4.



Carolina Division Second Floor F Elevations B, C Trillium Model 120 M.P.H. Project #: 105-16011 Designed By: KRK

Plans

Framing Plans C & Options

Floor ns B,

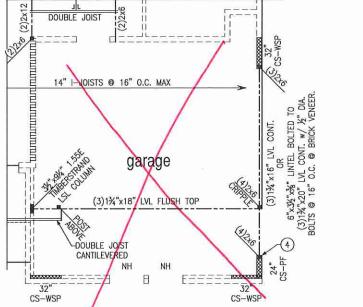
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Checked By: Issue Date: 4/8/19

Re-Issue: 12/3/19 Scale: 1/8"=1'-0" @ 11x17 1/4"=1'-0" @ 22x34







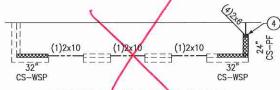


PARTIAL FRAMING PLAN

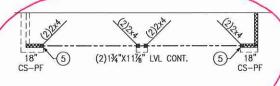
OPT. SIDE LOAD GARAGE

ELEVATION A

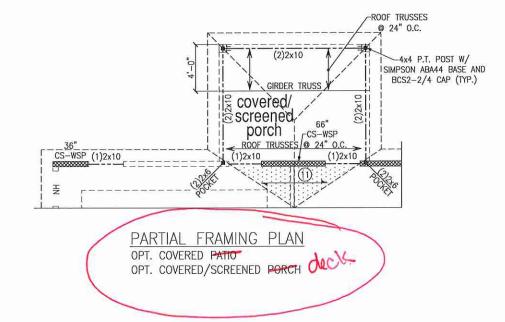
<u>PARTIAL</u> FRAMING PLAN OPT. SIDE LOAD GARAGE ELEVATION B

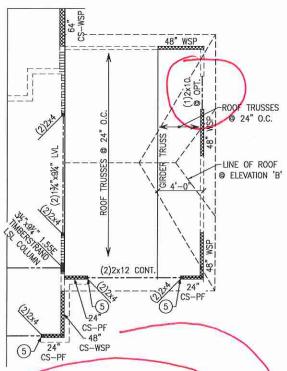


PARTIAL/ FRAMING PLAN OPT. SIDE LOAD GARAGE ELEVATION C

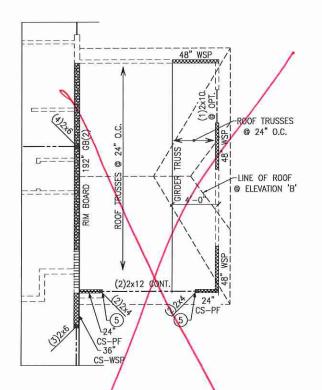


PARTIAL FRAMING PLAN OPT. 2 DOOR GARAGE





PARTIAL FRAMING PLAN OPT. 3-CAR GARAGE - FRONT LOAD



FRAMING PLAN OPT. 3-CAR GARAGE - SWING-IN CARRIAGE



PROVIDE SOLID BLOCKING
WITHIN FLOOR SYSTEM TO MATCH POST SIZE ABOVE.

⇒ BEARING WALL ABOVE ITITITITIE => INTERIOR BEARING WALL

⇒ BRACED WALL PANEL (SEE KSE STRUCTURAL DETAIL SHEETS FOR BRACED WALL PANEL SHEATHING FASTENING & BLOCKING DETAILS)

REFER TO KSE STRUCTURAL DETAILS SHEETS FOR GENERAL STRUCTURAL NOTES AND TYPICAL DETAILS

PLAN DESIGNED WITH 9' WALL PLATES

FLOOR FRAMING TO BE 14" DEEP TJI 110 I-JOISTS @ 19.2" O.C. MAXIMUM OR EQUAL

KEYNOTES:

- (4) INSTALL ONE PANEL CS-PF PORTAL FRAME PER DETAIL A OR B/SD-4.
- 5) INSTALL TWO PANEL CS-PF PORTAL FRAME PER DETAIL A OR B/SD-4.



Second Floor F Options Trillium Model 120 M.P.H. Carolina Divisio Project #: 105-16011 Designed By: KRK Checked By: Issue Dote: 4/8/19
Re-Issue: 12/3/19
Scole: 1/8"=1'-0" @ 11x17
1/4"=1'-0" @ 22x34

F

Division

Plans

Framing

S - 2.2



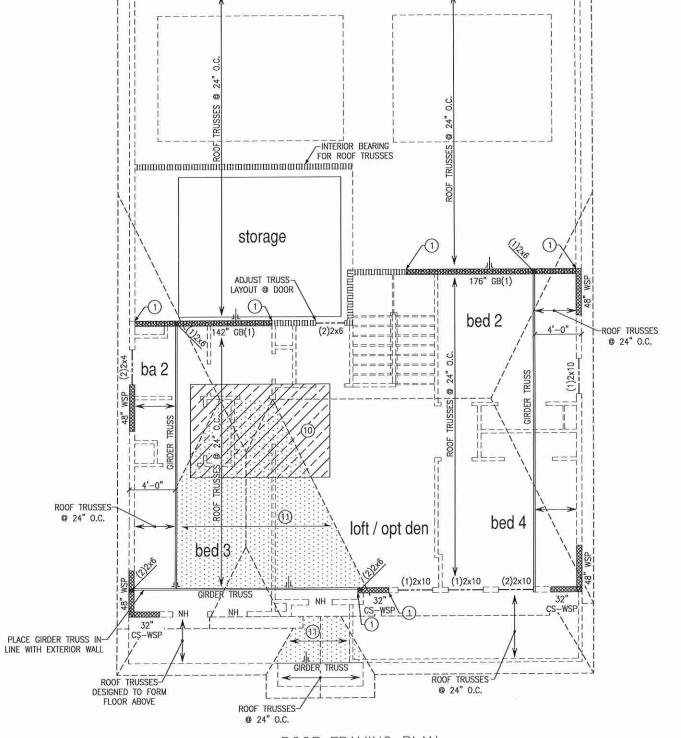
LEGEND PROVIDE SOLID BLOCKING
WITHIN FLOOR SYSTEM TO
MATCH POST SIZE ABOVE. ⇒ BEARING WALL ABOVE ⇒ BRACED WALL PANEL (SEE KSE STRUCTURAL DETAIL SHEETS FOR BRACED WALL PANEL SHEATHING FASTENING & BLOCKING DETAILS)

REFER TO KSE STRUCTURAL DETAILS SHEETS FOR GENERAL STRUCTURAL NOTES AND TYPICAL DETAILS

PLAN DESIGNED WITH 8' WALL PLATES KEYNOTES:

- (1) CONNECT STUD AT END OF BRACED WALL PANEL TO FRAMING BELOW WITH A 30" LONG SIMPSON CS22 COIL STRAP WITH MIN 8-10d NAILS EACH END.
- (10) 8'x16' HVAC PLATFORM TRUSSES DESIGNED TO SUPPORT HVAC UNITS.
- 11) 2x6 OVERFRAMING W/ 2x8 RIDGE AND VALLEY PLATES OR VALLEY SET TRUSSES @ 24" O.C. (TYP.)





1

storage

loft / opt den

CS-WSP

222" GB(1)

loft 2 / bonus rm

(1)

ROOF TRUSSES-@ 24" O.C.

ROOF FRAMING PLAN
OPT. LOFF 2 BONUS ROOM

GIRDER TRUSS

bed 3

ROOF TRUSSES-@ 24" O.C.

ROOF TRUSSES-

@ 24" O.C.

PLACE GIRDER TRUSS IN-LINE WITH EXTERIOR WALL

ba 2

32"

CS,-WSP

ROOF TRUSSES-

DESIGNED TO FORM

FLOOR ABOVE

ROOF FRAMING PLAN ELEVATION C

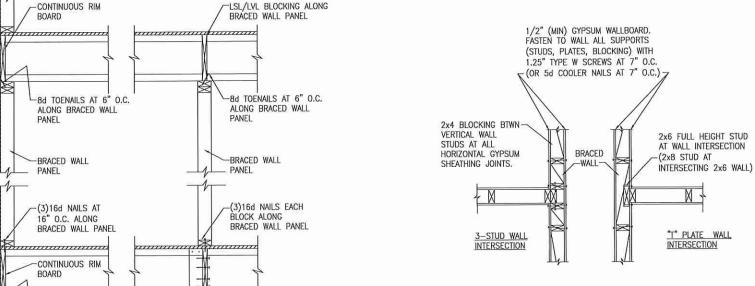
120 M.P.H. Carolina Division Framing tion C & Roof Framing Elevation C & Trillium Model 120 M.P.H. Project #: 105-16011 Designed By: KRK Checked By: Issue Date: 4/8/19 Re-Issue: 12/3/19 Scale: 1/8"=1'-0" @ 11x17 1/4"=1'-0" @ 22x34

Plans Option - RH





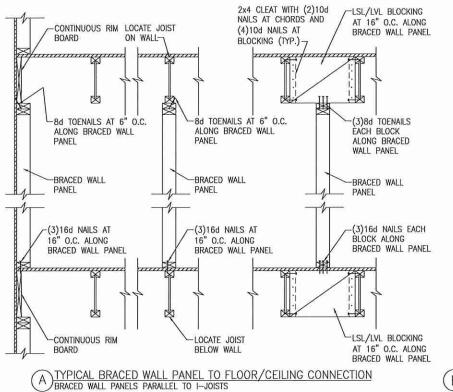


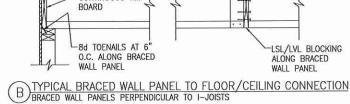


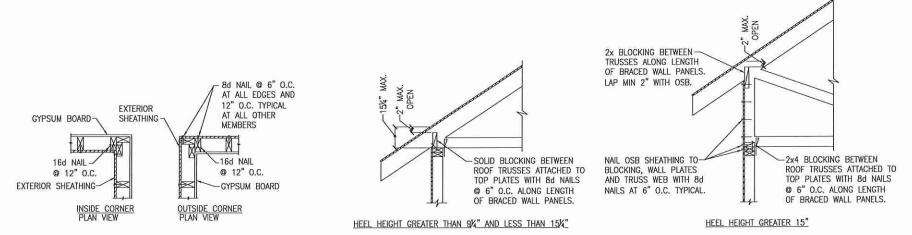
(C) METHOD GB(1) AND GB(2) INTERSECTION DETAILS

BRACED WALL INTERSECTIONS MAY BE FRAMED USING EITHER THE

3-STUD OR THE T-PLATE METHOD.







(D) TYPICAL EXTERIOR CORNER WALL FRAMING

ROOF TRUSS BEARING/BLOCKING AT BRACED WALL PANELS ONLY REQUIRED AT BRACED WALL PANELS

Detail

Wall

raced

 $\bar{\omega}$

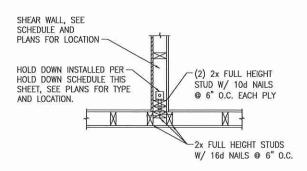
Project #: 105-19000 Designed By: KRK Checked By:

120/130 M.P.H. North Carolina











HOLD DOWN INSTALLED PER HOLD

DOWN SCHEDULE THIS SHEET, SEE

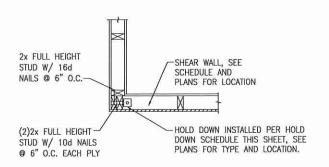
-A36 ALL THREAD ROD DRILLED AND

EPOXIED 6" INTO FOOTING USING SIMPSON

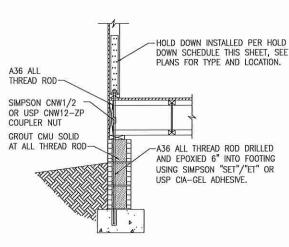
"SET"/"ET" OR USP CIA-GEL ADHESIVE.

PLANS FOR TYPE AND LOCATION.

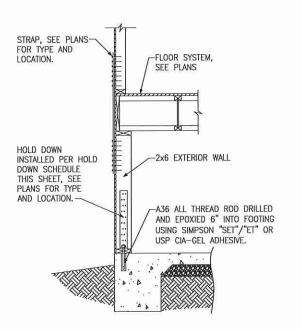
(D)HOLD DOWN AT MONOLITHIC SLAB FOUNDATION



B TYPICAL HOLD DOWN DETAIL



(E)HOLD DOWN AT CRAWL SPACE FOUNDATION



(C)HOLD DOWN AT STEMWALL SLAB FOUNDATION

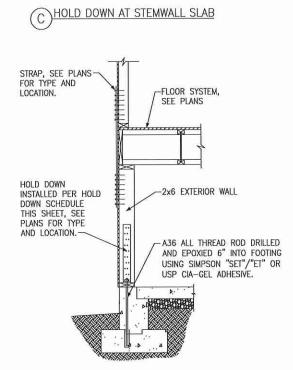
-HOLD DOWN INSTALLED PER HOLD DOWN SCHEDULE THIS SHEET, SEE PLANS FOR TYPE AND LOCATION.

-A36 ALL THREAD ROD DRILLED AND

EPOXIED 6" INTO FOOTING USING SIMPSON

"SET"/"ET" OR USP CIA-GEL ADHESIVE.

F HOLD DOWN AT BASEMENT FOUNDATION MONOLITHIC TURN-DOWN



-SIMPSON HOLD DOWN INSTALLED PER HOLD DOWN SCHEDULE THIS SHEET

- A36 ALL THREAD ROD DRILLED AND

EPOXIED 6" INTO FOOTING USING

SIMPSON "SET" OR "ET" ADHESIVE.

G HOLD DOWN AT BASEMENT FOUNDATION
STEM WALL

	HOLI	DOWN SCH	EDULE
HOLD DOWN		ALL THREAD ROD	FASTENERS
SIMPSON	USP	ALL IMMEAU ROD	Matericia
LTT20B	LTS20B	½" DIA.	(10)10d NAILS
HTT4	HTT16	5⁄8" DIA.	(18)16dx2½" LONG NAILS
НТТ5	HTT45	%" DIA.	(26)16dx2½" LONG NAILS



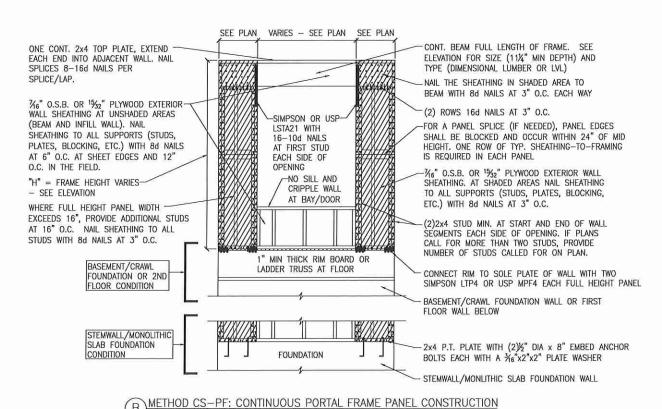
120/130 M.P.H. North Carolina Down Hold Project #: 105-19000 Designed By: KRK Checked By: Issue Date: 1/1/19 Re-Issue: Scale: 1/8"=1'-0" @ 11x17 1/4"=1'-0" @ 22x34

Detai

-HOLD DOWN INSTALLED PER HOLD DOWN SCHEDULE THIS SHEET, SEE PLANS FOR TYPE AND LOCATION.

ONE BRACED WALL SEGMEN

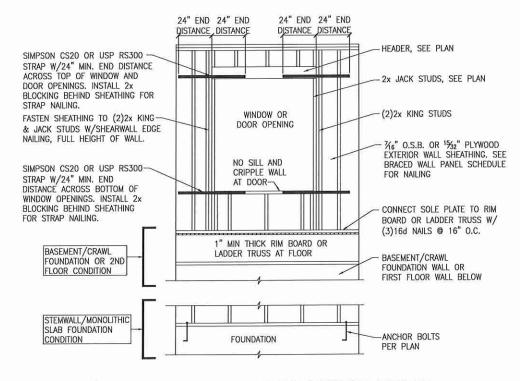
TWO BRACED WALL SEGMENTS



BRACED WALL PANEL AND ENGINEERED SHEAR WALL SCHEDULE PANEL TYPES MATERIAL **FASTENERS** PANEL TYPE 6D OR 8D COMMON NAILS AT 6" O.C. AT SHEET EDGES AND 12" O.C. AT INTERMITTENT WOOD 7/16" OSB INTERMEDIATE SUPPORTS. ENGINEERED ALTERNATIVE: 16 GAGE BY 1.75" LONG STRUCTURAL PANEL STAPLES AT 3" O.C. AT SHEET EDGES AND 6" O.C. AT INTERMEDIATE SUPPORTS INTERMITTENT GYPSUM 1.5" LONG GALV. ROOFING NAILS, 6d COMMON NAILS, OR 1.25" LONG TYPE W 1/2" GYPSUM GB(1) BOARD (SHEATHING ONE DRYWALL SCREWS AT 7" O.C. AT SHEET EDGES AND INTERMEDIATE SUPPORTS. FACE OF WALL) INTERMITTENT GYPSUM 1.5" LONG GALV. ROOFING NAILS, 6d COMMON NAILS, OR 1.25" LONG TYPE W GB(1)-4BOARD (SHEATHING ONE 1/2" GYPSUM DRYWALL SCREWS AT 4" O.C. AT SHEET EDGES AND INTERMEDIATE SUPPORTS. FACE OF WALL) INTERMITTENT GYPSUM 1.5" LONG GALV. ROOFING NAILS, 6d COMMON NAILS, OR 1.25" LONG TYPE W BOARD (SHEATHING BOTH 1/2" GYPSUM DRYWALL SCREWS AT 7" O.C. AT SHEET EDGES AND INTERMEDIATE SUPPORTS. FACES OF WALL) 6D OR 8D COMMON NAILS AT 6" O.C. AT SHEET EDGES AND 12" O.C. AT CONTINUOUS SHEATHED INTERMEDIATE SUPPORTS. ENGINEERED ALTERNATIVE: 16 GAGE BY 1.75" LONG CS-WSP WOOD STRUCTURAL 7/16" OSB STAPLES AT 3" O.C. AT SHEET EDGES AND 6" O.C. AT INTERMEDIATE SUPPORTS NAILING PER DETAIL 7/16" OSB CONTINUOUS SHEATHED CS-PF PORTAL FRAME NAILING PER DETAIL PORTAL FRAME WITH 7/16" OSB HOLD DOWNS 8D COMMON NAILS AT 6" O.C. AT SHEET EDGES AND 12" O.C. AT 7/16" OSB ENGINEERED SHEAR CS-ESW(1) INTERMEDIATE SUPPORTS. CONTINUOUS OSB AROUND DOOR/WINDOW OPENINGS WALL, TYPE 1 8D COMMON NAILS AT 4" O.C. AT SHEET EDGES AND 12" O.C. AT 7/16" OSB CS-ESW(2) INTERMEDIATE SUPPORTS. CONTINUOUS OSB AROUND DOOR/WINDOW OPENINGS WALL, TYPE 2 7/16" OSB 8D COMMON NAILS AT 3" O.C. AT SHEET EDGES AND 12" O.C. AT ENGINEERED SHEAR CS-ESW(3) INTERMEDIATE SUPPORTS. CONTINUOUS OSB AROUND DOOR/WINDOW OPENINGS WALL, TYPE 3

BRACED WALL PANEL NOTES

- ALL BRACED WALL PANELS, EXCEPT GB(1) & GB(2), SHALL HAVE 2x BLOCKING BETWEEN WALL STUDS AT ALL HORIZONTAL SHEET EDGES.
- PROVIDE NAILING/BLOCKING ABOVE AND BELOW ALL BRACED WALL PANELS PER KSE BRACED WALL DETAILS.
- SHEATH ALL EXTERIOR WALLS OF THE HOUSE WITH ½6" O.S.B., OR ½2" PLYWOOD, FASTENED PER IRC. AT EXTERIOR CORNERS, SHEATHING SHALL BE FASTENED PER KSE BRACED WALL DETAILS. AT INTERIOR WALL INTERSECTIONS, FASTEN STUDS & WALL BRACING
- BRACED WALL PANELS AND ENGINEERED SHEAR WALLS ARE PROVIDED PER IRC. PANEL LENGTHS SHOWN ON PLANS ARE THE MINIMUM LENGTH REQUIRED



(C) WINDOW OR DOOR REINFORCEMENT IN ENGINEERED SHEAR WALL ONLY REQUIRED WHERE SPECIFED ON PLANS





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工 M. M. 0 30 \circ orth 20

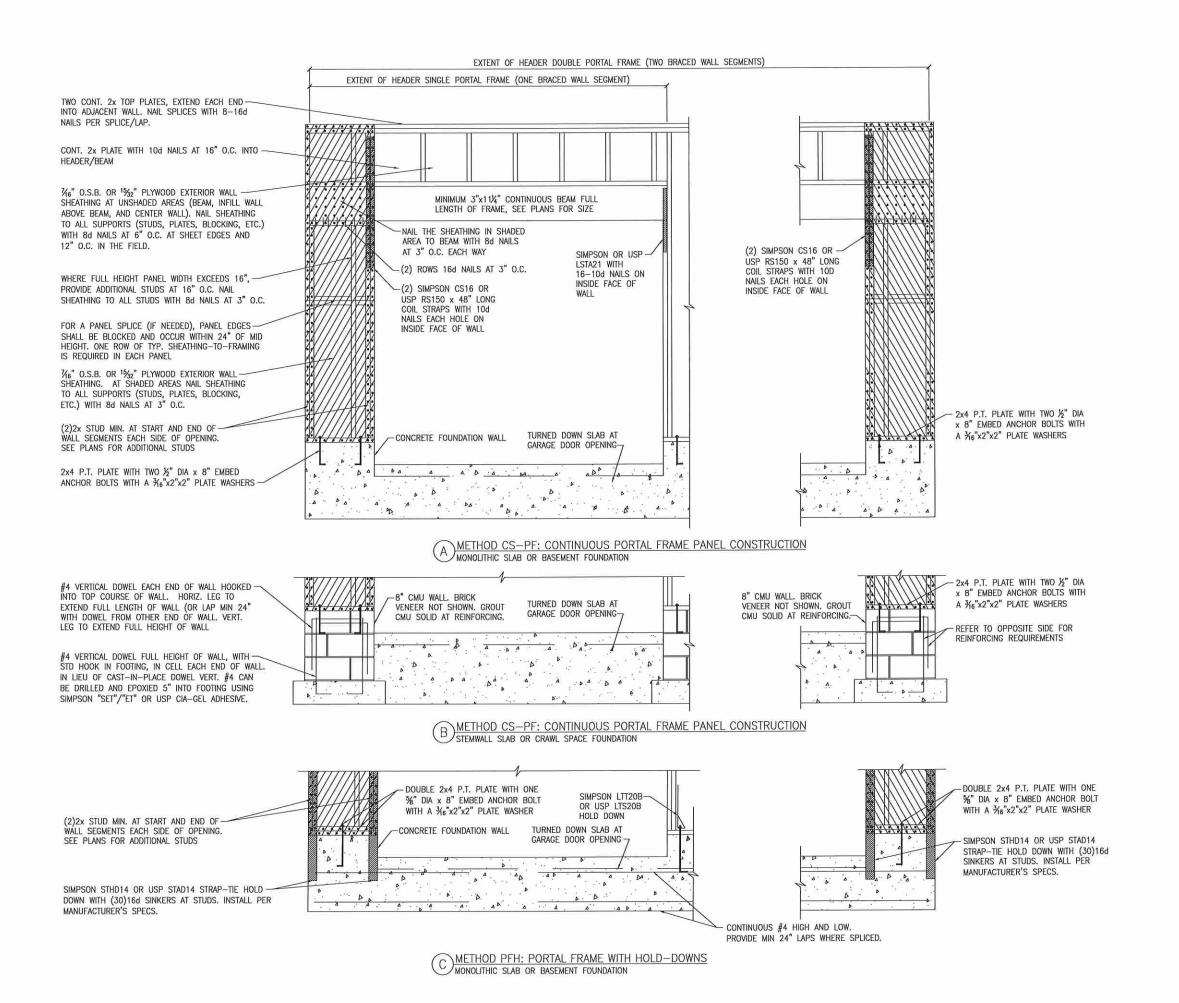
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Project #: 105-19000

Designed By: KRK Checked By:

Issue Date: 1/1/19 Re-Issue

Scale: 1/8"=1'-0" @ 11x17 1/4"=1'-0" @ 22x34







Detail Frame ortal

20, Project #: 105-19000

Designed By: KRK

Checked By:

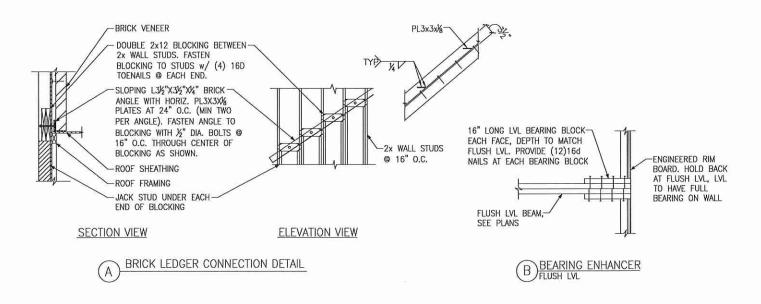
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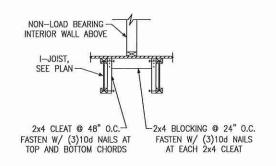
Scale: 1/8"=1'-0" @ 11x17 1/4"=1'-0" @ 22x34

130 M.P.H arolina

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North

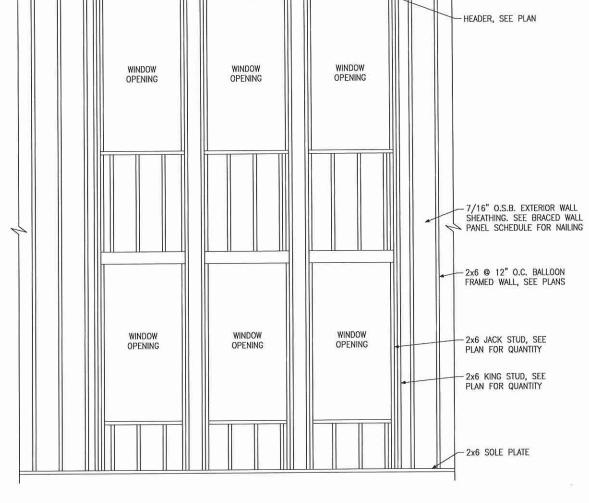




I-JOIST LADDER BLOCKING



(2)2x6 TOP PLATE



DBALLOON FRAMED WALL DETAIL N.T.S.

Details

Framing Miscellaneous

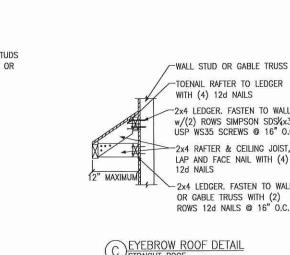
120/130 M.P.H. North Carolina Project #: 105-19000 Designed By: KRK Checked By:

Scale: 1/8"=1'-0" @ 11x17 1/4"=1'-0" @ 22x34

Issue Date: 1/1/19 Re-Issue:

KSE ENGINEERING 7E, SUITE 201, QUAKERTOWN, PA 18951 (215) 804-4449





FASTEN RAFTER TO LEDGER WITH SIMPSON H3 OR USP RT3A WALL STUD OR GABLE TRUSS -2x4 LEDGER. FASTEN TO WALL STUDS w/(2) ROWS SIMPSON SDS4x31/2" OR USP WS35 SCREWS @ 16" O.C. 2x4 RAFTER & CEILING JOIST, FASTEN VERTICAL TO RAFTER & BRICK VENEER, PER ELEVATION

B PENT ROOF DETAIL
STRAIGHT ROOF

A PENT ROOF DETAIL CURVED ROOF

-LINE OF OPTIONAL BRICK

FASTEN RAFTER TO LEDGER WITH

-2x4 LEDGER. FASTEN TO WALL STUDS

w/(2) ROWS SIMPSON SDS¼x3½" OR USP WS35 SCREWS @ 16" O.C.

FASTEN VERTICAL TO RAFTER &

CLG. JOIST w/(4) 12d NAILS.

WALL STUDS WITH (2) ROWS

-2x4 LEDGER, FASTEN TO

12d NAILS @ 16" O.C.

USP SUH24-2 HANGER BRICK VENEER, PER ELEVATION

-SIMPSON U24-2 OR

SIMPSON H3 OR USP RT3A

-WALL STUD OR GABLE TRUSS

-WALL SHEATHING

-2x4 VERTICAL

-2x4 CEILING JOIST,

LAP WITH VERTICAL

8d NAILS AT 6" O.C. -2x4 FRAMING AT 24" O.C. SLOPING L3½"x3½"x¾" BRICK ANGLE WITH HORIZ. PL3x3x/g PLATES AT 24" O.C. (MIN TWO END TRUSS BRICK VENEER-PER ANGLE. NAIL TO GIRDER 2x4 BLOCKING BTWN RAFTERS. TRUSS WITH 16d NAILS AT 9' O.C. THROUGH PRE-DRILLED PL3x3x16

OSB GUSSET, CUT TO

MATCH ROOF PROFILE FASTEN GUSSET TO

FRAMING w/8d NAILS @ 4"

O.C. INTO EACH MEMBER.

2'-6" MAXIMUM

2x12 RAFTER WITH -

CURVED PROFILE

CUT INTO RAFTER

2x WALL

STUDS, SEE PLAN-

ROOF GIRDER TRUSS TO SUPPORT DEAD LOAD OF BRICK, LIMIT DEFLECTION

TO L/600 OR 0.3" MAX.,

(D) TRUSS DETAIL

(E) GABLE END WALL DETAIL

BELOW EDGE NAILING PER SHEAR — WALL SCHEDULE PER SHEAR -(2) SIMPSON GBC OR USP HC520 EACH KICKER - ROOF TRUSSES AT 24" O.C. WALL ABOVE (6" O.C. AT NON-SHEAR WALLS) 光6" OSB WALL-SHEATHING

SPACED PER SHEAR WALL BELOW ENTIRE GABLE END

(5) 10d-

SIMPSON A35 OR USP MPA1

TRUSS, PER SHEAR WALL

2x12 RAFTER WITH CURVED PROFILE 2x4 VERTICAL CUT INTO RAFTER-

2x4 LEDGER, FASTEN TO

WALL STUDS w/(2) ROWS WS35 SCREWS @ 16" O.C.

SIMPSON SDSKx3K" OR USP

MPF4 EVERY OTHER

BLOCK

OSB GUSSET, CUT TO-MATCH ROOF PROFILE FASTEN GUSSET TO

FRAMING w/8d NAILS @ 4"

2'-6" MAXIMUM

12d NAILS @ 16" O.C. -SIMPSON U24-2 OR USP SUH24-2 HANGER

2x4 BLOCKING BETWEEN TRUSSES WITH SIMPSON U24 OR USP JL24 EACH END--8d NAILS AT 4" O.C.

CANTILEVERED OVER GABLE -SIMPSON LTP4 OR USP

2x6 KICKER AT 6'-0" O.C., WITH-2x6 "T" SCAB. NAIL SCAB TO KICKER WITH 10d NAILS AT 6" O.C. KICKER MAY BE OMITTED

WHEN HEIGHT OF GABLE END TRUSS IS 4'-0" OR LESS. %6" OSB AT GABLE END-

O.C. INTO EACH MEMBER.

FRAMING w/8d NAILS @ 4" O.C. INTO EACH - MEMBER.

12"x12"x½" OSB GUSSET. FASTEN GUSSET TO

CLG. JOIST w/(4) 12d NAILS. -2x4 LEDGER. FASTEN TO WALL STUDS WITH (2) ROWS

-LINE OF OPTIONAL BRICK

-WALL SHEATHING

-2x4 VERTICAL

LAP WITH VERTICAL

TOENAIL RAFTER TO LEDGER WITH (4) 12d NAILS -2x4 RAFTER & CEILING JOIST, LAP AND FACE NAIL WITH (4) -2x4 LEDGER, FASTEN TO WALL OR GABLE TRUSS WITH (2) ROWS 12d NAILS @ 16" O.C.

-2x4 LEDGER. FASTEN TO WALL STUDS

w/(2) ROWS SIMPSON SDS¼x3½" OR USP WS35 SCREWS @ 16" O.C.

Detai

Framing

scellaneous



KSE ENGINEERING PENGINEERING (215) 804-4449

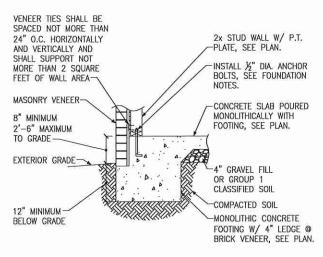
Checked By: Issue Dote: 1/1/19 Re-Issue: Scale: 1/8"=1'-0" @ 11x17 1/4"=1'-0" @ 22x34

Project #: 105-19000 Designed By: KRK

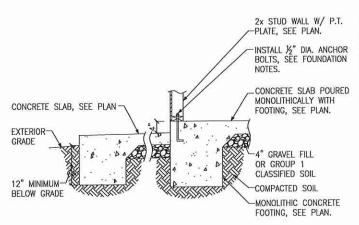
130 M.P.H Carolina

120/1 North

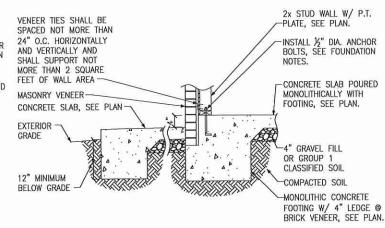




FOUNDATION SECTION EXTERIOR WALL @ MASONRY VENEER



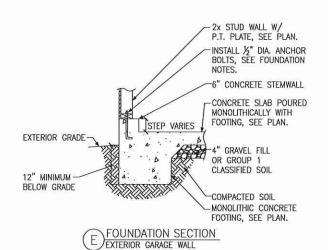
FOUNDATION SECTION EXTERIOR WALL AT PORCH

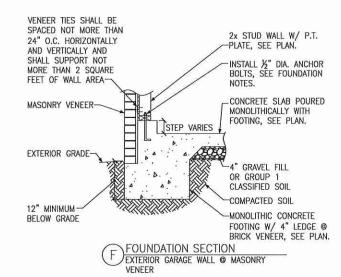


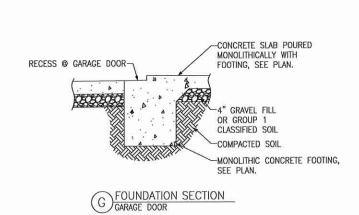
FOUNDATION SECTION

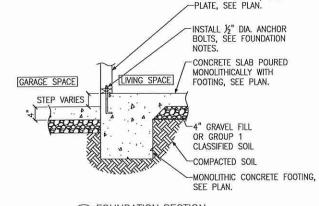
EXTERIOR WALL AT PORCH W/ MASONRY

2x STUD WALL W/ P.T.

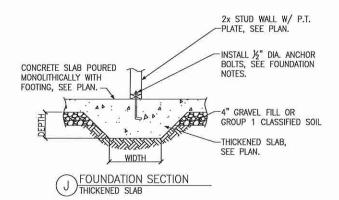


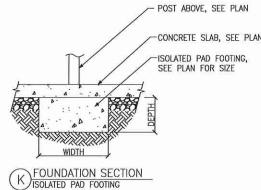












CONCRETE SLAB, SEE PLAN

Foundation Slab onolithic

Detail

North 20/ Project #: 105-19000 Designed By: KRK

Checked By: Issue Date: 1/1/19 Re-Issue:

Scale: 1/8"=1'-0" @ 11x17 1/4"=1'-0" @ 22x34

/130 M.P.H.

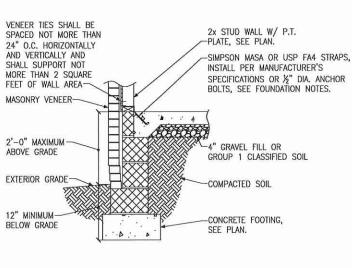
Carolina

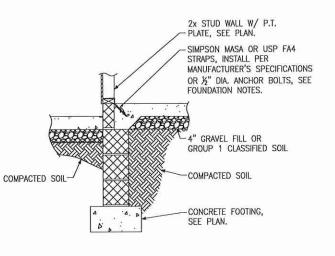
ENGINEERING

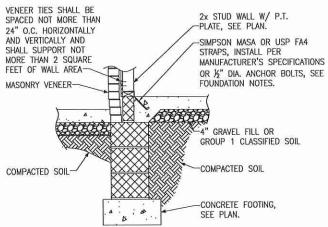
E. SUITE 201, QUAKERTOWN, PA 18951

COTT

(215) 804-4449







FOUNDATION SECTION B FOUNDATION SECTION BETTERIOR WALL @ MASONRY VENEER

VENEER TIES SHALL BE SPACED NOT MORE THAN 24" O.C. HORIZONTALLY

FOUNDATION SECTION EXTERIOR WALL AT PORCH

FOUNDATION SECTION EXTERIOR WALL AT PORCH W/ MASONRY

2x STUD WALL W/

- 4" GRAVEL FILL OR

COMPACTED SOIL

GROUP 1 CLASSIFIED SOIL

P.T. PLATE, SEE PLAN.

- SIMPSON MASA OR USP FA4 STRAPS, INSTALL PER

MANUFACTURER'S SPECIFICATIONS

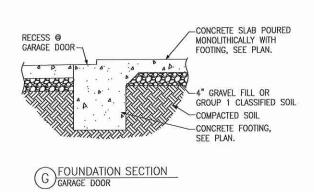
OR ½" DIA. ANCHOR BOLTS, SEE FOUNDATION NOTES.

INSTALL ½" DIA. ANCHOR BOLTS, SEE FOUNDATION EXTERIOR GRADE 4" GRAVEL FILL OR GROUP 1 CLASSIFIED SOIL COMPACTED SOIL CONCRETE FOOTING,

AND VERTICALLY AND SHALL SUPPORT NOT MORE THAN 2 SQUARE 2x STUD WALL W/ FEET OF WALL AREA-P.T. PLATE, SEE PLAN. MASONRY VENEER-8" CMU WALL TOP INSTALL ½" DIA. ANCHOR-BOLTS, SEE FOUNDATION COURSE GROUTED SOLID STEP VARIES EXTERIOR GRADE - 4" GRAVEL FILL OR GROUP 1 CLASSIFIED SOIL COMPACTED SOIL -12" CMU GROUTED SOLID @ BRICK CONCRETE FOOTING. SEE PLAN.

FOUNDATION SECTION

F) EXTERIOR GARAGE WALL @ MASONRY



FOUNDATION SECTION H) HOUNDATION ULL

LIVING SPACE

GARAGE SPACE

FOUNDATION SECTION EXTERIOR GARAGE WALL

CONCRETE SLAB POURED

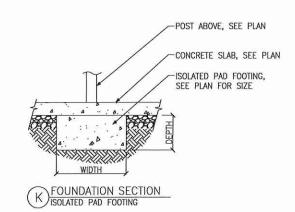
MONOLITHICALLY WITH FOOTING, SEE PLAN.

-2x STUD WALL W/ P.T. PLATE, SEE PLAN. -INSTALL ½" DIA. ANCHOR BOLTS, SEE FOUNDATION NOTES.

-4" GRAVEL FILL OR GROUP 1 CLASSIFIED SOIL -THICKENED SLAB, SEE PLAN.

FOUNDATION SECTION THICKENED SLAB

44 4 4





Detai Foundation lab S Wall

30 M.P.H olina Ö North 20

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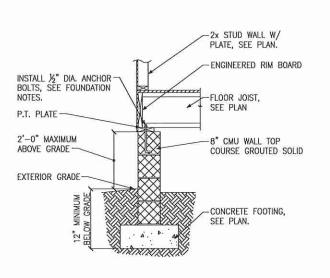
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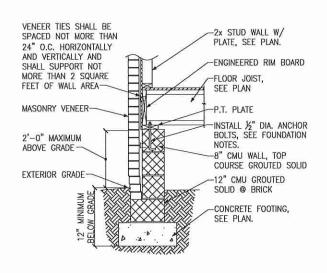
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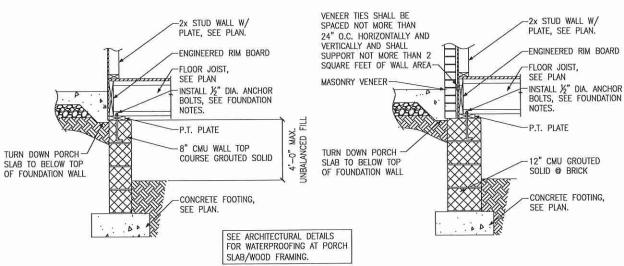
Project #: 105-19000 Designed By: KRK Checked By:

Issue Date: 1/1/19

Re-Issue: Scale: 1/8"=1'-0" @ 11x17 1/4"=1'-0" @ 22x34







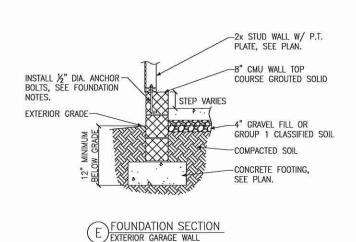


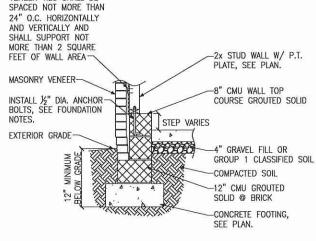


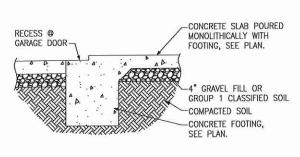
VENEER TIES SHALL BE

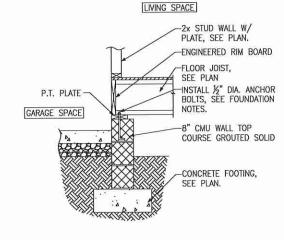


FOUNDATION SECTION EXTERIOR WALL AT PORCH W/ MASONRY VENEER







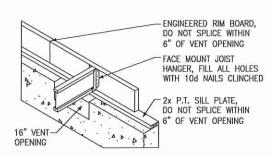


FOUNDATION SECTION EXTERIOR GARAGE WALL @ MASONRY VENEER

0	FOUNDATION GARAGE DOOR	SECTION
(6)	GARAGE DOOR	

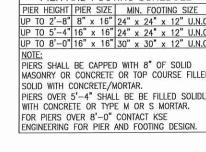
	FOUND	ATION	SECTION WALL
(H)	INTERIOR	GARAGE	WALL

FLOOR JOIST, SEE PLAN	
GIRDER PER 2x8 PT BI FULL LENC	EARING BLOCK, 6TH OF PIER
CMU PIER GROUTED ————————————————————————————————————	
LIMITS CONCRETE SEE PLAN	FOOTING,



		MIN. FOOTING SIZE
UP TO 2'-8"	8" x 16"	24" x 24" x 12" U.N.O.
UP TO 5'-4"	16" x 16"	24" x 24" x 12" U.N.O.
UP TO 8'-0"	16" x 16"	30" x 30" x 12" U.N.O.
SOLID WITH OPERS OVER SWITH CONCRE	CONCRETE/N 5'-4" SHAL TE OR TYP VER 8'-0"	OR TOP COURSE FILLED MORTAR. L BE BE FILLED SOLIDLY E M OR S MORTAR. CONTACT KSE AND FOOTING DESIGN.

PIER AND FOOTING SCHEDULE



Foundation Space MD.

Detai

North 20 Project #: 105-19000 Designed By: KRK Checked By:

Issue Date: 1/1/19 Re-Issue:

Scale: 1/8"=1'-0" @ 11x17 1/4"=1'-0" @ 22x34

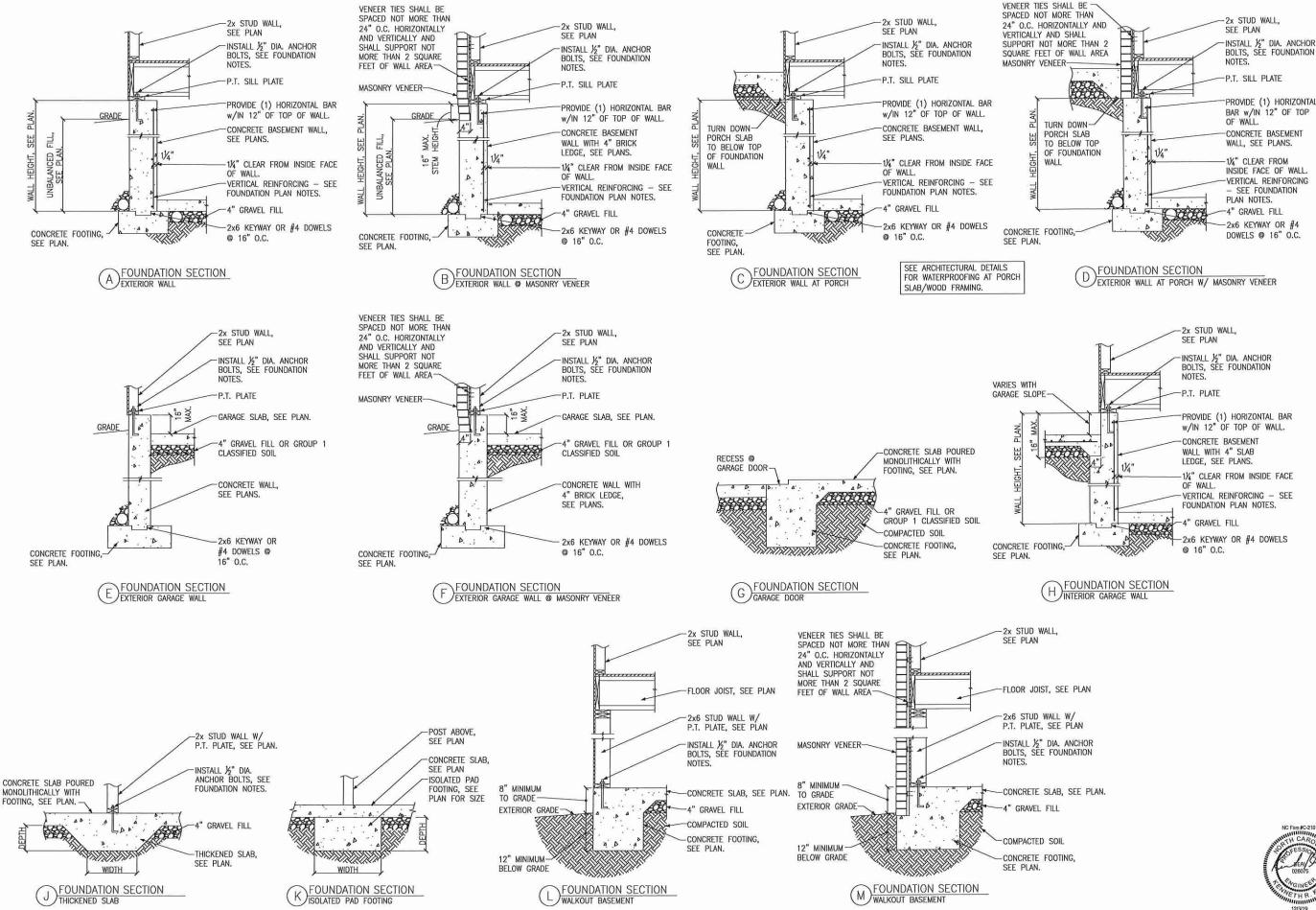
30 M.P.H Carolina

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FOUNDATION SECTION JINTERIOR PIER

(K) CRAWL SPACE VENT DETAIL

SD-9



WALKOUT BASEMENT

THICKENED SLAB

K) ISOLATED PAD FOOTING

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Detail Foundation sement

North 20, Project #: 105-19000 Designed By: KRK Checked By:

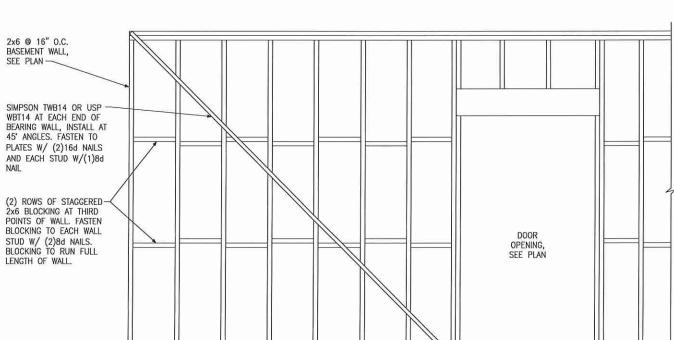
30 M.P.H Carolina

Issue Date: 1/1/19

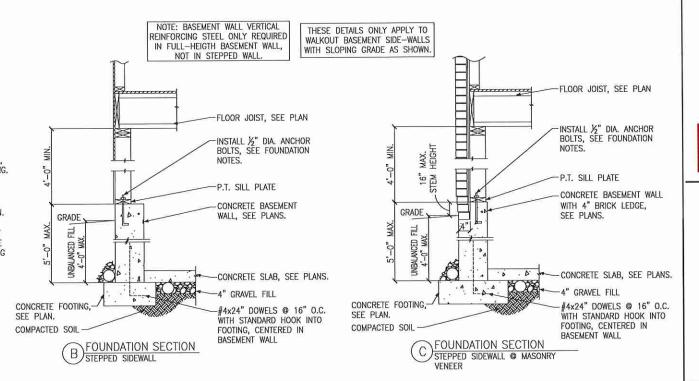
Scale: 1/8"=1'-0" @ 11x17 1/4"=1'-0" @ 22x34

FOUNDATION ELEVATION

(A) STEPPED SIDEWALL



(D)BASEMENT BEARING WALL BRACING DETAIL



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Details Wall Foundation Basement

120/130 M.P.H. North Carolina

Project #: 105-19000 Designed By: KRK

Checked By: Issue Date: 1/1/19

Re-Issue: Scale: 1/8"=1'-0" @ 11x17 1/4"=1'-0" @ 22x34

