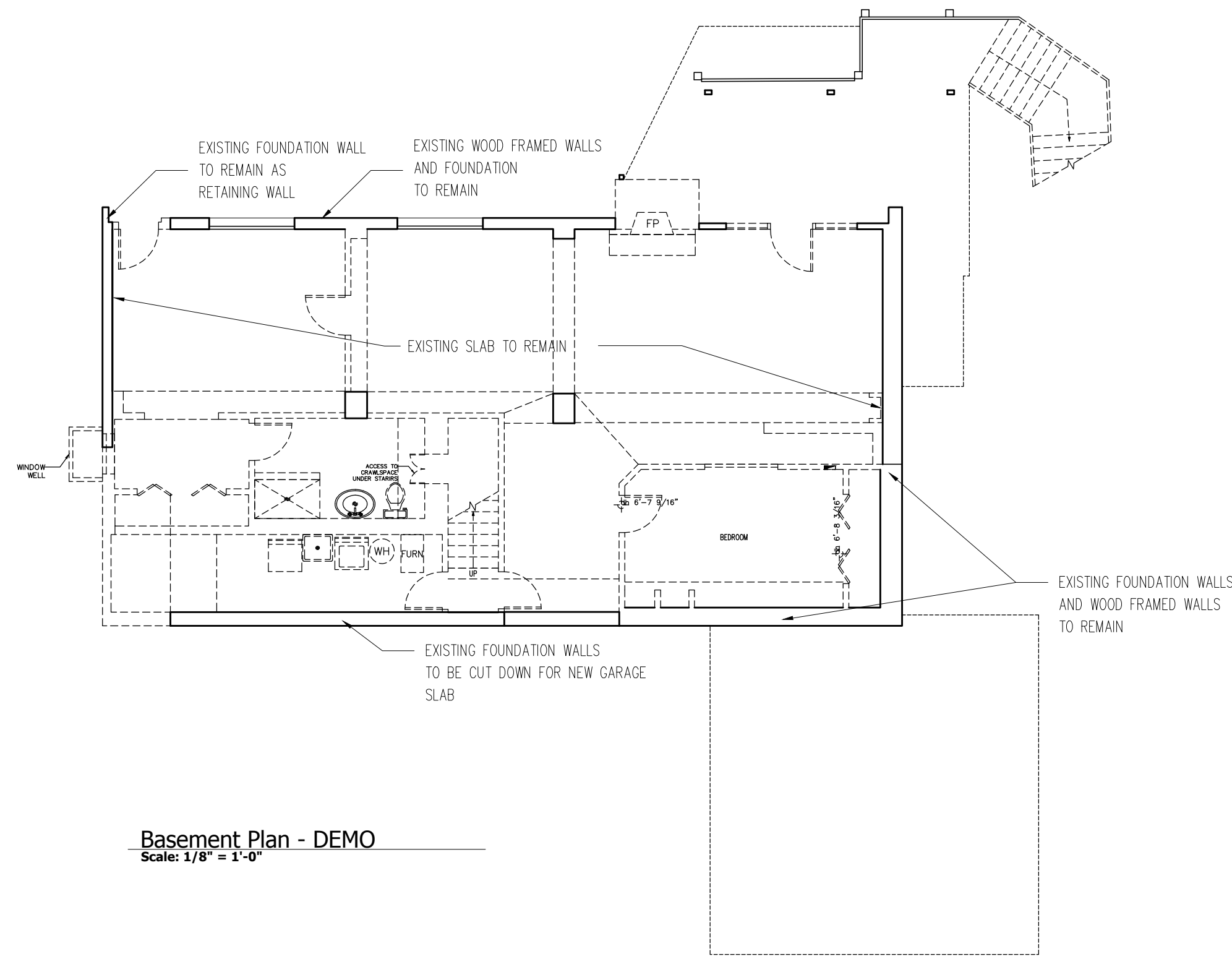
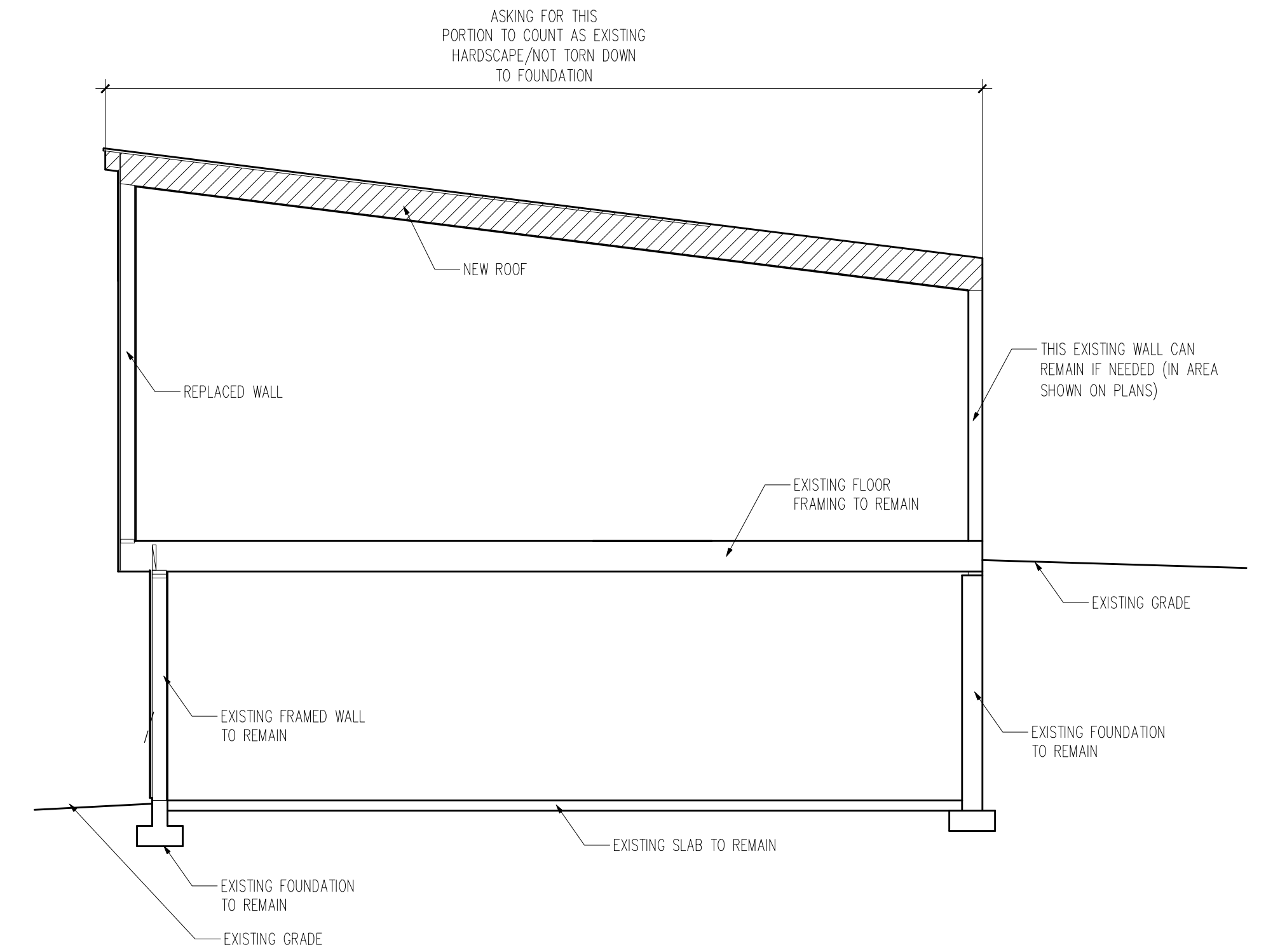


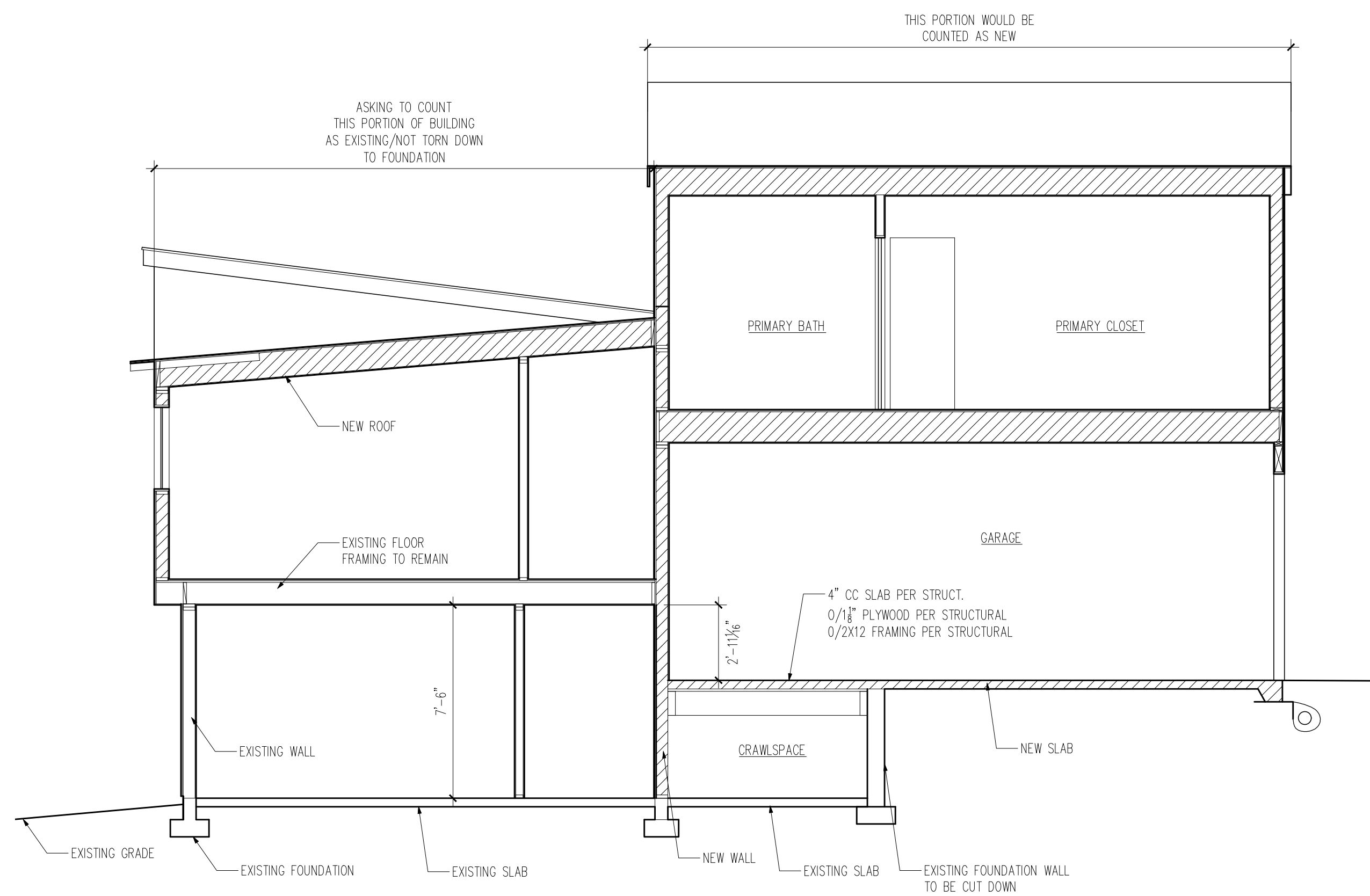
1st Floor Plan - DEMO
Scale: 1/8" = 1'-0"



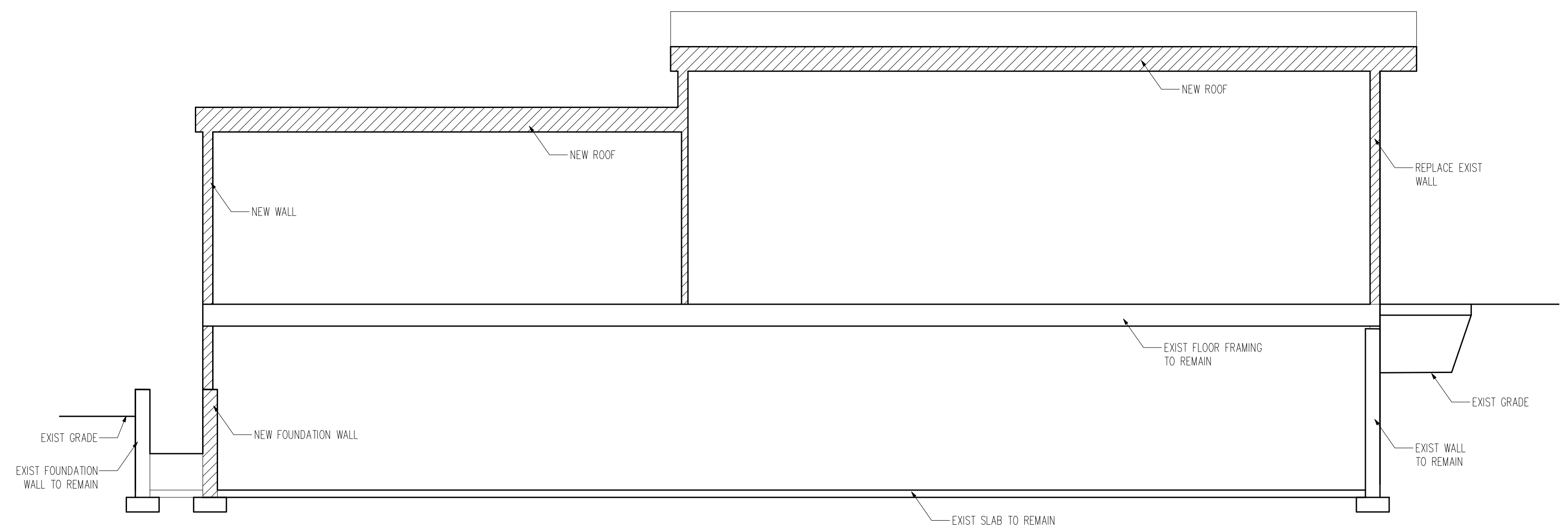
Basement Plan - DEMO
Scale: 1/8" = 1'-0"



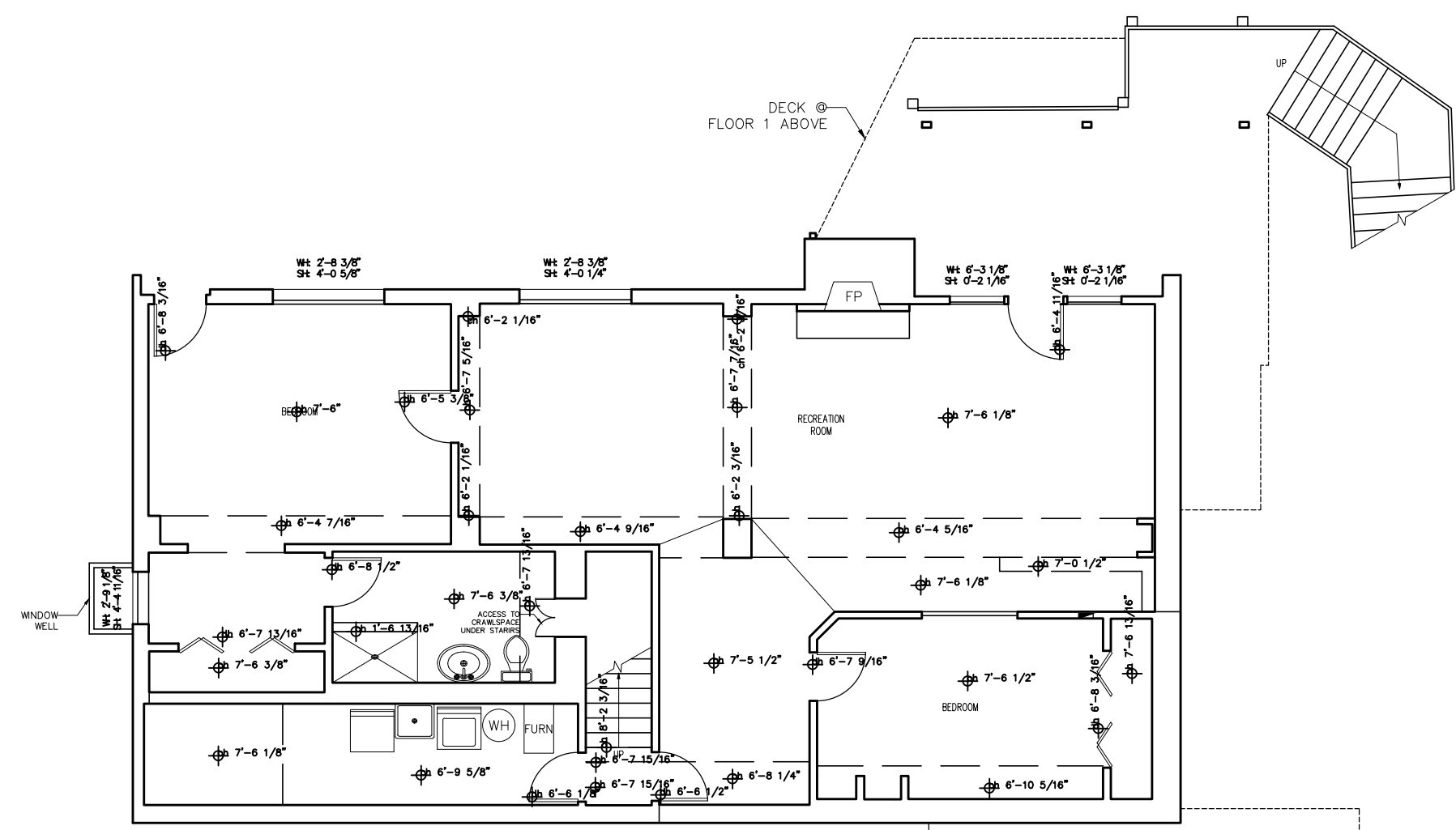
Demolition Section A
Scale: 1/4" = 1'-0"



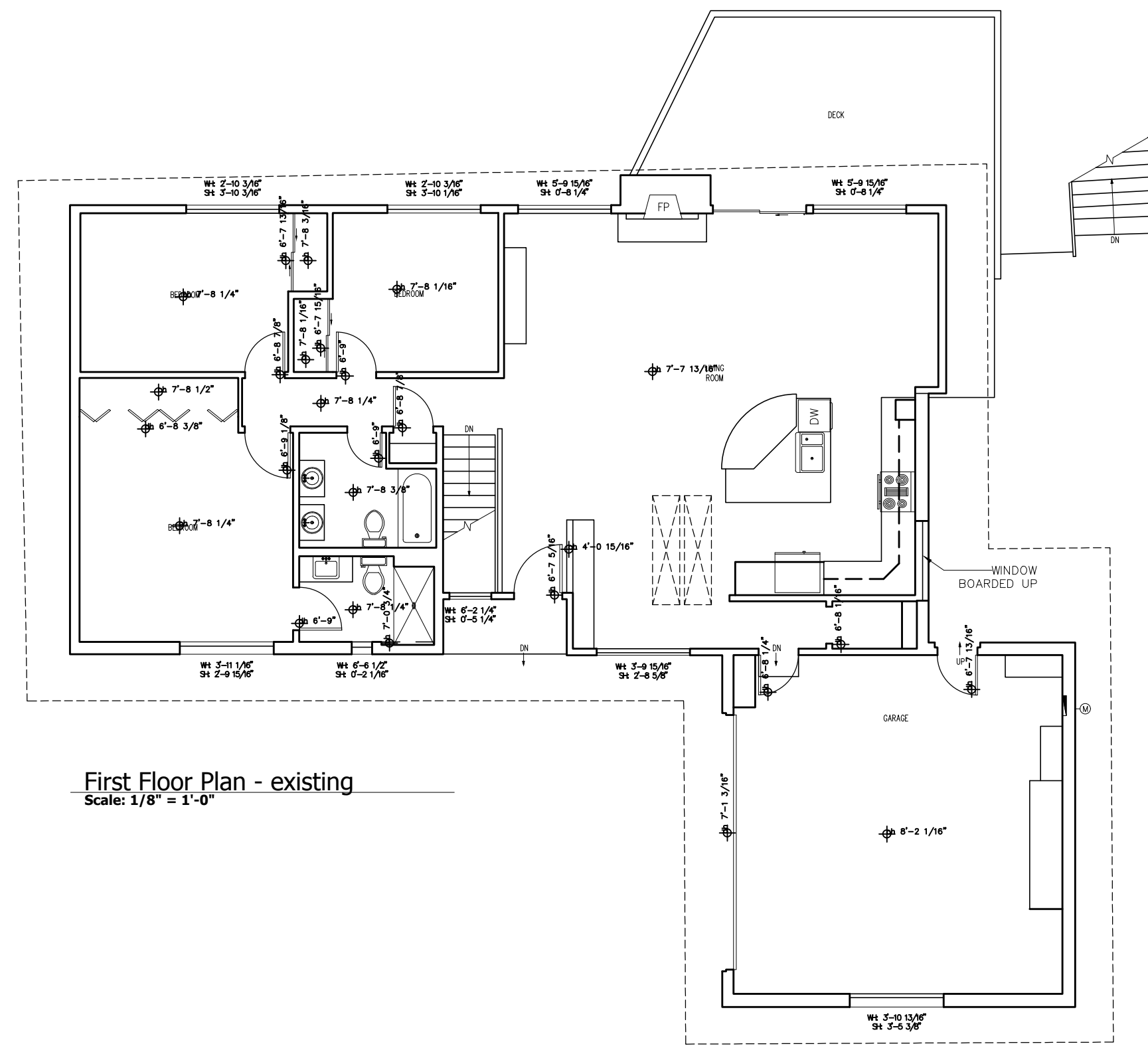
Demolition Section B
Scale: 1/4" = 1'-0"



Demolition Section C
Scale: 1/4" = 1'-0"



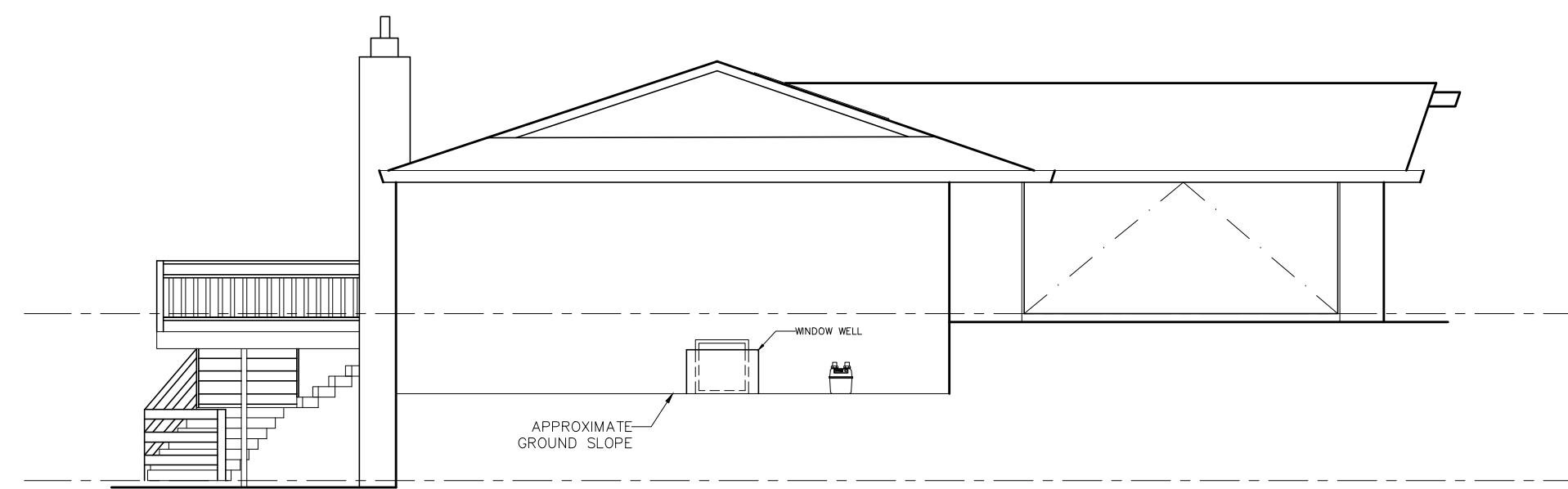
Basement Plan - existing
Scale: 1/8" = 1'-0"



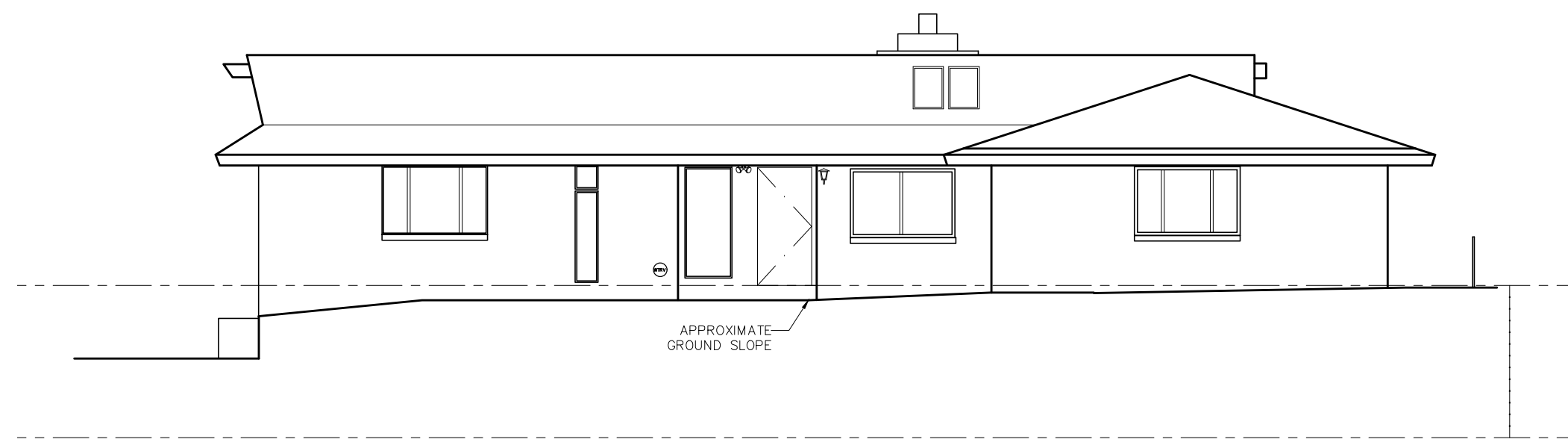
First Floor Plan - existing
Scale: 1/8" = 1'-0"



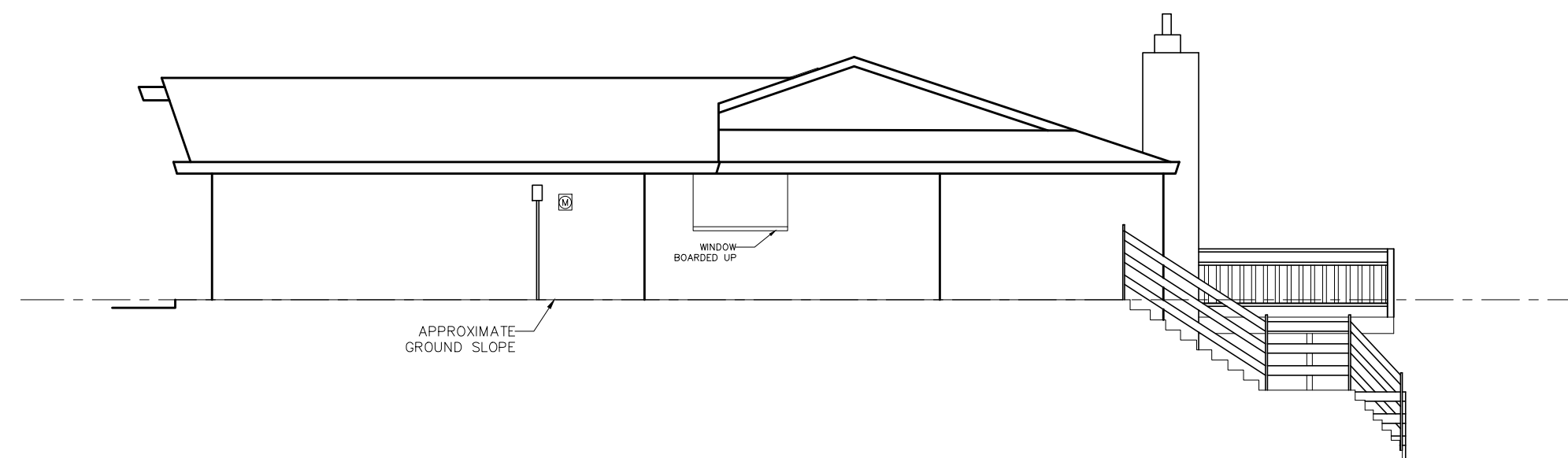
East Elevation - existing
Scale: 1/8" = 1'-0"



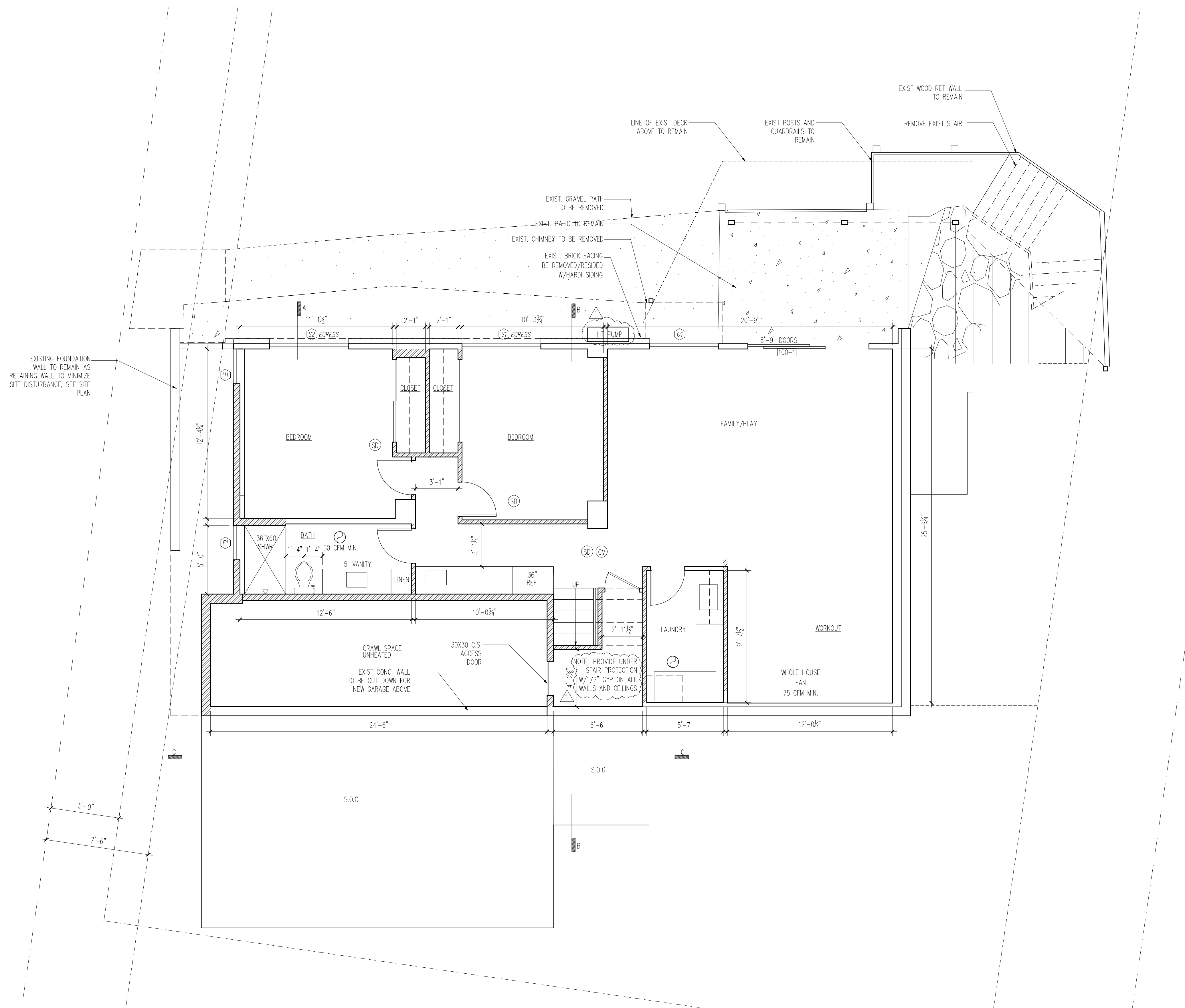
North Elevation - existing
Scale: 1/8" = 1'-0"



West Elevation - existing
Scale: 1/8" = 1'-0"



South Elevation - existing
Scale: 1/8" = 1'-0"



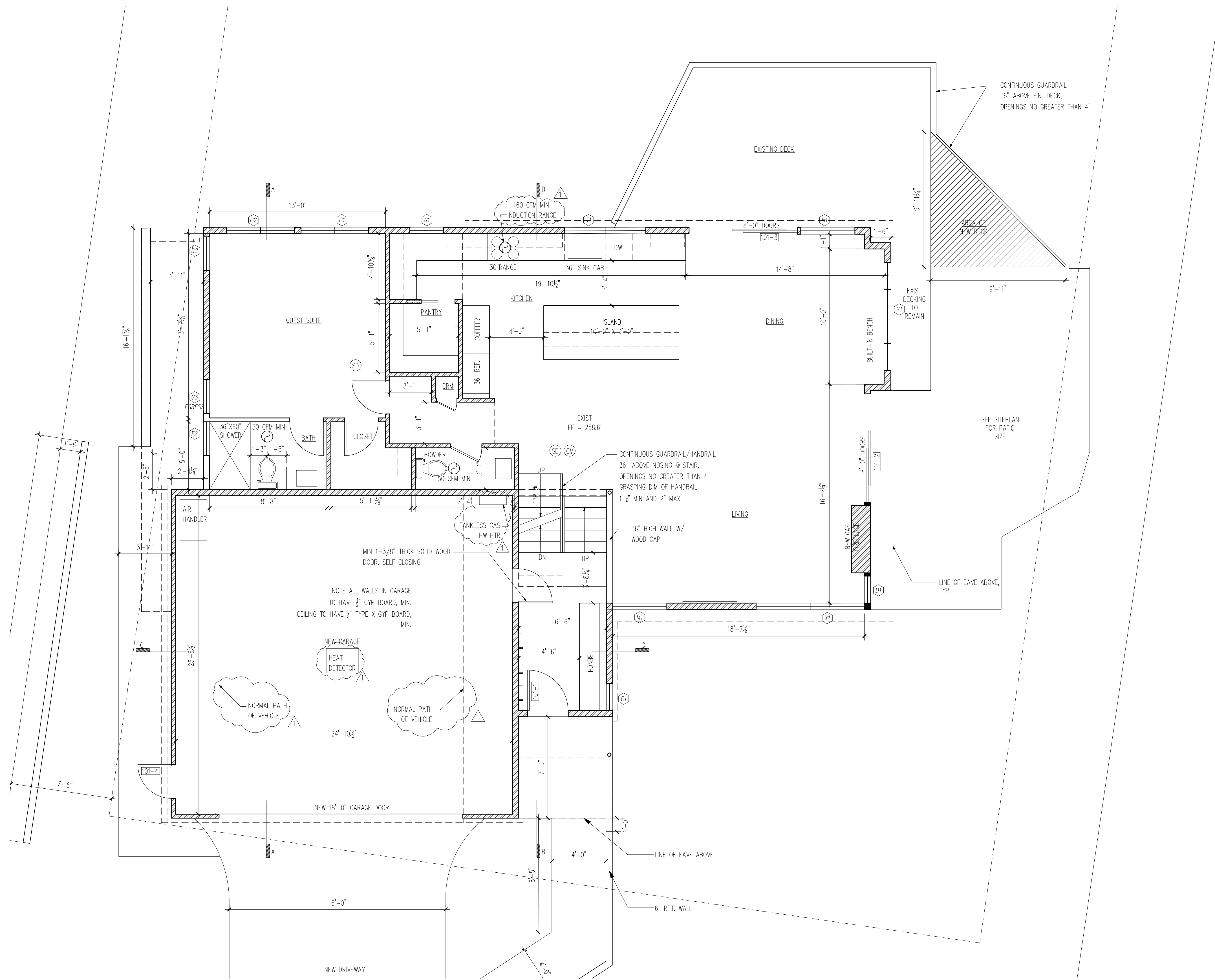
PLAN KEY:

- NEW WALL
- EXISTING WALL
- TO BE DEMOLISHED
- OVERHEAD
- SMOKE DETECTOR
- CARBON MONOXIDE DETECTOR
- EXHAUST FAN

PLAN NOTES:

1. INSULATE ALL EXISTING 2X4 EXTERIOR WALLS OPENED DURING CONSTRUCTION TO BE INSULATED TO A MINIMUM OF R-15. NEW WALLS TO BE INSULATED TO A MINIMUM OF R-21.
2. CONTRACTOR TO VERIFY THAT THERE IS A SMOKE DETECTOR INSIDE AND OUTSIDE EACH SLEEPING AREA AND ON ALL FLOORS, AND A CARBON MONOXIDE DETECTOR OUTSIDE EACH SEPARATE SLEEPING AREA IN THE IMMEDIATE VICINITY OF THE BEDROOM AND ON EACH LEVEL OF THE DWELLING.
3. DIMENSIONS ARE TO ROUGH FRAMING, U.N.O.
4. ALL EXISTING WINDOWS AND DOORS TO REMAIN U.N.O.
5. NEW WINDOWS AND WINDOWS TO BE REPLACED TO HAVE MIN. U-VALUE OF .30
6. ALL SMOKE ALARMS IN THE PRIMARY DWELLING UNIT MUST BE INTERCONNECTED

Basement Plan - proposed
 Scale: 1/4" = 1'-0"
 REF. NORTH



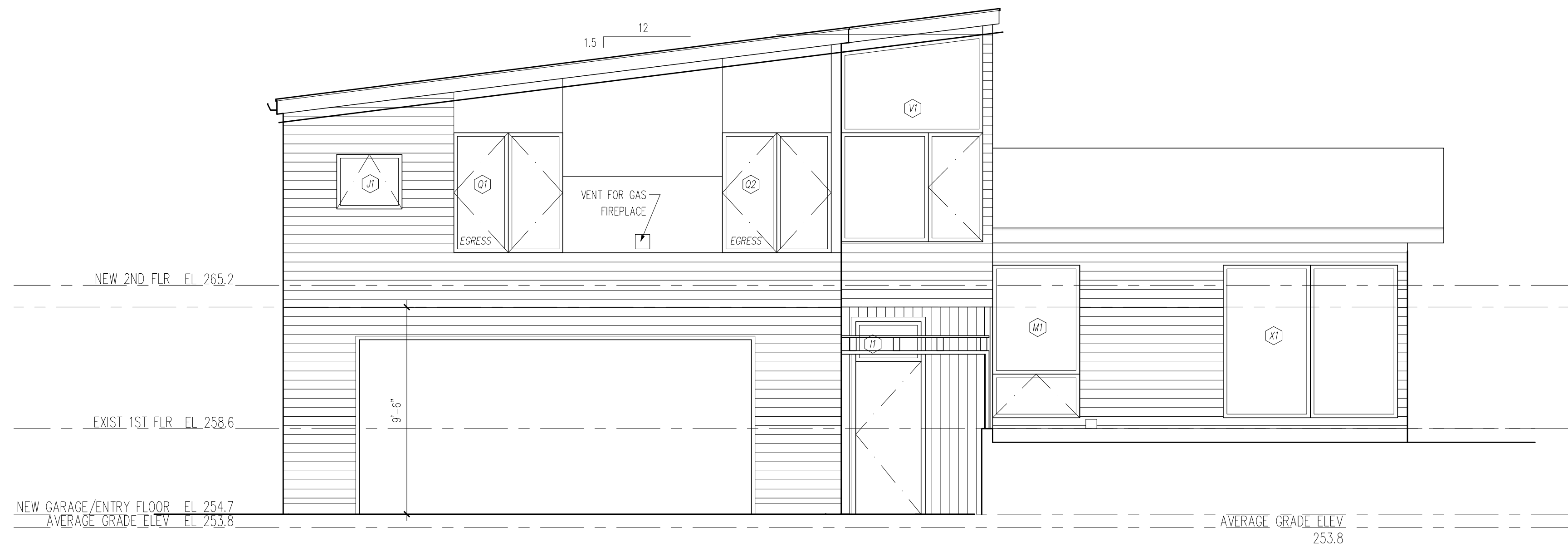
PLAN KEY:

- NEW WALL
- EXISTING WALL
- TO BE DEMOLISHED
- OVERHEAD
- SMOKE DETECTOR
- CARBON MONOXIDE DETECTOR
- EXHAUST FAN

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2. CONTRACTOR TO VERIFY THAT THERE IS A SMOKE DETECTOR INSIDE AND OUTSIDE EACH SLEEPING AREA AND ON ALL FLOORS, AND A CARBON MONOXIDE DETECTOR OUTSIDE EACH SEPARATE SLEEPING AREA IN THE IMMEDIATE VICINITY OF THE BEDROOM AND ON EACH LEVEL OF THE DWELLING.
3. DIMENSIONS ARE TO ROUGH FRAMING, U.N.O.
4. ALL EXISTING WINDOWS AND DOORS TO REMAIN U.N.O.
5. NEW WINDOWS AND DOORS TO BE REPLACED TO HAVE MIN. U-VALUE OF .30
6. ALL SMOKE ALARMS IN THE PRIMARY DWELLING UNIT MUST BE INTERCONNECTED

First Floor Plan - proposed
Scale: 1/4" = 1'-0"
REF. NORTH



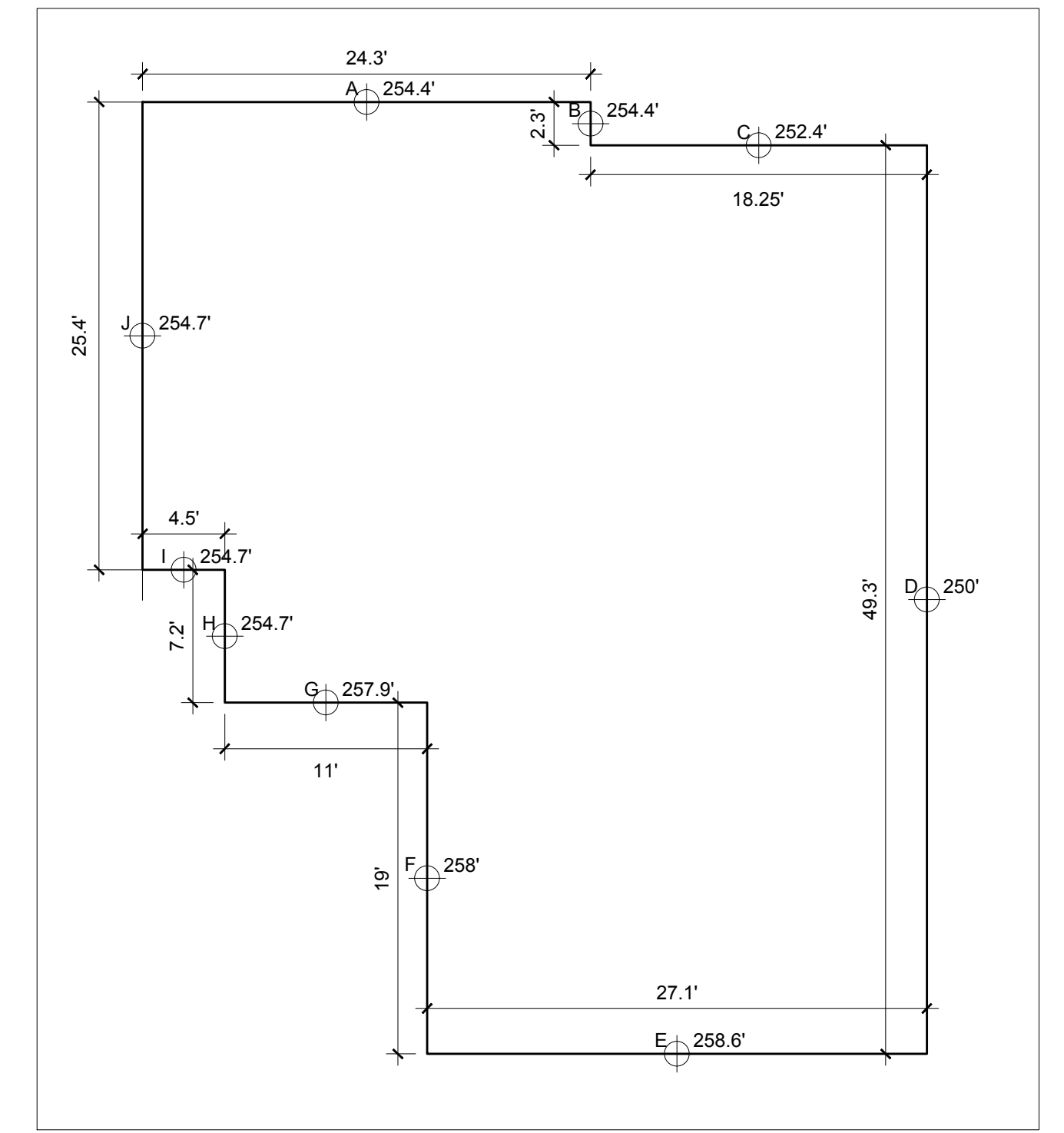
West Elevation - proposed
Scale: 1/4" = 1'-0"

AVERAGE GRADE CALCULATION
- PER DIRECTORS RULE 4-2012

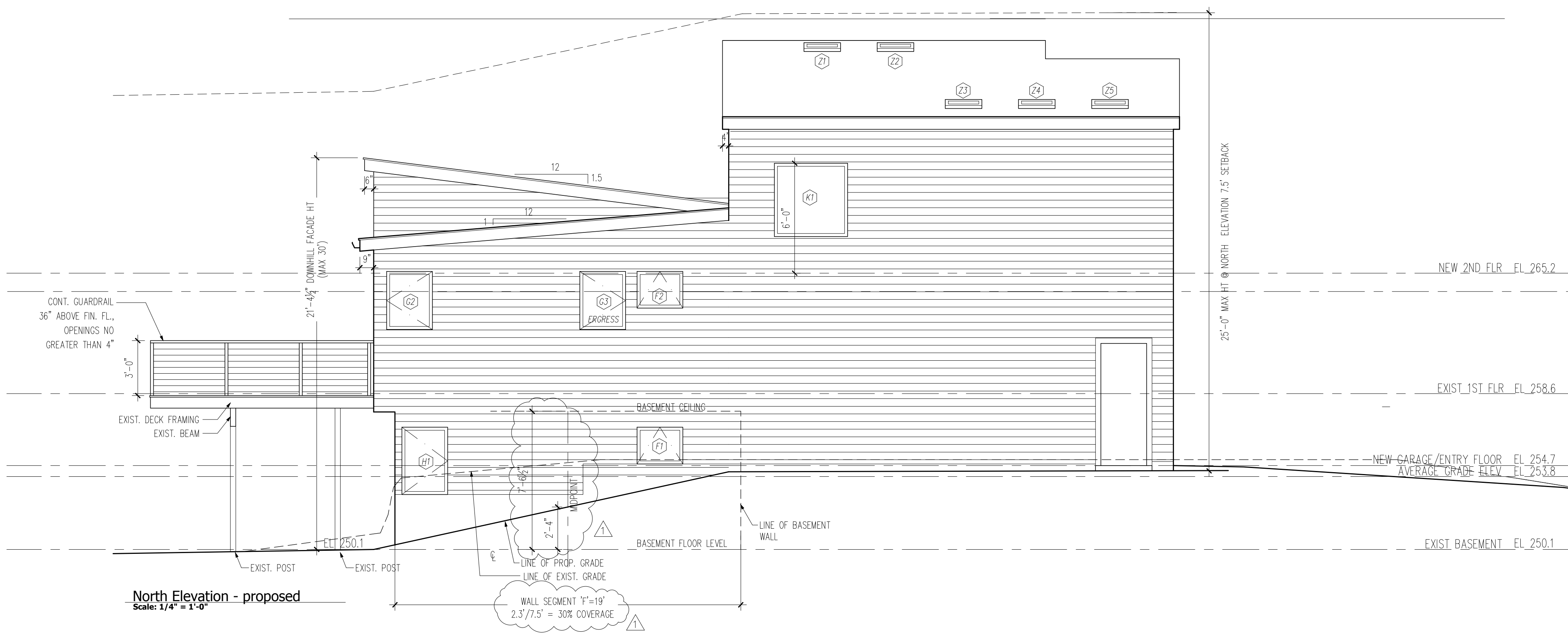
MIDPOINT ELEVATIONS	SECTION LENGTH
A = 254.4'	a = 24.3'
B = 254.4'	b = 2.3'
C = 252.4'	c = 18.25'
D = 250'	d = 49.3'
E = 258.6'	e = 27.1'
F = 258'	f = 19'
G = 257.9'	g = 11'
H = 254.7'	h = 7.2'
I = 254.7'	i = 4.5'
J = 254.7'	j = 25.4'

$$\frac{(Aa) + (Bb) + (Cc) + (Dd)}{a+b+c+d}$$

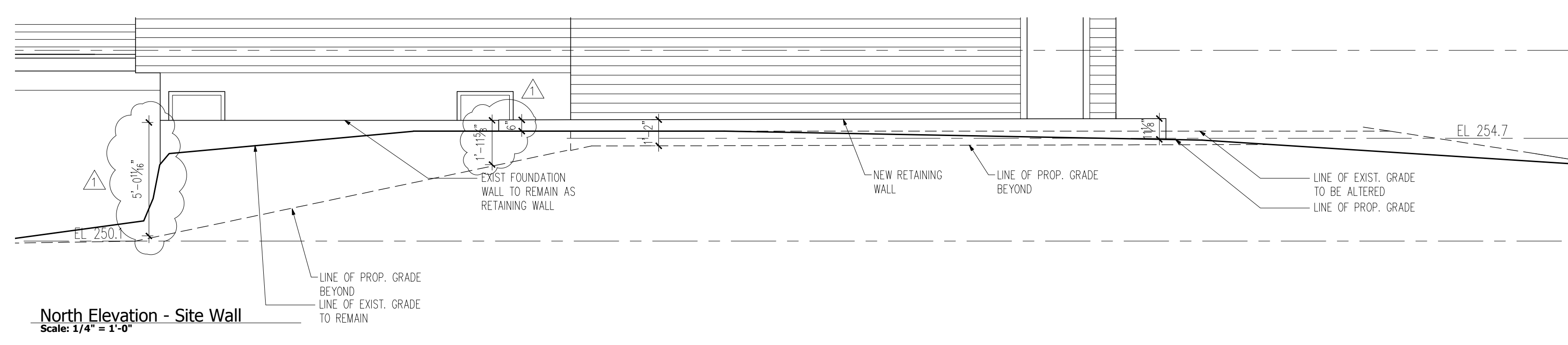
$$\frac{(6182) + (585) + (4606) + (12325) + (7008) + (4902) + (2837) + (1834) + (1146) + (6469)}{24.3 + 2.3 + 18.25 + 49.3 + 27.1 + 19 + 11 + 7.2 + 4.5 + 25.4}$$

$$\frac{47894}{188.65} = \text{AVE GRADE} = 253.8$$


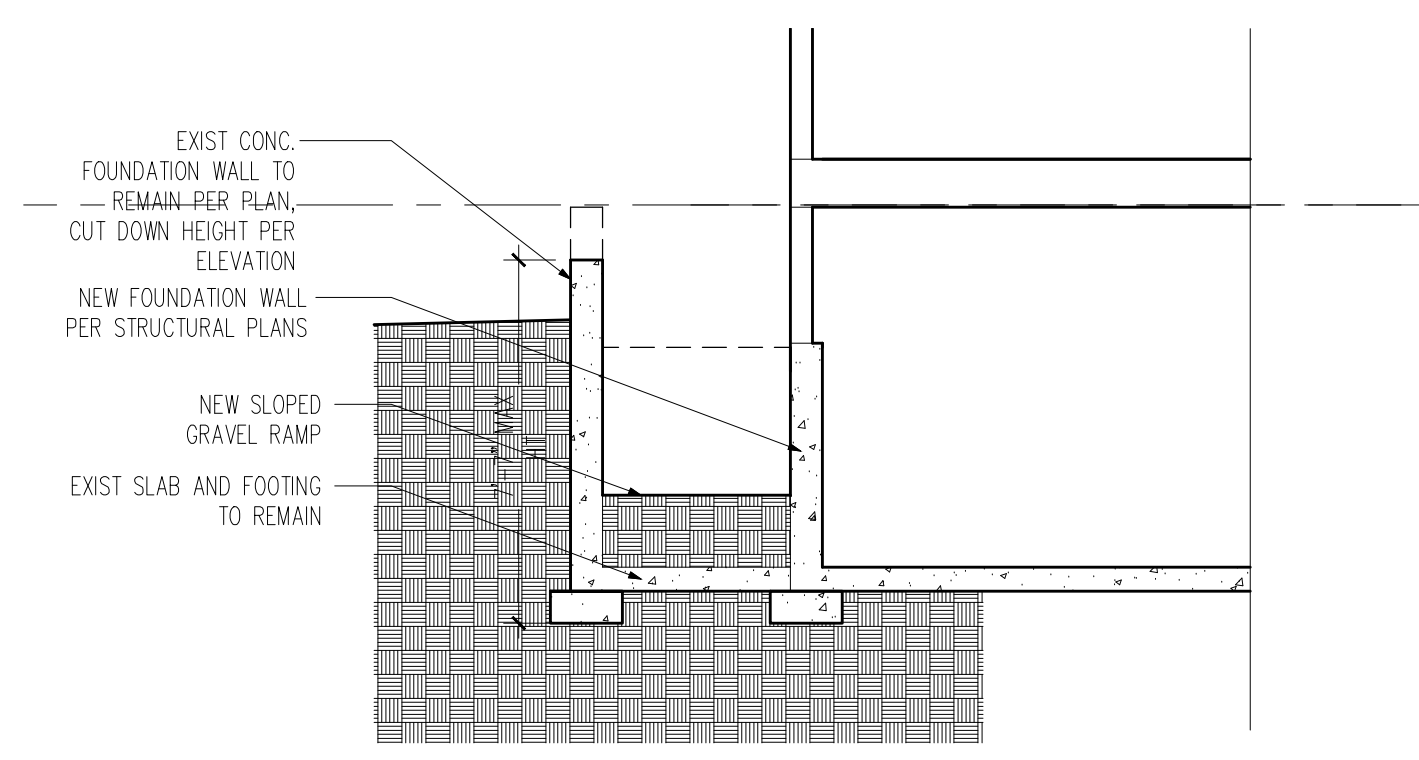
Average grade diagram
NOT TO SCALE



North Elevation - proposed
Scale: 1/4" = 1'-0"

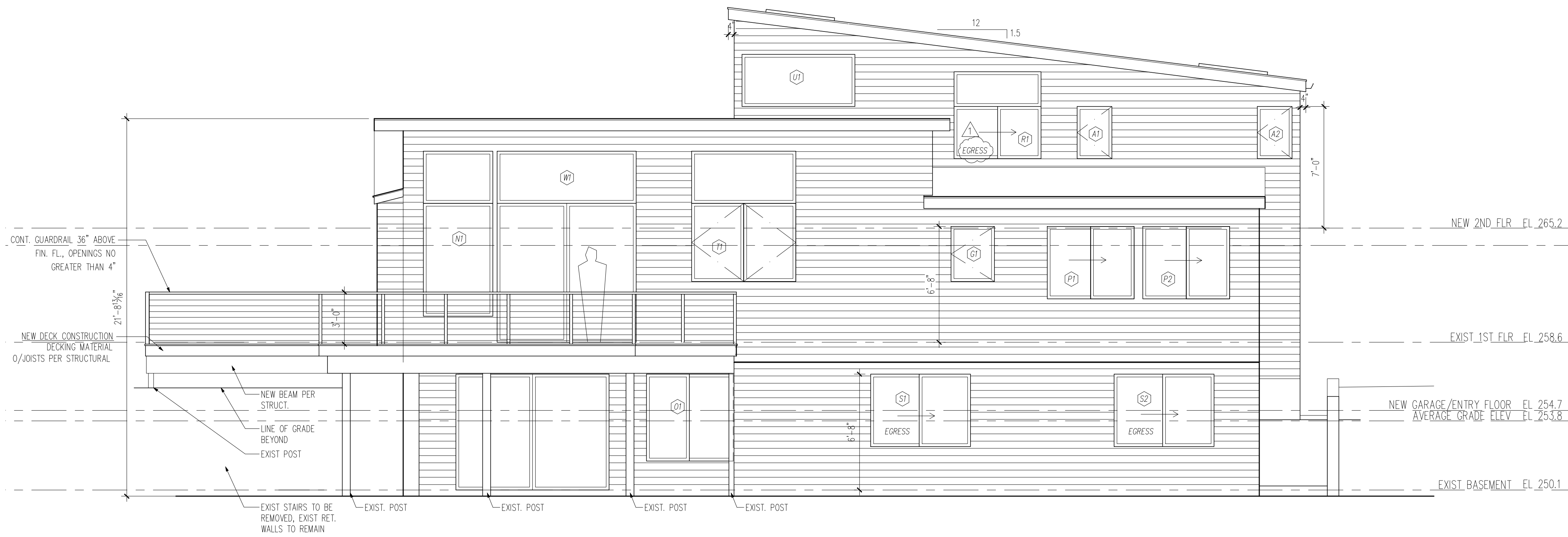


North Elevation - Site Wall
Scale: 1/4" = 1'-0"



North Elevation - Section at site wall
Scale: 1/4" = 1'-0"

MAX HEIGHT EL 265.2



WINDOW SCHEDULE

NUMBER/SIZE	TYPE	JAMB	U-VALUE	NOTES
A1	2'-0" X 3'-0"	CASEMENT	.30	
A2	2'-0" X 3'-0"	CASEMENT	.30	
B1	2'-0" X 5'-0"	FIXED	.30	
B2	2'-0" X 5'-0"	FIXED	.30	
B3	2'-0" X 5'-0"	FIXED	.30	
C1	2'-0" X 5'-6"	FIXED	.30	TEMPERED
D1	2'-0" X 7'-0"	5' FIXED OVER 2' AWNING	.30	TEMPERED
E1	3'-0" X 9'-10"	5'-2" FIXED OVER 4'-8" CSMNT	.30	EGRESS
F1	2'-6" X 2'-0"	AWNING	.30	
F2	2'-6" X 2'-0"	AWNING	.30	
G1	2'-6" X 3'-2"	CASEMENT	.30	
G2	2'-6" X 3'-2"	CASEMENT	.30	
G3	2'-6" X 3'-2"	CASEMENT	.30	EGRESS
H1	2'-6" X 3'-8"	CASEMENT	.30	
I1	3'-0" X 1'-10"	FIXED	.30	
J1	3'-0" X 2'-6"	AWNING	.30	
K1	4'-0" X 4'-0"	FIXED	.30	TEMPERED
L1	4'-0" X 5'-8"	FIXED	.30	TEMPERED
M1	4'-0" X 7'-0"	5' FIXED OVER 2' AWNING	.30	TEMPERED
N1	4'-0" X 9'-6"	3' FIXED OVER 6'-6" FIXED	.30	
O1	5'-0" X 5'-0"	SLIDER	.30	
P1	5'-0" X 4'-2"	SLIDER	.30	
P2	5'-0" X 4'-2"	SLIDER	.30	
Q1	5'-0" X 5'-6"	SLIDER	.30	EGRESS
Q2	5'-0" X 5'-6"	SLIDER	.30	EGRESS
R1	5'-0" X 5'-0"	2' FIXED OVER 3' SLIDER	.30	EGRESS
S1	5'-9" X 4'-2"	SLIDER	.30	EGRESS
S2	5'-9" X 4'-2"	SLIDER	.30	EGRESS
T1	6'-0" X 7'-6"	3' FIXED OVER 4'-6" SLIDER	.30	
U1	6'-6" X 3'-0"	FIXED	.30	
V1	6'-6" X VARIES	FIXED OVER 3'-2" AWNING	.30	
W1	8'-0" X 3'-0"	FIXED	.30	
X1	8'-0" X 7'-0"	PAIR OF 3'-6" FIXED	.30	TEMPERED
Y1	8'-0" X 4'-0"	TWO 2' CSMTS W/FIXED BTWN	.30	
Z1	2'-0" X 4'-0"	SKYLIGHT		
Z2	2'-0" X 4'-0"	SKYLIGHT		
Z3	2'-0" X 4'-0"	SKYLIGHT		
Z4	2'-0" X 4'-0"	SKYLIGHT		
Z5	2'-0" X 4'-0"	SKYLIGHT		

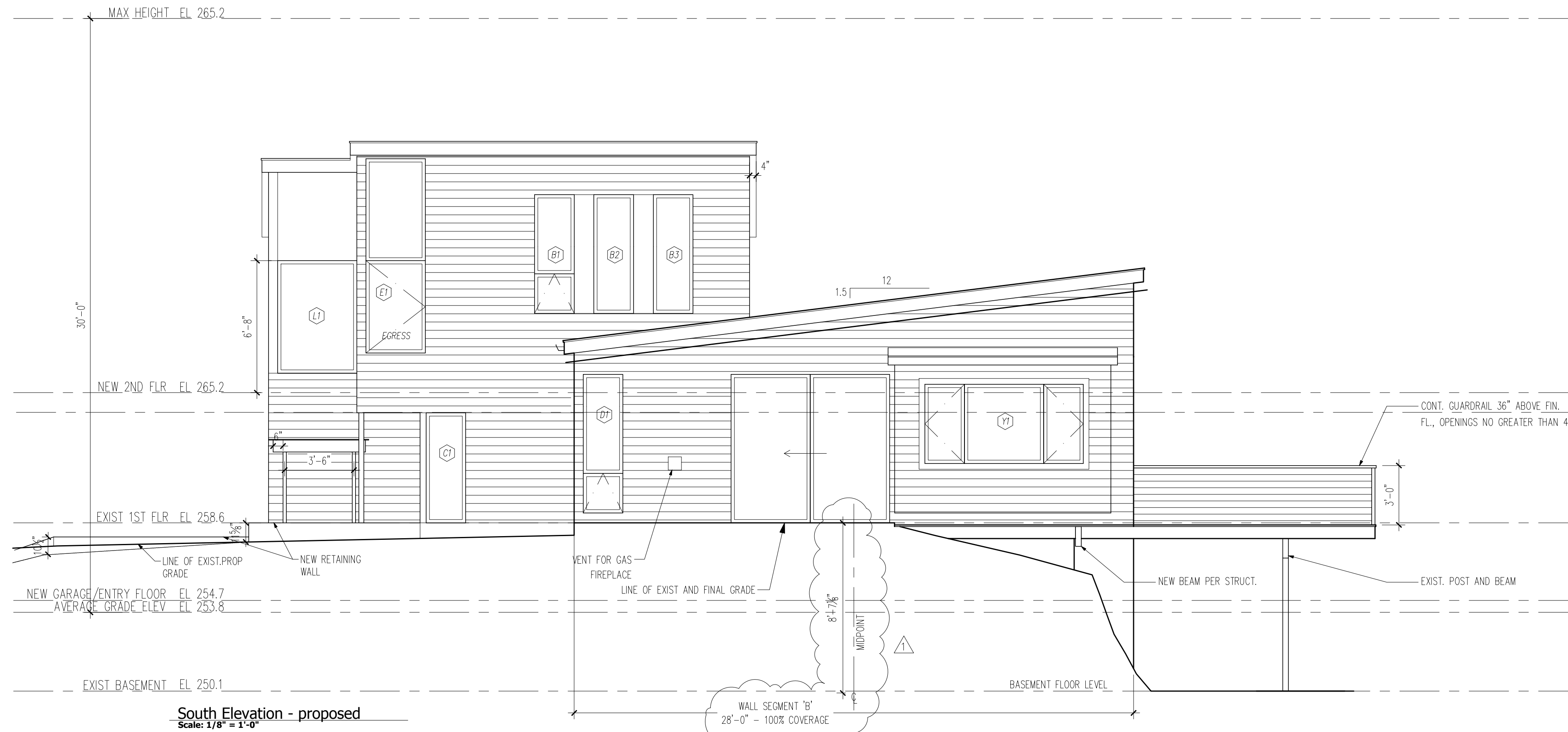
WINDOW GLAZING TOTAL
684.5

NOTE: VERIFY ALL SIZES IN FIELD MANUFACTURER TO BE DETERMINED WOOD CLAD OR FIBERGLASS UNITS W/ARGON FILLED LOW E DOUBLE GLAZING TO BE U VALUE .30 OR BETTER

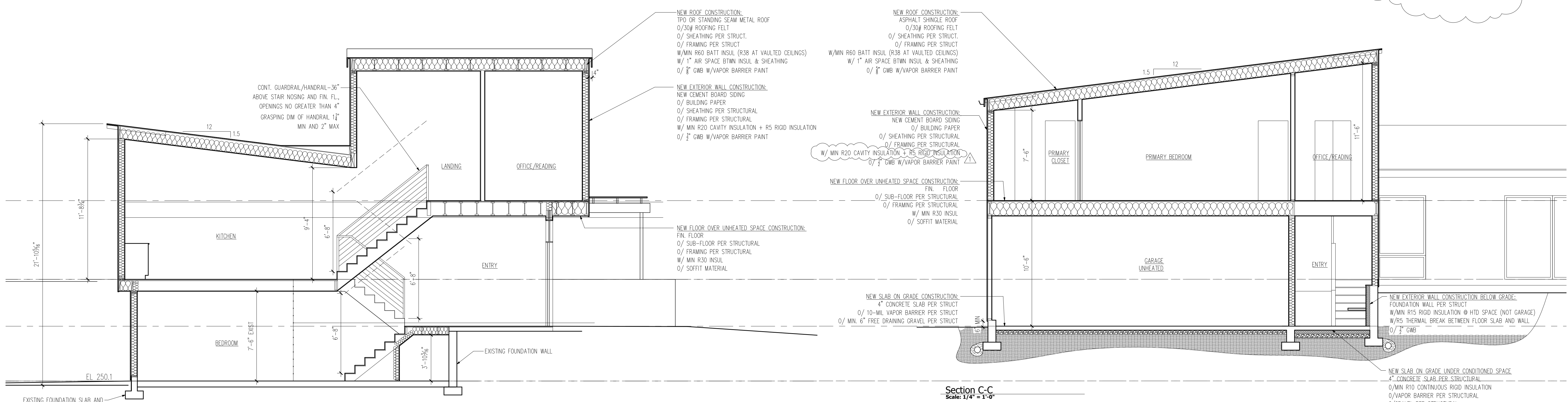
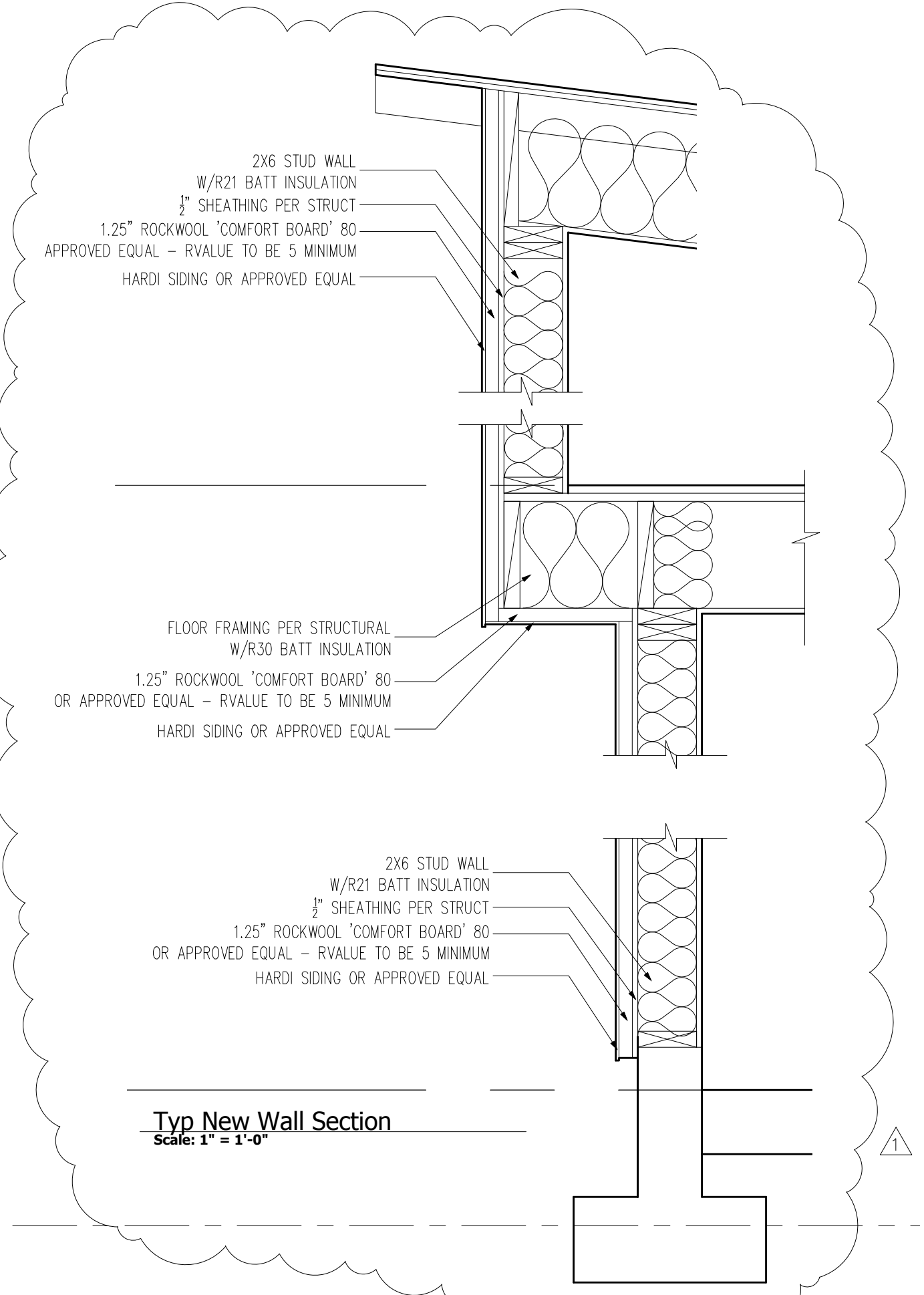
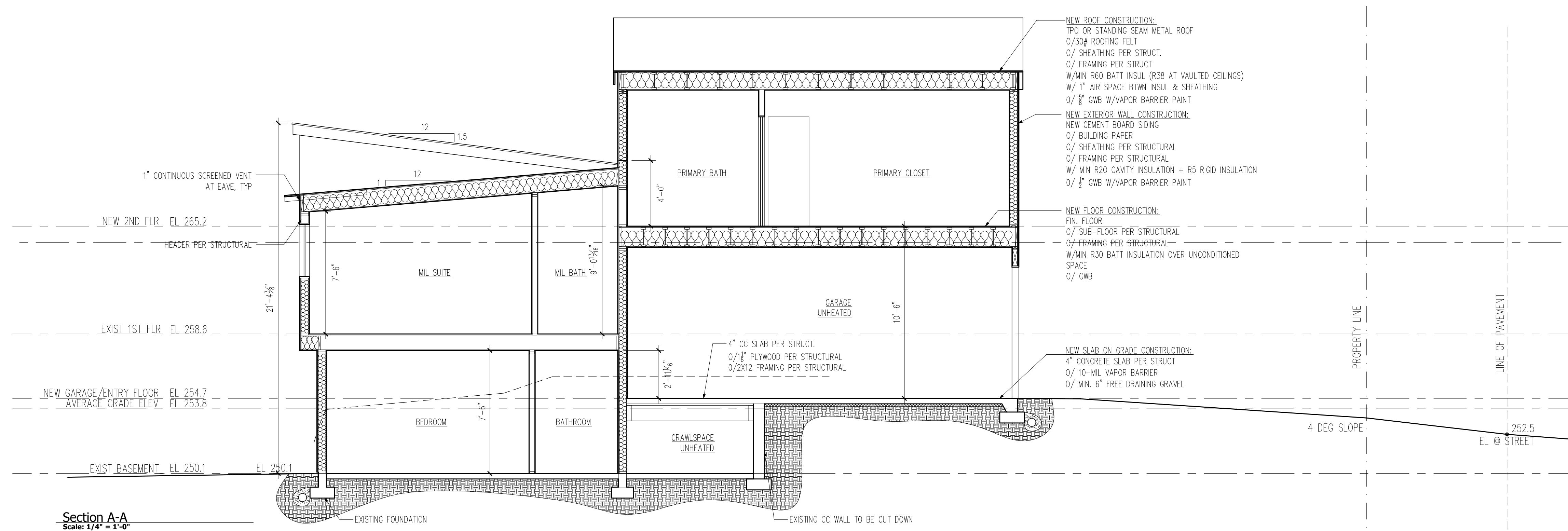
EXTERIOR DOOR SCHEDULE

NUMBER	LEAF SIZE	TYPE	THICKNESS	U-VALUE	NOTES	
30	100-1	4'-6" X 6'-8"	SLIDER	1-3/4"	.30	REPLACE EXISTING DOORS-PAIR OF SLIDING DOORS, GLASS LITES PER ELEVATIONS, CLAD, HARDWARE AND MANUFACTURER TBD
30	101-1	3'-0" X 7'-0"	SWING	1-3/4"	.30	STYLE TBD (ASSUME WOOD, SINGLE PANEL W/1 LITE)
30	101-2	4'-0" X 7'-6"	SLIDER	1-3/4"	.30	PAIR OF SLIDING DOORS, GLASS LITES PER ELEVATIONS, CLAD, HARDWARE AND MANUFACTURER TBD
30	101-3	4'-0" X 7'-6"	SLIDER	1-3/4"	.30	PAIR OF SLIDING DOORS, GLASS LITES PER ELEVATIONS, CLAD, HARDWARE AND MANUFACTURER TBD
30	101-4	2'-6" X 6'-8"	SWING	1-3/4"	.30	STYLE TBD (ASSUME SOLID WOOD, SINGLE PANEL)

East Elevation - proposed
Scale: 1/4" = 1'-0"



South Elevation - proposed
Scale: 1/8" = 1'-0"



Korpela + Wiens Residence
Proposed Building Sections

8441 SE 33rd Place
Mercer Island, WA
6.26.24
9.26.24

Jessyca Poole,
architect
7718 Fremont Ave N
Seattle, WA 98103
206.484.3802

A8

General Structural Notes

THE FOLLOWING APPLY UNLESS SHOWN OTHERWISE ON THE DRAWINGS

CRITERIA

- ALL MATERIALS, WORKMANSHIP, DESIGN, AND CONSTRUCTION SHALL CONFORM TO THE DRAWINGS, SPECIFICATIONS, AND THE INTERNATIONAL BUILDING CODE (2018 EDITION).
- DESIGN LOADING CRITERIA:
GARAGES
FLOOR LIVE LOAD (PASSENGER VEHICLES) 40 PSF
FLOOR CONCENTRATED LOAD (PASSENGER VEHICLES) 3000 LBS
HANDRAILS AND GUARDS
GUARDRAILS/BALCONY RAILS 50 PLF
GUARDRAILS/BALCONY RAILS CONCENTRATED LOAD 200 LBS
RESIDENTIAL – ONE AND TWO-FAMILY DWELLINGS
FLOOR LIVE LOAD 40 PSF
ROOF
ROOF LIVE LOAD 25 PSF
MISCELLANEOUS LOADS
DECKS 1.5 x AREA SERVED
PHOTOVOLTAIC PANEL SYSTEMS 5 PSF
DEFLECTION CRITERIA
LIVE LOAD DEFLECTION L/360
TOTAL LOAD DEFLECTION L/240
ENVIRONMENTAL LOADS
SNOW Ce=1.0, Is=1.0, Ct=1.1, Cs=1.0, Pg=25 PSF, Pf=20 PSF
WIND Gcpi=0.18, 98 MPH, RISK CATEGORY II, EXPOSURE "C"
EARTHQUAKE ANALYSIS PROCEDURE: EQUIVALENT LATERAL FORCE PROCEDURE
LATERAL SYSTEM: LIGHT FRAMED SHEAR WALLS,
SITE CLASS=D (DEFAULT), Ss=1.399, Sds=1.119, S1=0.487,
Sd1=0.883, Cs=0.172, SDC D, Ie=1.0, R=6.5
SEE PLANS FOR ADDITIONAL LOADING CRITERIA
- STRUCTURAL DRAWINGS SHALL BE USED IN CONJUNCTION WITH ARCHITECTURAL DRAWINGS FOR BIDDING AND CONSTRUCTION. ARCHITECTURAL DRAWINGS ARE THE PRIME CONTRACT DRAWINGS. ANY DISCREPANCIES FOUND AMONG THE DRAWINGS, THE SPECIFICATION, THESE GENERAL NOTES AND THE SITE CONDITIONS SHALL BE REPORTED TO THE ARCHITECT, WHO SHALL CORRECT SUCH DISCREPANCY IN WRITING. ANY WORK DONE BY THE GENERAL CONTRACTOR AFTER DISCOVERY OF SUCH DISCREPANCY SHALL BE DONE AT THE GENERAL CONTRACTOR'S RISK.
- PRIMARY STRUCTURAL ELEMENTS NOT DIMENSIONED ON THE STRUCTURAL PLANS AND DETAILS SHALL BE LOCATED BY THE ARCHITECTURAL PLANS AND DETAILS. VERTICAL DIMENSION CONTROL IS DEFINED BY THE ARCHITECTURAL WALL SECTIONS, BUILDING SECTION, AND PLANS. DETAILING AND SHOP DRAWING PRODUCTION FOR STRUCTURAL ELEMENTS WILL REQUIRE DIMENSIONAL INFORMATION CONTAINED IN BOTH ARCHITECTURAL AND STRUCTURAL DRAWINGS.
- CONTRACTOR SHALL BE RESPONSIBLE FOR ALL SAFETY PRECAUTIONS AND THE METHODS, TECHNIQUES, SEQUENCES OR PROCEDURES REQUIRED TO PERFORM THE CONTRACTORS WORK. THE STRUCTURAL ENGINEER HAS NO OVERALL SUPERVISORY AUTHORITY OR ACTUAL AND/OR DIRECT RESPONSIBILITY FOR THE SPECIFIC WORKING CONDITIONS AT THE SITE AND/OR FOR ANY HAZARDS RESULTING FROM THE ACTIONS OF ANY TRADE CONTRACTOR. THE STRUCTURAL ENGINEER HAS NO DUTY TO INSPECT, SUPERVISE, NOTE, CORRECT, OR REPORT ANY HEALTH OR SAFETY DEFICIENCIES TO THE OWNER, CONTRACTORS, OR OTHER ENTITIES OR PERSONS AT THE PROJECT SITE.
- CONTRACTOR SHALL PROVIDE TEMPORARY BRACING FOR THE STRUCTURE AND STRUCTURAL COMPONENTS UNTIL ALL FINAL CONNECTIONS HAVE BEEN COMPLETED IN ACCORDANCE WITH THE PLANS. CONFORM TO ASCE 37-14 "DESIGN LOADS ON STRUCTURES DURING CONSTRUCTION".
- CONTRACTOR-INITIATED CHANGES SHALL BE SUBMITTED IN WRITING TO THE ARCHITECT AND STRUCTURAL ENGINEER FOR APPROVAL PRIOR TO FABRICATION OR CONSTRUCTION. CHANGES SHOWN ON SHOP DRAWINGS ONLY WILL NOT SATISFY THIS REQUIREMENT.
- DRAWINGS INDICATE GENERAL AND TYPICAL DETAILS OF CONSTRUCTION. WHERE CONDITIONS ARE NOT SPECIFICALLY INDICATED BUT ARE OF SIMILAR CHARACTER TO DETAILS SHOWN, SIMILAR DETAILS OF CONSTRUCTION SHALL BE USED, SUBJECT TO REVIEW AND APPROVAL BY THE ARCHITECT AND THE STRUCTURAL ENGINEER. ALL TYPICAL NOTES AND DETAILS SHOWN ON DRAWINGS SHALL APPLY, UNLESS NOTED OTHERWISE. TYPICAL DETAILS MAY NOT NECESSARILY BE INDICATED ON THE PLANS BUT SHALL STILL APPLY AS SHOWN OR DESCRIBED IN THE DETAILS. WHERE TYPICAL DETAILS ARE NOTED ON THE PLANS, THE SPECIFIED TYPICAL DETAIL SHALL BE USED. WHERE NO TYPICAL DETAIL IS NOTED, IT SHALL BE THE CONTRACTOR'S RESPONSIBILITY TO CHOOSE THE APPROPRIATE TYPICAL DETAIL FROM THOSE PROVIDED OR REQUEST ADDITIONAL INFORMATION. THE CONTRACTOR SHALL SUBMIT ALL PROPOSED ALTERNATE TYPICAL DETAILS TO THOSE PROVIDED WITH RELATED CALCULATIONS TO THE ENGINEER FOR APPROVAL PRIOR TO SHOP DRAWING PRODUCTION AND FIELD USE.
- ALL STRUCTURAL SYSTEMS, WHICH ARE TO BE COMPOSED OF COMPONENTS TO BE FIELD ERCTED, SHALL BE SUPERVISED BY THE SUPPLIER DURING MANUFACTURING, DELIVERY, HANDLING, STORAGE AND ERECTION IN ACCORDANCE WITH INSTRUCTIONS PREPARED BY THE SUPPLIER.
- SHOP DRAWINGS FOR THE FOLLOWING ITEMS SHALL BE SUBMITTED TO THE ARCHITECT AND STRUCTURAL ENGINEER FOR REVIEW PRIOR TO FABRICATION OF THESE ITEMS.

GLUED LAMINATED MEMBERS
MANUFACTURED LUMBER (PSL'S, LSL'S, LVL'S)
PLYWOOD WEB JOISTS
STRUCTURAL STEEL

- SHOP DRAWING REVIEW: DIMENSIONS AND QUANTITIES ARE NOT REVIEWED BY THE ENGINEER OF RECORD, THEREFORE MUST BE VERIFIED BY THE CONTRACTOR. CONTRACTOR SHALL REVIEW AND STAMP DRAWINGS PRIOR TO REVIEW BY ENGINEER OF RECORD. CONTRACTOR SHALL REVIEW DRAWINGS FOR CONFORMANCE WITH THE MEANS, METHODS, TECHNIQUES, SEQUENCES AND OPERATIONS OF CONSTRUCTION, AND ALL SAFETY PRECAUTIONS AND PROGRAMS INCIDENTAL THERETO. SUBMITTALS SHALL INCLUDE A REPRODUCIBLE AND ONE COPY; REPRODUCIBLE WILL BE MARKED AND RETURNED WITHIN TWO WEEKS OF RECEIPT WITH A NOTATION INDICATING THAT THE SUBMITTAL HAS BEEN FOUND TO BE IN GENERAL CONFORMANCE WITH THE DESIGN OF THE BUILDING. THE SUBMITTED ITEMS SHALL NOT BE INSTALLED UNTIL THEY HAVE BEEN APPROVED BY THE BUILDING OFFICIAL.

SHOP DRAWING SUBMITTALS PROCESSED BY THE ENGINEER ARE NOT CHANGE ORDERS. THE PURPOSE OF SHOP DRAWING SUBMITTALS BY THE CONTRACTOR IS TO DEMONSTRATE TO THE ENGINEER THAT THE CONTRACTOR UNDERSTANDS THE DESIGN CONCEPT, BY INDICATING WHICH MATERIAL IS INTENDED TO BE FURNISHED AND INSTALLED AND BY DETAILING THE INTENDED FABRICATION AND INSTALLATION METHODS. IF DEVIATIONS, DISCREPANCIES, OR CONFLICTS BETWEEN SHOP DRAWING SUBMITTALS AND THE CONTRACT DOCUMENTS ARE DISCOVERED EITHER PRIOR TO OR AFTER SHOP DRAWING SUBMITTALS ARE PROCESSED BY THE ENGINEER, THE DESIGN DRAWINGS AND SPECIFICATIONS SHALL CONTROL AND SHALL BE FOLLOWED.

- SHOP DRAWINGS OF DESIGN BUILD COMPONENTS INCLUDING CANOPIES, BALCONIES, COLD FORM STEEL FRAMING, TEMPORARY SHORING, CURTAIN WALL SYSTEMS, SKYLIGHT FRAMES, PREFABRICATED STAIR SYSTEMS, EXTERIOR CLADDING, AND PRE-ENGINEERED SYSTEMS SHALL BE STAMPED, AND SIGNED BY A STRUCTURAL ENGINEER LICENSED IN THE STATE OF WASHINGTON. SHOP DRAWINGS SHALL BE APPROVED BY THE COMPONENT DESIGNER PRIOR TO REVIEW OF THE ARCHITECT OR ENGINEER OF RECORD FOR GENERAL CONFORMANCE WITH THE DESIGN OF THE BUILDING. THE COMPONENT DESIGNER IS RESPONSIBLE FOR CODE CONFORMANCE AND ALL NECESSARY CONNECTIONS NOT SPECIFICALLY CALLED OUT ON ARCHITECTURAL OR STRUCTURAL DRAWINGS. SHOP DRAWINGS SHALL INDICATE MAGNITUDE AND DIRECTION OF ALL LOADS IMPOSED ON BASIC STRUCTURE. DESIGN CALCULATIONS SHALL BE SUBMITTED WITH THE SHOP DRAWINGS.

QUALITY ASSURANCE

- SPECIAL INSPECTION SHALL BE PROVIDED IN ACCORDANCE WITH THE PROJECT SPECIFICATIONS AND SECTIONS 110 AND 1705 OF THE INTERNATIONAL BUILDING CODE BY A QUALIFIED TESTING AGENCY DESIGNATED BY THE ARCHITECT, AND RETAINED BY THE BUILDING OWNER. THE ARCHITECT, STRUCTURAL ENGINEER, AND BUILDING DEPARTMENT SHALL BE FURNISHED WITH COPIES OF ALL INSPECTION AND TEST RESULTS. SPECIAL INSPECTION OF THE FOLLOWING TYPES OF CONSTRUCTION IS REQUIRED UNLESS NOTED OTHERWISE.

STRUCTURAL STEEL FABRICATION AND ERECTION PER AISC 360
SOIL CONDITIONS, FILL PLACEMENT, AND DENSITY PER TABLE 1705.6
EXPANSION BOLTS AND THREADED EXPANSION INSERTS PER MANUFACTURER
EPOXY GROUTED INSTALLATIONS PER MANUFACTURER

PERIODIC INSPECTION: INSPECTION SHALL BE PERFORMED AT INTERVALS NECESSARY TO CONFIRM THAT WORK REQUIRING SPECIAL INSPECTION IS IN COMPLIANCE WITH REQUIREMENTS.
CONTINUOUS INSPECTION: INSPECTOR SHALL BE ONSITE AND OBSERVE THE WORK REQUIRING INSPECTION AT ALL TIMES THAT WORK IS PERFORMED.

- UNLESS OTHERWISE NOTED, THE FOLLOWING ELEMENTS COMPRISE THE SEISMIC-FORCE-RESISTING SYSTEM AND ARE SUBJECT TO SPECIAL INSPECTION FOR SEISMIC RESISTANCE IN ACCORDANCE WITH SECTION 1705.12 OF THE INTERNATIONAL BUILDING CODE.

A. STRUCTURAL WOOD SHEAR WALL SYSTEMS REQUIRE PERIODIC INSPECTION FOR FIELD GLUING, NAILING, BOLTING, ANCHORING AND OTHER FASTENING OF COMPONENTS WITHIN THE SEISMIC FORCE, RESISTING SYSTEM INCLUDING SHEAR WALLS, DIAPHRAGMS, DRAG STRUTS, BRACES AND HOLDOWNS.

GEOTECHNICAL

- FOUNDATION NOTES: SUBGRADE PREPARATION INCLUDING DRAINAGE, EXCAVATION, COMPACTION, AND FILLING REQUIREMENTS, SHALL CONFORM STRICTLY WITH RECOMMENDATIONS GIVEN IN THE SOILS REPORT OR AS DIRECTED BY THE SOILS ENGINEER. FOOTINGS SHALL BEAR ON SOLID UNDISTURBED EARTH OR COMPACTED STRUCTURAL FILL AT LEAST 18" BELOW LOWEST ADJACENT FINISHED GRADE. FOOTING DEPTHS/ELEVATIONS SHOWN ON PLANS (OR IN DETAILS) ARE MINIMUM AND FOR GUIDANCE ONLY; THE ACTUAL ELEVATIONS OF FOOTINGS MUST BE ESTABLISHED BY THE CONTRACTOR IN THE FIELD WORKING WITH THE TESTING LAB AND SOILS ENGINEER. BACKFILL BEHIND ALL RETAINING WALLS WITH FREE DRAINING GRANULAR FILL AND PROVIDE FOR SUBSURFACE DRAINAGE AS NOTED IN THE SOILS REPORT.

ALLOWABLE SOIL PRESSURE (NATIVE SOILS / STRUCTURAL FILL) 2500/2000 PSF
LATERAL EARTH PRESSURE (RESTRAINED/UNRESTRAINED) 55 PCF/35 PCF
ALLOWABLE PASSIVE EARTH PRESSURE (FS OF 1.5 INCLUDED) 300 PCF
COEFFICIENT OF FRICTION (FS OF 1.5 INCLUDED) 0.3
SEISMIC SURCHARGE PRESSURE (UNIFORM LOAD) 8H PSF

SOILS REPORT REFERENCE: GEOTECHNICAL ENGINEERING REPORT PREPARED BY ZIPPERGEO DATED NOVEMBER 28 2023 PROJECT NO. 2727.01

RENOVATION

- DEMOLITION: CONTRACTOR SHALL VERIFY ALL EXISTING CONDITIONS BEFORE COMMENCING ANY DEMOLITION. SHORING SHALL BE INSTALLED TO SUPPORT EXISTING CONSTRUCTION AS REQUIRED AND IN A MANNER SUITABLE TO THE WORK SEQUENCES. DEMOLITION DEBRIS SHALL NOT BE ALLOWED TO DAMAGE OR OVERLOAD THE EXISTING STRUCTURE. LIMIT CONSTRUCTION LOADING (INCLUDING DEMOLITION DEBRIS) ON EXISTING FLOOR SYSTEMS TO 40 PSF.

- CONTRACTOR SHALL VERIFY ALL EXISTING DIMENSIONS, MEMBER SIZES, AND CONDITIONS PRIOR TO COMMENCING ANY WORK. ALL DIMENSIONS OF EXISTING CONSTRUCTION SHOWN ON THE DRAWINGS ARE INTENDED AS GUIDELINES ONLY AND MUST BE VERIFIED. THE CONTRACTOR SHALL NOTIFY THE ARCHITECT AND STRUCTURAL ENGINEER IF EXISTING CONDITIONS DETERMINED DURING WORK VARY FROM THE EXISTING CONSTRUCTION SHOWN ON THE DRAWINGS.

- EXISTING REINFORCING SHALL BE SAVED WHERE AND AS NOTED ON THE PLANS. SAW CUTTING, IF AND WHERE USED, SHALL NOT CUT EXISTING REINFORCING THAT IS TO BE SAVED.

- ALL NEW OPENINGS THROUGH EXISTING WALLS, SLABS AND BEAMS SHALL BE ACCOMPLISHED BY SAW CUTTING WHEREVER POSSIBLE. CORNERS SHALL NOT BE OVERT CUT.
- CONTRACTOR SHALL VERIFY ALL EXISTING CONDITIONS AND LOCATION OF MEMBERS PRIOR TO CUTTING ANY OPENINGS.
- SMALL ROUND OPENINGS SHALL BE ACCOMPLISHED BY CORE DRILLING.
- WHERE NEW REINFORCING TERMINATES AT EXISTING CONCRETE, DRILL AND EPOXY DOWELS MATCHING THE NEW REINFORCING INTO THE EXISTING CONCRETE WITH 6" EMBED, UNLESS OTHERWISE NOTED ON PLANS.

- CONTRACTOR SHALL CHECK FOR DRY ROT AT ALL AREAS OF NEW WORK. ALL ROT SHALL BE REMOVED AND DAMAGED MEMBERS SHALL BE REPLACED OR REPAIRED AS DIRECTED BY THE STRUCTURAL ENGINEER OR ARCHITECT.

CONCRETE

- CONCRETE SHALL BE MIXED, PROPORTIONED, CONVEYED AND PLACED IN ACCORDANCE WITH ACI 301, INCLUDING TESTING PROCEDURES. CONCRETE SHALL ATTAIN A 28-DAY STRENGTH OF f'c = 3,000 PSI AND MIX SHALL CONTAIN NOT LESS THAN 5-1/2 SACKS OF CEMENT PER CUBIC YARD AND SHALL BE PROPORTIONED TO PRODUCE A SLUMP OF 5" OR LESS. REQUIRED CONCRETE STRENGTH IS BASED ON THE DURABILITY REQUIREMENTS OF SECTION 1904 OF THE IBC. DESIGN STRENGTH IS f'c = 2,500 PSI.

- ALL CONCRETE WITH SURFACES EXPOSED TO WEATHER OR STANDING WATER SHALL BE AIR-ENTRAINED WITH AN AIR-ENTRAINING AGENT CONFORMING TO ASTM C260, C494, AND C618. TOTAL AIR CONTENT FOR FROST-RESISTANT CONCRETE SHALL BE IN ACCORDANCE WITH ACI 318-14, TABLE 19.3.2.1 MODERATE EXPOSURE, F1.

- REINFORCING STEEL SHALL CONFORM TO ASTM A615 (INCLUDING SUPPLEMENT S1), GRADE 60, FY = 60,000 PSI. EXCEPTIONS: ANY BARS SPECIFICALLY SO NOTED ON THE DRAWINGS SHALL BE GRADE 40, FY = 40,000 PSI. WELDED WIRE FABRIC SHALL CONFORM TO ASTM A-185. SPIRAL REINFORCEMENT SHALL BE DEFORMED WIRE CONFORMING TO ASTM A615, GRADE 60, FY = 60,000 PSI.

- DETAILING OF REINFORCING STEEL (INCLUDING HOOKS AND BENDS) SHALL BE IN ACCORDANCE WITH ACI 315R-18 AND 318-14. LAP ALL CONTINUOUS REINFORCEMENT #5 AND SMALLER 40 BAR DIAMETERS OR 2'-0" MINIMUM. PROVIDE CORNER BARS AT ALL WALL AND FOOTING INTERSECTIONS. LAP CORNER BARS #5 AND SMALLER 40 BAR DIAMETERS OR 2'-0" MINIMUM. LAPS OF LARGER BARS SHALL BE MADE IN ACCORDANCE WITH ACI 318-14, CLASS B. LAP ADJACENT MATS OF WELDED WIRE FABRIC A MINIMUM OF 8" AT SIDES AND ENDS.

NO BARS PARTIALLY EMBEDDED IN HARDENED CONCRETE SHALL BE FIELD BENT UNLESS SPECIFICALLY SO DETAILED OR APPROVED BY THE STRUCTURAL ENGINEER.

- CONCRETE PROTECTION (COVER) FOR REINFORCING STEEL SHALL BE AS FOLLOWS:

FOOTINGS AND OTHER UNFORMED SURFACES CAST AGAINST AND PERMANENTLY EXPOSED TO EARTH 3"
FORMED SURFACES EXPOSED TO EARTH OR WEATHER (#6 BARS OR LARGER) 2"
FORMED SURFACES EXPOSED TO EARTH OR WEATHER (#5 BARS OR SMALLER) 1-1/2"
COLUMN TIES OR SPIRALS AND BEAM STIRRUPS 1-1/2"
SLABS AND WALLS (INT. FACE) GREATER OF BAR DIAMETER PLUS 1/8" OR 3/4"

- CONCRETE WALL REINFORCING--PROVIDE THE FOLLOWING UNLESS DETAILED OTHERWISE:

6" WALLS #4 @ 16 HORIZ. #4 @ 18 VERTICAL 1 CURTAIN
8" WALLS #4 @ 12 HORIZ. #4 @ 18 VERTICAL 1 CURTAIN
10" WALLS #4 @ 18 HORIZ. #4 @ 18 VERTICAL 2 CURTAINS
12" WALLS #4 @ 16 HORIZ. #4 @ 18 VERTICAL 2 CURTAINS

- CAST-IN-PLACE CONCRETE: SEE ARCHITECTURAL DRAWINGS FOR EXACT LOCATIONS AND DIMENSIONS OF DOOR AND WINDOW OPENINGS IN ALL CONCRETE WALLS. SEE MECHANICAL DRAWINGS FOR SIZE AND LOCATION OF MISCELLANEOUS MECHANICAL OPENINGS THROUGH CONCRETE WALLS. SEE ARCHITECTURAL DRAWINGS FOR ALL GROOVES, NOTCHES, CHAMFERS, FEATURE STRIPS, COLOR, TEXTURE, AND OTHER FINISH DETAILS AT ALL EXPOSED CONCRETE SURFACES, BOTH CAST-IN-PLACE AND PRECAST.

- NON-SHRINK GROUT SHALL BE FURNISHED BY AN APPROVED MANUFACTURER AND SHALL BE MIXED AND PLACED IN STRICT ACCORDANCE WITH THE MANUFACTURER'S PUBLISHED RECOMMENDATIONS. GROUT STRENGTH SHALL BE AT LEAST EQUAL TO THE MATERIAL ON WHICH IT IS PLACED (3000 PSI MINIMUM).

ANCHORAGE

- EXPANSION BOLTS INTO CONCRETE SHALL BE "STRONG-BOLT 2" WEDGE ANCHORS AS MANUFACTURED BY THE SIMPSON STRONG TIE COMPANY AND INSTALLED IN STRICT CONFORMANCE TO ICC-ES REPORT NUMBER ESR-3037, INCLUDING MINIMUM EMBEDMENT REQUIREMENTS. BOLTS INTO CONCRETE MASONRY OR BRICK MASONRY UNITS SHALL BE INTO FULLY GROUTED CELLS. PERIODIC SPECIAL INSPECTION IS REQUIRED TO VERIFY ANCHOR TYPE, ANCHOR DIMENSIONS, ANCHOR LOCATION, TIGHTENING TORQUE, HOLE DIMENSIONS, ANCHOR EMBEDMENT, AND ADHERENCE TO THE INSTALLATION INSTRUCTIONS.

- EPOXY-GROUTED ITEMS (THREADED RODS OR REINFORCING BAR) INTO CONCRETE SPECIFIED ON THE DRAWINGS SHALL BE INSTALLED USING "SET-36" HIGH STRENGTH EPOXY AS MANUFACTURED BY THE SIMPSON STRONG TIE COMPANY. INSTALL IN STRICT ACCORDANCE WITH ICC-ES REPORT NO. ESR-4057. MINIMUM BASE MATERIAL TEMPERATURE IS 40 DEGREES F. RODS SHALL BE ASTM A-36 UNLESS OTHERWISE NOTED. PERIODIC SPECIAL INSPECTION OF INSTALLATION IS REQUIRED TO VERIFY ANCHOR OR EMBEDDED BAR TYPE AND DIMENSIONS, LOCATION, ADHESIVE IDENTIFICATION AND EXPIRATION, HOLE DIMENSIONS, HOLE CLEANING PROCEDURE, ANCHOR EMBEDMENT, AND ADHERENCE TO THE INSTALLATION INSTRUCTIONS. CONTINUOUS SPECIAL INSPECTION IS REQUIRED FOR HORIZONTAL AND OVERHEAD INSTALLATIONS.

- CONCRETE SCREW ANCHORS INTO CONCRETE AND CONCRETE MASONRY UNITS SHALL BE "TITEN HD" HEAVY DUTY SCREW ANCHOR AS MANUFACTURED BY THE SIMPSON STRONG-TIE COMPANY, INSTALLED IN STRICT ACCORDANCE WITH ICC-ES REPORT NO. ESR-2713 (CONCRETE), NO. ESR-1056 (CMU), INCLUDING MINIMUM EMBEDMENT REQUIREMENTS. SCREW ANCHORS INTO CONCRETE MASONRY UNITS SHALL BE INTO FULLY GROUTED CELLS. SPECIAL INSPECTION IS REQUIRED.

STEEL

- STRUCTURAL STEEL DESIGN, FABRICATION, AND ERECTION SHALL BE BASED ON:

- AISC 360-16 AND SECTION 2205.2 OF THE INTERNATIONAL BUILDING CODE.
- JUNE 15, 2016 AISC CODE OF STANDARD PRACTICE FOR STEEL BUILDINGS AND BRIDGES AMENDED AS FOLLOWS: AS NOTED IN THE CONTRACT DOCUMENTS, BY THE DELETION OF PARAGRAPH 4.4.1, AND REVISE REFERENCE FROM "STRUCTURAL DESIGN DRAWINGS" TO "CONTRACT DOCUMENTS" IN PARAGRAPH 3.1.
- SPECIFICATION FOR STRUCTURAL JOINTS USING ASTM A325 OR A490 BOLTS.

- STRUCTURAL STEEL SHALL CONFORM TO THE FOLLOWING REQUIREMENTS:

TYPE OF MEMBER	ASTM SPECIFICATION	FY
A. WIDE FLANGE SHAPES	A992	50 KSI
B. OTHER SHAPES, PLATES, AND RODS	A36	36 KSI
C. OTHER SHAPES AND PLATES (NOTED GRADE 50 ON PLANS)	A572 (GRADE 50)	50 KSI
D. PIPE COLUMNS	A53 (E OR S, GR. B)	35 KSI
E. STRUCTURAL TUBING	A500 (GR. C)	
-SQUARE OR RECTANGULAR		50 KSI
-ROUND		46 KSI
-ANY SHAPE	ASTM A1085	50 KSI
F. CONNECTION BOLTS (3/4" ROUND, UNLESS SHOWN OTHERWISE)	A325-N	

- ARCHITECTURALLY EXPOSED STRUCTURAL STEEL SHALL CONFORM TO SECTION 10 OF THE AISC CODE OF STANDARD PRACTICE FOR STEEL BUILDINGS AND BRIDGES.

- ALL STEEL EXPOSED TO THE WEATHER OR IN CONTACT WITH GROUND SHALL BE CORROSION PROTECTED BY GALVANIZATION OR PROVIDED WITH EXTERIOR PAINT SYSTEM, UNLESS OTHERWISE NOTED.

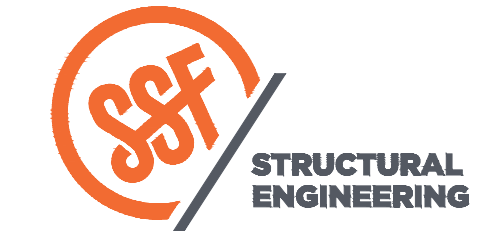
- SHOP PRIME ALL STEEL EXCEPT:

- STEEL ENCASED IN CONCRETE.
- SURFACES TO BE WELDED.
- CONTACT SURFACES AT HIGH-STRENGTH BOLTS.
- MEMBERS TO BE GALVANIZED.
- MEMBERS WHICH WILL BE CONCEALED BY INTERIOR FINISHES.
- SURFACES TO RECEIVE SPRAYED FIREPROOFING.
- SURFACES TO RECEIVE OTHER SPECIAL SHOP PRIMERS.

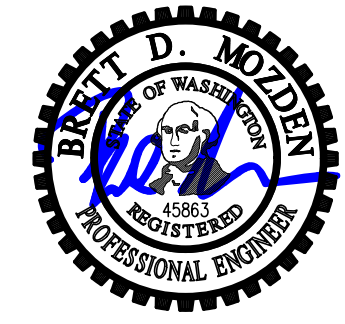
- ALL A-325N CONNECTION BOLTS NEED ONLY BE TIGHTENED TO A SNUG TIGHT CONDITION, DEFINED AS THE TIGHTNESS THAT EXISTS WHEN ALL PLIES IN A JOINT ARE IN FIRM CONTACT. THIS MAY BE ATTAINED BY A FEW IMPACTS OF AN IMPACT WRENCH OR THE FULL EFFORT OF AN IRONWORKER USING AN ORDINARY SPUD WRENCH.

- ALL ANCHORS EMBEDDED IN CONCRETE SHALL BE A307 HEADED BOLTS OR A36 THREADED ROD WITH AN ASTM 563 HEAVY HEX NUT TACK WELDED ON THE EMBEDDED END.

- ALL WELDING SHALL BE IN CONFORMANCE WITH AISC AND AWS STANDARDS AND SHALL BE PERFORMED BY WABO CERTIFIED WELDERS USING E70XX ELECTRODES. ONLY PREQUALIFIED WELDS (AS DEFINED BY AWS) SHALL BE USED. ALL COMPLETE JOINT PENETRATION GROOVE WELDS SHALL BE MADE WITH A FILLER MATERIAL THAT HAS A MINIMUM CVN TOUGHNESS OF 20 FT-LBS AT -20 DEGREES F AND 40 FT - LBS AT 70 DEGREES F, AS DETERMINED BY AWS CLASSIFICATION OR MANUFACTURER CERTIFICATION.



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DRAWN:	CFG
DESIGN:	BDM
CHECKED:	BDM
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REVISIONS:		
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SHEET TITLE:
**General
Structural
Notes**

SCALE:
DATE: Dec. 14, 2023
PROJECT NO: 02327-2023-04
SHEET NO:

S1.1

General Structural Notes Continued
THE FOLLOWING APPLY UNLESS SHOWN OTHERWISE ON THE DRAWINGS

WOOD

39. FRAMING LUMBER SHALL BE S-DRY, KD, OR MC-19, AND GRADED AND MARKED IN CONFORMANCE WITH WCLB STANDARD No. 17, GRADING RULES FOR WEST COAST LUMBER, 2018, OR WMPA STANDARD, WESTERN LUMBER GRADING RULES 2017. FURNISH TO THE FOLLOWING MINIMUM STANDARDS:

JOISTS AND BEAMS	(2X & 3X MEMBERS)	HEM-FIR NO. 2 MINIMUM BASE VALUE, Fb = 850 PSI
	(4X MEMBERS)	DOUGLAS FIR-LARCH NO. 1 MINIMUM BASE VALUE, Fb = 1000 PSI
BEAMS	(INCL. 6X AND LARGER)	DOUGLAS FIR-LARCH NO. 1 MINIMUM BASE VALUE, Fb = 1350 PSI
POSTS	(4X MEMBERS)	DOUGLAS FIR-LARCH NO. 2 MINIMUM BASE VALUE, Fc = 1350 PSI
	(6X AND LARGER)	DOUGLAS FIR-LARCH NO. 1 MINIMUM BASE VALUE, Fc = 1000 PSI
STUDS, PLATES & MISC. FRAMING:		DOUGLAS FIR-LARCH NO. 2 OR HEM-FIR NO. 2

40. GLUED LAMINATED MEMBERS SHALL BE FABRICATED IN CONFORMANCE WITH ASTM AND ANSI/AITC STANDARDS. EACH MEMBER SHALL BEAR AN AITC OR APA IDENTIFICATION MARK AND SHALL BE ACCOMPANIED BY AN AITC OR APA CERTIFICATE OF CONFORMANCE. ALL SIMPLE SPAN BEAMS SHALL BE DOUGLAS FIR COMBINATION 24F-V4, Fb = 2,400 PSI, Fv = 265 PSI. ALL CANTILEVERED BEAMS SHALL BE DOUGLAS FIR COMBINATION 24F-V8, Fb = 2400 PSI, Fv = 265 PSI.

41. MANUFACTURED LUMBER, PSL, LVL, AND LSL SHOWN ON PLAN ARE BASED PRODUCTS MANUFACTURED BY THE WEYERHAEUSER CORPORATION IN ACCORDANCE WITH ICC-ES REPORT ESR-1387. MEMBERS SHALL HAVE THE FOLLOWING MINIMUM PROPERTIES:

PSL (2.0E WS)	Fb = 2900 PSI, E = 2000 KSI, Fv = 290 PSI
LVL (2.0E-2600FB WS)	Fb = 2600 PSI, E = 2000 KSI, Fv = 285 PSI
LSL (1.55E)	Fb = 2325 PSI, E = 1550 KSI, Fv = 310 PSI

ALTERNATE MANUFACTURED LUMBER MANUFACTURERS MAY BE USED SUBJECT TO REVIEW AND APPROVAL BY THE ARCHITECT AND STRUCTURAL ENGINEER. ALTERNATE MANUFACTURER'S PRODUCTS SHALL BE COMPATIBLE WITH THE JOIST HANGERS AND OTHER HARDWARE SPECIFIED ON PLANS, OR ALTERNATE HANGERS AND HARDWARE SHALL SUBMITTED FOR REVIEW AND APPROVAL. SUBSTITUTED ITEMS SHALL HAVE ICC-ES REPORT APPROVAL FOR EQUAL OR GREATER LOAD CAPACITIES.

MANUFACTURED LUMBER PRODUCTS SHALL BE INSTALLED WITH A MOISTURE CONTENT OF 12% OR LESS. THE CONTRACTOR SHALL MAKE PROVISIONS DURING CONSTRUCTION TO PREVENT THE MOISTURE CONTENT OF INSTALLED BEAMS FROM EXCEEDING 12%. EXCESSIVE DEFLECTIONS MAY OCCUR IF MOISTURE CONTENT EXCEEDS THIS VALUE.

42. PREFABRICATED PLYWOOD WEB JOIST DESIGN SHOWN ON PLANS IS BASED ON JOISTS MANUFACTURED BY THE WEYERHAEUSER CORPORATION, IN ACCORDANCE WITH ICC-ES REPORT ESR-1157. ALTERNATE PLYWOOD WEB JOIST MANUFACTURERS MAY BE USED SUBJECT TO REVIEW AND APPROVAL BY THE ARCHITECT AND STRUCTURAL ENGINEER. ALTERNATE MANUFACTURER'S PRODUCTS SHALL BE COMPATIBLE WITH THE JOIST HANGERS AND OTHER HARDWARE SPECIFIED ON PLANS, OR ALTERNATE HANGERS AND HARDWARE SHALL SUBMITTED FOR REVIEW AND APPROVAL. SUBSTITUTED ITEMS SHALL HAVE ICC-ES REPORT APPROVAL FOR EQUAL OR GREATER LOAD CAPACITIES.

43. PLYWOOD SHEATHING SHALL BE GRADE C-D, EXTERIOR GLUE OR STRUCTURAL II, EXTERIOR GLUE IN CONFORMANCE WITH DOC PS 1 OR PS 2. ORIENTED STRAND BOARD OF EQUIVALENT THICKNESS, EXPOSURE RATING AND PANEL INDEX MAY BE USED IN LIEU OF PLYWOOD.

ROOF SHEATHING SHALL BE 1/2" (NOMINAL) WITH SPAN RATING 32/16.

FLOOR SHEATHING SHALL BE 3/4" (NOMINAL) WITH SPAN RATING 48/24.

WALL SHEATHING SHALL BE 1/2" (NOMINAL) WITH SPAN RATING 24/0.

PROVIDE APPROVED PLYWOOD EDGE CLIPS CENTERED BETWEEN JOISTS/TRUSSES AT UNBLOCKED ROOF SHEATHING EDGES. ALL FLOOR SHEATHING EDGES SHALL HAVE APPROVED T&G JOINTS OR SHALL BE SUPPORTED WITH SOLID BLOCKING. ALLOW 1/8" SPACING AT ALL PANEL EDGES AND ENDS OF FLOOR AND ROOF SHEATHING.

REFER TO WOOD FRAMING NOTES BELOW FOR TYPICAL NAILING REQUIREMENTS.

44. ALL WOOD IN DIRECT CONTACT WITH CONCRETE OR MASONRY SHALL BE PRESSURE-TREATED WITH AN APPROVED PRESERVATIVE OR (2) LAYERS OF ASPHALT IMPREGNATED BUILDING PAPER SHALL BE PROVIDED BETWEEN UNTREATED WOOD AND CONCRETE OR MASONRY.

45. PRESERVATIVE TREATED WOOD SHALL BE TREATED PER AWWA STANDARD U1 TO THE USE CATEGORY EQUAL TO OR HIGHER THAN THE INTENDED APPLICATION. TREATED WOOD FOR ABOVE GROUND USE SHALL BE TREATED TO AWWA UC3B. WOOD IN CONTINUOUS CONTACT WITH FRESH WATER OR SOIL SHALL BE TREATED TO AWWA UC4A. WOOD FOR USE IN PERMANENT FOUNDATIONS SHALL BE TREATED TO AWWA UC4B.

46. FASTENERS AND TIMBER CONNECTORS USED WITH TREATED WOOD SHALL HAVE CORROSION RESISTANCE AS INDICATED IN THE FOLLOWING TABLE, UNLESS OTHERWISE NOTED.

WOOD TREATMENT	CONDITION	PROTECTION
HAS NO AMMONIA CARRIER	INTERIOR DRY	G90 GALVANIZED
CONTAINS AMMONIA CARRIER	INTERIOR DRY	G185 OR A185 HOT DIPPED OR CONTINUOUS HOT-GALVANIZED PER ASTM A653
CONTAINS AMMONIA CARRIER	INTERIOR WET	TYPE 304 OR 316 STAINLESS
CONTAINS AMMONIA CARRIER	EXTERIOR	TYPE 304 OR 316 STAINLESS
AZCA	ANY	TYPE 304 OR 316 STAINLESS

INTERIOR DRY CONDITIONS SHALL HAVE WOOD MOISTURE CONTENT LESS THAN 19%. WOOD MOISTURE CONTENT IN OTHER CONDITIONS (INTERIOR WET, EXTERIOR WET, AND EXTERIOR DRY) IS EXPECTED TO EXCEED 19%. CONNECTORS AND THEIR FASTENERS SHALL BE THE SAME MATERIAL. COMPLY WITH THE TREATMENT MANUFACTURERS RECOMMENDATIONS FOR PROTECTION OF METAL.

47. TIMBER CONNECTORS CALLED OUT BY LETTERS AND NUMBERS SHALL BE "STRONG-TIE" BY SIMPSON COMPANY, AS SPECIFIED IN THEIR CATALOG NUMBER C-C-2021. EQUIVALENT DEVICES BY OTHER MANUFACTURERS MAY BE SUBSTITUTED, PROVIDED THEY HAVE ICC-ES APPROVAL FOR EQUAL OR GREATER LOAD CAPACITIES. PROVIDE NUMBER AND SIZE OF FASTENERS AS SPECIFIED BY MANUFACTURER FOR MAXIMUM LOAD CARRYING CAPACITY. CONNECTORS SHALL BE INSTALLED IN ACCORDANCE WITH THE MANUFACTURER'S RECOMMENDATIONS.

ALL 2X JOISTS SHALL BE CONNECTED TO FLUSH BEAMS WITH "LUS" SERIES JOIST HANGERS. ALL TJI JOISTS SHALL BE CONNECTED TO FLUSH BEAMS WITH "ITS" SERIES JOIST HANGERS. ALL DOUBLE-JOIST BEAMS SHALL BE CONNECTED TO FLUSH BEAMS WITH "MIT" SERIES JOIST HANGERS.

WHERE CONNECTOR STRAPS CONNECT TWO MEMBERS, PLACE ONE-HALF OF THE NAILS OR BOLTS IN EACH MEMBER.

ALL SHIMS SHALL BE SEASONED AND DRIED AND THE SAME GRADE (MINIMUM) AS MEMBERS CONNECTED.

48. WOOD FASTENERS

A. NAIL SIZES SPECIFIED ON DRAWINGS ARE BASED ON THE FOLLOWING SPECIFICATIONS:

SIZE	LENGTH	DIAMETER
6d	2"	0.113"
8d	2-1/2"	0.131"
10d	3"	0.148"
12d	3-1/4"	0.148"
16d BOX	3-1/2"	0.135"

IF CONTRACTOR PROPOSES THE USE OF ALTERNATE NAILS, THEY SHALL SUBMIT NAIL SPECIFICATIONS TO THE STRUCTURAL ENGINEER (PRIOR TO CONSTRUCTION) FOR REVIEW AND APPROVAL.

NAILS - PLYWOOD (APA RATED SHEATHING) FASTENERS TO FRAMING SHALL BE DRIVEN FLUSH TO FACE OF SHEATHING WITH NO COUNTERSINKING PERMITTED. TOE-NAILS SHALL BE DRIVEN AT AN ANGLE OF 30 DEGREES WITH THE MEMBER AND STARTED 1/3 THE LENGTH OF THE NAIL FROM THE MEMBER END.

B. ALL BOLTS IN WOOD MEMBERS SHALL CONFORM TO ASTM A307. PROVIDE WASHERS UNDER THE HEADS AND NUTS OF ALL BOLTS AND LAG BOLTS BEARING ON WOOD. INSTALLATION OF LAG BOLTS SHALL CONFORM TO THE NATIONAL DESIGN SPECIFICATION FOR WOOD CONSTRUCTION WITH A LEAD BORE HOLE OF 60 TO 70 PERCENT OF THE SHANK DIAMETER. LEAD HOLES ARE NOT REQUIRED FOR 3/8" AND SMALLER LAG SCREWS.

49. NOTCHES AND HOLES IN WOOD FRAMING:

A. NOTCHES ON THE ENDS OF SOLID SAWN JOISTS AND RAFTERS SHALL NOT EXCEED ONE-FOURTH THE JOIST DEPTH. NOTCHES IN THE TOP OR BOTTOM OF SOLID SAWN JOISTS SHALL NOT EXCEED ONE-SIXTH THE DEPTH AND SHALL NOT BE LOCATED IN THE MIDDLE THIRD OF THE SPAN. HOLES BORED IN SOLID SAWN JOISTS AND RAFTERS SHALL NOT BE WITHIN 2 INCHES OF THE TOP OR BOTTOM OF THE JOIST, AND THE DIAMETER OF ANY SUCH HOLE SHALL NOT EXCEED ONE-THIRD THE DEPTH OF THE JOIST.

B. IN EXTERIOR WALLS AND BEARING PARTITIONS, ANY WOOD STUD IS PERMITTED TO BE CUT OR NOTCHED TO A DEPTH NOT EXCEEDING 25 PERCENT OF ITS WIDTH. A HOLE NOT GREATER IN DIAMETER THAN 40 PERCENT OF THE STUD WIDTH IS PERMITTED TO BE BORED IN ANY WOOD STUD. IN NO CASE SHALL THE EDGE OF THE BORED HOLE BE NEARER THAN 5/8 INCH TO THE EDGE OF THE STUD. BORED HOLES SHALL NOT BE LOCATED AT THE SAME SECTION OF STUD AS A CUT OR NOTCH.

C. NOTCHES AND HOLES IN MANUFACTURED LUMBER AND PREFABRICATED PLYWOOD WEB JOISTS SHALL BE PER THE MANUFACTURERS RECOMMENDATIONS UNLESS OTHERWISE NOTED.

50. WOOD FRAMING NOTES--THE FOLLOWING APPLY UNLESS OTHERWISE SHOWN ON THE PLANS:

A. ALL WOOD FRAMING DETAILS NOT SHOWN OTHERWISE SHALL BE CONSTRUCTED TO THE MINIMUM STANDARDS OF THE INTERNATIONAL BUILDING CODE, THE AITC "TIMBER CONSTRUCTION MANUAL" AND THE AWC "NATIONAL DESIGN SPECIFICATION FOR WOOD CONSTRUCTION". MINIMUM NAILING, UNLESS OTHERWISE NOTED, SHALL CONFORM TO IBC TABLE 2304.10.1. COORDINATE THE SIZE AND LOCATION OF ALL OPENINGS WITH MECHANICAL AND ARCHITECTURAL DRAWINGS.

B. WALL FRAMING: REFER ARCHITECTURAL DRAWINGS FOR THE SIZE OF ALL WALLS. ALL STUDS SHALL BE SPACED AT 16" O.C. UNO. TWO STUDS MINIMUM SHALL BE PROVIDED AT THE END OF ALL WALLS AND AT EACH SIDE OF ALL OPENINGS, AND AT BEAM OR HEADER BEARING LOCATIONS. TWO 2x8 HEADERS SHALL BE PROVIDED OVER ALL OPENINGS NOT OTHERWISE NOTED. SOLID BLOCKING FOR WOOD COLUMNS SHALL BE PROVIDED THROUGH FLOORS TO SUPPORTS BELOW. PROVIDE CONTINUOUS SOLID BLOCKING AT MID-HEIGHT OF ALL STUD WALLS OVER 10'-0" IN HEIGHT.

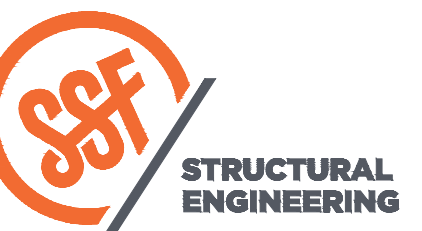
ALL WALLS SHALL HAVE A SINGLE BOTTOM PLATE AND A DOUBLE TOP PLATE. END NAIL TOP PLATE TO EACH STUD WITH TWO 16d NAILS, AND TOENAIL OR END NAIL EACH STUD TO BOTTOM PLATE WITH TWO 16d NAILS. FACE NAIL DOUBLE TOP PLATE WITH 16d @ 12" O.C.. LAP TOP PLATES AT JOINTS A MINIMUM 4'-0" AND NAIL WITH TWELVE 16d NAILS @ 4" O.C. EACH SIDE JOINT.

ALL STUD WALLS SHALL HAVE THEIR LOWER WOOD PLATES ATTACHED TO WOOD FRAMING BELOW WITH TWO ROWS OF 16d NAILS @ 12" ON-CENTER, OR ATTACHED TO CONCRETE BELOW WITH 5/8" DIAMETER ANCHOR BOLTS @ 4'-0" ON-CENTER EMBEDDED 7" MINIMUM, UNLESS INDICATED OTHERWISE. INDIVIDUAL MEMBERS OF BUILT-UP POSTS SHALL BE NAILED TO EACH OTHER WITH TWO ROWS OF 16d @ 12" ON-CENTER. UNLESS OTHERWISE NOTED, GYPSUM WALLBOARD SHALL BE FASTENED TO THE INTERIOR SURFACE OF ALL STUDS AND PLATES WITH NO. 6 X 1-1/4" TYPE S OR W SCREWS @ 8" ON-CENTER. UNLESS INDICATED OTHERWISE, 1/2" (NOMINAL) APA RATED SHEATHING (SPAN RATING 24/0) SHALL BE NAILED TO ALL EXTERIOR SURFACES WITH 8d NAILS @ 6" ON-CENTER AT PANEL EDGES AND TOP AND BOTTOM PLATES (BLOCK UN-SUPPORTED EDGES) AND TO ALL INTERMEDIATE STUDS AND BLOCKING WITH 8d NAILS @ 12" ON-CENTER ALLOW 1/8" SPACING AT ALL PANEL EDGES AND PANEL ENDS.

C. FLOOR AND ROOF FRAMING: PROVIDE DOUBLE JOISTS UNDER ALL PARALLEL PARTITIONS THAT EXTEND OVER MORE THAN HALF THE JOIST LENGTH AND AROUND ALL OPENINGS IN FLOORS OR ROOFS UNLESS OTHERWISE NOTED. PROVIDE SOLID BLOCKING BETWEEN RAFTERS AND JOISTS AT ALL BEARING POINTS WITH A MINIMUM OF (3) 16d TOE NAILS EACH END. TOE-NAIL JOISTS TO SUPPORTS WITH TWO 16d NAILS. ATTACH TIMBER JOISTS TO FLUSH HEADERS OR BEAMS WITH SIMPSON METAL JOIST HANGERS IN ACCORDANCE WITH NOTES ABOVE. NAIL ALL MULTI JOIST BEAMS TOGETHER WITH TWO ROWS 16d @ 12" ON-CENTER.

UNLESS OTHERWISE NOTED ON THE PLANS, PLYWOOD ROOF AND FLOOR SHEATHING SHALL BE LAID UP WITH GRAIN PERPENDICULAR TO SUPPORTS AND NAILED AT 6" ON-CENTER WITH 8d NAILS TO FRAMED PANEL EDGES, STRUTS AND OVER STUD WALLS AS SHOWN ON PLANS AND @ 12" ON-CENTER TO INTERMEDIATE SUPPORTS. PROVIDE APPROVED PLYWOOD EDGE CLIPS CENTERED BETWEEN JOISTS/TRUSSES AT UNBLOCKED ROOF SHEATHING EDGES. ALL FLOOR SHEATHING EDGES SHALL HAVE APPROVED T&G JOINTS OR SHALL BE SUPPORTED WITH SOLID BLOCKING. ALLOW 1/8" SPACING AT ALL PANEL EDGES AND ENDS OF FLOOR AND ROOF SHEATHING. TOENAIL BLOCKING TO SUPPORTS WITH 16d @ 12" ON-CENTER, MINIMUM TWO NAILS PER BLOCK, UNLESS OTHERWISE NOTED.

D. WOOD SHRINKAGE: MECHANICAL, ELECTRICAL, PLUMBING FIRE PROTECTION, CLADDING, AND OTHER SYSTEMS INSTALLED WITHIN THE BUILDING SHALL BE DESIGNED AND CONSTRUCTED TO ACCOMMODATE 3/8" OF VERTICAL MOVEMENT PER FLOOR LEVEL.



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DRAWN: CFG

DESIGN: BDM

CHECKED: BDM

APPROVED: BDM

REVISIONS:

1 Permit Set REV1 Nov. 8, 2024

JURISDICTIONAL APPROVAL STAMP:

PROJECT TITLE:

**Korpela + Wiens
Residence**

8441 SE 33rd Place
Mercer Island, WA

ARCHITECT:

Jessica Poole
7718 Fremont Ave N
Seattle, WA 98103
PH 206.484.3802

ISSUE:

Permit

SHEET TITLE:

**General
Structural Notes
Continued**

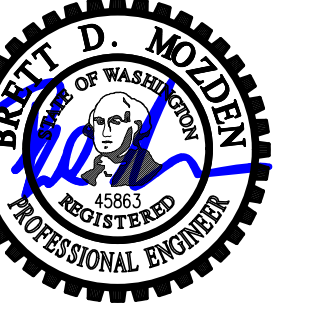
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DATE: Dec. 14, 2023

PROJECT NO: 02327-2023-04

SHEET NO:

S1.2



DRAWN: CFG
 DESIGN: BDM
 CHECKED: BDM
 APPROVED: BDM

REVISIONS:
 1 Permit Set REV1 Nov. 8, 2024

JURISDICTIONAL APPROVAL STAMP:

PROJECT TITLE:
**Korpela + Wiens
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 8441 SE 33rd Place
 Mercer Island, WA

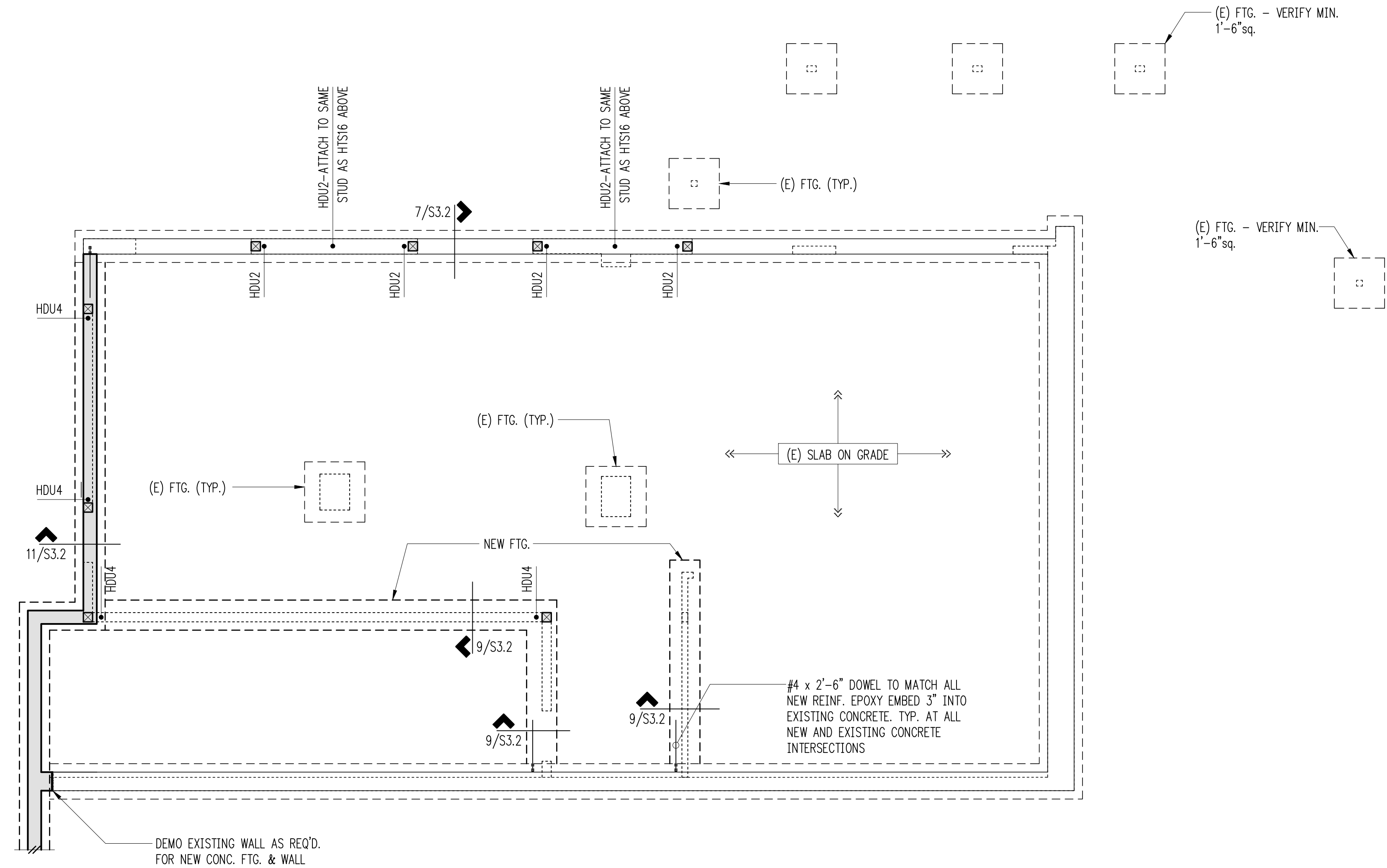
ARCHITECT:
Jessica Poole
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ISSUE:
Permit

SHEET TITLE:
**Lower
 Foundation
 Plan**

SCALE: 1/4" = 1'-0"
 DATE: Dec. 14, 2023
 PROJECT NO: 02327-2023-04
 SHEET NO:

S2.1

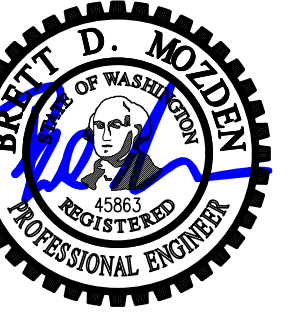


Plan Notes

- DO NOT SCALE DRAWINGS. REFER TO ARCHITECTURAL DRAWINGS FOR ALL DIMENSIONS.
- REFER TO GENERAL STRUCTURAL NOTES FOR ADDITIONAL REQUIREMENTS.
- EXISTING FRAMING ON PLANS IS ASSUMED. CONTRACTOR TO VERIFY DIRECTIONS AND EXTENTS. NOTIFY ARCHITECT AND ENGINEER IF DIFFERENT.
- EXTERIOR SLABS ON GRADE SHALL BE 4" MINIMUM THICKNESS. REINFORCE WITH #3 AT 16" O.C. CENTERED IN SLAB. BELOW SLAB PROVIDE 6" MINIMUM FREE DRAINING GRAVEL OVER FIRM NATIVE SOILS OR STRUCTURAL FILL.
- THE BOTTOM OF ALL NEW EXTERIOR FOOTINGS SHALL BE 18" MINIMUM BELOW EXTERIOR GRADE.
- ALL NEW POSTS ABOVE SHALL BEAR FULLY ON BEAMS OR POSTS BELOW AND SHALL HAVE FULL CONTINUOUS BEARING THROUGH FLOORS TO FOUNDATION.

Legend

- STRUCTURAL WALL OR POST ABOVE
- (E) STRUCTURAL WALL OR POST ABOVE
- NON-STRUCTURAL WALL BELOW
- EXISTING STEM WALL & FOOTING
- STEM WALL & FOOTING
- STRUCTURAL WALL OR POST BELOW
- HOLDOWN PER 11/S3.1 OR 9/S3.1 AT (E) U.N.O.



DRAWN: CFG
 DESIGN: BDM
 CHECKED: BDM
 APPROVED: BDM

REVISIONS:
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JURISDICTIONAL APPROVAL STAMP:

PROJECT TITLE:

**Korpela + Wiens
 Residence**
 8441 SE 33rd Place
 Mercer Island, WA

ARCHITECT:
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ISSUE:
Permit

SHEET TITLE:

**Upper Foundation &
 Main Floor Plan**

SCALE: 1/4" = 1'-0"
 DATE: Dec. 14, 2023
 PROJECT NO: 02327-2023-04
 SHEET NO:

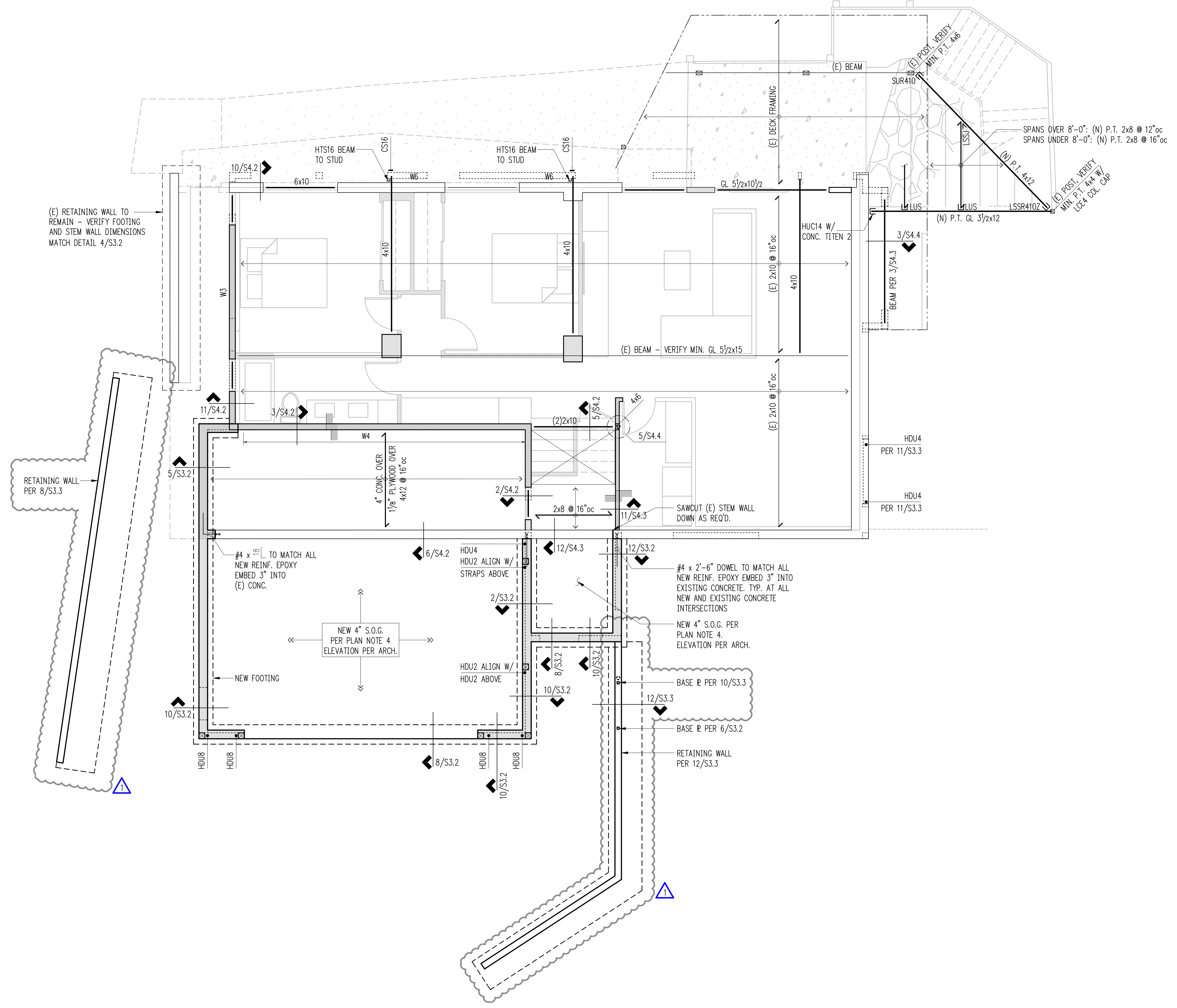
S2.2

Plan Notes

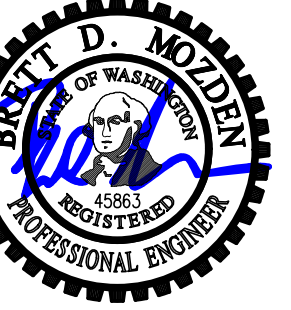
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- REFER TO GENERAL STRUCTURAL NOTES FOR ADDITIONAL REQUIREMENTS.
- EXISTING FRAMING ON PLANS IS ASSUMED. CONTRACTOR TO VERIFY DIRECTIONS AND EXTENTS. NOTIFY ARCHITECT AND ENGINEER IF DIFFERENT.
- NEW INTERIOR SLABS ON GRADE SHALL BE 4" MINIMUM THICKNESS. REINFORCE WITH #3 AT 16" O.C. CENTERED IN SLAB. BELOW SLAB PROVIDE A 10-MIL VAPOR BARRIER OVER 6" MINIMUM FREE DRAINING GRAVEL OVER FIRM NATIVE SOILS OR STRUCTURAL FILL.
- NEW EXTERIOR SLABS ON GRADE SHALL BE 4" MINIMUM THICKNESS. REINFORCE WITH #3 AT 16" O.C. CENTERED IN SLAB. BELOW SLAB PROVIDE 6" MINIMUM FREE DRAINING GRAVEL OVER FIRM NATIVE SOILS OR STRUCTURAL FILL.
- THE BOTTOM OF ALL NEW EXTERIOR FOOTINGS SHALL BE 18" MINIMUM BELOW EXTERIOR GRADE.
- ALL POSTS ABOVE SHALL BEAR FULLY ON BEAMS OR POSTS BELOW AND SHALL HAVE FULL CONTINUOUS BEARING THROUGH FLOORS TO FOUNDATION.
- PROVIDE AC, ACE, PC, EPC, LPC, OR LCE COLUMN CAP AND BASE AT ALL NEW BEAM TO COLUMN CONNECTIONS U.O.N.
- NEW MANUFACTURED LUMBER PRODUCTS (LSL, LVL, PSL, GL) SHALL BE INSTALLED WITH A MOISTURE CONTENT OF 12% OR LESS. THE CONTRACTOR SHALL MAKE PROVISIONS DURING CONSTRUCTION TO PREVENT THE MOISTURE CONTENT OF INSTALLED BEAMS FROM EXCEEDING 12%.

Legend

- STRUCTURAL WALL OR POST BELOW
- STRUCTURAL WALL OR POST ABOVE
- NON-STRUCTURAL WALL BELOW
- EXISTING WALL OR POST BELOW
- EXISTING STEM WALL & FOOTING
- STEM WALL & FOOTING
- SHEARWALL PER 4/S4.1
- SPAN DIRECTION
- EXTENT OF JOISTS
- HEADER/BREAM PER PLAN
- EXISTING HEADER/BEAM
- CHANGE IN ELEVATION
- HOLDOWN PER 11/S3.1 OR 9/S3.1 AT (E)



Upper Foundation/Main Floor Framing Plan
 Scale: 1/4" = 1'-0"



DRAWN: CFG
 DESIGN: BDM
 CHECKED: BDM
 APPROVED: BDM

REVISIONS:
 1 Permit Set REV1 Nov. 8, 2024

JURISDICTIONAL APPROVAL STAMP:

PROJECT TITLE:
**Korpela + Wiens
 Residence**
 8441 SE 33rd Place
 Mercer Island, WA

ARCHITECT:
Jessica Poole
 7718 Fremont Ave N
 Seattle, WA 98103
 PH 206.484.3802

ISSUE:
Permit

SHEET TITLE:
**Upper Floor
 & Lower
 Roof Plan**

SCALE: 1/4" = 1'-0"
 DATE: Dec. 14, 2023
 PROJECT NO: 02327-2023-04
 SHEET NO:

S2.3

Plan Notes

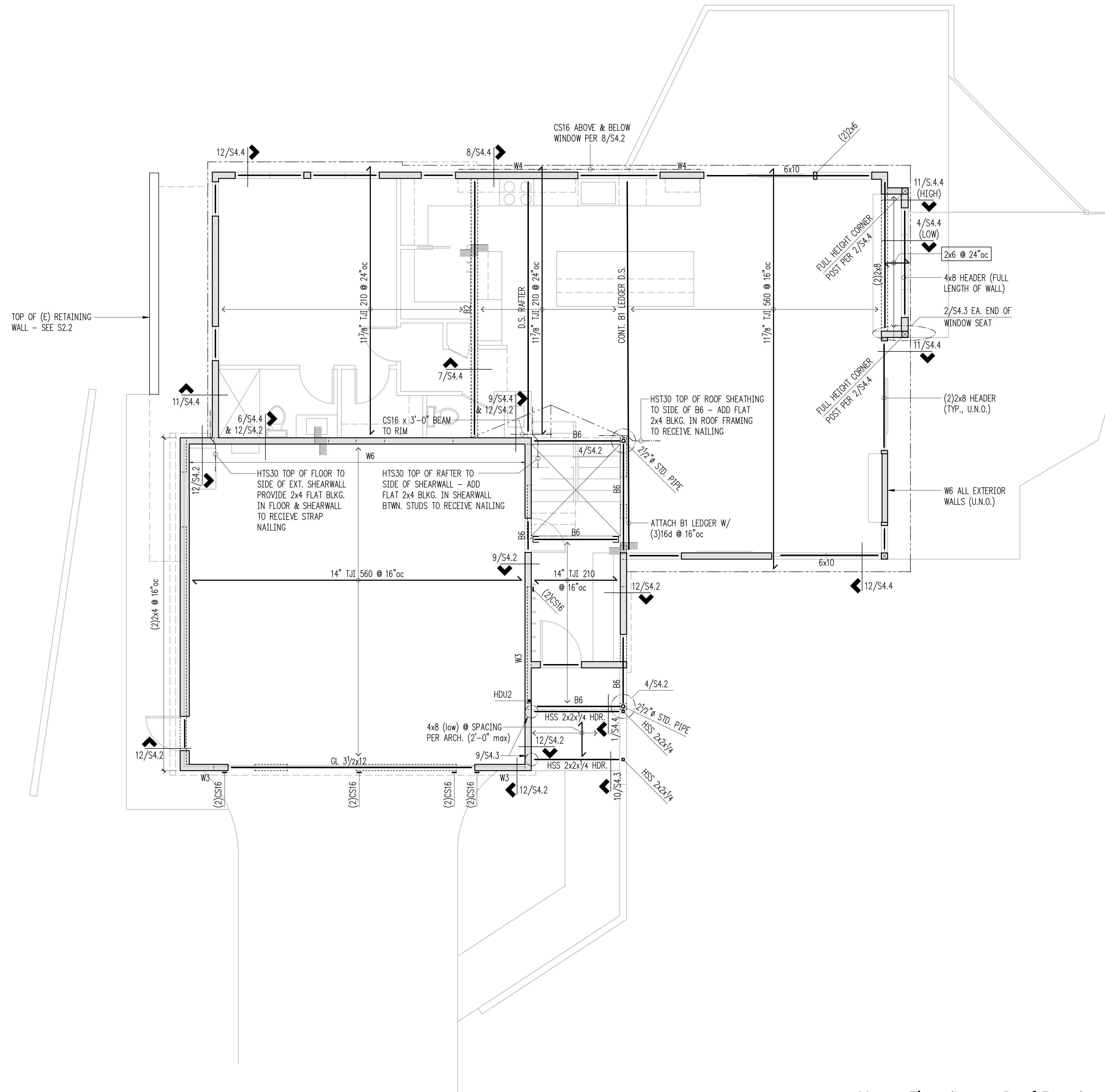
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- NEW MANUFACTURED LUMBER PRODUCTS (LSL, LVL, PSL, GL) SHALL BE INSTALLED WITH A MOISTURE CONTENT OF 12% OR LESS. THE CONTRACTOR SHALL MAKE PROVISIONS DURING CONSTRUCTION TO PREVENT THE MOISTURE CONTENT OF INSTALLED BEAMS FROM EXCEEDING 12%.
- TYPICAL FLOOR FRAMING CONSISTS OF FLOORING PER ARCHITECT OVER 3/4" T&G APA RATED PLYWOOD FACE GRAIN PERPENDICULAR TO FRAMING PER PLAN, U.O.N.
- NAIL FLOOR SHEATHING W/ 8D AT 6" OC AT FRAMED PANEL EDGES AND OVER SHEARWALLS, AND AT 12" OC IN FIELD.
- PROVIDE BLOCKING/BRIDGING AT 8'-0" O.C. IN FLOOR FRAMING
- TYPICAL ROOF FRAMING OF ROOFING PER ARCHITECTURAL DRAWINGS OVER 1/2" CDX APA RATED SHEATHING (EXPOSURE 1), FACE PERPENDICULAR TO FRAMING PER PLAN, U.O.N.
- NAIL ROOF SHEATHING WITH 8D AT 6" O.C. AT ALL FRAMED PANEL EDGES AND OVER SHEARWALLS, AND AT 12" O.C. FIELD.
- "W_" INDICATES PLYWOOD SHEARWALL BELOW FRAMING SHOWN. REFER TO SHEARWALL SCHEDULE FOR WALL ATTACHMENTS. ALL EXTERIOR WOOD FRAMED WALLS ARE W6, U.O.N.
- PROVIDE (2) BEARING STUDS AT EACH END OF ALL, HEADERS AND BEAMS OVER 3'-0" IN LENGTH, U.O.N.

Legend

- STRUCTURAL WALL OR POST BELOW XX HOLDOWN PER 11/S3.1
- STRUCTURAL WALL OR POST ABOVE D.S. DRAG STRUT: NAIL W/ 8d @ 4" oc THRU SHEATHING
- NON-STRUCTURAL WALL BELOW
- Wx SHEARWALL PER 4/S4.1
- SPAN DIRECTION
- EXTENT OF JOISTS
- HEADER/BREAM PER PLAN
- CHANGE IN ELEVATION

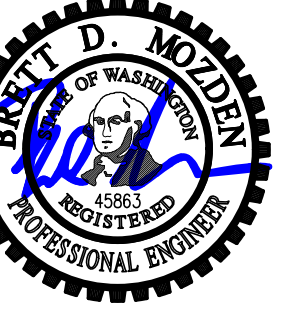
Beam Schedule

MARK	BEAM	HANGER	BRG. STUDS
B1	LVL 1 3/4x11 7/8	HU14	2
B2	LVL 3/2x11 7/8	HHUS410	3
B3	(3)LVL 1 3/4x11 7/8	HGUS5.50/14	4
B4	(4)LVL 1 3/4x11 7/8	HGUS7.25/14	5
B5	LSL 1 3/4x14	HU/HUC14	2
B6	LSL 3/2x14	HU/HUC416	3
B7	(3)LVL 1 3/4x14	HGUS5.50/14	4
B8	(4)LVL 1 3/4x14	HGUS7.25/14	5



Upper Floor/Lower Roof Framing Plan
 Scale: 1/4" = 1'-0"





DRAWN: CFG
 DESIGN: BDM
 CHECKED: BDM
 APPROVED: BDM

REVISIONS:
 1 Permit Set REV1 Nov. 8, 2024

JURISDICTIONAL APPROVAL STAMP:

PROJECT TITLE:
**Korpela + Wiens
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 8441 SE 33rd Place
 Mercer Island, WA

ARCHITECT:
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 PH 206.484.3802

ISSUE:
Permit

SHEET TITLE:
**Upper Roof
 Plan**

SCALE: 1/4" = 1'-0"
 DATE: Dec. 14, 2023
 PROJECT NO: 02327-2023-04
 SHEET NO:

Plan Notes

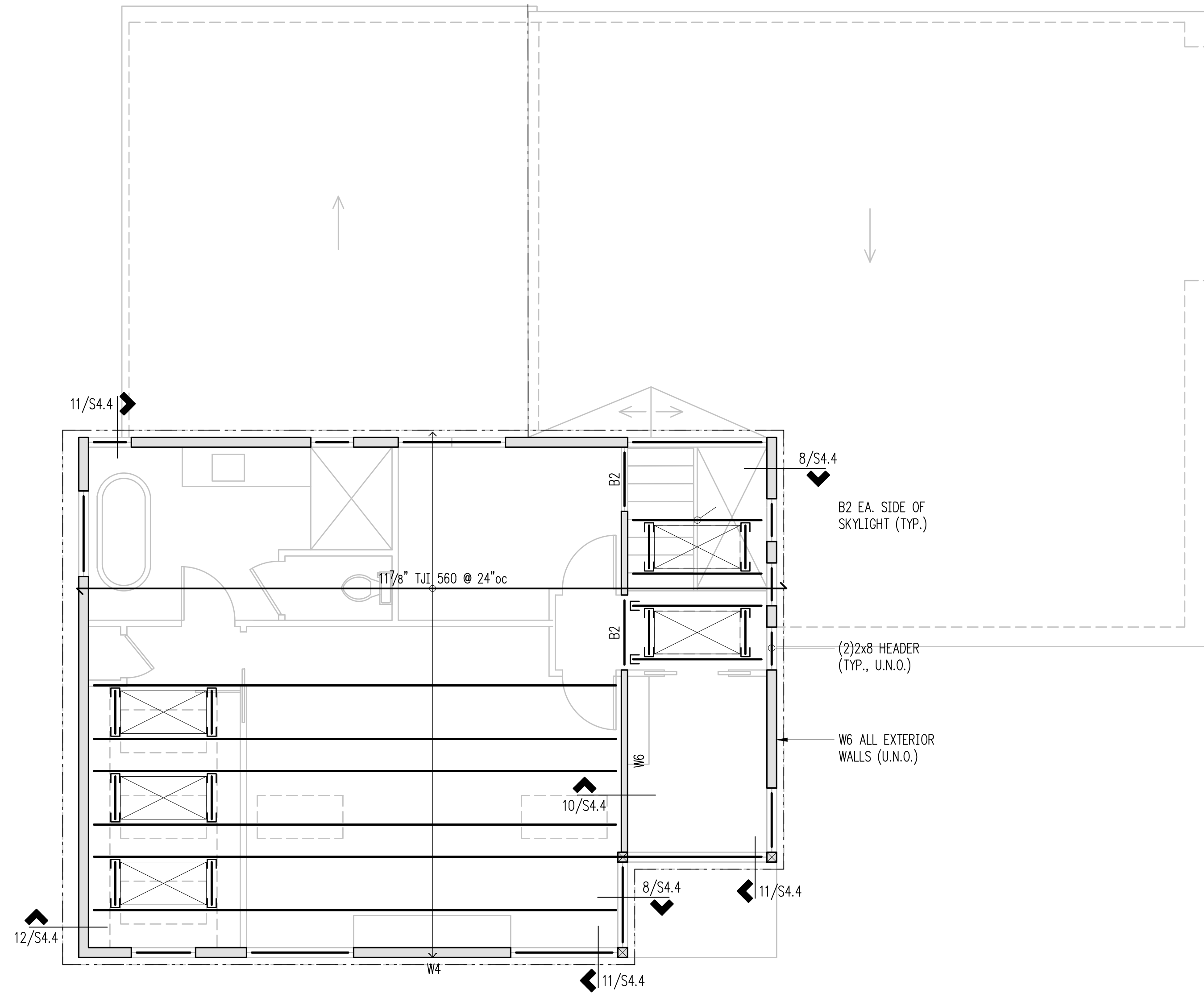
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- NAIL ROOF SHEATHING WITH 8D AT 6" O.C. AT ALL FRAMED PANEL EDGES AND OVER SHEARWALLS, AND AT 12" O.C. FIELD.
- "W_" INDICATES PLYWOOD SHEARWALL BELOW FRAMING SHOWN. REFER TO SHEARWALL SCHEDULE FOR WALL ATTACHMENTS. ALL EXTERIOR WOOD FRAMED WALLS ARE W6, U.O.N.
- PROVIDE (2) BEARING STUDS AT EACH END OF ALL HEADERS AND BEAMS OVER 3'-0" IN LENGTH, U.O.N.

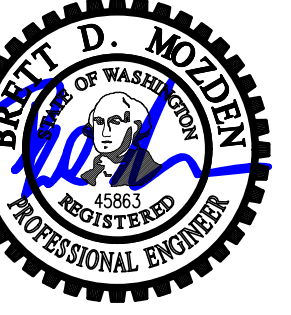
Legend

- STRUCTURAL WALL OR POST BELOW
- NON-STRUCTURAL WALL BELOW
- Wx SHEARWALL PER 4/S4.1
- SPAN DIRECTION
- EXTENT OF JOISTS
- HEADER/BEAM PER PLAN

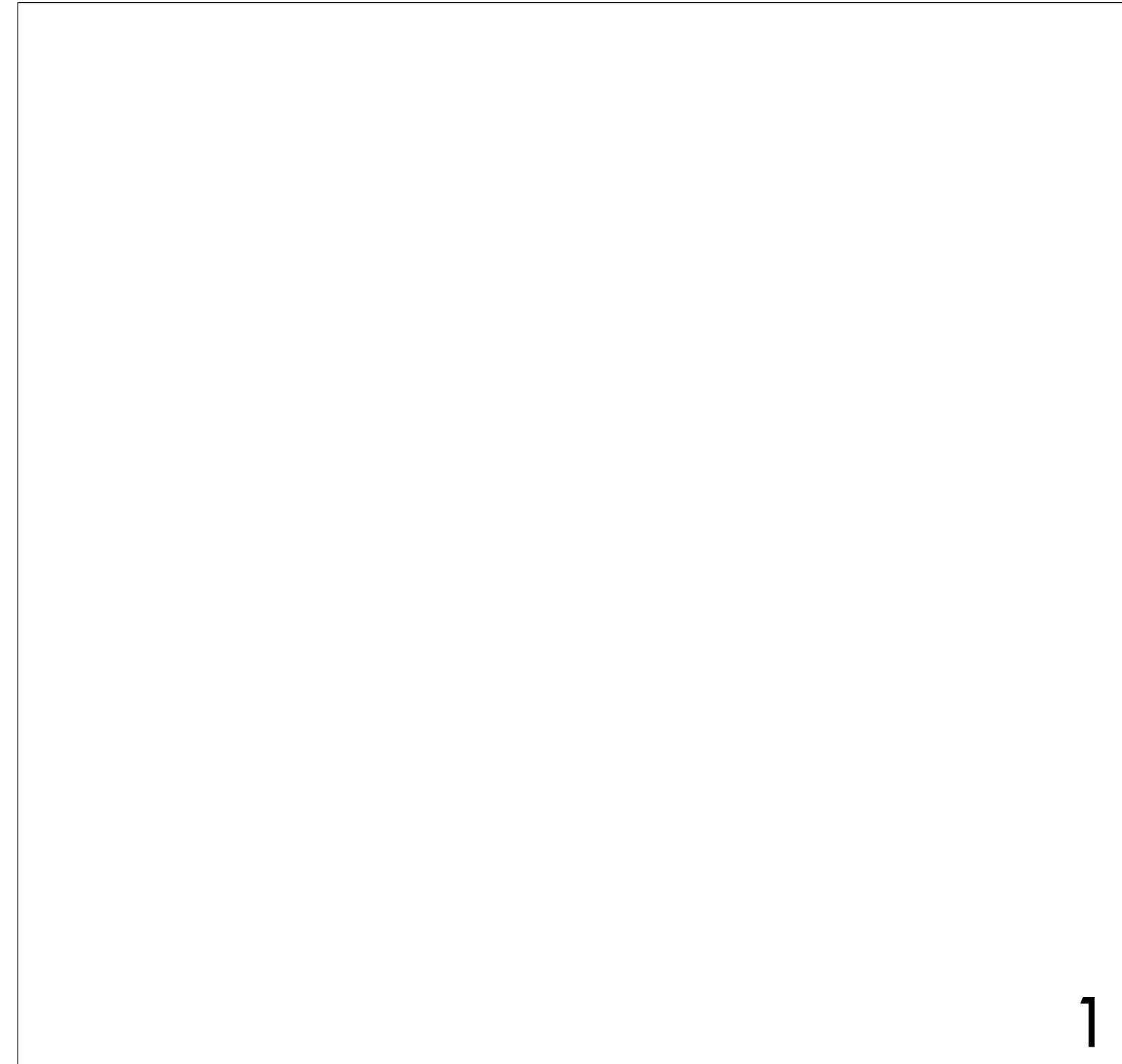
Beam Schedule

MARK	BEAM	HANGER	BRG. STUDS
B1	LVL 1 3/4x11 7/8	HU14	2
B2	LVL 3 1/2x11 7/8	HHUS410	3
B3	(3) LVL 1 3/4x11 7/8	HGUS5.50/14	4
B4	(4) LVL 1 3/4x11 7/8	HGUS7.25/14	5



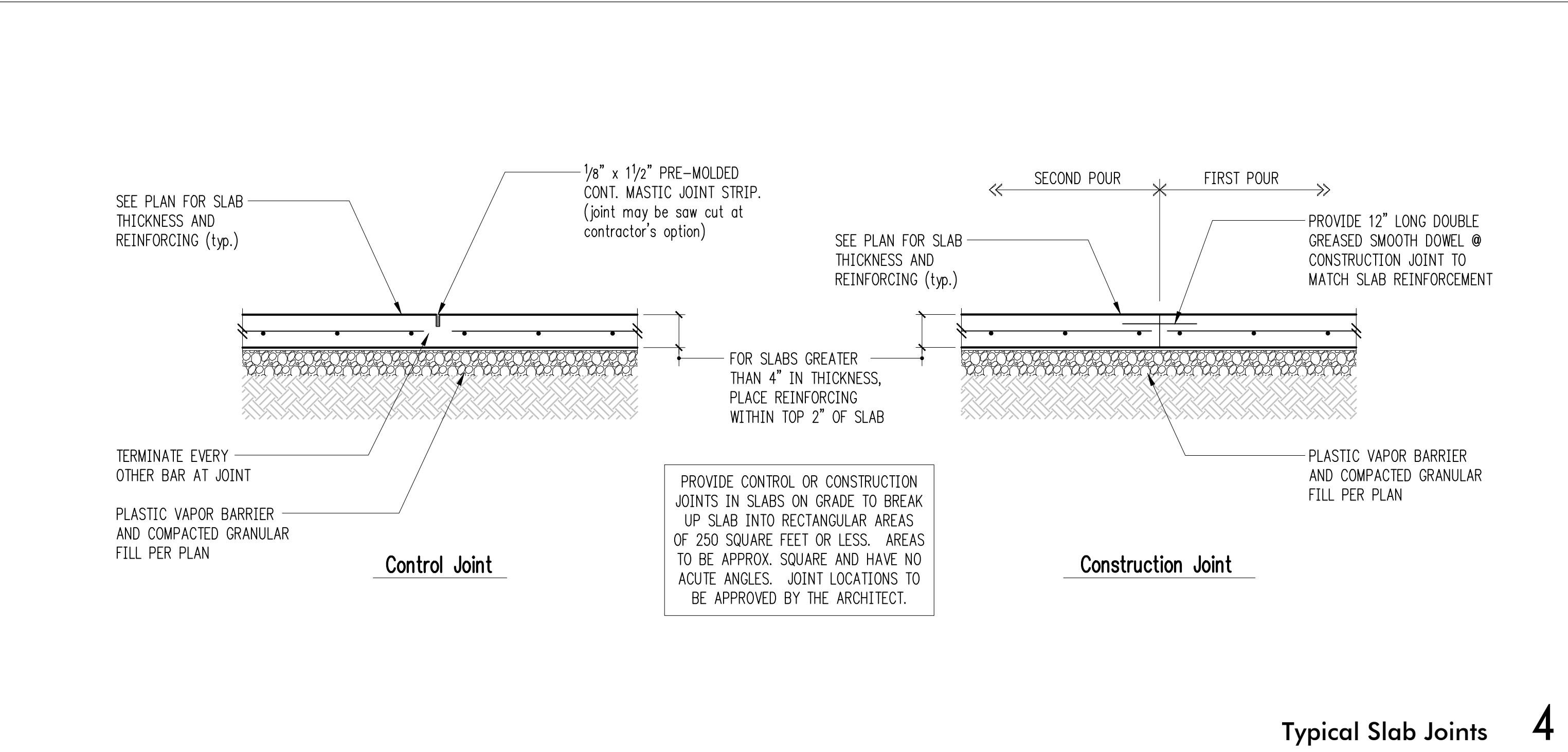


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 DESIGN: BDM
 CHECKED: BDM
 APPROVED: BDM



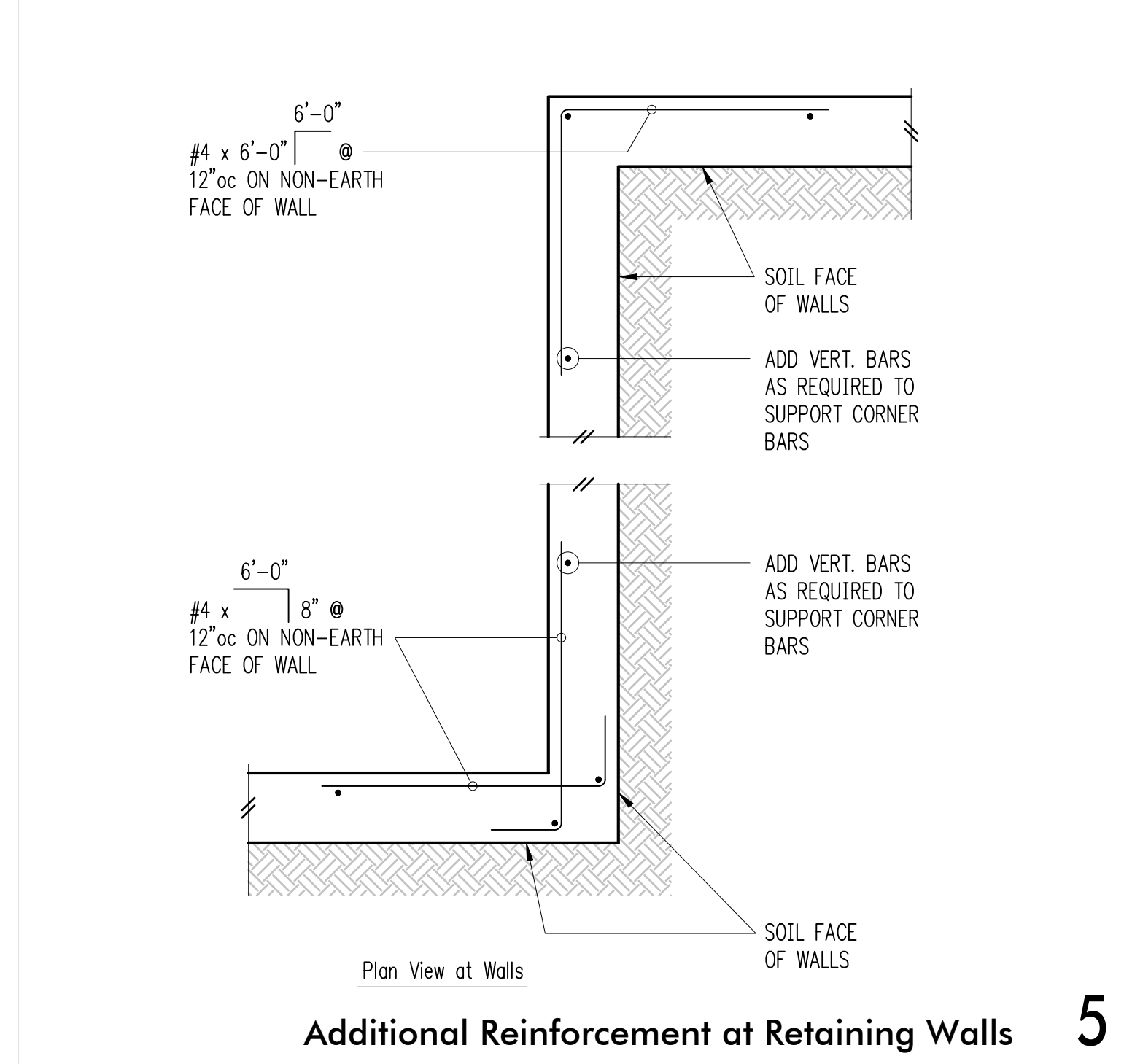
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Typical Stair On Grade 2



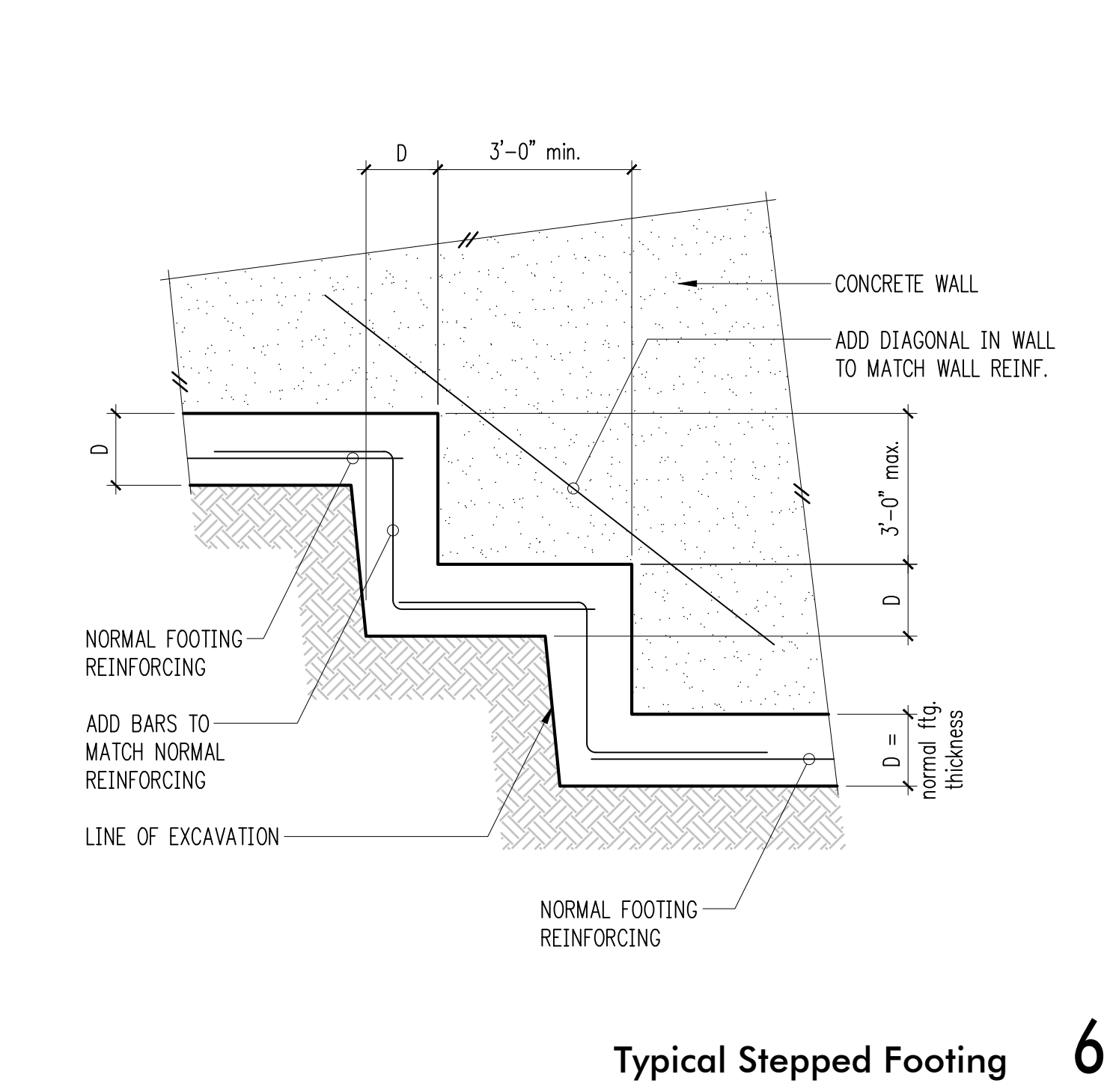
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Typical Slab Joints 4



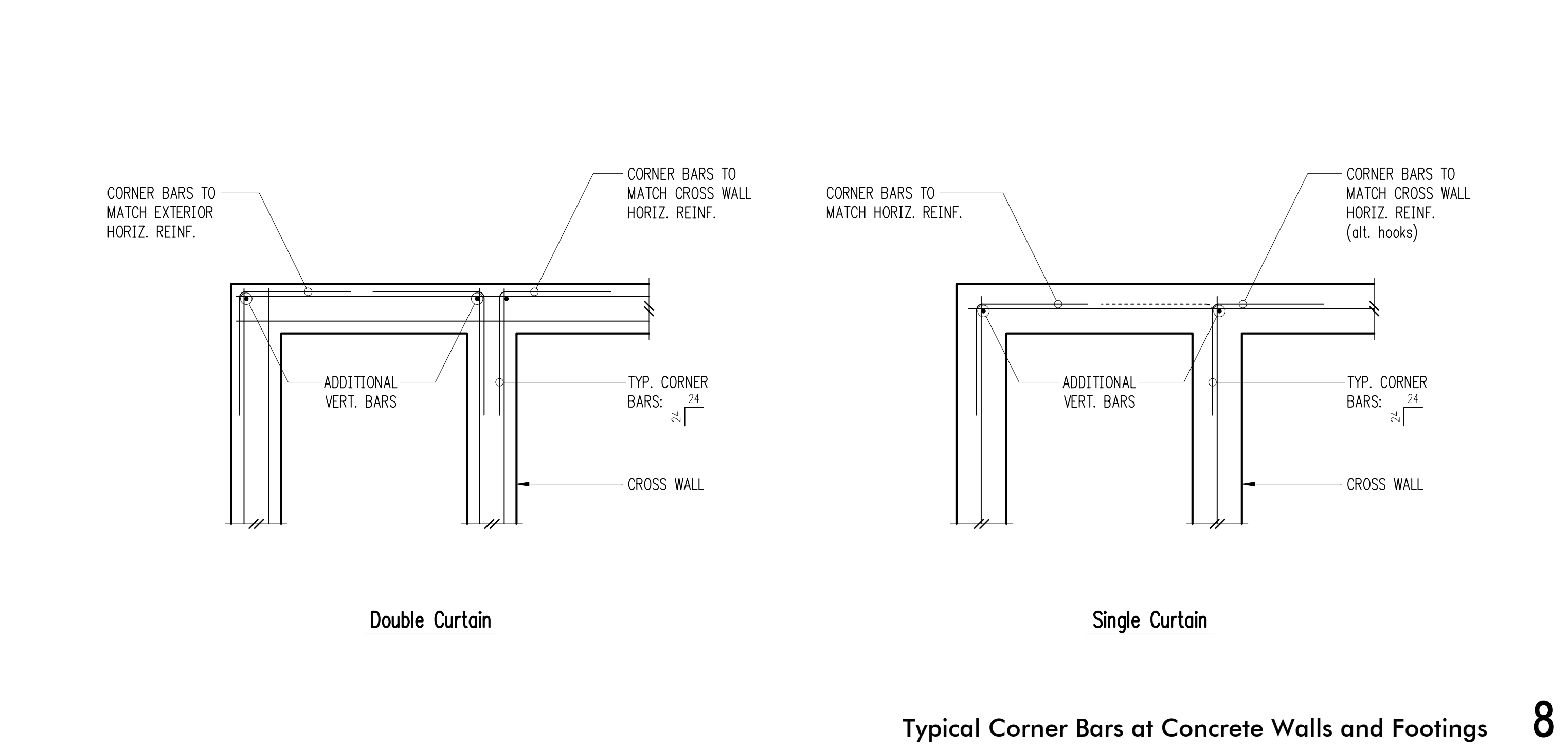
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Additional Reinforcement at Retaining Walls 5



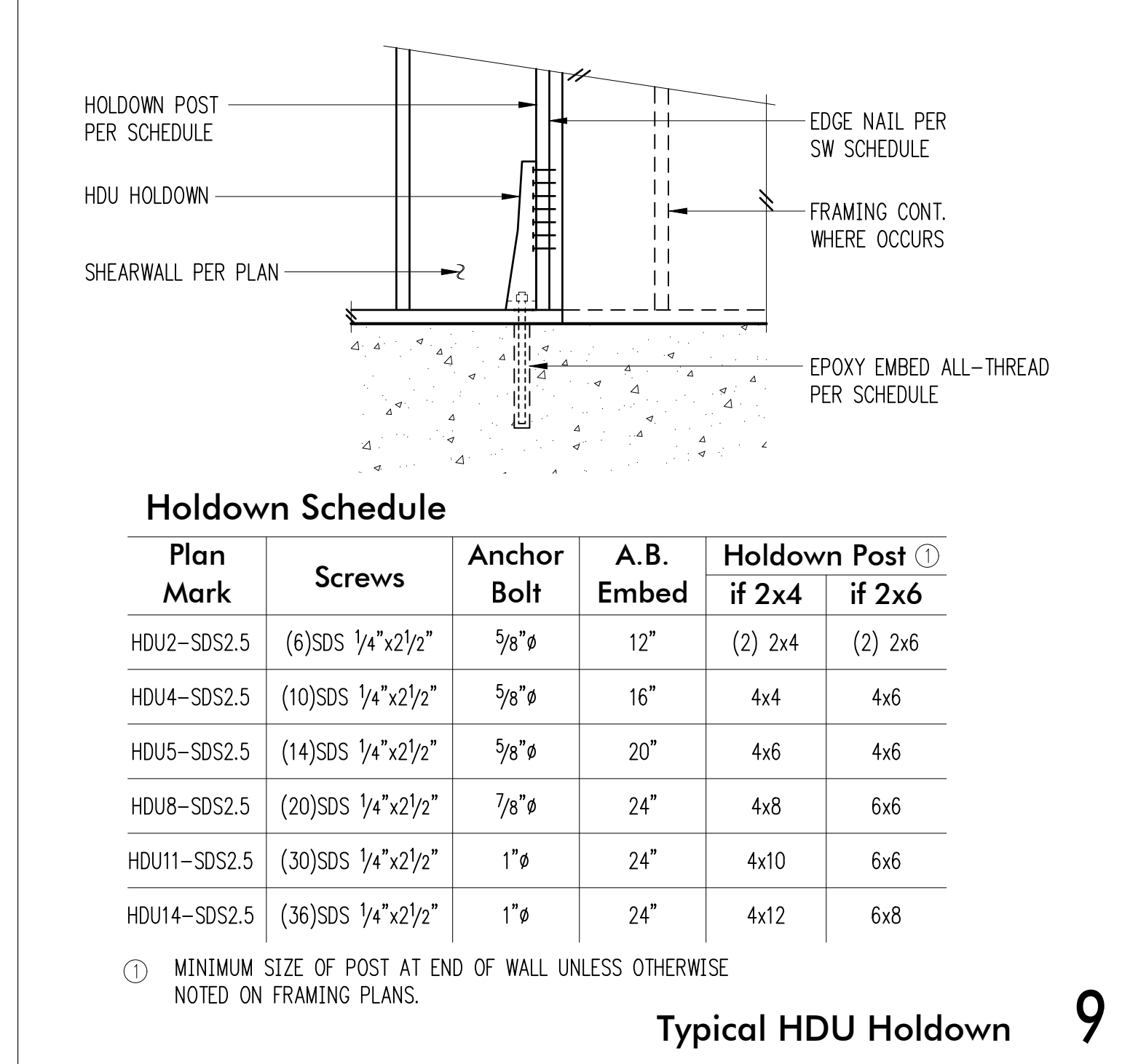
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Typical Stepped Footing 6



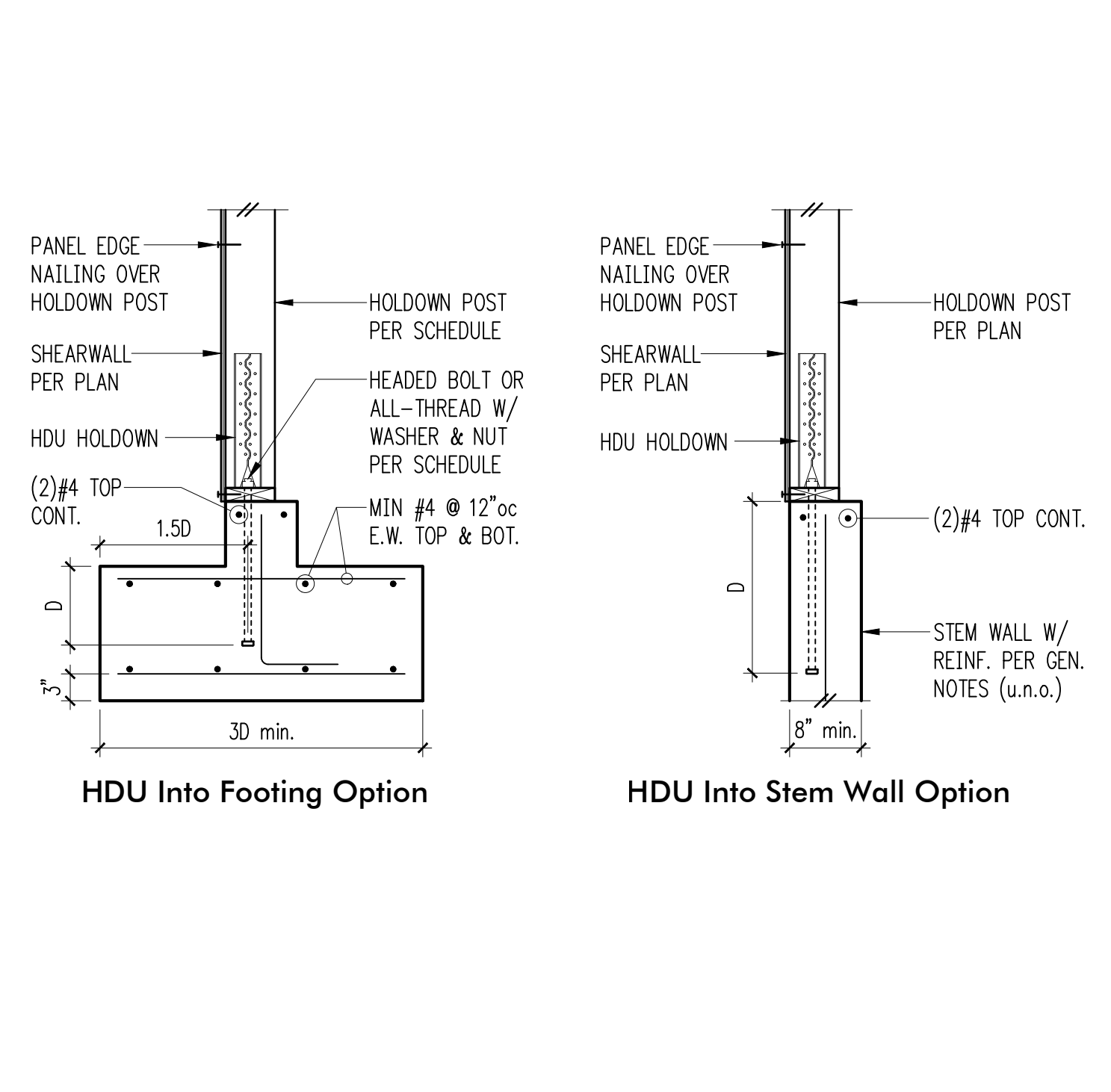
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Typical Corner Bars at Concrete Walls and Footings 8



9

Typical HDU Holdown 9



10

HDU Into Footing Option 10

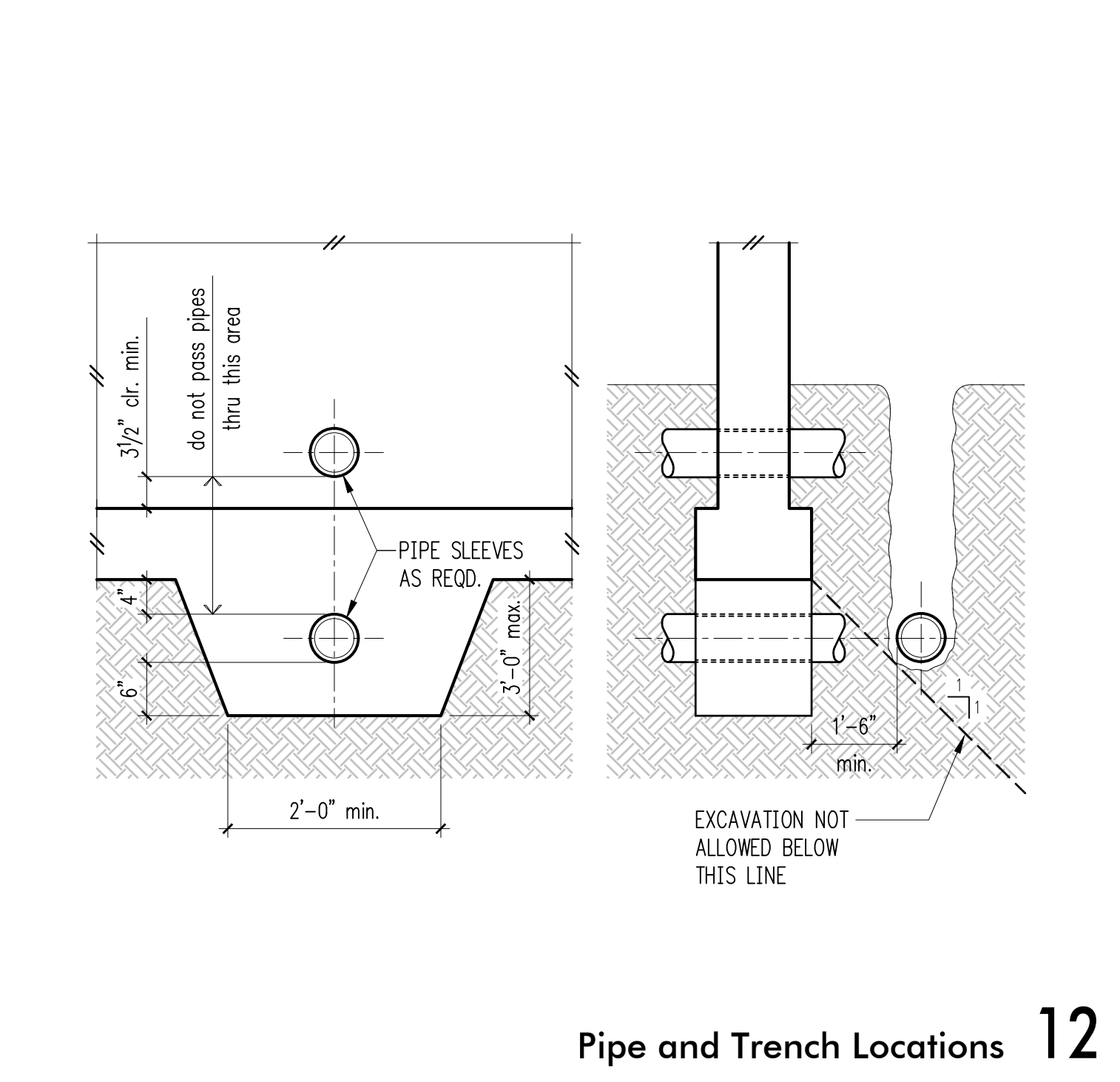
Holdown Schedule

Plan Mark	Screws	Anchor Bolt	Min. A.B. Embed (D)		Holdown Post ①	
			Stem Wall	Footing	if 2x4	if 2x6
HDU2-SDS2.5	(6)SDS 1/4"x2 1/2"	5/8"φ	12"	4"	(2) 2x4	(2) 2x6
HDU4-SDS2.5	(10)SDS 1/4"x2 1/2"	5/8"φ	18"	6"	4x4	4x6
HDU5-SDS2.5	(14)SDS 1/4"x2 1/2"	5/8"φ	SB5/8x24	7"	4x4	4x6
HDU8-SDS2.5	(20)SDS 1/4"x2 1/2"	7/8"φ	SSTB28	8"	4x6	6x6
HDU11-SDS2.5	(30)SDS 1/4"x2 1/2"	1"φ	SB1x30	10"	4x8	6x6
HDU14-SDS2.5	(36)SDS 1/4"x2 1/2"	1"φ	N/A	12"	4x8	6x6

① MINIMUM SIZE OF POST AT END OF WALL UNLESS OTHERWISE NOTED ON FRAMING PLANS.

11

Typical HDU Holdown 11



12

Pipe and Trench Locations 12

REVISIONS:
 1 Permit Set REV1 Nov. 8, 2024

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 Korpela + Wiens
 Residence
 8441 SE 33rd Place
 Mercer Island, WA

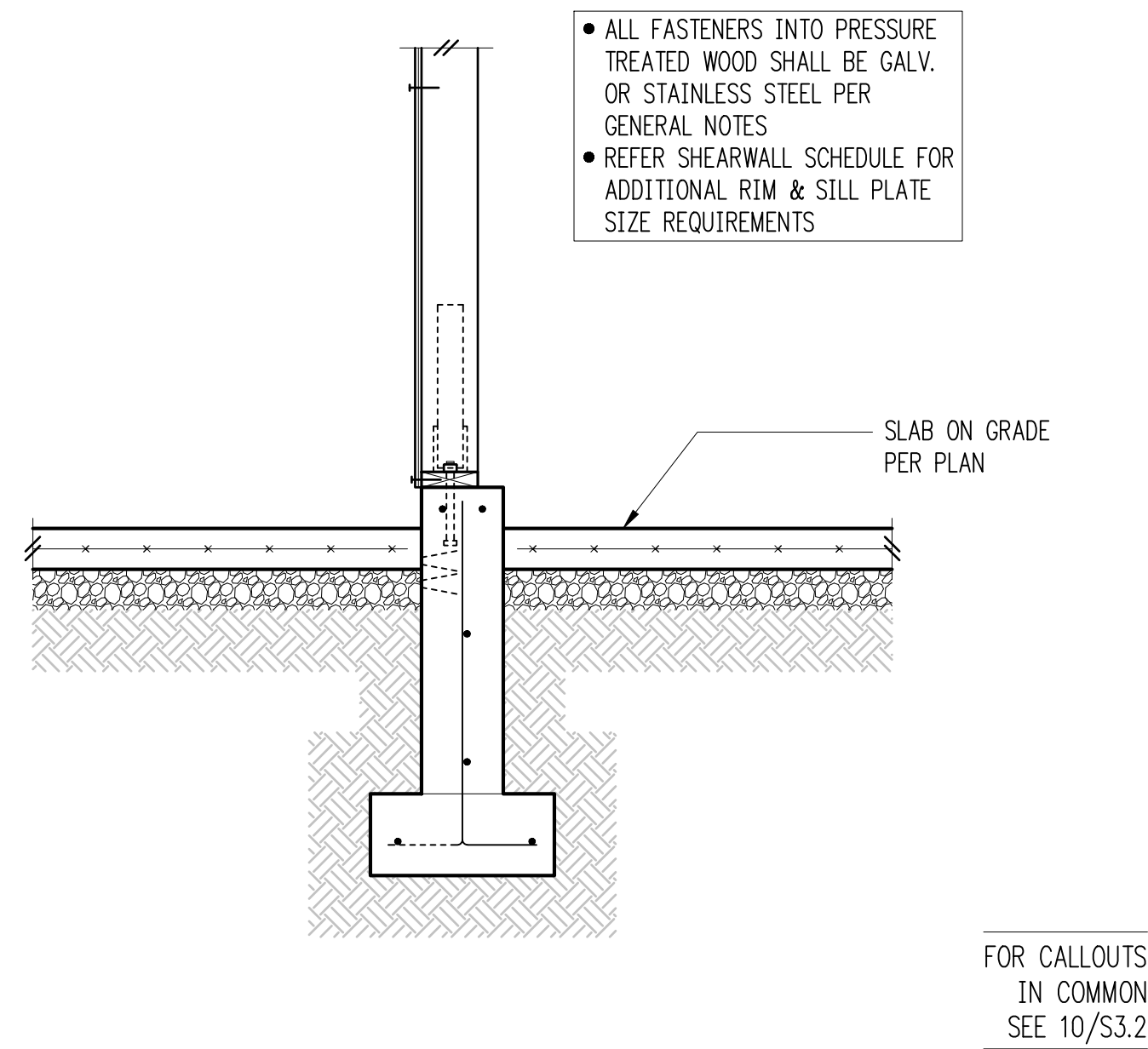
ARCHITECT:
 Jessyca Poole
 7718 Fremont Ave N
 Seattle, WA 98103
 PH 206.484.3802

ISSUE:
 Permit

SHEET TITLE:
 Typical
 Concrete
 Details

SCALE:
 3/4" = 1'-0" U.N.O.
 DATE:
 Dec. 14, 2023
 PROJECT NO:
 02327-2023-04
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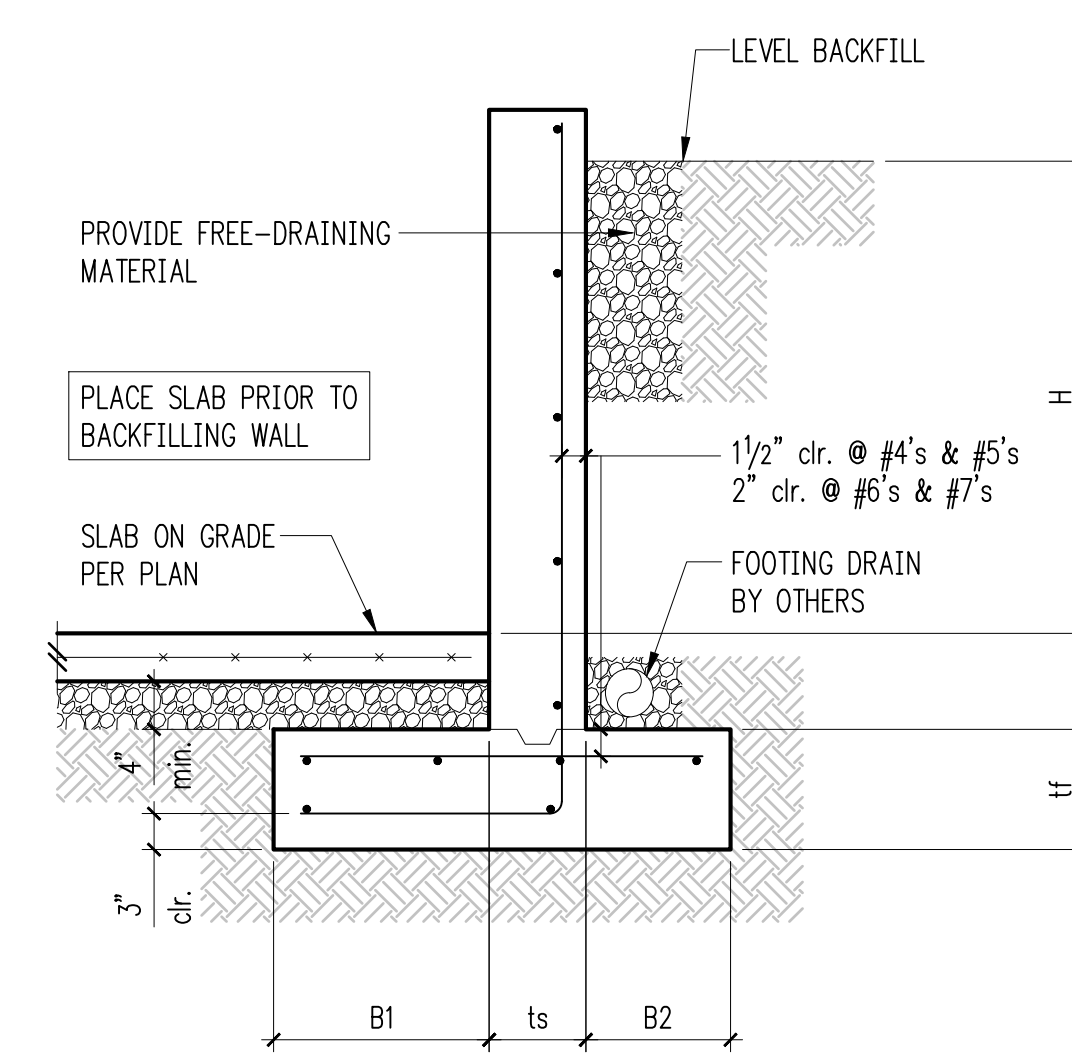
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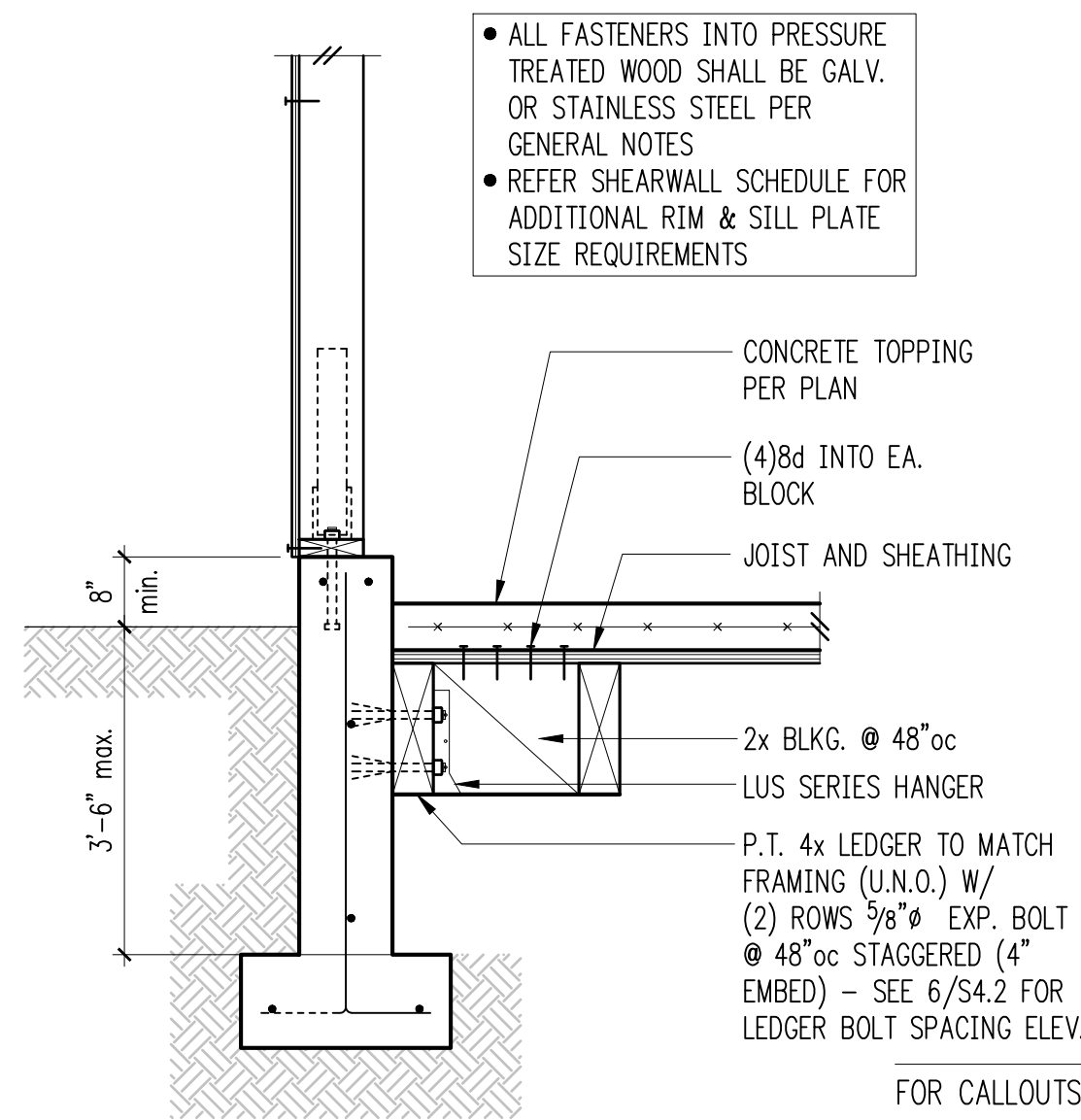
Garage Wall w/ Slab on Grade 2

Retaining Wall Schedule W/ Slab

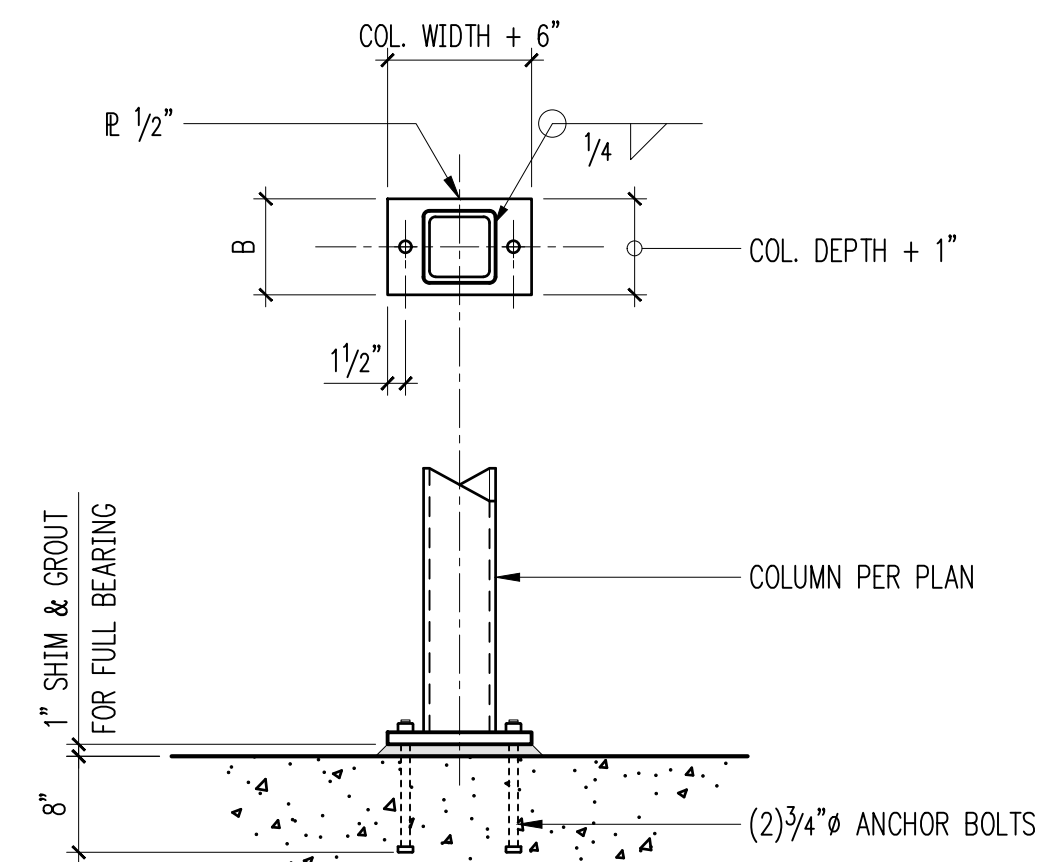
H (ft.)	B1	ts	B2	ff	Stem Reinforcing		Footing Reinforcing	
					Vert.	Horiz.	Top	Longit.
3'-0"	5"	8"	5"	8"	#4 @ 12"oc	#4 @ 12"oc	-	(2)#4
4'-0"	1'-0"	8"	5"	10"	#4 @ 12"oc	#4 @ 12"oc	-	(3)#5
6'-0"	1'-8"	8"	7"	10"	#5 @ 12"oc	#4 @ 12"oc	-	(4)#4
8'-0"	2'-9"	10"	1'-0"	12"	#6 @ 12"oc	#4 @ 12"oc	#5 @ 12"oc	(5)#5
10'-0"	3'-9"	10"	1'-6"	14"	#7 @ 10"oc	#4 @ 12"oc	#6 @ 12"oc	(6)#6



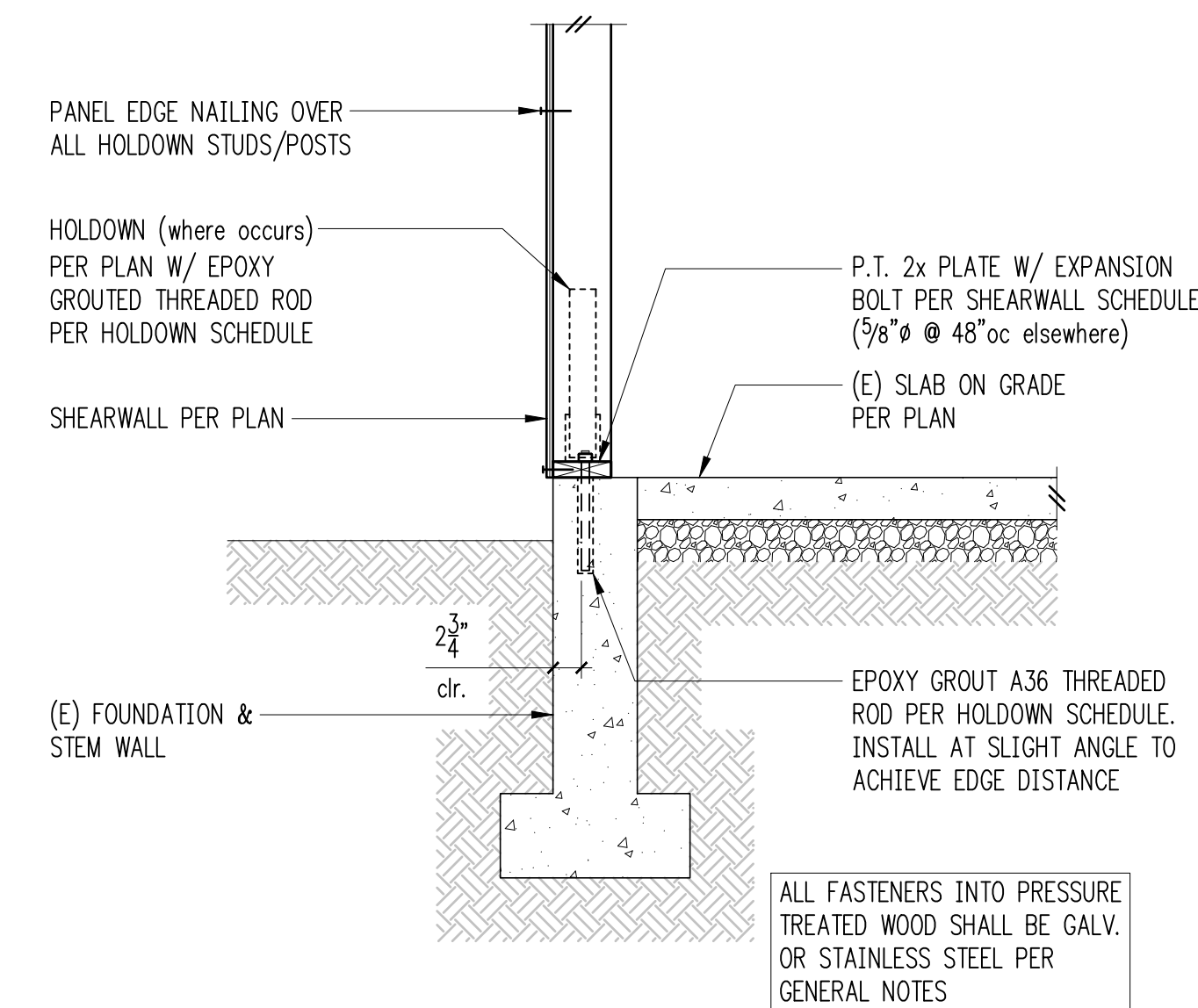
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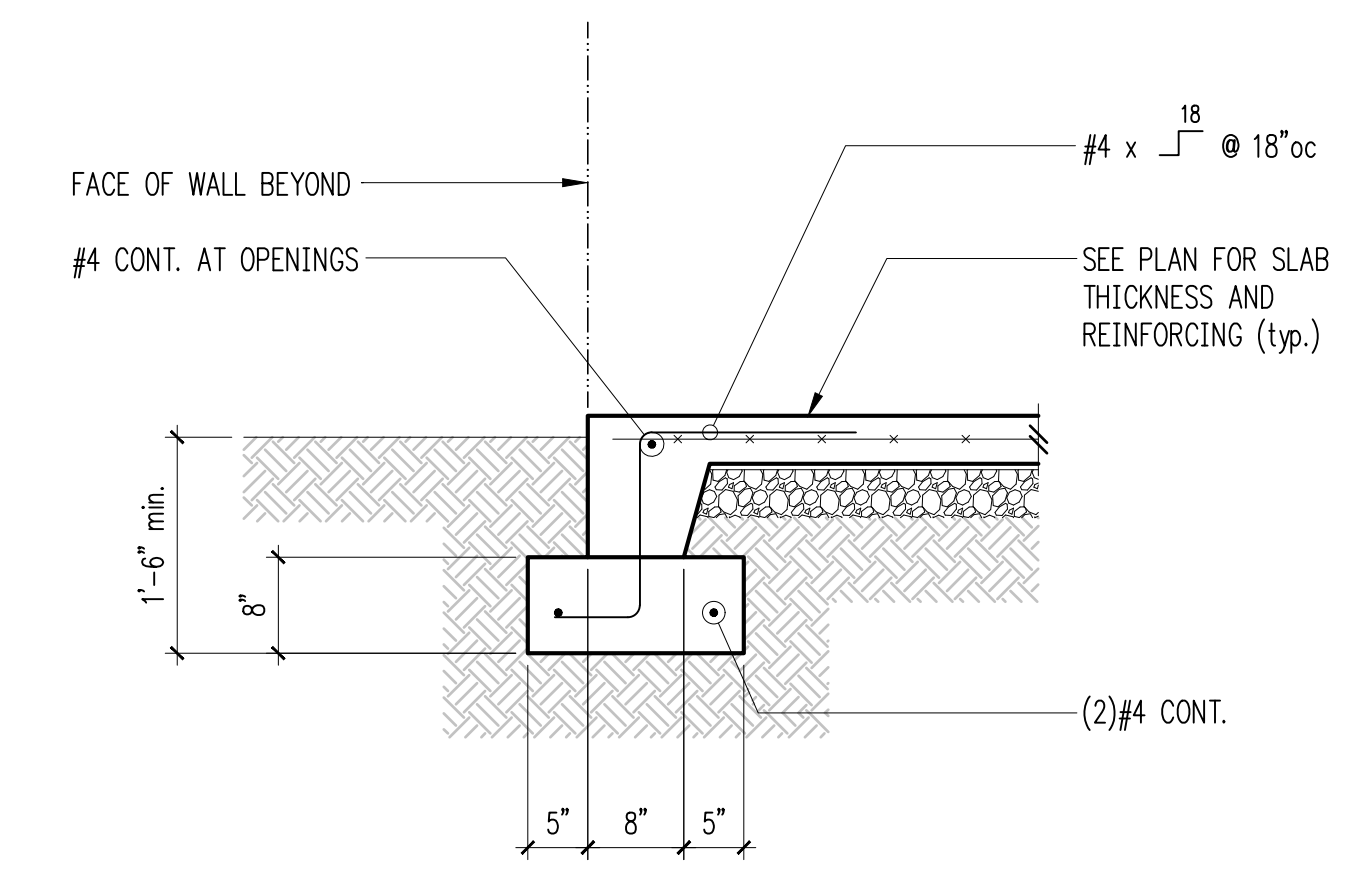
Garage Wall w/ Slab on Grade 5



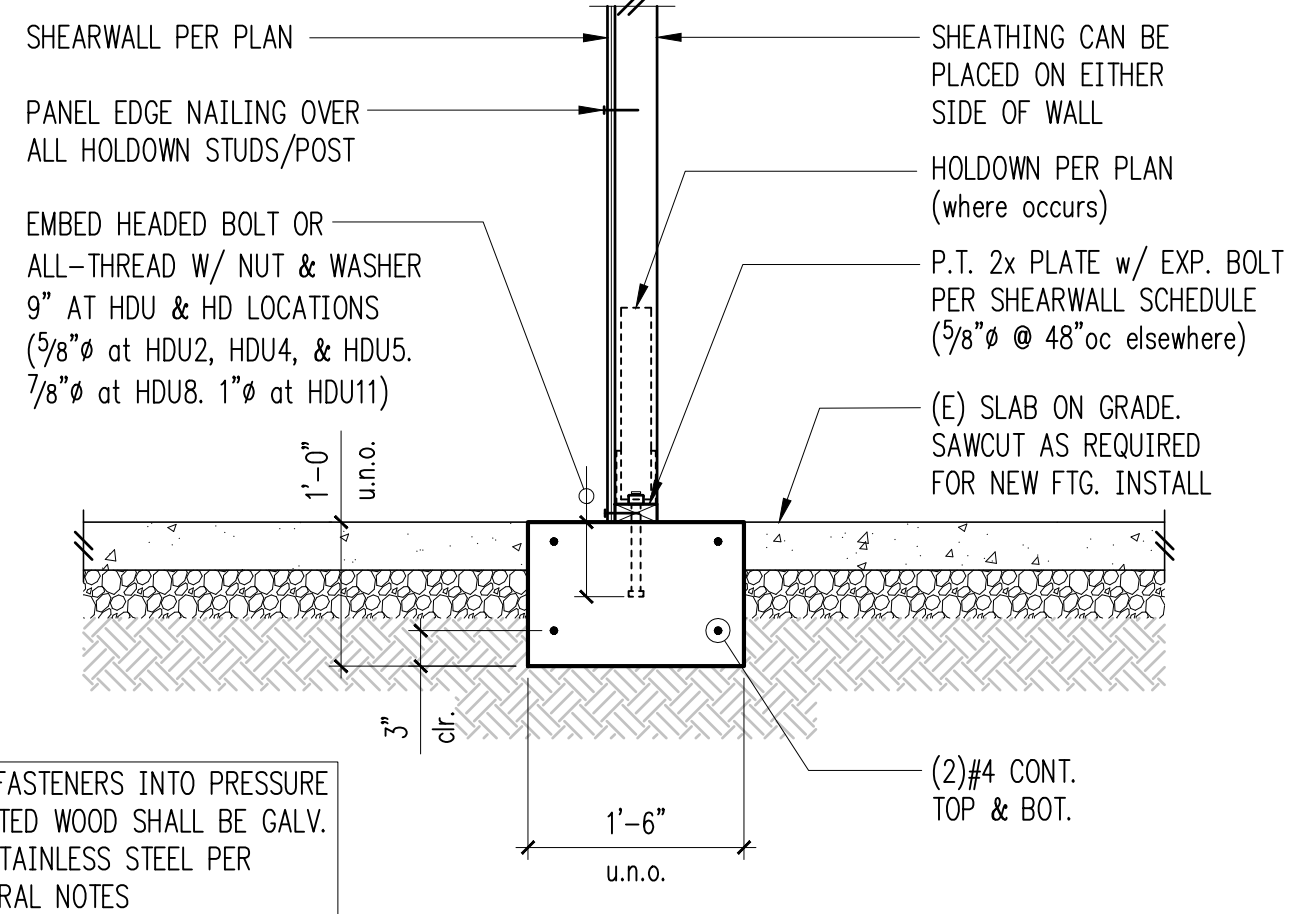
Baseplate - HSS Column 6



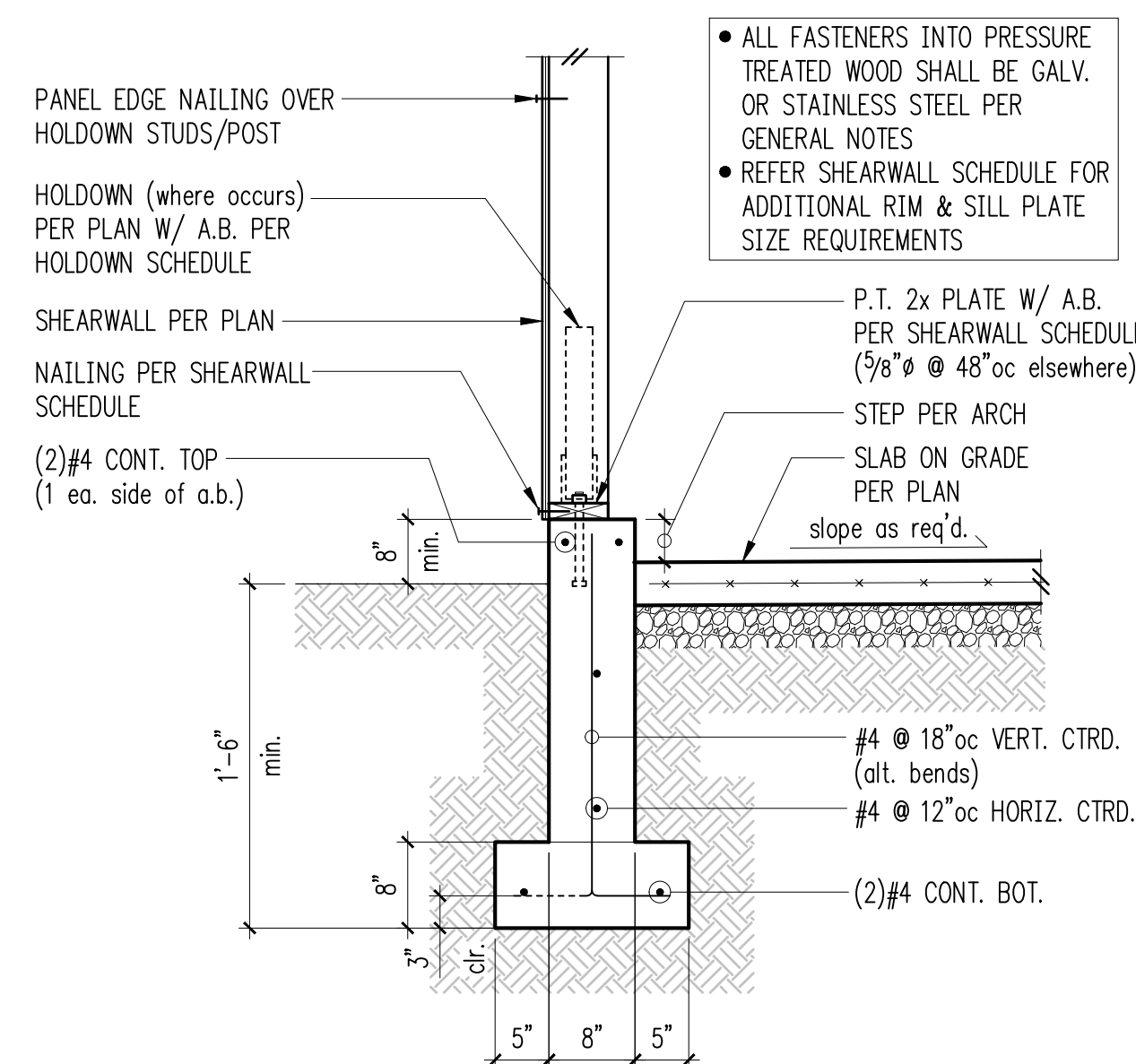
New Exterior Wall W/ Existing Slab & Foundation 7



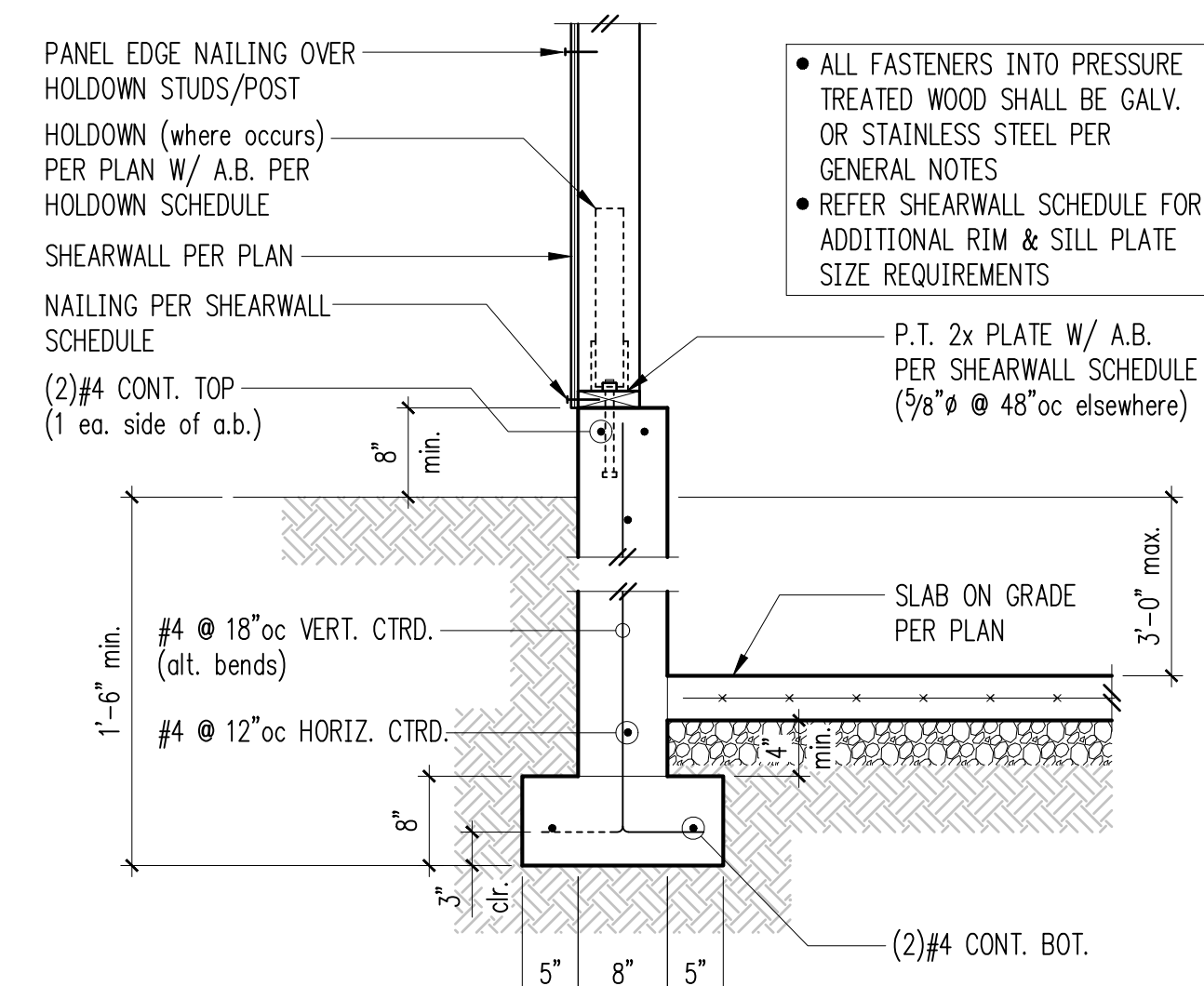
Typical Turned-Down Slab Edge 8



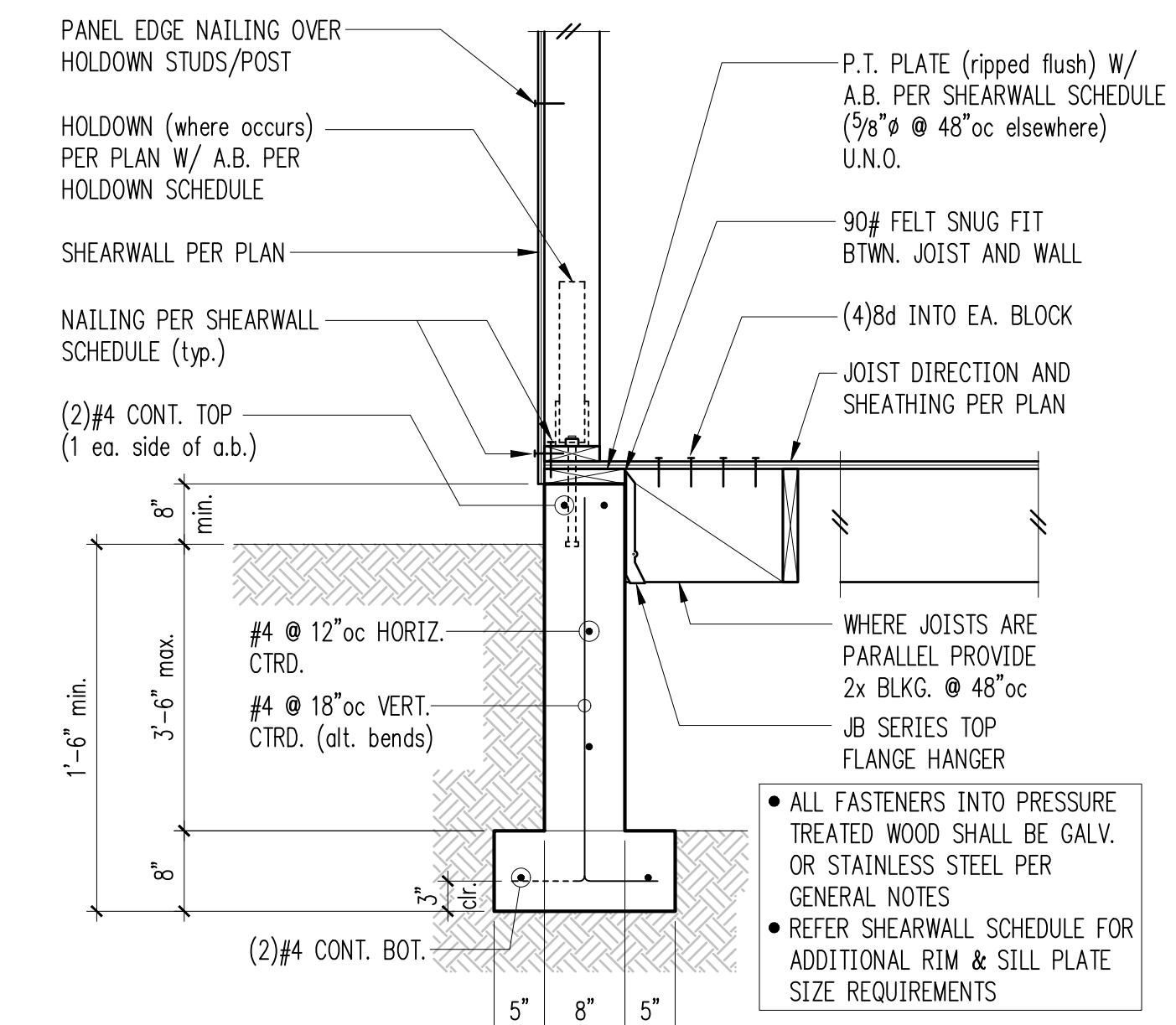
New Interior Wall & Foundation W/ Existing Slab 9



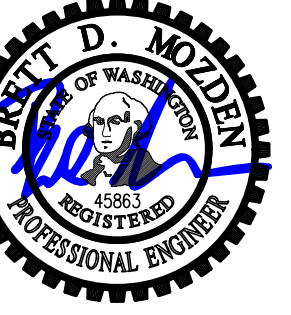
6' Garage Wall w/ Slab on Grade 10



Exterior Wall w/ Slab on Grade & High Grade 11



Exterior Framing at Crawl Space 12



DRAWN: CFG
 DESIGN: BDM
 CHECKED: BDM
 APPROVED: BDM

1

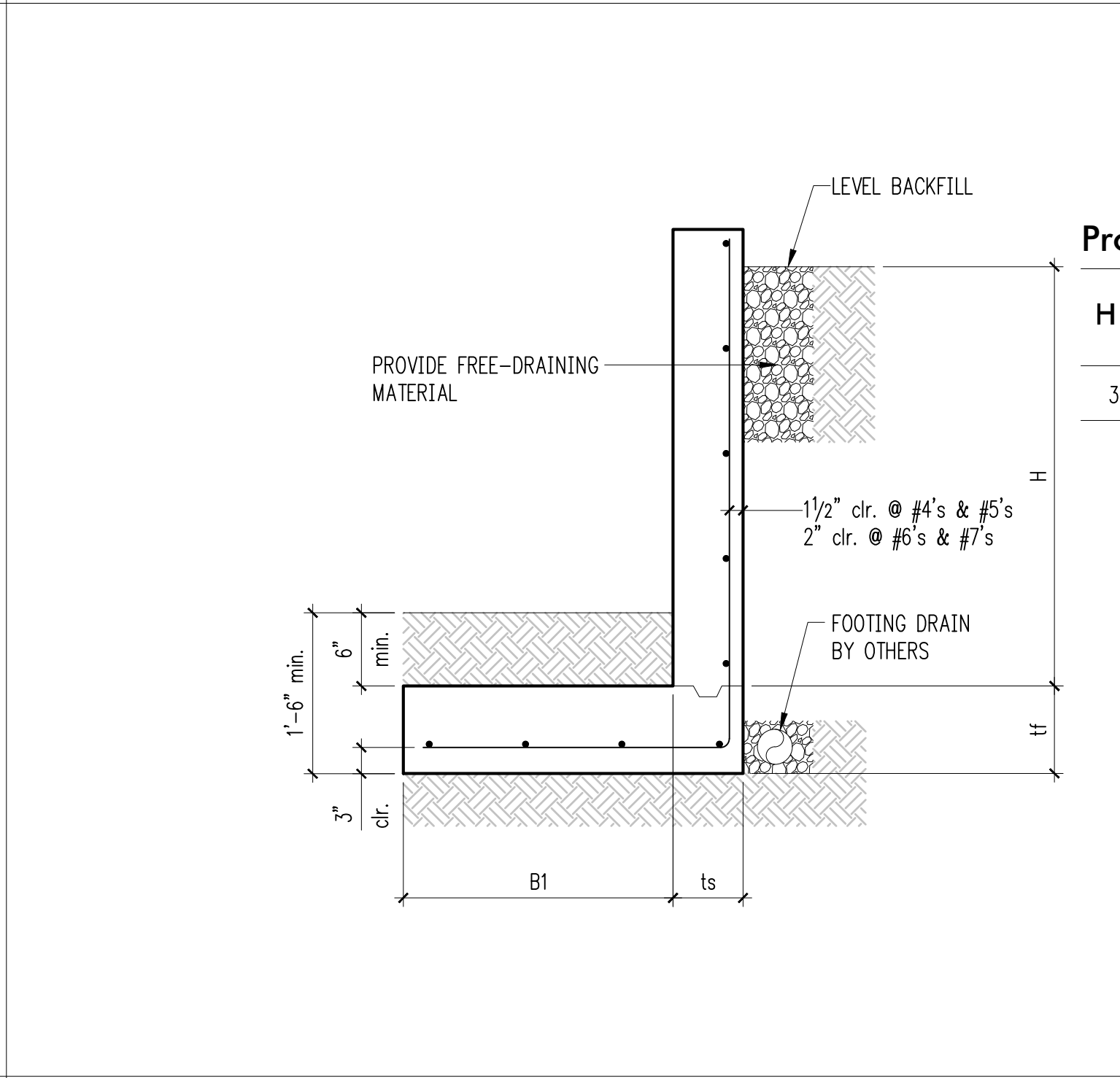
2

3

4

5

6



Property Line Wall w/ Key Schedule

H (ft.)	B1	ts	ff	D	Stem Reinforcing		Footing Reinforcing	
					Vert.	Horiz.	Bot.	Longit.
3'-0"	2'-5"	6"	10"	6"	#4 @ 12"oc	#4 @ 12"oc	-	(2)#4

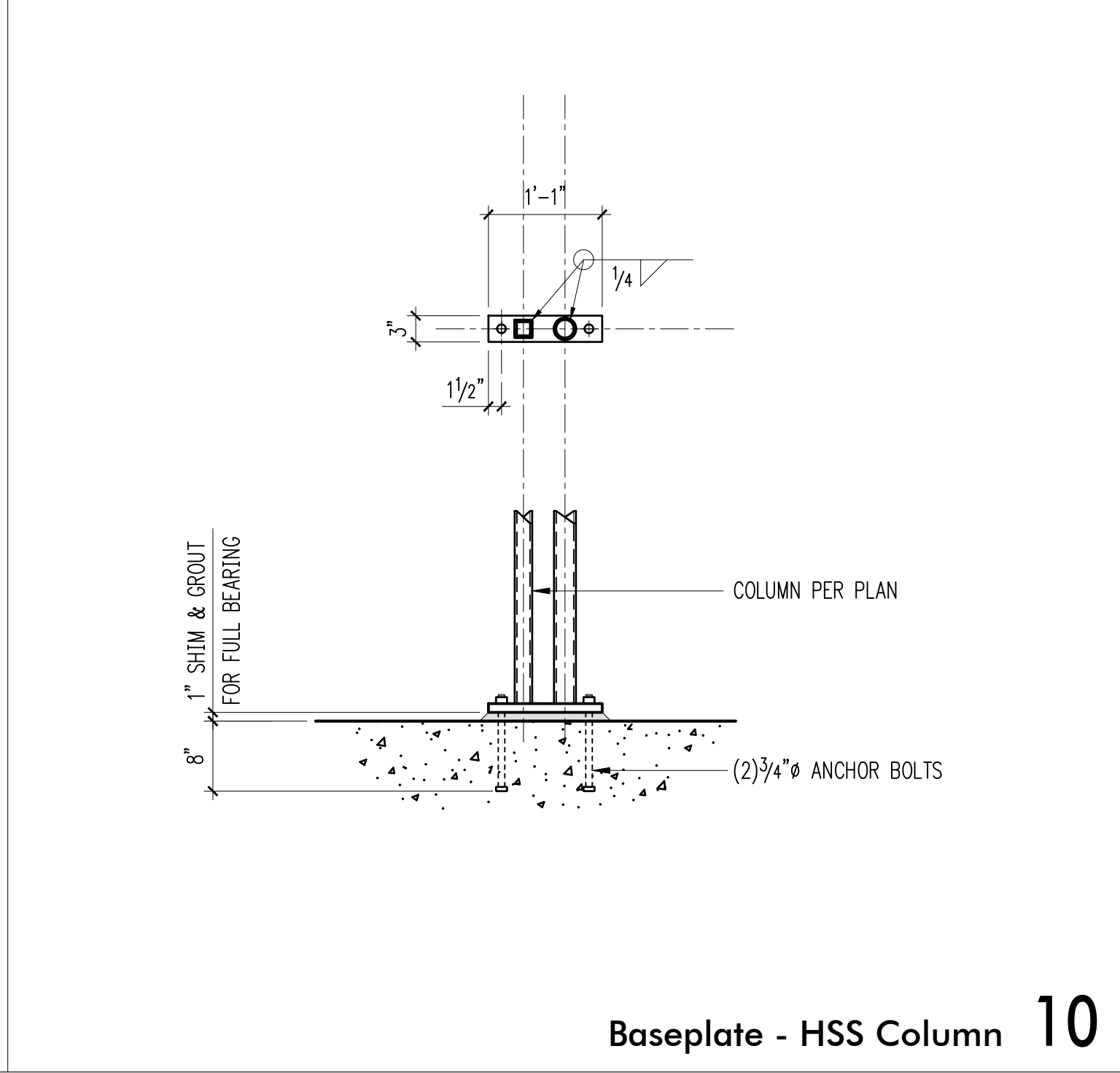
REVISIONS:
 1 Permit Set REV1 Nov. 8, 2024

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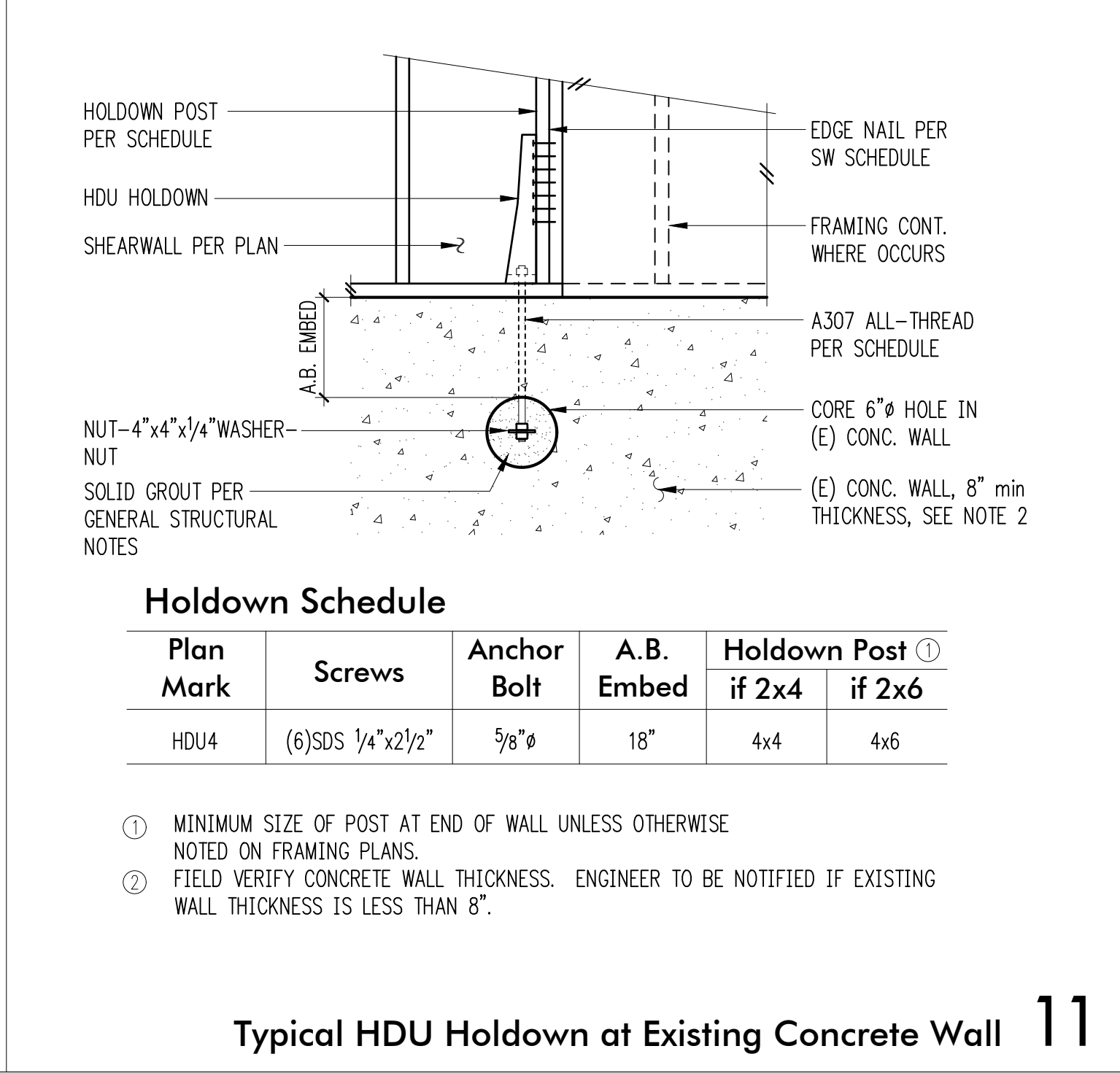
PROJECT TITLE:
 Korpela + Wiens
 Residence
 8441 SE 33rd Place
 Mercer Island, WA

8

9



Baseplate - HSS Column 10

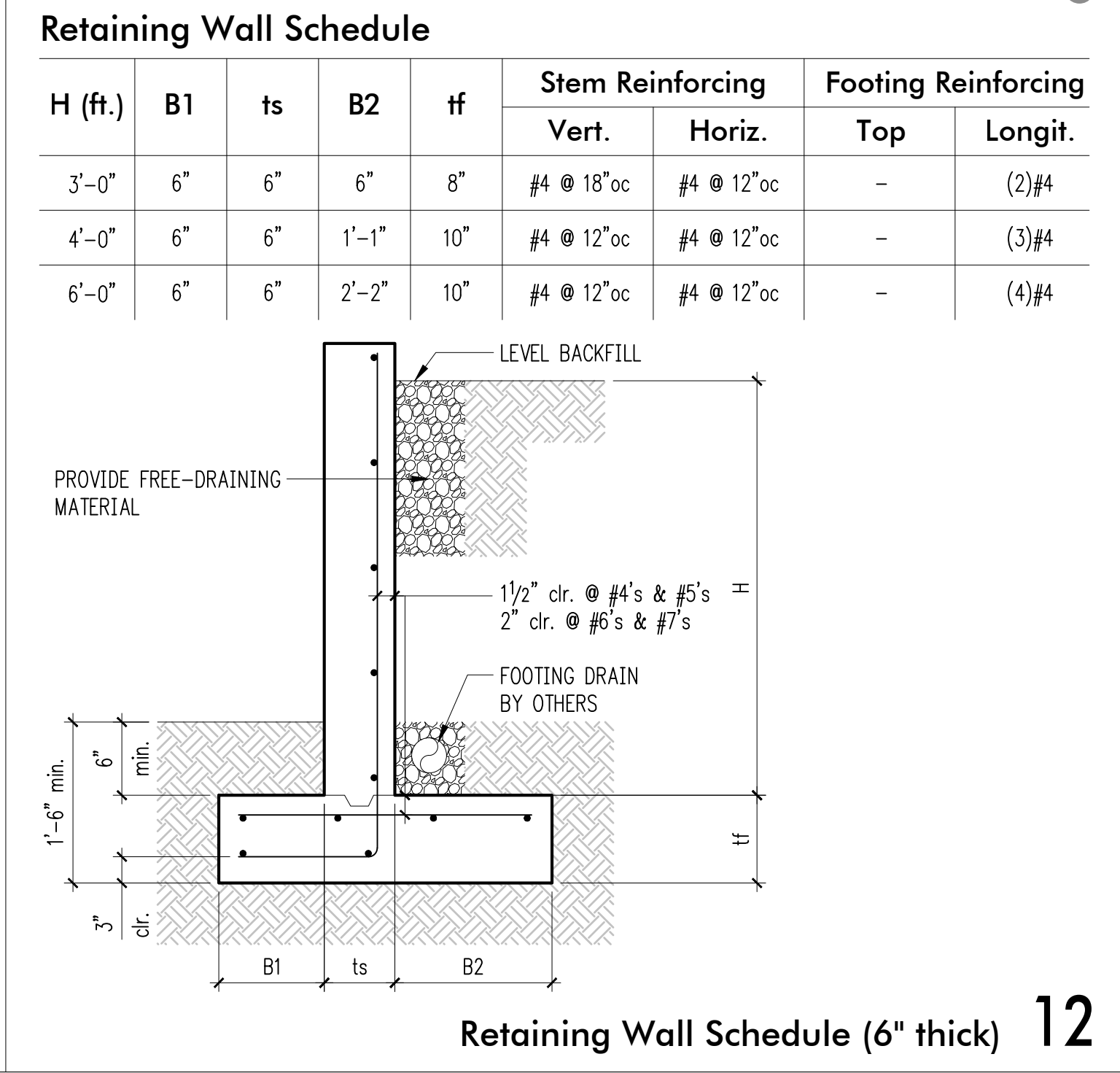


Holdown Schedule

Plan Mark	Screws	Anchor Bolt	A.B. Embed	Holdown Post ① if 2x4	if 2x6
HDU4	(6)SDS 1/4"x2/2"	5/8"φ	18"	4x4	4x6

- ① MINIMUM SIZE OF POST AT END OF WALL UNLESS OTHERWISE NOTED ON FRAMING PLANS.
- ② FIELD VERIFY CONCRETE WALL THICKNESS. ENGINEER TO BE NOTIFIED IF EXISTING WALL THICKNESS IS LESS THAN 8".

Typical HDU Holdown at Existing Concrete Wall 11



Retaining Wall Schedule

H (ft.)	B1	ts	B2	ff	Stem Reinforcing		Footing Reinforcing	
					Vert.	Horiz.	Top	Longit.
3'-0"	6"	6"	6"	8"	#4 @ 18"oc	#4 @ 12"oc	-	(2)#4
4'-0"	6"	6"	1'-1"	10"	#4 @ 12"oc	#4 @ 12"oc	-	(3)#4
6'-0"	6"	6"	2'-2"	10"	#4 @ 12"oc	#4 @ 12"oc	-	(4)#4

Retaining Wall Schedule (6" thick) 12

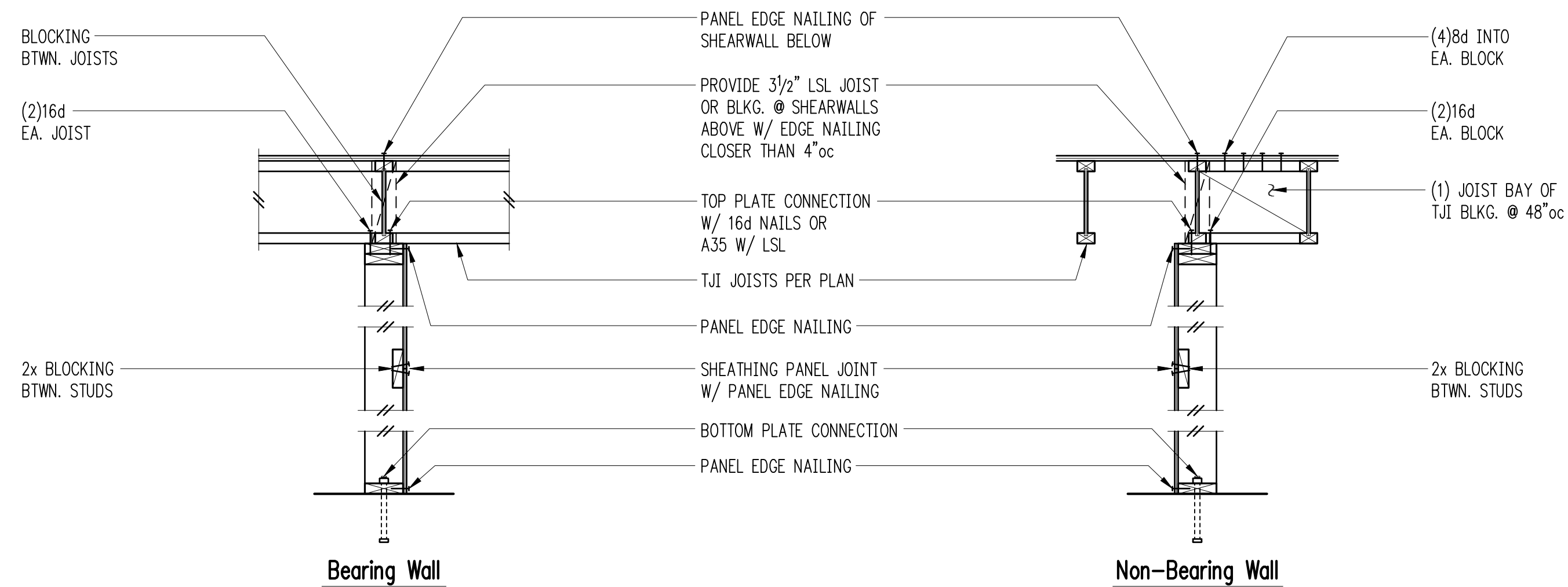
ARCHITECT:
 Jessyca Poole
 7718 Fremont Ave N
 Seattle, WA 98103
 PH 206.484.3802

ISSUE:
 Permit

SHEET TITLE:
 Concrete Details

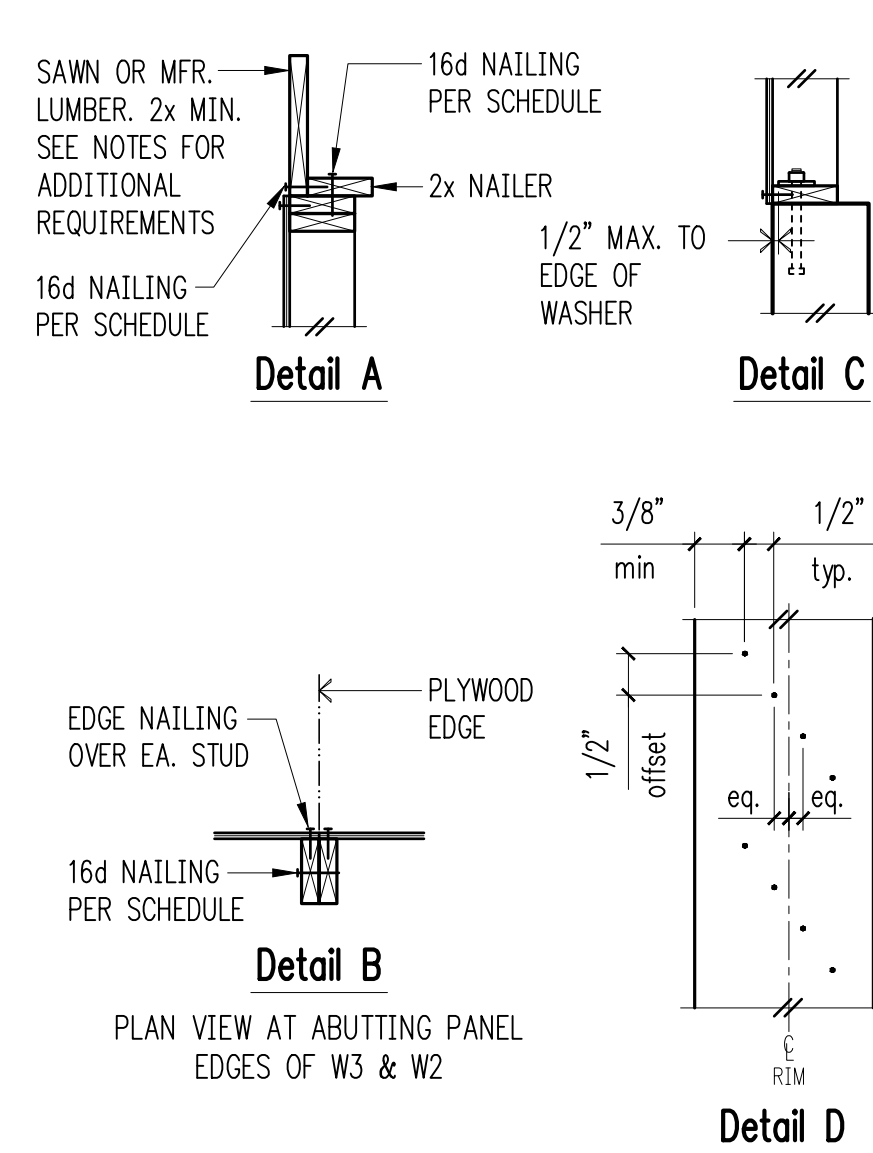
SCALE:
 3/4" = 1'-0" U.N.O.
 DATE:
 Dec. 14, 2023
 PROJECT NO:
 02327-2023-04
 SHEET NO:

S3.3



NOTE:
SEE SHEARWALL SCHEDULE FOR ALL NAILING AND CONNECTIONS, NOT OTHERWISE NOTED

Typical Shearwall Construction 2

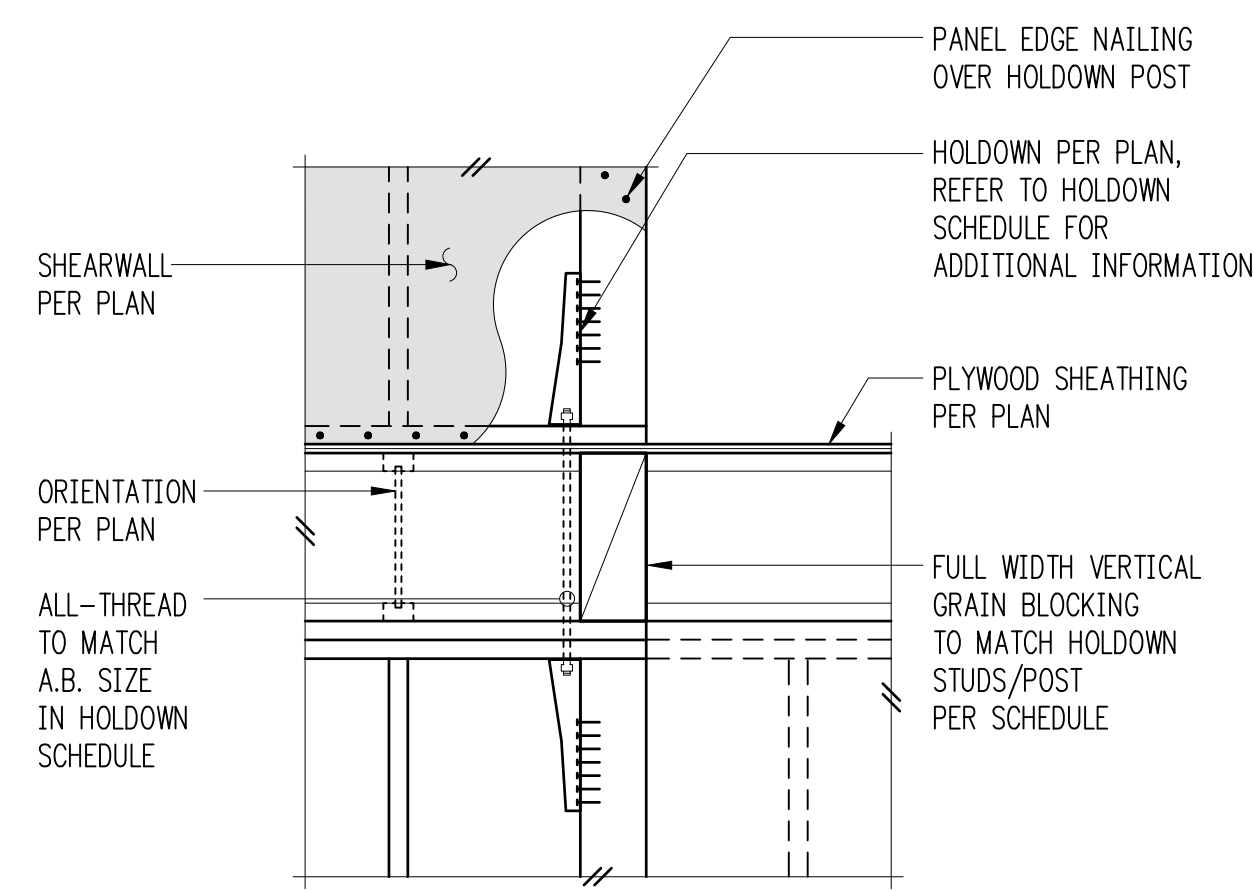


Shearwall Schedule ①②③④⑤⑥⑦

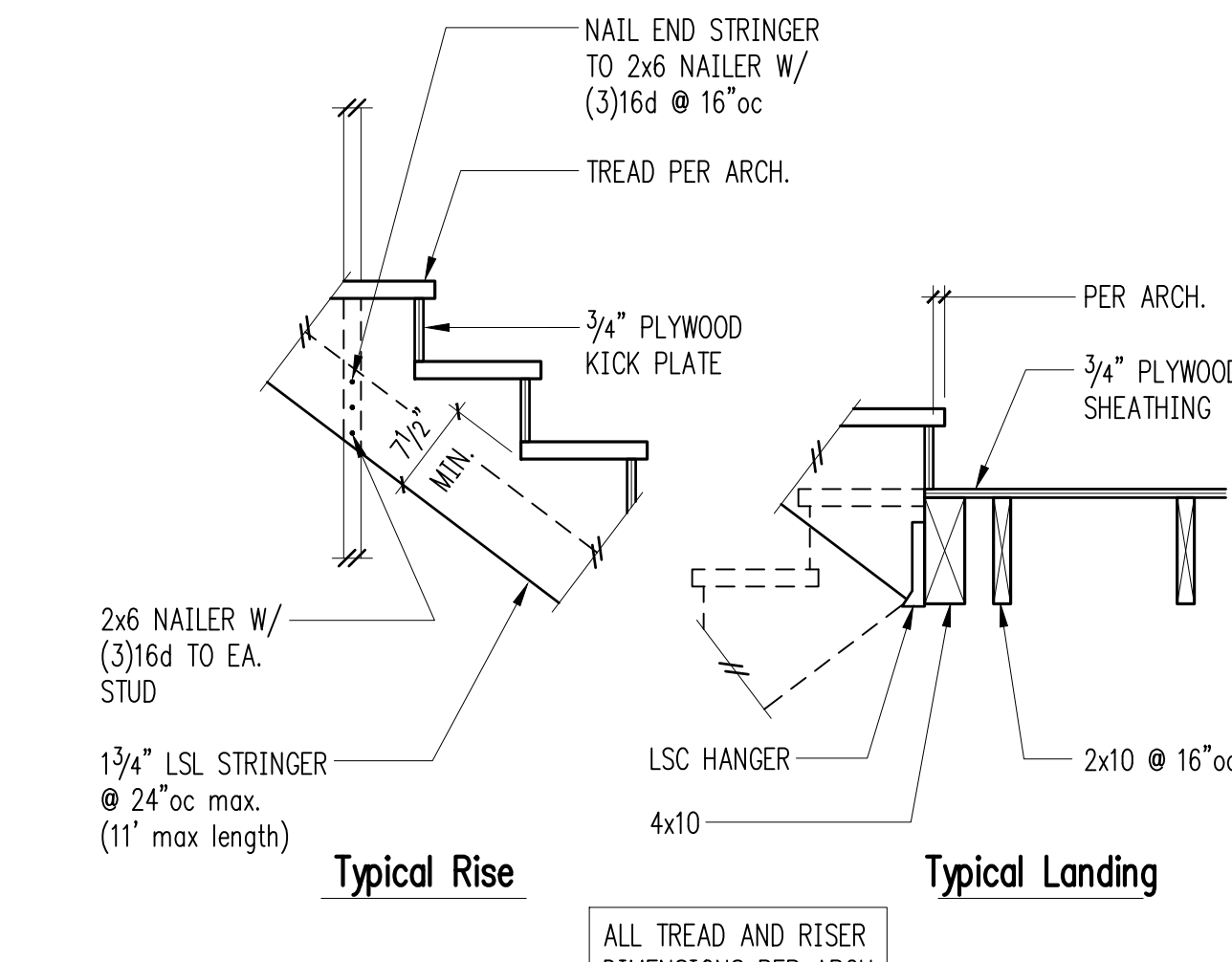
Mark	Sheathing	Panel Edge Nailing	Top Plate Connection		Base Plate Connection	
			if TJI	if Wood ⑧⑨	at Wood ⑩	at Concrete
W6	15/32" CDX PLYWOOD	8d @ 6"oc	16d @ 6"oc	A35 @ 24"oc	16d @ 6"oc	5/8" A.B. @ 48"oc
W4	15/32" CDX PLYWOOD	8d @ 4"oc	16d @ 4"oc	A35 @ 16"oc	(2)rows 16d @ 6"oc	5/8" A.B. @ 32"oc
W3 ①	15/32" CDX PLYWOOD	8d @ 3"oc	(2)rows 16d @ 4"oc	A35 @ 12"oc	(2)rows 16d @ 6"oc	5/8" A.B. @ 24"oc
W2 ②	15/32" CDX PLYWOOD	8d @ 2"oc	(2)rows 16d @ 4"oc	A35 @ 9"oc	(2)rows 16d @ 4"oc ⑪	5/8" A.B. @ 16"oc

- ① BLOCK PANEL EDGES WITH 2x MIN. LAID FLAT AND NAIL PANELS TO INTERMEDIATE SUPPORTS WITH 8d @ 12"oc.
- ② 8d NAILS SHALL BE 0.131"φ x 2 1/2" (common) - 16d NAILS SHALL BE 0.135"φ x 3 1/2" (box)
- ③ EMBED ANCHOR BOLTS AT LEAST 7". DRILLED AND EPOXYED THREADED ROD MAY BE SUBSTITUTED FOR ANCHOR BOLTS WITH 6" EMBEDMENT. TITEN HD SCREW ANCHORS MAY BE SUBSTITUTED FOR ANCHOR BOLTS W/ 4" EMBEDMENT. ALL BOLTS SHALL HAVE 3" x 3" x 1/4" MIN. PLATE WASHERS. PLATE WASHERS SHALL EXTEND TO WITHIN 1/2" OF THE EDGE OF THE BOTTOM PLATE ON THE SIDE WITH SHEATHING. SEE DETAIL C.
- ④ 3x STUDS OR DOUBLE STUDS NAILED TOGETHER W/ BASE PLATE NAILING ARE REQUIRED AT ABUTTING PANEL EDGES OF W3 AND W2. SEE DETAIL B. WHERE 3x STUDS ARE USED FOR W2, STAGGER NAILS AT ADJOINING PANEL EDGES.
- ⑤ TWO STUDS MINIMUM ARE REQUIRED AT EACH END OF ALL SHEARWALLS AND ALL END STUDS SHALL RECEIVE PANEL EDGE NAILING. SEE PLANS AND HOLDOWN SCHEDULE FOR ALTERNATE REQUIREMENTS.
- ⑥ ALL EXTERIOR WALLS SHALL BE W6, UNLESS NOTED OTHERWISE.
- ⑦ 7/16" O.S.B. MAY BE SUBSTITUTED FOR 15/32" CDX.
- ⑧ LTP4's (HORIZONTAL ORIENTATION) W/ 8d COMMON MAY BE SUBSTITUTED FOR A35's AT CONTRACTORS OPTION.
- ⑨ A 2x NAILER ATTACHED W/ BASE PLATE NAILING PER DETAIL A MAY BE SUBSTITUTED FOR A35's AT CONTRACTORS OPTION.
- ⑩ AT MULTI-ROW NAILING, MINIMUM OFFSET BETWEEN ROWS AND ROW SPACING 1/2", SEE DETAIL D.
- ⑪ PROVIDE (3) ROWS 16d @ 6"oc AT LVL RIMS.

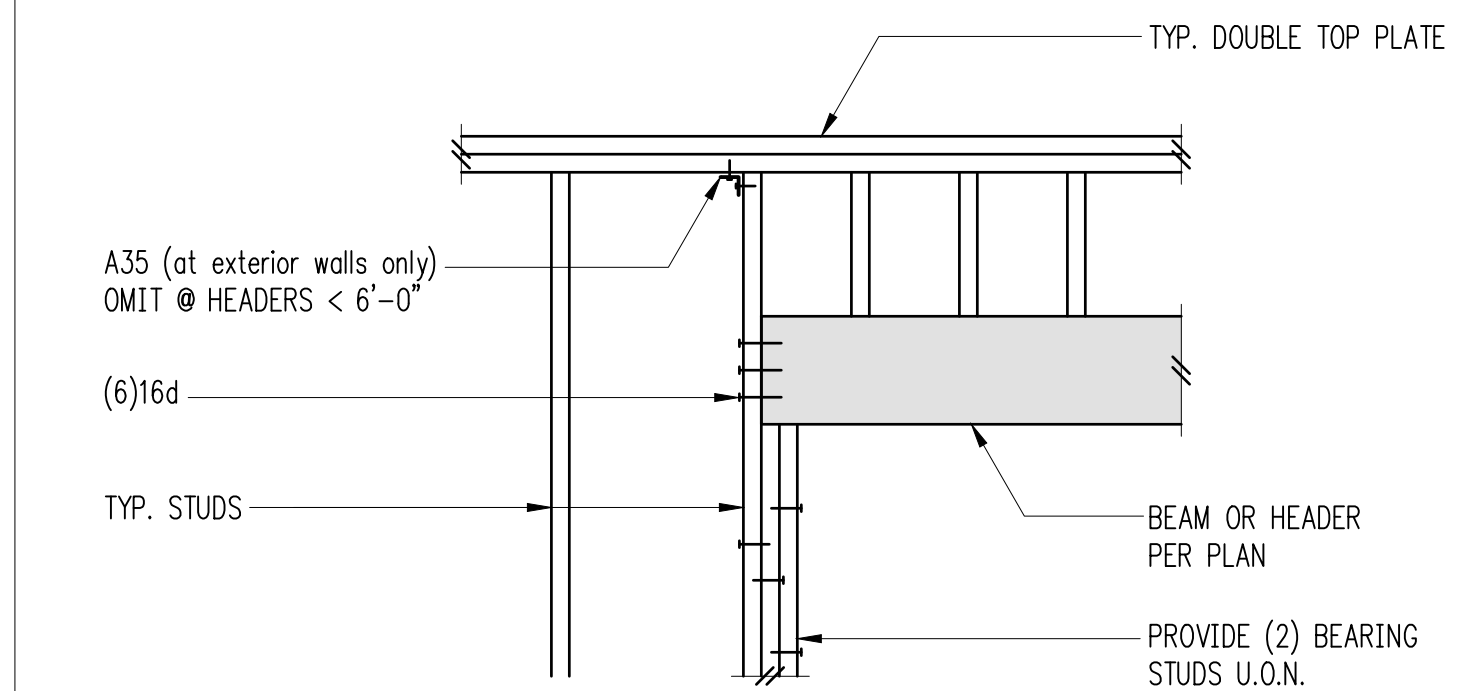
Shearwall Schedule - (Sheathed One Side) 4



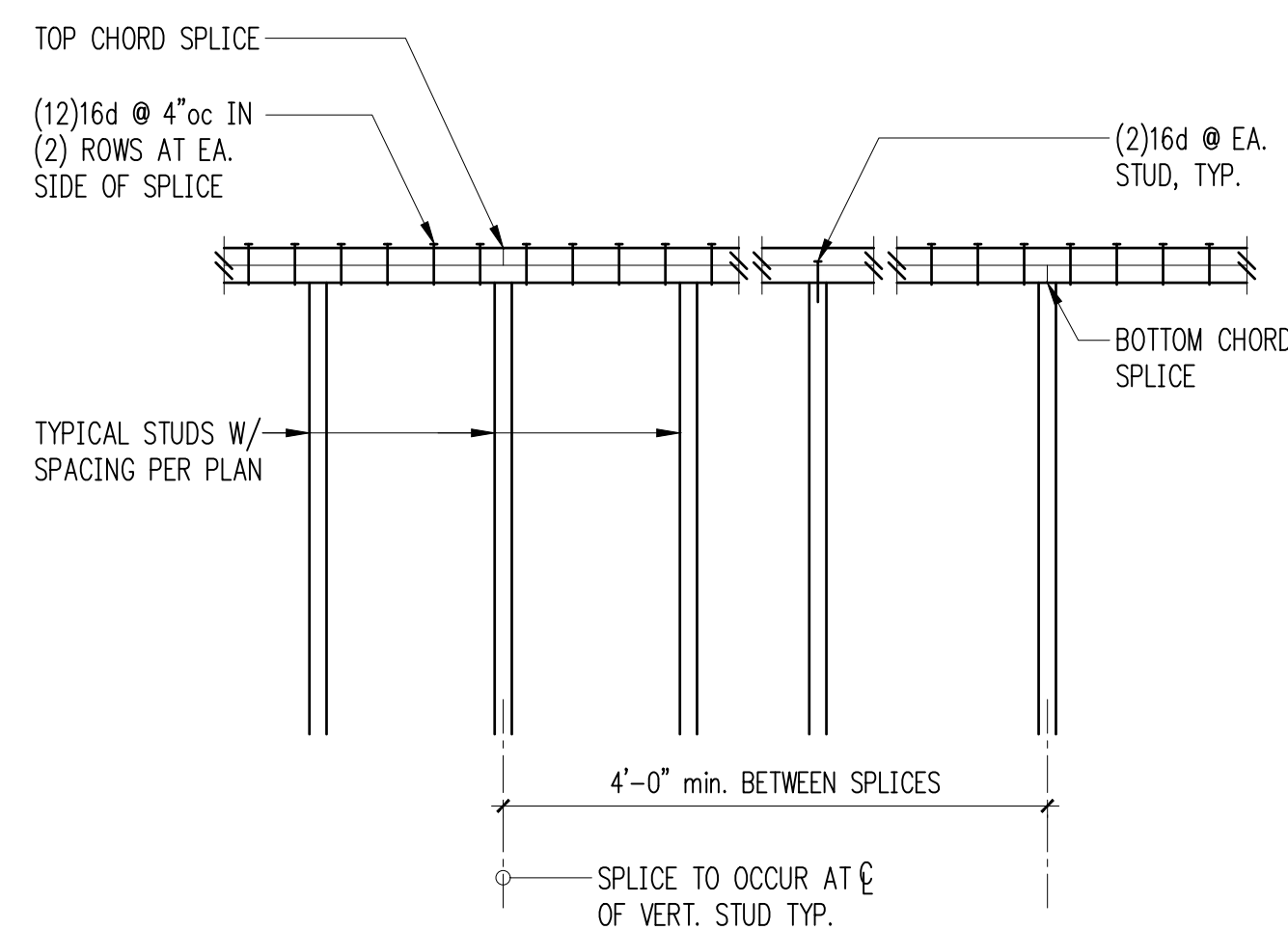
Typical HDU Holdowns (W/TJI) 6



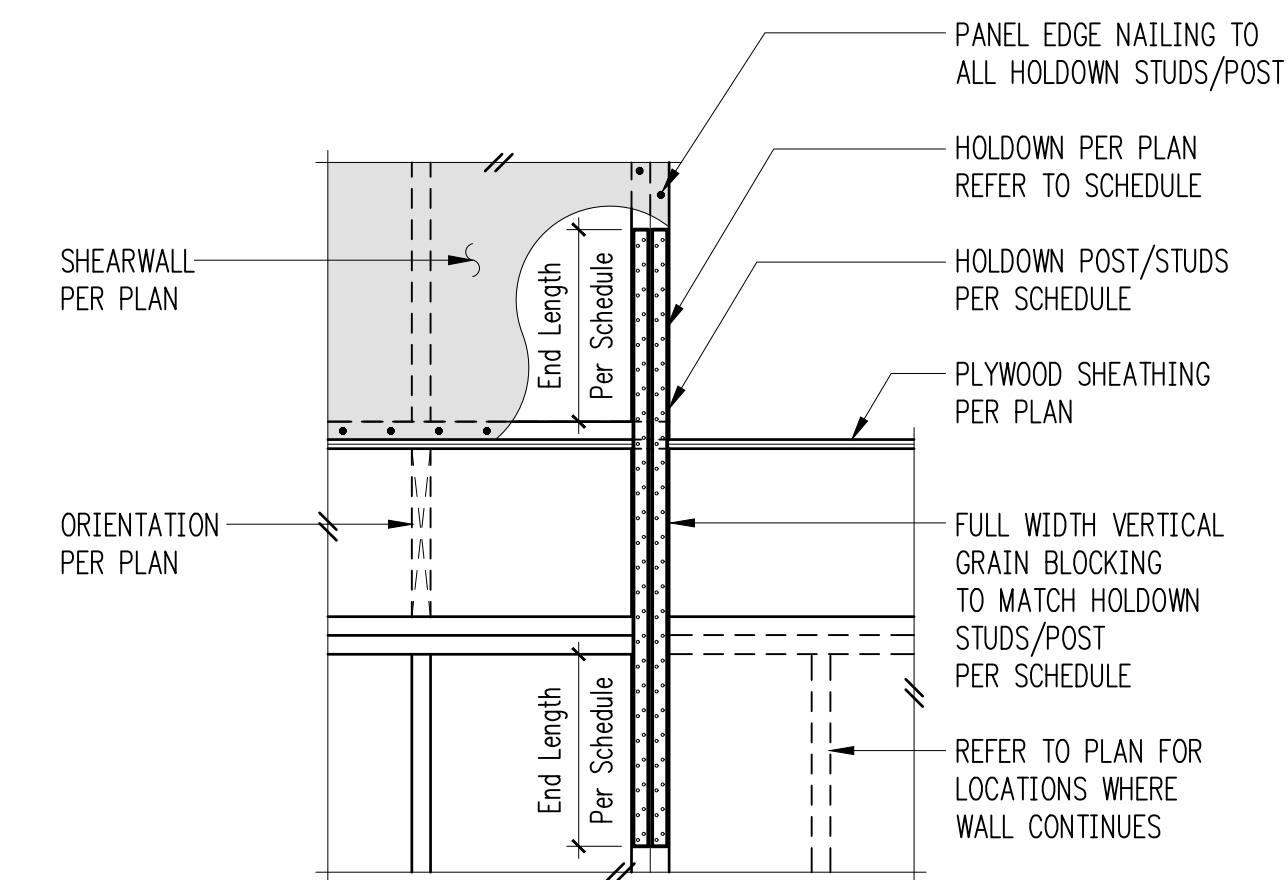
Typical Stair and Landing Detail 7



Typical Header Support w/2 Bearing Studs 8



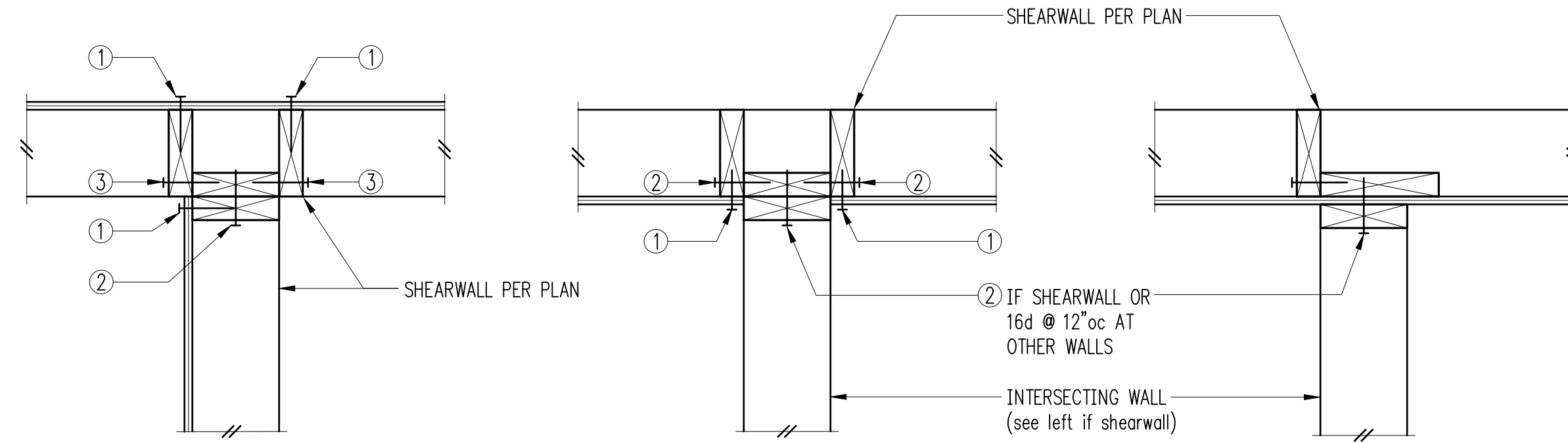
Typical Top Plate Splice 9



Holdown Strap Schedule

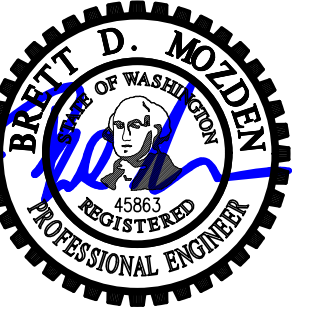
Plan Mark	End Length	#Nails Ea. End Length	Holdown Studs/Post	
			if 2x4	if 2x6
CS16	1'-2"	(13) 8d	(1) 2x4	(1) 2x6
CMST14	2'-6"	(33) 10d	4x6	4x6
CMST12	3'-3"	(43) 10d	4x8	6x6

Typical Holdown Schedule 10

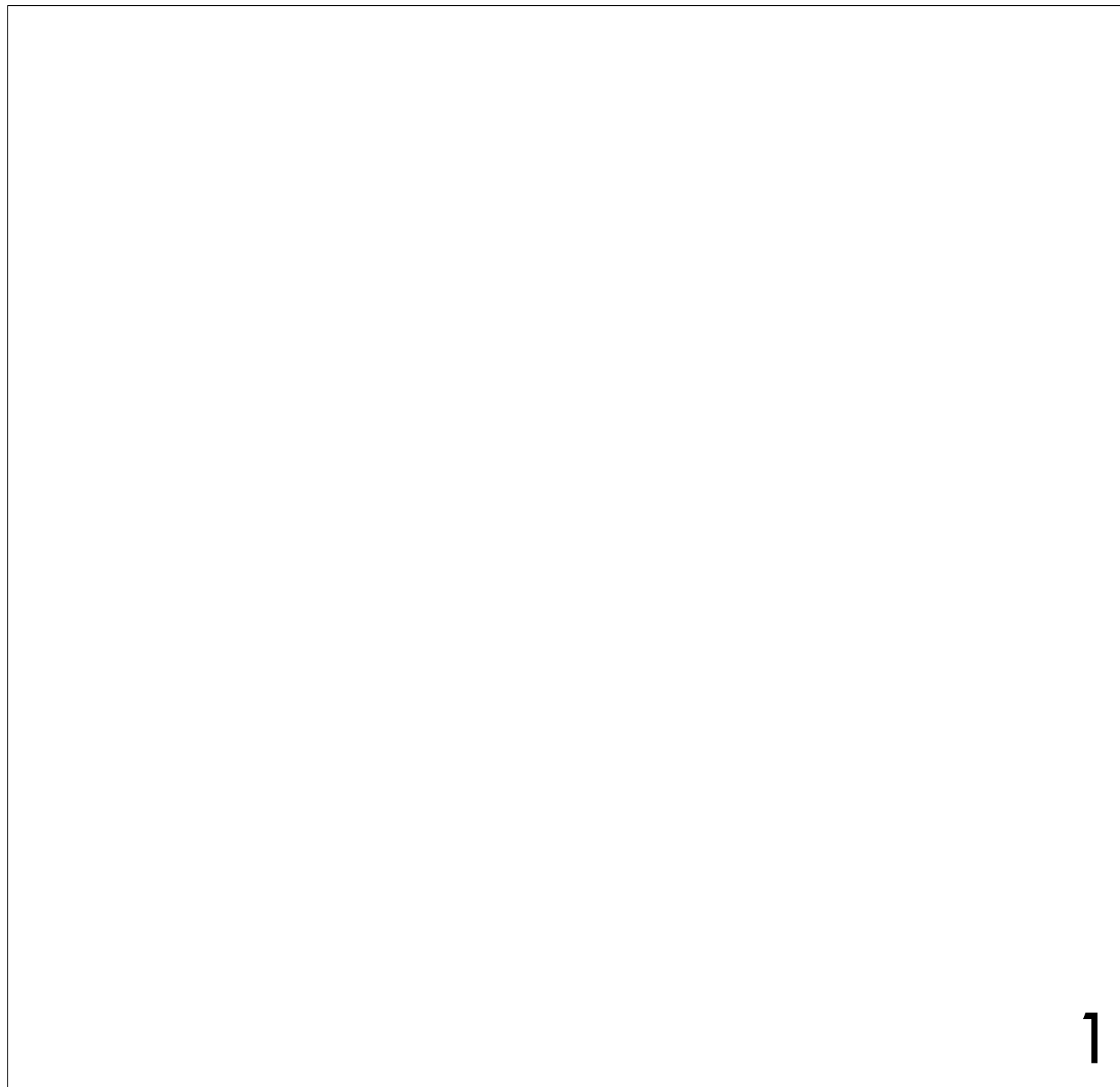


- ① PLYWOOD PANEL EDGE NAILING PER SHEARWALL SCHEDULE
- ② BASE PLATE NAILING PER SHEARWALL SCHEDULE
- ③ 16d @ 8"oc

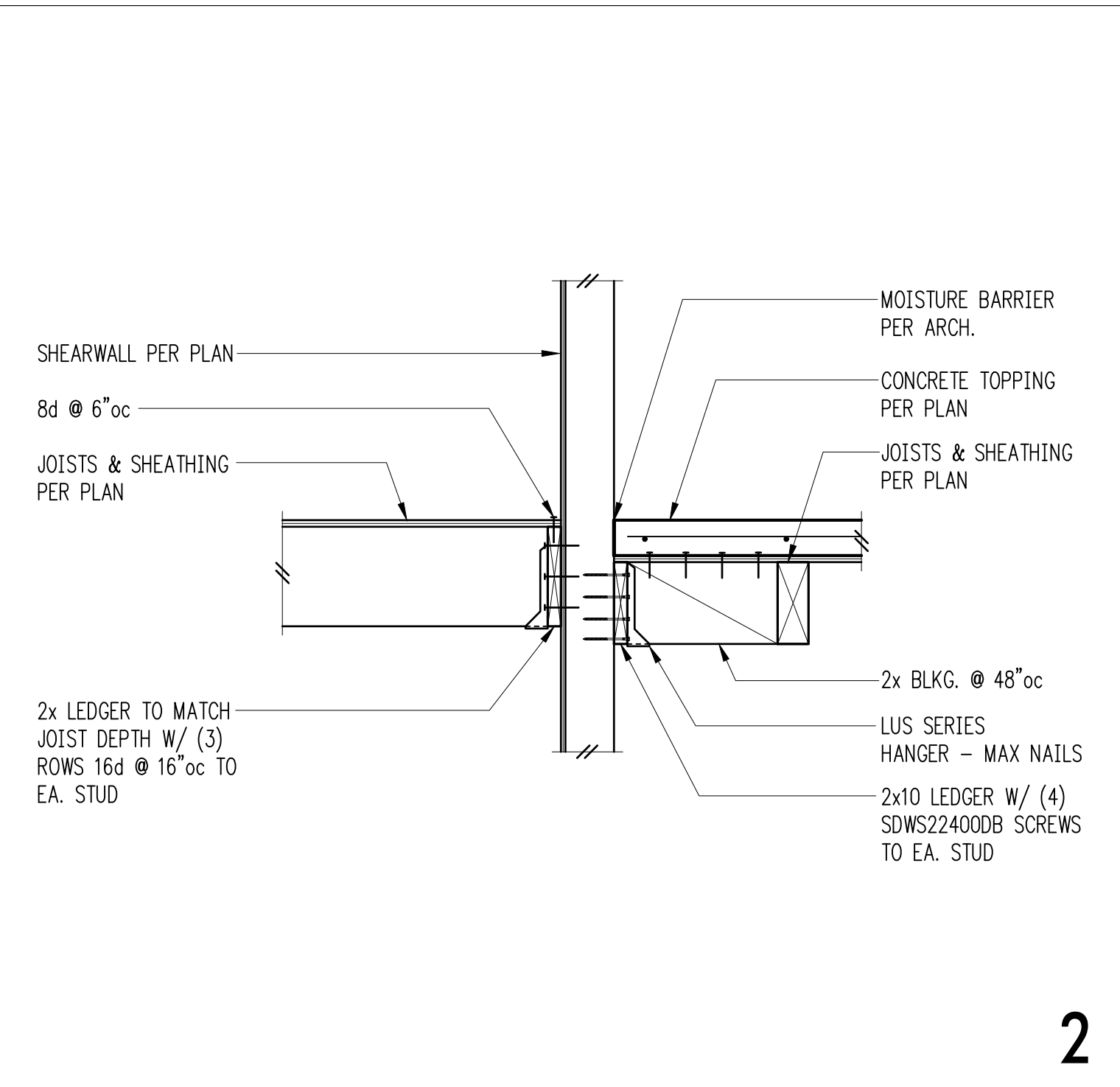
Typical Shearwall Intersections 12



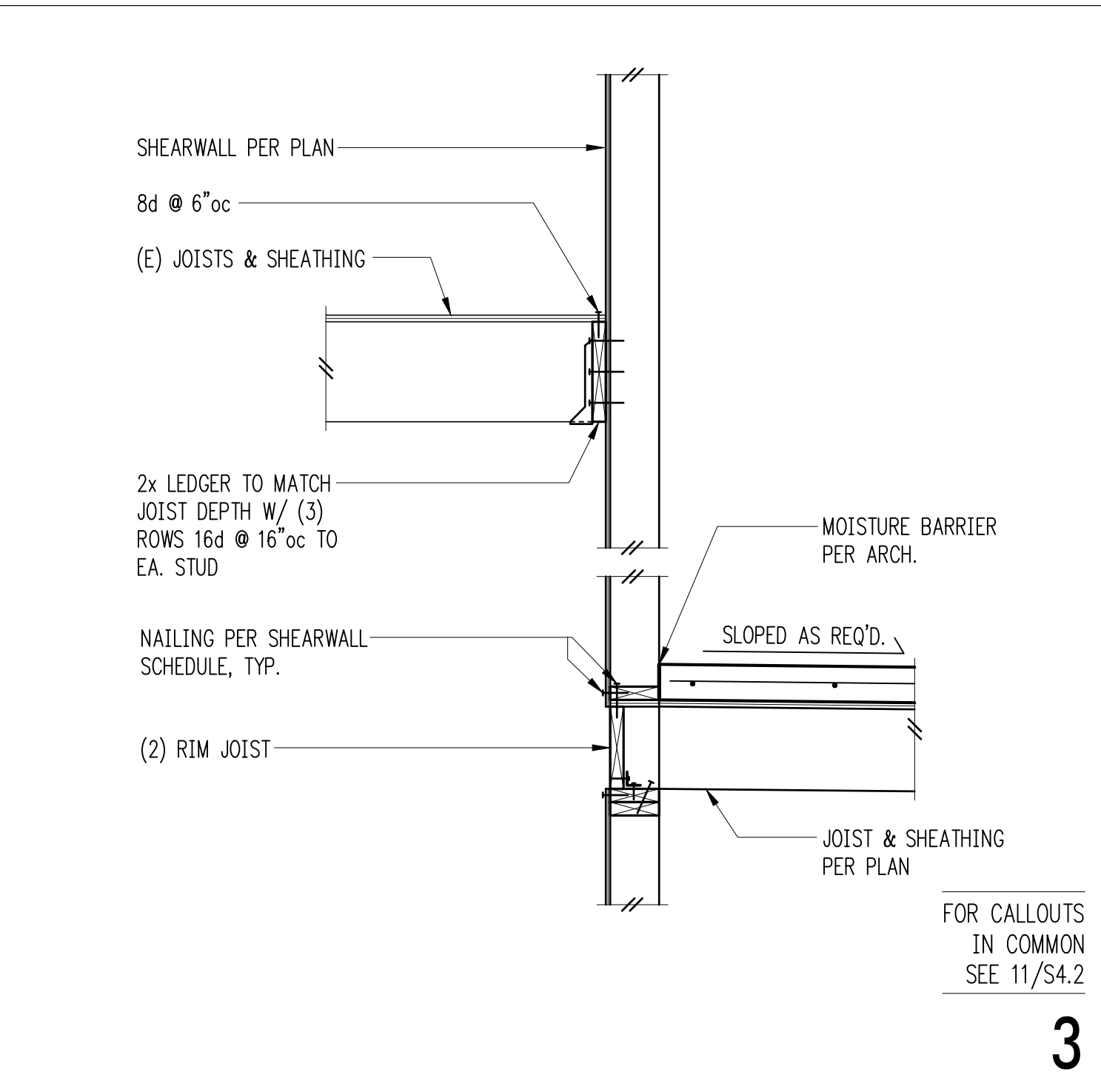
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 CHECKED: BDM
 APPROVED: BDM



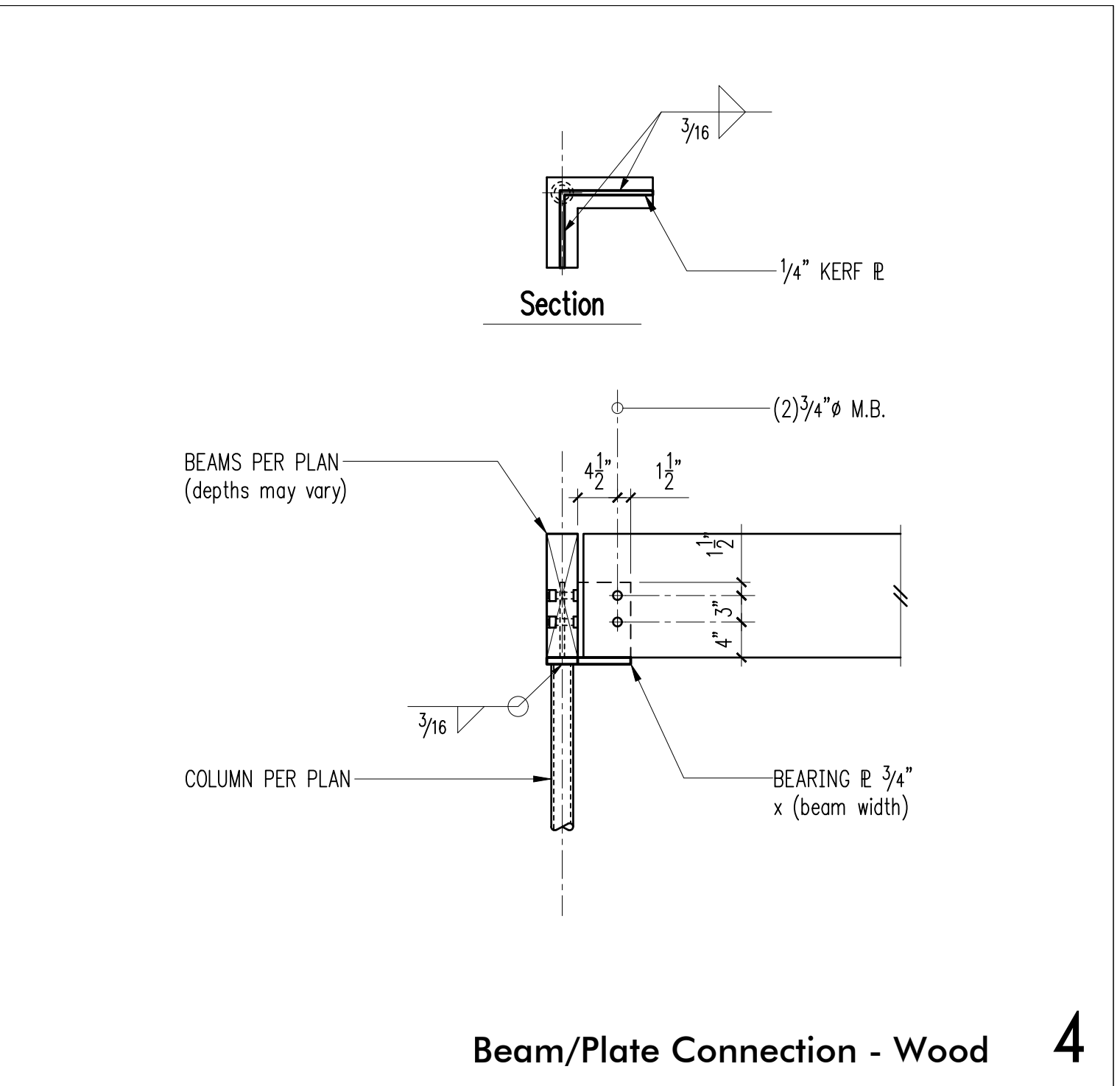
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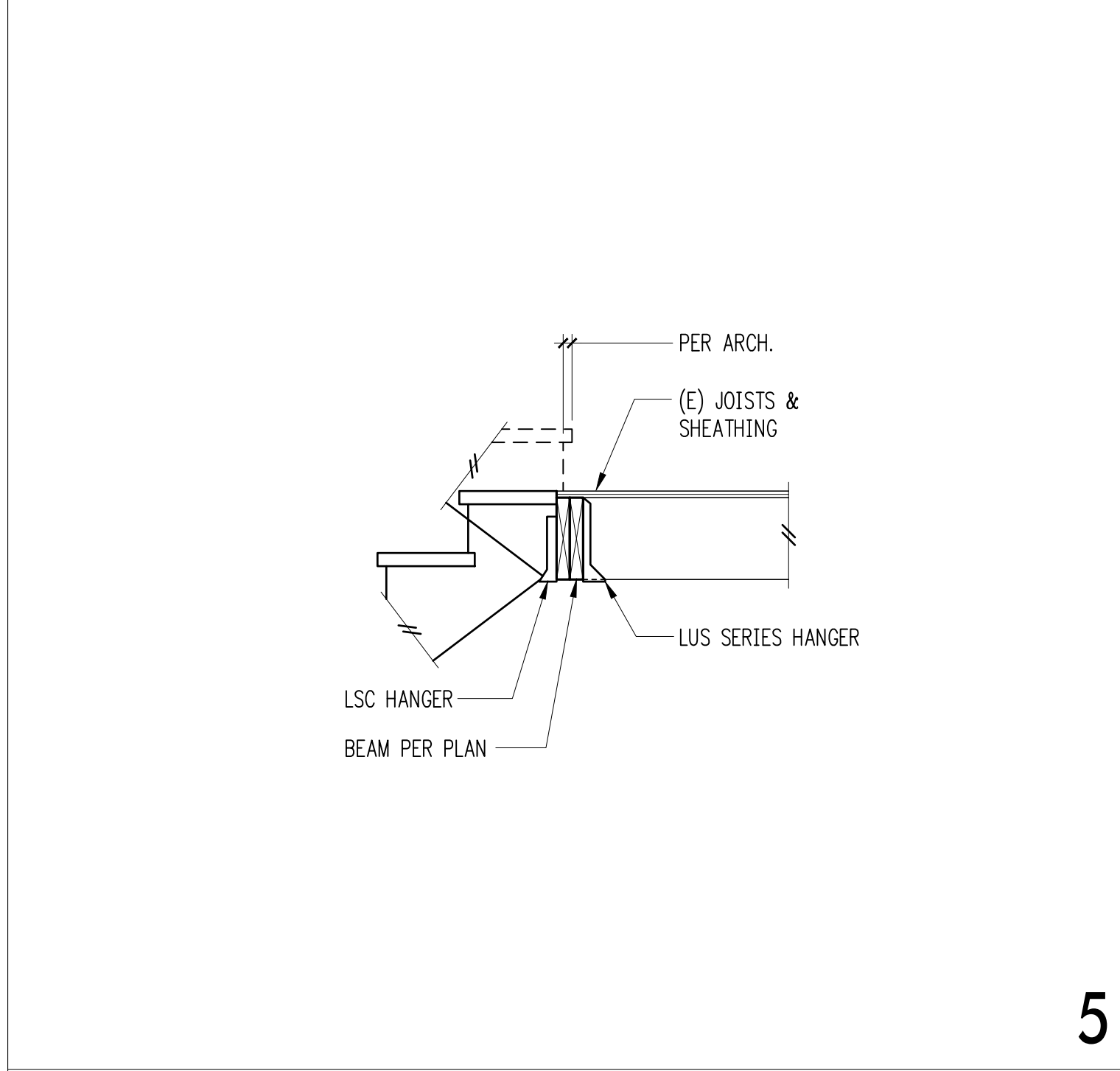
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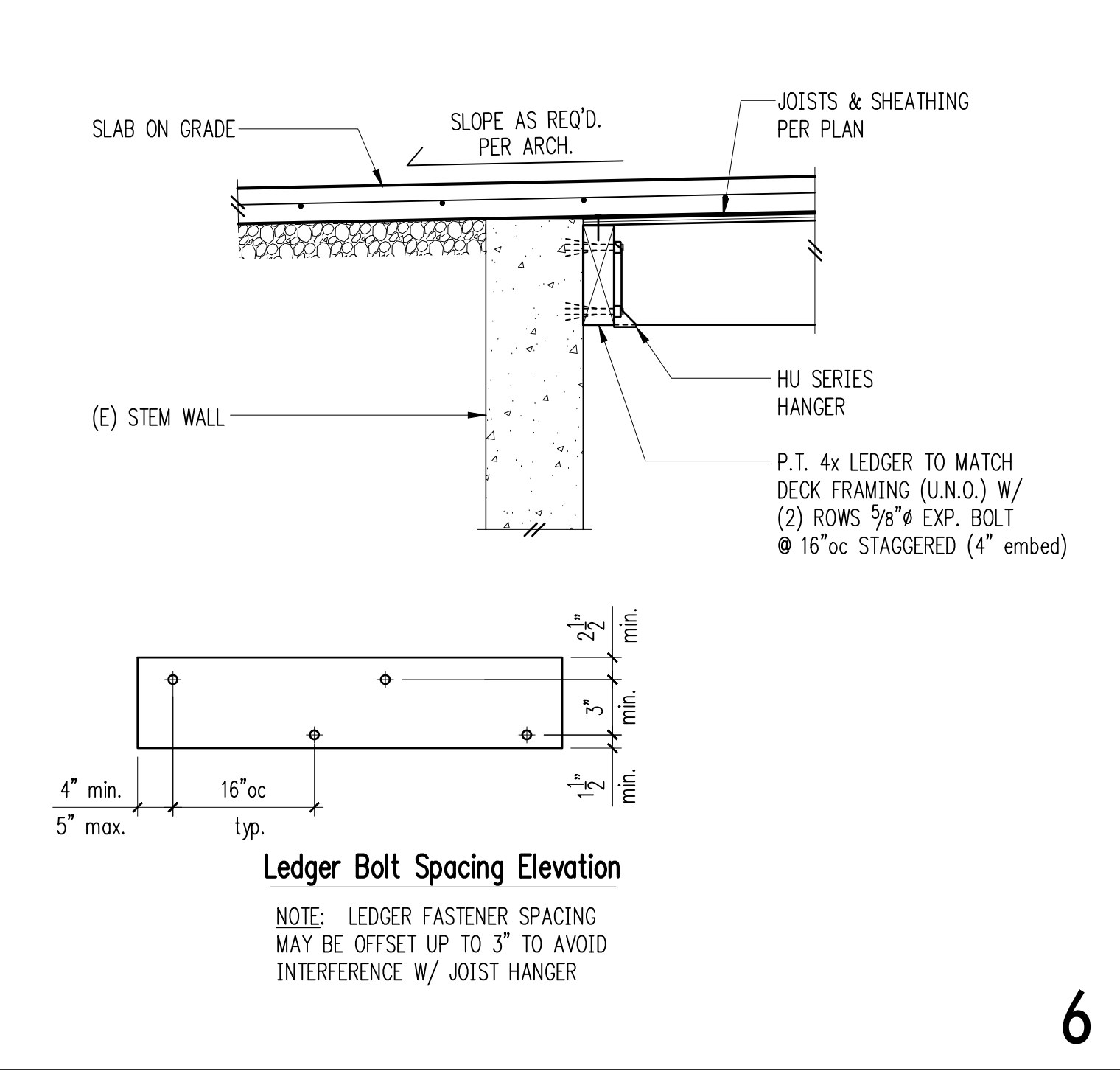
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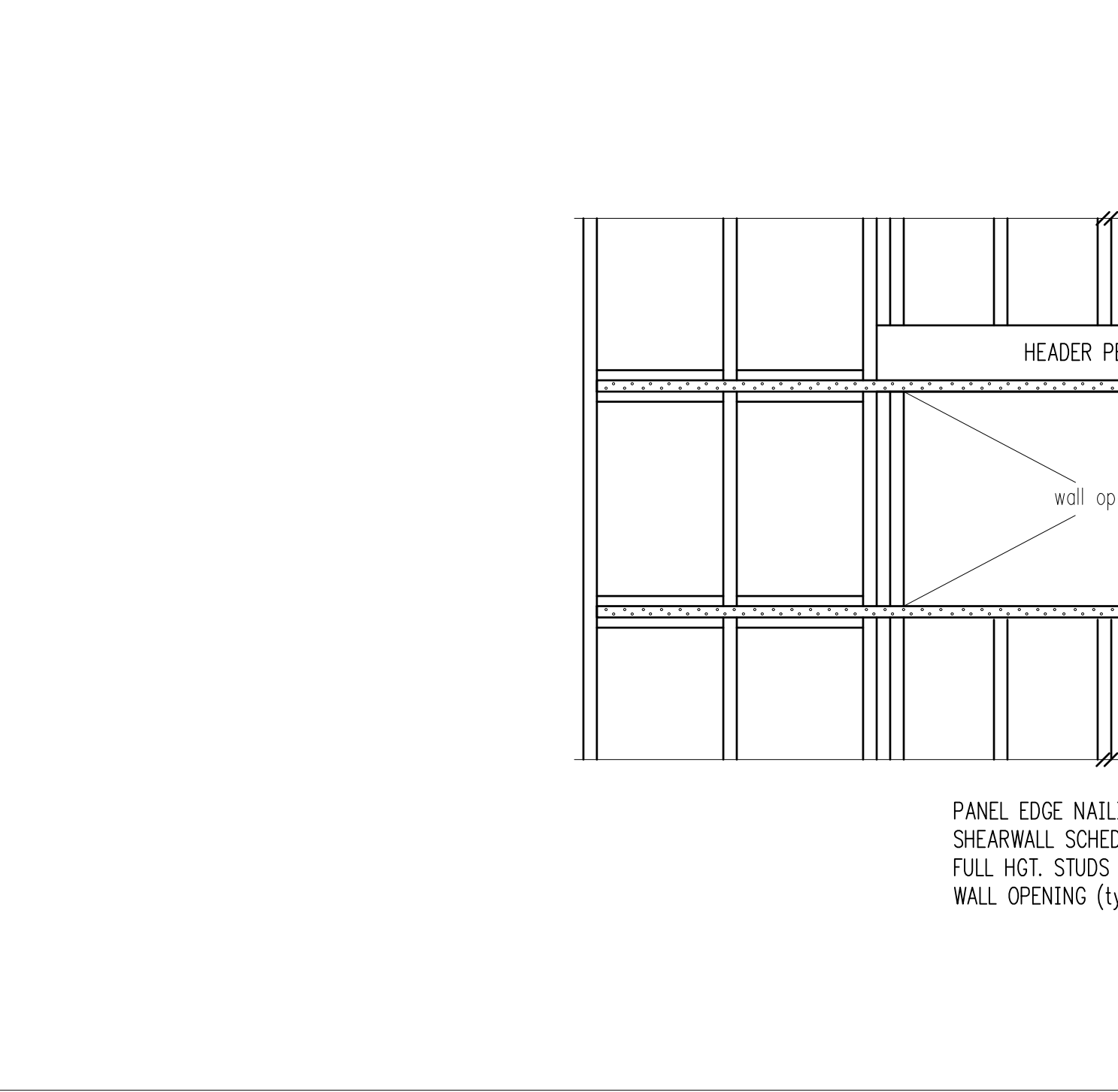
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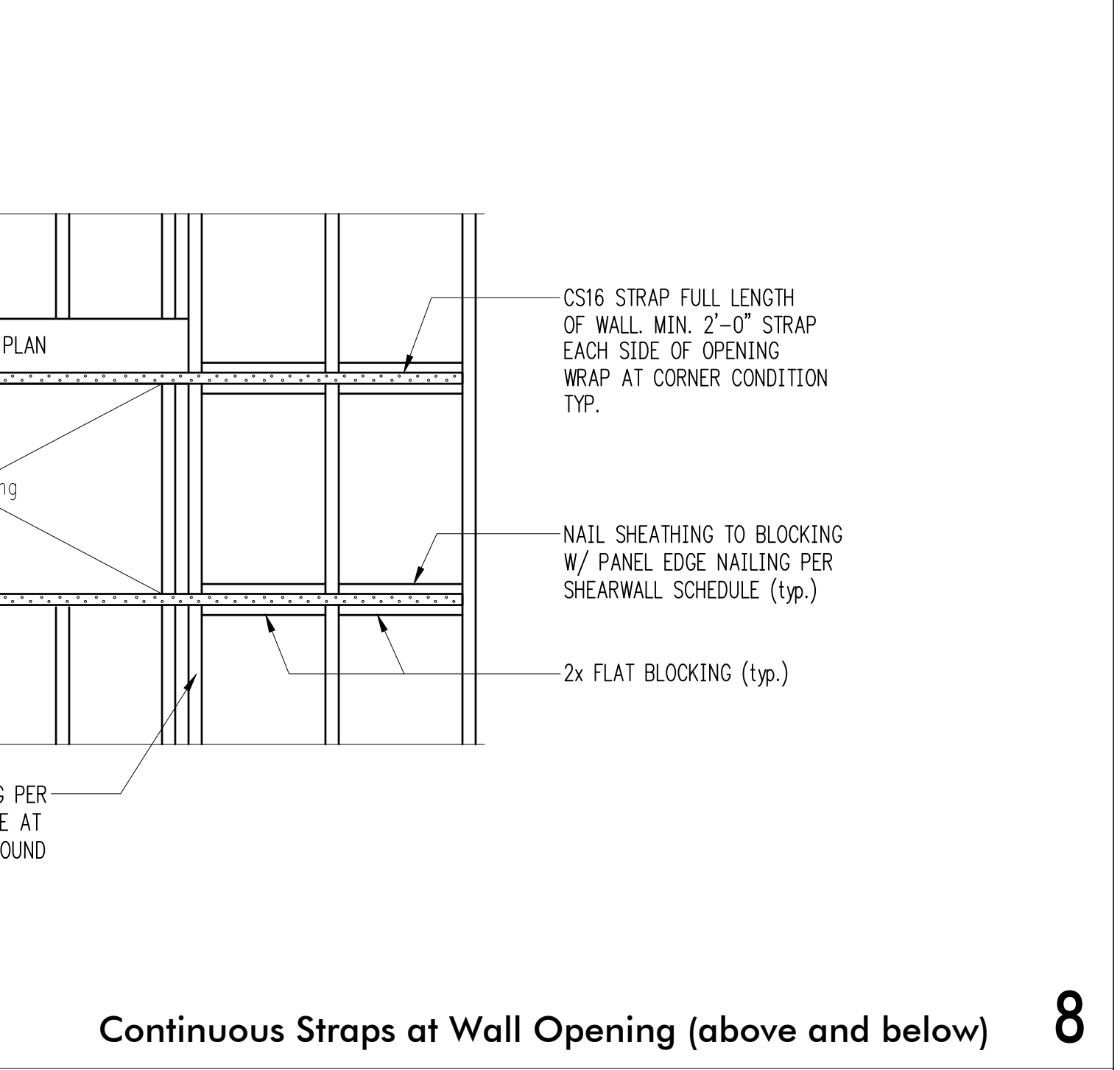
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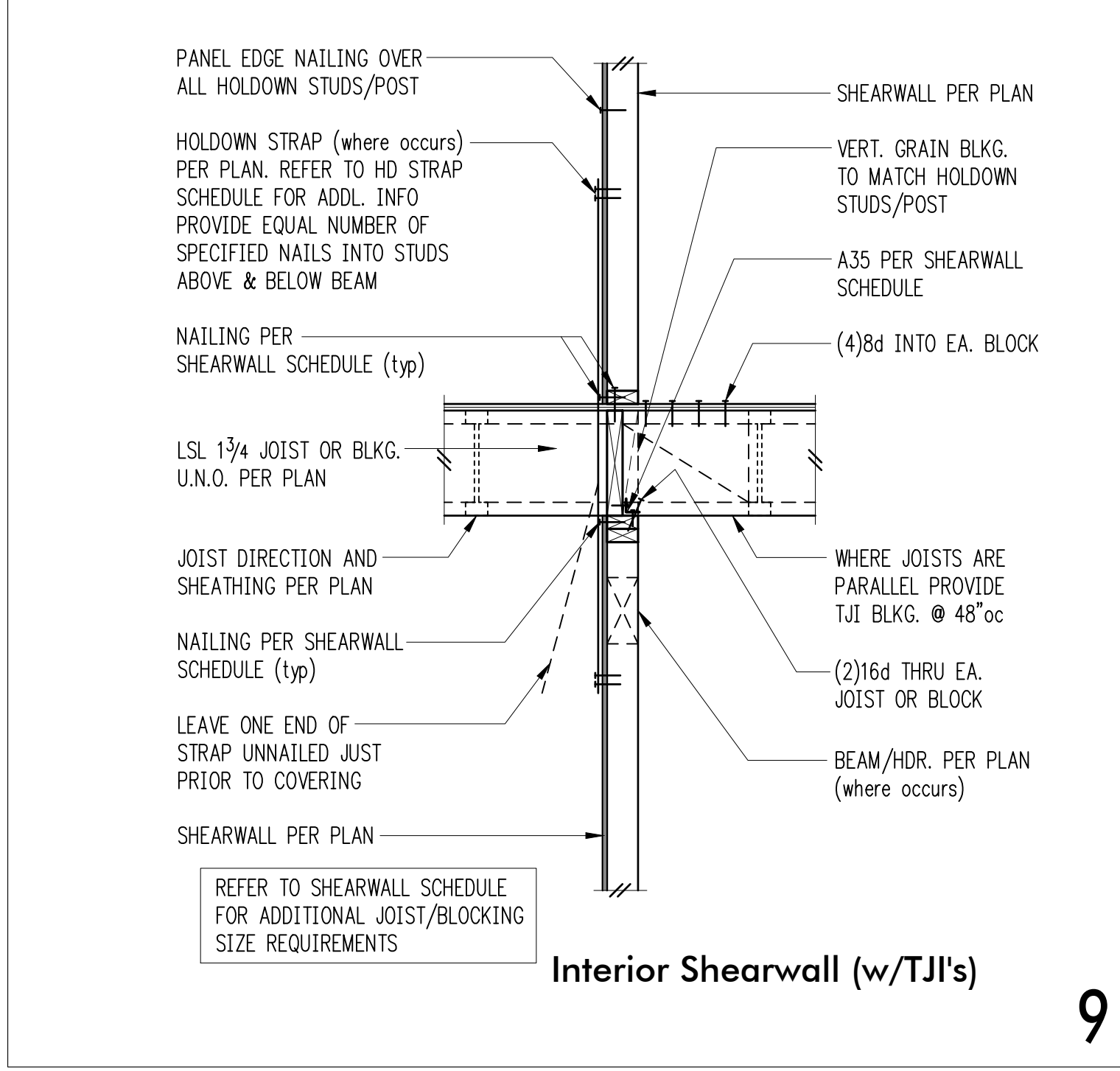
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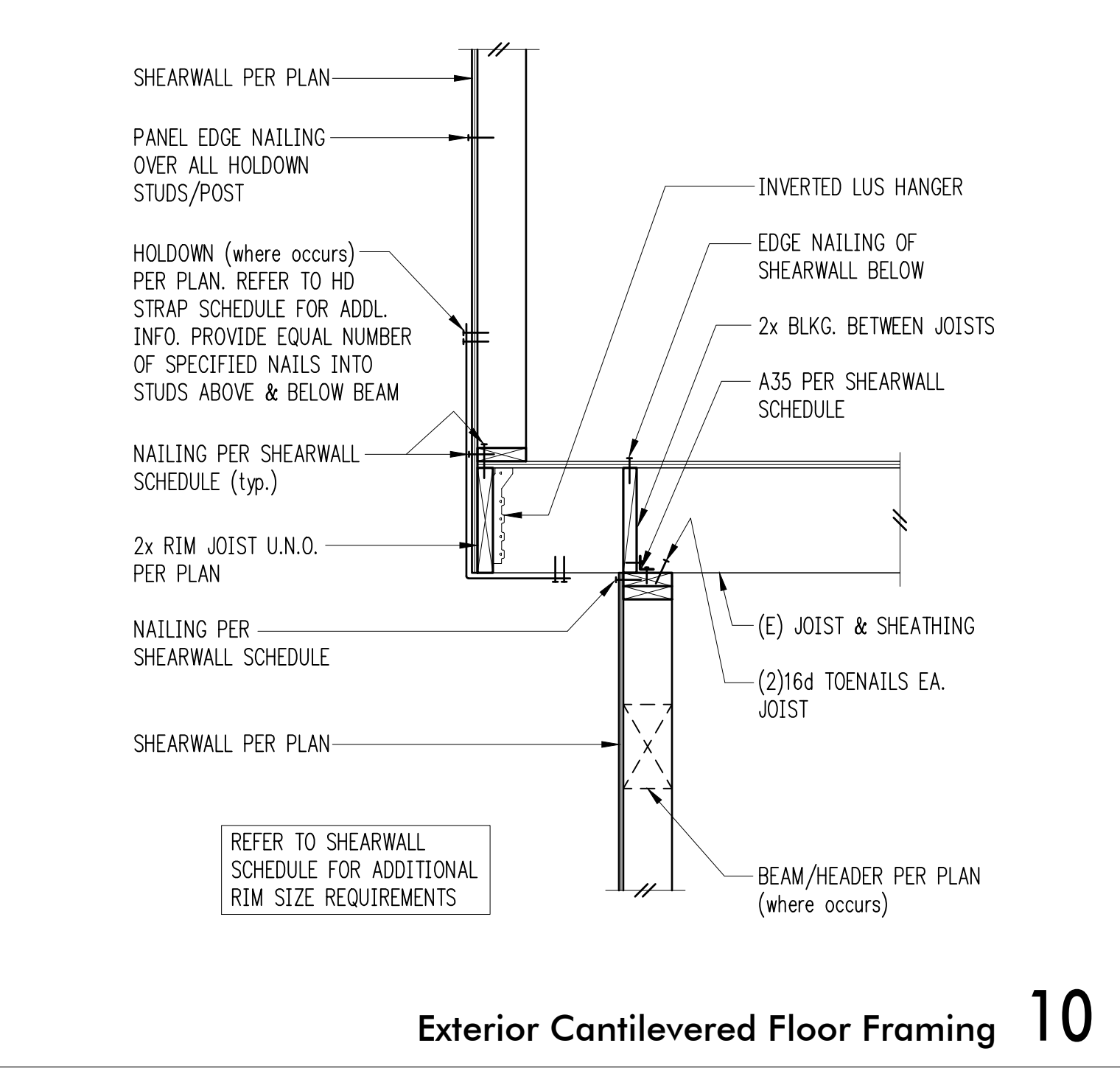
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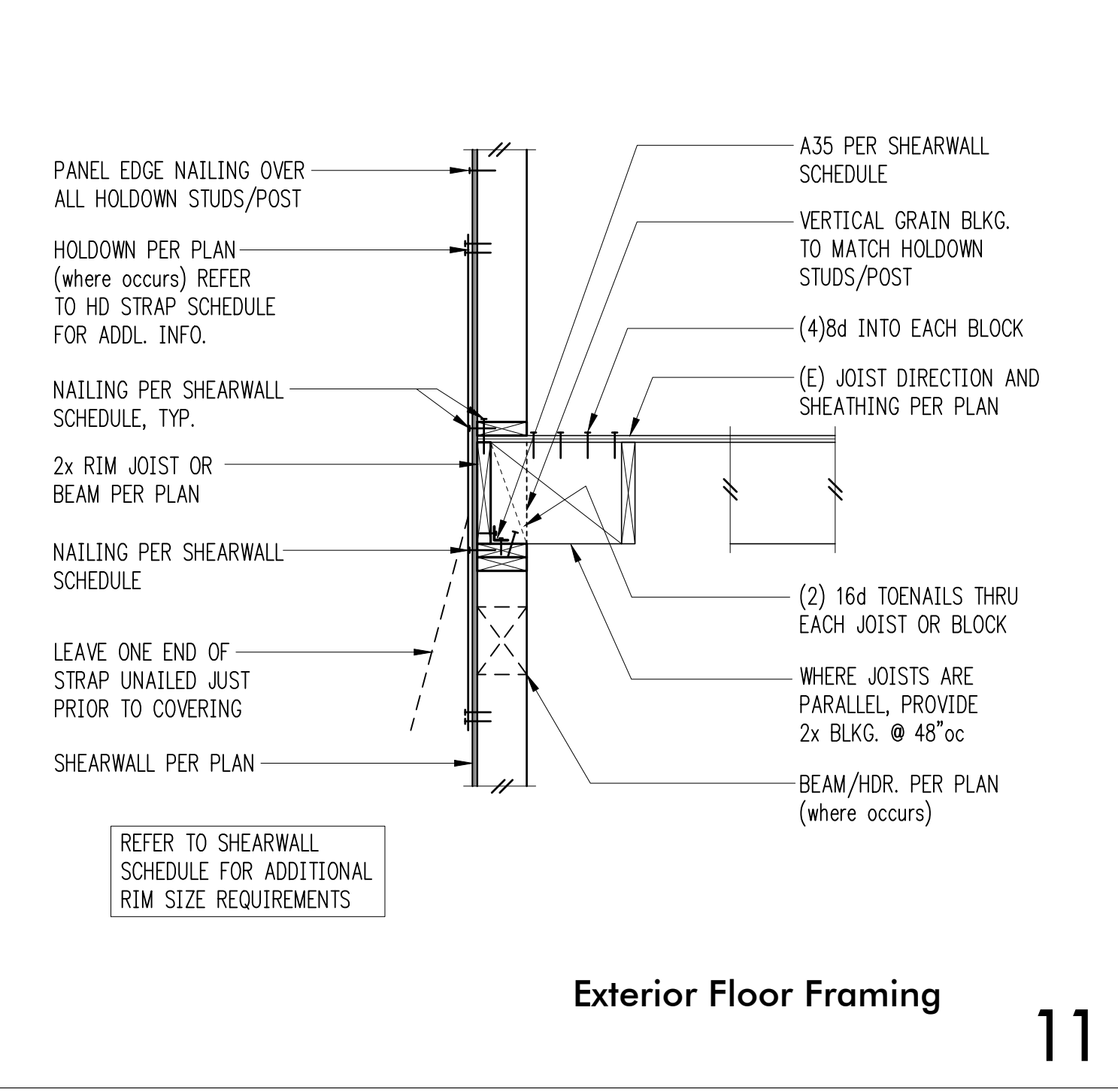
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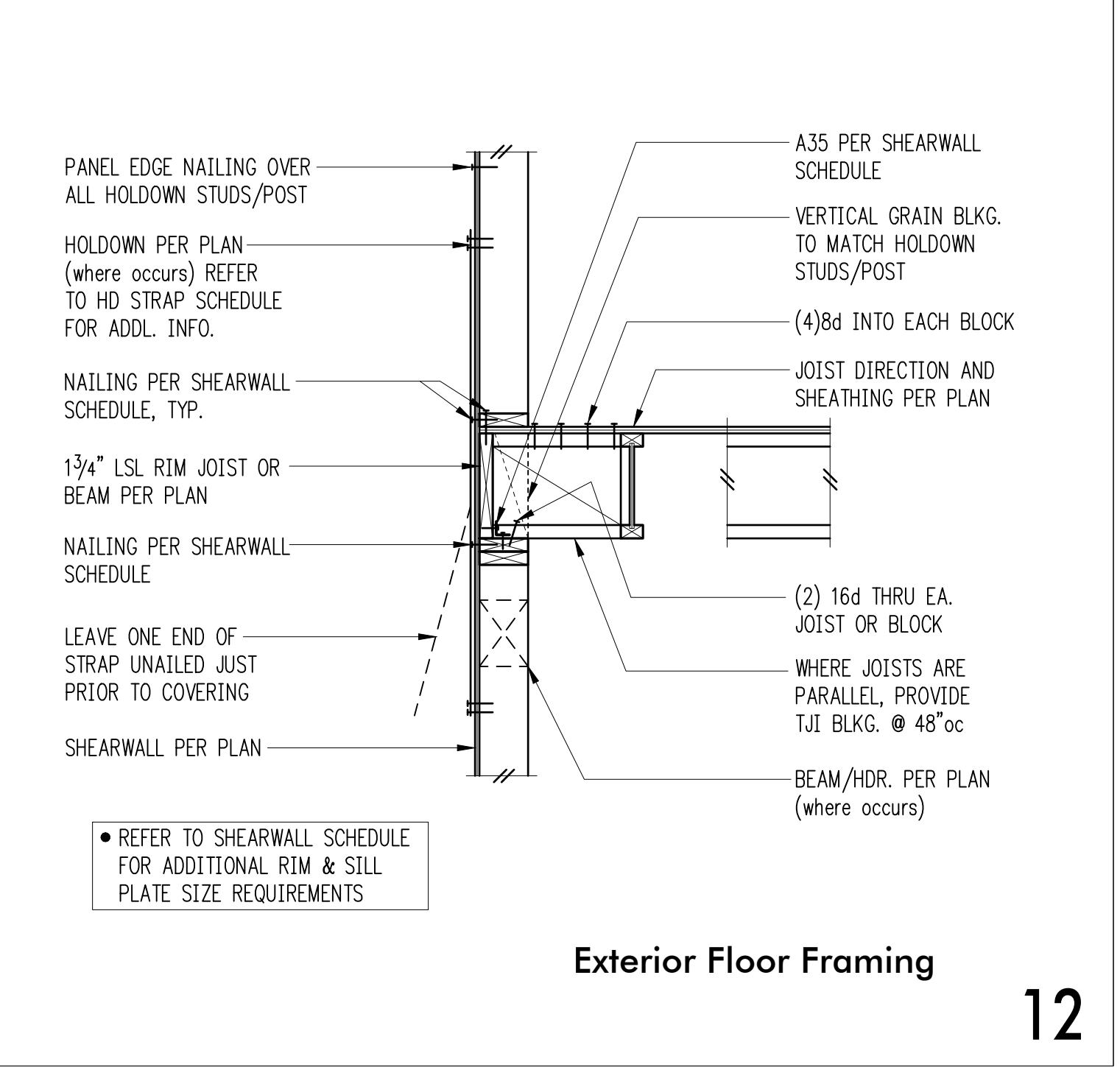
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10



11



12

REVISIONS:
 1 Permit Set REV1 Nov. 8, 2024

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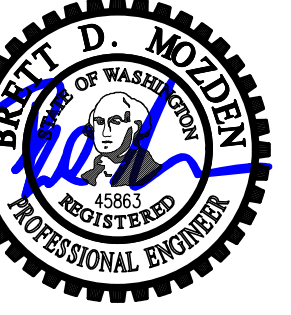
PROJECT TITLE:
 Korpela + Wiens Residence
 8441 SE 33rd Place
 Mercer Island, WA

ARCHITECT:
 Jessyca Poole
 7718 Fremont Ave N
 Seattle, WA 98103
 PH 206.484.3802

ISSUE:
 Permit
 SHEET TITLE:

Wood Framing Details
 SCALE: 3/4" = 1'-0" U.N.O.
 DATE: Dec. 14, 2023
 PROJECT NO: 02327-2023-04
 SHEET NO:

S4.2



DRAWN: CFG
 DESIGN: BDM
 CHECKED: BDM
 APPROVED: BDM

REVISIONS:
 1 Permit Set REV1 Nov. 8, 2024

JURISDICTIONAL APPROVAL STAMP:

PROJECT TITLE:
 Korpela + Wiens
 Residence
 8441 SE 33rd Place
 Mercer Island, WA

ARCHITECT:
 Jessyca Poole
 7718 Fremont Ave N
 Seattle, WA 98103
 PH 206.484.3802

ISSUE:
 Permit

SHEET TITLE:
 Wood Framing Details

SCALE: 3/4" = 1'-0" U.N.O.
 DATE: Dec. 14, 2023
 PROJECT NO: 02327-2023-04
 SHEET NO:

S4.3

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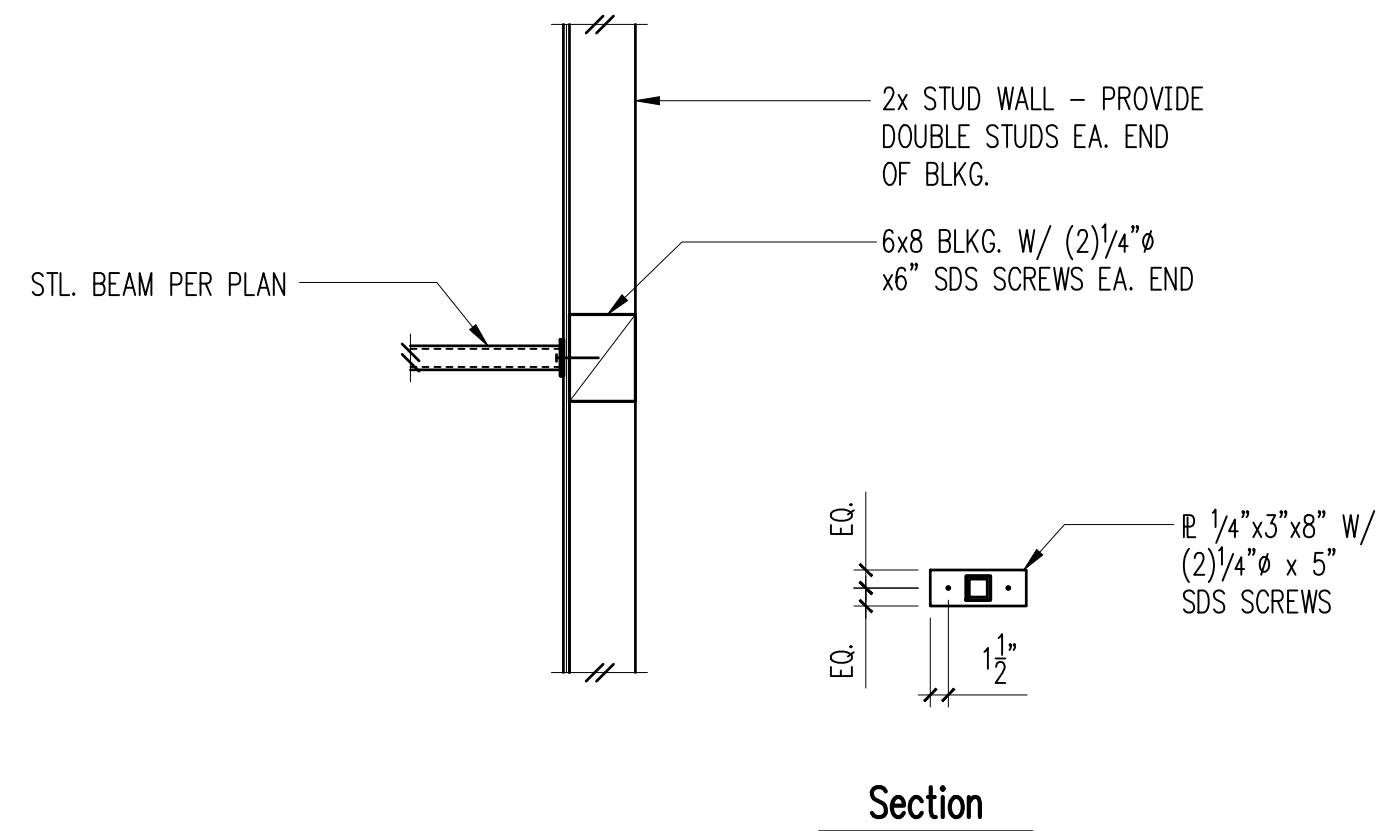
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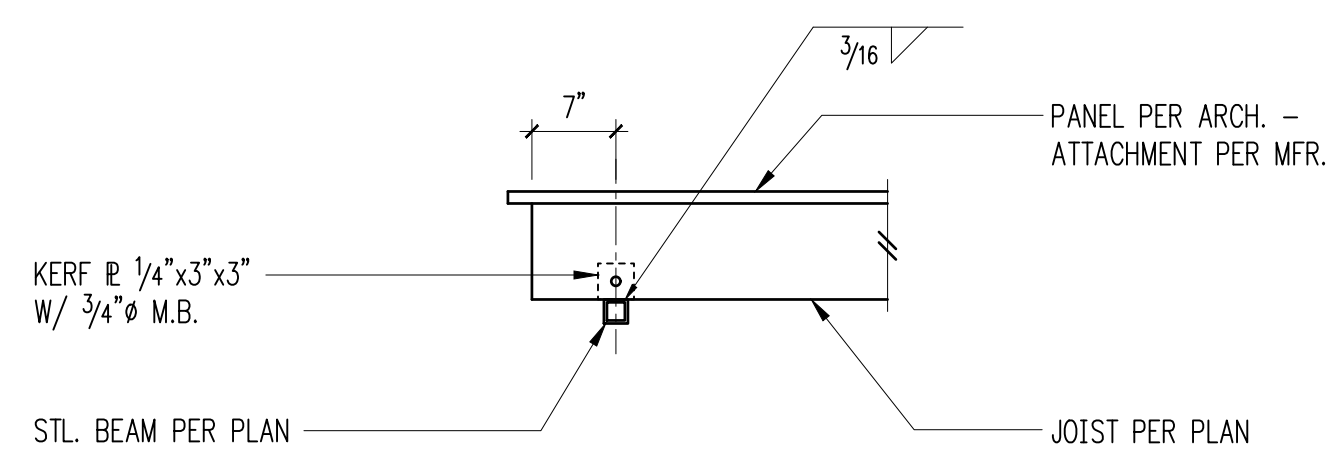
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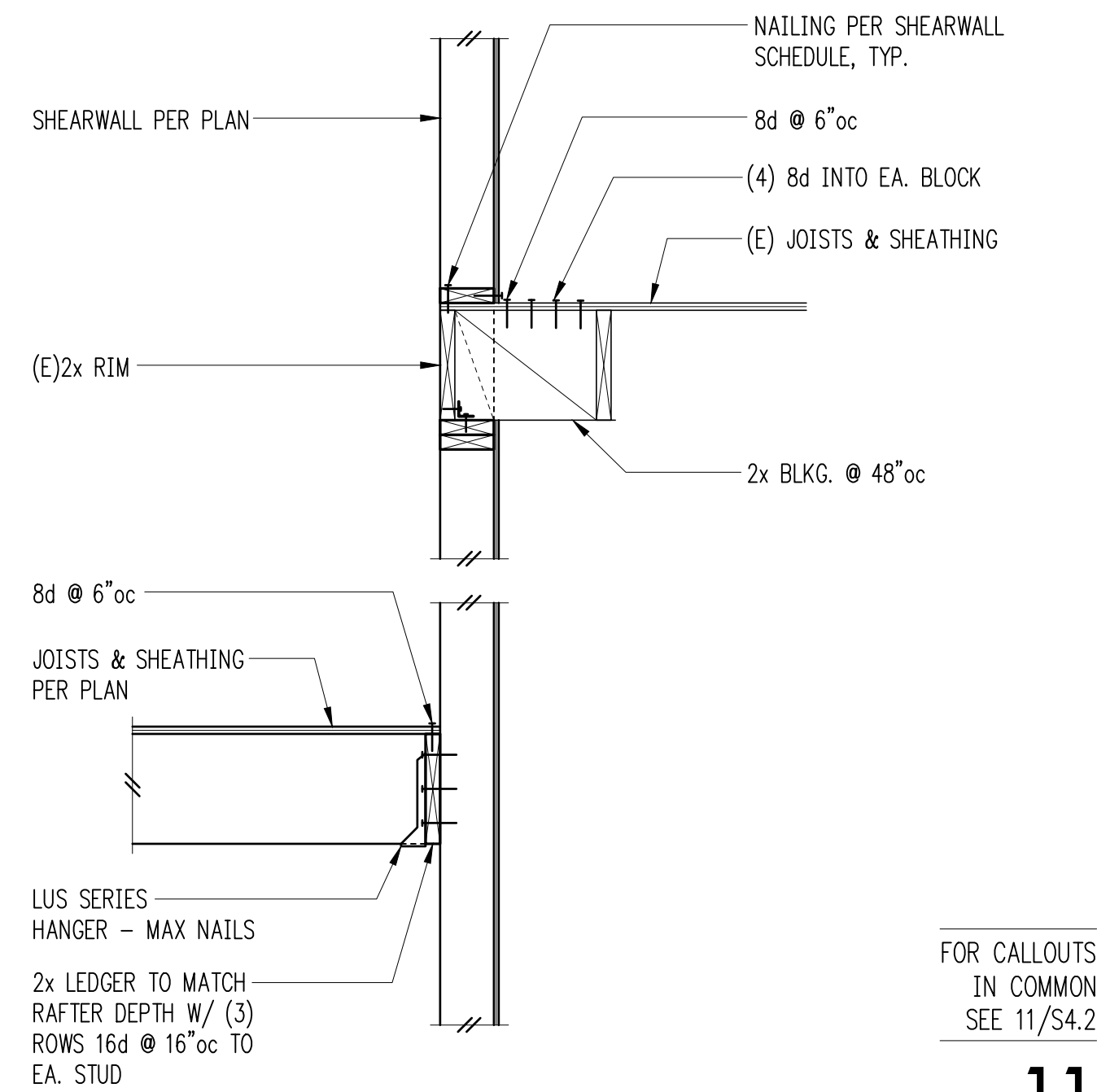
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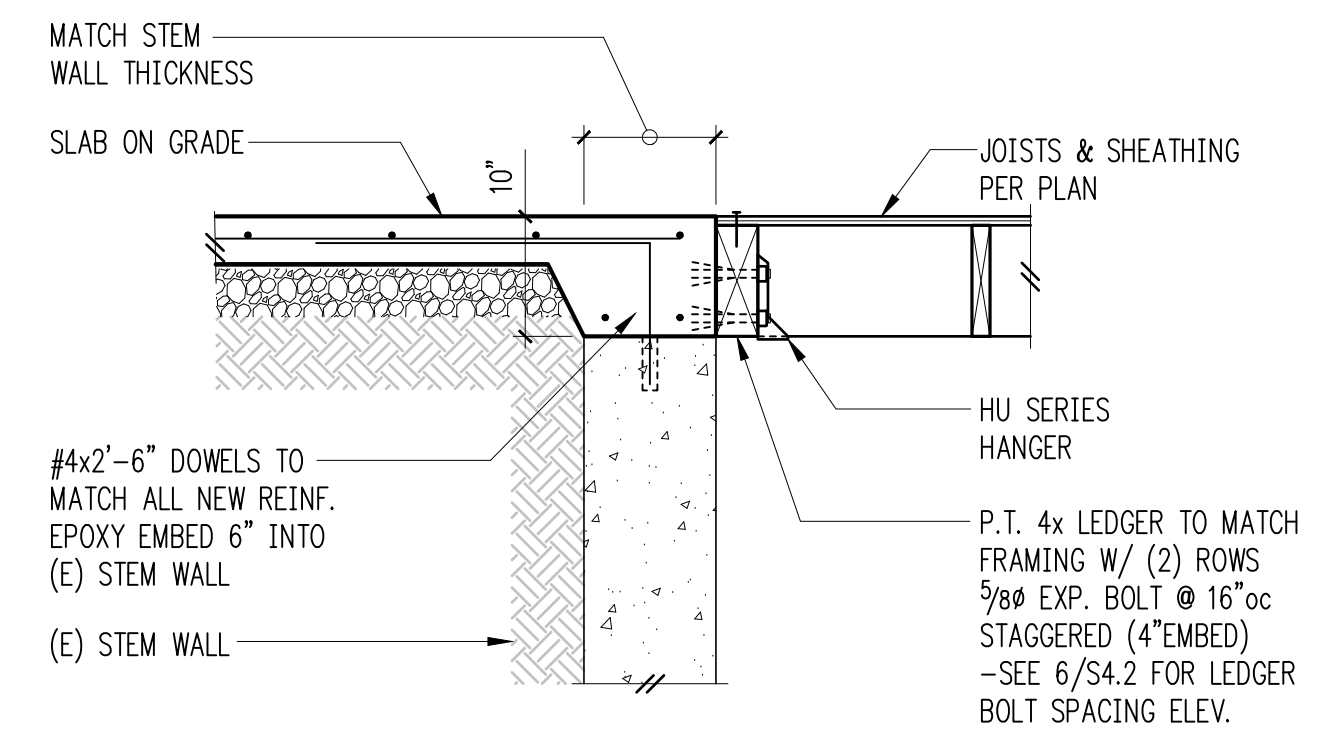


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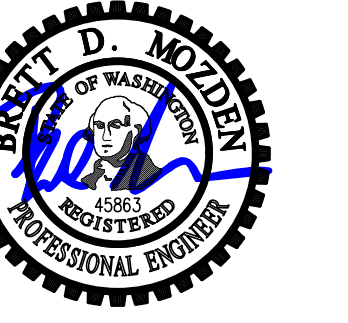


FOR CALLOUTS
 IN COMMON
 SEE 11/S4.2

11



12



DRAWN: CFG
DESIGN: BDM
CHECKED: BDM
APPROVED: BDM

REVISIONS:
1 Permit Set REV1 Nov. 8, 2024

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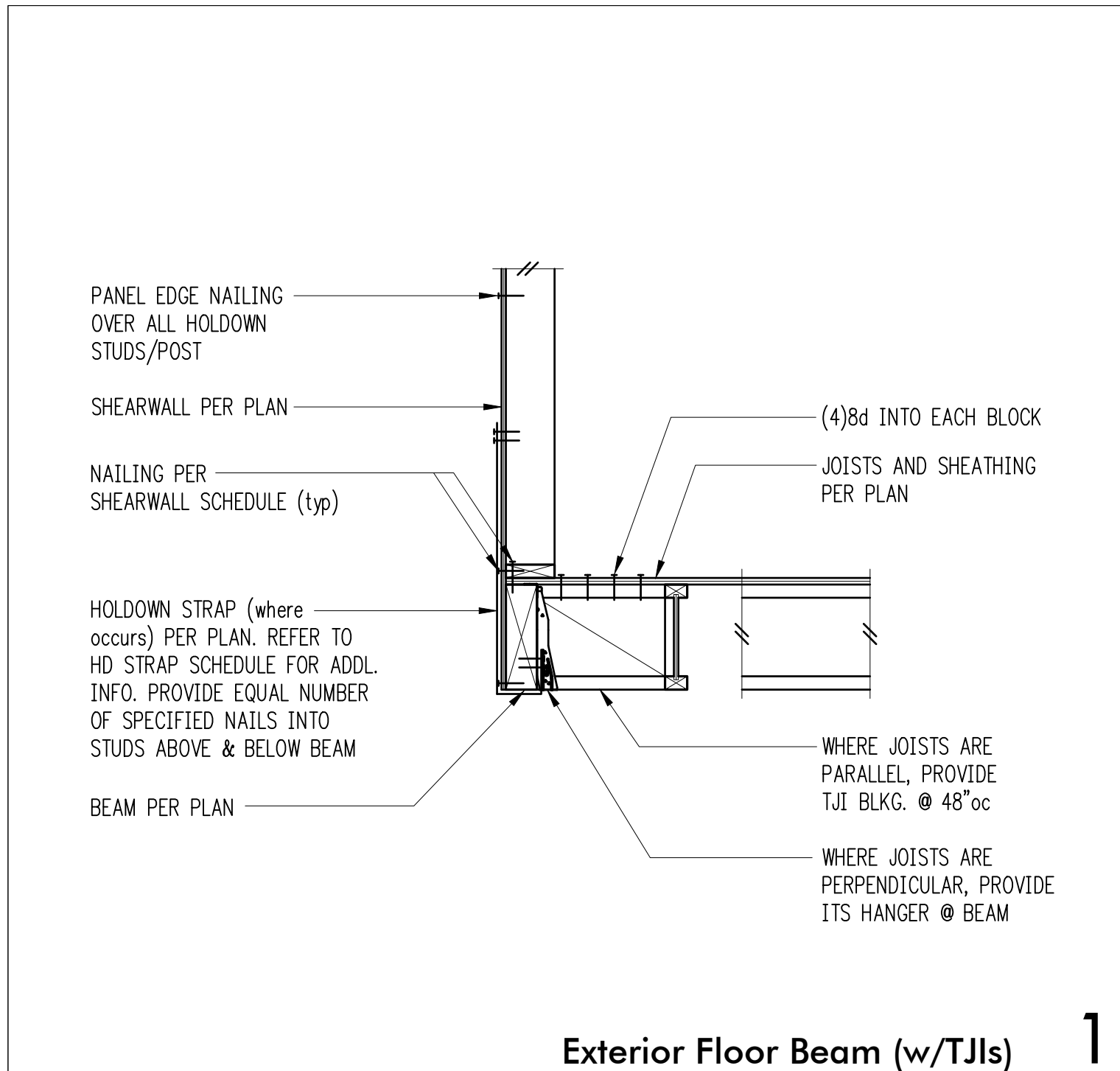
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**Korpela + Wiens
Residence**
8441 SE 33rd Place
Mercer Island, WA

ARCHITECT:
Jessica Poole
7718 Fremont Ave N
Seattle, WA 98103
PH 206.484.3802

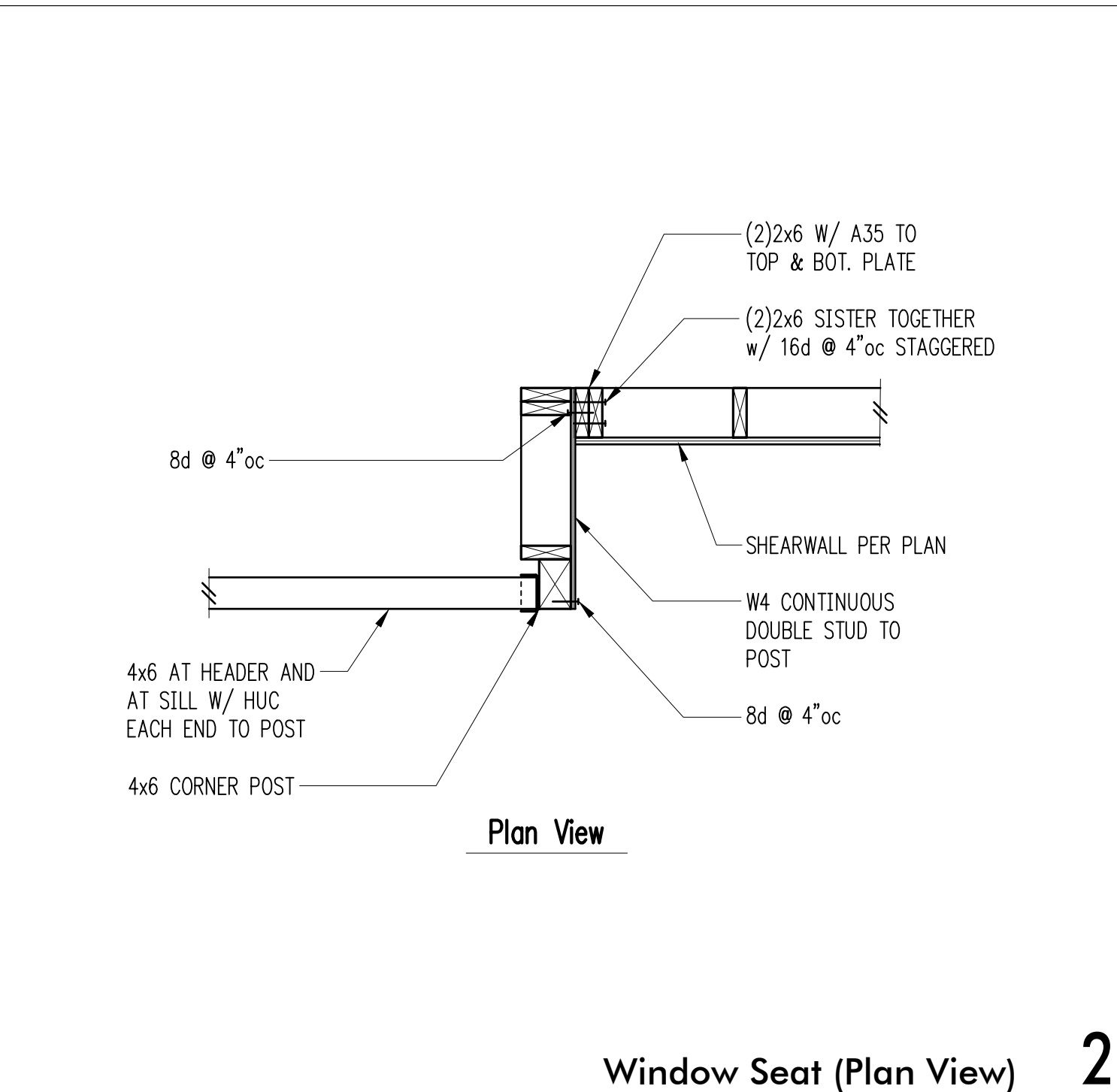
ISSUE:
Permit

SHEET TITLE:
**Wood
Framing
Details**

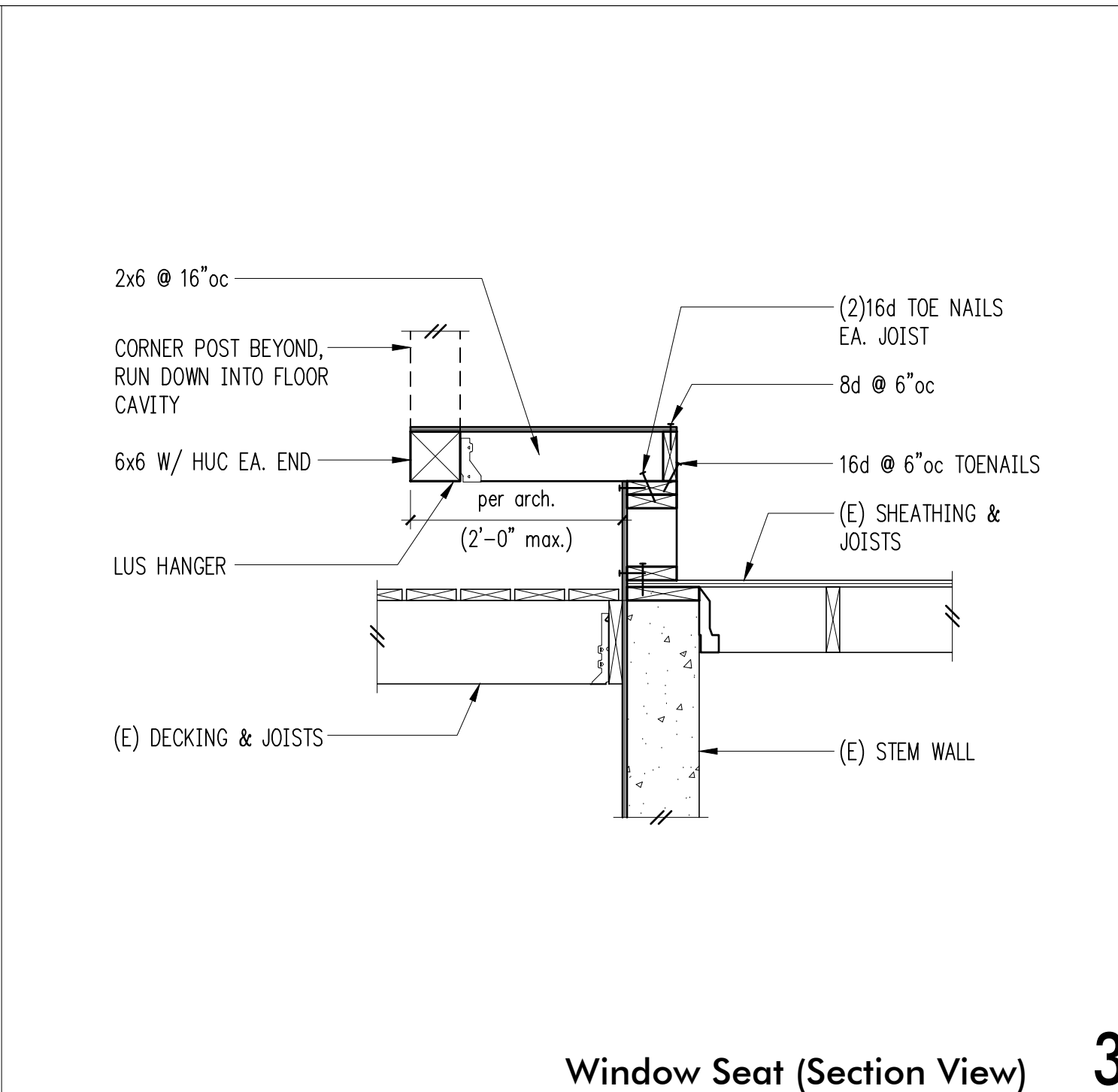
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DATE: Dec. 14, 2023
PROJECT NO: 02327-2023-04
SHEET NO:



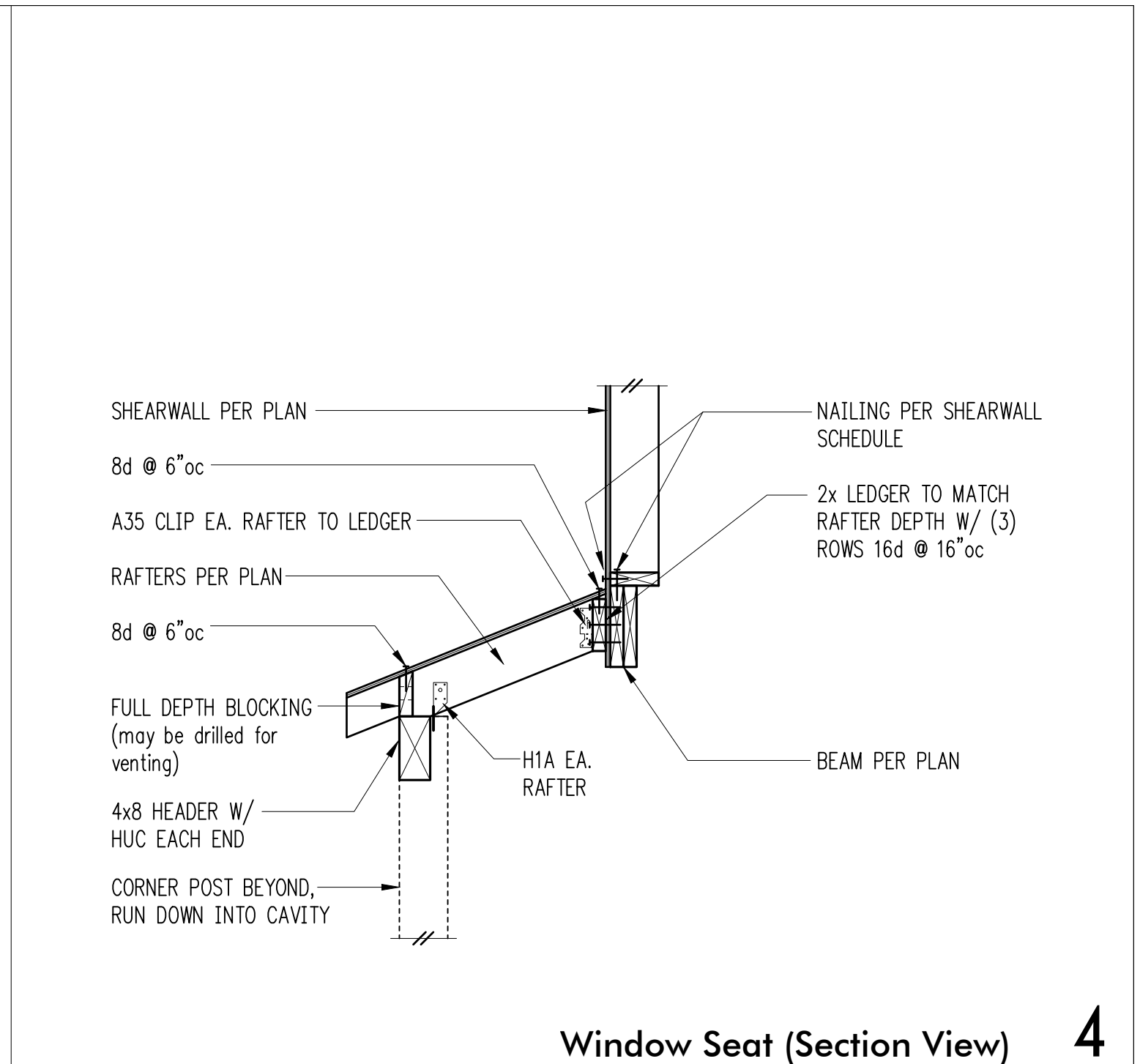
Exterior Floor Beam (w/TJIs) 1



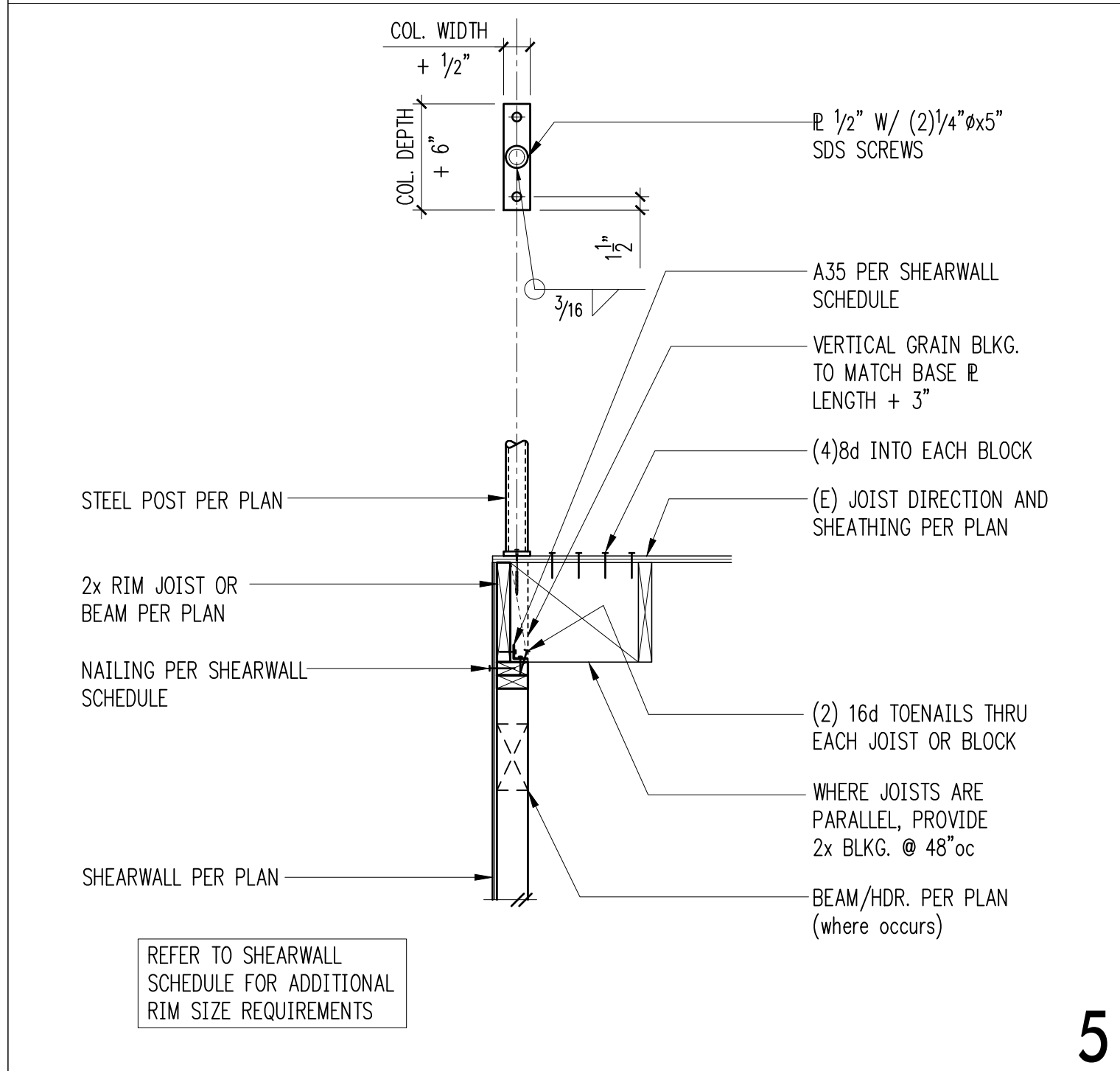
Window Seat (Plan View) 2



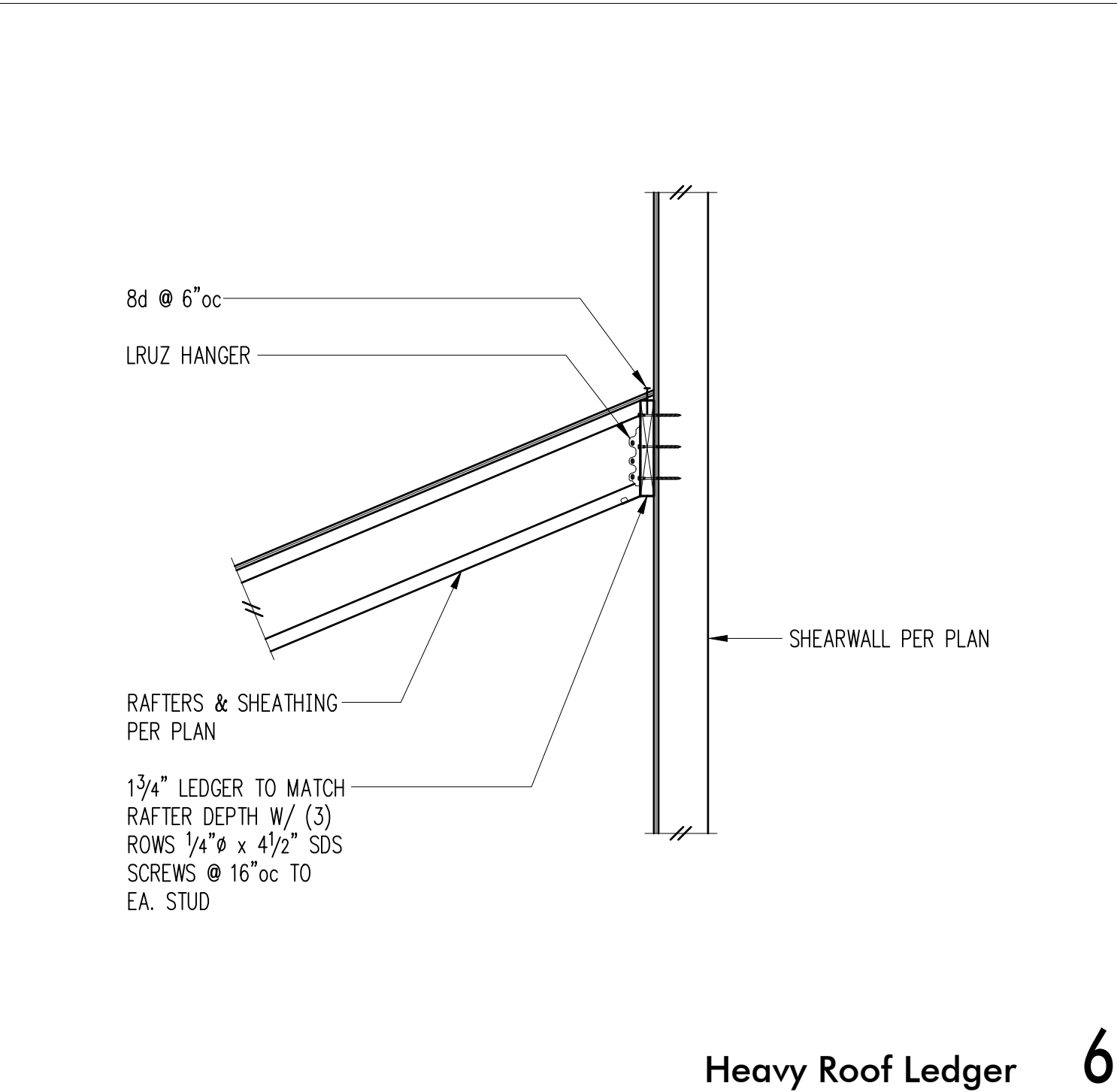
Window Seat (Section View) 3



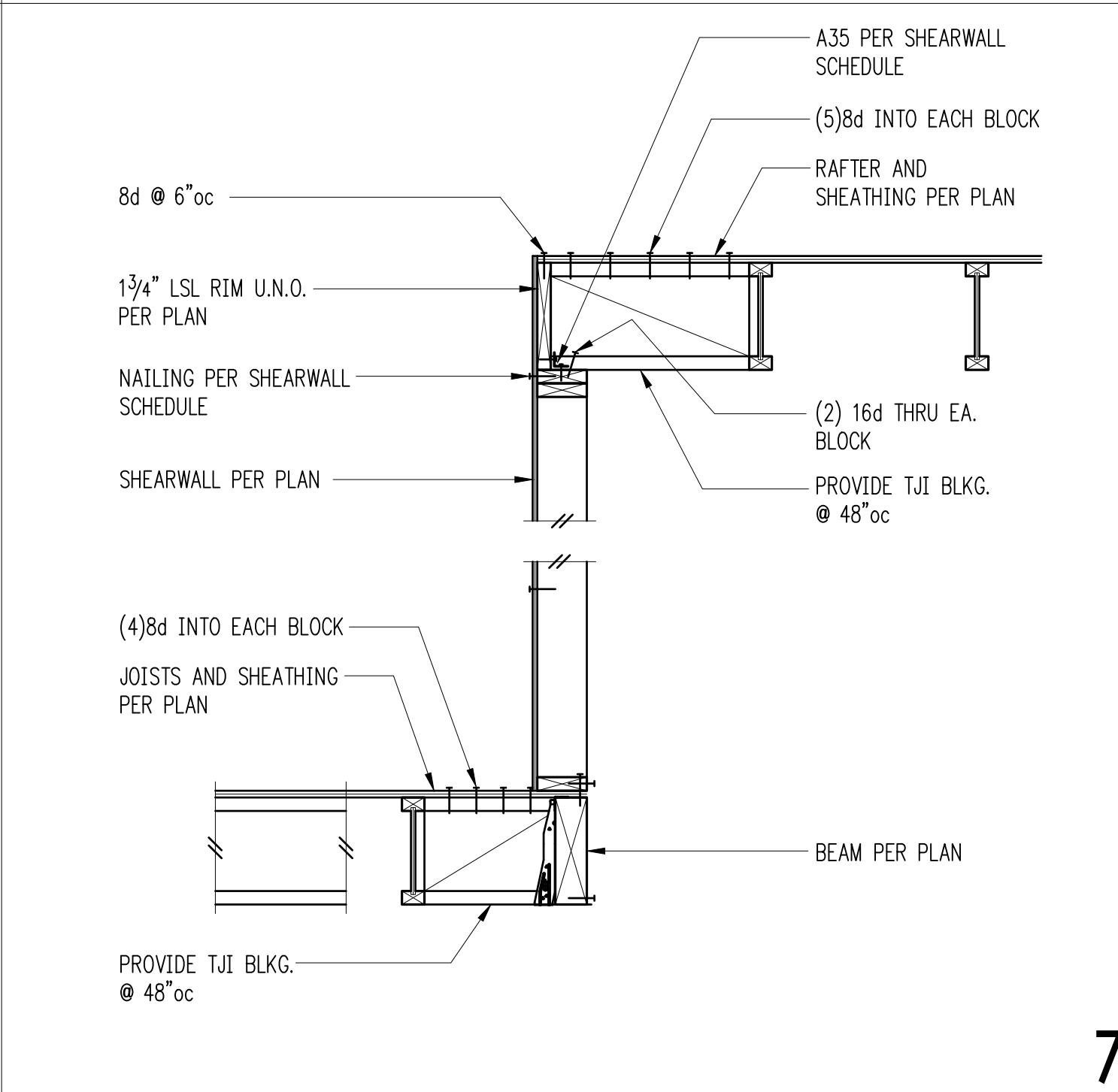
Window Seat (Section View) 4



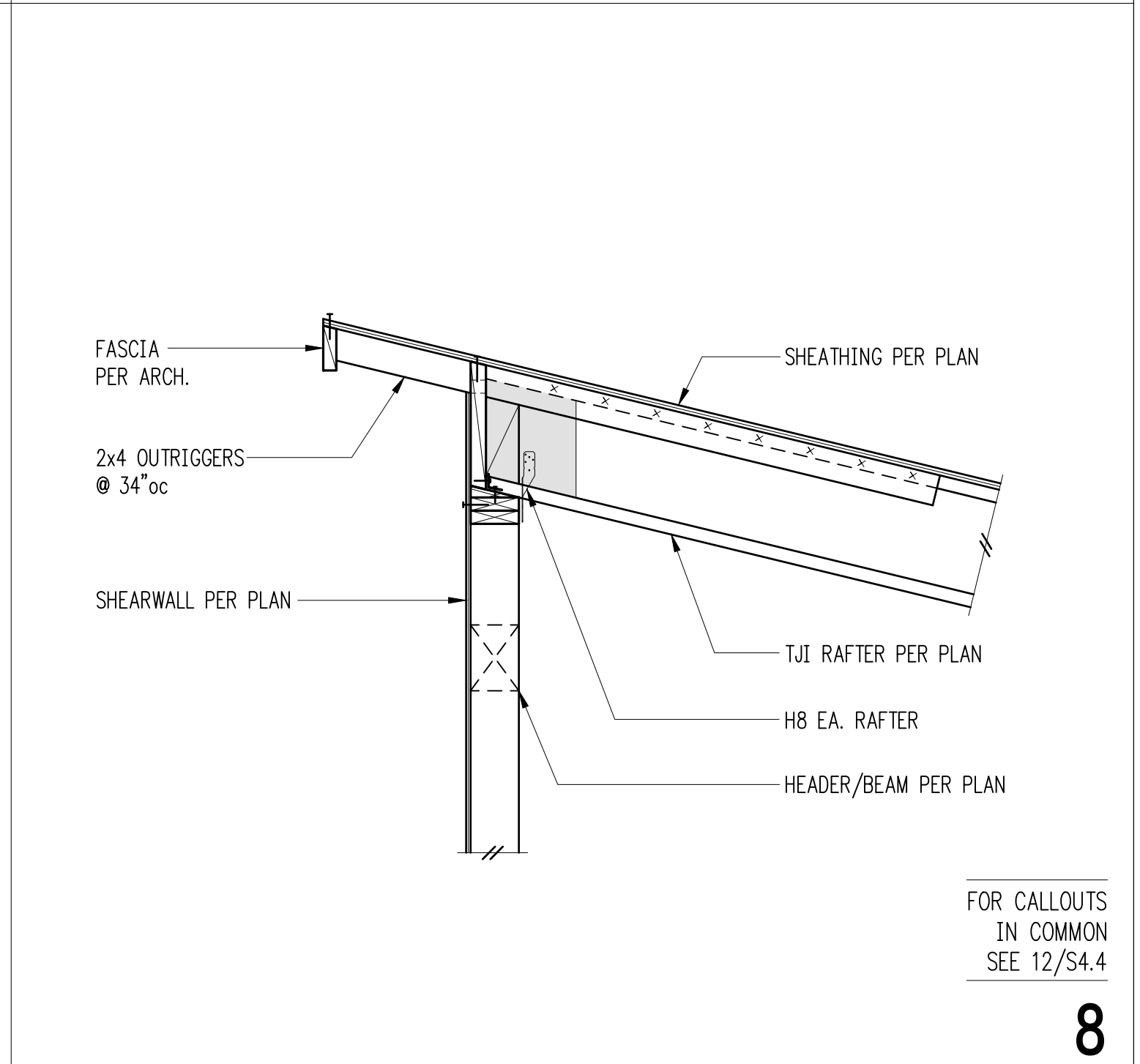
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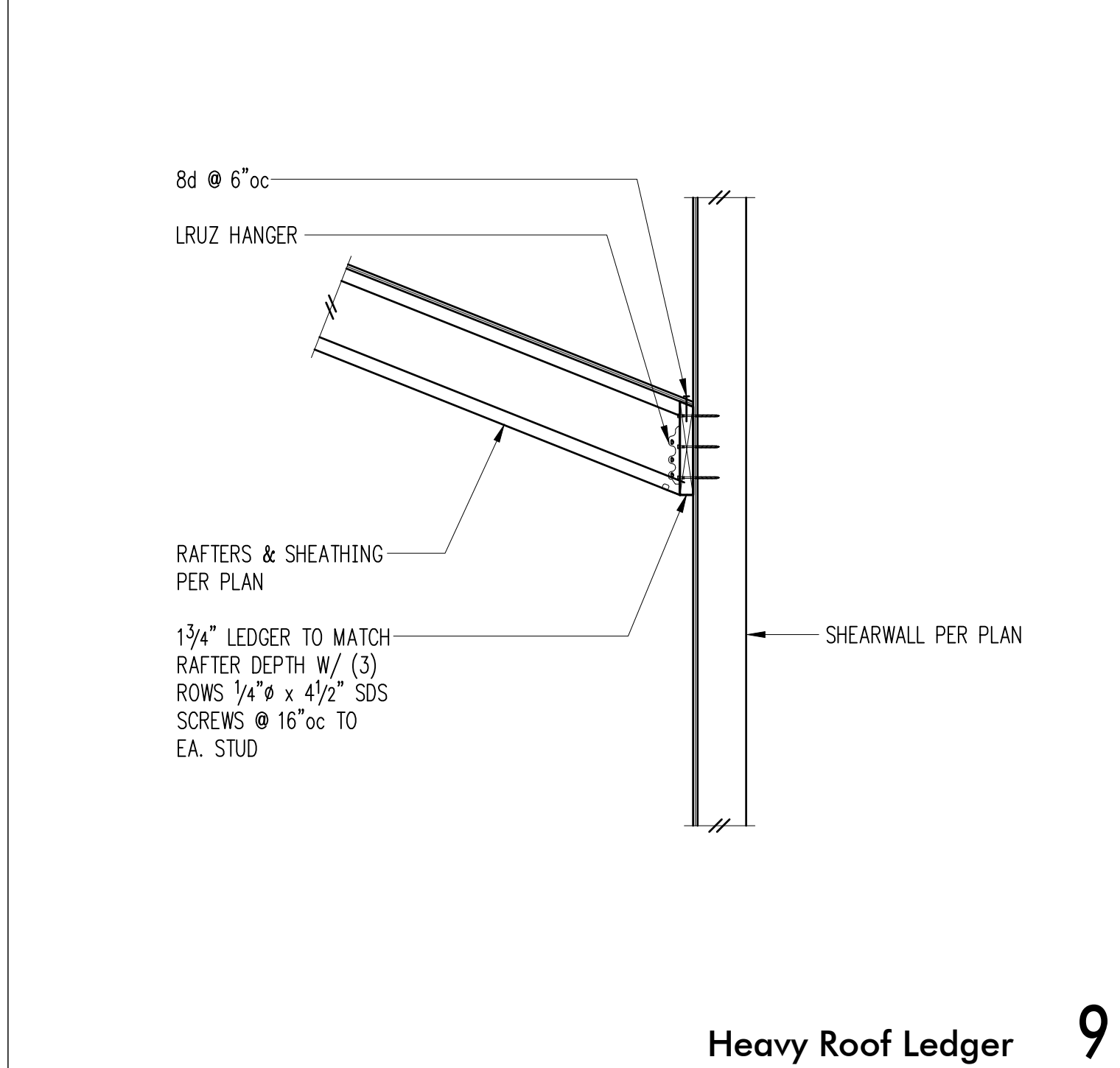
Heavy Roof Ledger 6



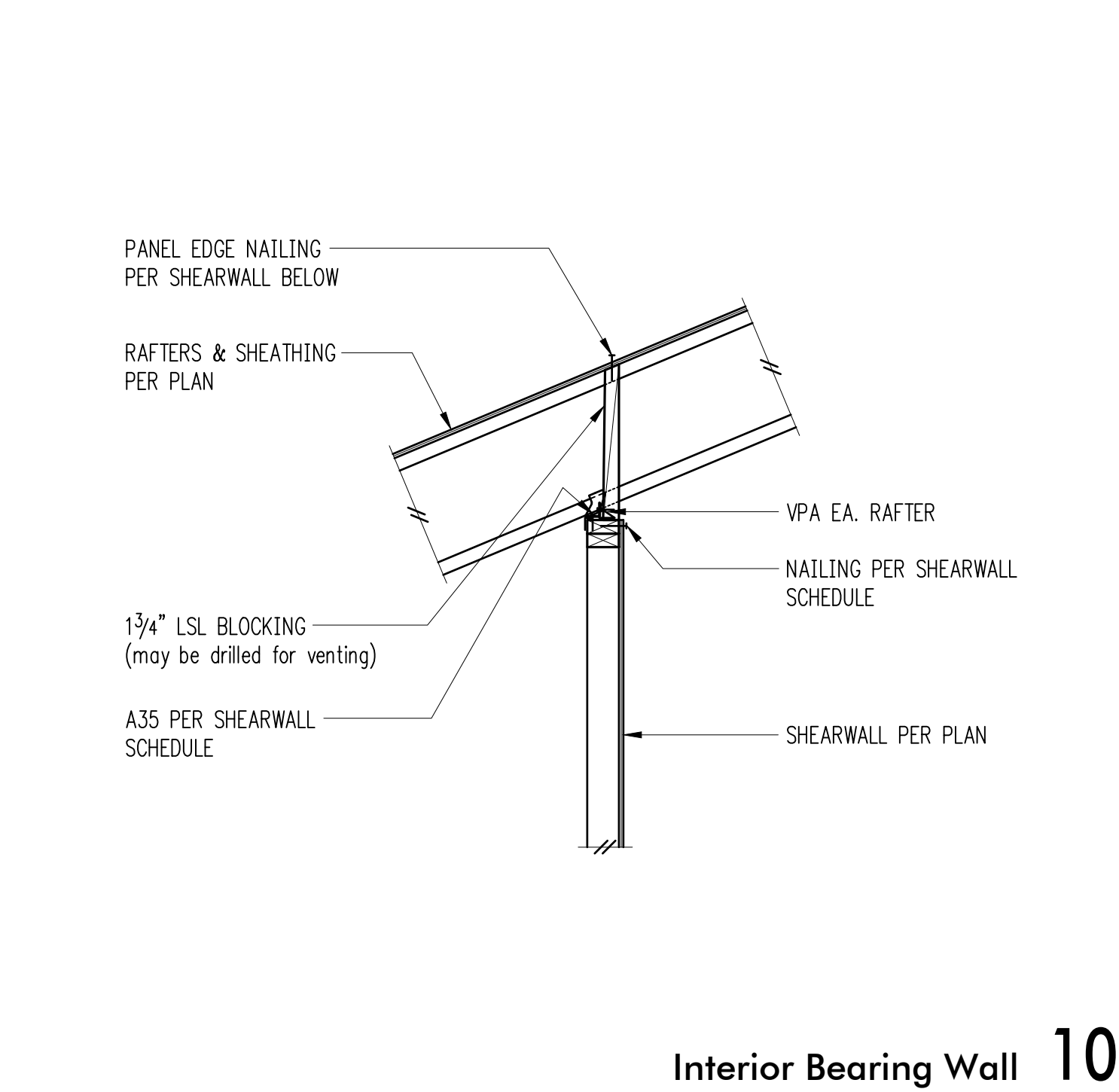
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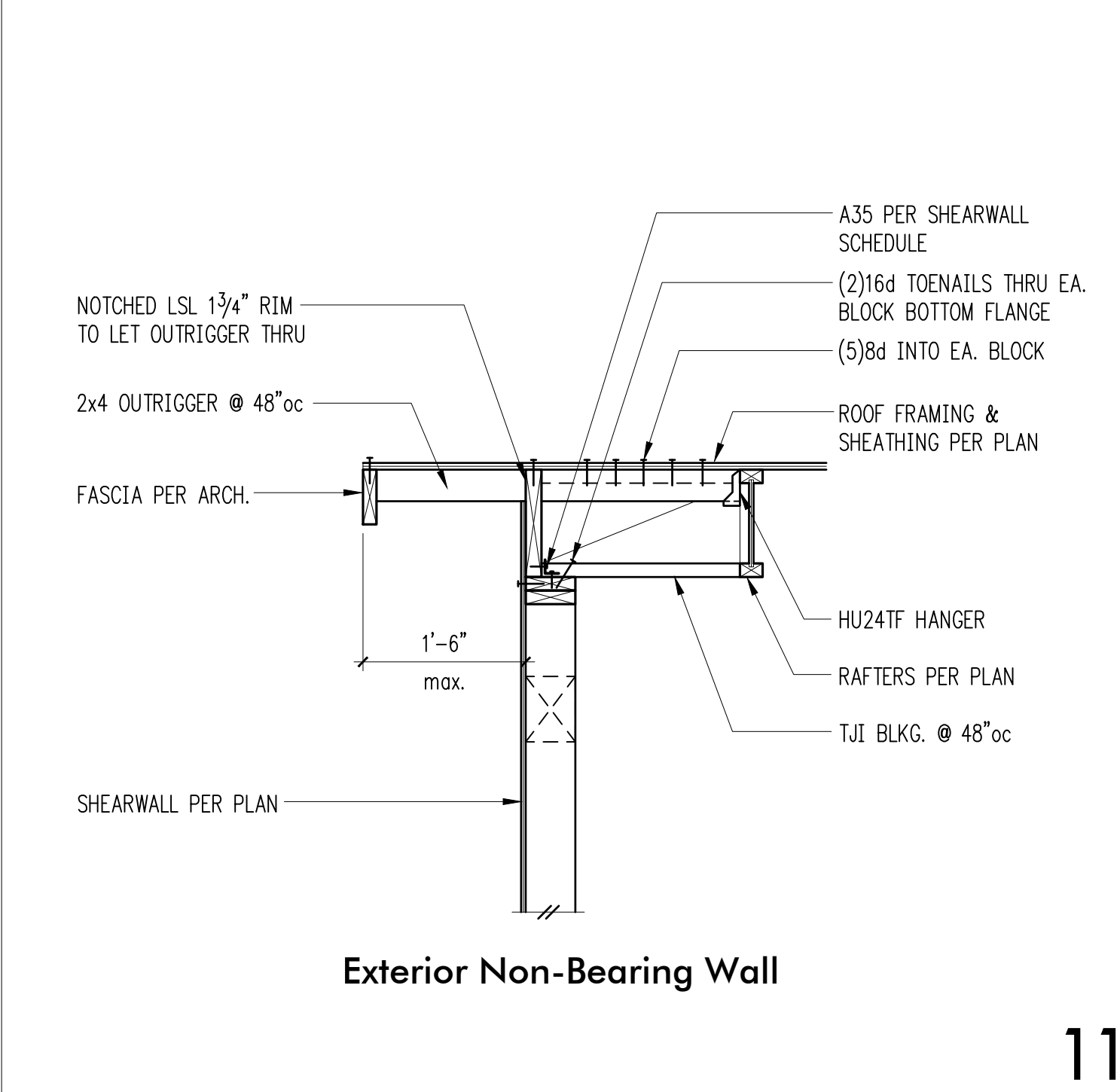
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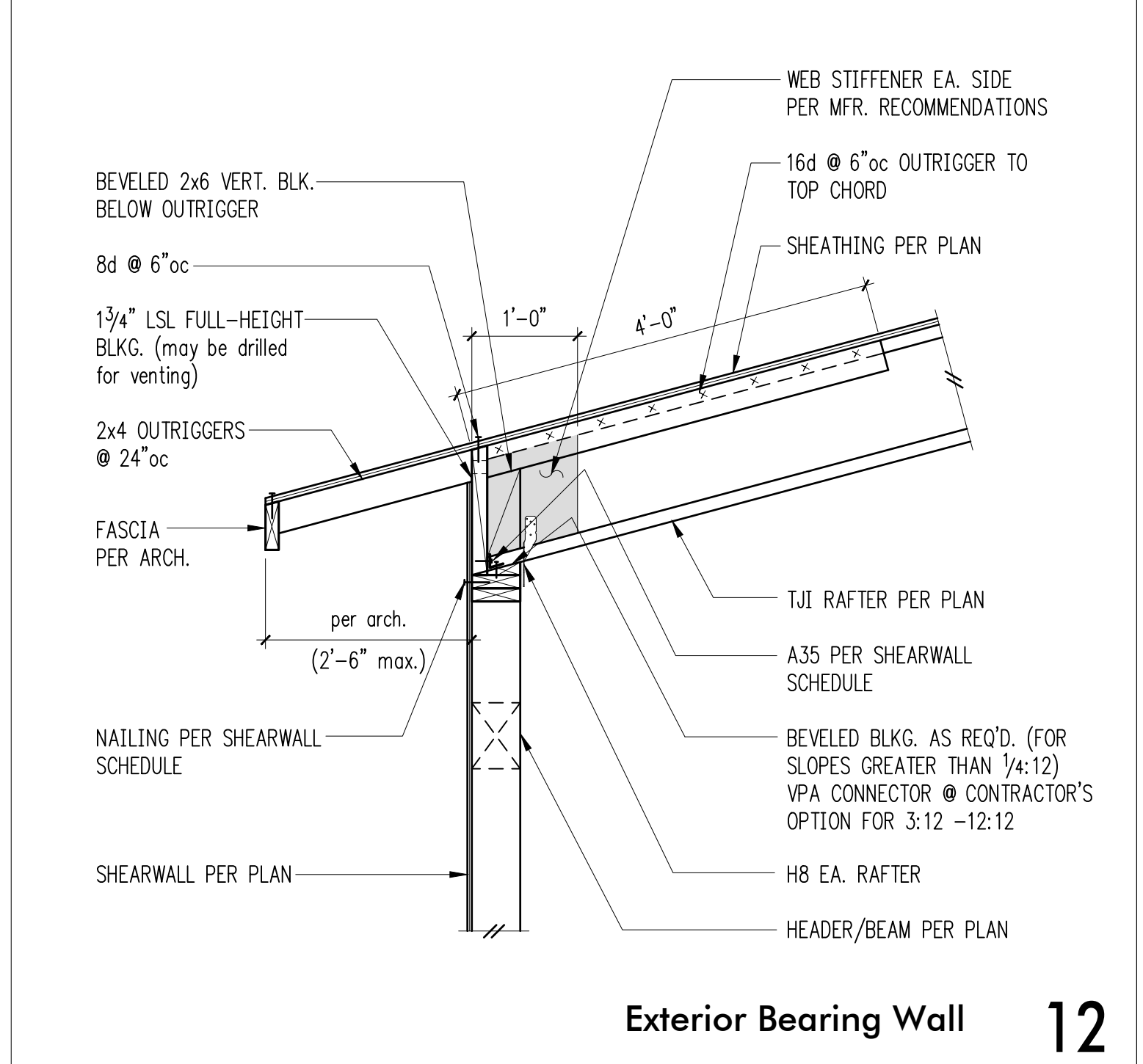
Heavy Roof Ledger 9



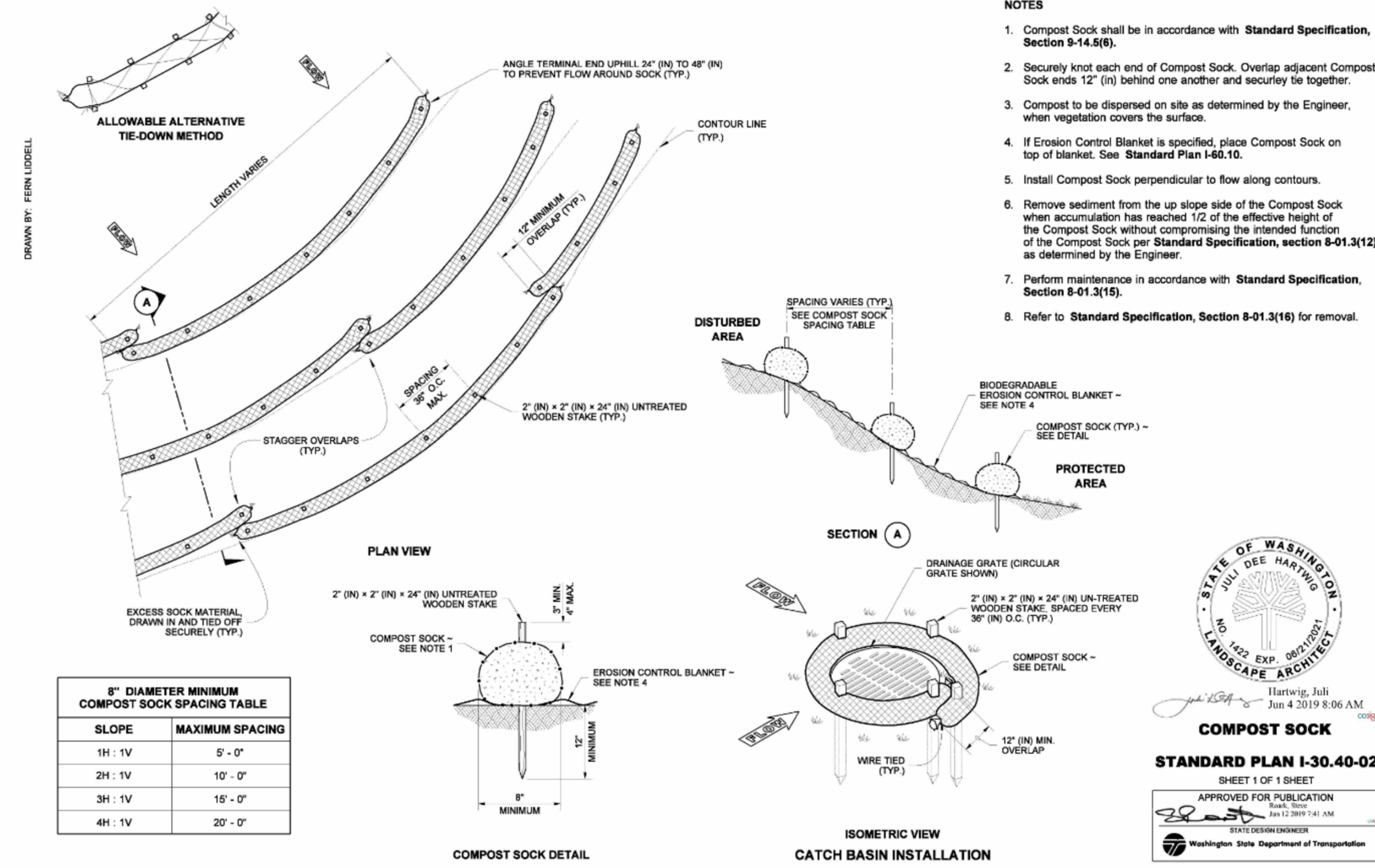
Interior Bearing Wall 10



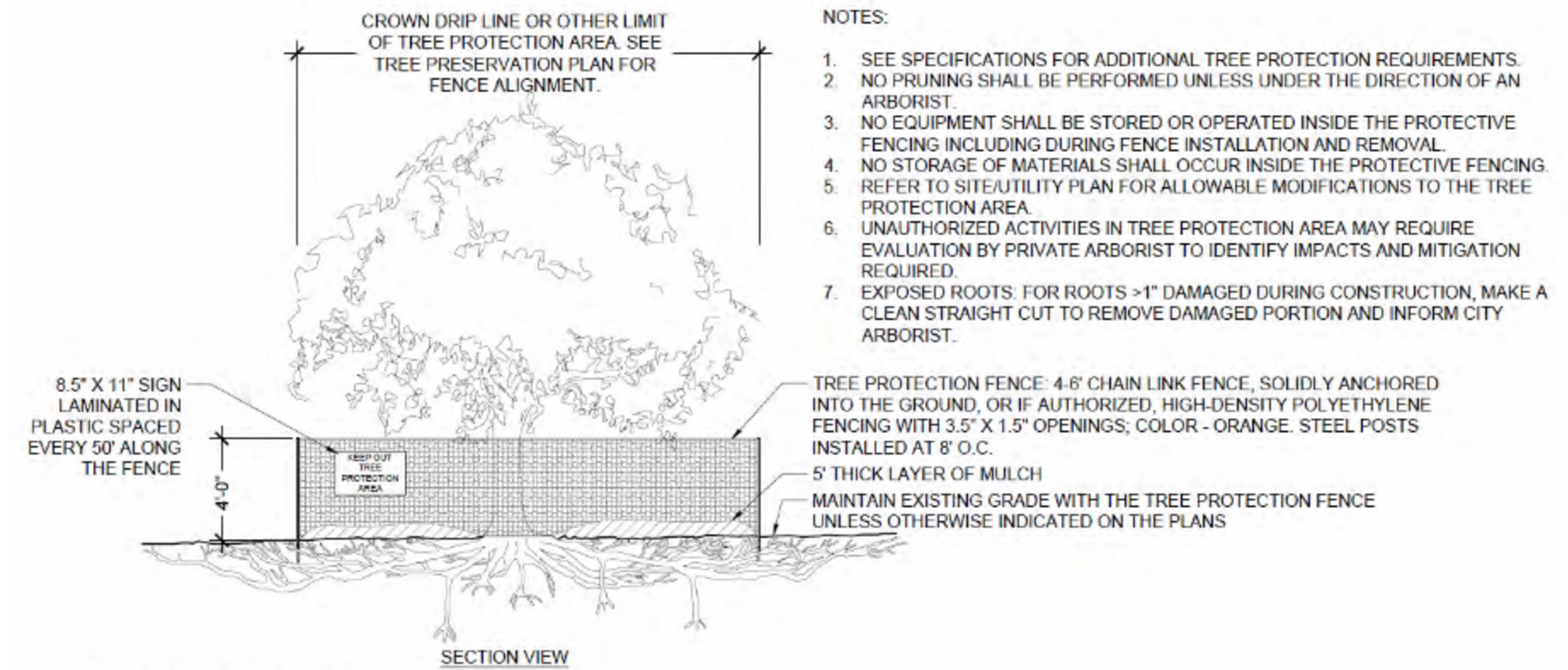
11



12



1 COMPOST STONE WSDOT STANDARD DETAIL
SCALE: NTS



2 TREE PROTECTION FENCE
SCALE: NTS

Salish Restoration Associates

Tree Summary Table

For: Korpela Project
At: 8441 SE 33rd Pl Mercer Island, WA

Salish Restoration Associates LLC

Date: 8/29/2023
Inspector: Benjamin Mark

Regulated (Large) Trees: Greater than 10". Exceptional trees: Per attached list. Trees on neighboring properties - Drip-line and Limits of Disturbance measurements from property lines
ISA TRAQ Risk Assessments were not carried out for any tree in this report.

ON-SITE TREES																
Tree/ Tag #	Evergreen/Deciduous	Common Name	Genus species	DBH Inches (Multistem calc.)	Healthy	Fair	Dead/Dying	Dripline				Limits of Disturbance	Photo #	REGULATED?	Exceptional?	Comments
								N	S	E	W					
1	Evergreen	Japanese black pine	<i>Pinus thunbergii</i>	10.8	✓	■	■	10	8	10	12	8nsew	1, 2	Yes	No	Codominant stems forked at 10 feet 17 feet from the corner of the garage.
2	Evergreen	Scots pine	<i>Pinus sylvestris</i>	10.7	✓	■	■	7	10	8	7	8nsew	2	Yes	No	4.5 feet from the corner of the garage.
3	Deciduous	Florida dogwood	<i>Cornus florida</i>	6.8	■	■	✓	9	10	5	9	8nsew	3	No	No	Poor condition from extensive infection of anthracnose. 5 feet west of house
4	Evergreen	Western hemlock	<i>Tsuga heterophylla</i>	18.1	✓	■	■	16	12	11	11	13nsew		Yes	YES	Dominated by old growth Douglas fir to the south.
5	Evergreen	Douglas fir	<i>Pseudotsuga menziesii</i>	63	✓	■	■	20	25	28	20	25nsew	4	Yes	YES	Remnant old growth. Top blown out. On steep slope. Good flare and taper
6	Deciduous	Big leaf maple	<i>Acer macrophyllum</i>	32.8	✓	■	■	46	28	25	21	20nsew	5	Yes	YES	Very large crown. Corrugated drain pipe from house was found just north of its root flare.
7	Deciduous	Big leaf maple	<i>Acer macrophyllum</i>	13	■	✓	■	18	19	22	26	20nsew	6	Yes	YES	Dominated by adjacent trees. Crown is mostly lost. Codominant leader is dead.
8	Deciduous	Big leaf maple	<i>Acer macrophyllum</i>	24	■	✓	■	20	18	23	15	20nsew	7	Yes	YES	Large, dead, broken stems on the east side. Decay is present. Crown is off-balance to the east
9	Deciduous	Big leaf maple	<i>Acer macrophyllum</i>	19	■	✓	■	24	20	11	20	18nsew	8, 12	Yes	YES	Will not be affected by the planned construction.

NEIGHBORING TREES																	
Tree/ Tag #	Evergreen/Deciduous	Common Name	Genus species	DBH Inches (Multistem calc.)	Healthy	Fair	Dead/Dying	Dripline				Limits of Disturbance	Photo #	REGULATED?	Exceptional?	Comments	
								N	S	E	W						
A	Evergreen	Portuguese laurel	<i>Prunus lusitanica</i>	8, 8, 8 (13.8)	✓	■	■	8				4n	9	Yes	No	4' stone retaining wall just to the north and west.	
B	Deciduous	Japanese maple	<i>Acer palmatum</i>	8, 8, 8, 8 (15)	✓	■	■	10				19	6n	10	Yes	No	Rock retaining wall on subject property 6' to the north of this tree. It's lowest branch slightly overhangs the existing house 6' above the south gutter line.
C	Evergreen	Western red cedar	<i>Thuja plicata</i>	21.7	✓	■	■	17				17	12s, 20e, 12w	Yes	YES	Root flare buried by falling wood retaining wall. Corner of house is 12 feet to the southwest.	
D	Evergreen	Douglas fir	<i>Pseudotsuga menziesii</i>	45.4	✓	■	■	23				17	20nsew	11	Yes	YES	Low live crown ratio, top blown out. Girdling stem at 80 feet. Trunk is under rolled on the east side.
E	Evergreen	Douglas fir	<i>Pseudotsuga menziesii</i>	19	✓	■	■	8				10n	12	Yes	YES	Top blown out at 55 feet. Canopy mostly extends to the east and west.	

3 TREE INVENTORY (PER SALISH RESTORATION ASSOCIATES)
SCALE: NTS



MARK	DATE	DESCRIPTION
	06/27/24	PERMIT SUBMITTAL
	11/14/24	PERMIT RESUBMITTAL

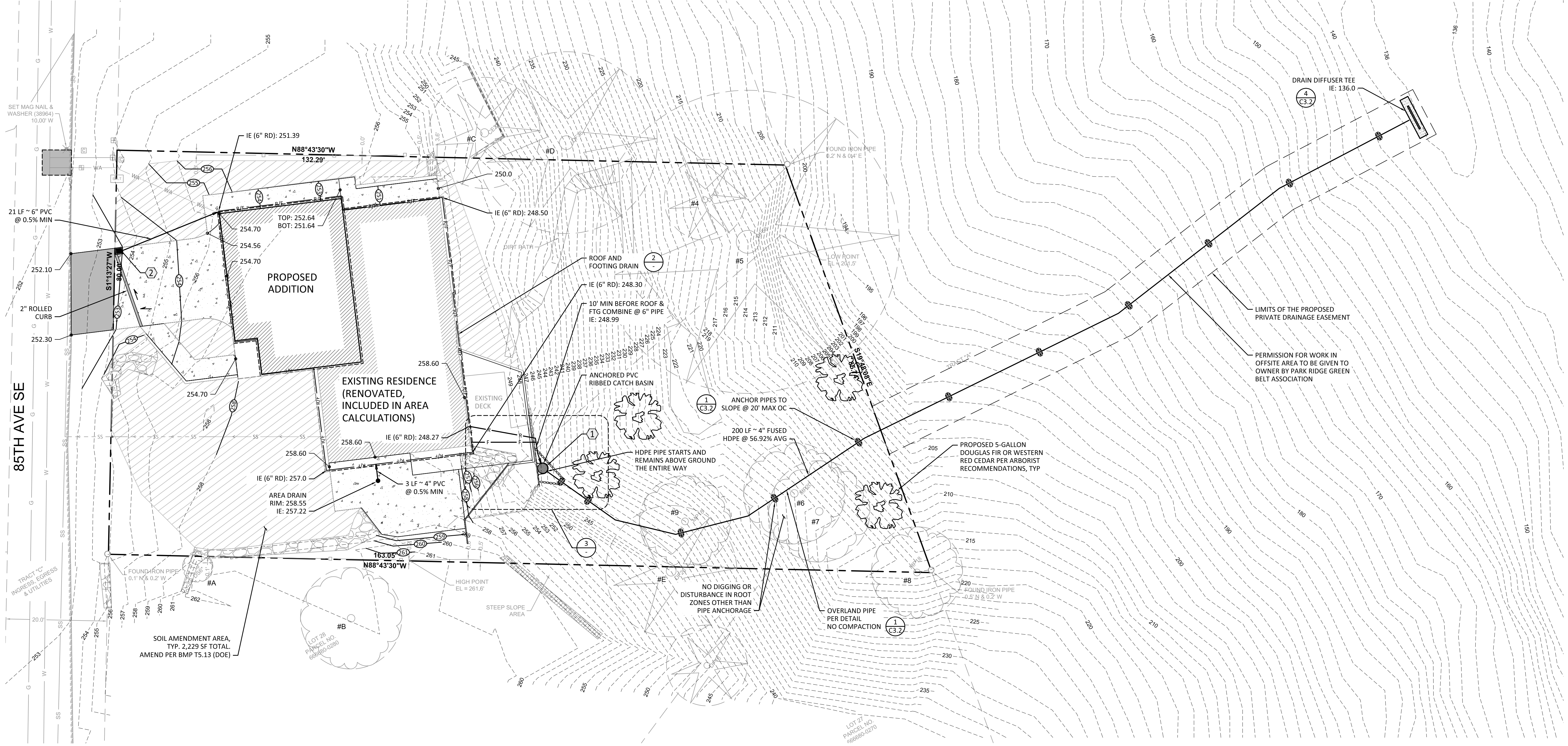
DESIGN: JCO
DRAWN: JCP
CHECK: JPU
JOB NO: 23354.20
DATE: 06/27/24

KORPELA RESIDENCE
8441 SE 33RD PL
MERCER ISLAND, WA 98040
TEMPORARY EROSION
CONTROL DETAILS



MARK	DATE	DESCRIPTION
	06/27/24	PERMIT SUBMITTAL
	11/14/24	PERMIT RESUBMITTAL

DESIGN:	JCO
DRAWN:	JCP
CHECK:	JPU
JOB NO:	23354.20
DATE:	06/27/24



1 GRADING AND DRAINAGE PLAN
 SCALE: 1" = 10'

GRADING AND DRAINAGE PLAN NOTES:

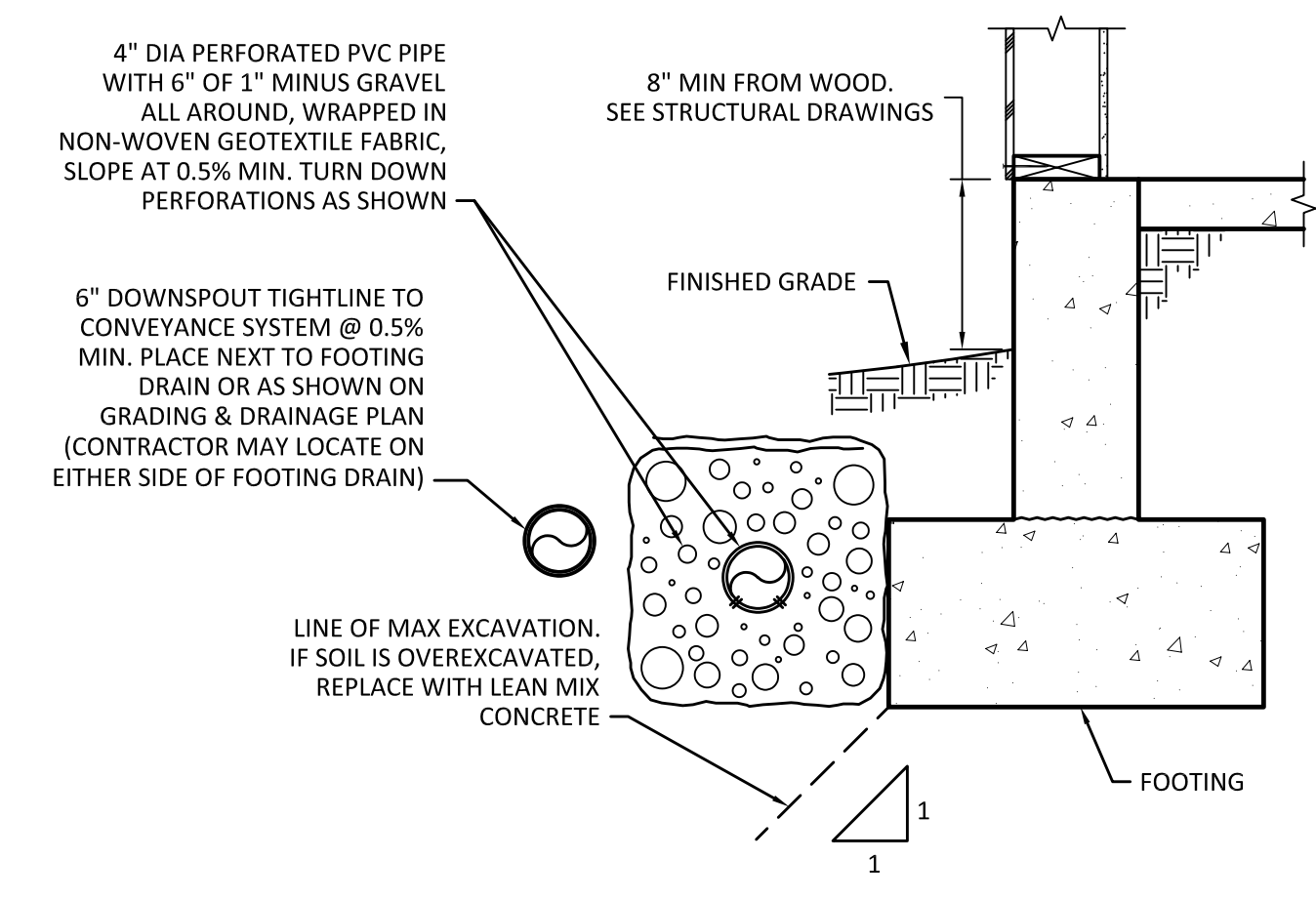
- SOILS REPORT
 REPORT NUMBER: 2727.01
 PREPARED BY: ZIPPERGEO
 DATED: 11/28/23
- TOW AND BOW REFER TO FINISHED GRADE AT THE TOP AND BOTTOM OF THE WALLS, RESPECTIVELY.
- A MINIMUM OF 3' HORIZONTAL SEPARATION AND 1' VERTICAL SEPARATION IS REQUIRED BETWEEN DRY UTILITY (POWER, GAS, PHONE, CABLE, ETC) AND SEWER, WATER AND STORM, AND A MINIMUM OF 5' HORIZONTAL SEPARATION AND 1' VERTICAL SEPARATION FROM ANY CITY-OWNED LINES.
- A MINIMUM OF 2' OF COVER IS REQUIRED FOR ALL PIPES LOCATED UNDER DRIVABLE SURFACES AND 1' OF COVER UNDER LANDSCAPE SURFACES.
- CONTRACTOR SHALL INVESTIGATE THE FUNCTIONALITY OF PIPES AND TIGHTLINE THESE TO THE NEW CATCH BASIN AT THE SE PER DETAIL 3/C3.1 END OF THE WALL ALONG WITH DRAINAGE FROM RESIDENCE.
- REROUTE DRAINS TO NEW CATCH BASIN AT SE AND TIE INTO HDPE DRAINAGE SYSTEM.
- NEW/REPLACED IMPERVIOUS SURFACE (INCLUDING ROW): 3,150 SF
 -- NEW RESIDENCE: 2,054 SF ROOF AREA DIRECTED TO DRAIN DIFFUSER TEE.
 -- NEW WALKWAY: 255 SF DIRECTED TO DRAIN DIFFUSER TEE.
 -- NEW PATIO: 343 SF DIRECTED TO DRAIN DIFFUSER TEE.
 -- NEW DRIVEWAY: 498 SF SHEET FLOWS TO 85TH AVE SE.

GRADING QUANTITIES	
TOTAL EXCAVATION (CUT) -	150 CU YDS TOTAL
EMBANKMENT (FILL) -	35 CU YDS
TOTAL	185 CU YDS

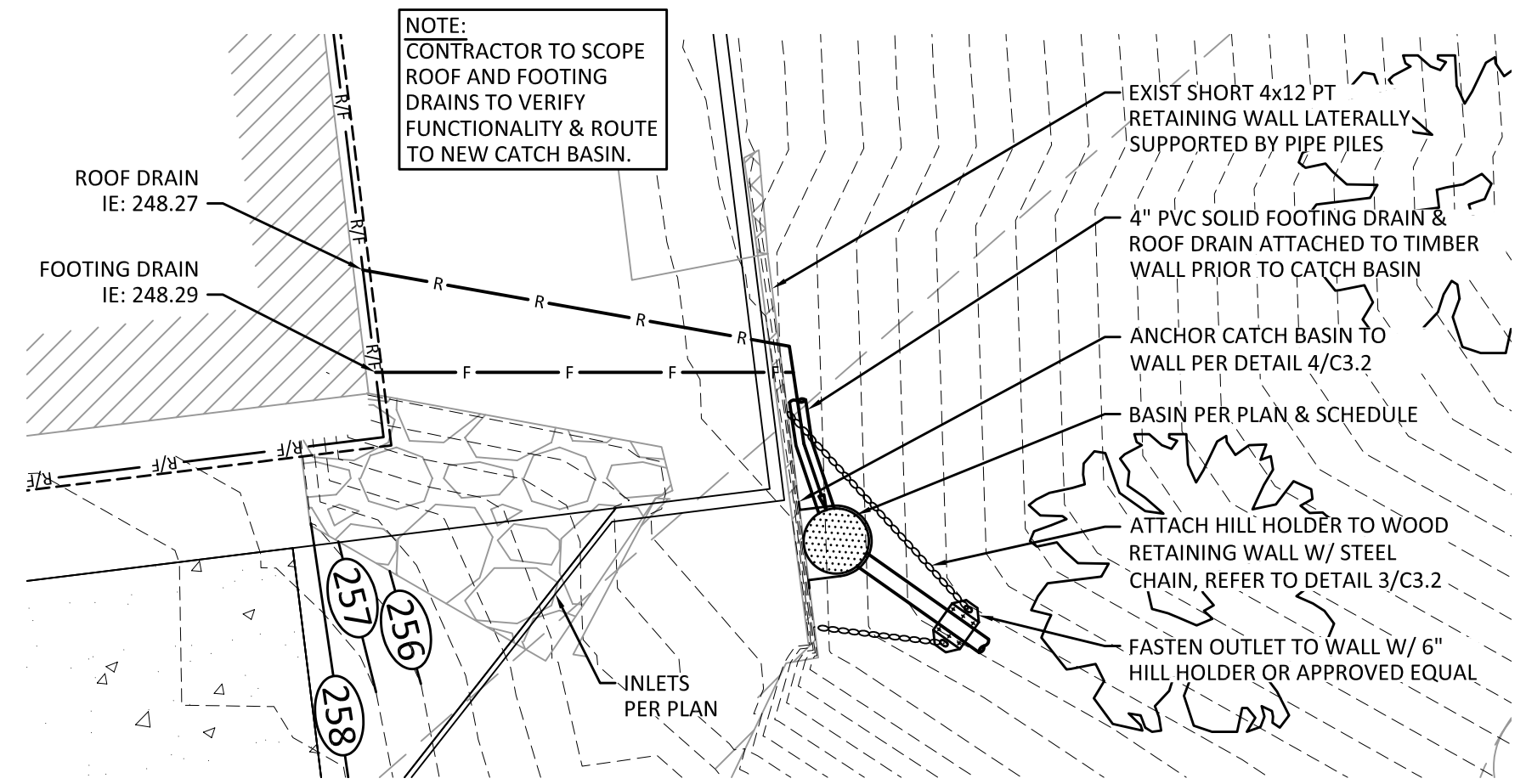
THE QUANTITIES SHOWN ABOVE ARE FOR THE PERMIT PROCESS ONLY. THESE VALUES ARE APPROXIMATE. DO NOT USE FOR BIDDING, PAYMENT, OR ESTIMATING PURPOSES.

CATCH BASIN SCHEDULE				
MARK	TYPE	RIM ELEV	INV ELEV	NOTES
1	24" Ø NYLOPLAST DRAIN BASIN	250.33	(6" N): 248.17 (4" SE): 248.07	2 3 C3.2 C3.2
2	TYPE 1 W/ FLOATABLE MATERIAL SEPARATOR	253.0	(6" E): 251.50	5 6 C3.2 C3.2

PAVING LEGEND	
	NEW ASPHALT
	NEW CONCRETE



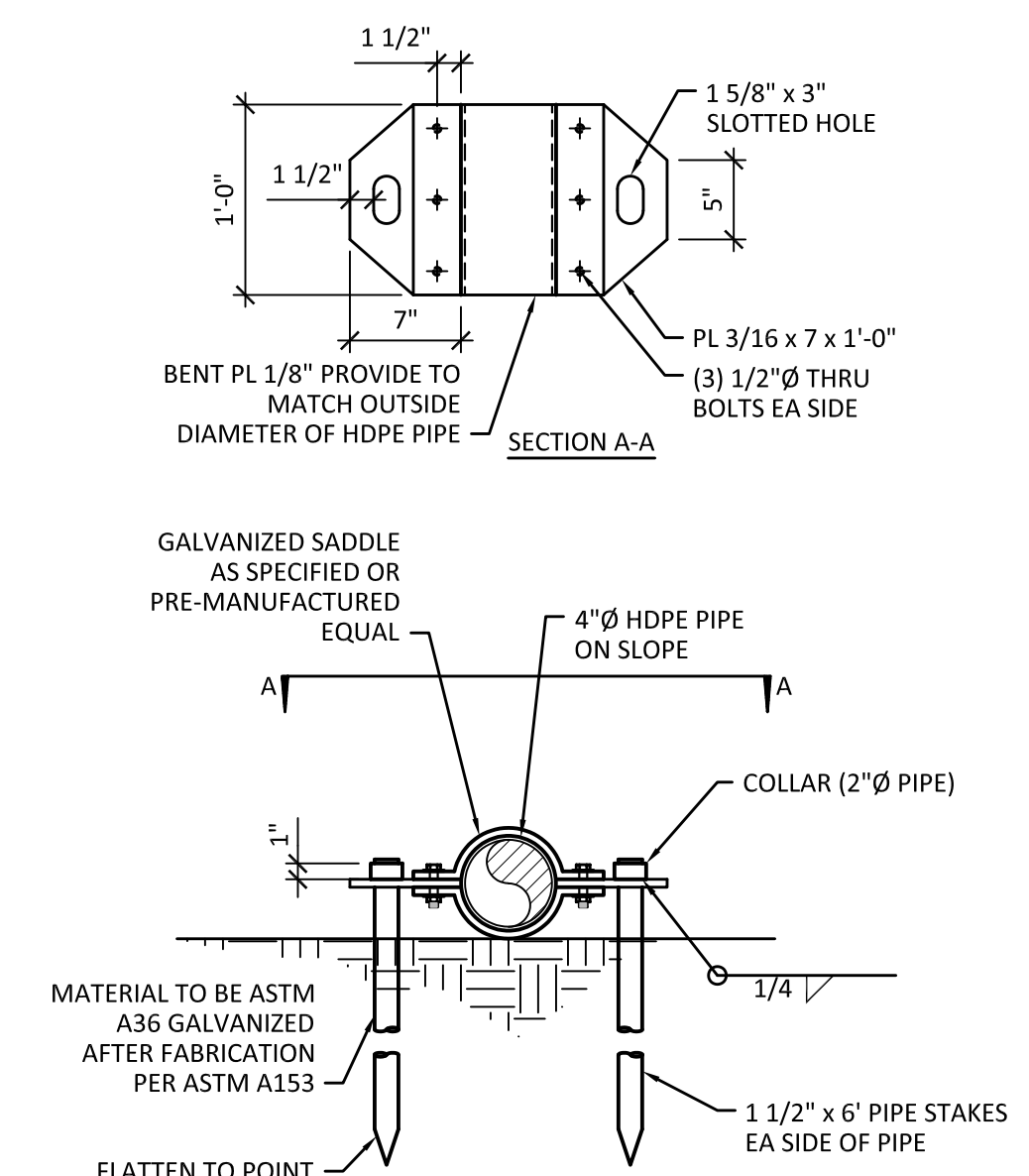
2 FOOTING AND ROOF DRAIN SECTION
 SCALE: NTS



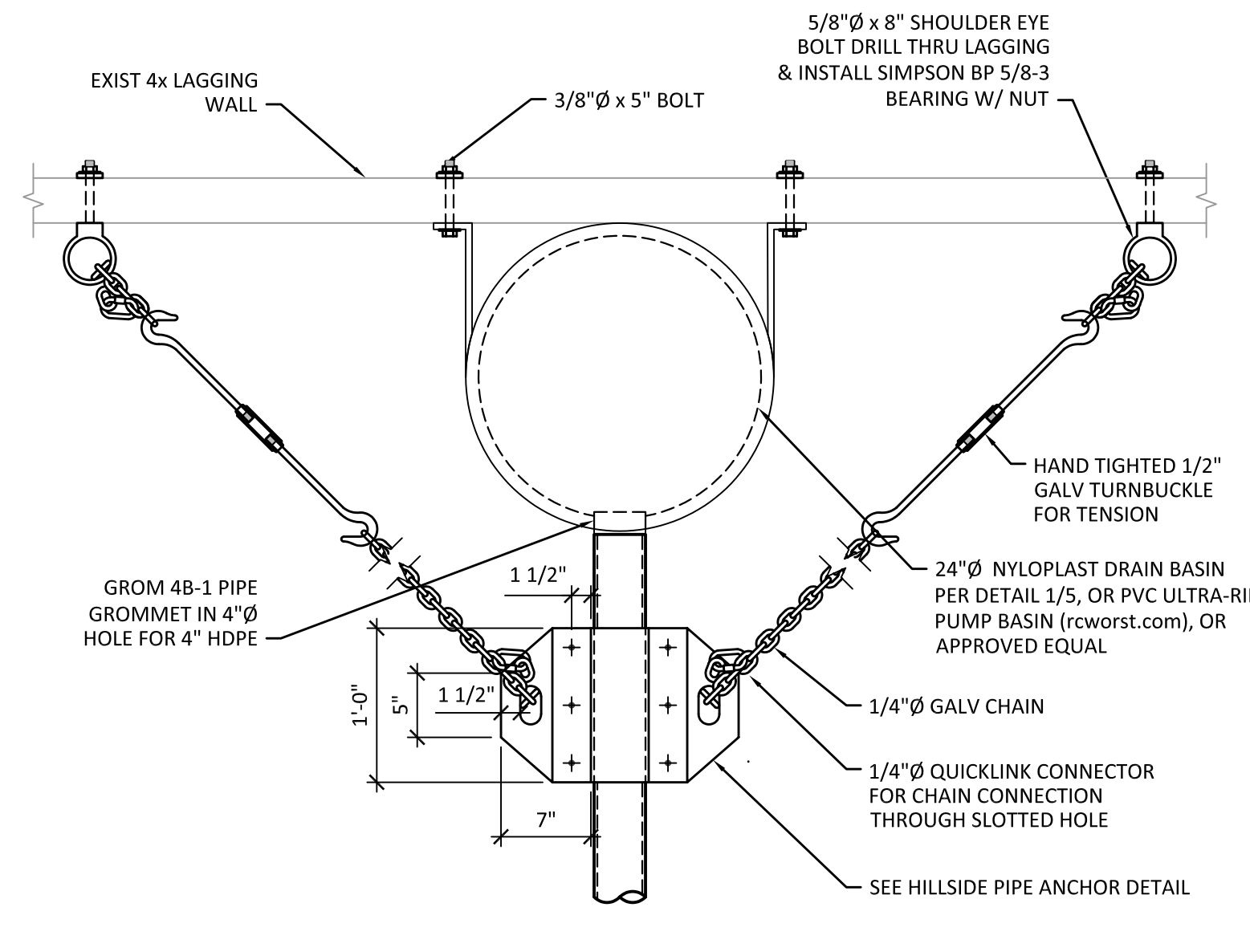
3 GRADING AND DRAINAGE PLAN
 SCALE: 1" = 5'

KORPELA RESIDENCE
 8441 SE 33RD PL
 MERCER ISLAND, WA 98040
GRADING AND DRAINAGE PLAN

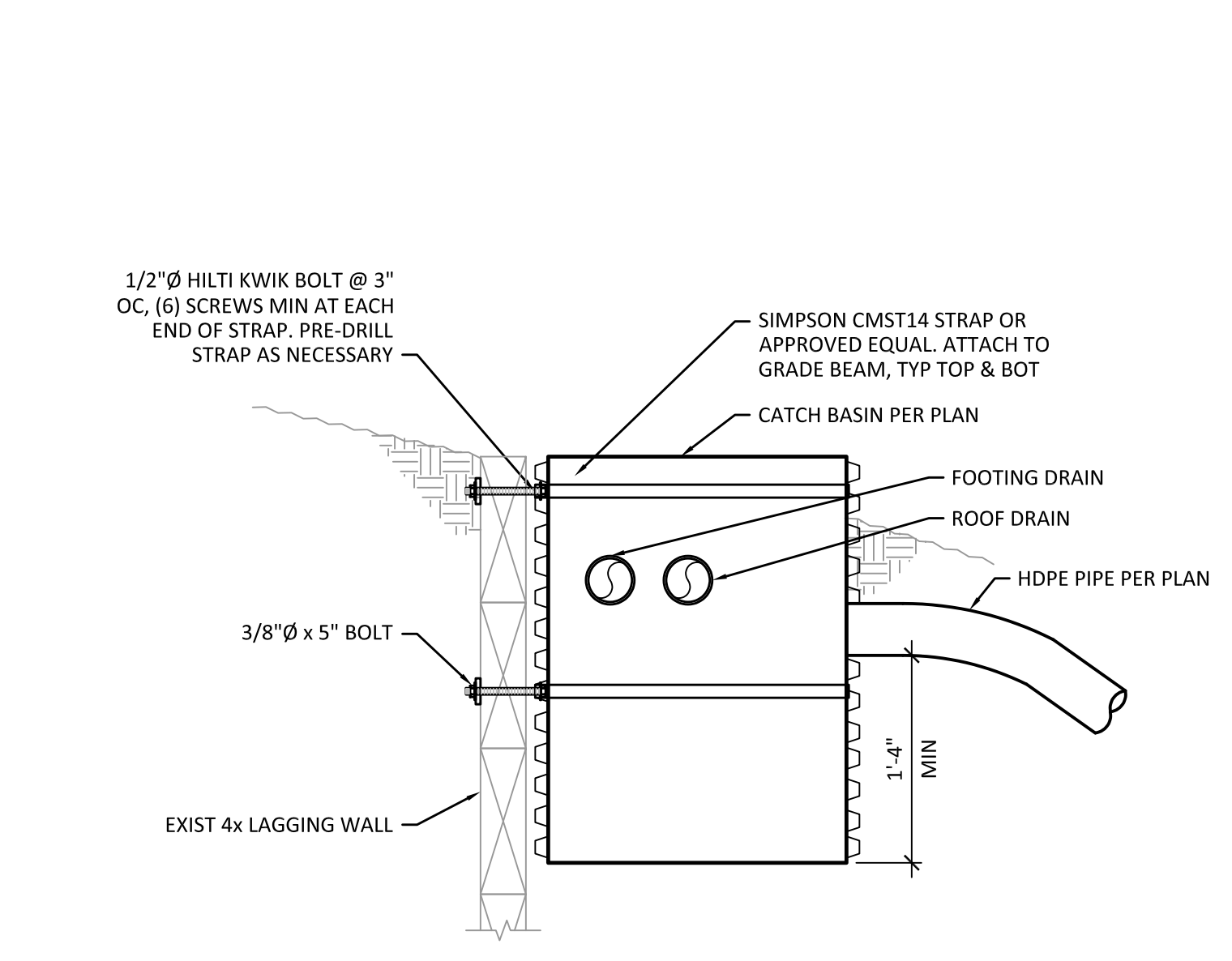
SHEET:
C3.1



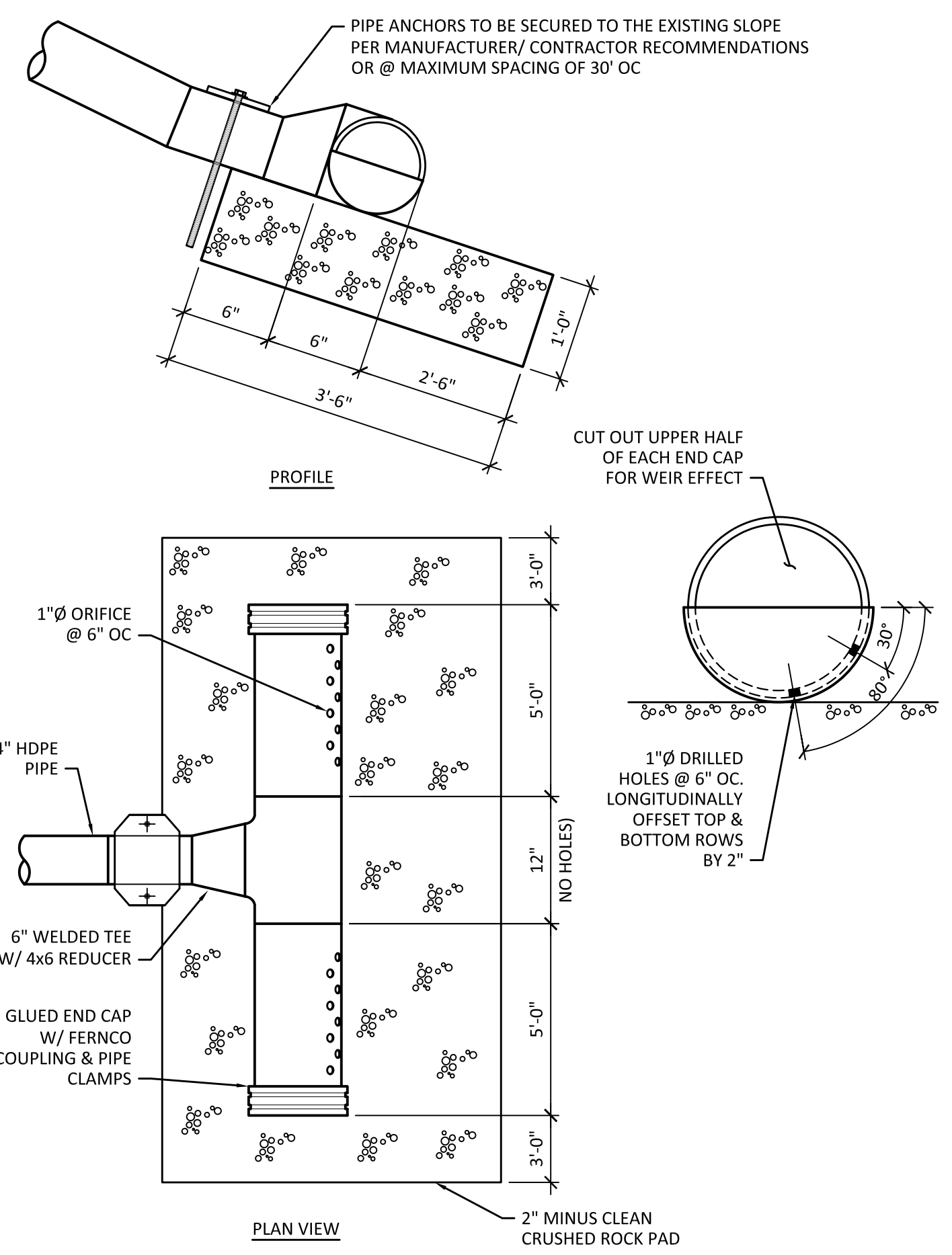
1 PIPE ANCHOR DETAIL
 SCALE: NTS



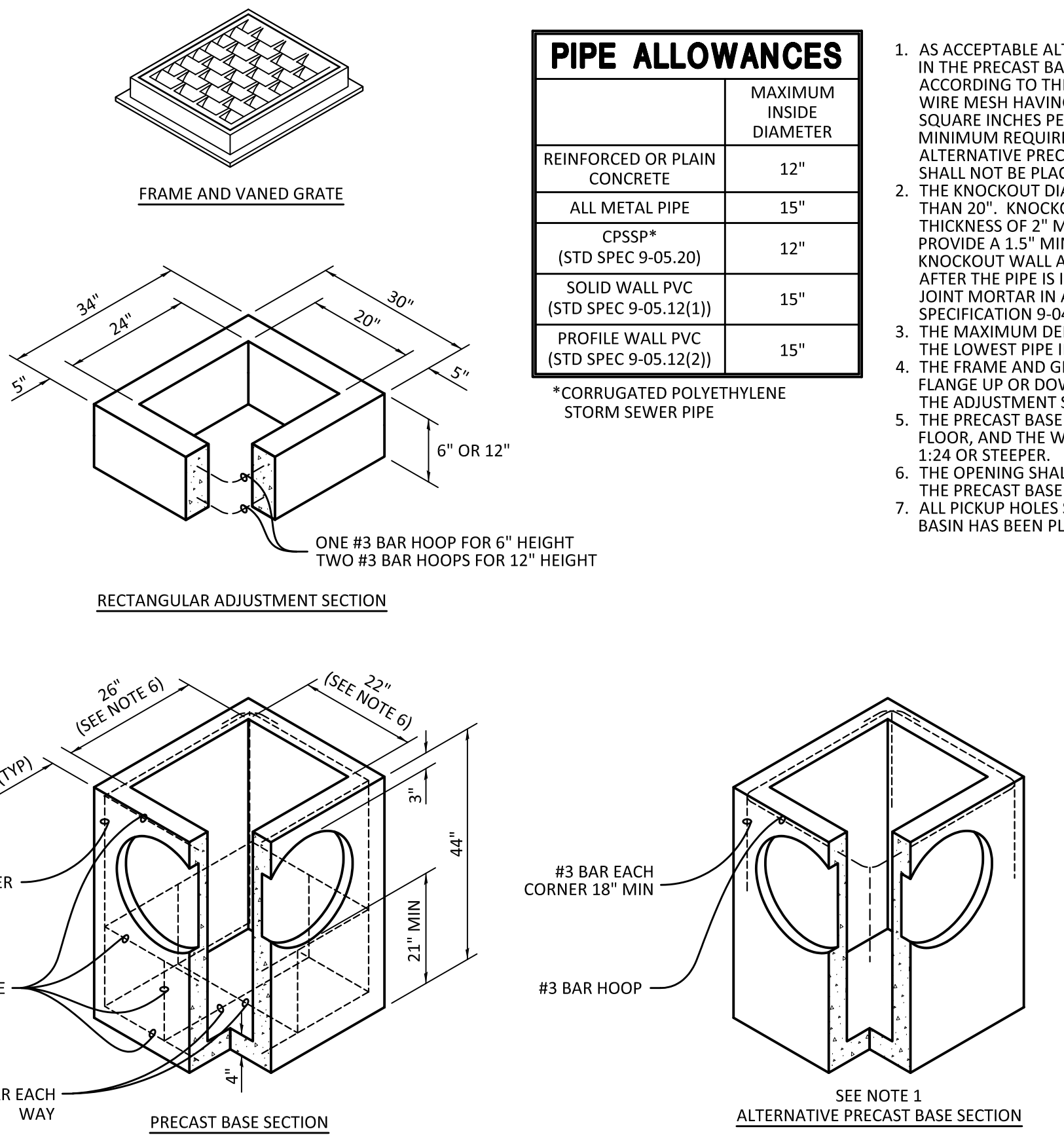
2 HDPE PIPE ANCHOR DETAIL
 SCALE: 1" = 1'-0"



3 CATCH BASIN CONNECTION
 SCALE: 1" = 1'-0"



4 DRAIN DIFFUSER TEE DETAIL
 SCALE: NTS

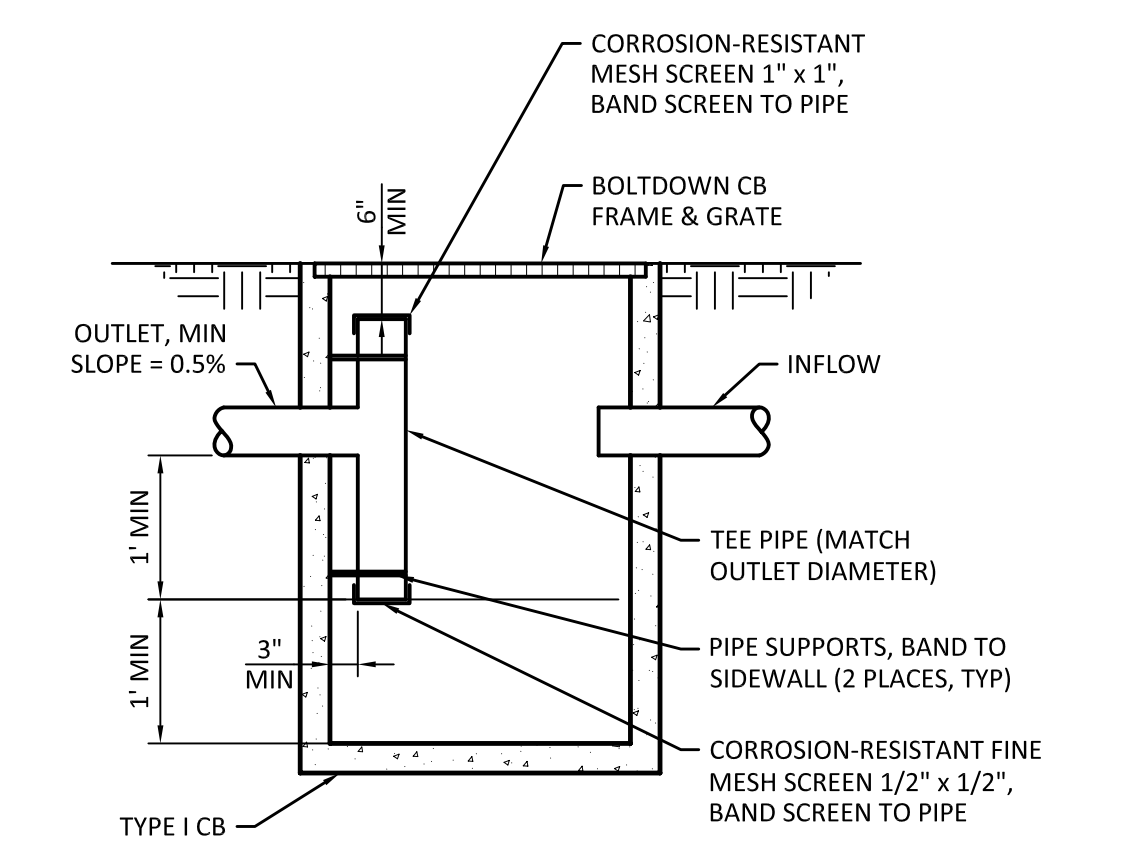


5 TYPE I CATCH BASIN
 SCALE: 1/2" = 1'-0"

PIPE ALLOWANCES	
	MAXIMUM INSIDE DIAMETER
REINFORCED OR PLAIN CONCRETE	12"
ALL METAL PIPE	15"
CPSS* (STD SPEC 9-05.20)	12"
SOLID WALL PVC (STD SPEC 9-05.12(1))	15"
PROFILE WALL PVC (STD SPEC 9-05.12(2))	15"

*CORRUGATED POLYETHYLENE STORM SEWER PIPE

- AS ACCEPTABLE ALTERNATIVES TO THE REBAR SHOWN IN THE PRECAST BASE SECTION, FIBERS (PLACED ACCORDING TO THE STANDARD SPECIFICATIONS), OR WIRE MESH HAVING A MINIMUM AREA OF 0.12 SQUARE INCHES PER FOOT SHALL BE USED WITH THE MINIMUM REQUIRED REBAR SHOWN IN THE ALTERNATIVE PRECAST BASE SECTION. WIRE MESH SHALL NOT BE PLACED IN THE KNOCKOUTS.
- THE KNOCKOUT DIAMETER SHALL NOT BE GREATER THAN 20". KNOCKOUTS SHALL HAVE A WALL THICKNESS OF 2" MINIMUM TO 2.5" MAXIMUM. PROVIDE A 1.5" MINIMUM GAP BETWEEN THE KNOCKOUT WALL AND THE OUTSIDE OF THE PIPE. AFTER THE PIPE IS INSTALLED, FILL THE GAP WITH JOINT MORTAR IN ACCORDANCE WITH STANDARD SPECIFICATION 9-04.3.
- THE MAXIMUM DEPTH FROM THE FINISHED GRADE TO THE LOWEST PIPE INVERT SHALL BE 5'.
- THE FRAME AND GRATE MAY BE INSTALLED WITH THE FLANGE UP OR DOWN. THE FRAME MAY BE CAST INTO THE ADJUSTMENT SECTION.
- THE PRECAST BASE SECTION MAY HAVE A ROUNDED FLOOR, AND THE WALLS MAY BE SLOPED AT A RATE OF 1:24 OR STEEPER.
- THE OPENING SHALL BE MEASURED AT THE TOP OF THE PRECAST BASE SECTION.
- ALL PICKUP HOLES SHALL BE GROUTED FULL AFTER THE BASIN HAS BEEN PLACED.



6 FLOATABLE MATERIAL SEPARATOR
 SCALE: NTS

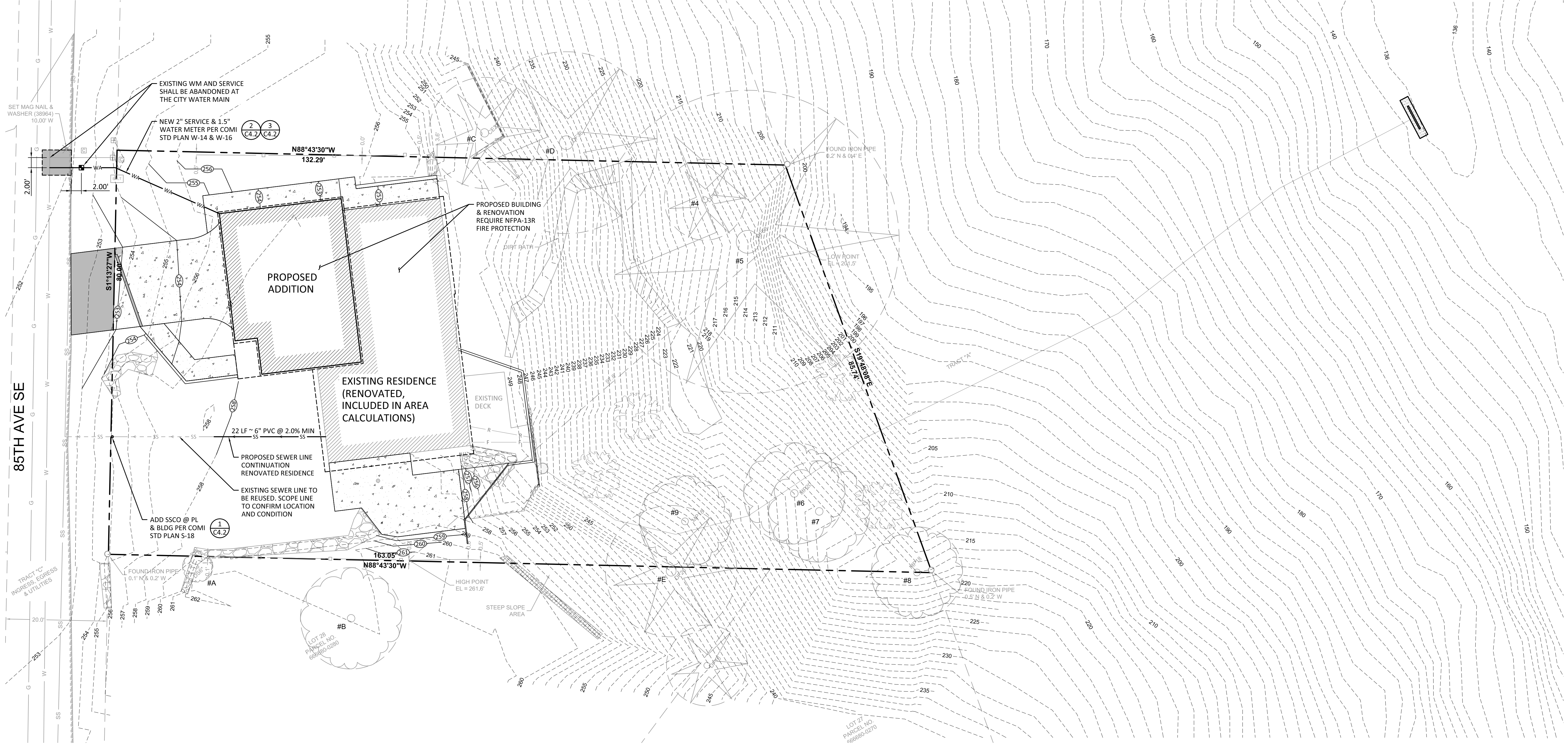
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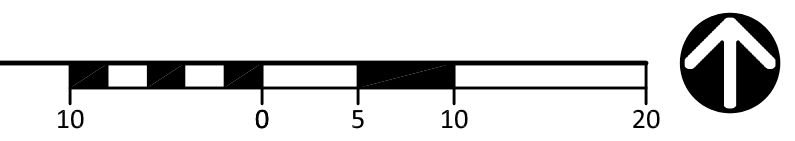
KORPELA RESIDENCE
 8441 SE 33RD PL
 MERCER ISLAND, WA 98040

GRADING AND DRAINAGE DETAILS

SHEET:



1 WATER AND SEWER PLAN
SCALE: 1" = 10'



ENGINEERING
250 4TH AVE. S., SUITE 200
EDMONDS, WASHINGTON 98020
PHONE (425) 778-8500
FAX (425) 778-5536

Craig Guillebert
STATE OF WASHINGTON
REGISTERED PROFESSIONAL ENGINEER
11/14/24

MARK	DATE	DESCRIPTION
	06/27/24	PERMIT SUBMITTAL
	11/14/24	PERMIT RESUBMITTAL

DESIGN:	JCO
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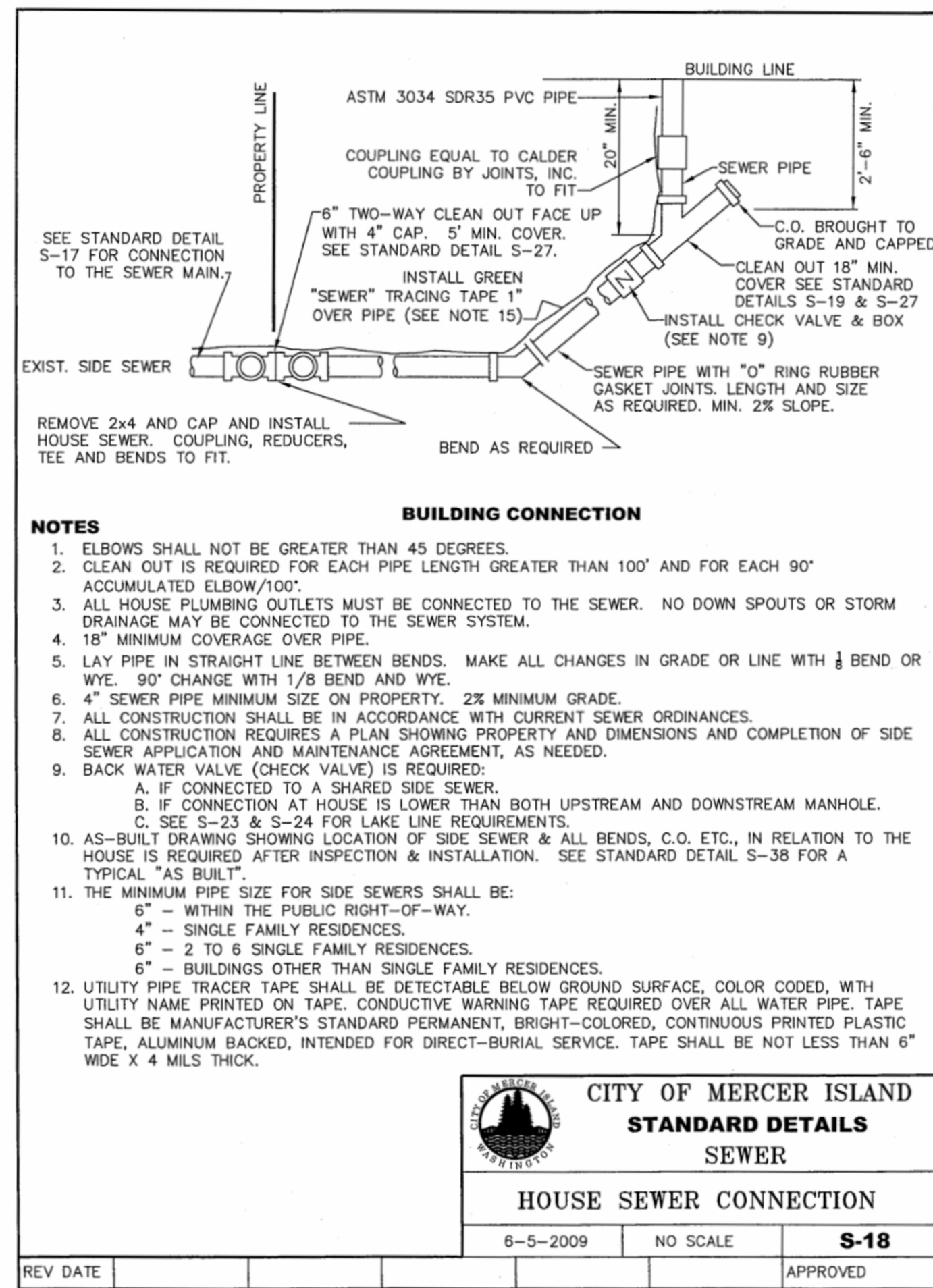
KORPELA RESIDENCE
8441 SE 33RD PL
MERCER ISLAND, WA 98040

WATER AND SEWER PLAN

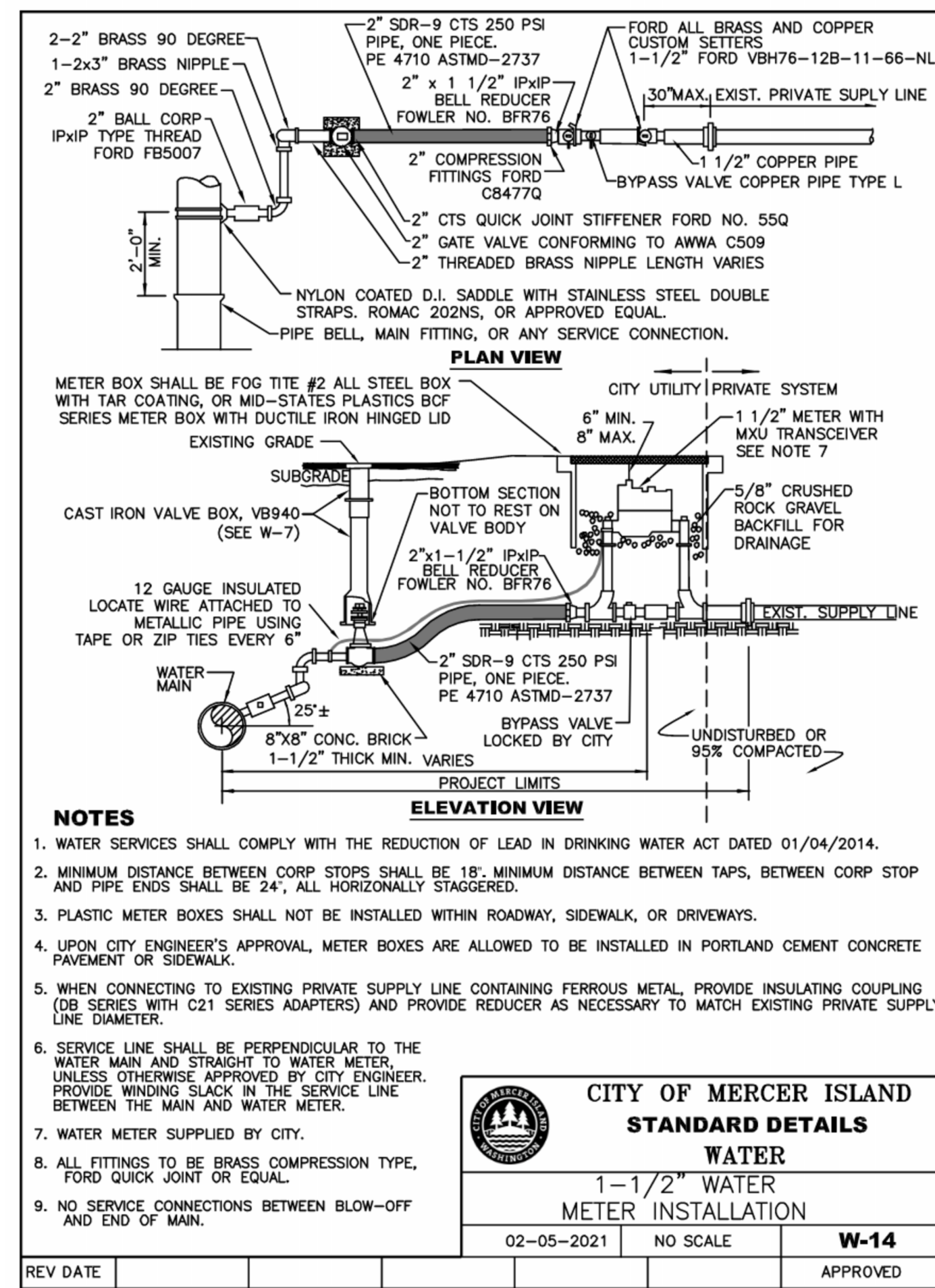
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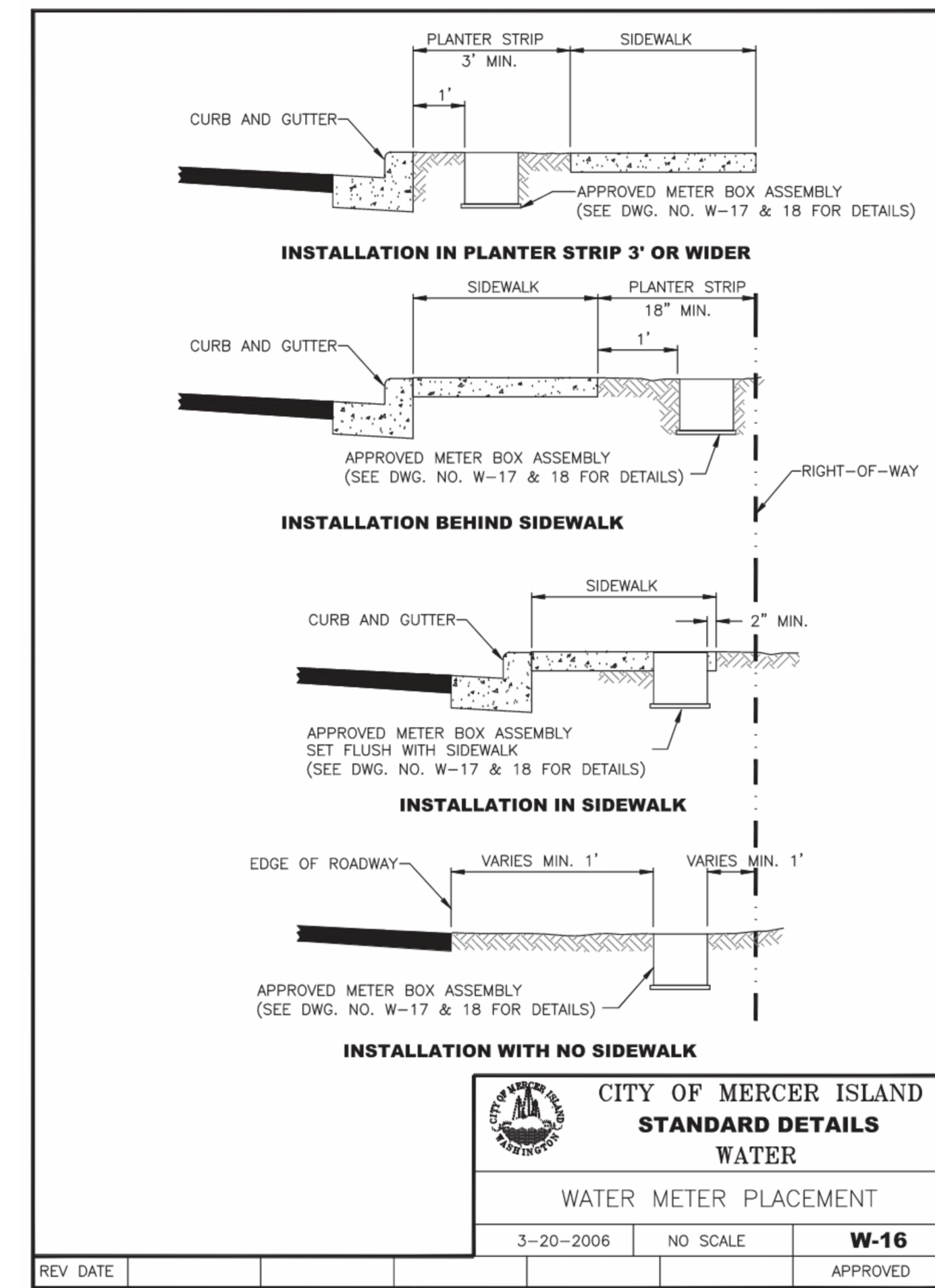
C4.1



1 CITY OF MERCER ISLAND STANDARD DETAIL SCALE: NTS



2 CITY OF MERCER ISLAND STANDARD DETAIL SCALE: NTS



3 CITY OF MERCER ISLAND STANDARD DETAIL SCALE: NTS



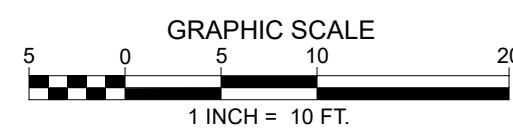
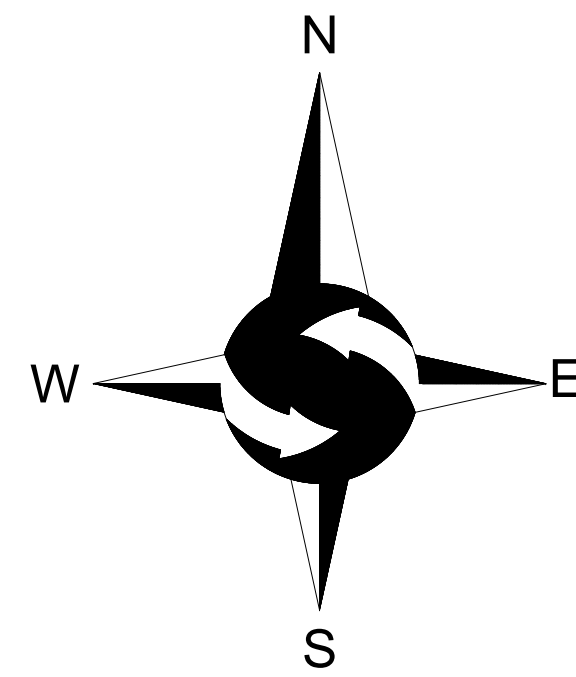
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KORPELA RESIDENCE
 8441 SE 33RD PL
 MERCER ISLAND, WA 98040

WATER AND SEWER DETAILS

SHEET:
C4.2



LEGEND

- FOUND MONUMENT IN CASE
- FOUND REBAR AS DESCRIBED
- SET MAG NAILS AS DESCRIBED
- POWER METER
- GAS METER
- ELECTRICAL VAULT
- CABLE PEDESTAL
- SANITARY SEWER MANHOLE
- WATER VALVE
- FIRE HYDRANT
- WATER METER
- APPROXIMATE LOCATION SANITARY SEWER LINE
- APPROXIMATE LOCATION UNDERGROUND GAS LINE
- APPROXIMATE LOCATION UNDERGROUND WATER LINE
- WOOD FENCE
- CONCRETE WALL
- TIMBER WALL
- ROCKERY
- ASPHALT SURFACE
- CONCRETE SURFACE
- GRAVEL SURFACE
- BRICK SURFACE
- CE CEDAR
- DF DOUGLAS FIR
- DS DECIDUOUS
- MP MAPLE
- * INDICATES MULTI-TRUNK

LEGAL DESCRIPTION

LOT 29, PARKRIDGE, ACCORDING TO THE PLAT THEREOF RECORDED IN VOLUME 78 OF PLATS, PAGES 29 AND 30, RECORDS OF KING COUNTY, WASHINGTON.
SITUATE IN THE CITY OF MERCER ISLAND, COUNTY OF KING, STATE OF WASHINGTON.

BASIS OF BEARINGS

THE PLAT OF PARKRIDGE, ACCORDING TO THE PLAT THEREOF RECORDED IN VOLUME 78 OF PLATS, PAGES 29 AND 30, RECORDS OF KING COUNTY, WASHINGTON.

PROJECT INFORMATION

PROPERTY OWNER: NATHAN KORPELA & SHAUNNA WIENS
8401 LINDEN AVENUE N
SEATTLE, WA 98103

TAX PARCEL NUMBER: 666680-0290

PROJECT ADDRESS: 8441 SE 33RD PLACE
MERCER ISLAND, WA 98040

ZONING: R-9.6

JURISDICTION: CITY OF MERCER ISLAND

PARCEL ACREAGE: 11,814 S.F. (0.271 ACRES) AS SURVEYED

GENERAL NOTES

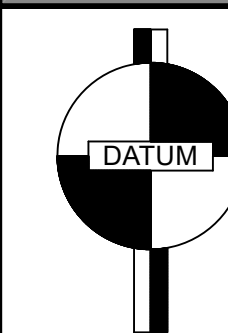
1. THIS SURVEY WAS COMPLETED WITHOUT BENEFIT OF A CURRENT TITLE REPORT. EASEMENTS AND OTHER ENCUMBRANCES MAY EXIST ON THIS PROPERTY THAT ARE NOT SHOWN HEREON.
2. INSTRUMENTATION FOR THIS SURVEY WAS A 3-SECOND SPECTRAPRECISION FOCUS 35 TOTAL STATION AND AN EMLID REACH RS2 GPS RECEIVER. PROCEDURES USED IN THIS SURVEY MEET OR EXCEED STANDARDS SET BY WAC 332-130-090.
3. THE INFORMATION ON THIS MAP REPRESENTS THE RESULTS OF A SURVEY MADE IN AUGUST 2022 AND CAN ONLY BE CONSIDERED AS INDICATING THE GENERAL CONDITIONS EXISTING AT THAT TIME.
4. UTILITIES SHOWN ON THIS SURVEY ARE BASED UPON ABOVE GROUND OBSERVATIONS AND AS-BUILT PLANS WHERE AVAILABLE. ACTUAL LOCATIONS OF UNDERGROUND UTILITIES MAY VARY AND UTILITIES NOT SHOWN ON THIS SURVEY MAY EXIST ON THIS SITE.
5. ALL MONUMENTS WERE LOCATED DURING THIS SURVEY UNLESS OTHERWISE NOTED.

VERTICAL DATUM & CONTOUR INTERVAL

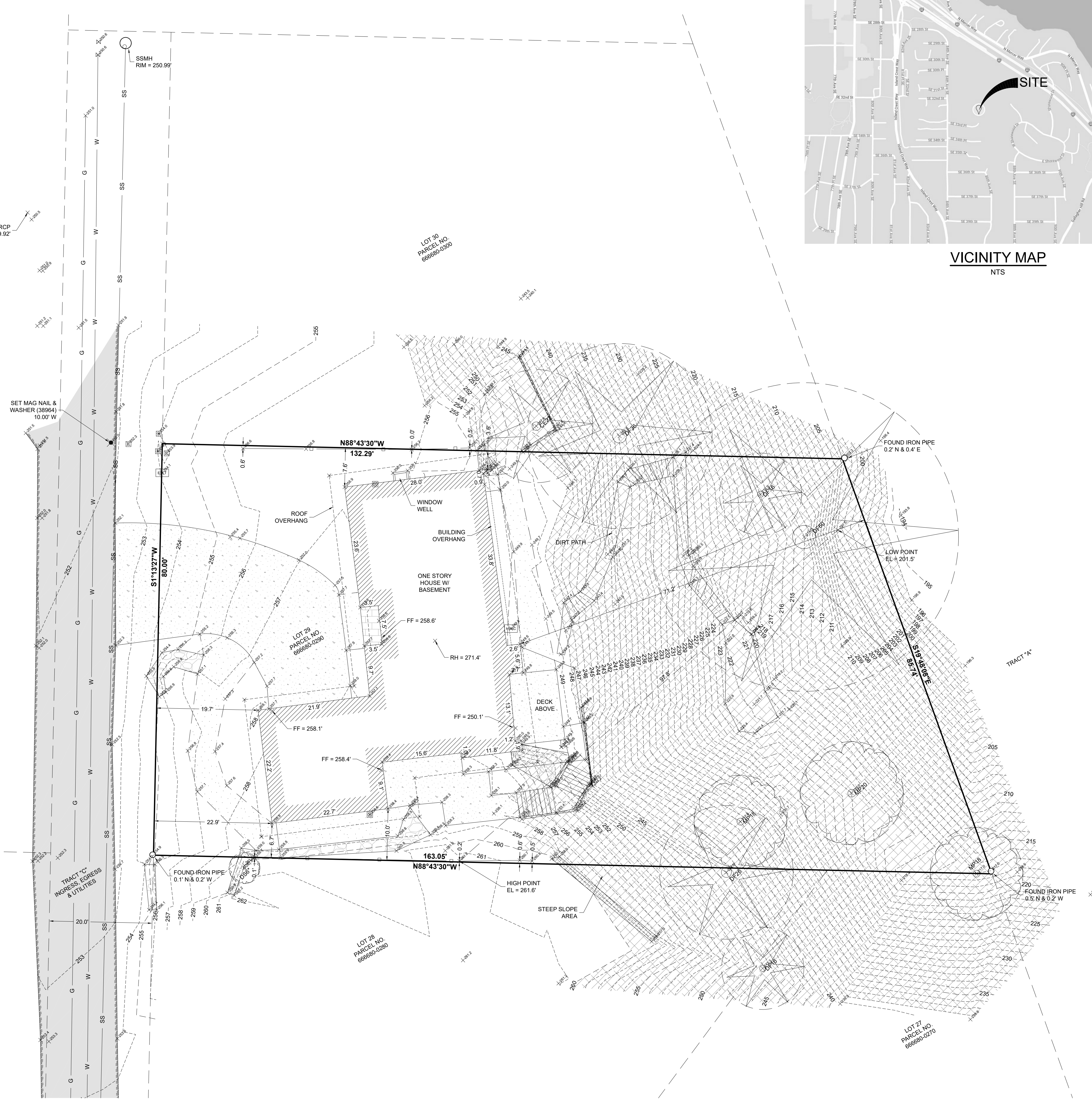
ELEVATIONS SHOWN ON THIS DRAWING WERE DERIVED FROM GPS OBSERVATION USING THE WSRN.

DATUM - NAVD 88

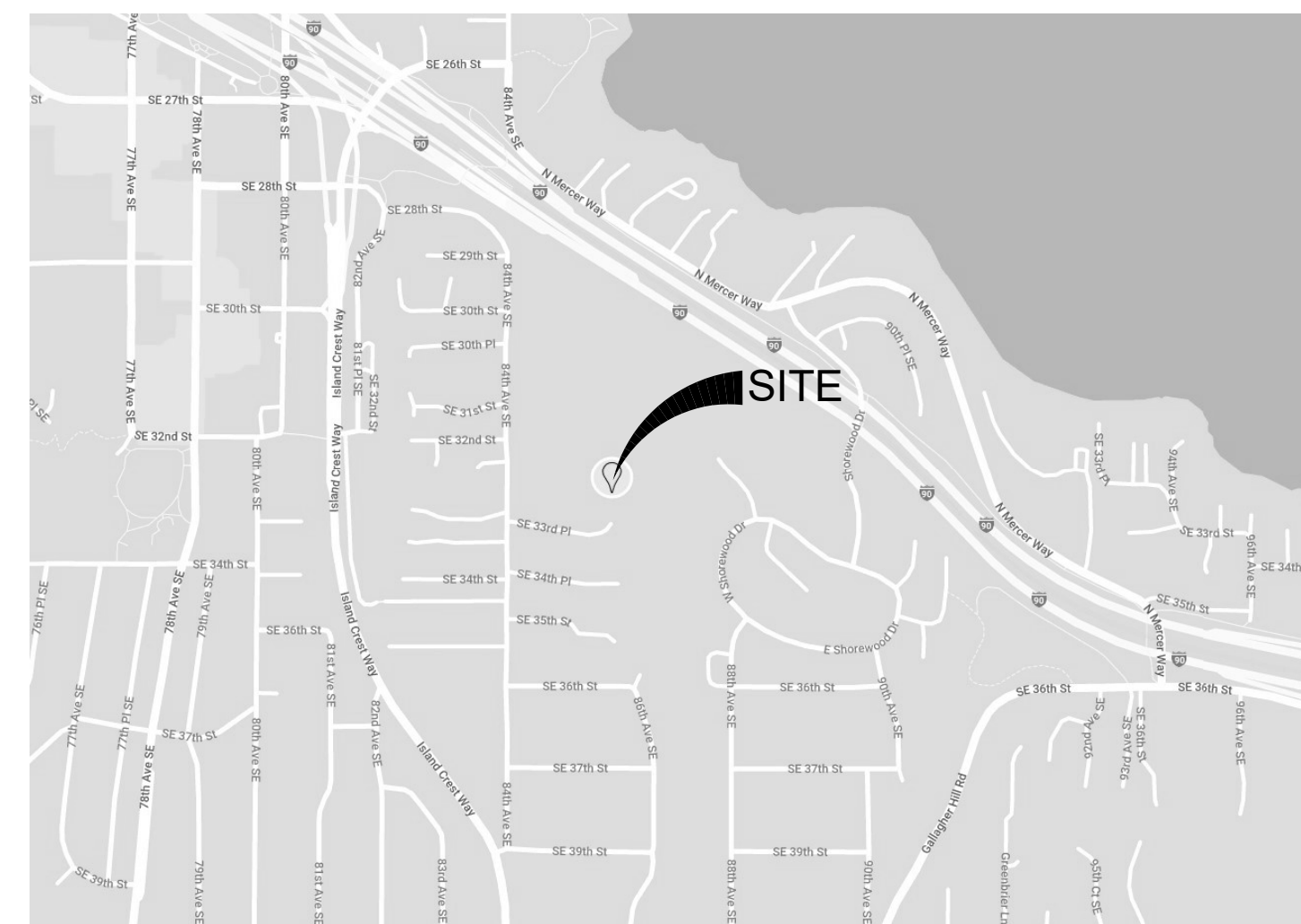
1.0' CONTOUR INTERVAL - THE EXPECTED VERTICAL ACCURACY IS EQUAL TO 1/2 THE CONTOUR INTERVAL OR PLUS / MINUS 0.5' FOR THIS PROJECT.



10" RCP
IE = 249.92'



SHEET 2



VICINITY MAP
NTS

NW 1/4, SW 1/4, SEC 7, TWP 24N, RNG 5E, W.M.



DATE	REVISION	DRN

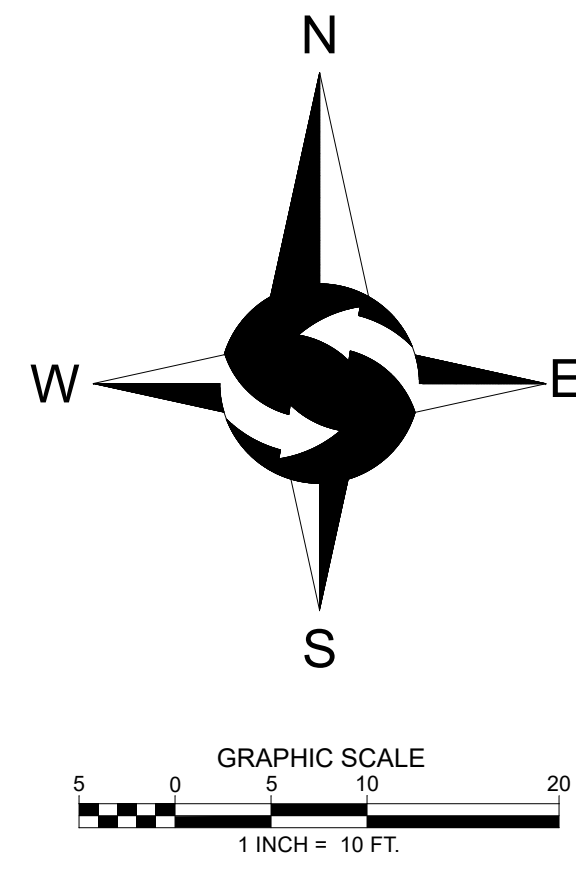
TOPOGRAPHIC SURVEY

NATHAN KORPELA
8441 SE 33RD PLACE
MERCER ISLAND, WA 98040

PROJECT NO. 22-401

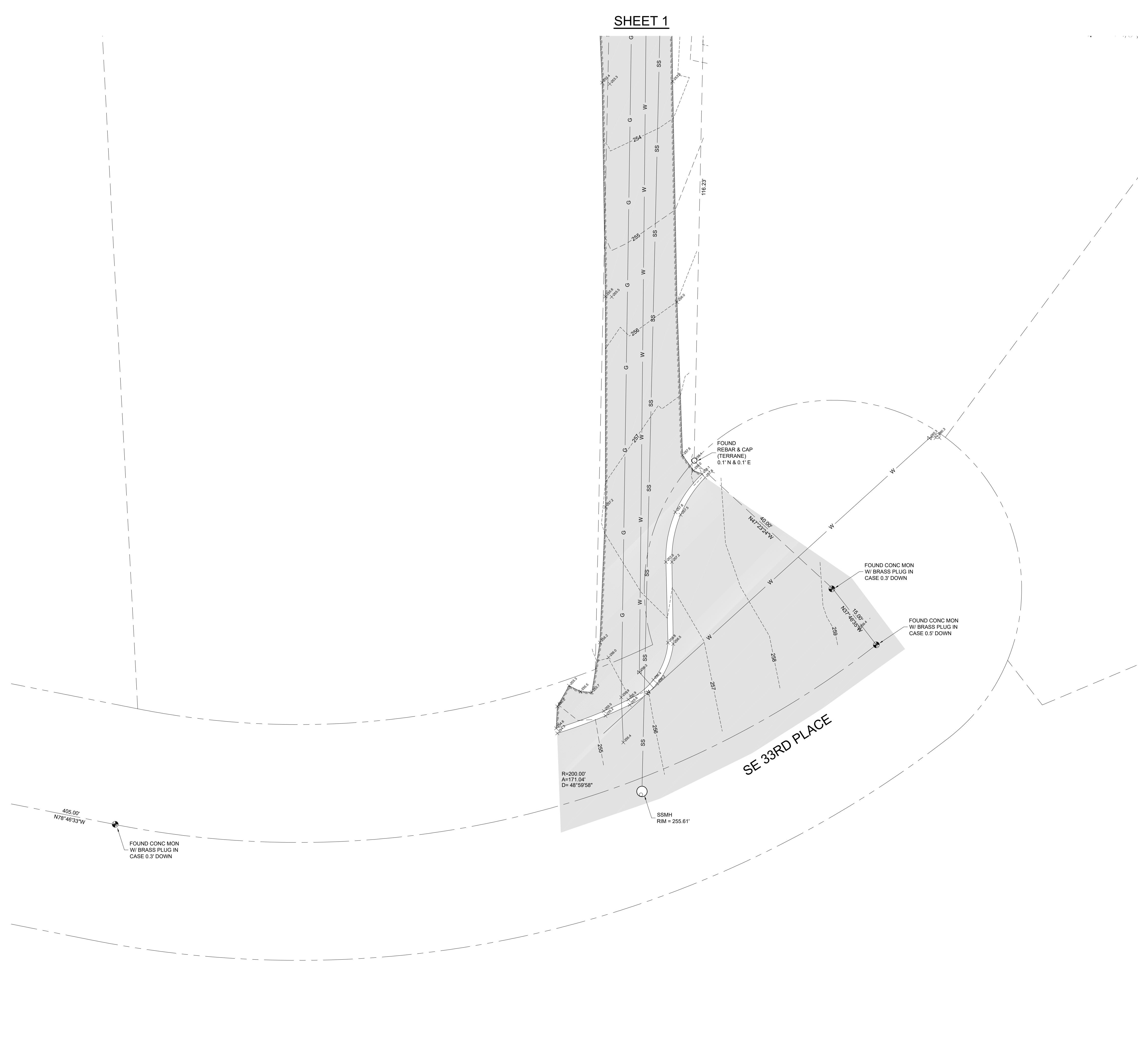
DRAWN BY: MTS
CHECKED BY: TNW
DATE: 8/8/2022

SHEET 1 OF 2



LEGEND

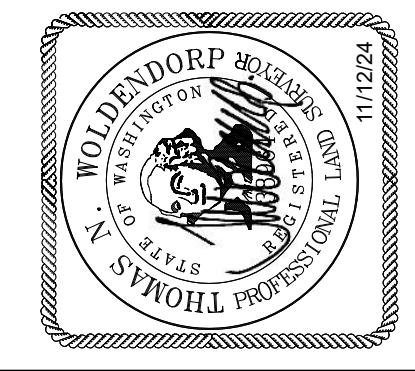
- | | |
|---|--|
| <ul style="list-style-type: none"> ○ FOUND MONUMENT IN CASE ○ FOUND REBAR AS DESCRIBED ✕ SET MAG NAILS AS DESCRIBED ⊠ POWER METER ⊠ GAS METER ⊠ EXT ELECTRICAL VAULT ⊠ CABLE PEDESTAL ○ SANITARY SEWER MANHOLE ⊠ WATER VALVE ⊠ FIRE HYDRANT ⊠ WATER METER —SS— APPROXIMATE LOCATION SANITARY SEWER LINE —G— APPROXIMATE LOCATION UNDERGROUND GAS LINE —W— APPROXIMATE LOCATION UNDERGROUND WATER LINE | <ul style="list-style-type: none"> —□— WOOD FENCE ▨ CONCRETE WALL ▨ TIMBER WALL ▨ ROCKERY ▨ ASPHALT SURFACE ▨ CONCRETE SURFACE ▨ GRAVEL SURFACE ▨ BRICK SURFACE CE CEDAR DF DOUGLAS FIR DS DECIDUOUS MP MAPLE * INDICATES MULTI-TRUNK |
|---|--|



SHEET 1

SE 33RD PLACE

NW 1/4, SW 1/4, SEC 7, TWP 24N, RNG 5E, W.M.



TOPOGRAPHIC SURVEY

NATHAN KORPELA
8441 SE 33RD PLACE
MERCER ISLAND, WA 98040

DATE	REVISION	DRN

PROJECT NO. 22-401
DRAWN BY: MTS
CHECKED BY: TNW
DATE: 8/8/2022
SHEET 2 OF 2