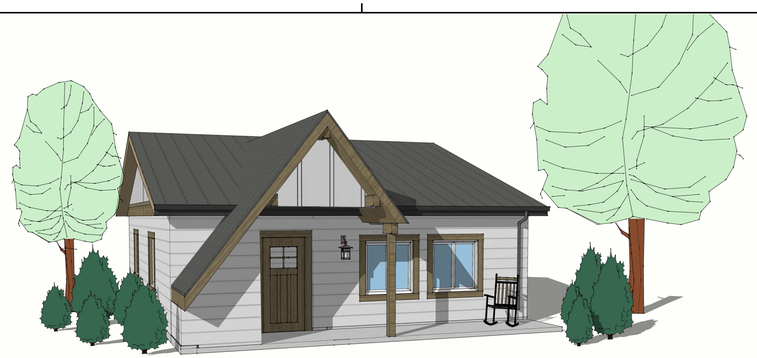
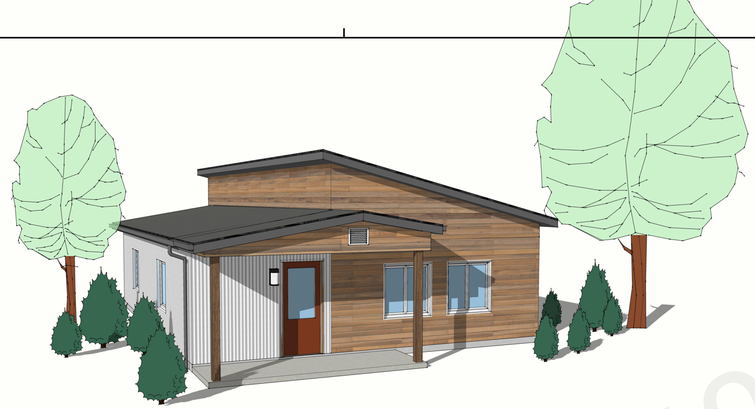


RURAL MOUNTAIN



HIGH DESERT

MONO COUNTY PROTOTYPE ACCESSORY DWELLING UNIT - PLAN 5

MONO COUNTY, CA

SHEET INDEX

SUPPORTING DOCUMENTS

ENERGY COMPLIANCE

PREPARED BY:	CARSTAIRS ENERGY INC.
DATE PREPARED:	08/04/2022
JOB NUMBER:	22-051011

DEFERRED SUBMITTALS

1. TRUSS DESIGN AND CALCULATIONS.
2. PV SYSTEM DESIGN.
   - A. SLAB ON GRADE PROJECT REQUIRES A ___2.01___ kWdc PV SYSTEM.
   - B. RAISED FOUNDATION PROJECT REQUIRES A ___2.11___ kWdc PV SYSTEM.
   - C. SYSTEM SHALL BE COMPLETED PRIOR TO FINAL INSPECTION.

PROJECT DIRECTORY

APPLICANT *(TO BE PROVIDED BY OWNER)*

ADDRESS: _____
_____
CONTACT: _____
EMAIL: _____
PHONE: _____

ARCHITECT RRM DESIGN GROUP

ADDRESS: 3765 S HIGUERA ST, SUITE 102
SAN LUIS OBISPO, CA 93401
CONTACT: _____
EMAIL: _____
PHONE: P:(805) 543-1794

PROJECT INFORMATION

PROJECT SCOPE:

1. CONSTRUCTION OF A NEW DETACHED 1 STORY 1033 SF ACCESSORY OR PRIMARY DWELLING UNIT WITH 2 BEDROOMS AND 1 BATH(S).
2. ALL SITE WORK WITHIN THE PROPERTY LINE.
3. ALL THE WORK SHOWN IN THE DRAWINGS AND SPECIFICATIONS.

SITE INFORMATION:
(TO BE PROVIDED BY COUNTY OF MONO OR TOWN OF MAMMOTH LAKES)

STREET ADDRESS: _____
_____
APN: _____
ZONING: _____
LOT SIZE: _____
LAND USE: _____
EXISTING USE: _____
PROPOSED USE: _____

FLOOR AREA RATIO
(TO BE PROVIDED BY COUNTY OF MONO OR TOWN OF MAMMOTH LAKES)

MAXIMUM FAR: _____
PROPOSED FAR: _____

LOT COVERAGE
(TO BE PROVIDED BY OWNER)

BUILDING: _____
HARDSACPE/PAVING: _____
LANDSCAPE: _____

SETBACKS
(TO BE PROVIDED BY COUNTY OF MONO OR TOWN OF MAMMOTH LAKES)

	REQUIRED	*PROPOSED*
FRONT:		
REAR:	4' - 0" (A.B. NO. 68)	
SIDES:	4' - 0" (A.B. NO. 68)	

BUILDING INFORMATION:
(TO BE PROVIDED BY COUNTY OF MONO OR TOWN OF MAMMOTH LAKES)

NUMBER OF STORIES:	1
OCCUPANCY GROUP:	R-3
CONSTRUCTION TYPE:	V-B
SPRINKLERED:	
MAX. HEIGHT ALLOWED: (PER 2022 CBC TABLE 504.3) / (ASSEMBLY BILL 68)	40' / 16'
MAX. HEIGHT ALLOWED: (PER COUNTY OF MONO)	
MAX. HEIGHT PROPOSED:	REFER TO ELEVATIONS. VARIES BY STYLE.
ROOF RATING:	CLASS A
HIGH FIRE ZONE:	REFER TO 'WILDLAND-URBAN INTERFACE FIRE AREA' AND 'VERY-HIGH FIRE SEVERITY ZONE' SECTIONS ON SHEET

BUILDING AREAS

AREAS - PLAN 5

CONDITIONED

PLAN 5 FLOOR	1033 SF

UNCONDITIONED

PLAN 5 FRONT PORCH - RM	186 SF
PLAN 5 FRONT PORCH - HD	79 SF

FIRE-RESISTANCE REQ.

SELECT THE APPROPRIATE BOX BELOW (ONLY 1):
NOTE: EXTERIOR WALLS SHALL HAVE A MINIMUM FIRE SEPARATION DISTANCE OF 4'-0" FROM PROPERTY LINE. ALL ROOF EAVES ARE 10" DEEP.

NON-SPRINKLERED

☐ **FIRE SEPARATION DISTANCE: ≥5'-0"** (EXTERIOR WALLS, PROJECTIONS, OPENINGS, AND PENETRATIONS)	**NO FIRE-RESISTANCE RATING REQUIRED**

☐ **FIRE SEPARATION DISTANCE: 4'-0" - 5'-0"** (EXTERIOR WALLS, OPENINGS, AND PENETRATIONS) **PROJECTION SEPARATION DIST.: ≥3'-0"**	
OPENINGS, AND PENETRATIONS	**NO FIRE-RESISTANCE RATING REQUIRED**
EXTERIOR WALLS AND PROJECTIONS	**1-HR FIRE-RESISTANCE** *REFER TO EAVE AND RAKE DETAILS FOR MORE INFO*

SPRINKLERED

☐ **FIRE SEPARATION DISTANCE: ≥4'-0"** (EXTERIOR WALLS, OPENINGS, AND PENETRATIONS)	**NO FIRE-RESISTANCE RATING REQUIRED**

VICINITY MAP

(TO BE PROVIDED BY OWNER)

PROJECT CHECKLIST

FOUNDATION

NOTE: THIS PROJECT ASSUMES A SITE WITH STANDARD SOIL CONDITIONS. IF THE ADU IS TO BE LOCATED ON A SITE WITH EXPANSIVE OR OTHERWISE UNUSUAL SOIL, THE APPLICANT MUST PROCURE A GEOTECHNICAL REPORT AND MAY REQUIRE A NEW FOUNDATION DESIGN.

- ☐ SLAB ON GRADE
  * STRIKE THROUGH T24-B501/502/503
- ☐ RAISED FOUNDATION
  * STRIKE THROUGH T24-A501/502/203

WASTE WATER

- ☐ SEWER
- ☐ SEPTIC (REQUIRES APPROVAL)

FIRE SPRINKLERS

DOES THE PRIMARY RESIDENCE HAVE NFPA 13D SPRINKLERS?

- ☐ **NO**
- ☐ **YES**

REQUIRED AT PROPOSED ADU:

- ☐ **NO** (NOT REQUIRED IF THE PRIMARY RESIDENCE IS UNSPRINKLERED
- ☐ **YES** (REQUIRED IF THE PRIMARY RESIDENCE IS SPRINKLERED

FIRE SPRINKLERS NOTES

IF FIRE SPRINKLERS ARE REQUIRED AT PROPOSED ADU THEN THE FOLLOWING NOTES APPLY.

1. DETAILED SPRINKLER PLANS SHALL BE SUBMITTED TO THE FIRE PREVENTION BUREAU AND APPROVED PRIOT TO INSTALLATION. PLANS AND INSTALLATION MUCH BE BY A C16 LICENSED SPRINKLER CONTRACTOR.
2. SECTION 903.3.1.3 NFPA 13D SPRINKLER SYSTEMS AUTOMATIC FIRE SPRINKLER SYSTEMS INSTALLED IN ONE- AND TWO-FAMILY DWELLINGS, GROUP R-3.
3. SECTION 903.2.8 GROUP R AN AUTOMATIC SPRINKLER SYSTEM INSTALLED IN ACCORDANCE WITH SECTION 903.3 SHALL BE PROVIDED THROUGHOUT ALL BUILDINGS WITH A GROUP R FIRE AREA.
4. SECTION 903.2.8.1 GROUP R-3 AN AUTOMATIC SPRINKLER SYSTEM INSTALLED IN ACCORDANCE WITH SECTION 903.3.1.3 SHALL BE PERMITTED IN GROUP R-3 OCCUPANCIES.
5. LOCATION AND SIZE OF WATER SERVICE UNDERGROUND SHALL BE INSTALLED AS SHOWN ON APPROVED FIRE SPRINKLER PLANS. A MINIMUM 1 INCH WATER SHALL BE INSTALLED.
6. A FIRE UNDERGROUND FLUSH CERTIFICATION SHALL BE REQUIRED AT FINAL INSPECTION.
7. A HYDRO INSPECTION OF THE FIRE SPRINKLER SYSTEM IS REQUIRED PRIOR TO FRAME INSPECTION. ONLY THE NEW PIPING SHALL BE TESTED.

ONSITE PARKING REQUIRED

- ☐ NONE, EXCEPTION USED:
  - ☐ THE ADU IS LOCATED WITHIN 1/2 MILE OF PUBLIC TRANSIT.
  - ☐ OFF STREET PARKING PERMITS ARE REQUIRED BUT NOT OFFERED TO THE OCCUPANT OF THE ADU.
  - ☐ WHEN THERE IS A CAR SHARE VEHICLE LOCATED WITHIN ONE BLOCK OF THE ADU.
- ☐ ONE PARKING SPACE (STUDIO OR 1-BEDROOM ADU)
- ☐ TWO PARKING SPACES (2-BEDROOM ADU)

WILDLAND-URBAN INTERFACE FIRE AREA

1. PORTIONS OF THE COUNTY OF MONO ARE LOCATED IN WITHIN THE WILDLAND-URBAN INTERFACE FIRE AREA (AS DEFINED BY **2022 CRC R337.2**).
   a. *AREA DEFINED BY STATE AS A "FIRE HAZARD SEVERITY ZONE"*
   b. *AREA DESIGNATED BY ENFORCING AGENCY TO BE AT A SIGNIFICANT RISK FROM WILDFIRES.*
2. AN ADU WITHIN THE WILDLAND-URBAN INTERFACE FIRE AREA SHALL COMPLY WITH THE **2022 CRC SECTION R337**.
3. THIS PROTOTYPE PLAN IS DESIGNED TO COMPLY WITH THE PROVISIONS REQUIRED BY THE **2022 CRC SECTION R337**, REGARDLESS IF LOCATED IN A WILDLAND-URBAN INTERFACE FIRE AREA.

REQUIRED W.U.I. DETAILS

1. REFER TO "W.U.I. REQUIREMENT NOTES" ON SHEET G-101.

- ☐ ROOF DETAILS: **SHEETS AD-902, AD-903, AD-904, AD-905, AND AD-906**
- ☐ VENTS: **W.U.I. COMPLIANT ATTIC VENT, SEE LEGEND ON ROOF PLANS SHEET**
- ☐ EXTERIOR WALL COVERING DETAIL: **SEE EXTERIOR ELEVATIONS LEGEND**
- ☐ EXTERIOR WINDOWS: **"WINDOW GENERAL NOTE" #6 ON FLOOR PLANS SHEET**
- ☐ EXTERIOR DOORS: **"DOOR GENERAL NOTE" #6 ON FLOOR PLANS SHEET**

VERY-HIGH FIRE SEVERITY ZONE

☐ **NO** ☐ **YES**

1. IN ACCORDANCE WITH THE **2022 CFC SECTION 4904**, STRUCTURES LOCATED IN THE VERY HIGH FIRE HAZARD SEVERITY ZONE SHALL PROVIDE & MAINTAIN A FUEL MODIFICATION ZONE. FUEL MODIFICATION ZONES: THE APPLICANT SHALL PROVIDE & MAINTAIN FIRE/FUEL BREAKS TO THE SATISFACTION OF THE LOCAL FIRE DEPARTMENT. FIRE/FUEL BREAKS SHALL BE SHOWN ON THE GRADING, MAP, AND BUILDING PLANS.
2. HOMEOWNER TO PROVIDE COMPLIANT VENTS/ICC REPORT IF IN A HIGH FIRE ZONE

EXTERIOR WALL MATERIAL

- ☐ CEMENT PLASTER STUCCO
- ☐ FIBER CEMENT - BOARD AND BATTEN SIDING
- ☐ FIBER CEMENT - LAP SIDING
- ☐ FIBER CEMENT - SHINGLE SIDING

WINDOW MATERIAL

- ☐ VINYL
- ☐ FIBERGLASS
- ☐ WOOD
- ☐ ALUMINUM CLAD WOOD

ROOF MATERIAL

- ☐ COMPOSITION SHINGLES
- ☐ STANDING SEAM METAL ROOF
- ☐ CLAY ROOF TILES

SNOW LOADING CATEGORIES

- ☐ < 65 PSF
- ☐ 66 PSF - 80 PSF
- ☐ 81 PSF - 120 PSF
- ☐ 220 PSF - 235 PSF

STYLE SELECTION

NOTE: WHEN SELECTING ONE OF THE TWO ARCHITECURAL STYLES, PLEASE SELECT THE OPTION THAT IS THE SAME OR A SIMILAR DESIGN TO THE PRINCIPAL RESIDENCE. THE ADU BUILDING COLORS AND MATERIALS SHALL BE THE SAME OR SIMILAR TO THE PRINCIPAL RESIDENCE.

☐ RURAL MOUNTAIN
*STRIKE THROUGH HIGH DESERT SHEETS: A5-122/202/302 AND AD-904

☐ HIGH DESERT
*STRIKE THROUGH RURAL MOUNTAIN SHEETS: A5-121/201/301 AND AD-903

USER LICENSE AGREEMENT

BY USING THESE PERMIT READY ACCESSORY DWELLING UNIT CONSTRUCTION DOCUMENTS, THE USER AGREES TO RELEASE, HOLD HARMLESS, AND INDEMNIFY THE COUNTY OF MONO, ITS ELECTED OFFICIALS AND EMPLOYEES, RRM DESIGN GROUP, AND THE ARCHITECT OR ENGINEER WHO PREPARED THESE CONSTRUCTION DOCUMENTS FROM ANY AND ALL CLAIMS, LIABILITIES, SUITS AND DEMANDS ON ACCOUNT OF ANY INJURY, DAMAGE OR LOSS TO PERSONS OR PROPERTY, INCLUDING INJURY OR DEATH, OR ECONOMIC LOSSES, ARISING OUT OF THE USE OF THESE CONSTRUCTION DOCUMENTS.

THE PLANS ATTACHED HERE ARE APPROVED FOR ONLY USE IN MONO COUNTY. NO DEVIATIONS, ALTERATIONS, OR OPTIONS BEYOND THOSE SPECIFICALLY INDICATED IN THE PLANS ARE ALLOWED WITHOUT PRIOR APPROVAL BY THE ISSUING JURISDICTION AND CHIEF BUILDING OFFICIAL. ANY UNAPPROVED PLAN MODIFICATIONS MAY BE DEVELOPED THROUGH RRM DESIGN GROUP AND THE APPROVING JURISDICTION IF REQUIRED.

SIGNATURE: _____ DATE: _____

MONO COUNTY

THESE PLANS ARE PROVIDED BY MONO COUNTY AS PART OF THE PRE-APPROVED ADU PROGRAM AND ARE PUBLIC DOMAIN. THERE CANNOT BE A CHARGE TO PROVIDE THESE PLANS. NO ALTERATIONS TO THESE PLANS ARE ALLOWED. ALL ALTERATIONS MUST BE DONE UNDER A SEPARATE PERMIT ONCE THE BUILDING PERMIT FOR THE ADU HAS BEEN ISSUED AND FINAL INSPECTION COMPLETED. IF YOU DO NOT HAVE THE CONSTRUCTION KNOWLEDGE AND EXPERIENCE TO CONTRUCT THESE PLANS WITHOUT FURTHER DETAILS, IT IS RECOMMENDED YOU HIRE A CONTRACTOR TO DO THE CONSTRUCTION. THE CITY WILL NOT PROVIDE FURTHER INFORMATION OR DETAILS AND BUILDING INSPECTORS WILL NOT PROVIDE STEP BY STEP INSTRUCTIONS IN THE FIELD.

MONO COUNTY ADU PROTOTYPES
MONO COUNTY

TITLE SHEET - PLAN 5

PUBLIC SET

DATE
01/10/2024

SHEET
G-005

FLOOR PLAN NOTES

1. **WEATHER BARRIERS.**
    a. NOT FEWER THAN ONE-LAYER WATER-RESISTIVE BARRIER SHALL BE APPLIED OVER STUDS OR SHEATHING OF ALL EXTERIOR WALLS CONTINUOUS FROM TOP OF WALS AND TERMINATED AT PENETRATIONS AND BUILDING APPENDAGES WITH FLASHING. MINIMUM NO. 15 FELT COMPLYING WITH ASTM D226, TYPE 1.
    b. PROVIDE (2) LAYERS OF GRADE D PAPER OR EQUAL WHEN PLASTER IS INSTALLED OVER WOOD BASED SHEATHING. *(2022 CRC R703.7.3)*
2. **DOMESTIC RANGE** VENTILATION DUCTS SHALL HAVE SMOOTH INTERIOR SURFACES. (2022 CMC 504.3)
3. **CLOTHES DRYER** MOISTURE EXHAUST DUCTS SHALL TERMINATE OUTSIDE THE BUILDING AND HAVE A BACK-DRAFT DAMPER. EXHAUST DUCT IS LIMITED TO 14'-0" W/ TWO ELBOWS. THIS SHALL BE REDUCED 2'-0" FOR EVERY ELBOW IN EXCESS OF TWO. MIN. DIA. 4", SMOOTH, METAL DUCT.*(2022 CMC 504.4)*
4. **ALL MANUFACTURED EQUIPMENT** SHALL BE INSTALLED AS PER MANUFACTURER'S SPECIFICATION AND DIMENSIONS VERIFIED WITH INSTALLATION REQUIREMENTS. ALL MANUFACTURER'S INSTALLATION INSTRUCTIONS SHOULD BE ON SITE FOR INSPECTIONS.
5. **SHOWERS AND TUB-SHOWER COMBINATIONS:** CONTROL VALVES MUST BE PRESSURE BALANCED OR THERMOSTATIC MIXING VALVES. *(2022 CPC 417.0.)*
6. **WET-ROOM GLAZING.** PROVIDE TEMPERED GLAZING IN DOORS AND ENCLOSURES FOR SHOWERS, BATHTUBS, SAUNAS, STEAM ROOMS, HOT TUBS & SIMILAR USES WHERE THE BOTTOM EXPOSED EDGE IS LESS THAN 60-INCHES ABOVE A STANDING SURFACE. *(2022 CRC R308.4.5)*
7. **HEATING AND AIR-CONDITIONING SYSTEM DESIGN** SHALL CONFORM TO CALGREEN SEC. 4.507, ENVIRONMENTAL COMFORT.
8. **WATER CLOSETS.**
    a. CLEARANCES: 24" MIN. FRONT, 30" MIN COMPARTMENT WIDTH.
    b. PROVIDE A MIN 3 SF WINDOW, 1/2 OF WHICH SHALL BE OPENABLE OR AN EXHAUST FAN 50 CFM FOR INTERMITTENT OR 20 CFM FOR CONTINUOUS. DIRECT VENT TO OUTSIDE WITH BACKDRAFT DAMPER. *(2022 CRC R303.3)*
    c. NEW WATER CLOSETS AND ASSOCIATED FLUSHOMETER VALVES, IF ANY SHALL USE NO MORE THAN 1.28 GALLONS PER FLUSH AND SHALL MEET PERFORMANCE STANDARDS ESTABLISHED BY THE AMERICAN SOCIETY OF MECHANICAL ENGINEERS STANDARD A112.19.2. H & S CODE, SECTION 17921.3(B).
9. **BATH ACCESSORIES:** PROVIDE MINIMUM 1 TOILET PAPER HOLDER AND 1 TOWEL BAR PER BATHROOM. PROVIDE NECESSARY BLOCKNG FOR TOILET PAPER HOLDER AND TOWEL BARS.
10. **WHOLE-BUILDING MECHANICAL VENTILATION SYSTE**M PER ASHRAE STANDARD 62.2. AT TIME OF BUILDING PERMIT APPLICATION, APPLICANT TO PROVIDE THE FOLLOWING INFORMATION:
    a. CALCULATIONS FOR REQUIRED VENTING RATES.
    b. CALCULATION ADJUSTMENTS FOR INTERMITTENT SYSTEMS IF APPLICABLE.
    c. DUCT DIAMETER AND MAXIMUM DUCT LENGTH PER ASHRAE 62.2 TABLE 7.1.
    d. TYPE OF SYSTEM USED AND PROVIDE COMPLETED CF-6R-MECH-05 FORM.
    e. FANS SHALL BE A MAXIMUM OF 1 SONE.
    f. FANS SHALL BE PROVIDED A COVER OF R-4.2 WHEN OFF.
11. **ATTIC ACCESS:**
    a. WHERE REQUIRED, PROVIDE 30" MIN. HEADROOM IN THE ATTIC SPACE (2022 CRC R807.1)
    b. BUILDINGS WITH COMBUSTIBLE CEILING OR ROOF CONSTRUCTION SHALL HAVE AN ATTIC ACCESS OPENING TO ATTIC AREAS THAT EXCEED 30 SQUARE FEET AND HAVE A VERTICAL HEIGHT OF 30-INCHES OR GREATER. THE VERTICAL HEIGHT SHALL BE MEASURED FROM TOP OF THE CEILING FRAMING MEMBERS TO THE UNDERSIDE OF THE ROOF FRAMING MEMBERS.
    c. THE ROUGH-FRAMED OPENING SHALL NOT BE LESS THAN 22" X 30" AND SHALL BE LOCATED NOT OVER 20 FEET FROM THE EQUIPMENT. (2022 CRC R807.1)
    d. IN ATTIC, PROVIDE LIGHT AND SWITCH, AND ALL NECESSARY ELECTRICAL. PROVIDE UNOBSTRUCTED PASSAGEWAY 24" WIDE OF SOLID CONTINUOUS FLOORING FROM ACCESS TO EQUIPMENT AND IT'S CONTROLS. ALSO PROVIDE UNOBSTRUCTED WORK SPACE IN FRONT OF EQUIPMENT 30" DEPTH MINIMUM. PROVIDE COMBUSTION AIR AND CONDENSATE LINE TO OUTSIDE OR AN APPROVED DRAIN FOR OPTIONAL AIR CONDITIONING.
    e. PROVIDE A 120V RECEPTACLE AND A LIGHT NEAR THE EQUIPMENT WITH LIGHT SWITCH LOCATED AT THE ATTIC ACCESS.
12. BATHTUB AND SHOWER FLOORS AND WALLS ABOVE BATHTUBS WITH INSTALLED SHOWER HEADS AND IN SHOWER COMPARTMENTS SHALL BE FINISHED WITH A NONABSORBENT SURFACE. SUCH WALL SURFACES SHALL EXTEND TO A HEIGHT OF NOT LESS THAN 6 FEET ABOVE THE FLOOR PER 2022 CRC, SECTION R307.2.

SITE NOTES

1. **CALL BEFORE YOU DIG!** CONTACT UNDERGROUND SERVICE ALERT (USA) AT 1-800-227-2600 AT LEAST 2 WORKING DAYS BEFORE EXCAVATING.
2. UNLESS OTHERWISE NOTED ON THE PLANS, FINISHED GROUND SURFACES SHALL BE GRADED TO DRAIN THE FINISHED SITE PROPERLY WITHIN 10-FEET OF ANY BUILDING FOUNDATION WITH A SLOPE OF 5% AWAY FROM ANY BUILDING OR STRUCTURE. ALL EXTERIOR HARDSCAPE WITHIN 10-FEET OF A BUILDING FOUNDATION SHALL BE INSTALLED WITH A 2% MINIMUM SLOPE AWAY FROM ANY BUILDING OR STRUCTURE. DRAINAGE SWALES SHALL BE A 1.5% MINIMUM SLOPE. ALL GRADED SLOPES SHALL HAVE A MAXIMUM SLOPE OF 3H TO 1V (33%), UNLESS SHOWN OTHERWISE ON THE PLANS.
3. LOT GRADING SHALL CONFORM AT THE PROPERTY LINES AND SHALL NOT SLOPE TOWARD PROPERTY LINES IN A MANNER WHICH WOULD CAUSE STORM WATER TO FLOW ONTO NEIGHBORING PROPERTY. HISTORIC DRAINAGE PATTERNS SHALL NOT BE ALTERED IN A MANNER TO CAUSE DRAINAGE PROBLEMS TO NEIGHBORING PROPERTY.
4. NEW RAINWATER DOWNSPOUTS SHALL BE DISCONNECTED AND DIRECT RUNOFF TO A LANDSCAPED AREA. DOWNSPOUTS MAY BE CONNECTED TO A POP-UP DRAINAGE EMITTER IN THE LANDSCAPED AREA OR MAY DRAIN TO SPLASH BLOCKS OR COBBLESTONES THAT DIRECT WATER AWAY FROM THE BUILDING.
5. CONTRACTOR TO FIELD VERIFY EXISTING DRAINAGE. IF THE EXISTING DRAINAGE SYSTEM IS DAMAGED DURING EXCAVATION, CONTRACTOR SHALL REPAIR AND/OR REROUTE DRAINAGE SYSTEM AND CONNECT TO EXISTING DRAINAGE FACILITY AS NECESSARY.
6. EXISTING PUBLIC IMPROVEMENTS THAT ARE DAMAGED BY THE PROJECT CONSTRUCTION SHALL BE REPAIRED OR REPLACED. EXISTING DAMAGED PUBLIC IMPROVEMENTS WITHIN THE PROJECT LIMITS SHALL BE REPAIRED OR REPLACED EVEN IF THE DAMAGE OCCURRED PRIOR TO THE START OF CONSTRUCTION.
7. EROSION AND SEDIMENT CONTROL FACILITIES SHALL BE INSTALLED PRIOR TO OCTOBER 1 AND SHALL BE MAINTAINED DAILY UNTIL APRIL 30. THESE FACILITIES SHALL CONTROL AND CONTAIN EROSION-CAUSED SILT DEPOSITS AND PROVIDE FOR THE SAFE DISCHARGE OF SILT-FREE STORM WATERS INTO EXISTING STORM DRAIN FACILITIES. EROSION AND SEDIMENT CONTROL SUPPLIES MUST BE KEPT ON-SITE DURING THE DRY SEASON AND EMPLOYED, AS NECESSARY PRIOR TO AND DURING RAIN EVENTS.
8. SEASONALLY APPROPRIATE BEST MANAGEMENT PRACTICES FOR THE FOLLOWING SITE MANAGEMENT CATEGORIES MUST BE IMPLEMENTED YEAR-ROUND: 1) EROSION CONTROL; 2) RUN-ON AND RUN-OFF CONTROL; 3) SEDIMENT CONTROL; 4) GOOD SITE MANAGEMENT; AND 5) NON-STORMWATER MANAGEMENT.
9. AN ENCROACHMENT PERMIT WILL BE REQUIRED FOR ANY CONSTRUCTION ACTIVITY WITHIN A PUBLIC STREET RIGHT OF WAY THAT HAS BEEN ACCEPTED BY THE CITY.

ELECTRICAL NOTES

1. CONFORM WITH CURRENT CEC, NFPA, MFR'S, AND LOCAL REQUIREMENTS.
2. ELECTRICAL SYSTEM GROUND TO BE PROVIDED PER NEC ARTICLE 250-81.
3. ALL MATERIALS TO BE U.L. LABELED.
4. METER IS NOT REQUIRED. IF IT IS PROVIDED FOR ADU, MAIN PANEL IS REQUIRED FOR ADU WITH MINIMUM OF 225 AMP BUS-BAR. IF MAIN PANEL IS NOT PROVIDED FOR ADU, ELECTRICAL PERMIT SHALL BE PULLED FOR THE PRIMARY RESIDENCE WITH ELECTRICAL LOAD CALCULATIONS.
5. IF PROVIDED, ELECTRICAL SUB PANEL: FLUSH MOUNT, 30" CLEARANCE. 100 AMP.
6. CONDUCTORS: TW, THW, COPPER, MINIMUM 14 AT LIGHTING, 12 AT OTHER CIRCUITS.
7. ALL LUMINARIES SHALL COMPLY WITH 2022 CENC SECTION 150.0 (K) AND TABLE 150.0-A AS REFERENCED IN ENERGY NOTES, LUMINAIRE REQUIREMENTS SHEET G-101.
8. ALL ELECTRICAL OUTLETS INSTALLED IN BATHROOMS, GARAGES, LAUNDRY AREAS, BASEMENTS, CRAWL SPACES, OUTDOORS, KITCHEN COUNTERS, AND AT WET BAR SINKS SHALL HAVE GROUND-FAULT CIRCUIT-INTERRUPTER PROTECTION IN COMPLIANCE WITH NEC Art. 210-8, CONSISTING OF 125 VOLT,
SINGLE-PHASE, 15- AND 20- AMPERE RECEPTACLES.
9. ALL BATHROOM RECEPTACLE OUTLETS SHALL BE SUPPLIED BY A MINIMUM OF ONE 120-VOLT, 20-AMPERE BRANCH CIRCUIT. SUCH CIRCUITS SHALL HAVE NO OTHER OUTLETS. THIS DEDICATED CIRCUIT MAY SERVE MORE THAN ONE BATHROOM. (2022 CEC 210.11(C))
10. THERMOSTAT SHALL BE A PROGRAMMABLE TYPE, HONEYWELL TH8320 OR EQUAL.
11. CEILING-SUSPENDED (PADDLE) FANS SHALL BE SUPPORTED INDEPENDENTLY OF AN OUTLET BOX OR BY LISTED OUTLET BOX OR OUTLET BOX SYSTEMS IDENTIFIED FOR THE USE AND INSTALLED IN ACCORDANCE WITH 2022 CEC 314.27(C) (2022 CEC 422.18).
12. ALL LUMINARIES, LAMPHOLDERS, AND RETROFIT KITS SHALL BE LISTED (2022 CEC 410.6).
13. ALL 120-VOLT, SINGLE PHASE 15- AND 20- AMPERE BRANCH CIRCUITS SUPPLYING OUTLETS INSTALLED IN DWELLING UNIT KITCHENS, FAMILY ROOMS, LIVING ROOMS, DINING ROOMS, PARLORS, LIBRARIES, DENS, BEDROOMS, SUNROOMS, RECREATION ROOMS, CLOSETS, HALLWAYS OR SIMILAR ROOMS OR AREAS SHALL BE PROTECTED BY A LISTED ARC-FAULT CIRCUIT INTERRUPTER, COMBINATION-TYPE, INSTALLED TO PROVIDE PROTECTION OF THE BRANCH CIRCUIT. (2022 CEC 210-12(A)).
14. ALL NON-LOCKING TYPE 125-VOLT, 15 AND 20 AMPERE RECEPTACLES IN A DWELLING UNIT SHALL BE LISTED TAMPER-RESISTANT RECEPTACLES. EXCEPTIONS: (1) RECEPTACLES MORE THAN 5'6" ABOVE THE FLOOR, (2) RECEPTACLES PART OF A LUMINAIRE OR APPLIANCE, (3) A SINGLE RECEPTACLE OR A DUPLEX RECEPTACLE FOR TWO APPLIANCES THAT ARE NOT EASILY MOVED AND LOCATED WITHIN DEDICATED SPACE AND ARE CHORD-AND-PLUG CONNECTED AS PER CEC 400.10, AND (4) NON-GROUNDING RECEPTACLES USED FOR REPLACEMNETS AS PERMITTED IN CEC 406.4(D)(2)(A).
15. HIGH EFFICACY LUMINAIRES OTHER THAN OUTDOOR HID LIGHTING CONTAIN ONLY ONLY HIGH EFFICACY LAMPS AS OUTLINED IN TABLE 150-C OF THE RESIDENTIAL ENERGY CODE AND NOT CONTAIN A MEDIUM SCREW BASE SOCKET.
16. BALLAST FOR LAMPS 13 WATTS OR GREATER SHALL BE ELECTRONIC AND HAVE AN OUTPUT FREQUENCY NO LESS THAT 20 kHz.
17. SMOKE DETECTORS SHALL RECEIVE THEIR PRIMARY POWER FROM THE BUILDING WIRING AND PROVIDED WITH A BATTERY BACK-UP. ALL SMOKE DETECTORS SHALL BE INTERCONNECTEED. ALL SMOKE DETECTORS SHALL MAINTAIN A MINIMUM 3 FOOT CLEARANCE TO HVAC SUPPLY OR RETURN AIR REGISTERS.
18. CARBON MONOXIDE ALARMS SHALL RECEIVE THEIR PRIMARY POWER FROM THE BUILDING WIRING AND PROVIDED WITH A BATTERY BACK-UP. ALL CARBON MONOXIDE ALARAMS SHALL BE INTERCONNECTEED.
19. EXHAUST FANS WILL BE CONTROLLED BY A HUMIDISTAT PER THE GREEN BUILDING STANDARDS CODE SECTION 4.506. EXHAUST FANS MUST BE SWITCHED SEPARATELY FROM LIGHTS *(2022 CEnC 150.0(k)2G).*
20. IN ADDITION TO THE NUMBER OF BRANCH CIRCUTS REQUIRED BY OTHER PARTS OF THE CODE, TWO OR MORE 20-AMPERE SMALL-APPLIANCE BRANCH CIRCUTS SHALL BE PROVIDED FOR ALL RECEPTACLE OUTLETS IN THE KITCHEN, PANTRY, BREAKFAST ROOM, DINING ROOM, OR SIMILAR AREA PER 2022 CEC, ARTICLE 210.11 (C)(1). THE CIRCUTS SHALL HAVE NO OTHER OUTLETS PER 2022 CEC, ARTICLE 210.52(B).
21. IN ADDITION TO THE NUMBER OF BRANCH CIRCUTS REQUIRED BY OTHER PARTS OF THE CODE, AT LEAST ONE ADDITIONAL 20-AMPERE BRANCH CIRCUT SHALL BE PROVIDED TO SUPPLY THE LAUNDRY RECEPTACLE OUTLET(S) REQUIRED BY 2022 CEC, ARTICLE 210.52 (F). THIS CIRCUT SHALL HAVE NO OTHER OUTLETS PER 2022 CEC, ARTICLE 201.11(C)(2).

ENERGY NOTES

1. THE BUILDER MUST PROVIDE NEW HOMEWONERS WITH A LUMINAIRE SCHEDULE THAT INCLUDES A LIST OF INSTALLED LAMPS AND LUMINARIES.

LUMINAIRE REQUIREMENTS *(2022 CEnC 150.0(k)1).*

A. **LUMINAIRE EFFICACY.** ALL INSTALLED LUMINAIRES SHALL MEET THE REQUIREMENTS IN TABLE 150.0-A.
EXCEPT: *INTEGRATED DEVICE LIGHTING. LIGHTING INTEGRAL TO EXHAUST FANS, KITCHEN RANGE HOODS, BATH VANITY MIRRORS AND GARAGE DOOR OPENERS. NAVIGATION LIGHTING: SUCH AS NIGHT LIGHTS, STEP LIGHTS, AND PATH LIGHTS LESS THAN 5 WATTS. CABINET LIGHTING: LIGHTING INTERNAL TO DRAWERS, CABINETRY AND LINEN CLOSETS WITH AN EFFICACY OF 45 LUMENS PER WATT OR GREATER.*
THE FOLLOWING ARE HIGH-EFFICACY LIGHT SOURCES PER TABLE 150.0-A:
THE FOLLOWING LIGHT SOURCES, OTHER THAN THOSE INSTALLED IN CEILING RECESSED DOWNLIGHT LUMINAIRES, ARE NOT REQUIRED TO COMPLY WITH REFERENCE JOINT APPENDIX JA8:
    1. *LED LIGHT SOURCES INSTALLED OUTDOORS.*
    2. *INSEPARABLE SOLID STATE LIGHTING (SSL) LUMINAIRES CONTAINING COLORED LIGHT SOURCES THAT ARE INSTALLED TO PROVIDE DECORATIVE LIGHTING.*
    3. *PIN-BASED LINEAR FLUORESCENT OR COMPACT FLUORESCENT LIGHT SOURCES USING ELECTRONIC BALLASTS.*
    4. *HIGH INTENSITY DISCHARGE (HID) LIGHT SOURCES INCLUDING PULSE START METAL HALIDE AND HIGH PRESSURE SODIUM LIGHT SOURCES.*
    5. *LUMINAIRES WITH HARDWIRED HIGH FREQUENCY GENERATOR AND INDUCTION LAMP.*
    6. *CEILING FAN LIGHT KITS SUBJECT TO FEDERAL APPLIANCE REGULATIONS.*

THE FOLLOWING LIGHT SOURCES ARE ONLY CONSIDERED TO BE HIGH EFFICACY IF THEY ARE CERTIFIED TO THE COMMISSION AS HIGH EFFICACY LIGHT SOURCES IN ACCORDANCE WITH REFERENCE JOINT APPENDIX JA8 AND MARKED AS REQUIRED BY JA8:
    1. *ALL LIGHT SOURCES INSTALLED IN CEILING RECESSED DOWNLIGHT LUMINAIRES. NOTE THAT CEILING RECESSED DOWNLIGHT LUMINAIRES SHALL NOT HAVE SCREW BASES REGARDLESS OF LAMP TYPE AS DESCRIBED IN SECTION 150.0(K)1C.*
    2. *ANY LIGHT SOURCE NOT OTHERWISE LISTED.*

B. **SCREW-BASED LUMINAIRES.** SCREW-BASED LUMINAIRES SHALL CONTAIN LAMPS THAT COMPLY WITH REFERENCE JOINT APPENDIX JA8.

C. **RECESSED DOWNLIGHT LUMINAIRES IN CEILINGS.** LUMINAIRES RECESSED INTO CEILINGS SHALL MEET ALL OF THE FOLLOWING REQUIREMENTS:
    1. SHALL NOT CONTAIN SCREW BASE LAMP SOCKETS; AND
    2. HAVE A LABEL THAT CERTIFIES THE LUMINAIRE IS AIRTIGHT WITH AIR LEAKAGE LESS THAN 2.0 CFM AT 75 PASCALS WHEN TESTED IN ACCORDANCE WITH ASTM E283. AN EXHAUST FAN HOUSING WITH INTEGRAL LIGHT SHALL NOT BE REQUIRED TO BE CERTIFIED AIRTIGHT; AND
    3. BE SEALED WITH A GASKET OR CAULK BETWEEN THE LUMINAIRE HOUSING AND CEILING, AND HAVE ALL AIR LEAK PATHS BETWEEN CONDITIONED AND UNCONDITIONED SPACES SEALED WITH A GASKET OR CAULK, OR BE INSTALLED PER MANUFACTURER'S INSTRUCTIONS TO MAINTAIN AIRTIGHTNESS BETWEEN THE LUMINAIRE HOUSING AND CEILING; AND
    4. MEET THE CLEARANCE AND INSTALLATION REQUIREMENTS OF CALIFORNIA ELECTRICAL CODE SECTION 410.116 FOR RECESSED LUMINAIRES.
    EXCEPT: *RECESSED LUMINAIRES MARKED FOR USE IN FIRE-RATED INSTALLATIONS EXTRUDED INTO CEILING SPACE AND RECESSED LUMINAIRES INSTALLED IN NONINSULATED CEILINGS.*

ENERGY NOTES CONTINUED

D. **LIGHT SOURCES IN ENCLOSED OR RECESSED LUMINAIRES.** LAMPS AND OTHER SEPARABLE LIGHT SOURCES THAT ARE NOT COMPLIANT WITH THE JA8 ELEVATED TEMPERATURE REQUIREMENTS, INCLUDING MARKING REQUIREMENTS, SHALL NOT BE INSTALLED IN ENCLOSED OR RECESSED LUMINAIRES.

E. **BLANK ELECTRICAL BOXES.** THE NUMBER OF ELECTRICAL BOXES THAT ARE MORE THAN 5 FEET ABOVE THE FINISHED FLOOR AND DO NOT CONTAIN A LUMINAIRE OR OTHER DEVICE SHALL BE NO GREATER THAN THE NUMBER OF BEDROOMS. THESE ELECTRICAL BOXES MUST BE SERVED BY A DIMMER, VACANCY SENSOR CONTROL, LOW VOLTAGE WIRING OR FAN SPEED CONTROL.

INDOOR LIGHTING CONTROLS *(2022 CEnC 150.0(k)2)*.

A. LIGHTING SHALL HAVE READILY ACCESSIBLE WALL-MOUNTED CONTROLS THAT ALLOW THE LIGHTING TO BE MANUALLY TURNED ON AND OFF.
    A. ***EXCEPT:*** *CEILING FANS MAY PROVIDE CONTROL OF INTEGRATED LIGHTING VIA A REMOTE CONTROL.*

B. NO CONTROLS SHALL BYPASS A DIMMER, OCCUPANT SENSOR OR VACANCY SENSOR FUNCTION WHERE THAT DIMMER OR SENSOR HAS BEEN INSTALLED TO COMPLY WITH SECTION 150.0(K).

C. LIGHTING CONTROLS SHALL COMPLY WITH THE APPLICABLE REQUIREMENTS OF SECTION 110.9.

D. AN ENERGY MANAGEMENT CONTROL SYSTEM (EMCS) OR A MULTISCENE PROGRAMMABLE CONTROL MAY BE USED TO COMPLY WITH DIMMING, OCCUPANCY AND LIGHTING CONTROL REQUIREMENTS IN SECTION 150.0(K)2 IF IT PROVIDES THE FUNCTIONALITY OF THE SPECIFIED CONTROLS IN ACCORDANCE WITH SECTION 110.9, AND THE PHYSICAL CONTROLS SPECIFIED IN SECTION 150.0(K)2A.

E. **AUTOMATIC-OFF CONTROLS.**
    1. IN BATHROOMS, GARAGES, LAUNDRY ROOMS, UTILITY ROOMS AND WALK-IN CLOSETS, AT LEAST ONE INSTALLED LUMINAIRE SHALL BE CONTROLLED BY AN OCCUPANCY OR VACANCY SENSOR PROVIDING AUTOMATIC-OFF FUNCTIONALITY.
    2. FOR LIGHTING INTERNAL TO DRAWERS AND CABINETRY WITH OPAQUE FRONTS OR DOORS, CONTROLS THAT TURN THE LIGHT OFF WHEN THE DRAWER OR DOOR IS CLOSED SHALL BE PROVIDED.

F. **DIMMING CONTROLS.** LIGHTING IN HABITABLE SPACES, INCLUDING BUT NOT LIMITED TO LIVING ROOMS, DINING ROOMS, KITCHENS AND BEDROOMS, SHALL HAVE READILY ACCESSIBLE WALL-MOUNTED DIMMING CONTROLS THAT ALLOW THE LIGHTING TO BE MANUALLY ADJUSTED UP AND DOWN. FORWARD PHASE CUT DIMMERS CONTROLLING LED LIGHT SOURCES IN THESE SPACES SHALL COMPLY WITH NEMA SSL 7A.
EXCEPT: *CEILING FANS MAY PROVIDE CONTROL OF INTEGRATED LIGHTING VIA A REMOTE CONTROL. LUMINAIRES CONNECTED TO A CIRCUIT WITH CONTROLLED LIGHTING POWER LESS THAN 20 WATTS OR CONTROLLED BY AN OCCUPANCY OR VACANCY SENSOR PROVIDING AUTOMATIC-OFF FUNCTIONALITY. NAVIGATION LIGHTING SUCH AS NIGHT LIGHTS, STEP LIGHTS, AND PATH LIGHTS LESS THAN 5 WATTS, AND LIGHTING INTERNAL TO DRAWERS AND CABINETRY WITH OPAQUE FRONTS OR DOORS OR WITH AUTOMATIC-OFF CONTROLS.*

G. **INDEPENDENT CONTROLS.** INTEGRATED LIGHTING OF EXHAUST FANS SHALL BE CONTROLLED INDEPENDENTLY FROM THE FANS. THE FOLLOWING SHALL BE CONTROLLED SEPARATELY FROM CEILING-INSTALLED LIGHTING SUCH THAT ONE CAN BE TURNED ON WITHOUT TURNING ON THE OTHER:
    1. UNDERCABINET LIGHTING, UNDERSHELF LIGHTING, INTERIOR LIGHTING OF DISPLAY CABINETS, AND SWITCHED OUTLETS.

RESIDENTIAL OUTDOOR LIGHTING *(2022 CEnC 150.0(k)3)*. IN ADDITION TO MEETING THE REQUIREMENTS OF SECTION 150.0(K)1A, LUMINAIRES PROVIDING RESIDENTIAL OUTDOOR LIGHTING SHALL MEET THE FOLLOWING REQUIREMENTS, AS APPLICABLE:

A. FOR SINGLE-FAMILY RESIDENTIAL BUILDINGS, OUTDOOR LIGHTING PERMANENTLY MOUNTED TO A RESIDENTIAL BUILDING OR TO OTHER BUILDINGS ON THE SAME LOT SHALL MEET THE REQUIREMENT IN ITEM I AND THE REQUIREMENTS IN EITHER ITEM II OR ITEM III:
    i. CONTROLLED BY A MANUAL ON AND OFF CONTROL SWITCH THAT PERMITS THE AUTOMATIC ACTIONS OF ITEMS II OR III BELOW; &
    ii. CONTROLLED BY A PHOTOCELL AND EITHER A MOTION SENSOR OR AN AUTOMATIC TIME SWITCH CONTROL; OR
    iii. CONTROLLED BY AN ASTRONOMICAL TIME CLOCK CONTROL.
    NOTE: CONTROLS THAT OVERRIDE TO ON SHALL NOT BE ALLOWED UNLESS THE OVERRIDE AUTOMATICALLY RETURNS THE AUTOMATIC CONTROL TO ITS NORMAL OPERATION WITHIN 6 HOURS. AN ENERGY MANAGEMENT CONTROL SYSTEM THAT PROVIDES THE SPECIFIED LIGHTING CONTROL FUNCTIONALITY AND COMPLIES WITH ALL REQUIREMENTS APPLICABLE TO THE SPECIFIED CONTROLS MAY BE USED TO MEET THESE REQUIREMENTS.

1. ALL JOINTS, PENETRATIONS AND OTHER OPENINGS IN THE BUILDING ENVELOPE THAT ARE POTENTIAL SOURCES OF AIR LEAKAGE SHALL BE CAULKED, GASKETED, WEATHER-STRIPPED OR OTHERWISE SEALED TO LIMIT INFILTRATION AND EXFILTRATION (2022 CEnC 110.7).
2. ATTIC ACCESS DOORS SHALL HAVE PERMANENTLY ATTACHED INSULATION USING ADHESIVE OR MECHANICAL FASTENERS. THE ATTIC ACCESS SHALL BE GASKETED TO PREVENT AIR LEAKAGE (2022 CEnC 150.0(a)3)

ADDTIONAL NOTES PER AGING IN PLACE REQUIREMENTS:

1. ELECTRICAL RECEPTABLE OUTLET, SWITCH AND CONTROLS (INCLUDING CONTROLS FOR HEATING, VENTILATION AND AIR CONDITIONING) INTENDED TO BE USED BY OCCUPANTS SHALL BE LOCATED NO MORE THAN 48" MEASURED FROM THE TOP OF THE OUTLET BOX AND NOT LESS THAN 15" MEASURED FROM THE BOTTOM OF THE OUTLET BOX ABOVE THE FINISH FLOOR *(PER CRC R327.1.2)*.
2. DOORBELL BUTTONS OR CONTROLS, WHEN INSTALLED, SHALL NOT EXCEED 48" ABOVE EXTERIOR FLOOR OR LANDING, MEASURED FROM THE TOP OF THE DOORBELL BUTTON ASSEMBLY. WHERE DOORBELL BUTTONS INTEGRATED WITH OTHER FEATURES ARE REQUIRED TO BE INSTALLED ABOVE 48" MEASURED FROM THE EXTERIOR FLOOR OR LANDING, A STANDARD DOORBELL BUTTON OR CONTROL SHALL ALSO BE PROVIDED AT A HEIGHT NOT EXCEEDING 48" ABOVE EXTERIOR FLOOR OR LANDING, MEASURED FROM THE TOP OF THE DOORBELL BUTTON OR CONTROL *(PER CRC R327.1.4)*

ENERGY STORAGE READINESS

1. **ENERGY STORAGE SYSTEM (ESS) REQUIREMENTS:**
    - IN SINGLE-FAMILY RESIDENTIAL BUILDINGS THAT INCLUDE ONE OR TWO DWELLINGS, EACH DWELLING UNIT SHALL BE PROVIDED WITH DEDICATED RACEWAYS, DESIGNATED BRANCH CIRCUITS AND ISOLATION DEVICES FOR ENERGY STORAGE SYSTEMS AS SPECIFIED IN CALIFORNIA ENERGY CODE SECTION 150.0(S). ADDITIONALLY, THE PANELBOARDS SHALL BE PROVIDED WITH THE MINIMUM BUSBAR RATING AS SPECIFIED IN CALIFORNIA ENERGY CODE SECTION 150.0(S). (2022 CEC SECTION 706.10)

CALIFORNIA ENERGY CODE SECTION 150.0(S)

1. AT LEAST ONE OF THE FOLLOWING SHALL BE PROVIDED:
    A. ESS READY INTERCONNECTION EQUIPMENT WITH A MINIMUM BACKED-UP CAPACITY OF 60 AMPS AND A MINIMUM OF FOUR ESS-SUPPLIED BRANCH CIRCUITS, OR
    B. A DEDICATED RACEWAY FROM THE MAIN SERVICE TO A PANELBOARD (SUBPANEL) THAT SUPPLIES THE BRANCH CIRCUITS IN SECTION 150.0(S)(2). ALL BRANCH CIRCUITS ARE PERMITTED TO BE SUPPLIED BY THE MAIN SERVICE PANEL PRIOR TO THE INSTALLATION OF AN ESS. THE TRADE SIZE OF THE RACEWAY SHALL BE NOT LESS THAN 1 INCH. THE PANELBOARD THAT SUPPLIES THE BRANCH CIRCUITS (SUBPANEL) MUST BE LABELED "SUBPANEL SHALL INCLUDE ALL BACKEDUP LOAD CIRCUITS."
2. A MINIMUM OF FOUR BRANCH CIRCUITS SHALL BE IDENTIFIED AND HAVE THEIR SOURCE OF SUPPLY COLLOCATED AT A SINGLE PANELBOARD SUITABLE TO BE SUPPLIED BY THE ESS. AT LEAST ONE CIRCUIT SHALL SUPPLY THE REFRIGERATOR, ONE LIGHTING CIRCUIT SHALL BE LOCATED NEAR THE PRIMARY EGRESS AND AT LEAST ONE CIRCUIT SHALL SUPPLY A SLEEPING ROOM RECEPTACLE OUTLET.
3. THE MAIN PANELBOARD SHALL HAVE A MINIMUM BUSBAR RATING OF 225 AMPS.
4. SUFFICIENT SPACE SHALL BE RESERVED TO ALLOW FUTURE INSTALLATION OF A SYSTEM ISOLATION EQUIPMENT/TRANSFER SWITCH WITHIN 3 FEET OF THE MAIN PANELBOARD. RACEWAYS SHALL BE INSTALLED BETWEEN THE PANELBOARD AND THE SYSTEM ISOLATION EQUIPMENT/TRANSFER SWITCH LOCATION TO ALLOW THE CONNECTION OF BACKUP POWER SOURCE.

PLUMBING NOTES

1. CONFORM WITH CURRENT CPC AND LOCAL REQUIREMENTS.
PIPING:
2. DOMESTIC WATER (WITHIN BUILDING): COPPER OR PEX PIPE OR APPROVED EQUAL.
3. AIR CHAMBERS: 12" LONG CAPPED NIPPLE AT END OF EACH BRANCH TO EACH FIXTURE.
4. DIELECTRIC UNIONS "F.P.C.O." REQUIREMENT AT ALL DISSIMILAR MATERIAL CONNECTIONS.
5. WHEN "OPTIONAL" SOFT-WATER LOOP INTALLED, PROVIDE WITH 2 GATE VALVES.
6. WATER SERVICE PIPE SHALL BE PER CIVIL PLANS OR AS REQUIRED BY THE JURISDICTION.
7. WATER METER: PER WATER DISTRICT (REFER SIZE W/ FIRE SPRINKLER PLANS IF APPLICABLE)
8. SHOWER HEADS AND FAUCETS: FLOW RATES PER 2022 *CGBSC SECTION 4.303*.
9. **WATER HEATER** (REFER TO BUILDING ENERGY ANALYSIS REPORT):
    A. ALL DOMESTIC HOT WATER PIPING SHALL BE INSULATED. *(2022 CPC 609.12.1)*
        1. PIPES UP TO 2 INCHES IN DIAMETER: INSULATION WALL THICKNESS NOT LESS THAN DIAMETER OF PIPE. *(2022 CPC 609.12.2)*
        2. PIPES GREATER THAN 2 INCHES IN DIAMETER: INSULATION WALL THICKNESS NOT LESS THAN 2 INCHES. *(2022 CPC 609.12.2)*
        EXCEPTIONS:
        1. PIPING THAT PENETRATES FRAMING MEMBERS SHALL NOT BE REQUIRED TO HAVE PIPE INSULATION FOR THE DISTANCE OF THE FRAMING PENETRATION. *(2022 CPC 609.12.2)*
        2. HOT WATER PIPING BETWEEN THE FIXTURE CONTROL VALVE OR SUPPLY STOP AND THE FIXTURE OR APPLIANCE SHALL NOT BE REQUIRED TO BE INSULATED. *(2022 CPC 609.12.2)*
    B. PROVIDE A TEMPERATURE AND PRESSURE RELIEF VALVE WITH A FULL SIZE DRAIN OF GALVANIZED STEEL OR HARD DRAWN COPPER TO THE OUTSIDE OF THE BUILDING WITH THE END OF THE PIPE PROTRUDING 6" MINIMUM @ 2' MAX. ABOVE GRADE POINTING DOWNWARD TO THE TERMINATION - UNTHREADED.
    C. COMBUSTION AIR PER MANUFACTURE REQUIREMENTS.
    D. CLEARANCES PER MANUFACTURE REQUIREMENTS.
10. **PLUMBING INSULATION** PER 2022 CENC 150.0 (J) AND CBC 609.11
    A. DOMESTIC HOT WATER PIPING SHALL BE INSULATED.
    B. HOT WATER PIPE INSULATION SHALL HAVE A MINIMUM WALL THICKNESS OF NOT LESS THAN THE DIAMETER OF THE PIPE FOR A PIPE UP TO 2 INCHES (50 MM) IN DIAMETER. INSULATION WALL THICKNESS SHALL BE NOT LESS THAN 2 INCHES (51 MM) FOR A PIPE OF 2 INCHES (50 MM) OR MORE IN DIAMETER.
        1. PIPING THAT PENETRATES FRAMING MEMBERS SHALL NOT BE REQUIRED TO HAVE PIPE INSULATION FOR THE DISTANCE OF THE FRAMING PENETRATION.
        2. HOT WATER PIPING BETWEEN THE FIXTURE CONTROL VALVE OR SUPPLY STOP AND THE FIXTURE OR APPLIANCE SHALL NOT BE REQUIRED TO BE INSULATED.
    C. SERVICE WATER HEATING SYSTEMS PIPING TO INCLUDE.
        1. RECIRCULATING SYSTEM PIPING, INCLUDING THE SUPPLY AND RETURN PIPING TO THE WATER HEATER.
        2. THE FIRST 8 FEET OF HOT AND COLD OUTLET PIPING, INCLUDING PIPING BETWEEN A STORAGE TANK AND A HEAT TRAP, FOR A NON-RECIRCULATING STORAGE SYSTEM.
        3. PIPES THAT ARE EXTERNALLY HEATED.
        SHALL BE INSULATED AS FOLLOWS:
        UP TO 1" PIPE DIAMETER TO HAVE 1.0 MIN THICKNESS OR R7/7 RATING PER CENC TABLE 120.3A
        EXCEPTIONS:
            1. FACTORY-INSTALLED PIPING WITHIN SPACE-CONDITIONING EQUIPMENT CERTIFIED UNDER SECTION 110.1 OR 110.2.
            2. PIPING THAT PENETRATES FRAMING MEMBERS SHALL NOT BE REQUIRED TO HAVE PIPE INSULATION FOR THE DISTANCE OF THE FRAMING PENETRATION. METAL PIPING THAT ENETRATES METAL FRAMING SHALL USE GROMMETS, PLUGS, WRAPPING OR OTHER INSULATING MATERIAL TO ASSURE THAT NO CONTACT IS MADE WITH THE METAL FRAMING.
            3. PIPING INSTALLED IN INTERIOR OR EXTERIOR WALLS SHALL NOT BE REQUIRED TO HAVE PIPE INSULATION IF ALL OF THE REQUIREMENTS ARE MET FOR COMPLIANCE WITH QUALITY INSULATION INSTALLATION (QII) AS SPECIFIED IN THE REFERENCE RESIDENTIAL APPENDIX RA3.5.
            4. PIPING SURROUNDED WITH A MINIMUM OF 1 INCH OF WALL INSULATION, 2 INCHES OF CRAWLSPACE INSULATION, OR 4 INCHES OF ATTIC INSULATION SHALL NOT BE REQUIRED TO HAVE PIPE INSULATION.
11. I**NSULATION PROTECTION**. PIPE INSULATION SHALL BE PROTECTED FROM DAMAGE DUE TO SUNLIGHT, MOISTURE, EQUIPMENT MAINTENANCE AND WIND. PROTECTION SHALL, AT MINIMUM, INCLUDE THE FOLLOWING (2022 CEC SECTION 120.3(B)):
    A. PIPE INSULATION EXPOSED TO WEATHER SHALL BE PROTECTED BY A COVER SUITABLE FOR OUTDOOR SERVICE. THE COVER SHALL BE WATER RETARDANT AND PROVIDES SHIELDING FROM SOLAR RADIATION THAT CAN CAUSE DEGRADATION OF THE MATERIAL. ADHESIVE TAPE SHALL NOT BE USED TO PROVIDE THIS PROTECTION.
    B. PIPE INSULATION COVERING CHILLED WATER PIPING AND REFRIGERANT SUCTION PIPING LOCATED OUTSIDE THE CONDITIONED SPACE SHALL INCLUDE, OR BE PROTECTED BY, A CLASS I OR CLASS II VAPOR RETARDER. ALL PENETRATIONS AND JOINTS SHALL BE SEALED.
    C. PIPE INSULATION BURIED BELOW GRADE MUST BE INSTALLED IN A WATER PROOF AND NONCRUSHABLE CASING OR SLEEVE.
12. PIPE INSULATION: REFER TO TITLE 24 - MANDATORY MEASURES - "SPACE CONDITIONING, WATER HEATING & PLUMBING SYSTEM MEASURES"
13. STRAPS AND HANGERS: PROVIDE AS NECESSARY TO INSURE A STABLE INSTALLATION. SEE TITLE-24 FOR WATER HEATER REQUIREMENTS.
14. ALL HOSE BIBS SHALL HAVE APPROVED BACK FLOW PREVENTION DEVICES.
15. PLUMBING FIXTURES (WATER CLOSETS) AND FITTINGS (FAUCETS AND SHOWERHEADS) SHALL MEET THE STANDARDS REFERENCED IN CALGREEN TABLE 4.303.3.
16. WATER HEATER SHALL BE PROVIDED WITH A TEMPERATURE AND PRESSURE RELIEF VALVE. PER [2022 CPC 505.2] THE RELIEF VALVE SHALL BE PROVIDED WITH A DRAIN LINE WHICH EXTENDS FROM THE VALVES TO THE OUTSIDE OF THE BUILDING. PER [2022 608.5 CPC]
17. PER 2022 CPC 603.5.7 OUTLETS WITH HOSE ATTATCHMENTS. POTABLE WATER OUTLETS WITH HOSE ATTACHMENTS, OTHER THAN WATER HEATER DRAINS, BOILER DRAINS, AND CLOTHES WASHER CONNECTIONS, SHALL BE PROTECTED BY A NONREMOVABLE HOSE BIBB TYPE BACKFLOW PREVENTER, A NONREMOVABLE HOSE BIBB TYPE VACUMM BREAKER, OR BY AN ATMOSPHERE VACUUM BREAKER INSTALLED NOT LESS THAN 6 INCHES ABOVE THE HIGHEST POINT OF USAGE LOCATED ON THE DISCHARGE SIDE OF THE LAST VALVE. IN CLIMATES WHERE FREEZING TEMPERATURES OCCUR, A LISTED SELF DRAINING FROST-PROOF HOSE BIBB WITH AN INTEGRAL BACKFLOW PREVENTER OR VACUUM BREAKER SHALL BE USED.

PROJECT GENERAL NOTES

1. APPLICABLE CODES AND STANDARDS:
1.1. 2022 CALIFORNIA BUILDING CODE AND ITS APPENDICES AND STANDARDS.
1.2. 2022 CALIFORNIA PLUMBING CODE AND ITS APPENDICES AND STANDARDS.
1.3. 2022 CALIFORNIA MECHANICAL CODE AND ITS APPENDICES AND STANDARDS.
1.4. 2022 CALIFORNIA FIRE CODE AND ITS APPENDICES AND STANDARDS.
1.5. 2022 CALIFORNIA ELECTRICAL CODE AND ITS APPENDICES AND STANDARDS.
1.6. 2022 CALIFORNIA BUILDING ENERGY EFFICIENCY STANDARDS.
1.7 2022 CALIFORNIA GREEN BUILDING STANDARDS CODE AND ITS APPENDICES AND STANDARDS.
1.8 CURRENT COUNTY OF MONO COUNTY, CA MUNICIPAL CODE.
2. ALL WORK DESCRIBED IN THE DRAWINGS SHALL BE VERIFIED FOR DIMENSION, GRADE, EXTENT AND COMPATIBILITY WITH EXISTING SITE CONDITIONS. ANY DISCREPANCIES AND UNEXPECTED CONDITIONS THAT AFFECT OR CHANGE THE WORK DESCRIBED IN THE CONTRACT DOCUMENTS SHALL BE BROUGHT TO THE ARCHITECT'S ATTENTION IMMEDIATELY. DO NOT PROCEED WITH THE WORK IN THE AREA OF DISCREPANCIES UNTIL ALL SUCH DISCREPANCIES ARE RESOLVED. IF THE CONTRACTOR CHOOSES TO DO SO, HE/SHE SHALL BE PROCEEDING AT HIS/HER OWN RISK.
3. DIMENSIONS SHOWN SHALL TAKE PRECEDENCE OVER DRAWING SCALE OR PROPORTION. LARGER SCALE DRAWINGS SHALL TAKE PRECEDENCE OVER SMALLER SCALE DRAWINGS.
4. IN THE EVENT OF THE UNFORESEEN ENCOUNTER OF MATERIALS SUSPECTED TO BE OF AN ARCHAEOLOGICAL OR PALEONTOLOGICAL NATURE, ALL GRADING AND EXCAVATION SHALL CEASE IN THE IMMEDIATE AREA AND THE THE CONTRACTOR SHALL NOTIFY THE OWNER. THE FIND SHALL BE LEFT UNTOUCHED UNTIL AN EVALUATION BY A QUALIFIED ARCHAEOLOGIST OR PALEONTOLOGIST IS MADE.
5. CONTRACTOR IS TO BE RESPONSIBLE FOR BEING FAMILIAR WITH THESE DOCUMENTS INCLUDING ALL CONTRACT REQUIREMENTS.
6. GRADING PLANS, DRAINAGE IMPROVEMENTS, ROAD AND ACCESS REQUIREMENTS AND ENVIRONMENTAL HEALTH CONSIDERATIONS SHALL COMPLY WITH ALL LOCAL ORDINANCES.
7. SHOP WELDS MUST BE PERFORMED BY A LICENSED FABRICATOR'S SHOP.
8. THE FOLLOWING ITEMS SHOWN ON THE DRAWINGS ARE OWNER PROVIDED, OWNER INSTALLED. UTILITIES PROVIDED FOR THESE ITEMS WILL BE PROVIDED BY THE CONTRACTOR. CONTRACTOR TO COORDINATE INSTALLATION WITH OWNER.
8.1. TV/DVD SYSTEMS
8.2 ICE MACHINE
8.3 VENDING MACHINE
8.4 REFRIGERATOR
8.5 MICROWAVE
9. OSHA PERMITS REQUIRED FOR VERTICAL CUTS 5' OR OVER.
10. CONTRACTOR TO PROVIDE COMPLETE DETAILS OF ENGINEERED TEMPORARY SHORING OR SLOT CUTTING PROCEDURES ON PLANS. CALL FOR INSPECTION BEFORE EXCAVATION BEGINS.
11. THE SOILS ENGINEER IS TO APPROVE THE KEY OR BOTTOM AND LEAVE A CERTIFICATE ON THE SITE FOR THE GRADING INSPECTOR. THE GRADING INSPECTOR IS TO BE NOTIFIED BEFORE ANY GRADING BEGINS, AND FOR BOTTOM INSPECTION, BEFORE FILL IS PLACED. FILL MAY NOT BE PLACED WITHOUT APPROVAL OF THE GRADING INSPECTOR.
12. CONTRACTOR TO REVIEW CALIFORNIA GREEN CODE REQUIREMENTS FOR CONTRACTOR REQUIREMENTS.
13. A SEPARATE OFFICER, ACCESS EASEMENT/AGREEMENT, AND/OR RECIPROCAL ACCESS EASEMENT/AGREEMENT MAY BE REQUIRED TO INSURE THAT THE PROPOSED PRIVATE ACCESS ROADWAY WILL REMAIN OPEN TO THROUGH TRAFFIC AND EMERGENCY VEHICLES PRIOR TO FINAL OF BUILDING PERMIT.

MECHANICAL NOTES

1. CONFORM WITH CURRENT ADOPTED CRC, CMC, SMACCNA, NFPA AND LOCAL REQUIREMENTS.
2. DUCTWORK: SMACCNA "LOW VELOCITY DUCT CONSTRUCTION" NFPA STANDARD #90A. ALL TRANSVERSE DUCT PLENUM AND FITTING JOINTS SHALL BE SEALED WITH PRESSURE SENSITIVE NON-CLOTH TAPE MEETING THE REQUIREMENTS OF UL181, 181A, OR 181B, OR MASTIC TO PREVENT AIR LOSS. DUCTS SHALL BE INSULATED AS REQUIRED BY THE UMC. SEE FLOOR PLAN FOR F.A.U. AND FIREPLACES. DUCTS PENETRATING A WALL OR FLOOR-CEILING BETWEEN GARAGE & DWELLING TO BE MINIMUM 26 GAUGE METAL WITHOUT OPENING IN GARAGE. FIRE DAMPER REQUIRED OTHERWISE.
3. GRILLES AND REGISTERS, DIFFUSERS, ETC: SUBJECT TO OWNERS APPROVAL. "CARNES" OR EQUAL FANS: DIRECTLY VENTED TO OUTSIDE, BACK DRAFT DAMPERS ARE REQUIRED (PER TABLE 2-53V, TITLE 24 C.A.C.).
4. LAUNDRY DRYER VENT TO EXTERIOR TO BE 14 FEET MAXIMUM, LESS 2 FEET PER 90 DEGREE TURN IN EXCESS OF 2 PER CMC 504.4.2.1. IF VENT IS OVER 14' AN APPROVED
POWER ASSISTED DEVICE IS REQUIRED. DRYER EXHAUST DUCT POWER VENTILATORS SHALL BE LISTED AND LABELED IN ACCORDANCE WITH UL 705 AND INSTALLED IN ACCORDANCE WITH THE MANUFACTURER'S INSTALLATION INSTRUCTIONS PER 2022 CMC, SECTION 504.2.2.3. SEE NOTE BELOW.
5. BATHROOM EXHAUST FANS (BATHROOM APPLIES TO ROOMS CONTAINING BATHTUB, SHOWER, OR TUB/SHOWER COMBINATION) WHICH EXHAUST DIRECTLY FROM BATHROOMS SHALL COMPLY WITH THE FOLLOWING *(2022 CGBSC SEC. 4.506.1)*:
    a. FANS SHALL BE ENERGY STAR COMPLIANT AND BE DUCTED TO TERMINATE OUTSIDE THE BUILDING MIN 3' FROM OPENINGS.
    b. UNLESS FUNCTIONING AS A COMPONENT OF A WHOLE HOUSE VENTILATION SYSTEM, FANS MUST BE CONTROLLED BY A HUMIDITY CONTROL.
        - HUMIDITY CONTROLS SHALL BE CAPABLE OF ADJUSTMENT BETWEEN A RELATIVE HUMIDITY RANGE OF ≤ 50 PERCENT TO A MAXIMUM OF 80 PERCENT. A HUMIDITY CONTROL MAY UTILIZE MANUAL OR AUTOMATIC MEANS OF ADJUSTMENT.
        - A HUMIDITY CONTROL MAY BE A
        SEPARATE COMPONENT TO EXHAUST FAN AND IS NOT REQUIRED TO BE INTEGRAL(I.E. BUILT IN)
6. BATHROOM EXHAUST FANS SHALL PROVIDE MINIMUM 50 CFM EXHAUST RATE *(2022 CMC TABLE 403.7)*.
7. KITCHEN EXHAUST FANS SHALL PROVIDE MINIMUM 100 CFM EXHAUST RATE *(2022 CMC TABLE 403.7)*

MONO
COUNTY

THESE PLANS ARE PROVIDED BY MONO COUNTY AS PART OF THE PRE-APPROVED ADU PROGRAM AND ARE PUBLIC DOMAIN. THERE CANNOT BE A CHARGE TO PROVIDE THESE PLANS. NO ALTERATIONS TO THESE PLANS ARE ALLOWED. ALL ALTERATIONS MUST BE DONE UNDER A SEPARATE PERMIT ONCE THE BUILDING PERMIT FOR THE ADU HAS BEEN ISSUED AND FINAL INSPECTION COMPLETED. IF YOU DO NOT HAVE THE CONSTRUCTION KNOWLEDGE AND EXPERIENCE TO CONTRUCT THESE PLANS WITHOUT FURTHER DETAILS, IT IS RECOMMENDED YOU HIRE A CONTRACTOR TO DO THE CONSTRUCTION. THE CITY WILL NOT PROVIDE FURTHER INFORMATION OR DETAILS AND BUILDING INSPECTORS WILL NOT PROVIDE STEP BY STEP INSTRUCTIONS IN THE FIELD.

MONO COUNTY ADU PROTOTYPES
MONO COUNTY

GENERAL NOTES

PUBLIC SET

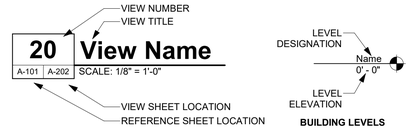
DATE
01/10/2024

SHEET
G-101

ABBREVIATIONS

A/C	AIR CONDITIONING
ABV	ABOVE
ACOUS	ACOUSTICAL
ACT	ACOUSTICAL CEILING TILE
ADA	AMERICANS WITH DISABILITIES ACT
AFCI	ARC FAULT CIRCUIT INTERRUPTER
AFF	ABOVE FINISH FLOOR
AL	ALUMINUM
ALT	ALTERNATE
ARCH	ARCHITECT(URAL)
BD	BOARD
BDRM	BEDROOM
BET	BETWEEN
BIT	BITUMINOUS
BLDG	BUILDNG
BLKG	BLOCKING
BLW	BELOW
BM	BEAM
BOT	BOTTOM
BUR	BUILT UP ROOF
CB	CATCH BASIN
CBC	CALIFORNIA BUILDING CODE
CEM	CEMENT
CFM	CUBIC FEET PER MINUTE
CIP	CAST IN PLACE
CJ	CONTROL JOINT
CL	CENTER LINE
CLG	CEILING
CLO	CLOSET
CLR	CLEAR
CMU	CONCRETE MASONRY UNIT
CO	CLEAN OUT
COL	COLUMN
CONC	CONCRETE
CONST	CONSTRUCTION
CONT	CONTINUOUS
CONTR	CONTRACTOR
CPT	CARPET
CT	CERAMIC TILE
CTR	CENTER
DBL	DOUBLE
DF	DRINKING FOUNTAIN
DIA	DIAMETER, DIAPHRAGM
DIM	DIMENSION
DN	DOWN
DR	DOOR
DS	DOWN SPOUT
DTL	DETAIL
DW	DISHWASHER
DWG	DRAWING
(E)	EXISTING
E	EAST
EA	EACH
EJ	EXPANSION JOINT
EL, ELEV	ELEVATION
ELEC	ELECTRIC
ENCL	ENCLOSURE
EQ	EQUAL
EQUIP	EQUIPMENT
EXH	EXHAUST
EXP	EXPANSION
EXT	EXTERIOR
FACP	FIRE ALARM CONTROL PANEL
FAU	FORCED AIR UNIT
FAWP	FLUID APPLIED WATERPROOFING
FD	FLOOR DRAIN
FDC	FIRE DEPARTMENT CONNECTION
FE	FIRE EXTINGUISHER
FEC	FIRE EXTINGUISHER CABINET
FF	FINISHED FLOOR ELEVATION
FG	FINISHED GRADE
FH	FIRE HYDRANT
FHC	FIRE HOSE CABINET
FIN	FINISH
FIXT	FIXTURE
FLR	FLOOR
FLUOR	FLOURESCENT
FND	FOUNDATION
FO	FACE OF
FOC	FACE OF CONCRETE
FOF	FACE OF FINISH
FOIC	FURNISHED BY OWNER INSTALLED BY CONTRACTOR
FOM	FACE OF MASONRY
FOS	FACE OF STUD
FRP	FIBERGLASS REINFORCED PANELS
FT	FOOT OR FEET
FTG	FOOTING
GA	GAUGE, GAGE
GALV	GALVANIZED
GB	GRAB BAR
GC	GENERAL CONTRACTOR
GFCI	GROUND FAULT CIRCUIT INTERRUPTER
GWB	GYPSUM BOARD
GYP	GYPSUM
HB	HOSE BIBB
HC	HOLLOW CORE
HDWD	HARDWOOD
HDWR	HARDWARE
HGT	HEIGHT
HM	HOLLOW METAL
HORIZ	HORIZONTAL
HVAC	HEATING, VENTILATION, A/C
ID	INSIDE DIAMETER
IIC	IMPACT INSULATION CLASS
IN	INCH
INCAND	INCANDESCENT
INSUL	INSULATION, INSULATED
INT	INTERIOR
JC	JANITORS CLOSET
JT	JOINT
LAM	LAMINATE
LAV	LAVATORY
LBS	POUNDS
LEED	LEADERSHIP IN ENERGY AND ENVIRONMENTAL DESIGN
LF	LINEAR FEET
LIN	LINEN CLOSET
LINO	LINOLEUM
LT(G)	LIGHT(ING)
LVL	LAMINATED VENEER LUMBER
LVT	LUXURY VINYL TILE
LW	LIGHTWEIGHT
MAX	MAXIMUM
MDF	MEDIUM DENSITY FIBERBOARD
MECH	MECHANICAL
MEMB	MEMBRANE
MEP	MECHANICAL, ELECTRICAL, PLUMBING
MFR	MANUFACTURER
MIN	MINIMUM
MISC	MISCELLANEOUS
MO	MASONRY OPENING
MTD	MOUNTED
MTL	METAL
N	NORTH
NIC	NOT IN CONTRACT
NO	NUMBER
NOM	NOMINAL
NTS	NOT TO SCALE
O.P.	OVERFLOW PIPE
OC	ON CENTER
OD	OVERFLOW DRAIN
OFF	OFFICE
OH	OPPOSITE HAND
OPG	OPENING
OPP	OPPOSITE
(P)	PROPOSED
PERM	PERIMETER
PERP	PERPENDICULAR
PG	PAINT GRADE
PL	PLATE, PROPERTY LINE
PLAM	PLASTIC LAMINATE
PLBG	PLUMBING
PLYWD	PLYWOOD
PNL	PANEL
PP	POWER POLE
PR	PAIR
PRTN	PARTITION
PSF	POUNDS PER SQUARE FOOT
PSI	POUNDS PER SQUARE INCH
PSL	PARALLEL STRAND LUMBER
PT	PRESSURE TREATED
PTD	PAINTED
PV	PHOTO VOLTAIC
PVC	POLYVINYL CHLORIDE
PVMT	PAVEMENT
QTY	QUANTITY
R	RADIUS, RISER
RB	RUBBER BASE
RCP	REFLECTED CEILING PLAN
RD	ROOF DRAIN
REF	REFRIGERATOR
REINF	REINFORCED
REQD	REQUIRED
RH	RIGHT HAND
RM	ROOM
RO	ROUGH OPENING
RTU	ROOF TOP UNIT (MECH)
S	SOUTH
SAFB	SOUND ATTENUATION FIBER BATT
SAWP	SELF ADHEREING WATERPROOFING
SC	SCUPPER/SOLID CORE
SCHED	SCHEDULE
SEAL	SEALANT
SECT	SECTION
SF	SQUARE FOOT
SHT	SHEET
SHTHG	SHEATHING
SIM	SIMILAR
SM	SHEET METAL
SPEC	SPECIFICATION
SQ	SQURE
SS	SOLID SURFACE
SSTL	STAINLESS STEEL
STC	SOUND TRANSMISSION CLASS
STD	STANDARD
STL	STEEL
STOR	STORAGE
STRUCT	STRUCTURAL
SUSP	SUPSPENDED
SV	SHEET VINYL
SYM	SYMMMETRICAL
T	TREAD
T&G	TONGUE & GROOVE
TEL	TELEPHONE
TEMP	TEMPERED
TER	TERRAZZO
THK	THICK
THR	THRESHOLD
TJI	TRUSS JOIST I-JOIST
TO	TOP OF
TOS	TOP OF SLAB
TOW	TOP OF WALL
TRANS	TRANSFORMER
TV	TELEVISION
TYP	TYPICAL
UFAS	UNIFORM FEDERAL ACCESSIBILITY STANDARDS
UG	UNDERGROUND
UNFIN	UNFINISHED
UNO	ULNESS NOTED OTHERWISE
UV	UTRAVIOLET
VCT	VINYL COMPOSITION TILE
VERT	VERTICAL
VIF	VERIFY IN FIELD
VTR	VENT TERMINATION PIPE
VWC	VINYL WALL COVERING
W	WEST
W/	WITH
W/D	WASHER DRYER
W/O	WITHOUT
WC	WATERCLOSET
WD	WOOD
WDW	WINDOW
WH	WATER HEATER
WI	WROUGHT IRON
WIN	WINDOW
WP	WATERPROOF(ING)
WR	WEATHER RESISTIVE
WRB	WATER RESISTIVE BARRIER
WSCT	WAINSCOT
WT	WEIGHT
WWF	WELDED WIRE FABRIC
YD	YARD

SYMBOLS



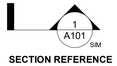
BUILDING LEVELS

NORTH ARROW

GRID REFERENCE

DOOR W/CLOSER

BUILDING ELEVATION



SECTION REFERENCE

DOOR TAG

WINDOW TAG

INTERIOR ELEVATIONS

DETAIL REFERENCE

WALL TAG

STOREFRONT TAG

REVISION TAG

CENTERLINE

MATERIAL TAG

THESE PLANS ARE PROVIDED BY MONO COUNTY AS PART OF THE PRE-APPROVED ADU PROGRAM AND ARE PUBLIC DOMAIN. THERE CANNOT BE A CHARGE TO PROVIDE THESE PLANS. NO ALTERATIONS TO THESE PLANS ARE ALLOWED. ALL ALTERATIONS MUST BE DONE UNDER A SEPARATE PERMIT ONCE THE BUILDING PERMIT FOR THE ADU HAS BEEN ISSUED AND FINAL INSPECTION COMPLETED. IF YOU DO NOT HAVE THE CONSTRUCTION KNOWLEDGE AND EXPERIENCE TO CONTRUCT THESE PLANS WITHOUT FURTHER DETAILS, IT IS RECOMMENDED YOU HIRE A CONTRACTOR TO DO THE CONSTRUCTION. THE CITY WILL NOT PROVIDE FURTHER INFORMATION OR DETAILS AND BUILDING INSPECTORS WILL NOT PROVIDE STEP BY STEP INSTRUCTIONS IN THE FIELD.

MONO COUNTY ADU PROTOTYPES
MONO COUNTY

ABBREVIATIONS AND SYMBOLS

PUBLIC SET

DATE
01/10/2024

SHEET
G-102

2022 CALIFORNIA GREEN BUILDING STANDARDS CODE

RESIDENTIAL MANDATORY MEASURES (SHEET 1)

CHAPTER 1 - ADMINISTRATION

SECTION 101 GENERAL

101.1 TITLE.
THESE REGULATIONS SHALL BE KNOWN AS THE CALIFORNIA GREEN BUILDING STANDARDS CODE AND MAY BE CITED AS SUCH AND WILL BE REFERRED TO HEREIN AS "THIS CODE." IT IS INTENDED THAT IT SHALL ALSO BE KNOWN AS THE CALGREEN CODE. THE CALIFORNIA GREEN BUILDING STANDARDS CODE IS PART 11 OF THIRTEEN PARTS OF THE OFFICIAL COMPILATION AND PUBLICATION OF THE ADOPTION, AMENDMENT AND REPEAL OF BUILDING REGULATIONS TO THE CALIFORNIA CODE OF REGULATIONS, TITLE 24, ALSO REFERRED TO AS THE CALIFORNIA BUILDING STANDARDS CODE.

101.2 PURPOSE.
THE PURPOSE OF THIS CODE IS TO IMPROVE PUBLIC HEALTH, SAFETY AND GENERAL WELFARE BY ENHANCING THE DESIGN AND CONSTRUCTION OF BUILDINGS THROUGH THE USE OF BUILDING CONCEPTS HAVING A REDUCED NEGATIVE IMPACT OR POSITIVE ENVIRONMENTAL IMPACT AND ENCOURAGING SUSTAINABLE CONSTRUCTION PRACTICES IN THE FOLLOWING CATEGORIES:

1. PLANNING AND DESIGN.
2. ENERGY EFFICIENCY.
3. WATER EFFICIENCY AND CONSERVATION.
4. MATERIAL CONSERVATION AND RESOURCE EFFICIENCY.
5. ENVIRONMENTAL QUALITY.

101.3 SCOPE.
THE PROVISIONS OF THIS CODE SHALL APPLY TO THE PLANNING, DESIGN, OPERATION, CONSTRUCTION, USE AND OCCUPANCY OF EVERY NEWLY CONSTRUCTED BUILDING OR STRUCTURE, UNLESS OTHERWISE INDICATED IN THIS CODE, THROUGHOUT THE STATE OF CALIFORNIA.

IT IS NOT THE INTENT THAT THIS CODE SUBSTITUTE OR BE IDENTIFIED AS MEETING THE CERTIFICATION REQUIREMENTS OF ANY GREEN BUILDING PROGRAM.

SECTION 102 CONSTRUCTION DOCUMENTS AND INSTALLATION VERIFICATION

102.1 SUBMITTAL DOCUMENTS.
CONSTRUCTION DOCUMENTS AND OTHER DATA SHALL BE SUBMITTED IN ONE OR MORE SETS WITH EACH APPLICATION FOR A PERMIT. WHERE SPECIAL CONDITIONS EXIST, THE ENFORCING AGENCY IS AUTHORIZED TO REQUIRE ADDITIONAL CONSTRUCTION DOCUMENTS TO BE PREPARED BY A LICENSED DESIGN PROFESSIONAL AND MAY BE SUBMITTED SEPARATELY.

EXCEPTION: THE ENFORCING AGENCY IS AUTHORIZED TO WAIVE THE SUBMISSION OF CONSTRUCTION DOCUMENTS AND OTHER DATA NOT REQUIRED TO BE PREPARED BY A LICENSED DESIGN PROFESSIONAL.

102.2 INFORMATION ON CONSTRUCTION DOCUMENTS.
CONSTRUCTION DOCUMENTS SHALL BE OF SUFFICIENT CLARITY TO INDICATE THE LOCATION, NATURE AND SCOPE OF THE PROPOSED GREEN BUILDING FEATURE AND SHOW THAT IT WILL CONFORM TO THE PROVISIONS OF THIS CODE, THE CALIFORNIA BUILDING STANDARDS CODE AND OTHER RELEVANT LAWS, ORDINANCES, RULES AND REGULATIONS AS DETERMINED BY THE ENFORCING AGENCY.

102.3 VERIFICATION.
DOCUMENTATION OF CONFORMANCE FOR APPLICABLE GREEN BUILDING MEASURES SHALL BE PROVIDED TO THE ENFORCING AGENCY. ALTERNATE METHODS OF DOCUMENTATION SHALL BE ACCEPTABLE WHEN THE ENFORCING AGENCY FINDS THAT THE PROPOSED ALTERNATE DOCUMENTATION IS SATISFACTORY TO DEMONSTRATE SUBSTANTIAL CONFORMANCE WITH THE INTENT OF THE PROPOSED GREEN BUILDING MEASURE.

CHAPTER 3 - GREEN BUILDING

SECTION 301 GENERAL

301.1 SCOPE.
BUILDINGS SHALL BE DESIGNED TO INCLUDE THE GREEN BUILDING MEASURES SPECIFIED AS MANDATORY IN THE APPLICATION CHECKLISTS CONTAINED IN THIS CODE. VOLUNTARY GREEN BUILDING MEASURES ARE ALSO INCLUDED IN THE APPLICATION CHECKLISTS AND MAY BE INCLUDED IN THE DESIGN AND CONSTRUCTION OF STRUCTURES COVERED BY THIS CODE, BUT ARE NOT REQUIRED UNLESS ADOPTED BY A CITY, COUNTY, OR CITY AND COUNTY AS SPECIFIED IN SECTION 101.7.

301.1.1 ADDITIONS AND ALTERATIONS. [HCD] THE MANDATORY PROVISIONS OF CHAPTER 4 SHALL BE APPLIED TO ADDITIONS OR ALTERATIONS OF EXISTING RESIDENTIAL BUILDINGS WHERE THE ADDITION OR ALTERATION INCREASES THE BUILDING'S CONDITIONED AREA, VOLUME, OR SIZE. THE REQUIREMENTS SHALL APPLY ONLY TO AND/OR WITHIN THE SPECIFIC AREA OF THE ADDITION OR ALTERATION.

THE MANDATORY PROVISIONS OF SECTION 4.106.4.2 MAY APPLY TO ADDITIONS OR ALTERATIONS OF EXISTING PARKING FACILITIES OR THE ADDITION OF NEW PARKING FACILITIES SERVING EXISTING MULTIFAMILY BUILDINGS. SEE SECTION 4.106.4.3 FOR APPLICATION.

NOTE: REPAIRS INCLUDING, BUT NOT LIMITED TO, RESURFACING, RESTRIPING, AND REPAIRING OR MAINTAINING EXISTING LIGHTING FIXTURES ARE NOT CONSIDERED ALTERATIONS FOR THE PURPOSE OF THIS SECTION.

301.2 LOW-RISE AND HIGH-RISE RESIDENTIAL BUILDINGS [HCD].
THE PROVISIONS OF INDIVIDUAL SECTIONS OF CALGREEN MAY APPLY TO EITHER LOW-RISE RESIDENTIAL BUILDINGS, HIGH-RISE RESIDENTIAL BUILDINGS, OR BOTH. INDIVIDUAL SECTIONS WILL BE DESIGNATED BY BANNERS TO INDICATE WHERE THE SECTION APPLIES SPECIFICALLY TO LOW-RISE ONLY (LR) OR HIGH-RISE ONLY (HR). WHEN THE SECTION APPLIES TO BOTH LOW-RISE AND HIGH-RISE BUILDINGS, NO BANNER WILL BE USED.

SECTION 302 MIXED OCCUPANCY BUILDINGS

302.1 MIXED OCCUPANCY BUILDINGS.
IN MIXED OCCUPANCY BUILDINGS, EACH PORTION OF A BUILDING SHALL COMPLY WITH THE SPECIFIC GREEN BUILDING MEASURES APPLICABLE TO EACH SPECIFIC OCCUPANCY.

CHAPTER 4 - RESIDENTIAL MANDATORY MEASURES

DIVISION 4.1 PLANNING AND DESIGN

4.106 SITE DEVELOPMENT

4.106.1 GENERAL.
PRESERVATION AND USE OF AVAILABLE NATURAL RESOURCES SHALL BE ACCOMPLISHED THROUGH EVALUATION AND CAREFUL PLANNING TO MINIMIZE NEGATIVE EFFECTS ON THE SITE AND ADJACENT AREAS. PRESERVATION OF SLOPES, MANAGEMENT OF STORM WATER DRAINAGE AND EROSION CONTROLS SHALL COMPLY WITH THIS SECTION.

4.106.2 STORM WATER DRAINAGE AND RETENTION DURING CONSTRUCTION
PROJECTS WHICH DISTURB LESS THAN ONE ACRE OF SOIL AND ARE NOT PART OF A LARGER COMMON PLAN OF DEVELOPMENT WHICH IN TOTAL DISTURBS ONE ACRE OR MORE, SHALL MANAGE STORM WATER DRAINAGE DURING CONSTRUCTION. IN ORDER TO MANAGE STORM WATER DRAINAGE DURING CONSTRUCTION, ONE OR MORE OF THE FOLLOWING MEASURES SHALL BE IMPLEMENTED TO PREVENT FLOODING OF ADJACENT PROPERTY, PREVENT EROSION AND RETAIN SOIL RUNOFF ON THE SITE.

1. RETENTION BASINS OF SUFFICIENT SIZE SHALL BE UTILIZED TO RETAIN STORM WATER ON THE SITE.
2. WHERE STORM WATER IS CONVEYED TO A PUBLIC DRAINAGE SYSTEM, COLLECTION POINT, GUTTER OR SIMILAR DISPOSAL METHOD, WATER SHALL BE FILTERED BY USE OF A BARRIER SYSTEM, WATTLE OR OTHER METHOD APPROVED BY THE ENFORCING AGENCY.
3. COMPLIANCE WITH A LAWFULLY ENACTED STORM WATER MANAGEMENT ORDINANCE.

4.106.3 GRADING AND PAVING
CONSTRUCTION PLANS SHALL INDICATE HOW THE SITE GRADING OR DRAINAGE SYSTEM WILL MANAGE ALL SURFACE WATER FLOWS TO KEEP WATER FROM ENTERING BUILDINGS. EXAMPLES OF METHODS TO MANAGE SURFACE WATER INCLUDE, BUT ARE NOT LIMITED TO, THE FOLLOWING:

1. SWALES
2. WATER COLLECTION AND DISPOSAL SYSTEMS
3. FRENCH DRAINS
4. WATER RETENTION GARDENS
5. OTHER WATER MEASURES WHICH KEEP SURFACE WATER AWAY FROM BUILDINGS AND AID IN GROUNDWATER RECHARGE.
   EXCEPTIONS: ADDITIONS AND ALTERATIONS NOT ALTERING THE DRAINAGE PATH.

4.106.4 ELECTRIC VEHICLE (EV) CHARGING FOR NEW CONSTRUCTION
NEW CONSTRUCTION SHALL COMPLY WITH SECTION 4.106.4.1, 4.106.4.2, OR 4.106.4.3, TO FACILITATE FUTURE INSTALLATION AND USE OF EV CHARGERS. ELECTRIC VEHICLE SUPPLY EQUIPMENT (EVSE) SHALL BE INSTALLED IN ACCORDANCE WITH THE *CALIFORNIA ELECTRICAL CODE*, ARTICLE 625.

EXCEPTIONS:

1. ON A CASE-BY-CASE BASIS, WHERE THE LOCAL ENFORCING AGENCY HAS DETERMINED EV CHARGING AND INFRASTRUCTURE ARE NOT FEASIBLE BASED UPON ONE OR MORE OF THE FOLLOWING CONDITIONS:
   1.1. WHERE THERE IS NO LOCAL UTILITY POWER SUPPLY OR THE LOCAL UTILITY IS UNABLE TO SUPPLY ADEQUATE POWER.
   1.2. WHERE THERE IS EVIDENCE SUITABLE TO THE LOCAL ENFORCING AGENCY SUBSTANTIATING THAT ADDITIONAL LOCAL UTILITY INFRASTRUCTURE DESIGN REQUIREMENTS, DIRECTLY RELATED TO THE IMPLEMENTATION OF SECTION 4.106.4, MAY ADVERSELY IMPACT THE CONSTRUCTION COST OF THE PROJECT.
2. ACCESSORY DWELLING UNITS (ADU) AND JUNIOR ACCESSORY DWELLING UNITS (JADU) WITHOUT ADDITIONAL PARKING FACILITIES.

4.106.4.1 NEW ONE- AND TWO-FAMILY DWELLINGS AND TOWNHOUSES WITH ATTACHED PRIVATE GARAGES
FOR EACH DWELLING UNIT, INSTALL A LISTED RACEWAY TO ACCOMODATE A DEDICATED 208/240-VOLT BRANCH CIRCUIT. THE RACEWAY SHALL NOT BE LESS THAN TRADE SIZE 1 (NOMINAL 1-INCH INSIDE DIAMTER). THE RACEWAY SHALL ORIGINATE AT THE MAIN SERVICE OR SUBPANEL AND SHALL TERMINATE INTO A LISTED CABINET, BOX OR OTHER ENCLOSURE IN CLOSE PROXIMITY TO THE PROPOSED LOCATION OF AN EV CHARGER. RACEWAYS ARE REQUIRED TO BE CONTINUOUS AT ENCLOSED, INACCESSIBLE OR CONCEALED AREAS AND SPACES. THE SERVICE PANEL AND/OR SUBPANEL SHALL PROVIDE CAPACITY TO INSTALL A 40-AMPERE MINIMUM DEDICATED BRANCH CIRCUIT AND SPACE(S) RESERVED TO PERMIT INSTALLATION OF A BRANCH CIRCUIT OVERCURRENT PROTECTION DEVICE.

4.106.4.1.1 IDENTIFICATION
THE SERVICE PANEL OR SUBPANEL CIRCUIT DIRECTORY SHALL IDENTIFY THE OVERCURRENT PROTECTIVE DEVICE SPACE(S) RESERVED FOR FUTURE EV CHARGING AS "EV CAPABLE". THE RACEWAY TERMINATION LOCATION SHALL BE PERMANENTLY AND VISIBLY MARKED AS "EV CAPABLE".

4.106.4.2 NEW MULTIFAMILY DWELLINGS, HOTELS AND MOTELS AND NEW RESIDENTIAL PARKING FACILITIES
WHEN PARKING IS PROVIDED, PARKING SPACES FOR NEW MULTIFAMILY DWELLINGS, HOTELS AND MOTELS SHALL MEET THE REQUIREMENTS OF SECTIONS 4.106.4.2.1 AND 4.106.4.2.2. CALCULATIONS FOR SPACES SHALL BE ROUNDED UP TO THE NEAREST WHOLE NUMBER. A PARKING SPACE SERVED BY ELECTRIC VEHICLE SUPPLY EQUIPMENT OR DESIGNED AS A FUTURE EV CHARGING SPACE SHALL COUNT AS AT LEAST ONE STANDARD AUTOMOBILE PARKING SPACE ONLY FOR THE PURPOSE OF COMPLYING WITH ANY APPLICABLE MINIMUM PARKING SPACE REQUIREMENTS ESTABLISHED BY A LOCAL JURISDICTION. SEE VEHICLE CODE SECTION 22511.2 FOR FURTHER DETAILS.

4.106.4.2.1 MULTIFAMILY DEVELOPMENT PROJECTS WITH LESS THAN 20 DWELLING UNITS; AND HOTELS AND MOTELS WITH LESS THAN 20 SLEEPING UNITS OR GUEST ROOMS
THE NUMBER OF DWELLING UNITS, SLEEPING UNITS OR GUEST ROOMS SHALL BE BASED ON ALL BUILDINGS ON A PROJECT SITE SUBJECT TO THIS SECTION.

1. **EV CAPABLE.** TEN (10) PERCENT OF THE TOTAL NUMBER OF PARKING SPACES ON A BUILDING SITE, PROVIDED FOR ALL TYPES OF PARKING FACILITIES, SHALL BE ELECTRIC VEHICLE CHARGING SPACES (EV SPACES) CAPABLE OF SUPPORTING FUTURE LEVEL 2 EVSE. ELECTRICAL LOAD CALCULATIONS SHALL DEMONSTRATE THAT THE ELECTRICAL PANEL SERVICE CAPACITY AND ELECTRICAL SYSTEM, INCLUDING ANY ON-SITE DISTRIBUTION TRANSFORMER(S), HAVE SUFFICIENT CAPACITY TO SIMULTANEOUSLY CHARGE ALL EVS AT ALL REQUIRED EV SPACES AT A MINIMUM OF 40 AMPERES.

   THE SERVICE PANEL OR SUBPANEL CIRCUIT DIRECTORY SHALL IDENTIFY THE OVERCURRENT PROTECTIVE DEVICE SPACE(S) RESERVED FOR FUTURE EV CHARGING PURPOSES AS "EV CAPABLE" IN ACCORDANCE WITH THE CALIFORNIA ELECTRICAL CODE.
   EXCEPTIONS:
   1. WHEN EV CHARGERS (LEVEL 2 EVSE) ARE INSTALLED IN A NUMBER EQUAL TO OR GREATER THAN THE REQUIRED NUMBER OF EV CAPABLE SPACES.
   2. WHEN EV CHARGERS (LEVEL 2 EVSE) ARE INSTALLED IN A NUMBER LESS THAN THE REQUIRED NUMBER OF EV CAPABLE SPACES, THE NUMBER OF EV CAPABLE SPACES REQUIRED MAY BE REDUCED BY A NUMBER EQUAL TO THE NUMBER OF EV CHARGERS INSTALLED.

   NOTES:
   a. CONSTRUCTION DOCUMENTS ARE INTENDED TO DEMONSTRATE THE PROJECT'S CAPABILITY AND CAPACITY FOR FACILITATING FUTURE EV CHARGING.
   b. THERE IS NO REQUIREMENT FOR EV SPACES TO BE CONSTRUCTED OR AVAILABLE UNTIL RECEPTACLES FOR EV CHARGING OR EV CHARGERS ARE INSTALLED FOR USE.
2. **EV READY.** TWENTY-FIVE (25) PERCENT OF THE TOTAL NUMBER OF PARKING SPACES SHALL BE EQUIPPED WITH LOW POWER LEVEL 2 EV CHARGING RECEPTACLES. FOR MULTIFAMILY PARKING FACILITIES, NO MORE THAN ONE RECEPTACLE IS REQUIRED PER DWELLING UNIT WHEN MORE THAN ONE PARKING SPACE IS PROVIDED FOR USE BY A SINGLE DWELLING UNIT.
   EXCEPTION: AREAS OF PARKING FACILITIES SERVED BY PARKING LIFTS.

4.106.4.2.2 MULTIFAMILY DEVELOPMENT PROJECTS WITH 20 OR MORE DWELLING UNITS, HOTELS AND MOTELS WITH 20 OR MORE SLEEPING UNITS OR GUEST ROOMS
THE NUMBER OF DWELLING UNITS, SLEEPING UNITS OR GUEST ROOMS SHALL BE BASED ON ALL BUILDINGS ON A PROJECT SITE SUBJECT TO THIS SECTION.

1. **EV CAPABLE.** TEN (10) PERCENT OF THE TOTAL NUMBER OF PARKING SPACES ON A BUILDING SITE, PROVIDED FOR ALL TYPES OF PARKING FACILITIES, SHALL BE ELECTRIC VEHICLE CHARGING SPACES (EV SPACES) CAPABLE OF SUPPORTING FUTURE LEVEL 2 EVSE. ELECTRICAL LOAD CALCULATIONS SHALL DEMONSTRATE THAT THE ELECTRICAL PANEL SERVICE CAPACITY AND ELECTRICAL SYSTEM, INCLUDING ANY ON-SITE DISTRIBUTION TRANSFORMER(S), HAVE SUFFICIENT CAPACITY TO SIMULTANEOUSLY CHARGE ALL EVS AT ALL REQUIRED EV SPACES AT A MINIMUM OF 40 AMPERES.

   THE SERVICE PANEL OR SUBPANEL CIRCUIT DIRECTORY SHALL IDENTIFY THE OVERCURRENT PROTECTIVE DEVICE SPACE(S) RESERVED FOR FUTURE EV CHARGING PURPOSES AS "EV CAPABLE" IN ACCORDANCE WITH THE CALIFORNIA ELECTRICAL CODE.

   EXCEPTION: WHEN EV CHARGERS (LEVEL 2 EVSE) ARE INSTALLED IN A NUMBER GREATER THAN FIVE (5) PERCENT OF PARKING SPACES REQUIRED BY SECTION 4.106.4.2.2, ITEM 3, THE NUMBER OF EV CAPABLE SPACES REQUIRED MAY BE REDUCED BY A NUMBER EQUAL TO THE NUMBER OF EV CHARGERS INSTALLED OVER THE FIVE (5) PERCENT REQUIRED.

   NOTES:
   CONSTRUCTION DOCUMENTS SHALL SHOW LOCATIONS OF FUTURE EV SPACES.
   THERE IS NO REQUIREMENT FOR EV SPACES TO BE CONSTRUCTED OR AVAILABLE UNTIL RECEPTACLES FOR EV CHARGING OR EV CHARGERS ARE INSTALLED FOR USE.
2. **EV READY.** TWENTY-FIVE (25) PERCENT OF THE TOTAL NUMBER OF PARKING SPACES SHALL BE EQUIPPED WITH LOW POWER LEVEL 2 EV CHARGING RECEPTACLES. FOR MULTIFAMILY PARKING FACILITIES, NO MORE THAN ONE RECEPTACLE IS REQUIRED PER DWELLING UNIT WHEN MORE THAN ONE PARKING SPACE IS PROVIDED FOR USE BY A SINGLE DWELLING UNIT.

   EXCEPTION: AREAS OF PARKING FACILITIES SERVED BY PARKING LIFTS.
3. **EV CHARGERS.** FIVE (5) PERCENT OF THE TOTAL NUMBER OF PARKING SPACES SHALL BE EQUIPPED WITH LEVEL 2 EVSE. WHERE COMMON USE PARKING IS PROVIDED, AT LEAST ONE EV CHARGER SHALL BE LOCATED IN THE COMMON USE PARKING AREA AND SHALL BE AVAILABLE FOR USE BY ALL RESIDENTS OR GUESTS.

   WHEN LOW POWER LEVEL 2 EV CHARGING RECEPTACLES OR LEVEL 2 EVSE ARE INSTALLED BEYOND THE MINIMUM REQUIRED, AN AUTOMATIC LOAD MANAGEMENT SYSTEM (ALMS) MAY BE USED TO REDUCE THE MAXIMUM REQUIRED ELECTRICAL CAPACITY TO EACH SPACE SERVED BY THE ALMS. THE ELECTRICAL SYSTEM AND ANY ON-SITE DISTRIBUTION TRANSFORMERS SHALL HAVE SUFFICIENT CAPACITY TO DELIVER AT LEAST 3.3 KW SIMULTANEOUSLY TO EACH EV CHARGING STATION (EVCS) SERVED BY THE ALMS. THE BRANCH CIRCUIT SHALL HAVE A MINIMUM CAPACITY OF 40 AMPERES, AND INSTALLED EVSE SHALL HAVE A CAPACITY OF NOT LESS THAN 30 AMPERES. ALMS SHALL NOT BE USED TO REDUCE THE MINIMUM REQUIRED ELECTRICAL CAPACITY TO THE REQUIRED EV CAPABLE SPACES.

4.106.4.2.2.1 ELECTRIC VEHICLE CHARGING STATIONS (EVCS)
ELECTRIC VEHICLE CHARGING STATIONS REQUIRED BY SECTION 4.106.4.2.2, ITEM 3, SHALL COMPLY WITH SECTION 4.106.4.2.2.1.

EXCEPTION: ELECTRIC VEHICLE CHARGING STATIONS SERVING PUBLIC ACCOMMODATIONS, PUBLIC HOUSING, MOTELS AND HOTELS SHALL NOT BE REQUIRED TO COMPLY WITH THIS SECTION. SEE CALIFORNIA BUILDING CODE, CHAPTER 11B, FOR APPLICABLE REQUIREMENTS.

4.106.4.2.2.1.1 LOCATION
EVCS SHALL COMPLY WITH AT LEAST ONE OF THE FOLLOWING OPTIONS: THE CHARGING SPACE SHALL BE LOCATED ADJACENT TO AN ACCESSIBLE PARKING SPACE MEETING THE REQUIREMENTS OF THE CALIFORNIA BUILDING CODE, CHAPTER 11A, TO ALLOW USE OF THE EV CHARGER FROM THE ACCESSIBLE PARKING SPACE.

THE CHARGING SPACE SHALL BE LOCATED ON AN ACCESSIBLE ROUTE, AS DEFINED IN THE CALIFORNIA BUILDING CODE, CHAPTER 2, TO THE BUILDING.

EXCEPTION: ELECTRIC VEHICLE CHARGING STATIONS DESIGNED AND CONSTRUCTED IN COMPLIANCE WITH THE CALIFORNIA BUILDING CODE, CHAPTER 11B, ARE NOT REQUIRED TO COMPLY WITH SECTION 4.106.4.2.2.1.1 AND SECTION 4.106.4.2.2.1.2, ITEM 3.

4.106.4.2.2.1.2 ELECTRIC VEHICLE CHARGING STATIONS (EVCS) DIMENSIONS
THE CHARGING SPACES SHALL BE DESIGNED TO COMPLY WITH THE FOLLOWING:

1. THE MINIMUM LENGTH OF EACH EV SPACE SHALL BE 18 FEET.
2. THE MINIMUM WIDTH OF EACH EV SPACE SHALL BE 9 FEET.
3. ONE IN EVERY 25 CHARGING SPACES, BUT NOT LESS THAN ONE, SHALL ALSO HAVE AN 8-FOOT WIDE MINIMUM AISLE. A 5-FOOT WIDE MINIMUM AISLE SHALL BE PERMITTED PROVIDED THE MINIMUM WIDTH OF THE EV SPACE IS 12 FEET.
   a. SURFACE SLOPE FOR THIS EV SPACE AND THE AISLE SHALL NOT EXCEED 1 UNIT VERTICAL IN 48 UNITS HORIZONTAL (2.083 PERCENT SLOPE) IN ANY DIRECTION.

4.106.4.2.2.1.3 ACCESSIBLE EV SPACES
IN ADDITION TO THE REQUIREMENTS IN SECTIONS 4.106.4.2.2.1.1 AND 4.106.4.2.2.1.2, ALL EVSE, WHEN INSTALLED, SHALL COMPLY WITH THE ACCESSIBILITY PROVISIONS FOR EV CHARGERS IN THE CALIFORNIA BUILDING CODE, CHAPTER 11B. EV READY SPACES AND EVCS IN MULTIFAMILY DEVELOPMENTS SHALL COMPLY WITH CALIFORNIA BUILDING CODE, CHAPTER 11A, SECTION 1109A.

4.106.4.2.3 EV SPACE REQUIREMENTS

1. **SINGLE EV SPACE REQUIRED.** INSTALL A LISTED RACEWAY CAPABLE OF ACCOMMODATING A 208/240-VOLT DEDICATED BRANCH CIRCUIT. THE RACEWAY SHALL NOT BE LESS THAN TRADE SIZE 1 (NOMINAL 1-INCH INSIDE DIAMETER). THE RACEWAY SHALL ORIGINATE AT THE MAIN SERVICE OR SUBPANEL AND SHALL TERMINATE INTO A LISTED CABINET, BOX OR ENCLOSURE IN CLOSE PROXIMITY TO THE LOCATION OR THE PROPOSED LOCATION OF THE EV SPACE. CONSTRUCTION DOCUMENTS SHALL IDENTIFY THE RACEWAY TERMINATION POINT, RECEPTACLE OR CHARGER LOCATION, AS APPLICABLE. THE SERVICE PANEL AND/ OR SUBPANEL SHALL HAVE A 40-AMPERE MINIMUM DEDICATED BRANCH CIRCUIT, INCLUDING BRANCH CIRCUIT OVERCURRENT PROTECTIVE DEVICE INSTALLED, OR SPACE(S) RESERVED TO PERMIT INSTALLATION OF A BRANCH CIRCUIT OVERCURRENT PROTECTIVE DEVICE.

   EXCEPTION: A RACEWAY IS NOT REQUIRED IF A MINIMUM 40-AMPERE 208/240-VOLT DEDICATED EV BRANCH CIRCUIT IS INSTALLED IN CLOSE PROXIMITY TO THE LOCATION OR THE PROPOSED LOCATION OF THE EV SPACE, AT THE TIME OF ORIGINAL CONSTRUCTION IN ACCORDANCE WITH THE CALIFORNIA ELECTRICAL CODE.
2. **MULTIPLE EV SPACES REQUIRED.** CONSTRUCTION DOCUMENTS SHALL INDICATE THE RACEWAY TERMINATION POINT AND THE LOCATION OF INSTALLED OR FUTURE EV SPACES, RECEPTACLES OR EV CHARGERS. CONSTRUCTION DOCUMENTS SHALL ALSO PROVIDE INFORMATION ON AMPERAGE OF INSTALLED OR FUTURE RECEPTACLES OR EVSE, RACEWAY METHOD(S), WIRING SCHEMATICS AND ELECTRICAL LOAD CALCULATIONS. PLAN DESIGN SHALL BE BASED UPON A 40-AMPERE MINIMUM BRANCH CIRCUIT. REQUIRED RACEWAYS AND RELATED COMPONENTS THAT ARE PLANNED TO BE INSTALLED UNDERGROUND, ENCLOSED, INACCESSIBLE OR IN CONCEALED AREAS AND SPACES SHALL BE INSTALLED AT THE TIME OF ORIGINAL CONSTRUCTION.

   EXCEPTION: A RACEWAY IS NOT REQUIRED IF A MINIMUM 40-AMPERE 208/240-VOLT DEDICATED EV BRANCH CIRCUIT IS INSTALLED IN CLOSE PROXIMITY TO THE LOCATION OR THE PROPOSED LOCATION OF THE EV SPACE AT THE TIME OF ORIGINAL CONSTRUCTION IN ACCORDANCE WITH THE CALIFORNIA ELECTRICAL CODE.

4.106.4.2.4 IDENTIFICATION
THE SERVICE PANEL OR SUBPANEL CIRCUIT DIRECTORY SHALL IDENTIFY THE OVERCURRENT PROTECTIVE DEVICE SPACE(S) RESERVED FOR FUTURE EV CHARGING PURPOSES AS "EV CAPABLE" IN ACCORDANCE WITH THE CALIFORNIA ELECTRICAL CODE.

4.106.4.2.5 ELECTRIC VEHICLE READY SPACE SIGNAGE
ELECTRIC VEHICLE READY SPACES SHALL BE IDENTIFIED BY SIGNAGE OR PAVEMENT MARKINGS, IN COMPLIANCE WITH CALTRANS TRAFFIC OPERATIONS POLICY DIRECTIVE 13-01 (ZERO EMISSION VEHICLE SIGNS AND PAVEMENT MARKINGS) OR ITS SUCCESSOR(S).

4.106.4.3 ELECTRIC VEHICLE CHARGING FOR ADDITIONS AND ALTERATIONS OF PARKING FACILITIES SERVING EXISTING MULTIFAMILY BUILDINGS
WHEN NEW PARKING FACILITIES ARE ADDED, OR ELECTRICAL SYSTEMS OR LIGHTING OF EXISTING PARKING FACILITIES ARE ADDED OR ALTERED AND THE WORK REQUIRES A BUILDING PERMIT, TEN (10) PERCENT OF THE TOTAL NUMBER OF PARKING SPACES ADDED OR ALTERED SHALL BE ELECTRIC VEHICLE CHARGING SPACES (EV SPACES) CAPABLE OF SUPPORTING FUTURE LEVEL 2 EVSE.

NOTES:

1. CONSTRUCTION DOCUMENTS ARE INTENDED TO DEMONSTRATE THE PROJECT'S CAPABILITY AND CAPACITY FOR FACILITATING FUTURE EV CHARGING.
2. THERE IS NO REQUIREMENT FOR EV SPACES TO BE CONSTRUCTED OR AVAILABLE UNTIL EV CHARGERS ARE INSTALLED FOR USE.

DIVISION 4.2 ENERGY EFFICIENCY

4.201 GENERAL

4.201.1 SCOPE.
FOR THE PURPOSES OF MANDATORY ENERGY EFFICIENCY STANDARDS IN THIS CODE, THE CALIFORNIA ENERGY COMMISSION WILL CONTINUE TO ADOPT MANDATORY STANDARDS.

DIVISION 4.3 WATER EFFICIENCY AND CONSERVATION

4.303 INDOOR WATER USE

4.303.1 WATER CONSERVING PLUMBING FIXTURES AND FITTINGS
PLUMBING FIXTURES (WATER CLOSETS AND URINALS) AND FITTINGS (FAUCETS AND SHOWERHEADS) SHALL COMPLY WITH THE FOLLOWING:

4.303.1.1 WATER CLOSETS
THE EFFECTIVE FLUSH VOLUME OF ALL WATER CLOSETS SHALL NOT EXCEED 1.28 GALLONS PER FLUSH. TANK-TYPE WATER CLOSETS SHALL BE CERTIFIED TO THE PERFORMANCE CRITERIA OF THE U.S. EPA WATERSENSE SPECIFICATION FOR TANK TYPE TOILET.

NOTE: THE EFFECTIVE FLUSH VOLUME OF DUAL FLUSH TOILETS IS DEFINED AS THE COMPOSITE, AVERAGE FLUSH VOLUME OF TWO REDUCED FLUSHES AND ONE FULL FLUSH.

4.303.1.2 URINALS
THE EFFECTIVE FLUSH VOLUME OF WALL-MOUNTED URINALS SHALL NOT EXCEED 0.125 GALLONS PER FLUSH. THE EFFECTIVE FLUSH VOLUME OF ALL OTHER URINALS SHALL NOT EXCEED 0.5 GALLONS PER FLUSH.

4.303.1.3 SHOWERHEADS

4.303.1.3.1 SINGLE SHOWERHEAD
SHOWERHEADS SHALL HAVE A MAXIMUM FLOW RATE OF NOT MORE THAN 1.8 GALLONS PER MINUTE AT 80 PSI. SHOWERHEADS SHALL BE CERTIFIED TO THE PERFORMANCE CRITERIA OF THE U.S. EPA WATERSENSE SPECIFICATION FOR SHOWERHEADS.

4.303.1.3.2 MULTIPLE SHOWERHEADS SERVING ONE SHOWER
WHEN A SHOWER IS SERVED BY MORE THAN ONE SHOWERHEAD, THE COMBINED FLOW RATE OF ALL SHOWERHEADS AND/OR OTHER SHOWER OUTLETS CONTROLLED BY A SINGLE VALVE SHALL NOT EXCEED 1.8 GALLONS PER MINUTE AT 80 PSI, OR THE SHOWER SHALL BE DESIGNED TO ALLOW ONLY ONE SHOWER OUTLET TO BE IN OPERATION AT A TIME.

NOTE: A HAND HELD SHOWER SHALL BE CONSIDERED A SHOWERHEAD.

4.303.1.4 FAUCETS

4.303.1.4.1 RESIDENTIAL LAVATORY FAUCETS
THE MAXIMUM FLOW RATE OF RESIDENTIAL LAVATORY FAUCETS SHALL NOT EXCEED 1.2 GALLONS PER MINUTE AT 60 PSI. THE MINIMUM FLOW RATE OF RESIDENTIAL LAVATORY FAUCETS SHALL NOT BE LESS THAN 0.8 GALLONS PER MINUTE AT 20 PSI.

4.303.1.4.2 LAVATORY FAUCETS IN COMMON AND PUBLIC USE AREAS
THE MAXIMUM FLOW RATE OF LAVATORY FAUCETS INSTALLED IN COMMON AND PUBLIC USE AREAS (OUTSIDE OF DWELLINGS OR SLEEPING UNITS) IN RESIDENTIAL BUILDINGS SHALL NOT EXCEED 0.5 GALLONS PER MINUTE AT 60 PSI.

4.303.1.4.3 METERING FAUCETS
METERING FAUCETS WHEN INSTALLED IN RESIDENTIAL BUILDINGS SHALL NOT DELIVER MORE THAN 0.2 GALLONS PER CYCLE.

4.303.1.4.4 KITCHEN FAUCETS
THE MAXIMUM FLOW RATE OF KITCHEN FAUCETS SHALL NOT EXCEED 1.8 GALLONS PER MINUTE AT 60 PSI. KITCHEN FAUCETS MAY TEMPORARILY INCREASE THE FLOW ABOVE THE MAXIMUM RATE, BUT NOT TO EXCEED 2.2 GALLONS PER MINUTE AT 60 PSI, AND MUST DEFAULT TO A MAXIMUM FLOW RATE OF 1.8 GALLONS PER MINUTE AT 60 PSI.

NOTE: WHERE COMPLYING FAUCETS ARE UNAVAILABLE, AERATORS OR OTHER MEANS MAY BE USED TO ACHIEVE REDUCTION.

4.303.2 SUBMETERS FOR MULTIFAMILY BUILDINGS AND DWELLING UNITS IN MIXED-USE RESIDENTIAL/COMMERCIAL BUILDINGS
SUBMETERS SHALL BE INSTALLED TO MEASURE WATER USAGE OF INDIVIDUAL RENTAL DWELLING UNITS IN ACCORDANCE WITH THE CALIFORNIA PLUMBING CODE.

4.303.2 SUBMETERS FOR MULTIFAMILY BUILDINGS AND DWELLING UNITS IN MIXED-USE RESIDENTIAL/COMMERCIAL BUILDINGS
SUBMETERS SHALL BE INSTALLED TO MEASURE WATER USAGE OF INDIVIDUAL RENTAL DWELLING UNITS IN ACCORDANCE WITH THE CALIFORNIA PLUMBING CODE.

4.303.3 STANDARDS FOR PLUMBING FIXTURES AND FITTINGS
PLUMBING FIXTURES AND FITTINGS SHALL BE INSTALLED IN ACCORDANCE WITH THE CALIFORNIA PLUMBING CODE, AND SHALL MEET THE APPLICABLE STANDARDS REFERENCED IN TABLE 1701.1 OF THE CALIFORNIA PLUMBING CODE.

NOTE:
THIS TABLE COMPILES THE DATA IN SECTION 4.303.1 AND IS INCLUDED AS A CONVENIENCE FOR THE USER.

TABLE - MAXIMUM FIXTURE WATER USE

FIXTURE TYPE	FLOW RATE
SHOWER HEADS (RESIDENTIAL)	1.8 GMP @ 80 PSI
LAVATORY FAUCETS (RESIDENTIAL)	MAX. 1.2 GPM @ 60 PSI MIN. 0.8 GPM @ 20 PSI
LAVATORY FAUCETS IN COMMON & PUBLIC USE AREAS	0.5 GPM @ 60 PSI
KITCHEN FAUCETS	1.8 GPM @ 60 PSI
METERING FAUCETS	0.2 GAL/CYCLE
WATER CLOSET	1.28 GAL/FLUSH
URINALS	0.125 GAL/FLUSH

4.304 OUTDOOR WATER USE

4.304.1 OUTDOOR POTABLE WATER USE IN LANDSCAPE AREAS
RESIDENTIAL DEVELOPMENTS SHALL COMPLY WITH A LOCAL WATER EFFICIENT LANDSCAPE ORDINANCE OR THE CURRENT CALIFORNIA DEPARTMENT OF WATER RESOURCES' MODEL WATER EFFICIENT LANDSCAPE ORDINANCE (MWELO), WHICHEVER IS MORE STRINGENT.
NOTES:

1. THE MODEL WATER EFFICIENT LANDSCAPE ORDINANCE (MWELO) IS LOCATED IN THE CALIFORNIA CODE OF REGULATIONS, TITLE 23, CHAPTER 2.7, DIVISION 2.

   MWELO AND SUPPORTING DOCUMENTS, INCLUDING A WATER BUDGET CALCULATOR, ARE AVAILABLE AT: HTTPS://WWW.WATER.CA.GOV/

DIVISION 4.4 MATERIAL CONSERVATION AND RESOURCE EFFICIENCY

4.406 ENHANCED DURABILITY AND REDUCED MAINTENANCE

4.406.1 RODENT PROOFING
ANNULAR SPACES AROUND PIPES, ELECTRIC CABLES, CONDUITS OR OTHER OPENINGS IN SOLE/BOTTOM PLATES AT EXTERIOR WALLS SHALL BE PROTECTED AGAINST THE PASSAGE OF RODENTS BY LCOSING SUCH OPENINGS WITH CEMENT MORTAR, CONCRETE MASONRY OR A SIMILAR METHOD ACCEPTABLE TO THE ENFORCING AGENCY.

4.408 CONSTRUCTION WASTE REDUCTION, DISPOSAL AND RECYCLING

4.408.1 CONSTRUCTION WASTE MANAGEMENT
RECYCLE AND/OR SALVAGE FOR REUSE A MINIMUM OF 65 PERCENT OF THE NONHAZARDOUS CONSTRUCTION AND DEMOLITION WASTE IN ACCORDANCE WITH EITHER SECTION 4.408.2, 4.408.3, OR 4.408.4, OR MEET A MORE STRINGENT LOCAL CONSTRUCTION AND DEMOLITION WASTE MANAGEMENT ORDINANCE.

EXCEPTIONS:

1. EXCAVATED SOIL AND LAND-CLEARING DEBRIS.
2. ALTERNATE WASTE REDUCTION METHODS DEVELOPED BY WORKING WITH LOCAL AGENCIES IF DIVERSION OR RECYCLE FACILITIES CAPABLE OF COMPLIANCE WITH THIS ITEM DO NOT EXIST OR ARE NOT LOCATED REASONABLY CLOSE TO THE JOBSITE.
3. THE ENFORCING AGENCY MAY MAKE ACCEPTIONS TO THE REQUIREMENTS OF THIS SECTION WHEN ISOLATED JOBSITES ARE LOCATED IN AREAS BEYOND THE HAUL BOUNDARIES OF THE DIVERSION FACILITY.

4.408.2 CONSTRUCTION WASTE MANAGEMENT PLAN
SUBMIT A CONSTRUCTION WASTE MANAGEMENT PLAN IN COMFORMANCE WITH ITEMS 1 THROUGH 5. THE CONSTRUCTION WASTE MANAGEMENT PLAN SHALL BE UPDATED AS NECESSARY AND SHALL BE AVAILABLE DURING CONSTRUCTION FOR EXAMINATION BY THE ENFORCING AGENCY.

1. IDENTIFY THE CONSTRUCTION AND DEMOLITION WASTE MATERIALS TO BE DIVERTED FROM DISPOSAL BY RECYCLING, REUSE ON THE PROJECT OR SALVAGE FOR FUTURE USE OR SALE.
2. SPECIFY IF CONSTRUCTION AND DEMOLITION WASTE MATERIALS WILL BE SORTED ON-SITE (SOURCE-SEPARATED) OR BULK MIXED (SINGLE STREAM).
3. IDENTIFY DIVERSION FACILITIES WHERE THE CONSTRUCTION AND DEMOLITION WASTE MATERIAL WILL BE TAKEN.
4. IDENTIFY CONSTRUCTION METHODS EMPLOYED TO REDUCE THE AMOUNT OF CONSTRUCTION AND DEMOLITION WASTE GENERATED.
5. SPECIFY THAT THE AMOUNT OF CONSTRUCTION AND DEMOLITION WASTE MATERIAL DIVERTED SHALL BE CALCULATED BY WEIGHT OR VOLUME, BUT NOT BY BOTH.

4.408.3 WASTE MANAGEMENT COMPANY.
UTILIZE A WASTE MANAGEMENT COMPANY, APPROVED BY THE ENFORCING AGENCY, WHICH CAN PROVIDE VERIFIABLE DOCUMENTATION THAT THE PERCENTAGE OF CONSTRUCTION AND DEMOLITION WASTE MATERIAL DIVERTED FROM THE LANDFILL COMPLIES WITH SECTION 4.408.1.
NOTE: THE OWNER OR CONTRACTOR MAY MAKE THE DETERMINATION IF THE CONSTRUCTION AND DEMOLITION WASTE MATERIALS WILL BE DIVERTED BY A WASTE MANAGEMENT COMPANY.

4.408.4 WASTE STREAM REDUCTION ALTERNATIVE [LR].
PROJECTS THAT GENERATE A TOTAL COMBINED WEIGHT OF CONSTRUCTION AND DEMOLITION WASTE DISPOSED OF IN LANDFILLS, WHICH DO NOT EXCEED 3.4 POUNDS PER SQUARE FOOT OF THE BUILDING AREA SHALL MEET THE MINIMUM 65 PERCENT CONSTRUCTION WASTE REDUCTION REQUIREMENT IN SECTION 4.408.1.

4.408.4.1 WASTE STREAM REDUCTION ALTERNATIVE.
PROJECTS THAT GENERATE A TOTAL COMBINED WEIGHT OF CONSTRUCTION AND DEMOLITION WASTE DISPOSED OF IN LANDFILLS, WHICH DO NOT EXCEED 2 POUNDS PER SQUARE FOOT OF THE BUILDING AREA, SHALL MEET THE MINIMUM 65-PERCENT CONSTRUCTION WASTE REDUCTION REQUIREMENT IN SECTION 4.408.1.

4.408.5 DOCUMENTATION
DOCUMENTATION SHALL BE PROVIDED TO THE ENFORCING AGENCY WHICH DEMONSTRATES COMPLIANCE WITH SECTION 4.408.2, ITEMS 1 THOUGH 5, SECTION 4.408.3 OR SECTION 4.408.4
NOTES:

1. SAMPLE FORMS FOUND IN "A GUIDE TO THE CALIFORNIA GREEN BUILDING STANDARDS CODE (RESIDENTIAL)" LOCATED AT WWW.HCD.CA.GOV/CALGREEN.HTML MAY BE USED TO ASSIST IN DOCUMENTING COMPLIANCE WITH THIS SECTION.
2. MIXED CONSTRUCTION AND DEMOLITION DEBRIS (C&D) PROCESSORS CAN BE LOCATED AT THE CALIFORNIA DEPARTMENT OF RESOURCES RECYCLING AND RECOVERY (CALRECYCLE).

MONO
COUNTY

MONO COUNTY ADU PROTOTYPES
MONO COUNTY

CAL GREEN RESIDENTIAL
REQUIREMENTS

PUBLIC SET

DATE
01/10/2024

SHEET
G-201

2022 CALIFORNIA GREEN BUILDING STANDARDS CODE

RESIDENTIAL MANDATORY MEASURES (SHEET 2)

4.410 BUILDING MAINTENANCE AND OPERATION

4.410.1 OPERATION AND MAINTENANCE MANUAL

AT THE TIME OF FINAL INSPECTION, A MANUAL, COMPACT DISC, WEB-BASED REFERENCE OR OTHER MEDIA ACCEPTABLE TO THE ENFORCING AGENCY WHICH INCLUDES ALL OF THE FOLLOWING SHALL BE PLACED IN THE BUILDING:

1. DIRECTIONS TO THE OWNER OR OCCUPANT THAT THE MANUAL SHALL REMAIN WITH THE BUILDING THROUGHOUT THE LIFE CYCLE OF THE STRUCTURE.
2. OPERATION AND MAINTENANCE INSTRUCTIONS FOR THE FOLLOWING:
   a. EQUIPMENT AND APPLIANCES, INCLUDING WATER-SAVING DEVICES AND SYSTEMS, HVAC SYSTEMS, PHOTOVOLTAIC SYSTEMS, ELECTRIC VEHICLE CHARGERS, WATER-HEATING SYSTEMS AND OTHER MAJOR APPLIANCES AND EQUIPMENT.
   b. ROOF AND YARD DRAINAGE, INCLUDING GUTTERS AND DOWNSPOUTS.
   c. SPACE CONDITIONING SYSTEMS, INCLUDING CONDENSERS AND AIR FILTERS.
   d. LANDSCAPE IRRIGATION SYSTEMS.
   e. WATER REUSE SYSTEMS.
3. INFORMATION FROM LOCAL UTILITY, WATER AND WASTE RECOVERY PROVIDERS ON METHODS TO FURTHER REDUCE RESOURCE CONSUMPTION, INCLUDING RECYCLE PROGRAMS AND LOCATIONS.
4. PUBLIC TRANSPORTATION AND/OR CARPOOL OPTIONS AVAILABLE IN THE AREA.
5. EDUCATIONAL MATERIAL ON THE POSITIVE IMPACTS OF AN INTERIOR RELATIVE HUMIDITY BETWEEN 30–60 PERCENT AND WHAT METHODS AN OCCUPANT MAY USE TO MAINTAIN THE RELATIVE HUMIDITY LEVEL IN THAT RANGE.
6. INFORMATION ABOUT WATER-CONSERVING LANDSCAPE AND IRRIGATION DESIGN AND CONTROLLERS WHICH CONSERVE WATER.
7. INSTRUCTIONS FOR MAINTAINING GUTTERS AND DOWNSPOUTS AND THE IMPORTANCE OF DIVERTING WATER AT LEAST 5 FEET AWAY FROM THE FOUNDATION.
8. INFORMATION ON REQUIRED ROUTINE MAINTENANCE MEASURES, INCLUDING, BUT NOT LIMITED TO, CAULKING, PAINTING, GRADING AROUND THE BUILDING, ETC.
9. INFORMATION ABOUT STATE SOLAR ENERGY AND INCENTIVE PROGRAMS AVAILABLE.
10. A COPY OF ALL SPECIAL INSPECTION VERIFICATIONS REQUIRED BY THE ENFORCING AGENCY OR THIS CODE.
11. INFORMATION FROM CAL FIRE ON MAINTENANCE OF DEFENSIBLE SPACE AROUND RESIDENTIAL STRUCTURES.
12. INFORMATION AND/OR DRAWINGS IDENTIFYING THE LOCATION OF GRAB BAR REINFORCEMENTS.

4.410.2 RECYCLING BY OCCUPANTS.

WHERE 5 OR MORE MULTIFAMILY DWELLING UNITS ARE CONSTRUCTED ON A BUILDING SITE, PROVIDE READILY ACCESSIBLE AREA(S) THAT SERVES ALL BUILDINGS ON THE SITE AND IS IDENTIFIED FOR THE DEPOSITING, STORAGE AND COLLECTION OF NON-HAZARDOUS MATERIALS FOR RECYCLING, INCLUDING (AT A MINIMUM) PAPER, CORRUGATED CARDBOARD, GLASS, PLASTICS, ORGANIC WASTE, AND METALS, OR MEEL A LAWFULLY ENACTED LOCAL RECYCLING ORDINANCE, IF MORE RESTRICTIVE.

EXCEPTION:
RURAL JURISDICTIONS THAT MEET AND APPLY FOR THE EXEMPTION IN PUBLIC RESOURCES CODE SECTION 42649.82 (A)(2)(A) ET SEQ. ARE NOT REQUIRED TO COMPLY WITH THE ORGANIC WASTE PORTION OF THIS SECTION.

DIVISION 4.5 ENVIRONMENTAL QUALITY

4.501 GENERAL

4.501.1 SCOPE

THE PROVISIONS OF THIS CHAPTER SHALL OUTLINE MEANS OF REDUCING THE QUANTITY OF AIR CONTAMINANTS THAT ARE ODOROUS, IRRITATING AND/OR HARMFUL TO THE COMFORT AND WELL-BEING OF A BUILDING'S INSTALLERS, OCCUPANTS AND NEIGHBORS.

4.503 FIREPLACES

4.503.1 GENERAL

ANY INSTALLED GAS FIREPLACE SHALL BE A DIRECT-VENT SEALED-COMBUSTION TYPE. ANY INSTALLED WOODSTOVE OR PELLET STOVE SHALL COMPLY WITH U.S. EPA NEW SOURCE PERFORMANCE STANDARDS (NSPS) EMISSION LIMITS AS APPLICABLE, AND SHALL HAVE A PERMANENT LABEL INDICATING THEY ARE CERTIFIED TO MEET THE EMISSION LIMITS. WOODSTOVES, PELLET STOVES AND FIREPLACES SHALL ALSO COMPLY WITH APPLICABLE LOCAL ORDINANCES.

4.504 POLLUTANT CONTROL

4.504.1 COVERING OF DUCT OPENINGS AND PROTECTION OF MECHANICAL EQUIPMENT DURING CONSTRUCTION

AT THE TIME OF ROUGH INSTALLATION, DURING STORAGE ON THE CONSTRUCTION SITE AND UNTIL FINAL STARTUP OF THE HEATING, COOLING AND VENTILATING EQUIPMENT, ALL DUCT AND OTHER RELATED AIR DISTRIBUTION COMPONENT OPENINGS SHALL BE COVERED WITH TAPE, PLASTIC, SHEETMETAL OR OTHER METHODS ACCEPTABLE TO THE ENFORCING AGENCY TO REDUCE THE AMOUNT OF WATER, DUST AND DEBRIS, WHICH MAY ENTER THE SYSTEM.

4.504.2 FINISH MATERIAL POLLUTANT CONTROL

FINISH MATERIALS SHALL COMPLY WITH THIS SECTION.

4.504.2.1 ADHESIVES, SEALANTS AND CAULKS

ADHESIVES, SEALANTS AND CAULKS USED ON THE PROJECT SHALL MEET THE REQUIREMENTS OF THE FOLLOWING STANDARDS UNLESS MORE STRINGENT LOCAL OR REGIONAL AIR POLLUTION OR AIR QUALITY MANAGEMENT DISTRICT RULES APPLY:

1. ADHESIVES, ADHESIVE BONDING PRIMERS, ADHESIVE PRIMERS, SEALANTS, SEALANT PRIMERS, AND CAULKS SHALL COMPLY WITH LOCAL OR REGIONAL AIR POLLUTION CONTROL OR AIR QUALITY MANAGEMENT DISTRICT RULES WHERE APPLICABLE OR SCAQMD RULE 1168 VOC LIMITS, AS SHOWN IN TABLE 4.504.1 OR 4.504.2, AS APPLICABLE. SUCH PRODUCTS ALSO SHALL COMPLY WITH THE RULE 1168 PROHIBITION ON THE USE OF CERTAIN TOXIC COMPOUNDS (CHLOROFORM, ETHYLENE DICHLORIDE, METHYLENE CHLORIDE, PERCHLOROETHYLENE AND TRICHLOROETHYLENE), EXCEPT FOR AEROSOL PRODUCTS, AS SPECIFIED IN SUBSECTION 2 BELOW.
2. AEROSOL ADHESIVES, AND SMALLER UNIT SIZES OF ADHESIVES, AND SEALANT OR CAULKING COMPOUNDS (IN UNITS OF PRODUCT, LESS PACKAGING, WHICH DO NOT WEIGH MORE THAN 1 POUND AND DO NOT CONSIST OF MORE THAN 16 FLUID OUNCES) SHALL COMPLY WITH STATEWIDE VOC STANDARDS AND OTHER REQUIREMENTS, INCLUDING PROHIBITIONS ON USE OF CERTAIN TOXIC COMPOUNDS, OF CALIFORNIA CODE OF REGULATIONS, TITLE 17, COMMENCING WITH SECTION 94507.

4.504.2.2 PAINTS AND COATINGS

ARCHITECTURAL PAINTS AND COATINGS SHALL COMPLY WITH VOC LIMITS IN TABLE 1 OF THE ARB ARCHITECTURAL SUGGESTED CONTROL MEASURE, AS SHOWN IN TABLE 4.504.3, UNLESS MORE STRINGENT LOCAL LIMITS APPLY. THE VOC CONTENT LIMIT FOR COATINGS THAT DO NOT MEET THE DEFINITIONS FOR THE SPECIALTY COATINGS CATEGORIES LISTED IN TABLE 4.504.3 SHALL BE DETERMINED BY CLASSIFYING THE COATING AS A FLAT, NONFLAT OR NONFLAT-HIGH GLOSS COATING, BASED ON ITS GLOSS, AS DEFINED IN SUBSECTIONS 4.21, 4.36, AND 4.37 OF THE 2007 CALIFORNIA AIR RESOURCES BOARD, SUGGESTED CONTROL MEASURE, AND THE CORRESPONDING FLAT, NONFLAT OR NONFLAT-HIGH GLOSS VOC LIMIT IN TABLE 4.504.3 SHALL APPLY.

4.504.2.3 AEROSOL PAINTS AND COATINGS

AEROSOL PAINTS AND COATINGS SHALL MEET THE PRODUCT-WEIGHTED MIR LIMITS FOR ROC IN SECTION 94522(A)(2) AND OTHER REQUIREMENTS, INCLUDING PROHIBITIONS ON USE OF CERTAIN TOXIC COMPOUNDS AND OZONE DEPLETING SUBSTANCES, IN SECTIONS 94522(E)(1) AND (F)(1) OF CALIFORNIA CODE OF REGULATIONS, TITLE 17, COMMENCING WITH SECTION 94520; AND IN AREAS UNDER THE JURISDICTION OF THE BAY AREA AIR QUALITY MANAGEMENT DISTRICT ADDITIONALLY COMPLY WITH THE PERCENT VOC BY WEIGHT OF PRODUCT LIMITS OF REGULATION 8, RULE 49.

4.504.2.4 VERIFICATION

VERIFICATION OF COMPLIANCE WITH THIS SECTION SHALL BE PROVIDED AT THE REQUEST OF THE ENFORCING AGENCY. DOCUMENTATION MAY INCLUDE, BUT IS NOT LIMITED TO, THE FOLLOWING:

1. MANUFACTURER'S PRODUCT SPECIFICATION.
2. FIELD VERIFICATION OF ON-SITE PRODUCT CONTAINERS.

4.504.3 CARPET SYSTEMS

4.504.3.1 CARPET CUSHION

ALL CARPET CUSHION INSTALLED IN THE BUILDING INTERIOR SHALL MEET THE REQUIREMENTS OF THE CALIFORNIA DEPARTMENT OF PUBLIC HEALTH, "STANDARD METHOD FOR THE TESTING AND EVALUATION OF VOLATILE ORGANIC CHEMICAL EMISSIONS FROM INDOOR SOURCES USING ENVIRONMENTAL CHAMBERS," VERSION 1.2, JANUARY 2017 (EMISSION TESTING METHOD FOR CALIFORNIA SPECIFICATION 01350).

SEE CALIFORNIA DEPARTMENT OF PUBLIC HEALTH'S WEBSITE FOR CERTIFICATION PROGRAMS AND TESTING LABS.

HTTPS://WWW.CDPH.CA.GOV/PROGRAMS/CCDPHP/DEODC/EHLB/IAQ/PAGES/VOC.ASPX

4.504.3.2 CARPET ADHESIVE

ALL CARPET ADHESIVE SHALL MEET THE REQUIREMENTS OF TABLE 4.504.1.

4.504.4 RESILIENT FLOORING SYSTEMS

WHERE RESILIENT FLOORING IS INSTALLED, AT LEAST 80 PERCENT OF FLOOR AREA RECEIVING RESILIENT FLOORING SHALL MEET THE REQUIREMENTS OF THE CALIFORNIA DEPARTMENT OF PUBLIC HEALTH, "STANDARD METHOD FOR THE TESTING AND EVALUATION OF VOLATILE ORGANIC CHEMICAL EMISSIONS FROM INDOOR SOURCES USING ENVIRONMENTAL CHAMBERS," VERSION 1.2, JANUARY 2017 (EMISSION TESTING METHOD FOR CALIFORNIA SPECIFICATION 01350).

SEE CALIFORNIA DEPARTMENT OF PUBLIC HEALTH'S WEBSITE FOR CERTIFICATION PROGRAMS AND TESTING LABS.

HTTPS://WWW.CDPH.CA.GOV/PROGRAMS/CCDPHP/DEODC/EHLB/IAQ/PAGES/VOC.ASPX

4.504.5 COMPOSITE WOOD PRODUCTS

HARDWOOD PLYWOOD, PARTICLEBOARD AND MEDIUM DENSITY FIBERBOARD COMPOSITE WOOD PRODUCTS USED ON THE INTERIOR OR EXTERIOR OF THE BUILDING SHALL MEET THE REQUIREMENTS FOR FORMALDEHYDE AS SPECIFIED IN ARB'S AIR TOXICS CONTROL MEASURE FOR COMPOSITE WOOD (17 CCR 93120 ET SEQ.) AS SHOWN IN TABLE 4.504.5.

4.504.5.1 DOCUMENTATION

VERIFICATION OF COMPLIANCE WITH THIS SECTION SHALL BE PROVIDED AS REQUESTED BY THE ENFORCING AGENCY. DOCUMENTATION SHALL INCLUDE AT LEAST ONE OF THE FOLLOWING:

1. PRODUCT CERTIFICATIONS AND SPECIFICATIONS.
2. CHAIN OF CUSTODY CERTIFICATIONS.
3. PRODUCT LABELED AND INVOICED AS MEETING THE COMPOSITE WOOD PRODUCTS REGULATION (SEE CCR, TITLE 17, SECTION 93120, ET SEQ.).
4. EXTERIOR GRADE PRODUCTS MARKED AS MEETING THE PS-1 OR PS-2 STANDARDS OF THE ENGINEERED WOOD ASSOCIATION, THE AUSTRALIAN AS/NZS 2269, EUROPEAN 636 3S, AND CANADIAN CSA O121, CSA O151, CSA O153 AND CSA O325 STANDARDS.
5. OTHER METHODS ACCEPTABLE TO THE ENFORCING AGENCY.

TABLE 4.504.1 - ADHESIVE VOC LIMIT
(LESS WATER AND LESS EXEMPT COMPOUNDS IN GRAMS PER LITER)

ARCHITECTURAL APPLICATIONS	CURRENT VOC LIMIT
INDOOR CARPET ADHESIVES	50
CARPET PAD ADHESIVES	50
OUTDOOR CARPET ADHESIVES	150
WOOD FLOORING ADHESIVES	100
RUBBER FLOORING ADHESIVES	60
SUBFLOOR ADHESIVES	50
CERAMIC TILE ADHESIVES	65
VCT AND ASPHALT TILE ADHESIVES	50
DRYWALL AND PANEL ADHESIVES	50
COVE BASE ADHESIVES	50
MULTIPURPOSE CONSTRUCTION ADHESIVES	70
STRUCTURAL GLAZING ADHESIVES	100
SINGLE-PLY ROOF MEMBRANE ADHESIVES	250
OTHER ADHESIVES NOT SPECIFICALLY LISTED	50
SPECIALTY APPLICATIONS	**CURRENT VOC LIMIT**
PVC WELDING	510
CPVC WELDING	490
ABD WELDING	325
PLASTIC CEMENT WELDING	250
ADHESIVE PRIMER FOR PLASTIC	550
CONTACT ADHESIVE	80
SPECIAL PURPOSE CONTACT ADHESIVE	250
STRUCTURAL WOOD MEMBER ADHESIVE	140
TOP AND TRIM ADHESIVES	250
SUBSTRATE SPECIFIC APPLICATIONS	**CURRENT VOC LIMIT**
METAL TO METAL	30
PLASTIC FOAMS	50
POROUS MATERIAL (EXCEPT WOOD)	50
WOOD	30
FIBERGLASS	80

1. IF AN ADHESIVE IS USED TO BOND DISSIMILAR SUBSTRATES TOGETHER, THE ADHESIVE WITH THE HIGHEST VOC CONTENT SHALL BE ALLOWED.
2. FOR ADDITIONAL INFORMATION REGARDING METHODS TO MEASURE THE VOC CONTENT SPECIFIED IN THIS TABLE, SEE SOUTH COAST AIR QUALITY MANAGEMENT DISTRICT RULE 1168.

TABLE 4.504.2 - SEALANT VOC LIMIT
(LESS WATER AND LESS EXEMPT COMPOUNDS IN GRAMS PER LITER)

SEALANTS	CURRENT VOC LIMIT
ARCHITECTURAL	250
MARINE DECK	760
NONMEMBRANE ROOF	300
ROADWAY	250
SINGLE-PLY ROOF MEMBRANE	450
OTHER	420
SEALANT PRIMERS	**CURRENT VOC LIMIT**
ARCHITECTURAL NONPOROUS	250
POROUS	250
MODIFIED BITUMINOUS	500
MARINE DECK	760
OTHER	750

TABLE 4.504.3 - VOC CONTENT LIMITS FOR ARCHITECTURAL COATINGS[2, 3]
(GRAMS OF VOC PER LITER OF COATING, LESS WATER AND LESS EXEMPT COMPOUNDS)

COATING CATEGORY	CURRENT VOC LIMIT
FLAT COATINGS	50
NONFLAT COATINGS	100
NONFLAT-HIGH GLOSS COATINGS	150
SPECIALTY COATINGS	**CURRENT VOC LIMIT**
ALUMINUM ROOF COATINGS	400
BASEMENT SPECIALTY COATINGS	400
BITUMINOUS ROOF COATINGS	50
BITUMINOUS ROOF PRIMERS	350
BOND BREAKERS	350
CONCRETE CURING COMPOUNDS	350
CONCRETE/MASONRY SEALERS	100
DRIVEWAY SEALERS	50
DRY FOG COATINGS	150
FAUX FINISHING COATINGS	350
FIRE RESISTIVE COATINGS	350
FLOOR COATINGS	100
FORM-RELEASE COMPOUNDS	250
GRAPHIC ARTS COATINGS (SIGN PAINTS)	500
HIGH TEMPERATURE COATINGS	420
IDUSTRIAL MAINTENANCE COATINGS	250
LOW SOLIDS COATINGS[1]	120
MAGNESITE CEMENT COATINGS	450
MASTIC TEXTURE COATINGS	100
METALLIC PIGMENTED COATINGS	500
MULTICOLOR COATINGS	250
PRETREATMENT WASH PRIMERS	420
PRIMERS, SEALERS, AND UNDERCOATERS	100
REACTIVE PENETRATING SEALERS	350
RECYCLED COATINGS	250
ROOF COATINGS	50
RUST PREVENTATIVE COATINGS	250
SHELLACS	
CLEAR	730
OPAQUE	550
SPECIALTY PRIMERS, SEALERS AND UNDERCOATERS	100
STAINS	250
STONE CONSOLIDANTS	450
SWIMMING POOL COATINGS	340
TRAFFIC MARKING COATINGS	100
TUB AND TILE REFINISH COATINGS	420
WATERPROOFING MEMBRANES	250
WOOD COATINGS	275
WOOD PRESERVATIVES	350
ZINC-RICH PRIMERS	340

1. GRAMS OF VOC PER LITER OF COATING, INCLUDING WATER AND INCLUDING EXEMPT COMPOUNDS.
2. THE SPECIFIED LIMITS REMAIN IN EFFECT ENLESS REVISED LIMITS ARE LISTED IN SUBSEQUENT COLUMNS IN THE TABLE
3. VALUES IN THIS TABLE ARE DERIVED FROM THOSE SPECIFIED BY THE CALIFORNIA AIR RESOURCES BOARD, ARCHITECTURAL COATINGS SUGGESTED CONTROL MEASURE, FEBUARY 1, 2008. MORE INFORMATION IS AVAILABLE FROM THE AIR RESOURCES BOARD.

TABLE 4.504.5 - FORMALDEHYDE LIMITS[1]
(MAXIMUM FORMALDEHYDE EMISSIONS IN PARTS PER MILLION)

PRODUCT	CURRENT LIMIT
HARDWOOD PLYWOOD VENEER CORE	0.05
HARDWOOD PLYWOOD COMPOSITE CORE	0.05
PARTICLEBOARD	0.09
MEDIUM DENSITY FIBERBOARD	0.11
THIN MEDIUM DENSITY FIBERBOARD[2]	0.13

1. VALUES IN THIS TABLE ARE DERIVED FROM THOSE SPECIFIED BY THE CALIFORNIA AIR RESOURCES BOARD, AIR TOXICS CONTROL MEASURE FOR COMPOSITE WOOD AS TESTED IN ACCORDANCE WITH ASTM E1333. FOR ADDITIONAL INFORMATION, SEE CALIFORNIA CODE OF REGULATIONS, TITLE 17, SECTIONS 93120 THROUGH 93120.12.
2. THIN MEDIUM DENSITY FIBERBOARD HAS A MAXIMUM THICKNESS OF 5/16 INCH (8MM).

DIVISION 4.5 ENVIORNMENTAL QUALITY CONTINUED

4.505 INTERIOR MOISTURE CONTROL

4.505.1 GENERAL

BUILDINGS SHALL MEET OR EXCEED THE PROVISIONS OF THE CALIFORNIA BUILDING STANDARDS CODE.

4.505.2 CONCRETE SLAB FOUNDATIONS

CONCRETE SLAB FOUNDATIONS REQUIRED TO HAVE A VAPOR RETARDER BY THE CALIFORNIA BUILDING CODE CHAPTER 19 OR CONCRETE SLAB-ON-GROUND FLOORS REQUIRED TO HAVE A VAPOR RETARDER BY THE CALIFORNIA RESIDENTIAL CODE, CHAPTER 5, SHALL ALSO COMPLY WITH THIS SECTION.

4.505.2.1 CAPILLARY BREAK

A CAPILLARY BREAK SHALL BE INSTALLED IN COMPLIANCE WITH AT LEAST ONE OF THE FOLLOWING:

1. A 4-INCH-THICK (101.6 MM) BASE OF 1/2 INCH (12.7 MM) OR LARGER CLEAN AGGREGATE SHALL BE PROVIDED WITH A VAPOR RETARDER IN DIRECT CONTACT WITH CONCRETE AND A CONCRETE MIX DESIGN, WHICH WILL ADDRESS BLEEDING, SHRINKAGE, AND CURLING, SHALL BE USED. FOR ADDITIONAL INFORMATION, SEE AMERICAN CONCRETE INSTITUTE, ACI 302.2R-06.
2. OTHER EQUIVALENT METHODS APPROVED BY THE ENFORCING AGENCY.
3. A SLAB DESIGN SPECIFIED BY A LICENSED DESIGN PROFESSIONAL.

4.505.3 MOISTURE CONTENT OF A BUILDING

BUILDING MATERIALS WITH VISIBLE SIGNS OF WATER DAMAGE SHALL NOT BE INSTALLED. WALL AND FLOOR FRAMING SHALL NOT BE ENCLOSED WHEN THE FRAMING MEMBERS EXCEED 19-PERCENT MOISTURE CONTENT. MOISTURE CONTENT SHALL BE VERIFIED IN COMPLIANCE WITH THE FOLLOWING:

1. MOISTURE CONTENT SHALL BE DETERMINED WITH EITHER A PROBE-TYPE OR CONTACT-TYPE MOISTURE METER. EQUIVALENT MOISTURE VERIFICATION METHODS MAY BE APPROVED BY THE ENFORCING AGENCY AND SHALL SATISFY REQUIREMENTS FOUND IN SECTION 101.8 OF THIS CODE.
2. MOISTURE READINGS SHALL BE TAKEN AT A POINT 2 FEET (610 MM) TO 4 FEET (1219 MM) FROM THE GRADE STAMPED END OF EACH PIECE TO BE VERIFIED.
3. AT LEAST THREE RANDOM MOISTURE READINGS SHALL BE PERFORMED ON WALL AND FLOOR FRAMING WITH DOCUMENTATION ACCEPTABLE TO THE ENFORCING AGENCY PROVIDED AT THE TIME OF APPROVAL TO ENCLOSE THE WALL AND FLOOR FRAMING.

INSULATION PRODUCTS WHICH ARE VISIBLY WET OR HAVE A HIGH MOISTURE CONTENT SHALL BE REPLACED OR ALLOWED TO DRY PRIOR TO ENCLOSURE IN WALL OR FLOOR CAVITIES. WET-APPLIED INSULATION PRODUCTS SHALL FOLLOW THE MANUFACTURERS' DRYING RECOMMENDATIONS PRIOR TO ENCLOSURE.

4.506 INDOOR AIR QUALITY AND EXHAUST

4.506.1 BATHROOM EXHAUST FANS

EACH BATHROOM SHALL BE MECHANICALLY VENTILATED AND SHALL COMPLY WITH THE FOLLOWING:

1. FANS SHALL BE ENERGY STAR COMPLIANT AND BE DUCTED TO TERMINATE OUTSIDE THE BUILDING.
2. UNLESS FUNCTIONING AS A COMPONENT OF A WHOLE HOUSE VENTILATION SYSTEM, FANS MUST BE CONTROLLED BY A HUMIDITY CONTROL.
   a. HUMIDITY CONTROLS SHALL BE CAPABLE OF ADJUSTMENT BETWEEN A RELATIVE HUMIDITY RANGE OF ≤ 50 PERCENT TO A MAXIMUM OF 80 PERCENT. A HUMIDITY CONTROL MAY UTILIZE MANUAL OR AUTOMATIC MEANS OF ADJUSTMENT.
   b. A HUMIDITY CONTROL MAY BE A SEPARATE COMPONENT TO THE EXHAUST FAN AND IS NOT REQUIRED TO BE INTEGRAL (I.E., BUILT-IN).

NOTES:

1. FOR THE PURPOSES OF THIS SECTION, A BATHROOM IS A ROOM WHICH CONTAINS A BATHTUB, SHOWER, OR TUB/ SHOWER COMBINATION.
2. LIGHTING INTEGRAL TO BATHROOM EXHAUST FANS SHALL COMPLY WITH THE CALIFORNIA ENERGY CODE.

4.507 ENVIROMENTAL COMFORT

4.507.1 RESERVED

4.507.2 HEATING AND AIR-CONDITIONING SYSTEM DESIGN

HEATING AND AIR-CONDITIONING SYSTEMS SHALL BE SIZED, DESIGNED AND HAVE THEIR EQUIPMENT SELECTED USING THE FOLLOWING METHODS:

1. THE HEAT LOSS AND HEAT GAIN IS ESTABLISHED ACCORDING TO ANSI/ACCA 2 MANUAL J—2016 (RESIDENTIAL LOAD CALCULATION), ASHRAE HANDBOOKS OR OTHER EQUIVALENT DESIGN SOFTWARE OR METHODS.
2. DUCT SYSTEMS ARE SIZED ACCORDING TO ANSI/ACCA 1 MANUAL D—2016 (RESIDENTIAL DUCT SYSTEMS), ASHRAE HANDBOOKS OR OTHER EQUIVALENT DESIGN SOFTWARE OR METHODS.
3. SELECT HEATING AND COOLING EQUIPMENT ACCORDING TO ANSI/ACCA 3 MANUAL S—2016 (RESIDENTIAL EQUIPMENT SELECTION) OR OTHER EQUIVALENT DESIGN SOFTWARE OR METHODS.

EXCEPTION: USE OF ALTERNATE DESIGN TEMPERATURES NECESSARY TO ENSURE THE SYSTEMS FUNCTION ARE ACCEPTABLE.

CHAPTER 7 - INSTALLER & SPECIAL INSPECTOR QUALIFICATIONS

702 QUALIFICATIONS

702.1 INSTALLER TRAINING

HVAC SYSTEM INSTALLERS SHALL BE TRAINED AND CERTIFIED IN THE PROPER INSTALLATION OF HVAC SYSTEMS INCLUDING DUCTS AND EQUIPMENT BY A NATIONALLY OR REGIONALLY RECOGNIZED TRAINING OR CERTIFICATION PROGRAM. UNCERTIFIED PERSONS MAY PERFORM HVAC INSTALLATIONS WHEN UNDER THE DIRECT SUPERVISION AND RESPONSIBILITY OF A PERSON TRAINED AND CERTIFIED TO INSTALL HVAC SYSTEMS OR CONTRACTOR LICENSED TO INSTALL HVAC SYSTEMS. EXAMPLES OF ACCEPTABLE HVAC TRAINING AND CERTIFICATION PROGRAMS INCLUDE BUT ARE NOT LIMITED TO THE FOLLOWING:

1. STATE CERTIFIED APPRENTICESHIP PROGRAMS.
2. PUBLIC UTILITY TRAINING PROGRAMS.
3. TRAINING PROGRAMS SPONSORED BY TRADE, LABOR OR STATEWIDE ENERGY CONSULTING OR VERIFICATION ORGANIZATIONS.
4. PROGRAMS SPONSORED BY MANUFACTURING ORGANIZATIONS.
5. OTHER PROGRAMS ACCEPTABLE TO THE ENFORCING AGENCY.

702.2 SPECIAL INSPECTION [HCD]

WHEN REQUIRED BY THE ENFORCING AGENCY, THE OWNER OR THE RESPONSIBLE ENTITY ACTING AS THE OWNER'S AGENT SHALL EMPLOY ONE OR MORE SPECIAL INSPECTORS TO PROVIDE INSPECTION OR OTHER DUTIES NECESSARY TO SUBSTANTIATE COMPLIANCE WITH THIS CODE. SPECIAL INSPECTORS SHALL DEMONSTRATE COMPETENCE TO THE SATISFACTION OF THE ENFORCING AGENCY FOR THE PARTICULAR TYPE OF INSPECTION OR TASK TO BE PERFORMED. IN ADDITION TO OTHER CERTIFICATIONS OR QUALIFICATIONS ACCEPTABLE TO THE ENFORCING AGENCY, THE FOLLOWING CERTIFICATIONS OR EDUCATION MAY BE CONSIDERED BY THE ENFORCING AGENCY WHEN EVALUATING THE QUALIFICATIONS OF A SPECIAL INSPECTOR:

1. CERTIFICATION BY A NATIONAL OR REGIONAL GREEN BUILDING PROGRAM OR STANDARD PUBLISHER.
2. CERTIFICATION BY A STATEWIDE ENERGY CONSULTING OR VERIFICATION ORGANIZATION, SUCH AS HERS RATERS, BUILDING PERFORMANCE CONTRACTORS, AND HOME ENERGY AUDITORS.
3. SUCCESSFUL COMPLETION OF A THIRD PARTY APPRENTICE TRAINING PROGRAM IN THE APPROPRIATE TRADE.
4. OTHER PROGRAMS ACCEPTABLE TO THE ENFORCING AGENCY.

NOTES:

1. SPECIAL INSPECTORS SHALL BE INDEPENDENT ENTITIES WITH NO FINANCIAL INTEREST IN THE MATERIALS OR THE PROJECT THEY ARE INSPECTING FOR COMPLIANCE WITH THIS CODE.
2. HERS RATERS ARE SPECIAL INSPECTORS CERTIFIED BY THE CALIFORNIA ENERGY COMMISSION (CEC) TO RATE HOMES IN CALIFORNIA ACCORDING TO THE HOME ENERGY RATING SYSTEM (HERS).

[BSC] WHEN REQUIRED BY THE ENFORCING AGENCY, THE OWNER OR THE RESPONSIBLE ENTITY ACTING AS THE OWNER'S AGENT SHALL EMPLOY ONE OR MORE SPECIAL INSPECTORS TO PROVIDE INSPECTION OR OTHER DUTIES NECESSARY TO SUBSTANTIATE COMPLIANCE WITH THIS CODE. SPECIAL INSPECTORS SHALL DEMONSTRATE COMPETENCE TO THE SATISFACTION OF THE ENFORCING AGENCY FOR THE PARTICULAR TYPE OF INSPECTION OR TASK TO BE PERFORMED. IN ADDITION, THE SPECIAL INSPECTOR SHALL HAVE A CERTIFICATION FROM A RECOGNIZED STATE, NATIONAL OR INTERNATIONAL ASSOCIATION, AS DETERMINED BY THE LOCAL AGENCY. THE AREA OF CERTIFICATION SHALL BE CLOSELY RELATED TO THE PRIMARY JOB FUNCTION, AS DETERMINED BY THE LOCAL AGENCY.

NOTE:
SPECIAL INSPECTORS SHALL BE INDEPENDENT ENTITIES WITH NO FINANCIAL INTEREST IN THE MATERIALS OR THE PROJECT THEY ARE INSPECTING FOR COMPLIANCE WITH THIS CODE.

703 VERIFICATIONS

703.1 DOCUMENTATION.

DOCUMENTATION USED TO SHOW COMPLIANCE WITH THIS CODE SHALL INCLUDE BUT IS NOT LIMITED TO, CONSTRUCTION DOCUMENTS, PLANS, SPECIFICATIONS, BUILDER OR INSTALLER CERTIFICATION, INSPECTION REPORTS, OR OTHER METHODS ACCEPTABLE TO THE ENFORCING AGENCY WHICH DEMONSTRATE SUBSTANTIAL CONFORMANCE. WHEN SPECIFIC DOCUMENTATION OR SPECIAL INSPECTION IS NECESSARY TO VERIFY COMPLIANCE, THAT METHOD OF COMPLIANCE WILL BE SPECIFIED IN THE APPROPRIATE SECTION OR IDENTIFIED APPLICABLE CHECKLIST.

MONO COUNTY

MONO COUNTY ADU PROTOTYPES
MONO COUNTY
CAL GREEN RESIDENTIAL REQUIREMENTS

PUBLIC SET

DATE
01/10/2024

SHEET
G-202

1/25/2024 4:06:53 PM
Autodesk Docs://2340-04_Mono County ADUs - Code Updates/2340-01_Mono County ADUs_2022 Code Update.rvt

BUILDING ENERGY ANALYSIS REPORT

PROJECT:
Mono County ADU (Plan 5)
Mono County, CA

Project Designer:
RRM Design Group
3765 South Higuera St. Suite 102
San Luis Obispo, CA 93401
(805) 543-1794

Report Prepared by:
Timothy Carstairs, CEA, HERS, GPR
Carstairs Energy Inc.
2238 Bayview Heights Drive, Suite E
Los Osos, CA 93402
805-904-9048

Job Number:
23-110715

Date:
11/8/2023

The EnergyPro computer program has been used to perform the calculations summarized in this compliance report. This program has approval and is authorized by the California Energy Commission for use with the Nonresidential 2022 Building Energy Efficiency Standards.

This program developed by EnergySoft, LLC - www.energysoft.com.

TABLE OF CONTENTS

CERTIFICATE OF COMPLIANCE - RESIDENTIAL PERFORMANCE COMPLIANCE METHOD — **CF1R-PRF-01E**

Project Name: Mono County ADU (Plan 5) — **Calculation Date/Time:** 2023-11-07T14:22:25-08:00 — **(Page 1 of 12)**

Calculation Description: Title 24 Analysis — **Input File Name:** Mono County ADU (Plan 5) 2022.ribd22x

GENERAL INFORMATION					
01	Project Name	Mono County ADU (Plan 5)			
02	Run Title	Title 24 Analysis			
03	Project Location	_			
04	City	Mono County	05	Standards Version	2022
06	Zip code		07	Software Version	EnergyPro 9.2
08	Climate Zone	16	09	Front Orientation (deg/ Cardinal)	All orientations
10	Building Type	Single family	11	Number of Dwelling Units	1
12	Project Scope	Newly Constructed	13	Number of Bedrooms	2
14	Addition Cond. Floor Area (ft²)	0	15	Number of Stories	1
16	Existing Cond. Floor Area (ft²)	n/a	17	Fenestration Average U-factor	0.3
18	Total Cond. Floor Area (ft²)	1033	19	Glazing Percentage (%)	13.65%
20	ADU Bedroom Count	n/a	21	ADU Conditioned Floor Area	n/a
22	Fuel Type	All electric	23	No Dwelling Unit:	No

COMPLIANCE RESULTS	
01	Building Complies with Computer Performance
02	This building incorporates features that require field testing and/or verification by a certified HERS rater under the supervision of a CEC-approved HERS provider.
03	This building incorporates one or more Special Features shown below

Registration Number: 223-P016612498A-000-000-0000000-0000 — Registration Date/Time: 2023-11-27 08:33:56 — HERS Provider: CalCERTS inc.

CA Building Energy Efficiency Standards - 2022 Residential Compliance — Report Version: 2022.0.000, Schema Version: rev 20220901 — Report Generated: 2023-11-07 14:24:01

CERTIFICATE OF COMPLIANCE - RESIDENTIAL PERFORMANCE COMPLIANCE METHOD — **CF1R-PRF-01E**

Project Name: Mono County ADU (Plan 5) — **Calculation Date/Time:** 2023-11-07T14:22:25-08:00 — **(Page 2 of 12)**

Calculation Description: Title 24 Analysis — **Input File Name:** Mono County ADU (Plan 5) 2022.ribd22x

ENERGY DESIGN RATINGS	Energy Design Ratings			Compliance Margins		
	Source Energy (EDR1)	Efficiency[1] EDR (EDR2efficiency)	Total[2] EDR (EDR2total)	Source Energy (EDR1)	Efficiency[1] EDR (EDR2efficiency)	Total[2] EDR (EDR2total)
Standard Design	49.6	57.1	61.2			
Proposed Design						
North Facing	34.6	42.6	52.3	15	14.5	8.9
East Facing	34.5	42.4	52.2	15.1	14.7	9
South Facing	34.4	42.1	52	15.2	15	9.2
West Facing	34.4	42.2	52	15.2	14.9	9.2

RESULT[3]: PASS

[1]Efficiency EDR includes improvements like a better building envelope and more efficient equipment
[2]Total EDR includes efficiency and demand response measures such as photovoltaic (PV) system and batteries
[3]Building complies when source energy, efficiency and total compliance margins are greater than or equal to zero and unmet load hour limits are not exceeded

- Standard Design PV Capacity: 0.00 kWdc
- Proposed PV Capacity Scaling: North (0.00 kWdc) East (0.00 kWdc) South (0.00 kWdc) West (0.00 kWdc)

Registration Number: 223-P016612498A-000-000-0000000-0000 — Registration Date/Time: 2023-11-27 08:33:56 — HERS Provider: CalCERTS inc.

CA Building Energy Efficiency Standards - 2022 Residential Compliance — Report Version: 2022.0.000, Schema Version: rev 20220901 — Report Generated: 2023-11-07 14:24:01

CERTIFICATE OF COMPLIANCE - RESIDENTIAL PERFORMANCE COMPLIANCE METHOD — **CF1R-PRF-01E**

Project Name: Mono County ADU (Plan 5) — **Calculation Date/Time:** 2023-11-07T14:22:25-08:00 — **(Page 3 of 12)**

Calculation Description: Title 24 Analysis — **Input File Name:** Mono County ADU (Plan 5) 2022.ribd22x

ENERGY USE SUMMARY						
Energy Use	**Standard Design Source Energy (EDR1) (kBtu/ft²-yr)**	**Standard Design TDV Energy (EDR2) (kTDV/ft²-yr)**	**Proposed Design Source Energy (EDR1) (kBtu/ft²-yr)**	**Proposed Design TDV Energy (EDR2) (kTDV/ft²-yr)**	**Compliance Margin (EDR1)**	**Compliance Margin (EDR2)**
Space Heating	13.38	90.5	7.18	78.14	6.2	12.36
Space Cooling	0.22	2.51	0.06	0.64	0.16	1.87
IAQ Ventilation	0.4	4.31	0.4	4.31	0	0
Water Heating	3.07	40.6	1.53	19.71	1.54	20.89
Self Utilization/Flexibility Credit				0		0
North Facing Efficiency Compliance Total	**17.07**	**137.92**	**9.17**	**102.8**	**7.9**	**35.12**
Space Heating	13.38	90.5	7.15	77.69	6.23	12.81
Space Cooling	0.22	2.51	0.06	0.65	0.16	1.86
IAQ Ventilation	0.4	4.31	0.4	4.31	0	0
Water Heating	3.07	40.6	1.53	19.7	1.54	20.9
Self Utilization/Flexibility Credit				0		0
East Facing Efficiency Compliance Total	**17.07**	**137.92**	**9.14**	**102.35**	**7.93**	**35.57**

Registration Number: 223-P016612498A-000-000-0000000-0000 — Registration Date/Time: 2023-11-27 08:33:56 — HERS Provider: CalCERTS inc.

CA Building Energy Efficiency Standards - 2022 Residential Compliance — Report Version: 2022.0.000, Schema Version: rev 20220901 — Report Generated: 2023-11-07 14:24:01

CERTIFICATE OF COMPLIANCE - RESIDENTIAL PERFORMANCE COMPLIANCE METHOD — **CF1R-PRF-01E**

Project Name: Mono County ADU (Plan 5) — **Calculation Date/Time:** 2023-11-07T14:22:25-08:00 — **(Page 4 of 12)**

Calculation Description: Title 24 Analysis — **Input File Name:** Mono County ADU (Plan 5) 2022.ribd22x

ENERGY USE SUMMARY						
Energy Use	**Standard Design Source Energy (EDR1) (kBtu/ft²-yr)**	**Standard Design TDV Energy (EDR2) (kTDV/ft²-yr)**	**Proposed Design Source Energy (EDR1) (kBtu/ft²-yr)**	**Proposed Design TDV Energy (EDR2) (kTDV/ft²-yr)**	**Compliance Margin (EDR1)**	**Compliance Margin (EDR2)**
Space Heating	13.38	90.5	7.1	76.92	6.28	13.58
Space Cooling	0.22	2.51	0.06	0.68	0.16	1.83
IAQ Ventilation	0.4	4.31	0.4	4.31	0	0
Water Heating	3.07	40.6	1.53	19.7	1.54	20.9
Self Utilization/Flexibility Credit				0		0
South Facing Efficiency Compliance Total	**17.07**	**137.92**	**9.09**	**101.61**	**7.98**	**36.31**
Space Heating	13.38	90.5	7.1	77.17	6.28	13.33
Space Cooling	0.22	2.51	0.07	0.74	0.15	1.77
IAQ Ventilation	0.4	4.31	0.4	4.31	0	0
Water Heating	3.07	40.6	1.53	19.69	1.54	20.91
Self Utilization/Flexibility Credit				0		0
West Facing Efficiency Compliance Total	**17.07**	**137.92**	**9.1**	**101.91**	**7.97**	**36.01**

Registration Number: 223-P016612498A-000-000-0000000-0000 — Registration Date/Time: 2023-11-27 08:33:56 — HERS Provider: CalCERTS inc.

CA Building Energy Efficiency Standards - 2022 Residential Compliance — Report Version: 2022.0.000, Schema Version: rev 20220901 — Report Generated: 2023-11-07 14:24:01

CERTIFICATE OF COMPLIANCE - RESIDENTIAL PERFORMANCE COMPLIANCE METHOD — **CF1R-PRF-01E**

Project Name: Mono County ADU (Plan 5) — **Calculation Date/Time:** 2023-11-07T14:22:25-08:00 — **(Page 5 of 12)**

Calculation Description: Title 24 Analysis — **Input File Name:** Mono County ADU (Plan 5) 2022.ribd22x

ENERGY USE INTENSITY				
	Standard Design (kBtu/ft² - yr)	**Proposed Design (kBtu/ft² - yr)**	**Compliance Margin (kBtu/ft² - yr)**	**Margin Percentage**
North Facing				
Gross EUI[1]	30.74	23.33	7.41	24.11
Net EUI[2]	30.74	23.33	7.41	24.11
East Facing				
Gross EUI[1]	30.74	23.26	7.48	24.33
Net EUI[2]	30.74	23.26	7.48	24.33
South Facing				
Gross EUI[1]	30.74	23.14	7.6	24.72
Net EUI[2]	30.74	23.14	7.6	24.72
West Facing				
Gross EUI[1]	30.74	23.21	7.53	24.5
Net EUI[2]	30.74	23.21	7.53	24.5

Notes
1. Gross EUI is Energy Use Total (not including PV) / Total Building Area.
2. Net EUI is Energy Use Total (including PV) / Total Building Area.

Registration Number: 223-P016612498A-000-000-0000000-0000 — Registration Date/Time: 2023-11-27 08:33:56 — HERS Provider: CalCERTS inc.

CA Building Energy Efficiency Standards - 2022 Residential Compliance — Report Version: 2022.0.000, Schema Version: rev 20220901 — Report Generated: 2023-11-07 14:24:01

CERTIFICATE OF COMPLIANCE - RESIDENTIAL PERFORMANCE COMPLIANCE METHOD — **CF1R-PRF-01E**

Project Name: Mono County ADU (Plan 5) — **Calculation Date/Time:** 2023-11-07T14:22:25-08:00 — **(Page 6 of 12)**

Calculation Description: Title 24 Analysis — **Input File Name:** Mono County ADU (Plan 5) 2022.ribd22x

REQUIRED PV SYSTEMS

01	02	03	04	05	06	07	08	09	10	11	12
DC System Size (kWdc)	**Exception**	**Module Type**	**Array Type**	**Power Electronics**	**CFI**	**Azimuth (deg)**	**Tilt Input**	**Array Angle (deg)**	**Tilt: (x in 12)**	**Inverter Eff. (%)**	**Annual Solar Access (%)**
0		Standard (14-17%)	Fixed	none	true	n/a	n/a	n/a	n/a	n/a	

REQUIRED SPECIAL FEATURES

The following are features that must be installed as condition for meeting the modeled energy performance for this computer analysis.

- PV exception 2: No PV required when minimum PV size (Section 150.1(c)14) < 1.8 kWdc (0 kW)
- Variable capacity heat pump compliance option (verification details from VCHP Staff report, Appendix B, and RA3)
- Northwest Energy Efficiency Alliance (NEEA) rated heat pump water heater; specific brand/model, or equivalent, must be installed

HERS FEATURE SUMMARY

The following is a summary of the features that must be field-verified by a certified HERS Rater as a condition for meeting the modeled energy performance for this computer analysis. Additional detail is provided in the building tables below. Registered CF2Rs and CF3Rs are required to be completed in the HERS Registry

- Indoor air quality ventilation
- Kitchen range hood
- Verified Refrigerant Charge
- Airflow in habitable rooms (SC3.1.4.1.7)
- Verified heat pump rated heating capacity
- Wall-mounted thermostat in zones greater than 150 ft2 (SC3.4.5)
- Ductless indoor units located entirely in conditioned space (SC3.1.4.1.8)

BUILDING - FEATURES INFORMATION

01	02	03	04	05	06	07
Project Name	**Conditioned Floor Area (ft²)**	**Number of Dwelling Units**	**Number of Bedrooms**	**Number of Zones**	**Number of Ventilation Cooling Systems**	**Number of Water Heating Systems**
Mono County ADU (Plan 5)	1033	1	2	1	0	1

Registration Number: 223-P016612498A-000-000-0000000-0000 — Registration Date/Time: 2023-11-27 08:33:56 — HERS Provider: CalCERTS inc.

CA Building Energy Efficiency Standards - 2022 Residential Compliance — Report Version: 2022.0.000, Schema Version: rev 20220901 — Report Generated: 2023-11-07 14:24:01

CERTIFICATE OF COMPLIANCE - RESIDENTIAL PERFORMANCE COMPLIANCE METHOD — **CF1R-PRF-01E**

Project Name: Mono County ADU (Plan 5) — **Calculation Date/Time:** 2023-11-07T14:22:25-08:00 — **(Page 7 of 12)**

Calculation Description: Title 24 Analysis — **Input File Name:** Mono County ADU (Plan 5) 2022.ribd22x

ZONE INFORMATION

01	02	03	04	05	06	07
Zone Name	**Zone Type**	**HVAC System Name**	**Zone Floor Area (ft²)**	**Avg. Ceiling Height**	**Water Heating System 1**	**Status**
Living Area	Conditioned	HVAC System1	1033	8	DHW Sys 1	New

OPAQUE SURFACES

01	02	03	04	05	06	07	08
Name	**Zone**	**Construction**	**Azimuth**	**Orientation**	**Gross Area (ft²)**	**Window and Door Area (ft²)**	**Tilt (deg)**
Front Wall	Living Area	R-21 Wall	0	Front	224	52	90
Left Wall	Living Area	R-21 Wall	90	Left	304	25	90
Rear Wall	Living Area	R-21 Wall	180	Back	224	30	90
Right Wall	Living Area	R-21 Wall	270	Right	304	34	90
Roof	Living Area	R-38 Roof Attic	n/a	n/a	1033	n/a	n/a

ATTIC

01	02	03	04	05	06	07	08
Name	**Construction**	**Type**	**Roof Rise (x in 12)**	**Roof Reflectance**	**Roof Emittance**	**Radiant Barrier**	**Cool Roof**
Attic Living Area	Attic RoofLiving Area	Ventilated	8	0.1	0.85	No	No

FENESTRATION / GLAZING

01	02	03	04	05	06	07	08	09	10	11	12	13	14
Name	**Type**	**Surface**	**Orientation**	**Azimuth**	**Width (ft)**	**Height (ft)**	**Mult.**	**Area (ft²)**	**U-factor**	**U-factor Source**	**SHGC**	**SHGC Source**	**Exterior Shading**
B	Window	Front Wall	Front	0			1	16	0.3	NFRC	0.23	NFRC	Bug Screen
B 2	Window	Front Wall	Front	0			1	16	0.3	NFRC	0.23	NFRC	Bug Screen
Door A1	Window	Front Wall	Front	0			1	20	0.3	NFRC	0.23	NFRC	Bug Screen

Registration Number: 223-P016612498A-000-000-0000000-0000 — Registration Date/Time: 2023-11-27 08:33:56 — HERS Provider: CalCERTS inc.

CA Building Energy Efficiency Standards - 2022 Residential Compliance — Report Version: 2022.0.000, Schema Version: rev 20220901 — Report Generated: 2023-11-07 14:24:01

MONO COUNTY

MONO COUNTY ADU PROTOTYPES
MONO COUNTY
ENERGY COMPLIANCE - PLAN 5 - SLAB ON GRADE

PUBLIC SET

DATE
01/10/2024

SHEET
T24-A501

1/25/2024 4:05:56 PM
Autodesk Docs://2340-04_Mono County ADUs - Code Updates/2340-01_Mono County ADUs_2022 Code Update.rvt

CERTIFICATE OF COMPLIANCE - RESIDENTIAL PERFORMANCE COMPLIANCE METHOD — CF1R-PRF-01E

Project Name: Mono County ADU (Plan 5) — **Calculation Date/Time:** 2023-11-07T14:22:25-08:00 — (Page 8 of 12)

Calculation Description: Title 24 Analysis — **Input File Name:** Mono County ADU (Plan 5) 2022.ribd22x

FENESTRATION / GLAZING

01	02	03	04	05	06	07	08	09	10	11	12	13	14
Name	Type	Surface	Orientation	Azimuth	Width (ft)	Height (ft)	Mult.	Area (ft^2)	U-factor	U-factor Source	SHGC	SHGC Source	Exterior Shading
B.1	Window	Left Wall	Left	90			1	9	0.3	NFRC	0.23	NFRC	Bug Screen
B 3	Window	Left Wall	Left	90			1	16	0.3	NFRC	0.23	NFRC	Bug Screen
B.3	Window	Rear Wall	Back	180			1	18	0.3	NFRC	0.23	NFRC	Bug Screen
A.1	Window	Rear Wall	Back	180			1	6	0.3	NFRC	0.23	NFRC	Bug Screen
A.1 2	Window	Rear Wall	Back	180			1	6	0.3	NFRC	0.23	NFRC	Bug Screen
B.3 2	Window	Right Wall	Right	270			1	18	0.3	NFRC	0.23	NFRC	Bug Screen
B 4	Window	Right Wall	Right	270			1	16	0.3	NFRC	0.23	NFRC	Bug Screen

SLAB FLOORS

01	02	03	04	05	06	07	08
Name	Zone	Area (ft^2)	Perimeter (ft)	Edge Insul. R-value and Depth	Edge Insul. R-value and Depth	Carpeted Fraction	Heated
Slab	Living Area	1033	106	none	0	80%	No

OPAQUE SURFACE CONSTRUCTIONS

01	02	03	04	05	06	07	08
Construction Name	Surface Type	Construction Type	Framing	Total Cavity R-value	Interior / Exterior Continuous R-value	U-factor	Assembly Layers
R-21 Wall	Exterior Walls	Wood Framed Wall	2x6 @ 16 in. O. C.	R-21	None / None	0.069	Inside Finish: Gypsum Board Cavity / Frame: R-21 / 2x6 Exterior Finish: 3 Coat Stucco

CERTIFICATE OF COMPLIANCE - RESIDENTIAL PERFORMANCE COMPLIANCE METHOD — CF1R-PRF-01E

Project Name: Mono County ADU (Plan 5) — **Calculation Date/Time:** 2023-11-07T14:22:25-08:00 — (Page 9 of 12)

Calculation Description: Title 24 Analysis — **Input File Name:** Mono County ADU (Plan 5) 2022.ribd22x

OPAQUE SURFACE CONSTRUCTIONS

01	02	03	04	05	06	07	08
Construction Name	Surface Type	Construction Type	Framing	Total Cavity R-value	Interior / Exterior Continuous R-value	U-factor	Assembly Layers
Attic RoofLiving Area	Attic Roofs	Wood Framed Ceiling	2x4 @ 24 in. O. C.	R-0	None / 0	0.644	Roofing: Light Roof (Asphalt Shingle) Roof Deck: Wood Siding/sheathing/decking Cavity / Frame: no insul. / 2x4
R-38 Roof Attic	Ceilings (below attic)	Wood Framed Ceiling	2x4 @ 24 in. O. C.	R-38	None / None	0.025	Over Ceiling Joists: R-28.9 insul. Cavity / Frame: R-9.1 / 2x4 Inside Finish: Gypsum Board

BUILDING ENVELOPE - HERS VERIFICATION

01	02	03	04	05
Quality Insulation Installation (QII)	High R-value Spray Foam Insulation	Building Envelope Air Leakage	CFM50	CFM50
Not Required	Not Required	N/A	n/a	n/a

WATER HEATING SYSTEMS

01	02	03	04	05	06	07	08	09
Name	System Type	Distribution Type	Water Heater Name	Number of Units	Solar Heating System	Compact Distribution	HERS Verification	Water Heater Name (#)
DHW Sys 1	Domestic Hot Water (DHW)	Standard	DHW Heater 1	1	n/a	None	n/a	DHW Heater 1 (1)

WATER HEATERS - NEEA HEAT PUMP

01	02	03	04	05	06	07	08
Name	# of Units	Tank Vol. (gal)	NEEA Heat Pump Brand	NEEA Heat Pump Model	Tank Location	Duct Inlet Air Source	Duct Outlet Air Source
DHW Heater 1	1	50	Rheem	XE50T10H22U0 (50 gal, JA13)	TankZone	Living Area	Living Area

CERTIFICATE OF COMPLIANCE - RESIDENTIAL PERFORMANCE COMPLIANCE METHOD — CF1R-PRF-01E

Project Name: Mono County ADU (Plan 5) — **Calculation Date/Time:** 2023-11-07T14:22:25-08:00 — (Page 10 of 12)

Calculation Description: Title 24 Analysis — **Input File Name:** Mono County ADU (Plan 5) 2022.ribd22x

WATER HEATING - HERS VERIFICATION

01	02	03	04	05	06	07
Name	Pipe Insulation	Parallel Piping	Compact Distribution	Compact Distribution Type	Recirculation Control	Shower Drain Water Heat Recovery
DHW Sys 1 - 1/1	Not Required	Not Required	Not Required	None	Not Required	Not Required

SPACE CONDITIONING SYSTEMS

01	02	03	04	05	06	07	08	09
Name	System Type	Heating Unit Name	Heating Equipment Count	Cooling Unit Name	Cooling Equipment Count	Fan Name	Distribution Name	Required Thermostat Type
HVAC System1	Heat pump heating cooling	Heat Pump System 1	1	Heat Pump System 1	1	n/a	n/a	Setback

HVAC - HEAT PUMPS

01	02	03	04	05	06	07	08	09	10	11	12	13
			Heating				Cooling					
Name	System Type	Number of Units	Heating Efficiency Type	HSPF/HSPF2/COP	Cap 47	Cap 17	Cooling Efficiency Type	SEER/SEER2	EER/EER2/CEER	Zonally Controlled	Compressor Type	HERS Verification
Heat Pump System 1	VCHP-ductless	1	HSPF	8.2	12000	8000	EERSEER	14	11.7	Not Zonal	Single Speed	Heat Pump System 1-hers-htpump

HVAC HEAT PUMPS - HERS VERIFICATION

01	02	03	04	05	06	07	08	09
Name	Verified Airflow	Airflow Target	Verified EER/EER2	Verified SEER/SEER2	Verified Refrigerant Charge	Verified HSPF/HSPF2	Verified Heating Cap 47	Verified Heating Cap 17
Heat Pump System 1-hers-htpump	Not Required	0	Not Required	Not Required	Yes	No	Yes	Yes

CERTIFICATE OF COMPLIANCE - RESIDENTIAL PERFORMANCE COMPLIANCE METHOD — CF1R-PRF-01E

Project Name: Mono County ADU (Plan 5) — **Calculation Date/Time:** 2023-11-07T14:22:25-08:00 — (Page 11 of 12)

Calculation Description: Title 24 Analysis — **Input File Name:** Mono County ADU (Plan 5) 2022.ribd22x

VARIABLE CAPACITY HEAT PUMP COMPLIANCE OPTION - HERS VERIFICATION

01	02	03	04	05	06	07	08	09	10
Name	Certified Low-Static VCHP System	Airflow to Habitable Rooms	Ductless Units in Conditioned Space	Wall Mount Thermostat	Air Filter Sizing & Pressure Drop Rating	Low Leakage Ducts in Conditioned Space	Minimum Airflow per RA3.3 and SC3.3.3.4.1	Certified non-continuous Fan	Indoor Fan not Running Continuously
Heat Pump System 1	Not required	Required	Required	Required	Not required	Not required	Not required	Not required	Not required

INDOOR AIR QUALITY (IAQ) FANS

01	02	03	04	05	06	07	08	09
Dwelling Unit	Airflow (CFM)	Fan Efficacy (W/CFM)	IAQ Fan Type	Includes Heat/Energy Recovery?	IAQ Recovery Effectiveness - SRE/ASRE	Includes Fault Indicator Display?	HERS Verification	Status
SFam IAQVentRpt	53	0.35	Exhaust	No	n/a / n/a	No	Yes	

CERTIFICATE OF COMPLIANCE - RESIDENTIAL PERFORMANCE COMPLIANCE METHOD — CF1R-PRF-01E

Project Name: Mono County ADU (Plan 5) — **Calculation Date/Time:** 2023-11-07T14:22:25-08:00 — (Page 12 of 12)

Calculation Description: Title 24 Analysis — **Input File Name:** Mono County ADU (Plan 5) 2022.ribd22x

DOCUMENTATION AUTHOR'S DECLARATION STATEMENT

1. I certify that this Certificate of Compliance documentation is accurate and complete.

Documentation Author Name: Timothy Carstairs	Documentation Author Signature: Timothy Carstairs
Company: Carstairs Energy Inc.	Signature Date: 2023-11-08 09:52:39
Address: 2238 Bayview Heights Drive, Suite E	CEA/ HERS Certification Identification (If applicable): r160610042
City/State/Zip: Los Osos, CA 93402	Phone: 805-904-9048

RESPONSIBLE PERSON'S DECLARATION STATEMENT

I certify the following under penalty of perjury, under the laws of the State of California:

1. I am eligible under Division 3 of the Business and Professions Code to accept responsibility for the building design identified on this Certificate of Compliance.
2. I certify that the energy features and performance specifications identified on this Certificate of Compliance conform to the requirements of Title 24, Part 1 and Part 6 of the California Code of Regulations.
3. The building design features or system design features identified on this Certificate of Compliance are consistent with the information provided on other applicable compliance documents, worksheets, calculations, plans and specifications submitted to the enforcement agency for approval with this building permit application.

Responsible Designer Name: Randy Russom	Responsible Designer Signature:
Company: RRM Design Group	Date Signed: 2023-11-27 08:33:56
Address: 3765 S. Higuera Street, Suite 102	License: na
City/State/Zip: San Luis Obispo, CA 94301	Phone: 805-543-1794

Digitally signed by CalCERTS. This digital signature is provided in order to secure the content of this registered document, and in no way implies Registration Provider responsibility for the accuracy of the information.

Easy to Verify at CalCERTS.com

RESIDENTIAL MEASURES SUMMARY — RMS-1

2022 Single-Family Residential Mandatory Requirements Summary

2022 Single-Family Residential Mandatory Requirements Summary

2022 Single-Family Residential Mandatory Requirements Summary

MONO COUNTY

MONO COUNTY ADU PROTOTYPES

MONO COUNTY

ENERGY COMPLIANCE - PLAN 5 - SLAB ON GRADE

PUBLIC SET

DATE 01/10/2024

SHEET T24-A502

2022 Single-Family Residential Mandatory Requirements Summary

§ 150.0(k)1G:	**Screw based luminaires.** Screw based luminaires must contain lamps that comply with Reference Joint Appendix JA8. *
§ 150.0(k)1H:	**Light Sources in Enclosed or Recessed Luminaires.** Lamps and other separable light sources that are not compliant with the JA8 elevated temperature requirements, including marking requirements, must not be installed in enclosed or recessed luminaires.
§ 150.0(k)1I:	**Light Sources in Drawers, Cabinets, and Linen Closets.** Light sources internal to drawers, cabinetry or linen closets are not required to comply with Table 150.0-A or be controlled by vacancy sensors provided that they are rated to consume no more than 5 watts of power, emit no more than 150 lumens, and are equipped with controls that automatically turn the lighting off when the drawer, cabinet or linen closet is closed.
§ 150.0(k)2A:	**Interior Switches and Controls.** All forward phase cut dimmers used with LED light sources must comply with NEMA SSL 7A.
§ 150.0(k)2B:	**Interior Switches and Controls.** Exhaust fans must be controlled separately from lighting systems. *
§ 150.0(k)2A:	**Accessible Controls.** Lighting must have readily accessible wall-mounted controls that allow the lighting to be manually turned on and off. *
§ 150.0(k)2B:	**Multiple Controls.** Controls must not bypass a dimmer, occupant sensor, or vacancy sensor function if the dimmer or sensor is installed to comply with § 150.0(k).
§ 150.0(k)2C:	**Mandatory Requirements.** Lighting controls must comply with the applicable requirements of § 110.9.
§ 150.0(k)2D:	**Energy Management Control Systems.** An energy management control system (EMCS) may be used to comply with dimming, occupancy, and control requirements if it provides the functionality of the specified control per § 110.9 and the physical controls specified in § 150.0(k)2A.
§ 150.0(k)2E:	**Automatic Shutoff Controls.** In bathrooms, garages, laundry rooms, utility rooms and walk-in closets, at least one installed luminaire must be controlled by an occupancy or vacancy sensor providing automatic-off functionality. Lighting inside drawers and cabinets with opaque fronts or doors must have controls that turn the light off when the drawer or door is closed.
§ 150.0(k)2F:	**Dimmers.** Lighting in habitable spaces (e.g., living rooms, dining rooms, kitchens, and bedrooms) must have readily accessible wall-mounted dimming controls that allow the lighting to be manually adjusted up and down. Forward phase cut dimmers controlling LED light sources in these spaces must comply with NEMA SSL 7A.
§ 150.0(k)2K:	**Independent controls.** Integrated lighting of exhaust fans shall be controlled independently from the fans. Lighting under cabinets or shelves, lighting in display cabinets, and switched outlets must be controlled separately from ceiling-installed lighting.
§ 150.0(k)3A:	**Residential Outdoor Lighting.** For single-family residential buildings, outdoor lighting permanently mounted to a residential building, or to other buildings on the same lot, must have a manual on/off switch and either a photocell and motion sensor or automatic time switch control) or an astronomical time clock. An energy management control system that provides the specified control functionality and meets all applicable requirements may be used to meet these requirements.
§ 150.0(k)4:	**Internally illuminated address signs.** Internally illuminated address signs must either comply with § 140.8 or consume no more than 5 watts of power.
§ 150.0(k)5:	**Residential Garages for Eight or More Vehicles.** Lighting for residential parking garages for eight or more vehicles must comply with the applicable requirements for nonresidential garages in §§ 110.9, 130.0, 130.1, 130.4, 140.6, and 141.0.
Solar Readiness:	
§ 110.10(a)1:	**Single-family Residences.** Single-family residences located in subdivisions with 10 or more single-family residences and where the application for a tentative subdivision map for the residences has been deemed complete and approved by the enforcement agency, which do not have a photovoltaic system installed, must comply with the requirements of § 110.10(b)-(e).
§110.10(b)1A:	**Minimum Solar Zone Area.** The solar zone must have a minimum total area as described below. The solar zone must comply with access, pathway, smoke ventilation, and spacing requirements as specified in Title 24, Part 9 or other parts of Title 24 or in any requirements adopted by a local jurisdiction. The solar zone total area must be comprised of areas that have no dimension less than 5 feet and are no less than 80 square feet each for buildings with roof areas less than or equal to 10,000 square feet or no less than 160 square feet each for buildings with roof areas greater than 10,000 square feet. For single-family residences, the solar zone must be located on the roof or overhang of the building and have a total area no less than 250 square feet. *
§ 110.10(b)2:	**Azimuth.** All sections of the solar zone located on steep-sloped roofs must have an azimuth between 90-300° of true north.
§ 110.10(b)3A:	**Shading.** The solar zone must not contain any obstructions, including but not limited to: vents, chimneys, architectural features, and roof mounted equipment.
§ 110.10(b)3B:	**Shading.** Any obstruction located on the roof or any other part of the building that projects above a solar zone must be located at least twice the horizontal distance of the height difference between the highest point of the obstruction and the horizontal projection of the nearest point of the solar zone, measured in the vertical plane.
§ 110.10(b)4:	**Structural Design Loads on Construction Documents.** For areas of the roof designated as a solar zone, the structural design loads for roof dead load and roof live load must be clearly indicated on the construction documents.
§ 110.10(c):	**Interconnection Pathways.** The construction documents must indicate: a location reserved for inverters and metering equipment and a pathway reserved for routing of conduit from the solar zone to the point of interconnection with the electrical service; and for single-family residences and central water-heating systems, a pathway reserved for routing plumbing from the solar zone to the water-heating system.
§ 110.10(d):	**Documentation.** A copy of the construction documents or a comparable document indicating the information from § 110.10(b)-(c) must be provided to the occupant.
§ 110.10(e)1:	**Main Electrical Service Panel.** The main electrical service panel must have a minimum busbar rating of 200 amps.
§ 110.10(e)2:	**Main Electrical Service Panel.** The main electrical service panel must have a reserved space to allow for the installation of a double pole circuit breaker for a future solar electric installation. The reserved space must be permanently marked as "For Future Solar Electric."
Electric and Energy Storage Ready:	

5/6/22

2022 Single-Family Residential Mandatory Requirements Summary

§ 150.0(s)	**Energy Storage System (ESS) Ready.** All single-family residences must meet all of the following: Either ESS-ready interconnection equipment with backed up capacity of 60 amps or more and four or more ESS supplied branch circuits, or a dedicated raceway from the main service to a subpanel that supplies the branch circuits in § 150.0(s); at least four branch circuits must be identified and have their source collocated at a single panelboard suitable to be supplied by the ESS, with one circuit supplying the refrigerator, one lighting circuit near the primary exit, and one circuit supplying a sleeping room receptacle outlet; main panelboard must have a minimum busbar rating of 225 amps; sufficient space must be reserved to allow future installation of a system isolation equipment/transfer switch within 3' of the main panelboard, with raceways installed between the panelboard and the switch location to allow the connection of backup power source.
§ 150.0(t)	**Heat Pump Space Heater Ready.** Systems using gas or propane furnaces to serve individual dwelling units must include: A dedicated unobstructed 240V branch circuit wiring installed within 3' of the furnace with circuit conductors rated at least 30 amps with the blank cover identified as "240V ready;" and a reserved main electrical service panel space to allow for the installation of a double pole circuit breaker permanently marked as "For Future 240V use."
§ 150.0(u)	**Electric Cooktop Ready.** Systems using gas or propane cooktop to serve individual dwelling units must include: A dedicated unobstructed 240V branch circuit wiring installed within 3' of the cooktop with circuit conductors rated at least 50 amps with the blank cover identified as "240V ready," and a reserved main electrical service panel space to allow for the installation of a double pole circuit breaker permanently marked as "For Future 240V use."
§ 150.0(v)	**Electric Clothes Dryer Ready.** Clothes dryer locations with gas or propane plumbing to serve individual dwelling units must include: A dedicated unobstructed 240V branch circuit wiring installed within 3' of the dryer location with circuit conductors rated at least 30 amps with the blank cover identified as "240V ready;" and a reserved main electrical service panel space to allow for the installation of a double pole circuit breaker permanently marked as "For Future 240V use."

*Exceptions may apply.

5/6/22

ROOM LOAD SUMMARY

Project Name	Date
Mono County ADU (Plan 5)	*11/8/2023*
System Name	Floor Area
HVAC System	*1,033*

ROOM LOAD SUMMARY

			ROOM COOLING PEAK			COIL COOLING PEAK			COIL HTG. PEAK	
Zone Name	Room Name	Mult.	CFM	Sensible	Latent	CFM	Sensible	Latent	CFM	Sensible
Living Area	*1st Floor ADU*	*1*	*425*	*7,246*	*-105*	*425*	*7,246*	*-105*	*532*	*16,760*
PAGE TOTAL			*425*	*7,246*	*-105*	*425*	*7,246*	*-105*	*532*	*16,760*
TOTAL *			*425*	*7,246*	*-105*	*425*	*7,246*	*-105*	*532*	*16,760*

* Total includes ventilation load for zonal systems.

PUBLIC SET

SHEET T24-A503

DATE 01/10/2024

MONO COUNTY ADU PROTOTYPES

MONO COUNTY

ENERGY COMPLIANCE - PLAN 5 - SLAB ON GRADE

THESE PLANS ARE PROVIDED BY MONO COUNTY AS PART OF THE PRE-APPROVED ADU PROGRAM. ALL PLANS ARE FREE AND CANNOT BE A CHARGE TO PROVIDE THESE PLANS. NO ALTERATIONS TO THESE PLANS ARE ALLOWED. ALL ALTERATIONS MUST BE DONE BY A REGISTERED DESIGN PROFESSIONAL. BUILDING PERMIT FOR THE ADU HAS BEEN ISSUED AND FINAL INSPECTION COMPLETED. IF YOU DO NOT HAVE THE CONSTRUCTION KNOWLEDGE REQUIRED TO CONSTRUCT THESE PLANS WITHOUT FURTHER DETAILS, IT IS RECOMMENDED YOU HIRE A CONTRACTOR TO DO THE CONSTRUCTION. THE CITY WILL NOT PROVIDE ANY INFORMATION BEYOND THESE PLANS AND BUILDING INSPECTORS WILL NOT PROVIDE STEP BY STEP INSTRUCTIONS IN THE FIELD.

BUILDING ENERGY ANALYSIS REPORT

PROJECT:
Mono County ADU (Plan 5)
Mono County, CA

Project Designer:
RRM Design Group
3765 South Higuera St. Suite 102
San Luis Obispo, CA 93401
(805) 543-1794

Report Prepared by:
Timothy Carstairs, CEA, HERS, GPR
Carstairs Energy Inc.
2238 Bayview Heights Drive, Suite E
Los Osos, CA 93402
805-904-9048

Job Number:
22-051011

Date:
11/20/2023

TABLE OF CONTENTS

GENERAL INFORMATION					
01	Project Name	Mono County ADU (Plan 5)			
02	Run Title	Title 24 Analysis			
03	Project Location				
04	City	Mono County	05	Standards Version	2022
06	Zip code		07	Software Version	EnergyPro 9.2
08	Climate Zone	16	09	Front Orientation (deg/ Cardinal)	All orientations
10	Building Type	Single family	11	Number of Dwelling Units	1
12	Project Scope	Newly Constructed	13	Number of Bedrooms	2
14	Addition Cond. Floor Area (ft^2)	0	15	Number of Stories	1
16	Existing Cond. Floor Area (ft^2)	n/a	17	Fenestration Average U-factor	0.3
18	Total Cond. Floor Area (ft^2)	1033	19	Glazing Percentage (%)	11.71%
20	ADU Bedroom Count	n/a	21	ADU Conditioned Floor Area	n/a
22	Fuel Type	All electric	23	No Dwelling Unit:	No

COMPLIANCE RESULTS	
01	Building Complies with Computer Performance
02	This building incorporates features that require field testing and/or verification by a certified HERS rater under the supervision of a CEC-approved HERS provider.
03	This building incorporates one or more Special Features shown below

ENERGY DESIGN RATINGS						
	Energy Design Ratings			Compliance Margins		
	Source Energy (EDR1)	Efficiency[1] EDR (EDR2efficiency)	Total[2] EDR (EDR2total)	Source Energy (EDR1)	Efficiency[1] EDR (EDR2efficiency)	Total[2] EDR (EDR2total)
Standard Design	46.4	57.6	46.6			
Proposed Design						
North Facing	27	33.9	31.5	19.4	23.7	15.1
East Facing	27	33.9	31.5	19.4	23.7	15.1
South Facing	27	33.8	31.5	19.4	23.8	15.1
West Facing	26.9	33.7	31.4	19.5	23.9	15.2
RESULT[3]: PASS						

[1]Efficiency EDR includes improvements like a better building envelope and more efficient equipment
[2]Total EDR includes efficiency and demand response measures such as photovoltaic (PV) system and batteries
[3]Building complies when source energy, efficiency and total compliance margins are greater than or equal to zero and unmet load hour limits are not exceeded

- Standard Design PV Capacity: 2.15 kWdc
- Proposed PV Capacity Scaling: North (2.15 kWdc) East (2.15 kWdc) South (2.15 kWdc) West (2.15 kWdc)

ENERGY USE SUMMARY						
Energy Use	Standard Design Source Energy (EDR1) (kBtu/ft^2 -yr)	Standard Design TDV Energy (EDR2) (kTDV/ft^2 -yr)	Proposed Design Source Energy (EDR1) (kBtu/ft^2 -yr)	Proposed Design TDV Energy (EDR2) (kTDV/ft^2 -yr)	Compliance Margin (EDR1)	Compliance Margin (EDR2)
Space Heating	14.21	96.04	5.55	60.73	8.66	35.31
Space Cooling	0.52	6.45	0.26	2.82	0.26	3.63
IAQ Ventilation	0.75	8.17	0.54	5.91	0.21	2.26
Water Heating	3.06	40.59	1.52	19.57	1.54	21.02
Self Utilization/Flexibility Credit				0		0
North Facing Efficiency Compliance Total	**18.54**	**151.25**	**7.87**	**89.03**	**10.67**	**62.22**
Space Heating	14.21	96.04	5.56	60.37	8.65	35.27
Space Cooling	0.52	6.45	0.24	2.62	0.28	3.83
IAQ Ventilation	0.75	8.17	0.54	5.91	0.21	2.26
Water Heating	3.06	40.59	1.52	19.58	1.54	21.01
Self Utilization/Flexibility Credit				0		0
East Facing Efficiency Compliance Total	**18.54**	**151.25**	**7.86**	**88.88**	**10.68**	**62.37**

ENERGY USE SUMMARY						
Energy Use	Standard Design Source Energy (EDR1) (kBtu/ft^2 -yr)	Standard Design TDV Energy (EDR2) (kTDV/ft^2 -yr)	Proposed Design Source Energy (EDR1) (kBtu/ft^2 -yr)	Proposed Design TDV Energy (EDR2) (kTDV/ft^2 -yr)	Compliance Margin (EDR1)	Compliance Margin (EDR2)
Space Heating	14.21	96.04	5.54	60.48	8.67	35.56
Space Cooling	0.52	6.45	0.26	2.82	0.26	3.63
IAQ Ventilation	0.75	8.17	0.54	5.91	0.21	2.26
Water Heating	3.06	40.59	1.52	19.57	1.54	21.02
Self Utilization/Flexibility Credit				0		0
South Facing Efficiency Compliance Total	**18.54**	**151.25**	**7.86**	**88.78**	**10.68**	**62.47**
Space Heating	14.21	96.04	5.51	60.26	8.7	35.78
Space Cooling	0.52	6.45	0.25	2.72	0.27	3.73
IAQ Ventilation	0.75	8.17	0.54	5.91	0.21	2.26
Water Heating	3.06	40.59	1.52	19.57	1.54	21.02
Self Utilization/Flexibility Credit				0		0
West Facing Efficiency Compliance Total	**18.54**	**151.25**	**7.82**	**88.46**	**10.72**	**62.79**

ENERGY USE INTENSITY				
	Standard Design (kBtu/ft^2 - yr)	Proposed Design (kBtu/ft^2 - yr)	Compliance Margin (kBtu/ft^2 - yr)	Margin Percentage
North Facing				
Gross EUI[1]	32.58	21.95	10.63	32.63
Net EUI[2]	21.02	10.39	10.63	50.57
East Facing				
Gross EUI[1]	32.58	21.94	10.64	32.66
Net EUI[2]	21.02	10.37	10.65	50.67
South Facing				
Gross EUI[1]	32.58	21.9	10.68	32.78
Net EUI[2]	21.02	10.34	10.68	50.81
West Facing				
Gross EUI[1]	32.58	21.88	10.7	32.84
Net EUI[2]	21.02	10.32	10.7	50.9

Notes
1. Gross EUI is Energy Use Total (not including PV) / Total Building Area.
2. Net EUI is Energy Use Total (including PV) / Total Building Area.

REQUIRED PV SYSTEMS												
01	02	03	04	05	06	07	08	09	10	11	12
DC System Size (kWdc)	Exception	Module Type	Array Type	Power Electronics	CFI	Azimuth (deg)	Tilt Input	Array Angle (deg)	Tilt: (x in 12)	Inverter Eff. (%)	Annual Solar Access (%)
2.15	NA	Standard (14-17%)	Fixed	none	true	150-270	n/a	n/a	<=7:12	96	98

REQUIRED SPECIAL FEATURES

The following are features that must be installed as condition for meeting the modeled energy performance for this computer analysis.

- Indoor air quality, balanced fan
- IAQ Ventilation System: as low as 0.46 W/CFM
- IAQ Ventilation System Heat Recovery: minimum 80 SRE and 80 ASRE
- IAQ Ventilation System: supply outside air inlet, filter, and H/ERV cores accessible per RACM Reference Manual
- Variable capacity heat pump compliance option (verification details from VCHP Staff report, Appendix B, and RA3)
- Northwest Energy Efficiency Alliance (NEEA) rated heat pump water heater: specific brand/model, or equivalent, must be installed

HERS FEATURE SUMMARY

The following is a summary of the features that must be field-verified by a certified HERS Rater as a condition for meeting the modeled energy performance for this computer analysis. Additional detail is provided in the building tables below. Registered CF2Rs and CF3Rs are required to be completed in the HERS Registry.

- Indoor air quality ventilation
- Kitchen range hood
- Verified Refrigerant Charge
- Airflow in habitable rooms (SC3.1.4.1.7)
- Verified heat pump rated heating capacity
- Wall-mounted thermostat in zones greater than 150 ft2 (SC3.4.5)
- Ductless indoor units located entirely in conditioned space (SC3.1.4.1.8)

BUILDING - FEATURES INFORMATION						
01	02	03	04	05	06	07
Project Name	Conditioned Floor Area (ft^2)	Number of Dwelling Units	Number of Bedrooms	Number of Zones	Number of Ventilation Cooling Systems	Number of Water Heating Systems
Mono County ADU (Plan 5)	1033	1	2	1	0	1

ZONE INFORMATION						
01	02	03	04	05	06	07
Zone Name	Zone Type	HVAC System Name	Zone Floor Area (ft^2)	Avg. Ceiling Height	Water Heating System 1	Status
Living Area	Conditioned	HVAC System1	1033	8	DHW Sys 1	New

OPAQUE SURFACES							
01	02	03	04	05	06	07	08
Name	Zone	Construction	Azimuth	Orientation	Gross Area (ft^2)	Window and Door Area (ft2)	Tilt (deg)
Front Wall	Living Area	R-21 Wall	0	Front	224	52	90
Left Wall	Living Area	R-21 Wall	90	Left	304	25	90
Rear Wall	Living Area	R-21 Wall	180	Back	224	30	90
Right Wall	Living Area	R-21 Wall	270	Right	304	34	90
Roof	Living Area	R-38 Roof Attic	n/a	n/a	1033	n/a	n/a
Raised Floor	Living Area	R-19 Floor Crawlspace	n/a	n/a	1033	n/a	n/a

ATTIC							
01	02	03	04	05	06	07	08
Name	Construction	Type	Roof Rise (x in 12)	Roof Reflectance	Roof Emittance	Radiant Barrier	Cool Roof
Attic Living Area	Attic RoofLiving Area	Ventilated	8	0.1	0.85	No	No

FENESTRATION / GLAZING													
01	02	03	04	05	06	07	08	09	10	11	12	13	14
Name	Type	Surface	Orientation	Azimuth	Width (ft)	Height (ft)	Mult.	Area (ft^2)	U-factor	U-factor Source	SHGC	SHGC Source	Exterior Shading
B	Window	Front Wall	Front	0			1	16	0.3	NFRC	0.23	NFRC	Bug Screen
B 2	Window	Front Wall	Front	0			1	16	0.3	NFRC	0.23	NFRC	Bug Screen
B.1	Window	Left Wall	Left	90			1	9	0.3	NFRC	0.23	NFRC	Bug Screen

MONO COUNTY

THESE PLANS ARE PROVIDED BY MONO COUNTY AS PART OF THE PRE-APPROVED ADU PROGRAM AND ARE PUBLIC DOMAIN, THERE CANNOT BE A CHARGE TO PROVIDE THESE PLANS. NO ALTERATIONS TO THESE PLANS ARE ALLOWED. ALL ALTERATIONS MUST BE DONE UNDER A SEPARATE PERMIT ONCE THE BUILDING PERMIT FOR THE ADU HAS BEEN ISSUED AND FINAL INSPECTION COMPLETED. IF YOU DO NOT HAVE THE CONSTRUCTION KNOWLEDGE AND EXPERIENCE TO CONTRUCT THESE PLANS WITHOUT FURTHER DETAILS, IT IS RECOMMENDED YOU HIRE A CONTRACTOR TO DO THE CONSTRUCTION. THE CITY WILL NOT PROVIDE FURTHER INFORMATION OR DETAILS AND BUILDING INSPECTORS WILL NOT PROVIDE STEP BY STEP INSTRUCTIONS IN THE FIELD.

MONO COUNTY ADU PROTOTYPES
MONO COUNTY
ENERGY COMPLIANCE - PLAN 5 - RAISED FOUNDATION

PUBLIC SET

DATE
01/10/2024

SHEET
T24-B501

1/25/2024 4:06:04 PM
Autodesk Docs://2340-04_Mono County ADUs - Code Updates/2340-01_Mono County ADUs_2022 Code Update.rvt

CERTIFICATE OF COMPLIANCE - RESIDENTIAL PERFORMANCE COMPLIANCE METHOD **CF1R-PRF-01E**

Project Name: Mono County ADU (Plan 5) **Calculation Date/Time:** 2023-11-20T07:35:32-08:00 **(Page 8 of 12)**

Calculation Description: Title 24 Analysis **Input File Name:** Mono County ADU (Plan 5)(raised foundation) 2022.ribd22x

FENESTRATION / GLAZING

01	02	03	04	05	06	07	08	09	10	11	12	13	14
Name	Type	Surface	Orientation	Azimuth	Width (ft)	Height (ft)	Mult.	Area (ft²)	U-factor	U-factor Source	SHGC	SHGC Source	Exterior Shading
B 3	Window	Left Wall	Left	90			1	16	0.3	NFRC	0.23	NFRC	Bug Screen
B.3	Window	Rear Wall	Back	180			1	18	0.3	NFRC	0.23	NFRC	Bug Screen
A.1	Window	Rear Wall	Back	180			1	6	0.3	NFRC	0.23	NFRC	Bug Screen
A.1 2	Window	Rear Wall	Back	180			1	6	0.3	NFRC	0.23	NFRC	Bug Screen
B.3 2	Window	Right Wall	Right	270			1	18	0.3	NFRC	0.23	NFRC	Bug Screen
B 4	Window	Right Wall	Right	270			1	16	0.3	NFRC	0.23	NFRC	Bug Screen

OPAQUE DOORS

01	02	03	04
Name	Side of Building	Area (ft²)	U-factor
Door A1	Front Wall	20	0.2

OPAQUE SURFACE CONSTRUCTIONS

01	02	03	04	05	06	07	08
Construction Name	Surface Type	Construction Type	Framing	Total Cavity R-value	Interior / Exterior Continuous R-value	U-factor	Assembly Layers
R-21 Wall	Exterior Walls	Wood Framed Wall	2x6 @ 16 in. O. C.	R-21	None / None	0.069	Inside Finish: Gypsum Board Cavity / Frame: R-21 / 2x6 Exterior Finish: 3 Coat Stucco
Attic RoofLiving Area	Attic Roofs	Wood Framed Ceiling	2x4 @ 24 in. O. C.	R-0	None / 0	0.644	Roofing: Light Roof (Asphalt Shingle) Roof Deck: Wood Siding/sheathing/decking Cavity / Frame: no insul. / 2x4

Registration Number: 223-P016617250A-000-000-0000000-0000 Registration Date/Time: 2023-11-27 08:34:10 HERS Provider: CalCERTS inc.

CA Building Energy Efficiency Standards - 2022 Residential Compliance Report Version: 2022.0.000 Schema Version: rev 20220901 Report Generated: 2023-11-20 07:37:14

CERTIFICATE OF COMPLIANCE - RESIDENTIAL PERFORMANCE COMPLIANCE METHOD **CF1R-PRF-01E**

Project Name: Mono County ADU (Plan 5) **Calculation Date/Time:** 2023-11-20T07:35:32-08:00 **(Page 9 of 12)**

Calculation Description: Title 24 Analysis **Input File Name:** Mono County ADU (Plan 5)(raised foundation) 2022.ribd22x

OPAQUE SURFACE CONSTRUCTIONS

01	02	03	04	05	06	07	08
Construction Name	Surface Type	Construction Type	Framing	Total Cavity R-value	Interior / Exterior Continuous R-value	U-factor	Assembly Layers
R-19 Floor Crawlspace	Floors Over Crawlspace	Wood Framed Floor	2x10 @ 16 in. O. C.	R-19	None / None	0.046	Floor Surface: Carpeted Floor Deck: Wood Siding/sheathing/decking Cavity / Frame: R-19 / 2x10
R-38 Roof Attic	Ceilings (below attic)	Wood Framed Ceiling	2x4 @ 24 in. O. C.	R-38	None / None	0.025	Over Ceiling Joists: R-28.9 insul. Cavity / Frame: R-9.1 / 2x4 Inside Finish: Gypsum Board

BUILDING ENVELOPE - HERS VERIFICATION

01	02	03	04	05
Quality Insulation Installation (QII)	High R-value Spray Foam Insulation	Building Envelope Air Leakage	CFM50	CFM50
Not Required	Not Required	N/A	n/a	n/a

WATER HEATING SYSTEMS

01	02	03	04	05	06	07	08	09
Name	System Type	Distribution Type	Water Heater Name	Number of Units	Solar Heating System	Compact Distribution	HERS Verification	Water Heater Name (#)
DHW Sys 1	Domestic Hot Water (DHW)	Standard	DHW Heater 1	1	n/a	None	n/a	DHW Heater 1 (1)

WATER HEATERS - NEEA HEAT PUMP

01	02	03	04	05	06	07	08
Name	# of Units	Tank Vol. (gal)	NEEA Heat Pump Brand	NEEA Heat Pump Model	Tank Location	Duct Inlet Air Source	Duct Outlet Air Source
DHW Heater 1	1	50	Rheem	XE50T10H22U0 (50 gal, JA13)	TankZone	Living Area	Living Area

Registration Number: 223-P016617250A-000-000-0000000-0000 Registration Date/Time: 2023-11-27 08:34:10 HERS Provider: CalCERTS inc.

CA Building Energy Efficiency Standards - 2022 Residential Compliance Report Version: 2022.0.000 Schema Version: rev 20220901 Report Generated: 2023-11-20 07:37:14

CERTIFICATE OF COMPLIANCE - RESIDENTIAL PERFORMANCE COMPLIANCE METHOD **CF1R-PRF-01E**

Project Name: Mono County ADU (Plan 5) **Calculation Date/Time:** 2023-11-20T07:35:32-08:00 **(Page 10 of 12)**

Calculation Description: Title 24 Analysis **Input File Name:** Mono County ADU (Plan 5)(raised foundation) 2022.ribd22x

WATER HEATING - HERS VERIFICATION

01	02	03	04	05	06	07
Name	Pipe Insulation	Parallel Piping	Compact Distribution	Compact Distribution Type	Recirculation Control	Shower Drain Water Heat Recovery
DHW Sys 1 - 1/1	Not Required	Not Required	Not Required	None	Not Required	Not Required

SPACE CONDITIONING SYSTEMS

01	02	03	04	05	06	07	08	09
Name	System Type	Heating Unit Name	Heating Equipment Count	Cooling Unit Name	Cooling Equipment Count	Fan Name	Distribution Name	Required Thermostat Type
HVAC System1	Heat pump heating cooling	Heat Pump System 1	1	Heat Pump System 1	1	n/a	n/a	Setback

HVAC - HEAT PUMPS

01	02	03	04	05	06	07	08	09	10	11	12	13
			Heating				Cooling					
Name	System Type	Number of Units	Heating Efficiency Type	HSPF/HSPF2/COP	Cap 47	Cap 17	Cooling Efficiency Type	SEER/SEER2	EER/EER2/CEER	Zonally Controlled	Compressor Type	HERS Verification
Heat Pump System 1	VCHP-ductless	1	HSPF	8.2	12000	8000	EERSEER	14	11.7	Not Zonal	Single Speed	Heat Pump System 1-hers-htpump

HVAC HEAT PUMPS - HERS VERIFICATION

01	02	03	04	05	06	07	08	09
Name	Verified Airflow	Airflow Target	Verified EER/EER2	Verified SEER/SEER2	Verified Refrigerant Charge	Verified HSPF/HSPF2	Verified Heating Cap 47	Verified Heating Cap 17
Heat Pump System 1-hers-htpump	Not Required	0	Not Required	Not Required	Yes	No	Yes	Yes

Registration Number: 223-P016617250A-000-000-0000000-0000 Registration Date/Time: 2023-11-27 08:34:10 HERS Provider: CalCERTS inc.

CA Building Energy Efficiency Standards - 2022 Residential Compliance Report Version: 2022.0.000 Schema Version: rev 20220901 Report Generated: 2023-11-20 07:37:14

MONO COUNTY

THESE PLANS ARE PROVIDED BY MONO COUNTY AS PART OF THE PRE-APPROVED ADU PROGRAM AND ARE PUBLIC DOMAIN. THERE CANNOT BE A CHARGE TO PROVIDE THESE PLANS. NO ALTERATIONS TO THESE PLANS ARE ALLOWED. ALL ALTERATIONS MUST BE DONE UNDER A SEPARATE PERMIT ONCE THE BUILDING PERMIT FOR THE ADU HAS BEEN ISSUED AND FINAL INSPECTION COMPLETED. IF YOU DO NOT HAVE THE CONSTRUCTION KNOWLEDGE AND EXPERIENCE TO CONTRUCT THESE PLANS WITHOUT FURTHER DETAILS, IT IS RECOMMENDED YOU HIRE A CONTRACTOR TO DO THE CONSTRUCTION. THE CITY WILL NOT PROVIDE FURTHER INFORMATION OR DETAILS AND BUILDING INSPECTORS WILL NOT PROVIDE STEP BY STEP INSTRUCTIONS IN THE FIELD.

CERTIFICATE OF COMPLIANCE - RESIDENTIAL PERFORMANCE COMPLIANCE METHOD **CF1R-PRF-01E**

Project Name: Mono County ADU (Plan 5) **Calculation Date/Time:** 2023-11-20T07:35:32-08:00 **(Page 11 of 12)**

Calculation Description: Title 24 Analysis **Input File Name:** Mono County ADU (Plan 5)(raised foundation) 2022.ribd22x

VARIABLE CAPACITY HEAT PUMP COMPLIANCE OPTION - HERS VERIFICATION

01	02	03	04	05	06	07	08	09	10
Name	Certified Low-Static VCHP System	Airflow to Habitable Rooms	Ductless Units in Conditioned Space	Wall Mount Thermostat	Air Filter Sizing & Pressure Drop Rating	Low Leakage Ducts in Conditioned Space	Minimum Airflow per RA3.3 and SC3.3.3.4.1	Certified non-continuous Fan	Indoor Fan not Running Continuously
Heat Pump System 1	Not required	Required	Required	Required	Not required	Not required	Not required	Not required	Not required

INDOOR AIR QUALITY (IAQ) FANS

01	02	03	04	05	06	07	08	09
Dwelling Unit	Airflow (CFM)	Fan Efficacy (W/CFM)	IAQ Fan Type	Includes Heat/Energy Recovery?	IAQ Recovery Effectiveness - SRE/ASRE	Includes Fault Indicator Display?	HERS Verification	Status
SFam IAQVentRpt 1-1	50	0.46	Balanced	Yes	80 / 80	No	Yes	

Registration Number: 223-P016617250A-000-000-0000000-0000 Registration Date/Time: 2023-11-27 08:34:10 HERS Provider: CalCERTS inc.

CA Building Energy Efficiency Standards - 2022 Residential Compliance Report Version: 2022.0.000 Schema Version: rev 20220901 Report Generated: 2023-11-20 07:37:14

CERTIFICATE OF COMPLIANCE - RESIDENTIAL PERFORMANCE COMPLIANCE METHOD **CF1R-PRF-01E**

Project Name: Mono County ADU (Plan 5) **Calculation Date/Time:** 2023-11-20T07:35:32-08:00 **(Page 12 of 12)**

Calculation Description: Title 24 Analysis **Input File Name:** Mono County ADU (Plan 5)(raised foundation) 2022.ribd22x

DOCUMENTATION AUTHOR'S DECLARATION STATEMENT

1. I certify that this Certificate of Compliance documentation is accurate and complete.

Documentation Author Name: Timothy Carstairs	Documentation Author Signature: Timothy Carstairs
Company: Carstairs Energy Inc.	Signature Date: 2023-11-20 08:18:47
Address: 2238 Bayview Heights Drive, Suite E	CEA/ HERS Certification Identification (If applicable): r160610042
City/State/Zip: Los Osos, CA 93402	Phone: 805-904-9048

RESPONSIBLE PERSON'S DECLARATION STATEMENT

I certify the following under penalty of perjury, under the laws of the State of California:

1. I am eligible under Division 3 of the Business and Professions Code to accept responsibility for the building design identified on this Certificate of Compliance.
2. I certify that the energy features and performance specifications identified on this Certificate of Compliance conform to the requirements of Title 24, Part 1 and Part 6 of the California Code of Regulations.
3. The building design features or system design features identified on this Certificate of Compliance are consistent with the information provided on other applicable compliance documents, worksheets, calculations, plans and specifications submitted to the enforcement agency for approval with this building permit application.

Responsible Designer Name: Randy Russom	Responsible Designer Signature:
Company: RRM Design Group	Date Signed: 2023-11-27 08:34:10
Address: 3765 S. Higuera Street, Suite 102	License: na
City/State/Zip: San Luis Obispo, CA 94301	Phone: 805-543-1794

Digitally signed by CalCERTS. This digital signature is provided in order to secure the content of this registered document, and in no way implies Registration Provider responsibility for the accuracy of the information.

Easy to Verify at CalCERTS.com

Registration Number: 223-P016617250A-000-000-0000000-0000 Registration Date/Time: 2023-11-27 08:34:10 HERS Provider: CalCERTS inc.

CA Building Energy Efficiency Standards - 2022 Residential Compliance Report Version: 2022.0.000 Schema Version: rev 20220901 Report Generated: 2023-11-20 07:37:14

RESIDENTIAL MEASURES SUMMARY RMS-1

Project Name Mono County ADU (Plan 5)	Building Type ☑ Single Family ☐ Addition Alone ☐ Multi Family ☐ Existing+ Addition/Alteration			Date 11/20/2023
Project Address Mono County	California Energy Climate Zone CA Climate Zone 16	Total Cond. Floor Area 1,033	Addition n/a	# of Units 1

INSULATION

Construction	Type	Cavity	Area (ft²)	Special Features	Status
Wall	Wood Framed	R 21	915		New
Door	Opaque Door	R-5	20		New
Roof	Wood Framed Attic	R 38	1,033		New
Floor	Wood Framed w/Crawl Space	R 19	1,033		New

FENESTRATION Total Area: 121 Glazing Percentage: 11.7 % New/Altered Average U-Factor: 0.30

Orientation	Area(ft²)	U-Fac	SHGC	Overhang	Sidefins	Exterior Shades	Status
Front (N)	32.0	0.300	0.23	none	none	N/A	New
Left (E)	25.0	0.300	0.23	none	none	N/A	New
Rear (S)	30.0	0.300	0.23	none	none	N/A	New
Right (W)	34.0	0.300	0.23	none	none	N/A	New

HVAC SYSTEMS

Qty.	Heating	Min. Eff	Cooling	Min. Eff	Thermostat	Status
1	Electric Heat Pump	8.20 HSPF	Split Heat Pump	14.0 SEER	Setback	New

HVAC DISTRIBUTION

Location	Heating	Cooling	Duct Location	Duct R-Value	Status
HVAC System	Ductless / with Fan	Ductless	n/a	n/a	New

WATER HEATING

Qty.	Type	Gallons	Min. Eff	Distribution	Status
1	Heat Pump	50	3.20	Standard	New

EnergyPro 9.2 by EnergySoft User Number: 6249 ID: 22-051011 Page 15 of 21

2022 Single-Family Residential Mandatory Requirements Summary

NOTE: Single-family residential buildings subject to the Energy Codes must comply with all applicable mandatory measures, regardless of the compliance approach used. Review the respective section for more information.
(04/2022)

Building Envelope:

§ 110.6(a)1:	**Air Leakage.** Manufactured fenestration, exterior doors, and exterior pet doors must limit air leakage to 0.3 CFM per square foot or less when tested per NFRC-400, ASTM E283, or AAMA/WDMA/CSA 101/I.S.2/A440-2011. *
§ 110.6(a)5:	**Labeling.** Fenestration products and exterior doors must have a label meeting the requirements of § 10-111(a).
§ 110.6(b):	**Field fabricated exterior doors and fenestration** products must use U-factors and solar heat gain coefficient (SHGC) values from Tables 110.6-A, 110.6-B, or JA4.5 for exterior doors. They must be caulked and/or weather-stripped. *
§ 110.7:	**Air Leakage.** All joints, penetrations, and other openings in the building envelope that are potential sources of air leakage must be caulked, gasketed, or weather stripped.
§ 110.8(a):	**Insulation Certification by Manufacturers.** Insulation must be certified by the Department of Consumer Affairs, Bureau of Household Goods and Services (BHGS).
§ 110.8(g):	**Insulation Requirements for Heated Slab Floors.** Heated slab floors must be insulated per the requirements of § 110.8(g).
§ 110.8(i):	**Roofing Products Solar Reflectance and Thermal Emittance.** The thermal emittance and aged solar reflectance values of the roofing material must meet the requirements of § 110.8(i) and be labeled per §10-113 when the installation of a cool roof is specified on the CF1R.
§ 110.8(j):	**Radiant Barrier.** When required, radiant barriers must have an emittance of 0.05 or less and be certified to the Department of Consumer Affairs.
§ 150.0(a):	**Roof Deck, Ceiling and Rafter Roof Insulation.** Roof decks in newly constructed attics in climate zones 4 and 8-16 area-weighted average U-factor not exceeding U-0.184. Ceiling and rafter roofs minimum R-22 insulation in wood-frame ceiling; or area-weighted average U-factor must not exceed 0.043. Rafter roof alterations minimum R-19 or area-weighted average U-factor of 0.054 or less. Attic access doors must have permanently attached insulation using adhesive or mechanical fasteners. The attic access must be gasketed to prevent air leakage. Insulation must be installed in direct contact with a roof or ceiling which is sealed to limit infiltration and exfiltration as specified in § 110.7, including but not limited to placing insulation either above or below the roof deck or on top of a drywall ceiling. *
§ 150.0(b):	**Loose-fill Insulation.** Loose fill insulation must meet the manufacturer's required density for the labeled R-value.
§ 150.0(c):	**Wall Insulation.** Minimum R-13 insulation in 2x4 inch wood framing wall or have a U-factor of 0.102 or less, or R-20 in 2x6 inch wood framing or have a U-factor of 0.071 or less. Opaque non-framed assemblies must have an overall assembly U-factor not exceeding 0.102. Masonry walls must meet Tables 150.1-A or B. *
§ 150.0(d):	**Raised-floor Insulation.** Minimum R-19 insulation in raised wood framed floor or 0.037 maximum U-factor. *
§ 150.0(f):	**Slab Edge Insulation.** Slab edge insulation must meet all of the following: have a water absorption rate, for the insulation material alone without facings, no greater than 0.3 percent; have a water vapor permeance no greater than 2.0 perm per inch; be protected from physical damage and UV light deterioration; and, when installed as part of a heated slab floor, meet the requirements of § 110.8(g).
§ 150.0(g)1:	**Vapor Retarder.** In climate zones 1 through 16, the earth floor of unvented crawl space must be covered with a Class I or Class II vapor retarder. This requirement also applies to controlled ventilation crawl space for buildings complying with the exception to §150.0(d).
§ 150.0(g)2:	**Vapor Retarder.** In climate zones 14 and 16, a Class I or Class II vapor retarder must be installed on the conditioned space side of all insulation in all exterior walls, vented attics, and unvented attics with air-permeable insulation.
§ 150.0(q):	**Fenestration Products.** Fenestration, including skylights, separating conditioned space from unconditioned space or outdoors must have a maximum U-factor of 0.45; or area-weighted average U-factor of all fenestration must not exceed 0.45. *

Fireplaces, Decorative Gas Appliances, and Gas Log:

§ 110.5(e)	**Pilot Light.** Continuously burning pilot lights are not allowed for indoor and outdoor fireplaces.
§ 150.0(e)1:	**Closable Doors.** Masonry or factory-built fireplaces must have a closable metal or glass door covering the entire opening of the firebox.
§ 150.0(e)2:	**Combustion Intake.** Masonry or factory-built fireplaces must have a combustion outside air intake, which is at least six square inches in area and is equipped with a readily accessible, operable, and tight-fitting damper or combustion-air control device. *
§ 150.0(e)3:	**Flue Damper.** Masonry or factory-built fireplaces must have a flue damper with a readily accessible control. *

Space Conditioning, Water Heating, and Plumbing System:

§ 110.0-§ 110.3:	**Certification.** Heating, ventilation, and air conditioning (HVAC) equipment, water heaters, showerheads, faucets, and all other regulated appliances must be certified by the manufacturer to the California Energy Commission. *
§ 110.2(a):	**HVAC Efficiency.** Equipment must meet the applicable efficiency requirements in Table 110.2-A through Table 110.2-N. *
§ 110.2(b):	**Controls for Heat Pumps with Supplementary Electric Resistance Heaters.** Heat pumps with supplementary electric resistance heaters must have controls that prevent supplementary heater operation when the heating load can be met by the heat pump alone; and in which the cut-on temperature for compression heating is higher than the cut-on temperature for supplementary heating, and the cut-off temperature for compression heating is higher than the cut-off temperature for supplementary heating. *
§ 110.2(c):	**Thermostats.** All heating or cooling systems not controlled by a central energy management control system (EMCS) must have a setback thermostat. *
§ 110.3(c)3:	**Insulation.** Unfired service water heater storage tanks and solar water-heating backup tanks must have adequate insulation, or tank surface heat loss rating.
§ 110.3(c)6:	**Isolation Valves.** Instantaneous water heaters with an input rating greater than 6.8 kBtu per hour (2 kW) must have isolation valves with hose bibbs or other fittings on both cold and hot water lines to allow for flushing the water heater when the valves are closed.

5/6/22

2022 Single-Family Residential Mandatory Requirements Summary

§ 110.5:	**Pilot Lights.** Continuously burning pilot lights are prohibited for natural gas: fan-type central furnaces; household cooking appliances (except appliances without an electrical supply voltage connection with pilot lights that consume less than 150 Btu per hour); and pool and spa heaters. *
§ 150.0(h)1:	**Building Cooling and Heating Loads.** Heating and/or cooling loads are calculated in accordance with the ASHRAE Handbook, Equipment Volume, Applications Volume, and Fundamentals Volume; the SMACNA Residential Comfort System Installation Standards Manual; or the ACCA Manual J using design conditions specified in § 150.0(h)2.
§ 150.0(h)3A:	**Clearances.** Air conditioner and heat pump outdoor condensing units must have a clearance of at least five feet from the outlet of any dryer.
§ 150.0(h)3B:	**Liquid Line Drier.** Air conditioners and heat pump systems must be equipped with liquid line filter driers if required, as specified by the manufacturer's instructions.
§ 150.0(j)1:	**Water Piping, Solar Water-heating System Piping, and Space Conditioning System Line Insulation.** All domestic hot water piping must be insulated as specified in § 609.11 of the California Plumbing Code. *
§ 150.0(j)2:	**Insulation Protection.** Piping insulation must be protected from damage, including that due to sunlight, moisture, equipment` maintenance, and wind as required by §120.3(b). Insulation exposed to weather must be water retardant and protected from UV light (no adhesive tapes). Insulation covering chilled water piping and refrigerant suction piping located outside the conditioned space must include, or be protected by, a Class I or Class II vapor retarder. Pipe insulation buried below grade must be installed in a waterproof and non-crushable casing or sleeve.
§ 150.0(n)1:	**Gas or Propane Water Heating Systems.** Systems using gas or propane water heaters to serve individual dwelling units must designate a space at least 2.5' x 2.5' x 7' suitable for the future installation of a heat pump water heater, and meet electrical and plumbing requirements, based on the distance between this designated space and the water heater location; and a condensate drain no more than 2" higher than the base of the water heater
§ 150.0(n)3:	**Solar Water-heating Systems.** Solar water-heating systems and collectors must be certified and rated by the Solar Rating and Certification Corporation (SRCC), the International Association of Plumbing and Mechanical Officials, Research and Testing (IAPMO R&T), or by a listing agency that is approved by the executive director.

Ducts and Fans:

§ 110.8(d)3:	**Ducts.** Insulation installed on an existing space-conditioning duct must comply with § 604.0 of the California Mechanical Code (CMC). If a contractor installs the insulation, the contractor must certify to the customer, in writing, that the insulation meets this requirement.
§ 150.0(m)1:	**CMC Compliance.** All air-distribution system ducts and plenums must meet CMC §§ 601.0-605.0 and ANSI/SMACNA-006-2006 HVAC Duct Construction Standards Metal and Flexible 3rd Edition. Portions of supply-air and return-air ducts and plenums must be insulated to R-6.0 or higher; ducts located entirely in conditioned space as confirmed through field verification and diagnostic testing (RA3.1.4.3.8) do not require insulation. Connections of metal ducts and inner core of flexible ducts must be mechanically fastened. Openings must be sealed with mastic, tape, or other duct-closure system that meets the applicable UL requirements, or aerosol sealant that meets UL 723. The combination of mastic and either mesh or tape must be used to seal openings greater than ¼", If mastic or tape is used. Building cavities, air handler support platforms, and plenums designed or constructed with materials other than sealed sheet metal, duct board or flexible duct must not be used to convey conditioned air. Building cavities and support platforms may contain ducts; ducts installed in these spaces must not be compressed. *
§ 150.0(m)2:	**Factory-Fabricated Duct Systems.** Factory-fabricated duct systems must comply with applicable requirements for duct construction, connections, and closures; joints and seams of duct systems and their components must not be sealed with cloth back rubber adhesive duct tapes unless such tape is used in combination with mastic and draw bands.
§ 150.0(m)3:	**Field-Fabricated Duct Systems.** Field-fabricated duct systems must comply with applicable requirements for: pressure-sensitive tapes, mastics, sealants, and other requirements specified for duct construction.
§ 150.0(m)7:	**Backdraft Damper.** Fan systems that exchange air between the conditioned space and outdoors must have backdraft or automatic dampers.
§ 150.0(m)8:	**Gravity Ventilation Dampers.** Gravity ventilating systems serving conditioned space must have either automatic or readily accessible, manually operated dampers in all openings to the outside, except combustion inlet and outlet air openings and elevator shaft vents.
§ 150.0(m)9:	**Protection of Insulation.** Insulation must be protected from damage due tosunlight, moisture, equipment maintenance, and wind. Insulation exposed to weather must be suitable for outdoor service (e.g., protected by aluminum, sheet metal, painted canvas, or plastic cover). Cellular foam insulation must be protected as above or painted with a water retardant and solar radiation-resistant coating.
§ 150.0(m)10:	**Porous Inner Core Flex Duct.** Porous inner cores of flex ducts must have a non-porous layer or air barrier between the inner core and outer vapor barrier.
§ 150.0(m)11:	**Duct System Sealing and Leakage Test.** When space conditioning systems use forced air duct systems to supply conditioned air to an occupiable space, the ducts must be sealed and duct leakage tested, as confirmed through field verification and diagnostic testing, in accordance with Reference Residential Appendix RA3.1.
§ 150.0(m)12:	**Air Filtration.** Space conditioning systems with ducts exceeding 10 feet and the supply side of ventilation systems must have MERV 13 or equivalent filters. Filters for space conditioning systems must have a two inch depth or can be one inch if sized per Equation 150.0-A. Clean-filter pressure drop and labeling must meet the requirements in §150.0(m)12. Filters must be accessible for regular service. Filter racks or grilles must use gaskets, sealing, or other means to close gaps around the inserted filters to and prevents air from bypassing the filter. *

5/6/22

2022 Single-Family Residential Mandatory Requirements Summary

§ 150.0(m)13:	**Space Conditioning System Airflow Rate and Fan Efficacy.** Space conditioning systems that use ducts to supply cooling must have a hole for the placement of a static pressure probe, or a permanently installed static pressure probe in the supply plenum. Airflow must be ≥ 350 CFM per ton of nominal cooling capacity, and an air-handling unit fan efficacy ≤ 0.45 watts per CFM for gas furnace air handlers and ≤ 0.58 watts per CFM for all others. Small duct high velocity systems must provide an airflow ≥ 250 CFM per ton of nominal cooling capacity, and an air-handling unit fan efficacy ≤ 0.62 watts per CFM. Field verification testing is required in accordance with Reference Residential Appendix RA3.3. *

Ventilation and Indoor Air Quality:

§ 150.0(o)1:	**Requirements for Ventilation and Indoor Air Quality**. All dwelling units must meet the requirements of ASHRAE Standard 62.2, Ventilation and Acceptable Indoor Air Quality in Residential Buildings subject to the amendments specified in § 150.0(o)1. *
§ 150.0(o)1B:	**Central Fan Integrated (CFI) Ventilation Systems.** Continuous operation of CFI air handlers is not allowed to provide the whole-dwelling unit ventilation airflow required per §150.0(o)1C. A motorized damper(s) must be installed on the ventilation duct(s) that prevents all airflow through the space conditioning duct system when the damper(s) is closed andcontrolled per §150.0(o)1Biii&iv. CFI ventilation systems must have controls that track outdoor air ventilation run time, and either open or close the motorized damper(s) for compliance with §150.0(o)1C.
§ 150.0(o)1C:	**Whole-Dwelling Unit Mechanical Ventilation for Single-Family Detached and townhouses .** Single-family detached dwelling units, and attached dwelling units not sharing ceilings or floors with other dwelling units, occupiable spaces, public garages, or commercial spaces must have mechanical ventilation airflow specified in § 150.0(o)1Ci-iii.
§ 150.0(o)1G:	**Local Mechanical Exhaust.** Kitchens and bathrooms must have local mechanical exhaust; nonenclosed kitchens must have demand-controlled exhaust system meeting requirements of §150.0(o)1Giii,enclosed kitchens and bathrooms can use demand-controlled or continuous exhaust meeting §150.0(o)1Giii-iv. Airflow must be measured by the installer per §150.0(o)1Gv, and rated for sound per §150.0(o)1Gvi. *
§ 150.0(o)1H&I:	**Airflow Measurement and Sound Ratings of Whole-Dwelling Unit Ventilation Systems.** The airflow required per § 150.0(o)1C must be measured by using a flow hood, flow grid, or other airflow measuring device at the fan's inlet or outlet terminals/grilles per Reference Residential Appendix RA3.7. Whole-Dwelling unit ventilation systems must be rated for sound per ASHRAE 62.2 §7.2 at no less than the minimum airflow rate required by §150.0(o)1C.
§ 150.0(o)2:	**Field Verification and Diagnostic Testing.** Whole-Dwelling Unit ventilation airflow, vented range hood airflow and sound rating, and HRV and ERV fan efficacy must be verified in accordance with Reference Residential Appendix RA3.7. Vented range hoods must be verified per Reference Residential Appendix RA3.7.4.3 to confirm if it is rated by HVI or AHAM to comply with the airflow rates and sound requirements per §150.0(o)1G

Pool and Spa Systems and Equipment:

§ 110.4(a):	**Certification by Manufacturers.** Any pool or spa heating system or equipment must be certified to have all of the following: compliance with the Appliance Efficiency Regulations and listing in MAEDbS; an on-off switch mounted outside of the heater that allows shutting off the heater without adjusting the thermostat setting; a permanent weatherproof plate or card with operating instructions; and must not use electric resistance heating. *
§ 110.4(b)1:	**Piping.** Any pool or spa heating system or equipment must be installed with at least 36 inches of pipe between the filter and the heater, or dedicated suction and return lines, or built-in or built-up connections to allow for future solar heating.
§ 110.4(b)2:	**Covers.** Outdoor pools or spas that have a heat pump or gas heater must have a cover.
§ 110.4(b)3:	**Directional Inlets and Time Switches for Pools.** Pools must have directional inlets that adequately mix the pool water, and a time switch that will allow all pumps to be set or programmed to run only during off-peak electric demand periods.
§ 110.5:	**Pilot Light.** Natural gas pool and spa heaters must not have a continuously burning pilot light.
§ 150.0(p):	**Pool Systems and Equipment Installation.** Residential pool systems or equipment must meet the specified requirements for pump sizing, flow rate, piping, filters, and valves. *

Lighting:

§ 110.9:	**Lighting Controls and Components.** All lighting control devices and systems, ballasts, and luminaires must meet the applicable requirements of § 110.9. *
§ 150.0(k)1A:	**Luminaire Efficacy.** All installed luminaires must meet the requirements in Table 150.0-A, except lighting integral to exhaust fans, kitchen range hoods, bath vanity mirrors, and garage door openers; navigation lighting less than 5 watts; and lighting internal to drawers, cabinets, and linen closets with an efficacy of at least 45 lumens per watt.
§ 150.0(k)1B:	**Screw based luminaires.** Screw based luminaires must contain lamps that comply with Reference Joint Appendix JA8. *
§ 150.0(k)1C:	**Recessed Downlight Luminaires in Ceilings.** Luminaires recessed into ceilings must not contain screw based sockets, must be airtight, and must be sealed with a gasket or caulk. California Electrical Code § 410.116 must also be met.
§ 150.0(k)1D:	**Light Sources in Enclosed or Recessed Luminaires.** Lamps and other separable light sources that are not compliant with the JA8 elevated temperature requirements, including marking requirements, must not be installed in enclosed or recessed luminaires.
§ 150.0(k)1E:	**Blank Electrical Boxes.** The number of electrical boxes that are more than five feet above the finished floor and do not contain a luminaire or other device shall be no more than the number of bedrooms. These boxes must be served by a dimmer, vacancy sensor control, low voltage wiring, or fan speed control.
§ 150.0(k)1F:	**Lighting Integral to Exhaust Fans.** Lighting integral to exhaust fans (except when installed by the manufacturer in kitchen exhaust hoods) must meet the applicable requirements of § 150.0(k). *

5/6/22

MONO COUNTY ADU PROTOTYPES
MONO COUNTY

ENERGY COMPLIANCE - PLAN 5 - RAISED FOUNDATION

DATE
01/10/2024

SHEET
T24-B502

PUBLIC SET

2022 Single-Family Residential Mandatory Requirements Summary

§ 150.0(k)1G:	**Screw based luminaires.** Screw based luminaires must contain lamps that comply with Reference Joint Appendix JA8. *
§ 150.0(k)1H:	**Light Sources in Enclosed or Recessed Luminaires.** Lamps and other separable light sources that are not compliant with the JA8 elevated temperature requirements, including marking requirements, must not be installed in enclosed or recessed luminaires.
§ 150.0(k)1I:	**Light Sources in Drawers, Cabinets, and Linen Closets.** Light sources internal to drawers, cabinetry or linen closets are not required to comply with Table 150.0-A or be controlled by vacancy sensors provided that they are rated to consume no more than 5 watts of power, emit no more than 150 lumens, and are equipped with controls that automatically turn the lighting off when the drawer, cabinet or linen closet is closed.
§ 150.0(k)2A:	**Interior Switches and Controls.** All forward phase cut dimmers used with LED light sources must comply with NEMA SSL 7A.
§ 150.0(k)2B:	**Interior Switches and Controls.** Exhaust fans must be controlled separately from lighting systems. *
§ 150.0(k)2A:	**Accessible Controls.** Lighting must have readily accessible wall-mounted controls that allow the lighting to be manually turned on and off. *
§ 150.0(k)2B:	**Multiple Controls.** Controls must not bypass a dimmer, occupant sensor, or vacancy sensor function if the dimmer or sensor is installed to comply with § 150.0(k).
§ 150.0(k)2C:	**Mandatory Requirements.** Lighting controls must comply with the applicable requirements of § 110.9.
§ 150.0(k)2D:	**Energy Management Control Systems.** An energy management control system (EMCS) may be used to comply with dimming, occupancy, and control requirements if it provides the functionality of the specified control per § 110.9 and the physical controls specified in § 150.0(k)2A.
§ 150.0(k)2E:	**Automatic Shutoff Controls.** In bathrooms, garages, laundry rooms, utility rooms and walk-in closets, at least one installed luminaire must be controlled by an occupancy or vacancy sensor providing automatic-off functionality. Lighting inside drawers and cabinets with opaque fronts or doors must have controls that turn the light off when the drawer or door is closed.
§ 150.0(k)2F:	**Dimmers.** Lighting in habitable spaces (e.g., living rooms, dining rooms, kitchens, and bedrooms) must have readily accessible wall-mounted dimming controls that allow the lighting to be manually adjusted up and down. Forward phase cut dimmers controlling LED light sources in these spaces must comply with NEMA SSL 7A.
§ 150.0(k)2K:	**Independent controls.** Integrated lighting of exhaust fans shall be controlled independently from the fans. Lighting under cabinets or shelves, lighting in display cabinets, and switched outlets must be controlled separately from ceiling-installed lighting.
§ 150.0(k)3A:	**Residential Outdoor Lighting.** For single-family residential buildings, outdoor lighting permanently mounted to a residential building, or to other buildings on the same lot, must have a manual on/off switch and either a photocell and motion sensor or automatic time switch control) or an astronomical time clock. An energy management control system that provides the specified control functionality and meets all applicable requirements may be used to meet these requirements.
§ 150.0(k)4:	**Internally illuminated address signs.** Internally illuminated address signs must either comply with § 140.8 or consume no more than 5 watts of power.
§ 150.0(k)5:	**Residential Garages for Eight or More Vehicles.** Lighting for residential parking garages for eight or more vehicles must comply with the applicable requirements for nonresidential garages in §§ 110.9, 130.0, 130.1, 130.4, 140.6, and 141.0.

Solar Readiness:

§ 110.10(a)1:	**Single-family Residences.** Single-family residences located in subdivisions with 10 or more single-family residences and where the application for a tentative subdivision map for the residences has been deemed complete and approved by the enforcement agency, which do not have a photovoltaic system installed, must comply with the requirements of § 110.10(b)-(e).
§110.10(b)1A:	**Minimum Solar Zone Area.** The solar zone must have a minimum total area as described below. The solar zone must comply with access, pathway, smoke ventilation, and spacing requirements as specified in Title 24, Part 9 or other parts of Title 24 or in any requirements adopted by a local jurisdiction. The solar zone total area must be comprised of areas that have no dimension less than 5 feet and are no less than 80 square feet each for buildings with roof areas less than or equal to 10,000 square feet or no less than 160 square feet each for buildings with roof areas greater than 10,000 square feet. For single-family residences, the solar zone must be located on the roof or overhang of the building and have a total area no less than 250 square feet. *
§ 110.10(b)2:	**Azimuth.** All sections of the solar zone located on steep-sloped roofs must have an azimuth between 90-300° of true north.
§ 110.10(b)3A:	**Shading.** The solar zone must not contain any obstructions, including but not limited to: vents, chimneys, architectural features, and roof mounted equipment. *
§ 110.10(b)3B:	**Shading.** Any obstruction located on the roof or any other part of the building that projects above a solar zone must be located at least twice the horizontal distance of the height difference between the highest point of the obstruction and the horizontal projection of the nearest point of the solar zone, measured in the vertical plane. *
§ 110.10(b)4:	**Structural Design Loads on Construction Documents.** For areas of the roof designated as a solar zone, the structural design loads for roof dead load and roof live load must be clearly indicated on the construction documents.
§ 110.10(c):	**Interconnection Pathways.** The construction documents must indicate: a location reserved for inverters and metering equipment and a pathway reserved for routing of conduit from the solar zone to the point of interconnection with the electrical service; and for single-family residences and central water-heating systems, a pathway reserved for routing plumbing from the solar zone to the water-heating system.
§ 110.10(d):	**Documentation.** A copy of the construction documents or a comparable document indicating the information from § 110.10(b)-(c) must be provided to the occupant.
§ 110.10(e)1:	**Main Electrical Service Panel.** The main electrical service panel must have a minimum busbar rating of 200 amps.
§ 110.10(e)2:	**Main Electrical Service Panel.** The main electrical service panel must have a reserved space to allow for the installation of a double pole circuit breaker for a future solar electric installation. The reserved space must be permanently marked as "For Future Solar Electric."

Electric and Energy Storage Ready:

5/6/22

2022 Single-Family Residential Mandatory Requirements Summary

§ 150.0(s)	**Energy Storage System (ESS) Ready.** All single-family residences must meet all of the following: Either ESS-ready interconnection equipment with backed up capacity of 60 amps or more and four or more ESS supplied branch circuits, *or* a dedicated raceway from the main service to a subpanel that supplies the branch circuits in § 150.0(s); at least four branch circuits must be identified and have their source collocated at a single panelboard suitable to be supplied by the ESS, with one circuit supplying the refrigerator, one lighting circuit near the primary exit, and one circuit supplying a sleeping room receptacle outlet; main panelboard must have a minimum busbar rating of 225 amps; sufficient space must be reserved to allow future installation of a system isolation equipment/transfer switch within 3' of the main panelboard, with raceways installed between the panelboard and the switch location to allow the connection of backup power source.
§ 150.0(t)	**Heat Pump Space Heater Ready.** Systems using gas or propane furnaces to serve individual dwelling units must include: A dedicated unobstructed 240V branch circuit wiring installed within 3' of the furnace with circuit conductors rated at least 30 amps with the blank cover identified as "240V ready;" and a reserved main electrical service panel space to allow for the installation of a double pole circuit breaker permanently marked as "For Future 240V use."
§ 150.0(u)	**Electric Cooktop Ready.** Systems using gas or propane cooktop to serve individual dwelling units must include: A dedicated unobstructed 240V branch circuit wiring installed within 3' of the cooktop with circuit conductors rated at least 50 amps with the blank cover identified as "240V ready;" and a reserved main electrical service panel space to allow for the installation of a double pole circuit breaker permanently marked as "For Future 240V use."
§ 150.0(v)	**Electric Clothes Dryer Ready.** Clothes dryer locations with gas or propane plumbing to serve individual dwelling units must include: A dedicated unobstructed 240V branch circuit wiring installed within 3' of the dryer location with circuit conductors rated at least 30 amps with the blank cover identified as "240V ready;" and a reserved main electrical service panel space to allow for the installation of a double pole circuit breaker permanently marked as "For Future 240V use."

*Exceptions may apply.

5/6/22

ROOM LOAD SUMMARY

Project Name: *Mono County ADU (Plan 5)*
Date: *11/20/2023*
System Name: *HVAC System*
Floor Area: *1,033*

ROOM LOAD SUMMARY

			ROOM COOLING PEAK			COIL COOLING PEAK			COIL HTG. PEAK	
Zone Name	Room Name	Mult.	CFM	Sensible	Latent	CFM	Sensible	Latent	CFM	Sensible
Living Area	*1st Floor ADU*	*1*	*427*	*7,272*	*-105*	*427*	*7,272*	*-105*	*474*	*14,935*
					PAGE TOTAL	*427*	*7,272*	*-105*	*474*	*14,935*
					TOTAL *	*427*	*7,272*	*-105*	*474*	*14,935*

* Total includes ventilation load for zonal systems.

MONO COUNTY

MONO COUNTY ADU PROTOTYPES
MONO COUNTY

ENERGY COMPLIANCE - PLAN 5 - RAISED FOUNDATION

PUBLIC SET

DATE
01/10/2024

SHEET

SITE PLAN TO BE PROVIDED BY APPLICANT

SITE PLAN LEGEND

- PROPERTY LINE
- SETBACK
- EASTMENT
- (E) FENCE
- (E) WALLS / RETAINING WALLS

SITE PLAN GENERAL NOTES

1. REFER TO GENERAL NOTES SHEET G-101 FOR ADDITIONAL REQUIREMENTS
2. REFER TO STRUCTURAL PLANS FOR FURTHER INFORMATION
3. EMERGENCY ESCAPE AND RESCUE OPENINGS SHALL OPEN DIRECTLY INTO A PUBLIC WAY PER 2022 CRC, SECTION 310.1.
4. NOT LESS THAN 30" OF CLEARANCE IN WIDTH, DEPTH, & HEIGHT SHALL BE PROVIDED TO ACCESS EXTERIOR MECHANICAL EQUIPMENT. SHOW LOCATION ON SITE PLAN & LABEL (2022 CMC SECTION 304.1 & 2022 CPC 504.3).

SITE PLAN CHECKLIST

IF (N) ADU IS 5' - 0" OR LESS TO ANY PROPERTY LINE AND/OR ADU IS 10' - 0" OR LESS FROM ANY ADJACENT BUILDING OR STRUCTURE:

☐ **NO** ☐ **YES;** IF YES, FIRE RATED WALL & ROOF REQUIRED PER 2022 CBC, CHAPTER 2. **SEE DETAILS**: **52/A-901 & 32/A-903**

ELECTRICAL PANEL: ☐ **OPTION 1 -** NEW ELECTRICAL MAIN PANEL WITH 225 AMP MINIMUM BUSBAR RATING

☐ **OPTION 2 -** A NEW ELECTRICAL SUBPANEL CONNECTS TO THE ELECTRICAL MAIN PANEL OF THE PRIMARY HOME WITH A 225 AMP MINIMUM BUSBAR RATING. A SEPARATE ELECTRICAL PERMIT SHALL BE PULLED FOR THE ELECTRICAL MAIN PANEL OF THE PRIMARY HOME, ELECTRICAL LOAD CALCULATIONS IS REQUIRED.

☐ **FOOTPRINT OF ALL EXISTING AND PROPOSED BUILDINGS**
PLOT THE PROPOSED ADU BUILDING FOOTPRINT ALONG WITH ANY OTHER EXISTING BUILDINGS ONSITE. THIS INCLUDES ALL STRUCUTRES / PORCHES / GAZEBOS. IF AN OPTIONAL COVERED PATIO IS SELECTED, PLEASE PLOT THAT AS WELL.

☐ **AREA OF EXISTING BUILDING**
INDICATE THE SQUARE FOOTAGE OF THE EXISTING HOUSE.

☐ **FOOTPRINT OF PROPOSED ADU**
REFER TO LEGEND FOR FOOTPRINT AT 10'=1" SCALE

☐ **DRAWING SCALE**
SITE PLAN SHOULD BE DRAWN TO A MEASURABLE SCALE.

☐ **PROPERTY LINES**
SHOW OUTLINE OF PROPERTY USING DASHED LINE IN LEGEND. INDICATE THE BEARING AND DISTANCE OF THE PROPERTY LINE.

☐ **LABEL YARDS**
LABEL FRONT, REAR, SIDE YARDS, AS WELL AS DRIVEWAYS, PATHWAYS AND ANY OTHER HARDSCAPE.

☐ **SETBACKS**
DIMENSION THE DISTANCE BETWEEN BUILDINGS AND PROPOERTY LINES, AS WELL AS BUILIDNGS TO OTHER STRUCTURES. SETBACKS TO SIDE AND REAR PROPERTY SIDE SHALL BE A MINIMUM OF (4' - 0").

☐ **EASEMENTS**
REFER TO LEGEND. MUST INCLUDE ALL APPLICABLE EASEMENTS. PROPOSED STRUCTURE SHALL COMPLY WITH EASEMENT REQUIREMENTS.

☐ **LOCATION OF RAIN WATER LEADERS**
THE ROOF DRAINS SHOULD DRAIN AWAY FROM THE PROPERTY LINES AND INTO THE LANDSCAPE AREA.

☐ **LABEL STREETS & SIDEWALKS**

☐ **DIMENSION BUILDING SEPARATION**
DIMENSION THE DISTANCE BETWEEN THE PROPOSED ADU AND ANY EXISTING STRUCTURES

☐ **LOT COVERAGE CALCULATION**
TOTAL FOOTPRINT AREA FOR STRUCTURES ON SITE / LOT AREA

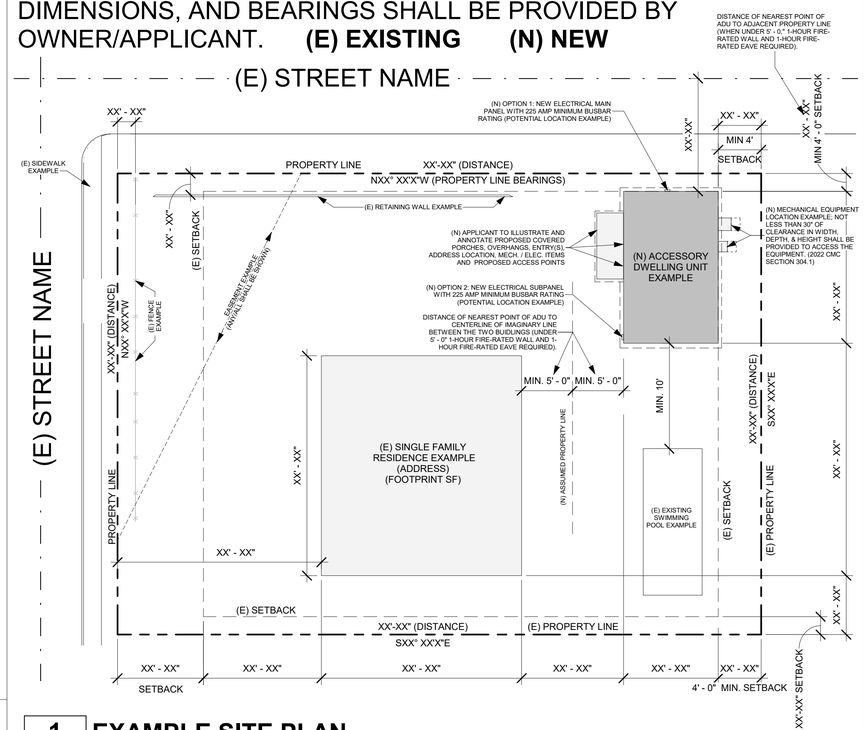
☐ **SWIMMING POOLS**
ALL EXISTING SWIMMING POOLS SHALL BE SHOWN ON THE SITE PLAN AND SHALL HAVE 10' MINIMUM SETBACK TO THE NEW ADU STRUCTURE.

☐ **PORCHES**
THERE SHALL BE NO MORE THAN 30 INCHES MEASURED VERITCALLY TO THE FLOOR OR GRADE BELOW (INCLUDING FLOORS, STAIRS, RAMPS, AND LANDINGS) ANYWHERE MEASURED LESS THAN 36 INCHES HORIZONTALLY TO THE EDGE OF THE PORCH/SLAB/SURFACE OF THE RAIL. INSECT SCREENING SHALL NOT BE CONSIDERED AS A GUARD.

☐ **LOCATION OF EXISTING UTILITIES**
UTILITIES, POLES, SEWER, DRAINS, ELECTRICAL, GAS METERS AND LINES AND ANY PHOTOVOLTATIC.

☐ **LOCATION OF PROPOSED UTILITIES**
PROPOSED UTILITIES SHALL CONFORM TO REQUIREMENTS OF CONTRA COSTA COUNTY SANITARY DISTRICT. SANITARY SEWER FROM ADU TO EXISTING SEWER. SEWER LINE TO THE PROPOSED ADU SHALL BE CONNECTED TO THE MAIN LATERAL AT THE PROPERTY LINE OR BEHIND THE SIDEWALK. LATERAL POINT OF CONNECTION INCLUDING REQUIRED CLEANOUTS, WATER LINE TO ADU, ELECTRIC TO ADU INCLUDING ANY NEW METERS OR SUBPANELS.

NOTE: THIS IS AN EXAMPLE SITE PLAN. EXACT LAYOUT, DIMENSIONS, AND BEARINGS SHALL BE PROVIDED BY OWNER/APPLICANT. **(E) EXISTING** **(N) NEW**



1 EXAMPLE SITE PLAN
AS-101 SCALE: 1" = 20'-0"

MONO COUNTY

THESE PLANS ARE PROVIDED BY MONO COUNTY AS PART OF THE PRE-APPROVED ADU PROGRAM AND ARE PUBLIC DOMAIN, THERE CANNOT BE A CHARGE TO PROVIDE THESE PLANS. NO ALTERATIONS TO THESE PLANS ARE ALLOWED, ALL ALTERATIONS MUST BE DONE UNDER A SEPARATE PERMIT ONCE THE BUILDING PERMIT FOR THE ADU HAS BEEN ISSUED AND FINAL INSPECTION COMPLETED. IF YOU DO NOT HAVE THE CONSTRUCTION KNOWLEDGE AND EXPERIENCE TO CONTRUCT THESE PLANS WITHOUT FURTHER DETAILS, IT IS RECOMMENDED YOU HIRE A CONTRACTOR TO DO THE CONSTRUCTION. THE CITY WILL NOT PROVIDE FURTHER INFORMATION OR DETAILS AND BUILDING INSPECTORS WILL NOT PROVIDE STEP BY STEP INSTRUCTIONS IN THE FIELD.

SITE PLAN | **SCALE:** | **NORTH ARROW**

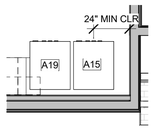
PUBLIC SET

MONO COUNTY ADU PROTOTYPES
MONO COUNTY
SITE PLAN INSTRUCTIONS & EXAMPLE

DATE
01/10/2024

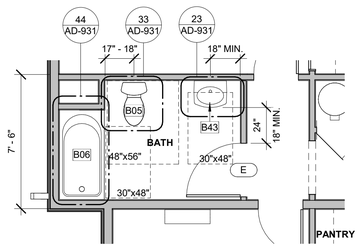
SHEET
AS-101

1/25/2024 4:05:52 PM
Autodesk Docs://2340-04_Mono County ADUs - Code Updates/2340-01_Mono County ADUs_2022 Code Update.rvt



4 OPT. ADAPTABLE WASHER/DRYER

A5-101 | A5-101 SCALE: 1/4" = 1'-0"

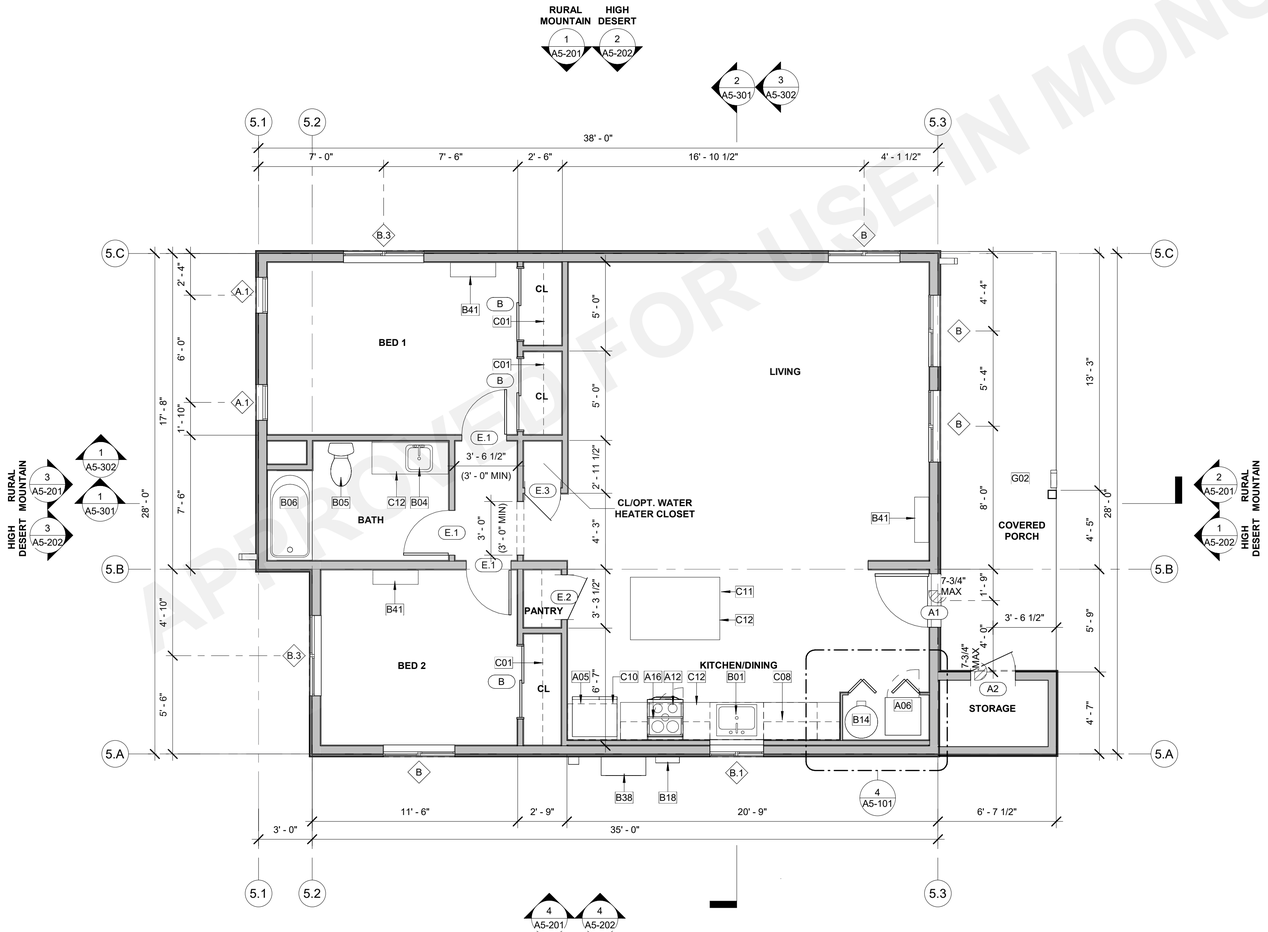


3 OPT. ADAPTABLE BATH

A1-201 | A5-101 SCALE: 1/4" = 1'-0"

KEYNOTES

A05	REFRIGERATOR LOCATION PER OWNER. PROVIDE ROUGH PLUMBING FOR ICE MAKER (RECESS IN WALL).
A06	STACKED WASHER/DRYER MACHINE LOCATION. PROVIDE WASTE AND WATER IN RECESSED WALL BOX. PROVIDE DRYER VENT. VENT TO OUTSIDE AIR.
A12	24" WIDE FREE STANDING ELECTRIC RANGE OVEN. PROVIDE VENT HOOD. VENT TO EXTERIOR, STAINLESS STEEL.
A15	FRONT LOADING WASHER. PROVIDE WASTE AND WATER IN RECESSED WALL BOX.
A16	MICROWAVE OVER RANGE.
A19	FRONT LOADING DRYER W/ RECESSED DRYER VENT BOX. PROVIDE DRYER VENT. VENT TO OUTSIDE AIR.
B01	30" SINGLE COMPARTMENT UNDER-MOUNT KITCHEN SINK W/ GARBAGE DISPOSAL. REFER TO WATER EFFICIENCY REQUIREMENTS ON CALGREEN CODE NOTES SHEET.
B04	LAVATORY SINK. REFER TO WATER EFFICIENCY REQUIREMENTS ON CALGREEN CODE NOTES SHEETS.
B05	WATER CLOSET. REFER TO WATER EFFICIENCY REQUIREMENTS ON CALGREEN CODE NOTES SHEETS.
B06	30" x 60" x 72" TUB AND SHOWER COMBINATION. FIBER-CEMENT BACKER SHALL BE USED AS A BASE FOR CERAMIC WALL TILES IN TUB/SHOWER AREA. GREEN BOARD SHALL NOT BE USED. MODEL BY BUILDER. PROVIDE SHOWER ROD.
B14	50 GALLON TANK TYPE ELECTRIC WATER HEATER. REFER TO TITLE 24 FOR ADDITIONAL INFORMATION.
B18	EXTERIOR RATED ELECTRIC SUB PANEL 80 AMP 120/240 VOLT. CONTRACTOR TO VERIFY MAIN PANEL.
B38	WALL-MOUNTED MULTI-ZONE HEAT PUMP CONDENSING UNIT. REFER TO PLANS FOR LOCATION OF INDOOR FAN FAN COIL UNITS. REFER TO TITLE 24 FOR ADDITIONAL INFORMATION.
B41	FAN COIL. REFER TO PLANS FOR LOCATION OF OUTDOOR CONDENSING UNIT. PROVIDE CONDENSATE DRAIN TO EXTERIOR PER MANUF. REFER TO TITLE 24 FOR ADDITIONAL INFORMATION. PROVIDE OUTLET.
B43	ACCESSIBLE WALL MOUNTED LAVATORY SINK. MAX HEIGHT 34". REFER TO WATER EFFICIENCY REQUIREMENTS ON CALGREEN CODE NOTES SHEETS.
C01	SINGLE WOOD SHELF AND POLE.
C08	12" DEEP UPPER CABINET
C10	24" DEEP UPPER CABINET.
C11	34 1/2" ISLAND BASE CABINET WITH COUNTER TOP
C12	34 1/2" HIGH BASE CABINET AND COUNTERTOP.
G02	AT [SLAB ON GRADE] CONCRETE FLATWORK. 1/4"/FT SLOPE AWAY FROM BUILDING. AT [RAISED FOUNDATION] 2X COMPOSITE IGNITION RESISTANT DECKING, TREX OR EQUAL, OVER 4X6 PT WOOD JOISTS @ 16" O.C. REFER TO DETAILS 41, 51, 52, 54 SHEET AD-902.



1 PLAN 5 - GROUND FLOOR PLAN

A1-201 | A5-101 SCALE: 1/4" = 1'-0"

WINDOW GENERAL NOTES

1. REFER TO GENERAL NOTES ON SHEET G-101 FOR ADDITIONAL REQUIREMENTS.
2. REFER TO FLOOR PLANS FOR WINDOW LOCATIONS.
3. CONTRACTOR TO VERIFY EXACT ROUGH OPENING SIZES PRIOR TO FABRICATION OF ROUGH OPENINGS.
4. INSTALL PER MANUFACTURERS WRITTEN INSTRUCTIONS.
5. REFER TO ENERGY COMPLIANCE REPORTS FOR U-FACTOR, SHGC AND ADDITIONAL WINDOW REQUIREMENTS.
6. ALL GLAZING IS DOUBLE PANE WITH A MINIMUM OF ONE TEMPERED PANE OR TO BE 20-MINUTE FIRE-RESISTENCE RATING. (LISTED AND APPROVED ASSEMBLY)
7. EGRESS WINDOWS SHALL HAVE A CLEAR OPENING WITH A MAX. SILL HEIGHT OF 44" AFF, MIN NET CLEAR OPENING FOR EMERGENCY ESCAPE SHALL BE 5.7 S.F. EXCEPTION: MIN 5 S.F. AT GROUND FLOOR, MINIMUM NET CLEAR OPENING DIMENSIONS: HEIGHT: 24", WIDTH: 20".

WINDOW REMARKS

1. REQUIRED EGRESS WINDOW. REFER TO GENERAL NOTE #7 FOR ADDITIONAL INFORMATION.
2. HAZARDOUS LOCATION. WINDOW INCLUDES BOTH PANES TEMPERED GLAZING.
3. HIGH WINDOW. REFER TO ELEVATIONS FOR LOCATION.

WINDOW SCHEDULE

SCHEDULE-WINDOW PLAN 5 RURAL MOUNTAIN & HIGH DESERT

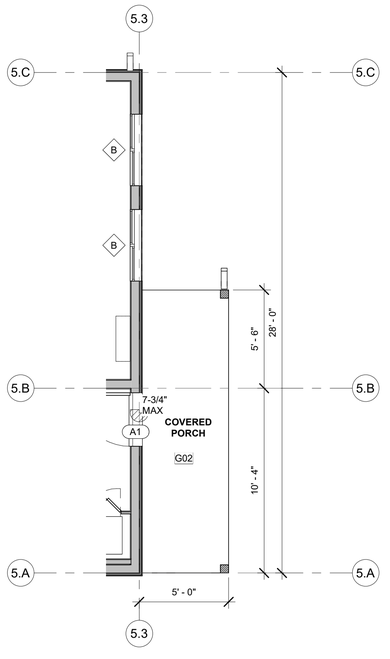
NO.	TYPE	COUNT	SIZE WIDTH	SIZE HEIGHT	HEAD HEIGHT	REMARKS
PLAN 5	A.1	2	2' - 0"	3' - 0"	6' - 8"	
PLAN 5	B	4	4' - 0"	4' - 0"	6' - 8"	
PLAN 5	B.3	2	4' - 6"	4' - 0"	6' - 8"	1

WINDOW LEGEND

A - A.1 SINGLE HUNG.

B - B.8 SLIDER.

C - C.1 FIXED



2 PLAN 5 HIGH DESERT OPT.

A5-101 SCALE: 1/4" = 1'-0"

FLOOR PLAN GENERAL NOTES

1. REFER TO GENERAL NOTES SHEET G-101 AND G-102 FOR ADDITIONAL REQUIREMENTS.
2. REFER TO STRUCTURAL PLANS FOR FURTHER INFORMATION.
3. REFER TO ELECTRICAL PLANS FOR FURTHER INFORMATION IF PROVIDED.
4. REFER TO MECHANICAL PLANS, DRAWINGS OR REPORTS FOR FURTHER INFORMATION.
5. ALL FURNITURE AND EQUIPMENT IS BY OWNER AND IS SHOWN FOR COORDINATION PURPOSES ONLY.
7. DIMENSIONS ARE TO FACE OF FRAMING UNLESS SPECIFICALLY NOTED OTHERWISE.
8. PROVIDE ADEQUATE BLOCKING IN WALLS FOR CABINETS AND OTHER WALL MOUNTED ACCESSORIES INCLUDING BUT NOT LIMITED TO HANDRAILS, SHELVING AND BATHROOM FIXTURES.
9. PROVIDE FIREBLOCKING FOR WALL CAVITIES THAT EXCEED 2019 CBC HEIGHT LIMITATIONS
10. DOOR AND WINDOW DIMENSIONS ARE CENTERED AT OPENINGS
11. WHERE DOOR IS LOCATED WITHOUT DIMENSION AT THE CORNER OF A ROOM IT SHALL BE 4" FROM FACE OF FRAMING OF ADJACENT WALL TO ROUGH DOOR OPENING
12. WHERE RECESSED FIXTURES OCCUR IN WALLS OR HORIZONTAL ASSEMBLIES, THE FIRE RATING OF THOSE ASSEMBLIES SHALL BE MAINTAINED.
13. AT ALL PENETRATIONS AND INTERSECTIONS OF FIRE-RATED PARTITIONS, PROVIDE FIRE SEALANT AND/OR FIRE STOPPING TO MAINTAIN CONTINUITY OF PARTITION RATING

LEGEND

EXTERIOR - 5 1/2" WOOD STUD W/ PLYWOOD SHEATHING AND EXTERIOR FINISH (REFER TO ELEVATIONS), ONE LAYER 5/8" TYPE X GYPSUM WALL BOARD INTERIOR.

INTERIOR - 3 1/2" WOOD STUD W/ONE LAYER 5/8" TYPE X GYPSUM WALL BOARD EACH SIDE.

DOOR GENERAL NOTES

1. REFER TO GENERAL NOTES SHEET G-101 FOR ADDITIONAL REQUIREMENTS
2. REFER TO PLANS FOR LOCATION OF DOORS.
3. VERIFY ROUGH OPENING SIZE WITH DOOR MANUFACTURER SPECIFICATIONS PRIOR TO CONSTRUCTION.
4. CONTRACTOR TO VERIFY ACTUAL DOOR SIZE TO FIT FINISH OPENING PRIOR TO FABRICATION OF DOOR AND FINISH OPENING.
5. INSTALL PER MANUFACTURERS WRITTEN INSTRUCTIONS.
6. EXTERIOR DOORS SHALL EITHER HAVE A FIRE-RESISTANCE RATING OF NOT LESS THAN 20-MINUTES OR SHALL BE CONSTRUCTED OF SOLID CORE WOOD THAT COMPLIES WITH THE FOLLOWING REQUIREMENTS:
   A. STILES AND RAILS SHALL NOT BE LESS THAN 1-3/8" THICK.
   B. PANELS SHALL NOT BE LESS THAN 1-1/4" THICK, EXCEPT FOR THE EXTERIOR PERIMETR OF THE PANEL SHALL BE PERMITTED TO TAPER TO A TONGUE OF NOT LESS THAN 3/8" THICK.
7. REFER TO DOOR TYPES LEGEND FOR GLAZING.
8. REFER TO T24 REPORT FOR GLAZING ENERGY REQUIREMENTS.
9. GLAZING IN DOORS SHALL BE TEMPERED PER ***SECTION R308.4.1***.

DOOR REMARKS

1. EXTERIOR DOOR. REFER TO GENERAL DOOR NOTE #6
2. GLAZING PER DOOR TYPES. REFER TO GENERAL DOOR NOTE #9
3. PROVIDE 100 SQ INCHES OF VENTING IN DOOR OR BY OTHER APPROVED MEANS.
4. OPTIONAL DOOR.
5. 3'-0" WIDTH DOOR FOR OPTIONAL ADAPTABLE BATH.

DOOR SCHEDULE

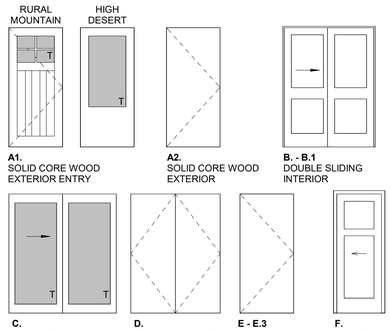
SCHEDULE-DOOR PLAN 5

NO.	TYPE	DOOR WIDTH	DOOR HEIGHT	REMARKS
PLAN 5	A1	3' - 0"	6' - 8"	
PLAN 5	A2	2' - 6"	6' - 8"	
PLAN 5	B	4' - 0"	6' - 8"	
PLAN 5	E.1	2' - 6"	6' - 8"	
PLAN 5	E.2	2' - 6"	6' - 8"	

SCHEDULE-DOOR PLAN 5 ADA

NO.	TYPE	DOOR WIDTH	DOOR HEIGHT	REMARKS
PLAN 5	A1	3' - 0"	6' - 8"	
PLAN 5	A2	2' - 6"	6' - 8"	
PLAN 5	B	4' - 0"	6' - 8"	
PLAN 5	E	3' - 0"	6' - 8"	
PLAN 5	E.1	2' - 6"	6' - 8"	
PLAN 5	E.2	2' - 6"	6' - 8"	

DOOR LEGEND



A1. SOLID CORE WOOD EXTERIOR ENTRY

A2. SOLID CORE WOOD EXTERIOR

B. - B.1 DOUBLE SLIDING INTERIOR

C. SLIDING GLASS EXTERIOR.

D. SOLID CORE WOOD EXTERIOR

E - E.3 HOLLOW CORE WOOD INTERIOR

F. HOLLOW CORE WOOD POCKET

MONO COUNTY

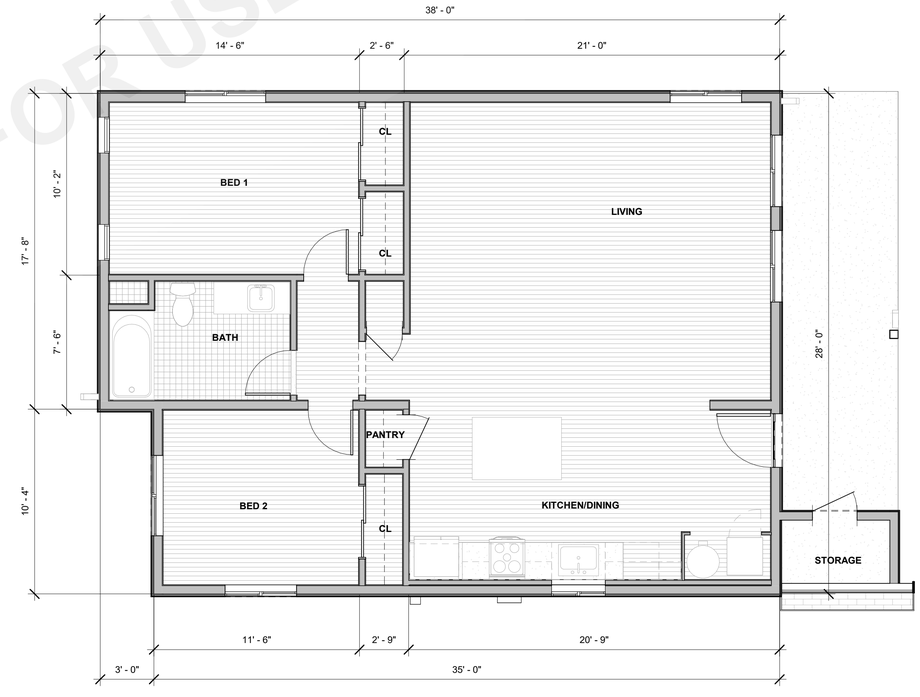
THESE PLANS ARE PROVIDED BY MONO COUNTY AS PART OF THE PRE-APPROVED ADU PROGRAM AND ARE PUBLIC DOMAIN, THERE CANNOT BE A CHARGE TO PROVIDE THESE PLANS. NO ALTERATIONS TO THESE PLANS ARE ALLOWED. ALL ALTERATIONS MUST BE DONE UNDER A SEPARATE PERMIT ONCE THE BUILDING PERMIT FOR THE ADU HAS BEEN ISSUED AND FINAL INSPECTION COMPLETED. IF YOU DO NOT HAVE THE CONSTRUCTION KNOWLEDGE AND EXPERIENCE TO CONTRUCT THESE PLANS WITHOUT FURTHER DETAILS, IT IS RECOMMENDED YOU HIRE A CONTRACTOR TO DO THE CONSTRUCTION. THE CITY WILL NOT PROVIDE FURTHER INFORMATION OR DETAILS AND BUILDING INSPECTORS WILL NOT PROVIDE STEP BY STEP INSTRUCTIONS IN THE FIELD.

MONO COUNTY ADU PROTOTYPES
MONO COUNTY
FLOOR PLAN / DOOR WINDOW SCHEDULES

PUBLIC SET

DATE 01/10/2024

SHEET A5-101



1 GROUND FLOOR FINISH PLAN

A1-201 | A5-102 SCALE: 1/4" = 1'-0"

FLOOR PLAN GENERAL NOTES

1. REFER TO GENERAL NOTES SHEET G-101 AND G-102 FOR ADDITIONAL REQUIREMENTS.
2. REFER TO STRUCTURAL PLANS FOR FURTHER INFORMATION.
3. REFER TO ELECTRICAL PLANS FOR FURTHER INFORMATION IF PROVIDED.
4. REFER TO MECHANICAL PLANS, DRAWINGS OR REPORTS FOR FURTHER INFORMATION.
5. ALL FURNITURE AND EQUIPMENT IS BY OWNER AND IS SHOWN FOR COORDINATION PURPOSES ONLY.
7. DIMENSIONS ARE TO FACE OF FRAMING UNLESS SPECIFICALLY NOTED OTHERWISE.
8. PROVIDE ADEQUATE BLOCKING IN WALLS FOR CABINETS AND OTHER WALL MOUNTED ACCESSORIES INCLUDING BUT NOT LIMITED TO HANDRAILS, SHELVING AND BATHROOM FIXTURES.
9. PROVIDE FIREBLOCKING FOR WALL CAVITIES THAT EXCEED 2019 CBC HEIGHT LIMITATIONS
10. DOOR AND WINDOW DIMENSIONS ARE CENTERED AT OPENINGS
11. WHERE DOOR IS LOCATED WITHOUT DIMENSION AT THE CORNER OF A ROOM IT SHALL BE 4" FROM FACE OF FRAMING OF ADJACENT WALL TO ROUGH DOOR OPENING
12. WHERE RECESSED FIXTURES OCCUR IN WALLS OR HORIZONTAL ASSEMBLIES, THE FIRE RATING OF THOSE ASSEMBLIES SHALL BE MAINTAINED
13. AT ALL PENETRATIONS AND INTERSECTIONS OF FIRE-RATED PARTITIONS, PROVIDE FIRE SEALANT AND/OR FIRE STOPPING TO MAINTAIN CONTINUITY OF PARTITION RATING

KEYNOTES

FINISH PLAN GENERAL NOTES

1. REFER TO GENERAL NOTES SHEET G-101 FOR ADDITIONAL REQUIREMENTS.
2. REFER TO ELECTRICAL PLANS FOR FURTHER INFORMATION.
3. REFER TO PLUMBING PLANS FOR FURTHER INFORMATION.
4. REFER TO DETAILS FOR FLOOR/CEILING ASSEMBLIES AND INTERIOR FINISH DETAILS.
5. ALL HARD SURFACE FLOORING SHALL BE SLIP RESISTANT AND MEET THE ***ANSI A326.3*** STANDARD FOR MEASURING THE DYNAMIC COEFFICIENT OF FRICTION (DCOF).
6. ALL FLOORING MATERIALS SHALL COMPLY WITH ***2022 CBC SEC. 804.1.***
7. ALL WALL AND CEILING FINISHES SHALL COMPLY WITH ***2022 CBC TABLE 803.12*** FOR MAXIMUM FLAME SPREAD AND SMOKE DENSITY.

FINISH SCHEDULE

FINISH SCHEDULE PLAN 2

NUMBER	NAME	FLOOR	CEILING	BASE	NOTES
109	BEDROOM	CPT	GWB		
110	LIVING	LVT	GWB		
111	KITCHEN	LVT	GWB		
112	BATH	CT	GWB		
113	W.I.C.	CPT	GWB		

FINISH LEGEND

LUXURY VINYL PLANK (LVP)

CERAMIC TILE (CT)

CONCRETE (EC)

LEGEND

EXTERIOR - 5 1/2" WOOD STUD W/ PLYWOOD SHEATHING AND EXTERIOR FINISH (REFER TO ELEVATIONS), ONE LAYER 5/8" TYPE X GYPSUM WALL BOARD INTERIOR.

INTERIOR - 3 1/2" WOOD STUD W/ONE LAYER 5/8" TYPE X GYPSUM WALL BOARD EACH SIDE.

MONO COUNTY

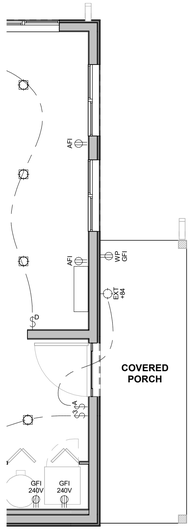
THESE PLANS ARE PROVIDED BY MONO COUNTY AS PART OF THE PRE-APPROVED ADU PROGRAM AND ARE PUBLIC DOMAIN. THERE CANNOT BE A CHARGE TO PROVIDE THESE PLANS. NO ALTERATIONS TO THESE PLANS ARE ALLOWED. ALL ALTERATIONS MUST BE DONE UNDER A SEPARATE PERMIT ONCE THE BUILDING PERMIT FOR THE ADU HAS BEEN ISSUED AND FINAL INSPECTION COMPLETED. IF YOU DO NOT HAVE THE CONSTRUCTION KNOWLEDGE AND EXPERIENCE TO CONTRUCT THESE PLANS WITHOUT FURTHER DETAILS, IT IS RECOMMENDED YOU HIRE A CONTRACTOR TO DO THE CONSTRUCTION. THE CITY WILL NOT PROVIDE FURTHER INFORMATION OR DETAILS AND BUILDING INSPECTORS WILL NOT PROVIDE STEP BY STEP INSTRUCTIONS IN THE FIELD.

MONO COUNTY ADU PROTOTYPES
MONO COUNTY
FINISH PLAN

DATE
01/10/2024

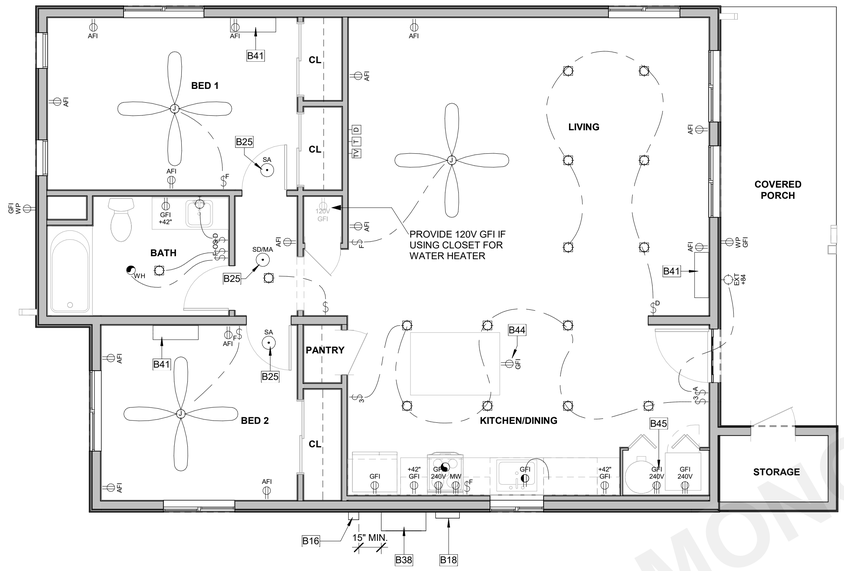
SHEET
A5-102

PUBLIC SET



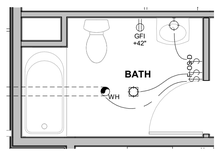
4 PLAN 5 - ELECTRICAL

A1-201 | A5-111 SCALE: 1/4" = 1'-0"



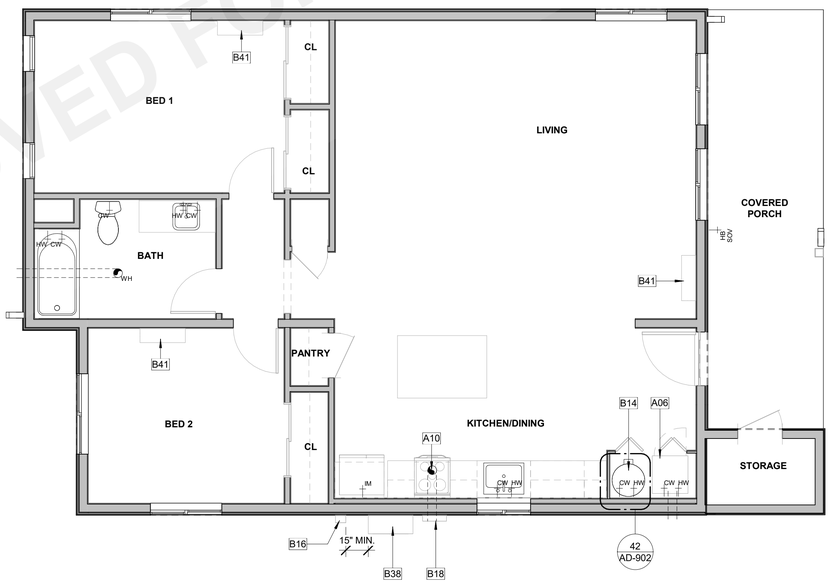
1 PLAN 5 - ELECTRICAL

A1-201 | A5-111 SCALE: 1/4" = 1'-0"



3 PLAN 5 - ELECTRICAL ADAPTABLE OPT.

A1-201 | A5-111 SCALE: 1/4" = 1'-0"



2 PLAN 5 - MECHANICAL

A1-201 | A5-111 SCALE: 1/4" = 1'-0"

KEYNOTES

A06 STACKED WASHER/DRYER MACHINE LOCATION. PROVIDE WASTE AND WATER IN RECESSED WALL BOX. PROVIDE DRYER VENT. VENT TO OUTSIDE AIR.

A10 (50) CFM MIN. INTERMITTENT VENTILATION HOOD.

B14 50 GALLON TANK TYPE ELECTRIC WATER HEATER. REFER TO TITLE 24 FOR ADDITIONAL INFORMATION.

B16 220V AIR GAP DISCONNECT, 30" CLEAR WORKING SPACE REQUIRED IN FRONT OF ELECTRICAL EQUIPMENT

B18 EXTERIOR RATED ELECTRIC SUB PANEL 80 AMP 120/240 VOLT. CONTRACTOR TO VERIFY MAIN PANEL.

B25 SMOKE ALARM OR SMOKE DETECTOR SHALL BE INSTALLED A MINIMUM OF 20 FEET HORIZONTAL DISTANCE FROM A PERMANENTLY INSTALLED COOKING APPLIANCE AND 3 FEET AWAY FROM PATH OF CEILING FAN BLADES. EXCEPTION: IONIZATION SMOKE ALARMS WITH AN ALARM SILENCING SWITCH OR PHOTOELECTRIC SMOKE ALARMS SHALL BE PERMITTED TO BE INSTALLED 10 FEET OR GREATER FROM A PERMANENTLY INSTALLED COOKING APPLIANCE. PHOTOELECTRIC SMOKE ALARMS SHALL BE PERMITTED TO BE INSTALLED GREATER THAN 6 FEET FROM PERMENANTLY INSTALLED COOKING APPLIANCE WHERE KITCHEN AND ADJACENT SAPCES HAVE NO CLEAR INTERIOR PARTITIONS AND THE 10 FOOT DISTANCE WOULD PROHIBIT PLACEMENT OF A SMOKE ALARM OR SMOKE DETECTOR REQUIRED BY OTHER SECTIONS OF THE CODE. SMOKE ALARMS SHALL BE LISTED FOR USE IN CLOSE PROXIMITY TO A PERMANENTLY INSTALLED COOKING APPLIANCE. PER CRC R314.3.3 ITEM 4.

B38 WALL-MOUNTED MULTI-ZONE HEAT PUMP CONDENSING UNIT. REFER TO PLANS FOR LOCATION OF INDOOR FAN FAN COIL UNITS. REFER TO TITLE 24 FOR ADDITIONAL INFORMATION.

B41 FAN COIL. REFER TO PLANS FOR LOCATION OF OUTDOOR CONDENSING UNIT. PROVIDE CONDENSATE DRAIN TO EXTERIOR PER MANUF. REFER TO TITLE 24 FOR ADDITIONAL INFORMATION. PROVIDE OUTLET.

B44 GFI PROTECTED RECEPTACLE TO BE LOCATED 12" BELOW THE COUNTERTOP WHERE COUNTERTOP DOES NOT EXTEND MORE THAN 6" BEYOND ITS SUPPORT BASE.

B45 OUTLET SERVING WATER HEATER SHALL BE ACCESSIBLE TO THE WATER HEATER WITH NO OBSTRUCTION. LOCATE OUTLET AT 72" A.F.F.

GENERAL ELECTRICAL NOTES

1. REFER TO ELECTRICAL NOTES ON SHEET G-101.
2. DANGER SIGNS SHALL BE CONSPICUOUSLY POSTED AT POINTS OF ACCESS TO CONDUCTORS IN ALL RACEWAY SYSTEMS AND CABLE SYSTEMS. (CEC 300.45)

LEGEND

- ELECTRICAL SWITCH
- ELECTRICAL SWITCH-THREE WAY
- ELECTRICAL SWITCH-FOUR WAY
- VS ELECTRICAL SWITCH-VACANCY SENSOR
- D ELECTRICAL SWITCH-DIMMER
- F ELECTRICAL SWITCH-FAN
- A ASTRONOMICAL TIME SWITCH
- EXHAUST FAN
- FL EXHAUST FAN/LIGHT COMBINATION
- P PENDANT LIGHT
- FL SURFACE MOUNTED HIGH-EFFICACY LIGHT
- WALL MOUNTED LIGHT
- +84 FL WALL MOUNTED HIGH-EFFICACY LIGHT
- RECESSED DOWNLIGHT
- FL RECESSED HIGH- EFFICACY DOWNLIGHT
- VP RECESSED DOWNLIGHT-VAPOR PROOF
- ELECTRICAL WIRING
- SA SMOKE DETECTOR/ALARM
- SD/MA COMBINATION SMOKE/CARBON MONOXIDE
- CHIME DOOR BELL CHIME
- PB DOOR BELL BUTTON/GARAGE DOOR OPENER BUTTON
- T TELEPHONE LOCATION
- TV CABLE TELEVISION LOCATION
- J ELECTRICAL JUNCTION BOX
- CEILING FAN OPTIONAL (PRE WIRE FOR CEILING FAN ONLY)
- GFI WP DUPLEX OUTLET ARC-FAULT CIRCUIT INTERRUPTER
- GFI 240V DUPLEX OUTLET 240 VOLTS
- 120V GFI DUPLEX OUTLET GROUND FAULT INTERRUPTER 120 VOLTS
- GFI DUPLEX OUTLET GROUND FAULT INTERRUPTER
- GFI WP DUPLEX OUTLET WATERPROOF GROUND FAULT INTERRUPTER
- GFI DUPLEX OUTLET GFCI-HALF HOT
- MW DUPLEX OUTLET MICROWAVE
- DW DUPLEX OUTLET DISH WASHER
- CW COLD WATER STUB OUT
- HW HOT WATER STUB OUT
- HB WATER HOSE BIBB
- SOV HB WATER HOSE BIBB WITH SHUT OF VALVE
- IM ICE MACHINE STUB OUT
- G GAS STUB OUT
- SURFACE MOUNTED HIGH-EFFICACY LIGHT
- UNDER CABINET HIGH-EFFICACY LIGHT
- 22"X30" MIN. CEILING ACCESS PANEL
- FAN COIL, PROVIDE DEDICATED 120V OUTLET

VENTILATION SUMMARIES

1) LOCAL EXHAUST VENTILATION

BATHROOM	OPTION A	OPTION B
BATHROOM FAN FLOW (cfm)	50 CFM	50 CFM
DUCT TYPE	FLEX DUCT	SMOOTH DUCT
DUCT SIZE (in)	4"	4"
MAX. ALLOWABLE DUCT LENGTH (ft)	70'	105'
THIS EXHAUST FAN IS REQUIRED TO BE RATED FOR SOUND AT A MAX. OF 3 SONES.		

KITCHEN	OPTION A	OPTION B
KITCHEN FAN FLOW (cfm)	100 CFM	80 CFM
DUCT TYPE	FLEX DUCT	SMOOTH DUCT
DUCT SIZE (in)	5"	5"
MAX. ALLOWABLE DUCT LENGTH (ft)	35'	85'
THIS EXHAUST FAN IS REQUIRED TO BE RATED FOR SOUND AT A MAX. OF 3 SONES.		

2) WHOLE BUILDING VENTILATION

	OPTION A	OPTION B
PER ASHRAE STANDARD 62.2, CEC EQUATION 150.0-B		
BUILDING FAN FLOW (cfm)	80 CFM	80 CFM
DUCT TYPE	FLEX DUCT	SMOOTH DUCT
DUCT SIZE (in)	5"	5"
MAX. ALLOWABLE DUCT LENGTH (ft)	70'	35"
THIS EXHAUST FAN IS REQUIRED TO BE RATED FOR SOUND AT A MAX. OF 1 SONE.		
THIS EXHAUST FAN IS REQUIRED TO OPERATE CONTINUOUSLY TO ENSURE CONTINUOUSLY TO ENSURE INDOOR AIR QUALITY.		

TOTAL (MINIMUM) REQUIRED VENTILATION RATE
PER ASHRAE STANDARD 62.2, CEC EQUATION 150.0-B
QCFM = .03(FLOOR AREA) + 7.5 (# OF BEDROOMS + 1)

WHOLE DWELLING UNIT MECHANICAL VENTILATION
PER SECTION 150.0(O)(C)(i) [ASHRAE 62.2:4.1.2]
1 BED - MINIMUM CUBIC FEET PER MINUTE (CFM) (Equation 150.0-B)
Qtot = 0.03Afloor + 7.5(Nbr + 1)
Qtot = 0.03(1033 sf) + 7.5 (2+1) = 53.49 CFM < 80 CFM

EFFECTIVE ANNUAL AVERAGE INFILTRATION RATE
PER SECTION 150.0(O)(C)(ii)
a. (Equation 150.0-C) Q50 = Vdu (x) 2 ACH50 / 60minutes
a. (Equation 150.0-D) Q50 = Vdu (x) Verified ACH50 / 60minutes
b. (Equation 150.0-E) Qtot = 0.052 (x) Q50 x wsf x
[H/Hr]^z [ASHRAE 62.2:4.1.2.1]

REQUIRED MECHANICAL VENTILATION RATE
AND REQUIRED MECHANICAL VENTILATION RATE PER 150.0(O)(C)(iii)
[ASHRAE 62.2:4.1.2]
(Equation 150.0-F) **Qfan = Qtot (-) ϕ (Qinf (x) Aext)**

MONO COUNTY

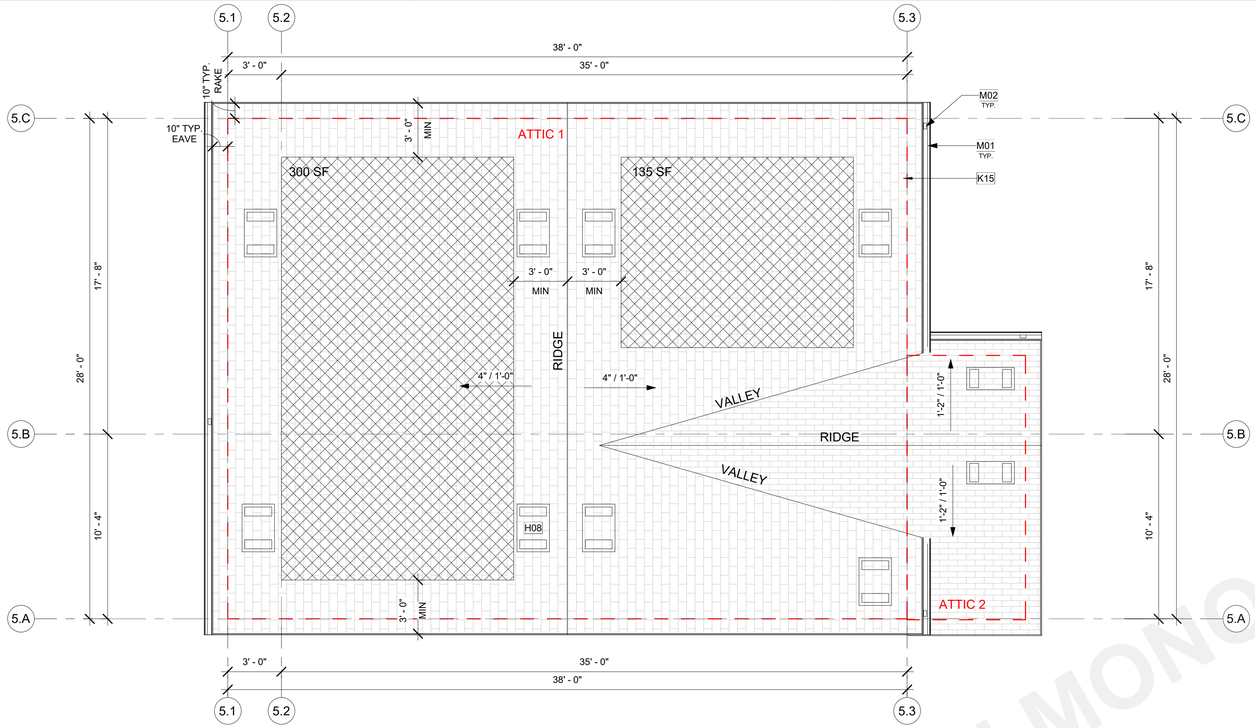
THESE PLANS ARE PROVIDED BY MONO COUNTY AS PART OF THE PRE-APPROVED ADU PROGRAM AND ARE PUBLIC DOMAIN, THERE CANNOT BE A CHARGE TO PROVIDE THESE PLANS. NO ALTERATIONS TO THESE PLANS ARE ALLOWED, ALL ALTERATIONS MUST BE DONE UNDER A SEPARATE PERMIT ONCE THE BUILDING PERMIT FOR THE ADU HAS BEEN ISSUED AND FINAL INSPECTION COMPLETED. IF YOU DO NOT HAVE THE CONSTRUCTION KNOWLEDGE AND EXPERIENCE TO CONTRUCT THESE PLANS WITHOUT FURTHER DETAILS, IT IS RECOMMENDED YOU HIRE A CONTRACTOR TO DO THE CONSTRUCTION. THE CITY WILL NOT PROVIDE FURTHER INFORMATION OR DETAILS AND BUILDING INSPECTORS WILL NOT PROVIDE STEP BY STEP INSTRUCTIONS IN THE FIELD.

MONO COUNTY ADU PROTOTYPES
MONO COUNTY
MECHANICAL AND ELECTRICAL PLANS

PUBLIC SET

DATE
01/10/2024

SHEET
A5-111



2 ROOF PLAN 5 - RURAL MOUNTAIN

A5-121 SCALE: 1/4" = 1'-0"

1 GROUND FLOOR RCP 5 - RURAL MOUNTAIN

A1-201 A5-121 SCALE: 1/4" = 1'-0"

ROOF VENTING CALCULATIONS

UPPER VENTS: *O'HAGIN FIRE & ICE STANDARD 1/4" MESH*
72.0 SQ.IN OF AIR MOVEMENT PER VENT = 72. SQ.IN. / 144 = 0.5 SF

LOWER VENTS: *O'HAGIN FIRE & ICE STANDARD 1/4" MESH*
72.0 SQ.IN OF AIR MOVEMENT PER VENT = 72. SQ.IN. / 144 = 0.5 SF

"UPPER VENTS PROVIDED" = (TOTAL ATTIC AREA/300) * (0.5) / (0.5 SF)

"LOWER VENTS PROVIDED" = (TOTAL ATTIC AREA/300) * (0.5) / (0.5 SF)

ATTIC	AREA	REQUIRED ATTIC VENTING (NFA)	UPPER VENTING REQUIRED (NFA)	LOWER VENTING REQUIRED (NFA)
ATTIC 1 - PLAN 5	1064 SF	3.55 SF	1.77 SF	1.77 SF
ATTIC 2 - PLAN 5	98 SF	0.33 SF	0.16 SF	0.16 SF

VENT TYPE	COUNT	VENT LENGTH	NET FREE AREA PER VENT	PROVIDED NET FREE AREA
ATTIC 1 - PLAN 5				
LOWER				
O'HAGIN SHINGLE ROOF VENT (LOWER)	4	2' - 8"	0.50 SF	2.00 SF
UPPER				
O'HAGIN SHINGLE ROOF VENT (UPPER)	4	2' - 8"	0.50 SF	2.00 SF
				4.00 SF
ATTIC 2 - PLAN 5				
LOWER				
O'HAGIN SHINGLE ROOF VENT (LOWER)	1	2' - 8"	0.50 SF	0.50 SF
UPPER				
O'HAGIN SHINGLE ROOF VENT (UPPER)	1	2' - 8"	0.50 SF	0.50 SF
				1.00 SF

KEYNOTES

F03	22" X 30" MIN. ATTIC ACCESS. PROVIDED SWITCH AND OUTLET AT ATTIC FOR FAU. PERMANENTLY ATTACH R-38 OR GREATER INSULATION TO ATTIC ACCESS DOOR USING ADHESIVE OR MECHANICAL FASTENERS CEnC 150.0 (a)1. PROVIDE GASKETED ATTIC ACCESS TO PREVENT AIR LEAKAGE CEnC 150.0 (a)1.

ROOF PLAN GENERAL NOTES

1. REFER TO GENERAL NOTES SHEET G-101 FOR ADDITIONAL REQUIREMENTS.
2. REFER TO STRUCTURAL PLANS FOR ROOF FRAMING INFORMATION INCLUDING MEMBER SIZES AND CONNECTION HARDWARE.
3. REFER TO MECHANICAL PLANS FOR ROOF MOUNTED EQUIPMENT LOCATIONS AND TYPES.
4. REFER TO ELECTRICAL PLANS FOR POWER DISTRIBUTION TO ROOF MOUNTED EQUIPMENT.
5. REFER TO PLUMBING PLANS ROOF VENT PENETRATIONS.
6. REFER TO SITE/GRADING PLAN FOR DOWNSPOUT DISCHARGE OR CONTINUATION.
7. PROVIDE A MINIMUM OF 1 INCH OF AIRSPACE BETWEEN THE INSULATION AND ROOF SHEATHING.
8. WHERE THE ROOF PROFILE ALLOWS A SPACE BETWEEN THE ROOF COVERING AND DECKING, THE SPACES SHALL BE CONSTRUCTED TO PREVENT THE INTRUSION OF FLAMES AND EMBERS, BE FIRESTOPPED WITH APPROVED MATERIALS OR HAVE ONE LAYER OF MINIMUM 72 POUND MINERAL-SURFACED NONPERFORATED CAP SHEET OVER THE COMBUSTIBLE DECKING.
9. ALL ROOFING MATERIALS TO BE INSTALLED PER MANUFACTURER'S SPECIFICATIONS.
10. OVERHANG DIMENSIONS ARE FROM FACE OF EXTERIOR WALL FRAMING TO ROOF EDGE
11. ROOF COVERINGS AND UNDERLAYMENT SHALL BE APPLIED IN ACCORDANCE WITH (***2022 CBC 1507.1***), AND MANUFACTURER'S INSTALLATION INSTRUCTIONS
12. WHERE PROVIDED, VENTILATION OPENINGS SHALL BE IN ACCORDANCE WITH (***2022 CBC SECTION 1202***). EXTERIOR OPENINGS INTO THE ATTIC SPACE SHALL BE COVERED WITH CORROSION-RESISTANT WIRE CLOTH SCREENING, HARDWARE CLOTH, PERFORATED VINYL OR SIMILAR MATERIAL. THE OPENINGS SHALL BE A MINIMUM OF 1/16" AND SHALL NOT EXCEED 1/4" PER ***(2022 CBC 1202.2.2.)***
13. ROOF VENTS SHALL BE APPLIED PER MANUFACTURER'S SPECIFICATIONS
14. FURNISHED DIMENSIONS FOR VENTS ARE GUIDES ONLY. INSTALL PER MANUFACTURERS SPECIFICATIONS AND ADJUST TO ACCOMMODATE TRUSS LOCATIONS, PLUMBING VENTS, AND SOLAR COLLECTORS.

LEGEND

- 10'-0" — HEIGHT OF TOP OF ROOFING SURFACE
- 2" / 12" — ROOF SLOPE (REFER TO PLANS FOR ACTUAL SLOPE)
- O'HAGIN ATTIC VENT, PAINT TO MATCH ROOF COLOR. (REFER TO EXTERIOR ELEVATIONS FOR COLORS AND MATERIALS.)
- WALL BELOW
- GUTTER, CONNECT TO DOWNSPOUT
  DOWNSPOUT, TO ROOF OR SPLASHBLOCK BELOW U.N.O.
- SOLAR ZONE. REFER TO SOLAR READY NOTES ON SHEET G-101.

RCP GENERAL NOTES

1. REFER TO GENERAL NOTES SHEET G-101 AND G-102 FOR ADDITIONAL REQUIREMENTS.
2. REFER TO ELECTRICAL PLANS FOR FURTHER INFORMATION.
3. REFER TO MECHANICAL PLANS FOR FURTHER INFORMATION.
4. REFER TO DETAILS FOR FLOOR/CEILING ASSEMBLIES.
5. HEIGHT OF CEILINGS SHALL BE MEASURED FROM TOP OF SLAB TO FINISH FACE OF GWB OR FACE OF CEILING GRID AS INDICATED ON THE REFLECTED CEILING PLAN, UNO.
6. CONTRACTOR TO VERIFY DEPTH OF SOFFITS AND HOLD TIGHT TO PLUMBING, SPRINKLERS, ELECTRICAL AND MECHANICAL DUCTS

LEGEND

- 10' - 0" — HEIGHT OF CEILING SURFACE (REFER TO PLANS FOR ACTUAL HEIGHT)
- 2" / 12" — CEILING SLOPE (REFER TO PLANS FOR ACTUAL SLOPE)
- **INTERIOR CEILING FINISH.** REFER TO FINISH SCHEDULE.
- **EXTERIOR 7/8" 3-COAT CEMENT PLASTER CEILING.** 1HR FIRE-RESISTANCE PER CBC TABLE 721.1(1) ITEM 1-4.1
- **EXTERIOR FIBER CEMENT BOARD CEILING.** HARIE SOFFIT PANELS - BEADED PORCH PANEL OR EQ.

MONO COUNTY

THESE PLANS ARE PROVIDED BY MONO COUNTY AS PART OF THE PRE-APPROVED ADU PROGRAM AND ARE PUBLIC DOMAIN. THERE CANNOT BE A CHARGE TO PROVIDE THESE PLANS. NO ALTERATIONS TO THESE PLANS ARE ALLOWED. ALL ALTERATIONS MUST BE DONE UNDER A SEPARATE PERMIT ONCE THE BUILDING PERMIT FOR THE ADU HAS BEEN ISSUED AND FINAL INSPECTION COMPLETED. IF YOU DO NOT HAVE THE CONSTRUCTION KNOWLEDGE AND EXPERIENCE TO CONTRUCT THESE PLANS WITHOUT FURTHER DETAILS, IT IS RECOMMENDED YOU HIRE A CONTRACTOR TO DO THE CONSTRUCTION. THE CITY WILL NOT PROVIDE FURTHER INFORMATION OR DETAILS AND BUILDING INSPECTORS WILL NOT PROVIDE STEP BY STEP INSTRUCTIONS IN THE FIELD.

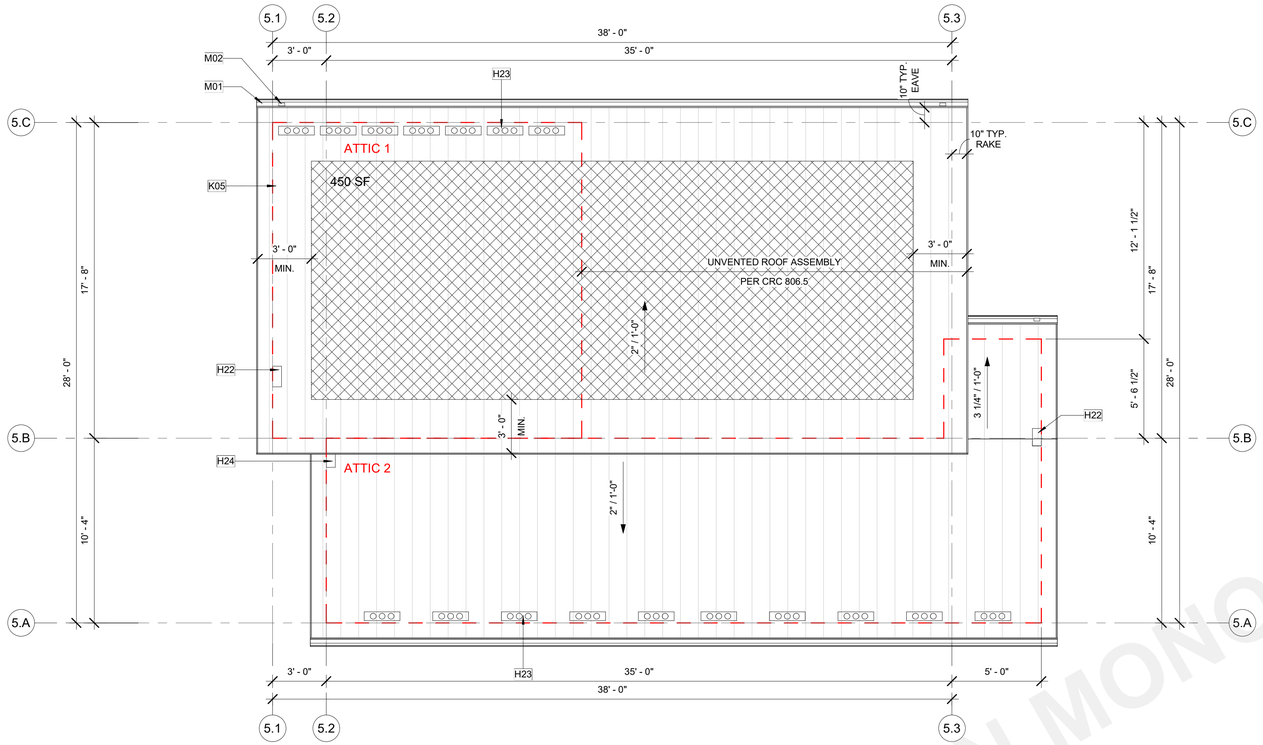
MONO COUNTY ADU PROTOTYPES
MONO COUNTY

ROOF PLAN & RCP - RURAL MOUNTAIN

DATE
01/10/2024

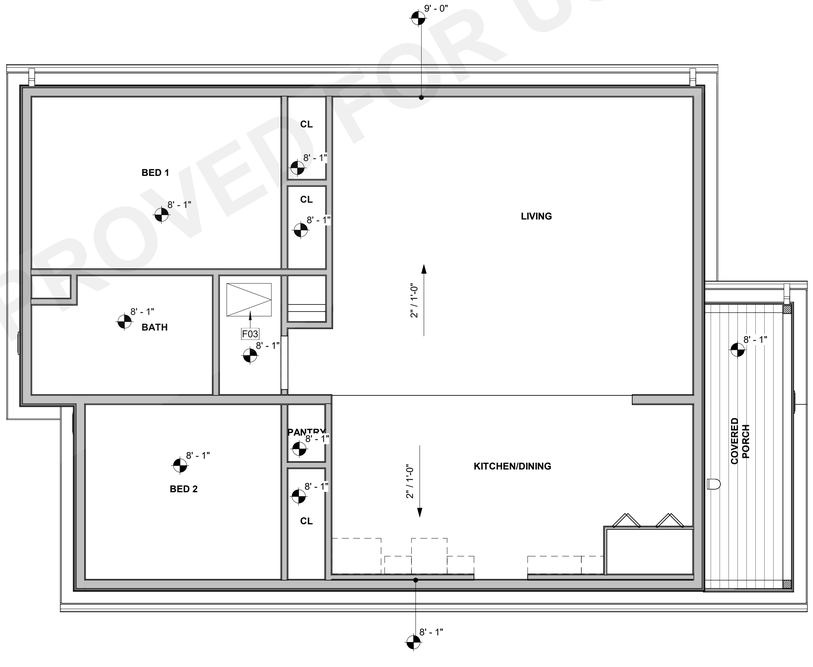
SHEET
A5-121

PUBLIC SET



2 ROOF PLAN 5 - HIGH DESERT

A5-122 SCALE: 1/4" = 1'-0"



1 GROUND FLOOR RCP 5 - HIGH DESERT

A1-201 A5-122 SCALE: 1/4" = 1'-0"

ROOF VENTING CALCULATIONS

UPPER VENTS: 14" x 17.5" VULCAN *GABLE VENT*
86.0 SQ.IN OF AIR MOVEMENT PER VENT = 86 SQ.IN. / 144 = 0.60 SF

14" X 12" VULCAN *GABLE VENT*
58.0 SQ.IN OF AIR MOVEMENT PER VENT = 58 SQ.IN. / 144 = 0.40 SF

LOWER VENTS: (3) *3" ROUND MESH FACE FIRE VULCAN VENTS IN EAVE BLOCKING*
12 SQ. IN. / 144 = 0.08 SF

"UPPER VENTS PROVIDED" = (TOTAL ATTIC AREA/300) * (0.5) / (0.40 SF)

"LOWER VENTS PROVIDED" = (TOTAL ATTIC AREA/300) * (0.5) / (0.08 SF)

ATTIC	AREA	REQUIRED ATTIC VENTING (NFA)	UPPER VENTING REQUIRED (NFA)	LOWER VENTING REQUIRED (NFA)
ATTIC 1 - PLAN 5	305 SF	1.02 SF	0.51 SF	0.51 SF
ATTIC 2 - PLAN 5	444 SF	1.48 SF	0.74 SF	0.74 SF

VENT TYPE	COUNT	VENT LENGTH	NET FREE AREA PER VENT	PROVIDED NET FREE AREA
ATTIC 1 - PLAN 5				
LOWER				
(3) 3" HOLES (LOWER)	7	2' - 0"	0.08 SF	0.56 SF
UPPER				
14X17.5 VULCAN GABLE VENT (UPPER)	1	1' - 2"	0.60 SF	0.60 SF
				1.16 SF
ATTIC 2 - PLAN 5				
LOWER				
(3) 3" HOLES (LOWER)	10	2' - 0"	0.08 SF	0.80 SF
UPPER				
14x12 VULCAN GABLE VENT (UPPER)	2	1' - 0"	0.40 SF	0.80 SF
				1.60 SF

KEYNOTES

F03 22" X 30" MIN. ATTIC ACCESS. PROVIDED SWITCH AND OUTLET AT ATTIC FOR FAU. PERMANENTLY ATTACH R-38 OR GREATER INSULATION TO ATTIC ACCESS DOOR USING ADHESIVE OR MECHANICAL FASTENERS CEnC 150.0 (a)1. PROVIDE GASKETED ATTIC ACCESS TO PREVENT AIR LEAKAGE CEnC 150.0 (a)1.

ROOF PLAN GENERAL NOTES

1. REFER TO GENERAL NOTES SHEET G-101 FOR ADDITIONAL REQUIREMENTS
2. REFER TO STRUCTURAL PLANS FOR ROOF FRAMING INFORMATION INCLUDING MEMBER SIZES AND CONNECTION HARDWARE.
3. REFER TO MECHANICAL PLANS FOR ROOF MOUNTED EQUIPMENT LOCATIONS AND TYPES.
4. REFER TO ELECTRICAL PLANS FOR POWER DISTRIBUTION TO ROOF MOUNTED EQUIPMENT.
5. REFER TO PLUMBING PLANS ROOF VENT PENETRATIONS.
6. REFER TO SITE/GRADING PLAN FOR DOWNSPOUT DISCHARGE OR CONTINUATION.
7. PROVIDE A MINIMUM OF 1 INCH OF AIRSPACE BETWEEN THE INSULATION AND ROOF SHEATHING.
8. WHERE THE ROOF PROFILE ALLOWS A SPACE BETWEEN THE ROOF COVERING AND DECKING, THE SPACES SHALL BE CONSTRUCTED TO PREVENT THE INTRUSION OF FLAMES AND EMBERS, BE FIRESTOPPED WITH APPROVED MATERIALS OR HAVE ONE LAYER OF MINIMUM 72 POUND MINERAL-SURFACED NONPERFORATED CAP SHEET OVER THE COMBUSTIBLE DECKING.
9. ALL ROOFING MATERIALS TO BE INSTALLED PER MANUFACTURER'S SPECIFICATIONS.
10. OVERHANG DIMENSIONS ARE FROM FACE OF EXTERIOR WALL FRAMING TO ROOF EDGE
11. ROOF COVERINGS AND UNDERLAYMENT SHALL BE APPLIED IN ACCORDANCE WITH (***2022 CBC 1507.1***), AND MANUFACTURER'S INSTALLATION INSTRUCTIONS
12. WHERE PROVIDED, VENTILATION OPENINGS SHALL BE IN ACCORDANCE WITH (***2022 CBC SECTION 1202***). EXTERIOR OPENINGS INTO THE ATTIC SPACE SHALL BE COVERED WITH CORROSION-RESISTANT WIRE CLOTH SCREENING, HARDWARE CLOTH, PERFORATED VINYL OR SIMILAR MATERIAL. THE OPENINGS SHALL BE A MINIMUM OF 1/16" AND SHALL NOT EXCEED 1/4" PER ***(2022 CBC 1202.2.2.)***
13. ROOF VENTS SHALL BE APPLIED PER MANUFACTURER'S SPECIFICATIONS
14. FURNISHED DIMENSIONS FOR VENTS ARE GUIDES ONLY. INSTALL PER MANUFACTURERS SPECIFICATIONS AND ADJUST TO ACCOMMODATE TRUSS LOCATIONS, PLUMBING VENTS, AND SOLAR COLLECTORS.

LEGEND

- 10'-0" — HEIGHT OF TOP OF ROOFING SURFACE
- 2" / 12" — ROOF SLOPE (REFER TO PLANS FOR ACTUAL SLOPE)
- O'HAGIN ATTIC VENT, PAINT TO MATCH ROOF COLOR. (REFER TO EXTERIOR ELEVATIONS FOR COLORS AND MATERIALS.)
- WALL BELOW
- GUTTER, CONNECT TO DOWNSPOUT
- DOWNSPOUT, TO ROOF OR SPLASHBLOCK BELOW U.N.O.
- SOLAR ZONE. REFER TO SOLAR READY NOTES ON SHEET G-101.

RCP GENERAL NOTES

1. REFER TO GENERAL NOTES SHEET G-101 AND G-102 FOR ADDITIONAL REQUIREMENTS.
2. REFER TO ELECTRICAL PLANS FOR FURTHER INFORMATION.
3. REFER TO MECHANICAL PLANS FOR FURTHER INFORMATION.
4. REFER TO DETAILS FOR FLOOR/CEILING ASSEMBLIES.
5. HEIGHT OF CEILINGS SHALL BE MEASURED FROM TOP OF SLAB TO FINISH FACE OF GWB OR FACE OF CEILING GRID AS INDICATED ON THE REFLECTED CEILING PLAN, UNO.
6. CONTRACTOR TO VERIFY DEPTH OF SOFFITS AND HOLD TIGHT TO PLUMBING, SPRINKLERS, ELECTRICAL AND MECHANICAL DUCTS

LEGEND

- 10' - 0" — HEIGHT OF CEILING SURFACE (REFER TO PLANS FOR ACTUAL HEIGHT)
- 2" / 12" — CEILING SLOPE (REFER TO PLANS FOR ACTUAL SLOPE)
- **INTERIOR CEILING FINISH.** REFER TO FINISH SCHEDULE.
- **EXTERIOR 7/8" 3-COAT CEMENT PLASTER CEILING.** 1HR FIRE-RESISTANCE PER CBC TABLE 721.1(1) ITEM 1-4.1
- **EXTERIOR FIBER CEMENT BOARD CEILING.** HARIE SOFFIT PANELS - BEADED PORCH PANEL OR EQ.

MONO COUNTY

THESE PLANS ARE PROVIDED BY MONO COUNTY AS PART OF THE PRE-APPROVED ADU PROGRAM AND ARE PUBLIC DOMAIN, THERE CANNOT BE A CHARGE TO PROVIDE THESE PLANS. NO ALTERATIONS TO THESE PLANS ARE ALLOWED. ALL ALTERATIONS MUST BE DONE UNDER A SEPARATE PERMIT ONCE THE BUILDING PERMIT FOR THE ADU HAS BEEN ISSUED AND FINAL INSPECTION COMPLETED. IF YOU DO NOT HAVE THE CONSTRUCTION KNOWLEDGE AND EXPERIENCE TO CONTRUCT THESE PLANS WITHOUT FURTHER DETAILS, IT IS RECOMMENDED YOU HIRE A CONTRACTOR TO DO THE CONSTRUCTION. THE CITY WILL NOT PROVIDE FURTHER INFORMATION OR DETAILS AND BUILDING INSPECTORS WILL NOT PROVIDE STEP BY STEP INSTRUCTIONS IN THE FIELD.

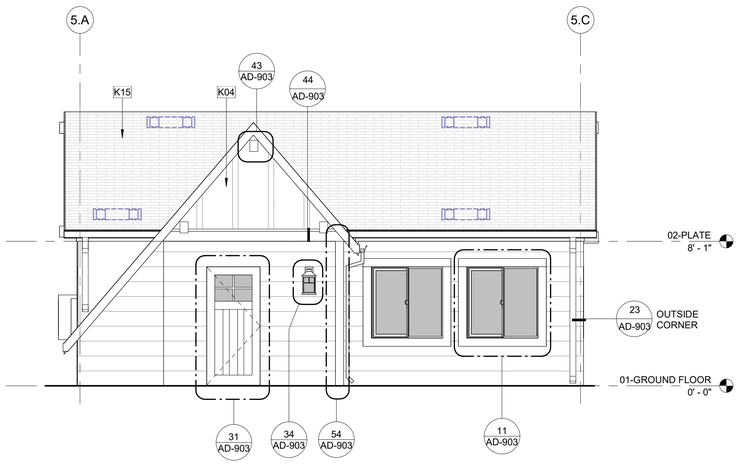
MONO COUNTY ADU PROTOTYPES
MONO COUNTY

ROOF PLAN & RCP - HIGH DESERT

DATE
01/10/2024

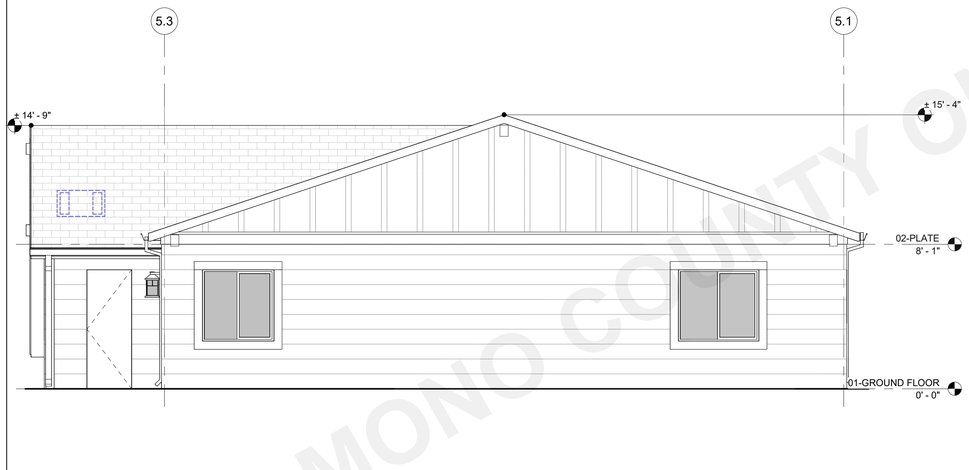
SHEET
A5-122

PUBLIC SET



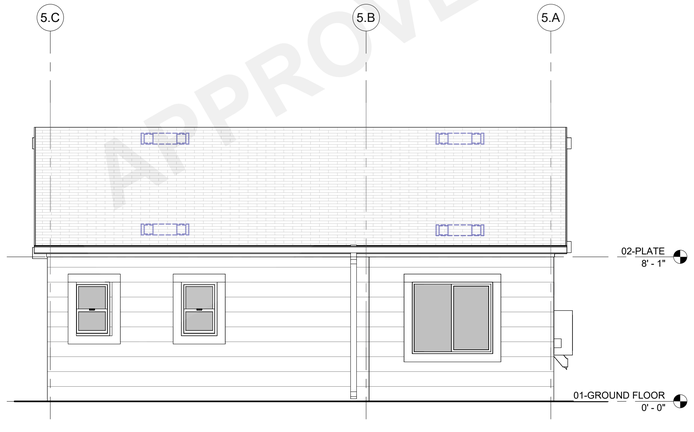
2 PLAN 5 - RURAL MOUNTAIN - RIGHT

A5-101 A5-201 SCALE: 1/4" = 1'-0"



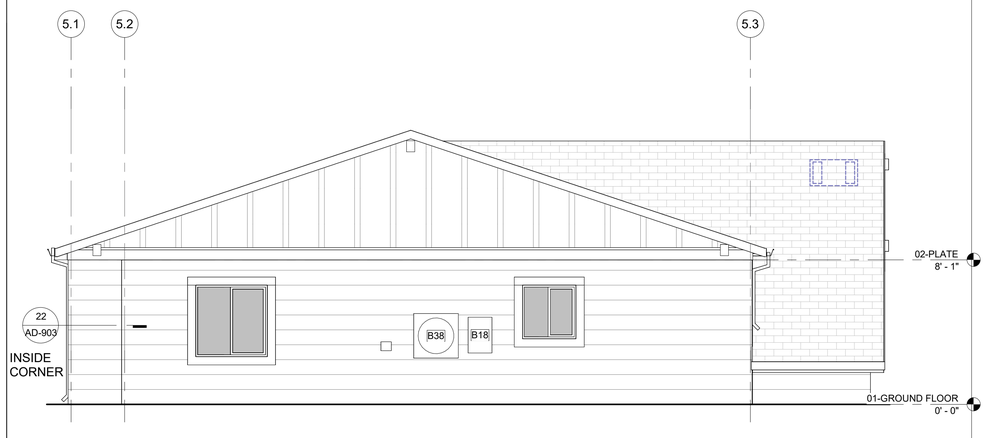
1 PLAN 5 - RURAL MOUNTAIN - REAR

A5-101 A5-201 SCALE: 1/4" = 1'-0"



3 PLAN 5 - RURAL MOUNTAIN - LEFT

A5-101 A5-201 SCALE: 1/4" = 1'-0"



4 PLAN 5 - RURAL MOUNTAIN - FRONT

A5-101 A5-201 SCALE: 1/4" = 1'-0"

ELEVATION GENERAL NOTES

1. REFER TO GENERAL NOTES SHEET G-101 FOR ADDITIONAL REQUIREMENTS.
2. FRAMING ELEVATIONS, INCLUDING FLOOR PLATES AND FLOOR LEVEL ELEVATIONS ARE MEASURED FROM BUILDING FINISH FLOOR, U.N.O.
3. SEE DETAILS FOR ADDITIONAL INFORMATION AND REQUIREMENTS.
4. REFER TO ROOF PLAN FOR ROOF PITCH AND OVERHANGS. FASCIA PER DETAILS.
5. SEE ROOF PLAN FOR APPROXIMATE DOWNSPOUT LOCATIONS, U.N.O.
6. REFER TO DOOR AND WINDOW SCHEDULES AND TYPES FOR DOOR AND WINDOW INFORMATION.
7. SEE ELECTRICAL DRAWINGS FOR EXTERIOR LIGHTING
8. SEE MECHANICAL DRAWINGS FOR GRILLES AND LOUVERS. PAINT TO MATCH ADJACENT FINISH.
9. CONTRACTOR TO VERIFY COLOR SCHEME WITH OWNER BEFORE PERFORMING THE WORK.

KEYNOTES

B18	EXTERIOR RATED ELECTRIC SUB PANEL 80 AMP 120/240 VOLT. CONTRACTOR TO VERIFY MAIN PANEL.
B38	WALL-MOUNTED MULTI-ZONE HEAT PUMP CONDENSING UNIT. REFER TO PLANS FOR LOCATION OF INDOOR FAN FAN COIL UNITS. REFER TO TITLE 24 FOR ADDITIONAL INFORMATION.
K04	FIBER CEMENT BOARD AND BATTEN SIDING, IN COMPLIANCE WITH 2019 CRC R337
K15	ASPHAULT COMPOSITE ROOF SHINGLES. CLASS A FIRE RATING

MONO COUNTY

THESE PLANS ARE PROVIDED BY MONO COUNTY AS PART OF THE PRE-APPROVED ADU PROGRAM AND ARE PUBLIC DOMAIN, THERE CANNOT BE A CHARGE TO PROVIDE THESE PLANS. NO ALTERATIONS TO THESE PLANS ARE ALLOWED. ALL ALTERATIONS MUST BE DONE UNDER A SEPARATE PERMIT ONCE THE BUILDING PERMIT FOR THE ADU HAS BEEN ISSUED AND FINAL INSPECTION COMPLETED. IF YOU DO NOT HAVE THE CONSTRUCTION KNOWLEDGE AND EXPERIENCE TO CONTRUCT THESE PLANS WITHOUT FURTHER DETAILS, IT IS RECOMMENDED YOU HIRE A CONTRACTOR TO DO THE CONSTRUCTION. THE CITY WILL NOT PROVIDE FURTHER INFORMATION OR DETAILS AND BUILDING INSPECTORS WILL NOT PROVIDE STEP BY STEP INSTRUCTIONS IN THE FIELD.

MONO COUNTY ADU PROTOTYPES
MONO COUNTY

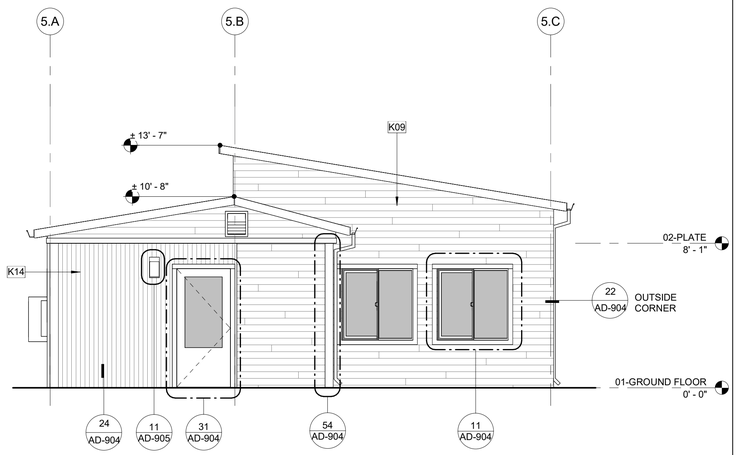
EXTERIOR ELEVATION - RURAL MOUNTAIN

PUBLIC SET

DATE
01/10/2024

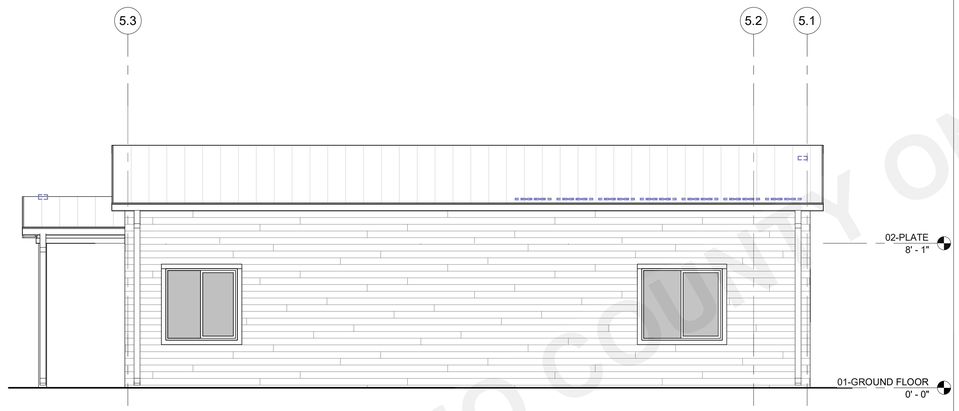
SHEET
A5-201

1/25/2024 4:05:44 PM
Autodesk Docs://2340-04_Mono County ADUs - Code Updates/2340-01_Mono County ADUs_2022 Code Update.rvt



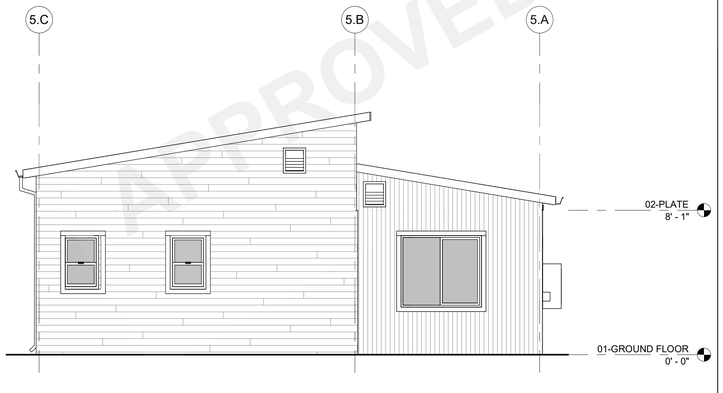
1 PLAN 5 - HIGH DESERT - RIGHT

A5-101 | A5-202 SCALE: 1/4" = 1'-0"



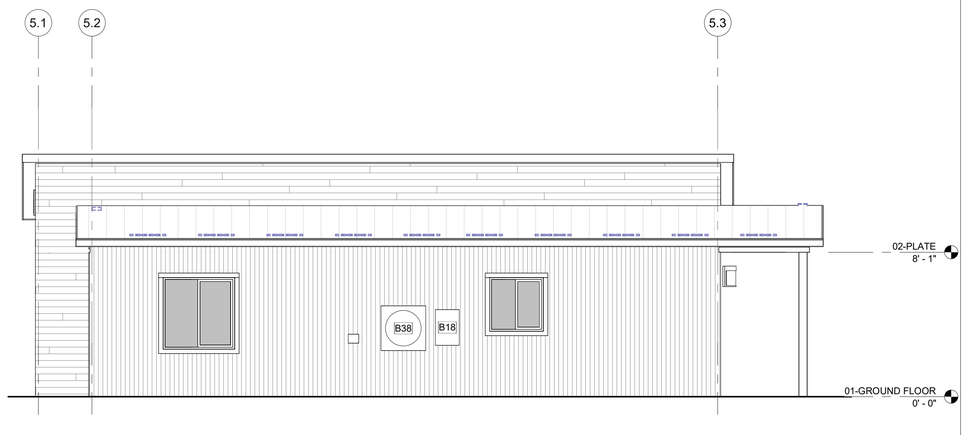
2 PLAN 5 - HIGH DESERT - REAR

A5-101 | A5-202 SCALE: 1/4" = 1'-0"



3 PLAN 5 - HIGH DESERT - LEFT

A5-101 | A5-202 SCALE: 1/4" = 1'-0"



4 PLAN 5 - HIGH DESERT - FRONT

A5-101 | A5-202 SCALE: 1/4" = 1'-0"

ELEVATION GENERAL NOTES

1. REFER TO GENERAL NOTES SHEET G-101 FOR ADDITIONAL REQUIREMENTS.
2. FRAMING ELEVATIONS, INCLUDING FLOOR PLATES AND FLOOR LEVEL ELEVATIONS ARE MEASURED FROM BUILDING FINISH FLOOR, U.N.O.
3. SEE DETAILS FOR ADDITIONAL INFORMATION AND REQUIREMENTS.
4. REFER TO ROOF PLAN FOR ROOF PITCH AND OVERHANGS. FASCIA PER DETAILS.
5. SEE ROOF PLAN FOR APPROXIMATE DOWNSPOUT LOCATIONS, U.N.O.
6. REFER TO DOOR AND WINDOW SCHEDULES AND TYPES FOR DOOR AND WINDOW INFORMATION.
7. SEE ELECTRICAL DRAWINGS FOR EXTERIOR LIGHTING
8. SEE MECHANICAL DRAWINGS FOR GRILLES AND LOUVERS. PAINT TO MATCH ADJACENT FINISH.
9. CONTRACTOR TO VERIFY COLOR SCHEME WITH OWNER BEFORE PERFORMING THE WORK.

KEYNOTES

B18	EXTERIOR RATED ELECTRIC SUB PANEL 80 AMP 120/240 VOLT. CONTRACTOR TO VERIFY MAIN PANEL.
B38	WALL-MOUNTED MULTI-ZONE HEAT PUMP CONDENSING UNIT. REFER TO PLANS FOR LOCATION OF INDOOR FAN FAN COIL UNITS. REFER TO TITLE 24 FOR ADDITIONAL INFORMATION.
K09	FIBER CEMENT HOROZONTAL SIDING, IN COMPLIANCE WITH 2022 CRC R337
K14	CORRUGATED METAL FINISH.

MONO COUNTY

THESE PLANS ARE PROVIDED BY MONO COUNTY AS PART OF THE PRE-APPROVED ADU PROGRAM AND ARE PUBLIC DOMAIN, THERE CANNOT BE A CHARGE TO PROVIDE THESE PLANS. NO ALTERATIONS TO THESE PLANS ARE ALLOWED. ALL ALTERATIONS MUST BE DONE UNDER A SEPARATE PERMIT ONCE THE BUILDING PERMIT FOR THE ADU HAS BEEN ISSUED AND FINAL INSPECTION COMPLETED. IF YOU DO NOT HAVE THE CONSTRUCTION KNOWLEDGE AND EXPERIENCE TO CONTRUCT THESE PLANS WITHOUT FURTHER DETAILS, IT IS RECOMMENDED YOU HIRE A CONTRACTOR TO DO THE CONSTRUCTION. THE CITY WILL NOT PROVIDE FURTHER INFORMATION OR DETAILS AND BUILDING INSPECTORS WILL NOT PROVIDE STEP BY STEP INSTRUCTIONS IN THE FIELD.

MONO COUNTY ADU PROTOTYPES

MONO COUNTY

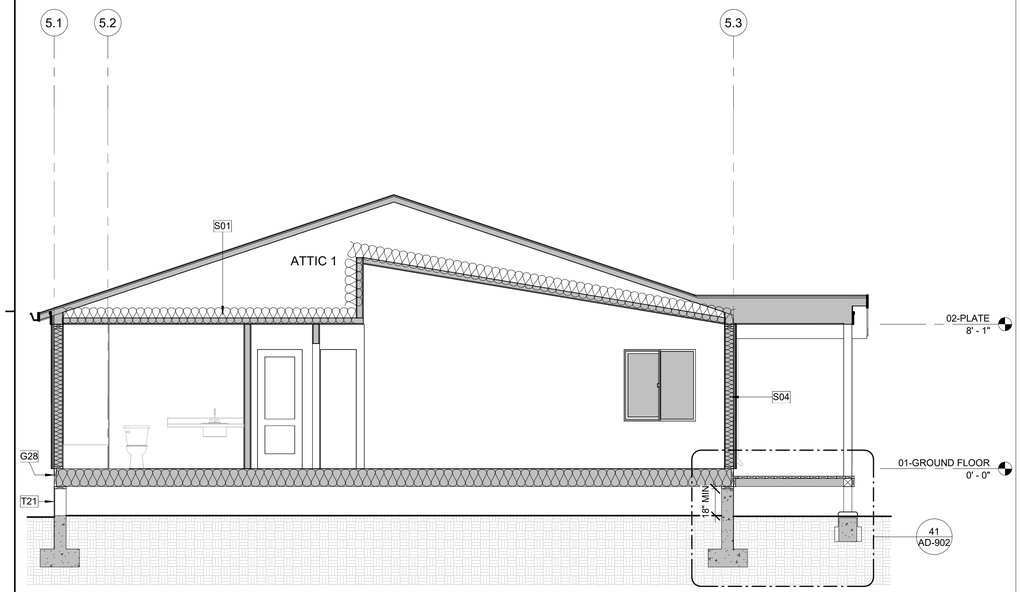
EXTERIOR ELEVATION - HIGH DESERT

PUBLIC SET

DATE
01/10/2024

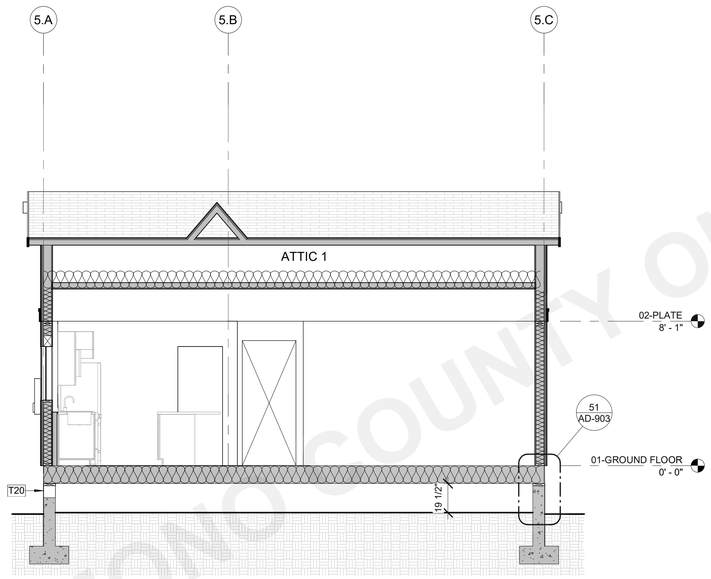
SHEET
A5-202

1/25/2024 4:05:45 PM
Autodesk Docs://2340-04_Mono County ADUs - Code Updates/2340-01_Mono County ADUs_2022 Code Update.rvt



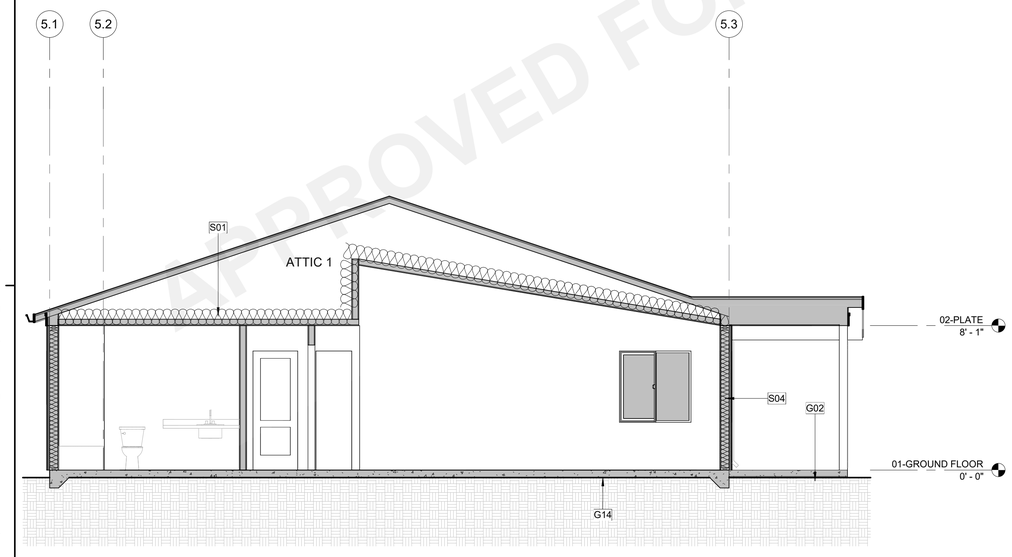
4 PLAN 5 - RM - SECTION 1 - RAISED FOUNDATION

A5-301 SCALE: 1/4" = 1'-0"



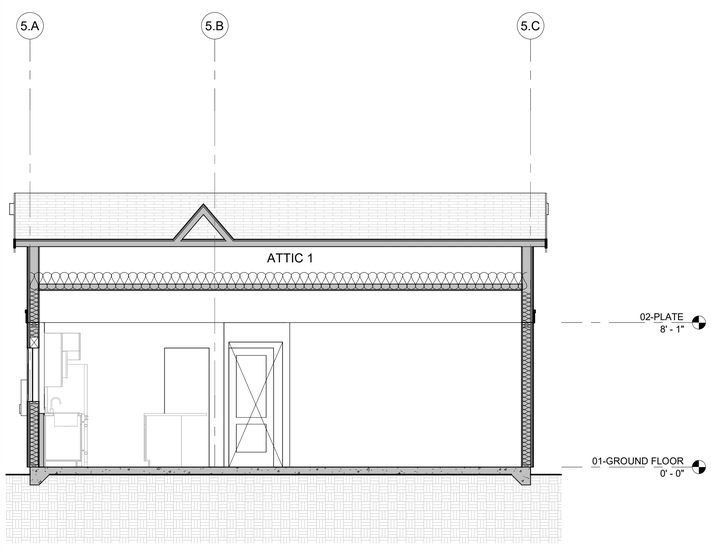
3 PLAN 5 - RM - SECTION 2 - RAISED FOUNDATION

A5-301 SCALE: 1/4" = 1'-0"



1 PLAN 5 - RM - SECTION 1 - SLAB-ON-GRADE

A5-101 A5-301 SCALE: 1/4" = 1'-0"



2 PLAN 5 - RM - SECTION 2 - SLAB-ON-GRADE

A5-101 A5-301 SCALE: 1/4" = 1'-0"

SECTIONS GENERAL NOTES

1. THE PURPOSE OF THESE DRAWINGS IS TO SHOW CONSTRUCTION MATERIALSS/ASSEMBLIES. FOR SPECIFIC SIZES AND DETAILS REFER TO ARCHITECTURAL PLANS, ELEVATIONS, DETAILS, AND STRUCTURAL PLANS. *KEYNOTES ONLY APPLY IF REFERENCED ON PLANS.
2. WALL ASSEMBLIES TO BE PER FLOOR PLAN.
3. DOORS AND WINDOWS TO BE PER APPLICABLE SCHEDULE. REFER TO FLOOR PLANS FOR IDENTIFICATION.
4. INSULATION: REFER TO TITLE 24 REPORT AND "INSULATION" NOTES ON SHEET FOR ADDITIONAL RATINGS, REQUIREMENTS, AND INFORMATION.
5. FIREBLOCKING TO BE LOACATED AT THE FOLLOWING LOCATIONS PER ***2022 CRC SECTION R302.11***:
   A. ***SECTION R302.11*** -
      1. FIREBLOCKING SHALL BE PROVIDED IN CONCEALED SPACES OF STUD WALLS AND PARTITIONS, INCLUDING FURRED SPACES AND PARALLEL ROWS OF STUDS OR STAGGERED STUDS, AS FOLLOWS:
         1. VERTICALLY AT CEILING AND FLOOR LEVELS
         2. HORIZONTALLY AT INTERVALS NOT EXCEEDING 10 FEET.
      2. AT INTERCONNECTIONS BETWEEN CONCEALED VERTICAL AND HORIZONTAL SPACES SUCH AS SOFFITS, DROP CEILINGS AND COVE CEILINGS.
      3. IN CONCEALED SPACES BETWEEN STAIR STRINGERS AT THE TOP AND BOTTOM OF THE RUN. ENCLOSED SPACES UNDER STAIRS SHALL COMPLY WITH ***SECTION R302.7***.
      4. AT OPENINGS AROUND VENTS, PIPES, DUCTS, CABLES AND WIRES AT CEILINGS AND FLOOR LEVEL, WITH AN APPROVED MATERIAL TO RESIST THE FREE PASSAGE OF FLAME PRODUCTS OF COMBUSTION. THE MATERIAL FILLING THIS ANNULAR SPACE SHALL NOT BE REQUIRED TO MEET THE ASTM E136 REQUIREMENTS.
      5. FOR THE FIREBLOCKING OF CHIMNEYS AND FIREPLACES, SEE ***SECTION R1003.19***.
      6. FIREBLOCKING OF CORNICES OF A TWO-FAMILY DWELLING IS REQUIRED AT THE LINE OF DWELLING-UNIT SEPARATION.
   A. ***SECTION R302.11.1*** - FIREBLOCKING MATERIALS SHALL CONSIST OF FOLLOWING MATERIALS:
      1. TWO-INCH NOMINAL LUMBER
      2. TWO THICKNESSES OF ONE-INCH NOMINAL LUMBER WITH BROKEN LAP JOINTS
      3. THE THICKNESS OF 0.719-INCH WOOD STRUCTURAL PANELS WITH JOINTS BACKED BY 0.719-INCH WOOD STRUCTURAL PANELS
      4. THE THICKNESS OF 0.75-INCH PARTICLE BOARD WITH JOINTS BACKED BY 0.75-INCH PARTICLE BOARD
      5. ONE-HALF-INCH GYPSUM BOARD
      6. ONE-FOURTH-INCH CEMENT-BASED MILLBOARD
      7. BATTS OR BLANKETS OF MINERAL WOOL, MINERAL FIBER OR OTHER APPROVED MATERIAL INSTALLED IN SUCH A MANNER AS TO BE SECURELY RETAINED IN PLACE
      8. CELLULOSE INSULATION INSTALLED AS TESTED IN ACCORDANCE WITH ASTM E119 OR UL 263, FOR THE SPECIFIC APPLICATION.
4. PER ***2022 CRC SECION R317*** SLEEPERS AND SILLS ON A CONCRETE OR MASONRY SLAB THAT IS IN DIRECT CONTACT WITH GROUND, UNLESS SEPARATED BY AN IMPERVIOUS MOISTURE BARRIER SHALL BE NATURALLY DURABLE OR PRESERVATIVE-TREATED WOOD.

KEYNOTES

G02	AT [SLAB ON GRADE] CONCRETE FLATWORK. 1/4"/FT SLOPE AWAY FROM BUILDING. AT [RAISED FOUNDATION] 2X COMPOSITE IGNITION RESISTANT DECKING, TREX OR EQUAL, OVER 4X6 PT WOOD JOISTS @ 16" O.C. REFER TO DETAILS 41, 51, 52, 54 SHEET AD-902.
G14	4" CONCRETE SLAB ON GRADE. REFER TO STUCTURAL PLANS
G28	RAISED FLOOR FOUNDATION. REFER TO STRUCTURAL.
S01	CEILING INSULATION. REFER TO TITLE 24 (R-38 MIN.).
S04	2X6 WALL INSULATION. REFER TO TITLE 24 (R-21 MIN.)
T20	FOUNDATION VENTS @ STEM WALL TO BE LOCATED AS APPROPRIATE ON SITE PER CONTRACTOR. REFER TO FOUNDATION CALCS ON BUILDING SECTIONS FOR NUMBER OF VENTS REQUIRED. REFER TO G-101 FOR ADDITIONAL VENTILATION REQUIREMENTS.
T21	CRAWL SPACE ACCESS PANEL. MINIMUM 18" X 24" PER CBC 1209.1. LOCATION DETERMINED ON SITE PER CONTRACTOR.

FOUNDATION VENTING CALCS

NOTE:
PER ***2022 CBC 1202.4***, THE SPACE BETWEEN THE BOTTOM OF THE FLOOR JOISTS AND THE EARTH UNDER ANY BUILDING EXCEPT SPACES OCCUPIED BY BASEMENTS OR CELLARS SHALL BE PROVIDED WITH VENTILATION. REFER TO UNDER-FLOOR VENTING NOTES ON SHEET G-101 FOR ADDITIONAL INFORMATION.

UNDER-FLOOR CALCULATION FORMULA
NFA OF AIR MOVEMENT PER VENT = 62 SQ.IN./144 IN./FT = 0.430 SF
"VENTS PROVIDED" = (451/150) / 0.430 SF

VENT PRODUCT INFO

VENT MANUFACTURER: *VULCAN VENTS*
PRODUCT: *8"X 14" FLANGE FRONT OR APPROVED EQUAL*
WWW.VULCANVENTS.COM

VENTING-FOUNDATION - CALCULATION - PLAN 5			
UNDER-FLOOR AREA (SF)	**REQUIRED FOUNDATION VENTING @ 1/150**	**FOUNDATION VENTS REQUIRED**	**FOUNDATION VENTS PROPOSED**
1033 SF	6.886667	17	

VENTING-PORCH- CALCULATION - PLAN 5 - RURAL MOUNTAIN				
LOCATION	**BALCONY AREA (SF)**	**REQUIRED BALCONY VENTING @ 1/150**	**VENT LENGTH REQUIRED (FT)**	**VENT LENGHT PROPOSED**
ENTRY	186 SF	1.241727	3	3

MONO COUNTY

THESE PLANS ARE PROVIDED BY MONO COUNTY AS PART OF THE PRE-APPROVED ADU PROGRAM AND ARE PUBLIC DOMAIN, THERE CANNOT BE A CHARGE TO PROVIDE THESE PLANS. NO ALTERATIONS TO THESE PLANS ARE ALLOWED. ALL ALTERATIONS MUST BE DONE UNDER A SEPARATE PERMIT ONCE THE BUILDING PERMIT FOR THE ADU HAS BEEN ISSUED AND FINAL INSPECTION COMPLETED. IF YOU DO NOT HAVE THE CONSTRUCTION KNOWLEDGE AND EXPERIENCE TO CONTRUCT THESE PLANS WITHOUT FURTHER DETAILS, IT IS RECOMMENDED YOU HIRE A CONTRACTOR TO DO THE CONSTRUCTION. THE CITY WILL NOT PROVIDE FURTHER INFORMATION OR DETAILS AND BUILDING INSPECTORS WILL NOT PROVIDE STEP BY STEP INSTRUCTIONS IN THE FIELD.

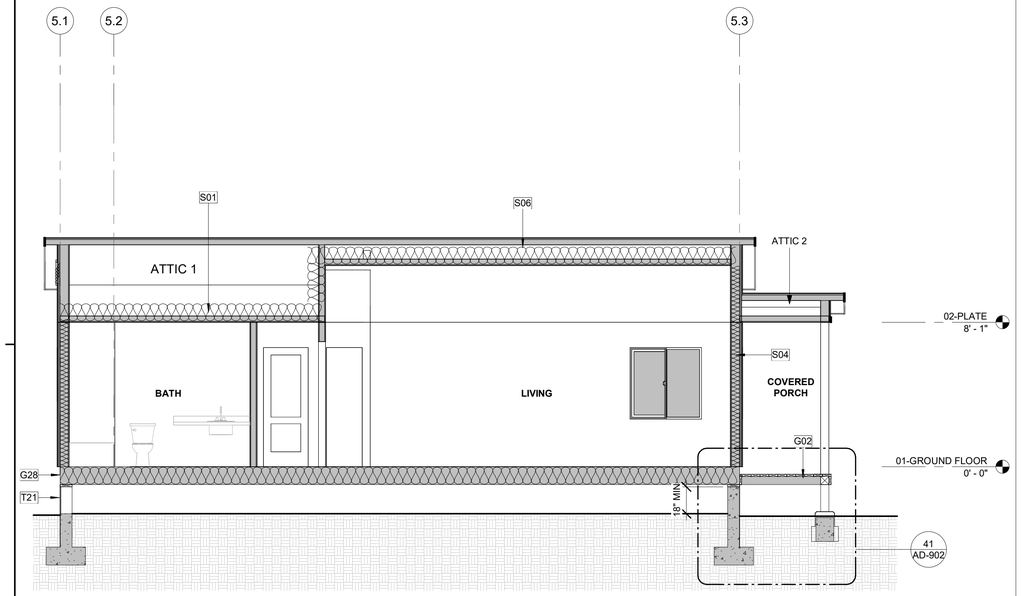
MONO COUNTY ADU PROTOTYPES
MONO COUNTY
BUILDING SECTIONS - RURAL MOUNTAIN

DATE
01/10/2024

SHEET
A5-301

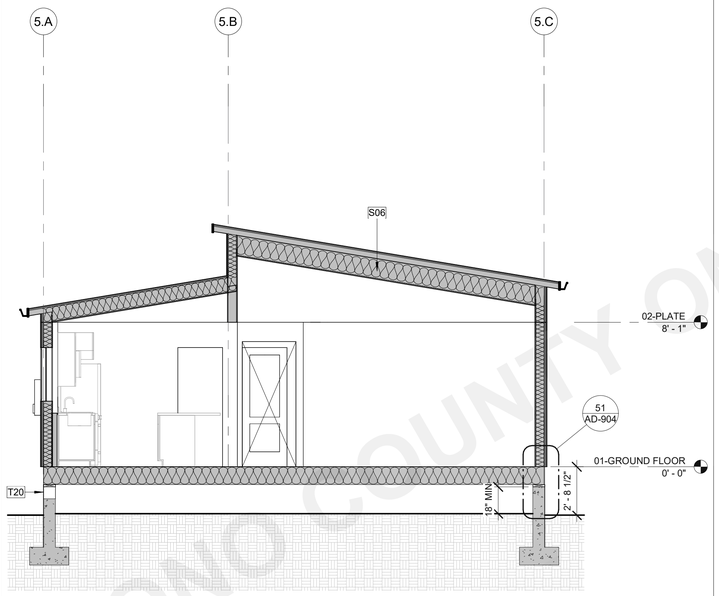
PUBLIC SET

1/25/2024 4:05:46 PM
Autodesk Docs://2340-04_Mono County ADUs - Code Updates/2340-01_Mono County ADUs_2022 Code Update.rvt



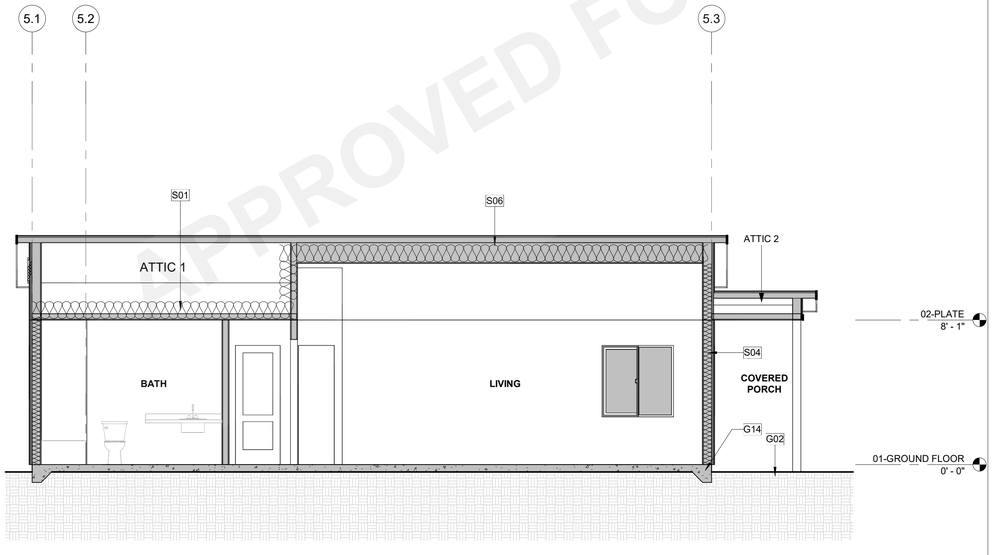
2 PLAN 5 - HD - SECTION 1 - RAISED FOUNDATION

A5-302 SCALE: 1/4" = 1'-0"



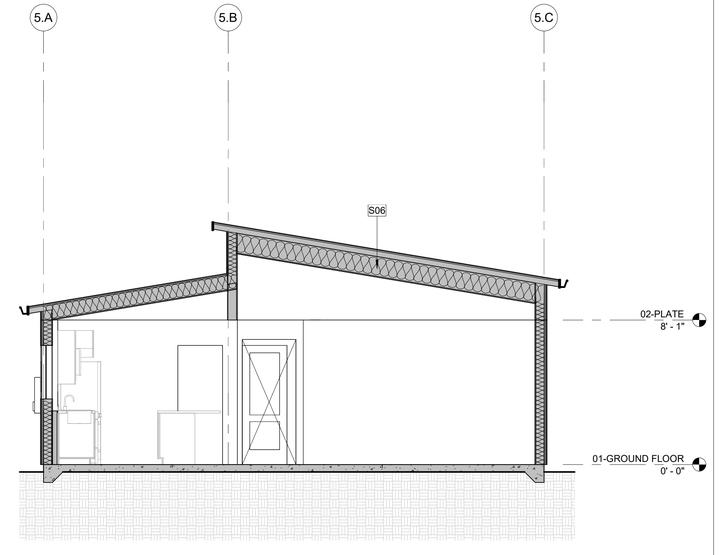
4 PLAN 5 - HD - SECTION 2 - RAISED FOUNDATION

A5-302 SCALE: 1/4" = 1'-0"



1 PLAN 5 - HD - SECTION 1 - SLAB-ON-GRADE

A5-101 A5-302 SCALE: 1/4" = 1'-0"



3 PLAN 5 - HD - SECTION 2 - SLAB-ON-GRADE

A5-101 A5-302 SCALE: 1/4" = 1'-0"

SECTIONS GENERAL NOTES

1. THE PURPOSE OF THESE DRAWINGS IS TO SHOW CONSTRUCTION MATERIALSS/ASSEMBLIES. FOR SPECIFIC SIZES AND DETAILS REFER TO ARCHITECTURAL PLANS, ELEVATIONS, DETAILS, AND STRUCTURAL PLANS. *KEYNOTES ONLY APPLY IF REFERENCED ON PLANS.
2. WALL ASSEMBLIES TO BE PER FLOOR PLAN.
3. DOORS AND WINDOWS TO BE PER APPLICABLE SCHEDULE. REFER TO FLOOR PLANS FOR IDENTIFICATION.
4. INSULATION: REFER TO TITLE 24 REPORT AND "INSULATION" NOTES ON SHEET FOR ADDITIONAL RATINGS, REQUIREMENTS, AND INFORMATION.
5. FIREBLOCKING TO BE LOACATED AT THE FOLLOWING LOCATIONS PER ***2022 CRC SECTION R302.11***:
   A. ***SECTION R302.11*** -
      1. FIREBLOCKING SHALL BE PROVIDED IN CONCEALED SPACES OF STUD WALLS AND PARTITIONS, INCLUDING FURRED SPACES AND PARALLEL ROWS OF STUDS OR STAGGERED STUDS, AS FOLLOWS:
         1. VERTICALLY AT CEILING AND FLOOR LEVELS
         2. HORIZONTALLY AT INTERVALS NOT EXCEEDING 10 FEET.
      2. AT INTERCONNECTIONS BETWEEN CONCEALED VERTICAL AND HORIZONTAL SPACES SUCH AS SOFFITS, DROP CEILINGS AND COVE CEILINGS.
      3. IN CONCEALED SPACES BETWEEN STAIR STRINGERS AT THE TOP AND BOTTOM OF THE RUN. ENCLOSED SPACES UNDER STAIRS SHALL COMPLY WITH ***SECTION R302.7***.
      4. AT OPENINGS AROUND VENTS, PIPES, DUCTS, CABLES AND WIRES AT CEILINGS AND FLOOR LEVEL, WITH AN APPROVED MATERIAL TO RESIST THE FREE PASSAGE OF FLAME PRODUCTS OF COMBUSTION. THE MATERIAL FILLING THIS ANNULAR SPACE SHALL NOT BE REQUIRED TO MEET THE ASTM E136 REQUIREMENTS.
      5. FOR THE FIREBLOCKING OF CHIMNEYS AND FIREPLACES, SEE ***SECTION R1003.19***.
      6. FIREBLOCKING OF CORNICES OF A TWO-FAMILY DWELLING IS REQUIRED AT THE LINE OF DWELLING-UNIT SEPARATION.
   A. ***SECTION R302.11.1*** - FIREBLOCKING MATERIALS SHALL CONSIST OF FOLLOWING MATERIALS:
      1. TWO-INCH NOMINAL LUMBER
      2. TWO THICKNESSES OF ONE-INCH NOMINAL LUMBER WITH BROKEN LAP JOINTS
      3. THE THICKNESS OF 0.719-INCH WOOD STRUCTURAL PANELS WITH JOINTS BACKED BY 0.719-INCH WOOD STRUCTURAL PANELS
      4. THE THICKNESS OF 0.75-INCH PARTICLE BOARD WITH JOINTS BACKED BY 0.75-INCH PARTICLE BOARD
      5. ONE-HALF-INCH GYPSUM BOARD
      6. ONE-FOURTH-INCH CEMENT-BASED MILLBOARD
      7. BATTS OR BLANKETS OF MINERAL WOOL, MINERAL FIBER OR OTHER APPROVED MATERIAL INSTALLED IN SUCH A MANNER AS TO BE SECURELY RETAINED IN PLACE
      8. CELLULOSE INSULATION INSTALLED AS TESTED IN ACCORDANCE WITH ASTM E119 OR UL 263, FOR THE SPECIFIC APPLICATION.
4. PER ***2022 CRC SECION R317*** SLEEPERS AND SILLS ON A CONCRETE OR MASONRY SLAB THAT IS IN DIRECT CONTACT WITH GROUND, UNLESS SEPARATED BY AN IMPERVIOUS MOISTURE BARRIER SHALL BE NATURALLY DURABLE OR PRESERVATIVE-TREATED WOOD.

KEYNOTES

G02	AT [SLAB ON GRADE] CONCRETE FLATWORK. 1/4"/FT SLOPE AWAY FROM BUILDING. AT [RAISED FOUNDATION] 2X COMPOSITE IGNITION RESISTANT DECKING, TREX OR EQUAL, OVER 4X6 PT WOOD JOISTS @ 16" O.C. REFER TO DETAILS 41, 51, 52, 54 SHEET AD-902.
G14	4" CONCRETE SLAB ON GRADE, REFER TO STUCTURAL PLANS
G28	RAISED FLOOR FOUNDATION. REFER TO STRUCTURAL.
S01	CEILING INSULATION. REFER TO TITLE 24 (R-38 MIN.).
S04	2X6 WALL INSULATION. REFER TO TITLE 24 (R-21 MIN.)
S06	ROOF INSULATION. UNVENTED ROOF PER CRC 806.5. REFER TO 41/AD-904 FOR DETAIL.
T20	FOUNDATION VENTS @ STEM WALL TO BE LOCATED AS APPROPRIATE ON SITE PER CONTRACTOR. REFER TO FOUNDATION CALCS ON BUILDING SECTIONS FOR NUMBER OF VENTS REQUIRED. REFER TO G-101 FOR ADDITIONAL VENTILATION REQUIREMENTS.
T21	CRAWL SPACE ACCESS PANEL. MINIMUM 18" X 24" PER CBC 1209.1. LOCATION DETERMINED ON SITE PER CONTRACTOR.

FOUNDATION VENTING CALCS

NOTE:
PER ***2022 CBC 1202.4***, THE SPACE BETWEEN THE BOTTOM OF THE FLOOR JOISTS AND THE EARTH UNDER ANY BUILDING EXCEPT SPACES OCCUPIED BY BASEMENTS OR CELLARS SHALL BE PROVIDED WITH VENTILATION. REFER TO UNDER-FLOOR VENTING NOTES ON SHEET G-101 FOR ADDITIONAL INFORMATION.

UNDER-FLOOR CALCULATION FORMULA
NFA OF AIR MOVEMENT PER VENT = 62 SQ.IN./144 IN./FT = 0.430 SF
"VENTS PROVIDED" = (451/150) / 0.430 SF

VENT PRODUCT INFO

VENT MANUFACTURER: *VULCAN VENTS*
PRODUCT: *8"X 14" FLANGE FRONT OR APPROVED EQUAL*
WWW.VULCANVENTS.COM

VENTING-FOUNDATION - CALCULATION - PLAN 5

UNDER-FLOOR AREA (SF)	REQUIRED FOUNDATION VENTING @ 1/150	FOUNDATION VENTS REQUIRED	FOUNDATION VENTS PROPOSED
1033 SF	6.886667	17	

VENTING-PORCH- CALCULATION - PLAN 5 - HIGH DESERT

LOCATION	BALCONY AREA (SF)	REQUIRED BALCONY VENTING @ 1/150	VENT LENGTH REQUIRED (FT)	VENT LENGHT PROPOSED
ENTRY	79 SF	0.527778	2	2

MONO COUNTY

THESE PLANS ARE PROVIDED BY MONO COUNTY AS PART OF THE PRE-APPROVED ADU PROGRAM AND ARE PUBLIC DOMAIN, THERE CANNOT BE A CHARGE TO PROVIDE THESE PLANS. NO ALTERATIONS TO THESE PLANS ARE ALLOWED. ALL ALTERATIONS MUST BE DONE UNDER A SEPARATE PERMIT ONCE THE BUILDING PERMIT FOR THE ADU HAS BEEN ISSUED AND FINAL INSPECTION COMPLETED. IF YOU DO NOT HAVE THE CONSTRUCTION KNOWLEDGE AND EXPERIENCE TO CONTRUCT THESE PLANS WITHOUT FURTHER DETAILS, IT IS RECOMMENDED YOU HIRE A CONTRACTOR TO DO THE CONSTRUCTION. THE CITY WILL NOT PROVIDE FURTHER INFORMATION OR DETAILS AND BUILDING INSPECTORS WILL NOT PROVIDE STEP BY STEP INSTRUCTIONS IN THE FIELD.

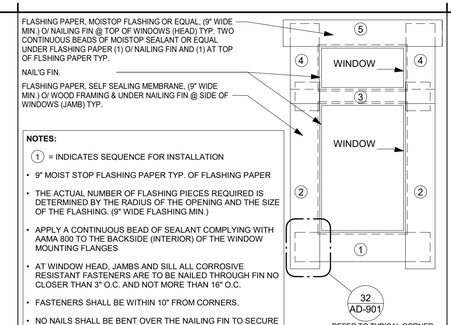
MONO COUNTY ADU PROTOTYPES
MONO COUNTY
BUILDING SECTIONS - HIGH DESERT

DATE
01/10/2024

SHEET
A5-302

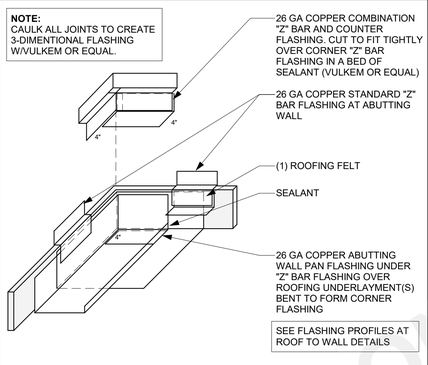
PUBLIC SET

1/25/2024 4:05:47 PM
Autodesk Docs://2340-04_Mono County ADUs - Code Updates/2340-01_Mono County ADUs_2022 Code Update.rvt



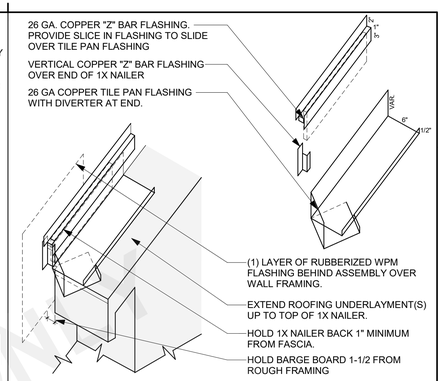
31 FLASHING - WINDOW TYP.

AD-901 SCALE: 12" = 1'-0"



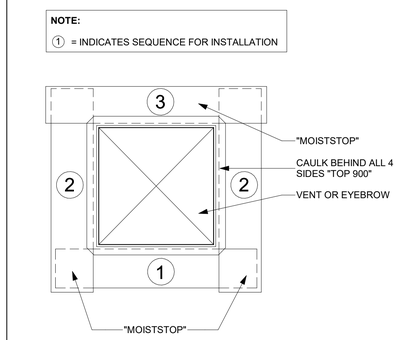
21 ROOF TO WALL TYP. FLASHING 5

AD-901 SCALE: 3" = 1'-0"



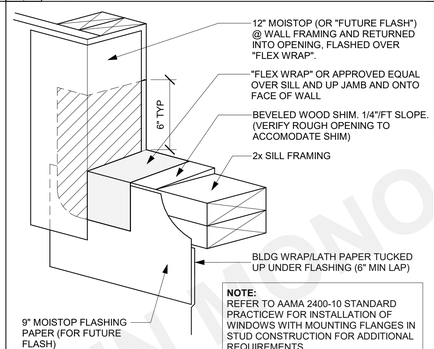
11 ROOF TO WALL TYP. FLASHING 1

AD-901 SCALE: 6" = 1'-0"



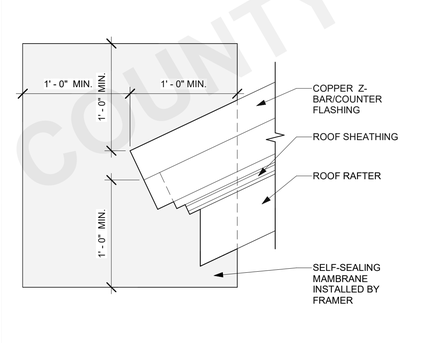
42 FLASHING - G.I. VENT

AD-901 SCALE: 1" = 1'-0"



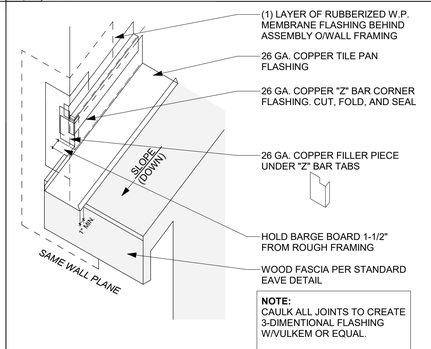
32 FLASHING - WINDOW CORNER TYP.

AD-901 AD-901 SCALE: 12" = 1'-0"



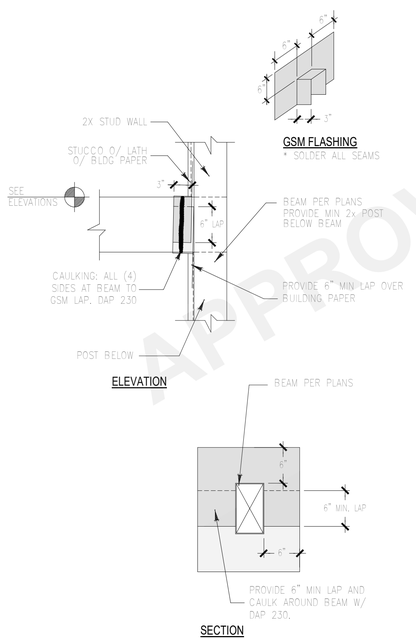
22 FLASHING - FASCIA TO WALL TYP.

AD-901 SCALE: 1 1/2" = 1'-0"



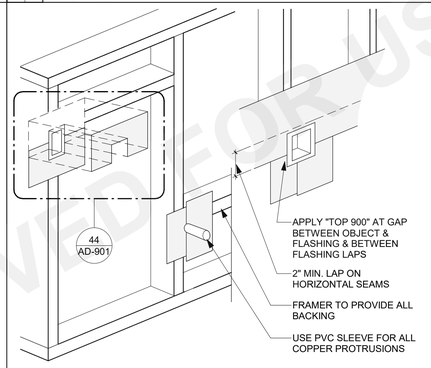
12 ROOF TO WALL TYP. FLASHING 2

AD-901 SCALE: 3" = 1'-0"



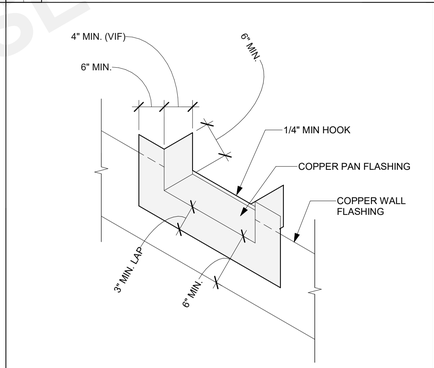
54 BEAM TO WALL FLASHING

AD-901 SCALE: 1" = 1'-0"



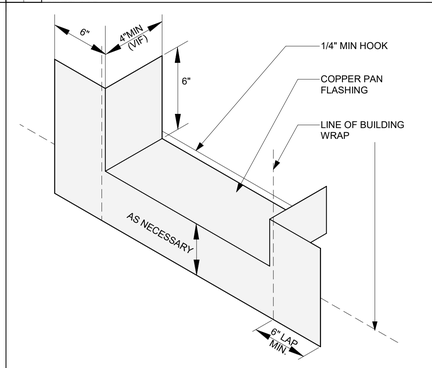
44 FLASHING - DETAILED PROTRUSION

AD-901 AD-901 SCALE: 1 1/2" = 1'-0"



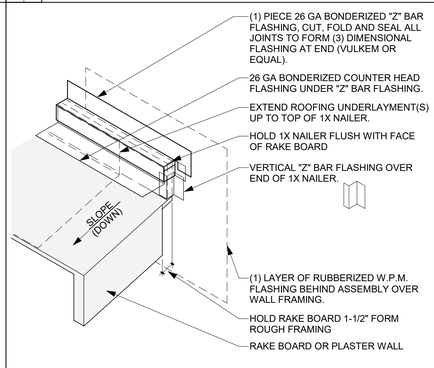
33 FLASHING - DOOR AT GRADE

AD-901 NTS



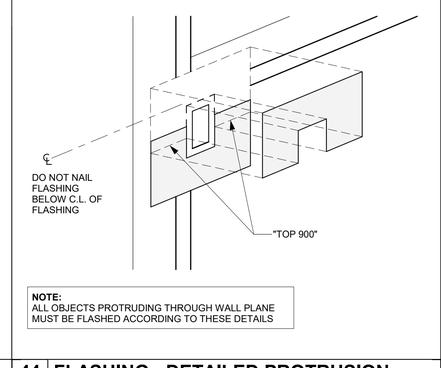
23 FLASHING PAN @ DOOR THRESHOLD

AD-901 SCALE: 3" = 1'-0"



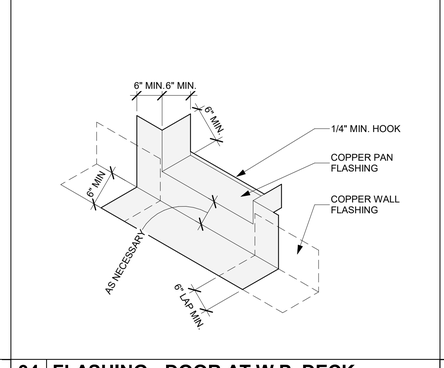
13 ROOF TO WALL TYP. FLASHING 3

AD-901 SCALE: 3" = 1'-0"



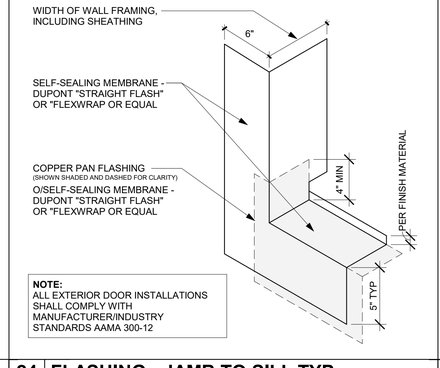
43 FLASHING - PROTRUSIONS

AD-901 SCALE: 1 1/2" = 1'-0"



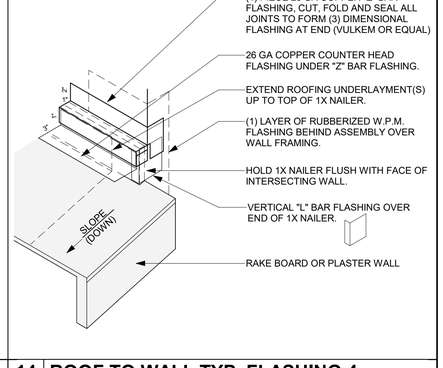
34 FLASHING - DOOR AT W.P. DECK

AD-901 NTS



24 FLASHING - JAMB TO SILL TYP.

AD-901 SCALE: 3" = 1'-0"



14 ROOF TO WALL TYP. FLASHING 4

AD-901 SCALE: 3" = 1'-0"

MONO COUNTY

THESE PLANS ARE PROVIDED BY MONO COUNTY AS PART OF THE PRE-APPROVED ADU PROGRAM AND ARE PUBLIC DOMAIN, THERE CANNOT BE A CHARGE TO PROVIDE THESE PLANS. NO ALTERATIONS TO THESE PLANS ARE ALLOWED, ALL ALTERATIONS MUST BE DONE UNDER A SEPARATE PERMIT ONCE THE BUILDING PERMIT FOR THE ADU HAS BEEN ISSUED AND FINAL INSPECTION COMPLETED. IF YOU DO NOT HAVE THE CONSTRUCTION KNOWLEDGE AND EXPERIENCE TO CONTRUCT THESE PLANS WITHOUT FURTHER DETAILS, IT IS RECOMMENDED YOU HIRE A CONTRACTOR TO DO THE CONSTRUCTION. THE CITY WILL NOT PROVIDE FURTHER INFORMATION OR DETAILS AND BUILDING INSPECTORS WILL NOT PROVIDE STEP BY STEP INSTRUCTIONS IN THE FIELD.

MONO COUNTY ADU PROTOTYPES

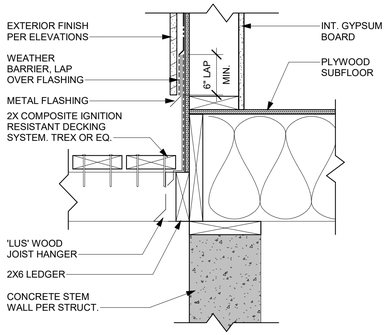
MONO COUNTY

ARCHITECTURAL DETAILS - COMMON

PUBLIC SET

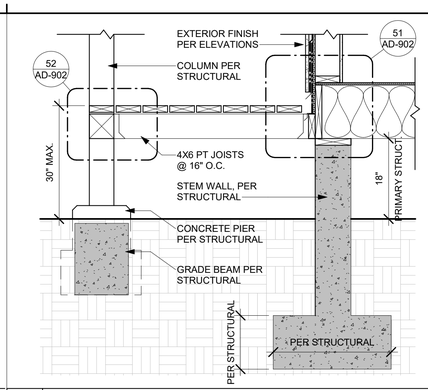
DATE
01/10/2024

SHEET
AD-901



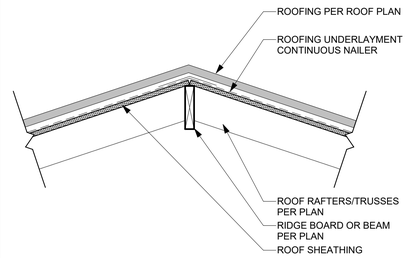
51 DECKING TO EXT. WALL

AD-902 AD-902 SCALE: 1 1/2" = 1'-0"



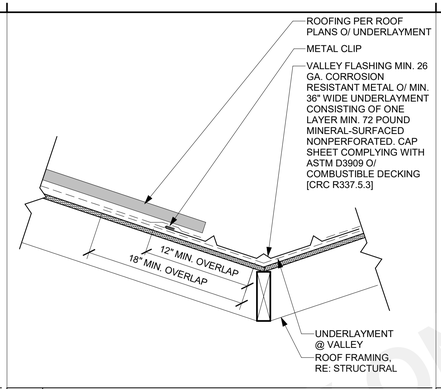
41 RAISED PORCH DETAIL

A1-301 AD-902 SCALE: 3/4" = 1'-0"



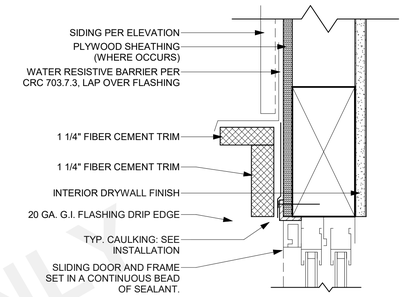
31 ROOF - HIP/RIDGE

AD-902 SCALE: 1" = 1'-0"



21 ROOF - VALLEY

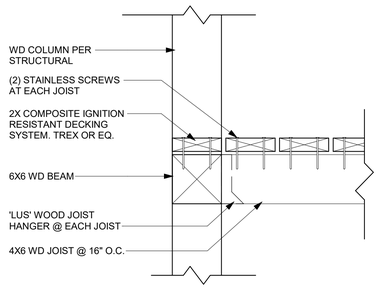
AD-902 SCALE: 1 1/2" = 1'-0"



HEAD

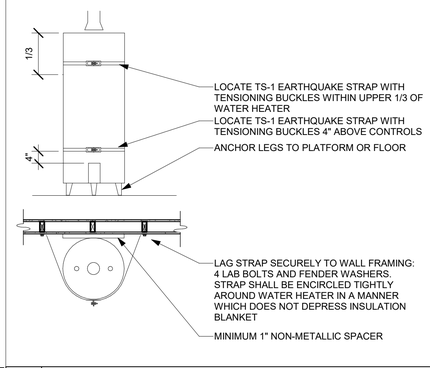
11 DOOR-SLIDING GLASS

AD-902 SCALE: 3" = 1'-0"



52 PORCH DECK EDGE

AD-902 AD-902 SCALE: 1 1/2" = 1'-0"

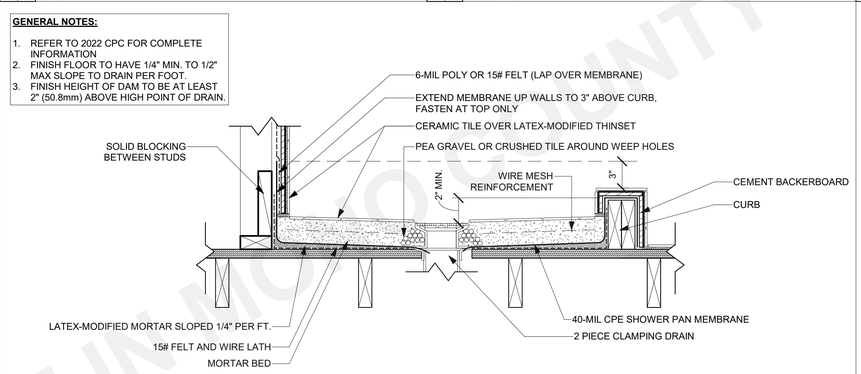


42 WATER HEATER MOUNTING

A1-111 AD-902 SCALE: 1/2" = 1'-0"

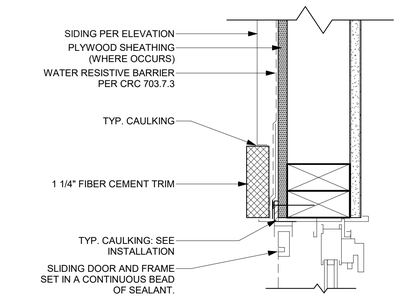
GENERAL NOTES:

1. REFER TO 2022 CPC FOR COMPLETE INFORMATION
2. FINISH FLOOR TO HAVE 1/4" MIN. TO 1/2" MAX SLOPE TO DRAIN PER FOOT.
3. FINISH HEIGHT OF DAM TO BE AT LEAST 2" (50.8mm) ABOVE HIGH POINT OF DRAIN.



32 SHOWER - SECTION

AD-902 SCALE: 1 1/2" = 1'-0"



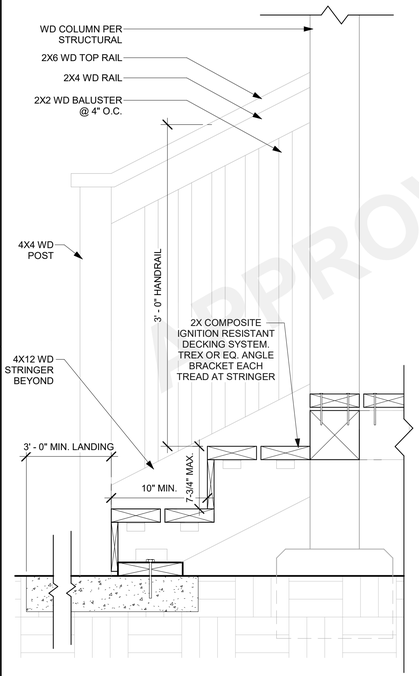
JAMB

12 DOOR-SLIDING GLASS

AD-902 SCALE: 3" = 1'-0"

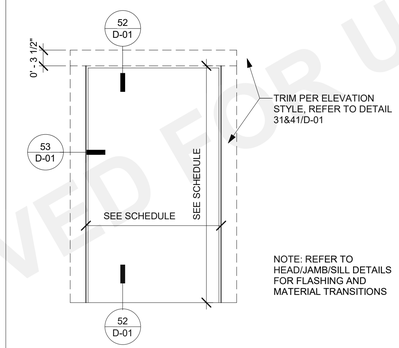
NOTE:

1. HANDRAIL REQUIRED ON NOT LESS THAN ONE SIDE OF EACH FLIGHT OF STAIRS WITH FOUR OR MORE RISERS.
2. ALL WD (WOOD) TO BE FIRE RETARDANT TREATED WOOD.



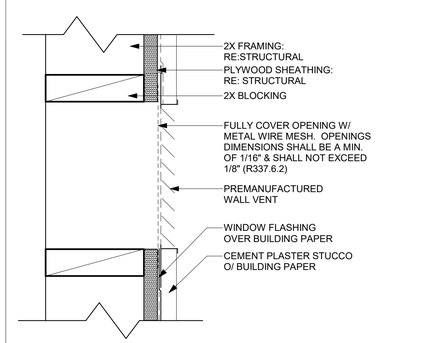
54 PORCH STAIRS

AD-902 SCALE: 1 1/2" = 1'-0"



10 DOOR TRIM - SLIDING GLASS

A2-201 AD-902 SCALE: 3/4" = 1'-0"

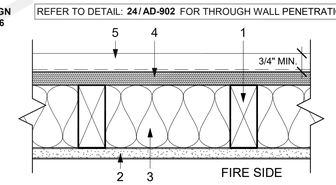


44 WALL VENT

A1-201 AD-902 SCALE: 3" = 1'-0"

UL DESIGN NO. U 356

REFER TO DETAIL: **24 / AD-902** FOR THROUGH WALL PENETRATIONS



WOOD STUDS, GYPSUM BOARD AND CEMENT STUCCO

1. WOOD STUDS
NOMINAL 2X4 SPACED 16" O.C. WITH (2) 2X4 TOP PLATES (1) 2X4 BOTTOM PLATE. STUDS LATERALLY-BRACED BY WOOD STRUCTURAL PANEL SHEATHING (ITEM 5) AND EFFECECTIVELY FIRE STOPPED AT TOP AND BOTTOM OF WALL.

2. GYPSUM BOARD
ANY CLASSIFIED 5/8" THICK, 48" WIDE, APPLIED VERTICALLY AND NAILED TO STUDS AND BEARING PLATES 7" O.C. WITH 6D CEMENT-COATED NAILS, 1 7/8" LONG WITH 1/4" DIAM. HEAD.

JOINTS AND NAILHEADS (NOT SHOWN) - WALLBOARD JOINTS COVERED WITH TAPE AND JOINT COMPOUND. NAIL HEADS COVERED WITH JOINT COMPOUND.

3. BATTS AND BLANKETS
MINERAL FIBER OR GLASS INSULATION, 3 1/2" THICK, PRESSURE FIT TO FILL WALL CAVITIES BETWEEN STUDS AND PLATES. MINERAL FIBER INSULATION TO BE UNFACED AND TO HAVE A MIN. DENSITY OF 3 PCF. GLASS FIBER INSULATION TO BE FACED WITH ALUMIUM FOIL OR FRAFT PAPER AND TO HAVE A MIN. DENSITY OF 0.9 PCF (MIN. R-13 THERMAL INSULATION RATING). FIBER SPRAYED - AS AN ALTERNATE TO BATTS AND BLANKETS (ITEM 4) - SPRAY APPLIED CELLULOSE INSULATION MATERIAL. THE FIBER IS APPLIED WITH WATER TO COMPLETELY FILL THE ENCLOSED CAVITY IN ACCORDANCE WITH THE APPLICATION INSTRUCTIONS SUPPLIED WITH THE PRODUCT. NOMINAL DRY DENSITY OF 3.0 LB/CU.FT.

4. WOOD STRUCTURAL PANEL SHEATHING
MIN 7/16" THICK, 4 FT. WIDE WOOD STRUCTURAL PANELS, MIN. GRADE "C-D" OR "SHEATHING". INSTALLED WITH LONG DIMENSION OF SHEET (STRENGTH AXIS) OR FACE GRAIN OF PLYWOOD PARALLEL WITH OR PERPENDICULAR TO STUDS. VERTICAL JOINTS CENTERED ON STUDS. HORIZONTAL JOINTS BACKED WITH NOMINAL 2X4 WOOD BLOCKING. ATTACHED TO STUDS ON EXTERIOR SIDE OF WALL WITH 6D CEMENT COATED BOX NAILS SPACED 6" O.C. AT PERIMETER OF PANELS AND 12" O.C. ALONG INTERIOR STUDS.

5. EXTERIOR FACING
INSTALLED IN ACCORDANCE WITH THE MANUFACTURER'S INSTALLATION INSTRUCTION. ONE OF THE FOLLOWING EXTERIOR FACINGS IS TO BE APPLIED OVER THE SHEATHING. REFER TO PLAN FOR INFOEMATION:

D. CEMENTITIOUS STUCCO - PORTLAND CEMENT OR SYNTHETIC STUCCO SYSTEM WITH SELF-FURRING METAL LATH OR ADHESIVE BASE COAT. THICKNESS FROM 3/8" TO 3/4", DEPENDING ON SYSTEM.
H. FIBER-CEMENT SIDING - FIBER-CEMENT EXTERIOR SIDING INCLUDING SMOOTH AND PATTERNED PANEL OR LAP SIDING.

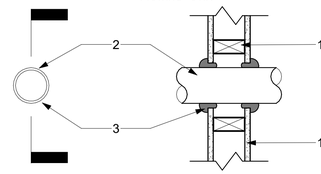
UL DES U305
AT INTERIOR WALL USE:
5/8" SHEETROCKFIRECODE CORE PANELS,
5/8" SHEETROCK ULTRALIGHT PANELS FIRE CODE X OR
5/8" FIBEROCK PANELS –
2 X 4 WOOD STUD 16" OR 24" O.C.

34 1-HR EXT. RATED WALL ASSEMBLY

AD-902 SCALE: 3" = 1'-0"

XHEZ.W-L-1166

WALL SYSTEM PENENTRATION
F RATING - 1 AND 2 HR (SEE ITEM 1B)
T RATING - 0 HR



1. WALL ASSEMBLY
THE 1 OR 2 HR. FIRE RATED GYPSUM WALLBOARD/STUD WALL ASSEMBLY SHALL BE CONSTRUCTED OF THE MATERIALS AND IN THE MANNER SPECIFIED IN THE INDIVIDUAL U300 OR U400 SERIES WALL AND PARTITION DESIGNS IN THE UL FIRE RESISTANCE DIRECTORY AND SHALL INCLUDE THE FOLLOWING CONSTRUCTION FEATURES:

A. STUDS-
WALL FRAMING MAY CONSIST OF EITHER WOOD STUDS OR STEEL. CHANNEL STUDS. WOOD STUDS TO CONSIST OF NOM. 2 IN. BY 4 IN. LUMBER SPACED 16 IN. O.C. STEEL STUDS TO BE MIN. 3 1/2 IN. WIDE AND SPACED MAX. 24 IN. O.C.

B. GYPSUM BOARD (BEARING THE UL CLASSIFICATION MARKING)-
THICKNESS, TYPE, NUMBER OF LAYERS AND FASTENERS AS REQUIRED IN THE INDIVIDUAL WALL AND PARTITION DESIGN. MAX. DIAM. OF OPENING IS 5 IN.

THE HOURLY F RATING OF THE FIRESTOP SYSTEM IS EQUAL TO THE HOURLY FIRE RATING OF THE WALL ASSEMBLY IN WHICH IT IS INSTALLED.

2. THROUGH- PENETRANTS
ONE METALLIC PIPE, CONDUIT OR TUBING INSTALLED EITHER CONCENTRICALLY OR ECCENTRICALLY WITHIN THE FIRESTOP SYSTEM. THE ANNULAR SPACE BETWEEN THE PIPE, CONDUIT OR TUBING AND PERIPHERY OF THE OPENING SHALL BE MIN. OF 0 IN. (POINT CONTACT) TO A MAX. 1/8 IN. PIPE, CONDUIT OR TUBING TO BE RIGIDLY SUPPORTED ON BOTH SIDES OF WALL ASSEMBLY. THE FOLLOWING TYPES AND SIZES OF METALLIC PIPES, CONDUITS OR TUBING MAY BE USED:

A. COPPER TUBING-
NOM. 4 IN. DIAM. (OR SMALLER) TYPE M (OR HEAVIER) COPPER TUBING.

B. COPPER PIPE-
NOM. 4 IN. DIAM. (OR SMALLER) REGULAR (OR HEAVIER) COPPER PIPE.

C. STEEL PIPE-
NOM. 4 IN. DIAM. (OR SMALLER) SCHEDULE 5 (OR HEAVIER) STEEL PIPE.

D. CONDUIT-
NOM. 4 IN. DIAM. (OR SMALLER) STEEL ELECTRICAL METALLIC TUBING OR RIGID STEEL CONDUIT

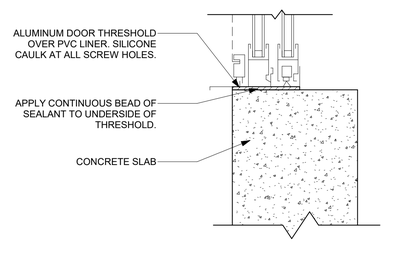
E. IRON PIPE-
NOM. 4 IN. DIAM. (OR SMALLER) CAST OR DUCTILE IRON PIPE.

3. FILL, VOID OR CAVITY MATERIALS (BEARING THE UL CLASSIFICATION MARKING) - CAULK OR PUTTY-MIN. 1/2 IN. DIAMETER BEAD CAULK OR PUTTY APPLIED CONTINUOUSLY AROUND THE PENETRANT ON THE WALL SURFACES ON BOTH SIDES OF THE WALL.

3M COMPANY - CP 25WB+ CAULK OR MPS-2+ PUTTY

24 THROUGH PENETRATION @ WALL1

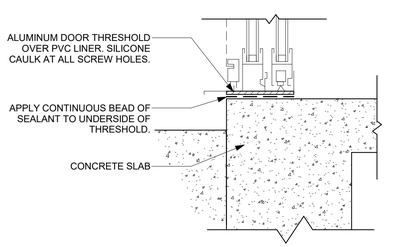
AD-902 SCALE: 1 1/2" = 1'-0"



SILL

13 DOOR-SLIDING GLASS

AD-902 SCALE: 3" = 1'-0"



THRESHOLD

14 DOOR-SLIDING GLASS - THRESHOLD

AD-902 SCALE: 3" = 1'-0"

MONO COUNTY

THESE PLANS ARE PROVIDED BY MONO COUNTY AS PART OF THE PRE-APPROVED ADU PROGRAM AND ARE PUBLIC DOMAIN. THERE CANNOT BE A CHARGE TO PROVIDE THESE PLANS. NO ALTERATIONS TO THESE PLANS ARE ALLOWED. ALL ALTERATIONS MUST BE DONE UNDER A SEPARATE PERMIT ONCE THE BUILDING PERMIT FOR THE ADU HAS BEEN ISSUED AND FINAL INSPECTION COMPLETED. IF YOU DO NOT HAVE THE CONSTRUCTION KNOWLEDGE AND EXPERIENCE TO CONTRUCT THESE PLANS WITHOUT FURTHER DETAILS, IT IS RECOMMENDED YOU HIRE A CONTRACTOR TO DO THE CONSTRUCTION. THE CITY WILL NOT PROVIDE FURTHER INFORMATION OR DETAILS AND BUILDING INSPECTORS WILL NOT PROVIDE STEP BY STEP INSTRUCTIONS IN THE FIELD.

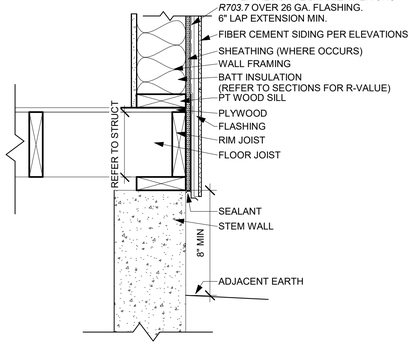
MONO COUNTY ADU PROTOTYPES
MONO COUNTY
ARCHITECTURAL DETAILS - COMMON

PUBLIC SET

DATE
01/10/2024

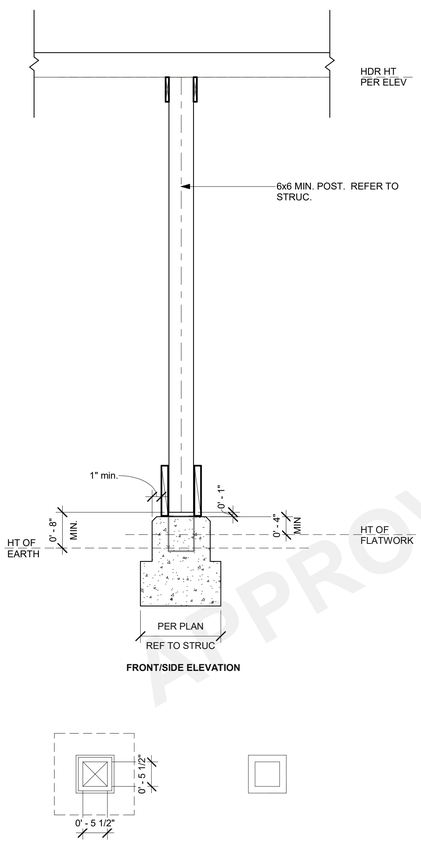
SHEET
AD-902

1/25/2024 4:05:49 PM
Autodesk Docs://2340-04_Mono County ADUs - Code Updates/2340-01_Mono County ADUs_2022 Code Update.rvt



51 TYP. RAISED FOUNDATION

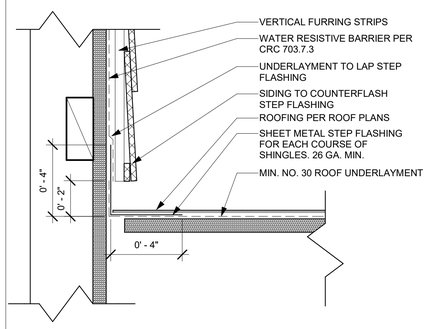
A1-301 AD-903 SCALE: 1 1/2" = 1'-0"



POSTS AND COLUMNS THAT ARE EITHER EXPOSED TO THE WEATHER OR LOCATED IN BASEMENTS OR CELLARS, SUPPORTED BY CONCRETE PIERS OR METAL PEDESTALS, SHALL BE PROJECTED AT LEAST 1 INCH ABOVE THE SLAB OR DECK AND 8 INCHES ABOVE EXPOSED EARTH AND SHALL BE SEPARATED BY AN IMPERVIOUS MOISTURE BARRIER (ALTERNATE, PROVIDE A PRESERVATIVE-TREATED WOOD POST OR COLUMN). 2304.12.2.2 & EXCEPTION 1 CBC

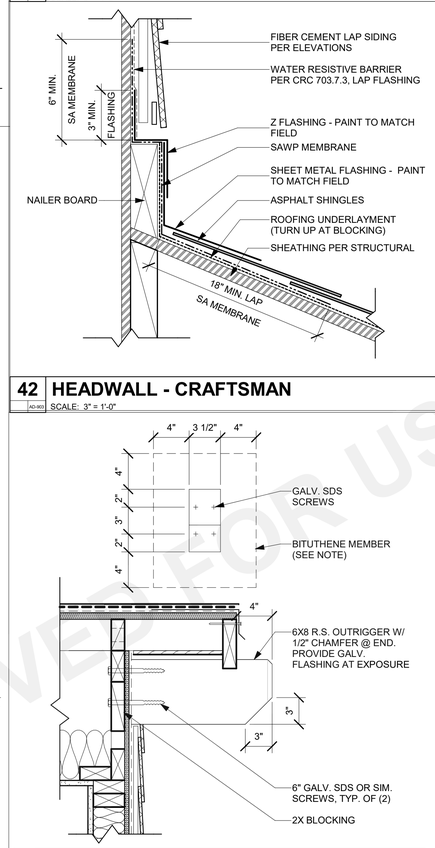
54 POST-RURAL MOUNTAIN

A1-201 AD-903 SCALE: 3/4" = 1'-0"



41 SIDEWALL - SUBURBAN RANCH

AD-903 SCALE: 3" = 1'-0"



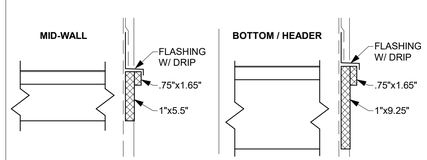
42 HEADWALL - CRAFTSMAN

AD-903 SCALE: 3" = 1'-0"

NOTES:
1. PRE-PRIME ALL SIDES OF BRACE PRIOR TO INSTALLATION.
2. A BITUTHENE MEMBRANE SHALL BE INSTALLED BEHIND OUTRIGGER W/ 4" LAP MIN.

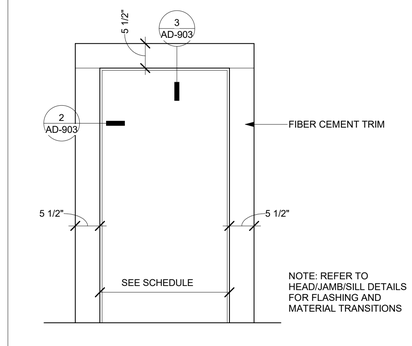
43 OUTRIGGER

A1-201 AD-903 SCALE: 1 1/2" = 1'-0"



44 TRIM PROFILE - RURAL MOUNTAIN

A1-201 AD-903 SCALE: 1 1/2" = 1'-0"

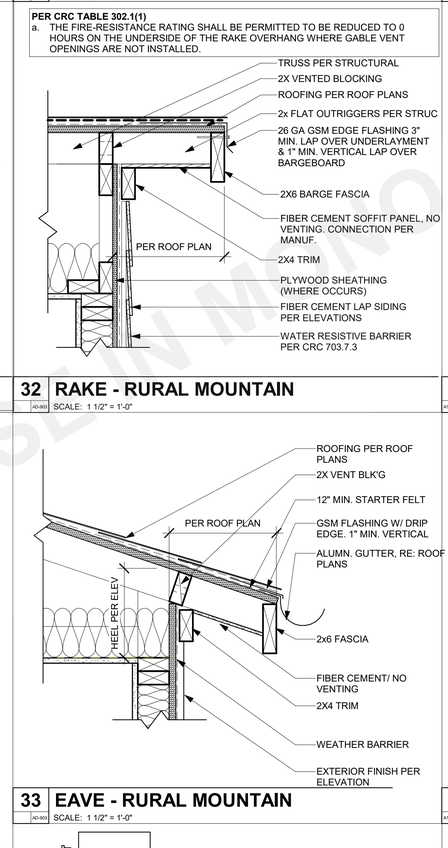


NOTE: REFER TO HEAD/JAMB/SILL DETAILS FOR FLASHING AND MATERIAL TRANSITIONS

31 DOOR TRIM - RURAL MOUNTAIN

A1-201 AD-903 SCALE: 3/4" = 1'-0"

PER CRC TABLE 302.1(1)
a. THE FIRE-RESISTANCE RATING SHALL BE PERMITTED TO BE REDUCED TO 0 HOURS ON THE UNDERSIDE OF THE RAKE OVERHANG WHERE GABLE VENT OPENINGS ARE NOT INSTALLED.

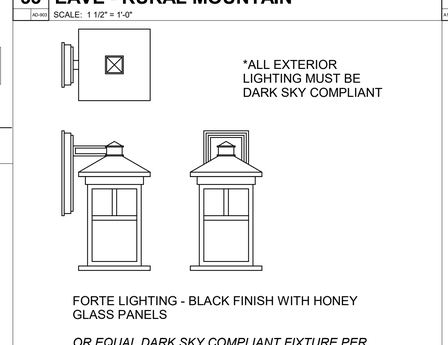


32 RAKE - RURAL MOUNTAIN

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

33 EAVE - RURAL MOUNTAIN

AD-903 SCALE: 1 1/2" = 1'-0"



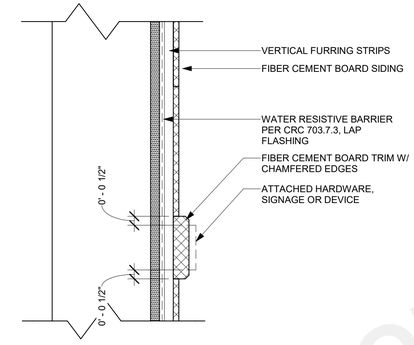
*ALL EXTERIOR LIGHTING MUST BE DARK SKY COMPLIANT

FORTE LIGHTING - BLACK FINISH WITH HONEY GLASS PANELS

OR EQUAL DARK SKY COMPLIANT FIXTURE PER ZONING REGULATIONS SECTION 17.70.100.

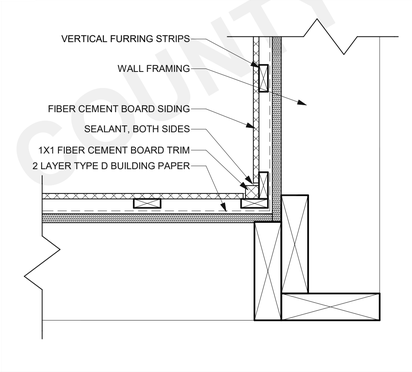
34 TYP. RURAL MNTN LIGHT FIXTURE

A1-201 AD-903 SCALE: 1 1/2" = 1'-0"



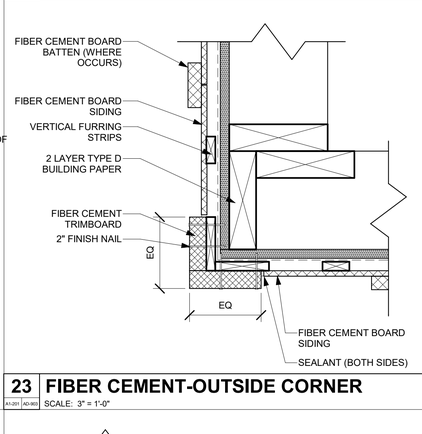
21 FIBER CEMENT MOUNTING PAD

AD-903 SCALE: 3" = 1'-0"



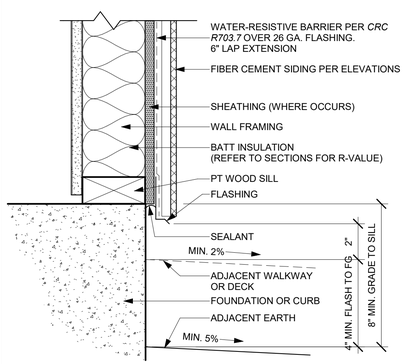
22 FIBER CEMENT-INSIDE CORNER TRIM

A1-201 AD-903 SCALE: 3" = 1'-0"



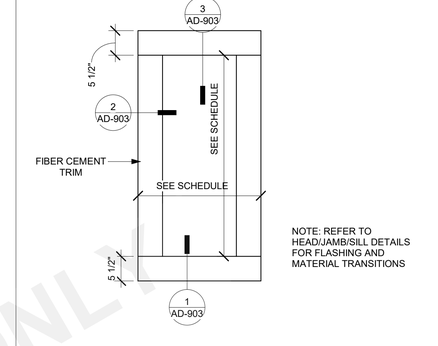
23 FIBER CEMENT-OUTSIDE CORNER

A1-201 AD-903 SCALE: 3" = 1'-0"



24 TYP. FOUNDATION-HIGH DESERT

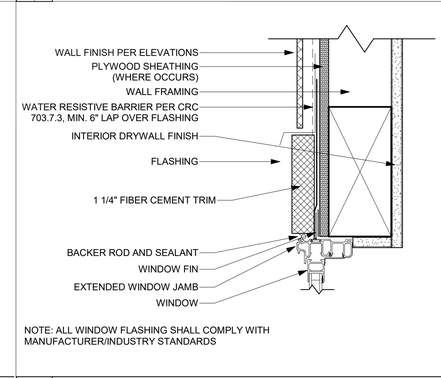
AD-903 SCALE: 3" = 1'-0"



NOTE: REFER TO HEAD/JAMB/SILL DETAILS FOR FLASHING AND MATERIAL TRANSITIONS

11 WINDOW TRIM - RURAL MOUNTAIN

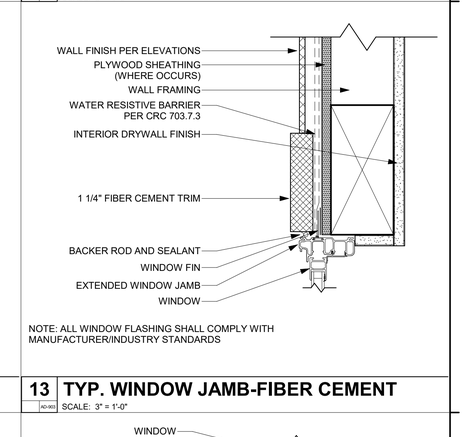
A1-201 AD-903 SCALE: 3/4" = 1'-0"



NOTE: ALL WINDOW FLASHING SHALL COMPLY WITH MANUFACTURER/INDUSTRY STANDARDS

12 TYP. WINDOW HEAD-FIBER CEMENT

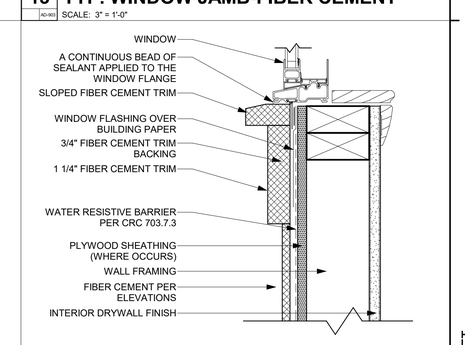
AD-903 SCALE: 3" = 1'-0"



NOTE: ALL WINDOW FLASHING SHALL COMPLY WITH MANUFACTURER/INDUSTRY STANDARDS

13 TYP. WINDOW JAMB-FIBER CEMENT

AD-903 SCALE: 3" = 1'-0"



NOTE: ALL WINDOW FLASHING SHALL COMPLY WITH MANUFACTURER/INDUSTRY STANDARDS AAMA 2400-02

14 TYP. WINDOW SILL-FIBER CEMENT

AD-903 SCALE: 3" = 1'-0"

MONO COUNTY

THESE PLANS ARE PROVIDED BY MONO COUNTY AS PART OF THE PRE-APPROVED ADU PROGRAM AND ARE PUBLIC DOMAIN. THERE CANNOT BE A CHARGE TO PROVIDE THESE PLANS. NO ALTERATIONS TO THESE PLANS ARE ALLOWED. ALL ALTERATIONS MUST BE DONE UNDER A SEPARATE PERMIT ONCE THE BUILDING PERMIT FOR THE ADU HAS BEEN ISSUED AND FINAL INSPECTION COMPLETED. IF YOU DO NOT HAVE THE CONSTRUCTION KNOWLEDGE AND EXPERIENCE TO CONTRUCT THESE PLANS WITHOUT FURTHER DETAILS, IT IS RECOMMENDED YOU HIRE A CONTRACTOR TO DO THE CONSTRUCTION. THE CITY WILL NOT PROVIDE FURTHER INFORMATION OR DETAILS AND BUILDING INSPECTORS WILL NOT PROVIDE STEP BY STEP INSTRUCTIONS IN THE FIELD.

MONO COUNTY ADU PROTOTYPES
MONO COUNTY

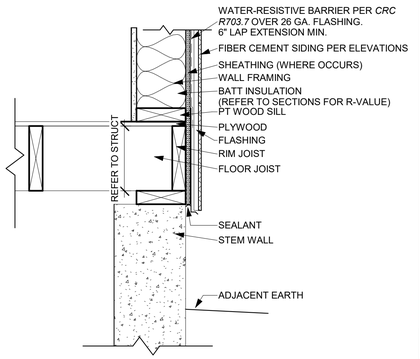
ARCHITECTURAL DETAILS - RURAL MOUNTAIN

PUBLIC SET

DATE
01/10/2024

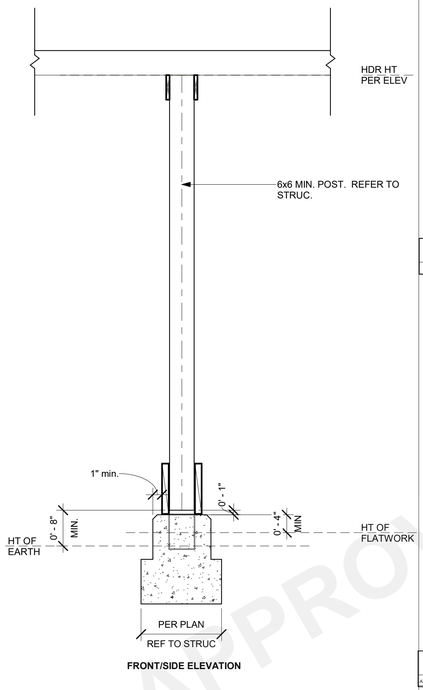
SHEET
AD-903

1/25/2024 4:05:50 PM
Autodesk Docs://2340-04_Mono County ADUs - Code Updates/2340-01_Mono County ADUs_2022 Code Update.rvt



51 TYP. RAISED FOUNDATION

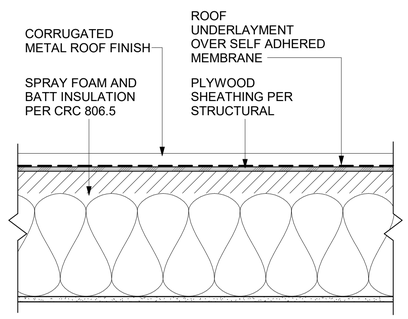
A1-302 AD-904 SCALE: 1 1/2" = 1'-0"



POSTS AND COLUMNS THAT ARE EITHER EXPOSED TO THE WEATHER OR LOCATED IN BASEMENTS OR CELLARS, SUPPORTED BY CONCRETE PIERS OR METAL PEDESTALS, SHALL BE PROJECTED AT LEAST 1 INCH ABOVE THE SLAB OR DECK AND 8 INCHES ABOVE EXPOSED EARTH AND SHALL BE SEPARATED BY AN IMPERVIOUS MOISTURE BARRIER (ALTERNATE, PROVIDE A PRESERVATIVE-TREATED WOOD POST OR COLUMN). 2304.12.2.2 & EXCEPTION 1 CBC

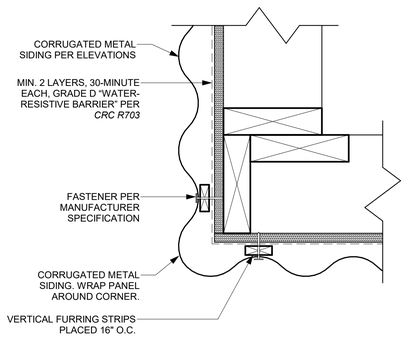
54 POST-HIGH DESERT

A1-202 AD-904 SCALE: 3/4" = 1'-0"



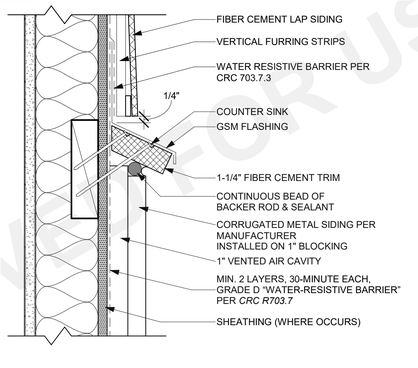
41 RAFTER ASSEMBLY - HIGH DESERT

AD-904 SCALE: 1 1/2" = 1'-0"



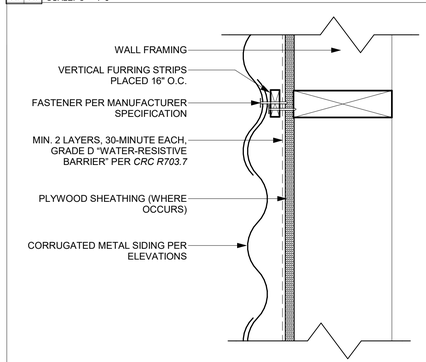
42 TYP. OUTSIDE CORNER-HIGH DESERT

AD-904 SCALE: 3" = 1'-0"



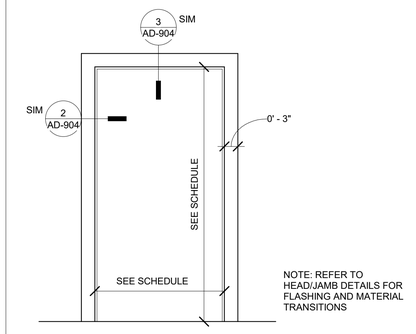
43 CORRUGATED METAL WAINSCOT

A3-201 AD-904 SCALE: 3" = 1'-0"



44 CORRUGATED METAL WALL EXT.

AD-904 SCALE: 3" = 1'-0"

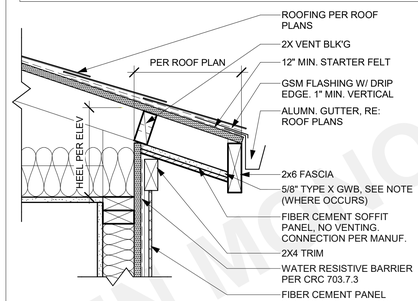


NOTE: REFER TO HEAD/JAMB DETAILS FOR FLASHING AND MATERIAL TRANSITIONS

31 DOOR TRIM - HIGH DESERT

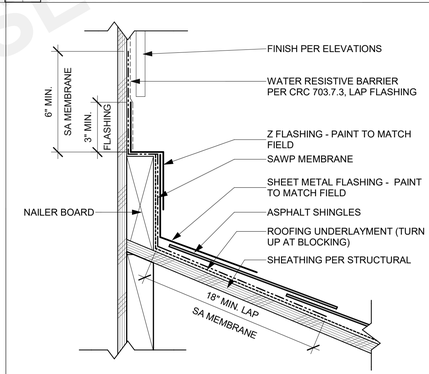
A1-202 AD-904 SCALE: 3/4" = 1'-0"

NOTE: WHERE 1-HR FIRE-RESISTANCE RATED PROJECTS REQUIRED (NON-SPRINKLERED & FIRE SEPARATION DISTANCE 3'-0" - 4'-0"), PROVIDE WATER-RESISTANT 5/8" TYPE X GWB BEHIND FIBER CEMENT SOFFIT PANEL



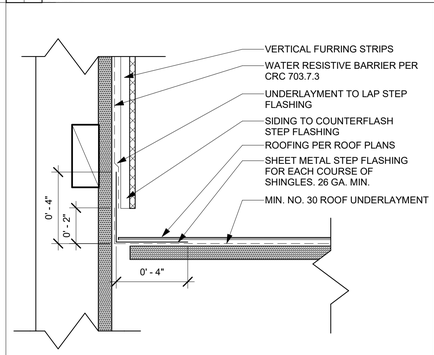
32 EAVE - HIGH DESERT

AD-904 SCALE: 1 1/2" = 1'-0"



33 HEADWALL - HIGH DESERT

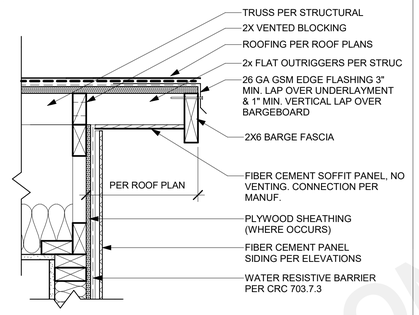
AD-904 SCALE: 3" = 1'-0"



34 SIDEWALL - HIGH DESERT

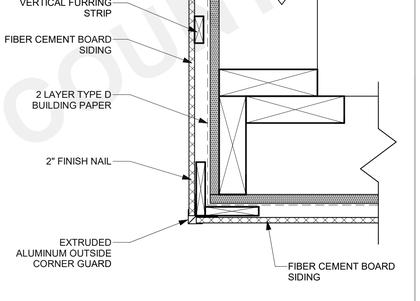
AD-904 SCALE: 3" = 1'-0"

TABLE 302.1(1)
a. THE FIRE-RESISTANCE RATING SHALL BE PERMITTED TO BE REDUCED TO 0 HOURS ON THE UNDERSIDE OF THE RAKE OVERHANG WHERE GABLE VENT OPENINGS ARE NOT INSTALLED.



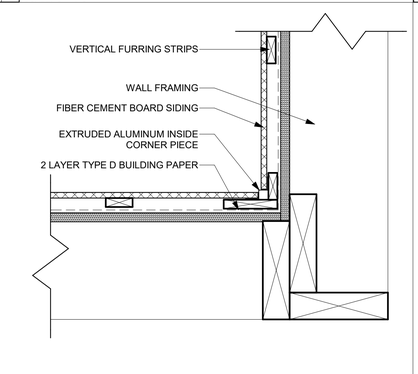
21 RAKE - HIGH DESERT

AD-904 SCALE: 1 1/2" = 1'-0"



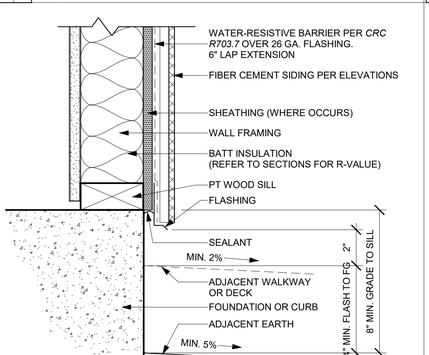
22 TYP. OUTSIDE CORNER-HIGH DESERT

A1-202 AD-904 SCALE: 3" = 1'-0"



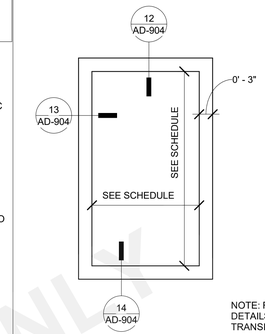
23 TYP. INSIDE CORNER-HIGH DESERT

AD-904 SCALE: 3" = 1'-0"



24 TYP. FOUNDATION-HIGH DESERT

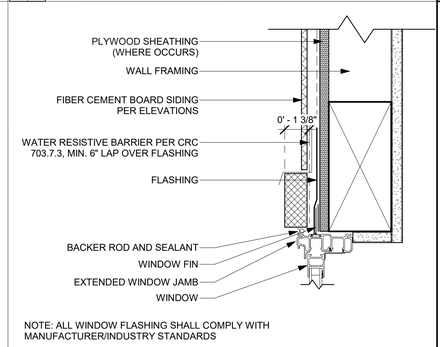
A3-202 AD-904 SCALE: 3" = 1'-0"



NOTE: REFER TO HEAD/JAMB/SILL DETAILS FOR FLASHING AND MATERIAL TRANSITIONS

11 WINDOW TRIM - HIGH DESERT

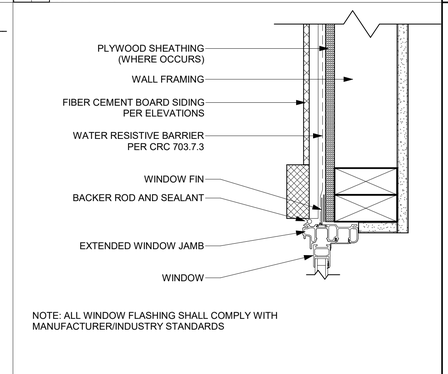
A1-202 AD-904 SCALE: 3/4" = 1'-0"



NOTE: ALL WINDOW FLASHING SHALL COMPLY WITH MANUFACTURER/INDUSTRY STANDARDS

12 TYP. WINDOW HEAD-HIGH DESERT

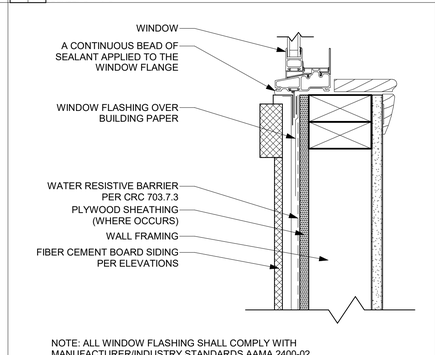
AD-904 SCALE: 3" = 1'-0"



NOTE: ALL WINDOW FLASHING SHALL COMPLY WITH MANUFACTURER/INDUSTRY STANDARDS

13 TYP. WINDOW JAMB-HIGH DESERT

AD-904 SCALE: 3" = 1'-0"



NOTE: ALL WINDOW FLASHING SHALL COMPLY WITH MANUFACTURER/INDUSTRY STANDARDS AAMA 2400-02

14 TYP. WINDOW SILL-HIGH DESERT

AD-904 SCALE: 3" = 1'-0"

THESE PLANS ARE PROVIDED BY MONO COUNTY AS PART OF THE PRE-APPROVED ADU PROGRAM AND ARE PUBLIC DOMAIN, THERE CANNOT BE A CHARGE TO PROVIDE THESE PLANS. NO ALTERATIONS TO THESE PLANS ARE ALLOWED. ALL ALTERATIONS MUST BE DONE UNDER A SEPARATE PERMIT ONCE THE BUILDING PERMIT FOR THE ADU HAS BEEN ISSUED AND FINAL INSPECTION COMPLETED. IF YOU DO NOT HAVE THE CONSTRUCTION KNOWLEDGE AND EXPERIENCE TO CONTRUCT THESE PLANS WITHOUT FURTHER DETAILS, IT IS RECOMMENDED YOU HIRE A CONTRACTOR TO DO THE CONSTRUCTION. THE CITY WILL NOT PROVIDE FURTHER INFORMATION OR DETAILS AND BUILDING INSPECTORS WILL NOT PROVIDE STEP BY STEP INSTRUCTIONS IN THE FIELD.

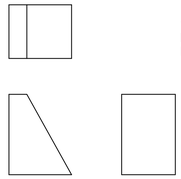
MONO COUNTY ADU PROTOTYPES
MONO COUNTY
ARCHITECTURAL DETAILS - HIGH DESERT

PUBLIC SET

DATE
01/10/2024

SHEET
AD-904

1/25/2024 4:05:51 PM
Autodesk Docs://2340-04_Mono County ADUs - Code Updates/2340-01_Mono County ADUs_2022 Code Update.rvt



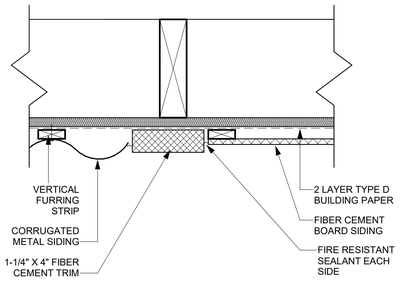
*ALL EXTERIOR LIGHTING MUST BE DARK SKY COMPLIANT

LINGMAN LIGHTING - WALL MOUNT
DIMMABLE BLACK LED WALL SCONCE
(ULEW-30001-8W-T3-W30-01-120/277V)

OR EQUAL DARK SKY COMPLIANT FIXTURE PER ZONING REGULATIONS SECTION 17.70.100.

11 LIGHT FIXTURE - HIGH DESERT

A1-202 | AD-905 SCALE: 1 1/2" = 1'-0"



12 WALL - CORRUGATED TO FIBER CEMENT TRANSITION

A1-202 | AD-905 SCALE: 3" = 1'-0"

MONO COUNTY

THESE PLANS ARE PROVIDED BY MONO COUNTY AS PART OF THE PRE-APPROVED ADU PROGRAM AND ARE PUBLIC DOMAIN. THERE CANNOT BE A CHARGE TO PROVIDE THESE PLANS. NO ALTERATIONS TO THESE PLANS ARE ALLOWED. ALL ALTERATIONS MUST BE DONE UNDER A SEPARATE PERMIT ONCE THE BUILDING PERMIT FOR THE ADU HAS BEEN ISSUED AND FINAL INSPECTION COMPLETED. IF YOU DO NOT HAVE THE CONSTRUCTION KNOWLEDGE AND EXPERIENCE TO CONTRUCT THESE PLANS WITHOUT FURTHER DETAILS, IT IS RECOMMENDED YOU HIRE A CONTRACTOR TO DO THE CONSTRUCTION. THE CITY WILL NOT PROVIDE FURTHER INFORMATION OR DETAILS AND BUILDING INSPECTORS WILL NOT PROVIDE STEP BY STEP INSTRUCTIONS IN THE FIELD.

PUBLIC SET

MONO COUNTY ADU PROTOTYPES
MONO COUNTY

ARCHITECTURAL DETAILS - HIGH DESERT

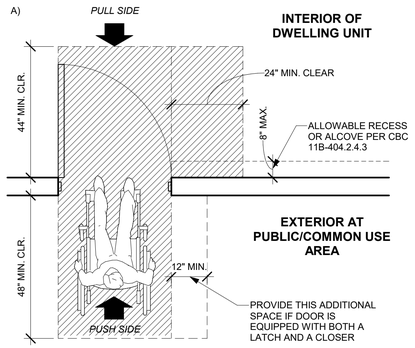
DATE
01/10/2024

SHEET
AD-905

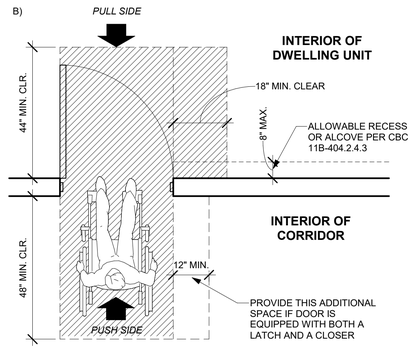
1/25/2024 4:05:51 PM
Autodesk Docs://2340-04_Mono County ADUs - Code Updates/2340-01_Mono County ADUs_2022 Code Update.rvt

FRONT APPROACH

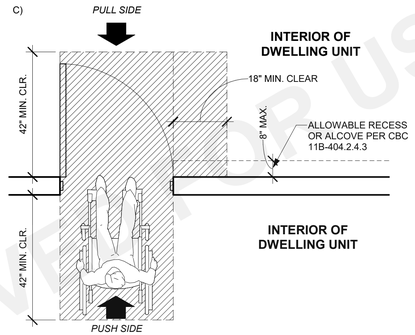
A)



B)



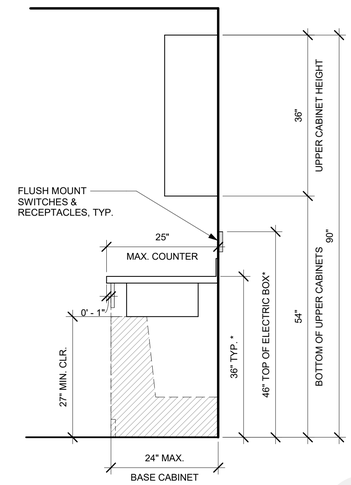
C)



REF CBC 1132A.5

43 CLEARANCES AT DOORS & GATES

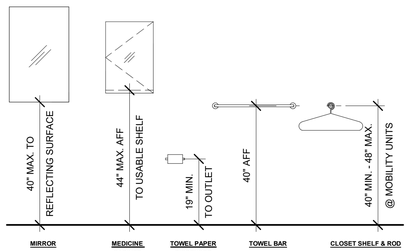
A1-101 AD-931 SCALE: 1/2" = 1'-0"



NOTES:
1. **(*)** DENOTES COMPLIANCE WITH SIDE REACH APPROACH ***PER 2022 CBC 11B-308 EXCEPTION.***
2. REMOVABLE BASE CABINET AT SINK & WORKSPACE (MIN. 30" CLEAR). REFER TO DETAIL **23/AD-931** FOR ADDITIONAL INFORMATION.

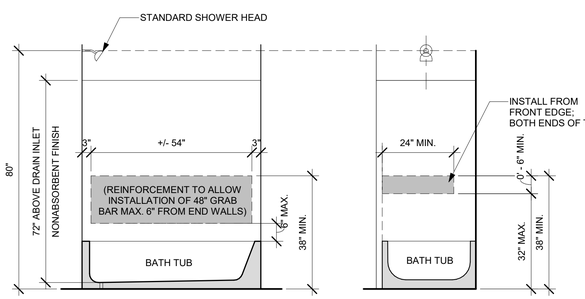
32 11A ADP. KITCHEN CASEWORK

AD-931 SCALE: 3/4" = 1'-0"



14 ACCESSORIES - RESIDENTIAL

AD-931 SCALE: 1/2" = 1'-0"

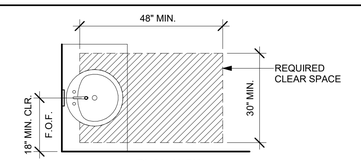


NOTES:
1. ALL DIMENSIONS FOR THIS DETAIL ARE FROM FACE OF FINISHED SURFACE
2. WALLS SHALL BE FINISHED WITH A SMOOTH, NONABSORBENT FINISH TO A HEIGHT MIN. 72" ABOVE THE DRAIN INLET. ***(2022 CBC 1210.2.1)***
3. BUILT-IN TUBS W SHOWERS SHALL HAVE WATERPROOF JOINTS BETWEEN THE TUB AND ADJACENT WALL
4. OPERABLE PARTS SHALL BE OPERABLE WITH ONE HAND AND SHALL NOT REQUIRE TIGHT GRASPING, PINCHING, OR TWISTING OF THE WRIST. THE FORCE REQUIRED TO ACTIVATE OPERABLE PARTS SHALL BE 5 LBS MAX.
5. ALL TUB/SHOWER ENCLOSURES: PROVIDE FACTORY INSTALLED BACKING FOR GRAB BAR REINFORCEMENT

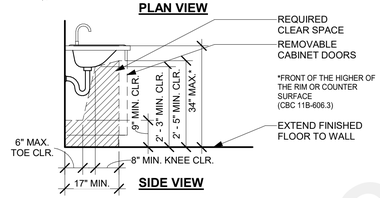
LOCATIONS FOR GRAB BAR REINFORCEMENT - PER 2022 CBC 11A-9G

44 11A ADP. TUB COMPLIANCE

A1-101 AD-931 SCALE: 1/2" = 1'-0"



PLAN VIEW



SIDE VIEW

NOTES:
1. **ADAPTABLE UNITS** - PROVIDE REMOVABLE DOORS AT SINK CABINET THAT DON'T REQUIRE SPECIALIZED KNOWLEDGE OR THE USE OF SPECIALIZED TOOLS.
2. THE FINISHED FLOOR SHOULD EXTEND TO THE WALL.
3. HOT WATER AND DRAIN PIPES UNDER ACCESSIBLE LAVATORIES SHALL BE INSULATED OR OTHERWISE COVERED. THERE SHALL BE NO SHARP OR ABRASIVE SURFACES UNDER LAVATORIES.
4. SINK SHALL BE 6 1/2" DEEP MAX.
5. THE DIP OF THE OVERFLOW SHALL NOT BE CONSIDERED IN DETERMINING KNEE & TOE CLEARANCES.
6. OPERABLE PARTS OF SOAP OR OTHER DISPENSERS LOCATED ON THE BACK WALL OF THE LAVATORY ARE WITHIN REACH RANGE 40" MAXIMUM AFF AND 17"-19" MAXIMUM DEEP DEPENDENT UPON TOE CLEARANCE BELOW PER CBC.
7. FAUCET CONTROLS AND OPERATING MECHANISMS SHALL BE OPERABLE WITH ONE HAND AND SHALL NOT REQUIRE TIGHT GRASPING, PINCHING OR TWISTING OF THE WRIST.
8. THE FORCE REQUIRED TO ACTIVATE CONTROLS SHALL BE NO GREATER THAN 5 POUND FORCE (22.2N). LEVER-OPERATED, PUSH-TYPE AND ELECTRONICALLY CONTROLLED MECHANISMS ARE EXAMPLES OF ACCEPTABLE DESIGNS. SELF-CLOSING VALVES ARE ALLOWED IF THE FAUCET REMAINS OPEN FOR AT LEAST 10 SECONDS.
9. WHERE MIRRORS OR TOWEL FIXTURES ARE PROVIDED THEY SHALL BE MOUNTED WITH THE BOTTOM EDGE NO HIGHER THAN 40 INCHES FROM THE FLOOR.

REF. 2019 1134A.8

21 11A ADP. BATHROOM SINK

A1-101 AD-931 SCALE: 1/2" = 1'-0"

***KITCHEN ACCESSIBILITY NOTES**

1. THE SINK AND WORK SURFACE MAY BE A SINGLE INTEGRAL UNIT A MINIMUM OF 60 INCHES IN LENGTH, OR BE SEPARATE (30") COMPONENTS.

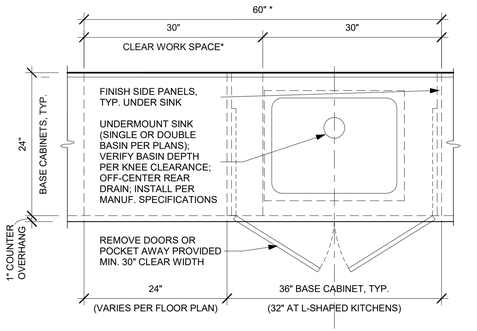
2. IF SOLID SURFACE COUNTERS ARE NOT PROVIDED, REPOSITIONABLE OR (2) 15" BREADBOARDS SHALL BE PROVIDED IN MIN. 5% OF UNITS.

2. BASE CABINETS DIRECTLY UNDER THE KITCHEN SINK COUNTER AREA, INCLUDING TOEBOARD AND SHELVING, SHALL BE REMOVABLE WITHOUT THE USE OF SPECIALIZED TOOLS OR SPECIALIZED KNOWLEDGE IN ORDER TO PROVIDE CLEARANCE FOR A WHEELCHAIR. THE FINISH FLOOR BENEATH THE KITCHEN SINK COUNTER AREA SHALL BE EXTENDED TO THE WALL.

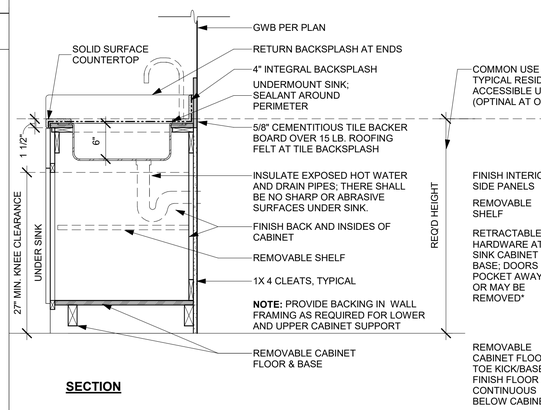
3. WITH BASE REMOVED, KNEE SPACE UNDER KITCHEN SINK SHALL BE AT LEAST 27 INCHES HIGH, 30 INCHES WIDE AND 19 INCHES DEEP.

4. FAUCET CONTROLS AND OPERATING MECHANISMS SHALL BE OPERABLE WITH ONE HAND AND SHALL NOT REQUIRE TIGHT GRASPING, PINCHING OR TWISTING OF THE WRIST.

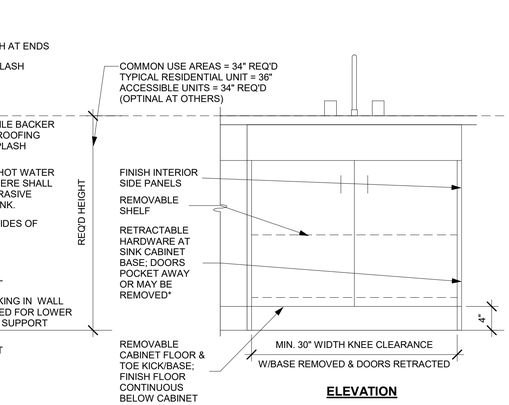
5. THE FORCE REQUIRED TO ACTIVATE CONTROLS SHALL BE NO GREATER THAN 5 POUND FORCE (22.2N). LEVER-OPERATED, PUSH-TYPE AND ELECTRONICALLY CONTROLLED MECHANISMS ARE EXAMPLES OF ACCEPTABLE DESIGNS. SELF-CLOSING VALVES ARE ALLOWED IF THE FAUCET REMAINS OPEN FOR AT LEAST 10 SECONDS.



PLAN



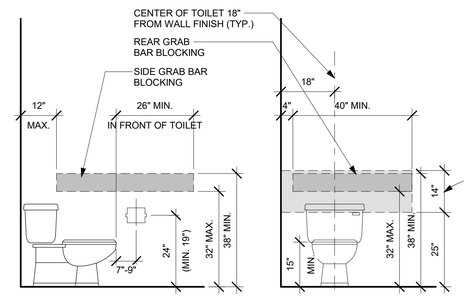
SECTION



ELEVATION

23 ADP. KITCHEN SINK REMOVEABLE BASE CABINET

A1-101 AD-931 SCALE: 1" = 1'-0"



NOTE (SHORT SIDE WALL CONDITIONS): WHERE SIDE WALL DOES NOT PROVIDE SUFFICIENT LENGTH FOR INSTALLATION OF SIDE GRAB BAR BLOCKING AS SHOWN, ADDITIONAL GRAB BAR BLOCKING SHALL BE PROVIDED AT REAR WALL TO ALLOW FOR INSTALLATION OF FOLDAWAY GRAB BAR.

LOCATIONS FOR GRAB BAR REINFORCEMENT - PER 2022 CBC 11A-9G

33 11A ADP. DWELLING UNIT TOILET

A1-101 AD-931 SCALE: 1/2" = 1'-0"

THESE PLANS ARE PROVIDED BY MONO COUNTY AS PART OF THE PRE-APPROVED ADU PROGRAM AND ARE PUBLIC DOMAIN. THERE CANNOT BE A CHARGE TO PROVIDE THESE PLANS. NO ALTERATIONS TO THESE PLANS ARE ALLOWED. ALL ALTERATIONS MUST BE DONE UNDER A SEPARATE PERMIT ONCE THE BUILDING PERMIT FOR THE ADU HAS BEEN ISSUED AND FINAL INSPECTION COMPLETED. IF YOU DO NOT HAVE THE CONSTRUCTION KNOWLEDGE AND EXPERIENCE TO CONTRUCT THESE PLANS WITHOUT FURTHER DETAILS, IT IS RECOMMENDED YOU HIRE A CONTRACTOR TO DO THE CONSTRUCTION. THE CITY WILL NOT PROVIDE FURTHER INFORMATION OR DETAILS AND BUILDING INSPECTORS WILL NOT PROVIDE STEP BY STEP INSTRUCTIONS IN THE FIELD.

MONO COUNTY ADU PROTOTYPES
MONO COUNTY

ADAPTABILITY DETAILS

PUBLIC SET

DATE
01/10/2024

SHEET
AD-931

1/25/2024 4:05:51 PM
Autodesk Docs://2340-04_Mono County ADUs - Code Updates/2340-01_Mono County ADUs_2022 Code Update.rvt

SYMBOLS

- S- — DETAIL REFERENCE BUBBLE WITH LEADER
- DETAIL REFERENCE BUBBLE
- FULL HEIGHT SECTION INDICATOR
- ELEVATION OF WALL OR FRAME
- NORTH ARROW
- BOT OF EL = (-X'-X") — TOP/BOTTOM OF ELEVATIONS
- SLOPE
- WELDED WIRE FABRIC (WWF LAYER)
- STEPPED SURFACE; FLOOR DEPRESSION
- SLOPED SURFACE
- S — S — STEPPED FOOTING
- SB — SB — BOTTOM STEPPED FOOTING
- XX'-X" / X — INDICATES SHEAR WALL TYPE AND LENGTH, PER SHEAR WALL SCHEDULE
- INDICATES SPAN AND DIRECTION OF PREFABRICATED ROOF TRUSS (BY OTHERS)
- XX — INDICATES SPAN AND DIRECTION OF ROOF RAFTER OR FLOOR JOIST WITH WEB STIFFENER
- XX — INDICATES SPAN AND DIRECTION OF ROOF RAFTER OR FLOOR JOIST
- INDICATES EXTENTS OF FRAMING OR OTHER STRUCTURAL ELEMENT
- INDICATES HEADER @ OPENING PER HEADER SCHEDULE
- EARTH LAYER
- INDICATES SAND OR GROUT
- INDICATES GRAVEL
- STEEL IN CROSS SECTION
- INDICATES BEARING WALL
- SHADED AREA INDICATES CALIFORNIA FRAMING
- SHADED AREA INDICATES FOOTPRINT OF FLOOR ABOVE
- STEEL HSS TUBE COLUMN
- STEEL HSS OR PIPE COLUMN
- WIDE FLANGE STEEL COLUMN
- WOOD POST
- X — INDICATES TOP PLATE SPLICE NAILING PER SCHEDULE
- 1x — INDICATES SHEAR WALL STRAP / HOLDOWN TYPE PER SCHEDULE
- F1 — INDICATES PAD FOOTING TYPE PER SCHEDULE
- C1 — INDICATES CONTINUOUS FOOTING TYPE PER SCHEDULE
- ANGLE BRACE
- (2L) — DOUBLE ANGLE BRACE
- DRAG STRUT CONNECTION
- FULL HEIGHT STIFFENER CONNECTION
- MOMENT CONNECTION
- MEMBER SPLICE
- (+3") — TOP OF STEEL ± ELEVATION
- [X] — NUMBER OF EVENLY SPACED SHEAR STUDS
- [X–Y–Z] — SPECIAL STUD SPACING SEE TYPICAL STEEL DETAILS
- <3/4> — BEAM CAMBER AT MID-SPAN

WALL TYPES

- INDICATES PLYWOOD SIDE FOR SHEARWALL
- INDICATES BEARING WOOD WALL BELOW
- INDICATES BEARING WOOD WALL ABOVE
- INDICATES NON-BEARING WOOD WALL BELOW
- INDICATES NON-BEARING WOOD WALL ABOVE
- INDICATES EXISTING BEARING WOOD WALL
- INDICATES EXISTING NON-BEARING WOOD WALL
- INDICATES BEARING CMU WALL BELOW
- INDICATES BEARING CMU WALL ABOVE
- INDICATES NON-BEARING CMU WALL BELOW
- INDICATES NON-BEARING CMU WALL ABOVE
- INDICATES EXISTING BEARING CMU WALL
- INDICATES EXISTING NON-BEARING CMU WALL
- INDICATES BEARING CONCRETE WALL BELOW
- INDICATES BEARING CONCRETE WALL ABOVE
- INDICATES NON-BEARING CONCRETE WALL BELOW
- INDICATES NON-BEARING CONCRETE WALL ABOVE
- INDICATES EXISTING BEARING CONCRETE WALL
- INDICATES EXISTING NON-BEARING CONCRETE WALL

SHEET INDEX

MONO COUNTY

ABBREVIATIONS

A & B	ABOVE AND BELOW
AB	ANCHOR BOLT
ABV	ABOVE
ACI	AMERICAN CONCRETE INSTITUTE
ADDL	ADDITIONAL
ADJ	ADJACENT
AESS	ARCHITECTURAL EXPOSED STRUCTURAL STEEL
AISC	AMERICAN INSTITUTE OF STEEL CONSTRUCTION
ALT	ALTERNATE
ALUM	ALUMINUM
ANCH	ANCHOR
ANSI	AMERICAN NATIONAL STANDARDS INSTITUTE
APA	ENGINEERED WOOD ASSOCIATION (FORMERLY THE AMERICAN PLYWOOD ASSOCIATION)
APPVD	APPROVED
APPROX	APPROXIMATE
ARCH	ARCHITECTURAL; ARCHITECT
AWPA	AMERICAN WOOD PRESERVERS ASSOCIATION
AWS	AMERICAN WELDING SOCIETY
AITC	AMERICAN INSTITUTE OF TIMBER CONSTRUCTION
ASTM	AMERICAN SOCIETY FOR TESTING MATERIALS
BLDG	BUILDING
BLK	BLOCK
BLKG	BLOCKING
BM	BEAM
BN	BOUNDARY NAIL
BOT OR B	BOTTOM
BRC	BRACE
BRG	BEARING
BTWN	BETWEEN
CANT	CANTILEVER
CAM OR C	CAMBER
CC	CENTER TO CENTER
CG	CENTER OF GRAVITY
CIP	CAST-IN-PLACE
CJ	CONSTRUCTION JOINT; CONTROL JOINT
CL	CENTER LINE
CLR	CLEARANCE; CLEAR
CMU	CONCRETE MASONRY UNIT
COL	COLUMN
COMP	COMPRESSION
CONC	CONCRETE
CONN	CONNECTION; CONNECT
CONSTR	CONSTRUCTION
CONT	CONTINUE; CONTINUOUS
CONTR	CONTRACTOR
CJP	COMPLETE JOINT PENETRATION WELD
CTR	CENTER
CTSK	COUNTERSINK; COUNTERSUNK
CU FT	CUBIC FOOT

d	PENNY (NAIL OR BAR DIA)
DBL	DOUBLE
DEPT	DEPARTMENT
DET	DETAIL
DF	DOUGLAS FIR/LARCH
DIA OR Ø	DIAMETER
DIAG	DIAGONAL
DIAPH	DIAPHRAGM
DIM	DIMENSION
DN	DOWN
DWG	DRAWING
DWL	DOWEL
EA	EACH
EF	EACH FACE
EJ	EXPANSION JOINT
EL	ELEVATION
ELEC	ELECTRICAL
ELEV	ELEVATOR
EMBED	EMBEDMENT
EN	EDGE NAIL
ENGR	ENGINEER
EQ	EQUAL OR EQUIVALENT
EQUIP	EQUIPMENT
ES	EACH SIDE
EW	EACH WAY
EXIST or (E)	EXISTING
EXT	EXTERIOR
FDN	FOUNDATION
FIN	FINISH
FJ	FLOOR JOIST
FLG	FLANGE
FLR	FLOOR
FN	FIELD NAIL
FOC	FACE OF CONCRETE
FOM	FACE OF MASONARY
FOS	FACE OF STUD
FOW	FACE OF WALL
FRMG	FRAMING
FT	FOOT; FEET
FTA	FLOOR TIE ABOVE
FTG	FOOTING
GA	GAUGE
GALV	GALVANIZED
GB	GRADE BEAM
GLB	GLUED LAMINATED BEAM
GR	GRADE
GRND	GROUND
H or HORIZ	HORIZONTAL
HDR	HEADER

HGR	HANGER
HP	HIGH POINT
HSH	HORIZONTALLY SLOTTED HOLES
HT	HEIGHT
ID	INSIDE DIAMETER
IF	INSIDE FACE
I-JST	I-JOIST
IN	INCH
INCL	INCLUDE
INFO	INFORMATION
INSP	INSPECTION
INT	INTERIOR
JST	JOIST
JT	JOINT
K	KIPS
KS	KING STUD
KP	KING POST
KSI	KIPS PER SQUARE INCH
LB(S) OR #	POUND(S)
LF	LINEAL FOOT
LIN	LINEAL; LINEAR
LLH	LONG LEG HORIZONTAL
LLV	LONG LEG VERTICAL
LP	LOW POINT
LSH	LONG SLOTTED HOLES
LSL	LAMINATED STRAND LUMBER
LT WT	LIGHTWEIGHT
LVL	LEVEL OR LAMINATED VENEER LUMBER
MAS	MASONRY
MATL	MATERIAL
MAX	MAXIMUM
MB	MACHINE BOLT
MECH	MECHANICAL
MFR	MANUFACTURER
MIN	MINIMUM; MINUTE
MISC	MISCELLANEOUS
(N)	NEW
N	NORTH
NO or #	NUMBER
NTS	NOT TO SCALE
OC	ON CENTER
OD	OUTSIDE DIAMETER
OF	OUTSIDE FACE
OH	OPPOSITE HAND
OPNG	OPENING
OPP	OPPOSITE
ORIG	ORIGINAL
OSB	ORIENTED STRAND BOARD

PA	POST ABOVE
PARA OR //	PARALLEL
PC	PRECAST; PIECE
PERP	PERPENDICULAR
PI	PLYWOOD INDEX
ℙ OR PL.	PLATE
PL	PROPERTY LINE
PLF	PONDS PER LINEAL FOOT
PLCS	PLACES
PLY	PLYWOOD
PROP	PROPERTY
PT	PRESSURE TREATED
PW	PLATE WASHER
PJP	PARTIAL JOINT PENETRATION WELD
PREFAB	PREFABRICATED
PSF	POUNDS PER SQUARE FOOT
PSI	POUNDS PER SQUARE INCH
PSL	PARALLEL STRAND LUMBER
PVMT	PAVEMENT
#	POUND; NUMBER
REF	REFERENCE
REINF	REINFORCE; REINFORCING
REQD	REQUIRED
RF	ROOF
RR	ROOF RAFTER
Ø	ROUND; DIAMETER
SCHED	SCHEDULE
SECT	SECTION
SEP	SEPARATION
SHT	SHEET
SHTG	SHEATHING
SIM	SIMILAR
SOG	SLAB ON GRADE
SN	SHEAR NAIL
SPCG	SPACING
SPECS	SPECIFICATIONS
SQ	SQUARE
SS	STAINLESS STEEL
SSL	SHORT SLOTTED HOLES
STD	STANDARD
STGR	STAGGER
STIFF	STIFFENERS
STIRR	STIRRUP
STL	STEEL
STRUCT	STRUCTURAL
SW	SHEAR WALL
SYM	SYMMETRICAL
TB	TIE BEAM

T & B	TOP AND BOTTOM
T & G	TONGUE & GROOVE
TO	TOP OF
TOC	TOP OF CURB; TOP OF CONCRETE
TOF	TOP OF FOOTING
TEMP	TEMPERATURE; TEMPORARY
THRU	THROUGH
THK	THICKNESS/THICK
THR	THREADED
TOP or T	TOP
TOS	TOP OF STEEL/TOP OF SLAB
TOW	TOP OF WALL
TS	TRIMMER STUD
TYP	TYPICAL
UNO	UNLESS NOTED OTHERWISE
UT	ULTRA-SONIC TEST
VERT	VERTICAL
VSH	VERTICAL SLOTTED HOLES
W/	WITH
W/O	WITHOUT
WO	WHERE OCCURS
WD	WOOD
WP	WORK POINT; WATERPROOF
WWF	WELDED WIRE FABRIC

STRUCTURAL STEEL SHAPES

W	W SHAPE
C	AMERICAN STD CHANNEL SHAPE
MC	MISC CHANNEL SHAPE
L	ANGLE SHAPE
WT, ST, MT	STRUCT TEE SHAPE
PIPE	STANDARD PIPE SHAPE
PIPE-X	EXTRA STRONG PIPE SHAPE
PIPE-XX	DBL EXTRA STRONG PIPE SHAPE
HSS	HOLLOW STRUCTURAL SECTION

MONO COUNTY ADU PROTOTYPES

MONO COUNTY

SHEET INDEX, ABBREVIATIONS & SYMBOLS

DATE
NOVEMBER 20, 2023

SHEET
S-101

N:\2200\2340-01-cu21-mono-cty-adu-design\structural\ConDocs\sheet-files\Plan 5\2340-01-CU21 - S101_Plan5.dwg, S101, Nov 20, 2023 5:13pm, alopez

WOOD (GENERAL)

1. PRESERVATIVE TREATMENT:

A. WOOD MEMBERS SHALL BE PRESERVATIVE TREATED IN ACCORDANCE WITH AITC 109-07, STANDARD FOR PRESERVATIVE TREATMENT, BASED ON THE SERVICE CONDITION PER THE USE CATEGORIES (UC#) SPECIFIED IN AWPA U1-06.
   a. UC1 - INTERIOR CONSTRUCTION, ABOVE GROUND, DRY - NO PRESERVATIVE TREATMENT REQUIRED
   b. UC2 - INTERIOR CONSTRUCTION, ABOVE GROUND, WET - PRESERVATIVE TREATMENT REQUIRED IF THE HUMIDITY OR MOISTURE CONDENSATION IS 20% OR GREATER.
   c. UC3 - EXTERIOR CONSTRUCTION ABOVE GROUND - PRESERVATIVE TREATMENT REQUIRED.

B. FOR ALL TREATED WOOD MEMBERS, ALL CUTS, HOLES AND INJURIES SUCH AS ABRASIONS OR HOLES FROM REMOVAL OF NAILS AND SPIKES WHICH MAY PENETRATE THE TREATED ZONE SHALL BE FIELD TREATED IN ACCORDANCE WITH AWPA M4-06. THE FOLLOWING FIELD TREATMENTS SHALL BE USED:
   a. BORED HOLES: HOLES FOR CONNECTORS OR BOLTS MAY BE TREATED BY PUMPING COAL TAR ROOFING CEMENT MEETING ASTM D5643 INTO HOLES USING A GREASE GUN OR SIMILAR DEVICE
   b. EXTERIOR: COPPER NAPHTHENATE
   c. INTERIOR: INORGANIC BORON PRESERVATIVES LIMITED TO USE IN APPLICATIONS NOT IN CONTACT WITH GROUND AND CONTINUOUSLY PROTECTED FROM LIQUID WATER

SAWN LUMBER

1. FRAMING LUMBER SHALL MEET THE FOLLOWING MINIMUM STANDARDS EXCEPT WHERE OTHERWISE NOTED:

SAWN LUMBER PROPERTIES

USE	SIZE	SPECIES	GRADE	REFERENCE
MUDSILLS	2 X 4	D.F.	STANDARD OR BETTER PRESSURE TREATED	2022 CBC 2303.1.9
	2 X 6 AND LARGER	D.F.	NO. 2 OR BETTER PRESSURE TREATED	
	2 X	REDWOOD	FOUNDATION GRADE	
HORIZONTAL FRAMING LUMBER				
ROOF JOISTS AND RAFTERS	2 x	D.F.	NO. 2	WCLIB & WWPA
FLOOR JOISTS	2 X	D.F.	NO. 2	
HEADERS AND BEAMS	4 X	D.F.	NO. 2	
ANY OTHER HORIZONTAL	4 X 4 AND SMALLER	D.F.	NO. 2	
	6 X 6 AND LARGER	D.F.	NO. 1	
VERTICAL FRAMING LUMBER				
TOP PLATES	2 X	D.F.	NO. 2	WCLIB & WWPA
STUDS	2 X 4 & 3 X 4	D.F.	STUD	
	2 X 6 & 2 X 8	D.F.	NO. 2	
POSTS	4 X 4 & 4 X 6 POSTS	D.F.	NO. 2	
	6 X 6 & LARGER POSTS	D.F.	NO. 1	
ALL OTHER FRAMING LUMBER				
ALL OTHER FRAMING LUMBER, UNO	ALL SIZES	D.F.	STANDARD & BETTER	WCLIB & WWPA

2. FLOOR JOISTS SHALL BE GRADE STAMPED “S-DRY” WHICH INDICATES A MOISTURE CONTENT NOT EXCEEDING 19 PERCENT.

3. ALL SOLE PLATES AND TOP PLATES SHALL BE GRADE STAMPED “KD” WHICH INDICATES KILN DRIED WITH A MOISTURE CONTENT NOT EXCEEDING 15 PERCENT.

4. STUD WALLS SHOWN ON PLANS ARE NONBEARING PARTITIONS WALLS, BEARING WALLS OR SHEAR WALLS BELOW THE FRAMING LEVEL, UNLESS NOTED OTHERWISE. STUDS SHALL BE SIZE AND SPACING AS NOTED IN THE DRAWINGS, SEE PLANS AND ARCHITECTURAL DRAWINGS. UNLESS OTHERWISE NOTED.

5. MINIMUM FRAMING NAILING SHALL CONFORM TO CBC TABLE 2304.10.1. ALL NAILS SHALL BE COMMON WIRE NAILS. PREDRILL NAIL HOLES TO 70% OF NAIL SHANK DIAMETER WHERE NAILING TENDS TO SPILT WOOD.

6. UNLESS OTHERWISE NOTED, ALL WOOD SILL PLATES UNDER BEARING, EXTERIOR, OR SHEAR WALLS IN CONTACT WITH CONCRETE OR MASONRY SHALL BE BOLTED TO THE CONCRETE OR MASONRY WITH 5/8" Ø X 12" BOLTS W/ 0.229" X 3" X 3" PLATE WASHER (GALV) AT 4'-O" O.C. BEGINNING AT 9" O.C. MAXIMUM FROM EACH END OF THE PLATES. THE BOLTS SHALL EXTEND A MINIMUM OF 7” INTO THE CONCRETE OR MASONRY. (POWDER DRIVEN PINS AT 1/3 OF THE BOLT SPACING OR 24” O.C. MAXIMUM MAY BE SUBSTITUTED FOR THE ANCHOR BOLTS AT INTERIOR NON-SHEAR WALLS ONLY).

7. ALL LUMBER IN CONTACT WITH CONCRETE SHALL BE PRESSURE TREATED LUMBER WITH AWPA TREATMENT C2 USING EITHER ALKALINE QUAT (ACQ TYPE B AND D), COPPER AZOLE (CBA-A, CA-B), OR SODIUM BORATES (SBX). ANCHOR BOLTS, FASTENERS, AND METAL FRAMING CONNECTORS IN CONTACT WITH PRESSURE TREATED LUMBER SHALL BE HOT-DIPPED GALVANIZED TO A RATING OF G-185 PER ASTM A653.

8. PROVIDE 2 STUDS UNDER ALL 4 X 10 AND LARGER BEAMS OR HEADERS AT SPANS 6 FEET OR LONGER, UNLESS OTHERWISE NOTED. WHERE POSTS OR MULTIPLE STUDS UNDER BEAMS OR HEADERS ARE CALLED FOR ON DRAWINGS THOSE POSTS OR MULTIPLE STUDS SHALL BE CARRIED TO THE FOUNDATION/PODIUM LEVEL.

9. PROVIDE THE FOLLOWING BLOCKING AS A MINIMUM, UNLESS SHOWN OTHERWISE:
   2” X FULL DEPTH SOLID BLOCKING BETWEEN JOISTS OVER SUPPORT.
   2” X FULL DEPTH SOLID BLOCKING BETWEEN JOISTS OVER AND BELOW PARTITION WALLS.

10. DOUBLE JOISTS UNDER PARTITIONS RUNNING PARALLEL TO JOISTS, UNLESS SUPPORTED BY A WALL BELOW OR SHOWN OTHERWISE. NAIL DOUBLED JOISTS WITH 16D AT 12” O.C., STAGGERED.

11. BRIDGING SHALL BE 2 X SOLID BLOCKS, INSTALLED AS FOLLOWS:
    ROOF JOISTS MORE THAN 10" DEPTH, 8'-O" O.C. MAXIMUM, NOT MORE THAN 8'-0' FROM SUPPORT.
    FLOOR JOISTS MORE THAN 10” DEPTH, 8'-O” O.C. MAXIMUM, NOT MORE THAN 8'-0' FROM SUPPORT.

12. JOIST HANGERS AND OTHER METAL FRAMING ACCESSORIES ARE REFERRED TO ON PLANS BY PARTICULAR TYPE AS MANUFACTURED BY SIMPSON STRONG-TIE COMPANY, STOCKTON, CALIFORNIA. ACCESSORIES OF OTHER MANUFACTURE WITH EQUIVALENT LOAD CARRYING CHARACTERISTICS MAY BE USED.

13. FIRE STOPPING, BACKING FOR INTERIOR FINISHES, NONBEARING WALLS, AND OTHER NON-STRUCTURAL FRAMING ARE NOT NECESSARILY SHOWN ON STRUCTURAL DRAWINGS.

HARDWARE AND CONNECTORS

GENERAL:
USE ALL SPECIFIED FASTENERS AS SPECIFIED ON PLANS. IF NOT INDICATED ON PLANS PROVIDE FASTENERS PER MFR'S APPROVED ICC-ESR REPORT OR PRODUCT LITERATURE

HOLDOWNS:
1. DO NOT OVER TIGHTEN NUTS ON TIE-DOWN ANCHOR RODS OR BOLTS. TIGHTEN ANCHOR ROD NUTS ONE-THIRD TO ONE HALF TURN BEYOND FINGER TIGHT
2. INSTALL ALL HOLDOWNS TIGHT TO END STUDS/POST, DO NOT USE FILLER BLOCKS. FOR MISALIGNED ANCHOR BOLTS, EXTEND THE ANCHOR ROD AT A 1:6 (HORIZ/VERT) USING A COUPLER WITH EQUIVALENT ANCHOR ROD AND INSTALL THE HOLDOWN HIGHER ON END STUD / POST
3. FOR HOLDOWNS THAT BOLT TO END POSTS, INSTALL THE HEAD OF THE BOLT TO THE BRACKET SIDE, AND ON THE SIDE OPPOSITE THE BRACKET, INSTALL A WASHER BETWEEN THE NUT AND THE STUD / POSTS

TIE DOWN & COLLECTOR STRAPS:
1. TIE DOWN AND COLLECTOR STRAPS SHALL BE INSTALLED STRAIGHT AND TRUE. DO NOT FOLD, BEND, KINK OR OTHERWISE ALTER CONNECTOR STRAPS
2. INSTALL TIE DOWN STRAPS DIRECT TO POST IN LIEU OF OVER SHEATHING. STRAPS MAY BE INSTALLED ON THE UNSHEATHED SIDE OF THE END STUDS / POSTS

REINFORCING STEEL

1. REINFORCING BARS SHALL CONFORM TO THE REQUIREMENTS OF CHAPTER 19 OF THE CODE AND WITH THE PROVISIONS OF ACI 318-19, ASTM A706, GRADE 60 UNO. ASTM A615 GR 60 STEEL MAY BE SUBSTITUTED FOR ASTM A706 GR60 STEEL PER ACI 318-19 SECTION 20.2.2.5 PROVIDED THE FOLLOWING CONDITIONS ARE MET:
   A. THE ACTUAL YIELD STRENGTH BASED ON MILL TESTS DOES NOT EXCEED THE SPECIFIED YIELD STRENGTH BY MORE THAN 18,000 PSI.
   B. THE RATIO OF THE ACTUAL ULTIMATE TENSILE STRESS TO THE ACTUAL YIELD STRENGTH IS NOT LESS THAN 1.25.
   C. WHERE REINFORCEMENT COMPLYING WITH ASTM A615 IS TO BE WELDED, CHEMICAL TESTS SHALL BE PERFORMED TO DETERMINE WELDABILITY IN ACCORDANCE WITH SECTION 26.6.4 OF ACI 318-19.

2. BARS SHALL BE CLEAN OF RUST, GREASE, OR OTHER MATERIALS LIKELY TO IMPAIR BOND. ALL REINFORCING BAR BENDS SHALL BE MADE COLD.

3. WELDED WIRE REINFORCEMENT (WWR), PLAIN OR DEFORMED, SHALL CONFORM TO ASTM A185. WELDED DEFORMED WIRE REINFORCEMENT (WWR) SHALL CONFORM TO ASTM A1064. ALL WWR FOR STAIR PANS AND ALL WWR FOR CONCRETE FILL ON METAL DECK TO BE PLAIN WWR. PROVIDE LAPS PER ACI 318-19 SECTION 25.5.3 OR 25.5.4 MINIMUM. WWR SHALL BE SUPPORTED ON APPROVED CHAIRS.

4. REINFORCING BAR LAP SPLICES SHALL BE MADE AS INDICATED ON THE DRAWINGS. LAP ALL HORIZONTAL BARS AT CORNERS AND INTERSECTIONS. STAGGER ALL SPLICES UNLESS NOTED OTHERWISE ON PLANS.
   A. MINIMUM LAP SPLICE LENGTH FOR REINFORCING STEEL BARS IN CONCRETE SHALL BE PER ACI 318-19 SECTION 25.5.2 AND THE REINFORCING SCHEDULE ON THE DRAWINGS.
   B. MINIMUM LAP SPLICE LENGTH FOR REINFORCING STEEL BARS IN MASONRY SHALL BE PER ACI 530-13 SECTION 8.1.6.7.1 OR 9.3.3.4 AND THE REINFORCING SCHEDULE ON THE DRAWINGS.

5. ALL BARS SHALL BE MARKED SO THEIR IDENTIFICATION CAN BE MADE WHEN THE FINAL IN-PLACE INSPECTION IS MADE. ALL REINFORCING CONFORMING TO DIFFERING ASTM SPECIFICATIONS AND/OR OF DIFFERING GRADES SHALL BE CLEARLY MARKED TO DIFFERENTIATE THEM FROM OTHER REINFORCING STEEL IF CONCURRENTLY PRESENT ON SITE.

6. WHERE WELDING OF REINFORCING IS APPROVED BY THE STRUCTURAL ENGINEER, IT SHALL BE DONE BY AWS CERTIFIED WELDERS USING E80XX OR APPROVED ELECTRODES. WELDING PROCEDURES SHALL CONFORM TO THE REQUIREMENTS OF STRUCTURAL WELDING CODE- REINFORCING STEEL", AWS-D1.4-15. REINFORCING BARS TO BE WELDED SHALL CONFORM TO THE REQUIREMENTS OF ASTM A706.

7. REINFORCING STEEL SHALL BE ACCURATELY PLACED AND ADEQUATELY SUPPORTED BEFORE THE CONCRETE IS PLACED AND SHALL BE SECURED AGAINST DISPLACEMENT DURING CONSTRUCTION WITHIN PERMITTED TOLERANCES. ADEQUATE SUPPORTS ARE ALSO NECESSARY TO KEEP THE REINFORCING STEEL AT THE PROPER DISTANCE FROM THE FORMS. USE WIRE BAR SUPPORTS, PRECAST CONCRETE SUPPORTS, SPACERS, BOLSTERS, REINFORCEMENT OR OTHER MEANS OF SUPPORT PER THE "CRSI MANUAL OF STANDARD PRACTICE", LATEST EDITION.

8. REINFORCING STEEL SHALL BE DETAILED IN ACCORDANCE WITH THE "CRSI MANUAL OF STANDARD PRACTICE FOR DETAILING REINFORCED CONCRETE STRUCTURES", LATEST EDITION.

9. COMPLETE AND DETAILED REINFORCING PLACEMENT DRAWINGS SHALL BE PREPARED AND SUBMITTED TO THE ARCHITECT FOR APPROVAL BY THE SEOR PRIOR TO FABRICATION IN ACCORDANCE WITH THE SPECIFICATIONS AND APPLICABLE CODES. THESE DRAWINGS SHALL BE AVAILABLE ON THE JOB SITE PRIOR TO PLACING OF CONCRETE. THE REINFORCING PLACEMENT DRAWINGS SHALL INCLUDE ALL PRIMARY REINFOREMENT, LAP SPLICES, TIES, DOWELS, HEADED U-DOWELS, EMBED PLATES, ANCHOR BOLTS, ETC. AREAS OF CONGESTION SHALL BE DETAILED SUFFICIENTLY TO DEMONSTRATE THAT PLACEMENT OF REBAR MEETS SPACING REQUIREMENTS OF ACI 318-19.

10. WHEN REQ'D, INSPECTION OF CONCRETE SHALL INCLUDE INSPECTION DURING INSTALLATION OF REINFORCING STEEL. INSPECTION SHALL BE SCHEDULED SO THAT PLACEMENT OF REINFORCING STEEL, CONDUIT, SLEEVES, AND EMBEDDED ITEMS MAY BE CORRECTED PRIOR TO PLACEMENT OF OVERLYING GRIDS OR REINFORCING STEEL.

11. CONCRETE PROTECTION FOR REINFORCEMENT

THE FOLLOWING MINIMUM CONCRETE COVER SHALL BE PROVIDED FOR REINFORCEMENT IN CAST-IN-PLACE CONCRETE (NON-PRESTRESSED):	MINIMUM COVER, IN.
A. CONCRETE CAST AGAINST AND PERMANENTLY EXPOSED TO EARTH	3
B. CONCRETE EXPOSED TO EARTH OR WEATHER:	
NO.6 THROUGH NO. 18 BAR	2
NO.5 BAR, W31 OR D31 WIRE & SMALLER	$1\frac{1}{2}$"
C. CONCRETE NOT EXPOSED TO WEATHER OR IN CONTACT WITH GROUND:	
SLABS, WALLS, JOISTS:	
NO.14 AND NO.18 BARS	$1\frac{1}{2}$"
NO.11 BAR & SMALLER	$\frac{3}{4}$"
BEAMS, COLUMNS:	
PRIMARY REINFORCEMENT TIES, STIRRUPS, SPIRALS	$1\frac{1}{2}$"

12. MECHANICAL BAR SPLICE CONNECTIONS SHALL CONFORM TO THE REQUIREMENTS OF ACI 318-19 SECTION 25.5.7 USE OF MECHANICAL CONNECTIONS SHALL BE APPROVED BY THE STRUCTURAL ENGINEER. SPLICES MUST BE TESTED AS INDICATED IN THE CONCRETE REINFORCEMENT SPECIFICATION. ACCEPTABLE PRODUCTS INCLUDE:

    LENTON STANDARD COUPLERS (IAPMO-ES 0129)
    LENTON FORM SAVERS, TYPE SA (IAPMO-ES 0129)
    LENTON WELDABLE HALF COUPLERS (IAPMO-ES 0129)
    LENTON LOCK COUPLERS PER (IAPMO-ES 0129)

    NOTE THAT REBAR ATTACHED TO PLATE USING LENTON WELDABLE HALF COUPLERS SHALL BE ASTM A706 PER IAPMO-ES 0129.

    ALL MECHANICAL BAR SPLICE CONNECTIONS IN SPECIAL STRUCTURAL WALLS, SPECIAL MOMENT FRAMES AND CONCRETE DIAPHRAGMS SHALL BE TYPE 2 CONFORMING TO THE REQUIREMENTS OF ACI 318-19 SECTION 18.2.7 & 18.12.7.4

CONCRETE

1. ALL CONCRETE CONSTRUCTION SHALL CONFORM WITH CHAPTER 19 OF THE CODE AND WITH THE PROVISIONS OF ACI 318-19.

2. CONCRETE MATERIALS SHALL BE IN ACCORDANCE WITH THE FOLLOWING STANDARDS:

MATERIAL	ASTM STANDARD
PORTLAND CEMENT (TYPE II)[A]	C150
CONCRETE AGGREGATES (HARDROCK)	C33
WATER[B]	C1602
COAL FLY ASH OR POZOLLAN (CLASS F)	C618
NATURAL OR MANUFACTURED SAND	C33
SLAG	C989

   A. FOR SOILS WITH HIGH CONCENTRATIONS OF SULFATES (EXPOSURES S2 OR S3 PER ACI 318-19 TABLE 19.3.2.1) PORTLAND CEMENT SHALL BE TYPE V. VERIFY WITH PROJECT GEOTECHNICAL REPORT.
   B. WATER SHOULD ONLY BE ADDED AT THE BATCH PLANT. IN NO CASE SHALL THE DESIGN WATER/ CEMENT RATIO BE EXCEEDED.

3. CONCRETE MIXES SHALL BE PROPORTIONED BASED ON SECTION 26.4.3 OF ACI 318-19, WHICH REFERENCES ACI 301-10 ARTICLE 4.2.3. MIX DESIGNS SHALL INCLUDE DOCUMENTATION OF MIX AVERAGE COMPRESSIVE STRENGTH THROUGH FIELD TEST DATA OR TRAIL MIXTURES IN ACCORDANCE WITH ACI 301-10 ARTICLE 4.2.3.4. SCHEDULE OF STRUCTURAL CONCRETE STRENGTHS AND LOCATIONS (UNO):

LOCATION IN STRUCTURE	MINIMUM STRENGTH (PSI)*	DENSITY (PCF)	MAX SLUMP (IN±1)	MAX WATER/CEMENT RATIO	SLAG/ FLY ASH[A] (MAX)
CONCRETE FOUNDATIONS, GRADE BEAMS, TIE BEAMS	2,500	150	4	0.5	0.15
CONCRETE BASEMENT WALLS/STEM WALLS	2,500	150	4	0.5	0.15
CONCRETE SLAB ON GRADE	2,500	150	4	0.45	0.15
STAIRS ON GRADE, CURBS AND OTHER NON-STRUCTURAL CONCRETE	2,500	150	4	0.5	0.15
SITE WALLS	2,500	150	4	0.5	0.15

   A. AS MEASURED BY CEMENTITIOUS WEIGHT
   * IF FOOTINGS ARE EXPOSED TO FROST CYCLES, INCREASE STRENGTH TO 4,500 PSI.

4. READY MIXED CONCRETE SHALL BE MIXED AND DELIVERED IN ACCORDANCE WITH THE REQUIREMENTS OF ASTM C94 OF C685.

5. DEPOSITING AND CONVEYING OF CONCRETE SHALL CONFORM TO SECTION 26.5 OF ACI 318-19 AND PROJECT SPECIFICATIONS.

6. ALL CONCRETE SURFACES AGAINST WHICH NEW CONCRETE IS TO BE PLACED SHALL BE CLEANED AND ROUGHENED TO 1/4" AMPLITUDE.

7. ALL REINFORCING BARS, ANCHOR BOLTS AND OTHER CONCRETE INSERTS SHALL BE WELL SECURED IN POSITION PRIOR TO PLACING CONCRETE.

8. PROVIDE SLEEVES FOR PLUMBING AND ELECTRICAL OPENINGS IN CONCRETE BEFORE PLACING. DO NOT CUT ANY REINFORCING WHICH MAY CONFLICT. CORING IN CONCRETE IS NOT PERMITTED WITHOUT SEOR APPROVAL. NOTIFY THE SEOR IN ADVANCE OF CONDITIONS NOT SHOWN ON THE DRAWINGS. SEE THE DRAWINGS FOR ADDITIONAL RESTRICTIONS ON THE PLACEMENT OF OPENINGS IN SLABS AND WALLS.

9. PIPES EMBEDDED IN CONCRETE:
   A. CONCRETE
      a. PIPES LARGER THAN 1-1/2" DIAMETER SHALL NOTE BE EMBEDDED IN STRUCTURAL CONCRETE EXCEPT WHERE SPECIFICALLY APPROVED BY SEOR.
      b. PIPES SHALL NOT DISPLACE OR INTERRUPT REINFORCING BARS.
      c. DO NOT STACK CONDUITS, SPACE EMBEDDED PIPES AND CONDUITS AT A MINIMUM OF 3 DIAMETERS CLEAR FROM OTHER EMBEDDED PIPES/CONDUITS AND REBAR.

FOUNDATION

1. GEOTECHNICAL INFORMATION AND FOUNDATION DESIGN IS BASED ON THE FOLLOWING:
   A. DESIGN LATERAL SOIL LOADS ARE IN ACCORDANCE WITH 2022 CBC TABLE 1610.1
   B. ALLOWABLE FOUNDATION BEARING AND LATERAL PRESSURES ARE IN ACCORDANCE WITH 2022 CBC TABLE 1806.2

2. SPREAD OR CONTINUOUS FOOTINGS:

ELEMENT	ALLOWABLE BEARING CAPACITY (PSF)[A]	ALLOWABLE LATERAL RESISTANCE[B]	
		PASSIVE RESISTANCE (PSF/FT BELOW GRADE)[E]	COHESION (PSF)
CONTINUOUS FOOTINGS	1,500	100	120

NOTES:
   A. THE ALLOWABLE CAPACITY MAY BE INCREASED BY ONE-THIRD WHEN CONSIDERING LOADS OF SHORT DURATION SUCH AS WIND OR SEISMIC FORCES.
   B. THE ALLOWABLE LATERAL RESISTANCE CAN BE TAKEN AS THE SUM OF THE FRICTIONAL RESISTANCE AND PASSIVE RESISTANCE .
   C. THE UPPER 0 FOOT OF SOIL NOT PROTECTED BY PAVEMENT SHALL BE NEGLECTED WHEN CALCULATING PASSIVE RESISTANCE.
   D. COMPACTED FILL SHOULD BE PREPARED AS FOLLOWS: A MIN OF 12" OF COMPACTED FILL SHALL BE PROVIDED, COMPACTED TO A MIN OF 90 PERCENT MODIFIED PROCTOR IN ACCORDANCE WITH ASTM D 1557 (2022 CBC 1804.6)
   E. MAY BE DOUBLED FOR ISOLATED POLES PER 2022 CBC 1806.3.4

4. WHERE NOT SHOWN ON THE DRAWINGS, CONTRACTOR TO PROVIDE FOR DESIGN AND INSTALLATION OF ALL CRIBBING, SHEATHING AND SHORING REQUIRED AND SHALL BE SOLELY RESPONSIBLE FOR ALL EXCAVATION PROCEDURES INCLUDING LAGGING, SHORING, AND PROTECTION OF ADJACENT PROPERTY, STRUCTURES, STREETS, AND UTILITIES IN ACCORDANCE WITH ALL NATIONAL, STATE AND LOCAL SAFETY ORDINANCES.

5. CONTRACTOR TO PROVIDE FOR DE-WATERING OF EXCAVATIONS FROM SURFACE WATER, GROUND WATER AND/OR SEEPAGE.

6. ALL EXCAVATIONS SHALL BE PROPERLY BACKFILLED. DO NOT PLACE BACKFILL BEHIND RETAINING WALLS BEFORE CONCRETE OR GROUT HAS ATTAINED FULL DESIGN STRENGTH. CONTRACTOR SHALL PROVIDE FOR DESIGN, PERMITS AND INSTALLATION OF SUCH BRACING.

7. EXCAVATIONS SHALL BE CUT SQUARE AND SMOOTH, WITH LEVEL BOTTOMS.

8. FOOTING BACKFILL AND UTILITY TRENCH BACKFILL WITHIN BUILDING AREA SHALL BE MECHANICALLY COMPACTED IN LAYERS.

9. ALL ABANDONED FOOTINGS, UTILITIES, ETC. SHALL BE REMOVED. NEW FOOTINGS MUST EXTEND INTO UNDISTURBED SOILS.

DESIGN INFORMATION

1. ROOF LIVE LOADS (2022 CBC SECTION 1603.1.2)

ROOF LIVE LOADS

OCCUPANCY OR USE	UNIFORM (PSF)	CONC. (LBS)	REFERENCE
ROOF ORDINARY FLAT, PITCHED AND CURVED ROOFS (THAT ARE NOT OCCUPIABLE)	20	—	2022 CBC TABLE 1607.1

2. ROOF SNOW LOADS (2022 CBC SECTION 1603.1.3):

SNOW DESIGN DATA

PARAMETER	VALUE	REFERENCE
GROUND SNOW LOAD	Pg = PROVIDED BY OWNER BASED ON PROJECT LOCATION	ASCE 7-16 7.2

3. WIND DESIGN DATA (2022 CBC SECTION 1603.1.4) :

WIND DESIGN DATA

PARAMETER	VALUE	REFERENCE
ULTIMATE DESIGN WIND SPEED (3-SEC GUST)	V_{ULT} = 115 MPH	2022 CBC FIG. 1609.3
NOMINAL DESIGN WIND SPEED (3-SEC GUST)	V_{ASD} = 90 MPH	2022 CBC 1609.3.1
EXPOSURE CATEGORY	C	2022 CBC 1609.4.3
INTERNAL PRESSURE COEFFICIENT:	GCpi = ± 0.18	ASCE 7-16 TABLE 26.13-1

COMPONENTS & CLADDING WIND PRESSURES (PSF)

LOCATION		COMPONENT TRIBUTARY AREA (SQ FT)		
		10	100	500
ROOF	ZONE 1	-48.4	-23.9	-23.9
	ZONE 2e	-48.4	-23.9	-23.9
	ZONE 2n	-53.3	-33.7	-28.8
	ZONE 2r	-48.4	-23.9	-23.9
	ZONE 3e	-65.5	-41.0	-28.8
	ZONE 3r	-53.3	-33.7	-28.8
OVERHANG	ZONE 1	-67.9	-43.5	-43.3
	ZONE 2e	-67.9	-43.5	-43.3
	ZONE 2n	-72.8	-53.3	-48.4
	ZONE 2r	-67.9	-43.5	-43.5
	ZONE 3e	-85.0	-60.6	-48.4
	ZONE 3r	-72.8	-53.3	-48.4
WALL	ZONE 4	-31.3	-27.1	-23.9
	ZONE 5	-38.6	-30.0	-23.9

4. EARTHQUAKE DESIGN DATA (2022 CBC SECTION 1603.1.5):

SITE AND OCCUPANCY PARAMETERS

PARAMETER	VALUE	REFERENCE
RISK CATEGORY	II	2022 CBC TABLE 1604.5
SEISMIC IMPORTANCE FACTOR	I = 1.0	ASCE 7-16 TABLE 1.5-2
MAPPED SPECTRAL RESPONSE ACCELERATIONS:	S_S = 2.00	2022 CBC 1613.2.1
	S_1 = 0.65	
SITE CLASS	D (DEFAULT)	2022 CBC 1613.2.2
SPECTRAL RESPONSE COEFFICIENTS:	S_{DS} = 1.60	2022 CBC 1613.2.4
	S_{D1} = 0.737	

BUILDING PARAMETERS

PARAMETER	VALUE	REFERENCE
SEISMIC DESIGN CATEGORY	SDC = D	2022 CBC 1613.2.5
BASIC SEISMIC FORCE RESISTING SYSTEM	LIGHT FRAME (WOOD) WALLS SHEATHED WITH WOOD STRUCTURAL PANELS RATED FOR SHEAR RESISTANCE	ASCE 7-16 TABLE 12.2-1
RESPONSE MODIFICATION FACTOR	R = $6\frac{1}{2}$	
SYSTEM OVERSTRENGTH FACTOR	Ωo = 3	
DEFLECTION AMPLIFICATION FACTOR	Cd = 4	
DESIGN BASE SHEAR	V = 11.7	ASCE 7-16 12.8.1
SEISMIC RESPONSE COEFFICIENTS	Cs = 0.246	ASCE 7-16 12.8.1.1
ANALYSIS PROCEDURE USED	EQUIVALENT LATERAL FORCE PROCEDURE	ASCE 7-16 12.8

5. DEAD LOAD DESIGN DATA

DEAD LOADS

LOCATION	MAX UNIFORM (PSF)	CONC. (LBS)	REFERENCE
ROOF (ASPHALT SHINGLES) *INCLUDES 4 PSF ALLOWANCE FOR SOLAR PANELS	26*	—	
WALL (SIDING)	11	—	

EXISTING UNDERGROUND UTILITIES

1. THE ARCHITECT AND ENGINEERS ARE NOT RESPONSIBLE FOR THE LOCATIONS OF EXISTING UNDERGROUND UTILITIES WHETHER OR NOT SHOWN ON THE DRAWINGS. DRAWINGS, IF ANY, IS APPROXIMATE. THE CONTRACTOR SHALL EXERCISE EXTREME CAUTION IN EXCAVATING AND TRENCHING ON THE SITE. THE CONTRACTOR SHALL IMMEDIATELY NOTIFY THE ARCHITECT AND/OR STRUCTURAL ENGINEER SHOULD ANY SUCH UNIDENTIFIED CONDITIONS BE DISCOVERED.

2. THE CONTRACTOR SHALL BE RESPONSIBLE FOR ANY DAMAGES WHICH MAY RESULT FROM HIS FAILURE TO EXACTLY LOCATE AND PRESERVE ALL EXISTING UNDERGROUND UTILITIES.

3. AN UNDERGROUND SERVICE ALERT INQUIRY IDENTIFICATION NUMBER MUST BE OBTAINED AT LEAST TWO WORKING DAYS BEFORE STARTING WORK WITH THIS PERMIT.
   A. FOR PROJECTS IN SOUTHERN CALIFORNIA TELEPHONE NO. 1-800-422-4133.
   B. FOR PROJECTS IN NORTHERN CALIFORNIA TELEPHONE NO. 1-800-227-2600.

GENERAL

1. ALL WORK SHALL CONFORM TO THE MINIMUM STANDARDS OF THE FOLLOWING CODES AND STANDARDS:
   A. 2022 CALIFORNIA BUILDING CODE, PART 2, VOLUME 2 OF 2, AND TITLE 24 C.C.R. 2022 EDITION AND LATEST REVISIONS (INCLUDING SUPPLEMENTS AND ERRATA) HEREIN REFERRED TO AS “THE CODE”.
   B. ANY OTHER REGULATING AGENCIES WHICH HAVE AUTHORITY OVER ANY PORTION OF THE WORK, INCLUDING THE STATE OF CALIFORNIA DIVISION OF OCCUPATIONAL SAFETY AND HEALTH (CAL/OSHA).
   C. CODES & STANDARDS REFERENCED IN THE CODE OR LISTED IN THESE NOTES AND SPECIFICATIONS.

2. ALL DRAWINGS ARE CONSIDERED TO BE A PART OF THE CONTRACT DOCUMENTS. THE CONTRACTOR SHALL BE RESPONSIBLE FOR THE REVIEW AND COORDINATION OF ALL DRAWINGS AND SPECIFICATIONS PRIOR TO THE START OF CONSTRUCTION. ANY DISCREPANCIES THAT OCCUR SHALL BE BROUGHT TO THE ATTENTION OF THE ARCHITECT PRIOR TO START OF CONSTRUCTION SO THAT A CLARIFICATION CAN BE ISSUED. ANY WORK PERFORMED IN CONFLICT WITH THE CONTRACT DOCUMENTS OR ANY CODE REQUIREMENTS SHALL BE CORRECTED BY THE CONTRACTOR AT THEIR OWN EXPENSE AND AT NO EXPENSE TO THE OWNER OR ARCHITECT.

3. NOTES AND DETAILS ON DRAWINGS SHALL TAKE PRECEDENCE OVER GENERAL NOTES AND TYPICAL DETAILS. WHERE NO DETAILS ARE GIVEN, CONSTRUCTION SHALL BE AS SHOWN FOR SIMILAR WORK.

4. THE CONTRACTOR SHALL VERIFY ALL DIMENSIONS PRIOR TO STARTING CONSTRUCTION. THE ARCHITECT SHALL BE NOTIFIED OF ANY DISCREPANCIES OR INCONSISTENCIES. IN NO INSTANCE SHALL DIMENSIONS BE SCALED FROM THE DRAWINGS.

5. SEE ARCHITECTURAL DRAWINGS FOR THE FOLLOWING:
   A. SIZE AND LOCATION OF ALL DOOR AND WINDOW OPENINGS, EXCEPT AS NOTED
   B. SIZE AND LOCATION OF ALL INTERIOR AND EXTERIOR NON-BEARING PARTITIONS UNLESS NOTED AND/OR DETAILED ON THE STRUCTURAL DRAWINGS
   C. SIZE AND LOCATION OF ALL CONCRETE CURBS, EQUIPMENT PADS, PITS, FLOOR DRAINS, SLOPES, DEPRESSED AREAS, CHANGE IN LEVEL, CHAMFERS, GROOVES, INSERTS, ETC
   D. SIZE AND LOCATION OF ALL FLOOR AND ROOF OPENINGS EXCEPT AS SHOWN
   E. FLOOR AND ROOF FINISHES
   F. MISCELLANEOUS DRAINAGE AND WATERPROOFING
   G. ALL FIREPROOFING REQUIREMENTS INCLUDING FIREPROOFING OF STRUCTURAL STEEL
   H. DIMENSIONS NOT SHOWN ON STRUCTURAL DRAWINGS

6. SEE MECHANICAL, PLUMBING AND ELECTRICAL DRAWINGS FOR THE FOLLOWING:
   A. PIPE RUNS, SLEEVES, HANGERS, TRENCHES, WALL AND SLAB OPENINGS, ETC., EXCEPT AS SHOWN OR NOTED.
   B. ELECTRICAL CONDUIT RUNS, BOXES, OUTLETS IN WALLS AND SLABS.
   C. CONCRETE INSERTS FOR ELECTRICAL, MECHANICAL OR PLUMBING FIXTURES.
   D. SIZE AND LOCATION OF MACHINE OR EQUIPMENT BASES, ANCHOR BOLTS FOR MOTOR MOUNTS.

8. THE CONTRACT STRUCTURAL DRAWINGS AND SPECIFICATIONS REPRESENT THE FINISHED STRUCTURE. THEY DO NOT INDICATE THE METHOD OF CONSTRUCTION. THE CONTRACTOR SHALL PROVIDE ALL MEASURES NECESSARY TO PROTECT THE STRUCTURE DURING CONSTRUCTION. SUCH MEASURES SHALL INCLUDE, BUT NOT BE LIMITED TO, BRACING, SHORING FOR LOADS DUE TO CONSTRUCTION EQUIPMENT ETC. THE CONTRACTOR IS RESPONSIBLE FOR PROVISION OF TEMPORARY SHORING AND OTHER CONSTRUCTION AIDS, INCLUDING ALL ENGINEERING OF SUCH SYSTEMS, FOR TEMPORARY SUPPORT OF NEW AND/OR EXISTING STRUCTURAL ELEMENTS AS REQUIRED FOR ERECTION AND OTHER CONTRACTOR'S MEANS AND METHODS OF CONSTRUCTION (UNO). OBSERVATION VISITS TO THE SITE BY THE STRUCTURAL ENGINEER SHALL NOT INCLUDE INSPECTION OF THE ABOVE ITEMS OR CONCERN CONSTRUCTION MEANS AND METHODS OR CONSTRUCTION SAFETY.

9. BACKFILL SHALL NOT BE PLACED BEHIND EXTERIOR AND INTERIOR RETAINING WALLS UNTIL THE CONCRETE / CMU HAS ACHIEVED FULL DESIGN STRENGTH. FOR BRACED WALLS SUPPORTED BY STRUCTURAL DIAPHRAGMS. BACKFILL SHALL NOT BE PLACED BEHIND THE WALL UNTIL THE DIAPHRAGM HAS BEEN INSTALLED , AND FOR CONCRETE DIAPHRAGMS, HAS ACHIEVED FULL DESIGN STRENGTH.

10. THE CONTRACT STRUCTURAL DRAWINGS SHOW THE BUILDING IN ITS FINAL INTENDED POSITION. CONTRACTOR SHALL MAKE PROVISIONS IN THE LAYOUT OF THE BUILDING TO TAKE INTO ACCOUNTS SHRINKAGE, CREEP, SHORTENING, ETC..

11. OPENINGS, POCKETS, ETC., LARGER THAN 6" SHALL NOT BE PLACED IN CONCRETE SLABS, DECKS, WALLS, UNLESS SPECIALLY DETAILED ON THE STRUCTURAL DRAWINGS. NOTIFY THE STRUCTURAL ENGINEER WHEN DRAWINGS BY OTHERS SHOW OPENINGS, POCKETS, ETC., LARGER THAN 6" NOT SHOWN ON THE STRUCTURAL DRAWINGS, BUT WHICH ARE LOCATED IN STRUCTURAL MEMBERS.

12. ASTM SPECIFICATIONS ON THE DRAWINGS SHALL BE THE VERSION REFERENCED IN CHAPTER 35 OF THE CODE OR AS REFERENCED IN THE APPLICABLE DESIGN STANDARD.

13. CONTRACTOR SHALL INVESTIGATE SITE DURING CLEARING AND EARTHWORK OPERATIONS FOR FILLED EXCAVATIONS OR BURIED STRUCTURES, SUCH AS CESSPOOLS, CISTERNS, FOUNDATIONS, ETC. IF ANY SUCH STRUCTURES ARE FOUND, THE STRUCTURAL ENGINEER AND GEOTECHNICAL ENGINEER SHALL BE NOTIFIED IMMEDIATELY.

14. CONSTRUCTION MATERIAL SHALL BE SPREAD OUT IF PLACED ON FRAMED ROOF OR FLOOR. LOAD SHALL NOT EXCEED THE DESIGN LIVE LOAD PER SQUARE FOOT. THE CONTRACTOR TO DESIGN AND PROVIDE ADEQUATE SHORING AND/OR BRACING WHERE STRUCTURE HAS NOT ATTAINED DESIGN STRENGTH.

15. CONTRACTOR SHALL COORDINATE SHORING WITH DRAWINGS OF RECORD TO INSURE PROVISIONS FOR POCKETS, BLOCKOUTS, OFFSETS, STEPPED FOOTINGS AND ANY OTHER ITEMS AFFECTED BY THE SHORING

16. AN UNDERGROUND SERVICE ALERT INQUIRY IDENTIFICATION NUMBER MUST BE OBTAINED AT LEAST TWO WORKING DAYS BEFORE STARTING WORK WITH THIS PERMIT.
    A. FOR PROJECTS IN SOUTHERN CALIFORNIA TELEPHONE NO. 1-800-422-4133.
    B. FOR PROJECTS IN NORTHERN CALIFORNIA TELEPHONE NO. 1-800-227-2600.

17. EDGE OF SLAB DIMENSIONS TO BE COORDINATED AND VERIFIED BY THE GENERAL CONTRACTOR PRIOR TO FABRICATION.

DIMENSIONS

1. DIMENSIONS SHALL BE DEFINED TO INCLUDE BOTH HORIZONTAL DIMENSIONS AND VERTICAL DIMENSIONS (ELEVATIONS).
2. WRITTEN DIMENSIONS SHALL TAKE PRECEDENCE OVER SCALED DRAWINGS.
3. SEE ARCHITECTURAL DRAWINGS FOR DIMENSION NOT NOTED ON STRUCTURAL DRAWINGS.
4. SEE ARCHITECTURAL AND/OR CIVIL DRAWINGS FOR FINISH FLOOR ELEVATIONS.
5. SEE ARCHITECTURAL DRAWINGS FOR ALL TOP OF SHEATHING AND/OR ROOF ELEVATIONS.
6. THE CONTRACTOR SHALL REVIEW AND VERIFY ALL DIMENSIONS PRIOR TO STARTING CONSTRUCTION. THE ARCHITECT SHALL BE NOTIFIED IMMEDIATELY OF ANY DISCREPANCIES OR INCONSISTENCIES.

MONO
COUNTY

THESE PLANS ARE PROVIDED BY MONO COUNTY AS PART OF THE PRE-APPROVED ADU PROGRAM AND ARE PUBLIC DOMAIN. THERE CANNOT BE A CHARGE TO PROVIDE THESE PLANS. NO ALTERATIONS TO THESE PLANS ARE ALLOWED. ALL ALTERATIONS MUST BE DONE UNDER A SEPARATE PERMIT ONCE THE BUILDING PERMIT FOR THE ADU HAS BEEN ISSUED AND FINAL INSPECTION COMPLETED. IF YOU DO NOT HAVE THE CONSTRUCTION KNOWLEDGE AND EXPERIENCE TO CONTRUCT THESE PLANS WITHOUT FURTHER DETAILS, IT IS RECOMMENDED YOU HIRE A CONTRACTOR TO DO THE CONSTRUCTION. THE CITY WILL NOT PROVIDE FURTHER INFORMATION OR DETAILS AND BUILDING INSPECTORS WILL NOT PROVIDE STEP BY STEP INSTRUCTIONS IN THE FIELD.

MONO COUNTY ADU PROTOTYPES
MONO COUNTY

GENERAL NOTES

DATE
NOVEMBER 20, 2023

SHEET
S-102

N:\2200\2340-01-cu21-mono-cty-adu-design\structural\ConDocs\sheet-files\2340-01-CU21 - S102.dwg, PLAN 2 - S102, Nov 20, 2023 5:13pm, alopez

SHOP FABRICATION

1. SHOP FABRICATION REQUIRES SPECIAL INSPECTION IN ACCORDANCE WITH CODE SECTION 1704.2.5. EXCEPTION: SHOP SPECIAL INSPECTIONS ARE NOT REQUIRED WHEN WORK IS DONE ON THE PREMISES OF FABRICATOR REGISTERED AND APPROVED TO PERFORM SUCH WORK IN ACCORDANCE WITH CODE SECTION 1704.2.5.1. THE FOLLOWING ACCREDITATIONS MEET THE REQUIREMENTS OF THIS EXCEPTION:
   - A. WOOD BUILDING
     - a. WOOD STRUCTURAL PANELS (SHEATHING) SHALL BE IDENTIFIED BY THE APA TRADEMARK.
     - b. TRUSS MANUFACTURER SHALL BE FABRICATED IN A SHOP WITH CURRENT FABRICATOR COMPLIANCE CERTIFICATES PER CBC SECTION 1704.2.5.1.

REQUIRED VERIFICATION AND INSPECTIONS

CONCRETE CONSTRUCTION
CODE TABLE 1705.3

SPECIAL INSPECTION OR TEST	CONTINUOUS	PERIODIC	REFERENCED STANDARD	CBC REFERENCE
1. INSPECT REINFORCMENT AND VERIFY PLACEMENT.	—	X	ACI 318: CH 20, 25.2, 25.3, 26.6.1-26.6.3	1908.4
2. REINFORCING BAR WELDING: a. VERIFY WELDABILITY OF REINFORCING BARS OTHER THAN ASTM A706 b. INSPECT SINGLE-PASS FILLET WELDS, MAXIMUM $\frac{5}{16}$" AND c. INSPECT ALL OTHER WELDS	— — X	X X —	AWS D1.4 ACI 318: 26.6.4	—
3. INSPECT ANCHORS CAST IN CONCRETE	—	X	ACI 318: 17.8.2	—
4. INSPECT ANCHORS POST-IONSTALLED IN HARDENED CONCRETE MEMBERS [(b)] (a) ADHESIVE ANCHORS INSTALLED IN HORIZONTALLY OR UPWARDLY INCLINED ORIENTATIONS TO RESIST SUSTAINED TENSION LOADS (b) MECHANICAL ANCHORS AND ADHESIVE ANCHORS NOT DEFINED IN 4.a.	X	X	ACI 318: 17.8.2.4 ACI 318: 17.8.2	— —
5. VERIFY USE OF REQUIRED MIX DESIGN	—	X	ACI 318: CH. 19, 26.4.3, 26.4.4	1904.1, 1904.2, 1908.2, 1908.3
6. PRIOR TO CONCRETE PLACEMENT, FABRICATE SPECIMENS FOR STRENGTH TESTS, PERFORM SLUMP AND AIR CONTENT TESTS, AND DETERMINE THE TEMPERATURE OF THE CONCRETE.	X	—	ASTM C 172 ASTM C 31 ACI 318: 26.5, 26.12	1908.10
8. VERIFY MAINTENANCE OF SPECIFIED CURING TEMPERATURE AND TECHNIQUES.	—	X	ACI 318: 26.5.3-26.5.5	1908.9
12. INSPECT FORMWORK FOR SHAPE, LOCATION, AND DIMENSIONS OF THE CONCRETE MEMBER BEING FORMED.	—	X	ACI 318: 26.11.1.2 (b)	—
SPECIAL INSPECTIONS LISTED FOR CONCRETE ALSO APPLY TO GROUTING OPERATIONS.				

INDICATES INSPECTION REQ'D FOR ALL CONCRETE WORK

INDICATES INSPECTION REQ'D FOR 3,000 PSI AND GREATER CONCRETE WORK ONLY

WOOD
CODE CHAPTER 17 AND REFERENCED 2018 NDS AND AWC SDPWS-2015

SPECIAL INSPECTION OR TEST	CONTINUOUS	PERIODIC	CBC REFERENCE
1. HIGH LOAD DIAPHRAGM WOOD STRUCTURAL PANELS - VERIFY THE FOLLOWING: - GRADE - THICKNESS - NOMINAL SIZE OF FRAMING MEMBERS AT ADJOINING PANEL EDGES - NAIL OR STAPLE DIAMETER AND LENGTH - NUMBER OF FASTENER LINES - SPACING BETWEEN FASTENERS IN EACH LINE - SPACING BETWEEN FASTENERS AT EDGE MARGINS	—	X	1705.5.1 2306.2
3. WOOD LATERAL FORCE-RESISTING SYSTEM WITH FASTENER SPACING OF THE SHEATHING LESS THAN OR EQUAL TO 4" OC. - WOOD SHEAR WALLS - WOOD DIPHRAGMS - DRAG STRUTS - SHEAR PANELS - HOLD-DOWNS	—	X	1705.12.2
4. WOOD LATERAL FORCE-RESISTING SYSTEM WITH FASTENER SPACING OF THE SHEATHING GREATER THAN 4" OC (NOT REQUIRED) - WOOD SHEAR WALLS - WOOD DIAPHRAGMS - DRAG STRUTS - SHEAR PANELS - HOLD-DOWNS	—	—	1705.12.2

SOILS
CODE TABLE 1705.6

SPECIAL INSPECTION OR TEST	CONTINUOUS	PERIODIC
1. VERIFY MATERIALS BELOW SHALLOW FOUNDATIONS ARE ADEQUATE TO ACHIEVE THE DESIGN BEARING CAPACITY	—	X
2. VERIFY EXCAVATIONS ARE EXTENDED TO PROPER DEPTH AND HAVE REACHED PROPER MATERIAL.	—	X
3. PERFORM CLASSIFICATION AND TESTING OF COMPACTED FILL MATERIALS	—	X
4. VERIFY USE OF PROPER MATERIALS, DENSITIES, AND LIFT THICKNESSES DURING PLACEMENT AND COMPACTION OF COMPACTED FILL.	X	—
5. PRIOR TO PLACEMENT OF COMPACTED FILL, INSPECT SUBGRADE AND VERIFY THAT SITE HAS BEEN PREPARED PROPERLY.	—	X

STRUCTURAL COMPOSITE LUMBER

1. STRUCTURAL COMPOSITE LUMBER SHALL HAVE STRUCTURAL CAPACITIES AND DESIGN PROVISIONS ESTABLISHED AND MONITORED IN ACCORDANCE WITH ASTM D5456 PER CODE SECTION 2303.1.10
2. STRUCTURAL COMPOSITE LUMBER SHALL BE IDENTIFIED WITH THE MANUFACTURER'S NAME AND/OR LOGO, THE NAME AND OR LOGO OF THE INSPECTION AGENCY (PFS CORP , INTERTEK,OR APA-EWS) AND THE EVALUATION REPORT NUMBER, THE PLANT NUMBER, PRODUCT DESIGNATION OR TYPE, PRODUCTION DATE, AND GRADE.
3. INSTALLATION, FABRICATION, IDENTIFICATION AND CONNECTION DETAILS SHALL BE IN ACCORDANCE WITH THE APPLICABLE ICC REPORT.
4. LAMINATED VENEER LUMBER (LVL)
   - A. LAMINATED VENEER LUMBER SHALL BE ONE OF THE FOLLWING:
     - a. MICROLLAM LAMINATED VENEER LUMBER GRADE 2.0E-2750F_b WS, MANUFACTURED BY WEYERHAEUSER IN ACCORDANCE WITH ICC-ESR 1387.
     - b. REDLAM LAMINATED VENEER LUMBER GRADE 2.0E DF/LP/WH, MANUFACTURED BY REDBUILT IN ACCORDANCE WITH ICC-ESR 2993.
   - B. IDENTIFICATION: IN ADDITION TO THE IDENTIFICATION LISTED FOR STRUCTURAL COMPOSITE LUMBER ABOVE, LVL SHALL BE IDENTIFIED WITH THE SPECIES OR SPECIES GROUP.
5. PARALLEL STRAND LUMBER (PSL)
   - A. PARALLEL STRAND LUMBER SHALL BE PARALLAM PARALLEL STRAND LUMBER GRADE 2.0E DF, MANUFACTURED BY WEYERHAEUSER IN ACCORDANCE WITH ICC-ESR 1387.
6. LAMINATED STRAND LUMBER (LSL)
   - A. LAMINATED STRAND LUMBER SHALL BE TIMBERSTRAND LAMINATED STRAND LUMBER GRADE 1.55E, MANUFACTURED BY WEYERHAEUSER IN ACCORDANCE WITH ICC-ESR 1387.
7. PRODUCTS FROM OTHER MANUFACTURER'S MAY BE USED WITH EQUAL OR GREATER CAPACITIES. REQUESTS FOR PRODUCT SUBSTITUTION SHALL FOLLOW THE REQUIREMENTS LISTED IN THE SUBMITTALS SECTION.

PRE-FABRICATED WOOD TRUSS NOTES

1. THE DESIGN OF METAL PLATE CONNECTED WOOD TRUSSES SHALL BE IN ACCORDANCE WITH THE FOLLOWING
   - A. CODES AND STANDARDS:
     - a. THE GOVERNING CODE LISTED IN THE PROJECT GENERAL NOTES
     - b. MINIMUM DESIGN LOADS FOR BUILDINGS AND OTHER STRUCTURES (ASCE 7-16)
     - c. NATIONAL DESIGN STANDARD FOR WOOD CONSTRUCTION AND SUPPLEMENT (ANSI/AWC NDS-2018)
     - d. SPECIAL DESIGN PROVISIONS FOR WIND & SEISMIC (AWC SDPWS-2015)
     - e. THE NATIONAL DESIGN STANDARD FOR METAL PLATE CONNECTED WOOD TRUSS CONSTRUCTION (ANSI/TPI 1-2014)
   - B. DESIGN CRITERIA:
     - a. TRUSSES SHALL BE DESIGNED FOR THE FOLLOWING MINIMUM VERTICAL LOADS AND OTHER LOADS INDICATED ON THE CONSTRUCTION DOCUMENTS (ATTIC MECHANICAL UNITS, ETC.)

       <u>ROOF TRUSS LOADING:</u>

TOP-CHORD DEAD LOAD:	17.2 PSF (15.8 PSF SUPERIMPOSED)
BOT CHORD DEAD LOAD:	6.5 PSF (5.4 PSF SUPERIMPOSED)
ROOF - LIVE LOAD:	20 PSF
TOP CHORD - SNOW LOAD:	PER PLAN AND SPECIFIC LOCATION OWNER/CONTRACTOR TO PROVIDE TO TRUSS MANUF.

       <u>DEFLECTION CRITERIA:</u>

DEAD + LIVE LOAD	L/240
LIVE LOAD ONLY	L/360

     - b. ( ) INDICATES HORIZONTAL SEISMIC/WIND LOAD ON COLLECTOR TRUSSES. THE TRUSS DESIGNER SHALL DESIGN FOR THE TRUSSES FOR THE INDICATED HORIZONTAL LOAD ACTING IN BOTH THE TOP AND BOTTOM TRUSS CHORDS AND FOR THE TRANSFER OF THE FORCE TO THE CHORDS THROUGH THE WEB.
2. CONTRACTOR REQUIREMENTS:
   - A. THE CONTRACTOR SHALL MEET ALL THE REQUIREMENTS LISTED IN SECTION 2.3.4 OF ANSI/TPI 1-2014 INCLUDING THE FOLLOWING:
     - a. MEANS AND METHODS: THE CONTRACTOR IS RESPONSIBLE FOR ALL MEANS AND METHODS, TECHNIQUES, SEQUENCES, PROCEDURES, PROGRAMS AND SAFETY IN CONNECTION WITH THE RECEIPT, STORAGE, HANDLING, INSTALLATION, RESTRAINING, AND BRACING OF THE TRUSSES. REFER TO THE GUIDE TO GOOD PRACTICE FOR HANDLING, INSTALLING, RESTRAINING & BRACING OF METAL PLATE CONNECTED WOOD TRUSSES (BCSI-B1)
     - b. TRUSS INSTALLATION SHALL COMPLY WITH INSTALLATION TOLERANCES SHOWN IN BCSI-B1
     - c. TEMPORARY INSTALLATION RESTRAINT/BRACING FOR THE TRUSS SYSTEM AND THE PERMANENT TRUSS SYSTEM SHALL BE INSTALLED IN ACCORDANCE WITH BCSI-B2.
     - d. CONSTRUCTION LOADING ON TRUSSES SHALL BE DONE IN ACCORDANCE WITH BCSI-B4.
     - e. TRUSS DAMAGE, JOBSITE MODIFICATIONS & INSTALLATION ERRORS SHALL BE BROUGHT TO THE IMMEDIATE ATTENTION OF THE EOR AND THE TRUSS DESIGNER, REFERENCE BCSI-B5.
     - f. SUBMIT THE DRAWINGS FROM THE TRUSS DESIGNER/MANUFACTURER TO THE BUILDING DEPARTMENT PRIOR TO FABRICATION FOR APPROVAL. A COPY OF THIS SUBMITTAL SHALL BE PROVIDED TO THE COUNTY BUILDING DEPARTMENT OF RECORD FOR REVIEW OF GENERAL CONFORMANCE TO THE DESIGN INTENT. THE CONTRACTOR SHALL INCORPORATE THE TIME REQUIRED FOR THE SUBMITTAL TO BE REVIEWED, STAMPED AND APPROVED BY ALL PARTIES AND SHALL HAVE THE APPROVED TRUSS PLANS ON THE JOB SITE PRIOR TO FOUNDATION INSPECTION.
3. TRUSS DESIGNER REQUIREMENTS:
   - A. THE TRUSS DESIGNER SHALL MEET ALL THE REQUIREMENTS LISTED IN SECTION 2.3.5 OF ANSI/TPI 1-2014 INCLUDING THE FOLLOWING:
     - a. TRUSS DESIGNER SHALL SUPERVISE THE PREPARATION OF THE TRUSS DESIGN DRAWINGS WHICH SHALL CONTAIN THE INFORMATION LISTED IN SECTION 2.3.5.5 OF ANSI/TPI 1-2014. THIS INCLUDES ALL TRUSS TO TRUSS CONNECTIONS, AND DETAILS FOR THE "CALIFORNIA FILL" AREAS.
     - b. TRUSS DESIGNER SHALL COMPLY WITH THE REFERENCED CODE AND DESIGN CRITERIA ABOVE.
     - c. TRUSS DESIGNER SHALL SHOW ALL HANGERS, BRACING AND RESTRAINTS AS WELL AS METHOD OF RESTRAINT/BRACING ON THE TRUSS PLANS TO MEET ANY SEISMIC AND WIND REQUIREMENTS OF THE CODE.
     - d. SUBMIT TRUSS DESIGN DRAWINGS INCLUDING ALL RELEVANT DETAILS FOR THE FABRICATION OF THE TRUSSES AND PREPARE CALCULATIONS. ALL PLANS,DETAILS AND CALCULATIONS FOR THE TRUSSES SHALL BE STAMPED AND SIGNED BY A LICENSED PROFESSIONAL ENGINEER (CIVIL OR STRUCTURAL), LICENSED TO PRACTICE IN THE STATE OF CALIFORNIA.

WOOD STRUCTURAL PANELS (SHEATHING)

1. WOOD STRUCTURAL PANELS SHALL MEET THE FOLLOWING MINIMUM STANDARDS EXCEPT WHERE OTHERWISE NOTED:

WOOD STRUCTURAL PANEL PROPERTIES

USE	PLY	BOND CLASSIFICATION [C]	SHEATHING GRADE	PERFORMANCE RATING	SPAN RATING	RATING [B]	REFERENCE [A]
ROOF	5	EXPOSURE 1	REFER TO TYPICAL DIAPHRAGM SCHEDULE			APA	2019 CBC 2303.1.5 (DOC PS 1-09 OR PS 2-10)
FLOOR	5	EXPOSURE 1				APA	
WALL [D]	5	EXPOSURE 1	REFER TO TYPICAL SHEAR WALL SCHEDULE			APA	

TABLE NOTES:

- A. WOOD STRUCTURAL PANELS SHALL CONFORM TO THE REQUIREMENTS FOR THEIR TYPE IN ACCORDANCE WITH THE FOLLOWING VOLUNTARY STANDARDS BY THE ENGINEERED WOOD ASSOCIATION (APA):
  - a. VOLUNTARY PRODUCT STANDARD, STRUCTURAL PLYWOOD, PS 1-09
  - b. VOLUNTARY PRODUCT STANDARD, PERFORMANCE STANDARD FOR WOOD-BASED STRUCTURAL-USE PANELS, PS 2-10
- B. WOOD STRUCTURAL PANELS SHALL BE IDENTIFIED BY THE APA TRADEMARK INDICATING CONFORMANCE TO THE APPLICABLE VOLUNTARY STANDARD
- C. WHERE PANELS ARE EXPOSED TO REPEATED WETTING AND REDRYING, LONG-TERM EXPOSURE TO WEATHER, OR CONDTIONS OF SIMILAR SEVERITY, "EXTERIOR" APA RATED PLYWOOD SHEATHING SHALL BE USED. C-D "EXPOSURE 1" APA RATED PLYWOOD SHEATHING (CDX) <u>SHALL NOT</u> BE USED FOR CONDITIONS INVOLVING LONG-TERM EXPOSURE TO WEATHER.
  - a. EXCEPTION: WOOD STRUCTURAL PANEL ROOF SHEATHING EXPOSED TO THE OUTDOORS ON THE UNDERSIDE IS PERMITTED TO BE "EXPOSURE 1" TYPE.
  - b. WOOD STRUCTURAL PANELS TO BE USED AS SIDING SHALL COMPLY WITH ANSI/APA PRP-210.
- D. ORIENTED STRAND BOARD (OSB) WITH EQUIVALENT CLASSIFICATION AND RATINGS MAY BE USED IN LIEU OF PLYWOOD FOR WOOD STRUCTURAL PANEL WALL SHEATHING.

2. TRANSPORTATION, STORAGE, AND HANDLING:
   - A. TRANSPORTATION
     - a. IN TRANSPORTING PANELS ON OPEN TRUCK BEDS, COVER THE BUNDLES WITH A TARP.
   - B. STORAGE
     - a. ALWAYS STORE THE PANELS UNDER COVER WHENEVER POSSIBLE
     - b. WHEN STORING PANELS OUTSIDE STACK THEM ON A LEVEL SURFACE ON TOP OF STRINGERS OR OTHER BLOCKING, THREE STRINGERS MINIMUM.
     - c. NEVER LEAVE PANELS IN CONTACT WITH THE GROUND
     - d. COVER THE STACK WITH A PLASTIC TARP, ENSURING THAT THE BUNDLE IS WELL VENTILATED TO PREVENT MILDEW.
     - e. IF MOISTURE ABSORPTION IS EXPECTED, CUT THE STEEL BAND TO PREVENT DAMAGE
     - f. KEEP SANDED OR OTHER APPEARANCE GRADE PANELS AWAY FROM HIGH TRAFFIC AREAS
   - C. HANDLING
     - a. ALWAYS PROTECT ENDS AND EDGES, ESPECIALLY TONGUE AND GROOVE PRODUCTS, FROM PHYSICAL DAMAGE.
     - b. ACCLIMATIZE THE PANELS FOR 24 HOURS MINIMUM BEFORE INSTALLATION BY STANDING THE PANELS ON EDGE WITH A GAP BETWEEN EACH TO ALLOW FOR AIR CIRCULATION OR PER MANUFACTURER'S RECOMMENDATIONS.
3. PLYWOOD ORIENTATION
   - A. ROOF AND FLOOR SHEATHING SHALL BE LAID WITH THE GRAIN OF THE OUTER PILES PERPENDICULAR TO THE FRAMING MEMBERS, SHALL BE CONTINUOUS OVER 2 JOIST BAYS MINIMUM AND END JOINTS SHALL BE JOINED OVER FRAMING AND STAGGERED. LEAVE A $\frac{1}{8}$" GAP BETWEEN PANELS TO ALLOW FOR PANEL EXPANSION UNLESS RECOMMENDED OTHERWISE BY THE PANEL MANUF. REFER TO SPECIFIC DETAILS IN THE DRAWINGS FOR FURTHER PARAMETERS.
   - B. PLYWOOD OR OSB WALL SHEATHING MAY BE APPLIED VERTICALLY OR HORIZONTALLY. ALL END JOINTS BE JOINED OVER FRAMING AND STAGGERED.
4. BLOCKING:
   - A. ROOF: ALL ROOF SHEATHING SHALL BE BLOCKED UNLESS SPECIFICALLY ALLOWED ON PLANS. WHERE PERMITTED TO BE UNBLOCKED, ALL UNBLOCKED EDGES SHALL BE TONGUE AND GROOVE.
   - B. ALL FLOOR SHEATHING SHALL BE BLOCKED UNLESS SPECIFICALLY ALLOWED ON PLANS. WHERE PERMITTED TO BE UNBLOCKED, ALL UNBLOCKED EDGES SHALL BE TONGUE AND GROOVE.
   - C. WALLS: ALL SHEAR WALLS SHALL BE FULLY BLOCKED AT PLYWOOD EDGES.
5. FASTENERS
   - A. USE SHEATHING NAILS SAME GAUGE AS COMMON WIRE NAILS WITH LENGTHS AT LEAST EQUAL TO SHEATHING THICKNESS PLUS REQUIRED PENETRATION PER AWS SDPWS TABLE 4.2A OR 4.3A (AS REQUIRED).
   - B. EQUIVALENT PNEUMATIC DRIVE NAILS OR STAPLES MAY BE USED IF FASTENER MANUFACTURER HAS RECEIVED ICC OR IAPMO APPROVAL FOR THE INTENDED US. FASTENERS TO BE SUBSTITUTED SHALL BE EQUIVALENT IN LATERAL AND WITHDRAWAL STRENGTH TO THE SIZE OF COMMON NAIL SPECIFIED.
   - C. USE OF MACHINE NAILING IS SUBJECT TO A SATISFACTORY JOB SITE DEMONSTRATION FOR EACH PROJECT AND THE APPROVAL BY THE PROJECT ARCHITECT OR STRUCTURAL ENGINEER. THE APPROVAL IS SUBJECT TO CONTINUED SATISFACTORY PERFORMANCE. MACHINE NAILING WILL NOT BE APPROVED IN 5/16" PLYWOOD OR OSB SHEATHING. IF NAIL HEADS PENETRATE THE OUTER PLY MORE T HAN WOULD BE NORMAL FOR A HAND HAMMER OR IF MINIMUM ALLOWABLE EDGE DISTANCES ARE NOT MAINTAINED, THE PERFORMANCE WILL BE DEEMED UNSATISFACTORY.
   - D. TYPICAL NAILING SHALL BE 10D AT 6" O.C. AT ALL SUPPORTED EDGES AND OVER SHEAR WALLS, AND 10D AT 12" O.C. AT ALL INTERMEDIATE SUPPORTS, UNLESS OTHERWISE NOTED, SEE PLANS AND REFER TO SHEAR WALL SCHEDULE.

MONO COUNTY

MONO COUNTY ADU PROTOTYPES

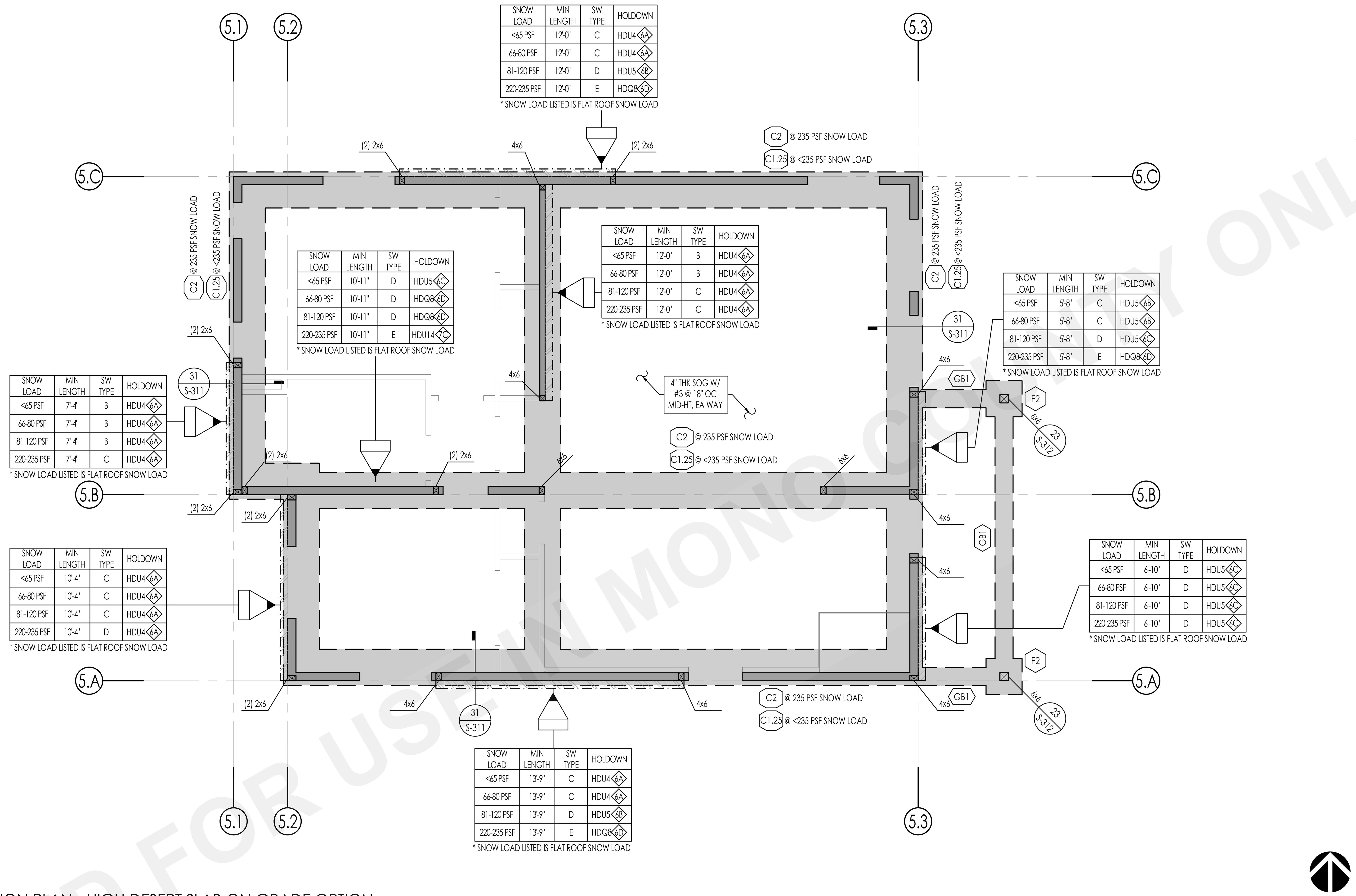
MONO COUNTY

GENERAL NOTES, SPECIAL INSPECTION & TESTS

DATE
NOVEMBER 20, 2023

SHEET
S-103

N:\2200\2340-01-cu21-mono-cty-adu-design\structural\ConDocs\sheet-files\2340-01-CU21 - S103.dwg, PLAN 2 - S103, Nov 20, 2023 5:13pm, alopez



1 FOUNDATION PLAN - HIGH DESERT SLAB ON GRADE OPTION

SCALE: 1/4" = 1'-0"

FOUNDATION PLAN NOTES

1. REFER TO THE FOLLOWING SHEETS FOR TYPICAL DETAILS:

DESCRIPTION	SHEET (S)
SYMBOLS AND ABBREVIATIONS	S-101
STRUCTURAL GENERAL NOTES	S-102 - S-103
TESTING AND INSPECTION	S-103
TYPICAL CONCRETE DETAILS	S-301
TYPICAL WOOD DETAILS	S-401 - S-404

2. SEE ARCHITECTURAL DRAWINGS FOR FINISHED FLOOR ELEVATIONS. REFERENCE FINISHED FLOOR ELEVATION = 0'-0" COORESPONDS TO FINISHED FLOOR ELEVATION.
3. ALL DIMENSIONS SHOWN ARE FROM FACE OF CONCRETE/MASONRY, FACE OF SHEATHING, OR CENTERLINE OF COLUMN. ALL COLUMNS ARE CENTERED IN STUD WALLS, UNO.
4. FOR ANY DIMENSIONAL INFORMATION NOT SHOWN, SEE ARCHITECTURAL DRAWINGS.
5. SEE ARCHITECTURAL DRAWINGS FOR ANY EMBEDDED ITEMS AND ALL EXTERIOR CONCRETE PAVE
6. SEE PLANS AND ARCHITECTURAL DRAWINGS FOR DEPRESSIONS AND/OR SLOPES IN CONCRETE SLABS.
7. SEE ARCHIECTURAL DRAWINGS FOR SIZE AND LOCATION OF ALL DOOR AND WINDOW OPENINGS IN BEARING AND NON-BEARING WALLS.
8. SEE ARCHITECTURAL DRAWINGS FOR LOCATION OF INTERIOR NON-BEARING PARTITIONS.
9. SEE ARCHITECTURAL, PLUMBING, MECHANICAL AND ELECTRICAL DRAWINGS FOR ADDITIONAL EMBEDDED ITEMS AND SLAB PENETRATIONS.
10. FOR TYPICAL SLAB-ON-GRADE REQUIREMENTS, INCLUDING SLAB JOINTS, SEE DETAIL 31/S-301.
11. ALL POSTS IN 4" WALLS SHALL BE 4x4, UNLESS NOTED OTHERWISE
ALL POSTS IN 6" WALLS SHALL BE 6x6, UNLESS NOTED OTHERWISE
12. PLATE WASHERS ARE REQUIRED FOR ALL SILL PLATE ANCHOR BOLTS. REFER TO 34/S-402 FOR PLATE WASHER REQUIREMENTS AT SHEAR WALLS.
13. ALL HOLDOWN ANCHOR NUTS SHALL BE TIGHTENED JUST PRIOR TO COVERING.
14. ALL BOLT HOLES IN WOOD MEMBERS, SHALL BE DRILLED A MAXIMUM OF 1/16" OVERSIZED. INSPECTOR TO VERIFY.
15. THE BUILDING PAD SHALL BE PREPARED AS OUTLINED IN DETAIL 53/S-301. THE BUILDING OFFICIAL SHALL REQUIRE PAD CERTIFICATION BY A GEOTECHNICAL ENGINEER AT THEIR DISCRETION.
16. BOTTOM OF FOOTING SHALL BE, UNLESS DEEPER FOUNDATIONS ARE REQUIRED BY THE BUILDING OFFICIAL:
    A. 18" BELOW PAD OR ADJACENT GRADE AT PERIMETER, WHICHEVER IS DEEPER, UNO.
    B. 18" BELOW PAD OR ADJACENT GRADE AT INTERIOR GRADE BEAMS, WHICHEVER IS DEEPER, UNO.
    NOTE: FOOTING MUST BE DEEPEND LOCALLY PER DETAIL 32/S-301 TO ACCOMMODATE ANCHOR BOLT HOLDOWN EMBED DEPTHS, OR FROST DEPTHS AS INDICATED BY THE BUILDING OFFICIAL.
17. DIAPHRAGM TYPE:
ALL FLOOR DIAPHRAGMS SHALL BE TYPE D, UNO
REFER TO 12/S-403
18. OWNER MAY SELECT EITHER SLAB ON GRADE FOUNDATION OR THE RAISED FLOOR FOUNDATION, TO SUIT THE SPECIFIC SITE.
19. WHERE RAISED FLOOR FOUNDATION IS SELECTED, OWNER HAS THE OPTION TO USE CRIPPLE STUD WALLS IN LIEU OF THE SPECIFIED CONCRETE STEM WALLS BELOW THE FLOOR FRAMING. CRIPPLE STUDS ARE TO MATCH TYPICAL WALL FRAMING, AND TO BE SHEATHED TO MATCH SHEARWALLS ABOVE. HOLDOWNS SPECIFIED SHALL BE INSTALLED ACROSS THE FLOOR FRAMING PER DETAIL 12/S-405 AND THEN INTO THE CONCRETE STEM WALL PER DETAILS 22/S-311 AND 24/S-311.
20. REFER TO ARCHITECTURAL DRAWINGS FOR SIZE AND LOCATION OF UNDERFLOOR ACCESS HOLE.
21. REFER TO ARCHITECTURAL DRAWINGS FOR UNDERFLOOR HEIGHT ALLOWANCE.
22. ALL SNOW LOADS LISTED ARE THE FLAT ROOF SNOW LOAD. TO FIND THE FLAT ROOF SNOW LOAD, FOLLOW THIS EQUATION: FLAT ROOF SNOW = 0.77 x GROUND SNOW LOAD.
23. LOCATION OF CRAWL SPACE ACCESS IS SPECIFIC TO SITE. REFER TO DETAIL 33/S-313 FOR OPENING AT CONC WALL FOOTING.

SYMBOL LEGEND

XX'-X" X — INDICATES SHEAR WALL TYPE AND LENGTH, SEE SCHEDULE ON 13/S-402

INDICATES CONCRETE WALL PER DETAIL 22/S-311

SCHEDULES

HOLDOWN SCHEDULE

SPECIFIES HOLDOWN/ STRAP DETAIL — 1x — INDICATES HOLDOWN/ STRAP TYPE		DETAIL
6x	INDICATES SIMPSON SSTB HOLDOWN TO: CONC FOUNDATION: CONC STEM WALL:	12/S-311 22/S-311
7x	INDICATES SIMPSON SB HOLDOWN TO: CONC FOUNDATION: CONC STEM WALL:	14/S-311 24/S-311

CONTINUOUS FOOTING SCHEDULE

MARK	WIDTH	MIN EMBED BELOW LOWEST PAD GRADE	LONG REINF	TRANS REINF	DETAIL
C1.25	1'-3"	SEE NOTE 16	(2) #5 T&B	#3 @ 12" OC, BOT	31/S-311
C2	2'-0"	SEE NOTE 16	(3) #5 T&B	#3 @ 12" OC, BOT	31/S-311

T-FOOTING SCHEDULE

TYPE	WIDTH	THICKNESS	MIN EMBED BELOW LOWEST PAD GRADE	LONG REINF	TRANS REINF	DETAIL
T1.25	1'-3"	1'-0"	SEE NOTE 16	(2) #4 @ TOP (2) #4 @ BOT	#3 @ 24" OC	13/S-312
T2	2'-0"	1'-0"	SEE NOTE 16	(3) #4 @ TOP (3) #4 @ BOT	#3 @ 24" OC	13/S-312

GRADE BEAM SCHEDULE

TYPE	WIDTH	THICKNESS	MIN EMBED BELOW LOWEST PAD GRADE	LONG REINF	TRANS REINF	DETAIL
GB1	1'-0"	1'-0"	SEE NOTE 16	(2) #4 @ TOP (2) #4 @ BOT	#3 @ 24" OC	13/S-312

PAD FOOTING SCHEDULE

TYPE	WIDTH	LENGTH	THICKNESS	MIN EMBED BELOW LOWEST PAD GRADE	TOP REINF	BOT REINF	DETAIL
F2	2'-0"	2'-0"	1'-6"	SEE NOTE 16	(3) #5, EW	(3) #5, EW	11/S-312
F3	3'-0"	3'-0"	1'-6"	SEE NOTE 16	(4) #5, EW	(4) #5, EW	11/S-312
F5	5'-0"	5'-0"	1'-6"	SEE NOTE 16	(6) #5, EW	(6) #5, EW	11/S-312

NOTE: FOOTING MUST BE DEEPENED LOCALLY PER DETAIL 32/S-301 TO ACCOMMODATE AB HOLDOWN EMBED DEPTHS

MONO COUNTY ADU PROTOTYPES

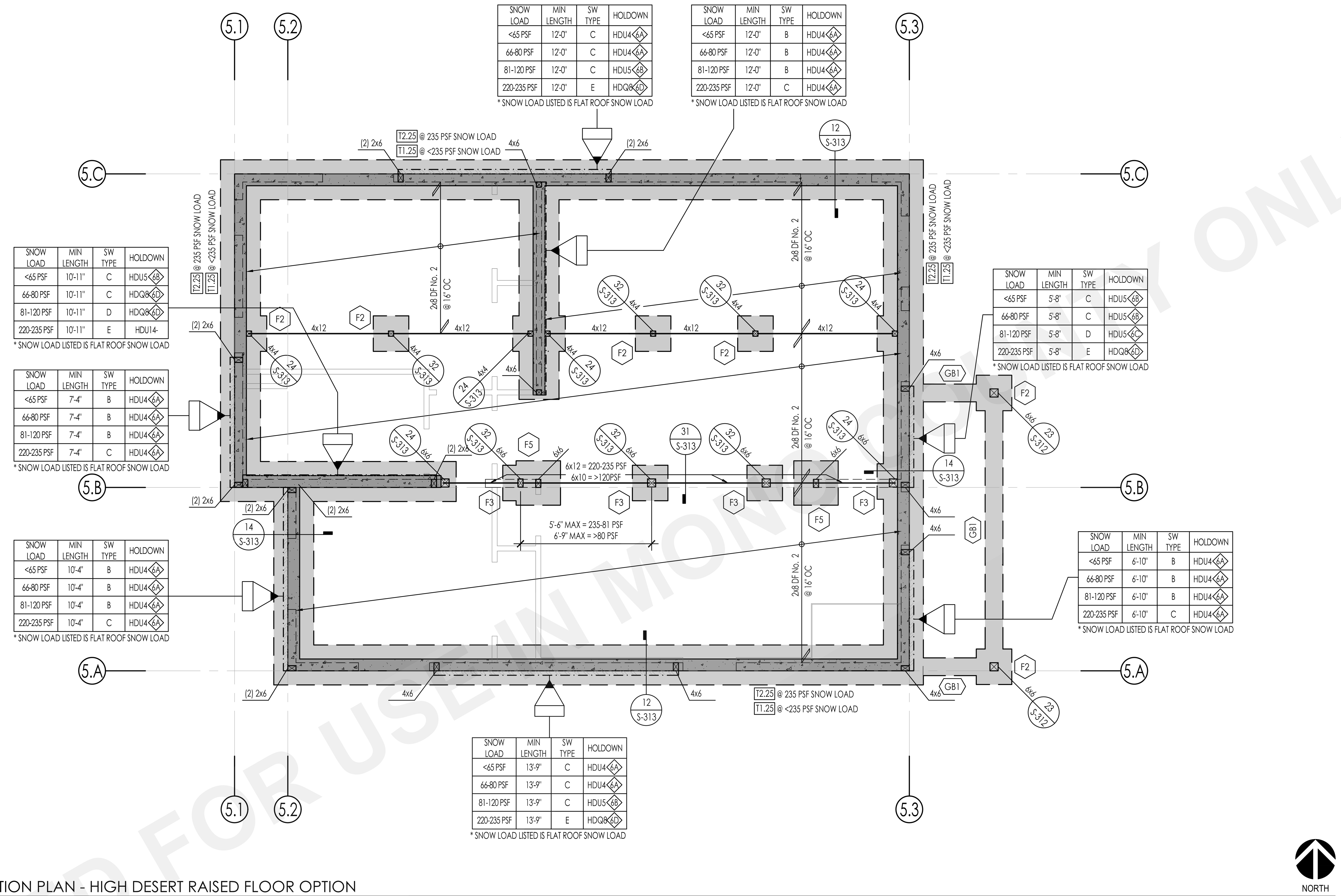
MONO COUNTY

FOUNDATION PLAN - HIGH DESERT - SLAB ON GRADE

DATE
NOVEMBER 20, 2023

SHEET
S5-201A.1

N:\2200\2340-01-cu21-mono-cty-adu-design\structural\ConDocs\sheet-files\Plan 5\2340-01-CU21 - Plan5.dwg, PLAN 5 - S2-201A.1, Nov 20, 2023 5:13pm, alopez



1 FOUNDATION PLAN - HIGH DESERT RAISED FLOOR OPTION

SCALE: 1/4" = 1'-0"

FOUNDATION PLAN NOTES

1. REFER TO THE FOLLOWING SHEETS FOR TYPICAL DETAILS:

DESCRIPTION	SHEET (S)
SYMBOLS AND ABBREVIATIONS	S-101
STRUCTURAL GENERAL NOTES	S-102 - S-103
TESTING AND INSPECTION	S-103
TYPICAL CONCRETE DETAILS	S-301
TYPICAL WOOD DETAILS	S-401 - S-404

2. SEE ARCHITECTURAL DRAWINGS FOR FINISHED FLOOR ELEVATIONS. REFERENCE FINISHED FLOOR ELEVATION = 0'-0" COORESPONDS TO FINISHED FLOOR ELEVATION.
3. ALL DIMENSIONS SHOWN ARE FROM FACE OF CONCRETE/MASONRY, FACE OF SHEATHING, OR CENTERLINE OF COLUMN. ALL COLUMNS ARE CENTERED IN STUD WALLS, UNO.
4. FOR ANY DIMENSIONAL INFORMATION NOT SHOWN, SEE ARCHITECTURAL DRAWINGS.
5. SEE ARCHITECTURAL DRAWINGS FOR ANY EMBEDDED ITEMS AND ALL EXTERIOR CONCRETE PAVE
6. SEE PLANS AND ARCHITECTURAL DRAWINGS FOR DEPRESSIONS AND/OR SLOPES IN CONCRETE SLABS.
7. SEE ARCHIECTURAL DRAWINGS FOR SIZE AND LOCATION OF ALL DOOR AND WINDOW OPENINGS IN BEARING AND NON-BEARING WALLS.
8. SEE ARCHITECTURAL DRAWINGS FOR LOCATION OF INTERIOR NON-BEARING PARTITIONS.
9. SEE ARCHITECTURAL, PLUMBING, MECHANICAL AND ELECTRICAL DRAWINGS FOR ADDITIONAL EMBEDDED ITEMS AND SLAB PENETRATIONS.
10. FOR TYPICAL SLAB-ON-GRADE REQUIREMENTS, INCLUDING SLAB JOINTS, SEE DETAIL 31/S-301.
11. ALL POSTS IN 4" WALLS SHALL BE 4x4, UNLESS NOTED OTHERWISE
ALL POSTS IN 6" WALLS SHALL BE 6x6, UNLESS NOTED OTHERWISE
12. PLATE WASHERS ARE REQUIRED FOR ALL SILL PLATE ANCHOR BOLTS. REFER TO 34/S-402 FOR PLATE WASHER REQUIREMENTS AT SHEAR WALLS.
13. ALL HOLDOWN ANCHOR NUTS SHALL BE TIGHTENED JUST PRIOR TO COVERING.
14. ALL BOLT HOLES IN WOOD MEMBERS, SHALL BE DRILLED A MAXIMUM OF 1/16" OVERSIZED. INSPECTOR TO VERIFY.
15. THE BUILDING PAD SHALL BE PREPARED AS OUTLINED IN DETAIL 53/S-301. THE BUILDING OFFICIAL SHALL REQUIRE PAD CERTIFICATION BY A GEOTECHNICAL ENGINEER AT THEIR DISCRETION.
16. BOTTOM OF FOOTING SHALL BE, UNLESS DEEPER FOUNDATIONS ARE REQUIRED BY THE BUILDING OFFICIAL:
    A. 18" BELOW PAD OR ADJACENT GRADE AT PERIMETER, WHICHEVER IS DEEPER, UNO.
    B. 18" BELOW PAD OR ADJACENT GRADE AT INTERIOR GRADE BEAMS, WHICHEVER IS DEEPER, UNO.
    NOTE: FOOTING MUST BE DEEPEND LOCALLY PER DETAIL 32/S-301 TO ACCOMMODATE ANCHOR BOLT HOLDOWN EMBED DEPTHS, OR FROST DEPTHS AS INDICATED BY THE BUILDING OFFICIAL.
17. DIAPHRAGM TYPE:
ALL FLOOR DIAPHRAGMS SHALL BE TYPE D, UNO
REFER TO 12/S-403
18. OWNER MAY SELECT EITHER SLAB ON GRADE FOUNDATION OR THE RAISED FLOOR FOUNDATION, TO SUIT THE SPECIFIC SITE.
19. WHERE RAISED FLOOR FOUNDATION IS SELECTED, OWNER HAS THE OPTION TO USE CRIPPLE STUD WALLS IN LIEU OF THE SPECIFIED CONCRETE STEM WALLS BELOW THE FLOOR FRAMING. CRIPPLE STUDS ARE TO MATCH TYPICAL WALL FRAMING, AND TO BE SHEATHED TO MATCH SHEARWALLS ABOVE. HOLDOWNS SPECIFIED SHALL BE INSTALLED ACROSS THE FLOOR FRAMING PER DETAIL 12/S-405 AND THEN INTO THE CONCRETE STEM WALL PER DETAILS 22/S-311 AND 24/S-311.
20. REFER TO ARCHITECTURAL DRAWINGS FOR SIZE AND LOCATION OF UNDERFLOOR ACCESS HOLE.
21. REFER TO ARCHITECTURAL DRAWINGS FOR UNDERFLOOR HEIGHT ALLOWANCE.
22. ALL SNOW LOADS LISTED ARE THE FLAT ROOF SNOW LOAD. TO FIND THE FLAT ROOF SNOW LOAD, FOLLOW THIS EQUATION: FLAT ROOF SNOW = 0.77 x GROUND SNOW LOAD.
23. LOCATION OF CRAWL SPACE ACCESS IS SPECIFIC TO SITE. REFER TO DETAIL 33/S-313 FOR OPENING AT CONC WALL FOOTING.

SYMBOL LEGEND

SYMBOL	DESCRIPTION
XX'-X" / X	INDICATES SHEAR WALL TYPE AND LENGTH, SEE SCHEDULE ON 13/S-402
(concrete wall)	INDICATES CONCRETE WALL PER DETAIL 22/S-311

SCHEDULES

HOLDOWN SCHEDULE

SPECIFIES HOLDOWN/ STRAP DETAIL → 1x ← INDICATES HOLDOWN/ STRAP TYPE		DETAIL
6x	INDICATES SIMPSON SSTB HOLDOWN TO: CONC FOUNDATION: CONC STEM WALL:	12/S-311 22/S-311
7x	INDICATES SIMPSON SB HOLDOWN TO: CONC FOUNDATION: CONC STEM WALL:	14/S-311 24/S-311

CONTINUOUS FOOTING SCHEDULE

MARK	WIDTH	MIN EMBED BELOW LOWEST PAD GRADE	LONG REINF	TRANS REINF	DETAIL
C1.25	1'-3"	SEE NOTE 16	(2) #5 T&B	#3 @ 12" OC, BOT	31/S-311
C2	2'-0"	SEE NOTE 16	(3) #5 T&B	#3 @ 12" OC, BOT	31/S-311

GRADE BEAM SCHEDULE

TYPE	WIDTH	THICKNESS	MIN EMBED BELOW LOWEST PAD GRADE	LONG REINF	TRANS REINF	DETAIL
GB1	1'-0"	1'-0"	SEE NOTE 16	(2) #4 @ TOP (2) #4 @ BOT	#3 @ 24" OC	13/S-312

T-FOOTING SCHEDULE

TYPE	WIDTH	THICKNESS	MIN EMBED BELOW LOWEST PAD GRADE	LONG REINF	TRANS REINF	DETAIL
T1.25	1'-3"	1'-0"	SEE NOTE 16	(2) #4 @ TOP (2) #4 @ BOT	#3 @ 24" OC	13/S-312
T2	2'-0"	1'-0"	SEE NOTE 16	(3) #4 @ TOP (3) #4 @ BOT	#3 @ 24" OC	13/S-312

PAD FOOTING SCHEDULE

TYPE	WIDTH	LENGTH	THICKNESS	MIN EMBED BELOW LOWEST PAD GRADE	TOP REINF	BOT REINF	DETAIL
F2	2'-0"	2'-0"	1'-6"	SEE NOTE 16	(3) #5, EW	(3) #5, EW	11/S-312
F3	3'-0"	3'-0"	1'-6"	SEE NOTE 16	(4) #5, EW	(4) #5, EW	11/S-312
F5	5'-0"	5'-0"	1'-6"	SEE NOTE 16	(6) #5, EW	(6) #5, EW	11/S-312

NOTE: FOOTING MUST BE DEEPENED LOCALLY PER DETAIL 32/S-301 TO ACCOMMODATE AB HOLDOWN EMBED DEPTHS

MONO COUNTY

MONO COUNTY ADU PROTOTYPES

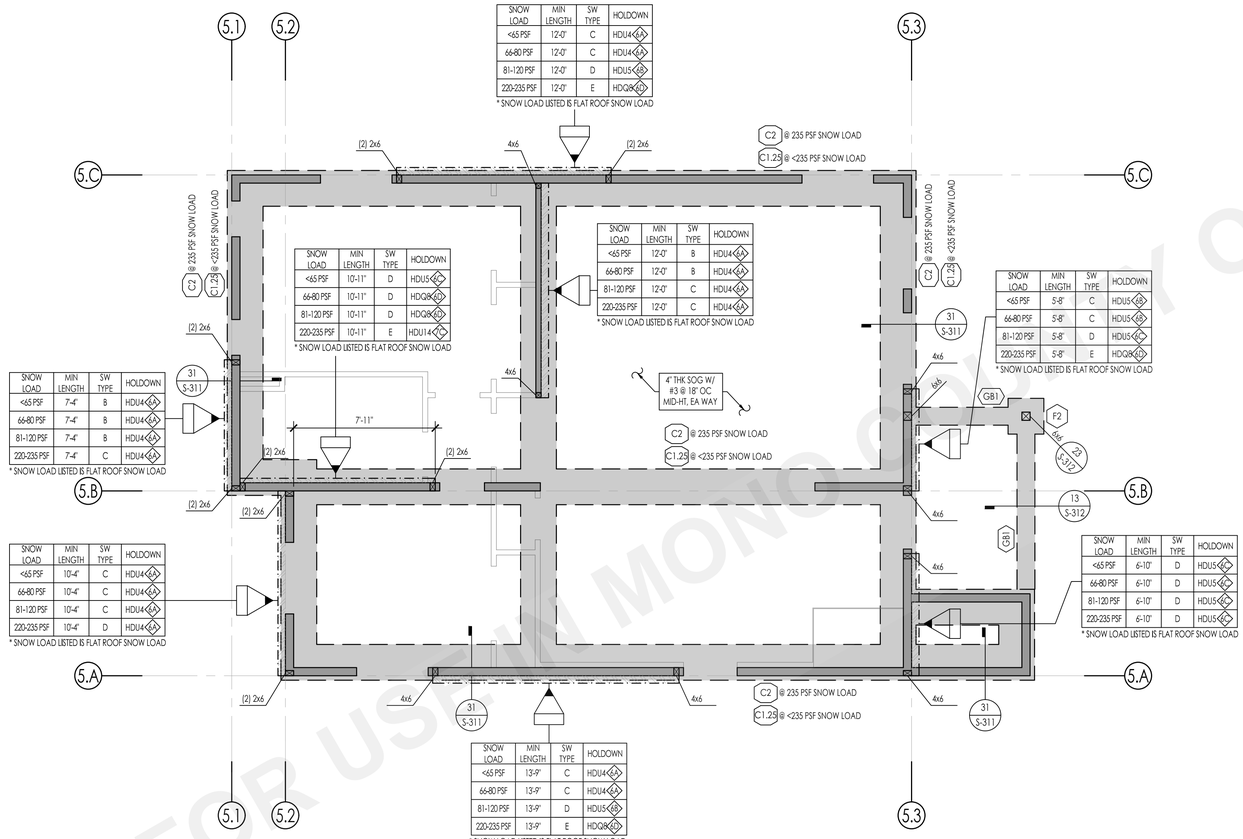
MONO COUNTY

FOUNDATION PLAN - HIGH DESERT - RAISED FLOOR

DATE
NOVEMBER 20, 2023

SHEET
S5-201A.2

N:\2200\2340-01-cu21-mono-cty-adu-design\structural\ConDocs\sheet-files\Plan 5\2340-01-CU21 - Plan5.dwg, PLAN 5 - S2-201A.2, Nov 20, 2023 5:13pm, alopez



SNOW LOAD	MIN LENGTH	SW TYPE	HOLDOWN
<65 PSF	12'-0"	C	HDU4 (4A)
66-80 PSF	12'-0"	C	HDU4 (4A)
81-120 PSF	12'-0"	D	HDU5 (5B)
220-235 PSF	12'-0"	E	HDQR (5D)

SNOW LOAD	MIN LENGTH	SW TYPE	HOLDOWN
<65 PSF	10'-11"	D	HDU5 (5B)
66-80 PSF	10'-11"	D	HDQR (5D)
81-120 PSF	10'-11"	D	HDQR (5D)
220-235 PSF	10'-11"	E	HDU14 (7A)

SNOW LOAD	MIN LENGTH	SW TYPE	HOLDOWN
<65 PSF	12'-0"	B	HDU4 (4A)
66-80 PSF	12'-0"	B	HDU4 (4A)
81-120 PSF	12'-0"	C	HDU4 (4A)
220-235 PSF	12'-0"	C	HDU4 (4A)

SNOW LOAD	MIN LENGTH	SW TYPE	HOLDOWN
<65 PSF	5'-8"	C	HDU5 (5B)
66-80 PSF	5'-8"	C	HDU5 (5B)
81-120 PSF	5'-8"	D	HDU5 (5B)
220-235 PSF	5'-8"	E	HDQR (5D)

SNOW LOAD	MIN LENGTH	SW TYPE	HOLDOWN
<65 PSF	7'-4"	B	HDU4 (4A)
66-80 PSF	7'-4"	B	HDU4 (4A)
81-120 PSF	7'-4"	B	HDU4 (4A)
220-235 PSF	7'-4"	C	HDU4 (4A)

SNOW LOAD	MIN LENGTH	SW TYPE	HOLDOWN
<65 PSF	6'-10"	D	HDU5 (5B)
66-80 PSF	6'-10"	D	HDU5 (5B)
81-120 PSF	6'-10"	D	HDU5 (5B)
220-235 PSF	6'-10"	D	HDU5 (5B)

SNOW LOAD	MIN LENGTH	SW TYPE	HOLDOWN
<65 PSF	10'-4"	C	HDU4 (4A)
66-80 PSF	10'-4"	C	HDU4 (4A)
81-120 PSF	10'-4"	C	HDU4 (4A)
220-235 PSF	10'-4"	D	HDU4 (4A)

SNOW LOAD	MIN LENGTH	SW TYPE	HOLDOWN
<65 PSF	13'-9"	C	HDU4 (4A)
66-80 PSF	13'-9"	C	HDU4 (4A)
81-120 PSF	13'-9"	D	HDU5 (5B)
220-235 PSF	13'-9"	E	HDQR (5D)

1 FOUNDATION PLAN - RURAL MOUNTAIN SLAB ON GRADE OPTION

SCALE: 1/4" = 1'-0"

NORTH

FOUNDATION PLAN NOTES

1. REFER TO THE FOLLOWING SHEETS FOR TYPICAL DETAILS:

DESCRIPTION	SHEET (S)
SYMBOLS AND ABBREVIATIONS	S-101
STRUCTURAL GENERAL NOTES	S-102 - S-103
TESTING AND INSPECTION	S-103
TYPICAL CONCRETE DETAILS	S-301
TYPICAL WOOD DETAILS	S-401 - S-404

2. SEE ARCHITECTURAL DRAWINGS FOR FINISHED FLOOR ELEVATIONS. REFERENCE FINISHED FLOOR ELEVATION = 0'-0" COORESPONDS TO FINISHED FLOOR ELEVATION.
3. ALL DIMENSIONS SHOWN ARE FROM FACE OF CONCRETE/MASONRY, FACE OF SHEATHING, OR CENTERLINE OF COLUMN. ALL COLUMNS ARE CENTERED IN STUD WALLS, UNO.
4. FOR ANY DIMENSIONAL INFORMATION NOT SHOWN, SEE ARCHITECTURAL DRAWINGS.
5. SEE ARCHITECTURAL DRAWINGS FOR ANY EMBEDDED ITEMS AND ALL EXTERIOR CONCRETE PAVE
6. SEE PLANS AND ARCHITECTURAL DRAWINGS FOR DEPRESSIONS AND/OR SLOPES IN CONCRETE SLABS.
7. SEE ARCHECTURAL DRAWINGS FOR SIZE AND LOCATION OF ALL DOOR AND WINDOW OPENINGS IN BEARING AND NON-BEARING WALLS.
8. SEE ARCHITECTURAL DRAWINGS FOR LOCATION OF INTERIOR NON-BEARING PARTITIONS.
9. SEE ARCHITECTURAL, PLUMBING, MECHANICAL AND ELECTRICAL DRAWINGS FOR ADDITIONAL EMBEDDED ITEMS AND SLAB PENETRATIONS.
10. FOR TYPICAL SLAB-ON-GRADE REQUIREMENTS, INCLUDING SLAB JOINTS, SEE DETAIL 31/S-301.
11. ALL POSTS IN 4" WALLS SHALL BE 4x4, UNLESS NOTED OTHERWISE
    ALL POSTS IN 6" WALLS SHALL BE 6x6, UNLESS NOTED OTHERWISE
12. PLATE WASHERS ARE REQUIRED FOR ALL SILL PLATE ANCHOR BOLTS. REFER TO 34/S-402 FOR PLATE WASHER REQUIREMENTS AT SHEAR WALLS.
13. ALL HOLDOWN ANCHOR NUTS SHALL BE TIGHTENED JUST PRIOR TO COVERING.
14. ALL BOLT HOLES IN WOOD MEMBERS, SHALL BE DRILLED A MAXIMUM OF 1/16" OVERSIZED. INSPECTOR TO VERIFY.
15. THE BUILDING PAD SHALL BE PREPARED AS OUTLINED IN DETAIL 53/S-301. THE BUILDING OFFICIAL SHALL REQUIRE PAD CERTIFICATION BY A GEOTECHNICAL ENGINEER AT THEIR DISCRETION.
16. BOTTOM OF FOOTING SHALL BE, UNLESS DEEPER FOUNDATIONS ARE REQUIRED BY THE BUILDING OFFICIAL:
    A. 18" BELOW PAD OR ADJACENT GRADE AT PERIMETER, WHICHEVER IS DEEPER, UNO.
    B. 18" BELOW PAD OR ADJACENT GRADE AT INTERIOR GRADE BEAMS, WHICHEVER IS DEEPER, UNO.
    NOTE: FOOTING MUST BE DEEPEND LOCALLY PER DETAIL 32/S-301 TO ACCOMMODATE ANCHOR BOLT HOLDOWN EMBED DEPTHS, OR FROST DEPTHS AS INDICATED BY THE BUILDING OFFICIAL.
17. DIAPHRAGM TYPE:
    ALL FLOOR DIAPHRAGMS SHALL BE TYPE D, UNO
    REFER TO 12/S-403
18. OWNER MAY SELECT EITHER SLAB ON GRADE FOUNDATION OR THE RAISED FLOOR FOUNDATION, TO SUIT THE SPECIFIC SITE.
19. WHERE RAISED FLOOR FOUNDATION IS SELECTED, OWNER HAS THE OPTION TO USE CRIPPLE STUD WALLS IN LIEU OF THE SPECIFIED CONCRETE STEM WALLS BELOW THE FLOOR FRAMING. CRIPPLE STUDS ARE TO MATCH TYPICAL WALL FRAMING, AND TO BE SHEATHED TO MATCH SHEARWALLS ABOVE. HOLDOWNS SPECIFIED SHALL BE INSTALLED ACROSS THE FLOOR FRAMING PER DETAIL 12/S-405 AND THEN INTO THE CONCRETE STEM WALL PER DETAILS 22/S-311 AND 24/S-311.
20. REFER TO ARCHITECTURAL DRAWINGS FOR SIZE AND LOCATION OF UNDERFLOOR ACCESS HOLE.
21. REFER TO ARCHITECTURAL DRAWINGS FOR UNDERFLOOR HEIGHT ALLOWANCE.
22. ALL SNOW LOADS LISTED ARE THE FLAT ROOF SNOW LOAD. TO FIND THE FLAT ROOF SNOW LOAD, FOLLOW THIS EQUATION: FLAT ROOF SNOW = 0.77 x GROUND SNOW LOAD.
23. LOCATION OF CRAWL SPACE ACCESS IS SPECIFIC TO SITE. REFER TO DETAIL 33/S-313 FOR OPENING AT CONC WALL FOOTING.

SYMBOL LEGEND

XX"-"X" / X — INDICATES SHEAR WALL TYPE AND LENGTH, SEE SCHEDULE ON 13/S-402

INDICATES CONCRETE WALL PER DETAIL 22/S-311

SCHEDULES

HOLDOWN SCHEDULE

SPECIFIES HOLDOWN/ STRAP DETAIL	INDICATES HOLDOWN/ STRAP TYPE	DETAIL
4X	INDICATES SIMPSON SSTB HOLDOWN TO: CONC FOUNDATION:	12/S-311
	CONC STEM WALL:	22/S-311
7X	INDICATES SIMPSON SB HOLDOWN TO: CONC FOUNDATION:	14/S-311
	CONC STEM WALL:	24/S-311

CONTINUOUS FOOTING SCHEDULE

MARK	WIDTH	MIN EMBED BELOW LOWEST PAD GRADE	LONG REINF	TRANS REINF	DETAIL
C1.25	1'-3"	SEE NOTE 16	(2) #5 T&B	#3 @ 12" OC, BOT	31/S-311
C2	2'-0"	SEE NOTE 16	(3) #5 T&B	#3 @ 12" OC, BOT	31/S-311

GRADE BEAM SCHEDULE

TYPE	WIDTH	THICKNESS	MIN EMBED BELOW LOWEST PAD GRADE	LONG REINF	TRANS REINF	DETAIL
GB1	1'-0"	1'-0"	SEE NOTE 16	(2) #4 @ TOP (2) #4 @ BOT	#3 @ 24" OC	13/S-312

T-FOOTING SCHEDULE

TYPE	WIDTH	THICKNESS	MIN EMBED BELOW LOWEST PAD GRADE	LONG REINF	TRANS REINF	DETAIL
T1.25	1'-3"	1'-0"	SEE NOTE 16	(2) #4 @ TOP (2) #4 @ BOT	#3 @ 24" OC	13/S-312
T2	2'-0"	1'-0"	SEE NOTE 16	(3) #4 @ TOP (3) #4 @ BOT	#3 @ 24" OC	13/S-312

PAD FOOTING SCHEDULE

TYPE	WIDTH	LENGTH	THICKNESS	MIN EMBED BELOW LOWEST PAD GRADE	TOP REINF	BOT REINF	DETAIL
F2	2'-0"	2'-0"	1'-6"	SEE NOTE 16	(3) #5, EW	(3) #5, EW	11/S-312
F3	3'-0"	3'-0"	1'-6"	SEE NOTE 16	(4) #5, EW	(4) #5, EW	11/S-312
F5	5'-0"	5'-0"	1'-6"	SEE NOTE 16	(6) #5, EW	(6) #5, EW	11/S-312

NOTE: FOOTING MUST BE DEEPENED LOCALLY PER DETAIL 32/S-301 TO ACCOMMODATE AB HOLDOWN EMBED DEPTHS

MONO COUNTY

THESE PLANS ARE PROVIDED BY MONO COUNTY AS PART OF THE PRE-APPROVED ADU PROGRAM AND ARE PUBLIC DOMAIN. THERE CANNOT BE A CHARGE TO PROVIDE THESE PLANS. NO ALTERATIONS TO THESE PLANS ARE ALLOWED. ALL ALTERATIONS MUST BE DONE UNDER A SEPARATE PERMIT ONCE THE BUILDING PERMIT FOR THE ADU HAS BEEN ISSUED AND FINAL INSPECTION COMPLETED. IF YOU DO NOT HAVE THE CONSTRUCTION KNOWLEDGE AND EXPERIENCE TO CONTRUCT THESE PLANS WITHOUT FURTHER DETAILS, IT IS RECOMMENDED YOU HIRE A CONTRACTOR TO DO THE CONSTRUCTION. THE CITY WILL NOT PROVIDE FURTHER INFORMATION OR DETAILS AND BUILDING INSPECTORS WILL NOT PROVIDE STEP BY STEP INSTRUCTIONS IN THE FIELD.

MONO COUNTY ADU PROTOTYPES

MONO COUNTY

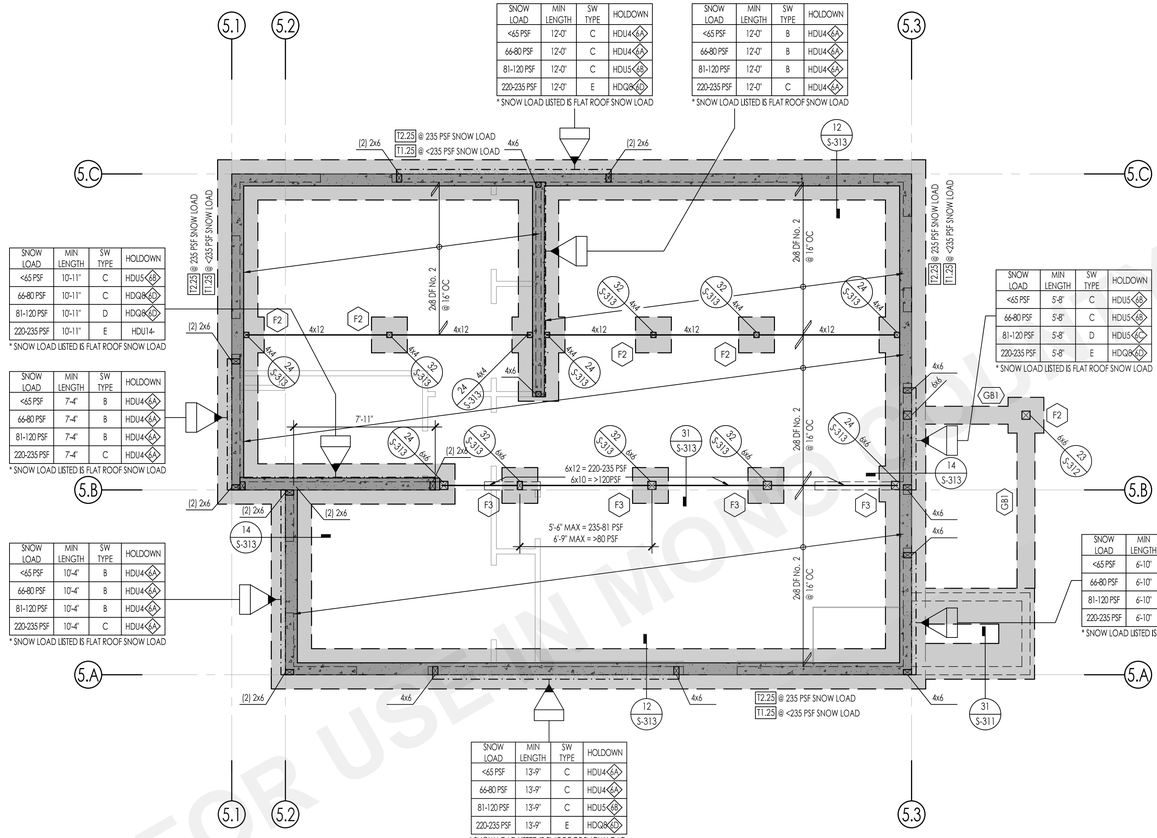
FOUNDATION PLAN - RURAL MOUNTAIN - SLAB ON GRADE

DATE

NOVEMBER 20, 2023

SHEET

S5-201B.1



SNOW LOAD	MIN LENGTH	SW TYPE	HOLDOWN
<65 PSF	12'-0"	C	HDU4 (4A)
66-80 PSF	12'-0"	C	HDU4 (4A)
81-120 PSF	12'-0"	C	HDU5 (5B)
220-235 PSF	12'-0"	E	HDQ8 (8D)

* SNOW LOAD LISTED IS FLAT ROOF SNOW LOAD

SNOW LOAD	MIN LENGTH	SW TYPE	HOLDOWN
<65 PSF	12'-0"	B	HDU4 (4A)
66-80 PSF	12'-0"	B	HDU4 (4A)
81-120 PSF	12'-0"	B	HDU4 (4A)
220-235 PSF	12'-0"	C	HDU4 (4A)

* SNOW LOAD LISTED IS FLAT ROOF SNOW LOAD

SNOW LOAD	MIN LENGTH	SW TYPE	HOLDOWN
<65 PSF	10'-11"	C	HDU5 (5B)
66-80 PSF	10'-11"	C	HDQ8 (8D)
81-120 PSF	10'-11"	D	HDQ8 (8D)
220-235 PSF	10'-11"	E	HDU14-

* SNOW LOAD LISTED IS FLAT ROOF SNOW LOAD

SNOW LOAD	MIN LENGTH	SW TYPE	HOLDOWN
<65 PSF	7'-4"	B	HDU4 (4A)
66-80 PSF	7'-4"	B	HDU4 (4A)
81-120 PSF	7'-4"	B	HDU4 (4A)
220-235 PSF	7'-4"	C	HDU4 (4A)

* SNOW LOAD LISTED IS FLAT ROOF SNOW LOAD

SNOW LOAD	MIN LENGTH	SW TYPE	HOLDOWN
<65 PSF	10'-4"	B	HDU4 (4A)
66-80 PSF	10'-4"	B	HDU4 (4A)
81-120 PSF	10'-4"	B	HDU4 (4A)
220-235 PSF	10'-4"	C	HDU4 (4A)

* SNOW LOAD LISTED IS FLAT ROOF SNOW LOAD

SNOW LOAD	MIN LENGTH	SW TYPE	HOLDOWN
<65 PSF	5'-8"	C	HDU5 (5B)
66-80 PSF	5'-8"	C	HDU5 (5B)
81-120 PSF	5'-8"	D	HDU5 (5B)
220-235 PSF	5'-8"	E	HDQ8 (8D)

* SNOW LOAD LISTED IS FLAT ROOF SNOW LOAD

SNOW LOAD	MIN LENGTH	SW TYPE	HOLDOWN
<65 PSF	6'-10"	B	HDU4 (4A)
66-80 PSF	6'-10"	B	HDU4 (4A)
81-120 PSF	6'-10"	B	HDU4 (4A)
220-235 PSF	6'-10"	C	HDU4 (4A)

* SNOW LOAD LISTED IS FLAT ROOF SNOW LOAD

SNOW LOAD	MIN LENGTH	SW TYPE	HOLDOWN
<65 PSF	13'-9"	C	HDU4 (4A)
66-80 PSF	13'-9"	C	HDU4 (4A)
81-120 PSF	13'-9"	C	HDU5 (5B)
220-235 PSF	13'-9"	E	HDQ8 (8D)

* SNOW LOAD LISTED IS FLAT ROOF SNOW LOAD

1 FOUNDATION PLAN - RURAL MOUNTAIN RAISED FLOOR OPTION

SCALE: 1/4" = 1'-0"

FOUNDATION PLAN NOTES

1. REFER TO THE FOLLOWING SHEETS FOR TYPICAL DETAILS:

DESCRIPTION	SHEET (S)
SYMBOLS AND ABBREVIATIONS	S-101
STRUCTURAL GENERAL NOTES	S-102 - S-103
TESTING AND INSPECTION	S-103
TYPICAL CONCRETE DETAILS	S-301
TYPICAL WOOD DETAILS	S-401 - S-404

2. SEE ARCHITECTURAL DRAWINGS FOR FINISHED FLOOR ELEVATIONS. REFERENCE FINISHED FLOOR ELEVATION = 0'-0" COORESPONDS TO FINISHED FLOOR ELEVATION.
3. ALL DIMENSIONS SHOWN ARE FROM FACE OF CONCRETE/MASONRY, FACE OF SHEATHING, OR CENTERLINE OF COLUMN. ALL COLUMNS ARE CENTERED IN STUD WALLS, UNO.
4. FOR ANY DIMENSIONAL INFORMATION NOT SHOWN, SEE ARCHITECTURAL DRAWINGS.
5. SEE ARCHITECTURAL DRAWINGS FOR ANY EMBEDDED ITEMS AND ALL EXTERIOR CONCRETE PAVE
6. SEE PLANS AND ARCHITECTURAL DRAWINGS FOR DEPRESSIONS AND/OR SLOPES IN CONCRETE SLABS.
7. SEE ARCHECTURAL DRAWINGS FOR SIZE AND LOCATION OF ALL DOOR AND WINDOW OPENINGS IN BEARING AND NON-BEARING WALLS.
8. SEE ARCHITECTURAL DRAWINGS FOR LOCATION OF INTERIOR NON-BEARING PARTITIONS.
9. SEE ARCHITECTURAL, PLUMBING, MECHANICAL AND ELECTRICAL DRAWINGS FOR ADDITIONAL EMBEDDED ITEMS AND SLAB PENETRATIONS.
10. FOR TYPICAL SLAB-ON-GRADE REQUIREMENTS, INCLUDING SLAB JOINTS, SEE DETAIL 31/S-301.
11. ALL POSTS IN 4" WALLS SHALL BE 4x4, UNLESS NOTED OTHERWISE
    ALL POSTS IN 6" WALLS SHALL BE 6x6, UNLESS NOTED OTHERWISE
12. PLATE WASHERS ARE REQUIRED FOR ALL SILL PLATE ANCHOR BOLTS. REFER TO 34/S-402 FOR PLATE WASHER REQUIREMENTS AT SHEAR WALLS.
13. ALL HOLDOWN ANCHOR NUTS SHALL BE TIGHTENED JUST PRIOR TO COVERING.
14. ALL BOLT HOLES IN WOOD MEMBERS, SHALL BE DRILLED A MAXIMUM OF 1/16" OVERSIZED. INSPECTOR TO VERIFY.
15. THE BUILDING PAD SHALL BE PREPARED AS OUTLINED IN DETAIL 53/S-301. THE BUILDING OFFICIAL SHALL REQUIRE PAD CERTIFICATION BY A GEOTECHNICAL ENGINEER AT THEIR DISCRETION.
16. BOTTOM OF FOOTING SHALL BE, UNLESS DEEPER FOUNDATIONS ARE REQUIRED BY THE BUILDING OFFICIAL:
    A. 18" BELOW PAD OR ADJACENT GRADE AT PERIMETER, WHICHEVER IS DEEPER, UNO.
    B. 18" BELOW PAD OR ADJACENT GRADE AT INTERIOR GRADE BEAMS, WHICHEVER IS DEEPER, UNO.
    NOTE: FOOTING MUST BE DEEPEND LOCALLY PER DETAIL 32/S-301 TO ACCOMMODATE ANCHOR BOLT HOLDOWN EMBED DEPTHS, OR FROST DEPTHS AS INDICATED BY THE BUILDING OFFICIAL.
17. DIAPHRAGM TYPE:
    ALL FLOOR DIAPHRAGMS SHALL BE TYPE D, UNO
    REFER TO 12/S-403
18. OWNER MAY SELECT EITHER SLAB ON GRADE FOUNDATION OR THE RAISED FLOOR FOUNDATION, TO SUIT THE SPECIFIC SITE.
19. WHERE RAISED FLOOR FOUNDATION IS SELECTED, OWNER HAS THE OPTION TO USE CRIPPLE STUD WALLS IN LIEU OF THE SPECIFIED CONCRETE STEM WALLS BELOW THE FLOOR FRAMING. CRIPPLE STUDS ARE TO MATCH TYPICAL WALL FRAMING, AND TO BE SHEATHED TO MATCH SHEARWALLS ABOVE. HOLDOWNS SPECIFIED SHALL BE INSTALLED ACROSS THE FLOOR FRAMING PER DETAIL 12/S-405 AND THEN INTO THE CONCRETE STEM WALL PER DETAILS 22/S-311 AND 24/S-311.
20. REFER TO ARCHITECTURAL DRAWINGS FOR SIZE AND LOCATION OF UNDERFLOOR ACCESS HOLE.
21. REFER TO ARCHITECTURAL DRAWINGS FOR UNDERFLOOR HEIGHT ALLOWANCE.
22. ALL SNOW LOADS LISTED ARE THE FLAT ROOF SNOW LOAD. TO FIND THE FLAT ROOF SNOW LOAD, FOLLOW THIS EQUATION: FLAT ROOF SNOW = 0.77 x GROUND SNOW LOAD.
23. LOCATION OF CRAWL SPACE ACCESS IS SPECIFIC TO SITE. REFER TO DETAIL 33/S-313 FOR OPENING AT CONC WALL FOOTING.

SYMBOL LEGEND

XX'-X" / X — INDICATES SHEAR WALL TYPE AND LENGTH, SEE SCHEDULE ON 13/S-402

INDICATES CONCRETE WALL PER DETAIL 22/S-311

SCHEDULES

HOLDOWN SCHEDULE

SPECIFIES HOLDOWN/ STRAP DETAIL	INDICATES HOLDOWN/ STRAP TYPE	DETAIL
4X	INDICATES SIMPSON SSTB HOLDOWN TO: CONC FOUNDATION:	12/S-311
	CONC STEM WALL:	22/S-311
7X	INDICATES SIMPSON SB HOLDOWN TO: CONC FOUNDATION:	14/S-311
	CONC STEM WALL:	24/S-311

CONTINUOUS FOOTING SCHEDULE

MARK	WIDTH	MIN EMBED BELOW LOWEST PAD GRADE	LONG REINF	TRANS REINF	DETAIL
C1.25	1'-3"	SEE NOTE 16	(2) #5 T&B	#3 @ 12" OC, BOT	31/S-311
C2	2'-0"	SEE NOTE 16	(3) #5 T&B	#3 @ 12" OC, BOT	31/S-311

GRADE BEAM SCHEDULE

TYPE	WIDTH	THICKNESS	MIN EMBED BELOW LOWEST PAD GRADE	LONG REINF	TRANS REINF	DETAIL
G81	1'-0"	1'-0"	SEE NOTE 16	(2) #4 @ TOP (2) #4 @ BOT	#3 @ 24" OC	13/S-312

T-FOOTING SCHEDULE

TYPE	WIDTH	THICKNESS	MIN EMBED BELOW LOWEST PAD GRADE	LONG REINF	TRANS REINF	DETAIL
T1.25	1'-3"	1'-0"	SEE NOTE 16	(2) #4 @ TOP (2) #4 @ BOT	#3 @ 24" OC	13/S-312
T2	2'-0"	1'-0"	SEE NOTE 16	(3) #4 @ TOP (3) #4 @ BOT	#3 @ 24" OC	13/S-312

PAD FOOTING SCHEDULE

TYPE	WIDTH	LENGTH	THICKNESS	MIN EMBED BELOW LOWEST PAD GRADE	TOP REINF	BOT REINF	DETAIL
F2	2'-0"	2'-0"	1'-6"	SEE NOTE 16	(3) #5, EW	(3) #5, EW	11/S-312
F3	3'-0"	3'-0"	1'-6"	SEE NOTE 16	(4) #5, EW	(4) #5, EW	11/S-312
F5	5'-0"	5'-0"	1'-6"	SEE NOTE 16	(6) #5, EW	(6) #5, EW	11/S-312

NOTE: FOOTING MUST BE DEEPENED LOCALLY PER DETAIL 32/S-301 TO ACCOMMODATE AB HOLDOWN EMBED DEPTHS

MONO COUNTY

THESE PLANS ARE PROVIDED BY MONO COUNTY AS PART OF THE PRE-APPROVED ADU PROGRAM AND ARE PUBLIC DOMAIN. THERE CANNOT BE A CHARGE TO PROVIDE THESE PLANS. NO ALTERATIONS TO THESE PLANS ARE ALLOWED. ALL ALTERATIONS MUST BE DONE UNDER A SEPARATE PERMIT ONCE THE BUILDING PERMIT FOR THE ADU HAS BEEN ISSUED AND FINAL INSPECTION COMPLETED. IF YOU DO NOT HAVE THE CONSTRUCTION KNOWLEDGE AND EXPERIENCE TO CONTRUCT THESE PLANS WITHOUT FURTHER DETAILS, IT IS RECOMMENDED YOU HIRE A CONTRACTOR TO DO THE CONSTRUCTION. THE CITY WILL NOT PROVIDE FURTHER INFORMATION OR DETAILS AND BUILDING INSPECTORS WILL NOT PROVIDE STEP BY STEP INSTRUCTIONS IN THE FIELD.

MONO COUNTY ADU PROTOTYPES

MONO COUNTY

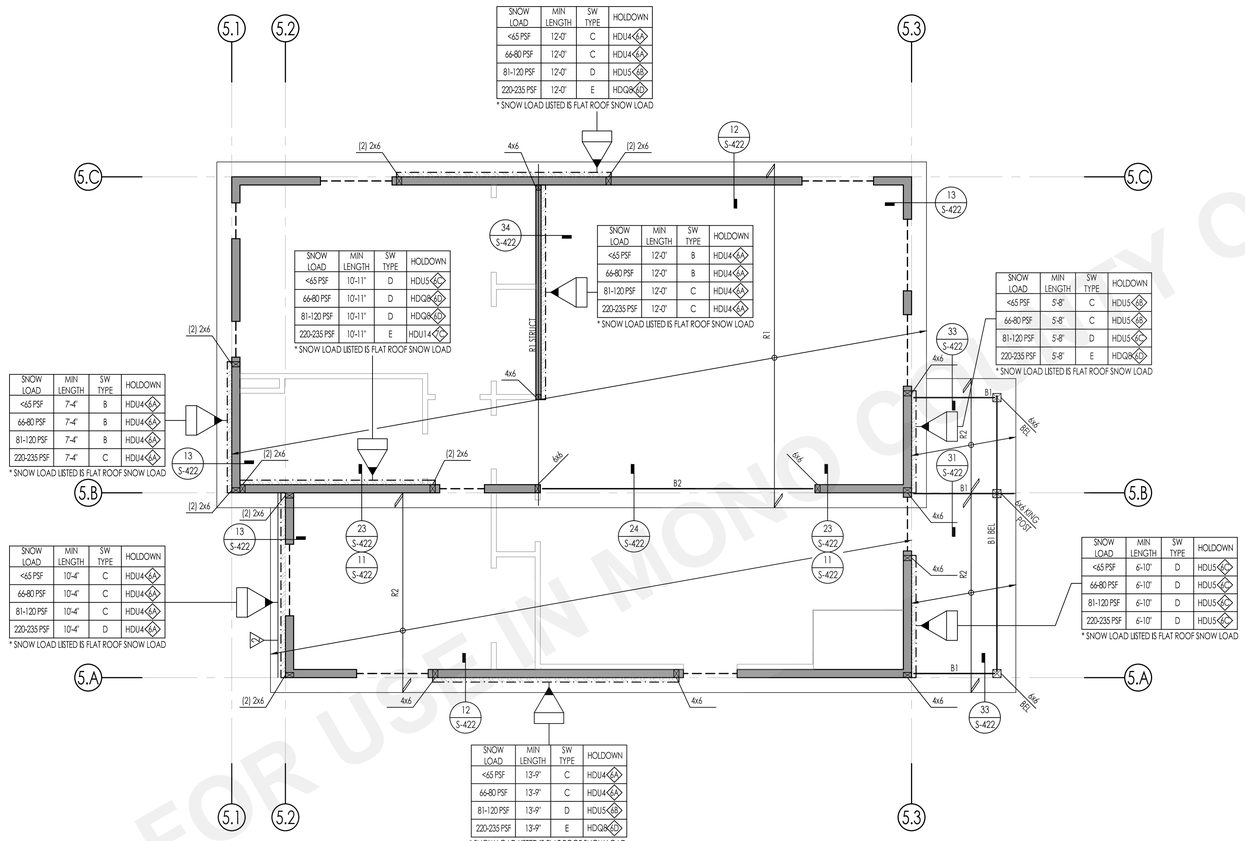
FOUNDATION PLAN - RURAL MOUNTAIN - RAISED FLOOR

DATE

NOVEMBER 20, 2023

SHEET

S5-201B.2



SNOW LOAD	MIN LENGTH	SW TYPE	HOLDOWN
<65 PSF	12'-0"	C	HDU4 (4A)
66-80 PSF	12'-0"	C	HDU4 (4A)
81-120 PSF	12'-0"	D	HDU5 (5B)
220-235 PSF	12'-0"	E	HDQ8 (8D)

* SNOW LOAD LISTED IS FLAT ROOF SNOW LOAD

SNOW LOAD	MIN LENGTH	SW TYPE	HOLDOWN
<65 PSF	10'-11"	D	HDU5 (5B)
66-80 PSF	10'-11"	D	HDQ8 (8D)
81-120 PSF	10'-11"	D	HDQ8 (8D)
220-235 PSF	10'-11"	E	HDU14 (14A)

* SNOW LOAD LISTED IS FLAT ROOF SNOW LOAD

SNOW LOAD	MIN LENGTH	SW TYPE	HOLDOWN
<65 PSF	12'-0"	B	HDU4 (4A)
66-80 PSF	12'-0"	B	HDU4 (4A)
81-120 PSF	12'-0"	C	HDU4 (4A)
220-235 PSF	12'-0"	C	HDU4 (4A)

* SNOW LOAD LISTED IS FLAT ROOF SNOW LOAD

SNOW LOAD	MIN LENGTH	SW TYPE	HOLDOWN
<65 PSF	5'-8"	C	HDU5 (5B)
66-80 PSF	5'-8"	C	HDU5 (5B)
81-120 PSF	5'-8"	D	HDU5 (5B)
220-235 PSF	5'-8"	E	HDQ8 (8D)

* SNOW LOAD LISTED IS FLAT ROOF SNOW LOAD

SNOW LOAD	MIN LENGTH	SW TYPE	HOLDOWN
<65 PSF	7'-4"	B	HDU4 (4A)
66-80 PSF	7'-4"	B	HDU4 (4A)
81-120 PSF	7'-4"	B	HDU4 (4A)
220-235 PSF	7'-4"	C	HDU4 (4A)

* SNOW LOAD LISTED IS FLAT ROOF SNOW LOAD

SNOW LOAD	MIN LENGTH	SW TYPE	HOLDOWN
<65 PSF	10'-4"	C	HDU4 (4A)
66-80 PSF	10'-4"	C	HDU4 (4A)
81-120 PSF	10'-4"	C	HDU4 (4A)
220-235 PSF	10'-4"	D	HDU4 (4A)

* SNOW LOAD LISTED IS FLAT ROOF SNOW LOAD

SNOW LOAD	MIN LENGTH	SW TYPE	HOLDOWN
<65 PSF	6'-10"	D	HDU5 (5B)
66-80 PSF	6'-10"	D	HDU5 (5B)
81-120 PSF	6'-10"	D	HDU5 (5B)
220-235 PSF	6'-10"	D	HDU5 (5B)

* SNOW LOAD LISTED IS FLAT ROOF SNOW LOAD

SNOW LOAD	MIN LENGTH	SW TYPE	HOLDOWN
<65 PSF	13'-9"	C	HDU4 (4A)
66-80 PSF	13'-9"	C	HDU4 (4A)
81-120 PSF	13'-9"	D	HDU5 (5B)
220-235 PSF	13'-9"	E	HDQ8 (8D)

* SNOW LOAD LISTED IS FLAT ROOF SNOW LOAD

1 ROOF PLAN - HIGH DESERT
SCALE: 1/4" = 1'-0"

NORTH

ROOF FRAMING PLAN NOTES

1. SEE ARCHITECTURAL DRAWINGS FOR ALL DIMENSIONS AND ELEVATIONS INCLUDING, BUT NOT LIMITED TO THE FOLLOWING, ALL DIMENSIONS TO BE VERIFIED PRIOR TO CONSTRUCTION:
   A. GRID DIMENSIONS AND HORIZONTAL CONTROL
   B. ALL DIMENSIONS, ELEVATIONS, FINISH SURFACE, SLOPES, DRAINS, SLAB DEPRESSIONS, ETC
   C. LOCATION AND EXTENT OF EXTERIOR WALL ASSEMBLIES AND OPENINGS
   D. ALL NON STRUCTURAL WALLS
2. REFER TO THE FOLLOWING SHEETS FOR TYPICAL DETAILS:

DESCRIPTION	SHEET (S)
SYMBOLS AND ABBREVIATIONS	S-101
STRUCTURAL GENERAL NOTES	S-102 - S-103
TESTING AND INSPECTION	S-103
TYPICAL CONCRETE DETAILS	S-301
TYPICAL WOOD DETAILS	S-401 - S-405

3. SEE ARCHITECTURAL DRAWINGS FOR ALL TOP OF SHEATHING AND TOP OF WALL ELEVATIONS.
4. SEE ARCHITECTURAL, PLUMBING, MECHANICAL AND ELECTRICAL DRAWINGS FOR SIZE AND LOCATION OF PIPES, DUCTS AND OTHER ROOF PENETRATIONS. FOR ROOF PENETRATIONS NOT SHOWN ON ROOF FRAMING PLAN, SEE DETAIL 23/S-403 FOR TYPICAL OPENINGS, UNO.
5. ALL POSTS IN 4" WALLS SHALL BE 4x4, UNLESS NOTED OTHERWISE.
   ALL POSTS IN 6" WALLS SHALL BE 6x6, UNLESS NOTED OTHERWISE.

   TYPICAL WALL FRAMING SHALL BE:
   2x6 @ 16" OC @ ALL EXTERIOR WALLS, UNO
   2x6 @ 16" OC @ ALL INTERIOR BEARING WALLS, UNO
   2x4 @ 16" @ ALL INTERIOR NON-BEARING WALLS, UNO
6. ALL INTERIOR WALLS NOT SHOWN ON THE STRUCTURAL FRAMING PLANS BUT SHOWN ON THE ARCHITECTURAL DRAWINGS SHALL BE CONSTRUCTED PER NON-BEARING PARTION WALL DETAIL 43/S-401, UNO.
7. DIAPHRAGM TYPES:
   < 65 PSF SNOW LOAD, ROOF DIAPHRAGM, TYPE A
   66-80 PSF SNOW LOAD, ROOF DIAPHRAGM, TYPE A
   81-120 PSF SNOW LOAD, ROOF DIAPHRAGM, TYPE B
   220-235 PSF SNOW LOAD, ROOF DIAPHRAGM, TYPE C
   REFER TO 12/-403
8. ALL LINES AND/OR MEMBERS INDICATED AS "STRUT" SHALL RECEIVE (2) ROWS OF BOUNDARY NAILING (BN), STGR.
9. TRUSS MEMBERS AND COMPONENTS SHALL NOT BE CUT, NOTCHED, DRILLED OR OTHERWISE ALTERED IN ANY WAY WITHOUT WRITTEN CONCURRENCE AND APPROVAL OF A REGISTERED DESIGN PROFESSIONAL.
10. ALTERATIONS RESULTING IN THE ADDTION OF LOADS TO ANY MEMBER (E.G. HVAC EQUIPMENT, WATER HEATER) SHALL NOT BE PERMITTED WITHOUT VERIFICATION THAT THE TRUSS IS CAPABLE OF SUPPORTING SUCH ADDITIONAL LOADING.
11. TRUSSES ARE TO BE DESIGNED FOR THE PROPER SITE SPECIFIC SNOW LOAD. TRUSS DRAWINGS SHALL BE SUBMITTED TO THE BUILDING DEPARTMENT FOR REVIEW AND APPROVAL PRIOR TO FABRICATION. FOR OTHER TRUSSES DESIGN CRITERIA REFER TO SHEET S-103 PREFABRICATED WOOD TRUSSES 1.B.a.
12. TRUSSES SHALL INCLUDED PROPER ICE DAMN LOADING AT EAVES, SLIDING SNOW AND SNOW DRIFTS PER ASCE 7-16 WHERE APPLICABLE BASED ON THE ROOF CONFIGURATION.
13. WHERE THE OWNER WOULD LIKE TO SUBSTITUTE TRUSSES IN PLACE OF SPECIFIED RAFTERS THAT IS STRUCTURALLY ACCEPTABLE. THESE TRUSSES SHALL BE INCLUDED IN THE SUBMITTAL TO THE BUILDING DEPARTMENT.
14. AL LUMBER EXPOSED TO THE ELEMENTS SHALL BE SELECT STRUCTURAL GRADE.
15. SHEARWALL CONSTRUCTION, HOLDOWNS, RAFTERS AND HEADERS SHALL BE SELECTED FROM THE TABLES BASED ON THE SNOW LOADING FOR THE SPECIFIC SITE.
16. SHEARWALL LENGTHS LISTED IN THE TABLES ABOVE ARE CONSIDERED THE MINIMUMS. THE SHEARWALL CAN BE PLACED ANYWHERE ALONG THE BUILDING LINE AS LONG AS IT IS NOT INTERRUPTED BY A DOORWAY OR WINDOW.
17. ALL SNOW LOADS LISTED ARE THE FLAT ROOF SNOW LOAD. TO FIND THE FLAT ROOF SNOW LOAD, FOLLOW THIS EQUATION: FLAT ROOF SNOW = 0.77 x GROUND SNOW LOAD.

SYMBOL LEGEND

- XX-"X" / X — INDICATES SHEAR WALL TYPE AND LENGTH, SEE SCHEDULE ON 13/S-402
- * — INDICATES BLOCKING & STRAPPING ABOVE & BELOW WINDOW OPENINGS PER DETAIL 44/S-402
- INDICATES HEADER @ OPENING. REFER TO 32/S-401 FOR HEADER SIZE, UNO ON PLANS
- (X) — INDICATES TOP PLATE SPLICE NAILING PER 33/S-403 NOTE THAT NAILING APPLIES TO ENTIRE LENGTH OF TOP PLATE. PROVIDE TYPE (C) SPLICE, UNO
- INDICATES CONT BLK & STRAP PER 24/S-405 @ ROOF, UNO
- INDICATES STRAP PER 34/S-405, UNO
- DSC# — INDICATES DRAG TRUSS CONNECTOR PER 31/S-405, UNO

SCHEDULES

HOLDOWN SCHEDULE

SPECIFIES HOLDOWN/ STRAP DETAIL	INDICATES HOLDOWN/ STRAP TYPE	DETAIL
(6A)	INDICATES SIMPSON SSTB HOLDOWN TO: CONC FOUNDATION:	12/S-311
	CONC STEM WALL:	22/S-311
(7A)	INDICATES SIMPSON SB HOLDOWN TO: CONC FOUNDATION:	14/S-311
	CONC STEM WALL:	24/S-311

ROOF RAFTER SCHEDULE

MARK	SNOW LOAD	SIZE	REMARKS
R1	<65 PSF	(2) 2x12 @ 16" OC	
	66-80 PSF	(2) 2x12 @ 12" OC	
	81-120 PSF	(2) 2x14 @ 12" OC	
	220-235 PSF	(2) 1 3/4" x 14" LVL @ 16" OC	
R2	<65 PSF	2x10 @ 16" OC	
	66-80 PSF	2x10 @ 16" OC	
	81-120 PSF	2x12 @ 16" OC	
	220-235 PSF	(2) 2x12 @ 16" OC	

BEAM SCHEDULE

MARK	SNOW LOAD	SIZE	REMARKS
B1	<120 PSF	6x10	
	121-235 PSF	6x14	
B2	<80 PSF	5.5x16 GLB	
	81-120 PSF	5.5x19.5 GLB	
	121-235 PSF	5.5x25.5 GLB	

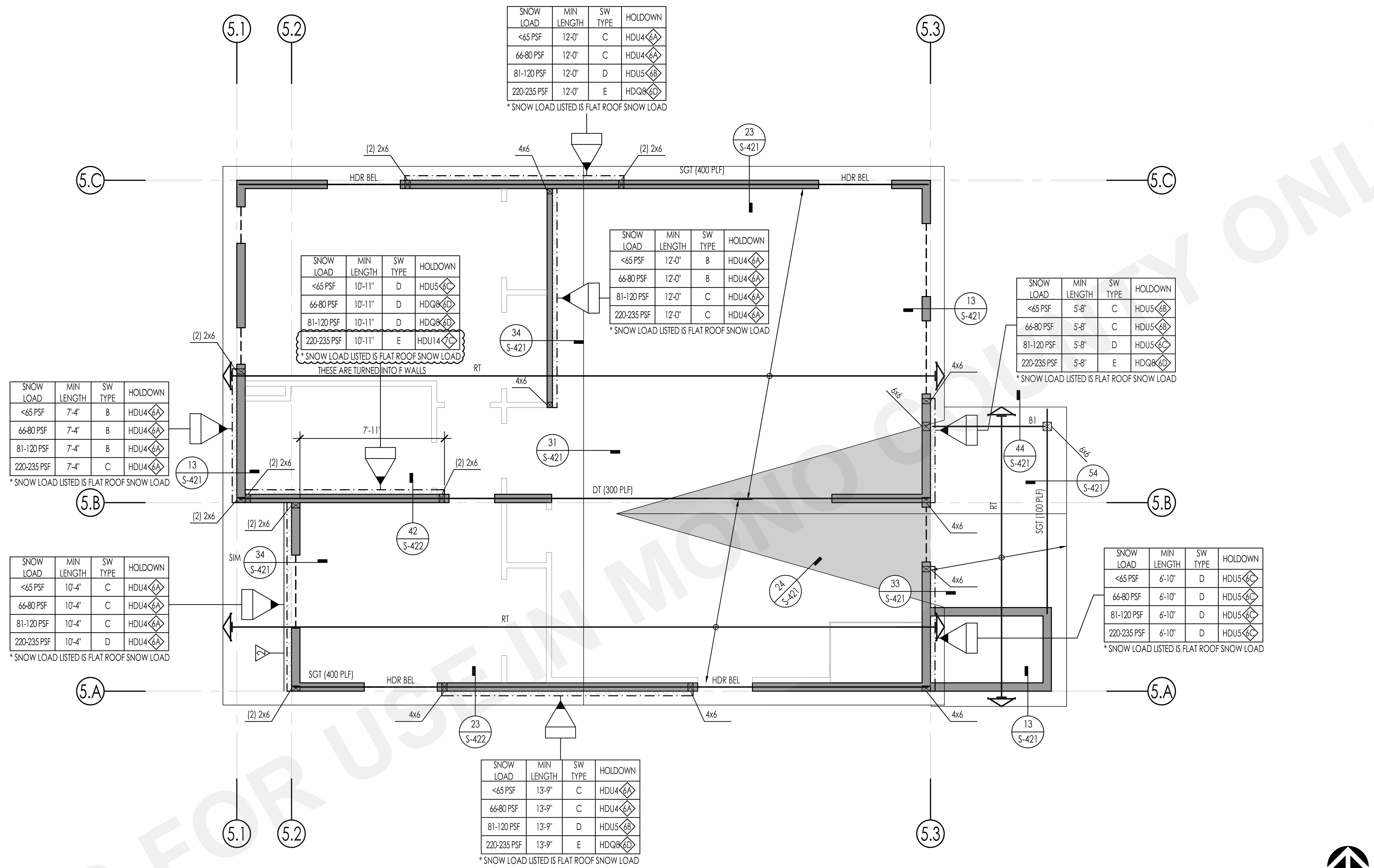
MONO COUNTY

THESE PLANS ARE PROVIDED BY MONO COUNTY AS PART OF THE PRE-APPROVED ADU PROGRAM AND ARE PUBLIC DOMAIN. THERE CANNOT BE A CHARGE TO PROVIDE THESE PLANS. NO ALTERATIONS TO THESE PLANS ARE ALLOWED. ALL ALTERATIONS MUST BE DONE UNDER A SEPARATE PERMIT ONCE THE BUILDING PERMIT FOR THE ADU HAS BEEN ISSUED AND FINAL INSPECTION COMPLETED. IF YOU DO NOT HAVE THE CONSTRUCTION KNOWLEDGE AND EXPERIENCE TO CONTRUCT THESE PLANS WITHOUT FURTHER DETAILS, IT IS RECOMMENDED YOU HIRE A CONTRACTOR TO DO THE CONSTRUCTION. THE CITY WILL NOT PROVIDE FURTHER INFORMATION OR DETAILS AND BUILDING INSPECTORS WILL NOT PROVIDE STEP BY STEP INSTRUCTIONS IN THE FIELD.

MONO COUNTY ADU PROTOTYPES
MONO COUNTY
ROOF PLAN - HIGH DESERT

DATE
NOVEMBER 20, 2023

SHEET
S5-202A



1 ROOF FRAMING PLAN - RURAL MOUNTAIN
SCALE: 1/4" = 1'-0"

ROOF FRAMING PLAN NOTES

1. SEE ARCHITECTURAL DRAWINGS FOR ALL DIMENSIONS AND ELEVATIONS INCLUDING, BUT NOT LIMITED TO THE FOLLOWING, ALL DIMENSIONS TO BE VERIFIED PRIOR TO CONSTRUCTION:
   A. GRID DIMENSIONS AND HORIZONTAL CONTROL
   B. ALL DIMENSIONS, ELEVATIONS, FINISH SURFACE, SLOPES, DRAINS, SLAB DEPRESSIONS, ETC
   C. LOCATION AND EXTENT OF EXTERIOR WALL ASSEMBLIES AND OPENINGS
   D. ALL NON STRUCTURAL WALLS
2. REFER TO THE FOLLOWING SHEETS FOR TYPICAL DETAILS:

DESCRIPTION	SHEET (S)
SYMBOLS AND ABBREVIATIONS	S-101
STRUCTURAL GENERAL NOTES	S-102 - S-103
TESTING AND INSPECTION	S-103
TYPICAL CONCRETE DETAILS	S-301
TYPICAL WOOD DETAILS	S-401 - S-404

3. SEE ARCHITECTURAL DRAWINGS FOR ALL TOP OF SHEATHING AND TOP OF WALL ELEVATIONS.
4. SEE ARCHITECTURAL, PLUMBING, MECHANICAL AND ELECTRICAL DRAWINGS FOR SIZE AND LOCATION OF PIPES, DUCTS AND OTHER ROOF PENETRATIONS. FOR ROOF PENETRATIONS NOT SHOWN ON ROOF FRAMING PLAN, SEE DETAIL 23/S-403 FOR TYPICAL OPENINGS, UNO.
5. ALL POSTS IN 4" WALLS SHALL BE 4x4, UNLESS NOTED OTHERWISE.
   ALL POSTS IN 6" WALLS SHALL BE 6x6, UNLESS NOTED OTHERWISE.

   TYPICAL WALL FRAMING SHALL BE:
   2x6 @ 16" OC @ ALL EXTERIOR WALLS, UNO
   2x6 @ 16" OC @ ALL INTERIOR BEARING WALLS, UNO
   2x4 @ 16" @ ALL INTERIOR NON-BEARING WALLS, UNO
6. ALL INTERIOR WALLS NOT SHOWN ON THE STRUCTURAL FRAMING PLANS BUT SHOWN ON THE ARCHIECTURAL DRAWINGS SHALL BE CONSTRUCTED PER NON-BEARING PARTION WALL DETAIL 43/S-401, UNO.
7. DIAPHRAGM TYPES:
   < 65 PSF SNOW LOAD, ROOF DIAPHRAGM, TYPE A
   66-80 PSF SNOW LOAD, ROOF DIAPHRAGM, TYPE A
   81-120 PSF SNOW LOAD, ROOF DIAPHRAGM, TYPE B
   220-235 PSF SNOW LOAD, ROOF DIAPHRAGM, TYPE C
   REFER TO 12/-403
8. ALL LINES AND/OR MEMBERS INDICATED AS "STRUT" SHALL RECEIVE (2) ROWS OF BOUNDARY NAILING (BN), STGR.
9. TRUSS MEMBERS AND COMPONENTS SHALL NOT BE CUT, NOTCHED, DRILLED OR OTHERWISE ALTERED IN ANY WAY WTHOUT WRITTEN CONCURRENCE AND APPROVAL OF A REGISTERED DESIGN PROFESSIONAL.
10. ALTERATIONS RESULTING IN THE ADDTION OF LOADS TO ANY MEMBER (E.G. HVAC EQUIPMENT, WATER HEATER) SHALL NOT BE PERMITTED WITHOUT VERIFICATION THAT THE TRUSS IS CAPABLE OF SUPPORTING SUCH ADDITIONAL LOADING.
11. TRUSSES ARE TO BE DESIGNED FOR THE PROPER SITE SPECIFIC SNOW LOAD. TRUSS DRAWINGS SHALL BE SUBMITTED TO THE BUILDING DEPARTMENT FOR REVIEW AND APPROVAL PRIOR TO FABRICATION. FOR OTHER TRUSSES DESIGN CRITERIA REFER TO SHEET S-103 PRE-FABRICATED WOOD TRUSSES 1.B.a.
12. TRUSSES SHALL INCLUDED PROPER ICE DAMN LOADING AT EAVES, SLIDING SNOW AND SNOW DRIFTS PER ASCE 7-16 WHERE APPLICABLE BASED ON THE ROOF CONFIGURATION.
13. WHERE THE OWNER WOULD LIKE TO SUBSTITUTE TRUSSES IN PLACE OF SPECIFIED RAFTERS THAT IS STRUCTURALLY ACCEPTABLE. THESE TRUSSES SHALL BE INCLUDED IN THE SUBMITTAL TO THE BUILDING DEPARTMENT.
14. AL LUMBER EXPOSED TO THE ELEMENTS SHALL BE SELECT STRUCTURAL GRADE.
15. SHEARWALL CONSTRUCTION, HOLDOWNS, RAFTERS AND HEADERS SHALL BE SELECTED FROM THE TABLES BASED ON THE SNOW LOADING FOR THE SPECIFIC SITE.
16. SHEARWALL LENGTHS LISTED IN THE TABLES ABOVE ARE CONSIDERED THE MINIMUMS. THE SHEARWALL CAN BE PLACED ANYWHERE ALONG THE BUILDING LINE AS LONG AS IT IS NOT INTERRUPTED BY A DOORWAY OR WINDOW.
17. ALL SNOW LOADS LISTED ARE THE FLAT ROOF SNOW LOAD. TO FIND THE FLAT ROOF SNOW LOAD, FOLLOW THIS EQUATION: FLAT ROOF SNOW = 0.77 x GROUND SNOW LOAD.

SYMBOL LEGEND

Symbol	Description
XX'-X" / X	INDICATES SHEAR WALL TYPE AND LENGTH, SEE SCHEDULE ON 13/S-402
*	INDICATES BLOCKING & STRAPPING ABOVE & BELOW WINDOW OPENINGS PER DETAIL 44/S-402
— — — —	INDICATES HEADER @ OPENING. REFER TO 32/S-401 FOR HEADER SIZE, UNO ON PLANS
X	INDICATES TOP PLATE SPLICE NAILING PER 33/S-403 NOTE THAT NAILING APPLIES TO ENTIRE LENGTH OF TOP PLATE. PROVIDE TYPE (C) SPLICE, UNO
	INDICATES CONT BLK & STRAP PER 24/S-405 @ ROOF, UNO
	INDICATES STRAP PER 34/S-405, UNO
DSC#	INDICATES DRAG TRUSS CONNECTOR PER 31/S-405, UNO

SCHEDULES

HOLDOWN SCHEDULE		
SPECIFIES HOLDOWN/ STRAP DETAIL → 1x ← INDICATES HOLDOWN/ STRAP TYPE		DETAIL
6x	INDICATES SIMPSON SSTB HOLDOWN TO: CONC FOUNDATION: CONC STEM WALL:	12/S-311 22/S-311
7x	INDICATES SIMPSON SB HOLDOWN TO: CONC FOUNDATION: CONC STEM WALL:	14/S-311 24/S-311

PREFABRICATED ROOF TRUSS

1. FOR PREFABRICATED ROOF TRUSS NOTES SEE NOTES ON SHEET S-103

ROOF TRUSS SCHEDULE		
MARK	DESCRIPTION	REMARKS
RT	ROOF TRUSS (COMMON)	24" OC MAX
SGT	STRUCTURAL GABLE TRUSS	
SCT	SCISSOR TRUSS	
MT	MONO PITCH TRUSS	24" OC MAX
JT	JACK TRUSS	24" OC MAX
VJT	VALLEY JACK TRUSS	24" OC MAX
CJT	CORNER JACK TRUSS	
GT	GIRDER TRUSS	
MGT	MONO PITCH GIRDER TRUSS	
DT (#*)	DRAG TRUSS	
CGT	CALIFORNIA GIRDER TRUSS	
HR	HIP RAFTER / JACK RAFTER	
CHT	CALIFORNIA HIP TRUSS	24" OC MAX

(#*) - EQUALS DRAG FORCE IN LBS, DRAG FORCE IS AT A FACTORED LEVEL (0.7E) DRAG FORCES CALCULATED IN ACCORDANCE WITH ASCE 7-16 12.10.1.1. IN STRUCTURES ENTIRELY BRACED BY LIGHT FRAME SHEAR WALLS, OR PORTIONS THEREOF, DRAG MEMBERS SHALL BE DESIGNED TO RESIST FORCES USING THE LOAD COMBINATIONS OF ASCE 7-16 SECTION 12.4.2.3 IN ALL OTHER STRUCTURES DRAGS SHALL INCLUDE THE EFFECT OF OVER STRENGTH PER ASCE 7-16 12.4.3.2

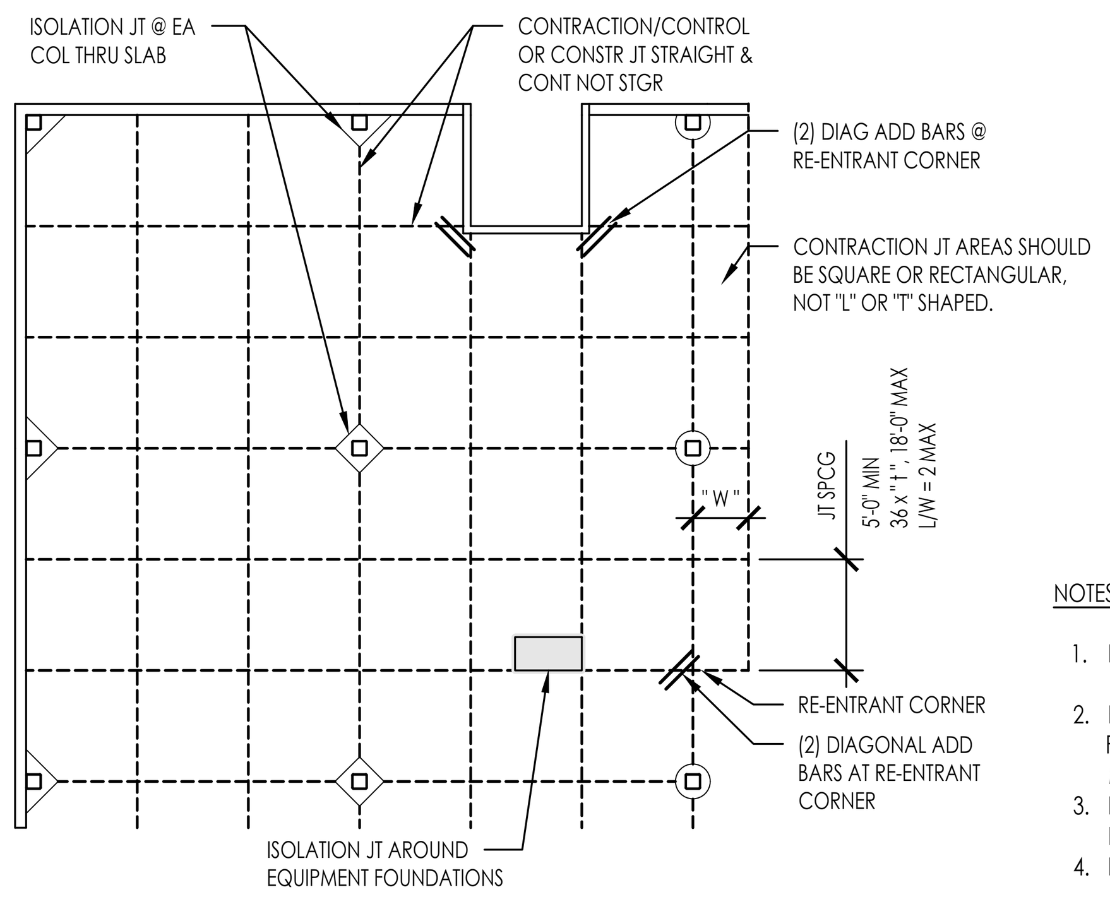
MONO COUNTY

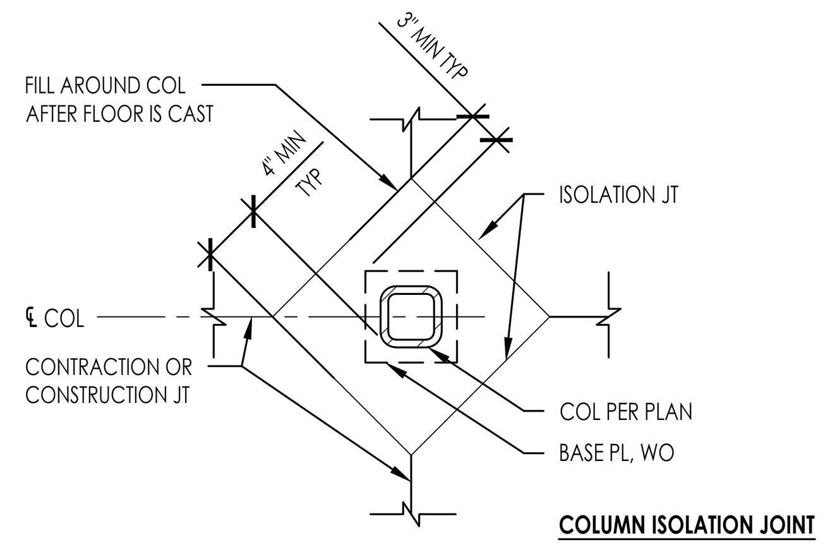
MONO COUNTY ADU PROTOTYPES
MONO COUNTY

ROOF PLAN - RURAL MOUNTAIN

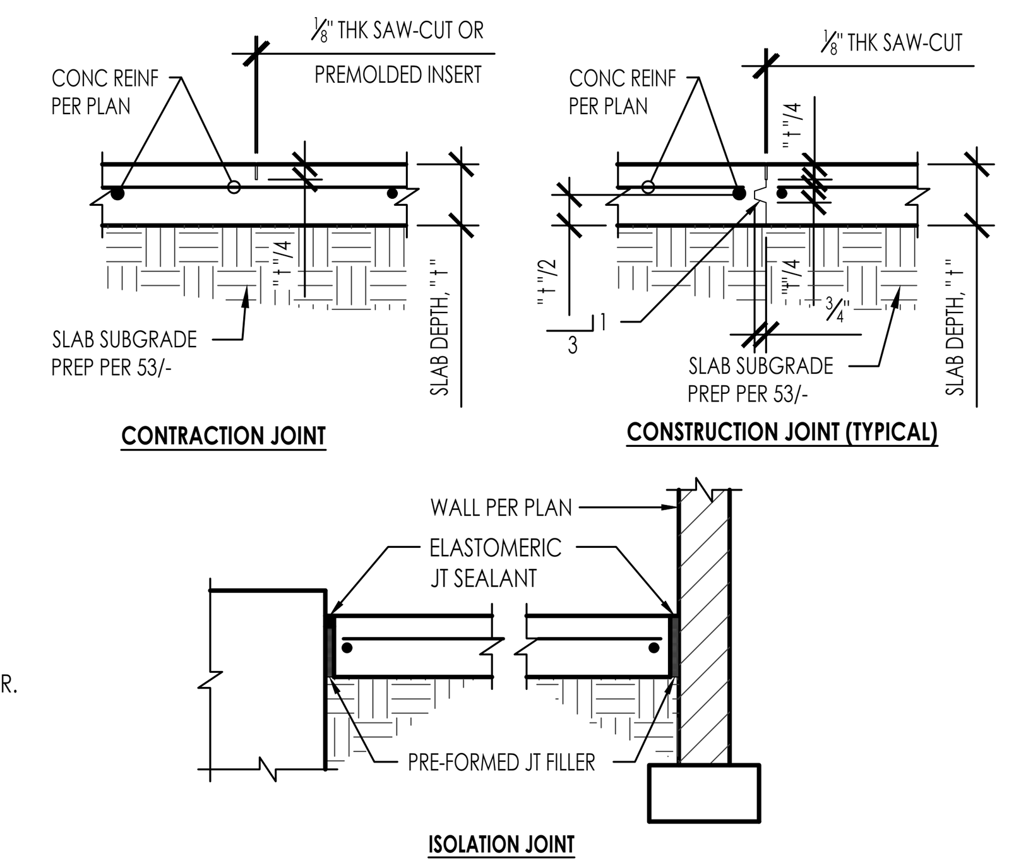
DATE
NOVEMBER 20, 2023

SHEET
S5-202B





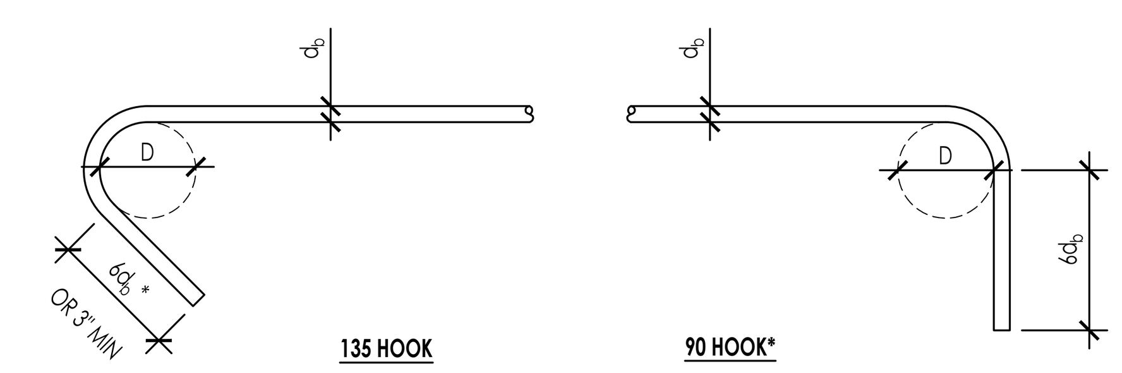
COLUMN ISOLATION JOINT



NOTES:

1. IF SAW CUT CONTRACTION OR CONTROL JOINT IS USED, SAW-CUT WITHIN 24 HOURS. EARLY ENTRY SAWS MAY BE USED WITHIN 1-4 HOURS OF POUR, AND CONVENTIONAL SAWS 4-12 HOURS OF POUR DEPENDING ON WEATHER.
2. FILL CONTRACTION JOINT WITH AN ELASTOMERIC JOINT COMPOUND RATED FOR ITS USE. FOR INDUSTRIAL FLOORS SUBJECTED TO HARD WHEELED TRAFFIC, USE SEALANTS RATED FOR SUCH APPLICATIONS BY THE MANUFACTURER.
3. DOWELS IN INDUSTRIAL FLOOR APPLICATIONS SHOULD BE SMOOTH ALIGNED, AND SUPPORTED SO THEY WILL REMAIN PARALLEL IN BOTH HORIZONTAL AND VERTICAL PLANES DURING PLACING AND FINISHING.
4. IN STEEL AND/OR CONC. BUILDINGS DO NOT POUR DIAMOND UNTIL STRUCTURAL STEEL AND CONCRETE ABOVE HAS BEEN INSTALLED.

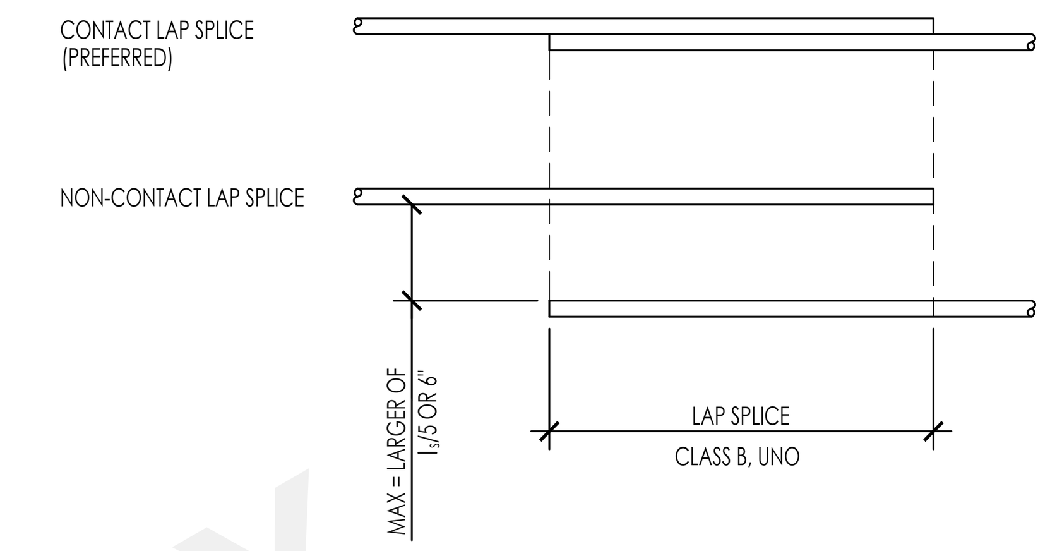
SLAB ON GRADE JOINTS
2340-01-CU21 - S301 - 31 NTS 31



BAR SIZE	D
#3	1½"
#4	2"
#5	2½"

* PROVIDE $10d_b$ EXTENSIONS IN LIEU OF $6d_b$ AT ALL FRAME COLUMNS, GIRDERS, SHEAR WALLS AND SHEAR WALL BOUNDARY MEMBERS

REINF TIES AND STIRRUPS
2340-01-CU21 - S301 - 21 NTS 21



REINFORCING TENSION DEVELOPMENT LENGTH AND LAP SPLICE SCHEDULE

BAR SIZE	DEVELOPMENT LENGTH, l_d (CLASS A LAP SPLICE) f'c (psi) 2,500	3,000	4,000	LAP SPLICE, l_s (CLASS B LAP SPLICE) f'c (psi) 2,500	3,000	4,000
#3	1'-6"	1'-5"	1'-3"	2'-0"	1'-10"	1'-7"
#4	2'-0"	1'-10"	1'-7"	2'-8"	2'-5"	2'-1"
#5	2'-6"	2'-4"	2'-0"	3'-3"	3'-0"	2'-7"
#6	3'-0"	2'-9"	2'-5"	3'-11"	3'-7"	3'-2"
#7	4'-5"	4'-0"	3'-6"	5'-9"	5'-2"	4'-6"
#8	5'-0"	4'-7"	4'-0"	6'-6"	5'-11"	5'-2"
#9	5'-8"	5'-2"	4'-6"	7'-4"	6'-9"	5'-10"
#10	6'-5"	5'-10"	5'-1"	8'-3"	7'-7"	6'-7"
#11	7'-1"	6'-6"	5'-7"	9'-2"	8'-5"	7'-3"

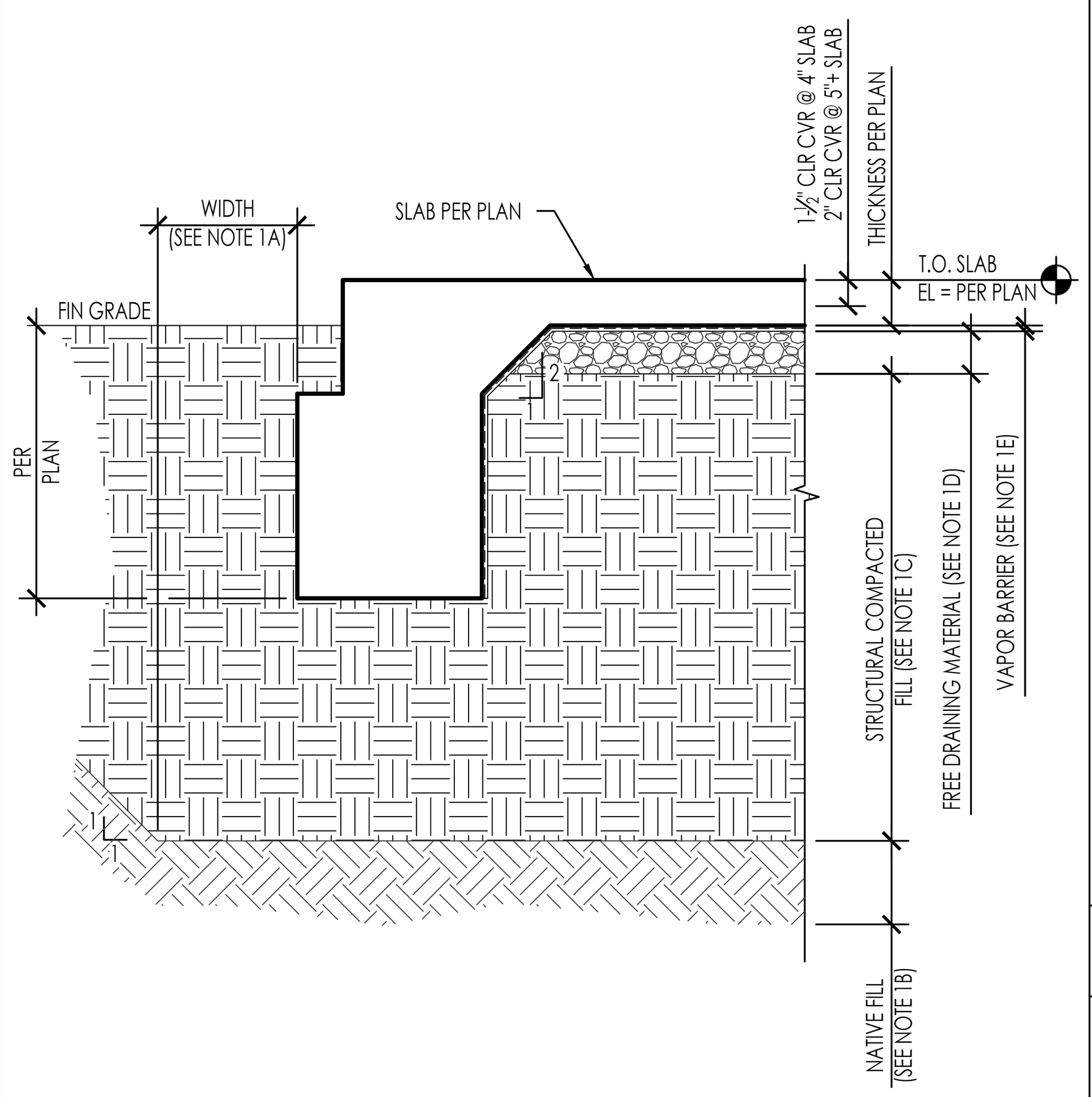
NOTES:

1. VALUES ABOVE ARE FOR REINFORCEMENT WITH THE FOLLOWING PARAMETERS:
   A. GRADE 60 REINFORCEMENT
   B. NORMAL WEIGHT CONCRETE
      a. FOR LIGHTWEIGHT CONCRETE MULTIPLY THE VALUES ABOVE BY 1.3
   C. NON-EPOXY COATED REINFORCEMENT
   D. HORIZONTAL BARS WITHOUT 12" OF CONCRETE BELOW (BOTTOM BARS), AND VERTICAL BARS
      a. FOR TOP BARS WITH 12" OR MORE OF CONCRETE BELOW THE BAR MULTIPLY THE VALUES ABOVE BY 1.3
   E. CLEAR SPACING NOT LESS THAN d_b, CLEAR COVER NOT LESS THAN d_b AND STIRRUPS THROUGH L_d NOT LESS THAN MIN

      OR

      CLEAR SPACING NO LESS THAN $2d_b$ AND CLEAR COVER NOT LESS THAN db
      a. FOR OTHER SPACING AND COVER CONDITIONS MULTIPLY THE VALUES ABOVE BY 1.5
   F. REINFORCEMENT NOT IN SHEAR WALLS
      a. FOR REINFORCEMENT IN SHEAR WALLS MULTIPLY THE VALUES ABOVE BY 1.25
2. THE MULTIPLIERS LISTED IN NOTE 1 ABOVE ARE CUMULATIVE INCREASES IN DEVELOPMENT/LAP SPLICE LENGTH.
3. ALL LAP SPLICES REFERENCED IN THE PLANS SHALL BE CLASS B UNLESS NOTED OTHERWISE.
4. WHEN REINFORCING BARS OF TWO SIZES ARE LAP-SPLICED IN TENSION, USE THE LARGER OF THE TENSION CLASS B, LAP SPLICE LENGTH (l_s) OF THE SMALLER BAR, AND THE CLASS A, TENSION DEVELOPMENT LENGTH (l_d) OF THE LARGER BAR.

REINF DEVELOPMENT LENGTH AND SPLICES
2340-01-CU21 - S301 - 12 NTS 12

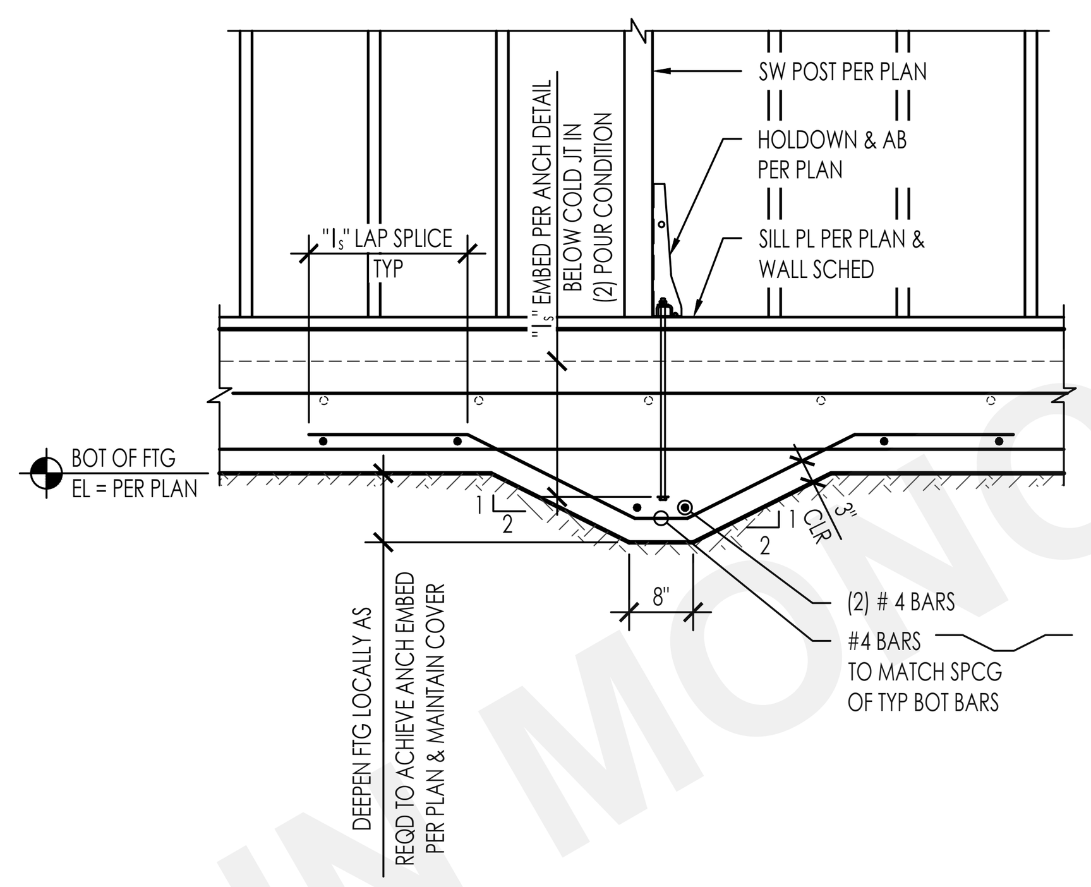


NOTES:

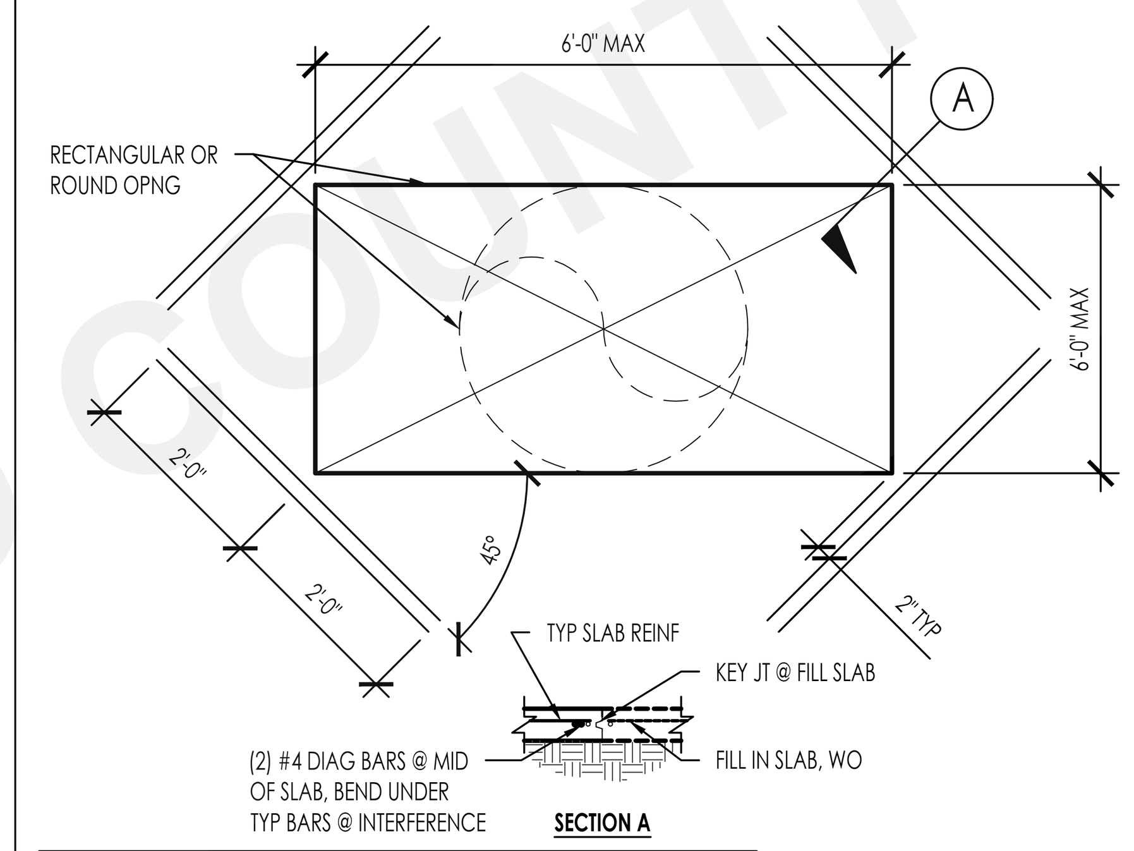
1. PREPARATION OF THE SLAB SUBGRADE SHALL BE BASED ON THE FOLLOWING.
   A. OVER-EXCAVATION SHALL EXTEND 5 FEET BEYOND PERIMETER FOUNDATION, TO PROPERTY LINES OR EXISTING IMPROVEMENTS, WHICHEVER IS LEAST.
   B. NATIVE MATERIALS
      a. SHALL BE OVER-EXCAVATED 30" BELOW (E) GRADE OR 12" BELOW BOTTOM OF FOOTINGS, TO COMPETENT MATERIAL, OR TO ½ THE DEPTH OF THE DEEPEST FILL (MEASURED FROM THE BOTTOM OF THE DEEPEST FOOTING); WHICHEVER IS GREATEST.
      b. THE EXPOSED SURFACE SHALL BE SCARIFIED TO A DEPTH OF 6", MOISTURE CONDITIONED AND COMPACTED TO A MINIMUM RELATIVE DENSITY OF 90 PERCENT (ASTM D1557)
   C. ENGINEERED COMPACTED FILL
      a. ANY IMPORT MATERIAL SHALL BE NON-EXPANSIVE MATERIAL.
      b. STRUCTURAL FILL SHALL BE PLACED IN HORIZONTAL LAYERS, EACH APPROXIMATELY 8" THICK BEFORE COMPACTION, AND COMPACTED TO A MINIMUM RELATIVE DENSITY OF 90 PERCENT (ASTM D1557)
   D. 4" THICK, CLEAN FREE-DRAINING MATERIAL SUCH AS ½" COARSE AGGREGATE
   E. REFER TO ARCH DRAWINGS FOR VAPOR BARRIER. INSTALL PER MANUFACTURER'S RECOMMENDATIONS FOR SEALING OF PENETRATIONS, JOINTS AND EDGES.
      a. VAPOR BARRIER IS NOT TO BE PUNCTURED DURING CONSTRUCTION OF SLAB ON GRADE.
   F. 2" THICK OPTIONAL SAND LAYER, SHALL BE LIGHTLY MOISTENED PRIOR TO PLACING CONCRETE.

SLAB ON GRADE EDGE AND SUBGRADE PREP
2340-01-CU21 - S301 - 53 NTS 53

42



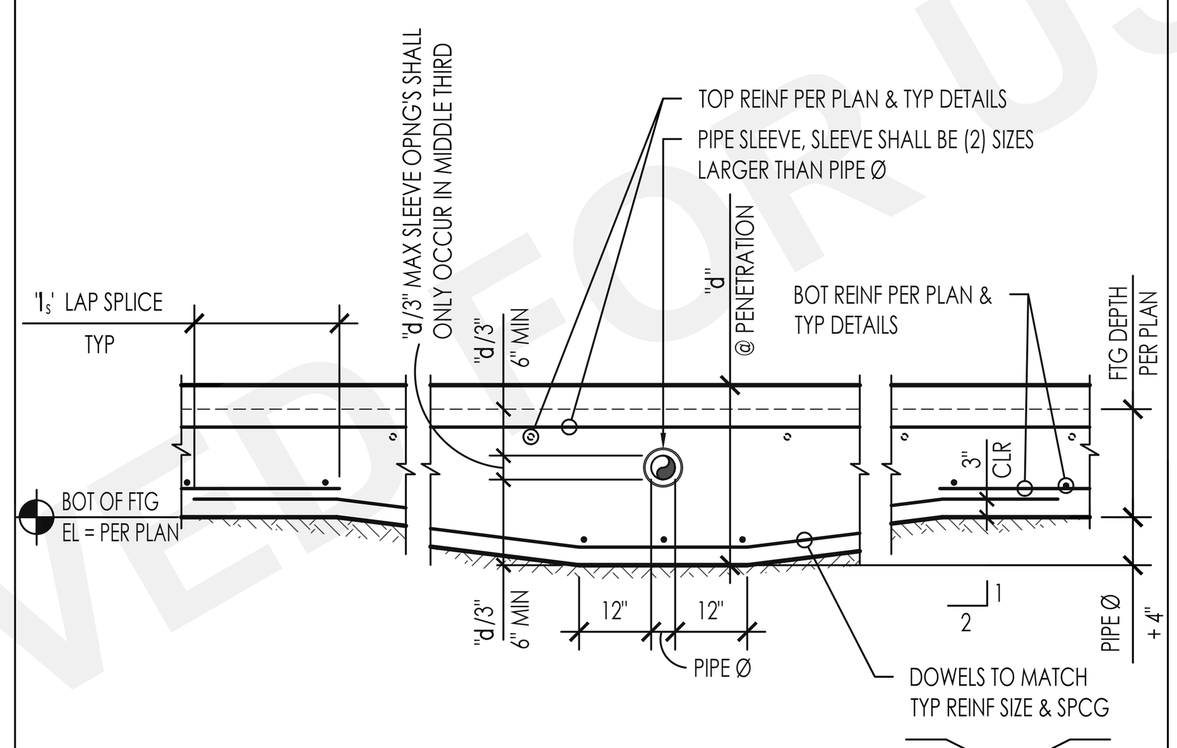
DEEPENED FTG @ ANCHOR BOLT
2340-01-CU21 - S301 - 32 NTS 32



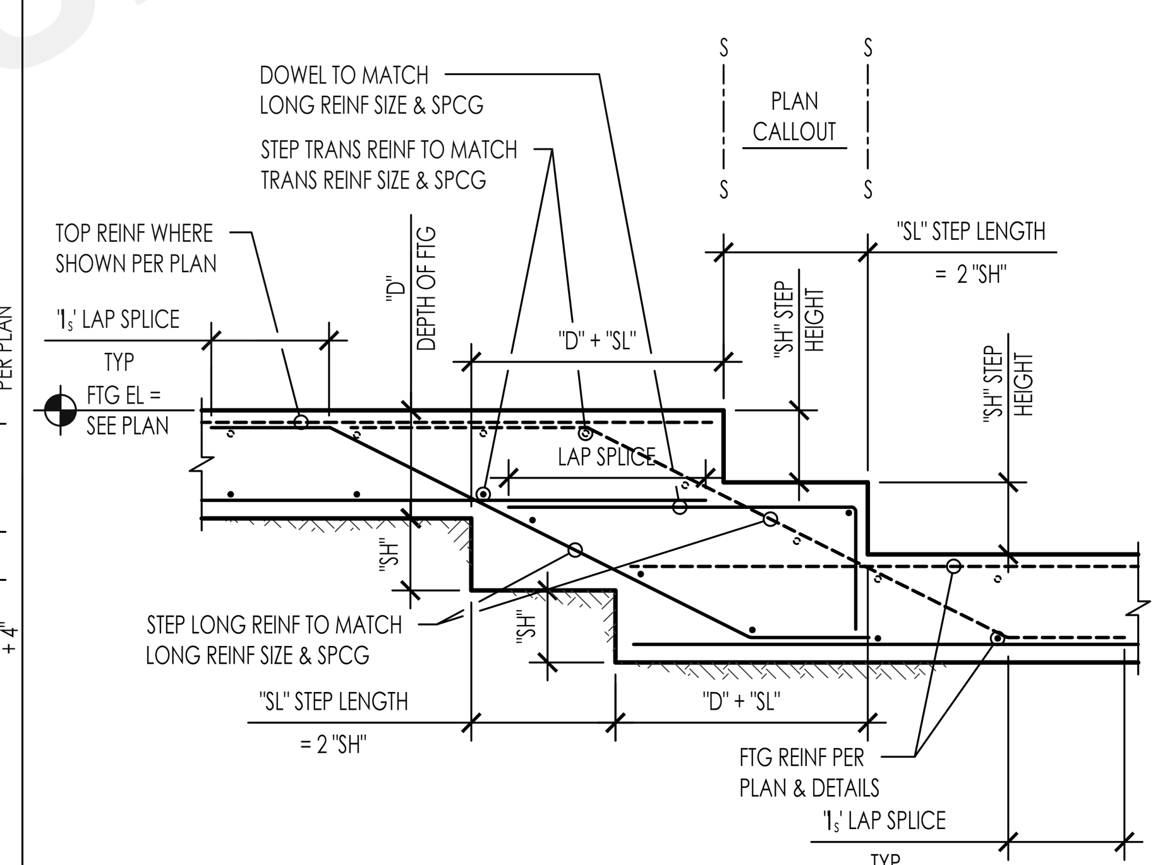
NOTES:

1. ELIMINATE BARS IF OPENING IS LESS THAN 2'-0" IN BOTH DIMENSIONS.
2. REFER TO DETAIL 53/- FOR SLAB ON GRADE SUBGRADE SUPPORT

SOG OPENING
2340-01-CU21 - S301 - 22 NTS 22

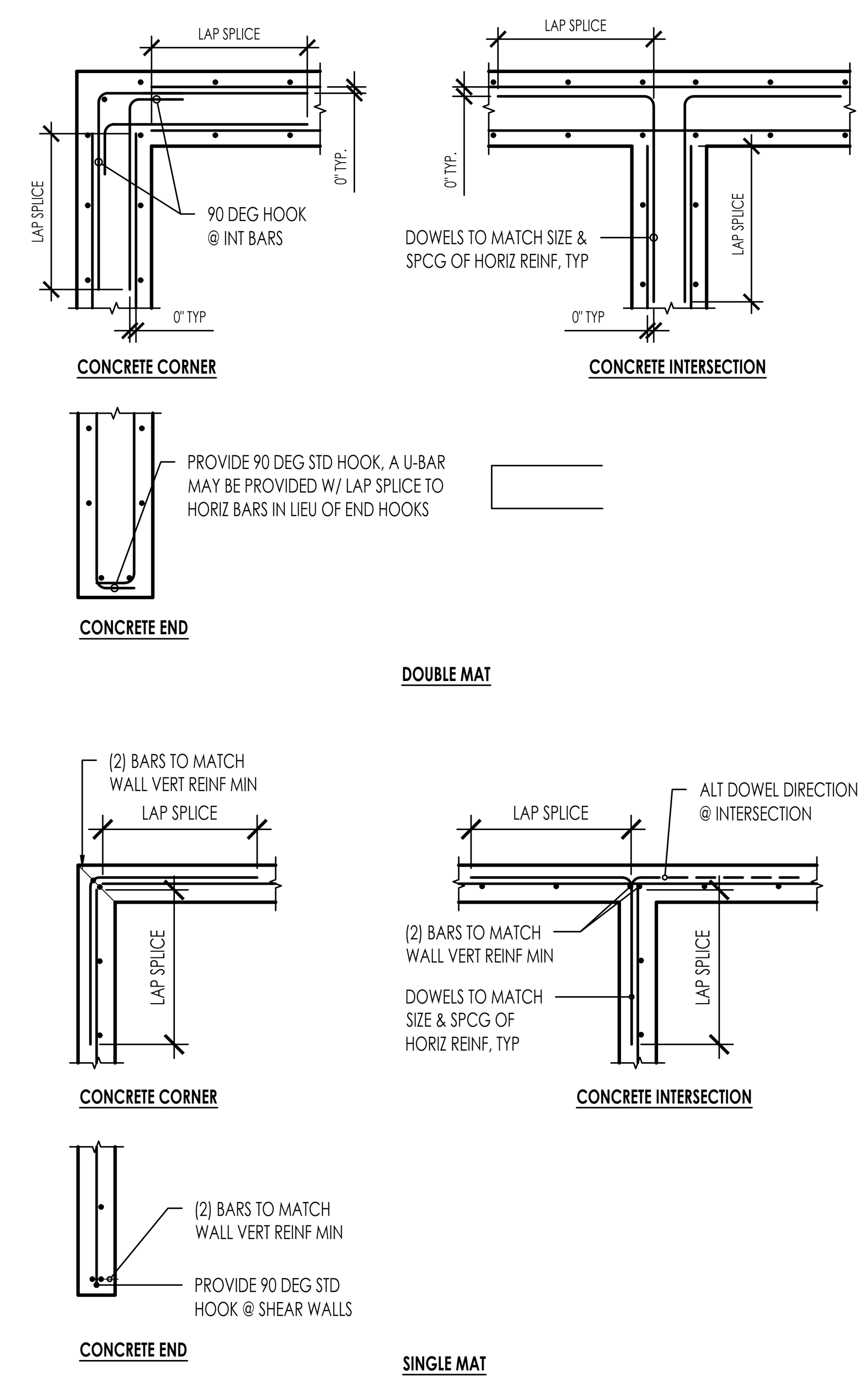


SLEEVE THROUGH FOUNDATION (SLAB TURN-DOWN)
2340-01-CU21 - S301 - 43 NTS 43



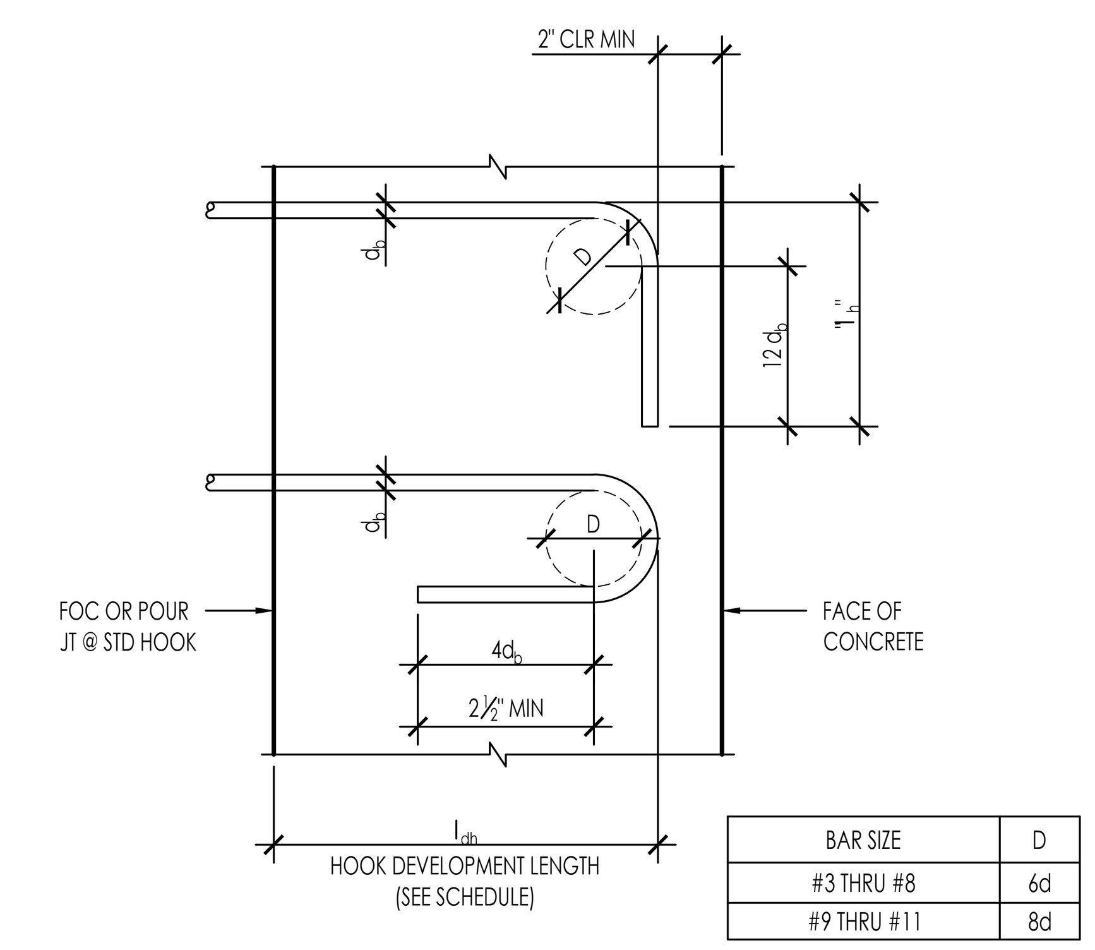
NOTE:
"SH" = 1'-6" MAX

STEP FOOTING
2340-01-CU21 - S301 - 33 NTS 33



NOTE:
REINFORCEMENT SHOWN ON WALL ELEVATION(S), BOUNDARY REINFORCING DETAILS, AND OTHER SPECIFICALLY REFERENCED DETAILS SHALL TAKE PRECEDENCE OVER REINFORCEMENT SHOWN HERE.

CONC REINF @ INTERSECTION
2340-01-CU21 - S301 - 24 NTS 24



BAR SIZE	D
#3 THRU #8	6d
#9 THRU #11	8d

STANDARD HOOK DEVELOPMENT LENGTH "l_{dh}"

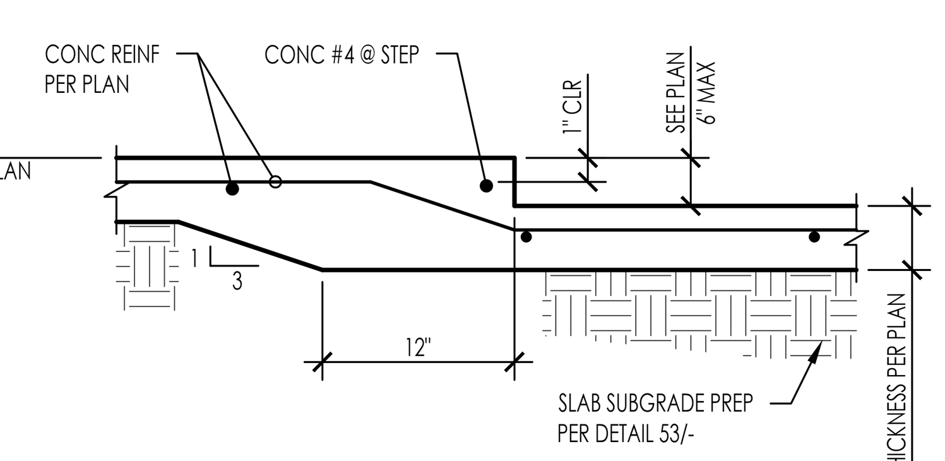
BAR SIZE	D	"l_h"	NORMAL WEIGHT 2,500	3,000	4,000
#3	2 1/4"	6"	0'-9"	0'-9"	0'-8"
#4	3"	8"	1'-0"	0'-11"	0'-10"
#5	3 3/4"	10"	1'-3"	1'-2"	1'-0"
#6	4 1/2"	12"	1'-6"	1'-5"	1'-3"
#7	5 1/4"	1'-2"	1'-9"	1'-8"	1'-5"
#8	6"	1'-4"	2'-0"	1'-10"	1'-7"
#9	9 1/2"	1'-7 1/2"	2'-3"	2'-1"	1'-10"
#10	10 3/4"	1'-10"	2'-7"	2'-4"	2'-1"
#11	12"	2'-0 1/2"	2'-10"	2'-7"	2'-3"

NOTES:

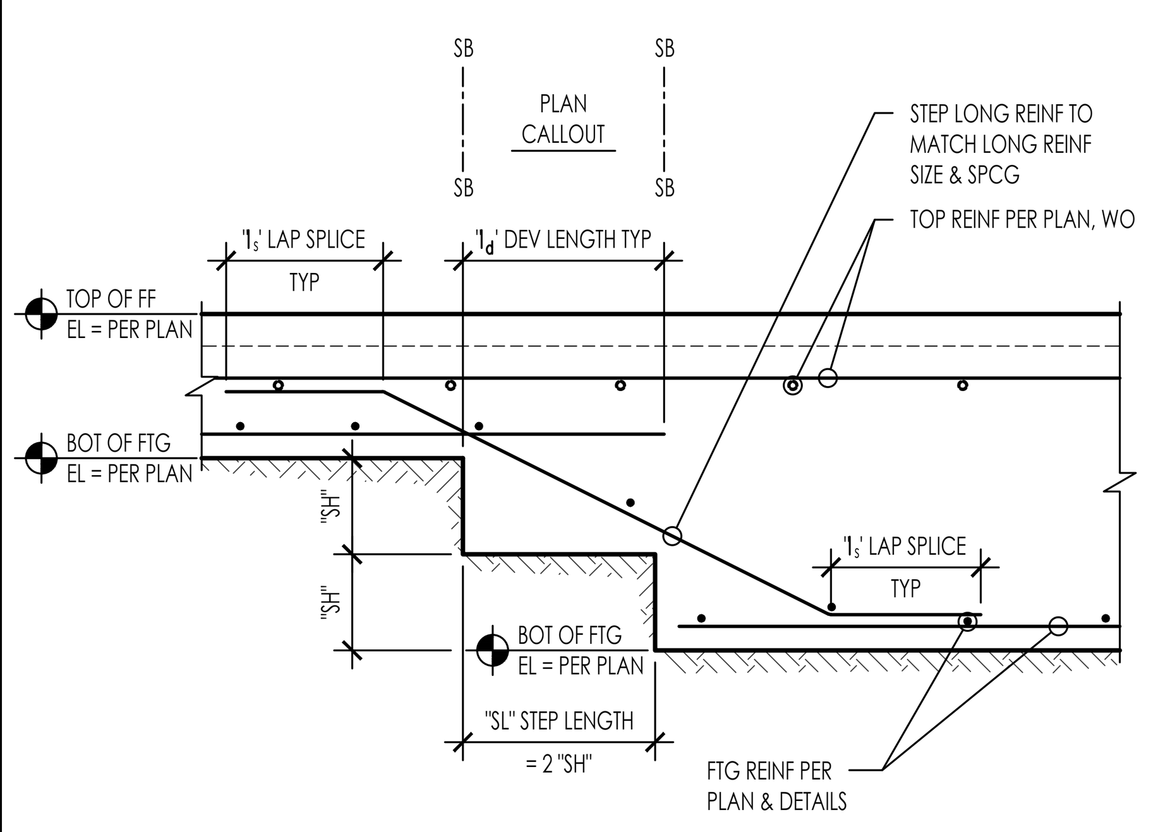
1. ALL HOOKED BARS SHALL EXTEND AS FAR AS POSSIBLE WITH A MINIMUM 2" END COVER AND WITH EMBEDMENT NOT LESS THAN SHOWN ON THE SCHEDULE UNLESS NOTED OTHERWISE ON PLANS.
2. MINIMUM SIDE COVER = 2½".
3. FOR LIGHTWEIGHT CONCRETE MULTIPLY LENGTHS IN SCHEDULE BY 1.3.

REINF HOOK DEVELOPMENT LENGTH AND BENDS
2340-01-CU21 - S301 - 14 NTS 14

54



SLAB ON GRADE DEPRESSION
2340-01-CU21 - S301 - 44 NTS 44



NOTE:
"SH" = 1'-6" MAX

STEPPED FOOTING (BOTTOM ONLY)
2340-01-CU21 - S301 - 34 NTS 34

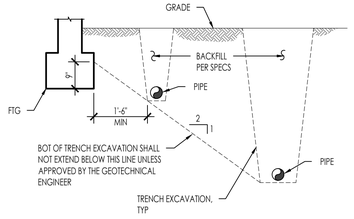
MONO COUNTY ADU PROTOTYPES
MONO COUNTY

TYPICAL CONCRETE DETAILS

DATE
NOVEMBER 20, 2023

SHEET
S-301

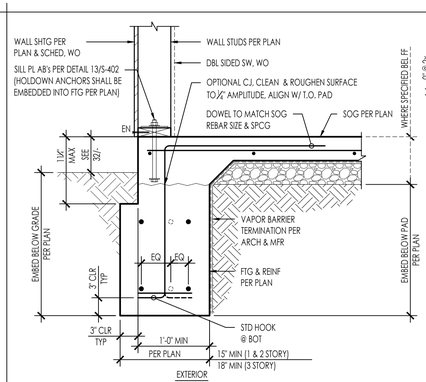
N:\2200\2340-01-cu21-mono-cty-adu-design\structural\ConDocs\sheet-files\2340-01-CU21 - S301.dwg, PLAN 2 - S301, Nov 20, 2023 5:14pm, alopez



NOTES:
1. CONTRACTOR SHALL COORDINATE ALL PIPE LOCATIONS WITH BUILDING FOUNDATION REQUIREMENTS.
2. IF REQUIREMENTS AS SHOWN CANNOT BE MET STEP FOOTING PER TYPICAL "STEPPED FOOTING" DETAILS (33 S-301) (34 S-301)

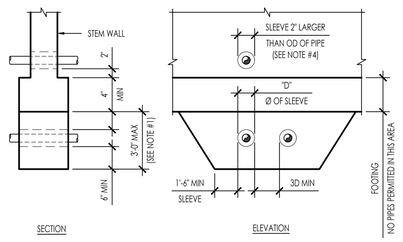
PIPES PARALLEL TO FOOTINGS

2340-01-CU21 - S311 - 51 | NTS | 51



CONTINUOUS WALL FOOTING

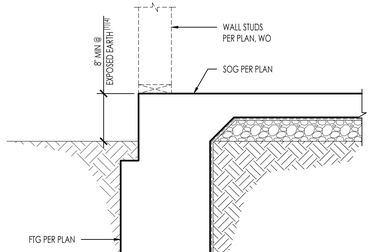
2340-01-CU21 - S311 - 31 | NTS | 31



NOTES:
1. FOOTINGS SHALL BE STEPPED PER DETAIL 33/ & 34/S-301 SO THAT THIS DIMENSION DOES NOT EXCEED 3'-0".
2. CONTRACTOR SHALL COORDINATE ALL PIPE LOCATIONS WITH BUILDING FOUNDATION REQUIREMENTS.
3. TRENCH BELOW FOOTING SHALL BE FILLED WITH CONCRETE OR 3-SACK SLURRY BEFORE POURING FOOTING. CONCRETE FILL SHALL BE SAME WIDTH AS FOOTING AND FULL WIDTH OF PIPE TRENCH.
4. PIPES MAY BE WRAPPED IN 1" THICK LOOSE FOAM IN LIEU OF SLEEVING.
5. CONDUIT MAY BE RUN THRU STEM OR ENCASEMENT UNDER FOOTING WITHOUT SLEEVES OR FOAM WRAP.

PIPES PERPENDICULAR TO FOOTINGS W/ STEM WALL

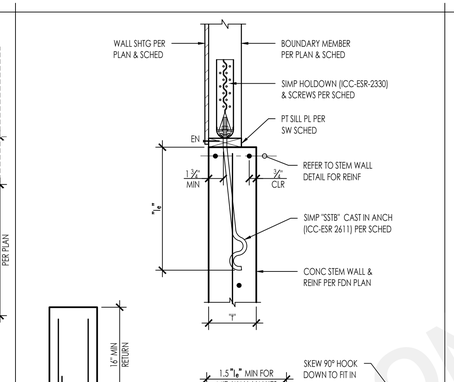
2340-01-CU21 - S311 - 52 | NTS | 52



NOTES:
1. MIN DISTANCE TO EXPOSED EARTH APPLIES TO BOTH TURNED DOWN AND STEM WALL FOOTINGS
2. CONCRETE OR IMPERVIOUS SURFACE WITH ADEQUATE DRAINAGE AWAY FROM FOUNDATION (2% MIN SLOPE)
3. FOR BALANCE OF FOOTING INFO NOT SHOWN, SEE DETAIL 31/-
4. WHERE MINIMUM DISTANCE TO EXTERIOR FINISHED GRADE OR SURFACE CANNOT BE ACHIEVED, PROVIDE CONCRETE CURB PER DETAIL 33/-

MINIMUM DISTANCE FROM GRADE TO WOOD FRAMING

2340-01-CU21 - S311 - 32 | NTS | 32

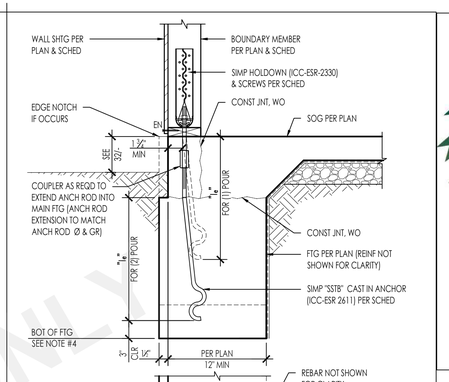


TYPE	HOLDOWN	ANCHOR	MIN STEM WALL WIDTH "t" (IN)	DIA (IN)	FASTENERS	BOUNDARY MEMBER MIN THICKNESS (IN)	MIN EMBED l_e" (IN)	ALLOWABLE LOADS (lbs)		
								CORNER	MIDWALL	END
6A	HDU2-SDS2.5	SSTB16	6	⅝	6-SDS¼" x 2½"	3	12⅝	2,550	2,550	2,550
6B	HDU4-SDS2.5	SSTB20			10-SDS¼" x 2½"	3	16⅝	2,960	3,145	2,960
6C	HDU4-SDS2.5	SSTB24			10-SDS¼" x 2½"	3	20⅝	3,325	3,740	3,325
6D	HDU8-SDS2.5	SSTB28	8	⅞	20-SDS¼" x 2½"	4½	24⅞	7,315	7,870*	6,395

1. MINIMUM EDGE DISTANCE IS SHOWN ABOVE. ANCHOR LOCATIONS PER PLAN
2. MINIMUM ANCHOR TO ANCHOR SPACING IS $3l_e$
3. * = CAPACITY LIMITED BY HOLDOWN

SSTB ANCHOR & HOLDOWN @ STEM WALL

2340-01-CU21 - S311 - 22 | NTS | 22

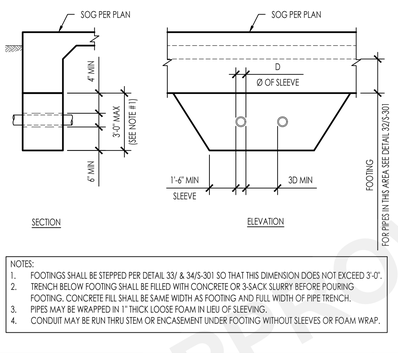


TYPE	HOLDOWN	ANCHOR	DIA (IN)	FASTENERS	BOUNDARY MEMBER MIN THICKNESS (IN)	MIN EMBED l_e" (IN)	ALLOWABLE LOADS (lbs)	
							CORNER	MIDWALL
6A	HDU4-SDS2.5	SSTB16	⅞	10-SDS¼" x 2½"	3	12⅝	3,780	3,780
6B	HDU5-SDS2.5	SSTB20		14-SDS¼" x 2½"	3	16⅝	4,785	4,785
6C	HDU5-SDS2.5	SSTB24		14-SDS¼" x 2½"	3	20⅝	5,645*	5,645*
6D	HDQ8-SDS3	SSTB28	1⅛	20-SDS¼" x 3"	4½	24⅞	9,230*	9,230*

1. MINIMUM EDGE DISTANCE IS SHOWN ABOVE. ANCHOR LOCATIONS PER PLAN
2. MINIMUM ANCHOR TO ANCHOR SPACING IS $3l_e$
3. * = CAPACITY LIMITED BY HOLDOWN
4. DEEPEN FOOTING AT HOLDOWN ANCHOR AS REQ'D PER DETAIL 32/-

SSTB ANCHOR & HOLDOWN @ FOUNDATION

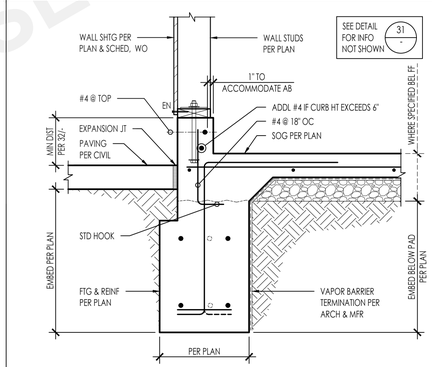
2340-01-CU21 - S311 - 12 | NTS | 12



NOTES:
1. FOOTINGS SHALL BE STEPPED PER DETAIL 33/ & 34/S-301 SO THAT THIS DIMENSION DOES NOT EXCEED 3'-0".
2. TRENCH BELOW FOOTING SHALL BE FILLED WITH CONCRETE OR 3-SACK SLURRY BEFORE POURING FOOTING. CONCRETE FILL SHALL BE SAME WIDTH AS FOOTING AND FULL WIDTH OF PIPE TRENCH.
3. PIPES MAY BE WRAPPED IN 1" THICK LOOSE FOAM IN LIEU OF SLEEVING.
4. CONDUIT MAY BE RUN THRU STEM OR ENCASEMENT UNDER FOOTING WITHOUT SLEEVES OR FOAM WRAP.

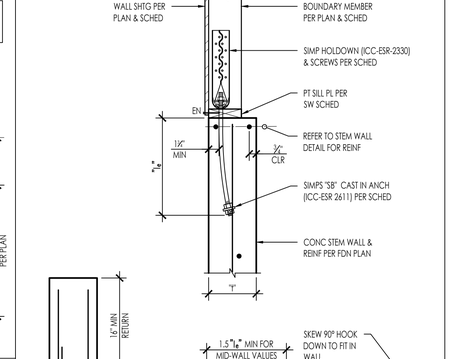
PIPES PERPENDICULAR TO FOOTINGS

2340-01-CU21 - S311 - 53 | NTS | 53



EXTERIOR CONTINUOUS WALL FTG W/ CURB

2340-01-CU21 - S311 - 33 | NTS | 33

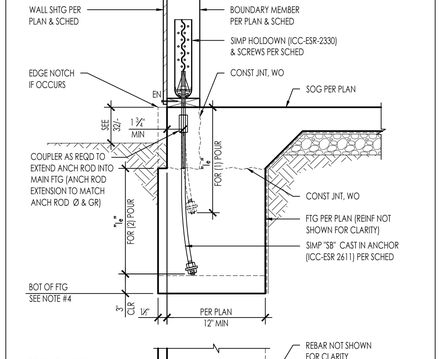


TYPE	HOLDOWN	ANCHOR	MIN STEM WALL WIDTH "t" (IN)	DIA (IN)	FASTENERS	BOUNDARY MEMBER MIN THICKNESS (IN)	MIN EMBED l_e" (IN)	ALLOWABLE LOADS (lbs)		
								CORNER	MIDWALL	END
7A	HDU5-SDS2.5	SB ⅞" x 24	6	⅝	14-SDS¼" x 2½"	3	18	5,645*	5,645*	5,645*
7B	HDQ8-SDS3	SB ⅞" x 24	8	⅞	20-SDS¼" x 3"	4½	18	7,855	8,795	5,730
7C	HDU14-SDS2.5	SB 1" x 30	8	1	36-SDS¼" x 2½"	4x6	24	8,315	10,770*	6,065
						5½		8,315	11,470	6,065

1. MINIMUM EDGE DISTANCE IS SHOWN ABOVE. ANCHOR LOCATIONS PER PLAN
2. MINIMUM ANCHOR TO ANCHOR SPACING IS $3l_e$
3. * = CAPACITY LIMITED BY HOLDOWN

SB ANCHOR & HOLDOWN @ STEM WALL

2340-01-CU21 - S311 - 24 | NTS | 24

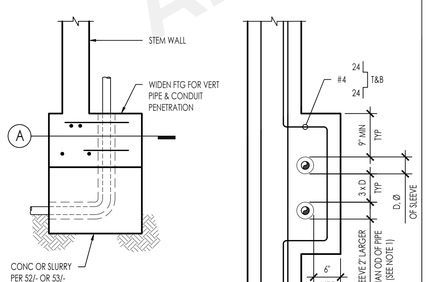


TYPE	HOLDOWN	ANCHOR	DIA (IN)	FASTENERS	MIN MEMBER THICKNESS (IN)	MIN EMBED l_e" (IN)	ALLOWABLE LOADS (lbs)	
							CORNER	MIDWALL
7A	HDU5-SDS2.5	SB ⅞" x 24	1⅛	14-SDS¼" x 2½"	3	18	5,645*	5,645*
7B	HDQ8-SDS3	SB ⅞" x 24	1⅛	20-SDS¼" x 3"	4½	18	9,230*	9,230*
7C	HDU14-SDS2.5	SB 1" x 30	1	36-SDS¼" x 2½"	4x6	24	10,770*	10,770*
					5½		13,090*	14,445*

1. MINIMUM EDGE DISTANCE IS SHOWN ABOVE. ANCHOR LOCATIONS PER PLAN
2. MINIMUM ANCHOR TO ANCHOR SPACING IS $3l_e$
3. * = CAPACITY LIMITED BY HOLDOWN
4. DEEPEN FOOTING AT HOLDOWN ANCHOR AS REQ'D PER DETAIL 32/S-301

SB ANCHOR & HOLDOWN @ FOUNDATION

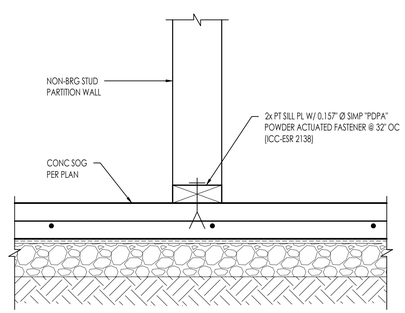
2340-01-CU21 - S311 - 14 | NTS | 14



NOTES:
1. PIPES MAY BE WRAPPED IN 1" THICK LOOSE FOAM IN LIEU OF SLEEVING.
2. CONDUIT MAY BE ROUTED UP THROUGH FOOTING WITHOUT SLEEVES OR FOAM WRAP.

TYPICAL VERT PIPES OR COND THROUGH FOOTING

2340-01-CU21 - S311 - 54 | NTS | 54



NON-BEARING WALL ANCHORAGE @ SOG

2340-01-CU21 - S311 - 34 | NTS | 34

MONO COUNTY

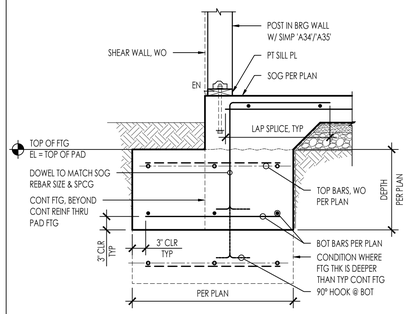
THESE PLANS ARE PROVIDED BY MONO COUNTY AS PART OF THE PRE-APPROVED ADU PROGRAM AND ARE PUBLIC DOMAIN. THERE CANNOT BE A CHARGE TO PROVIDE THESE PLANS. NO ALTERATIONS TO THESE PLANS ARE ALLOWED. ALL ALTERATIONS MUST BE DONE UNDER A SEPARATE PERMIT ONCE THE BUILDING PERMIT FOR THE ADU HAS BEEN ISSUED AND FINAL INSPECTION COMPLETED. IF YOU DO NOT HAVE THE CONSTRUCTION KNOWLEDGE AND EXPERIENCE TO CONTRUCT THESE PLANS WITHOUT FURTHER DETAILS, IT IS RECOMMENDED YOU HIRE A CONTRACTOR TO DO THE CONSTRUCTION. THE CITY WILL NOT PROVIDE FURTHER INFORMATION OR DETAILS AND BUILDING INSPECTORS WILL NOT PROVIDE STEP BY STEP INSTRUCTIONS IN THE FIELD.

MONO COUNTY ADU PROTOTYPES
MONO COUNTY

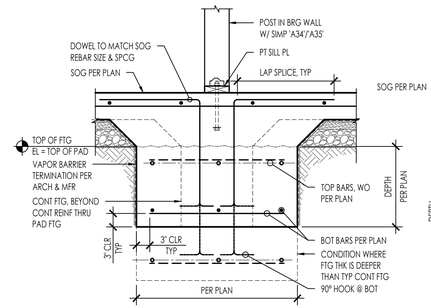
CONCRETE DETAILS

DATE
NOVEMBER 20, 2023

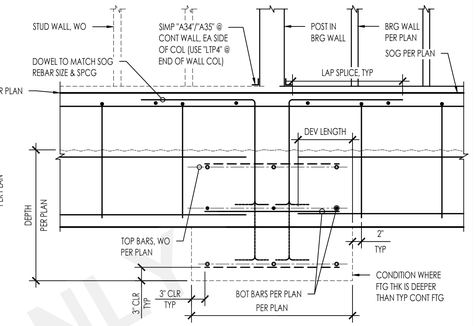
SHEET
S-311



A SECTION @ EXTERIOR FTG



B SECTION @ INTERIOR FTG



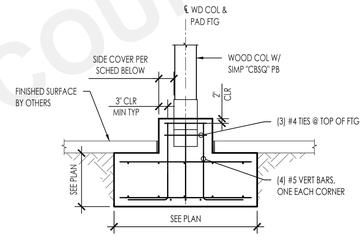
C ELEVATION

SPREAD FOOTING @ BEARING WALL POST

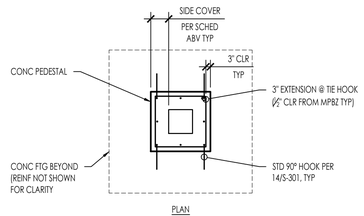
2340-01-CU21 - S312 - 11

3/4" = 1'-0"

11



POST SIZE	MIN. SIDE COVER
4x4	0'-3"
6x6	0'-3"
8x8	0'-3"



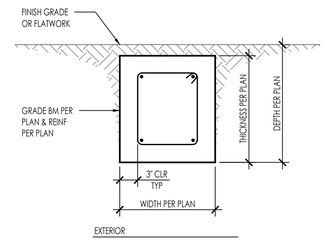
PLAN

PORCH PAD FOOTING

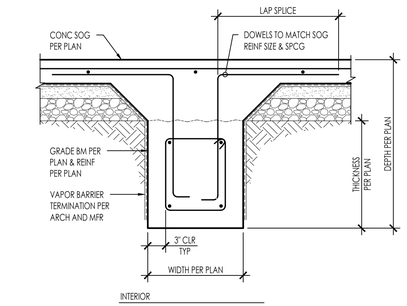
2340-01-CU21 - S312 - 24

1/2" = 1'-0"

23



EXTERIOR



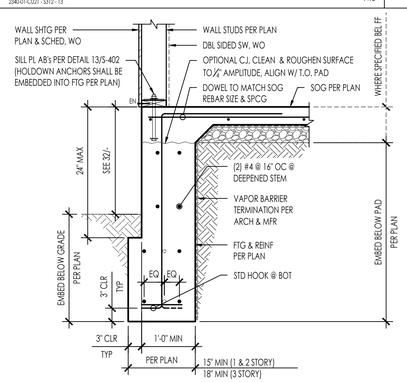
INTERIOR

GRADE BEAM

2340-01-CU21 - S312 - 13

NTS

13



DEEPEND EXTERIOR FOOTING

2340-01-CU21 - S312 - 14

3/4" = 1'-0"

14

THESE PLANS ARE PROVIDED BY MONO COUNTY AS PART OF THE PRE-APPROVED ADU PROGRAM AND ARE PUBLIC DOMAIN. THERE CANNOT BE A CHARGE TO PROVIDE THESE PLANS. NO ALTERATIONS TO THESE PLANS ARE ALLOWED. ALL ALTERATIONS MUST BE DONE UNDER A SEPARATE PERMIT ONCE THE BUILDING PERMIT FOR THE ADU HAS BEEN ISSUED AND FINAL INSPECTION COMPLETED. IF YOU DO NOT HAVE THE CONSTRUCTION KNOWLEDGE AND EXPERIENCE TO CONTRUCT THESE PLANS WITHOUT FURTHER DETAILS, IT IS RECOMMENDED YOU HIRE A CONTRACTOR TO DO THE CONSTRUCTION. THE CITY WILL NOT PROVIDE FURTHER INFORMATION OR DETAILS AND BUILDING INSPECTORS WILL NOT PROVIDE STEP BY STEP INSTRUCTIONS IN THE FIELD.

MONO COUNTY ADU PROTOTYPES

MONO COUNTY

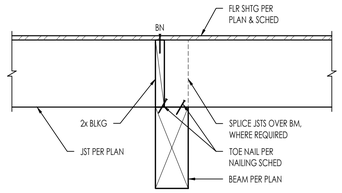
CONCRETE DETAILS

DATE

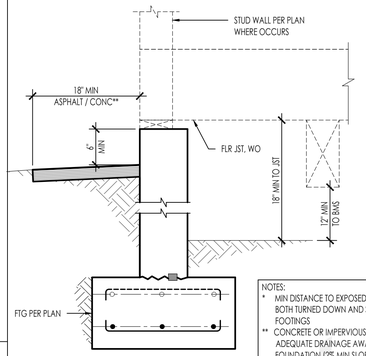
NOVEMBER 20, 2023

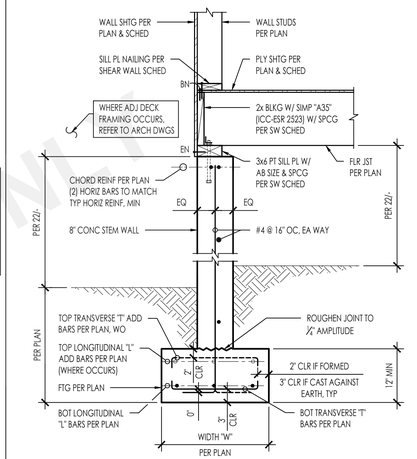
SHEET

S-312

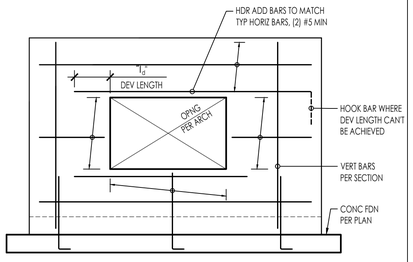


51 | 41 | DROPPED BEAM @ PERP JOIST 2340-01-C\101 - S313 - 31 | 1" = 1'-0" | 31

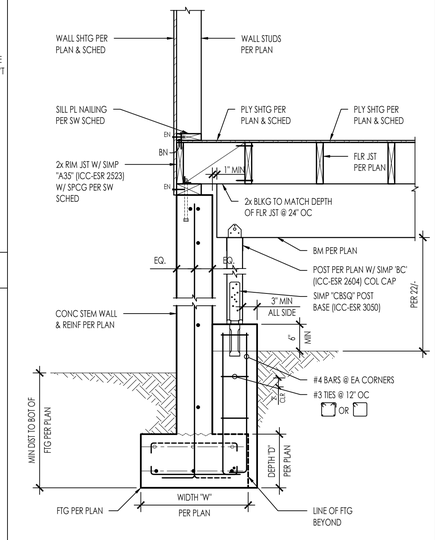




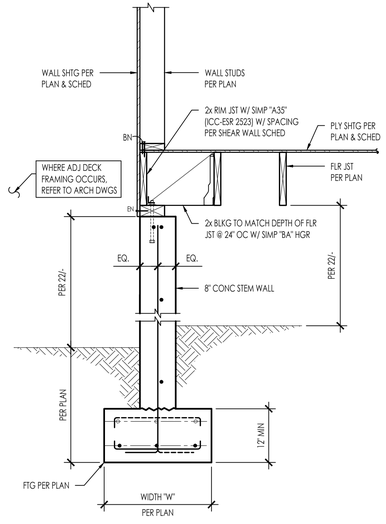
52 | 42 | PIER FOOTING 2340-01-C\101 - S313 - 32 | 1/2" = 1'-0" | 32 | MIN DISTANCE FROM GRADE TO WOOD FRAMING 2340-01-C\101 - S313 - 22 | 1" = 1'-0" | 22 | CONC WALL FOUNDATION 2340-01-C\101 - S313 - 12 | 3/4" = 1'-0" | 12



53 | 43 | CONC WALL FOOTING @ OPENING 2340-01-C\101 - S313 - 33 | NTS | 33



54 | 44 | 34 | CONC WALL FOUNDATION 2340-01-C\101 - S313 - 24 | 3/4" = 1'-0" | 24



SEE DETAIL FOR INFO NOT SHOWN 12/-

14 | CONC WALL FOUNDATION 2340-01-C\101 - S313 - 14 | 3/4" = 1'-0" | 14

MONO COUNTY ADU PROTOTYPES

MONO COUNTY

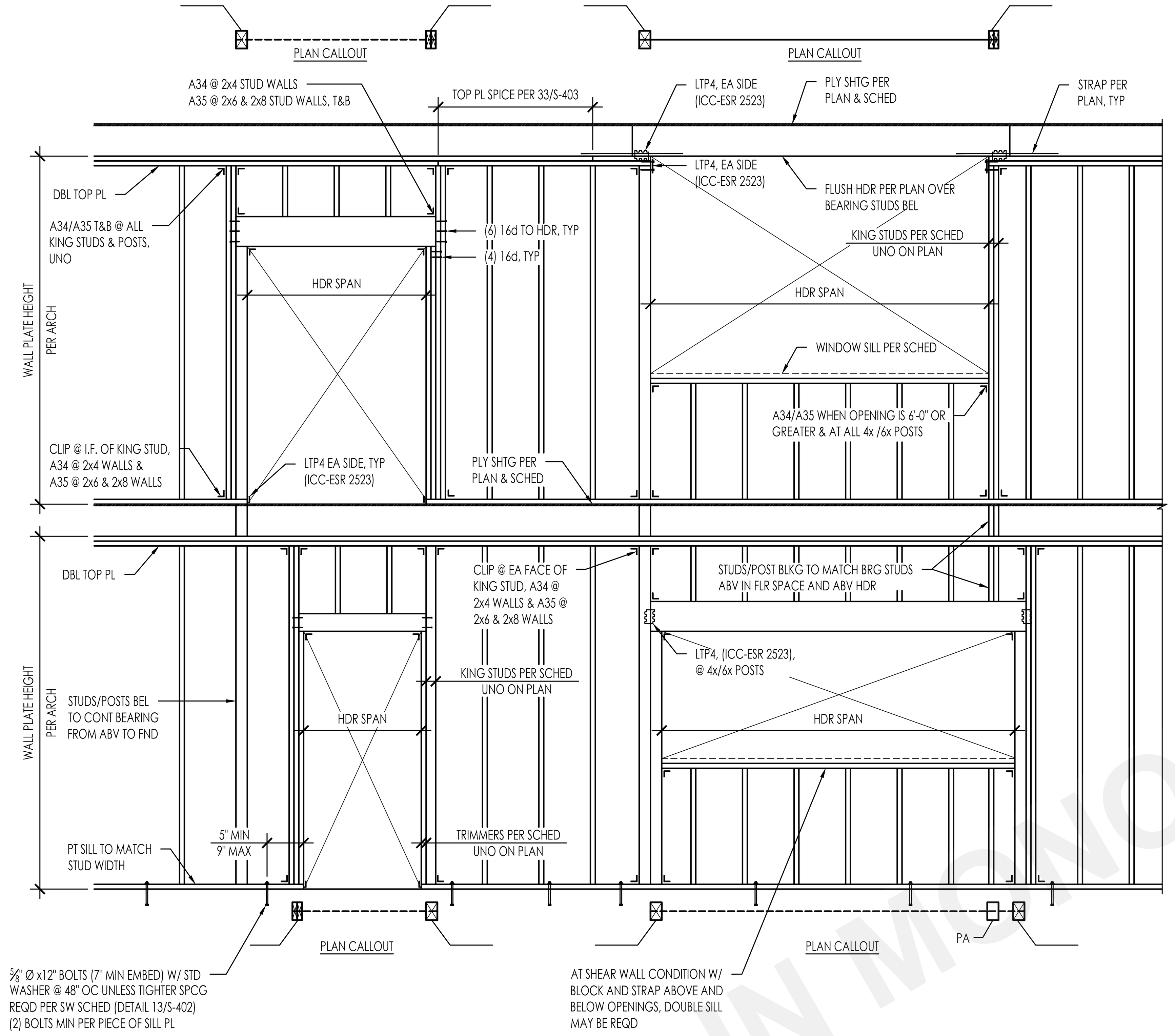
CONCRETE DETAILS

DATE

NOVEMBER 20, 2023

SHEET

S-313



BEARING/SHEAR WALL HEADER SCHEDULE					
SNOW LOAD	6 INCH WALLS				
1-STORY	OPENING WIDTH	6x HEADER	SILL AT WINDOW	POST / TRIMMER	KING STUDS
<65 PSF	UP TO 3'-0"	6x4	2x	2x6	2x6
	3'-0" - 4'-0"	6x6	2x	2x6	2x6
	4'-0" - 5'-6"	6x8	(2) 2x	2x6	(2) 2x6
1-STORY	OPENING WIDTH	6x HEADER	SILL AT WINDOW	POST / TRIMMER	KING STUDS
66-80 PSF	UP TO 3'-0"	6x6	2x	2x6	2x6
	3'-0" - 4'-0"	6x8	2x	2x6	2x6
	4'-0" - 5'-6"	6x8	(2) 2x	(2) 2x6	(2) 2x6
1-STORY	OPENING WIDTH	6x HEADER	SILL AT WINDOW	POST / TRIMMER	KING STUDS
81-120 PSF	UP TO 3'-0"	6x6	2x	2x6	2x6
	3'-0" - 4'-0"	6x10	2x	2x6	2x6
	4'-0" - 5'-6"	6x12	(2) 2x	(2) 2x6	(2) 2x6
1-STORY	OPENING WIDTH	6x HEADER	SILL AT WINDOW	POST / TRIMMER	KING STUDS
220-235 PSF	UP TO 3'-0"	6x6	2x	(2) 2x6	2x6
	3'-0" - 4'-0"	6x10	2x	(2) 2x6	2x6
	4'-0" - 5'-6"	6x12	(2) 2x	4x6	(2) 2x6

NOTES:
1. THIS DETAIL APPLIES AT ALL EXT WALLS AND INT LOAD BEARING WALLS AND ALSO APPLIES TO SHEAR WALL FRAMING
   A. FOR SHEAR WALLS SEE 34/S-402 FOR ADD'L REQUIREMENTS.
   B. FOR INTERIOR NON-BEARING PARTITIONS SEE DETAIL 43/-
2. HEADERS, KING STUDS AND OTHER REFERENCES ON PLAN GOVERN OVER THIS TYPICAL SCHED/DETAILS
3. PROVIDE A34 @ 4" WALLS & A35 @ 6" OR GREATER WALLS (ICC-ESR 2353)

EXTERIOR WALL / INTERIOR WALL BEARING WALL FRAMING

2340-01-CU21 - S401 - 32 NTS 32

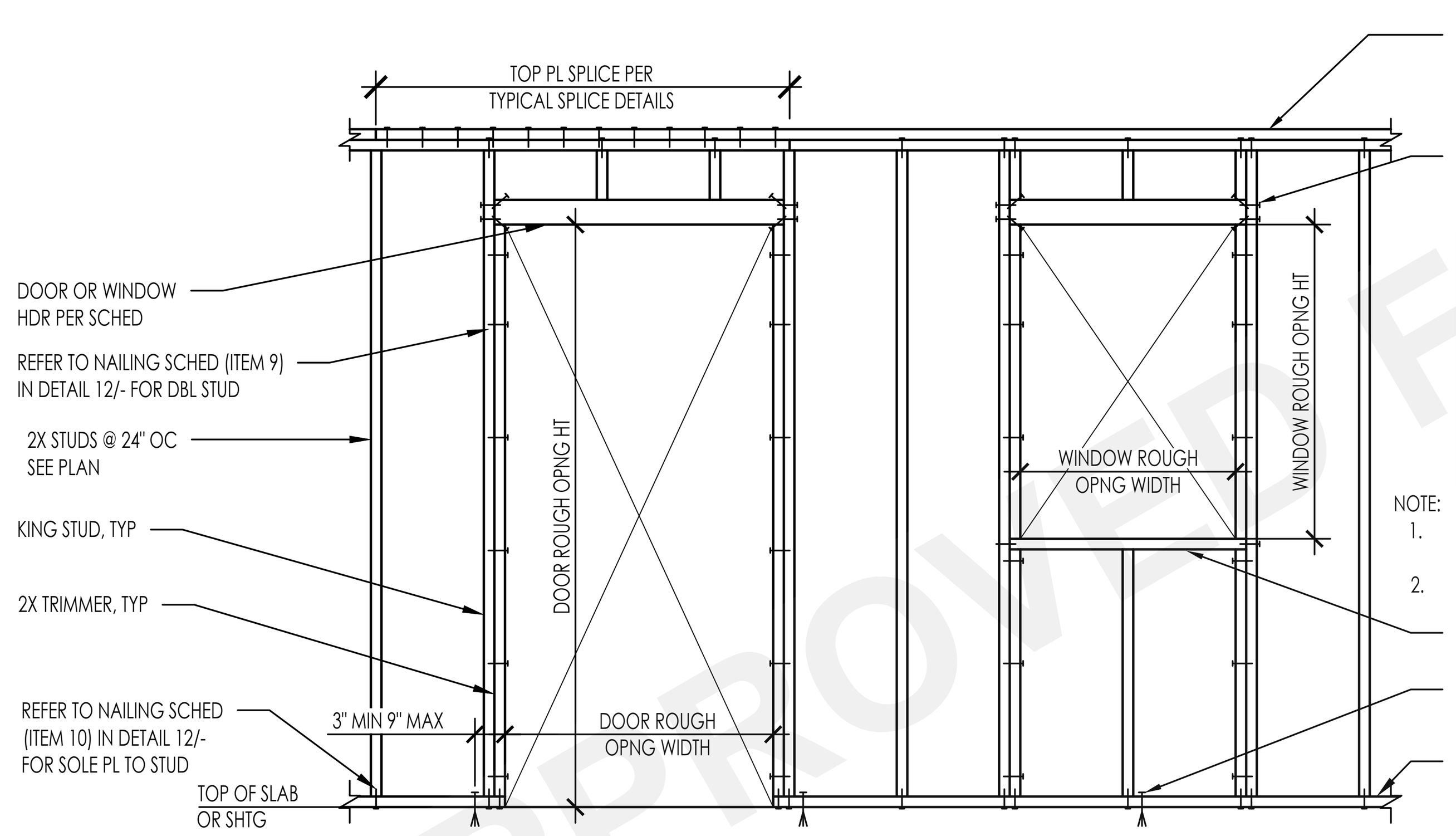
FASTENING SCHEDULE PER 2019 CBC 2304.10.1		
CONNECTION	FASTENING	LOCATION
1. BLOCKING BETWEEN CEILING JOISTS, RAFTERS OR TRUSSES TO TOP PLATE OR OTHER FRAMING BELOW	3-8d COMMON	EACH END, TOENAIL
2. BLOCKING BETWEEN RAFTERS OR TRUSS NOT AT THE WALL TO TOP PLATE, TO RAFTER OR TRUSS	2-8d COMMON	EACH END, TOENAIL
	2-16d COMMON	END NAIL
3. FLAT BLOCKING TO TRUSS AND WEB FILLER	16d COMMON @ 6" OC	FACE NAIL
4. CEILING JOIST TO TOP PLATE	3-8d COMMON	EACH JOIST, TOENAIL
5. CEILING JOIST NOT ATTACHED TO PARALLEL RAFTER, LAPS OVER PARTITIONS	3-16d COMMON	FACE NAIL
6. CEILING JOIST ATTACHED TO PARALLEL RAFTER (HEEL JOINT)	3-16d COMMON	FACE NAIL
7. COLLAR TIE TO RAFTER	3-10d COMMON	FACE NAIL
8. RAFTER OR ROOF TRUSS TO PLATE	3-10d COMMON	TOENAIL[b]
9. ROOF RAFTER TO RIDGE VALLEY OR HIP RAFTER; OR ROOF RAFTER TO 2-INCH RIDGE BEAM	2-16d COMMON	END NAIL
	3-10d COMMON	TOENAIL
10. STUD TO STUD AND ABUTTING STUDS AT INTERSECTING WALL CORNERS	16d COMMON	16" OC FACE NAIL
11. BUILT-UP HEADER (2" TO 2" HEADER)	16d COMMON	16" OC EACH EDGE, FACE NAIL
12. CONTINUOUS HEADER TO STUD	4-10d COMMON	TOENAIL
13. TOP PLATE TO TOP PLATE	16d COMMON	16" OC FACE NAIL
14. TOP PLATE TO TOP PLATE, AT END JOINTS	8-16d COMMON	EACH SIDE OF END JOINT, FACE NAIL (MINIMUM 24" LAP SPLICE LENGTH EACH SIDE OF END JOINT)
15. BOTTOM PLATE TO JOIST, RIM JOIST, BAND JOIST OR BLOCKING	2-16d COMMON	16" OC FACE NAIL
16. STUD TO TOP OR BOTTOM PLATE	4-8d COMMON	TOENAIL
	2-16d COMMON	END NAIL
17. TOP PLATES, LAPS AT CORNERS AND INTERSECTIONS	2-16d COMMON	FACE NAIL
18. JOIST TO SILL, TOP PLATE, OR GIRDER	3-8d COMMON	TOENAIL
20. RIM JOIST, BAND JOIST, OR BLOCKING TO TOP PLATE, SILL OR OTHER FRAMING BELOW	8d COMMON	6" OC, TOENAIL
21. 1"x6" SUBFLOOR OR LESS TO EACH JOIST	2-8d COMMON	FACE NAIL
22. 2" SUBFLOOR TO JOIST OR GIRDER	2-16d COMMON	FACE NAIL
23. BUILT-UP GIRDER AND BEAMS, 2" LUMBER LAYERS	20d COMMON (4" x 0.192")	32" OC FACE NAIL AT TOP AND BOTTOM STAGGERED ON APPOSITE SIDE
24. LEDGER STRIP SUPPORTING JOIST OR RAFTERS	3-16d COMMON	EACH JOIST OR RAFTER, FACE NAIL
26. JOIST TO BAND JOIST OR RIM JOIST	3-16d COMMON	END NAIL
27. BRIDGING OR BLOCKING TO JOIST, RAFTER OR TRUSS	2-8d COMMON	EACH END, TOENAIL

NOTES:
a. THIS NAILING SCHEDULE SHALL ONLY BE USED IF CONDITION IS NOT OTHERWISE DETAILED OR SPECIFIED ON THE CONSTRUCTION DOCUMENTS. COMMON NAILS SHALL BE USED EXCEPT WHERE OTHERWISE STATED
b. WHERE A RAFTER IS FASTENED TO AN ADJACENT PARALLEL CEILING JOIST IN ACCORDANCE WITH THIS SCHEDULE AND THE CEILING JOIST IS FASTENED TO THE TOP PLATE IN ACCORDANCE WITH THIS SCHEDULE, THE NUMBER OF TOENAILS IN THE RAFTER SHALL BE PERMITTED TO BE REDUCED BY ONE NAIL

NAILING SCHEDULE

2340-01-CU21 - S401 - 12 NTS 12

THESE PLANS ARE PROVIDED BY MONO COUNTY AS PART OF THE PRE-APPROVED ADU PROGRAM AND ARE PUBLIC DOMAIN. THERE CANNOT BE A CHARGE TO PROVIDE THESE PLANS. NO ALTERATIONS TO THESE PLANS ARE ALLOWED. ALL ALTERATIONS MUST BE DONE UNDER A SEPARATE PERMIT ONCE THE BUILDING PERMIT FOR THE ADU HAS BEEN ISSUED AND FINAL INSPECTION COMPLETED. IF YOU DO NOT HAVE THE CONSTRUCTION KNOWLEDGE AND EXPERIENCE TO CONTRUCT THESE PLANS WITHOUT FURTHER DETAILS, IT IS RECOMMENDED YOU HIRE A CONTRACTOR TO DO THE CONSTRUCTION. THE CITY WILL NOT PROVIDE FURTHER INFORMATION OR DETAILS AND BUILDING INSPECTORS WILL NOT PROVIDE STEP BY STEP INSTRUCTIONS IN THE FIELD.



SEE NON-BRG PARTITION ATTACHMENT DETAIL FOR CONN TO FRMG ABV

REFER TO NAILING SCHED (ITEM 12) IN DETAIL 12/- FOR HDR TO STUD

HEADER SCHEDULE		
OPENING WIDTH	2x4 WALL HEADER	2x6 WALL HEADER
<4'-0"	4x4	4x6 FLAT
4'-0" - 6'-0"	4x4	4x6 FLAT
6'-0" - 8'-0"	4x6	4x6 FLAT
8'-0" - 10'-0"	4x6	6x6

NOTE:
1. HEADERS, KING STUDS AND OTHER REFERENCES ON PLAN GOVERN OVER THESE TYPICAL SCHEDULES/DETAILS.
2. NAIL SILL PLATE TO WOOD FRAMED FLOORS WITH 16d @ 12" O.C.

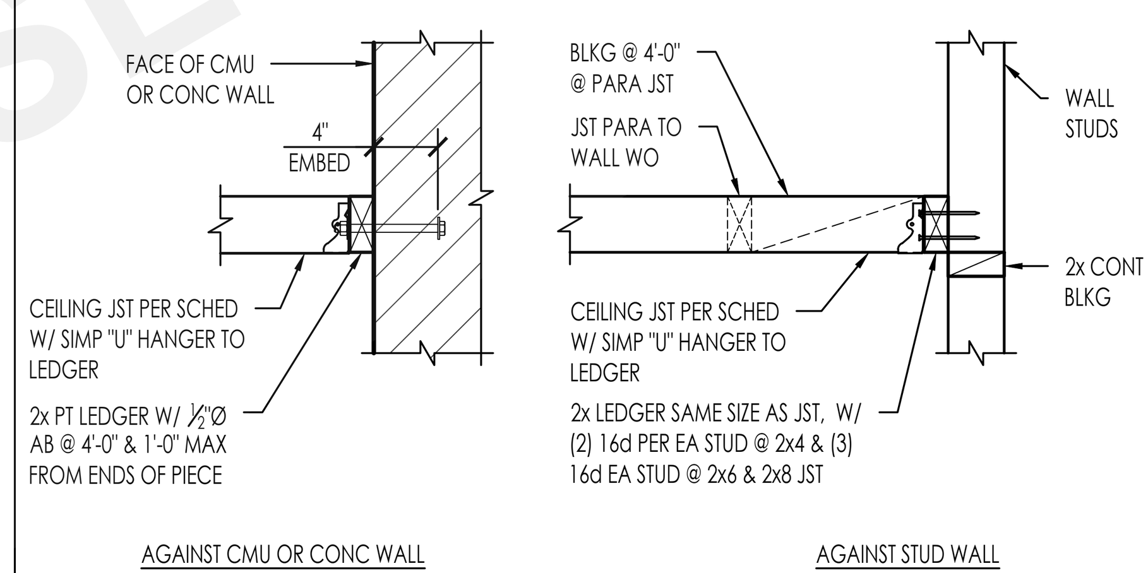
2X WINDOW SILL TYP

SEE NON-BEARING PARTITION ANCHORAGE DETAIL 34/S-311 FOR CONN TO CONC SLAB

PRESSURE TREATED SILL PL

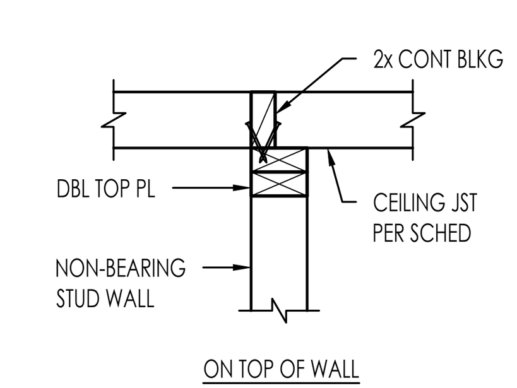
INTERIOR NON-BEARING PARTITION WALL FRAMING

2340-01-CU21 - S401 - 43 NTS 43



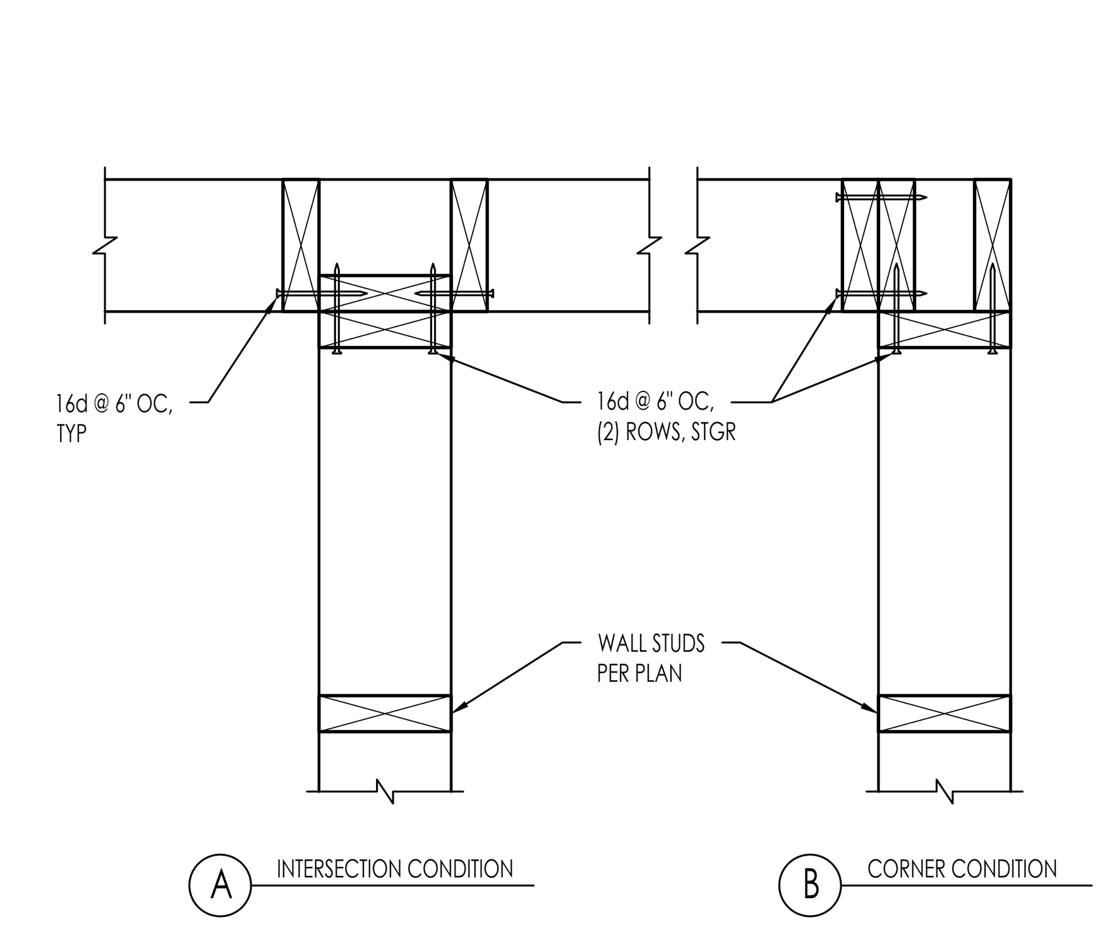
CEILING JOIST SCHED	
JOIST SIZE	MAX SPAN
2x4 @ 16" OC	9'-0"
2x6 @ 16" OC	14'-0"
2x8 @ 16" OC	18'-0"

NOTE:
THIS DETAIL IS INTENDED FOR CEILING JST THAT SPAN FROM WALL TO WALL @ CONTRACTORS OPTION



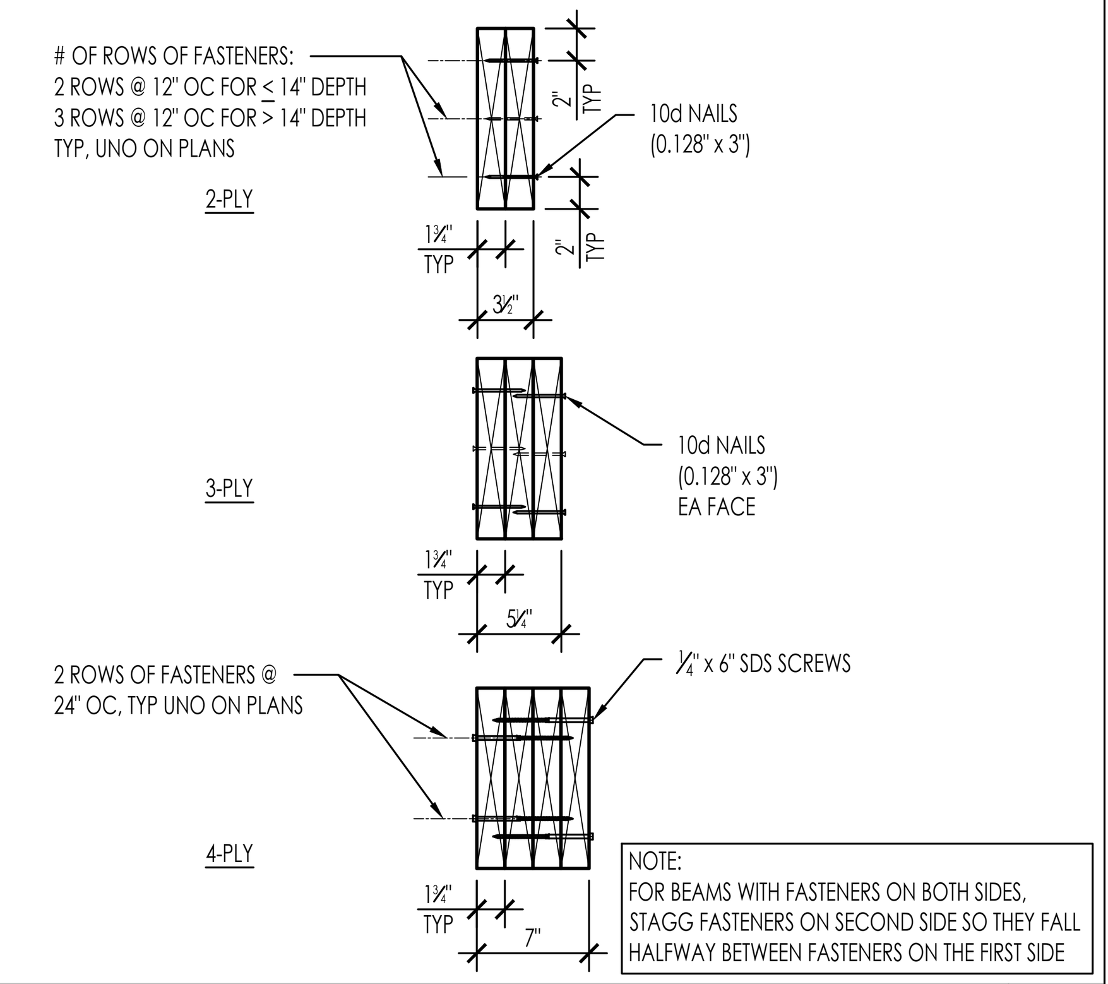
CEILING JOIST SCHED & DETAILS

2340-01-CU21 - S401 - 33 NTS 33



TYPICAL WOOD STUD INTERSECTIONS

2340-01-CU21 - S401 - 23 NTS 23



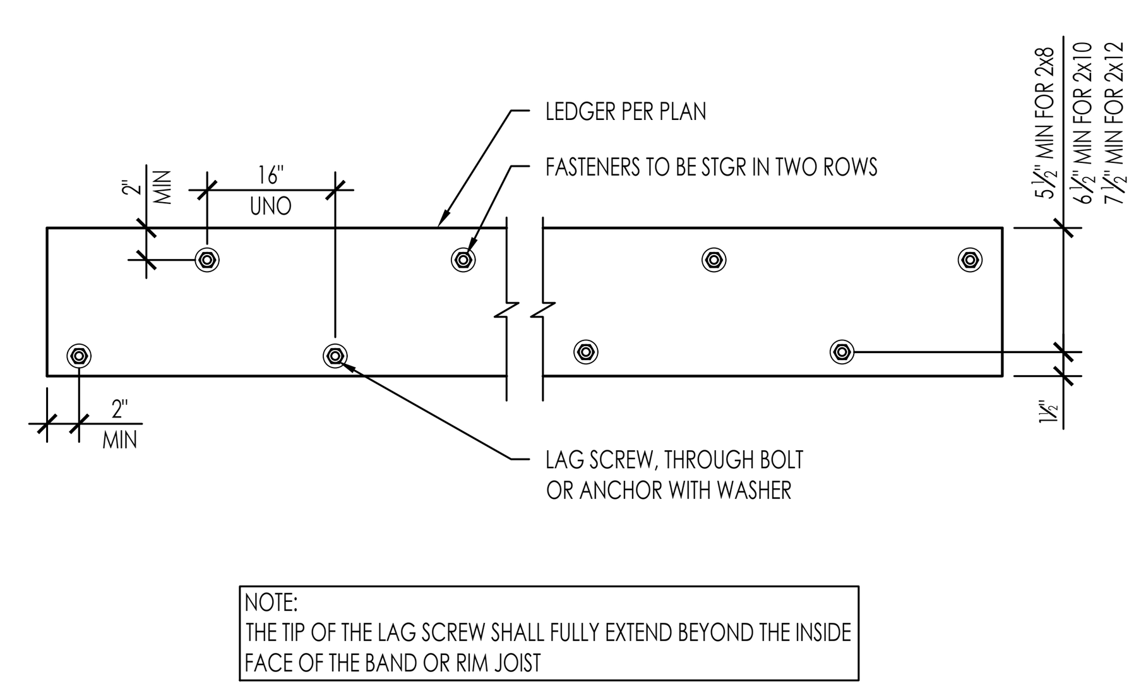
MULTI-PLY MEMBER CONNECTION

2340-01-CU21 - S401 - 13 NTS 13

54

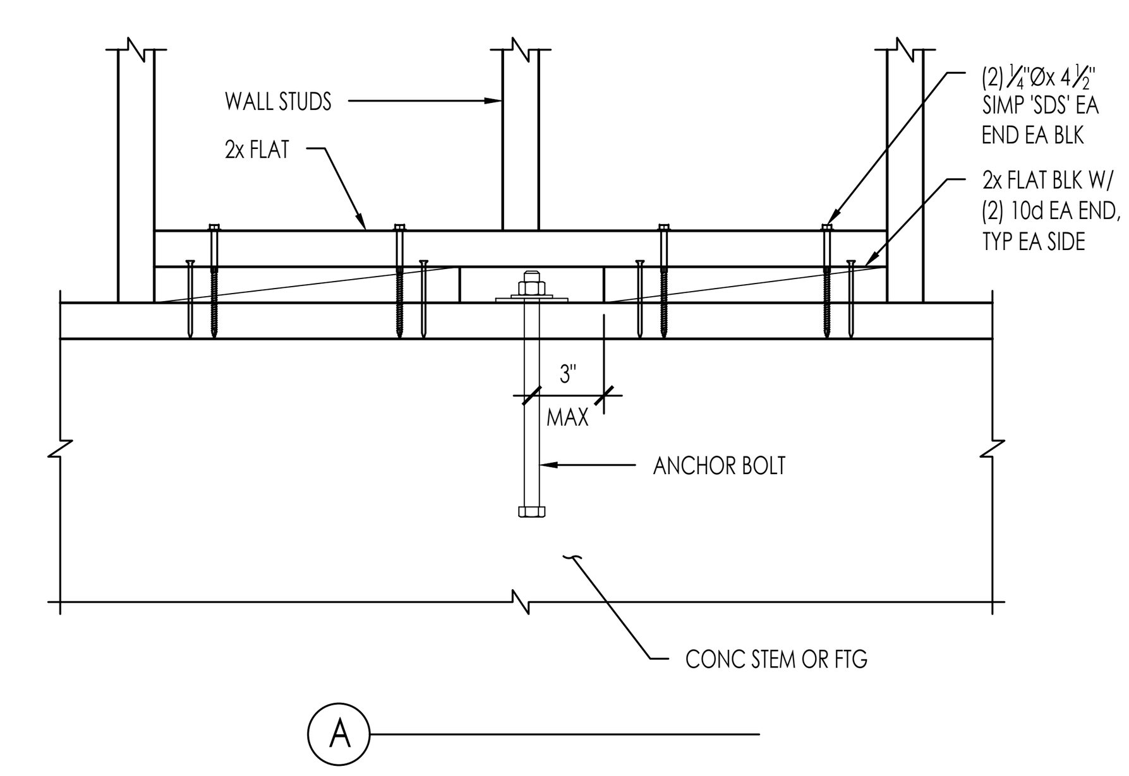
44

34



LEDGER DETAIL

2340-01-CU21 - S401 - 24 NTS 24



ANCHOR BOLT AT WOOD STUD

2340-01-CU21 - S401 - 14 NTS 14

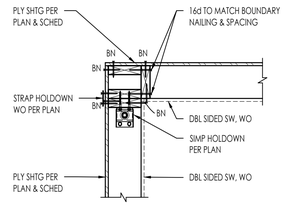
MONO COUNTY ADU PROTOTYPES

MONO COUNTY

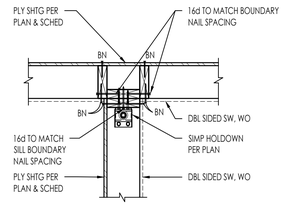
TYPICAL WOOD DETAILS

DATE
NOVEMBER 20, 2023

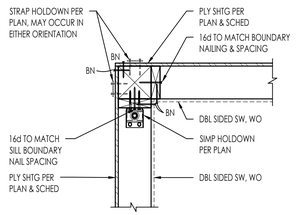
SHEET
S-401



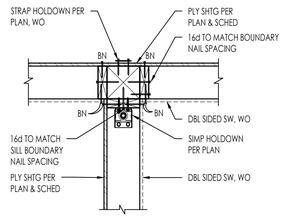
CORNER W/O POST



INTERSECTION W/O POST



CORNER W/ POST

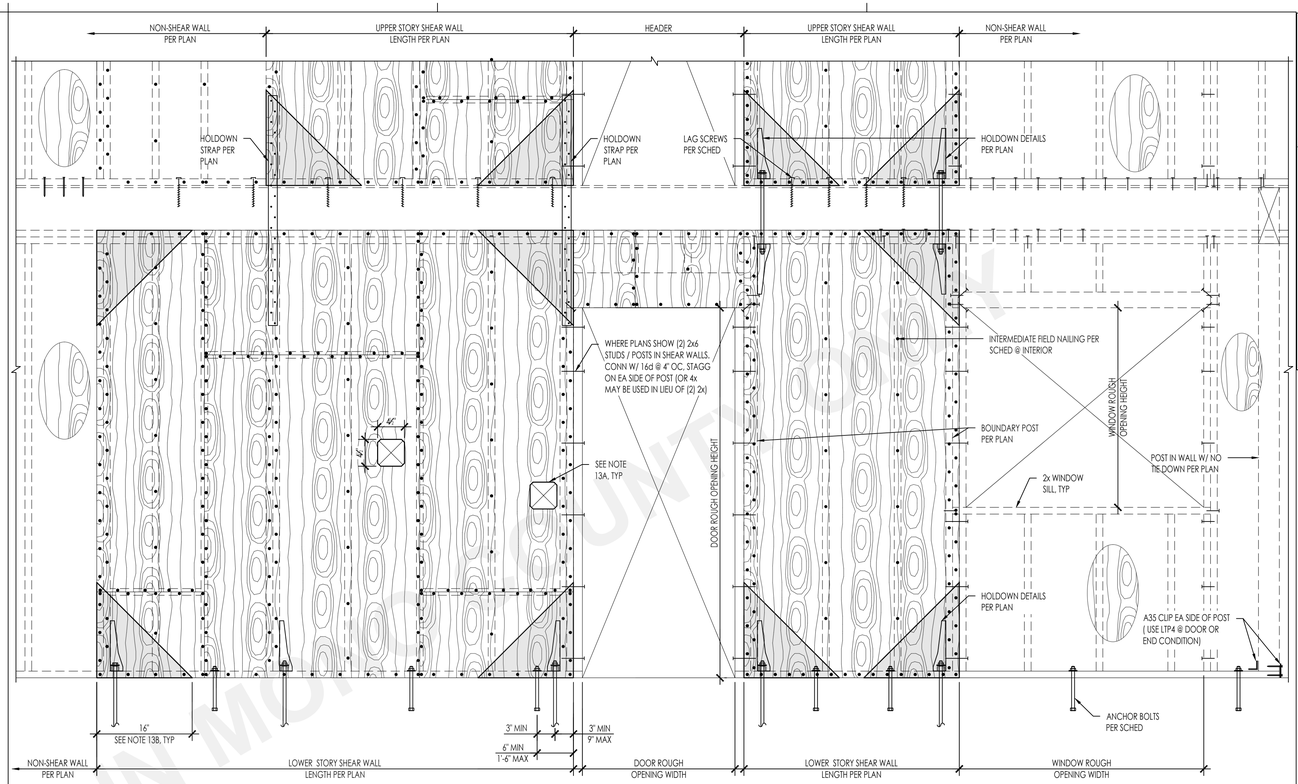


INTERSECTION W/ POST

SHEAR WALL INTERSECTION

2340-01-CU21 - S402 - 42

NTS 42



SHEAR WALL SHEATHING / NAILING SCHEDULE									
WALL SYMBOL	STRUCT SHEATHING [1,12]	FRAMING SIZE [6]	NAILING [2,3,4]			SILL NAILING [7]		A35s	ANCHOR BOLTING [10, 11]
			(2) 2x STUD	EDGE	INTERMEDIATE SUPPORTS	NAILS /LAG SCREWS [8]	SDS SCREWS OPTION [14]		
A	15/32" STRUCT 1 PLYWOOD	2x	10d @ 9" OC	8d @ 6" OC	8d @ 12" OC	16d @ 6" OC	12" OC	24" OC	5/8" DIA @ 48" OC
B	15/32" STRUCT 1 PLYWOOD	2x	10d @ 8" OC	10d @ 6" OC	10d @ 12" OC	5/8"Ø LAG SCREWS @ 16" OC	12" OC	16" OC	5/8" DIA @ 48" OC
C	15/32" STRUCT 1 PLYWOOD	2x	10d @ 5" OC	10d @ 4" OC	10d @ 12" OC	5/8"Ø LAG SCREWS @ 16" OC	8" OC	12" OC	5/8" DIA @ 32" OC
D	15/32" STRUCT 1 PLYWOOD	2x	10d @ 4" OC	10d @ 3" OC	10d @ 12" OC	5/8"Ø LAG SCREWS @ 16" OC	6" OC	8" OC	5/8" DIA @ 32" OC
E	15/32" STRUCT 1 PLYWOOD	2x	10d @ 3" OC	10d @ 2" OC	10d @ 12" OC	5/8"Ø LAG SCREWS @ 8" OC	4" OC	8" OC	5/8" DIA @ 24" OC
F	15/32" STRUCT 1 PLYWOOD (EACH FACE OF WALL)	3x	(2) 10d @ 5" OC	10d @ 4" OC	10d @ 12" OC	5/8"Ø LAG SCREWS @ 8" OC	(2) @ 8" OC *	6" OC	5/8" DIA @ 16" OC
G	15/32" STRUCT 1 PLYWOOD (EACH FACE OF WALL)	3x	(2) 10d @ 4" OC	10d @ 3" OC	10d @ 8" OC	5/8"Ø LAG SCREWS @ 8" OC	(2) @ 6" OC *	A34 @ 4" OC	5/8" DIA @ 16" OC
H	15/32" STRUCT 1 PLYWOOD (EACH FACE OF WALL)	3x	(2) 10d @ 3" OC	10d @ 2" OC	10d @ 6" OC	5/8"Ø LAG SCREWS @ 6" OC	(2) @ 4" OC *	LTP4 @ 4" OC [15]	5/8" DIA @ 8" OC

NOTES:
1. ALL PLYWOOD SHALL BE 5 PLY MINIMUM WITH A SPAN RATING OF 32/16 AND ALL PANEL EDGES SHALL BE BLOCKED. PROVIDE 1/8" GAP AT ALL PANEL JOINTS.
2. 8d NAIL DEFINED AS 0.131" DIAMETER SHANK x 2 1/2" LONG x 0.281 DIAMETER HEAD. 10d NAIL DEFINED AS 0.148" DIAMETER SHANK x 3" LONG x 0.312 DIAMETER HEAD.
3. PROVIDE E.N. AT ALL END STUDS. STUDS/POSTS WITH HOLDOWNS OR TIE DOWN STRAPS, SILL PLATES AND TOP PLATES.
4. WHERE 10d NAILS ARE 3 INCHES ON CENTER OR LESS, NAILS SHALL BE STAGGERED.
5. NAILS SHALL BE 1/2 INCH MINIMUM FROM PLYWOOD PANEL EDGE AND 3/8 INCH MINIMUM FROM CONNECTING MEMBER EDGE WHERE SHEAR EXCEEDS 300 PLF.
6. USE 3x FRAMING AT BOTTOM SILL PLATES, BLOCKING AND ALL STUDS AT ADJACENT PANEL EDGES WHERE SHEAR EXCEEDS 700 PLF. STRUCTURALLY ACCEPTABLE TO USE (2) 2x INSTEAD OF 3x FRAMING AT BOTTOM SILL PLATES.
7. WHERE SILL SHEAR TRANSFER IS THROUGH LAG SCREWS, SILL PLATE SHALL BE A MINIMUM OF 2 1/2" THICK.
8. LAG SCREWS SHALL BE 6 INCHES LONG AND HOLES ARE TO BE PRE-DRILLED AS TO NOT SPLIT BLOCKING/RIM.
9. SEE ELEVATION ABOVE FOR TYPICAL CONSTRUCTION.
10. REFER TO PLATE WASHER DETAIL FOR REQUIREMENTS
11. LENGTHEN ANCHOR BOLTS AS REQUIRED FOR EMBEDMENT AND SILL PLATE THICKNESS.
12. ORIENTED STRAND BOARD (OSB) MAY BE SUBSTITUTED FOR PLYWOOD NOTED ABOVE PROVIDED IT IS RATED BY APA'S PERFORMANCE STANDARD RATING AND IS OF THE SAME NUMBER OF LAYERS AS PLYWOOD PLY INDICATED.
13. LIMITATIONS OF MECHANICAL PENETRATIONS IN SHEAR WALLS:
    A. 4 1/2" MAX PENETRATION
    B. NO CUTS OR HOLES IN SHEATHING WITHIN 16" OF CORNERS, SQUARE PENETRATIONS SHALL RADIUS EDGES. DO NOT OVER CUT HOLE WITH SAW
14. ASSUMES A 1 1/4" MIN LSL RIM BOARD. FASTENER EDGE DIST IS 5/8" MIN & 6" END DISTANCE MIN. 2" MIN PENETRATION INTO RIM BOARD.
    * WALL W/ DOUBLE SIDED PLYWOOD REQUIRE (2) RIM BOARDS.
15. SIMPSON LTP4 CLIP SHALL BE INSTALLED IN A HORIZONTAL ORIENTATION. IF CLIP IS INSTALLED OVER THE SHEATHING, O.131" x 2 1/2" NAILS SHALL BE USED.

TYPICAL SHEAR WALL ELEVATION AND SCHEDULE

2340-01-CU21 - S402 - 13

NTS 13

STRAP AT STEP IN SHEAR WALL SILL PLATE

2340-01-CU21 - S402 - 53

NTS 53

ELEVATION

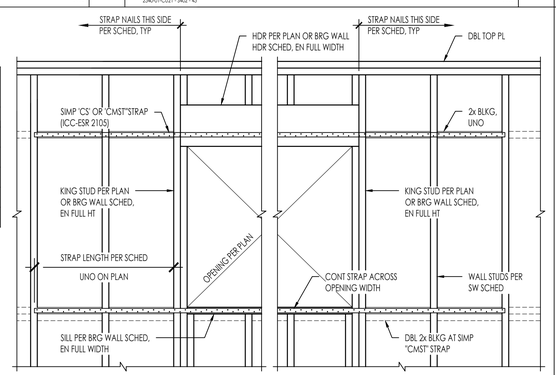
TYPICAL BLOCKING DETAIL

2340-01-CU21 - S402 - 43

NTS 43

MARK	# OF BLKG	SIMPSON STRAP	NAILS EA SIDE OF OPENING	STRAP LENGTH (IN)	ALLOWABLE TENSION LOADS (LBS)
▽	1	CS20	(12) 10d x 2½"	32"	1,030
▽	1	CS16	(20) 10d x 2½"		1,705
▽	1	CS14	(26) 10d x 2½"		2,490
▽	2	CMSTC16	(50) 10d x 3¼"		4,690
▽	2	CMST14	(66) 10d x 2½"		6,475
▽	2	CMST12	(86) 10d x 2½"	39	9,215

NOTES:
1. 2 BAYS OR 32" MIN STRAP LENGTH
2. EDGE NAILING FROM PLYWOOD TO STUDS / FRAMING SHALL OCCUR ALL AROUND OPENINGS AT THIS CONDITION
3. SEE TYPICAL SHEAR WALL ELEVATION FOR BALANCE OF INFO NOT SHOWN



FORCE TRANSFER AROUND OPENINGS

2340-01-CU21 - S402 - 44

NTS 44

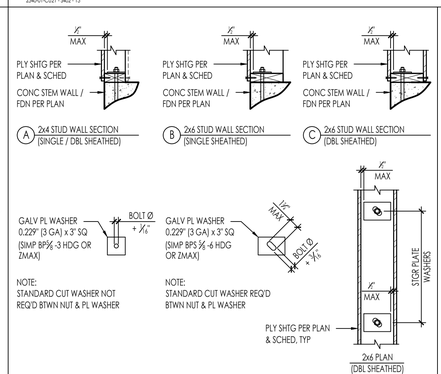
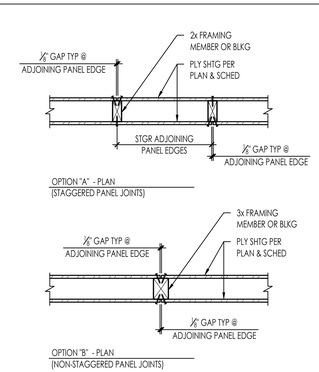


PLATE WASHER DETAIL

2340-01-CU21 - S402 - 34

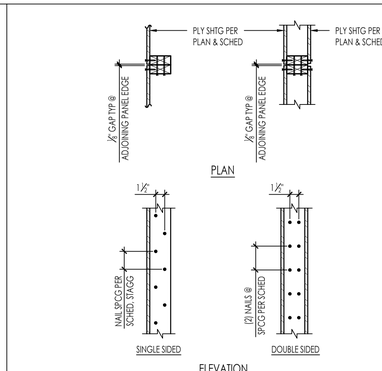
NTS 34



DOUBLE SIDED SHEAR WALL

2340-01-CU21 - S402 - 24

NTS 24



2x STUD NAILING @ ADJOINING PANEL EDGES

2340-01-CU21 - S402 - 14

NTS 14

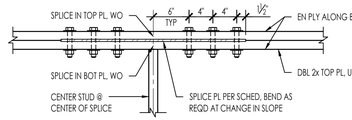
THESE PLANS ARE PROVIDED BY MONO COUNTY AS PART OF THE PRE-APPROVED ADU PROGRAM AND ARE PUBLIC DOMAIN. THERE CANNOT BE A CHARGE TO PROVIDE THESE PLANS. NO ALTERATIONS TO THESE PLANS ARE ALLOWED. ALL ALTERATIONS MUST BE DONE UNDER A SEPARATE PERMIT ONCE THE BUILDING PERMIT FOR THE ADU HAS BEEN ISSUED AND FINAL INSPECTION COMPLETED. IF YOU DO NOT HAVE THE CONSTRUCTION KNOWLEDGE AND EXPERIENCE TO CONTRUCT THESE PLANS WITHOUT FURTHER DETAILS, IT IS RECOMMENDED YOU HIRE A CONTRACTOR TO DO THE CONSTRUCTION. THE CITY WILL NOT PROVIDE FURTHER INFORMATION OR DETAILS AND BUILDING INSPECTORS WILL NOT PROVIDE STEP BY STEP INSTRUCTIONS IN THE FIELD.

MONO COUNTY ADU PROTOTYPES
MONO COUNTY

TYPICAL WOOD DETAILS

DATE
NOVEMBER 20, 2023

SHEET
S-402



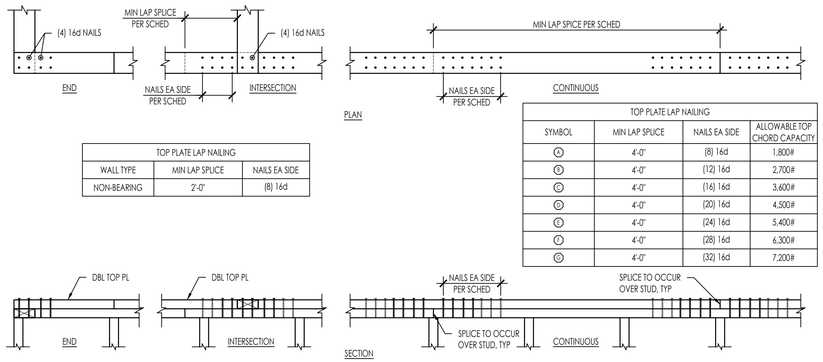
TOP PLATE SPLICE				
MARK	NO. OF BOLTS EA SIDE	SPLICE PLATE (A500 GR B)	CAPACITY (LBS)	NOTES
H	(2) ½"	¼" X 3"	9,939	@ 4" STUDS, UNO
J	(3) ½"	¼" X 3"	14,364	@ 4" STUDS, UNO
K	(4) ½"	¼" X 3"	17,842*	@ 4" STUDS, UNO
L	(2) ½"	¼" X 5"	9,750	@ 6" STUDS, MIN
M	(3) ½"	¼" X 5"	14,500	@ 6" STUDS, MIN
N	(4) ½"	¼" X 5"	18,500	@ 6" STUDS, MIN
P	(5) ½"	¼" X 5"	21,500	@ 6" STUDS, MIN
Q	(6) ½"	¼" X 5"	24,000	@ 6" STUDS, MIN

*CAPACITY LIMITED BY TOP PLATES IN TENSION

TOP PLATE SPLICE W/ STEEL TIE PLATE

2340-01-CU21 - S403 - 51

NTS 51



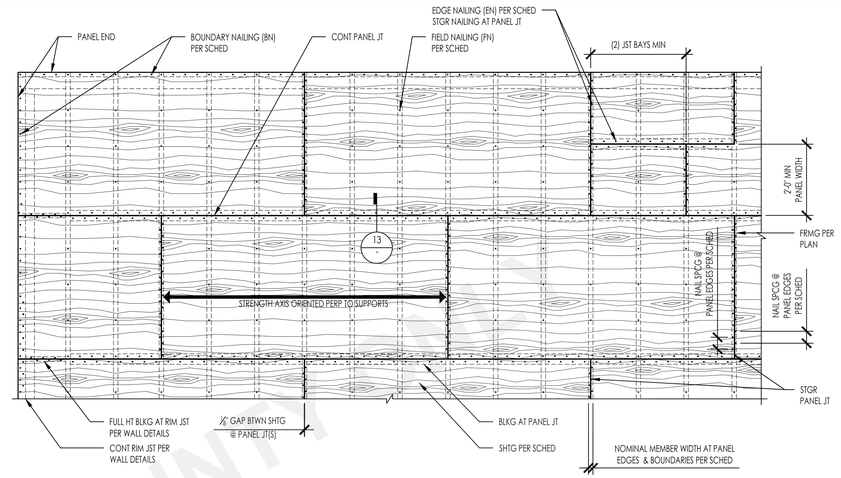
TOP PLATE LAP NAILING		
WALL TYPE	MIN LAP SPLICE	NAILS EA SIDE
NON-BEARING	2'-0"	(8) 16d

TOP PLATE LAP NAILING			
SYMBOL	MIN LAP SPLICE	NAILS EA SIDE	ALLOWABLE TOP CHORD CAPACITY
A	4'-0"	(8) 16d	1,800#
B	4'-0"	(12) 16d	2,700#
C	4'-0"	(16) 16d	3,600#
D	4'-0"	(20) 16d	4,500#
E	4'-0"	(24) 16d	5,400#
F	4'-0"	(28) 16d	6,300#
G	4'-0"	(32) 16d	7,200#

DBL TOP PLATE SPLICE NAILING

2340-01-CU21 - S403 - 31

NTS 31



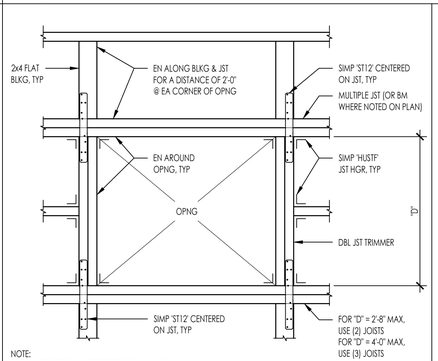
DIAPHRAGM SCHEDULE												
TYPE	LOCATION	SHEATHING THICKNESS	SHEATHING GRADE	SPAN RATING	BLOCKING	NAILS	BOUNDARY NAILING (BN)	EDGE NAILING AT CONT. PANEL EDGES (EN)	EDGE NAILING AT OTHER PANEL EDGES (EN)	FIELD NAILING (FN)	PANEL EDGE SUPPORT OR NOMINAL MEMBER WIDTH AT PANEL EDGES	LINES OF FASTENERS
A	ROOF	⅜"	SHEATHING	40 / 20	NO	10d	6	-	6	12	H-CLIPS	1
B	ROOF	⅜"	SHEATHING	40 / 20	YES	10d	6	6	6	12	T&G	1
C	ROOF	1"	SHEATHING	54 / 32	YES	10d	4	6	6	12	2x4 FLAT	1
D	FLOOR	23/32"	STURD-I-FLOOR	48 / 24	NO	10d	6	-	6	12	T&G	1

NOTES:
1. DIAPHRAGM SHALL BE GLUED TO FLOOR FRAMING PRIOR TO NAILING. REFER TO PROJECT GENERAL NOTES.
2. MINIMUM EDGE DISTANCE FOR NAILS SHALL BE ⅜" FROM SHEATHING EDGE AND ½" FROM LUMBER EDGE.
3. NAILS SHALL BE DRIVEN TIGHT TO TOP OF PLYWOOD SURFACE AND SHALL NOT PENETRATE THE TOP OF PLYWOOD MORE THAN COMMONLY EXPECTED WITH HAMMER DRIVEN NAILS.
4. WHERE H-CLIPS ARE SPECIFIED, THEY SHOULD BE INSTALLED AS FOLLOWS:
   A. ONE H-CLIP SHALL BE PLACED BETWEEN ABUTTING PANELS AT A LOCATION MIDWAY BETWEEN EACH PAIR OF TRUSSES, RAFTERS OR JOISTS. HOWEVER, (2) H-CLIPS ARE REQUIRED BETWEEN SUPPORTS WHEN SPACED 48 INCHES ON CENTER
   B. USE THE SAME SIZE PANEL EDGE CLIP AS THE PANEL THICKNESS. H-CLIPS MUST FIT SNUGLY
   C. ABUTTING WOOD STRUCTURAL PANELS BE FITTED AS CLOSELY AS CLIPS PERMIT. OCCASIONAL MISFIT OF ABUTTING SHEETS MAY BE TOLERATED PROVIDING THAT GAPS DO NOT EXCEED MAXIMUM OPENING OF ½".

PLYWOOD DIAPHRAGM SHEATHING

2340-01-CU21 - S403 - 12

NTS 12

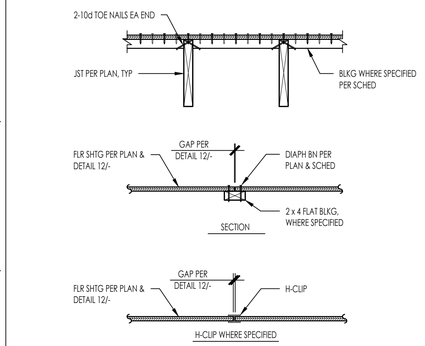


NOTE:
FOR LARGER OPENINGS REFER TO FRAMING PLAN

OPENING AT FRAMING

2340-01-CU21 - S403 - 23

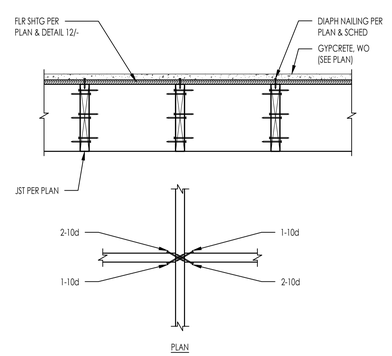
NTS 23



DIAPHRAGM PANEL JOINTS

2340-01-CU21 - S403 - 13

NTS 13



TYP JOIST BLOCKING

2340-01-CU21 - S403 - 14

NTS 14

MONO COUNTY ADU PROTOTYPES

MONO COUNTY

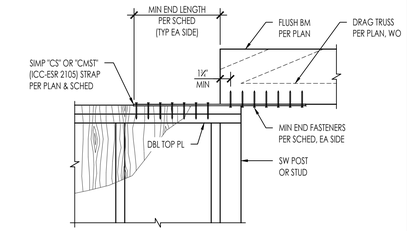
TYPICAL WOOD DETAILS

DATE

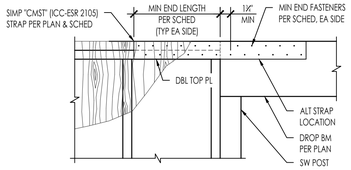
NOVEMBER 20, 2023

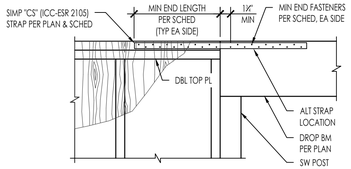
SHEET

S-403

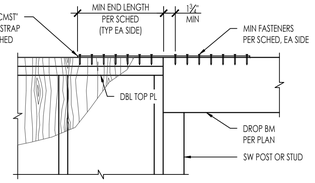


A STRAP TO BOTTOM OF FLUSH BEAM





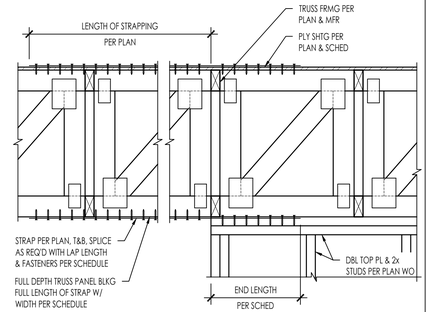
B STRAP TO FACE OF DROP BEAM



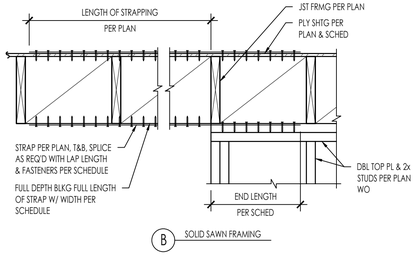
C STRAP TO TOP OF DROP BEAM

STRAP MODEL	END FASTENERS	END LENGTH (IN)	ALLOWABLE TENSION LOADS (lbs)
CS16	(20) 10d	11	1,705
	(22) 8d	13	
CS14	(26) 10d	15	2,490
	(30) 8d	16	
CMSTC16	(50) 16d	20	4,690
CMST14	(56) 16d	26	6,475
	(66) 10d	30	
CMST12	(74) 16d	33	9,215
	(86) 10d	39	

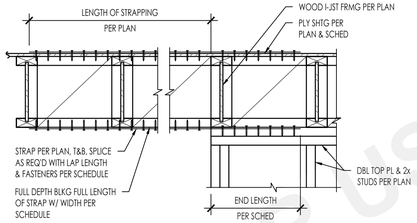
DRAG STRAP AT BEAM-TO-WALL
2340-01-C\121 - S404 - 53 NTS 53



A WOOD TRUSS FRAMING



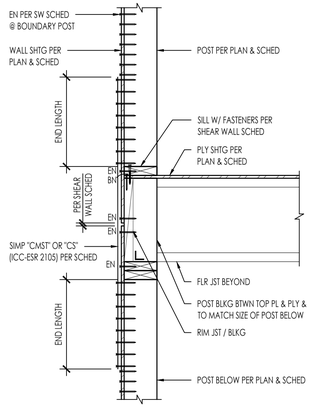
B SOLID SAWN FRAMING



C TJI FRAMING

STRAP MODEL	END FASTENERS	END LENGTH (IN)	FASTENERS PER SPLICE	SPLICE LENGTH (IN)	MIN BLKG WIDTH	ALLOWABLE TENSION LOADS (lbs)
CS16	(20) 10d	11	(5) 10d	8	1½"	1,705
	(22) 8d	13	(6) 8d	9		
CS14	(26) 10d	15	(6) 10d	9	1½"	2,490
	(30) 8d	16	(7) 8d	10		
CMSTC16	(50) 16d	20	(11) 16d	10	3½"	4,690
	(50) 16d	20	(11) 16d	10		
CMST14	(56) 16d	26	(13) 16d	14	3½"	6,475
	(66) 10d	30	(15) 10d	15		
CMST12	(74) 16d	33	(18) 16d	18	3½"	9,215
	(86) 10d	39	(22) 10d	21		

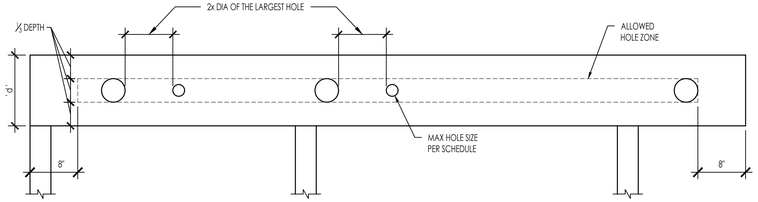
BLOCK & STRAP PERP TO FRMG
2340-01-C\121 - S404 - 43 NTS 43



NOTE:
PLYWOOD FIELD NAILING NOT SHOWN FOR CLARITY. REFER TO DIAPHRAGM AND SHEAR WALL SCHEDULE

MARK	STRAP MODEL	FASTENERS	END LENGTH (IN)	ALLOWABLE TENSION LOADS (lbs)
2A	CS16	22-10d	11	1,705
2B	CS14	30-10d	15	2,490
2C	CMSTC16	50-16d SINKER	20	4,585
2D	CMST14	56-10d	26	6,490
		66-10d	30	
2E	CMST12	74-16d	33	9,215
		86-10d	39	

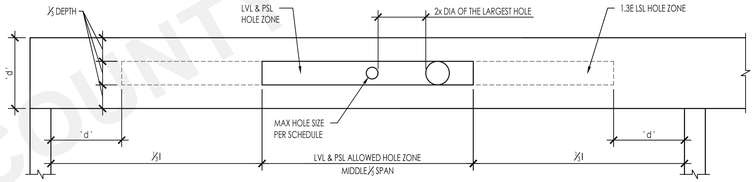
STRAP ACROSS FLOOR
2340-01-C\121 - S404 - 32 NTS 32



1.55E LSL BEAMS & HEADERS	
HEADER OR BEAM DEPTH	MAX ROUND HOLE SIZE
9 ¼"	3"
11 ⅞"	3 ½"
14" - 16"	4 ½"

1.55E LSL NOTES:
1. ALLOWED HOLE ZONE SUITABLE FOR HEADERS AND BEAMS WITH UNIFORM AND/OR CONCENTRATED LOADS ANYWHERE ALONG THE MEMBER.
2. ROUND HOLES ONLY.
3. NO HOLES IN HEAERS OR BEAMS IN PLANK ORIENTATION.

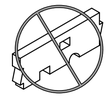
A 1.55E LSL HEADERS & BEAMS



LVL, PSL, & 1.3E LSL BEAMS & HEADERS	
HEADER OR BEAM DEPTH	MAX ROUND HOLE SIZE
4 ⅜"	1"
5 ¼"	1 ¾"
7 ¼" - 20"	2"

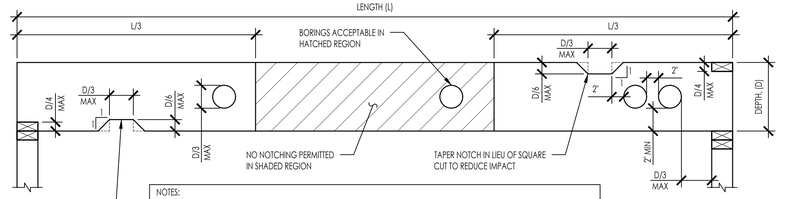
LVL/PSL/1.3E LSL:
1. ALLOWED HOLE ZONE SUITABLE FOR HEADERS AND BEAMS WITH UNIFORM LOADS ONLY.
2. ROUND HOLES ONLY.
3. NO HOLES IN CANTILEVERS.
4. NO HOLES IN HEADERS OR BEAMS IN PLANK ORIENTATION.

B LVL, PSL, & 1.3E LSL HEADERS & BEAMS



DO NOT CUT, NOTCH, OR DRILL HOLES IN HEADERS OR BEAMS EXCEPT AS INDICATED IN THE ILLUSTRATIONS AND TABLES

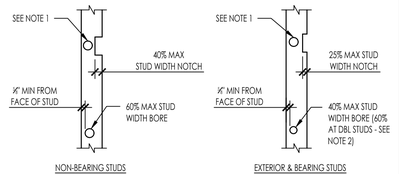
ALLOWABLE HOLES THRU ENGINEERED LUMBER HEADERS & BEAMS
2340-01-C\121 - S404 - 12 NTS 12



NOTES:
1. NOTCHING AND BORING NOT PERMITTED IN THE SAME JOIST CROSS SECTION WITHOUT STRUCTURAL ENGINEER'S APPROVAL.
2. NOTCH WIDTHS GREATER THAN SHOWN IN TABLE NOT PERMITTED WITHOUT STRUCTURAL ENGINEER'S APPROVAL.
3. NO NOTCHES OR HOLES PERMITTED ANYWHERE IN CANTILEVERED ELEMENTS WITHOUT STRUCTURAL ENGINEER'S APPROVAL

NOTCH AND HOLE LIMITATIONS				
JOIST SIZE	MAX HOLE	MAX NOTCH DEPTH	MAX END NOTCH	MAX NOTCH LENGTH
2X4	NONE	NONE	NONE	NONE
2X6	1 ½"	⅝"	1 ⅜"	1 ½"
2X8	2 ½"	1 ¼"	1 ⅞"	2 ½"
2X10	3"	1 ½"	2 ⅛"	3"
2X12	3 ¾"	1 ⅞"	2 ⅞"	3 ¾"

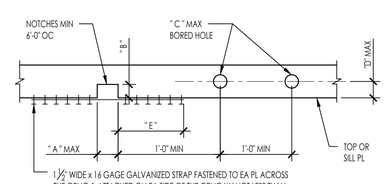
SAWN LUMBER AND RAFTER JOIST NOTCHING AND BORING LIMITATIONS
2340-01-C\121 - S404 - 13 NTS 13



MAXIMUM BORED HOLE DIAMETER/NOTCH DEPTH			
STUD SIZE (IN)	APPLICATION	MAX HOLE DIAMETER (IN)	MAX NOTCH DEPTH (IN)
2X4	NON-BEARING	2 ⅛"	1 ⅜"
	EXTERIOR/BEARING	1 ⅜"	⅞"
2X6	NON-BEARING	3 ¼"	2 ⅜"
	EXTERIOR/BEARING	2 ¾"	1 ⅜"

NOTES:
1. NOTCHING AND BORING NOT PERMITTED IN THE SAME STUD SECTION.
2. NO MORE THAN 2 SUCCESSIVE DBL. STUDS ARE PERMITTED TO HAVE 60% MAX BORED HOLES.

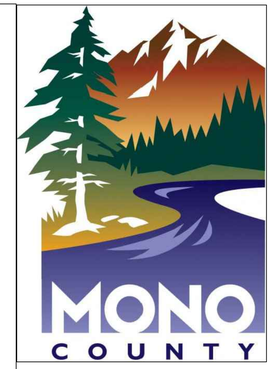
TYP WALL NOTCH AND BORING LIMITATIONS
2340-01-C\121 - S404 - 24 NTS 24



1½" WIDE x 16 GAGE GALVANIZED STRAP FASTENED TO EA PL ACROSS THE OPNG & ATTACHED ON EA SIDE OF THE OPNG W/ NOT LESS THAN "F" 16d COMMON NAILS

NOTCH AND HOLE LIMITATIONS						
TOP PL OR SILL PL	A	B	C	D	E	F
2X4	3½"	1½"	1¼"	1½"	5¾"	6
2X6	4½"	2¼"	2¼"	2½"	8¼"	9
2X8	5½"	3"	3¼"	3½"	12¼"	12

TOP PL AND SILL NOTCH AND BORING LIMITATIONS
2340-01-C\121 - S404 - 14 NTS 14

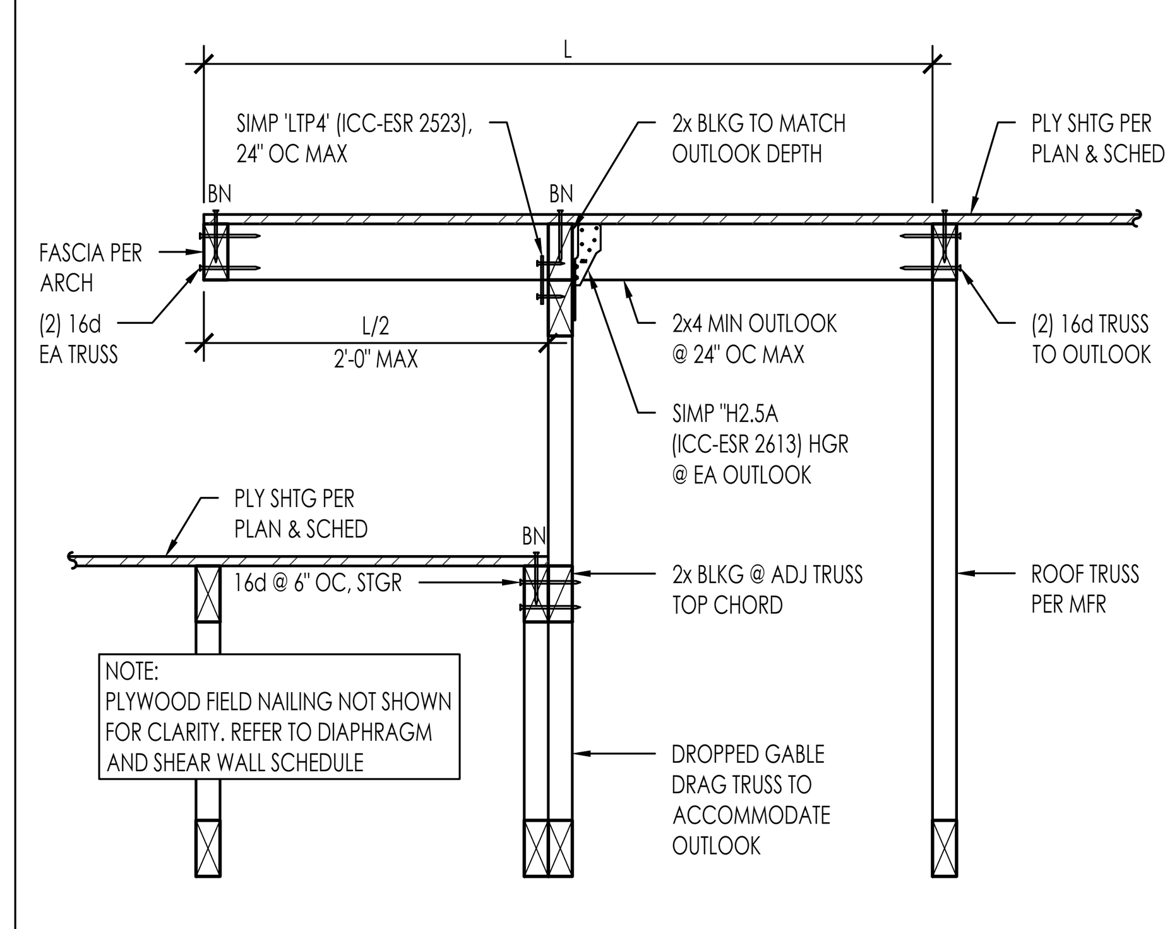


MONO COUNTY ADU PROTOTYPES
MONO COUNTY

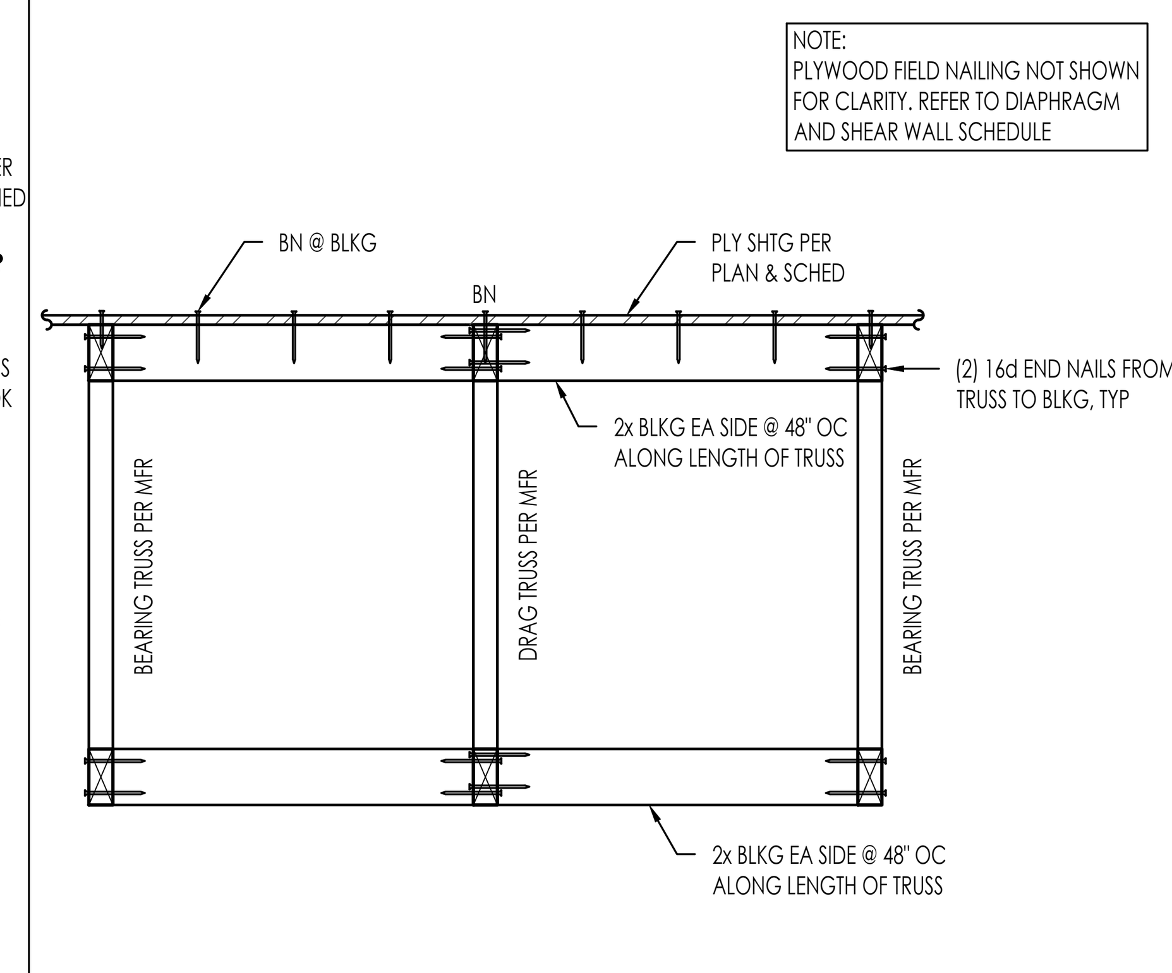
TYPICAL WOOD DETAILS

DATE
NOVEMBER 20, 2023

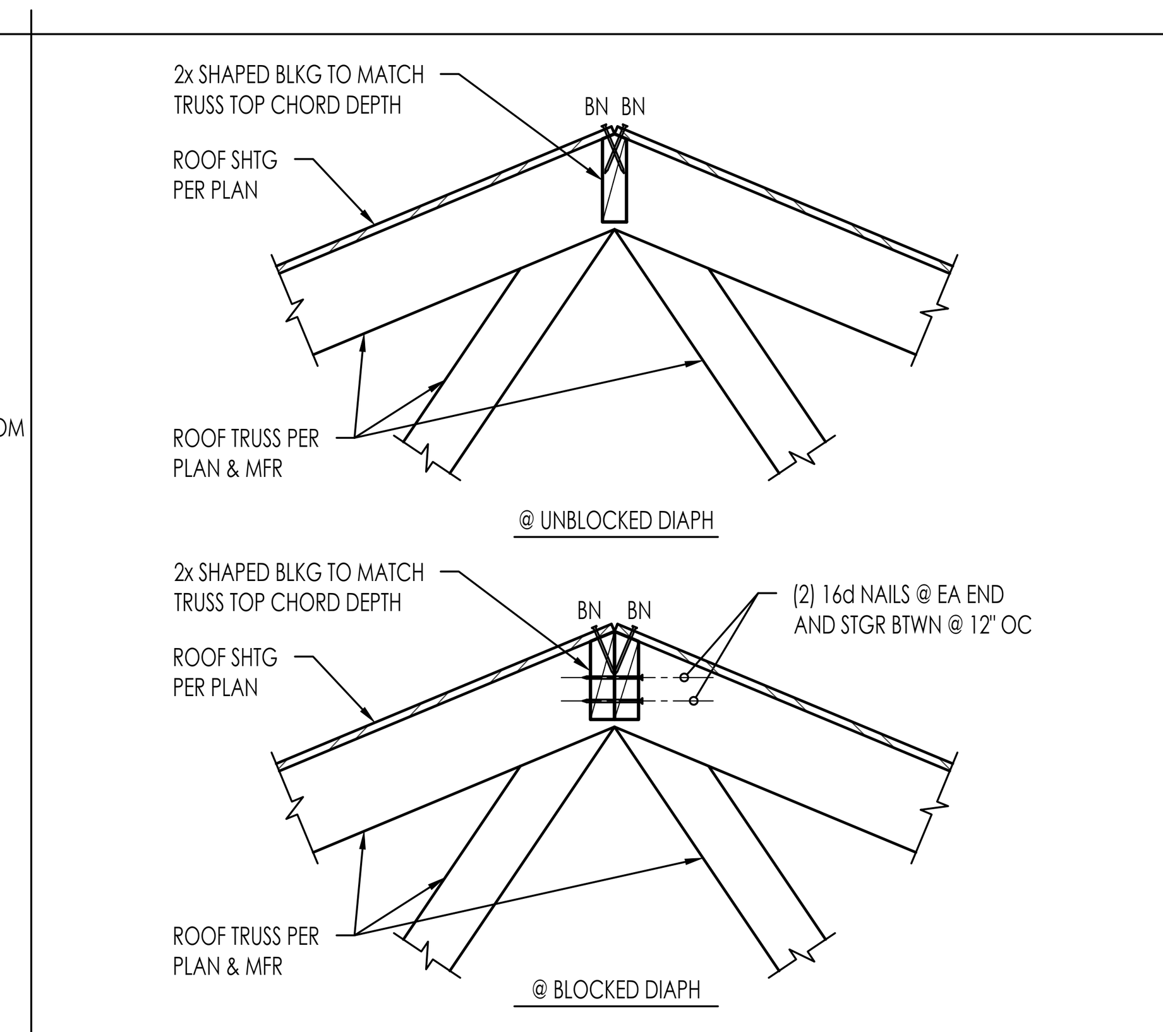
SHEET
S-404



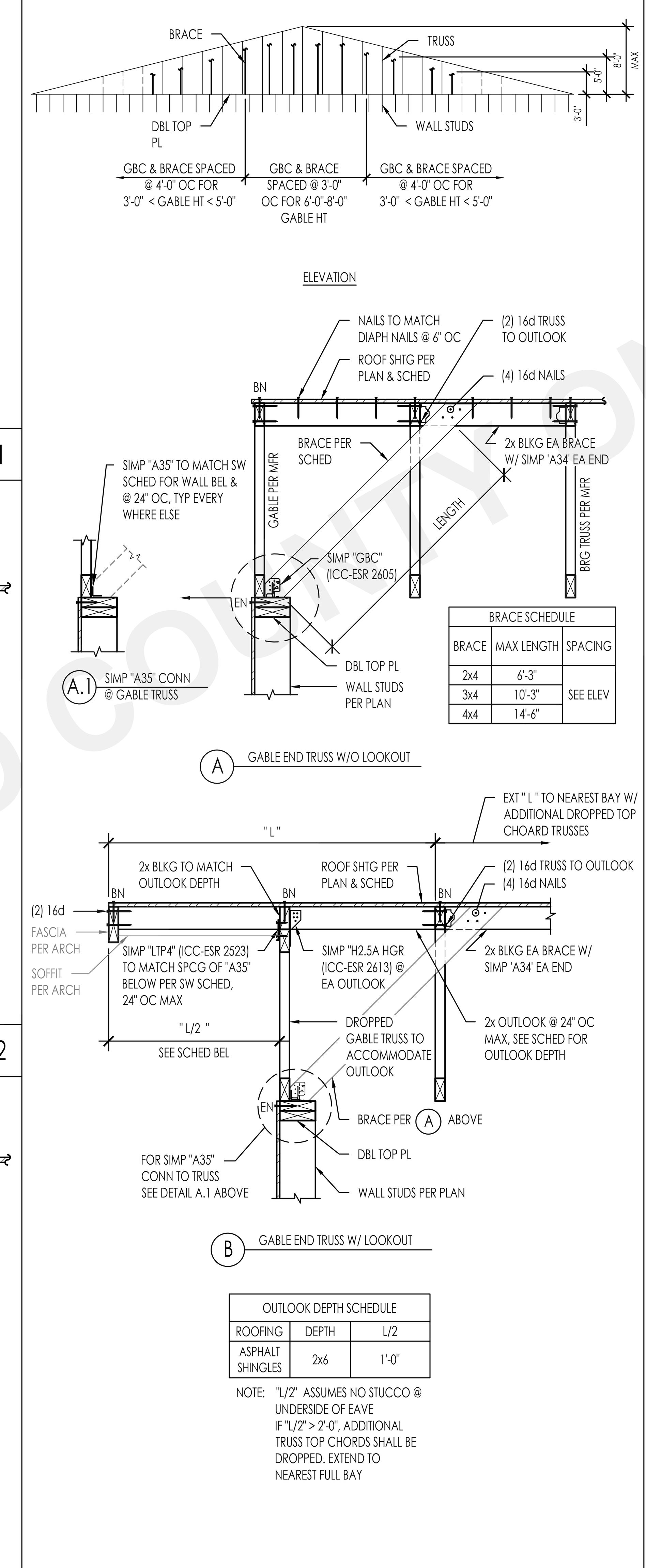
DIAPH TRANSITION W/ OVERHANG — 1" = 1'-0" — 51



INTERIOR DRAG TRUSS — 1" = 1'-0" — 41



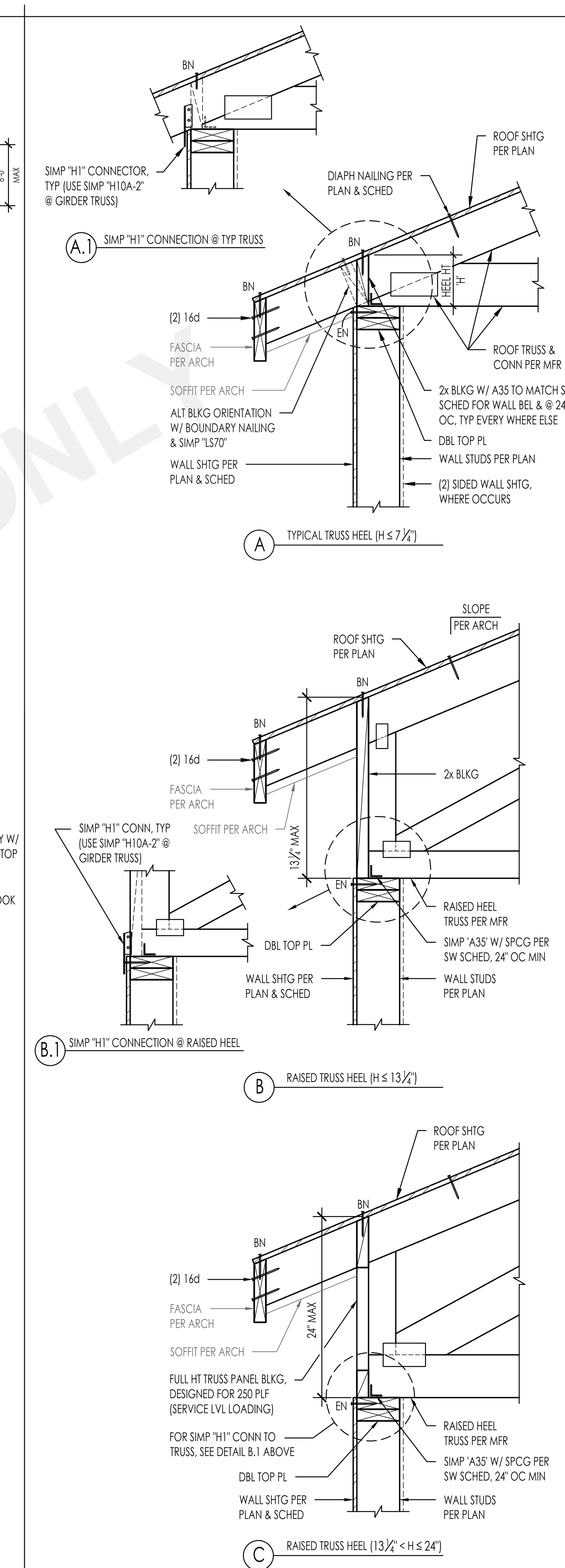
SHEATHING OVER ROOF RIDGE — 1" = 1'-0" — 31



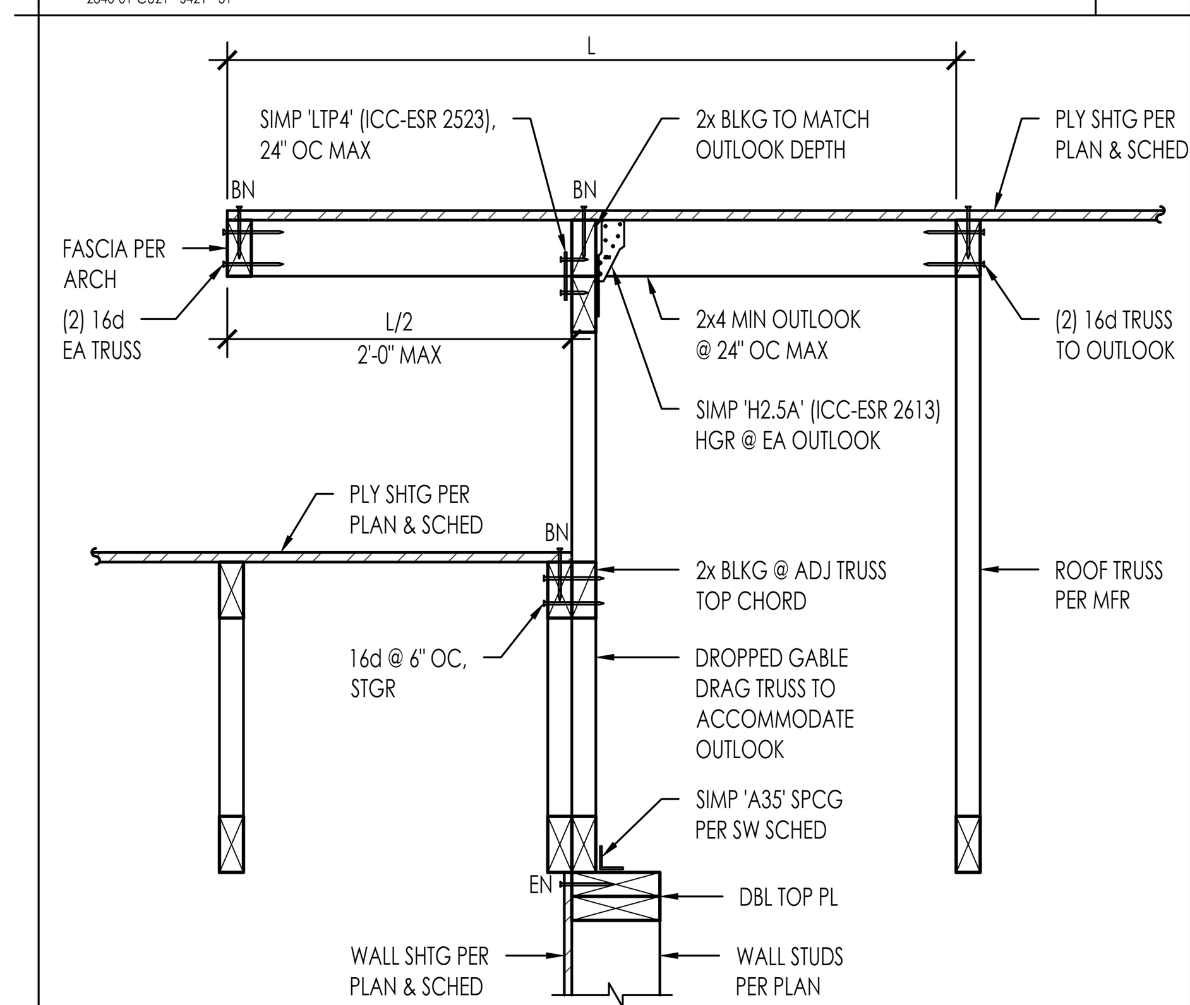
BRACE SCHEDULE		
BRACE	MAX LENGTH	SPACING
2x4	6'-3"	SEE ELEV
3x4	10'-3"	
4x4	14'-6"	

OUTLOOK DEPTH SCHEDULE		
ROOFING	DEPTH	L/2
ASPHALT SHINGLES	2x6	1'-0"

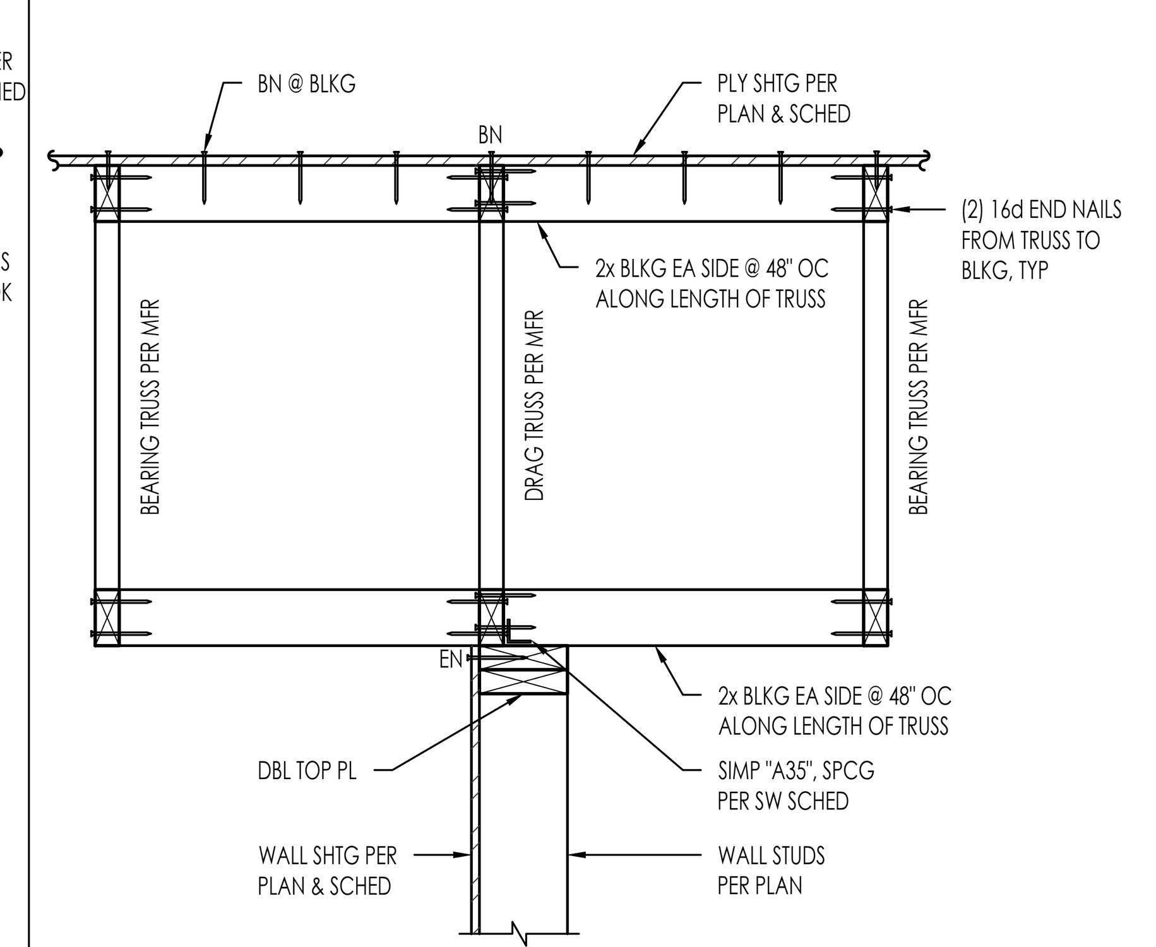
GABLE END TRUSS — NTS — 23



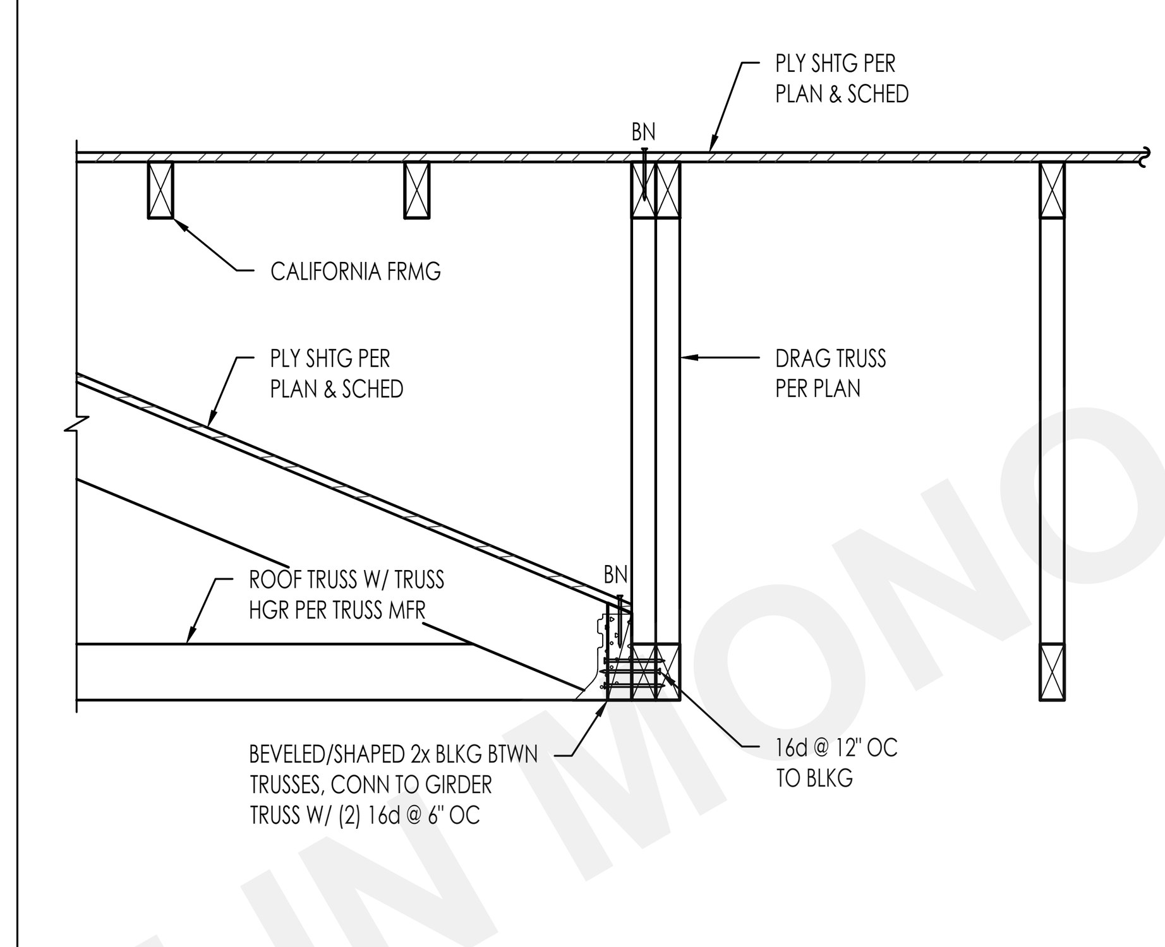
ROOF TRUSS PERP TO EXTERIOR WALL — NTS — 13



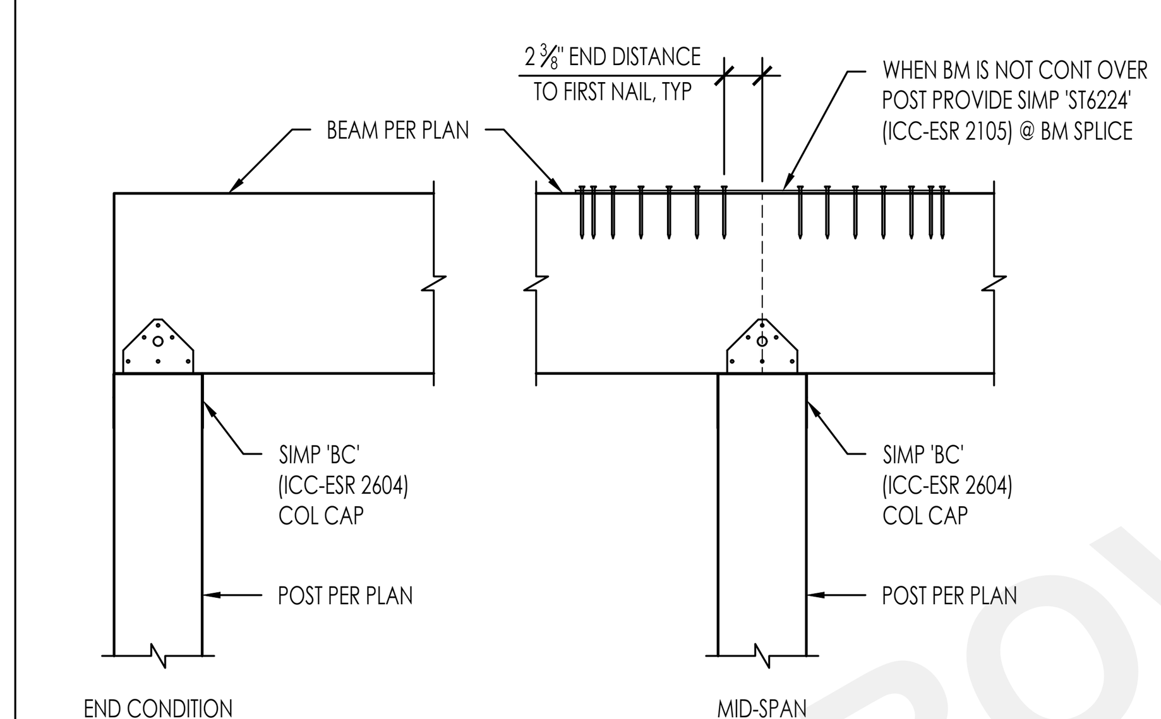
DIAPH TRANSITION W/ OVERHANG — 1" = 1'-0" — 52



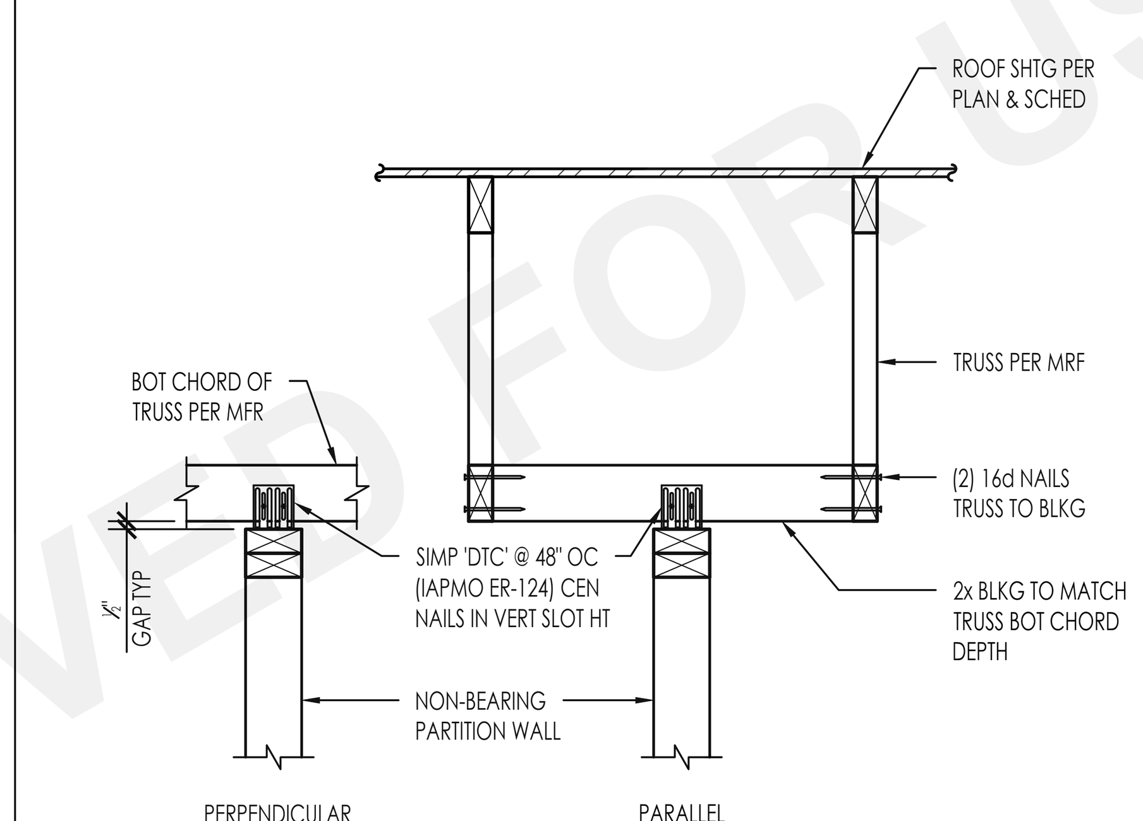
INTERIOR SHEAR WALL (ROOF TRUSS PARALLEL) — 1" = 1'-0" — 42



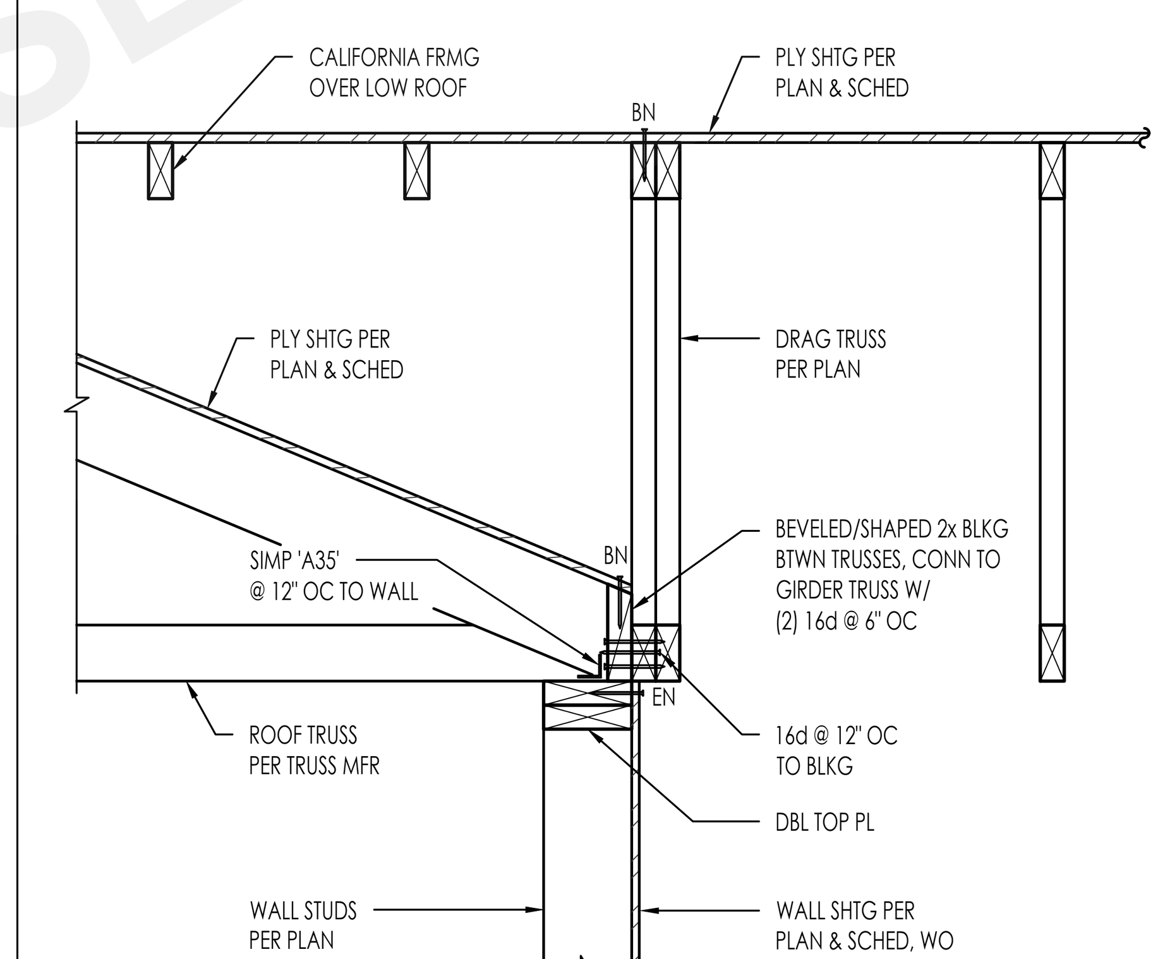
TRUSS TO GIRDER TRUSS — 1" = 1'-0" — 32



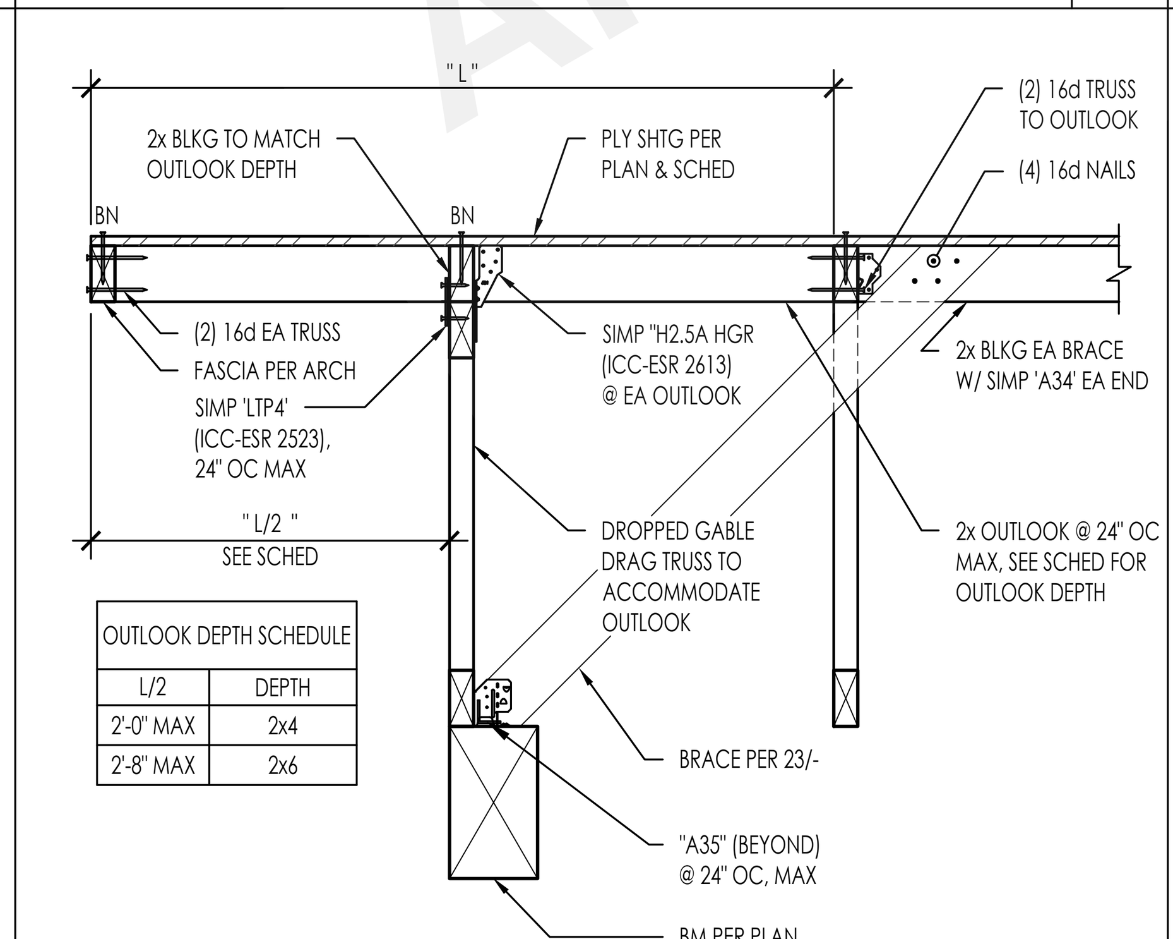
BEAM TO POST CONNECTION — 1" = 1'-0" — 53



TRUSS OVER NON-BEARING PARTITION — 1" = 1'-0" — 43

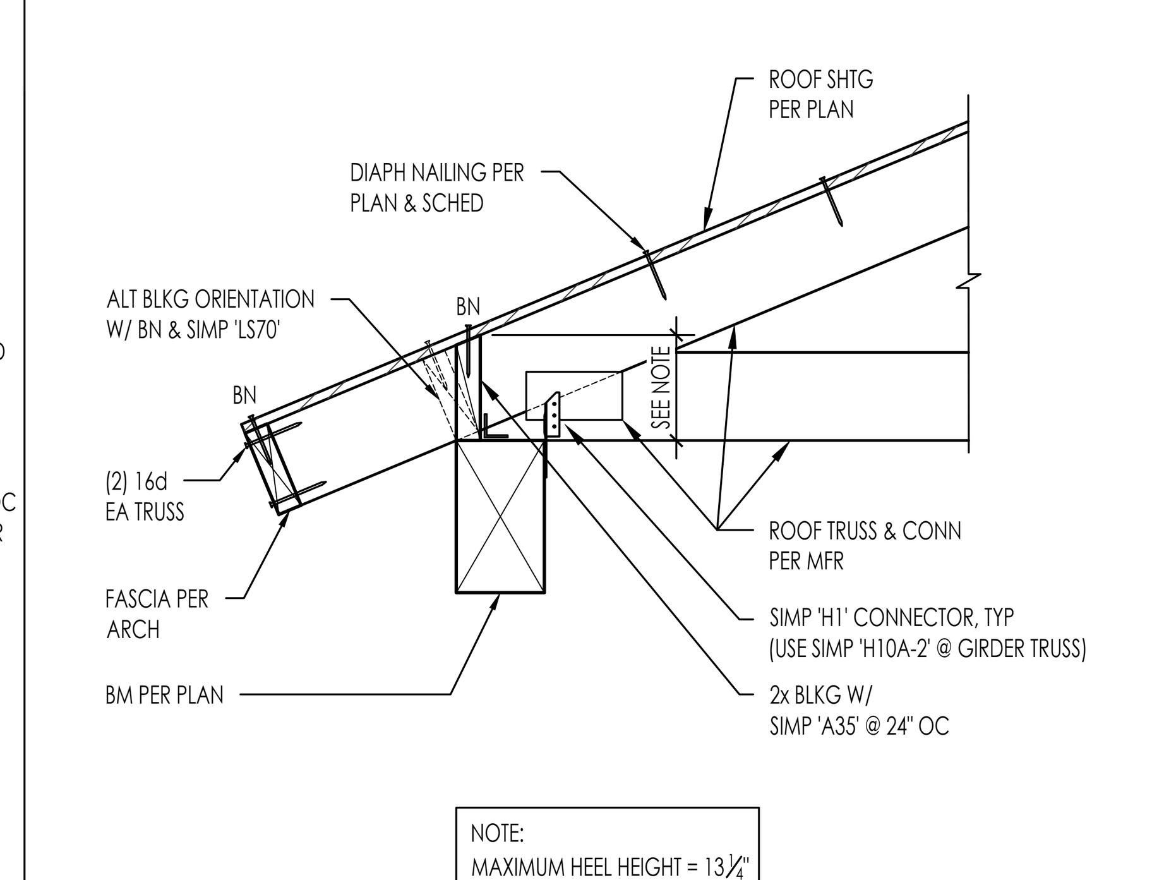


TRUSS TO GIRDER TRUSS W/ WALL BELOW — 1" = 1'-0" — 33

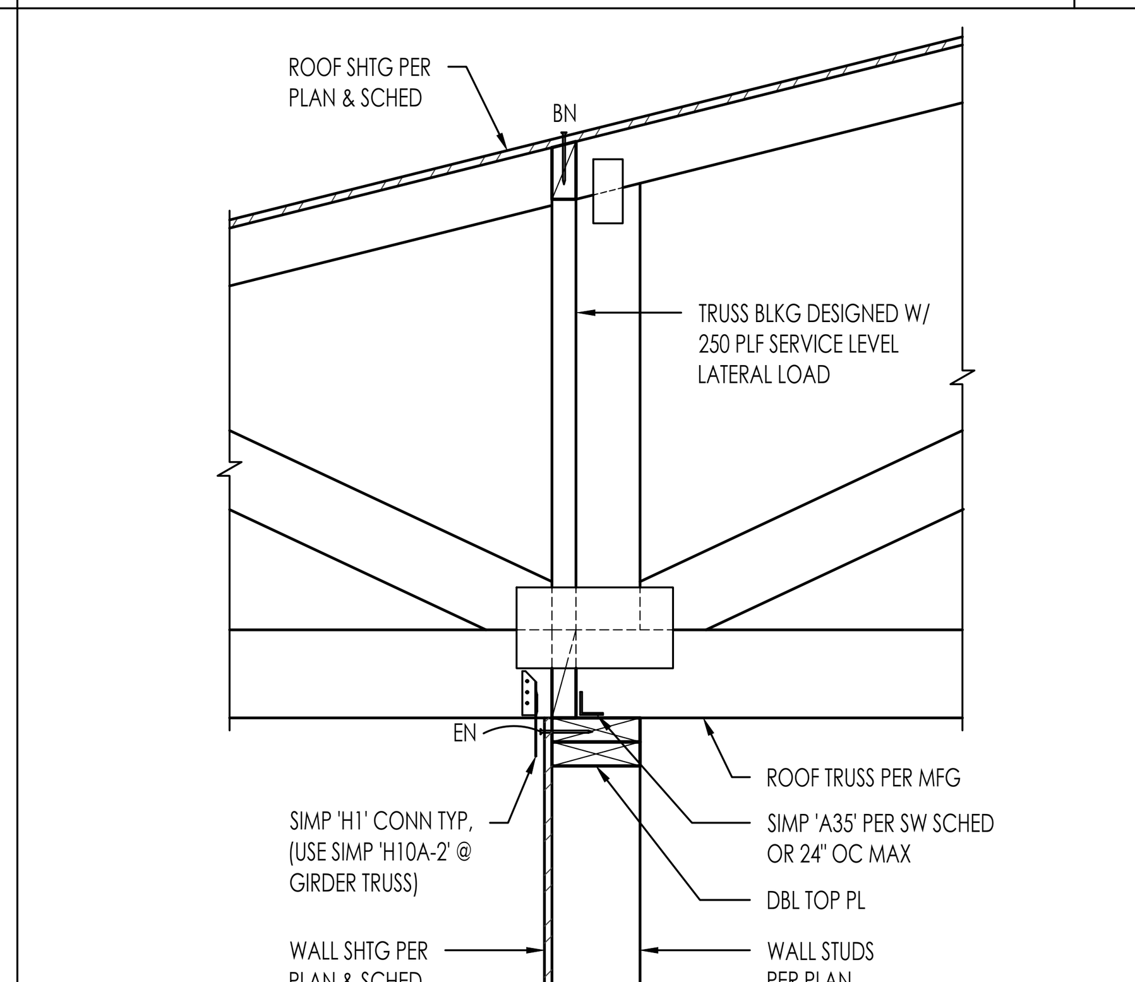


OUTLOOK DEPTH SCHEDULE	
L/2	DEPTH
2'-0" MAX	2x4
2'-8" MAX	2x6

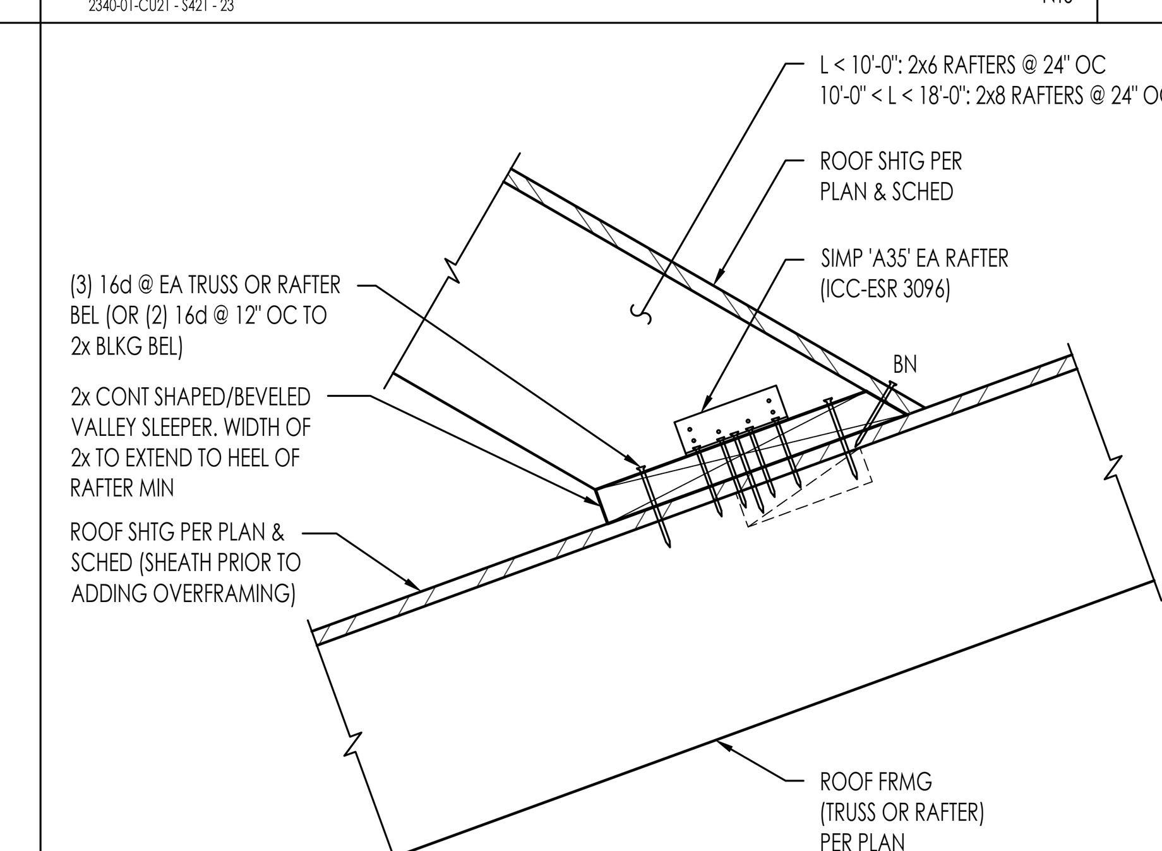
GABLE END TRUSS W/ LOOKOUT @ BEAM — 1" = 1'-0" — 54



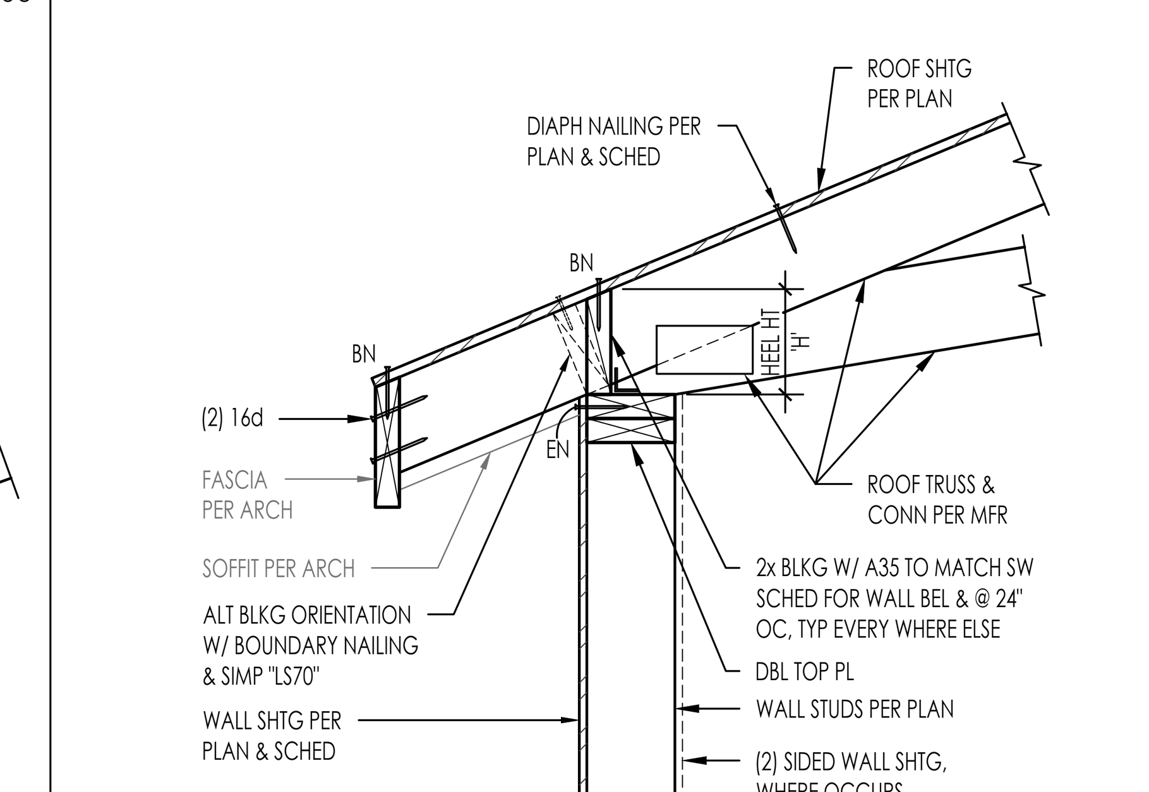
ROOF TRUSS PERP TO BEAM — 1" = 1'-0" — 44



TRUSS INTERIOR BEARING WALL — 1" = 1'-0" — 34



CALIFORNIA FRAMING SLEEPER — NTS — 24



ROOF TRUSS PERP TO EXTERIOR WALL — NTS — 14

APPROVED FOR USE IN MONO COUNTY ONLY

MONO COUNTY

THESE PLANS ARE PROVIDED BY MONO COUNTY AS PART OF THE PRE-APPROVED ADU PROGRAM AND ARE PUBLIC DOMAIN. THERE CANNOT BE A CHARGE TO PROVIDE THESE PLANS. NO ALTERATIONS TO THESE PLANS ARE ALLOWED. ALL ALTERATIONS MUST BE DONE UNDER A SEPARATE PERMIT ONCE THE BUILDING PERMIT FOR THE ADU HAS BEEN ISSUED AND FINAL INSPECTION COMPLETED. IF YOU DO NOT HAVE THE CONSTRUCTION KNOWLEDGE AND EXPERIENCE TO CONTRACT THESE PLANS WITHOUT FURTHER DETAILS, IT IS RECOMMENDED YOU HIRE A CONTRACTOR TO DO THE CONSTRUCTION. THE CITY WILL NOT PROVIDE FURTHER INSTRUCTION OR DETAILS AND BUILDING INSPECTORS WILL NOT PROVIDE STEP BY STEP INSTRUCTIONS IN THE FIELD.

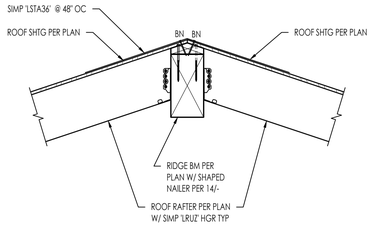
MONO COUNTY ADU PROTOTYPES

MONO COUNTY

ROOF FRAMING DETAILS

DATE
NOVEMBER 20, 2023

SHEET
S-421



51

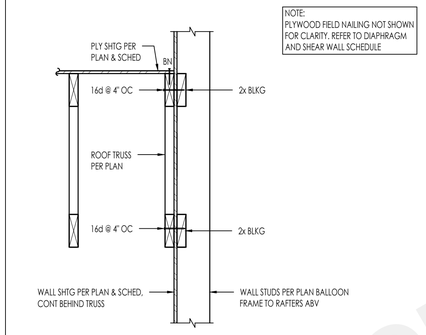
41

ROOF RIDGE

2340-01-CU21 - S422 - 32

1" = 1'-0"

31

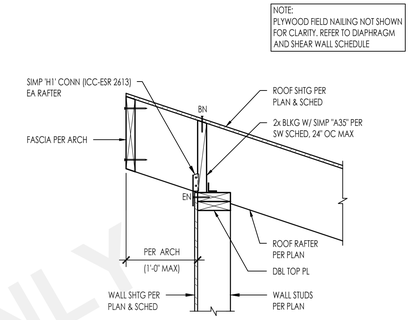


TRUSS ROOF @ BALLOON FRAMING

2340-01-CU21 - S422 - 21

1" = 1'-0"

21



RAFTER @ EXTERIOR SHEAR WALL

2340-01-CU21 - S422 - 11

1" = 1'-0"

11

52

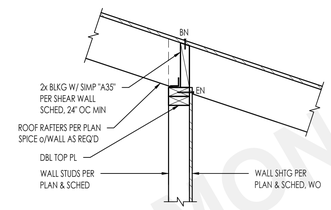
42

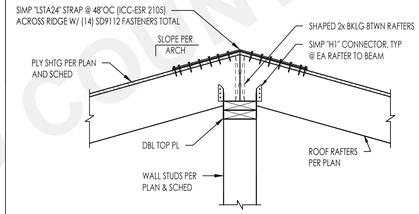
RAFTER TO WALL BELOW

2340-01-CU21 - S422 - 32

1" = 1'-0"

32



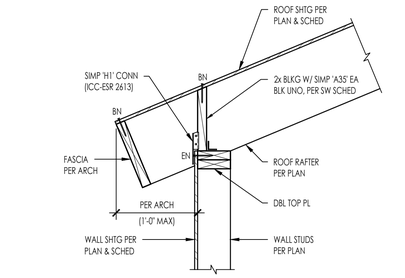


RIDGE @ WALL BELOW

2340-01-CU21 - S422 - 22

1" = 1'-0"

22



RAFTER @ EXTERIOR SHEAR WALL

2340-01-CU21 - S422 - 12

1" = 1'-0"

12

53

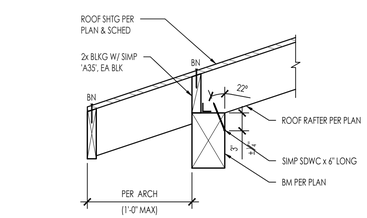
43

ROOF RAFTER TO BEAM

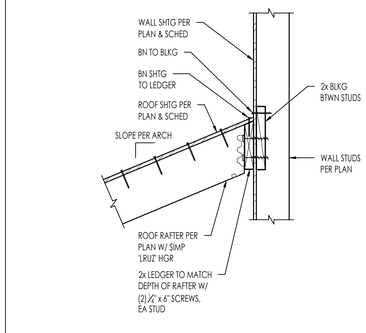
2340-01-CU21 - S422 - 33

1" = 1'-0"

33



NOTES:
1. PLYWOOD FIELD NAILING NOT SHOWN FOR CLARITY. REFER TO DIAPHRAGM AND SHEAR WALL SCHEDULE
2. REFER TO GENERAL NOTES FOR GUILDELINES ON EXPOSED MEMBERS AND CONNECTORS AT EXTERIOR CONDITION

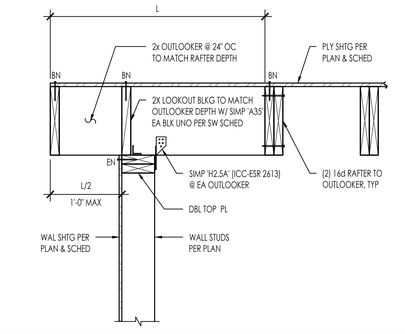


ROOF RAFTER TO EXTERIOR WALL (PERP)

2340-01-CU21 - S422 - 23

1" = 1'-0"

23



OUTLOOKER @ EXTERIOR SHEAR WALL

2340-01-CU21 - S422 - 13

1" = 1'-0"

13

54

44

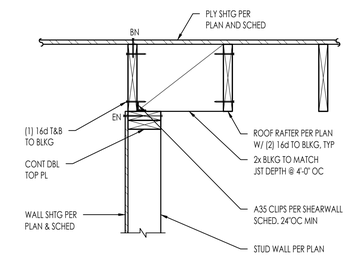
INTERIOR SHEAR WALL (JOIST PARALLEL)

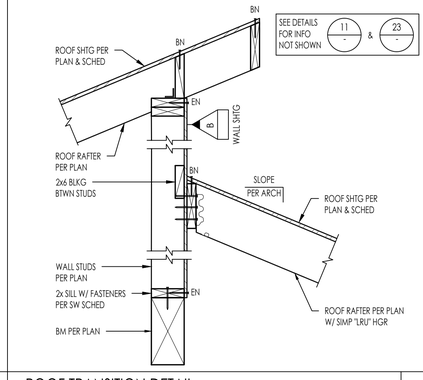
2340-01-CU21 - S422 - 34

1" = 1'-0"

34

NOTE:
PLYWOOD FIELD NAILING NOT SHOWN FOR CLARITY. REFER TO DIAPHRAGM AND SHEAR WALL SCHEDULE



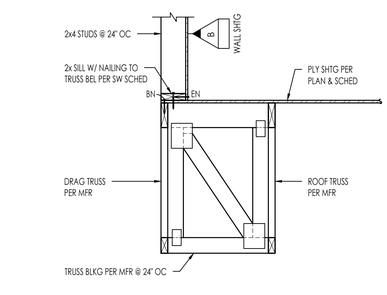


ROOF TRANSITION DETAIL

2340-01-CU21 - S422 - 24

1" = 1'-0"

24



CHANGE IN ROOF FRAMING

2340-01-CU21 - S422 - 14

3/4" = 1'-0"

14

MONO COUNTY

THESE PLANS ARE PROVIDED BY MONO COUNTY AS PART OF THE PRE-APPROVED ADU PROGRAM AND ARE PUBLIC DOMAIN. THERE CANNOT BE A CHARGE TO PROVIDE THESE PLANS. NO ALTERATIONS TO THESE PLANS ARE ALLOWED. ALL ALTERATIONS MUST BE DONE UNDER A SEPARATE PERMIT ONCE THE BUILDING PERMIT FOR THE ADU HAS BEEN ISSUED AND FINAL INSPECTION COMPLETED. IF YOU DO NOT HAVE THE CONSTRUCTION KNOWLEDGE AND EXPERIENCE TO CONTRUCT THESE PLANS WITHOUT FURTHER DETAILS, IT IS RECOMMENDED YOU HIRE A CONTRACTOR TO DO THE CONSTRUCTION. THE CITY WILL NOT PROVIDE FURTHER INFORMATION OR DETAILS AND BUILDING INSPECTORS WILL NOT PROVIDE STEP BY STEP INSTRUCTIONS IN THE FIELD.

MONO COUNTY ADU PROTOTYPES

MONO COUNTY

ROOF FRAMING DETAILS

DATE

NOVEMBER 20, 2023

SHEET

S-422