ABBREVIATIONS

EXIST.

EXP.

EXPO.

EXT.

F.B.

F.D.

F.E.

F.E.C.

F.F.E.

F.H.C.

F.H.S.

EXISTING

EXPOSED

EXTERIOR

FIRE ALARM

FLAT BAR

FIRE HOSE

FLOOR DRAIN

FOUNDATION

FIRE EXTINGUISHER

FIRE HOSE CABINET

FIRE HOSE STATION

FIRE EXTINGUISHER CABINET

FINISH FLOOR ELEVATION

E.I.F.S. EXT. INSUL. FINISH SYSTEM

EXPANDED; EXPANSION

NO., #

NOM.

N.T.S.

O.A.

OBS.

O.C.

O.D.

OFF.

O.H.

OPH.

OPP.

OPNG.

NOISE REDUCTION

NOT TO SCALE

NUMBER

NOMINAL

OVER

OVERALL

OFFICE

OPENING

OPPOSITE

OBSCURE

ON CENTER

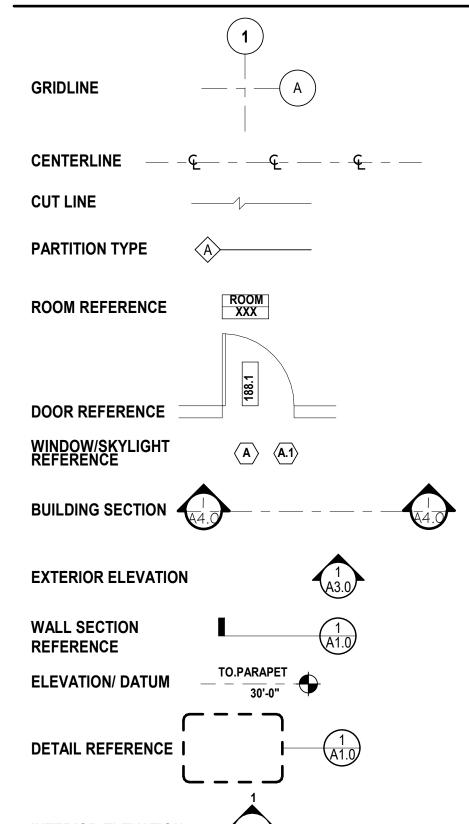
OVERHEAD

OUTSIDE DIAMETER

OPPOSITE HAND

| ADDI | REVIATIONS | | | | |
|-----------------|-------------------------------------------------------|--------------------|----------------------------------------------|------------------|--------------------------------------------------|
| Λ P | ANCHOR POLT | F.H.M.S | ELAT HEAD MACHINE SCREW | P.B. | PARTICLE BOARD |
| A.B ABV | ANCHOR BOLT ABOVE | F.H.M.S F.H.W.S | FLAT HEAD MACHINE SCREW FLAT HEAD WOOD SCREW | P.B. P.C. | PRE-CAST CONCRETE |
| ACC | ACCESS | FIN. | FINISH | PCF. | POUNDS PER CUBIC FOOT |
| ACOUS. | ACOUSTICAL | F/F. | FINISH TO FINISH | PERF. | PERFORATED |
| A.C.P | ASPHALT CONCRETE PAVEMENT | FF. | FACE TO FINISH | PERP. | PERPENDICULAR |
| ACT A.D. | ACOUSTICAL TILE AREA DRAIN | FL; FLR FLASH. | FLOOR; FLOORING FLASHING | P.GWB. PL. | PAINTED GYPSUM WALL BOARD PROPERTY LINE, PLATE |
| ADD | ADDITIVE | FLUOR. | FLUORESCENT | P.LAM. | PLASTIC LAMINATE |
| ADJ. | ADJUSTABLE | F.O. | FACE OF | PLAS. | PLASTER |
| A.F.F. | ABOVE FINISHED FLOOR | F.O.C. | FACE OF CONCRETE | PLYWD. | PLYWOOD |
| AGGR. | AGGREGATE | F.O.F. | FACE OF FINISH | PNL. | PANEL |
| A.H.J. A.I.B | AUTHORITY HAVING JURISDICTION AIR & MOISTURE BARRIERS | F.O.I.C. FUR | RNISHED BY OWNER AND INSTALLED BY CONTRACTOR | PR. PSF. | PAIR POUNDS PER SQUARE FOOT |
| A.I.B ALT | ALTERNATE | F.O.I.O. | FURNISHED BY OWNER AND | PSI. | POUNDS PER SQUARE FOOT POUNDS PER SQUARE INCH |
| ALUM. | ALUMINUM | | INSTALLED BY OWNER | PT. | POINT |
| AP. | ACCESS PANEL | F.O.M. | FACE OF MASONRY | P.T. | PRESSURE TREATED |
| APPROX. | APPROXIMATE | F.O.S. | FACE OF STUDS | PTD. | PAINT |
| ARCH. ASB. | ARCHITECTURAL ASBESTOS | F.O.W. FPRF. | FACE OF WALL FIREPROOF | P.T.D. PTN. | PAPER TOWEL DISPENSER PARTITION |
| A.S.L. | ABOVE SEA LEVEL | FRPL. | FIREPLACE | PVC. | POLYVINYL CHOORIDE |
| ASPH. | ASPHALT | F.R | FRAME | P.WD. | PAINTED WOOD |
| AUTO. | AUTOMATIC | F.R.T. | FIRE RETARDANT TREATED | | |
| BD. | BOARD | F.S. FT. | FLOOR SINK | Q.T. | QUARRY TILE |
| BD. BITUM. | BITUMINOUS | FTG. | FOOT OR FEET FOOTING | QUAN. | QUANTITY |
| BLDG. | BUILDING | FURR. | FURRING | R | RISERS |
| BLK. | BLOCK | FUT. | FURTINTURE | RA. | RETURN AIR |
| BLKG. | BLOCKING | FW. | FULL WIDTH | RAD. | RADIUS |
| BM. | BEAM BOTTOM OF | F.V. | FIELD VARIFY | RB. | RUBBER BASE |
| B.O. BOT. | BOTTOM OF BOTTOM | GA. | GAUGE | R.D. REF. | ROOF DRAIN REFERENCE |
| BSMT. | BASEMENT | GAL. | GALLON | REFR. | REFRIGERATOR |
| BRG. | BEARING | GALV. | GALVANIZED | REINF. | REINFORCED, REINFORCING |
| BUR. | BUILT UP ROOFING | G.C. | GENERAL CONTRACTOR | REQ. | REQUIRED |
| CAB. | CABINET | GL. G.L.B. | GLASS GLUE LAM BEAM | RESIL. REV. | RESILIENT PEVISION: PEVISED |
| CAB. C.B. | CATCH BASIN | G.L.B. GR. | GRADE | REV. RGTR. | REVISION; REVISED REGISTER |
| CB. | CHALK BOARD | G.R. | GUARD RAIL | RH. | ROUND-HEAD; RIGHT HAND |
| CC. | CENTER TO CENTER | G.S.B. | GYPSUM SHEATHING BOARD | RM. | ROOM |
| CEM. | CEMENT | G.W.B. | GYPSUM WALL BOARD | R.O. | ROUGH OPENING |
| CER. CG. | CERAMIC CORNER GUARD | GYP. | GYPSUM | RWL. | RAIN WATER LEADER |
| C.I. | CAST IRON | H.B. | HOSE BIBB | S. | SOUTH |
| C.I.P. | CAST IN PLACE | H.C. | HOLLOW CORE | S.B.C. | SEATTLE BUILDING CODE |
| CJ. | CONTROL JOINT | H.D.GALV | HOT DIPPED GALVANIZED | S.CONC. | SCOURED CONCRETE |
| CLG. | CEILING | HDR. | HEADER | SAF. | SELF ADHERED FLASHING |
| CLKG. CLO. | CAULKING CLOSET | HDO. HDWD. | HIGH DINSITY OVERLAY HARDWOOD | SC. SC.ALUM. | SOLID CORE SOILD CORNER ALUMINUM |
| CLO. | CLEAR | HDWE. | HARDWARE | SCHED. | SCHEDULE |
| C.M.U. | CONCRETE MASONRY UNIT | HEM. | HEMLOCK | S.D. | SMOKE DETECTOR |
| CNTR. | COUNTER | H.M. | HOLLOW METAL | SEC. | SEALED CONCRETE |
| COL. | COLUMN | HORIZ. | HORIZONTAL | SECT. | SECTION |
| CONC. CONN. | CONCRETE CONNECTION | HP. HR. | HIGH POINT HOUR | S.G. SH;SHLF | SAFETY GLASS SHELF |
| CONN. | CONSTRUCTION | HT. | HEIGHT | SHR. | SHOWER |
| CONT. | CONTINUOUS | HVAC. | HEATING/VENTILATION/AIR CONDITIONING | SHT. | SHEET |
| CONTR. | CONTRACTOR | HW. | HOT WATER | SHEATH. | SHEATHING |
| CORR. | CORRIDOR | H.W.H. | HOT WATER HEATER | SIM. | SIMILAR |
| C.P. CPT. | CONCRETE PAVER CARPET; CARPETED | I.B.C. | INTERNATIONAL BUILDING CODE | SM. SMS. | SHEET METAL SHEET METAL SCREW |
| CPT SQRS. | CARPET SQUARES | I.D. | INSIDE DIAMETER | S.O.G. | SLAB ON GRADE |
| CRS. | COURSE; COURSES | IN. | INCH | SPEC. | SPECIFICATION |
| C.S. | CRAWL SPACE | INCL. | INCLUDED; INCLUDING | S.P.M. | SINGLE-PLY MEMBRANE |
| CTSK. | COUNTERSUNK | INSUL. INT. | INSULATION INTERIOR | SQ. SQ.FT. | SQUARE |
| C.T. CTR. | CERAMIC TILE CENTER | IN I . INV. | INVERT | SQ.FT. SQ.IN. | SQUARE FEET SQUARE INCH (ES) |
| CU.FT. | CUBIC FEET | | IIIVEIXI | SS. | STAINLESS STEEL |
| C.V.G. | CLEAR VERTICAL GRAIN | JAN. | JANITOR | ST. | STONE |
| C.W.C. | CHILLED WATER CABINET | J.B. | JUNCTION BOX | STA. | STATION |
| | | JT. | JOINT | STD. STL. | STANDARD Steel |
| DBL. | DOUBLE | KIT. | KITCHEN | STOR. | STORAGE |
| DEMO. | DEMOLITION | K.O. | KNOCK-OUT | STRUCT. | STRUCTURAL |
| DTL., | DET. DETAIL | | | SUSP. | SUSPENDED |
| D.F. | DRINKING FOUNTAIN | LAM. | LAVATORY | SYM. | SYMMETRICAL |
| DIA. DIM. | DIAMETER DIMENSION | LAV. L.F. | LAVATORY LINEAL FEET | T.; TRD. | TREADS |
| DIWI. DISP. | DISPENSER | LL. | LIVE LOAD | TB. | TACK BOARD |
| DL. | DEAD LOAD | LP. | LOW POINT | T.B. | TOWEL BAR |
| DN. | DOWN | LOC. | LOCATION | T.C. | TOP OF CURB |
| D.O. | DOOR OPENING | LT. | LIGHT | TEMP. | TEMPERED TEMPERED GLASS |
| D.P. DR. | DAMPPROOFING DOOR | MAS. | MASONRY | T.G. T.&G. | TONGUE AND GROOVE |
| DS. | DOWNSPOUT | MAX. | MAXIMUM | T/;T.O | TOP OF |
| D.S.P | DRY STAND PIPE | M.B. | MACHINE BOLT | T.O.S | TOP OF SLAB; TOP OF STEEL |
| DT. | DRAIN TILE | M.C. | MEDICINE CABINET | T.O.W. | TOP OF WALL |
| DW. DWG. | DISHWASHER DRAWING | MDO. Mech. | MEDIUM DENSITY OVERLAY MECHANICAL | TEL. T.P.H. | TELEPHONE TOILET PAPER HOLDER |
| DIVIG. | PINMING | MEMB. | MECHANICAL MEMBRANE | Т.Р.Н. Т.S. | TUBULAR STEEL |
| E. | EAST | MET. | METAL | TYP. | TYPICAL |
| EA. | EACH | MEZZ. | MEZZANINE | | |
| EB. | EXPANSION BOLT | METAL | MTL. | U.N.O. | UNLESS NOTED OTHERWISE |
| E.J. EL. | EXPANSION JOINT ELEVATION | MFR. MH. | MANUFACTURER MANHOLE | U.SK. | UTILITY SINK |
| EL. ELEV. | ELEVATION ELEVATOR | MH. MIN. | MINIMUM | V.B. | VAPOR BARRIER |
| ELECT. | ELECTRICAL | MIR. | MIRROR | | |
| EMER. | EMERGENCY | MISC. | MISCELLANEOUS | W.C. | WATER CLOSET |
| ENCL | ENCLOSURE | MNT. | MOUNTED MASONRY OPENING | WD. | WOOD |
| E.O. E.P. | EDGE OF ELECTRICAL PANELBOARD | M.O. MTL. | MASONRY OPENING MATERIAL | W/ W/O | WITH WITHOUT |
| E.P. EQ. | EQUAL | MIL. | MULLION | WP. | WATERPROOF OR |
| EQUIP. | EQUIPMENT | | | | WATERPROOFING |
| EST. | ESTIMATE | N. | NORTH | WR | WATER RESISTANT |
| E.W. | EACH WAY | N/A | NOT APPLICABLE | WSCT. | WAINSCOT |
| (E), E. | EXISTING | N.I.C. | NOT IN CONTRACT | | |

SYMBOLS LEGEND



INTERIOR ELEVATION REVISION REFERENCE /

(ONLY THE MOST RECENT REVISIONS ARE SHOWN CLOUDED. THE TAG REFERS TO PAST REVISIONS. THE NUMBERS ARE KEYED TO THE DATES THE REVISIONS WERE ISSUED)



GENERAL CONDITIONS

- 1. DO NOT SCALE DIMENSIONS FROM DRAWINGS. USE CALCULATED DIMENSIONS ONLY. NOTIFY THE ARCHITECT IMMEDIATELY IF ANY CONFLICT
- 2. ALL DIMENSIONS ARE TO FACE OF FINISH UNLESS NOTED OTHERWISE.
- 3. CONTRACTOR SHALL VERIFY ALL CONDITIONS PRIOR TO INITIATING THE WORK. NOTIFY THE ARCHITECT OF ANY DISCREPANCIES.
- 4. VERIFY ALL ROUGH-IN DIMENSIONS FOR EQUIPMENT. PROVIDE ALL BUCK-OUT, BLOCKING, BACKING AND JACKS REQUIRED FOR INSTALLATION.
- 5. VERIFY LOCATIONS OF ALL EXISTING UTILITIES AND SLEEVING: CAP, MARK,
- AND PROTECT AS NECESSARY TO COMPLETE THE WORK.
- 6. ALL WOOD IN CONTACT WITH CONCRETE IS PRESSURE TREATED. 7. PROVIDE AS-BUILT PLAN OF ALL UTILITY LOCATIONS.
- 8. SERVICE WATER PIPES IN UNHEATED SPACES TO BE INSULATED.

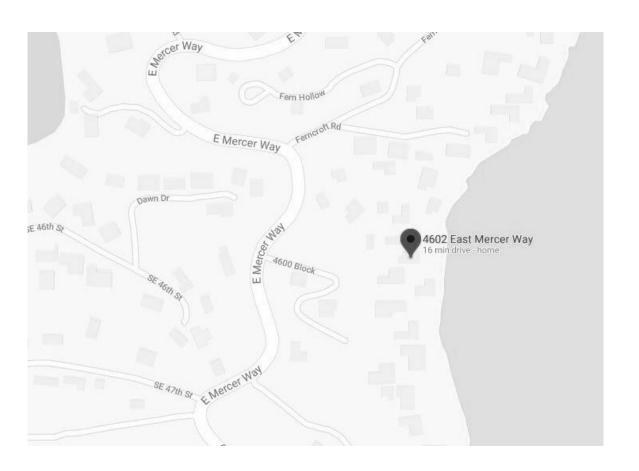
APPLICABLE CODES

- ALL WORK SHALL CONFORM TO: - 2015 INTERNATIONAL BUILDING CODE WITH STATEWIDE AND CITY AMENDMENTS - ICC/ANSI A117.1-09, ACCESSIBLE AND USABLE BUILDINGS AND FACILITIES, WITH STATEWIDE AND
- CITY AMENDMENTS - 2015 INTERNATIONAL RESIDENTIAL CODE WITH STATEWIDE AND CITY AMENDMENTS
- 2015 INTERNATIONAL MECHANICAL CODE WITH STATEWIDE AND CITY AMENDMENTS
- 2015 INTERNATIONAL FIRE CODE WITH STATEWIDE AND CITY AMENDMENTS - 2015 WASHINGTON STATE ENERGY CODE
- WASHINGTON CITIES ELECTRICAL CODEHTTP://WWW.CODEPUBLISHING.COM/WA/MERCERISLAND/HTML/MERCERISLAND17/MERCERI
- ALL CODES, AS MODIFIED BY LOCAL JURISDICTIONS AND ALL OTHER GOVERNING LAWS,
- CODES, ORDINANCES AND REGULATIONS

CITY OF MERCER ISLAND ZONING: -SINGLE FAMILY R-15

VICINITY MAP

NTS



AERIAL VIEW

NTS

PROJECT DIRECTORY

OWNER SARA TRUMBLE THOMAS TRUMBLE

> PROJECT ADDRESS 4602 E MERCER WAY MERCER ISLAND, WA 98040

LOCAL JURISDICTION
CITY OF MERCER ISLAND 9611 SE 36TH STREET MERCER ISLAND, WA 98040 P: (206) 275-7605

APPLICANT / ARCHITECT SUZANNE ZAHR INC., 2441 76TH AVE SE, SUITE 160 MERCER ISLAND, WA 98040 P: (206) 354-1567 **CONTACT: SUZANNE ZAHR** EMAIL: INFO@SUZANNEZAHR.COM

SANDY BEACH TRS UNREC & SH LDS PLat Block: Plat Lot: 9

GENERAL CONTRACTOR

STRUCTURAL ENGINEER
JOHN AND EVAN APOLIS CONSULTING STRUCTURAL ENGINEERING SERVICES 6311 17TH AVE NE SEATTLE, WA 98115 P: (206) 527-1288 **CONTACT: EVAN APOLIS**

EMAIL: EPISOEN@GMAIL.COM

PARCEL NUMBER: 755870-0045

LEGAL DISCRIPTION:

CIVIL ENGINEER D.R. STRONG CONSULTING ENGINEERS INC. **CIVIL ENGINEERS PLANNERS SURVEYORS 620 7TH AVENUE**

CONTACT: YOSHIO L. PIEDISCALZI, P.E. P: (425) 827-3063 EMAIL: YOSHIO.PIEDISCALZI@DRSTRONG.COM

3213 EASTLAKE AVE E, STE B SEATTLE, WA 98102-7127 CONTACT: H. MICHAEL XUE, P.E. P: (206)262-0370 EMAIL: MXUE@PANGEOINC.COM

KIRKLAND, WA 98033

10801 MAIN STREET, SUITE 102 BELLEVUE, WA 98004 CONTACT: DANNY SLAGER EMAIL: DANNYS@TERRANE.NET

ARBORIST SUPERIOR NW CONTACT: ANTHONY MORAN EMAIL: ANTHONY@SUPERIORNW.COM

DRAWING INDEX

| SHEET# | SHEET NAME |
|-----------------|--------------------------------|
| A0.0 | COVERSHEET |
| A0.1 | GENERAL NOTES |
| A0.2 | SCHEDULES |
| SURVEY | TOPOGRAPHIC & BOUNDRY SURVEY |
| TESC | TESC PLAN |
| DRAINAGE | DRAINAGE PLAN |
| TSCE & DRAINAGE | TSCE & DRAINAGE DETAILS |
| A1.0 | SITE PLAN |
| A1.1 | LAND USE CALCS |
| A2.0 | GARAGE FLOOR DEMO PLAN |
| A2.1 | GARAGE CONSTRUCTION FLOOR PLAN |
| A2.2 | DADU CONSTRUCTION FLOOR PLAN |
| A2.3 | ROOF CONSTRUCTION PLAN |
| A2.4 | GARAGE POWER & DATA PLAN |
| A2.5 | DADU POWER & DATA PLAN |
| A3.0 | GARAGE REFLECTED CEILING PLAN |
| A3.1 | DADU REFLECTED CEILING PLAN |
| A4.0 | BUILDING ELEVATIONS |
| A4.1 | BUILDING ELEVATIONS |
| A5.0 | BUILDING SECTIONS |
| S1 | STRUCTURAL DRAWINGS |
| S2 | STRUCTURAL DRAWINGS |
| S3 | STRUCTURAL DRAWINGS |
| S4 | STRUCTURAL NOTES |

PROJECT DESCRIPTION

THE SCOPE OF WORK INCLUDES DEMOLISHING THE EXISTING DETACHED GARAGE AND STORAGE AND ADDING A DETACHED GARAGE WITH AN ACCESSORY DWELLING UNIT ABOVE.

SUZANNE ZAHR INC.

2441 SE 76TH AVE, SUITE 160 MERCER ISLAND, WASHINGTON 98040 T. 206 354 1567 WWW.SUZANNEZAHR.COM

PROJECT NUMBER

20004

REGISTERED ARCHITECT SUZANNE ZAHR STATE OF WASHINGTON

ISSUED / REVISIONS DATE

ISSUE DATE: 12.08.20 DRAWN BY: **CHECKED BY:**

COVERSHEET

SHEET NUMBER

PERMIT SET

A0.0

1. SEE CONSTRUCTION PLAN, POWER AND DATA PLAN, REFLECTED CEILING PLAN AND FINISH PLAN NOTES FOR ADDITIONAL NOTES RELATED TO EACH SPECIFIC PLAN.

2. THE INTENT OF THE CONTRACT DOCUMENTS IS TO ALLOW FOR THE PERFORMANCE OF THE WORK. EVERY ITEM NECESSARILY REQUIRED MIGHT NOT BE SPECIFICALLY MENTIONED OR SHOWN. UNLESS EXPRESSLY STATED, ALL SYSTEMS AND EQUIPMENT SHALL BE COMPLETED AND APPROPRIATELY OPERABLE. FURNISH AND INSTALL ALL SPECIFIED AND APPROPRIATE ITEMS, AND ALL INCIDENTAL, ACCESSORY, AND OTHER ITEMS NOT SPECIFIED BUT REQUIRED FOR A COMPLETE AND FINISHED PROJECT.

3. NO WORK DEFECTIVE IN CONSTRUCTION OR QUALITY OR DEFICIENT IN ANY REQUIREMENTS OF THE CONTRACT DOCUMENTS WILL BE ACCEPTABLE DESPITE THE ARCHITECT'S FAILURE TO DISCOVER OR POINT OUT DEFECTS OR DEFICIENCIES DURING CONSTRUCTION. DEFECTIVE WORK REVEALED WITHIN THE TIME REQUIRED BY GUARANTEES SHALL BE REPLACED BY WORK CONFORMING TO THE INTENT OF THE CONTRACT. NO PAYMENT, EITHER PARTIAL OR FINAL, SHALL BE CONSTRUED AS AN ACCEPTANCE OF DEFECTIVE WORK OR IMPROPER MATERIALS.

4. IT IS INTENDED THAT THE CONTRACTOR PROVIDE COMPLETE CONSTRUCTION AND ANY OMISSIONS IN THESE NOTES OR IN THE OUTLINE OF WORK SHALL NOT BE CONSTRUED AS RELIEVING THE CONTRACTOR OF SUCH RESPONSIBILITIES IMPLIED BY SCOPE OF WORK EXCEPT FOR THE ITEMS SPECIFICALLY NOTED.

5. SHOULD ANY PORTION OF THE CONTRACT DOCUMENTS PROVE NOT TO BE, FOR WHATEVER REASONS, UNENFORCEABLE, SUCH UNENFORCEABILITY SHALL NOT EXTEND TO THE REMAINDER OF THE CONTRACT NOR SHALL IT VOID ANY OTHER PROVISIONS OF THE CONTRACT.

6. THROUGHOUT THE DURATION OF THE PROJECT THE CONTRACTOR SHALL REFRAIN FROM ACTIONS THAT COULD LEAD TO THE FILING OF CLAIMS OF LIEN BY SUBCONTRACTORS, SUPPLIERS OF MATERIALS, LABOR, SERVICE, OR EQUIPMENT OR ANY OTHER INDIVIDUAL OR COMPANY SO ENTITLED UNDER GOVERNING LAWS AND REGULATIONS UNLESS HE CAN SHOW REASONABLE AND JUSTIFIABLE CAUSE. APPROVAL FOR FINAL PAYMENT SHALL BE CONTINGENT UPON THE CONTRACTOR'S OBTAINING AND FURNISHING TO THE ARCHITECT SIGNED RELEASES FROM SUCH INDIVIDUALS OR COMPANIES.

7. THE CONTRACTOR IS RESPONSIBLE FOR CHECKING CONTRACT DOCUMENTS, FIELD CONDITIONS AND DIMENSIONS FOR ACCURACY AND CONFIRMING THAT WORK IS BUILDABLE AS SHOWN BEFORE PROCEEDING WITH CONSTRUCTION. IF THERE ARE ANY QUESTIONS REGARDING THESE OR OTHER COORDINATION QUESTIONS, THE CONTRACTOR SHALL SUBMIT THEM, IN WRITING, TO THE DESIGNER. THE CONTRACTOR IS RESPONSIBLE FOR OBTAINING A WRITTEN CLARIFICATION FROM THE DESIGNER BEFORE PROCEEDING WITH WORK IN QUESTION, OR RELATED WORK.

8. DURING THE COURSE OF CONSTRUCTION, ACTUAL LOCATIONS OF CONSTRUCTION ITEMS DENOTED IN THE CONSTRUCTION DOCUMENTS SHALL BE INDICATED BY THE CONTRACTOR, TO SCALE, IN CONTRASTING INK ON THE DRAWINGS FOR ALL RUNS OF MECHANICAL AND ELECTRICAL WORK; INCLUDING SITE UTILITIES AND CONCEALED DEVIATIONS FROM THE DRAWINGS. UPON COMPLETION OF THE PROJECT, INCLUDING DRAWINGS, PROVIDED BY THE ARCHITECT. THIS SET SHALL BE CONSPICUOUSLY MARKED "AS BUILT SET" AND DELIVERED TO THE ARCHITECT.

9. UPON COMPLETION OF THE WORK OR SHORTLY BEFORE, THE ARCHITECT SHALL PREPARE A PUNCH-LIST OF CORRECTIONS AND UNSATISFACTORY AND/OR INCOMPLETE WORK. FINAL PAYMENT WILL BE CONTINGENT UPON THE COMPLETION OF THESE ITEMS UNDER THE TERMS OF THE OWNER/CONTRACTOR AGREEMENT.

10. EXECUTE WORK IN ACCORDANCE WITH ANY AND ALL APPLICABLE CODES, MANUFACTURER'S RECOMMENDATIONS AND TRADE AND REFERENCE STANDARDS, INCLUDING BUT NOT LIMITED TO: IBC, SEISMIC CODES, NEC, NPC, UPC, CBC,MFPA, ASME, UMC AUSI, FIRE AND SAFETY CODES, ADA, STATE TITLE AND ADMINISTRATIVE CODES, AND OTHER APPROPRIATE REGULATORY AUTHORITIES LATEST ENFORCED EDITIONS.

11. DO NOT SCALE DRAWINGS; DIMENSIONS SHALL GOVERN. DETAILS SHALL GOVERN OVER PLANS AND ELEVATIONS. LARGE-SCALE DETAILS SHALL GOVERN OVER SMALL-SCALE DETAILS.

12. THERE SHALL BE NO SUBSTITUTION OF MATERIALS WHERE A MANUFACTURER IS SPECIFIED. WHERE THE TERM "OR APPROVED EQUAL" IS USED, THE ARCHITECT ALONE SHALL DETERMINE EQUALITY BASED UPON INFORMATION SUBMITTED BY THE CONTRACTOR.

13. ALL MATERIALS SHALL BE NEW, UNUSED, AND OF THE HIGHEST QUALITY IN EVERY RESPECT UNLESS OTHERWISE NOTED. MANUFACTURED MATERIALS AND EQUIPMENT SHALL BE INSTALLED AS PER MANUFACTURER'S RECOMMENDATIONS AND INSTRUCTIONS UNLESS NOTED OTHERWISE.

14. IT SHALL BE THE RESPONSIBILITY OF THE CONTRACTOR TO NOTIFY THE ARCHITECT OF ANY CONFLICTS HEREIN - EITHER APPARENT OR OBVIOUS - PRIOR TO THE START OF NEW WORK ON THAT ITEM OR BEAR THE RESPONSIBILITY OF CORRECTING SUCH WORK AS DIRECTED BY THE ARCHITECT.

15. VERIFY LAYOUT AND EXACT LOCATION OF ALL PARTITIONS, DOORS, ELECTRICAL/TELEPHONE AND COMMUNICATION OUTLETS, LIGHT FIXTURES AND SWITCHES WITH THE ARCHITECT IN THE FIELD PRIOR TO INSTALLATION.

16. THE CONTRACTOR SHALL BE RESPONSIBLE FOR THE DISTRIBUTION OF DRAWINGS TO ALL TRADES UNDER HIS/HER JURISDICTION.

17. THE CONTRACTOR SHALL NOT PROCEED WITH ANY WORK REQUIRING ADDITIONAL COMPENSATION BEYOND THE CONTRACT AMOUNT WITHOUT WRITTEN AUTHORIZATION FROM THE ARCHITECT. FAILURE TO OBTAIN AUTHORIZATION SHALL INVALIDATE ANY CLAIM FOR EXTRA COMPENSATION.

18. THE CONTRACTOR AND SUBCONTRACTORS SHALL PURCHASE AND MAINTAIN CERTIFICATIONS OF INSURANCE WITH RESPECT TO WORKERS COMPENSATION, PUBLIC LIABILITY AND PROPERTY DAMAGE FOR THE LIMITS AS REQUIRED BY LAW. THE CONTRACTOR SHALL BE RESPONSIBLE FOR INITIATING, MAINTAINING AND SUPERVISING ALL SAFETY PRECAUTIONS IN CONNECTION WITH THE WORK.

19. THE CONTRACTOR SHALL BE RESPONSIBLE FOR CORRECTING ANY DEFECTS FOUND IN EXISTING BUILDING CONSTRUCTION. THIS INCLUDES BUT IS NOT LIMITED TO UNEVEN SURFACES AND FINISHES AT GYPSUM BOARD OR DAMAGED FIREPROOFING. THE CONTRACTOR SHALL PATCH AND REPAIR SURFACES TO MATCH ADJACENT AND ADJOINING SURFACES. UNLESS NOTED OTHERWISE.

20. THE CONTRACTOR SHALL PROVIDE STRICT CONTROL AND JOB CLEANING TO PREVENT DUST AND DEBRIS FROM EMANATING FROM CONSTRUCTION AREA.

21. THE CONTRACTOR SHALL BE RESPONSIBLE FOR SCHEDULING ALL ACCESS INTO ADJACENT PROPERTY WITH THE PROPERTY OWNERS AS REQUIRED FOR PRICING AND CONSTRUCTION.

22. THE CONTRACTOR SHALL PROVIDE PROTECTION TO ALL EXISTING FINISHES REMAINING. THE CONTRACTOR SHALL BE RESPONSIBLE TO REPAIR ANY DAMAGES CAUSED THEREIN BY THE CONTRACTOR OR SUBCONTRACTORS.

23. "TYPICAL" OR "TYP." MEANS IDENTICAL FOR ALL SIMILAR CONDITIONS UNLESS NOTED OTHERWISE.

24. "SIMILAR" OR "SIM." MEANS COMPARABLE CHARACTERISTICS TO THE CONDITION NOTED. VERY DIMENSIONS

25. "VERIFY" OR "VER." MEANS TO ASCERTAIN AND CONFIRM APPLICATION WITH APPROPRIATE PARTY AS NOTED.

26. "ALIGN" MEANS TO ACCURATELY LOCATE FINISHED FACES IN THE SAME PLANE.

27. THE CONTRACTOR SHALL THOROUGHLY EXAMINE THE PREMISES AND SHALL BASE HIS/HER BID ON THE EXISTING CONDITIONS, NOTWITHSTANDING ANY INFORMATION SHOWN OR NOT SHOWN ON THE CONSTRUCTION DRAWINGS.

28. ALL DRAWINGS AND WRITTEN MATERIAL HEREIN CONSTITUTE THE ORIGINAL AND UNPUBLISHED WORK OF THE ARCHITECT, AND THE SAME MAY NOT BE DUPLICATED, USED OR DISCLOSED WITHOUT THE WRITTEN CONSENT OF THE ARCHITECT. ALL COPYRIGHT LAWS AND REVELATIONS PERTAINING TO INTELLECTUAL PROPERTY APPLY, BEFORE, DURING, AND AFTER CONSTRUCTION.

29. ALL INSTALLED PLUMBING, MECHANICAL AND ELECTRICAL EQUIPMENT SHALL OPERATE QUIETLY AND FREE OF VIBRATION. ALL SUCH EQUIPMENT SHALL COMPLY WITH LOCAL SOUND ORDINANCES.

30. THE CONTRACTOR SHALL VERIFY THAT NO CONFLICTS EXIST IN LOCATIONS OF ANY AND ALL MECHANICAL, TELEPHONE AND COMMUNICATION, ELECTRICAL, LIGHTING, PLUMBING AND SPRINKLER EQUIPMENT (TO INCLUDE ALL PIPING, DUCTOWRK AND CONDUIT) AND THAT ALL REQUIRED CLEARANCES FOR INSTALLATION AND MAINTENANCE OF ABOVE EQUIPMENT ARE PROVIDED.

31. THE GENERAL CONTRACTOR SHALL PROVIDE SUBMITTAL INFORMATION FOR ALL APPLIANCES, FIXTURES, EQUIPMENT, HARDWARE, FINISH MATERIAL AND ANY ADDITIONAL SELECTIONS FOR APPROVAL PRIOR TO ORDERING. SUBMITTAL INFORMATION INCLUDES TECHNICAL INFORMATION, IMAGES OF THE PRODUCT, AND FINISH SAMPLES FOR APPROVAL.

CONSTRUCTION PLAN NOTES

1. SEE GENERAL NOTES.

2. THE CONTRACTOR SHALL PATCH AND REPAIR ALL FIREPROOFING DAMAGE INCURRED DURING DEMOLITION AND/OR CONSTRUCTION. THE CONTRACTOR SHALL FIREPROOF AS REQUIRED BY CODE, ALL NEW PENETRATIONS GENERATED BY THE WORK DESCRIBED IN THESE DOCUMENTS.

3. ALL PARTITION LOCATIONS SHALL BE AS SHOWN ON THE CONSTRUCTION PLAN. IN THE CASE OF A CONFLICT NOTIFY THE ARCHITECT. THE CONSTRUCTION PLAN BY THE ARCHITECT SUPERSEDES ALL OTHER PLANS. INCLUDING ALL CONSTRUCTION PLANS.

4. UPON COMPLETION OF PARTITION LAYOUT, THE CONTRACTOR SHALL NOTIFY THE ARCHITECT. VERIFICATION OF LAYOUT TO BE PROVIDED BY THE ARCHITECT PRIOR TO PARTITION INSTALLATION.

5. ALL GYPSUM BOARD PARTITIONS SHALL BE TAPED AND SANDED SMOOTH WITH NO VISIBLE JOINTS. THE CONTRACTOR SHALL PATCH AND REPAIR SURFACES TO MATCH ADJACENT OR ADJOINING SURFACES WHEREVER REQUIRED. ALL SURFACES SHALL BE ALIGNED AND SANDED SMOOTH.

6. ALL PARTITIONS ARE DIMENSIONED FINISH FACE OF GYPSUM BOARD TO FINISH FACE OF GYPSUM BOARD, U.N.O. ALL DIMENSIONS MARKED "CLEAR" SHALL BE MAINTAINED AND SHALL ALLOW FOR THE THICKNESS OF ALL FINISHES INCLUDING CARPET (AND CUSHION), CERAMIC TILE, VCT AND PLYWOOD UNDERLAYMENT FILE CABINETS.

7. CEILING HEIGHT PARTITIONS SHALL BE INSTALLED TIGHT TO FINISHED CEILING WITH NO JOINTS VARYING MORE THAN 1/8 INCH OVER 6'-0" AND NO JOINTS GREATER THAN 3/16 INCH.

8. PROVIDE METAL CORNER OR EDGE BEADS AT ALL GWB TERMINATION.

9. REFER TO REFLECTED CEILING PLANS FOR GYPSUM BOARD SOFFITS, CEILINGS AND PLENUM BARRIER LOCATIONS.

10. FOR DOORS THAT ARE NOT LOCATED BY SPECIFIC PLAN DIMENSIONS, REFER TO TYPICAL DOOR JAMB DIMENSIONS. DOOR OR CASED OPENINGS WITHOUT LOCATION DIMENSIONS ARE TO BE (6) INCHES FROM

11. TRIM THE BOTTOMS OF DOORS TO CLEAR THE TOP OF FINISHED FLOOR BY 3/8 INCH MAXIMUM, U.N.O.

12. DIMENSIONS LOCATING DOORS BY EDGE ARE TO THE INSIDE EDGE OF JAMB, U.N.O.

THE FACE OF THE ADJACENT PARTITION OR CENTERED BETWEEN PARTITIONS.

13. ALL GLASS SHALL BE CLEAR GLASS, U.N.O. GLAZING TONG MARKS SHALL NOT BE VISIBLE. CLEAN AND POLISH ALL GLASS PRIOR TO PROJECT DELIVERY.

14. ALL MILLWORK ABOVE 4'-0" SHALL BE BOLTED TO PARTITION. THE CONTRACTOR SHALL PROVIDE FIRE TREATED BLOCKING AS REQUIRED.

15. INSTALL ALL NEW OR RELOCATED APPLIANCES SPECIFIED AND ALL EQUIPMENT ACCORDING TO MANUFACTURER'S INSTRUCTIONS AND SPECIFICATIONS. VERIFY ALL CLEAR OPENING DIMENSIONS IN CABINETRY ADEQUATELY ACCOMMODATE THE SPECIFIED OR RELOCATED EQUIPMENT.

16. PROVIDE BLOCKING FOR ALL "IN CONTRACT" WALL MOUNTED SHELVES, FIXTURES, AND MILLWORK AND FOR ITEMS SPECIFICALLY NOTED THAT ARE N.I.C.

17. DIMENSIONS MARKED +/- MEAN A TOLERANCE NOT GREATER NOR SMALLER THAN 2 INCHES FROM INDICATED DIMENSION, U.N.O. VERIFY FIELD DIMENSIONS EXCEEDING TOLERANCE WITH THE ARCHITECT.

18. ALL HEIGHTS ARE DIMENSIONED FROM TOP OF FINISH FLOOR, U.N.O.

19. ALL WORK SHALL BE ERECTED AND INSTALLED PLUMB, LEVEL, SQUARE AND TRUE AND IN PROPER

20. DO NOT SCALE DRAWINGS, WRITTEN DIMENSIONS GOVERN.

POWER & DATA PLAN NOTES

1. SEE GENERAL NOTES.

2. SURVEY FIELD CONDITIONS AND VERIFY THAT WORK IS FEASIBLE AS SHOWN. VERIFY LOCATION OF FLOOR OUTLETS AND OTHER OUTLETS IN RELATION TO STRUCTURAL AND OTHER ELEMENTS AS REQUIRED. NOTIFY THE ARCHITECT IN WRITING OF ANY DISCREPANCIES BEFORE PROCEEDING WITH WORK.

3. ARCHITECTURAL DRAWINGS DETERMINE THE LOCATION OF OUTLETS AND SUPERSEDE CONSULTANTS DRAWINGS, UNLESS NOTED OTHERWISE. VERIFY FIELD CONDITIONS.

4. ELECTRICAL DESIGN TO BE HANDLED AS DESIGN/BUILD,WHERE APPLICABLE.

5. FURNITURE AND EQUIPMENT IS SHOWN FOR COORDINATION OF OUTLETS AND DEVICES ONLY.

6. ALL SWITCHES SHOWN ADJACENT TO EACH OTHER SHALL BE GANGED AND COVERED IN A SINGLE COVER PLATE, U.N.O. IF SWITCH DOES NOT ALLOW GANGING, VERIFY LOCATION WITH THE ARCHITECT PRIOR TO INSTALLATION.

7. WHERE THERMOSTATS AND LIGHT SWITCHES OCCUR TOGETHER INSTALL BOTH ALIGNED VERTICALLY.

8. ALL ELECTRICAL AND COMMUNICATION OUTLETS AND SWITCHES SHALL BE THE SAME COLOR AS THE COVER PLATE, U.N.O. COORDINATE COVER PLATE COLOR WITH THE ARCHITECT PRIOR TO ORDERING OR INSTALLATION.

9. STANDARD MOUNTING HEIGHTS: ELECTRICAL AND COMMUNICATION OUTLETS +18" A.F.F. TO CENTER OF BOX WORK COUNTER OUTLETS AT +44" A.F.F. TO CENTER OF BOX WALL MOUNTED TELEPHONES AT +50" A.F.F. TO CENTER OF BOX SWITCHES AT +44" A.F.F.

BACK OUTLETS 2'-0" MIN. AT ACOUSTICAL PARTITIONS, U.N.O.

10. ALL LIGHT SWITCHES AND OUTLETS TO BE LOCATED 6" FROM THE LATCH SIDE OF THE DOORFRAME,

11. SPECIAL OUTLET MOUNTING HEIGHTS ARE NOTED ADJACENT TO THE OUTLET.

12. AT ALL VOICE AND DATA LOCATIONS PROVIDE MUD RING AND PULL STRING OR CONDUIT IF REQUIRED BY LOCAL BUILDING OFFICIAL. CABLING PROVIDED BY OTHERS.

13. ALL ELECTRICAL, MECHANICAL THERMOSTATS AND LIFE SAFETY DEVICES TO BE LOCATED WITHIN 18" OF THE END OF A WALL OR A DOOR, U.N.O., VERTICALLY ALIGN DEVICES WITH SWITCHES WHERE APPLICABLE.

14. OUTLETS SHOWN BACK TO BACK ON PARTITION WALLS SHALL BE OFFSET 1'-0". SEPARATE BACK-TO-

15. COORDINATE ALL WORK RELATED TO SPECIAL EQUIPMENT WITH MANUFACTURER'S RECOMMENDATIONS, SPECIFICATIONS AND INSTRUCTIONS.

16. ALL EXISTING AND NEW FLOOR SLAB PENETRATIONS FOR PIPING AND CONDUIT SHALL BE FULLY PACKED AND SEALED IN ACCORDANCE WITH THE APPLICABLE BUILDING AND FIRE CODES. COORDINATE FLOOR CORES WITH STRUCTURAL BEAMS AND MECHANICAL SYSTEMS BELOW.

17. UPON COMPLETION OF OUTLET LAYOUT, THE CONTRACTOR SHALL NOTIFY THE ARCHITECT. THE ARCHITECT SHALL SITE VERIFY ALL OUTLET LOCATIONS PRIOR TO COMMENCEMENT OF CORING OR OUTLET INSTALLATION.

18. FURNISH AND INSTALL UNDERWRITERS LABORATORIES, INC. (UL) LABELED DEVICES THROUGHOUT.

19. MAINTAIN 4 INCH HORIZONTAL CLEARANCE IN BOTH DIRECTION MINIMUM FROM EDGE OF COVER PLATE, AND THE LIKE, FOR WALL MOUNTED OUTLETS, OR MONUMENT FOR FLOOR MOUNTED OUTLETS, AND THE LIKE, ADJACENT TO A WALL, COLUMN OR SIMILAR ELEMENTS, U.N.O.

20. INDICATED DIMENSIONS ARE TO THE CENTER OF THE COVER PLATE OF MONUMENT. CLUSTERS OF OUTLETS ARE DIMENSIONED TO THE CENTER OF THE CLUSTER, U.N.O. GANGED COVER PLATES SHALL BE ONE-PIECE TYPE, U.N.O.

21. WALL OUTLETS NOT DIMENSIONED AND SHOWN NEAR THE CORNER SHALL BE INSTALLED 8" FROM THE CORNER; WALL OUTLETS SHOWN NEAR THE CENTER OF A PARTITION SHALL BE INSTALLED ON THE CLOSEST STUD NEAREST THE CENTER, U.N.O.

REFLECTED CEILING PLAN NOTES

1. SEE GENERAL NOTES.

2. THE CONTRACTOR SHALL COORDINATE THE WORK OF ALL TRADES INVOLVED IN THE CEILING WORK TO INSURE CLEARANCES FOR FIXTURES, DUCTS, PIPING, CEILING SUSPENSION SYSTEM, ETC. MAINTAIN THE FINISHED CEILING HEIGHTS INDICATED ON THE ARCHITECT'S DRAWINGS.

3. REFER TO DESIGN DRAWINGS AND SPECIFICATIONS FOR LOCATION ONLY. MECHANICAL AND ELECTRICAL TO BE HANDLED AS "DESIGN/BUILD", WHERE APPLICABLE.

5. PROVIDE FIRE PROTECTION AT ALL PENETRATIONS OF FIRE RATED ELEMENTS AS REQUIRED BY THE GOVERNING

6. PERIMETER CEILING ANGLE, WHERE OCCURS, SHALL BE INSTALLED TIGHT TO VERTICAL SURFACES, FREE FROM

7. THE ELECTRICAL SUBCONTRACTOR SHALL FURNISH AND INSTALL ALL FIXTURES, ASSOCIATED TRIM AND FIXTURE

CURVES, BREAKS OR OTHER IRREGULARITIES AND PAINTED TO MATCH CEILING FINISH, U.N.O.

LAMPS AS SPECIFIED, U.N.O.

8. ALL SWITCHES, OUTLETS, THERMOSTATS OR ANY OTHER ELECTRICAL ITEMS SHOWN ON PLAN SIDE BY SIDE BUT

CALLED OUT AT DIFFERENT HEIGHTS SHOULD BE STACKED VERTICALLY.

9. ALL SWITCHES SHOWN ADJACENT TO EACH OTHER SHALL BE GANGED AND COVERED IN A SINGLE COVER PLATE,

U.N.O. IF SWITCH DOES NOT ALLOW GANGING, VERIFY LOCATION WITH THE DESIGNER PRIOR TO INSTALLATION.

11. ACCESS PANEL TYPE AND LOCATION SHALL BE SUBMITTED TO THE ARCHITECT FOR APPROVAL PRIOR TO

10. WHERE THERMOSTATS AND LIGHT SWITCHES OCCUR TOGETHER INSTALL BOTH ALIGNED VERTICALLY.

COMMENCING WORK.

12. ALL ELECTRICAL AND MECHANICAL THERMOSTATS, AND LIFE SAFETY DEVICES TO BE LOCATED WITHIN 18" OF THE

END OF A WALL OR A DOOR,U.N.O. VERTICALLY ALIGN DEVICES WITH SWITCHES WHERE APPLICABLE.

13. ALL SWITCHES AND DIMMERS SHALL BE LOCATED 48" ABOVE FINISHED FLOOR TO CENTER OF SWITCH, U.N.O.. MULTIPLE SWITCHES AT ONE LOCATION SHALL BE GANGED TOGETHER AND FINISHED WITH TONE COVER PLATE, U.N.O.. 14. THE REFLECTED CEILING PLAN INDICATES THE LOCATION OF CEILING TYPES, CEILING FIXTURES AND ASSOCIATED

15. ALL SPECIFIC INFORMATION CONCERNING INSTALLATION OF VARIOUS ABOVE CEILING ELEMENTS ARE TO BE FOUND

IN THE HVAC, PLUMBING, AND FIRE PROTECTION, ELECTRICAL AND LIGHTING DRAWINGS, AND SPECIFICATIONS.

16. CONTRACTOR TO NOTIFY ARCHITECT OF ANY CONFLICTS OF LIGHT FIXTURE LOCATION WITH MAIN RUNNER, DUCTS, STRUCTURAL, HVAC (E) CONDUIT PRIOR TO FRAMING FOR LIGHTS. ANY DISCREPANCIES BETWEEN THE ARCHITECT'S

RCP AND ACTUAL FIELD CONDITIONS ARE TO BE CLARIFIED WITH THE ARCHITECT'S PRIOR TO INSTALLATION.

17. SUBMIT GRILLE, THERMOSTAT AND OTHER FIXTURES AND ELEMENT LAYOUT TO THE ARCHITECT FOR REVIEW AT

18. VERIFY FIELD CONDITIONS AND LOCATIONS OF ALL PLUMBING, MECHANICAL DUCTS, STRUCTURAL ELEMENTS AND ANY AND ALL OTHER APPLICABLE ITEMS. INSTALL APPLICABLE NEW PLUMBING, MECHANICAL, FANS, DUCTS, CONDUITS AND OTHER RELATED AND PERTINENT ITEMS SO AS TO NOT CONFLICT WITH LUMINARIES AND ANY AND ALL FIELD CONDITIONS.

19. FURNISH AND INSTALL UNDERWRITERS LABORATORIES, INC. (UL) LABELED DEVICES THROUGHOUT.

20. INSTALL LIGHT FIXTURES WITH PROTECTIVE MYLAR OR SIMILAR COVER OVER LOUVER LENS, BAFFLE, AND THE LIKE, TO AVOID FIXTURE SOILING OR DAMAGE. FIXTURES SHALL BE MAINTAINED CLEAN AND AS NEW. LAMPS SHALL BE NEW AT PROJECT COMPLETION.

ELECTRICAL PLAN NOTES

LEAST 2 WEEKS PRIOR TO INSTALLATION.

1. SEE GENERAL NOTES.

2. SURVEY FIELD CONDITIONS AND VERIFY THAT WORK IS FEASIBLE AS SHOWN. VERIFY LOCATION OF FLOOR OUTLETS AND OTHER OUTLETS IN RELATION TO STRUCTURAL AND OTHER ELEMENTS AS REQUIRED. NOTIFY THE DESIGNER IN WRITING OF ANY DISCREPANCIES BEFORE PROCEEDING WITH WORK.

3. DESIGNER'S DRAWINGS DETERMINE THE LOCATION OF OUTLETS AND SUPERSEDE CONSULTANTS DRAWINGS, UNLESS NOTED OTHERWISE. VERIFY FIELD CONDITIONS.

4. ELECTRICAL DESIGN TO BE HANDLED AS DESIGNBUILD.

5. FURNITURE AND EQUIPMENT IS SHOWN FOR COORDINATION OF OUTLETS AND DEVICES ONLY.

6. ALL SWITCHES SHOWN ADJACENT TO EACH OTHER SHALL BE GANGED AND COVERED IN A SINGLE COVER PLATE, U.N.O. IF SWITCH DOES NOT ALLOW GANGING, VERIFY LOCATION WITH THE DESIGNER PRIOR TO INSTALLATION.

7. WHERE THERMOSTATS AND LIGHT SWITCHES OCCUR TOGETHER, INSTALL BOTH ALIGNED VERTICALLY.

8. ALL ELECTRICAL AND COMMUNICATION OUTLETS AND SWITCHES SHALL BE THE SAME COLOR AS THE COVER PLATE, U.N.O. COORDINATE COVER PLATE COLOR WITH THE DESIGNER PRIOR TO ORDERING OR

9. STANDARD MOUNTING HEIGHTS:

A. ELECTRICAL AND COMMUNICATION OUTLETS @ 18" A.F.F. TO CENTER OF BOX. B. WALL-MOUNTED TELEPHONES @ 50" A.F.F. TO CENTER OF BOX. C. SWITCHES @ 44" A.F.F.

10.ALL LIGHT SWITCHES AND OUTLETS TO BE LOCATED 8" FROM THE LATCH SIDE OF THE DOOR FRAME, U.N.O.

11.SPECIAL OUTLET MOUNTING HEIGHTS ARE NOTED ADJACENT TO THE OUTLET.

12.AT ALL VOICE AND DATA LOCATIONS PROVIDE MUD RING AND PULL STRING OR CONDUIT IF REQUIRED BY LOCAL BUILDING OFFICIAL CABLING PROVIDED BY OTHERS.

13.ALL ELECTRICAL, MECHANICAL THERMOSTATS AND LIFE SAFETY DEVICES TO BE LOCATED WITHIN 18" OF THE END OF A WALL OR A DOOR. VERTICALLY ALIGN DEVICES WITH SWITCHES WHERE APPLICABLE.

14.OUTLETS SHOWN BACK-TO-BACK ON PARTITION WALLS SHALL BE OFFSET 1' 0". SEPARATE BACK-TO-BACK OUTLETS 2'-0" MIN. AT ACOUSTICAL PARTITIONS, U.N.O.

15.COORDINATE ALL WORK RELATED TO SPECIAL EQUIPMENT WITH MANUFACTURER'S RECOMMENDATIONS, SPECIFICATIONS AND INSTRUCTIONS.

16.ALL EXISTING AND NEW FLOOR SLAB PENETRATIONS FOR PIPING AND CONDUIT SHALL BE FULLY PACKED AND SEALED IN ACCORDANCE WITH THE APPLICABLE BUILDING AND FIRE CODES. COORDINATE FLOOR CORES WITH STRUCTURAL BEAMS AND MECHANICAL SYSTEMS BELOW.

17.UPON COMPLETION OF OUTLET LAYOUT, THE CONTRACTOR SHALL NOTIFY THE DESIGNER. THE DESIGNER SHALL SITE VERIFY ALL OUTLET LOCATIONS PRIOR TO COMMENCEMENT OF CORING OR OUTLET INSTALLATION.

18.FURNISH AND INSTALL UNDERWRITER'S LABORATORIES, INC. (UL) LABELED DEVICES THROUGHOUT.

19.MAINTAIN 4 INCH HORIZONTAL CLEARANCE IN BOTH DIRECTION MINIMUM FROM EDGE OF COVER PLATE, AND THE LIKE, FOR WALL-MOUNTED OUTLETS OR MONUMENT FOR FLOOR MOUNTED OUTLETS, AND THE LIKE, ADJACENT TO A WALL, COLUMN OR SIMILAR ELEMENTS, U.N.O.

20.INDICATED DIMENSIONS ARE TO THE CENTER OF THE COVER PLATE OF MONUMENT. CLUSTERS OF OUTLETS ARE DIMENSIONED TO THE CENTER OF THE CLUSTER, U.N.O. GANGED COVER PLATES SHALL BE ONE PIECE TYPE, U.N.O.

21.WALL OUTLETS NOT DIMENSIONED AND SHOWN NEAR THE CORNER SHALL BE INSTALLED 8" FROM THE CORNER. WALL OUTLETS SHOWN NEAR THE CENTER OF A PARTITION SHALL BE INSTALLED ON THE STUD NEAREST THE CENTER, U.N.O.

22. SEC R404.1: Provide a note on the drawing,
"A minimum of 75 percent of permanently installed lamps in lighting fixtures shall be high-efficacy lamps."

FINISH PLAN NOTES

1. SEE GENERAL NOTES.

2. PAINTING - NO PAINTING OR INTERIOR FINISHING SHALL BE DONE UNDER CONDITIONS, WHICH WILL JEOPARDIZE THE QUALITY OR APPEARANCE OF SUCH WORK. ALL WORKMANSHIP, WHICH IS JUDGED LESS

THAN FIRST QUALITY BY THE ARCHITECT, WILL BE REJECTED.

A. ALL COLORS ARE TO BE SELECTED OR APPROVED BY THE ARCHITECT.

B. B. ALL NEW AND EXISTING SURFACES SHALL BE PREPARED TO RECEIVE THE SPECIFIED FINISH.

C. BANT CRADE WOODWORK SHALL BE HAND SANDED AND DUSTED OF EARL, ALL KNOT HOLES.

C. PAINT GRADE WOODWORK SHALL BE HAND SANDED AND DUSTED CLEAN. ALL KNOT HOLES; PITCH POCKETS OR SAPPY PORTIONS SHALL BE SCRAPED AND SEALED. FILL NAIL HOLES, CRACKS OR DEFECTS CAREFULLY WITH MATCHING PUTTY. INTERIOR PAINT GRADE WOODWORK FINISHES SHALL BE SANDED BETWEEN COATS.

D. INTERIOR GYPSUM WALLBOARD SURFACES SHALL BE WIPED WITH A DAMP CLOTH JUST PRIOR TO APPLICATION OF THE FIRST COAT, IN ORDER TO LAY FLAT ANY NAP, WHICH MAY HAVE FORMED, IN THE SANDING PROCESS.

E. ALL EXISTING FERROUS METAL SHALL BE LIGHTING SANDED TO PREPARE A SMOOTH SURFACE.
F. ALL EXISTING GWB SHALL BE PREPPED AND PATCHED TO MATCH ADJACENT SURFACE.
G. THE CONTRACTOR SHALL, UPON COMPLETION, REMOVE ALL PAINT FROM WHERE IT HAS SPILLED,

SPLASHED OR SPLATTERED ON EXPOSED ADJACENT SURFACES.

H. PROTECT ALL SURFACES NOT TO RECEIVE PAINT FROM ALL DRIPS, SPLATTERS AND SPILLS.

IMMEDIATELY CLEAN ANY SPILL TO AVOID DAMAGING THE EXISTING SURFACE.

I. ALL VENEER STAINS SHALL HAVE UNIFORM COLOR.

J. THE CONTRACTOR SHALL PROVIDE THE ARCHITECT WITH A MINIMUM OF (2) 8" X 10" BRUSH-OUTS OF EACH COLOR AND FINISH FOR THE ARCHITECT'S APPROVAL AT LEAST TWO WEEKS PRIOR TO SITE APPLICATION. A WALL TEST WILL BE REQUIRED ONE WEEK PRIOR TO FINAL APPROVAL. THE ARCHITECT RESERVES THE RIGHT TO ADJUST ANY COLOR ONCE THE WALL TEST HAS BEEN MADE.

3. ELECTRICAL SWITCH AND OUTLET COVER PLATES, SURFACE HARDWARE, ETC., SHALL BE INSTALLED AFTER PAINTING AND/OR APPLICATION OF WALLCOVERINGS AND CARPET. REMOVE ALL EXISTING SWITCH AND OUTLET COVER PLATES, SURFACE HARDWARE, GRILLS, SIGNAGE, ETC PRIOR TO PAINTING. REINSTALL WHEN PAINTING IS COMPLETE.

4. THE CONTRACTOR SHALL BE RESPONSIBLE FOR ALLOWING FOR DELIVERY LEAD TIMES FOR ALL FINISHES

WITHIN THE CONSTRUCTION SCHEDULE. ALL DELIVERY TIMES MUST BE CONFIRMED, AND ANY EXCESSIVE LENGTH MUST BE BROUGHT TO THE ARCHITECT'S ATTENTION IMMEDIATELY TO ALLOW FOR RE-SPECIFICATION IF NEEDED.

5. THE CONTRACTOR SHALL MODIFY EXISTING FLOOR SURFACES AS REQUIRED TO INSTALL NEW FLOORING MATERIALS THUS PREVENTING NOTICEABLE LUMPS, OR DEPRESSIONS, WHICH MAY CAUSE UNUSUAL WEAR TO NEW MATERIALS.

6. SEE FINISH PLAN, INTERIOR ELEVATIONS AND DETAILS FOR CLARIFICATION OF EXTENT OF FINISH.

7. THE CONTRACTOR SHALL SUBMIT TO THE ARCHITECT A CARPET SEAMING DIAGRAM AT LEAST 2 WEEKS PRIOR TO INSTALLATION.

8. THE CONTRACTOR SHALL COORDINATE WITH THE ARCHITECT FOR COLOR FINISH OF ALL WALL-MOUNTED DEVICES ON ACCENT COLORED WALLS SUCH THAT DEVICES SHALL MATCH THE COLOR OF THE WALL (SWITCHES, OUTLETS, STROBES, ETC.), UNLESS FINISH IS GOVERNED BY CODE.

PAINT SCHEDULE FOR INTERIOR SURFACES

ENJAMIN MOORE OR EQUAL.

REFER TO FINISH PLAN FOR COLOR SELECTIONS.

I. GYPSUM WALLBOARD: WALLS AND CEILINGS.

A. LATEX, EGGSHELL. CLEAN AND ROLL ON THREE-COAT SYSTEM.

1. BOTTOM COAT: BENJAMIN MOORE, PRISTINE ECO SPEC PRIMER

2. INTERMEDIATE COAT: BENJAMIN MOORE, PRISTINE ECO SPEC

3. TOP COAT: BENJAMIN MOORE, PRISTINE ECO SPEC

2. FERROUS METAL: HOLLOW METAL DOORS AND FRAMES, HANDRAILS, EXPOSED MISCELLANEOUS METALS.

A. ACRYLIC SEMIGLOSS. SAND EXISTING METAL AND BRUSH ON THREE-COAT SYSTEM.

1. BOTTOM COAT: BENJAMIN MOORE, PRISTINE ECO SPEC PRIMER

2. INTERMEDIATE COAT: BENJAMIN MOORE, PRISTINE ECO SPEC

3. TOP COAT: BENJAMIN MOORE, PRISTINE ECO SPEC

3. WOOD: WOOD TRIM, WOOD DOORS AND FRAMES.
A. ACRYLIC SEMIGLOSS. SAND EXISTING WOOD AND BRUSH ON THREE-COAT SYSTEM.

1. BOTTOM COAT: BENJAMIN MOORE, PRISTINE ECO SPEC PRIMER
2. INTERMEDIATE COAT: BENJAMIN MOORE, PRISTINE ECO SPEC
3. TOP COAT: BENJAMIN MOORE, PRISTINE ECO SPEC

GENERAL LIGHTING NOTES

GOVERNING AUTHORITY.

APPROVAL PRIOR TO COMMENCING WORK.

WITH ONE TONE COVER PLATE, U.N.O.

AND ASSOCIATED ITEMS.

THE CONTRACTOR SHALL COORDINATE THE WORK OF ALL TRADES INVOLVED IN THE CEILING WORK TO INSURE CLEARANCES FOR FIXTURES, DUCTS, PIPING, CEILING SUSPENSION SYSTEM, ETC.

MAINTAIN FINISHED CEILING HEIGHTS INDICATED ON THE ARCHITECT/DESIGNER'S DRAWINGS.

2. REFER TO DESIGN DRAWINGS AND SPECIFICATIONS FOR LOCATION ONLY. MECHANICAL AND

ELECTRICAL TO BE HANDLED AS "DESIGNBUILD."

3. PROVIDE FIRE PROTECTION AT ALL PENETRATIONS OF FIRE-RATED ELEMENTS AS REQUIRED BY THE

4. PERIMETER CEILING ANGLE WHERE OCCURS SHALL BE INSTALLED TIGHT TO VERTICAL SURFACES, FREE FROM CURVES. BREAKS OR OTHER IRREGULARITIES AND PAINTED TO MATCH CEILING FINISH.

5. THE ELECTRICAL SUBCONTRACTOR SHALL FURNISH AND INSTALL ALL FIXTURES, ASSOCIATED TRIM AND FIXTURE LAMPS AS SPECIFIED.

 ALL SWITCHES, OUTLETS, THERMOSTATS OR ANY OTHER ELECTRICAL ITEMS SHOWN ON PLAN SIDE BY SIDE BUT CALLED OUT AT DIFFERENT HEIGHTS SHOULD BE STACKED VERTICALLY.
 ALL SWITCHES SHOWN ADJACENT TO EACH OTHER SHALL BE GANGED AND COVERED IN A SINGLE

ARCHITECT/DESIGNER PRIOR TO INSTALLATION.

COVER PLATE, U.N.O. IF SWITCH DOES NOT ALLOW GANGING, VERIFY LOCATION WITH THE

9. ACCESS PANEL TYPE AND LOCATION SHALL BE SUBMITTED TO THE ARCHITECT/DESIGNER FOR

3. WHERE THERMOSTATS AND LIGHT SWITCHES OCCUR TOGETHER, INSTALL BOTH ALIGNED

10.ALL ELECTRICAL AND MECHANICAL THERMOSTATS AND LIFE SAFETY DEVICES TO BE LOCATED WITHIN 18 INCHES OF THE END OF A WALL OR A DOOR. VERTICALLY ALIGN DEVICES WITH

SWITCHES WHERE APPLICABLE.

11.ALL SWITCHES AND DIMMERS SHALL BE LOCATED 48 INCHES ABOVE FINISHED FLOOR TO CENTER OF SWITCH, U.N.O. MULTIPLE SWITCHES AT ONE LOCATION SHALL BE GANGED TOGETHER AND FINISHED

12.THE REFLECTED CEILING PLAN INDICATES THE LOCATION OF CEILING TYPES, CEILING FIXTURES

13.ALL SPECIFIC INFORMATION CONCERNING INSTALLATION OF VARIOUS ABOVE CEILING ELEMENTS ARE TO BE FOUND IN THE HVAC, PLUMBING AND FIRE PROTECTION, ELECTRICAL AND LIGHTING DRAWINGS.

14.CONTRACTOR TO NOTIFY ARCHITECT/DESIGNER OF ANY CONFLICTS OF LIGHT FIXTURE LOCATION WITH MAIN RUNNER, DUCTS, STRUCTURAL, HVAC (E) CONDUIT PRIOR TO FRAMING FOR LIGHTS. ANY DISCREPANCIES BETWEEN THE ARCHITECT/DESIGNERS RCP AND ACTUAL FIELD CONDITIONS ARE TO

15.SUBMIT GRILLE, THERMOSTAT AND OTHER FIXTURES AND ELEMENT LAYOUT TO THE ARCHITECT/DESIGNER FOR REVIEW AT LEAST 2 WEEKS PRIOR TO INSTALLATION.

BE CLARIFIED WITH THE DESIGNER PRIOR TO INSTALLATION.

16.VERIFY FIELD CONDITIONS AND LOCATIONS OF ALL PLUMBING, MECHANICAL DUCTS, STRUCTURAL ELEMENTS AND ANY AND ALL OTHER APPLICABLE ITEMS. INSTALL APPLICABLE NEW PLUMBING, MECHANICAL, FANS, DUCTS, CONDUITS AND OTHER RELATED AND APPURTENANT ITEMS SO AS TO NOT CONFLICT WITH LUMINARIES AND ANY AND ALL FIELD CONDITIONS.

17.FURNISH AND INSTALL UNDERWRITERS LABORATORIES, INC. (UL) LABELED DEVICES THROUGHOUT.

18.INSTALL LIGHT FIXTURES WITH PROTECTIVE MYLAR OR SIMILAR COVER OVER LOUVER LENS, BAFFLE, AND THE LIKE, TO AVOID FIXTURE SOILING OR DAMAGE. FIXTURES SHALL BE MAINTAINED CLEAN AND AS NEW. LAMPS SHALL BE NEW AT PROJECT COMPLETION.

57

SUZANNE ZAHR INC.

WWW.SUZANNEZAHR.COM

2441 SE 76TH AVE, SUITE 160 MERCER ISLAND, WASHINGTON 98040 T. 206 354 1567

RESIDENCE NG UNIT ADDITION

302 E MERCER WAY

PROJECT NUMBER

20004

9221
REGISTERED ARCHITECT
SUZANNE ZAHR
STATE OF WASHINGTON

ISSUED / REVISIONS DATE

GENERAL NOTES

12.08.20

ISSUE DATE:

DRAWN BY:

CHECKED BY:

SHEET NUMBER

Building Air Leakage Testing

2012 Washington State Energy Code (WSEC) section R402.4.1.2 requires air leakage testing for all new houses and additions. The requirement is met if the structure has a leakage rate of 5 air changes per hour when depressurized with a blower door to 50 Pascals or less (5ACH₅₀). A Pascal is a measurement of pressure. 249 Pascals are equal to 1" of water column. The test must be performed using a Blower Door device which consists of a large fan, a frame and panel. A manometer (pressures

manometer (pressure gauge) is used to read house and fan pressures.

WSEC states that the test may be performed at any time after rough in. All penetrations in the building envelope must be sealed including those for utilities, plumbing, electrical, ventilation and combustion appliances. The code also states that

combustion appliances. The code also states that when required by the building official, the test shall be conducted by an approved third party

To conduct the test:

Close all windows, doors and fireplace and stove doors.
 Close all dampers including exhaust, intake, make-up air, backdraft and flue dampers. Since you will be depressurizing the house, dampers in bath fans, etc. will be sucked closed during the test and will therefore not negatively affect the results.

Make sure plumbing traps are filled with water.
 Leave doors between heated areas open.

5. Open access hatches to conditioned attics and/or conditioned crawl spaces. Leave hatches closed if these are unconditioned areas.6. Seal exterior openings for continuously operating ventilation systems and

heat recovery ventilators.

7. Turn off heating and cooling systems but do not seal supply or return

8. Adjust all combustion appliances so that they do not turn on during the

test.

9. Install the blower door in an exterior door opening and connect hoses from

the manometer to the blower door fan and the exterior pressure tap. See manufacturer's instructions for correct set-up.

10. Depressurize the house to -50 Pascals.

Energy Code

Support

WASHINGTON STATE UNIVERSITY
EXTENSION ENERGY PROGRAM

EXTENSION ENERGY PROGRAM

blower doors can automatically perform this conversion, and display CFM₅₀ directly.) Consult your blower door and manometer manuals.

You now must convert the flow rate (CFM₅₀) to ACH₅₀. Use the following formula:

converted to CFM_{50} using a flow table. Many digital manometers sold with

ACH₅₀ = (CFM50 X 60) / Volume

re: ACH₅₀ = Air Changes per Hour at -50 Pascals
CFM50 X 60 = Converts Cubic Feet per Minute to Cubic Feet per
Hour
Volume = Conditioned floor area of the housing unit multiplied by

Example: A blower door test has been done on a 2,000 square foot house and the fan flow (CFM50) rate is 1100 CFM.

 $ACH_{50} = (CFM50 \times 60) / Volume$ $ACH_{50} = (1100 \times 60) / (2000 \times 8)$

ACH₅₀ = 66,000/16,000 ACH₅₀ = 4.1

Since the code requires the ACH_{50} to be less than 5, this house complies with an ACH_{50} of 4.1. Record the ACH_{50} on the energy certificate on or near the electrical papel.

© 2010 Washington State University Extension Energy Program. This publication contains material written and produced for public distribution. Permission to copy or disseminate all or part of this material is granted, provided that the copies are not made or distributed for commercial advantage, and that each is referenced by title with credit to the Washington State University Extension Energy Program. Copying, reprinting or dissemination, electronic or otherwise, for any other use requires prior written permission

from the Washington State University Extension Energy Program. WSUEEP10-001 Rev. 1, 2010

NOTF:

U-FACTORS OF FENESTRATION PRODUCTS TO BE DETERMINED IN ACCORDANCE WITH NFRC 100 PER SEC R303.1.3

| EXTERIOR DOOR SCHEDULE | | | | | | | | | | | |
|------------------------|--------|---------------|--------------|-------|------------|-------------|---------------------------------|----------|------------|----------|-----------------------|
| IMAGE | NUMBER | LOCATION | MANUFACTURER | Count | DOOR WIDTH | DOOR HEIGHT | SAFETY GLASS | U-VALUE | GLASS AREA | UA VALUE | Туре |
| | 101.1 | GARAGE | TBD | 1 | 3' - 0" | 6' - 10" | YES r n. | ı/a | 14 SF | n/a | SINGLE SOLID DOOR |
| | 101.2 | GARAGE | TBD | 1 | 8' - 0" | 6' - 10" | YES n. | ı/a | 38 SF | n/a | GLAZED GARAGE DOOR |
| | 101.2 | GARAGE | TBD | 1 | 8' - 0" | 6' - 10" | YES n. | /a | 38 SF | n/a | GLAZED GARAGE DOOR |
| | 101.2 | GARAGE | TBD | 1 | 8' - 0" | 6' - 10" | YES n. | ı/a | 38 SF | n/a | GLAZED GARAGE DOOR |
| | 101.2 | GARAGE | TBD | 1 | 8' - 0" | 6' - 10" | YES n. | /a | 38 SF I | n/a | GLAZED GARAGE DOOR |
| | 201.1 | ENTRY | TBD | 1 | 3' - 0" | 9' - 0" | YES r 0. | .28 | 18 SF | 5.04 | SINGLE FULL-LITE DOOR |
| | 203.1 | LIVING/DINING | | 1 | 15' - 0" | 9' - 0" | | .28 | 110 SF | 30.8 | SLIDING GLASS DOOR |
| | 1 | | | | | <u> </u> | SUM OF VERTICAL FENESTRATION AF | REA & UA | 128 SF | 35.84 | |
| | | | | | | | AREA WEIGHTED U = | UA/AREA | 0.28 | | |

| | INTERIOR DOOR SCHEDULE | | | | | | | | | | |
|-------|------------------------|--------------|--------------|-------|------------|-------------|-------|----------------------------|--|--|--|
| IMAGE | NUMBER | LOCATION | MANUFACTURER | Count | DOOR WIDTH | DOOR HEIGHT | AREA | TYPE | | | |
| | | | | | | | | | | | |
| | 202.1 | BATHROOM | TBD | 1 | 2' - 6" | 9' - 0" | 23 SF | SINGLE SOLID DOOR | | | |
| | 201.2 | ENTRY CLOSET | TBD | 1 | 7' - 0" | 8' - 0" | 56 SF | DOUBLE SLIDING CLOSET DOOR | | | |
| | | | | 4 | 01 011 | 01 011 | 22 CE | SINGLE SOLID DOOR | | | |
| | 205.1 | BEDROOM | TBD | 1 | 2' - 6" | 9' - 0" | 23 SF | SINGLE SOLID DOOK | | | |

| WINDOW SCHEDULE | | | | | | | | | | | | |
|-----------------|-----|-----------------------|--------------|------|---------|---------|--------------------|--------------|---------|--------|----------|------------------------|
| /IAGE | TAG | LOCATION | MANUFACTURER | QTY. | WIDTH | HEIGHT | SAFETY GLASS | EGRESS | U-VALUE | AREA | UA-VALUE | TYPE |
| | | | | | | | | | | | | |
| | W-1 | BEDROOM | TBD | 1 | 3' - 2" | 8' - 0" | N/A | | 0.28 | 25 SF | 7 | SINGLE FIXED WINDOW |
| | W-2 | LIVING ROOM & BEDROOM | TBD | 3 | 5' - 1" | 5' - 6" | N/A | | 0.28 | 28 SF | 23.52 | SINGLE FIXED WINDOW |
| | W-3 | LIVING ROOM & BEDROOM | TBD | 3 | 2' - 6" | 5' - 6" | N/A | | 0.28 | 14 SF | 11.76 | SINGLE CASEMENT WINDOW |
| | W-4 | ENTRY | TBD | 1 | 4' - 0" | 6' - 0" | N/A | | 0.28 | 24 SF | 6.72 | SINGLE FIXED WINDOW |
| | | , | | | | SU | M OF VERTICAL FENE | STRATION AR | EA & UA | 175 SF | 49 | |
| | | | | | | | AREA W | /EIGHTED U = | UA/AREA | 0.28 | | |

Residential Building Air Leakage Test (Blower Door Test) Results Permit #: _____ House address or lot number: _____ City: _____ Zip: _____ Cond. Floor Area (ft²): _____ Age of house: _____ Source (circle one): Plans Estimated Measured

Source (circle one): Plans Estimated Measured

Results shall be reported as Air Changes per Hour at 50 Pascals (ACH₅₀) and shall be calculated as follows: $ACH_{50} = (CFM50 \times 60)/Volume$ Where:

CFM50 = Blower door fan flow at 50 Pascal pressure difference
Volume = Conditioned Floor Area of the housing unit x ceiling height

Blower Door Test Result: ______ACH₅₀

Ring (circle one if applicable): Open A B C

Blower Door Fan Location: _____ Weather Conditions: _____

Company Name: ______ Technician: _____

Technician Signature: _____ Date: _____ Phone Number: _____

I certify that these blower door results are accurate and determined using standard industry protocol.

2015 Washington State Energy Code reference:

R402.4.1.2 Testing. The building or dwelling unit shall be tested and verified as having an air leakage rate of not exceeding 5 air changes per hour. Testing shall be conducted with a blower door at a pressure of 0.2 inches w.g. (50 Pascals). Where required by the code official, testing shall be conducted by an approved third party. A written report of the results of the test shall be signed by the party conducting the test and provided to the code official. Testing shall be performed at any time after creation of all penetrations of the building thermal envelope. Once visual inspection has confirmed sealing (see Table R402.4.1.1), operable windows and doors manufactured by small business shall be permitted to be sealed off at the frame prior to the test.

Energy Code
S u p p o r t

WASHINGTON STATE UNIVERSITY

EXTENSION ENERGY PROGRAM

During testing:

1. Exterior windows and doors, fireplace and stove doors shall be closed, but not sealed, beyond the intended

weatherstripping or other infiltration control measures;

2. Dampers including exhaust, intake, makeup air, backdraft and flue dampers shall be closed, but not sealed

beyond intended infiltration control measures;Interior doors, if installed at the time of the test, shall be open, access hatches to conditioned crawl spaces and conditioned attics shall be open;

4. Exterior openings for continuous ventilation systems and heat recovery ventilators shall be closed and sealed;
5. Heating and cooling systems, if installed at the time of the test, shall be turned off; and

6. Supply and return registers, if installed at the time of the test, shall be fully open.

Conditioned Floor Area Builder or registered design professional: R-Values Floors: Over unconditioned space R-Slab on grade floor R-U-Factors and SHGC NRFC rating (or) Default rating (Appendix A WSEC 2015) Skylights U-Table 406.2 Option(s) Total 406.2 Credits Heating, Cooling & Domestic Hot Water Heating DHW Duct & Building Air Leakage All ducts & HVAC in conditioned space (yes/no) Insulation R-Air handler present (yes / no) Test Target ____ CFM@25Pa Test Result ____ CFM@25Pa Building air leakage target: ACH₅₀ < 5.0 - Tested leakage: ACH₅₀ = Onsite Renewable Energy Electric Power System Rated annual generation

SUM OF AREA FOR VERTICAL FENESTRATION 303 SF

SUM OF UA FOR VERTICAL FENESTRATION 84.84

SUM OF WEIGHTED U FOR VERTICAL FENESTRATION

SUZANNE ZAHR INC.

2441 SE 76TH AVE, SUITE 160
MERCER ISLAND, WASHINGTON 98040
T. 206 354 1567
WWW.SUZANNEZAHR.COM

BLE RESIDENCE Y DWELLING UNIT ADDITION

4602 E MERCER

PROJECT NUMBER
20004

| 9221 | REGISTERED |
|-------|---------------------------------|
| 17 | ARCHITECT |
| | |
| STATE | SUZANNE ZAHR E OF WASHINGTON |
| 7 | |

ISSUED / REVISIONS DATE

ISSUE DATE: 12.08.20
DRAWN BY: SA
CHECKED BY: SZ

SCHEDULES

0.28

SHEET NUMBER

THAT PORTION OF THE SOUTHWEST QUARTER OF THE SOUTHEAST QUARTER AND OF GOVERNMENT LOT 3, SECTION 18, TOWNSHIP 24 NORTH, RANGE 5 EAST, WILLAMETTE MERIDIAN, IN KING COUNTY, WASHINGTON, LYING EAST OF MERCER ISLAND BOULEVARD AND BETWEEN LINES PARALLEL WITH AND DISTANT 24.1 FEET AND 74.1 FEET, RESPECTIVELY, SOUTH OF THE NORTH LINE OF SAID GOVERNMENT SUBDIVISION;

(BEING KNOWN AS LOT 9, SANDY BEACH TRACTS, ACCORDING TO THE UNRECORDED PLAT THEREOF);

TOGETHER WITH SECOND CLASS SHORELANDS, AS CONVEYED BY THE STATE OF WASHINGTON, SITUATE IN FRONT OF AND LYING BETWEEN SAID PARALLEL LINES PRODUCED EASTERLY;

TOGETHER WITH AN EASEMNT FOR INGRESS AND EGRESS TO AND FROM SAID PREMISES UPON AND ACROSS ALL EXISTING ROADS AS CONVEYED BY DEED RECORDED MAY 02, 1942, UNDER RECORDING NUMBER 3237836.

SITUATE IN THE COUNTY OF KING, STATE OF WASHINGTON.

BASIS OF BEARINGS

A BEARING OF N 88°06'10" E BETWEEN FOUND MONUMENTS ON DAWN DRIVE CALCULATED PER R1.

REFERENCES

- R1. DAWN VISTA, VOL. 82, PG. 78&79,
- R2. SHORT PLAT, VOL. 10, PG. 118,
- R3. RECORD OF SURVEY, VOL. 138, PG. 176, R4. RECORD OF SURVEY, VOL. 279, PG. 41, ALL RECORDS OF KING COUNTY, WASHINGTON.

VERTICAL DATUM

NAVD88 PER GPS OBSERVATIONS.

SURVEYOR'S NOTES

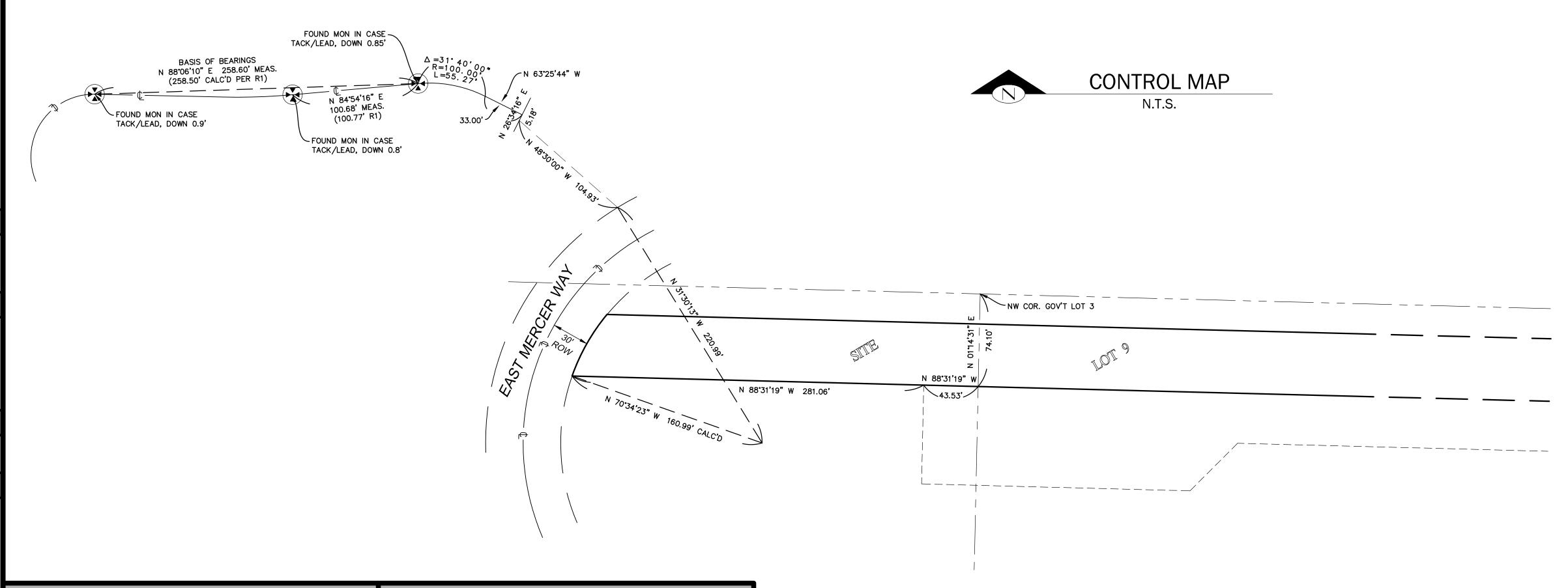
- I. THE TOPOGRAPHIC SURVEY SHOWN HEREON WAS PERFORMED IN AUGUST OF 2020. THE FIELD DATA WAS COLLECTED AND RECORDED ON MAGNETIC MEDIA THROUGH AN ELECTRONIC THEODOLITE. THE DATA FILE IS ARCHIVED ON DISC OR CD. WRITTEN FIELD NOTES MAY NOT EXIST. CONTOURS ARE SHOWN FOR CONVENIENCE ONLY. DESIGN SHOULD RELY ON SPOT
- 2. ALL MONUMENTS SHOWN HEREON WERE LOCATED DURING THE COURSE OF THIS SURVEY UNLESS OTHERWISE NOTED.
- 3. THE TYPES AND LOCATIONS OF ANY UTILITIES SHOWN ON THIS RAWING ARE BASED ON INFORMATION PROVIDED OTHERS OR GENERAL INFORMATION READILY AVAILABLE IN THE PUBLIC DOMAIN INCLUDING, AS APPLICABLE, IDENTIFYING MARKINGS PLACED BY UTILITY LOCATE SERVICES AND OBSERVED BY TERRANE IN THE FIELD. AS SUCH, THE UTILITY INFORMATION SHOWN ON THESE DRAWINGS ARE FOR INFORMATIONAL PURPOSES ONLY AND SHOULD NOT BE RELIED ON FOR DESIGN OR CONSTRUCTION PURPOSES; TERRANE IS NOT RESPONSIBLE OR LIABLE FOR THE ACCURACY OR COMPLETENESS OF THIS UTILITY INFORMATION. FOR THE ACCURATE LOCATION AND TYPE OF UTILITIES NECESSARY FOR DESIGN AND CONSTRUCTION, PLEASE CONTACT THE SITE OWNER AND THE LOCAL UTILITY LOCATE SERVICE (800-424-5555).
- 4. SUBJECT PROPERTY TAX PARCEL NO. 755870-0045.

30,726± S.F. (0.71 ACRES)

- 5. SUBJECT PROPERTY UPLAND AREA PER THIS SURVEY IS
- 6. THE PROPERTY DESCRIBED HEREON IS THE SAME AS THE PROPERTY DESCRIBED IN CHICAGO TITLE COMPANY, COMMITMENT NO. 0188037-ETU, WITH AN EFFECTIVE DATE OF AUGUST 26, 2020 AND THAT ALL EASEMENTS, COVENANTS AND RESTRICTIONS REFERENCED IN SAID TITLE COMMITMENT OR APPARENT FROM A PHYSICAL INSPECTION OF THE PROPERTY OR OTHERWISE KNOWN TO ME HAVE BEEN PLOTTED HEREON OR OTHERWISE NOTED AS TO THEIR EFFECT ON THE PROPERTY.
- 7. FIELD DATA FOR THIS SURVEY WAS OBTAINED BY DIRECT FIELD MEASUREMENTS WITH A CALIBRATED ELECTRONIC 5-SECOND TOTAL STATION AND/OR SURVEY GRADE GPS OBSERVATIONS. ALL ANGULAR AND LINEAR RELATIONSHIPS ARE ACCURATE AND MEET THE STANDARDS SET BY WAC 332-130-090.



TOPOGRAPHIC & BOUNDARY SURVEY



SCHEDULE B ITEMS

EASEMENT(S) FOR THE PURPOSE(S) SHOWN BELOW AND RIGHTS INCIDENTAL THERETO AS SET FORTH IN A DOCUMENT: PURPOSE: INGRESS AND EGRESS

RECORDING DATE: MAY 2, 1942 RECORDING NO: 3237836 AFFECTS: THE DESCRIPTION CONTAINED IN THE ABOVE INSTRUMENT

IS NOT SUFFICIENT TO DETERMINE ITS EXACT LOCATION WITHIN THE PROPERTY HEREIN DESCRIBED (AS CONSTRUCTED, NOT PLOTTED)

2. EASEMENT(S) FOR THE PURPOSE(S) SHOWN BELOW AND RIGHTS

INCIDENTAL THERETO AS SET FORTH IN A DOCUMENT:

IN FAVOR OF: PUGET SOUND POWER & LIGHT COMPANY PURPOSE: ELECTRIC TRANSMISSION AND/OR DISTRIBUTION LINE RECORDING DATE: NOVEMBER 28, 1947 RECORDING NO: 3749195 AFFECTS: THE DESCRIPTION CONTAINED IN THE ABOVE INSTRUMENT

IS NOT SUFFICIENT TO DETERMINE ITS EXACT LOCATION WITHIN THE PROPERTY HEREIN DESCRIBED (AS CONSTRUCTED, NOT PLOTTED)

3. EASEMENT(S) FOR THE PURPOSE(S) SHOWN BELOW AND RIGHTS INCIDENTAL THERETO AS SET FORTH IN A DOCUMENT: IN FAVOR OF: MERCER ISLAND SEWER DISTRICT PURPOSE: SEWER PIPELINES AND NECESSARY APPURTENANCES RECORDING DATE: JUNE 19, 1964

RECORDING NO: 5750985 AFFECTS: 5 FEET ON EITHER SIDE OF THE PIPELINE AS INSTALLED IN THE SECOND CLASS SHORELANDS (AS CONSTRUCTED, NOT PLOTTED)

4. EASEMENT(S) FOR THE PURPOSE(S) SHOWN BELOW AND RIGHTS INCIDENTAL THERETO AS SET FORTH IN A DOCUMENT: IN FAVOR OF: WASHINGTON NATURAL GAS COMPANY PURPOSE: GAS PIPELINE OR PIPELINES RECORDING DATE: JANUARY 27, 1987

RECORDING NO: 8701270845 AFFECTS: THE DESCRIPTION CONTAINED IN THE ABOVE INSTRUMENT IS NOT SUFFICIENT TO DETERMINE ITS EXACT LOCATION WITHIN THE PROPERTY HEREIN DESCRIBED (AS CONSTRUCTED, NOT PLOTTED)

5. COVENANTS, CONDITIONS AND RESTRICTIONS BUT OMITTING ANY COVENANTS OR RESTRICTIONS, IF ANY, INCLUDING BUT NOT LIMITED TO THOSE BASED UPON RACE, COLOR, RELIGION, SEX, SEXUAL ORIENTATION, FAMILIAL STATUS, MARITAL STATUS, DISABILITY, HANDICAP, NATIONAL ORIGIN, ANCESTRY, OR SOURCE OF INCOME, AS SET FORTH IN APPLICABLE STATE OR FEDERAL LAWS, EXCEPT TO THE EXTENT THAT SAID COVENANT OR RESTRICTION IS PERMITTED BY APPLICABLE LAW, AS SET FORTH IN THE DOCUMENT RECORDING DATE: MAY 2, 1942 RECORDING NO: 3237836 (BLANKET IN NATURE)

6. PROPERTY LINE AGREEMENT EXECUTED BY: GERALD AND PEGGY GERON; AND JEFFERSON AND NANCY DAVIS RECORDING DATE: MARCH 1, 1990 RECORDING NO.: 9003010658 (NOTHING TO PLOT)

SCHEDULE B ITEMS

7. ANY RIGHTS, INTERESTS, OR CLAIMS WHICH MAY EXIST OR ARISE BY REASON OF THE FOLLOWING SURVEY MATTERS DISCLOSED WARRANTY DEED RECORDED UNDER RECORDING NO. 9905121223:

ENCROACHES ONTO THE NORTHERLY ADJOINER; B) WOOD FENCE MEANDERS ALONG THE NORTHERLY PROPERTY

A) CONCRETE DRIVE APPURTENANT TO SUBJECT PREMISES

C) DECIDUOUS TREE STRADDLES TO THE NORTH PROPERTY LINE; D) WOOD & PICKETT FENCE MEANDER ALONG THE SOUTH

PROPERTY LINE; E) FIR TREE STRADDLES SOUTH PROPERTY LINE F) ROCKERY EXTENDS ALONG THE WEST PROPERTY LINE (CURRENT CONDITIONS SHOWN)

8. ANY RIGHTS, INTERESTS, OR CLAIMS WHICH MAY EXIST OR ARISE BY REASON OF THE FOLLOWING MATTERS DISCLOSED BY

RECORDING DATE: JUNE 26, 2000 RECORDING NO.: 20000626900004 MATTERS SHOWN:

a) WIRE FENCE AND RETAINING WALL MEANDERS ALONG THE SOUTHERLY PROPERTY LINE; b) ROCKERY ALONG THE EAST PROPERTY LINE EXTENDS ONTO THE SOUTHERLY ADJOINER; c) YARD DRAIN AND HAND HOLE EXTEND ONTO THE SOUTHERLY

ADJOINER. (CURRENT CONDITIONS SHOWN)

LECEND

| | | LEGI | =ND | |
|---|-------------------|--------------------------|----------------------------------------|------------------------|
| | • | AREA DRAIN | PST□ | POST |
| ı | | ASPHALT SURFACE | BOLO | BOLLARD |
| ı | <u> </u> | BUILDING | X | FIRE HYDRANT |
| ı | — <u>¢</u> — | CENTERLINE ROW | G 🔲 | GAS METER |
| | CO • | CLEANOUT | >- | GUY ANCHOR |
| | > | CULVERT PIPE | | INLET (TYPE 2) |
| | | CONCRETE SURFACE | \forall | SIGN (AS NOTED) |
| | | WALL | COL 🗌 | COLUMN |
| | | DECK | ACU □ | AC UNIT |
| | —× × | FENCE LINE (CHAIN LINK) | × | YARD LIGHT |
| | /// // | FENCE LINE (IRON) | W∨⋈ | WATER VALVE |
| | | FENCE LINE (WOOD) | TV HH□ | TV HAND HOLE |
| | TETTE | ROCKERY | SIZE TYPE | TREE (AS NOTED) |
| | ss | SEWER LINE | 3121 1111 2 | |
| | \bigcirc | SEWER MANHOLE | \\\\\\\\\\\\\\\\\\\\\\\\\\\\\\\\\\\\\\ | HEDGE FOLIAGE LINE |
| | SD | STORM DRAIN LINE | PH□ | POWER HAND HOLE |
| | — т — | TELEPHONE (OVERHEAD) | P□ | POWER METER |
| | w | WATER LINE | PP O | POWER POLE |
| | —— Р —— | POWER (OVERHEAD) | O PP O | POWER POLE W/ LIGHT |
| | (<u>F</u> | MONUMENT IN CASE (FOUND) | 0 | REBAR AS NOTED (FOUND) |
| | | FLAGSTONE SURFACE | • OHPT | OHP TRANSMISSION LINE |
| | | | НВ○ | HOSE BIB RISER |
| | _ | REBAR & CAP (SET) | > < | NAIL AS NOTED |

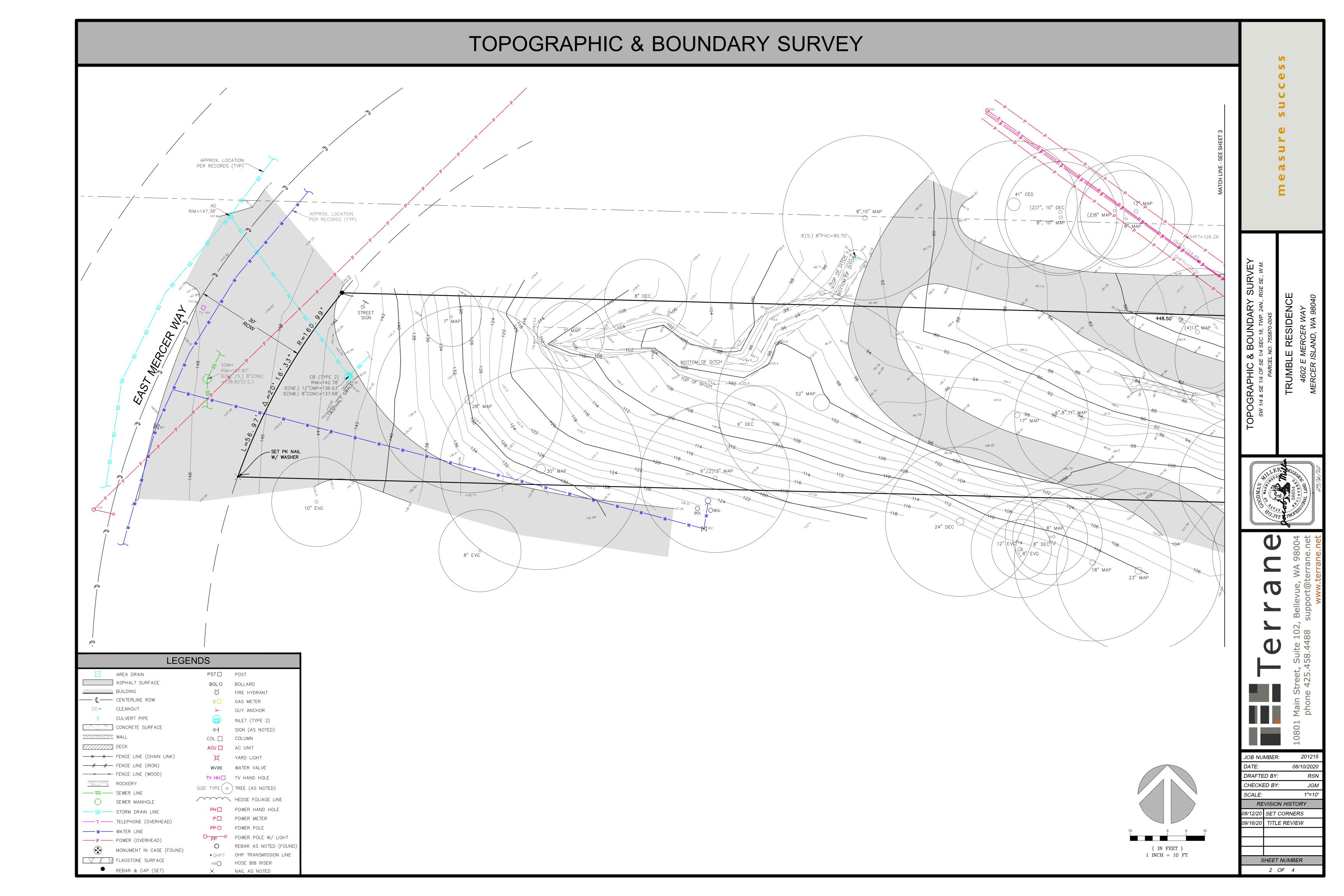
STEEP SLOPE/BUFFER DISCLAIMER:

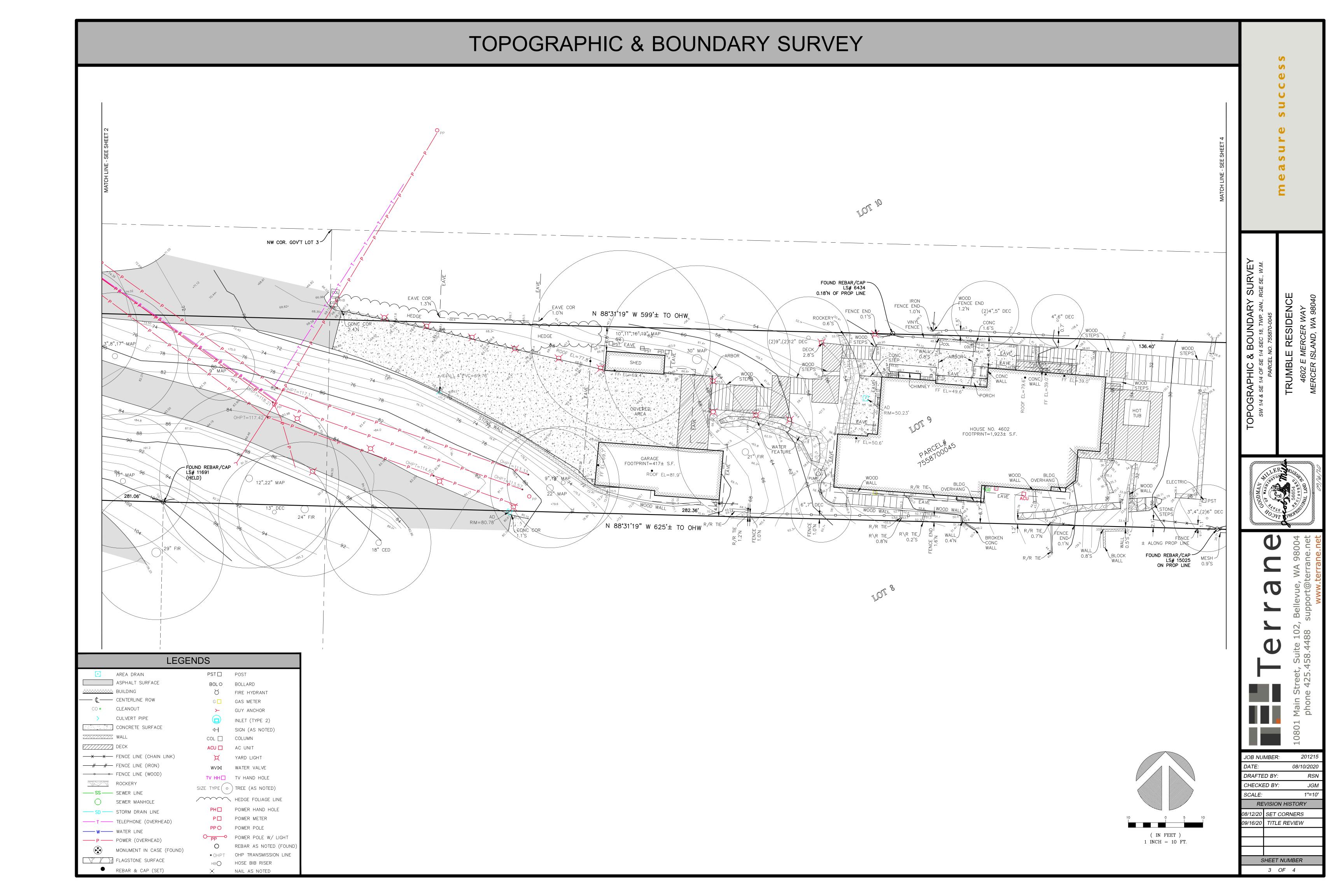
THE LOCATION AND EXTENT OF STEEP SLOPES SHOWN ON THIS DRAWING ARE FOR INFORMATIONAL PURPOSES ONLY AND CANNOT BE RELIED ON FOR DESIGN AND/OR CONSTRUCTION. THE PITCH, LOCATION, AND EXTENT ARE BASED SOLELY ON OUR GENERAL OBSERVATIONS ON SITE AND OUR CURSORY REVIEW OF READILY AVAILABLE PUBLIC DOCUMENTS; AS SUCH, TERRANE CANNOT BE LIABLE OR RESPONSIBLE FOR THE ACCURACY OR COMPLETENESS OF ANY STEEP SLOPE INFORMATION. ULTIMATELY, THE LIMITS AND EXTENT OF ANY STEEP SLOPES ASSOCIATED WITH ANY SETBACKS OR OTHER DESIGN OR CONSTRUCTION PARAMETERS MUST BE DISCUSSED AND APPROVED BY THE REVIEWING AGENCY BEFORE ANY CONSTRUCTION CAN OCCUR.

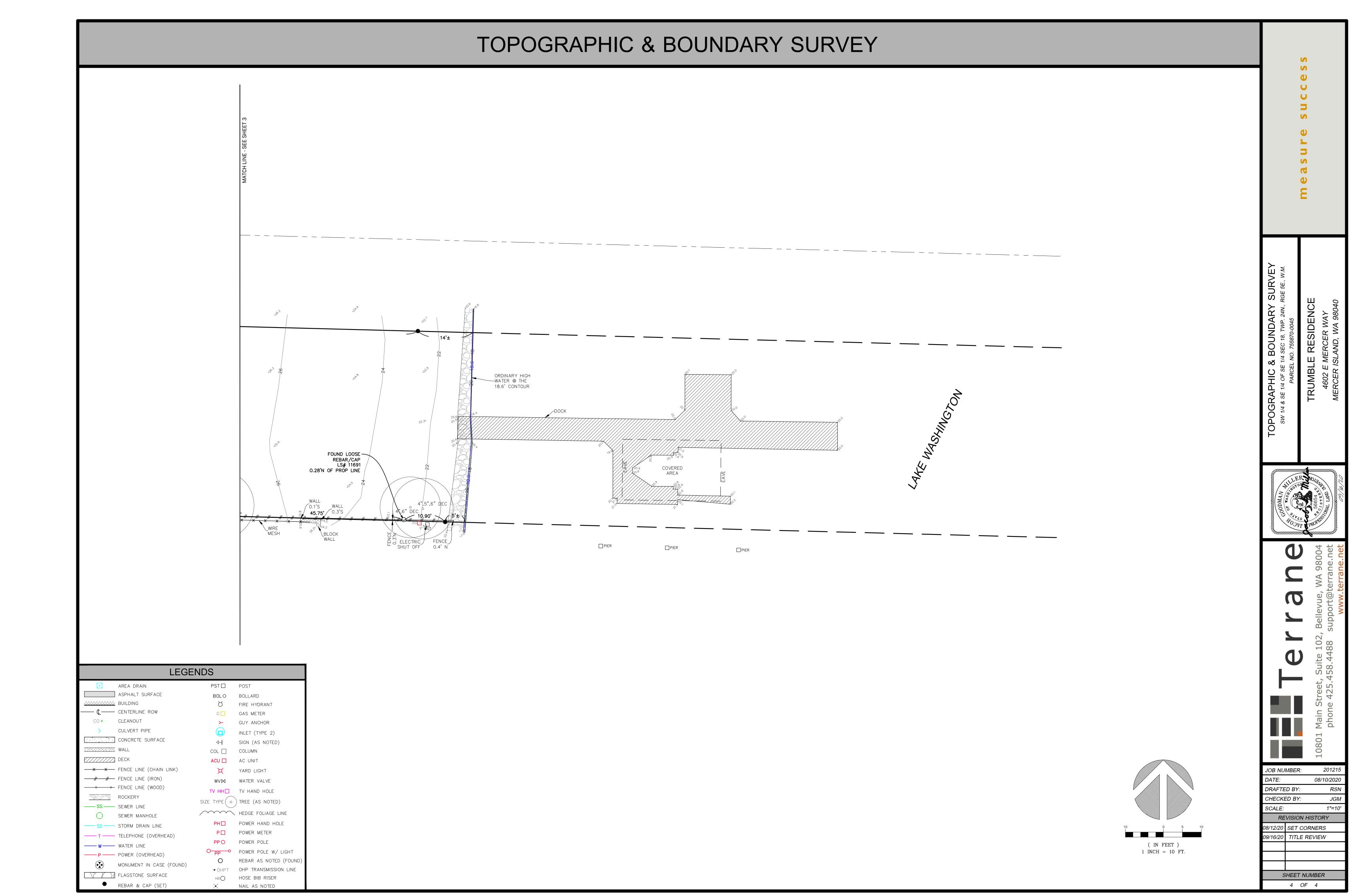
| | | 7 | |
|----------------|---------|------------|--|
| OB NU | MBER: | 201215 | |
| ATE: | | 08/10/2020 | |
| RAFTE | D BY: | RSN | |
| HECKED BY: JGM | | | |
| CALE: | | 1" = 10' | |
| RE | VISION | HISTORY | |
| 12/20 | SET CO | ORNERS | |
| 6/20 | TITLE I | REVIEW | |
| | | | |

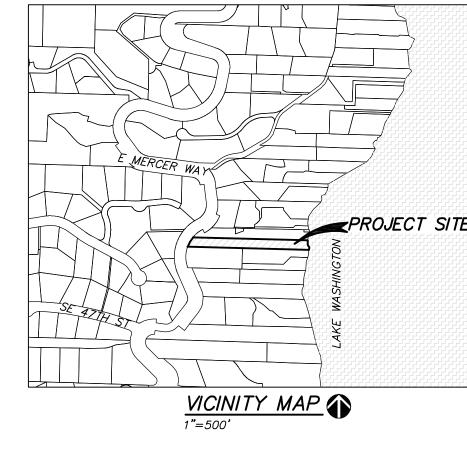
SHEET NUMBER

1 OF 4



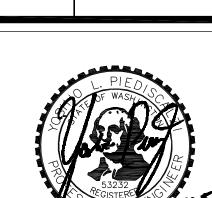






D.R. STRONG CONSULTING ENGINEER

620 - 7th AVENUE KIRKLAND, WA 98033 O 425.827.3063 F 425.827.2423



TREE TO BE REMOVED

CONSTRUCTION LIMITS, TO BE FLAGGED

SAWCUTTING AND SURFACING POLLUTION

OR FENCED WHEN NO SILT FENCE IS

PROPOSED (BMP C103)

ENTRANCE (BMP C105)

PREVENTION (BMP C152)

DUST CONTROL (BMP C140)

PERMANENT SEEDING AND

QUALITY & DEPTH (BMP C120)

CONCRETE HANDLING (BMP C151)

PLASTIC COVERING (BMP C123)

INLET PROTECTION (BMP C220)

PLANTING (BMP C120)

MULCHING, MATTING, & COMPOST

BLANKETS (BMP C121, BMP C125)

POST-CONSTRUCTION SOIL AMENDMENT

STABILIZED CONSTRUCTION

TREE TO BE SAVED. PROVIDE TREE PROTECTION FENCING

2 OF 3 DRAINAGE PLAN 3 OF 3 DETAILS

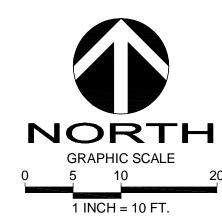
TESC LEGEND:

DC -

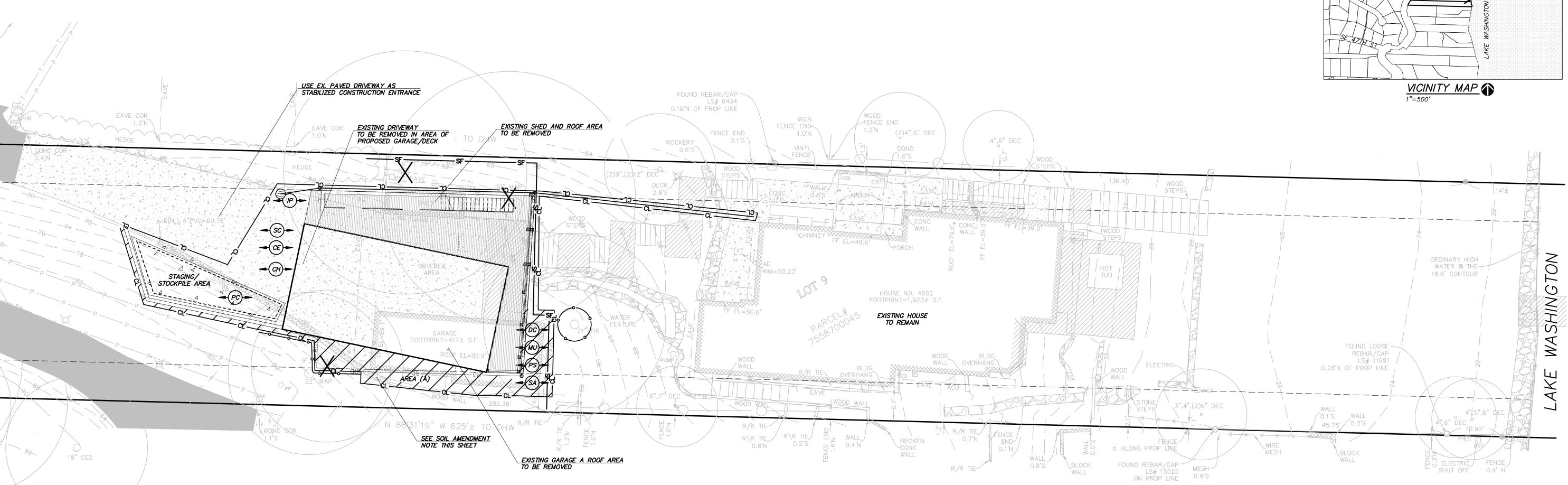
SA→

FOR ADDITIONAL TESC DETAILS REFER TO DOE 2012 SWMMWW

SILT FENCE IS PROPOSED (BMP C233)







SURVEYOR'S NOTES: (BY SURVEYOR)

1. THE TOPOGRAPHIC SURVEY SHOWN HEREON WAS PERFORMED IN AUGUST OF 2020. THE FIELD DATA WAS COLLECTED AND RECORDED ON MAGNETIC MEDIA THROUGH AN ELECTRONIC THEODOLITE. THE DATA FILE IS ARCHIVED ON DISC OR CD. WRITTEN FIELD NOTES MAY NOT EXIST. CONTOURS ARE SHOWN FOR CONVENIENCE ONLY. DESIGN SHOULD RELY ON SPOT ELEVATIONS.

2. ALL MONUMENTS SHOWN HEREON WERE LOCATED DURING THE COURSE OF THIS SURVEY UNLESS OTHERWISE NOTED.

3. THE TYPES AND LOCATIONS OF ANY UTILITIES SHOWN ON THIS DRAWING ARE BASED ON INFORMATION PROVIDED TO US, BY OTHERS OR GENERAL INFORMATION READILY AVAILABLE IN THE PUBLIC DOMAIN INCLUDING, AS APPLICABLE, IDENTIFYING MARKINGS PLACED BY UTILITY LOCATE SERVICES AND OBSERVED BY TERRANE IN THE FIELD. AS SUCH, THE UTILITY INFORMATION SHOWN ON THESE DRAWINGS ARE FOR INFORMATIONAL PURPOSES ONLY AND SHOULD NOT BE RELIED ON FOR DESIGN OR CONSTRUCTION PURPOSES; TERRANE IS NOT RESPONSIBLE OR LIABLE FOR THE ACCURACY OR COMPLETENESS OF THIS UTILITY INFORMATION. FOR THE ACCURATE LOCATION AND TYPE OF UTILITIES NECESSARY FOR DESIGN AND CONSTRUCTION, PLEASE CONTACT THE SITE OWNER AND THE LOCAL UTILITY LOCATE SERVICE (800-424-5555).

4. SUBJECT PROPERTY TAX PARCEL NO. 755870-0045.

5. SUBJECT PROPERTY UPLAND AREA PER THIS SURVEY IS 30,726± S.F. (0.71 ACRES)

6. THE PROPERTY DESCRIBED HEREON IS THE SAME AS THE PROPERTY DESCRIBED IN CHICAGO TITLE COMPANY, COMMITMENT NO. 0188037-ETU, WITH AN EFFECTIVE DATE OF AUGUST 26, 2020 AND THAT ALL EASEMENTS, COVENANTS AND RESTRICTIONS REFERENCED IN SAID TITLE COMMITMENT OR APPARENT FROM A PHYSICAL INSPECTION OF THE PROPERTY OR OTHERWISE KNOWN TO ME HAVE BEEN PLOTTED HEREON OR OTHERWISE NOTED AS TO THEIR EFFECT ON THE PROPERTY.

7. FIELD DATA FOR THIS SURVEY WAS OBTAINED BY DIRECT FIELD MEASUREMENTS WITH A CALIBRATED ELECTRONIC 5-SECOND TOTAL STATION AND OR SURVEY GRADE GPS OBSERVATIONS. ALL ANGULAR AND LINEAR RELATIONSHIPS ARE ACCURATE AND MEET THE STANDARDS SET BY WAC 332-130-090.

LEGAL DESCRIPTION: (BY SURVEYOR)

(PER QUIT CLAIM DEED RECORDING# 20171212000158)

THAT PORTION OF THE SOUTHWEST QUARTER OF THE SOUTHEAST QUARTER AND OF GOVERNMENT LOT 3, SECTION 18, TOWNSHIP 24 NORTH, RANGE 5 EAST, WILLAMETTE MERIDIAN, IN KING COUNTY, WASHINGTON, LYING EAST OF MERCER ISLAND BOULEVARD AND BETWEEN LINES PARALLEL WITH AND DISTANT 24.1 FEET AND 74.1 FEET, RESPECTIVELY, SOUTH OF THE NORTH LINE OF SAID GOVERNMENT SUBDIVISION;

(BEING KNOWN AS LOT 9, SANDY BEACH TRACTS, ACCORDING TO THE UNRECORDED PLAT

TOGETHER WITH SECOND CLASS SHORELANDS, AS CONVEYED BY THE STATE OF WASHINGTON, SITUATE IN FRONT OF AND LYING BETWEEN SAID PARALLEL LINES PRODUCED

TOGETHER WITH AN EASEMNT FOR INGRESS AND EGRESS TO AND FROM SAID PREMISES UPON AND ACROSS ALL EXISTING ROADS AS CONVEYED BY DEED RECORDED MAY 02, 1942, UNDER RECORDING NUMBER 3237836.

SITUATE IN THE COUNTY OF KING, STATE OF WASHINGTON.

BASIS OF BEARINGS: (BY SURVEYOR)

A BEARING OF N 88'06'10" E BETWEEN FOUND MONUMENTS ON DAWN DRIVE CALCULATED

VERTICAL DATUM: (BY SURVEYOR) NAVD88 PER GPS OBSERVATIONS

EROSION AND SEDIMENT CONTROL NOTES:

1. APPROVAL OF THIS EROSION AND SEDIMENT CONTROL (ESC) PLAN DOES NOT CONSTITUTE AN APPROVAL OF PERMANENT ROAD OR DRAINAGE DESIGN (E.G. SIZE AND LOCATION OF ROADS, PIPES, RESTRICTORS, CHANNELS, RETENTION FACILITIES,

2. THE IMPLEMENTATION OF THESE ESC PLANS AND THE CONSTRUCTION, MAINTENANCE,

REPLACEMENT, AND UPGRADING OF THESE ESC FACILITIES IS THE RESPONSIBILITY OF THE APPLICANT/ESC SUPERVISOR UNTIL ALL CONSTRUCTION IS APPROVED. 3. THE BOUNDARÍES OF THE CLEARING LIMITS SHOWN ON THIS PLAN SHALL BE CLEARLY FLAGGED BY A CONTINUOUS LENGTH OF SURVEY TAPE (OR FENCING, IF REQUIRED) PRIOR TO CONSTRUCTION. DURING THE CONSTRUCTION PERIOD. NO DISTURBANCE BEYOND THE CLEARING LIMITS SHALL BE PERMITTED. THE CLEARING LIMITS SHALL BE MAINTAINED BY THE APPLICANT/ESC SUPERVISOR FOR THE

DURATION OF CONSTRUCTION. 4. THE ESC FACILITIES SHOWN ON THIS PLAN MUST BE CONSTRUCTED PRIOR TO OR IN CONJUNCTION WITH ALL CLEARING AND GRADING SO AS TO ENSURE THAT THE TRANSPORT OF SEDIMENT TO SURFACE WATERS, DRAINAGE SYSTEMS, AND

ADJACENT PROPERTIES IS MINIMIZED. 5. THE ESC FACILITIES SHOWN ON THIS PLAN ARE THE MINIMUM REQUIREMENTS FOR ANTICIPATED SITE CONDITIONS. DURING THE CONSTRUCTION PERIOD. THESE ESC FACILITIES SHALL BE UPGRADED AS NEEDED FOR UNEXPECTED STORM EVENTS AND MODIFIED TO ACCOUNT FOR CHANGING SITE CONDITIONS (E.G. ADDITIONAL SUMP PUMPS, RELOCATION OF DITCHES AND SILT FENCES, ETC.).

6. THE ESC FACILITIES SHALL BE INSPECTED DAILY BY THE APPLICANT/ESC SUPERVISOR AND MAINTAINED TO ENSURE CONTINUED PROPER FUNCTIONING. WRITTEN RECORDS SHALL BE KEPT OF WEEKLY REVIEWS OF THE TESC FACILITIES DURING THE WET SEASON (OCT. 1 TO APRIL 30) AND OF MONTHLY REVIEWS DURING THE DRY SEASON (MAY 1 TO SEPT. 30).

7. ANY AREAS OF EXPOSED SOILS, INCLUDING ROADWAY EMBANKMENTS, THAT WILL NOT BE DISTURBED FOR TWO DAYS DURING THE WET SEASON OR SEVEN DAYS DURING THE DRY SEASON SHALL BE IMMEDIATELY STABILIZED WITH THE APPROVED

ESC METHODS (E.G., SEEDING, MULCHING, PLASTIC COVERING, ETC.). 8. AT NO TIME SHALL MORE THAN ONE FOOT OF SEDIMENT BE ALLOWED TO ACCUMULATE WITHIN A TRAPPED CATCH BASIN. ALL CATCH BASINS AND CONVEYANCE LINES SHALL BE CLEANED PRIOR TO PAVING. THE CLEANING OPERATION SHALL NOT FLUSH SEDIMENT LADEN WATER INTO THE DOWNSTREAM SYSTEM. STABILIZED CONSTRUCTION ENTRANCES SHALL BE INSTALLED AT THE BEGINNING OF CONSTRUCTION AND MAINTAINED FOR THE DURATION OF THE PROJECT. ADDITIONAL MEASURES MAY BE REQUIRED TO INSURE THAT ALL PAVED AREAS ARE KEPT CLEAN FOR THE DURATION OF THE PROJECT.

9. ALL DISTURBED AREAS SHALL BE STABILIZED USING TYPICAL TESC BMP'S. THE LIMITS OF DISTURBANCE WILL BE DELINEATED WITH HIGH VISIBILITY CONSTRUCTION FENCING. DURING CONSTRUCTION SILT FENCES WILL BE PLACED DOWN SLOPE OF DISTURBED AREAS ALONG WITH STRAW MATTING, NETS, OR PLASTIC COVERING OVER EXPOSED SOIL OR STOCKPILES. TREES TO BE RETAINED WILL BE PROTECTED WITH

HIGH VISIBILITY CONSTRUCTION FENCING. 10. ALL SOIL STOCKPILES TO BE COVERED WITH PLASTIC SHEETING UNTIL SUCH TIME THAT THE SOIL IS EITHER USED OR REMOVED. PILES SHOULD BE SITUATED AND LOCATED SUCH THAT SEDIMENT DOES NOT RUN INTO THE STREET OR ONTO 11. ALL EXPOSED SOIL AREAS SHALL BE COVERED OR PROTECTED USING AN

APPROPRIATE BMP. STABILIZE DENUDED AREAS OF THE SITE BY MULCHING, SEEDING, PLANTING. OR SODDING 12. ALL ADJACENT PROPERTIES SHALL BE PROTECTED FROM SEDIMENT DEPOSITION BY APPROPRIATE USE OF VEGETATION BUFFER STRIPS, SEDIMENT BARRIERS, OR FILTERS, DIKES, MULCHING, OR BY A COMBINATION OF THESE MEASURES AND OTHER APPROPRIATE BMP'S.

13. PROVIDE FOR PERIODIC STREET CLEANING TO REMOVE ANY SEDIMENT THAT MAY HAVE BEEN TRACKED OFF-SITE. SEDIMENT SHOULD BE REMOVED BY SHOVELING OR SWEEPING AND CAREFULLY REMOVED TO A SUITABLE DISPOSAL AREA WHERE IT WILL NOT BE RE-ERODED.

14. ALL INSTALLED EROSION AND SEDIMENT CONTROL BMP'S SHALL BE INSPECTED REGULARLY BY THE GENERAL CONTRACTOR ESPECIALLY AFTER ANY LARGE STORM. MAINTENANCE, INCLUDING REMOVAL AND PROPER DISPOSAL OF SEDIMENT SHOULD BE A NECESSARY TO INSURE THAT SEDIMENT AND EROSION IS CONTROLLED ON SITE.

GENERAL EROSION CONTROL NOTES:

ALL DISTURBED AREAS SHALL BE STABILIZED USING TYPICAL TESC BMP'S. THE LIMITS OF DISTURBANCE WILL BE DELINEATED WITH HIGH VISIBILITY CONSTRUCTION FENCING. DURING CONSTRUCTION SILT FENCES WILL BE PLACED DOWN SLOPE OF DISTURBED AREAS ALONG WITH STRAW MATTING, NETS. OR PLASTIC COVERING OVER EXPOSED SOIL OR STOCKPILES. TREES TO BE RETAINED WILL BE PROTECTED WITH HIGH VISIBILITY CONSTRUCTION

AT THE COMPLETION OF THE PROJECT ALL DISTURBED AREAS WILL BE STABILIZED WITH COMPOST AMENDED SOILS AND HYDROSEEDING OR SOD.

CONSTRUCTION NOTES:

1. SEE ARCHITECTURAL PLAN A2.0 and A2.1 FOR EXISTING IMPROVEMENTS TO BE DEMOLISHED / REMOVED.

SOIL AMENDMENT NOTE:

SEE DETAIL & ADDITIONAL NOTES ON SHEET C3. AREA (A): STOCKPILE SITE DUFF AND TOPSOIL FOR ALL DISTURBED PERVIOUS AREAS AND REAPPLY WITH SOIL AMENDMENT AFTER GRADING AND CONSTRUCTION. MINIMUM SCARIFICATION DEPTH 8-INCHES. PROVIDE A TOTAL OF 2.5 C.Y. OF AMENDMENT FOR AN AREA OF 456 S.F.

GRADING NOTE:

TOTAL AREA TO BE DISTURBED ON-SITE....2,780 S.F. TOTAL AREA TO BE DISTURBED OFF-SITE.. O S.F.

SITE VOLUME CALCULATIONS

CUT VOLUME FILL VOLUME NET VOLUME

(CU. YDS.) (CU. YDS.) (CU. YDS.) *50 YDS CUT*

ALL VOLUMES ARE APPROXIMATE AND ARE PROVIDED FOR PERMITTING PURPOSES AND REPRESENT FINISH GRADE TO EXISTING GRADE AS SHOWN. CONTRACTOR SHALL RELY ON HIS/HER OWN ESTIMATES FOR DETERMINING ACTUAL EARTHWORK QUANTITIES. THE VOLUMES DO NOT INCLUDE STRIPPING, STRUCTURAL EXCAVATION.

EXPANSION/COMPACTION FACTOR OR ANY SOIL TYPE RESTRICTIONS.

CONSTRUCTION SEQUENCE

ARRANGE AND ATTEND A PRECONSTRUCTION MEETING WITH THE CITY FLAG OR FENCE CLEARING LIMITS.

3. CALL ONE-CALL UTILITY LOCATE SERVICE PRIOR TO ANY EXCAVATION 4. USE EXISTING DRIVEWAY FOR STABILIZED CONSTRUCTION ENTRANCE. 5. INSTALL PERIMETER PROTECTION (SILT FENCE, BRUSH BARRIER, ETC.). RECONSTRUCT DRIVEWAY AND CONSTRUCT OTHER SITE IMPROVEMENTS.

MAINTAIN EROSION CONTROL MEASURES IN ACCORDANCE WITH CITY STANDARDS AND MANUFACTURER'S RECOMMENDATIONS. 8. MAINTAIN ACCESS TO OFF-SITE ROADS AND DRIVEWAYS AT ALL TIMES DURING THE DURATION OF THE PROJECT.

9. RELOCATE EROSION CONTROL MEASURES OR INSTALL NEW MEASURES SO THAT AS SITE CONDITIONS CHANGE THE EROSION AND SEDIMENT CONTROL IS ALWAYS IN ACCORDANCE WITH THE CITY TESC MINIMUM REQUIREMENTS. 10. COVER ALL AREAS THAT WILL BE UNWORKED FOR MORE THAN SEVEN DAYS DURING THE DRY SEASON OR TWO DAYS DURING THE WET SEASON

WITH STRAW, WOOD FIBER MULCH, COMPOST, PLASTIC SHEETING OR EQUIVALENT. 11. STABILIZE ALL AREAS THAT REACH FINAL GRADE WITHIN SEVEN DAYS. 12. SEED OR SOD ANY AREAS TO REMAIN UNWORKED FOR MORE THAN 30

13. UPON COMPLETION OF THE PROJECT, ALL DISTURBED AREAS MUST BE STABILIZED AND BMPS REMOVED IF APPROPRIATE AFTER ACCEPTANCE BY

PROJECT CONTACTS:

SARA & THOMAS TRUMBLE 4602 E. MERCER WAY MERCER ISLAND WA 98040

ARCHITECT SUZANNE ZAHR, INC. 2441 76TH AVE SE, SUITE 160 MERCER ISLAND, WASHINGTON 98040 206.354.1567 CONTACT: SUZANNE ZAHR

SZ@SUZANNEZAHR.COM CIVIL ENGINEER D.R. STRONG CONSULTING ENGINEERS, INC. 620 7TH AVE NE

KIRKLAND, WASHINGTON 98033 425.827.3063 CONTACT: YOSHIO L. PIEDISCALZI, P.E. YOSHIO.PIEDISCALZI@DRSTRONG.COM

SURVEYOR

TERRANE 10801 MAIN ST, SUITE 102 BELLEVUE, WASHINGTON 98004 *425.458.4488* CONTACT: DANNY SLAGER, P.L.S. SHEET INDEX:

PROJECT NO.: 20105

DRAWING: C1 SHEET: **1** OF **3**

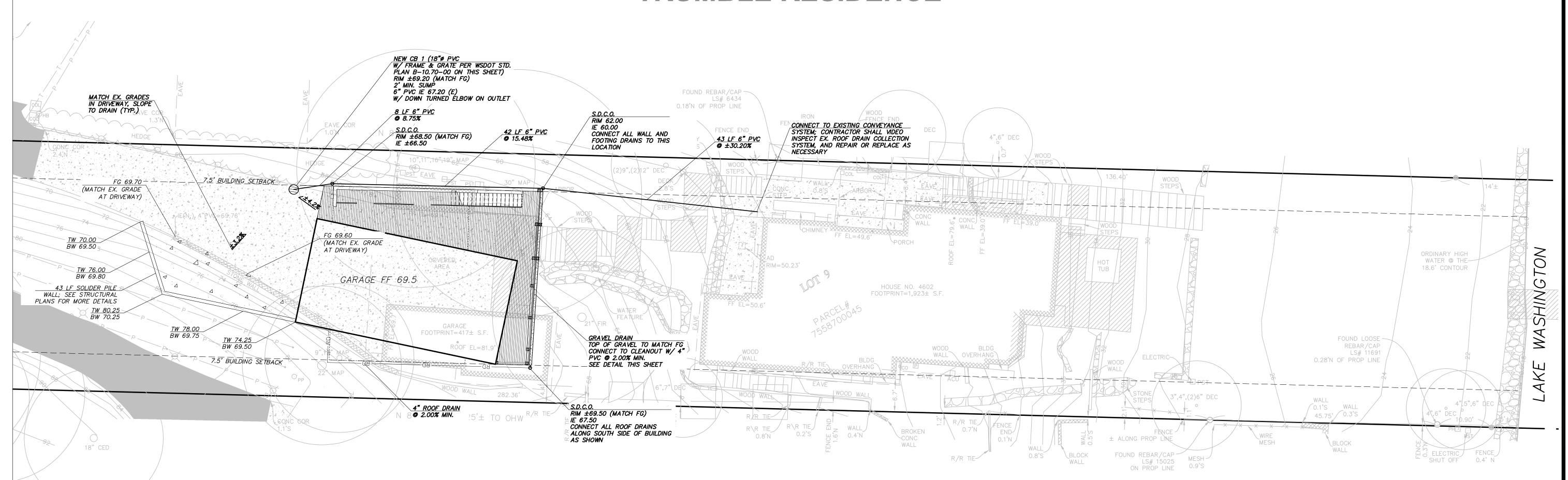
DRAFTED BY: YLP

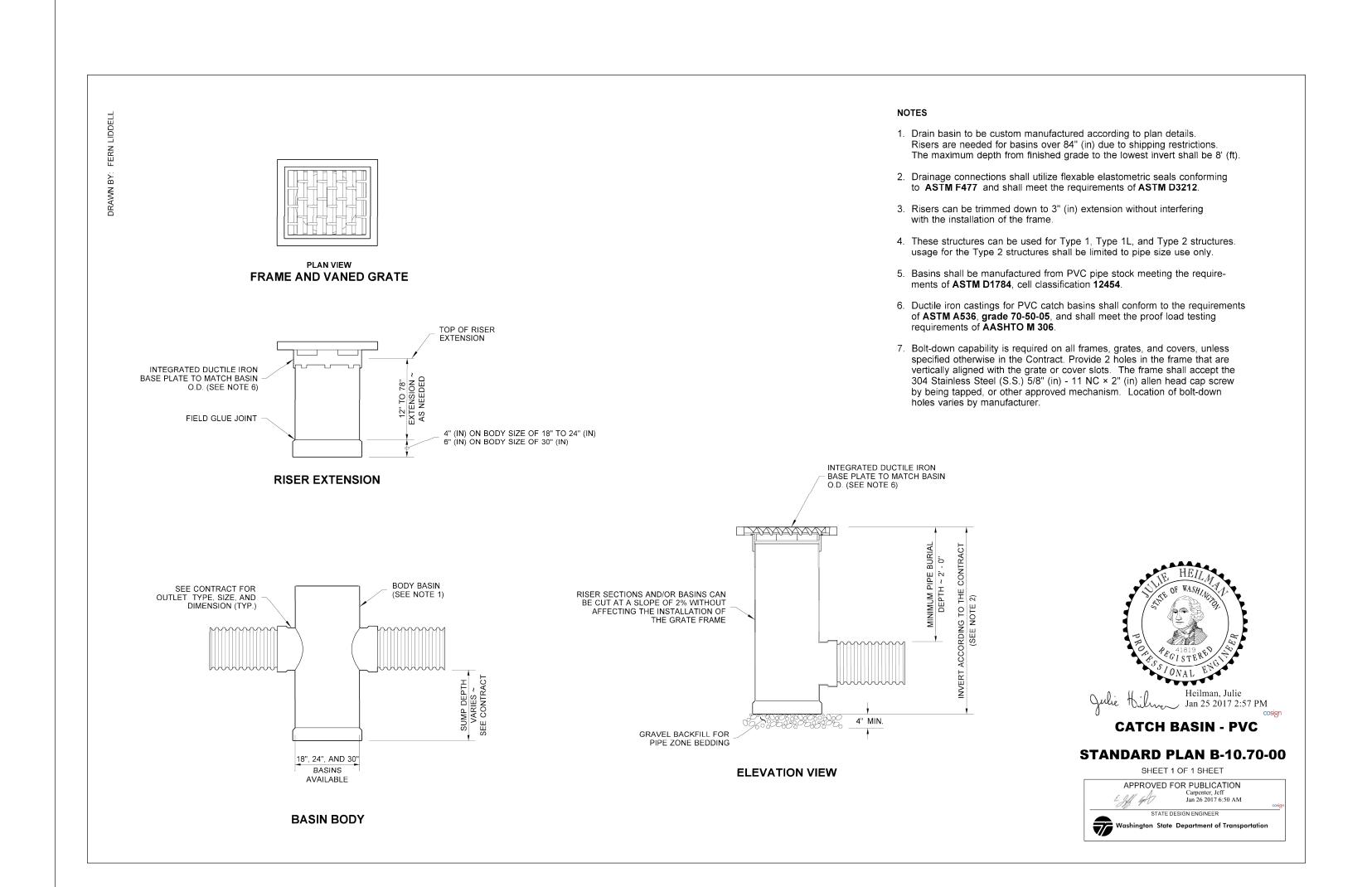
DESIGNED BY: YLP

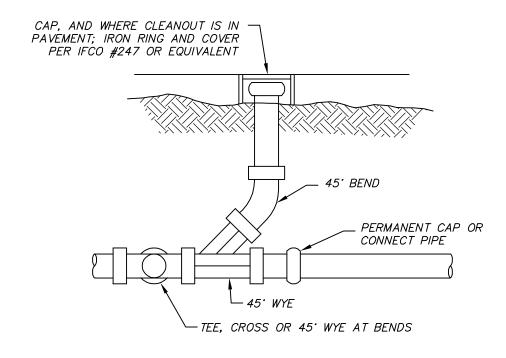
DATE: **11.05.20**

PROJECT ENGINEER: YLP

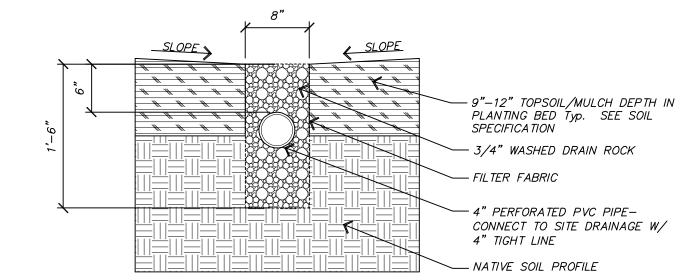
TRUMBLE RESIDENCE







STORM DRAIN CLEAN—OUT



GRAVEL DRAIN

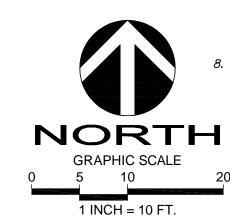
WATER SERVICE:

1. EX. 1" WATER SERVICE & METER TO REMAIN.

WITHIN 3' OF THE BUILDING.

SIDE SEWER NOTE:

1. CONTRACTOR SHALL VERIFY LOCATION OF EX. SIDE SEWER PRIOR TO CONSTRUCTION & INSTALL A BACKWATER VALVE



PER LANDSCAPE ARCHITECT

AREAS NOTE:

(AREAS SHOWN BELOW FOR PURPOSES OF DRAINAGE REPORT ONLY, SEE ARCHITECTURAL SHEETS A1.0 & A1.1 FOR DETAILED LOT COVERAGE DIAGRAM AND BREAKDOWN FOR ZONING CODE COMPLIANCE)

LOT AREA: ±30,726 S.F. (±0.705 ACRES) NET LOT AREA: ±26,764 (MINUS 3,962 SF ACCESS EASEMENT)

TOTAL PROPOSED IMPERVIOUS AREAS:

ROOF (TO REMAIN) 2,330 S.F.

ROOF (TO BE REMOVED) 1,246 S.F.

DRIVEWAY (TO BE REMAIN) 887 S.F.

DRIVEWAY (TO BE REMOVED) 340 S.F.

TOTAL EXISTING IMPERVIOUS 4,803 S.F. (18%)

TOTAL IMPERVIOUS REMOVED 1,586 S.F.

 GARAGE ROOF (NEW)
 1,278
 S.F.

 DRIVEWAY (NEW)
 244
 S.F.

 TOTAL PROPOSED IMPERVIOUS
 4,739
 S.F. (17.7%)

PROPOSED HARDSCAPE AREAS:

ROCKERIES (TO REMAIN) 530 S.F.

RETAINING WALLS (TO REMAIN) 6 S.F.

RETAINING WALLS (TO BE REMOVED) 53 S.F.

WOOD WALLS (TO REMAIN) 42 S.F.

SITE STAIRS (TO REMAIN) 219 S.F.
DECKING (TO REMAIN) 463 S.F.
DECKING (TO BE REMOVED) 92 S.F.
CONCRETE WALKWAYS (TO REMAIN) 305 S.F.
TOTAL EXISTING HARDSCAPE 1,710 S.F. (6.3%)

TOTAL PROPOSED HARDSCAPE 1,869 S.F. (7%)

TOTAL HARDSCAPE TO BE REMOVED 145 S.F.

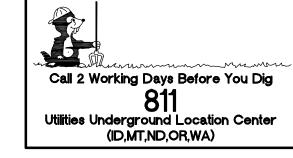
ROCKERIES/SITE WALLS (NEW) 29 S.F.

SITE STAIRS/DECKING (NEW) 275 S.F.

GENERAL NOTES:

- SITE PLAN PER ARCHITECT PROVIDED ON 11/9/20.
 CONTRACTOR SHALL POT—HOLE LOCATION OF EXISTING UTILITIES TO BE RECONNECTED PRIOR TO BEGINNING CONSTRUCTION. NOTIFY ENGINEER OF
- CONTRACTOR TO VERIFY CONDITION AND GOOD WORKING ORDER OF ALL EXISTING UTILITIES TO BE RECONNECTED OR RE-USED PRIOR TO START OF CONSTRUCTION.
 WALL/ FOOTING DRAINAGE SYSTEM AND ROOF DOWNSPOUT SYSTEM SHALL
- 4. WALL/ FOOTING DRAINAGE SYSTEM AND ROOF DOWNSPOUT SYSTEM SHALL NOT BE INTERCONNECTED UNLESS SUCH CONNECTION IS MADE AT LEAST ONE FOOT BELOW THE WALL/FOOTING DRAINAGE SYSTEM AND DOWN SLOPE OF THE WALL/BUILDING FOUNDATION.
- 4. USE SAND COLLARS AT CB CONNECTIONS TO PVC PIPE.
- 5. AREA DRAINS ARE NYLOPLAST 8" PVC BASINS WITH DROP IN GRATES PER DETAIL ON SHEET C3 OR EQUAL.
- 6. SLEEVE ALL PIPES UNDER/THROUGH WALLS.
 7. EXISTING UTILITY LOCATIONS SHOWN HEREON ARE APPROXIMATE ONLY. IT SHALL BE THE CONTRACTOR'S RESPONSIBILITY TO DETERMINE THE EXACT VERTICAL AND HORIZONTAL LOCATION OF ALL EXISTING UNDERGROUND UTILITIES PRIOR TO COMMENCING CONSTRUCTION. NO REPRESENTATION IS MADE THAT ALL EXISTING UTILITIES ARE SHOWN HEREON. THE ENGINEER ASSUMES NO RESPONSIBILITY FOR UTILITIES SHOWN, OR NOT SHOWN IN THEIR PROPER LOCATION.

8. ALWAYS CALL 811 TWO WORKING DAYS BEFORE YOU DIG.

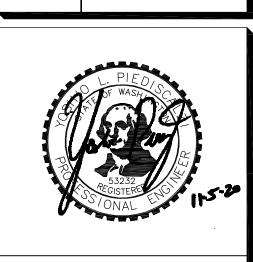


D.R. STRONG

CONSULTING ENGINEERS
ENGINEERS PLANNERS SURVEYORS
620 - 7th AVENUE KIRKLAND, WA 98033
O 425.827.3063 F 425.827.2423

DRAINAGE PLAN
4602 EAST MERCER WAY

2441 76TH AVE SE, SUITE 160 MERCER ISLAND, WA 98040



APR

REVISION

DRAFTED BY: YLP
DESIGNED BY: YLP

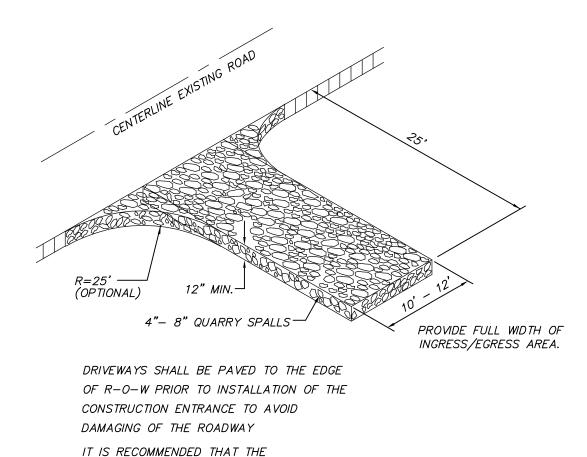
PROJECT ENGINEER: YLP

PROJECT NO.: **20105**DRAWING: **C2**

SHEET: 2 OF 3

DATE: **11.05.20**

TRUMBLE RESIDENCE



GRAVEL CONSTRUCTION ENTRANCE

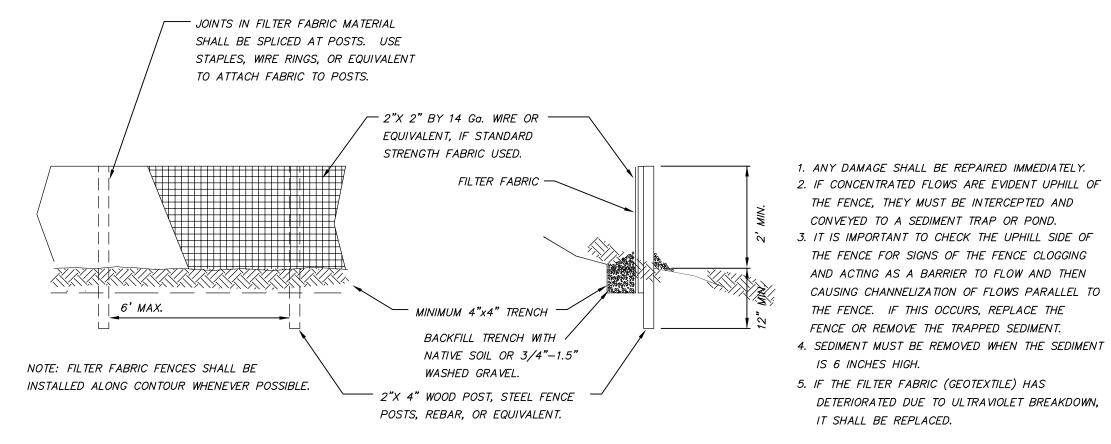
ENTRANCE BE CROWNED SO THAT

RUNOFF DRAINS OFF THE PAD

Crown drip line or other limit of Tree Protection area. See 1. No pruning shall be performed unless under the direction of an arborist. 2. No equipment shall be stored or operated inside the protective fencing including during fence installation and removal. 3. No storage of materials shall occur inside the protective fencing.

4. Refer to Site/Utility Plan for any modifications to the Tree Protection Area. 5. Unauthorized activities in tree protection area may require evaluation by private arborist to identify impacts and mitigation required. 6. Exposed Roots: For roots >1" damaged during construction, make a clean straight cut to removed damaged portion and inform city arborist. fence: High density with 3.5" x 1.5" orange. Steel posts 2" x 6' steel posts or approved equal. plastic spaced KEEP OUT TREE along the fence. layer of mulch. PROTECTION Maintain existing AREA protection fence unless otherwise indicated on the SECTION VIEW

TREE PROTECTION FENCING



SILT FENCE DETAIL

GRATE — - STANDARD STRENGTH FILTER FABRIC *FILTERED* WA TER BASIN

NOTE: ONLY TO BE USED WHERE PONDING OF WATER ABOVE THE CATCH BASIN WILL NOT CAUSE TRAFFIC PROBLEMS AND WHERE OVERFLOW WILL NOR RESULT IN EROSION OF SLOPES.

THE FENCE, THEY MUST BE INTERCEPTED AND

THE FENCE FOR SIGNS OF THE FENCE CLOGGING

DETERIORATED DUE TO ULTRAVIOLET BREAKDOWN,

IS 6 INCHES HIGH.

IT SHALL BE REPLACED.

CATCH BASIN INSERT MAINTENANCE STANDARDS

- 1. ANY ACCUMULATED SEDIMENT ON OR AROUND THE FILTER FABRIC PROTECTION SHALL BE REMOVED IMMEDIATELY. SEDIMENT SHALL NOT BE REMOVED WITH WATER, AND ALL SEDIMENT MUST BE DISPOSED OF AS FILL ON SITE OR HAULED OFF SITE.
- 2. ANY SEDIMENT IN THE CATCH BASIN INSERT SHALL BE REMOVED WHEN THE SEDIMENT HAS FILLED ONE—THIRD OF THE AVAILABLE STORAGE.
 THE FILTER MEDIA FOR THE INSERT SHALL BE CLEANED OR REPLACED AT
- 3. REGULAR MAINTENANCE IS CRITICAL FOR BOTH FORMS OF CATCH BASINS PROTECTION. UNLIKE MANY FORMS OF PROTECTION THAT FAIL GRADUALLY, CATCH BASIN PROTECTION WILL FAIL SUDDENLY AND COMPLETELY IF NOT MAINTAINED PROPERLY.

CATCH BASIN INLET FILTER

2"-4" MULCH 3/4" OF COMPOST INCORPORATED INTO SOIL INCORPORATED INTO TO 8" DEPTH OR 8" OF SOIL TO 8" DEPTH OR IMPORT TOPSOIL 8" OF IMPORT TOPSOIL SUBSOIL SCARIFIED 4" BELOW SUBSOIL SCARIFIED 4" BELOW COMPOST AMENDED LAYER (12" COMPOST AMENDED LAYER (12" BELOW SOIL SURFACE), OR AS BELOW SOIL SURFACE), OR AS DETERMINED BY THE CITY

AMENDMEN7

SOIL AMENDMENT NOTES

SOIL RETENTION: RETAIN, IN AN UNDISTURBED STATE, THE DUFF LAYER AND NATIVE TOPSOIL TO MAXIMUM EXTENT PRACTICABLE. IN ANY AREAS REQUIRING GRADING REMOVE AND STOCKPILE THE DUFF LAYER AND TOPSOIL ON SITE IN A DESIGNATED, CONTROLLED AREA, NOT ADJACENT TO PUBLIC RESOURCES AND CRITICAL AREAS, TO BE REAPPLIED TO OTHER PORTIONS OF THE SITE WHERE FEASIBLE.

*SOIL QUALITY: ALL AREAS SUBJECT TO CLEARING AND GRADING THAT HAVE NOT BEEN COVERED BY IMPERVIOUS SURFACE, INCORPORATED INTO A DRAINAGE FACILITY OR ENGINEERED AS STRUCTURAL FILL OR SLOPE SHALL, AT PROJECT COMPLETION, DEMONSTRATE THE FOLLOWING:

- 1. A TOPSOIL LAYER WITH A MINIMUM ORGANIC MATTER CONTENT OF 10% DRY WEIGHT IN PLANTING BEDS, AND 5% ORGANIC MATTER CONTENT IN TURF AREAS, AND A PH FROM 6.0 TO 8.0 OR MATCHING THE PH OF THE UNDISTURBED SOIL. THE TOPSOIL LAYER SHALL HAVE A MINIMUM DEPTH OF EIGHT INCHES EXCEPT WHERE TREE ROOTS LIMIT THE DEPTH OF INCORPORATION OF AMENDMENTS NEEDED TO MEET THE CRITERIA. SUBSOILS BELOW THE TOPSOIL LAYER SHOULD BE SCARIFIED AT LEAST 4 INCHES WITH SOME INCORPORATION OF THE UPPER MATERIAL TO AVOID STRATIFIED LAYERS, WHERE FEASIBLE.
- 2. MULCH PLANTING BEDS WITH 2-4 INCHES OF ORGANIC MATERIAL 3. USE COMPOST AND OTHER MATERIALS THAT MEET THESE ORGANIC CONTENT REQUIREMENTS: A. THE ORGANIC CONTENT FOR "PRE-APPROVED" AMENDMENT RATES CAN BE MET ONLY USING COMPOST MEETING THE COMPOST SPECIFICATION FOR BIORETENTION (BMP T7.30), WITH THE EXCEPTION THAT THE COMPOST MAY HAVE UP TO 35% BIOSOLIDS OR MANURE. THE COMPOST MUST ALSO HAVE AN ORGANIC MATTER CONTENT OF 40% TO 65%, AND A CARBON TO NITROGEN RATIO BELOW 25:1. THE CARBON TO NITROGEN RATIO MAY BE AS HIGH AS 35:1 FOR PLANTINGS COMPOSED ENTIRELY OF PLANTS NATIVE TO THE PUGET SOUND LOWLANDS REGION.
- B. CALCULATED AMENDMENT RATES MAY BE MET THROUGH USE OF COMPOSTED MATERIAL MEETING (A.) ABOVE; OR OTHER ORGANIC MATERIALS AMENDED TO MEET THE CARBON TO NITROGEN RATIO REQUIREMENTS, AND NOT EXCEEDING THE CONTAMINANT LIMITS IDENTIFIED IN TABLE 220-B, TESTING PARAMETERS, IN WAC 173-350-220. THE RESULTING SOIL SHOULD BE CONDUCIVE TO THE TYPE OF VEGETATION TO BE ESTABLISHED.

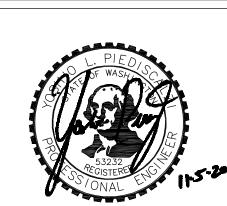
*IMPLEMENTATION OPTIONS: THE SOIL QUALITY DESIGN GUIDELINES LISTED ABOVE CAN BE MET BY USING ONE OF THE METHODS LISTED BELOW:

- 1. LEAVE UNDISTURBED NATIVE VEGETATION AND SOIL, AND PROTECT FROM COMPACTION DURING
- 2. AMEND EXISTING SITE TOPSOIL OR SUBSOIL EITHER AT DEFAULT "PRE-APPROVED" RATES, OR AT CUSTOM CALCULATED RATES BASED ON TESTS OF THE SOIL AND AMENDMENT.
- 3. STOCKPILE EXISTING TOPSOIL DURING GRADING, AND REPLACE IT PRIOR TO PLANTING. STOCKPILED TOPSOIL MUST ALSO BE AMENDED IF NEEDED TO MEET THE ORGANIC MATTER OR DEPTH REQUIREMENTS, EITHER AT A DEFAULT "PRE-APPROVED" RATE OR AT A CUSTOM CALCULATED RATE. 4. IMPORT TOPSOIL MIX OF SUFFICIENT ORGANIC CONTENT AND DEPTH TO MEET THE REQUIREMENTS.
- MORE THAN ONE METHOD MAY BE USED ON DIFFERENT PORTIONS OF THE SAME SITE. SOIL THAT ALREADY MEETS THE DEPTH AND ORGANIC MATTER QUALITY STANDARDS, AND IS NOT COMPACTED, DOES NOT NEED

MAINTENANCE: *ESTABLISH SOIL QUALITY AND DEPTH TOWARD THE END OF CONSTRUCTION AND ONCE ESTABLISHED, PROTECT FROM COMPACTION, SUCH AS FROM LARGE MACHINERY USE, AND FROM EROSION. PLANT VEGETATION AND MULCH THE AMENDED SOIL AREA AFTER INSTALLATION. *LEAVE PLANT DEBRIS OR ITS EQUIVALENT ON THE SOIL SURFACE TO REPLENISH ORGANIC MATTER. *REDUCE AND ADJUST, WHERE POSSIBLE, THE USE OF IRRIGATION, FERTILIZERS, HERBICIDES AND PESTICIDES, RATHER THAN CONTINUING TO IMPLEMENT FORMERLY ESTABLISHED PRACTICES.

D.R. STRONG

CONSULTING ENGINEERS ENGINEERS PLANNERS SURVEYORS 620 - 7th AVENUE KIRKLAND, WA 98033 O 425.827.3063 F 425.827.2423



DRAFTED BY: YLP DESIGNED BY: YLP

PROJECT ENGINEER: YLP

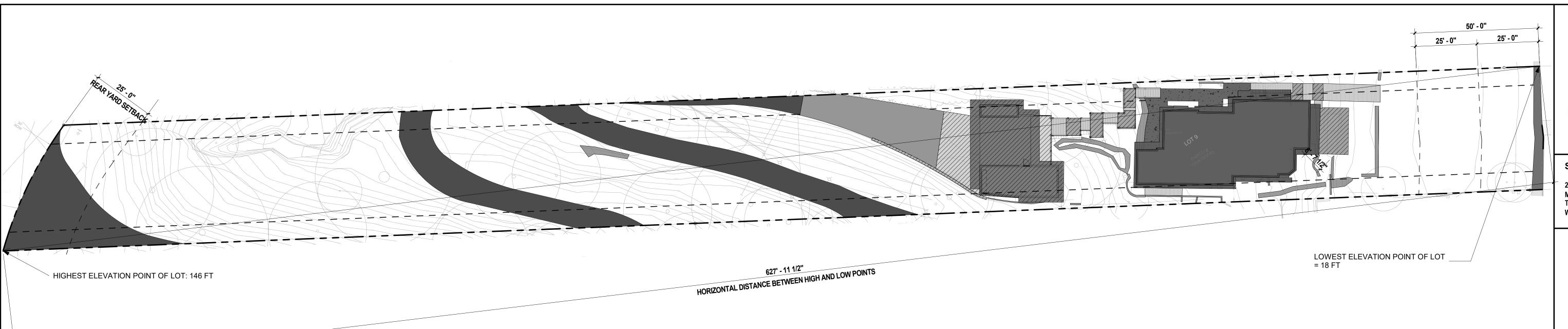
PROJECT NO.: **20105** DRAWING: **C3**

SHEET: **3** OF **3**

DATE: **11.05.20**

 $R: \2020\1\20105\3\Drawings\Plots\Engineering\03-3DET20105.dwg11/13/2020$ 8: 54: 54 AM COPYRIGHT © 2018, D.R. STRONG CONSULTING ENGINEERS INC.

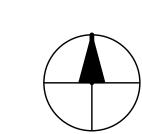
SUZANNE ZAHR INC. 2441 SE 76TH AVE, SUITE 160 MERCER ISLAND, WASHINGTON 98040 T. 206 354 1567 WWW.SUZANNEZAHR.COM DADU ENTRANCE -TREE TO BE REMOVED 10",11",16",19" MAP **GATED ENTRY** 25' - 0" 25' - 0" TREE TO BE REMOVED PROPOSED TREES PROPOSED TREES -30" MAP **EXISTING STAIRS** NORTH PROPERTY LINE: N 88°31'19" W 599'± TO OHW **EXISTING HOUSE** DRIVEWAY ROOF AREA =2,330 SF NEW ACCESSORY ROOF EL = 79.6' ROOF AREA =1,278 SF TREE TO BE REMOVED 9",13" MAP SOUTH PROPERTY LINE: N 88°31'19" W 625'± TO OHWNEW RETAINING WALL TREE TO BE PROTECTED 22" MAP PROPOSED TREES PROJECT NUMBER 20004 REGISTERED ARCHITECT SUZANNE ZAHR STATE OF WASHINGTON ISSUED / REVISIONS DATE OWNER'S NAME: LOT SLOP CALCULATION: DETACHED ACCESSORY AVERAGE BUILDING HEIGHT HIGHEST ELEVATION POINT OF LOT: 146 FT **CALCULATIONS:** SARA TRUMBLE LOWEST ELEVATION POINT OF LOT: 18 FT A = 3.9' L X 68.02' H = 265.3 THOMAS TRUMBLE B = 30.5' X 68.2' H = 2,080.1 ELEVATION DIFFERENCE: 128 FT HORIZONTAL DISTANCE BETWEEN HIGH AND LOW C = 21.25' L X 69.6' H = 1,479 POINTS: 628 FT D = 41.16' X 69.72' = 2,869.7 SITE AND OWNERS ADDRESS: LOT SLOPE" 20 % 4602 E MERCER WAY E = 21.25' L X 69.5' H = 1,476.9 MERCER ISLAND, WA 98040 F= 41.16' X 69.5' H = 2,860.6 TOTAL WALL SEGMENT LENGTH = 159.22' EXISTING MAIN HOUSE: (BASED ON KING COUNTY) AVERAGE BUILDING HEIGHT = 11,031.6/ 159.22 = 69.3' 1ST FLOOR = 1,600 SF MAX. BUILDING HEIGHT = 69.3' +30 = 99.30' LEGAL DISCRIPTION: 1/2 FLOOR = 460 SF LEGAL DISCRIPTION: 2ND FLOOR = 1,080 SF FINISH BASEMENT = 300 SF SANDY BEACH TRS UNREC & SH LDS ADJ TOTAL BASEMENT = 590 SF PLat Block: TOTAL FINISHED AREA = 3,440 SF Plat Lot: 9 ASSESSOR'S PARCEL NUMBER: EXISTING DETACHED STRUCTURE FLOOR AREA: ISSUE DATE: 12.08.20 755870-0045 GARAGE & STORAGE = 491 SF DRAWN BY: **ZONE:** R-15 PROPOSED GROSS FLOOR AREA: GARAGE FLOOR = 1,009 SF CHECKED BY: DADU = 899 SF LOT COVERAGE SUMMARY: TOTAL = 1,908 SF PER MICC 19.02.020 25% of 12000 sf = 3000 sf LOT SIZE = 30,726 SF NET LOT AREA = 26,764 SF 1,908 SF < 3000 SF SITE PLAN LOT COVERAGE = 35% MAX. (9,367 SF) MAXIMUM ALLOWABLE GROSS FLOOR AREA: 12,000 SF PROPOSED GROSS FLOOR AREA: **EXISTING LOT COVERAGE:** 1,908 + 3,440 = **5,348 SF < 12000 SF** TOTAL = 4,803 SF (18% >35 %) PROPOSED: TOTAL = 4,739 SF (17.7%) SHEET NUMBER A1.0 **PERMIT SET**



SITE PLAN - LOT COVERAGE EXISTING

1" = 20'-0"

SITE PLAN - LOT COVERAGE PROPOSED



ALLOWABLE LOT COVERAGE

| TOTAL LOT AREA | 30,726 SF | |
|----------------------------------|-----------|--------|
| NET LOT AREA: (- ACCESS EASEMENT | 26,764 SF | |
| ACCESS EASEMENT: (GLENHOME ROAD | 3,962 SF | |
| ALLOWABLE LOT COVERAGE: | 35% (9,3 | 67 SF) |
| ALLOWABLE HARDSCAPE: | 9% (2,4 | 08 SF) |

LOT COVERAGE - EXISTING / DEMOLISHED/ PROPOSED

| EST GGTEIGTOF EXISTING / BEINGEIGHEB/ I IX | <u> </u> | | |
|--------------------------------------------|----------------|--------|--|
| EX. MAIN HOUSE ROOF AREA (TO REMAIN) | 2,330 SF | | |
| EX. GARAGE ROOF AREA (TO BE REMOVED) | 1,246 SF | | |
| EX. DRIVEWAY (TO REMAIN) | 887 SF | | |
| EX. DRIVEWAY (TO BE REMOVED) | 340 SF | | |
| TOTAL EXISTING IMPERVIOUS: | 4,803 SF (18%) | | |
| TOTAL IMPERVIOUS TO BE REMOVED : | 1,586 SF | | |
| GARAGE ROOF AREA (NEW) | 1,278 SF | | |
| DRIVEWAY (NEW) | 244 SF | | |
| TOTAL PROPOSED IMPERVIOUS: | 4,739 SF (| 17.7%) | |

HARDSCAPE - EXISTING / DEMOLISHED/ PROPOSED

| TOTAL PROPOSED HARDSCAPE: | 1,869 SF | (7%) |
|----------------------------------|------------|-------|
| DECKING/ CONCRETE WALKWAY: (NEW) | 275 SF | |
| ROCKERIES / SITE WALLS: (NEW) | 29 SF | |
| TOTAL HARDSCAPE TO BE REMOVED : | 145 SF | |
| TOTAL EXISTING HARDSCAPE: | 1,710 SF (| 6.3%) |
| CONCRETE WALKWAYS: (TO REMAIN) | 305 SF | 4 4 4 |
| DECKING: (TO BE REMOVED) | 92 SF | |
| DECKING: (TO REMAIN) | 463 SF | |
| SITE STAIRS: (TO REMAIN) | 219 SF | |
| WOOD WALLS: (TO REMAIN) | 42 SF | |
| RETAINING WALLS: (TO BE REMOVED) | 53 SF | |
| RETAING WALLS: (TO REMAIN) | 6 SF | |
| ROCKERIES: (TO REMAIN) | 530 SF | |

OWNER'S NAME: SARA TRUMBLE THOMAS TRUMBLE

SITE AND OWNERS ADDRESS: 4602 E MERCER WAY MERCER ISLAND, WA 98040

LEGAL DISCRIPTION: LEGAL DISCRIPTION: SANDY BEACH TRS UNREC & SH LDS ADJ PLat Block: Plat Lot: 9

ASSESSOR'S PARCEL NUMBER: 755870-0045

R-15

LOT COVERAGE SUMMARY:

LOT SIZE = 30,726 SF NET LOT AREA = 26,764 SF LOT COVERAGE = 35% MAX. (9,367 SF) **EXISTING LOT COVERAGE:** TOTAL = 4,803 SF (18% >35 %)

PROPOSED: TOTAL = 4,739 SF (17.7%) LOT SLOP CALCULATION: HIGHEST ELEVATION POINT OF LOT: 146 FT LOWEST ELEVATION POINT OF LOT: 18 FT ELEVATION DIFFERENCE: 128 FT HORIZONTAL DISTANCE BETWEEN HIGH AND LOW

POINTS: 628 FT

LOT SLOPE" 20 %

EXISTING MAIN HOUSE: (BASED ON KING COUNTY) 1ST FLOOR = 1,600 SF 1/2 FLOOR = 460 SF 2ND FLOOR = 1,080 SF FINISH BASEMENT = 300 SF TOTAL BASEMENT = 590 SF TOTAL FINISHED AREA = 3,440 SF

EXISTING DETACHED STRUCTURE FLOOR AREA: GARAGE & STORAGE = 491 SF

PROPOSED GROSS FLOOR AREA: GARAGE FLOOR = 1,009 SF DADU = 899 SF TOTAL = 1,908 SF PER MICC 19.02.020 25% of 12000 sf = 3000 sf 1,908 SF < 3000 SF

MAXIMUM ALLOWABLE GROSS FLOOR AREA: 12,000 SF PROPOSED GROSS FLOOR AREA: 1,908 + 3,440 = **5,348 SF < 12000 SF**

SUZANNE ZAHR INC.

2441 SE 76TH AVE, SUITE 160 MERCER ISLAND, WASHINGTON 98040 T. 206 354 1567 WWW.SUZANNEZAHR.COM

PROJECT NUMBER

20004

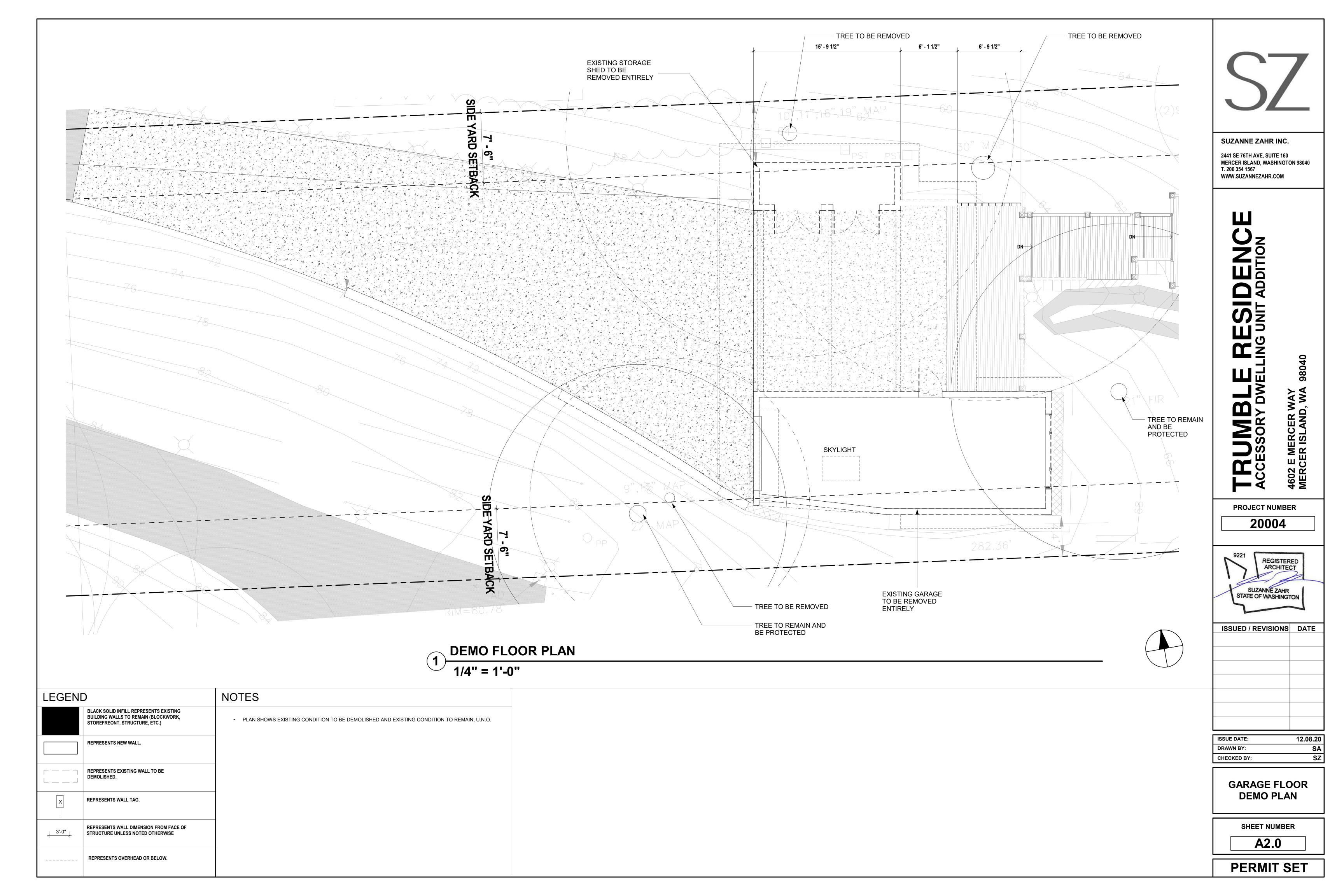
REGISTERED ARCHITECT SUZANNE ZAHR STATE OF WASHINGTON

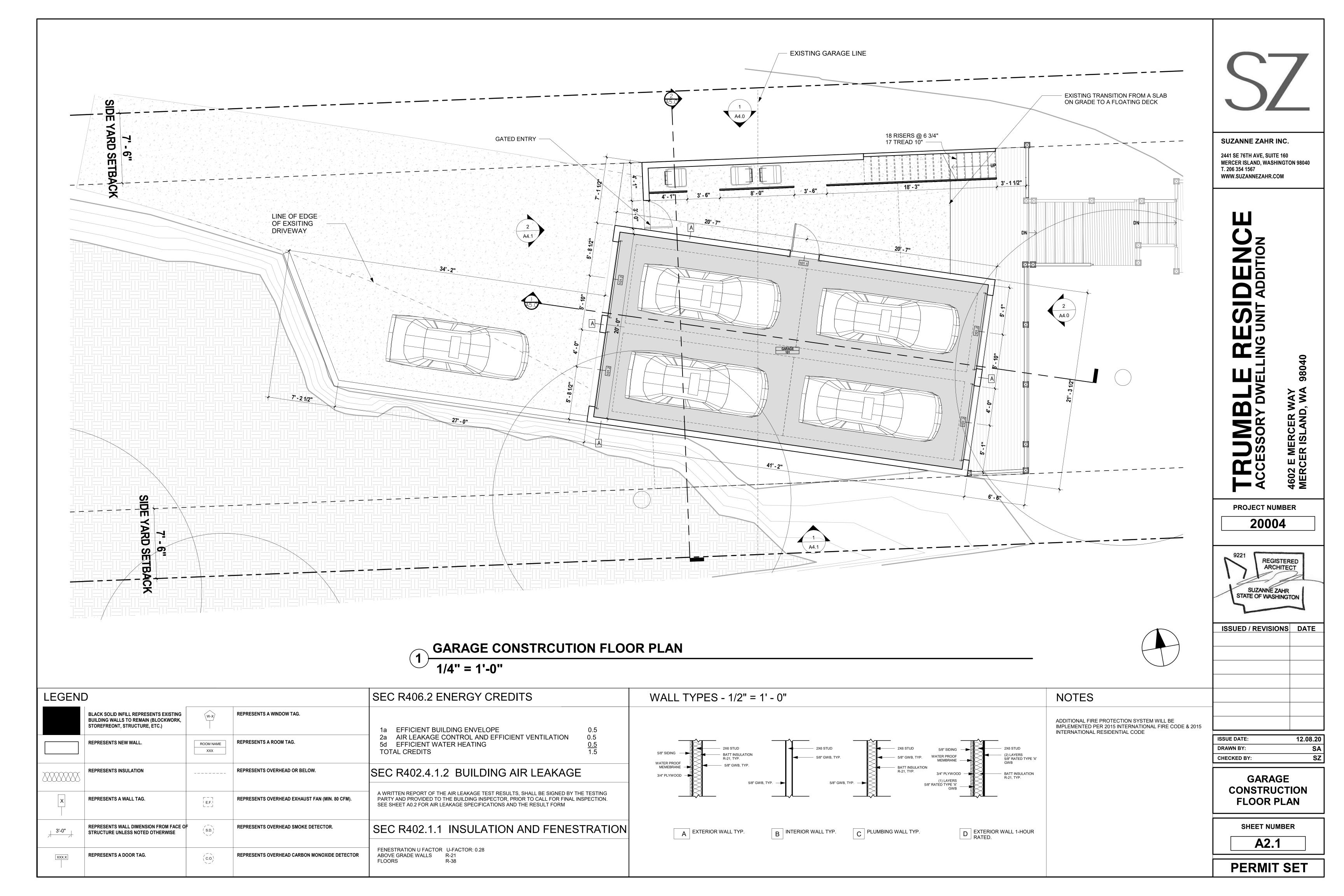
ISSUED / REVISIONS DATE

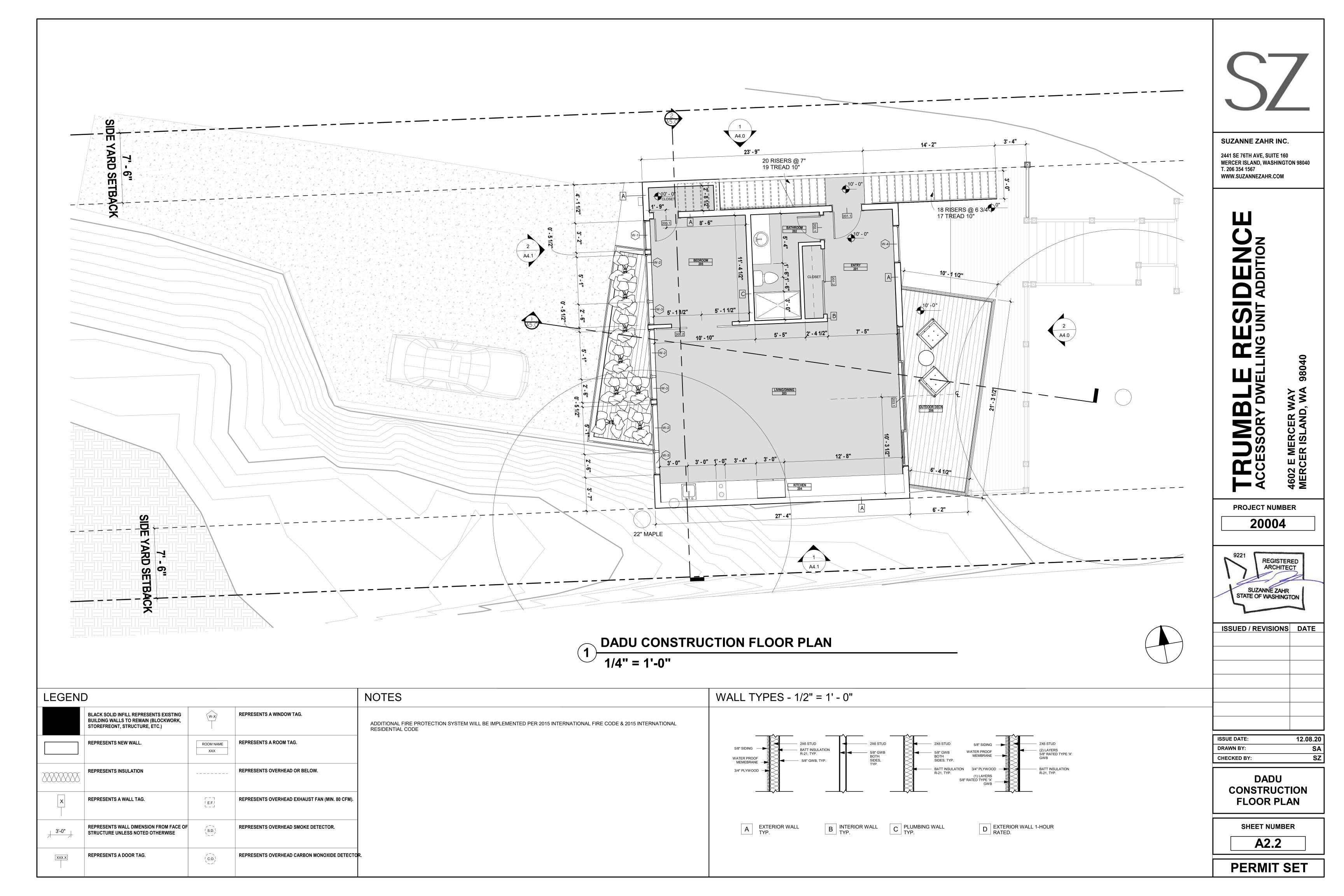
12.08.20 ISSUE DATE: DRAWN BY: CHECKED BY:

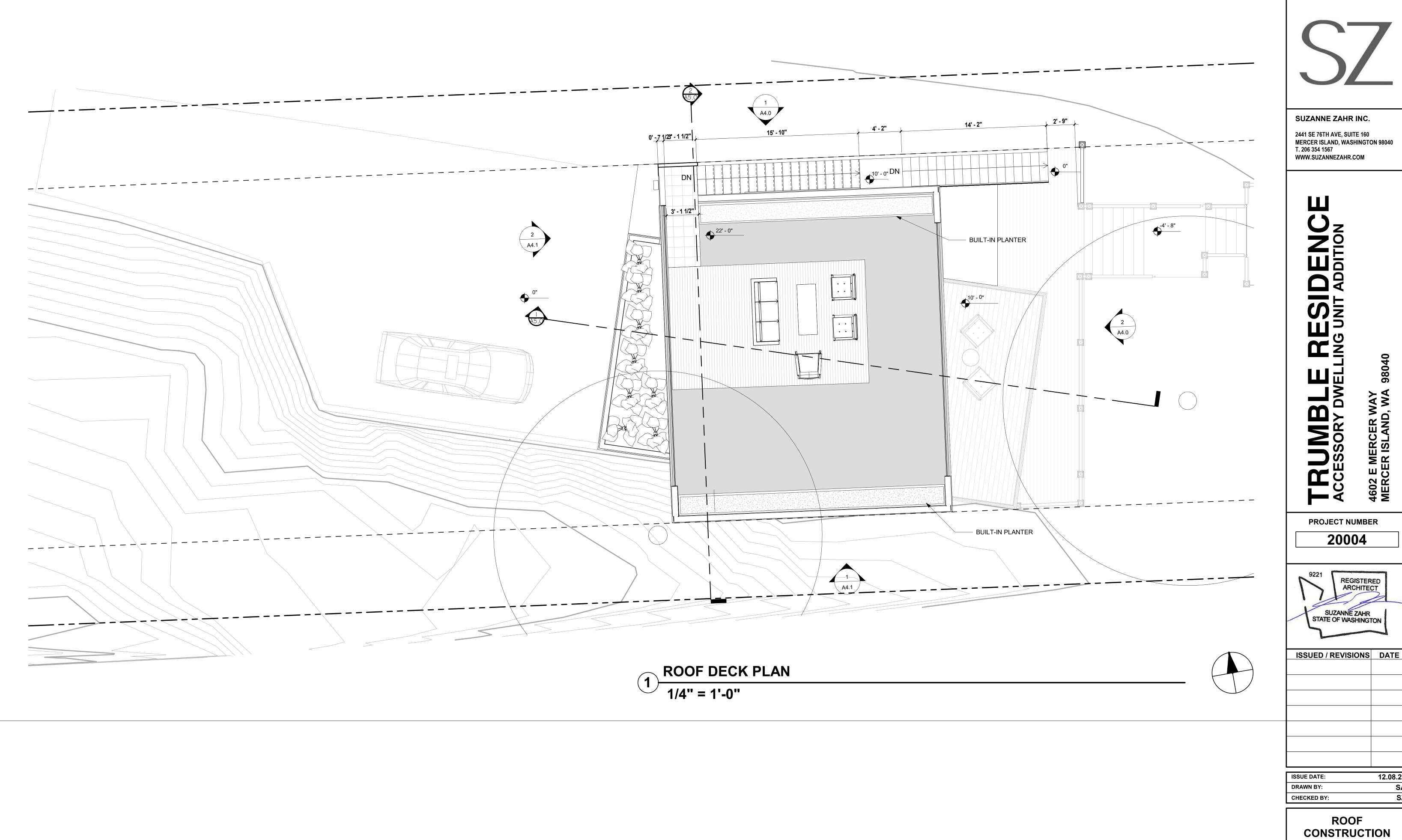
LAND USE CALCS

SHEET NUMBER **A1.1**







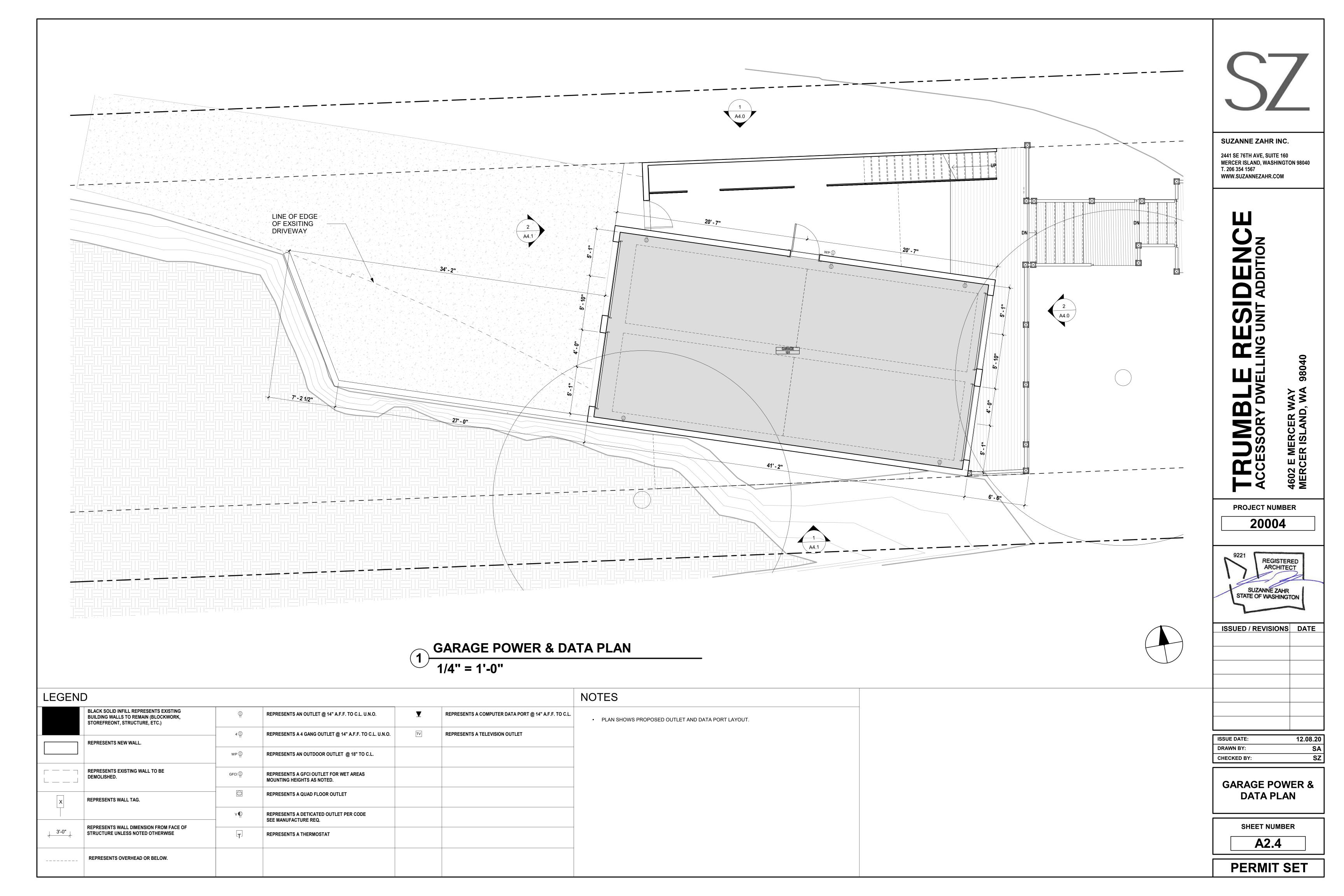


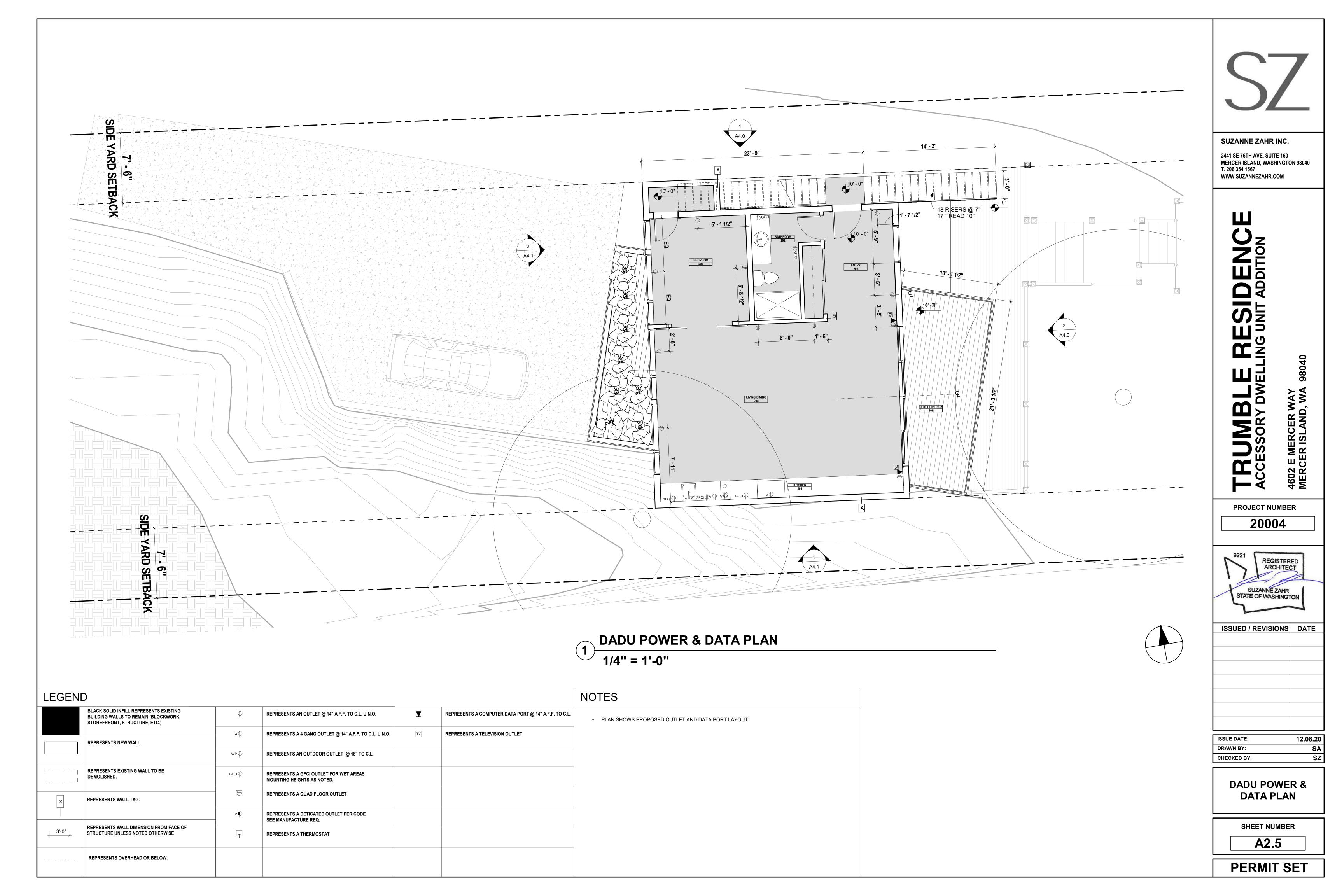
12.08.20

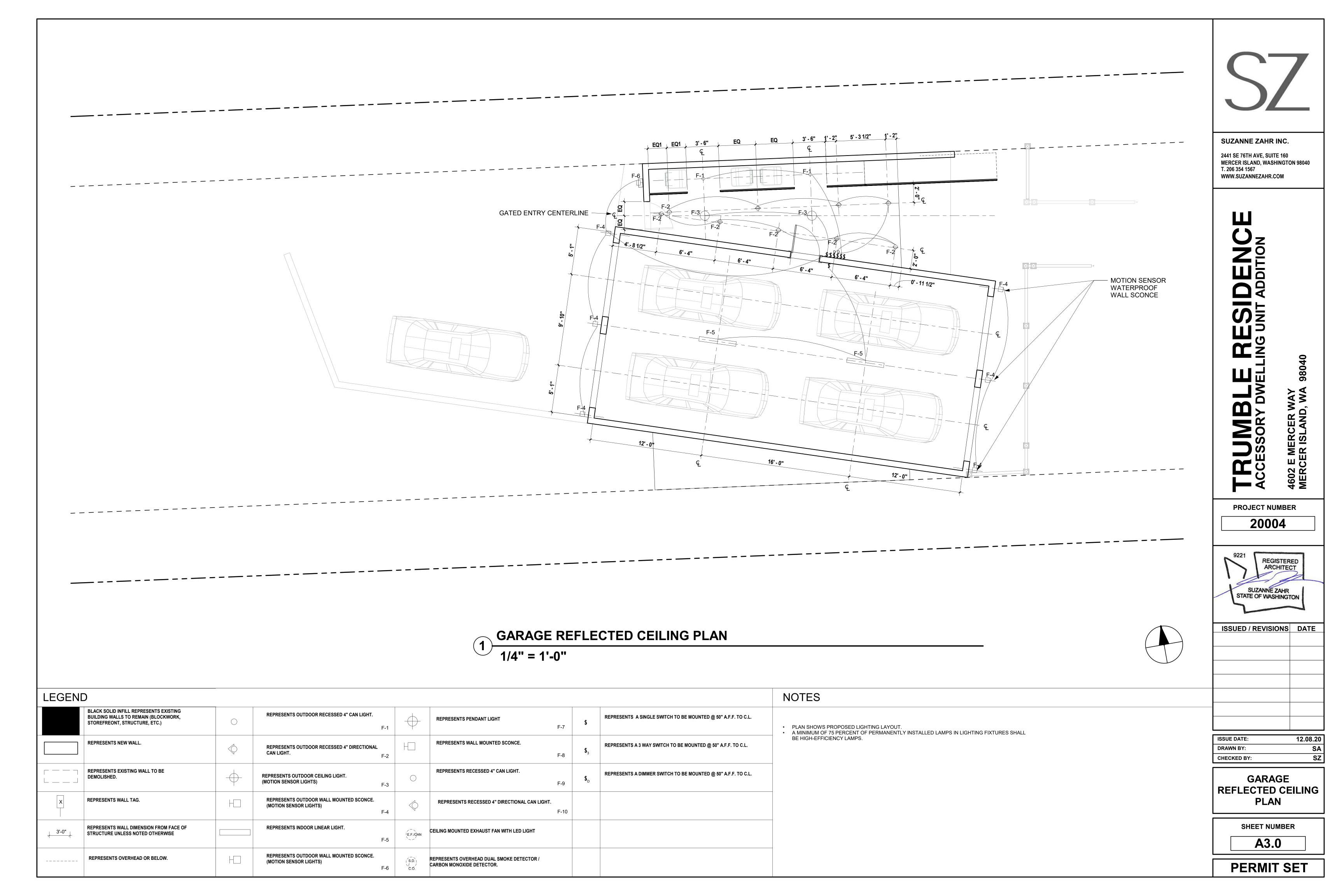
PLAN

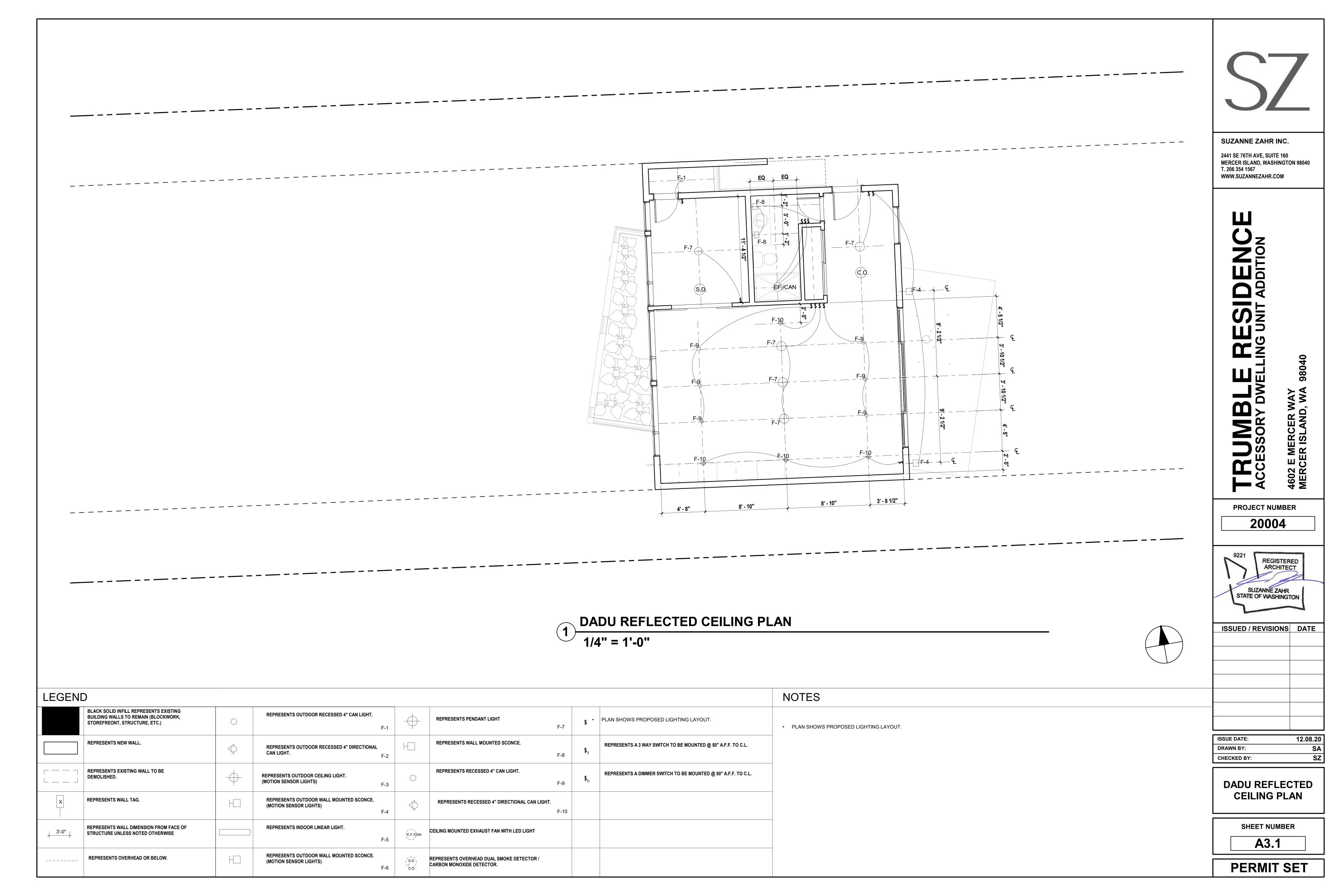
SHEET NUMBER

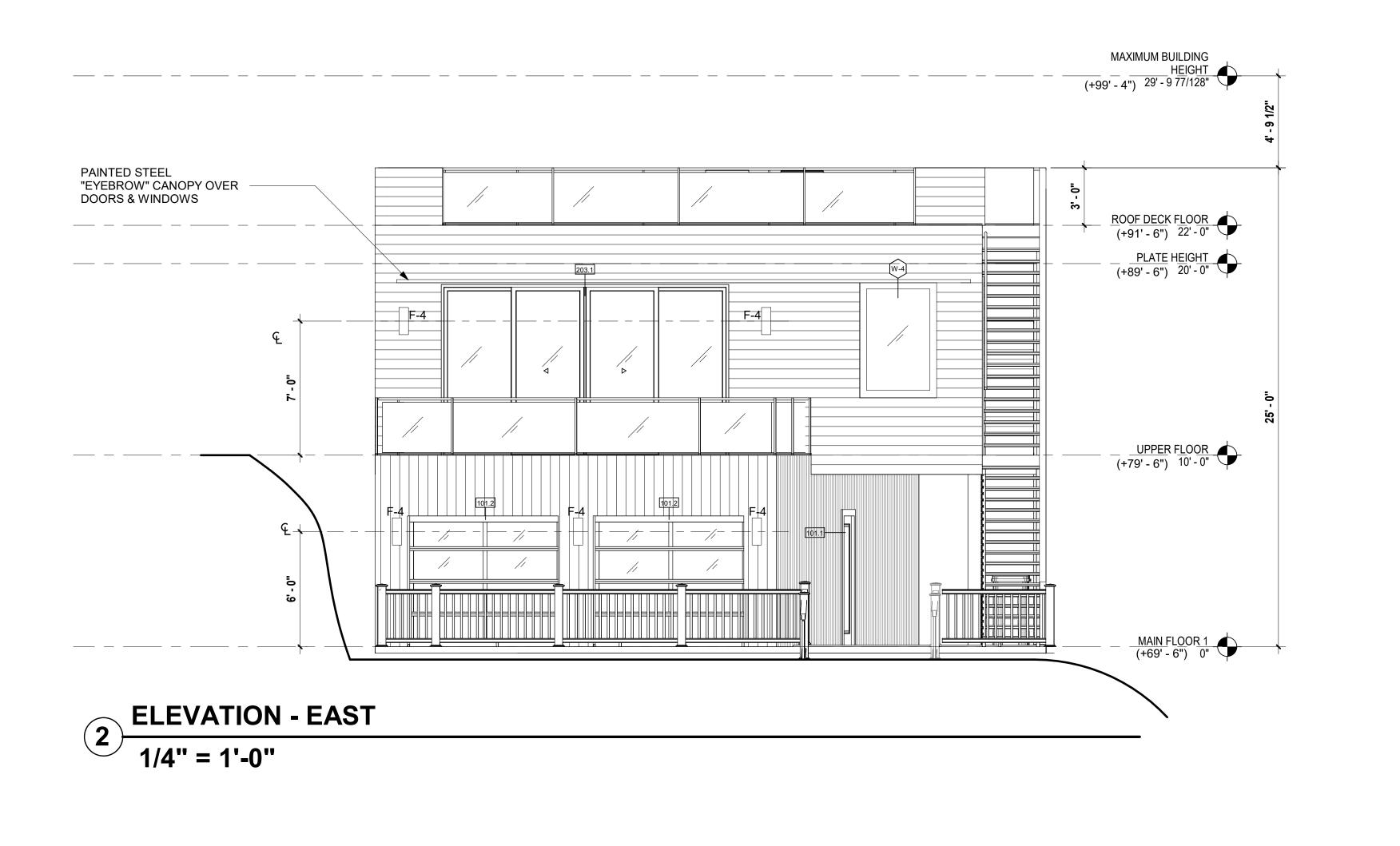
A2.3



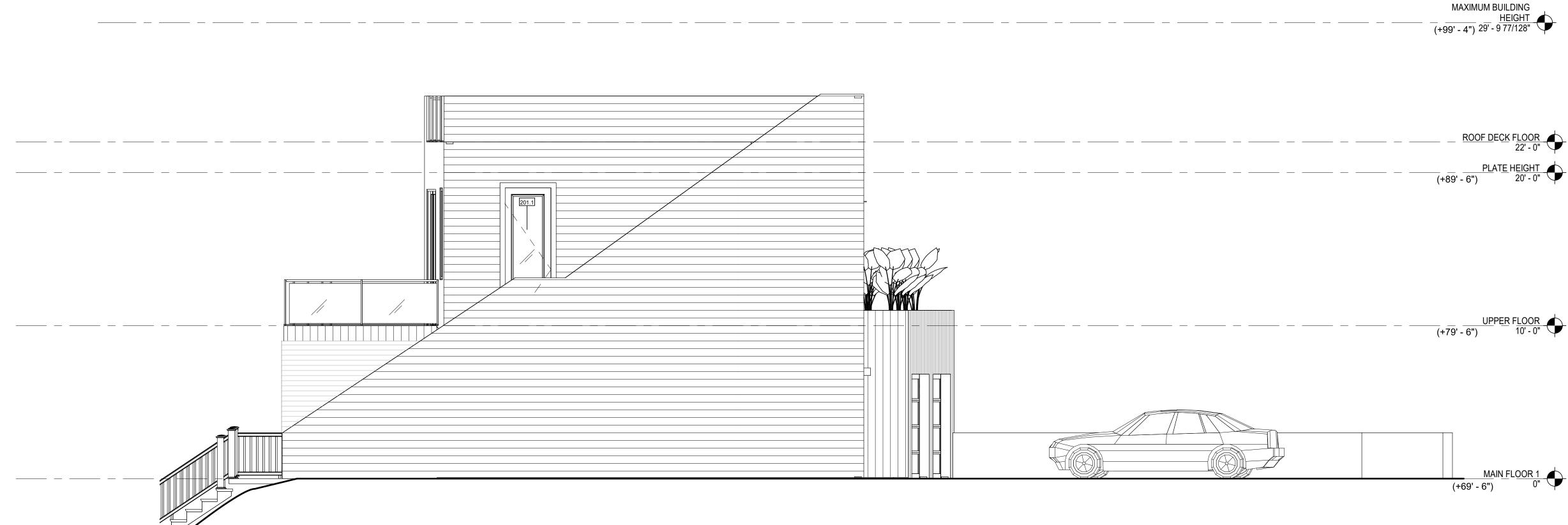








- ALL WOOD SIDING AND TRIM TO BE PAINTED TO MATCH EXISING MAIN HOUSE.
- GLASS GUARDRAIL TO MATCH EXISTING TERRACE GUARDRAILL OF MAIN HOUSE.
- WOOD DECKING, STAIRS AND RAILINGS TO MATCH EXISTING MAIN HOUSE.



ELEVATION - NORTH

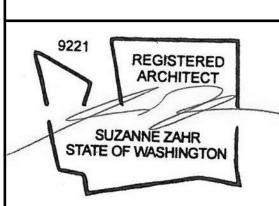
PERMIT SET

SUZANNE ZAHR INC.

2441 SE 76TH AVE, SUITE 160 MERCER ISLAND, WASHINGTON 98040 T. 206 354 1567 WWW.SUZANNEZAHR.COM

PROJECT NUMBER

20004



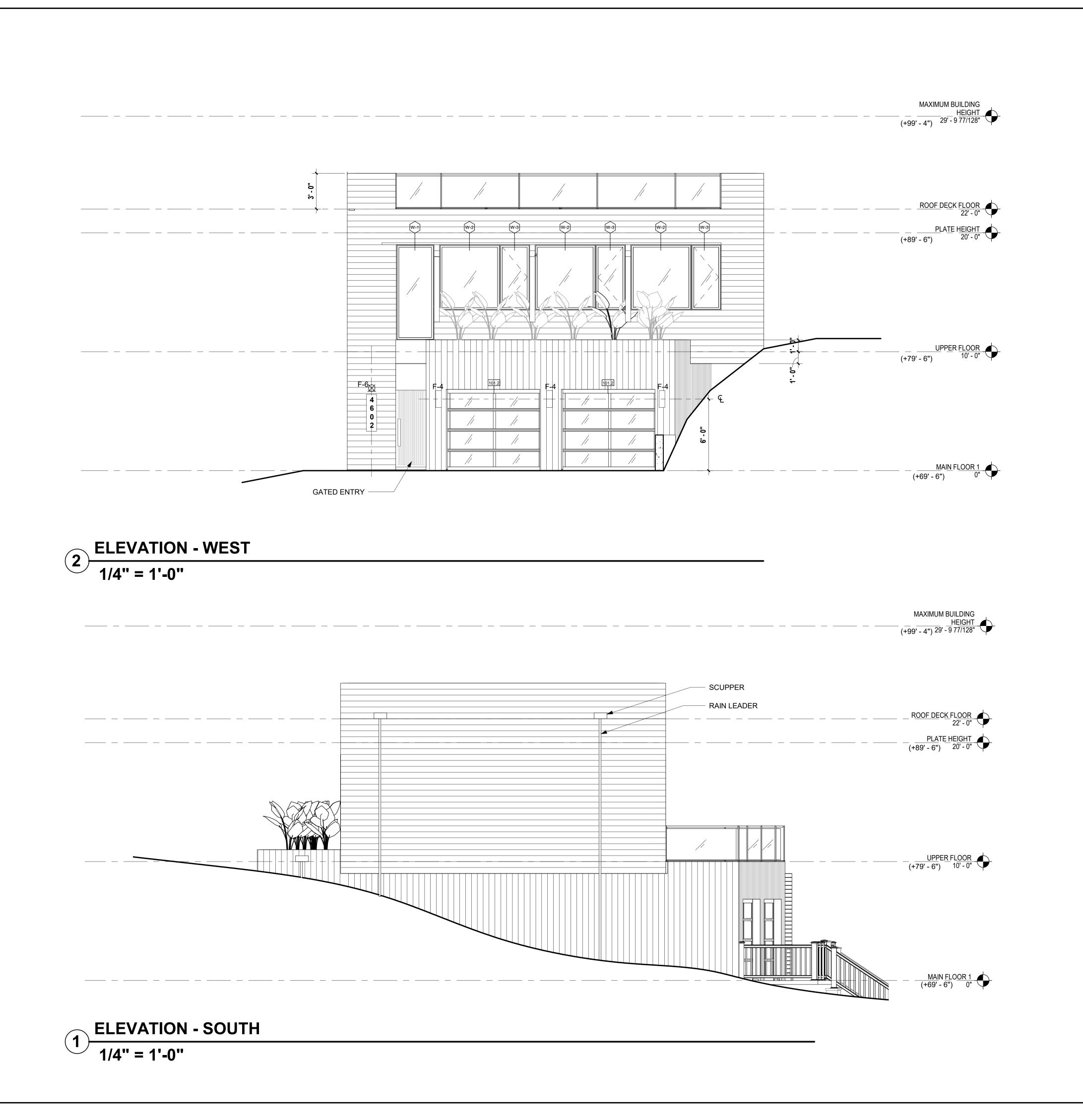
ISSUED / REVISIONS DATE

ISSUE DATE: 12.08.20 DRAWN BY:

> **BUILDING ELEVATIONS**

CHECKED BY:

SHEET NUMBER A4.0



<u>S</u>Z

SUZANNE ZAHR INC.

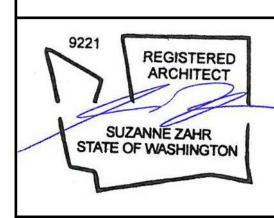
2441 SE 76TH AVE, SUITE 160 MERCER ISLAND, WASHINGTON 98040 T. 206 354 1567 WWW.SUZANNEZAHR.COM

I ADDITION

TRUMBLE RES ACCESSORY DWELLING UNIT

PROJECT NUMBER

20004



ISSUED / REVISIONS DATE

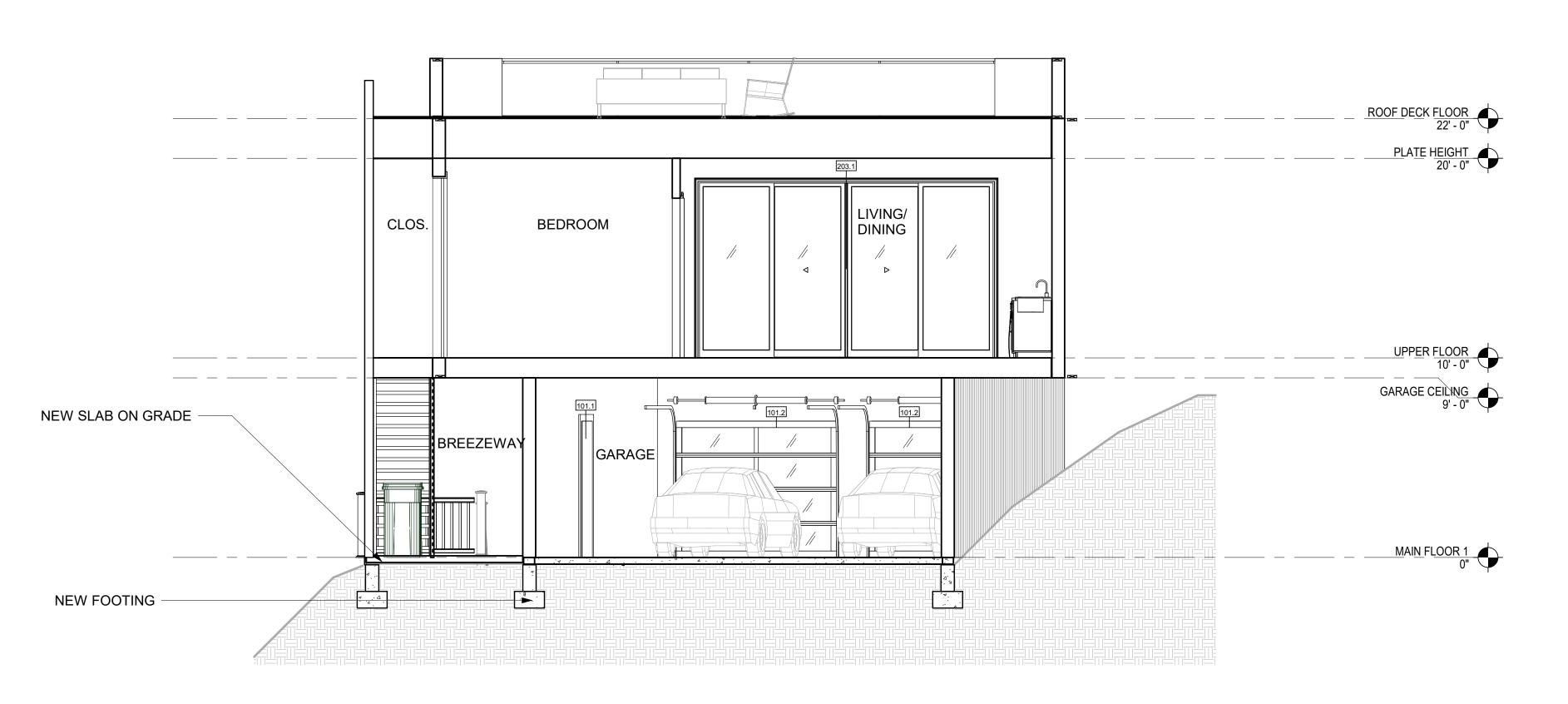
ISSUE DATE: 12.08.20
DRAWN BY: SA

CHECKED BY:

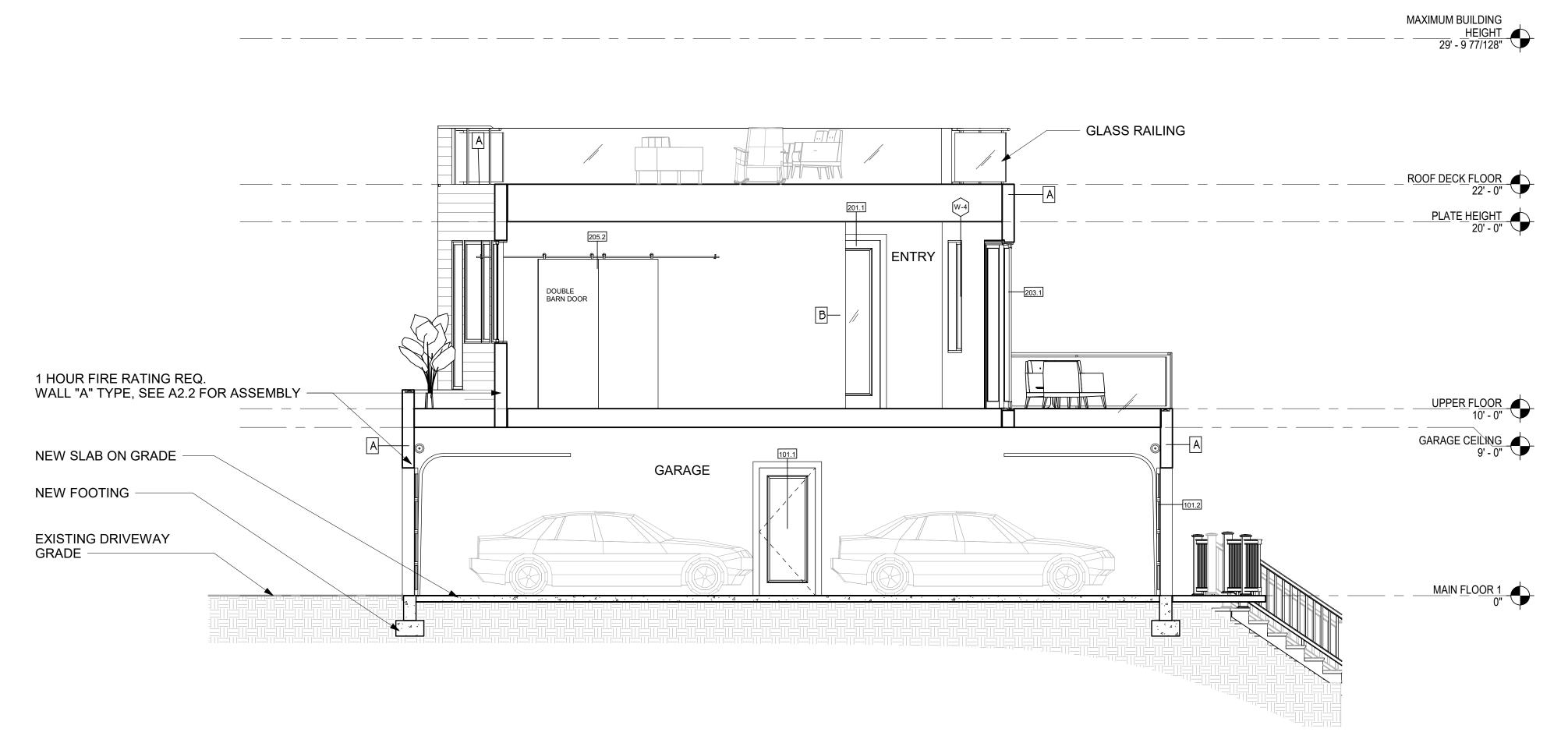
BUILDING ELEVATIONS

SHEET NUMBER

A4.1



BUILDING SECTION B1/4" = 1'-0"



BULDING SECTION A

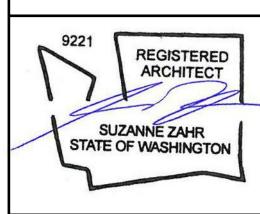
1/4" = 1'-0"

SUZANNE ZAHR INC.

2441 SE 76TH AVE, SUITE 160 MERCER ISLAND, WASHINGTON 98040 T. 206 354 1567 WWW.SUZANNEZAHR.COM

PROJECT NUMBER

20004



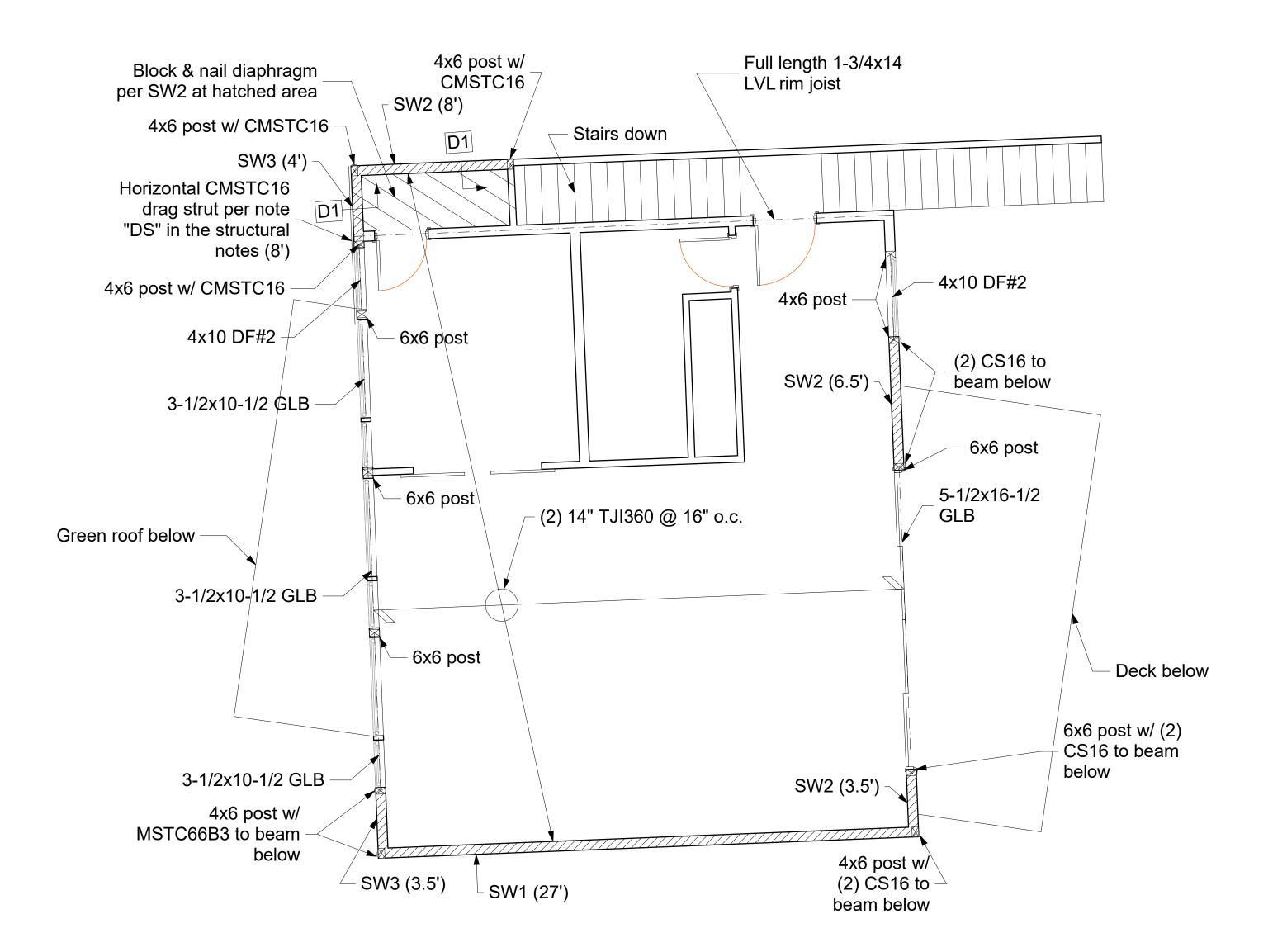
ISSUED / REVISIONS DATE

ISSUE DATE: 12.08.20 CHECKED BY:

BUILDING SECTIONS

SHEET NUMBER

A5.0



wall schedule

down per plan

nailing per

Wood framed

Wood post per

wall per framing

Floor framing

Diaphragm edge nailing, refer to

notes on framing plans, as

12"

Min.

- Wall top plate

A35 per shear wall schedule

Ventilation opening, refer to architect's

sheathing

(H2.5 shown)

requirements for size and position

Solid blocking between

joist, as applicable. No

gap permitted between

H1 or H2.5 each joist/truss,

Refer to plans for member sizes.

the blocking and the roof

joists/trusses, or rim

diaphragm schedule and diaphragm

applicable. Diaphragm nail spacing

may be adjusted to account for holes

spacing may not be less than 3" o.c.

Roof

sheathing

members

Exterior wall

Roof Ventilation Typical Detail

= 1'-0"

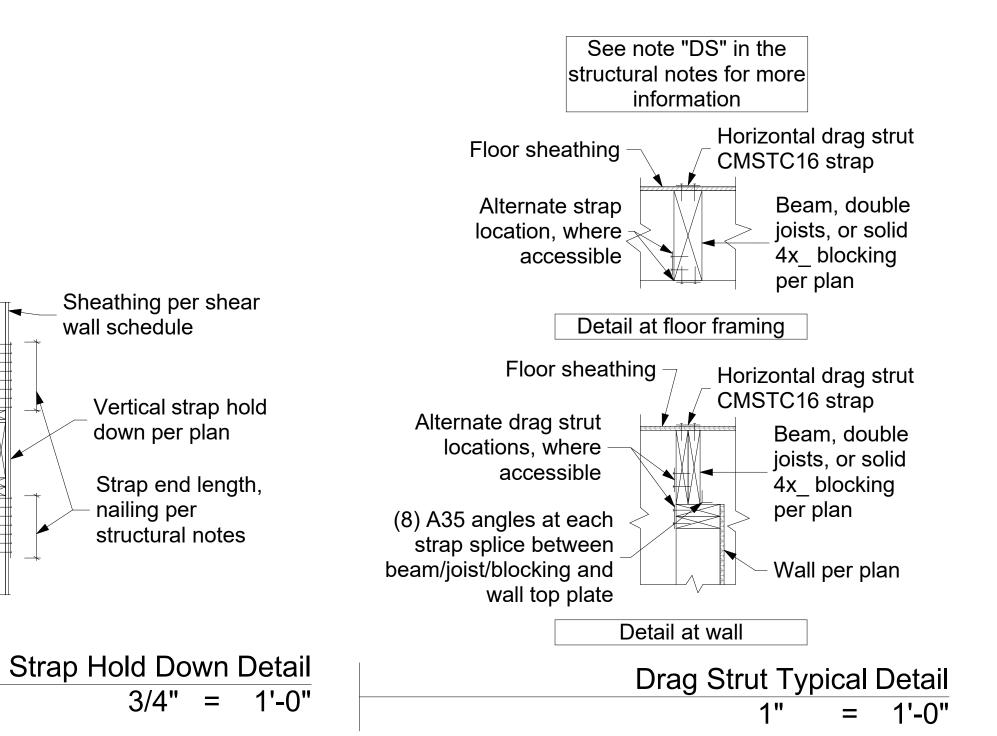
Roof framing

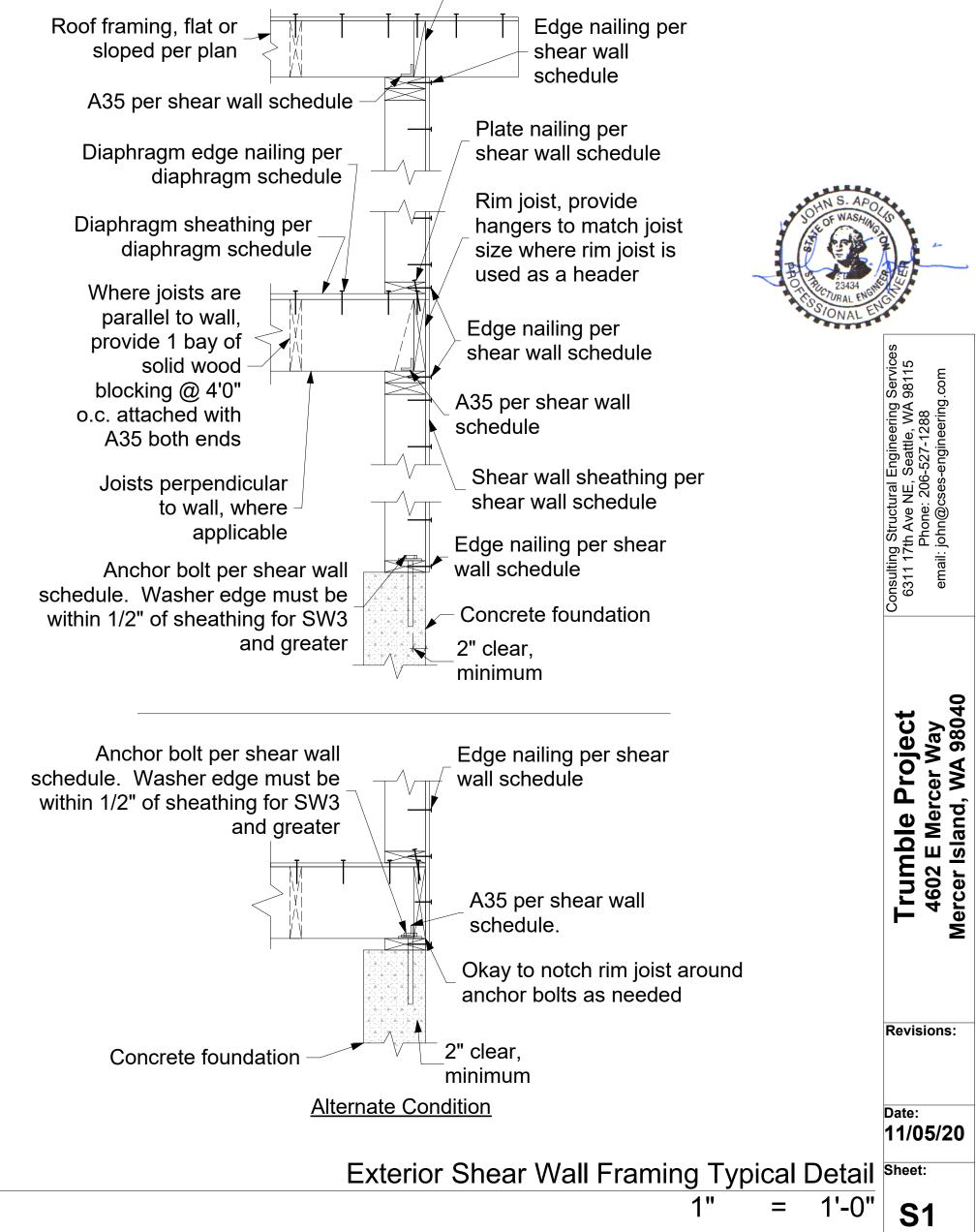
in the blocking, provided the same

number of nails are used. Nail



1/4" = 1'-0"





Solid wood blocking between studs,

provide (2) A34 each side to studs,

MSTC48B3 strap

from joist/block to wall

blocking @ 32" o.c.

Perpendicular framing per plan

blocking for 2 bays @ 32" o.c.

or parallel framing with LVL

Balloon framed (2) 2x6 HF #2

Parapet Detail 3/4" = 1'-0"

- A34 each joist to plate

At roof framing, roof

vent block per vent

block typical detail

(4 total per block)

@ 16" o.c.

Sheathing

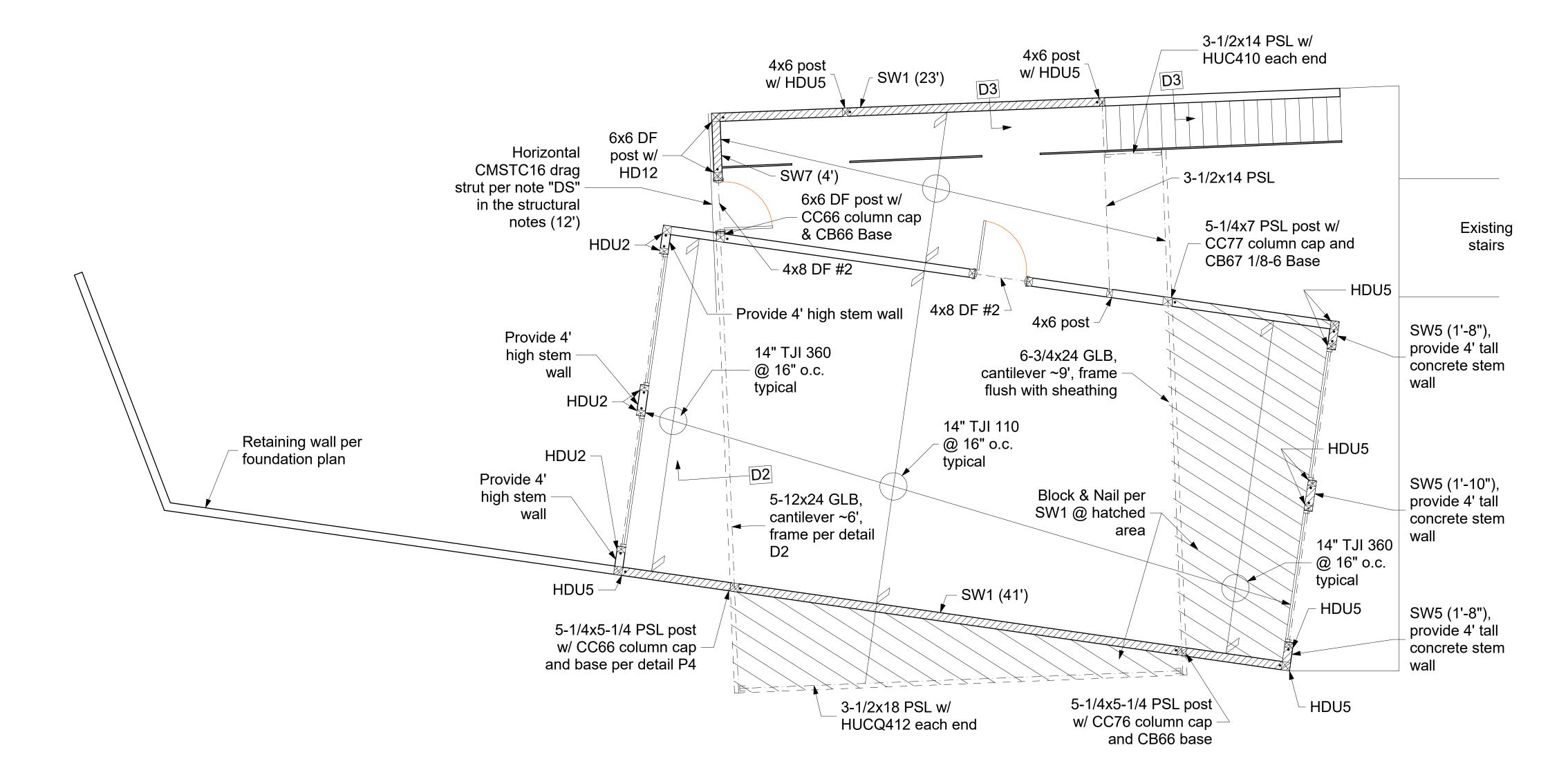
Parapet/stair rail top

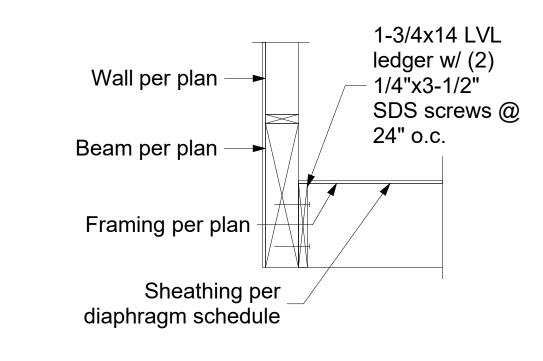
plate, A34 each joist

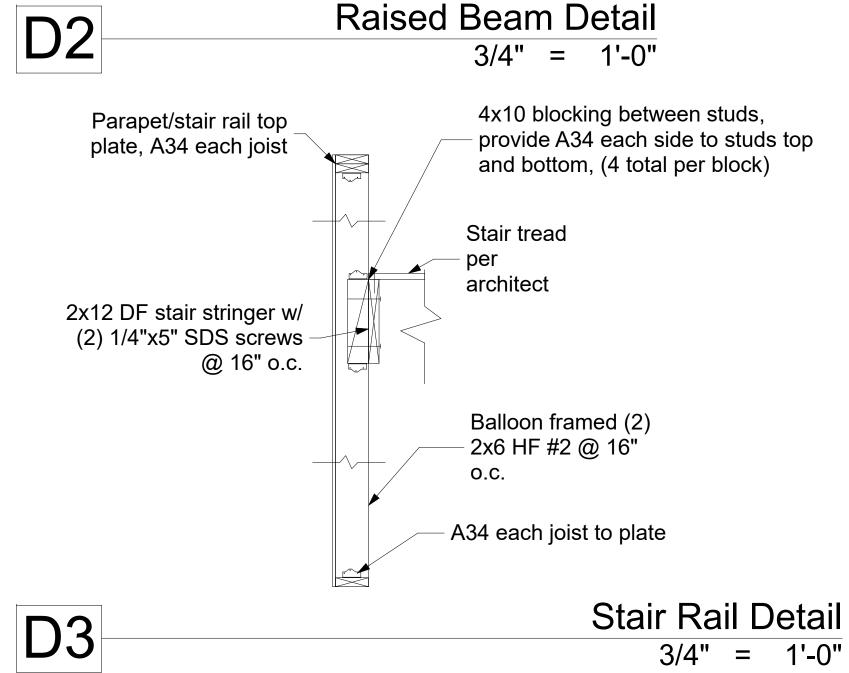
1-3/4x14 LVL ledger w/

(3) 1/4"x3-1/2" SDS

screws @ 16" o.c.







Shear wall

Beam below

3/4" = 1'-0"

above

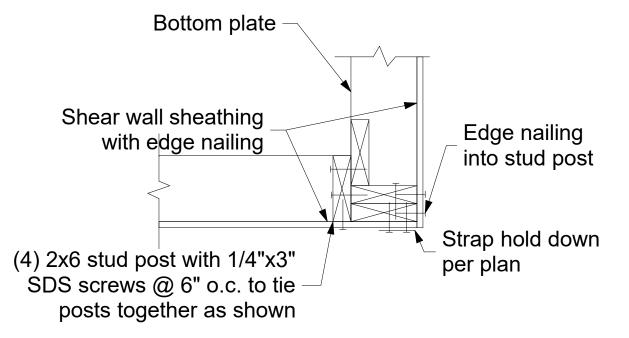
Retrofit HDU Hold Down Typical Detail

Upper Floor Framing and Main Floor Wall Plan 1/4" = 1'-0"

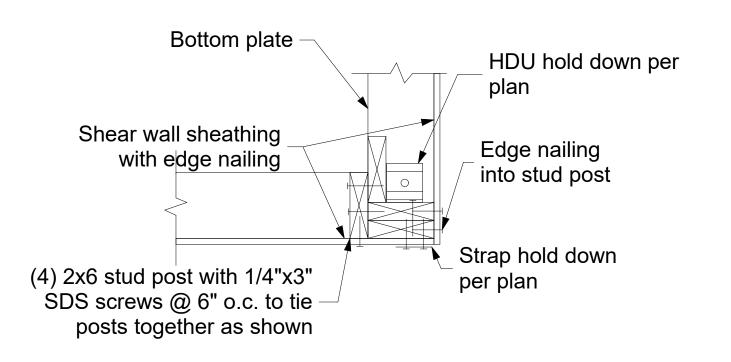
Shear wall end post

Strap hold down, wrapped around

beam below as needed to meet



Strap Hold Down Configuration



HDU Configuration

Corner Hold Down Detail Discontinuous Shear Wall Detail 1 1/2"= 1'-0" 3/4" = 1'-0"

Edge nailing per

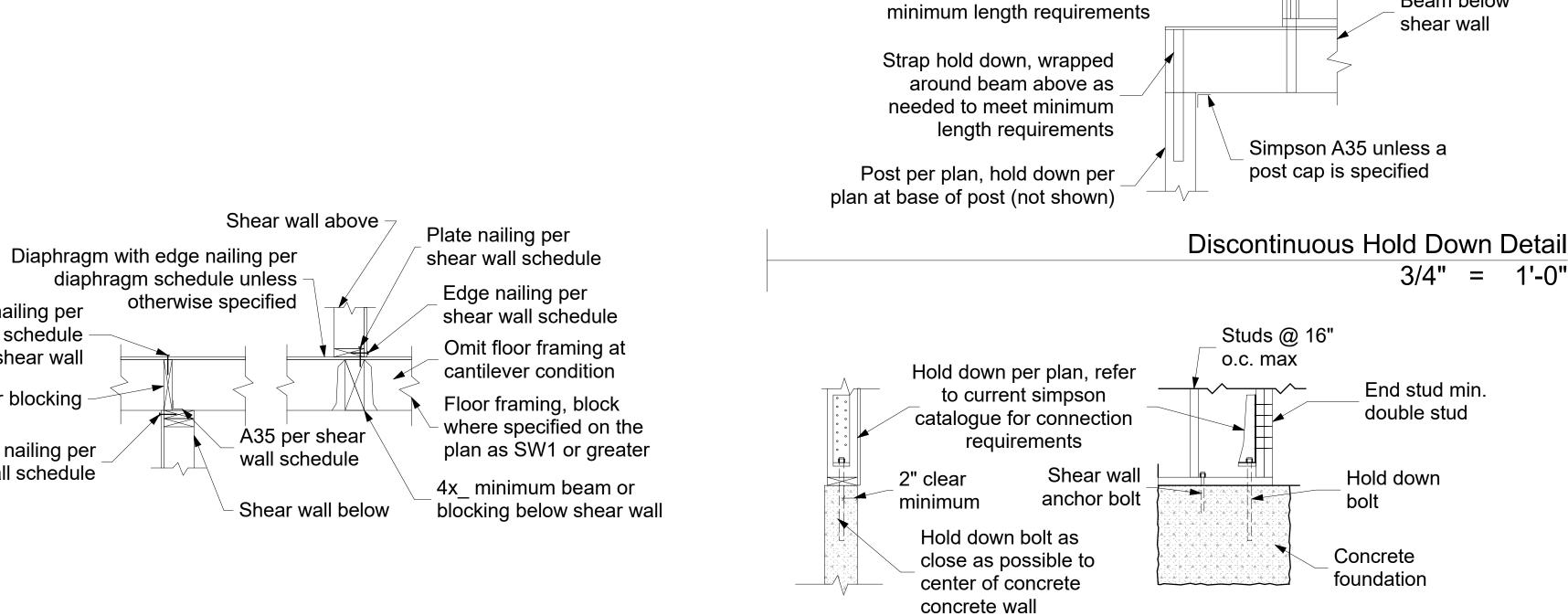
Joist or blocking

shear wall schedule

Edge nailing per

shear wall schedule

of lower shear wall

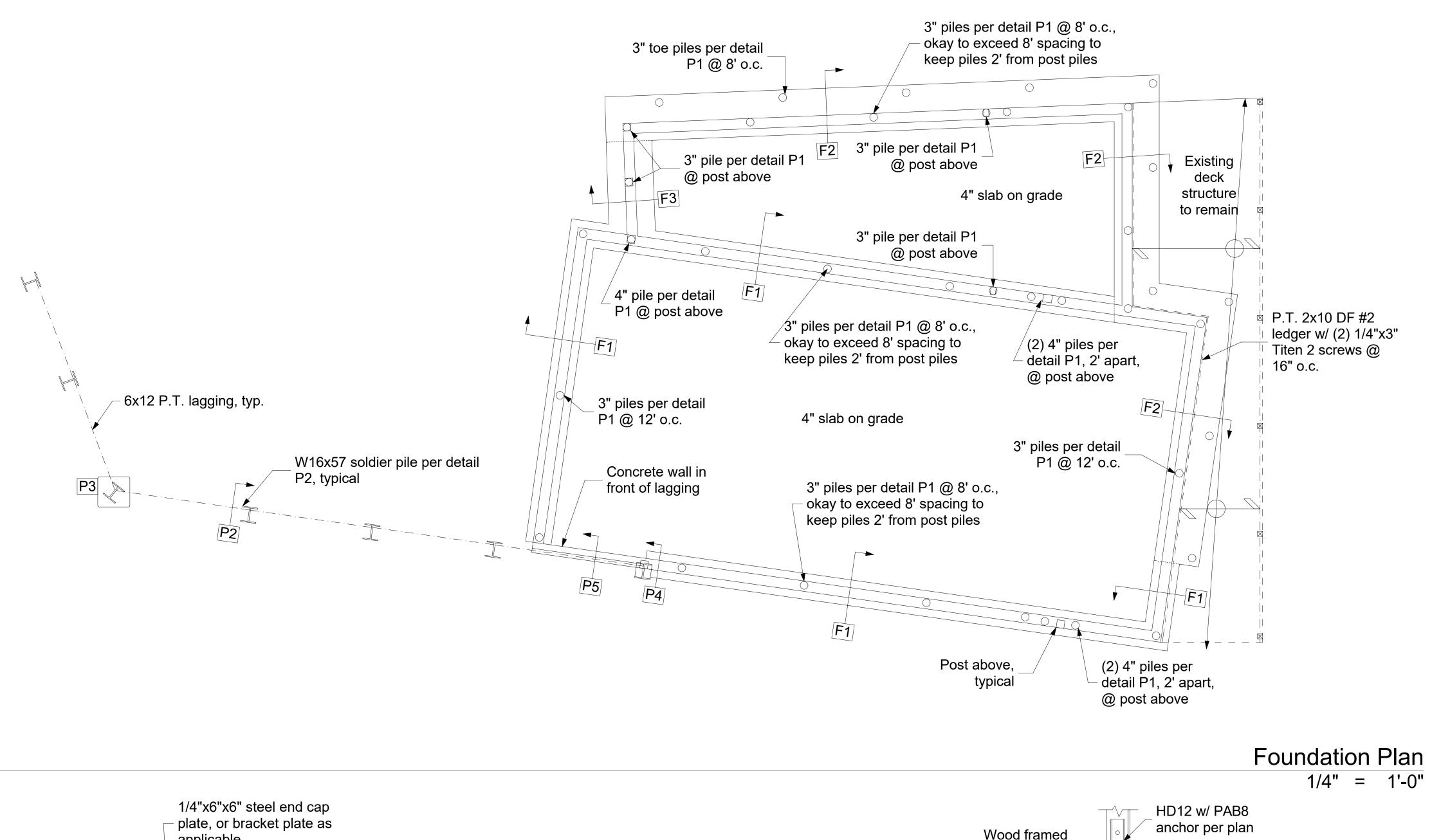


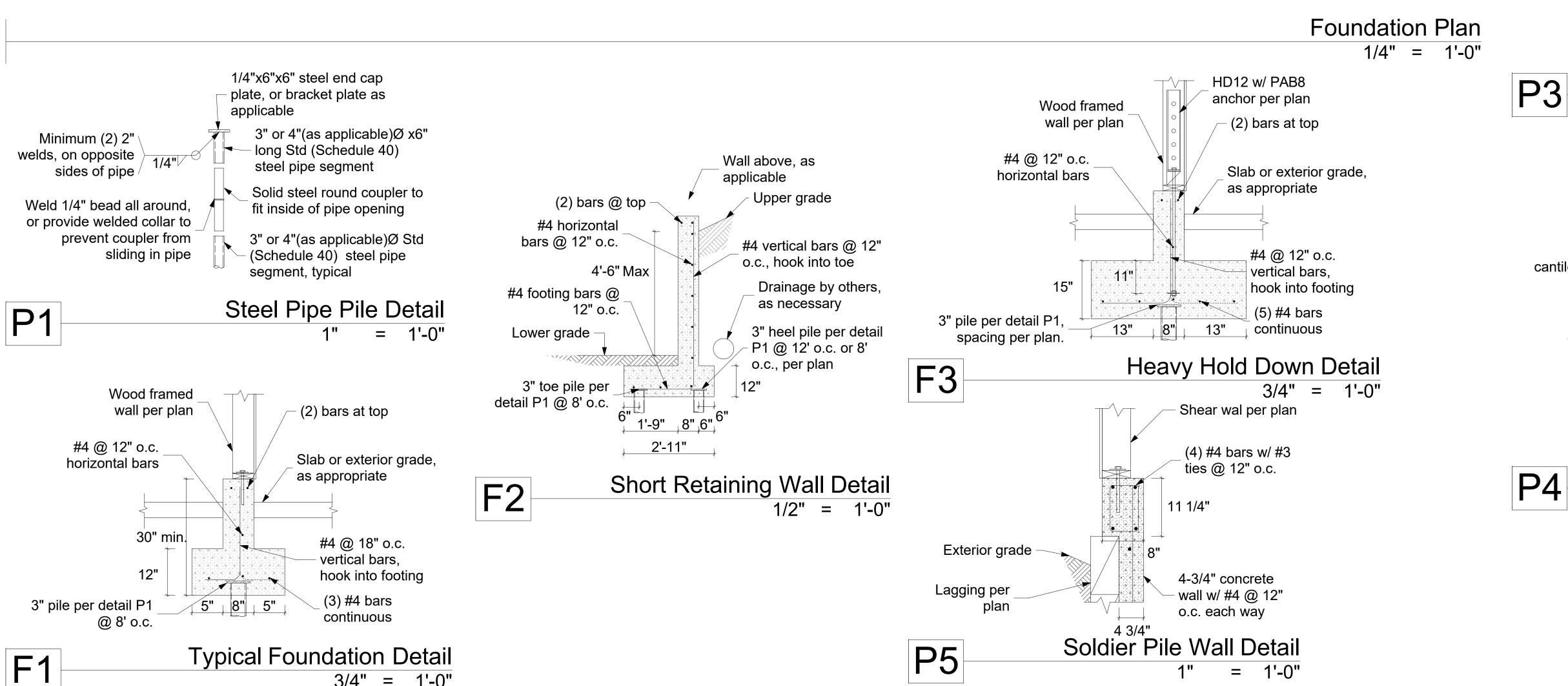
Trumble Project 4602 E Mercer Way Mercer Island, WA 98040

Revisions

11/05/20 Sheet:

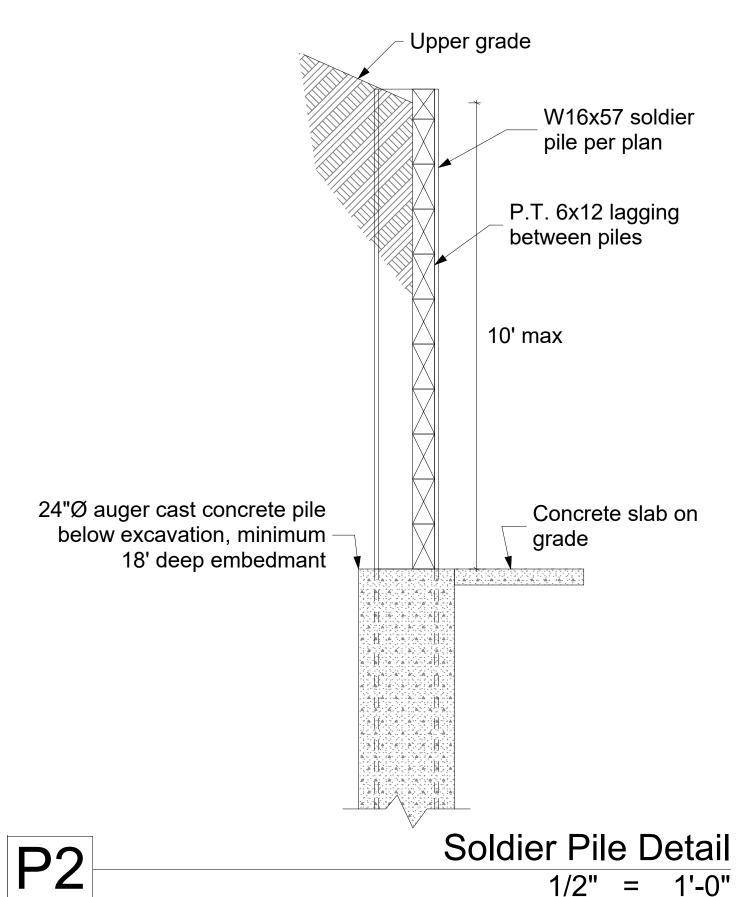
S2

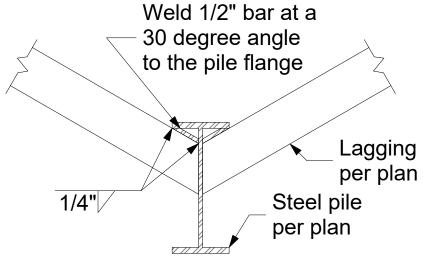




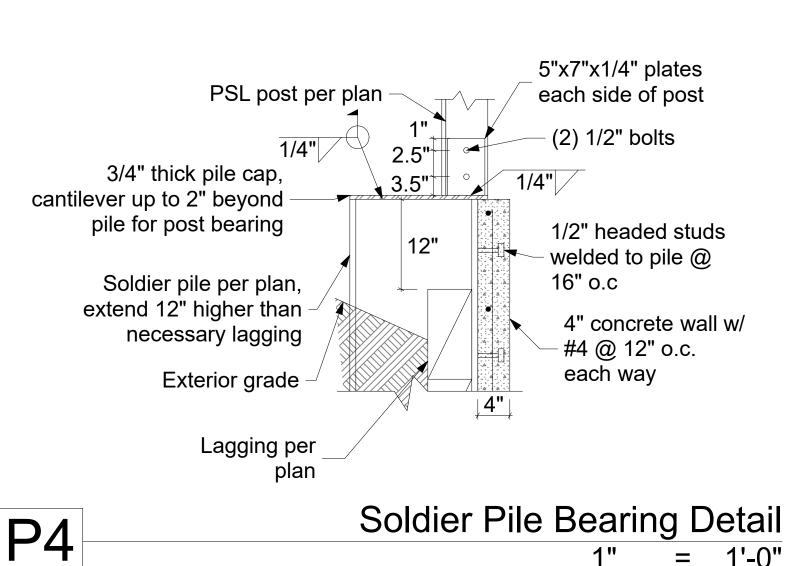
3/4" = 1'-0"

= 1'-0"





Soldier Pile Angled Lagging Detail



Trumble Project 4602 E Mercer Way Mercer Island, WA 98040

onsulting Structural Engineering Service 6311 17th Ave NE, Seattle, WA 98115 Phone: 206-527-1288 email: john@cses-engineering com

Revisions

11/05/20 Sheet:

S3

| | | | SHEAF | R WALL SCH | EDULE | | | |
|-------------------|-----------------------------------|-----------------|------------------|----------------------|-------------------------|---------|----------------|-------------------|
| | | (Lumber | for shear walls | is HF#2 or better | unless otherwise | noted.) | | |
| Туре | Material | Edge Nailing | Field Nailing | A.B. Size/Spacing | Plate Nailing | Plates | A35 Spacing | Shear Capacity |
| Unblocked Wall | 15/32" WSP one side, unblocked | 8d @ 6" | 8d @ 12" | 1/2"Ø @ 72" | (2) 16d @ 12" | 2x_ | 24" | 100 plf |
| SW1 | 15/32" WSP one side | 8d @ 6" | 8d @ 12" | 1/2"Ø @ 48" | (2) 16d @ 9" | 2x_ | 24" | 230 plf |
| SW2 | 15/32" WSP one side | 8d @ 4" | 8d @ 12" | 1/2"Ø @ 32" | (2) 16d @ 6" | 2x_ | 16" | 350 plf |
| SW3 | 15/32" WSP one side | 10d @ 3" | 10d @ 12" | 5/8"Ø @ 24" | (2) 16d @ 4" | 3x_ | 12" | 550 plf |
| SW5 | 15/32" WSP two sides | 8d @ 3" | 8d @ 12" | 5/8"Ø @ 16" | 5/8"Ø x 8" Lag @ 16" | 3x_ | 8" | 910 plf |
| SW7 | 15/32" WSP two sides | 10d @ 2" | 10d @ 12" | 3/4"Ø @ 16" | 3/4"Ø x 8" Lag @ 12" | 3x_ | 4" | 1420 plf |

For shear wall callouts on the Structural Framing Plans: SW x (y') denotes a shear wall type "x" with a minimum length of "y" feet.

- For SW3 and greater: studs, plates, and blocking where two WSP panels abut shall have a minimum 3" nominal thickness. Double 2x_members may be used for studs if the members are connected by plate nailing. Note 10d nails at WSP panel edges.
- For shear walls with 2 layers of sheathing: Both layers of the sheathing may be installed on the same side of the shear wall, provided the joints between sheathing panels for the two layers are offset. End studs, studs at panel joints, and top and bottom plates must be $3x_0$ or thicker lumber. Nails should be staggered evenly in rows so that no two nails are closer than 1-1/2 apart. Top and bottom plates may be $2x_0$ lumber if the sheathing extends up or down past the plates to a continuous rim joist, and is nailed there.
- "WSP" refers to "Wood Structural Panel", either plywood or other wood materials.
- Provide double stud minimum at both ends of all shear walls.
- At the roof or top level of any shear wall, "A35 spacing", and all other relevant connector specifications, apply to assemblies at both the top
 and bottom of the shear wall. At lower levels, apply to the bottom of the wall only.
- Provide floor diaphragm edge nailing per diaphragm schedule through floor plywood into blocking, parallel joist framing, or top plates (whichever applies) of all shear walls.
- Provide 3x_ plates, and 4x_ rim joists, minimum, where lag screws are specified for plate nailing.
- Where shear wall edge nails are spaced closer than 3" o.c., or spaced 3" o.c. with 10d nails, foundation sill plates and all framing members
 receiving edge nailing from abutting panels shall not be less than a single 3x_ member.
- Where panels are applied on the same face of a wall and nail spacing is less than 6 inches o.c. on either side, panel joints shall be offset horizontally and vertically to fall on different framing members, or all framing supporting panel edges shall consist of 3 inch nominal or thicker members and the position of nails on each side shall be staggered vertically.
- Provide 4x_ or double 2x_ framing where A35 angles are used on both sides of one piece of wood.
- Where a shear wall terminates above the foundation level (no shear wall below), provide minimum 4x_ blocking or double joist framing (as applicable) below the shear wall."&" Plate nailing per this schedule shall be nailed into this blocking at the bottom of the shear wall.
- Shear wall nails shall be placed no closer than 3/8" from a panel edge or perpendicular face of stud.
- Maximum spacing between nails shall not exceed 12".
- Shear wall nailing shall be common or galvanized box nails, unless lag screws are noted. Galvanized nails shall be hot dipped or tumbled.
- Lag screw plate connectors shall penetrate 3.5" minimum, and plates or beams receiving lag screws shall have a minimum width of 3.5".
- Where hold downs are specified, the shear wall bolt shall be located within 6 inches of the end of the shear wall, unless otherwise approved by the engineer of record. Minimum end studs shall be as specified in the most recent Simpson catalog.
- Shear wall edge nailing through shear wall sheathing shall be provided into all studs attached to a hold down.
- •Retrofit anchor bolts shall have a minimum embedment of 5" into the concrete foundation.
- Cast in place anchor bolts shall have a minimum embedment of 7" into the concrete foundation.
- For SW3 and greater, foundation anchor bolt plate washers shall extend to within 1/2" of the edge of the sheathing.
- Plate nails shall be nailed into a solid wood rim joist.
- 2x_ plates may be substited for 3x_ plates if panels are nailed with edge nailing directly to the rim joist.
- Where 3x_ plates are used, (2) 20d common nails must be used instead of (2) 16d common nails to connect studs to the bottom plate.
- Where Roof ventilation is required over a shear wall, see roof ventilation detail.

| Diaphragm Schedule | | | | | | | | |
|--------------------------------------------------------------------------------|--------------|-------------|-------------------|--------------|--------|----|------------------|--|
| (Lumber for diaphragm construction is HF#2 or better, unless otherwise noted.) | | | | | | | | |
| Type | Material | Edge N | Iailing Field Nai | ling Edge Bl | ocking | Re | emarks | |
| Roof | 15/32" CDX 2 | 24/0 8d @ 6 | " o.c. 8d @ 12" | o.c. no | no | | Minimum Standard | |
| Floor | 23/32" CDX 4 | 8/24 8d @ 6 | " o.c. 8d @ 12" | o.c. no | .c. no | | Minimum Standard | |

- "WSP" refers to "Wood Structural Panel", either plywood or other wood materials.
- Rim joists at exterior walls shall be continuous for tension. At rim joist splice locations, provide (2) CS16 horizontal straps, minimum 24"
 Where roof or floor framing is cantilevered over an exterior wall below, provide solid blocking with Diaphragm edge nailing between joists.
- This is the minimum required diaphragm construction. Where otherwise noted on the plans, additional blocking or nailing may be required.

Structural Notes:

Applicable Codes and Standards:

2015 International Building Code (IBC) and other applicable local building codes. ASCE/SEI 7-10 - "Minimum Design Loads for Buildings and Other Structures" 2015 NDS for wood structures.

American Wood Preservers Bureau - AWPB Standards for Pressure Treated Material.
American Concrete Institute - ACI 315, ACI 318, ACI 301, ACI 307.

American Institute of Steel Construction - "Specification for the Design, Fabrication, and Erection of Structural Steel."

American Welding Society - AWS Structural Welding Code.

Structural design shall be in accordance with the latest edition of above codes and standards. Contractor shall comply with the latest edition of all applicable codes and standards.

Special Inspections:

Special Inspections are required for: Steel Pipe Pile Installation Soldier Pile Shoring Installation

Design Loads:

Live load: roof 25 psf (snow)

floors 40 psf
decks 60 psf
and: Resignated 110 ms

Wind load:

Basic wind speed

110 mph, exposure C, KzT=1.0

Building Category: Enclosed, Wind Important Factor Iw = 1.0

Refer to calculation page L1 for design wind forces.

Seismic loading per IBC Section 1613, Site Class D.

Seismic base shear = 0.146 * Dead Load

The basic structural type is a bearing wall system with light framed walls with shear panels. Rw = 6.5 (wood structural panels), soil type D.

Seismic importance factor 1.0, Seismic Use Group I

Design and Analysis by Simplified Design Procedure

Peak Ground Accelerations (PGA) based on USGS Hazards Program, by lat/long.

PGA 1 sec = .494 PGA .2 sec = 1.423

Internal pressure 5 psf, Components and cladding design per 1609.6.4.4.1

Foundations:

Soil parameters per Geotech Report by PanGeo, Dated October 30, 2020.

Steel Pipe Piles:

Steel pipe piles shall be installed per the Geotech Report by PanGeo, Dated October 30, 2020. The design strength for 3" piles is 12,000 lbs, and for 4" piles is 20,000 lbs. The Structural Steel pipe shall conform to ASTM A53 Grade A, Fy = 35 ksi. 3" or 4" (respectively) diameter schedule 40 pipe may be used.

The pipes shall be driven to refusal, defined in the referenced Geotech Report in Table 2.

Piles shall be driven in nominal sections and connected with compression fitted sleeve couplers (see typical detail on below) We discourage welding of pipe joints, particularly when galvanized pipe is used, as we have frequently observed welds broken during driving.

The steel pipe pile refusal shall be witnessed by the geotechnical engineer of record.

Steel Soldier Piles:

Steel wide flange piles shall be installed per the Geotech Report by PanGeo, Dated October 30, 2020.

The piles shall conform to ASTM A992, Fy = 50 ksi.

Piles shall be embedded 10' minimum below the bottom of the excavation.

Below the bottom of the excavation, Active pressure acts on one pile diameter, Passive pressure acts on two pile diameters.

Active pressure 45 pcf

Passive pressure 300 pcf

Concrete Retailing Walls:

Active Pressure 35 pcf, or 50 pcf with a 2:1 backslope.
Lateral Pressure 8H
Passive Pressure 300 pcf
Friction coefficient 0.35

Cast in Place Concrete:

Concrete shall attain a minimum compressive strength of 2,500 psi at 28 days (5-½ sack mix). An alternate mix provided by the concrete supplier and pre-approved by the building department is acceptable. Reinforcing steel shall conform to ASTM A-615, Grade 60 (Fy=60,000 psi) for all bars. Provide all wall and footing horizontal bars with 2'-0" x 2'-0" corner bars of the same size at all corners and wall intersections. Minimum lap splice 48 bar diameters.

Concrete protection for reinforcement shall be:

Concrete exposed to earth or weather

Concrete cast against earth

Slabs

1.5" (#5 & smaller) 2" (#6 & larger)

3"

0.75"

Structural steel:

Plates, ASTM A36, Fy=36 ksi. Shapes, ASTM A992, Fy=50 ksi. Structural Steel Pipe per ASTM A53, Fy=35 ksi.

BOIT Anch

Anchor bolts shall conform to F1554. All other bolts shall conform to ASTM A307. Minimum anchor bolt size and spacing shall be $\frac{1}{2}$ " diameter bolts @ 6' o.c. Shear wall anchor bolts per the shear wall schedule.

For cast-in-place anchors, provide 7" minimum embedment into the new concrete foundation. For retrofitted anchors, provide 5" minimum embedment into the existing concrete foundation. Epoxy grout with Simpson SET epoxy.

Provide 3"x3" square x 0.229" thick bolt washers where anchor bolts connect the sill plate to the concrete foundation.

Welding:

Use E70xx electrodes for welding. All fillet welds shall be 3/16" or equal to minimum thickness of member being welded, whichever is greater, unless otherwise shown. All welding shall conform to the provisions of AWS and shall be performed by welders certified in accordance with AWS and WABO.

Wood Framing Specifications:

All sill plates and other wood framing which is in contact with concrete or masonry must be preservative-treated in accordance with AWPAU1 and M4 standards. For anchor bolts connecting wood sill plates to concrete or masonry, provide galvanized steel washers and nuts on top of the sill, minimum washer size 3" x 3" x 1/4" thick.

Where toenails are used for stud wall construction, a minimum of (2) toenails at top and bottom of each stud shall be provided. Toenails shall be 16d nails driven at approximately a 45 degree angle, with a minimum of 1-1/2" of the nail shank shall be embedded in both the stud and the plate. End nails driven through the plate and into the stud end grain are not permitted. Simpson A34 clips at top and bottom of each stud are permitted where correct toenailing is not provided.

Wherever joists bear on a wall or beam, either a continuous rim joist or solid wood blocking must be provided. Blocking shall be connected to the joists with A35 angles at each end. Individual blocks may be omitted to allow for ducting or other openings. Consult with the engineer of record if more than 25% of the blocking is omitted.

Where LVLs are specified with a thickness greater than 1-3/4", the beam may be built up out of multiple 1-3/4" LVL beams connected per truss-joist TJ-9000 specifier's guide.

Unless noted otherwise, the following grades and species shall be used for structural lumber:

Hem-Fir #2

2x, 3x, and 4x studs DF/L standard for plywood or WSP shear walls Hem-Fir standard for other walls

4x and 6x beams Hem-Fir standard for other by DF-L #2

Microllam LVL lumber

Parallam lumber

Glu-lam lumber

LVL 1.9E, Fb = 2600 psi, Fv = 285 psi (minimums)

2.0 WS, Fb = 2900 psi, Fv = 290 psi (minimums)

24F-V4 for simple span beams, 24F-V8 for cantilever beams

All framing connections shall be per Table 2304.9.1 of the IBC, unless otherwise noted.

Preservative-Treated Wood and Fasteners:

All wood in contact with concrete or masonry shall be preservative-treated, in accordance with AWPA U1 and M4 standards.

All fasteners installed in preservative-treated wood shall be hotdipped zinc-coated galvanized with a minimum coating weight complying with ASTM A 153.

Fasteners other than nails and timber rivets are permitted to be mechanically deposited zinc-coated with coating weights complying with ASTM B 695, Class 55 minimum. Plain carbon steel fasteners in wood preservated-treated with SBX/DOT or zinc borate are not required to be galvanized.

Plywood Thickness, Grade, and Nailing:

Install plywood sheets with face grain perpendicular to framing. Stagger joints in adjacent sheets. If not otherwise noted, use nailing schedule, Table 2304.9.1 of the IBC.

Manufactured Joists:

"TJI" Joists specified on the plans are prefabricated products manufactured by the Weyerhaeuser Corporation. The contractor shall submit shop drawings and stamped structural design calculations for review. Joist design and shop drawings shall include location and weight of all equipment being supported by these joists. The manufacturer's installation instructions shall be available on the job site at the time of inspection. Other suppliers may be used, upon approval by the engineer of record.

Metal Framing Connectors:

<u>Unless otherwise noted:</u> Metal framing connectors shall be manufactured by the Simpson company, or approved equal. Unless noted otherwise, use U-series joist hangers to match joist size (e.g., U210 for 2x10 joist). Provide H1 or H2.5 hurricane ties, or other connectors with similar capacity, at every roof joist or truss, and H6 or H7 at ends of roof beams and girder trusses. Where supported by wood posts, wood beams shall be connected to the tops of the posts using Simpson AC, PCZ or EPCZ post caps, and to the bottoms of the posts bearing on wood framing using Simpson AC connectors. Where supported by perpendicular beams, wood beams shall be connected by HU-series face mount beam hangers. Provide Simpson AB or PB post bases to connect posts to concrete foundations. Unless otherwise specified, the maximum number of nails or screws should always be installed on any connector.

Drag Strut Note "DS"

Provide a continuous horizontal connection between the indicated beams, walls, and blocking, using the following method.

A horizontal Simpson CMSTC16 strap shall be provided to create this connection. The strap shall extend minimum 3' onto any beam or wall being connected, and shall be continuous over any blocking between joists for the extent of the drag strut. The strap must be nailed using 16d sinkers, with a nailing pattern per Simpson specifications.

The strap may be installed either on top of the plywood floor diaphragm, or connecting a beam or joist, as applicable and feasible.

Beams or joists may be connected to a wall top plate by (8) A35s.

Where no joists occur below the strap, provide 3-1/2" wide by 3-1/2" deep (minimum) solid wood blocking in the floor or roof framing, below the strap, for nailing. The blocking should be attached to the perpendicular joists with Simpson A34 framing anchors at both ends of each block.

Refer to the latest edition of the Simpson Catalog for required nailing and other requirements.

Refer to the Drag Strut Typical Detail provided with these plans.

Hold Down Notes

Convention for showing shear walls and hold downs: Shear walls are shown on the framing plan for the floor above. (For example, first floor shear walls will be shown on the second floor framing plan, and the shear walls for the topmost floor will be shown on the roof framing plan.) Hold downs are located at the <u>bottom</u> of that shear wall, and connect the end of the shear wall to wall framing or a structural beam located in the floor below the shear wall. Contact the engineer of record for clarification if needed.

Hold downs for each floor must be continuously connected to hold downs on the floor below (or to other intermediate wood framing where so indicated), until they are finally connected to the concrete foundation.

Hold downs shall be installed so as to be as far apart as is reasonable. Hold downs may be located on either the near side or the far side of the post or double stud to which they are attached. In no case shall a hold down bolt be located farther than 6" from the end of the shear wall, except with prior written approval of the engineer. Refer to the latest edition of the Simpson Catalog for details.

Where multiple studs are called out at a hold down, nail studs together with (2) 16d nails at 8" o.c. or 1/4" x 3" Simpson SDS Screws at 12" o.c.

Strap Hold Downs:

the minimum end length is reached.

Provide a vertically oriented strap hold down consisting of one or two of the Simpson vertical strap ties listed below, connecting the end stud or post of the shear wall indicated to new or existing studs in the wall framing below, or to a wood beam supporting the shear wall, where applicable.

Straps shall be installed so that the minimum end length is provided to both connected posts or studs.

Where a strap is connected to a below below, the strap shall be wrapped around the beam until

CS16 denotes a Simpson CS16 strap, with a minim end length of 14", and (13) 8d nails each end.

denotes a Simpson CMSTC16 strap, with a minim end length of 25", and (29) 16d sinker nails each end.

Rod Hold Downs:

HDUx denotes a Simpson HDU(2,4,5,8,or 11)-SDS2.5 hold down. For hold downs at new concrete foundations, provide the following bolts.

<u>For HDU2,4,5:</u> Simpson SB5/8x24 may be used, installed per the most recent edition of the Simpson Strong-Tie Literature.

HD12 denotes a Simpson HD12 hold down, connected to a 6x6 DF post with (4) 1" through bolts. A PAB8 may be used, installed per the most recent edition of the

Simpson Strong-Tie Literature.



nsulting Structural Engineering Services 3311 17th Ave NE, Seattle, WA 98115 Phone: 206-527-1288

> mble Project 2 E Mercer Way

> > evisions

11/05/20

S4