NEW TK CLASSROOM AT CHENEY KINDERGARTEN

149 ADAMS ST, COALINGA, CA 93210

COALINGA-HURON UNIFIED SCHOOL DISTRICT

657 SUNSET ST. COALINGA, CA 93210

PROJECT TRACKING NUMBER: 62126-38

ABBREVIATIONS

ABBREVIATIONS WHEN USED IN THESE DOCUMENTS SHALL CONFORM TO THE FOLLOWING LIST UNLESS OTHERWISE NOTED. INDIVIDUAL DRAWINGS (SUCH AS CIVIL, STRUCTURAL, MECHANICAL, PLUMBING, AND ELECTRICAL) MAY CONTAIN SPECIFIC REFERENCES AND LEGENDS WITH INTERPRETATIONS INTENDED ONLY FOR THOSE DRAWINGS.

&	AND	FIN.	FINISH	P.O.C.	POINT OF CONNECTION
L.	ANGLE	FL.	FLOOR	PR.	PAIR
@	AT	FLASH.	FLASHING	PRCST.	PRECAST
C	CENTERLINE	F.O.C.	FACE OF CONCRETE	PREFIN.	PREFINISHED
ø	DIAMETER	F.O.F.	FACE OF FINISH	PROJ.	PROJECT
#	POUND OR NUMBER	F.O.M.	FACE OF MASONRY	PT.	POINT
(E)	EXISTING	F.O.P.	FACE OF PLYWOOD	P.T.D.	PAPER TOWEL DISPENSER
(N)	NEW	F.O.S.	FACE OF STUDS	P.D.T.R.	COMBINATION PAPER TOWEL DISPENSER AND RECEPTACLE
A.B.	ANCHOR BOLT	FRPF.	FIRE PROOF	PTN.	PARTITION
A/C	AIR CONDITIONING	F.R.P.	FIBER REINFORCED PANEL	P.T.R.	PAPER TOWEL RECEPTACLE
A.C.	ASPHALT CONCRETE	F.R.T.	FIRE RETARDANT TREATED		
ACOUST.	ACOUSTICAL	FT.	FOOT OR FEET	Q.T.	QUARRY TILE
A.D.	AREA DRAIN	FTG.	FOOTING		
ADJ.	ADJUSTABLE	FURR.	FURRING	R.	RADIUS
AGG.	AGGREGATE	FUT.	FUTURE	R.A.	RETURN AIR
ALUM.	ALUMINUM			R.B.	RUBBER BASE
ALT.	ALTERNATE	G.	GAS	R.D.	ROOF DRAIN
APPROX.	APPROXIMATE	GA.	GAGE	REF.	REFERENCE
ARCH.	ARCHITECTURAL	GALV.	GALVANIZED	REFR.	REFRIGERATOR
	(OR ARCHITECT)	G.B.	GRAB BAR	REINF.	REINFORCED
ASPH.	ASPHALT	G.I.	GALVANIZED IRON	REQ.	REQUIRED
AUTO.	AUTOMATIC	GND.	GROUND	RESIL.	RESILIENT
		GR.	GRADE	RM.	ROOM
BEL.	BELOW	GYP.	GYPSUM	R.O.	ROUGH OPENING
BET.	BETWEEN			R.O.W.	RIGHT-OF-WAY
BD.	BOARD	H.	HIGH	RDWD.	REDWOOD
BLDG.	BUILDING	H.B.	HOSE BIB	RWL	RAIN WATER LEADER
BLK.	BLOCKING	H.C.	HOLLOW CORE		
BM.	BEAM	HD.	HEAD	S.	SOUTH
B.O.	BOTTOM OF	HDWD.	HARDWOOD	S.A.	SUPPLY AIR
BOT.	BOTTOM	HGT.	HEIGHT	S.C.	SOLID CORE
B.U.R.	BUILT-UP ROOF	H.M.	HOLLOW METAL	S.C.D.	SEAT COVER DISPENSER
BRD.	BOARD	HORIZ.	HORIZONTAL	SCHED.	SCHEDULE
		HR.	HOUR	S.D.	STORM DRAIN
CAB.	CABINET	H.V.A.C.	HEATING VENTILATING, AND AIR CONDITIONING	S.DISP.	SOAP DISPENSER
C.B.	CATCH BASIN	H.W.H.	HOT WATER HEATER	SECT.	SECTION
C.G.	CORNER GUARD			S.F.	SQUARE FOOT (FEET)
C.I.	CAST IRON	I.D.	INSIDE DIAMETER	SH.	SHELF
C.J.	CONTROL JOINT	IN.	INCHES	SHR.	SHOWER
CLG.	CEILING	INCL.	INCLUDING, INCLUDES	SHT.	SHEET
CLO.	CLOSET	INSUL.	INSULATION	SHTG.	SHEATHING
CLR.	CLEAR	INT.	INTERIOR	SIM.	SIMILAR
CNTR.	COUNTER	INV.	INVERT	S.M.S.	SHEET METAL SCREW
COL.	COLUMN	I.P.S.	IRON PIPE SIZE	S.N.D.	SANITARY NAPKIN DISPOSAL
C.M.U.	CONCRETE MASONRY UNIT			S.N.V.	SANITARY NAPKIN VENDOR
CONC.	CONCRETE	JAN.	JANITOR	S.O.V.	SHUT OFF VALVE
CONN.	CONNECTION	JB.	JAMB	SPEC.	SPECIFICATIONS
CONSTR.	CONSTRUCTION	JT.	JOINT	SQ.	SQUARE
CONT.	CONTINUOUS	JST	JOIST	ST.STL.	STAINLESS STEEL
CONTR.	CONTRACTOR			S.S.	SERVICE SINK
CORR.	CORRIDOR	K.	KITCHEN	S.T.	SELF TAPPING
CTR.	CENTER			STA.	STATION
CTSK.	COUNTERSUNK	L.	LONG	STD.	STANDARD
C.Y.	CUBIC YARD	LAB.	LABORATORY	STL.	STEEL
		LAM.	LAMINATE	STOR.	STORAGE
DBL.	DOUBLE	LAV.	LAVATORY	STRUCT.	STRUCTURAL
DEPT.	DEPARTMENT	LKR.	LOCKER	SUSP.	SUSPENDED
DET.	DETAIL	LT.	LIGHT	S.V.	SHEET VINYL
D.F.	DRINKING FOUNTAIN			S.Y.	SQUARE YARD
D.I.	DROP INLET	MAX.	MAXIMUM	SYM.	SYMMETRICAL
DIA	DIAMETER	M.B.	MACHINE BOLT		
DIAG.	DIAGONAL	M.C.	MEDICINE CABINET	T.B.	TOWEL BAR
DIM.	DIMENSION	MATL.	MATERIAL	T.C.	TERMINAL CABINET
DISP.	DISPENSER	MECH.	MECHANICAL	TEL.	TELEPHONE
DN.	DOWN	MET.	METAL	TEMP.	TEMPERED
D.O.	DOOR OPENING	MFR.	MANUFACTURER	TERR.	TERRAZO
DP.	DEEP	MH.	MANHOLE	T&G	TONGUE AND GROOVE
DR.	DOOR	MIN.	MINIMUM	THK.	THICK
DS.	DOWNSPOUT	MISC.	MISCELLANEOUS	T.P.D.	TOILET PAPER DISPENSER
DW.	DOMESTIC WATER	M.O.	MASONRY OPENING	T.O.M.	TOP OF MASONRY
DWG.	DRAWING	MOD.	MODULE, MODULAR	T.PL.	TOP OF PLATE
DWR.	DRAWER	MTD.	MOUNTED	T.O.S.	TOP OF STEEL
		MUL.	MULLION	TRD.	TREAD
E.	EAST			T.S.R.	TOP SET RUBBER
EA.	EACH	N.	NORTH	T.V.	TELEVISION
E.J.	EXPANSION JOINT	N.I.C.	NOT IN CONTRACT (N.I.C. ITEMS NOT PART OF THIS APPROVAL)	T.W.	TOP OF WALL
ELEV.	ELEVATION			TYP.	TYPICAL
ELEC.	ELECTRICAL				
EMBED.	EMBEDMENT	NO. OR #	NUMBER	UNF.	UNFINISHED
ENCL.	ENCLOSURE	NOM.	NOMINAL	U.O.N.	UNLESS OTHERWISE NOTED
ENGR.	ENGINEER	N.T.S.	NOT TO SCALE	UR.	URINAL
E.P.B.	ELECTRICAL PANEL BOARD				
EQ.	EQUAL	O/	OVER	V.B.	VINYL BASE
EQUIP.	EQUIPMENT	O.A.	OVERALL	V.C.T.	VINYL COMPOSITION TILE
E.W.C.	ELECTRIC WATER COOLER	OBS.	OBSCURE	VCTB	VINYL COVERED TACKBOARD
EXP	EXPANSION	O.C.	ON CENTER	VWC	VINYL WALLCOVERING
EXIST.	EXISTING	O.D.	OUTSIDE DIAMETER	VERT.	VERTICAL
EXT	EXTERIOR	OFF.	OFFICE	VEST.	VESTIBULE
		O.H.	OPPOSITE HAND		
F.A.	FIRE ALARM	O.H.M.S.	OVAL HEAD MACHINE SCREW	W.	WEST
F.B.	FLAT BAR	O.H.W.S.	OVAL HEAD WOOD SCREW	W/	WITH
F.D.	FLOOR DRAIN	OPNG.	OPENING.	W.C.	WATER CLOSET
FDN.	FOUNDATION	OPP.	OPPOSITE	WWF	WELDED WIRE FABRIC
F.E.	FIRE EXTINGUISHER	P.E.N.	PLYWOOD EDGE NAILING	WD.	WOOD
F.E.C.	FIRE EXTINGUISHER AND CABINET	PL.	PLATE	W/O	WITHOUT
		P. LAM.	PLASTIC LAMINATE	WP.	WATERPROOF
F.F.E.	FINISH FLOOR ELEVATION	PL.	PLATE	W.R.	WATER RESISTANT
F.H.C.	FIRE HOSE CABINET	PLAS.	PLASTER	W.S.	WOOD SCREW
F.H.M.S.	FLAT HEAD MACHINE SCREW	PLUMB.	PLUMBING	WSCT.	WAINSCOT
F.H.W.S.	FLAT HEAD WOOD SCREW	PLYWD.	PLYWOOD	WT.	WEIGHT

CONSULTANTS

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PHONE: 559.733.2671 FAX: 559.733.0372

PROJECT SCOPE

THE PROJECT INCLUDES THE ADDITION OF ONE NEW TK CLASSROOM BUILDING '7', FIRE ALARM UPGRADES AT BLDG. 5, ALTERATION TO EXISTING PARKING LOT, AND RELATED SITE WORK

DEFERRED APPROVALS

INSTALLATION OF DEFERRED APPROVAL ITEMS SHALL NOT BE STARTED UNTIL THE CONTRACTOR'S DRAWINGS SPECIFICATIONS, AND ENGINEERING CALCULATIONS FOR THE ACTUAL SYSTEMS HAVE BEEN ACCEPTED AND SIGNED BY THE ARCHITECT OR STRUCTURAL ENGINEER AND APPROVED BY THE DIVISION OF THE STATE ARCHITECT.

1. NONE

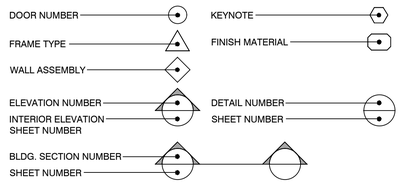
APPLICABLE CODES

ALL WORK SHALL BE PERFORMED IN ACCORDANCE WITH THE PLANS, SPECIFICATIONS AND THE FOLLOWING REGULATIONS :

1. 2022 BUILDING STANDARDS ADMINISTRATIVE CODE, PART 1, TITLE 24 CCR.
2. 2022 CALIFORNIA BUILDING CODE (CBC), PART 2, TITLE 24 CCR.
3. 2022 CALIFORNIA ELECTRICAL CODE (CEC), PART 3, TITLE 24 CCR.
4. 2022 CALIFORNIA MECHANICAL CODE (CMC) PART 4, TITLE 24 CCR.
5. 2022 CALIFORNIA PLUMBING CODE (CPC), PART 5, TITLE 24 CCR.
6. 2022 CALIFORNIA ENERGY CODE (CEC), PART 6, TITLE 24 CCR.
7. 2022 CALIFORNIA FIRE CODE, PART 9, TITLE 24 CCR.
8. 2022 CALIFORNIA GREEN BUILDING STANDARDS CODE (CALGREEN), PART 11, TITLE 24 CCR.
9. 2022 CALIFORNIA REFERENCED STANDARDS, PART 12, TITLE 24 CCR.
10. TITLE 19 CCR, PUBLIC SAFETY, STATE FIRE MARSHAL REGULATIONS.
11. 2022 NFPA 72 NATIONAL FIRE ALARM AND SIGNALING CODE, (CA AMENDED)
12. 2019 NFPA 80 STANDARD FOR FIRE DOORS AND OTHER OPENING PROTECTIVES.
13. 2022 NFPA 13 STANDARD FOR THE INSTALLATION OF SPRINKLER SYSTEMS, (CA AMENDED)
14. 2021 NFPA 17A STANDARD FOR WET CHEMICAL EXTINGUISHING SYSTEMS.
15. 2019 NFPA 14 STANDARD FOR THE INSTALLATION OF STANDPIPE AND HOSE SYSTEMS, (CA AMENDED)
16. 2019 NFPA 20 STANDARD FOR THE INSTALLATION OF STATIONARY PUMPS FOR FIRE PROTECTION.
17. 2019 NFPA 24 STANDARD FOR THE INSTALLATION OF PRIVATE FIRE SERVICE MAINS AND THEIR APPURTENANCES, (CA AMENDED)
18. 2018 NFPA 2001 STANDARD ON CLEAN AGENT FIRE EXTINGUISHING SYSTEMS, (CA AMENDED)

REFERENCE CODE SECTION FOR NFPA STANDARDS - 2022 CBC (SFM) CHAPTER 35. SEE CHAPTER 35 FOR STATE OF CALIFORNIA AMENDMENTS TO NFPA STANDARDS.

SYMBOL LEGEND



GENERAL NOTES

1. CUTTING, BORING, SAW CUTTING, OR DRILLING THROUGH NEW OR EXISTING STRUCTURAL MEMBERS WILL BE PERMITTED ONLY WHERE INDICATED ON THE DRAWINGS, OR WHEN ACCEPTED BY THE ARCHITECT.
2. CHANGES TO THE APPROVED DRAWINGS AND SPECIFICATIONS OR SUBSTITUTIONS AFFECTING DSA REGULATED ITEMS SHALL BE MADE BY ADDENDUM OR A CONSTRUCTION CHANGE DOCUMENT (CCD) APPROVED BY THE DIVISION OF THE STATE ARCHITECT, AS REQUIRED BY SECTION 4-338, PART 1, TITLE 24, CCR.
3. A "DSA CERTIFIED" CLASS 2 PROJECT INSPECTOR EMPLOYED BY THE DISTRICT (OWNER) AND APPROVED BY THE DSA SHALL PROVIDE CONTINUOUS INSPECTION OF THE WORK. THE DUTIES OF THE INSPECTOR ARE DEFINED IN SECTION 4-342, PART 1, TITLE 24, CCR.
4. A DSA ACCEPTED TESTING LABORATORY DIRECTLY EMPLOYED BY THE DISTRICT (OWNER) SHALL CONDUCT ALL THE REQUIRED TESTS AND INSPECTIONS FOR THE PROJECT.
5. GRADING PLANS, DRAINAGE IMPROVEMENTS, ROAD AND ACCESS REQUIREMENTS, AND ENVIRONMENTAL HEALTH CONSIDERATIONS SHALL COMPLY WITH ALL LOCAL ORDINANCES.
6. THE INTENT OF THESE DRAWINGS AND SPECIFICATIONS IS THAT THE WORK OF THE ALTERATION, REHABILITATION OR RECONSTRUCTION IS TO BE IN ACCORDANCE WITH TITLE 24, CCR. SHOULD ANY EXISTING CONDITIONS SUCH AS DETERIORATION OR NON-COMPLYING CONSTRUCTION BE DISCOVERED WHICH IS NOT COVERED BY THE CONTRACT DOCUMENTS WHEREIN THE FINISHED WORK WILL NOT COMPLY WITH TITLE 24, CCR, A CONSTRUCTION CHANGE DOCUMENT (CCD), OR A SEPARATE SET OF PLANS AND SPECIFICATIONS, DETAILING AND SPECIFYING THE REQUIRED WORK SHALL BE SUBMITTED TO AND APPROVED BY DSA BEFORE PROCEEDING WITH THE WORK. (SECTION 4-317 (c), PART 1, TITLE 24, CCR).
7. THE DRAWINGS AND SPECIFICATIONS ARE BASED ON LIMITED FIELD INVESTIGATION. CONTRACTOR SHALL FIELD VERIFY THE EXISTING CONDITIONS PRIOR TO THE BID NECESSARY TO ACCOMPLISH THE WORK WHETHER SPECIFICALLY INDICATED OR NOT.
8. THE STORAGE OF MATERIAL AND EFFECTS OF WORK SHALL BE APPROVED BY LOCAL FIRE AUTHORITY. COMPLY WITH CALIF. FIRE CODE CHAPTER 33 - FIRE SAFETY DURING CONSTRUCTION AND DEMOLITION. COMPLY WITH CBC CHAPTER 33, SAFETY DURING CONSTRUCTION.
9. THE CALIFORNIA ENERGY CODE SECTION 10-103 REQUIRES ACCEPTANCE TESTING ON ALL NEWLY INSTALLED LIGHTING CONTROLS, MECHANICAL SYSTEMS, ENVELOPES, AND PROCESS EQUIPMENT AFTER INSTALLATION AND BEFORE PROJECT COMPLETION. AN ACCEPTANCE TEST IS A FUNCTIONAL PERFORMANCE TEST TO HELP ENSURE THAT NEWLY INSTALLED EQUIPMENT IS OPERATING AND IN COMPLIANCE WITH THE ENERGY CODE. LIGHTING CONTROLS ACCEPTANCE TESTS MUST BE PERFORMED BY A CERTIFIED LIGHTING CONTROLS ACCEPTANCE TEST TECHNICIAN (ATT). MECHANICAL SYSTEM ACCEPTANCE TESTS MUST BE PER FORMED BY A CERTIFIED MECHANICAL ATT FOR PROJECTS SUBMITTED ON OR AFTER OCTOBER 1, 2021. ENVELOPE AND PROCESS EQUIPMENT ACCEPTANCE TESTS SHALL BE PERFORMED BY THE INSTALLING CONTRACTOR, ENGINEER, ARCHITECT OF RECORD OF THE OWNER'S AGENT. A LISTING OF CERTIFIED ATT CAN BE FOUND AT: https://www.energy.ca.gov/programs-and-topics/programs -and- topics /programs/acceptance-test-technician-certification- provider-program/acceptance. THE ACCEPTANCE TESTING PROCEDURES MUST BE REPEATED, AND DEFICIENCIES MUST BE CORRECTED BY THE BUILDER OR INSTALLING CONTRACTOR UNTIL THE CONSTRUCTION/INSTALLATION OF THE SPECIFIED SYSTEMS CONFORM AND PASS THE REQUIRED ACCEPTANCE CRITERIA. PROJECT INSPECTORS WILL COLLECT THE FORMS TO CONFIRM THAT THE REQUIRED ACCEPTANCE TESTS HAVE BEEN COMPLETED.
10. NEW BUILDINGS SHALL BE PROVIDED WITH EMERGENCY RESPONDER RADIO COVERAGE IN ACCORDANCE WITH CALIFORNIA FIRE CODE SECTION 510. THE PROJECT ARCHITECT (AOR) SHALL CONTACT THE LOCAL FIRE DEPARTMENT AND/OR EMERGENCY COMMUNICATIONS AUTHORITY TO OBTAIN DESIGN, EQUIPMENT SPECIFICATIONS, TESTING AND ACCEPTANCE CRITERIA. PLANS AND REQUESTED DOCUMENTATION SHALL BE SUBMITTED TO THE LOCAL AUTHORITY HAVING JURISDICTION FOR REVIEW AND APPROVAL. UPON COMPLETION, COPIES OF THE APPROVED PLANS, EQUIPMENT DATA SHEETS, TESTING AND ACCEPTANCE DOCUMENTATION SHALL BE PROVIDED TO THE SCHOOL DISTRICT.

SHEET INDEX (89 SHEETS TOTAL)

GENERAL INFORMATION
G1 COVER SHEET, SHEET INDEX, & VICINITY MAP
FC1 FIRE CODE SITE PLAN, BUILDING CODE SUMMARY

CIVIL
C0.1 CIVIL COVERSHEET
C1.1 PARTIAL TOPOGRAPHIC SURVEY
C1.2 PARTIAL TOPOGRAPHIC SURVEY
C3.1 GRADING AND DRAINAGE PLAN
C3.2 GRADING AND DRAINAGE PLAN
C4.1 STORM DRAIN PLAN
C5.1 OFFSITE DEMOLITION PLAN
C5.2 OFFSITE IMPROVEMENTS PLAN
C7.1 CIVIL DETAILS
C7.2 OFFSITE DETAILS

LANDSCAPE
LA1 PARTIAL PLANTING PLAN
LA2 PLANTING DETAILS
IR1 IRRIGATION PLAN
IR2 IRRIGATION DETAILS
IR3 IRRIGATION DETAILS
IR4 IRRIGATION DETAILS

SITE DEVELOPMENT
SD1 OVERALL SITE PLAN, LEGEND, & NOTES
SD2 ENLARGED DEMO SITE PLAN
SD3 ENLARGED SITE PLAN
SD4 SITE DETAILS
SD5 SITE DETAILS

ARCHITECTURAL
A1 FLOOR PLAN, EXIT ANALYSIS, & ENLARGED FLOOR PLAN
A2 EXTERIOR ELEVATIONS
A3 REFLECTED CEILING PLAN & ROOF PLAN
A4 SECTIONS & AIR BARRIER SECTIONS
A5 INTERIOR ELEVATIONS
A6 INTERIOR ELEVATIONS
A7 INTERIOR ELEVATIONS
A8 FINISH SCHEDULE
A9 WALL ASSEMBLIES
A10 DOOR SCHEDULE
A11 FRAME TYPE SCHEDULE
A12 FRAME DETAILS
A13 MILLWORK DETAILS
A14 TYPICAL DETAILS
A15 DETAILS
A16 DETAILS

STRUCTURAL
S1.1 TYPICAL NOTES AND DETAILS
S1.2 TYPICAL NOTES AND DETAILS
S1.3 TYPICAL NOTES AND DETAILS
S1.4 TYPICAL NOTES AND DETAILS
S1.5 TYPICAL NOTES AND DETAILS
S1.6 TYPICAL NOTES AND DETAILS
S2.1 FOUNDATION PLAN
S2.2 FOOTING DETAILS
S3.1 ROOF FRAMING PLAN
S4.1 CEILING FRAMING PLAN
S5.1 BUILDING SECTIONS
S5.2 BUILDING SECTIONS
S6.1 SHEAR WALL ELEVATIONS
S7.1 FRAMING DETAILS

PLUMBING
P1 PLUMBING SITE PLAN
P2 PLUMBING FLOOR PLAN
P3 ENLARGED PLUMBING PLAN
P4 ENLARGED PLUMBING PLAN
P5 PLUMBING DETAILS
P6 PLUMBING SCHEDULES

MECHANICAL
M1.1 PARTIAL MECHANICAL FLOOR PLAN
M1.2 PARTIAL MECHANICAL FLOOR PLAN
M2.1 MECHANICAL ROOF PLAN
M3.1 MECHANICAL SCHEDULE
M4.1 MECHANICAL DETAILS
M4.2 MECHANICAL DETAILS
M5.1 T-24 DOCUMENTS
M5.2 T-24 DOCUMENTS
M5.3 T-24 DOCUMENTS

ELECTRICAL
EG1.1 ELEC CODES, NOTES SYMBOLS AND FIXTURE SCHEDULE
EG1.2 INDOOR LIGHTING COMPLIANCE
EG1.3 OUTDOOR LIGHTING COMPLIANCE
EG1.4 POWER COMPLIANCE
EG1.5 SOLAR AND BATTERY COMPLIANCE
ES1.1 SITE ELECTRICAL PLAN
E1.1 LIGHTING AND LIGHTING CONTROLS PLANS
E1.2 POWER AND ROOF ELECTRICAL PLANS
E1.3 FIRE ALARM PLANS
E2.1 FIRE ALARM SPECS, CODES AND NOTES.
E2.2 FIRE ALARM SYSTEM RISER DIAGRAM AND CALCS
E2.3 FIRE ALARM DETAILS
E3.1 ONE LINE DIAGRAM
E3.2 DETAILS
E3.3 DETAILS
E3.4 DETAILS
E3.5 SOLAR DETAILS AND NOTES
E4.1 PANEL SCHEDULES

TELECOMMUNICATIONS
TG1.1 SIGNALS SYMBOLS, CODES AND NOTES
TS1.1 SITE SIGNALS PLAN
T1.1 SIGNALS PLAN

VICINITY MAP

CHENEY KINDERGARTEN — N.T.S.
149 ADAMS ST., COALINGA, CA 93210



north

APPROVALS

FILE # 10-28 — APPLICATION # 02-122132

IDENTIFICATION STAMP
DIV. OF THE STATE ARCHITECT
APP: 02-122132 INC:
REVIEWED FOR
SS ☑ FLS ☑ ACS ☑
DATE: 08/06/2024

LICENSED ARCHITECT
MICHAEL J. SCOTT JR.
No. C-34290
REN: 05-31-25
STATE OF CALIFORNIA

DATE: JANUARY 31, 2024

NEW TK CLASSROOM AT CHENEY KINDERGARTEN
COALINGA-HURON UNIFIED SCHOOL DISTRICT
COALINGA, FRESNO COUNTY, CA

REVISIONS

MANGINI ARCHITECTURE INGENUITY
MANGINI ASSOCIATES INC.
4320 West Mineral King Avenue
Visalia, California 93291
www.manginilaw.com
(559) 627-0530 Office
(559) 627-1926 Fax

THESE DRAWINGS FOR THE ITEMS LISTED BELOW HAVE BEEN PREPARED BY OTHER DESIGN PROFESSIONALS OR CONSULTANTS WHO ARE LICENSED AND/OR AUTHORIZED TO PREPARE SUCH DRAWINGS IN THIS STATE. THESE DWGS. HAVE BEEN EXAMINED BY ME FOR DESIGN INTENT AND APPEAR TO MEET THE APPROPRIATE REQUIREMENTS OF TITLE 24, CALIFORNIA CODE OF REGULATIONS AND THE PROJECT SPECIFICATIONS PREPARED BY ME.

THE DWGS. LISTED BELOW HAVE BEEN COORDINATED WITH MY PLANS AND SPECIFICATIONS AND ARE ACCEPTABLE FOR INCORPORATION INTO THE CONSTRUCTION OF THIS PROJECT FOR WHICH I AM THE INDIVIDUAL DESIGNATED TO BE IN GENERAL RESPONSIBLE CHARGE (OR FOR WHICH I HAVE BEEN DELEGATED RESPONSIBILITY FOR THIS PORTION OF WORK).

THE STATEMENT OF GENERAL CONFORMANCE SHALL NOT BE CONSTRUED AS RELIEVING ME OF MY RIGHTS, DUTIES, AND RESPONSIBILITIES UNDER SECTION 17302 AND 81138 OF THE EDUCATION CODE AND SECTIONS 4-336, 4-341, AND 4-344 OF TITLE 24, PART 1. (TITLE 24, PART 1, SECTION 4-317 (b))

LIST OF DWGS. REVIEWED ARE ATTACHED AND LISTED AS: C1.1, C1.2

SIGNATURE OF THE ARCHITECT/ ENGINEER — DATE: 08-05-24
LICENSE NUMBER: C-34290 — EXPIRATION DATE: 05-31-25

TITLE
COVER SHEET, SHEET INDEX, & VICINITY MAP

G1

PROJECT 23044

APPROVALS

FILE # 10-28 | APPLICATION # 02-122132

IDENTIFICATION STAMP
DIV. OF THE STATE ARCHITECT
APP: 02-122132 INC: A
REVIEWED FOR
SS ☑ FLS ☑ ACS ☑
DATE: 08/06/2024

LICENSED ARCHITECT
MICHAEL J. SCOTT JR.
No. C-34290
REN: 05-31-25
STATE OF CALIFORNIA

DATE: JANUARY 31, 2024

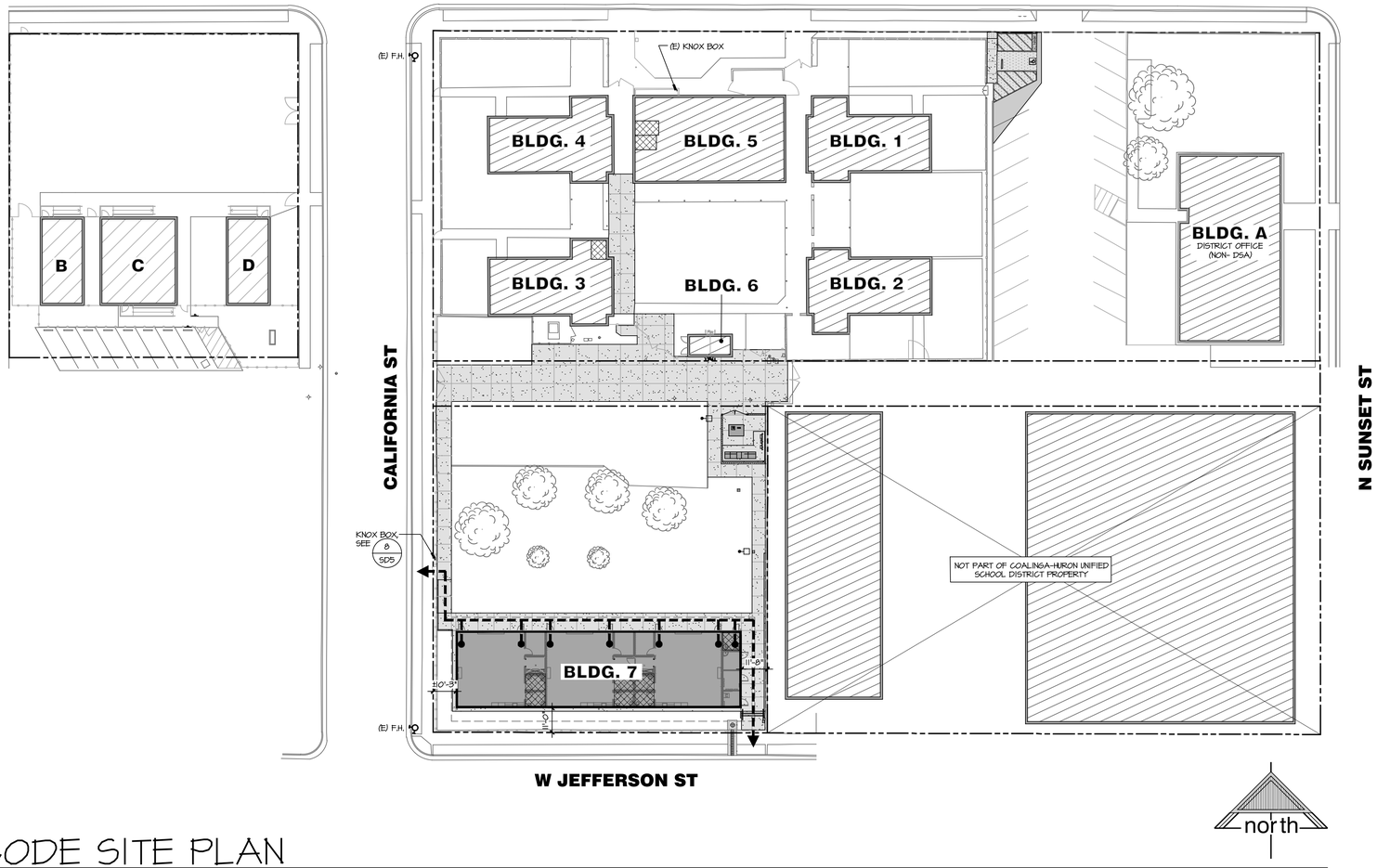
BUILDING SUMMARY

NOTE: SUMMARY BASED ON CONFORMANCE TO STATE BUILDING, TITLE 24, PART 2, C.B.C. NO MAJOR RE-CONSTRUCTION, ADDITIONS OR CHANGES IN USE ARE PROPOSED IN THIS PROJECT. THESE BUILDINGS WILL MAINTAIN THEIR CURRENT FUNCTIONS, CAPACITY & USE.

BLDG.	DESCRIPTION	OCCUPANCY TYPE	CONSTR. TYPE	AREA (s.f.)	D.S.A. #
1	KINDERGARTEN	E-1	V-N	2370	5885
2	KINDERGARTEN	E-1	V-N	1967	5885
3	KINDERGARTEN	E-1	V-N	1844	5885
4	KINDERGARTEN	E-1	V-N	2370	5885
5	ADMIN., LIB. TWR	A-3/B-2	V-N	2472	5885
6	TOILETS, JAN.	B-2	V-N	294	45124
A	DISTRICT OFFICE				
B	CLASSROOM	E-1	V-N	800	67001
C	CLASSROOM	E-1	V-N	1,440	02-102872
D	CLASSROOM	E-1	V-N	800	67001

NOTES AND LEGEND :

- NEW BUILDING
- EXIST. BUILDING
- ACCESSIBLE RESTROOMS
- PROPERTY LINE
- PATH OF TRAVEL TO PUBLIC WAY
- (E) FH EXISTING FIRE HYDRANT



FIRE CODE SITE PLAN

SCALE: 1" = 30'-0"

BUILDING CODE SUMMARY

BUILDING DESIGNATION	BUILDING NAME	OCCUPANCY CLASSIFICATION CBC CHAPTER 3	ALLOWABLE BUILDING AREA CBC 506	ACTUAL BUILDING AREA CBC 202			CONSTRUCTION TYPE CBC CHAPTER 6	SEPARATION OF OCCUPANCIES CBC 508.3	ACTUAL BUILDING HEIGHT	ALLOWABLE BUILDING HEIGHT CBC TABLE 504.3	ACTUAL # OF STORIES	ALLOWABLE # OF STORIES CBC TABLE 504.4	BUILDING SEPARATION (FIRE WALLS) CBC 706.1	AUTOMATIC FIRE SPRINKLER SYSTEM CBC 903	AREA MODIFICATION $A_a = [A_t + (NS \times I_f)] \times S_a$ CBC 506.2	TOTAL BLDG. AREA		MINIMUM REQUIRED FIRE FLOW CFC TABLE B105.1	FIRE RESISTANCE RATINGS FOR EXTERIOR WALLS BASED ON FIRE SEPARATION DISTANCE CBC TABLE 705.5	FIRE RESISTANCE RATINGS REQUIREMENTS CBC TABLE 601	
				BUILDING AREA	OVERHANG AREA	(BLDG + O.H.) TOTAL AREA														CONSTRUCTION TYPE	VB
7	CLASSROOM BUILDING	E	9,500 SF	4,515 SF	1,925 SF	6,439 SF	VB	N/A	19'-0"	40'-0"	1	1	N/A	N/A	N/A	BLDG 7	6,440 SF	CONSTRUCTION TYPE: VB TOTAL AREA: 6,440 SF REQ'D FLOW: 2,250 GPM DURATION: 2 HOURS	CONSTRUCTION TYPE: VB SEPERATION DISTANCE: 10 <X< 30 OCC. NO RATING	EXTERIOR BEARING WALLS	0
																				INTERIOR BEARING WALLS	0

DSA 810

FIRE & LIFE SAFETY SITE CONDITIONS SUBMITTAL

To facilitate the Division of the State Architect's (DSA) fire and life safety plan review of project site conditions, DSA requires the design professional to provide the following information at time of project submittal for projects consisting of construction of a new campus, construction of new building(s), additions to existing buildings, and for site alternate design means for fire department emergency vehicle access, and fire suppression water supply.

Information associated with compliance items 1–3 below is to be provided for all project types indicated above. Information associated with items 4–7 is to be completed when an alternate means is utilized. Acknowledgement by the school district and signature from the local fire authority (LFA) is only required when an alternate design means is being requested.

Page 1 of the completed form must be imaged onto the fire access site plan. When an alternate design/means is proposed, completed pages 1 *and* 2 are to be imaged on the fire access site plan.

For additional information refer to the instructions at the end of this form and DSA Policy 09-01.

PROJECT INFORMATION

School District/Owner: COALINGA-HURON UNIFIED SCHOOL DISTRICT
Project Name/School: CHENEY KINDERGARTEN
Project Address: 144 ADAMS STREET, COALINGA, CA 93210

FIRE & LIFE SAFETY INFOMATION

1.	Has a fire hydrant flow test been performed within the past 12 months? *(If yes, provide a copy of the test data.)*	Yes ☒	No ☐
2.	Was the fire hydrant water flow test performed as part of this LFA review?	Yes ☒	No ☐
3.	Is the project located within a designated fire hazard severity zone as established by Cal-Fire? *(If yes, indicate fire hazard zone classification below)*	Yes ☐	No ☒
	Refer to the following for fire hazard zone locations: www.fire.ca.gov/fire_prevention/fire_prevention_wildland_zones_maps	Moderate ☐ / High ☐	Very High ☐
	Wildland Interface Area (WIFA) *(If any designations are checked, project design must meet the requirements of CBC Chapter 7A.)*		WIFA ☐

CONDITION MEANS AND METHODS RESOLUTION		ALTERNATE ACCEPTED Yes	No	N/A	N/R
4.	Emergency vehicle access roadways do not meet CFC requirements.			☒	
4a.	**Acceptable Alternate:** Emergency vehicle and personnel access as proposed by the project architect is acceptable for providing fire suppression and protection of life and property.				
5.	**Fire Hydrants:** Number and spacing does not meet CFC requirements.			☒	
5a.	**Acceptable Alternate:** Number of fire hydrants and spacing as proposed by the project architect is acceptable for fire suppression and protection of life and property.				
6.	**Fire Hydrants:** Water flow and pressure are less than CFC minimum.			☒	
6a.	**Acceptable Alternate:** The available flow and pressure is acceptable for providing fire suppression and protection of life and property.				
7.	Location of fire department connection(s) serving fire sprinkler systems or standpipe systems does not meet CFC requirements.			☒	
7a.	**Acceptable Alternate:** The location of fire department connection serving the fire sprinkler system and/or standpipe system is acceptable for providing fire suppression and protection of life and property.				

DSA 810 (rev 10-22-18) DEPARTMENT OF GENERAL SERVICES Page 1 of 4
DIVISION OF THE STATE ARCHITECT STATE OF CALIFORNIA

HYDRANT FLOW REQUEST FORM

COALINGA FIRE

Coalinga Fire Department
Fire Prevention Division
300 W. Elm Ave, Coalinga, CA 93210
Office # (559) 935-1652 FAX # (559) 935-1638

Please complete the below information in blue or black ink. Submit form and fee ($119). Please make check or money order payable to City of Coalinga Fire Department. Our mailing address is listed above.

Date Requested: 10/17/2023 Date Required: 10/20/2023
Name of Company Requesting Hydrant Flow: Fire System Solutions, Inc.
Contact Name: Jory Rothenfluh
Contact Mailing Address: 4277 W. Richert Ave., Fresno, CA 93722
Phone Number: 559-281-8772
Reason for Requesting Hydrant Flow: ☒ New Construction ☐ Tenant Improvement
☐ Insurance ☐ Other – Please State:
Address and Location of Hydrant: North East Corner of California St. and Jefferson St.
(For example: 314 W. Cook Street, hydrant located at north east corner of property)
Send Hydrant Flow Information: ☐ By Mail ☐ By Fax: (Fax Number)
☒ By E-mail: jory@firesystemsolutions.com (E-mail Address)
Requestor's Signature: Jory Rothenfluh Date: 10/17/2023

HYDRANT FLOW INFORMATION

TO BE COMPLETED BY FIRE DEPARTMENT

Date: 1-16-24 Completed By: J. Ramirez
Location: N/E Corner of California & Jefferson
Static: 74 Residual: 44 Pitot:
Gallons Per Minute: 2252 Outlet Diameter: 4.5"

TO BE COMPLETED BY FIRE DEPARTMENT

Date Hydrant Flow Fee Paid: N/A Accepted By:
Date Hydrant Flow Information Sent:
☐ By Fax ☐ By Mail ☒ By E-mail ☐ Other:
Sent By: J. Phillips

Rev.10/23/19

NEW TK CLASSROOM AT CHENEY KINDERGARTEN
COALINGA-HURON UNIFIED SCHOOL DISTRICT
COALINGA, FRESNO COUNTY, CA

REVISIONS

MANGINI ARCHITECTURE | INGENUITY.
MANGINI ASSOCIATES INC.
4320 West Mineral King Avenue
Visalia, California 93291
www.mangini.us
(559) 627-2630 Office
(559) 627-1926 Fax

TITLE
FIRE CODE SITE PLAN, BUILDING CODE SUMMARY

FC1

PROJECT 23044

F:\01 projects\23044\Drawings\01 architectural\03 sheets\23044_FC1–Fire Code Site Plan.dwg Aug 02 2024 10:28am

SYMBOL LEGEND

	FIRE HYDRANT
	WATER VALVE
	EXISTING LIGHT POLE
	SIGN
	CHAIN LINK FENCE
	FLOW ARRROW AS NOTED ON PLANS
	MANHOLE
	GUY WIRE
0.00	PROPOSED ELEVATION
(0.00) 0.00 0.00	EXISTING ELEVATION

UTILITIES

E	UNDERGROUND ELECTRIC
F	FIRE LINE (WATER)
FO	UNDERGROUND FIBER OPTIC LINE
G	UNDERGROUND GAS LINE
IRR	UNDERGROUND IRRIGATION LINE
SD	STORM DRAIN
SS	SANITARY SEWER
T	UNDERGROUND TELEPHONE LINE
TV	UNDERGROUND CABLE TELEVISION LINE
W	WATER

LEGEND: WHEN USED IN THESE CIVIL DRAWINGS SHALL CONFORM TO THE ABOVE LIST, UNLESS NOTED OTHERWISE. OTHER SHEETS WITHIN THESE PLANS MAY CONTAIN SPECIFIC REFERENCES AND LEGENDS WITH INTERPRETATIONS INTENDED ONLY FOR THOSE SHEETS.

BENCHMARK

VERTICAL DATUM & BENCHMARKS:

THE VERTICAL DATUM USED FOR THIS SURVEY IS THE NORTH AMERICAN VERTICAL DATUM OF 1988 (NAVD 88) BASED ON THE CALIFORNIA SURVEYING AND DRAFTING, INC. VIRTUAL SURVEY NETWORK, EPOCH DATE 2011.

TBM NO. 1: CHISELED PLUS IN TOP OF CURB ON THE WEST SIDE OF CALIFORNIA STREET, 4's NORTH OF THE NORTH EDGE DRIVE APPROACH, NORTHWEST CORNER OF SITE.

ELEV = 675.18 (NAVD 88).

TBM NO. 2: CHISELED PLUS IN TOP OF CURB, 2's NORTH OF THE NORTH CURB RETURN NORTHWEST CORNER OF CALIFORNIA STREET AND JEFFERSON STREET.

ELEV = 675.07 (NAVD 88).

VERTICAL DATUM NOTE:

1. ADD 600.00 FEET TO ELEVATIONS SHOWN ON PLAN TO OBTAIN DATUM BASED ON NORTH AMERICAN VERTICAL DATUM 1988.

CONSTRUCTION STAKING

CONSTRUCTION STAKING LIABILITY WAIVER

THESE IMPROVEMENT PLANS HAVE BEEN PREPARED WITH THE INTENT THAT THE FIRM OF LANE ENGINEERS, INC. WILL BE PERFORMING THE CONSTRUCTION STAKING FOR THE COMPLETE PROJECT. IF ANYONE OTHER THAN THE DESIGN ENGINEER IS EMPLOYED TO USE THESE PLANS FOR THE PURPOSE OF CONSTRUCTION STAKING, NOTICE IS HEREBY GIVEN THAT LANE ENGINEERS, INC. WILL NOT ASSUME ANY RESPONSIBILITY FOR ERRORS OR OMISSIONS. IF ANY, WHICH MIGHT OCCUR AND COULD HAVE BEEN AVOIDED, CORRECTED, OR MITIGATED IF THE FIRM OF LANE ENGINEERS, INC. HAD PERFORMED THE CONSTRUCTION STAKING WORK.

STANDARD GENERAL NOTES

1. THE CONTRACTOR AGREES THAT, IN ACCORDANCE WITH GENERALLY ACCEPTED CONSTRUCTION PRACTICES, THE CONTRACTOR WILL BE REQUIRED TO ASSUME SOLE AND COMPLETE RESPONSIBILITY FOR JOB SITE CONDITIONS DURING THE COURSE OF CONSTRUCTION OF THE PROJECT, INCLUDING SAFETY OF ALL PERSONS AND PROPERTY. THIS REQUIREMENT SHALL BE MADE TO APPLY CONTINUOUSLY AND NOT BE LIMITED TO NORMAL WORKING HOURS. THE CONTRACTOR FURTHER AGREES TO DEFEND, INDEMNIFY AND HOLD OWNER AND ENGINEER HARMLESS FROM ANY AND ALL LIABILITY, REAL OR ALLEGED, IN CONNECTION WITH THE PERFORMANCE OF WORK ON THIS PROJECT, EXEMPTING LIABILITY ARISING FROM THE SOLE NEGLIGENCE OF ENGINEER.
2. THE CONTRACTOR SHALL ACCEPT THE SITE IN ITS PRESENT CONDITION AND DEMOLISH AND/OR REMOVE FROM THE AREA OF DESIGNATED PROJECT EARTHWORK ALL STRUCTURES, BOTH SURFACE AND SUBSURFACE, TREES, BRUSH, ROOTS, DEBRIS, ORGANIC MATTER, AND ALL OTHER MATTER DETERMINED BY THE INSPECTOR TO BE DELETERIOUS. SUCH MATERIAL SHALL BE REMOVED FROM THE SITE BY THE CONTRACTOR.
3. EXCAVATIONS SHALL BE ADEQUATELY SHORED, BRACED AND SHEETED SO THAT THE EARTH WILL NOT SLIDE OR SETTLE AND SO THAT ALL EXISTING IMPROVEMENTS OF ANY KIND WILL BE FULLY PROTECTED FROM DAMAGE. ANY DAMAGE RESULTING FROM A LACK OF ADEQUATE SHORING, BRACING AND SHEETING, SHALL BE THE RESPONSIBILITY OF THE CONTRACTOR AND HE SHALL EFFECT NECESSARY REPAIRS OR RECONSTRUCTION AT HIS OWN EXPENSE. WHERE THE EXCAVATION FOR A CONDUIT TRENCH, AND/OR STRUCTURE IS FIVE FEET OR MORE IN DEPTH, THE CONTRACTOR SHALL PROVIDE ADEQUATE SHEETING, WHICH SHALL CONFORM TO THE APPLICABLE CONSTRUCTION SAFETY ORDERS OF THE DIVISION OF INDUSTRIAL SAFETY OF THE STATE OF CALIFORNIA. THE CONTRACTOR SHALL ALWAYS COMPLY WITH OSHA REQUIREMENTS.
4. IT IS THE RESPONSIBILITY OF THE CONTRACTOR TO OBTAIN PERMITS NECESSARY TO PERFORM THE WORK SHOWN IN THESE PLANS FROM THE APPROPRIATE AGENCIES.
5. THE CONTRACTOR SHALL TAKE EFFECTIVE ACTION TO PREVENT THE FORMATION OF AN AIRBORNE DUST NUISANCE AND SHALL BE RESPONSIBLE FOR ANY DAMAGE RESULTING FROM HIS FAILURE TO DO SO.
6. THE CONTRACTOR SHALL PROVIDE FOR INGRESS AND EGRESS FOR PRIVATE PROPERTY ADJACENT TO WORK THROUGHOUT THE PERIOD OF CONSTRUCTION.
7. THE CONTRACTOR SHALL PROVIDE ALL LIGHTS, SIGNS, BARRICADES, FLAGMEN OR OTHER DEVICES NECESSARY TO PROVIDE FOR SAFETY. TRAFFIC CONTROL AND ALL TRAFFIC CONTROL DEVICES SHALL BE IN CONFORMANCE WITH THE "MANUAL OF TRAFFIC CONTROLS FOR CONSTRUCTION AND MAINTENANCE ZONES", LATEST EDITION AS PUBLISHED BY THE STATE OF CALIFORNIA, DEPARTMENT OF TRANSPORTATION.
8. THE CONTRACTOR SHALL POST EMERGENCY TELEPHONE NUMBERS FOR POLICE, FIRE, AMBULANCE, AND THOSE AGENCIES RESPONSIBLE FOR MAINTENANCE OF UTILITIES IN THE VICINITY OF JOBSITE.
9. ALL RETURN RADII AND CURB DATA ARE TO FACE OF CURB UNLESS SHOWN OR NOTED OTHERWISE.
10. ALL QUANTITIES AND PAY ITEMS ARE AND WILL BE BASED ON HORIZONTAL MEASUREMENTS.
11. LENGTHS OF SANITARY SEWERS AND STORM DRAINS ARE HORIZONTAL DISTANCES FROM CENTER TO CENTER OF STRUCTURES, ROUNDED OFF TO THE NEAREST FOOT.
12. EXISTING UNDERGROUND UTILITIES AND IMPROVEMENTS ARE SHOWN IN THEIR APPROXIMATE LOCATIONS BASED UPON RECORD INFORMATION AVAILABLE TO THE ENGINEER AT THE TIME OF PREPARATION OF THESE PLANS. LOCATIONS MAY NOT HAVE BEEN VERIFIED IN THE FIELD AND NO GUARANTEE IS MADE AS TO THE ACCURACY OR COMPLETENESS OF THE INFORMATION SHOWN. THE CONTRACTOR SHALL NOTIFY UTILITY COMPANIES AT LEAST 2 WORKING DAYS IN ADVANCE OF CONSTRUCTION TO FIELD LOCATE UTILITIES. CALL UNDERGROUND SERVICE ALERT (U.S.A.), AT 1-800-227-2600. IT SHALL BE THE RESPONSIBILITY OF THE CONTRACTOR TO DETERMINE THE EXISTENCE AND LOCATION OF THOSE UTILITIES SHOWN ON THESE PLANS OR INDICATED IN THE FIELD BY LOCATING SERVICES. ANY ADDITIONAL COSTS INCURRED AS A RESULT OF CONTRACTOR'S FAILURE TO VERIFY LOCATIONS OF EXISTING UTILITIES PRIOR TO BEGINNING OF CONSTRUCTION IN THEIR VICINITY SHALL BE BORNE BY THE CONTRACTOR AND ASSUMED INCLUDED AND MERGED IN THE CONTRACT UNIT PRICE.
13. ALL EXISTING UTILITIES AND IMPROVEMENTS THAT BECOME DAMAGED DURING CONSTRUCTION SHALL BE COMPLETELY RESTORED TO THE SATISFACTION OF THE LOCAL AGENCY ENGINEER, AT THE CONTRACTOR'S SOLE EXPENSE.
14. ANY RELOCATION OF PUBLIC UTILITIES SHALL BE CONDUCTED IN ACCORDANCE WITH ANY AND ALL REQUIREMENTS OF THE UTILITY COMPANY, INCLUDING FEES, BONDS, PERMITS AND WORKING CONDITIONS, ETC.
15. IF ARCHAEOLOGICAL MATERIALS ARE UNCOVERED DURING GRADING, TRENCHING OR OTHER EXCAVATION, EARTHWORK WITHIN 100 FEET OF THESE MATERIALS SHALL BE STOPPED UNTIL A PROFESSIONAL ARCHAEOLOGIST WHO IS CERTIFIED BY THE SOCIETY OF CALIFORNIA ARCHAEOLOGY (SCA) AND/OR THE SOCIETY OF PROFESSIONAL ARCHAEOLOGY (SOPA) HAS HAD AN OPPORTUNITY TO EVALUATE THE SIGNIFICANCE OF THE FIND AND SUGGEST APPROPRIATE MITIGATION MEASURES, IF THEY ARE DEEMED NECESSARY.
16. LANE ENGINEERS, INC. DOES NOT SPECIFY NOR RECOMMEND THE USE OR INSTALLATION OF ANY MATERIAL OR EQUIPMENT WHICH IS MADE FROM, OR WHICH CONTAINS ASBESTOS FOR USE IN THE CONSTRUCTION OF THESE IMPROVEMENTS. ANY PARTY INSTALLING OR USING SUCH MATERIALS OR EQUIPMENT SHALL BE SOLELY RESPONSIBLE FOR ALL INJURIES, DAMAGES, OR LIABILITIES, OF ANY KIND, CAUSED BY THE USE OF SUCH MATERIALS OR EQUIPMENT. THE PROVISIONS OF THIS NOTE SHALL APPLY UNLESS THEY ARE EXPRESSLY WAIVED IN WRITING BY LANE ENGINEERS, INC..
17. SHOULD IT APPEAR THAT THE WORK TO BE DONE OR ANY MATTER RELATIVE THERETO IS NOT SUFFICIENTLY DETAILED OR EXPLAINED ON THESE PLANS, THE CONTRACTOR SHALL CONTACT MANGINI ASSOCIATES, INC. (559) 627-0530 FOR SUCH FURTHER EXPLANATIONS AS MAY BE NECESSARY.
18. THE CONTRACTOR SHALL MEET AND FOLLOW ALL NPDES REQUIREMENTS IN EFFECT AT THE TIME OF CONSTRUCTION.
19. CONTRACTOR SHALL COMPLY WITH SAN JOAQUIN VALLEY AIR POLLUTION CONTROL DISTRICT (SJVAPCD) REGULATION VIII TO LIMIT FUGITIVE DUST.
20. APPROPRIATE APPROVAL SHALL BE OBTAINED PRIOR TO PROCEEDING WITH ANY WORK IN THE VICINITY OF IRRIGATION DITCHES, CREEKS AND ASSOCIATED IRRIGATION FACILITIES WHETHER OR NOT SHOWN ON THESE PLANS.

CIVIL ABBREVIATIONS

&	AND
@	AT
℄	CENTERLINE
Ø	DIAMETER OR ROUND
⊥	PERPENDICULAR
#	POUND OR NUMBER
( )	EXISTING DATA
N	NORTH
S	SOUTH
W	WEST
E	EAST
AB	AGGREGATE BASE
ABV	ABOVE
AC	ASPHALT CONCRETE
ACC	ACCESSIBLE
ACP	ASBESTOS CEMENT PIPE
AD	AREA DRAIN
ADJ	ADJUSTABLE
ADJT	ADJACENT
ALT	ALTERNATE
APPROX	APPROXIMATE
ARCH	ARCHITECT(URAL)
BC	BEGINNING OF CURVE
BCR	BEGINNING OF CURB RETURN
BLDG	BUILDING
BM	BENCH MARK
BO	BLOW OFF
BOT	BOTTOM
BTWN	BETWEEN
BW	BOTH WAYS
C	TOP OF CONCRETE
CB	CATCH BASIN
CEM	CEMENT
CF	CUBIC FOOT
CI	CAST IRON
CIP	CAST IRON PIPE
CIPC	CAST-IN-PLACE CONCRETE
CIR	CIRCLE
CJ	CONTROL JOINT
CAP	CORRUGATED ALUMINUM PIPE
CMP	CORRUGATED METAL PIPE
CSP	CORRUGATED STEEL PIPE
CMU	CONCRETE MASONRY UNIT
CO	CLEAN OUT
COL	COLUMN
CONC	CONCRETE
CONST	CONSTRUCTION
CONT	CONTINUOUS
CONTR	CONTRACTOR
COR	CORNER
CR	CROWN
CY	CUBIC YARD
D	DRAIN
DA	DRIVE APPROACH
DEM	DEMOLISH, DEMOLITION
DET	DETAIL
DI	DRAIN OR DROP INLET
DIA	DIAMETER
DIAG	DIAGONAL
DIM	DIMENSION
DIP	DUCTILE IRON PIPE
DN	DOWN
DWG	DRAWING
E	EAST
EA	EACH
EC	END OF CURVE
ECR	END OF CURB RETURN
EJ	EXPANSION JOINT
ELEV	ELEVATION
ENCL	ENCLOSURE
EP	EDGE OF PAVEMENT
EQ	EQUAL
EQUIP	EQUIPMENT
EST	ESTIMATE
ETW	EDGE OF TRAVEL WAY
EXCA	EXCAVATE
EXIST	EXISTING
FD	FOUND
FES	FLARED END SECTION
FF	FINISHED FLOOR ELEVATION
FG	FINISHED GRADE
FH	FIRE HYDRANT
FL	FLOW LINE
FNC	FENCE
FOC	FACE OF CONCRETE
FOF	FACE OF FINISH
FOM	FACE OF MASONRY
FOS	FACE OF STUDS
FTG	FOOTING
GA	GAUGE
GALV	GALVANIZED
GB	GRADE BREAK
GC	GRADE CHANGE
GI	GALVANIZED IRON
GR	TOP OF GRATE
GRD	GRADE, GRADING
GV	GATE VALVE
HORIZ	HORIZONTAL
HP	HINGE POINT
HPT	HIGH POINT
HW	HEADWALL
HWL	HIGH WATER LINE
ID	INSIDE DIAMETER
INCL	INCLUDE(D), INCLUDING
INV	INVERT
JB	JUNCTION BOX
JT	JOINT
L	LEFT
LP	LOW POINT
LT	LIGHT
M	METER(S)
MAS	MASONRY
MAX	MAXIMUM
MECH	MECHANICAL
MED	MEDIUM
MET	METAL
MFR	MANUFACTURER
MH	MAN HOLE
MIN	MINIMUM
MISC	MISCELLANEOUS
MM	MILLIMETER(S)
MTL	MATERIAL
MTR	METER
N	NORTH
NE	NORTH EAST
NAT	NATURAL
NIC	NOT IN CONTRACT
NTS	NOT TO SCALE
OC	ON CENTER
OD	OUTSIDE DIAMETER
OG	ORIGINAL GROUND
OH	OPPOSITE HAND
OPNG	OPENING
OPP	OPPOSITE
P	TOP OF PAVING
PAR	PARALLEL
PC	PROPERTY CORNER
PCC	POINT OF COMPOUND CURVATURE
PERI	PERIMETER
PK	PARKING
P/L	PROPERTY LINE
POC	POINT OF CONNECTION
PP	POWER POLE
PRC	POINT OF REVERSE CURVATURE
PRKG	PARKING
PROP	PROPERTY
PT	POINT
PVC	POLYVINYL CHLORIDE
PVMT	PAVEMENT
R	RIDGE
RAD	RADIUS
RCP	REINFORCED CONCRETE PIPE
RDR	ROOF DRAIN
REF	REFERENCE
REQD	REQUIRED
RET	RETURN
RETG	RETAINING
REV	REVISION
RP	RADIUS POINT
RR	RAILROAD
RT	RIGHT
R/W	RIGHT OF WAY
RWC	RAINWATER CONDUCTOR
RWL	RAINWATER LEADER
S	SOUTH
SCHED	SCHEDULE
SD	STORM DRAIN
SDMH	STORM DRAIN MANHOLE
SEC	SECTION
SERV	SERVICE
SF	SQUARE FOOT
SG	FINISHED SUBGRADE
SHT	SHEET
SIM	SIMILAR
SPEC	SPECIFICATION
SPECS	SPECIFICATIONS
SQ	SQUARE
SS	SANITARY SEWER
SSMH	SANITARY SEWER MANHOLE
SSDMH	SANITARY SEWER DROP MANHOLE
SSTL	STAINLESS STEEL
STA	STATION
STD	STANDARD
STL	STEEL
STRUCT	STRUCTURAL
SW	SWALE
SYM	SYMETRICAL
T&B	TOP AND BOTTOM
TB	TOP OF BERM
TBM	TEMPORARY BENCH MARK
TC	TOP OF CURB
TD	TOP OF DIKE
TEL	TELEPHONE
TEMP	TEMPORARY
TER	TOP OF EAST RAIL
TF	TOP OF FOOTING
TH	TOP OF REDWOOD HEADER
THK	THICK(NESS)
TM	TOP OF MOW STRIP
TOM	TOP OF MASONRY
TOS	TOP OF STEEL
TNR	TOP OF NORTH RAIL
TR	TOP OF RAIL
TRK	TOP OF ROCK
TSL	TOP OF SLAB
TSR	TOP OF SOUTH RAIL
TW	TOP OF WALL
TWR	TOP OF WEST RAIL
TYP	TYPICAL
UGD	UNDERGROUND
UNO	UNLESS NOTED OTHERWISE
VCP	VITRIFIED CLAY PIPE
VERT	VERTICAL
VIF	VERIFY IN FIELD
W	WEST
W	WITH
W/O	WITHOUT
WD	WOOD
WHB	WHEEL BUMPER
WM	WATER METER
WP	WORKING POINT
WTR	WATER
WV	WATER VALVE

ABBREVIATIONS: WHEN USED IN THESE CIVIL DRAWINGS SHALL CONFORM TO THE ABOVE LIST, UNLESS NOTED OTHERWISE. OTHER SECTIONS (SUCH AS ARCHITECTURAL, STRUCTURAL, MECHANICAL, PLUMBING AND ELECTRICAL PLANS) MAY CONTAINSPECIFIC REFERENCES AND LEGENDS WITH INTERPRETATIONS INTENDED ONLY FOR THOSE SECTIONS.

REGISTERED PROFESSIONAL ENGINEER — HA VANG — C.E.E. 73146 — 06/19/2024 — CIVIL — STATE OF CALIFORNIA

CONSULTANT

LANE ENGINEERS INC.
CIVIL• STRUCTURAL• SURVEYING
979 N. BLACKSTONE
TULARE, CALIFORNIA 93274
(559) 688-5263

APPROVALS

FILE #	APPLICATION #
10-28	02-122132

IDENTIFICATION STAMP
DIV. OF THE STATE ARCHITECT
APP: 02-122132 INC: A
REVIEWED FOR
SS ☑ FLS ☑ ACS ☑
DATE: 08/06/2024

LICENSED ARCHITECT — MICHAEL J. SCOTT — No. C-34290 — REN:08-31-25 — STATE OF CALIFORNIA

DATE: JANUARY 31, 2024

NEW TK CLASSROOM AT CHENEY ELEMENTARY SCHOOL

COALINGA-HURON UNIFIED SCHOOL DISTRICT
36131 N ST, HURON, CALIFORNIA 93234

REVISIONS

MANGINI — ARCHITECTURE | ENGINEERING
MANGINI ASSOCIATES INC.
4320 West Mineral King Avenue
Visalia, California 93291
www.mangini.us
(559) 627-0530 Office
(559) 627-1926 Fax

TITLE
CIVIL COVERSHEET

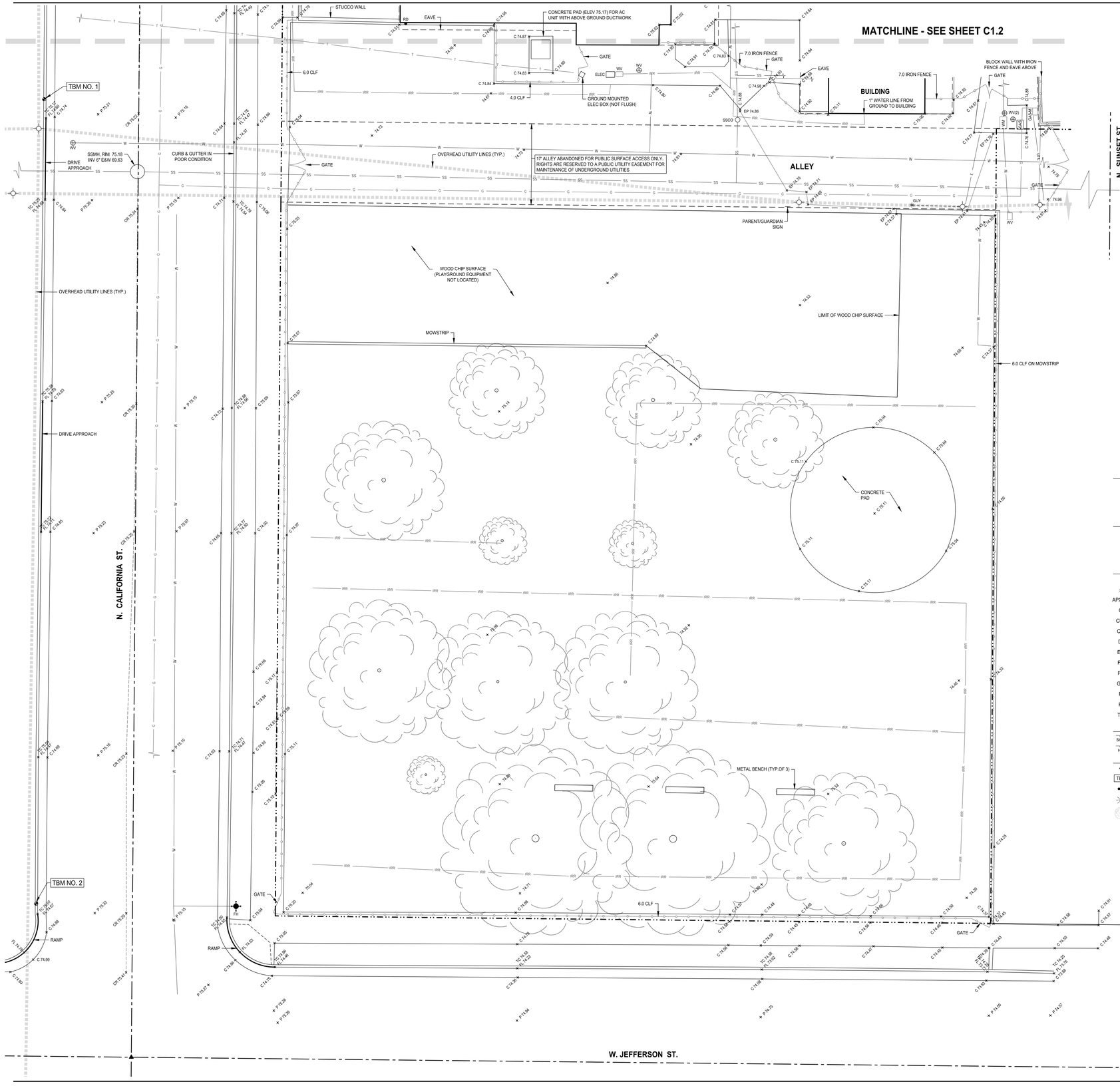
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PROJECT 23044

LANE PROJ. NO. 23343.1

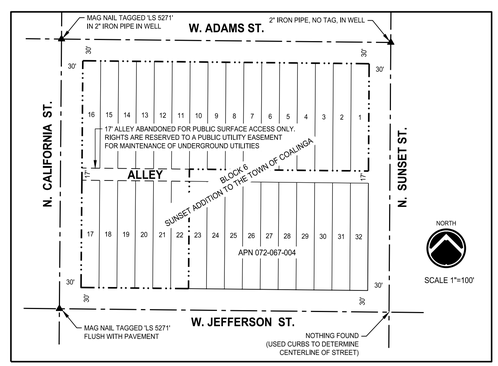
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VICINITY MAP



NORTH

GRAPHIC SCALE

10 0 5 10 20

1 INCH = 10 FT.

BASIS OF BEARINGS

THE BASIS OF BEARINGS FOR THIS SURVEY IS THE CALIFORNIA COORDINATE SYSTEM, ZONE 4, NAD 83, AS DETERMINED BY GPS OBSERVATIONS RELATIVE TO THE CALIFORNIA SURVEYING AND DRAFTING, INC, VIRTUAL SURVEY NETWORK, EPOCH DATE 2011.

LEGAL DESCRIPTION:

LOTS 1-22 OF BLOCK 6 OF THE CORRECTED MAP OF SUNSET ADDITION TO THE TOWN OF COALINGA, RECORDED IN BOOK 3 OF MAPS, AT PAGE 15, F.C.R., SITUATED IN A PORTION OF SECTION 32, T. 20 S., R. 15 E., M. D, B, & M., IN THE CITY OF COALINGA, COUNTY OF FRESNO, STATE OF CALIFORNIA.
APN 072-067-001

BOUNDARY NOTE:

RIGHT OF WAYS AND CENTERLINES SHOWN ARE BASED ON RECORD DATA , FOUND MONUMENTS AND CURB LOCATIONS.

VERTICAL DATUM & BENCHMARKS:

THE VERTICAL DATUM USED FOR THIS SURVEY IS THE NORTH AMERICAN VERTICAL DATUM OF 1988 (NAVD 88) BASED ON THE CALIFORNIA SURVEYING AND DRAFTING, INC. VIRTUAL SURVEY NETWORK. EPOCH DATE 2011.

TBM NO. 1: CHISELED PLUS IN TOP OF CURB ON THE WEST SIDE OF CALIFORNIA STREET, 4'± NORTH OF THE NORTH EDGE DRIVE APPROACH, NORTHWEST CORNER OF SITE.
ELEV = 675.18 (NAVD 88).

TBM NO. 2: CHISELED PLUS IN TOP OF CURB, 2'± NORTH OF THE NORTH CURB RETURN NORTHWEST CORNER OF CALIFORNIA STREET AND JEFFERSON STREET.
ELEV = 675.07 (NAVD 88).

VERTICAL DATUM NOTE:

1. ADD 600.00 FEET TO ELEVATIONS SHOWN ON PLAN TO OBTAIN DATUM BASED ON NORTH AMERICAN VERTICAL DATUM 1988.

DATE OF SURVEY NOTE:

FIELD WORK FOR THIS TOPOGRAPHIC SURVEY WAS COMPLETED ON NOVEMBER 9, 2023 AND UPDATED JANUARY 31, 2024.

UNDERGROUND UTILITY NOTE:

UNDERGROUND UTILITY LINES ARE SHOWN BASED ON SURFACE EVIDENCE INCLUDING MANHOLES, BOXES, VALVES AND PAINT MARKINGS PROVIDED BY MDR UTILITY LOCATING SPECIALISTS, TO CONFIRM THESE LOCATIONS IT WILL BE NECESSARY TO NOTIFY U.S.A. (UNDERGROUND SERVICE ALERT). TELEPHONE U.S.A. AT 811 PRIOR TO DIGGING. THE DEPTHS OF ALL LINES MUST BE DETERMINED BY CAREFULLY PROBING OR POTHOLING UNDER UTILITY COMPANY SUPERVISION.

FLOOD HAZARD ZONE X (UNSHADED)

AS DELINEATED ON THE FEDERAL EMERGENCY MANAGEMENT AGENCY'S FLOOD INSURANCE RATE MAP (MAP NUMBER 06019C3213H) FOR COMMUNITY NO. 060045, CITY OF COALINGA, FRESNO COUNTY, CALIFORNIA, EFFECTIVE FEBRUARY 18, 2009, THE PROPERTY SHOWN ON THIS MAP LIES FULLY WITHIN FLOOD ZONE AREA DESIGNATED ZONE X (UNSHADED), WHICH ARE AREAS OUTSIDE OF 0.2% ANNUAL CHANCE FLOODING.

LEGEND

× 90.11	ORIGINAL GROUND ELEVATION (UNLESS NOTED OTHERWISE)
APX FF	CONCRETE ELEVATION MEASURED ADJACENT TO LOCKED DOOR
C	TOP OF CONCRETE
CLF	CHAIN LINK FENCE
CR	CROWN
DI	DRAIN INLET
EP	EDGE OF PAVEMENT
FF	FINISH FLOOR ELEVATION
FL	FLOW LINE
GR	TOP OF GRATE
P	TOP OF PAVEMENT
R	RIDGE
TC	TOP OF CURB

SIGNS

SIGN	SIGN AS NOTED
HC	HANDICAP SIGN

GENERAL SYMBOLS

▲	MONUMENT FOUND AS DESCRIBED
TBM	TEMPORARY BENCH MARK
● GP	GUARD POST TO SCALE
	AREA LIGHT
	DECIDUOUS TREE TRUNK AND CANOPY DRAWN TO SCALE

WET UTILITIES

DI	DRAIN INLET
FH	FIRE HYDRANT
ICV	IRRIGATION CONTROL VALVE
RD	ROOF DRAIN
SSCO	SANITARY SEWER CLEAN OUT
WM	WATER METER
WV	WATER VALVE
MH	MANHOLE

DRY UTILITIES

ELEC	ELECTRICAL BOX
GAS-M	GAS METER
GAS	GAS VALVE
GUY	GUY ANCHOR
	UTILITY POLE

UTILITY LINETYPES

E	ELECTRICAL
G	GAS
IRR	IRRIGATION
SS	SANITARY SEWER
T	TELEPHONE
UTIL	UNLABELED UTILITY PAINT
W	WATER

IDENTIFICATION STAMP
DIV. OF THE STATE ARCHITECT
APP: 02-122132 INC: A
REVIEWED FOR
SS ☑ FLS ☑ ACS ☑
DATE: 08/06/2024

Project
CHENEY ELEMENTARY, TK CLASSROOMS

149 ADAMS STREET
COALINGA, CA.

Prepared For
COALINGA-HURON UNIFIED SCHOOL DISTRICT

LANE ENGINEERS, INC.
CIVIL • STRUCTURAL • SURVEYING

979 North Blackstone Street
Tulare, California 93274
559.688.5263
www.laneengineers.com

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Professional Seal

LICENSED LAND SURVEYOR
Ronald D. Snow
No. 6859
STATE OF CALIFORNIA

Description	Release Date

No.	Revision	Date

Drawn by: DRD/BAS

Reviewed by: RDS

Sheet Title
PARTIAL TOPOGRAPHIC SURVEY

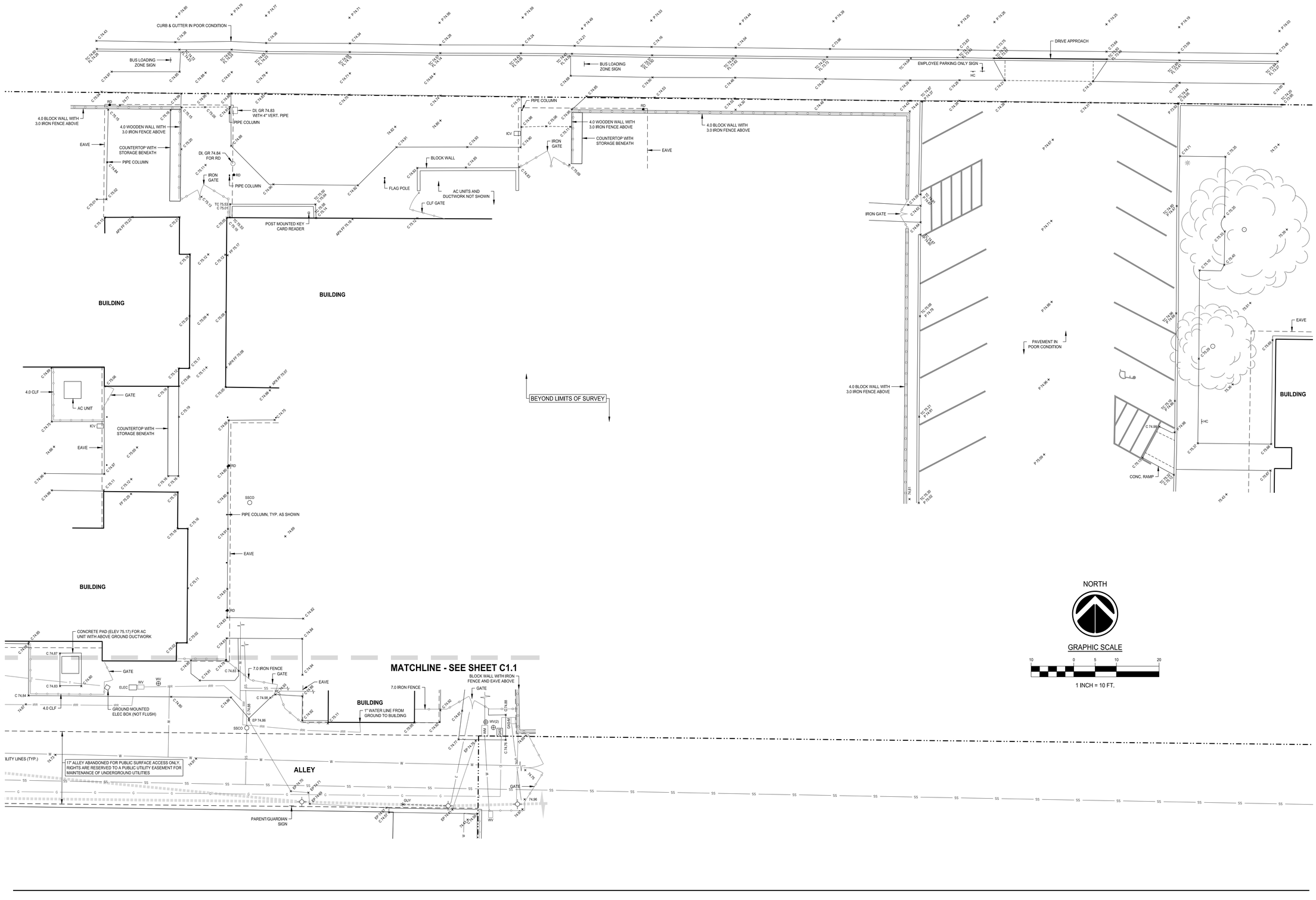
Original drawing is 24 x 36. Do not scale contents of this drawing.

Sheet Number

C1.1

OF 2

Project No: 23343



NORTH

GRAPHIC SCALE

10 0 5 10 20

1 INCH = 10 FT.

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IDENTIFICATION STAMP
DIV. OF THE STATE ARCHITECT
APP: 02-122132 INC:
REVIEWED FOR
SS ☑ FLS ☑ ACS ☑
DATE: 08/06/2024

Project
CHENEY ELEMENTARY, TK CLASSROOMS

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Professional Seal

LICENSED LAND SURVEYOR
Ronald D. Snow
No. 6859
STATE OF CALIFORNIA

Description	Release Date

No.	Revision	Date

Drawn by: DRD/BAS

Reviewed by: RDS

Sheet Title
PARTIAL TOPOGRAPHIC SURVEY

Original drawing is 24 x 36. Do not scale contents of this drawing.

Sheet Number

C1.2

OF 2

Project No: 23343

APPROVALS

FILE # 10-28 | APPLICATION # 02-122132

IDENTIFICATION STAMP
DIV. OF THE STATE ARCHITECT
APP: 02-122132 INC:
REVIEWED FOR
SS ☑ FLS ☑ ACS ☑
DATE: 08/06/2024

LICENSED ARCHITECT
MICHAEL J. SCOTT '98
No. C-34290
RENT 08-31-25
STATE OF CALIFORNIA

DATE: JANUARY 31, 2024

NEW TK CLASSROOM AT CHENEY ELEMENTARY SCHOOL

COALINGA-HURON UNIFIED SCHOOL DISTRICT
36131 N ST, HURON, CALIFORNIA 93234

REVISIONS

GRADING NOTES

1. REFER TO SHEETS C0.1 FOR BENCHMARKS, GENERAL NOTES & INFORMATION.
2. UNLESS SHOWN OR NOTED OTHERWISE, WHERE FINISH GRADE ABUTS CONCRETE PAVEMENTS/BACK OF CURBS, FINISH GRADE ELEVATION SHALL BE 1 INCH LOWER THAN ADJACENT CONCRETE ELEVATION IN SHRUB AREAS AND ½ INCH LOWER IN TURF AREAS.
3. CROSS SLOPE AT ALL PEDESTRIAN WALKS AND SIDEWALKS SHALL BE 1% MIN., BUT SHALL NOT EXCEED 2.0%.
4. FINISHED PAVEMENT SLOPES AT ALL ACCESSIBLE PARKING SPACES AND ACCESS AISLES SHALL NOT EXCEED 2.0% IN ANY DIRECTION.
5. EXTERIOR CONCRETE SHALL BE FLUSH WITH FINISHED FLOOR AT ALL EXTERIOR DOORS.
6. FIELD VERIFY ALL ELEVATIONS SHOWN WHERE PROPOSED IMPROVEMENTS ABUT EXISTING IMPROVEMENTS. IMMEDIATELY NOTIFY PROJECT ARCHITECT OF ANY DISCREPANCIES.
7. REFER TO ARCHITECTURAL DRAWINGS FOR ADDITIONAL SITE INFORMATION AND DETAILS.
8. ALL EXISTING VALVE BOXES AND MANHOLES TO REMAIN SHALL BE ADJUSTED AS REQUIRED SO THAT THE TOP OF COVERS ARE FLUSH WITH FINISH GRADES.
9. SEE PROJECT SPECIFICATIONS FOR SITE PREPARATION OVER-EXCAVATION REQUIREMENTS.
10. SEE SHEET C5.1 & C5.2 FOR OFFSITE DEMOLITION AND IMPROVEMENTS.

LEGEND

- NEW CONCRETE WALKWAY & OTHER CONCRETE SURFACE IMPROVEMENTS
- RIGHT OF WAY/PROPERTY LINE
- ROAD CENTERLINE

A ENLARGED GRADING

SCALE: 1"=5'

GRADING AND DRAINAGE PLAN

REGISTERED PROFESSIONAL ENGINEER
WA VANG
C.E. 73146
06/19/2024
CIVIL
STATE OF CALIFORNIA

CONSULTANT
LANE ENGINEERS INC.
CIVIL • STRUCTURAL • SURVEYING
979 N. BLACKSTONE
TULARE, CALIFORNIA 93274
(559) 688-5263

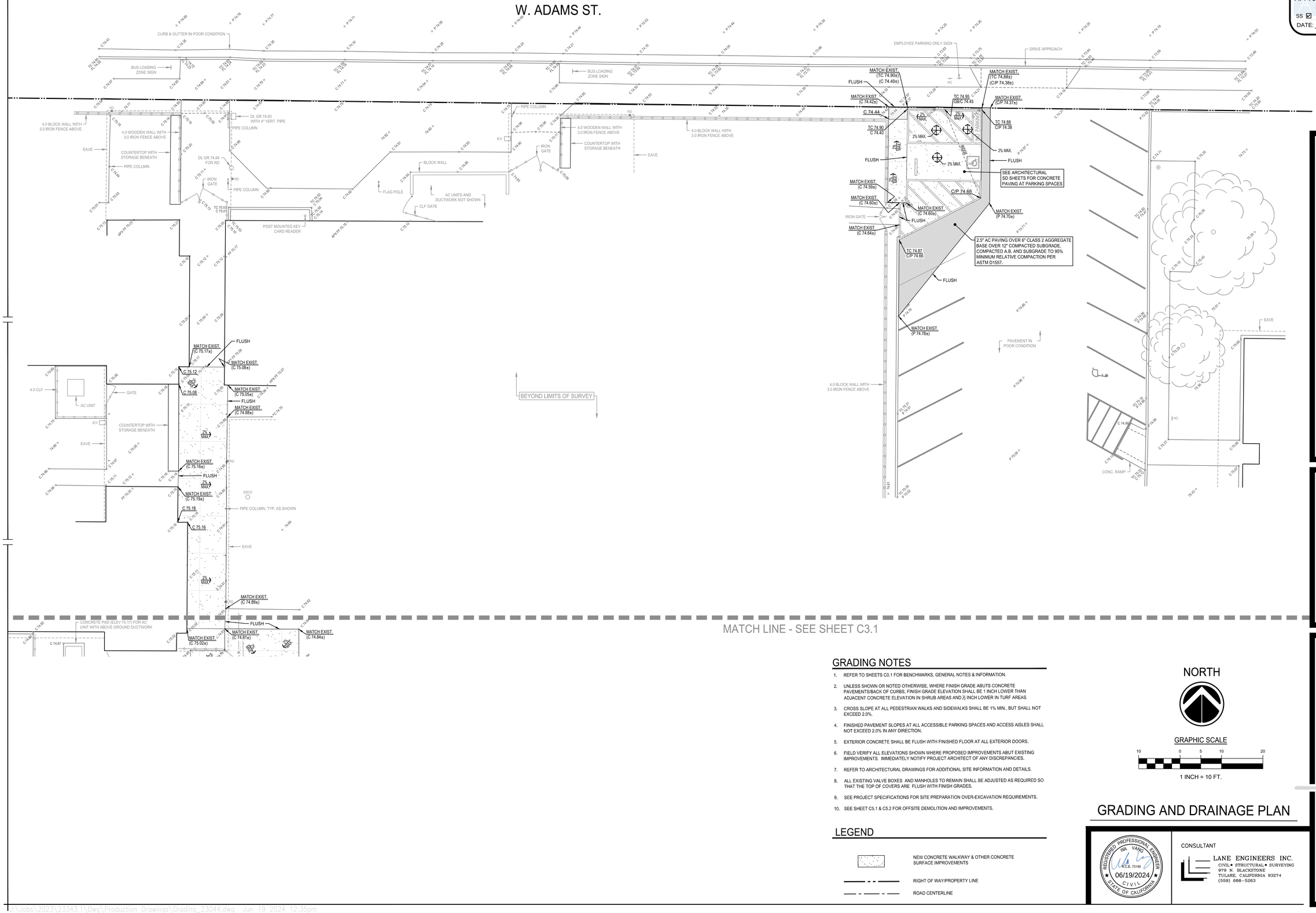
MANGINI ARCHITECTURE | INGENUITY
MANGINI ASSOCIATES INC.
4320 West Mineral King Avenue
Visalia, California 93291
www.mangini.us
(559) 627-0530 Office
(559) 627-1926 Fax

TITLE
GRADING AND DRAINAGE PLAN

C3.1

PROJECT 23044

LANE PROJ. NO. 23343.1



GRADING NOTES

1. REFER TO SHEETS C0.1 FOR BENCHMARKS, GENERAL NOTES & INFORMATION.
2. UNLESS SHOWN OR NOTED OTHERWISE, WHERE FINISH GRADE ABUTS CONCRETE PAVEMENTS/BACK OF CURBS, FINISH GRADE ELEVATION SHALL BE 1 INCH LOWER THAN ADJACENT CONCRETE ELEVATION IN SHRUB AREAS AND ½ INCH LOWER IN TURF AREAS.
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7. REFER TO ARCHITECTURAL DRAWINGS FOR ADDITIONAL SITE INFORMATION AND DETAILS.
8. ALL EXISTING VALVE BOXES AND MANHOLES TO REMAIN SHALL BE ADJUSTED AS REQUIRED SO THAT THE TOP OF COVERS ARE FLUSH WITH FINISH GRADES.
9. SEE PROJECT SPECIFICATIONS FOR SITE PREPARATION OVER-EXCAVATION REQUIREMENTS.
10. SEE SHEET C5.1 & C5.2 FOR OFFSITE DEMOLITION AND IMPROVEMENTS.

LEGEND

- NEW CONCRETE WALKWAY & OTHER CONCRETE SURFACE IMPROVEMENTS
- RIGHT OF WAY/PROPERTY LINE
- ROAD CENTERLINE

NORTH

GRAPHIC SCALE

10 0 5 10 20

1 INCH = 10 FT.

GRADING AND DRAINAGE PLAN

REGISTERED PROFESSIONAL ENGINEER YA VANG C.E.E. 73146 06/19/2024 CIVIL STATE OF CALIFORNIA

CONSULTANT

LANE ENGINEERS INC.
CIVIL● STRUCTURAL● SURVEYING
979 N. BLACKSTONE
TULARE, CALIFORNIA 93274
(559) 688-5263

APPROVALS

FILE # 10-28 | APPLICATION # 02-122132

IDENTIFICATION STAMP
DIV. OF THE STATE ARCHITECT
APP: 02-122132 INC:
REVIEWED FOR
SS ☑ FLS ☑ ACS ☑
DATE: 08/06/2024

LICENSED ARCHITECT MICHAEL J. SCOTT '98 No. C-34290 REN:08-31-25 STATE OF CALIFORNIA

DATE: JANUARY 31, 2024

NEW TK CLASSROOM AT CHENEY ELEMENTARY SCHOOL
COALINGA-HURON UNIFIED SCHOOL DISTRICT
36131 N ST, HURON, CALIFORNIA 93234

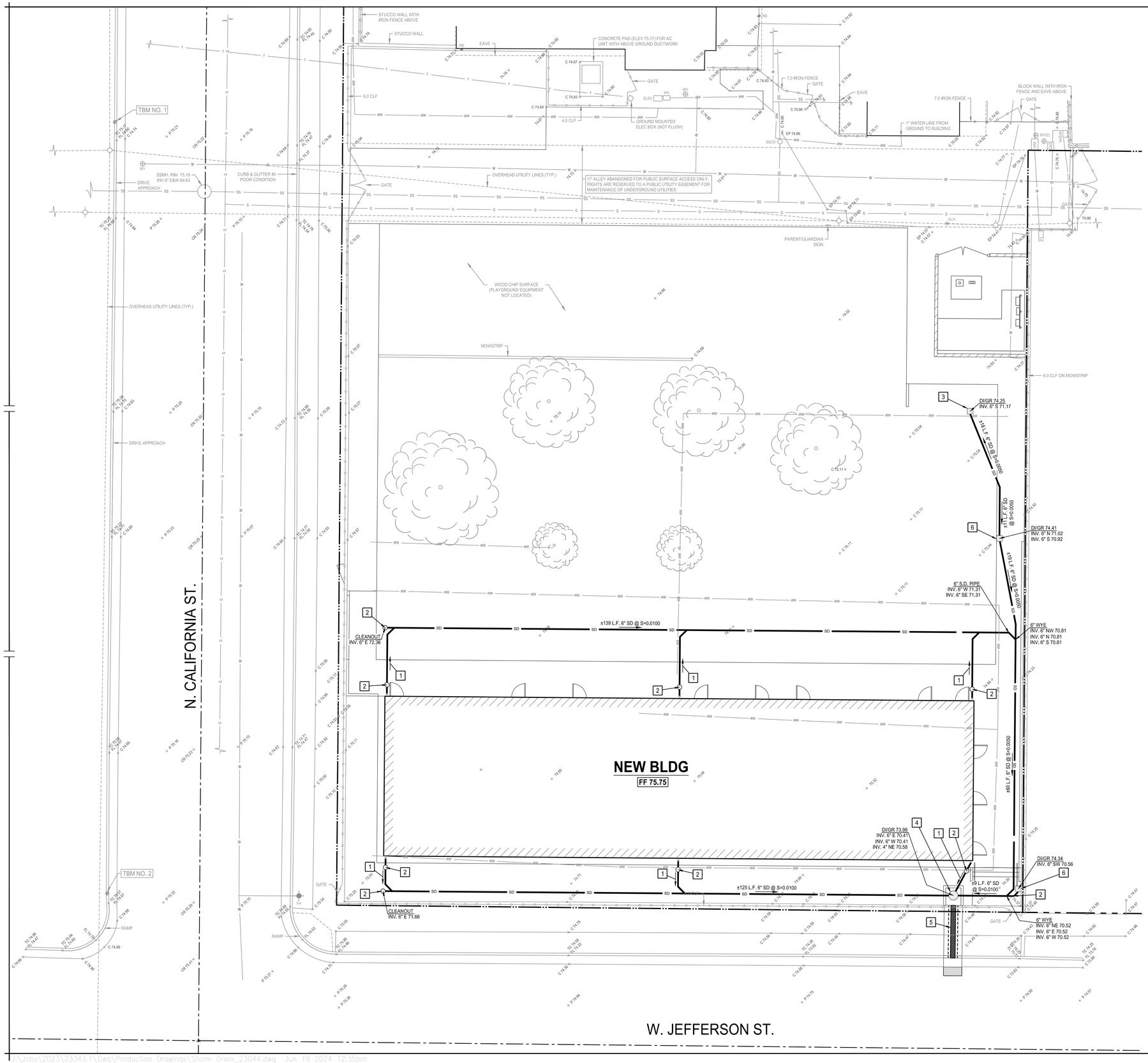
REVISIONS

MANGINI ARCHITECTURE | ENGINEERING
MANGINI ASSOCIATES INC.
4320 West Mineral King Avenue
Visalia, California 93291
www.mangini.us
(559) 627-0530 Office
(559) 627-1926 Fax

TITLE
GRADING AND DRAINAGE PLAN

C3.2

PROJECT 23044



NOTES

1. REFER TO SHEETS C0.1 FOR BENCHMARKS, GENERAL NOTES & INFORMATION.
2. SEE ARCHITECTURAL DWGS. FOR ADDITIONAL SITE INFORMATION AND DETAILS. SEE PLUMBING DRAWINGS FOR ADDITIONAL WET UTILITY PIPING.
3. ALL STORM DRAIN PIPING AND LATERALS SHALL HAVE A MINIMUM OF 3' OF COVER.
4. EXTEND STORM DRAIN LATERAL PIPING TO BUILDING DOWNSPOUTS, UNLESS NOTED OTHERWISE. CONTRACTOR SHALL VERIFY ALL ROOF DOWNSPOUT LOCATIONS WITH ARCHITECTURAL DRAWINGS.
5. ALL TRENCHES ON-SITE SHALL BE BACKFILLED IN ACCORDANCE WITH DETAIL 11/C7.1.
6. ANY EXISTING IRRIGATION SYSTEMS THAT ARE DAMAGED OR REMOVED DUE TO NEW STORM DRAIN PIPE INSTALLATION SHALL BE REPAIR/REPLACED AS REQUIRED.
7. CONTRACTOR SHALL VERIFY THAT NO CONFLICTS OCCUR BETWEEN STORM DRAIN PIPE ALIGNMENTS AND CANOPY FOOTINGS.
8. DUE TO THE SCALE OF THE DRAWINGS, IT IS NOT POSSIBLE TO INDICATE ALL OFFSETS, PIPE SLOPES, FITTINGS, ETC., WHICH MAY BE REQUIRED. IT SHALL BE THE RESPONSIBILITY OF THE CONTRACTOR TO REVIEW THESE DRAWINGS AND FURNISH ALL FITTINGS, ETC. NECESSARY TO COMPLETE A FULLY FUNCTIONAL PIPING SYSTEM AND AVOID ANY CONFLICTS WITH OTHER UTILITIES.

LEGEND

- RIGHT OF WAY/PROPERTY LINE
- ROAD CENTERLINE
- SD — NEW STORM DRAIN PIPING

CONSTRUCTION KEYNOTES — THIS SHEET ONLY

1. FURNISH & INSTALL 4"Ø STORM DRAIN LATERALS TO ROOF DOWNSPOUT. ALL LATERALS SLOPE TO DRAIN AWAY FROM STRUCTURES AND SHALL HAVE A MIN. SLOPE OF 2.0%.
2. FURNISH AND INSTALL CLEANOUT TO GRADE. SEE DETAIL 12/C7.1
3. FURNISH & INSTALL DRAIN INLET WITH CAST IRON GRATE. SEE DETAIL 23/C7.1.
4. CONSTRUCT DRAINAGE OUTLET BEHIND SIDEWALK. SEE DETAIL 22/C7.1.
5. CONSTRUCT CITY STANDARD SIDEWALK CHANNEL DRAIN. SEE OFFSITE SHEET C5.2 FOR MORE INFORMATION.
6. FURNISH & INSTALL DRAIN INLET WITH "ADA" GRATE. SEE DETAIL 24/C7.1.

NORTH

GRAPHIC SCALE

10 0 5 10 20

1 INCH = 10 FT.

STORM DRAIN PLAN

APPROVALS

FILE # 10-26 — APPLICATION # 02-122132

IDENTIFICATION STAMP
DIV. OF THE STATE ARCHITECT
APP: 02-122122 INC:
REVIEWED FOR
SS ☑ FLS ☑ ACS ☑
DATE: 08/06/2024

LICENSED ARCHITECT
MICHAEL J. SCOTT '98
No. C-34290
REN: 08-31-25
STATE OF CALIFORNIA

DATE: JANUARY 31, 2024

NEW TK CLASSROOM AT CHENEY ELEMENTARY SCHOOL

COALINGA-HURON UNIFIED SCHOOL DISTRICT
36131 N ST, HURON, CALIFORNIA 93234

REVISIONS

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MANGINI ASSOCIATES INC.
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Visalia, California 93291
www.mangini.us
(559) 627.0530 Office
(559) 627.1926 Fax

TITLE: STORM DRAIN PLAN

C4.1

PROJECT 23044

REGISTERED PROFESSIONAL ENGINEER
RA VANG
R.C.E. 73146
06/19/2024
CIVIL
STATE OF CALIFORNIA

CONSULTANT
LANE ENGINEERS INC.
CIVIL• STRUCTURAL• SURVEYING
979 N. BLACKSTONE
TULARE, CALIFORNIA 93274
(559) 688-5263

LANE PROJ. NO. 23343.1



DEMOLITION NOTES

1. REFER TO SHEET C0.1 FOR BENCHMARKS, GENERAL NOTES, INFORMATION, AND SPECIFICATIONS.
2. ALL WORK AND MATERIALS WITHIN CITY RIGHT-OF-WAY SHALL BE IN ACCORDANCE WITH THE CITY OF COALINGA IMPROVEMENT STANDARDS . AN ENCROACHMENT PERMIT SHALL BE OBTAINED BY THE CONTRACTOR PRIOR TO DOING ANY WORK WITHIN THE CITY RIGHT-OF-WAY. SIGNING AND FLAGGING SHALL BE IN ACCORDANCE WITH THE REQUIREMENTS SET FORTH IN THE CURRENT AMENDED VERSION OF THE MANUAL ON UNIFORM TRAFFIC CONTROL DEVICES FOR USE IN CALIFORNIA.
3. TEXT FROM THE TOPOGRAPHIC SURVEY ARE SHOWN FADED ON THIS DRAWING.
4. ALL IMPROVEMENTS NOT NOTED FOR SALVAGE, REMOVAL, OR RELOCATION SHALL BE PROTECTED IN PLACE.
5. ALL ITEMS NOTED TO BE SALVAGED SHALL BE REMOVED WITHOUT DAMAGING AND STORED ON THE OWNER'S PROPERTY IN A LOCATION DESIGNATED BY THE OWNER UNTIL THEY ARE RE-INSTALLED AS SHOWN ON THE PLANS.
6. ALL HOLES AND TRENCHES CREATED FROM DEMOLITION AND REMOVAL SHALL BE BACKFILLED AND COMPACTED IN ACCORDANCE WITH THE REQUIREMENTS NOTED ON THESE PLANS.
7. IT SHALL BE THE CONTRACTOR'S RESPONSIBILITY TO FIELD VERIFY ALL ITEMS NOTED FOR REMOVAL WITH THE OWNER. PRIOR TO CONSTRUCTION, THE CONTRACTOR SHALL VERIFY DIMENSIONS FOR DEMOLITION.
8. ANY EXISTING SURFACE STRUCTURES OR IMPROVEMENTS (E.G. UTILITY BOXES, METER BOXES, WATER VALVES, TRASH BINS, BENCHES, SIGNS, PAVEMENT STRIPING, STREET LIGHTS, IRRIGATION SYSTEMS ETC.) THAT ARE DAMAGED OR TEMPORARILY REMOVED DURING DEMOLITION SHALL BE REPLACED IN KIND, U.N.O.
9. ANY UTILITY BOXES, VALVES AND MANHOLES NOT NOTED TO BE REMOVED SHALL BE ADJUSTED AS REQUIRED TO FINISHED GRADES, TYP.
10. ANY EXISTING REGULATORY OR WARNING SIGNS REMOVED FOR CONSTRUCTION SHALL BE REPLACED WITH TEMPORARY SIGNS AS NECESSARY TO SAFELY DIRECT TRAFFIC UNTIL THE NEW PERMANENT SIGNS ARE INSTALLED IN THEIR PERMANENT LOCATIONS PER THESE PLANS. TEMPORARY SIGNAGE MUST BE APPROVED BY THE PROJECT ARCHITECT.
11. CONTRACTOR SHALL VERIFY WITH OWNER PRIOR TO REMOVING OR RELOCATING ANY EXISTING STRUCTURES SHOWN ON THIS PLAN.
12. REMOVAL OF ANY IMPROVEMENTS FROM THE SITE SHALL BE DISPOSED OF IN A PROPER MANNER PER FEDERAL, STATE, AND OR LOCAL LAWS AND ORDINANCES.
13. ANY STRIPING BEING REMOVED SHALL BE COMPLETELY REMOVED BY WET SANDBLASTING. COATING PATCHES OVER EXISTING STRIPING IS NOT PERMITED.
14. REFER TO ARCHITECTURAL DRAWINGS FOR ON-SITE DEMOLITION REQUIREMENTS.

LEGEND

RIGHT OF WAY

DEMOLITION KEYNOTES (THIS SHEET ONLY)

D1 SAWCUT EXISTING A.C. PAVEMENT TO A CLEAN VERTICAL EDGE.
SHOWN THUS: – – – – – –

D2 UNLESS NOTED OTHERWISE, DEMOLISH AND REMOVE ALL EXISTING SURFACE SITE IMPROVEMENTS (CONCRETE, ASPHALT PAVEMENT, CURBS, GUTTERS ETC...) WITHIN DEMOLITION LIMITS.
SHOWN THUS:

D3 REMOVE CHAIN LINK FENCE FABRIC FOR NEW CONSTRUCTION AS REQUIRED AND REINSTALL FABRIC TO FENCE POST AFTER NEW CONSTRUCTION.

NORTH

GRAPHIC SCALE
10 0 5 10 20
1 INCH = 10 FT.

OFFSITE DEMOLITION PLAN

REGISTERED PROFESSIONAL ENGINEER
HA YANG
R.C.E. 73146
06/19/2024
CIVIL
STATE OF CALIFORNIA

CONSULTANT
LANE ENGINEERS INC.
CIVIL • STRUCTURAL • SURVEYING
979 N. BLACKSTONE
TULARE, CALIFORNIA 93274
(559) 688-5263

APPROVALS

FILE #	APPLICATION #
10-26	02-122132

IDENTIFICATION STAMP
DIV. OF THE STATE ARCHITECT
APP: 02-122132 INC:
REVIEWED FOR
SS ☑ FLS ☑ ACS ☑
DATE: 08/06/2024

LICENSED ARCHITECT
MICHAEL J. SCOTT YEE
No. C-34290
REN: 08-31-25
STATE OF CALIFORNIA

DATE: JANUARY 31, 2024

NEW TK CLASSROOM AT
CHENEY ELEMENTARY SCHOOL
COALINGA-HURON UNIFIED SCHOOL DISTRICT
36131 N ST, HURON, CALIFORNIA 93234

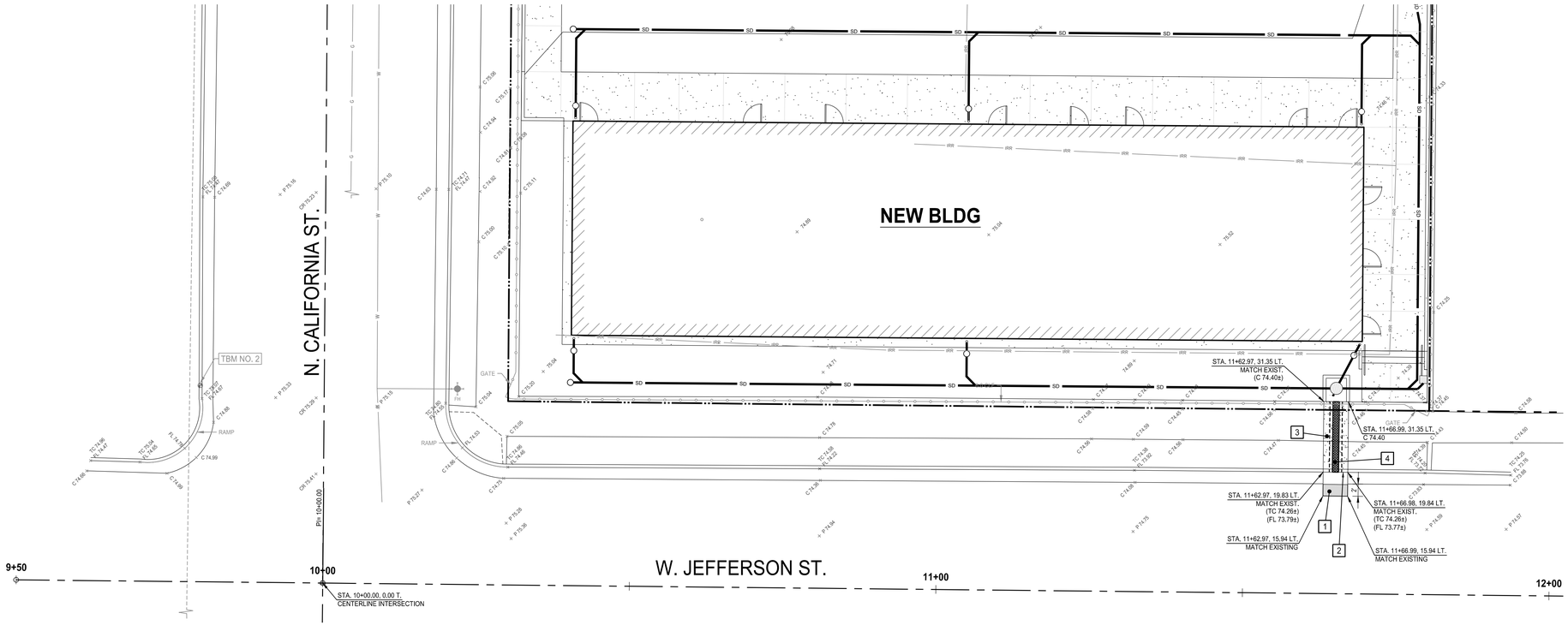
REVISIONS

MANGINI ARCHITECTURE | INGENUITY
www.mangini.us
(559) 627-0530 Office
(559) 627-1926 Fax
MANGINI ASSOCIATES INC.
4320 West Mineral King Avenue
Visalia, California 93291

TITLE
OFFSITE DEMOLITION PLAN

C5.1

PROJECT 23044



NOTES

1. REFER TO SHEETS C0.1 FOR BENCHMARKS, GENERAL NOTES & INFORMATION.
2. UNLESS SHOWN OR NOTED OTHERWISE, WHERE FINISH GRADE ABUTS CONCRETE PAVEMENTS/BACK OF CURBS, FINISH GRADE ELEVATION SHALL BE 1 INCH LOWER THAN ADJACENT CONCRETE ELEVATION IN SHRUB AREAS AND ½ INCH LOWER IN TURF AREAS.
3. CROSS SLOPE AT ALL PEDESTRIAN WALKS AND SIDEWALKS SHALL BE 1% MIN., BUT SHALL NOT EXCEED 2.0%.
4. FINISHED PAVEMENT SLOPES AT ALL ACCESSIBLE PARKING SPACES AND ACCESS AISLES SHALL NOT EXCEED 2.0% IN ANY DIRECTION.
5. EXTERIOR CONCRETE SHALL BE FLUSH WITH FINISHED FLOOR AT ALL EXTERIOR DOORS.
6. FIELD VERIFY ALL ELEVATIONS SHOWN WHERE PROPOSED IMPROVEMENTS ABUT EXISTING IMPROVEMENTS. IMMEDIATELY NOTIFY PROJECT ARCHITECT OF ANY DISCREPANCIES.
7. REFER TO ARCHITECTURAL DRAWINGS FOR ADDITIONAL SITE INFORMATION AND DETAILS.
8. ALL EXISTING VALVE BOXES AND MANHOLES TO REMAIN SHALL BE ADJUSTED AS REQUIRED SO THAT THE TOP OF COVERS ARE FLUSH WITH FINISH GRADES.
9. ALL IMPERVIOUS SURFACES ADJACENT TO BUILDING SHALL HAVE 1% MINIMUM AND 2% MAX SLOPE AWAY FROM BUILDINGS.

LEGEND

- NEW CONCRETE FLATWORK & OTHER CONCRETE SURFACE - SEE ARCH. "SD" DRAWINGS
- AC PAVING PATCH/REPAIR
- RIGHT OF WAY/PROPERTY LINE
- ROAD CENTERLINE

CONSTRUCTION KEYNOTES (THIS SHEET ONLY)

1. 7" THICK ASPHALT CONCRETE PAVEMENT (TYPE B) OVER 6" COMPACTED SUBGRADE. SUBGRADE SHALL BE COMPACTED TO 95% MIN. RELATIVE COMPACTION.
2. RECONSTRUCT CURB & GUTTER PER CITY STANDARD DETAILS P-1. SEE SHEET C7.2.
3. RECONSTRUCT SIDEWALK PER CITY STANDARD DETAILS P-4. SEE SHEET C7.2.
4. FURNISH MATERIAL REQUIRED AND CONSTRUCT SIDEWALK CHANNEL DRAIN PER CITY STANDARD DETAIL A-15. SEE SHEET C7.2. CONCRETE CHANNEL & STEEL PLATE SHALL EXTEND THRU PARKWAY FROM SIDEWALK TO STREET GUTTER AS SHOWN.

NORTH

GRAPHIC SCALE

10 0 5 10 20

1 INCH = 10 FT.

OFFSITE IMPROVEMENTS PLAN

REGISTERED PROFESSIONAL ENGINEER
MA VANG
R.C.E. 73146
06/19/2024
CIVIL
STATE OF CALIFORNIA

CONSULTANT

LANE ENGINEERS INC.
CIVIL • STRUCTURAL • SURVEYING
979 N. BLACKSTONE
TULARE, CALIFORNIA 93274
(559) 688-5263

APPROVALS

FILE # 10-26 | APPLICATION # 02-122132

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SS ☑ FLS ☑ ACS ☑
DATE: 08/06/2024

LICENSED ARCHITECT
MICHAEL J. SCOTT YEE
No. C-34290
REN: 08-31-25
STATE OF CALIFORNIA

DATE: JANUARY 31, 2024

NEW TK CLASSROOM AT
CHENEY ELEMENTARY SCHOOL
COALINGA-HURON UNIFIED SCHOOL DISTRICT
36131 N ST, HURON, CALIFORNIA 93234

REVISIONS

MANGINI | ARCHITECTURE INGENUITY

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4320 West Mineral King Avenue
Visalia, California 93291
www.mangini.us
(559) 627.0530 *Office*
(559) 627.1926 *Fax*

TITLE
OFFSITE IMPROVEMENTS PLAN

C5.2

PROJECT 23044

LANE PROJ. NO. 23343.1

APPROVALS

FILE # 10-26 | APPLICATION # 02-122132

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NEW TK CLASSROOM AT CHENEY ELEMENTARY SCHOOL

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(559) 627-0530 Office
(559) 627-1926 Fax

MANGINI ASSOCIATES INC.
4320 West Mineral King Avenue
Visalia, California 93291

TITLE
CIVIL DETAILS

C7.1

PROJECT 23044

LANE PROJ. NO. 23343.1

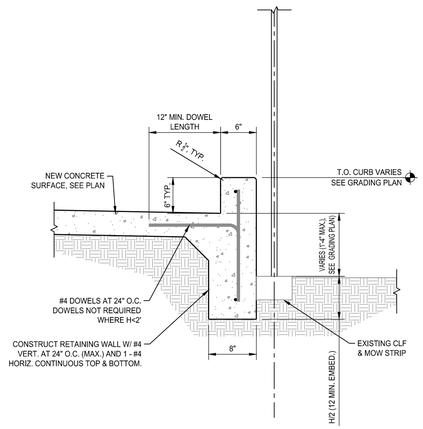
51

41

52

42

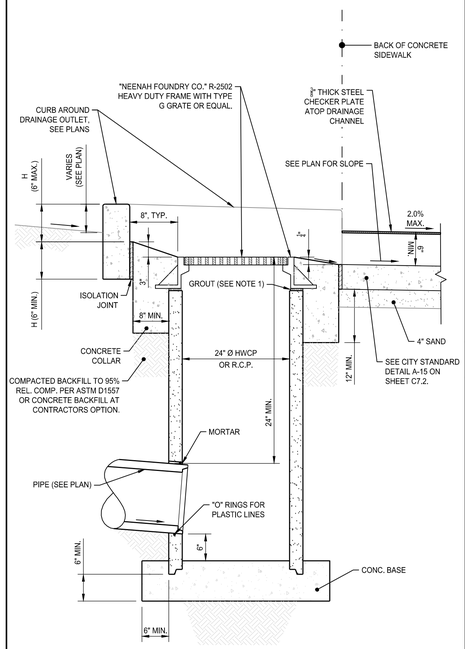
RETAINING CURB — NO SCALE — 32



NOTE:

1. ALL NEW CONCRETE SHALL BE 2500 PSI MIN. AT 28 DAYS.
2. ALL REINFORCING SHALL BE 60 KSI DEFORMED STEEL.

DRAINAGE OUTLET AT SIDEWALK DRAIN — 22

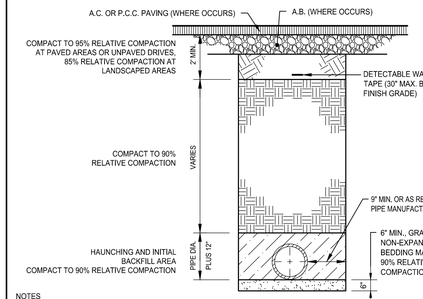


NOTES:

1. INLET FRAME AND GRATE SHALL HAVE HS-20 MINIMUM LOADING CAPACITY.
2. GROUT SHALL BE A HIGH STRENGTH, SHRINKAGE COMPENSATING NON-METALLIC GROUT, "MASTERFLOW" 713 OR EQUAL.
3. CONCRETE SHALL BE 2500 PSI MIN. AT 28 DAYS.

NO SCALE

TRENCH BACKFILL AND PAVING — NO SCALE — 11

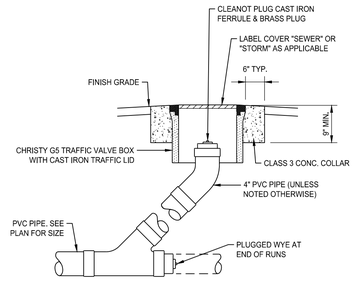


NOTES

1. BACKFILL TO A DEPTH OF 12" OVER TOP OF PIPE, FILL SHALL BE PLACED BY HAND AND TAMPED OR AS PER PIPE MANUFACTURER'S SPECIFICATIONS. FOR PLASTIC PIPE INSTALLATIONS, BEDDING SHALL BE IN ACCORDANCE W/PIPE MANUFACTURER SPECIFICATIONS.
2. BACKFILL MATERIAL WITHIN THE HAUNCHING, INITIAL BACKFILL, AND OUTER BEDDING AREAS SHALL BE CATEGORY I, II, OR III MATERIAL (ASTM D2321) PLACED TO 90% REL. COMPACTION.

(ON SITE)

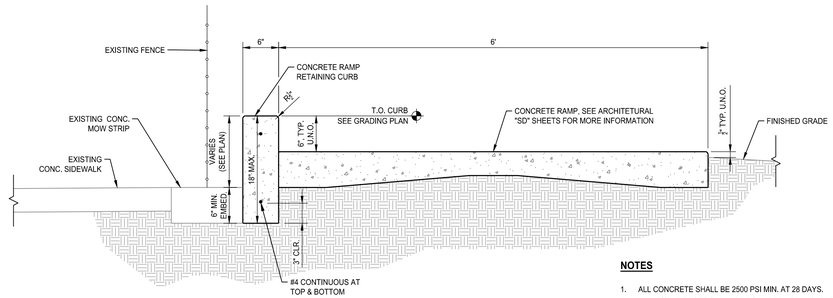
SURFACE CLEANOUT (COTG) — NO SCALE — 12



53

44

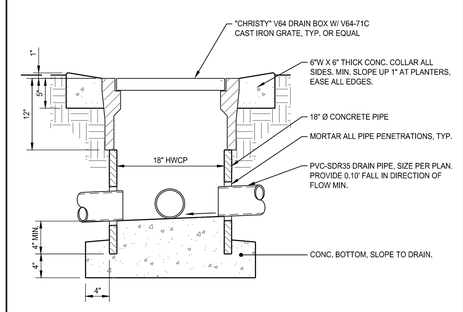
SECTION AT RAMP — NO SCALE — 33



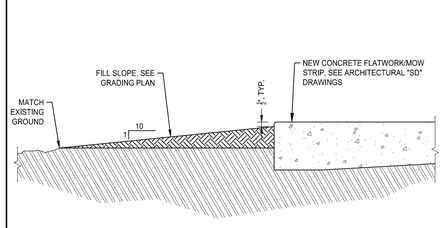
NOTES

1. ALL CONCRETE SHALL BE 2500 PSI MIN. AT 28 DAYS.
2. ALL VISIBLE EDGES SHALL BE ROUNDED WITH 1/2" RADII.
3. ALL REINFORCING BARS SHALL BE GRADE 60.

PLANTER DRAIN INLET — NO SCALE — 23



TYPICAL FILL SLOPE — NO SCALE — 13



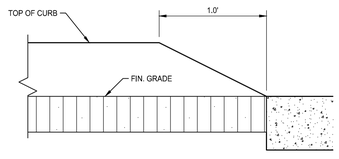
NOTE:

1. ALL NEW CONCRETE SHALL BE 2500 PSI MIN. AT 28 DAYS.
2. SEE ARCHITECTURAL "SD" DRAWINGS FOR ADDITIONAL REQUIREMENTS.

54

44

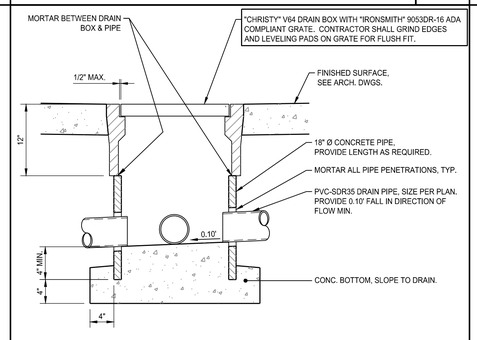
DUBB CURB — NO SCALE — 34



NOTES

1. ALL CONCRETE SHALL BE 2500 PSI MIN. AT 28 DAYS.
2. ALL VISIBLE EDGES SHALL BE ROUNDED WITH 1/2" RADII.

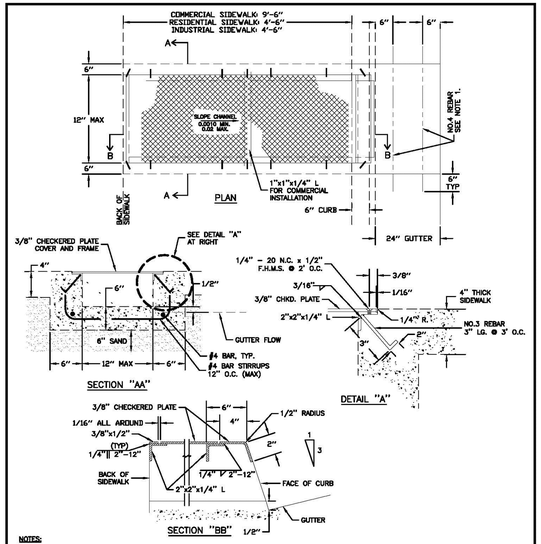
DRAIN INLET W/ ADA GRATE — NO SCALE — 24



REGISTERED PROFESSIONAL ENGINEER
HA YANG
C.E. 73146
06/19/2024
CIVIL
STATE OF CALIFORNIA

CONSULTANT

LANE ENGINEERS INC.
CIVIL • STRUCTURAL • SURVEYING
979 N. BLACKSTONE
TULARE, CALIFORNIA 93274
(559) 688-5263

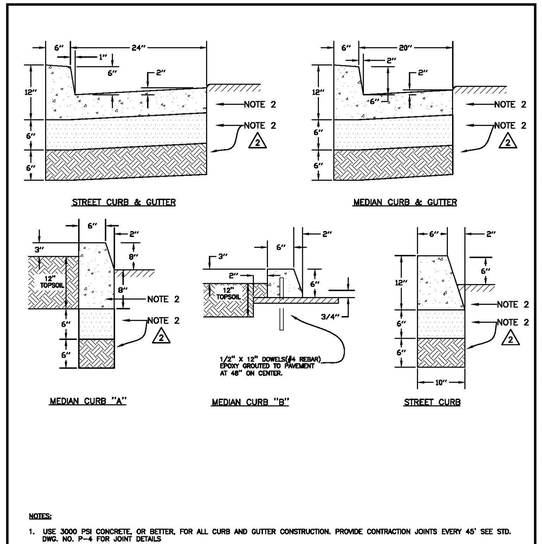


NOTES:

1. REMOVE AND REPLACE CONCRETE CURB AND GUTTER WITHIN LIMITS OF WORK WHERE CONC. CURB AND GUTTER EXIST.
2. FLOOR OF CHANNEL SHALL BE GIVEN A STEEL TROWELED FINISH
3. STRUCTURE SHALL BE CLASS "A" CONCRETE. EXPOSED SURFACES SHALL BE FINISHED AS PER CURB SPECIFICATIONS.
4. ALL PARTS SHALL BE STRUCTURAL GRADE STEEL.
5. ALL EXPOSED METAL SHALL BE PAINTED OR DIPPED WITH AN ASPHALTUM PAINT.

NOT TO SCALE

GENERAL Sidewalk Channel Drain	Revision:	Date:
	Engineer: OSCAR M. RAMIREZ	Date: 11/2005
	Drawn by: L. RIOS	Date: 11/2005
PUBLIC WORKS DEPT. STD. DRAWING	Std. No. A-15	Rev.

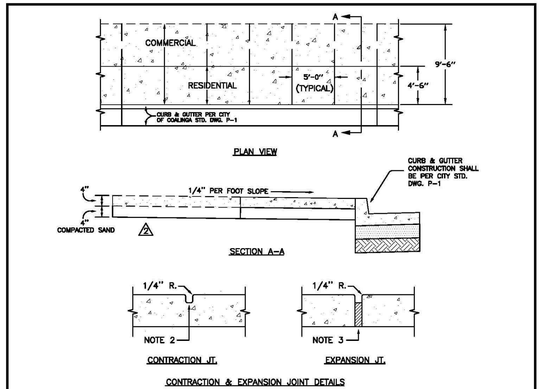


NOTES:

1. USE 3000 PSI CONCRETE, OR BETTER, FOR ALL CURB AND GUTTER CONSTRUCTION. PROVIDE CONTRACTION JOINTS EVERY 45' SEE STD. DWG. NO. P-4 FOR JOINT DETAILS
2. ALL CONCRETE CURB & GUTTER, WITH THE EXCEPTION OF MEDIAN CURB "B" SHALL BE POURED UPON A 6"LAYER OF CLASS II AGGREGATE BASE COMPACTED TO 95% R.C. . AGGREGATE BASE SHALL BE PLACED UPON A 6" LAYER OF NATIVE SOIL COMPACTED TO 90% R.C.
3. THE DRAINAGE ADEQUACY OF ALL NEW GUTTERS SHALL BE WATER TESTED. THE DIRECTION OF THE GUTTER SLOPE SHALL MATCH THE STREET PAVEMENT SLOPE.

NOT TO SCALE

PAVING CURB AND GUTTER	Revision:	Date:
	Engineer: OSCAR M. RAMIREZ	Date: 11/2005
	Drawn by: L. RIOS	Date: 11/2005
PUBLIC WORKS DEPT. STD. DRAWING	Std. No. P-1	Rev.



NOTES

1. THE STANDARD SIDEWALK SHALL BE A 4'-6" WIDE FOR RESIDENTIAL AND 9'-6" WIDE FOR COMMERCIAL BY 4" THICK CONCRETE SLAB. INSTALL CONTRACTION JOINTS EVERY 5' AND EXPANSION JOINTS EVERY 45' USE 3000 PSI CONCRETE OR BETTER.
2. CONTRACTION JOINTS SHALL BE 1/4" WIDE AND EXTENDING TO 1/4 OF THE DEPTH OF THE SLAB.
4. EXPANSION JOINTS SHALL BE 3/4" WIDE, EXTENDING THE FULL WIDTH OF THE CONCRETE SLAB. THESE JOINTS SHALL BE FILLED WITH MOLDED JOINT FILLER CONFORMING TO ASTM D 1751.
5. ALL SIDEWALK CONSTRUCTION SHALL BE IN ACCORDANCE WITH CALTRANS STANDARD SPECIFICATIONS SECTION 73, DATED JULY 1992, EXCEPT WHERE OTHERWISE STATED HEREIN.

NOT TO SCALE

PAVING Concrete Sidewalk (Commercial & Residential)	Revision:	Date:
	Engineer: OSCAR M. RAMIREZ	Date: 11/2005
	Drawn by: L. RIOS	Date: 11/2005
PUBLIC WORKS DEPT. STD. DRAWING	Std. No. P-4	Rev.

APPROVALS

FILE # 10-26 | APPLICATION # 02-122132

IDENTIFICATION STAMP
DIV. OF THE STATE ARCHITECT
APP: 02-122132 INC:
REVIEWED FOR
SS ☑ FLS ☑ ACS ☑
DATE: 08/06/2024

LICENSED ARCHITECT
MICHAEL J. SCOTT MS
No. C-34290
RENT:08-31-25
STATE OF CALIFORNIA

DATE: JANUARY 31, 2024

NEW TK CLASSROOM AT CHENEY ELEMENTARY SCHOOL

COALINGA-HURON UNIFIED SCHOOL DISTRICT
36131 N ST, HURON, CALIFORNIA 93234

REVISIONS

MANGINI ARCHITECTURE INGENUITY
MANGINI ASSOCIATES INC.
4320 West Mineral King Avenue
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(559) 627-1926 Fax

TITLE
OFFSITE DETAILS

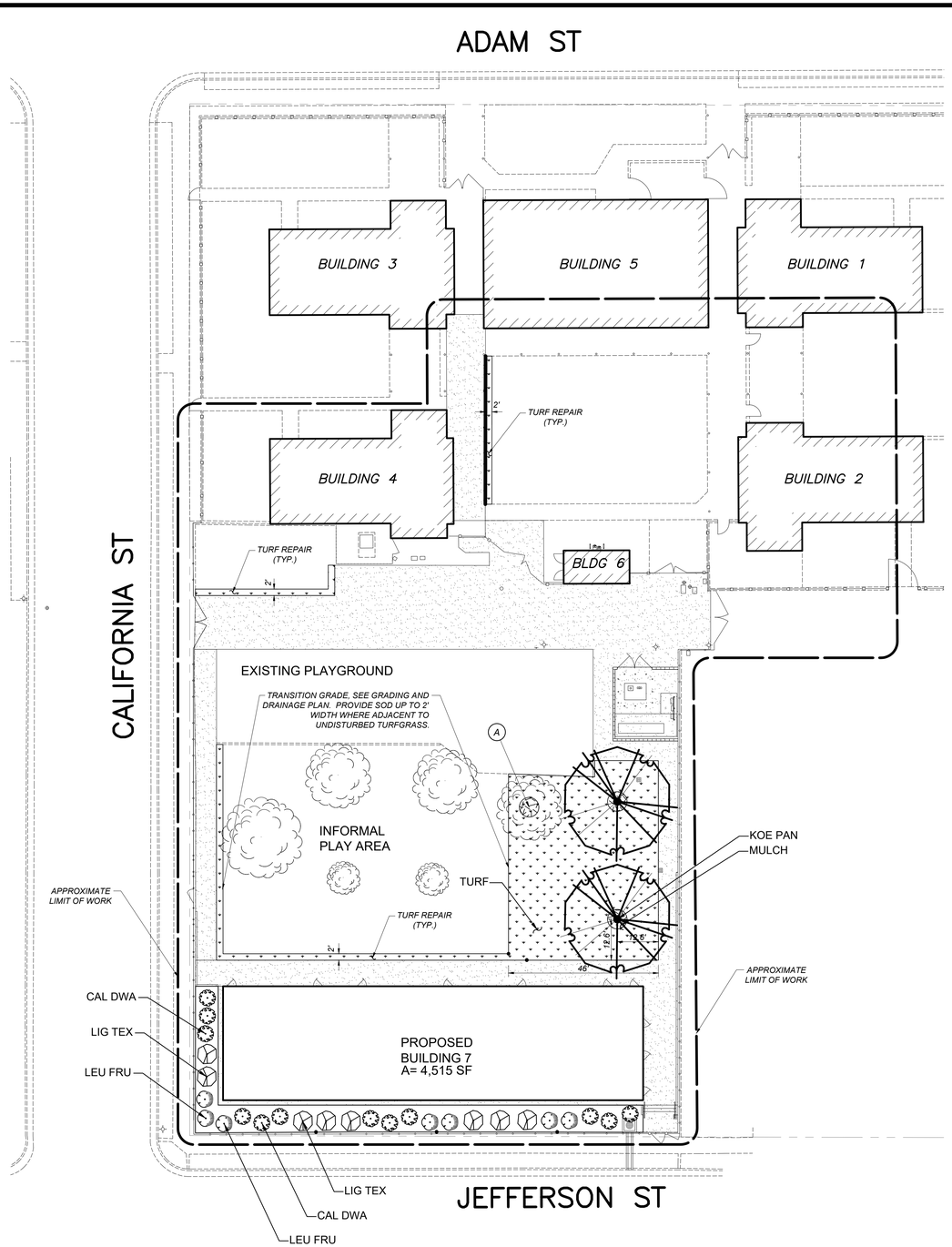
C7.2

PROJECT 23044

REGISTERED PROFESSIONAL ENGINEER
HA YANG
R.C.E. 73146
06/19/2024
CIVIL
STATE OF CALIFORNIA

CONSULTANT
LANE ENGINEERS INC.
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TULARE, CALIFORNIA 93274
(559) 688-5263

OFFSITE DETAILS



PLANT LEGEND

SUNSET ZONE# 9

SYMBOL	CODE	BOTANICAL / COMMON NAME	CONT	WATER USE	QTY	DETAIL	REMARKS
MEDIUM TREES							
	KOE PAN	KOELREUTERIA PANICULATA / GOLDEN RAIN TREE	24"BOX	M	2	A/LA2	DECIDUOUS. STANDARD FORM. PARTIAL SHADE TO FULL SUN. YELLOW FLOWERS IN SUMMER. MS: 35' H X 25'-40'
SYMBOL	CODE	BOTANICAL / COMMON NAME	SIZE	WATER USE	QTY	DETAIL	REMARKS
SHRUBS							
	CAL DWA	CALLISTEMON VIMINALIS `LITTLE JOHN` / DWARF WEEPING BOTTLEBRUSH	1 GAL	L	13	B/LA2	FULL SUN. RED FLOWERS MS: 3' H X 5' W
	LEU FRU	LEUCOPHYLLUM FRUTESCENS `COMPACTA` / COMPACT TEXAS RANGER	5 GAL	L	8	B/LA2	FULL SUN. PARTIAL SHADE. BRIGHT PINK FLOWERS. MS: 4'-5' H X 4'-5' W
	LIG TEX	LIGUSTRUM JAPONICUM `TEXANUM` / TEXAS PRIVET	5 GAL	L	9		MS: 8`-10` H X 4`-6` W
SYMBOL	CODE	BOTANICAL / COMMON NAME	CONT	WATER USE	QTY	DETAIL	REMARKS
GROUND COVERS							
	MULCH	WALK-ON WOOD MULCH	N/A	N/A	84 SF	F/LA2	MIN. 3 INCH COMPRESSED DEPTH. SEE PLANTING NOTE #18.
	TURF	`CELEBRATION` BERMUDAGRASS	SOD	M	5,947 SF	E/LA2	INSTALL FULL WIDTH SOD TO THE LIMITS OF DISTURBANCE. VERIFY QUANTITY. SEE DEMOLITION AND GRADING PLANS.
(A)		PROTECT EXISTING TREE IN PLACE. TPZ - 1 (TREE PROTECTION ZONE) PER SECTION 320190					

WATER EFFICIENT LANDSCAPE WORKSHEET
Educational

Project: New Classroom at Cheney Kindergarten
Location: Coalinga, CA
ETo Reference (MWELO-Apdx. A): Coalinga

MAWA = MAXIMUM APPLIED WATER ALLOWANCE (1,000 GALLONS)

TOTAL NEW BUILDING FOOTPRINT	4,515	SF	(1,600 sf is threshold for inclusion)
75% OF BLDG. SF REQ'D LANDSCAPE	3,386	SF	
EXIST. IRRIGATION REMOVED FROM SERVICE	9,869	SF	
REGULAR LANDSCAPE AREA	1,399	SF	(landscape area >500 sf)
SPECIAL LANDSCAPE AREA (SLA)	0	SF	
TOTAL PROPOSED LANDSCAPE AREA (LA)	1,399	SF	
TOTAL COMPLIANT LANDSCAPE AREA	11,268	SF	

NORMAL YEAR REFERENCE	ANNUAL
EVAPOTRANSPIRATION (ETo)	50.9
EFFECTIVE PRECIPITATION (25% OF ANNUAL)	0.0
ADJUSTED EVAPOTRANSPIRATION	50.9

MAWA=(ETo) x (0.62) [(0.65 x LA)+(0.35 x SLA)]	ANNUAL	
MAX. APPLIED WATER ALLOWANCE	**150.7**	K Gallons
TOTAL IN ACRE/FT	0.5	
TOTAL IN CCF	201.5	

2015 DWR/DSA Update

ETWU = ESTIMATED TOTAL WATER USE (1,000 GALLONS)

LANDSCAPE HYDROZONE TYPES		HA	PF	IE	ETAF
MIXED PLANTING (L)	1,399	SF	0.3	0.81	0.37
MIXED PLANTING (M)	0	SF	0.5	0.81	0.62
WARM-SEASON TURFGRASS (MH)	5,947	SF	0.6	0.75	0.80
SLA - RECREATIONAL/RECYCED WATER USE	0	SF	0.6	0.75	0.80
		AVERAGE REGULAR ETAF:			0.47
		MAXIMUM AVERAGE REGULAR ETAF:			**0.65**

ETWU=(ETo) x (0.62)x [(HA x PF/IE) + SLA]	ANNUAL	
MIXED PLANTING (L)	16.4	
MIXED PLANTING (M)	0.0	
WARM-SEASON TURFGRASS (M)	150.1	
SLA - RECREATIONAL/RECYCED WATER USE	0.0	
ESTIMATED TOTAL WATER USE	**166.5**	K Gallons
TOTAL IN ACRE/FT	0.5	
TOTAL IN CCF	222.6	

typical IE coeficients
0.75 overhead sprinklers
0.81 drip & bubblers

ETWU AS A PERCENT OF MAWA: 110%

WATER CONSERVATION COMPLIANCE STATEMENT:

I HAVE COMPLIED WITH THE CRITERIA OF THE LANDSCAPE WATER CONSERVATION ORDINANCE AND GUIDELINES, AND HAVE APPLIED THEM FOR THE EFFICIENT USE OF WATER IN THE PLANTING DESIGN PLAN.

DAVID W. BRILEY, RLA 2787

LANDSCAPE PLANTING AREA REQUIREMENT (DSA 1-L)

	AREA (SF)
NEW BUILDINGS FOOTPRINT:	*4,515*
REQUIRED MWELO COMPLIANT PLANTING:	*3,386*
EXISTING IRRIGATED AREA DESIGNATED FOR REMOVAL:	*9,869*
PROPOSED MWELO COMPLIANT PLANTING:	*1,399*
TOTAL CREDIT FOR MWELO COMPLIANT PLANTING:	*11,268*
EXCESS / (DEFICIT) OF PROPOSED COMPLIANT PLANTING:	*7,882*

LANDSCAPE SHADE CALCULATIONS *SHADING PER CALGREEN 5.106.12*

SITE SHADING - LANDSCAPE & HARDSCAPE	***QUANTITY PROPOSED (SF)***	***PERCENT REQUIRED***	***SHADE AREA REQUIRED (SF)***
LANDSCAPED AREA (EXCLUDING SPECIAL USE & PARKING LANDSCAPE AREAS)	*1,399*	*20*	*280*
UNCOVERED HARDSCAPE AREA (EXCLUDING PARKING HARDSCAPE AREAS)	*3,584*	*20*	*717*
TOTAL SITE SHADE REQUIRED			*997*
PROVIDED SHADE TREES	***PROVIDED SHADE AREA***	***NO. TREES***	
VERY LARGE (40' dia.= 1256 SF)	*0*	*0*	
LARGE (35' dia.= 962 SF)	*0*	*0*	
MEDIUM (30' dia.= 707 SF)	*1,414*	*2*	
SMALL (20' dia.= 314 SF)	*0*	*0*	
TOTALS	*1,414*	*2*	
OVER (UNDER) LANDSCAPE & HARDSCAPE SHADE REQUIREMENT			***417***

SCALE: N 1"=20'

0 5 20 40
SCALE IN FEET

LANDSCAPE PLANTING OBSERVATION LOG

ITEM NO.	WORK ITEM DESCRIPTION	REVIEWED & ACCEPTED BY OWNER'S REP OR LAND ARCH: PRINT NAME	SIGNATURE	DATE
PL-1	REPORT & PROTECTION OF EXISTING TREES			
PL-2	RIPPING OF PLANTING AREAS			
PL-3	SOIL CONDITIONING & TILLAGE DEPTH			
PL-4	IRRIGATION COVERAGE PRIOR TO PLANTING			
PL-5	FINISH GRADING PRIOR TO PLANTING			
PL-6	TREES - INITIAL QUALITY & LAYOUT			
PL-7	PLANTS - INITIAL QUALITY & LAYOUT			
PL-8	GRANULAR PRE-EMERGENT HERBICIDE IN MULCHED AREAS			
PL-9	WOOD MULCH DEPTH			

NOTES: THE ORIGINAL VERSION OF THIS LOG SHALL BE MAINTAINED ON THE AS-BUILT RECORD DRAWING SET.
WORK ITEMS MAY NOT BE REVIEWED IF PRIOR WORK ITEMS HAVE NOT BEEN ACCEPTED.

SEE SHEET LA2 FOR PLANTING DETAILS AND NOTES

811 Know what's below. Call before you dig.

LICENSED LANDSCAPE ARCHITECT DAVID W. BRILEY No. 2787 12/31/24 Renewal Date STATE OF CALIFORNIA

Blair, Church & Flynn CONSULTING ENGINEERS
Blair, Church & Flynn Consulting Engineers
453 Clovis Avenue, Suite 200
Clovis, California 93612
Tel (559) 326-1400
Fax (559) 326-1500

APPROVALS
FILE # 10-28 APPLICATION # 02-122132

IDENTIFICATION STAMP
DIV. OF THE STATE ARCHITECT
APP: 02-122132 INC:
REVIEWED FOR
SS ☑ FLS ☑ ACS ☑
DATE: 08/06/2024

LICENSED ARCHITECT MICHAEL J. SCOTT JR. No. C-34290 REN: 08-31-25 STATE OF CALIFORNIA

DATE: JANUARY 31, 2024

NEW TK CLASSROOM AT CHENEY KINDERGARTEN
COALINGA-HURON UNIFIED SCHOOL DISTRICT
COALINGA, FRESNO COUNTY, CA

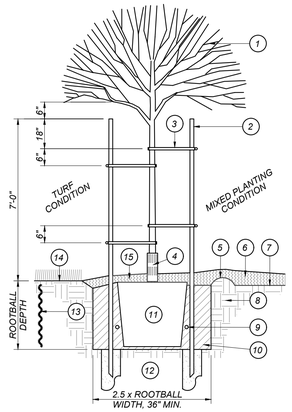
REVISIONS

MANGINI ARCHITECTURE PLANNING SCOTT MORRELLI BARENG
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TITLE
PARTIAL PLANTING PLAN

LA1

PROJECT 23044



LEGEND:

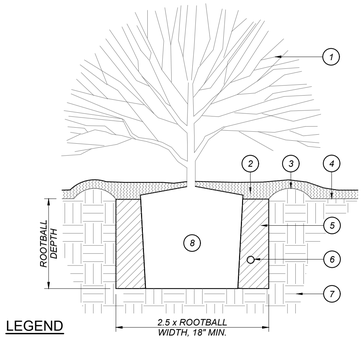
1. *TREE PER PLANTING PLAN.*
2. *2" X 10' LODGEPOLE PINE STAKE. DO NOT DRIVE STAKE THROUGH ROOTBALL. CUT OFF TOP SECTION DAMAGED BY HAMMERING. TOP OF STAKE IS 6" CLEAR OF LOWEST TREE BRANCHES.*
3. *FLEXIBLE VINYL TREE TIE, 4 / TREE (V.I.T. OR APPROVED EQUAL.)*
4. *TREE TRUNK PROTECTOR (GRAY) WHERE TREE IS IN TURF AREA.*
5. *4" HIGH WATERING BERM.*
6. *ADJACENT PLANTING AREA WITH MULCH WHERE OCCURS.*
7. *FINISH GRADE.*
8. *SITE SOIL.*
9. *PLANT FERTILIZER TABLET. SEE SPECIFICATIONS.*
10. *AMENDED BACKFILL. SEE SPECIFICATIONS.*
11. *ROOTBALL. SET TOP OF ROOTBALL 2" ABOVE FINISH GRADE.*
12. *DRAINAGE SUMP: 12" DIA. PER DRAINAGE SUMP NOTES. FILL WITH CONCRETE SAND PER SSPWC 200-1.5.5.*
13. *ROOT CONTROL BARRIER WHERE REQUIRED. SEE GENERAL PLANTING NOTES AND DETAIL [D/LA2].*
14. *ADJACENT TURFGRASS PLANTING WHERE OCCURS.*
15. *MULCH, MINIMUM 3" DEPTH. SEE GENERAL PLANTING NOTE 17.*

DRAINAGE SUMP NOTES:

A. *DRAINAGE SUMPS SHALL PENETRATE THROUGH AND BEYOND ANY UNDERLYING PAVEMENT OR HARDPAN SOIL STRATUM, AND SUCH PAVEMENT OR HARDPAN MATERIAL SHALL BE REMOVED FROM THE SUMP HOLES.*

B. *THE SUMP HOLE SHALL BE DRILLED TO MINIMUM DEPTH OF TEN (10) FEET, UNLESS VISUAL EVIDENCE OF A SUBSURFACE SAND AND/OR GRAVEL DRAINAGE STRATUM IS APPARENT AT A LESSER DEPTH. THE SUMP HOLES SHALL EXTEND INTO THE DRAINAGE STRATUM A MINIMUM OF ONE (1) FOOT.*

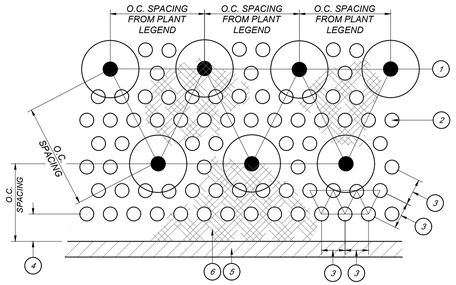
A / LA2 — DOUBLE STAKE TREE PLANTING
NOT TO SCALE



LEGEND

1. *SHRUB.*
2. *WOOD MULCH LAYER.*
3. *3" HIGH WATERING BASIN.*
4. *FINISH GRADE.*
5. *AMENDED BACKFILL. SEE SPECIFICATIONS.*
6. *FERTILIZER PACKET. SEE SPECIFICATIONS.*
7. *SITE SOIL.*
8. *ROOTBALL. SET TOP OF ROOTBALL 1" ABOVE FINISH GRADE.*

B / LA2 — SHRUB PLANTING
NOT TO SCALE



LEGEND:

1. *CONTAINER SHRUB OR GROUND COVER IN TRIANGULATED ROWS, SEE SHRUB PLANTING PER DETAIL [B/LA2].*
2. *GROUND COVER FLATS OR LINERS - TRIANGULATED ROWS.*
3. *SPACE PER PLANT LEGEND. OMIT PLANTS WHERE IN CONFLICT WITH SHRUBS OR TREE WATERING BASINS.*
4. *SPACING DISTANCE FROM PLANT LEGEND.*
5. *HARDSCAPE ELEMENT: CURB, WALK, ETC.*
6. *MULCH PER SPECIFICATIONS.*

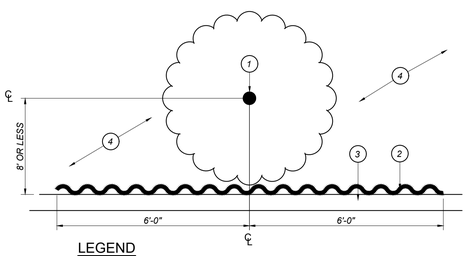
C / LA2 — SHRUB AND GROUND COVER SPACING
NOT TO SCALE

PLANTING NOTES:

1. *IMMEDIATELY NOTIFY THE OWNER'S REPRESENTATIVE IF IT IS OBVIOUS THAT OBSTRUCTIONS OR STRUCTURES, IRRIGATION SYSTEM MALFUNCTION, EXISTING TREES OR PLANTS, GRADE DIFFERENCES OR CHANGES IN THE SITE PLAN ARE PRESENT THAT WILL IMPACT THE PLANTING DESIGN. FAILURE TO GIVE SUCH NOTIFICATION SHALL PLACE THE RESPONSIBILITY ON THE CONTRACTOR FOR ANY REVISIONS OR REPLACEMENTS NECESSARY FOR CORRECTION.*
2. *ANY EXISTING PLANTING SHOWN ON THE PLAN IS FOR REFERENCE ONLY. THE CONTRACTOR SHALL VERIFY THE EXISTING PLANTING AT THE SITE PRIOR TO STARTING WORK. UNLESS NOTED OTHERWISE, THE CONTRACTOR SHALL PROTECT THE EXISTING PLANTING ADJACENT TO THE WORK FROM DAMAGE OR DISTRESS.*
3. *ALL TREES AND SHRUBS SHALL BE OF CLASS A QUALITY WITHOUT PESTS, DISEASE OR DAMAGE, SHALL BE WELL ESTABLISHED IN THEIR CONTAINERS WITHOUT GIRDLING ROOTS OR EXCESSIVE TOP GROWTH, AND SHALL COMPLY WITH THE REQUIREMENTS OF THE "AMERICAN STANDARDS FOR NURSERY STOCK" (ANSI Z60.1).*
4. *NOTIFY THE LANDSCAPE ARCHITECT PRIOR TO THE INSTALLATION OF IRRIGATION COMPONENTS AND TREE AND/OR SHRUB PLANTING FOR APPROVAL OF THE PLANT LAYOUT AND PLANT QUALITY. PLANT LOCATIONS SHALL AVOID CONFLICTS WITH EXISTING IMPROVEMENTS, PLANTINGS OR UTILITIES. LIGHT POLES WHILE MEETING THE DESIGN INTENT. DO NOT PLANT TREES WITHIN 15 FEET OF LIGHT POLES UNLESS SPECIFICALLY AUTHORIZED. FAILURE TO OBTAIN SUCH APPROVAL SHALL PLACE THE RESPONSIBILITY ON THE CONTRACTOR FOR ANY RELOCATION OR REPLACEMENT OF IRRIGATION COMPONENTS, PLANTED TREES AND/OR SHRUBS.*
5. *PLANT QUANTITIES ARE PROVIDED FOR BIDDING CONVENIENCE ONLY. THE CONTRACTOR SHALL PROVIDE SUFFICIENT QUANTITIES OF PLANTS EQUAL TO THE SYMBOL COUNT OR TO FILL THE AREA SHOWN ON THE PLAN AT THE SPECIFIED TRIANGULAR SPACING.*
6. *WHERE GROUND COVER PLANTS ARE SHOWN AT A SPECIFIED SPACING, THE GROUND COVER PLANTING CONTINUES UNDERNEATH THE TALLER SHRUBS AND TREES AS SHOWN IN THE PLANTING DETAILS. DO NOT PLANT GROUND COVER IN SHRUB OR TREE WATERING BASINS.*
7. *ALL NEW TREES LOCATED WITHIN 8 FEET OF PAVEMENT OR STRUCTURES SHALL HAVE A ROOT CONTROL BARRIER INSTALLED WHEN PLANTED. UNLESS OTHERWISE SPECIFIED, INSTALL A 12 FOOT LONG X 24 INCH DEEP LINEAR POLYETHYLENE BARRIER VESPRO OR EQUAL AT THE EDGE OF PAVEMENT/STRUCTURE, CENTERED ON THE TREE TRUNK AS SHOWN IN THE PLANTING DETAILS.*
8. *REMOVE NURSERY STAKES FROM TREES AFTER TREE STAKING OR GUYING AS SHOWN IN THE DETAILS.*
9. *INSTALL PERFORATED POLYETHYLENE TREE TRUNK PROTECTORS FOR ALL NEW TREES PLANTED IN TURF. UNLESS NOTED OTHERWISE, MAINTAIN A MINIMUM 6 FOOT DIAMETER MULCHED AREA AT THE BASE OF THE TREE INSIDE THE WATERING BASIN.*
10. *THE CONTRACTOR SHALL PRUNE NEW TREES ONLY WHEN SPECIFICALLY DIRECTED BY THE LANDSCAPE ARCHITECT. TREES HEADED BACK WITHOUT INTACT SCAFFOLDING BRANCH STRUCTURE OR IN ROOT-BOUND CONTAINERS SHALL BE REJECTED.*
11. *SUBMIT REPRESENTATIVE SOIL SAMPLES OF NATIVE AND PROPOSED IMPORT, IF NEEDED, PLANTING TOPSOIL TO A SOIL LAB FOR HORTICULTURAL ANALYSES AND FERTILITY RECOMMENDATIONS. AMEND SOIL ACCORDING TO THE RECOMMENDATIONS OF THE SOILS REPORT AND LANDSCAPE ARCHITECT'S DIRECTION. SEE THE LANDSCAPE PLANTING SPECIFICATIONS FOR ADDITIONAL INSTRUCTIONS.*
12. *PROVIDE SANDY LOAM TOPSOIL PER SPECIFICATION IN ALL RAISED PLANTERS AND WHERE IMPORT TOPSOIL IS REQUIRED. NATIVE SITE SOIL MAY BE USED IN RAISED PLANTERS ONLY WHEN THE NATIVE SITE SOIL MEETS THE CRITERIA FOR SANDY LOAM TOPSOIL AS DETERMINED BY A SOIL ANALYSIS.*
13. *PRIOR TO SOIL CONDITIONING, RIP IN TWO DIFFERENT DIRECTIONS WITH TINES AT 12 INCH SPACING, ALL TURFGRASS AREAS TO A 12 INCH DEPTH, AND SHRUB/GROUND COVER AREAS TO A 18 INCH DEPTH. ROUGH GRADE AND TILL THE APPROVED SOIL CONDITIONERS AND FERTILIZERS INTO THE TOP 6 INCHES PER THE LANDSCAPE PLANTING SPECIFICATIONS. COMPOST RATE SHALL BE A MINIMUM OF FOUR (4) CUBIC YARDS PER 1,000 SQUARE FEET.*
14. *UPON THE COMPLETION OF THE SOIL CONDITIONING, REMOVE ROCKS AND CLODS 1 INCH DIAMETER AND GREATER FROM THE TOP TWO INCHES OF TOPSOIL, AND ALL DEBRIS. FINISH GRADE THE AREA TO +/- 0.04 FOOT TOLERANCE. FINISH GRADE IN MULCHED AREAS SHALL BE STRAIGHT GRADES WITHOUT HUMPS OR DEPRESSIONS AND SHALL BE 2 INCHES BELOW ADJACENT HARDSCAPE, INLETS OR UTILITY BOX COLLARS. RELATIVE DENSITY OF THE TOPSOIL SHALL NOT EXCEED 85% COMPACTION.*
15. *OBTAIN THE APPROVAL OF THE OWNER'S REPRESENTATIVE TO BEGIN PLANTING OPERATIONS ONCE THE IRRIGATION SYSTEM IS OPERATIONAL AND THE SOIL CONDITIONING AND FINISH GRADING IS COMPLETED.*
16. *AFTER PLANTING IS COMPLETED AND JUST PRIOR TO MULCH INSTALLATION, APPLY A BROAD SPECTRUM PRE-EMERGENT HERBICIDE TO ALL NON-TURFGRASS PLANTING AREAS PER THE MANUFACTURER'S SPECIFICATIONS.*
17. *WHERE MULCH IS TO BE INSTALLED IN AN EXISTING PLANTING AREA, BREAKUP/TILL THE EXISTING SOIL TO A MINIMUM 6 INCH DEPTH PER SPECS, AND ADJUST FINISH GRADE ADJACENT TO HARDSCAPE AND DRAINAGE ELEMENTS TO PROVIDE A 2 INCH DEPTH THAT TRANSITIONS TO THE EXISTING GRADE OVER 1 TO 2 FEET.*
18. *INSTALL A MINIMUM 3 INCH DEPTH OF CHIPPED WALK-ON WOOD MULCH IN ALL PLANTING AREAS AND TREE WATERING BASINS EXCEPT FOR TURFGRASS AREAS, SLOPES 3H:1V OR GREATER, AREAS TO RECEIVE SEED PLANTING, OR AS NOTED ON THE PLAN. AREAS PLANTED WITH FLATS SHALL HAVE A MINIMUM MULCH DEPTH OF 2 INCHES. INSTALL A MINIMUM 3 FOOT RADIUS OF 3 INCH DEEP WOOD MULCH AT THE BASE OF ALL TREES IN NEW TURFGRASS AREAS.*
19. *ALL EXISTING PLANTS AND/OR TURFGRASS SHOWN TO REMAIN AND DAMAGED OR REMOVED BY CONSTRUCTION OPERATIONS AND/OR UTILITY/IRRIGATION/DRAINAGE LINES SHALL BE REPLACED WITH PLANTS THAT MATCH AS CLOSELY AS POSSIBLE TO THE EXISTING PLANT SPECIES, VARIETY AND SIZE. THE REPLACEMENT TURFGRASS SOD VARIETY SHALL BE THE SAME AS SHOWN IN THE PLANTING LEGEND AS IF FOR NEW WORK, OR SHALL MATCH THE EXISTING TURFGRASS VARIETY WHERE EXISTING. TILL SOIL CONDITIONING MATERIALS INTO THE TOP 6 INCHES OF THE SOIL OVER THE AREA OF REPAIR/REPLACEMENT AS IF FOR NEW WORK. ADJUST FINISH GRADE SO NEW TURFGRASS SOD ABUTS FLUSH TO EXISTING SOD GRADE. THE REPLACEMENT PLANTS AND/OR TURFGRASS SOD SHALL BE MAINTAINED AS PART OF THE ORIGINAL SCOPE OF WORK. THE REPAIR OR REPLACEMENT WORK SHALL BE AT THE CONTRACTOR'S SOLE EXPENSE.*
20. *CONTRACTOR SHALL MAINTAIN THE NEW PLANTING FOR HEALTHY AND VIGOROUS GROWTH, WHICH INCLUDES BUT IS NOT LIMITED TO WATERING, WEEDING, FERTILIZING, MOWING AND EDGING (AT LEAST ONCE A WEEK), REMOVING TRASH AND DEBRIS, AND OTHER RELATED ACTIVITIES THROUGHOUT THE DURATION OF THE MAINTENANCE PERIOD UNTIL FINAL ACCEPTANCE.*

CONTRACTOR SPECIAL PLANTING NOTES:

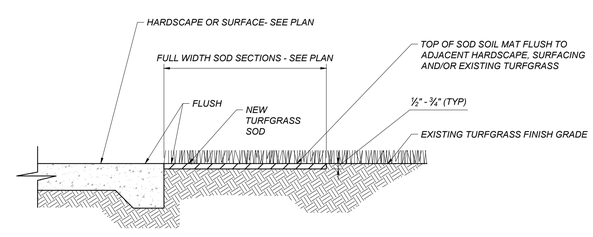
1. *AN ASSESSMENT AND VALUATION OF ONSITE EXISTING TREES SCHEDULED TO REMAIN IN THE AREA OF WORK SHALL BE PERFORMED BY THE CONTRACTOR'S ARBORIST PRIOR TO THE START OF CONSTRUCTION OPERATIONS PER THE 'EXISTING LANDSCAPE PROTECTION' SPECIFICATION.*
2. *THE CONTRACTOR SHALL RIP, CONDITION AND TILL THE ENTIRE EXTENT OF ALL PLANTING AREAS RECEIVING NEW PLANTS PER THE PLANTING NOTES AND 'LANDSCAPE PLANTING' SPECIFICATIONS.*
3. *ALL EXISTING MIXED PLANTING AREAS RECEIVING NEW WOOD MULCH SHALL BE MANUALLY TILLED TO A MINIMUM DEPTH OF 4 INCHES, CLODS BROKEN UP TO A MAXIMUM 1 INCH DIAMETER, FINISH GRADED TO 2 INCHES BELOW ADJACENT SURFACES AND UTILITY/IRRIGATION BOXES WITHIN 12 INCHES OF THE HARDSCAPE EDGE, AND A PRE-EMERGENT HERBICIDE APPLIED PRIOR TO WOOD MULCH INSTALLATION. PROTECT EXISTING PLANTING DURING WOOD MULCH PREPARATION AND INSTALLATION.*
4. *THE ORIGINAL PLANTING OBSERVATION LOG SHALL BE MAINTAINED ON THE AS-BUILT RECORD DRAWING SET.*
5. *THE AS-BUILT RECORD DRAWING SET AND MAINTENANCE MANUAL SHALL BE SUBMITTED AND ACCEPTED PRIOR TO THE SCHEDULING OF A FINAL ACCEPTANCE REVIEW.*



LEGEND

1. *TREE TRUNK.*
2. *12 LF OF 24"-DEEP ROOT CONTROL BARRIER: DEEP ROOT UB24-2 OR EQUIVALENT. CENTER BARRIER ON TRUNK OF TREE. INSTALL PER MANUFACTURER'S SPECIFICATIONS.*
3. *HARDSCAPE ELEMENT: CURB, SIDEWALK, WALL, ETC.*
4. *PLANTING AREA.*
5. *INSTALL ROOT CONTROL BARRIER ON ALL SIDES OF THE PLANTING AREA WHEN SURROUNDED BY HARDSCAPE WITHIN 8' OF THE TREE TRUNK.*

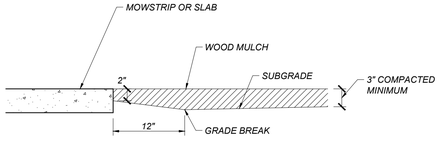
D / LA2 — ROOT CONTROL BARRIER
NOT TO SCALE



NOTE:

IF THE EXISTING TURFGRASS FINISH GRADE IS HIGHER OR LOWER THAN THE NEW FINISH SURFACE, TRANSITION GRADE THE NEW SOD AT A MAXIMUM 1V:12H SLOPE

E / LA2 — TURF SOD INSTALLATION
NOT TO SCALE



F / LA2 — MULCH DETAIL
NOT TO SCALE

TREE SIZE AND QUALITY STANDARDS

AMERICAN STANDARDS FOR NURSERY STOCK (ANSI Z60.1) AND GUIDELINE SPECIFICATIONS FOR NURSERY TREE QUALITY (URBAN TREE FOUNDATION) SHALL APPLY

	TYPES 1 & 2 SHADE TREES			*TYPE 3 SMALL UPRIGHT TREES***			*TYPE 4 SMALL SPREADING TREES****		
CONTAINER SIZE	*MIN. CALIPER*	*MAX. CALIPER*	*TYPE 1 MIN./MAX. HEIGHT**	*MIN. CALIPER*	*MAX. CALIPER*	*MIN./MAX. HEIGHT*	*MIN. CALIPER*	*MAX. CALIPER*	*MIN./MAX. HEIGHT*
15 GALLON	*0.75*	*2.0*	*7-10 FT*	*0.75*	*2.0*	*6-8 FT*	*0.75*	*2.0*	*4-8 FT*
24" BOX	*1.25*	*3.0*	*8-12 FT*	*1.25*	*3.0*	*8-10 FT*	*1.25*	*3.0*	*6-10 FT*
36" BOX	*1.75*	*3.5*	*10-16 FT*	*1.75*	*3.5*	*10-14 FT*	*1.75*	*3.5*	*7-12 FT*
42" BOX	*2.0*	*4.0*	*12-20 FT*	*2.0*	*4.0*	*12-18 FT*	*2.0*	*4.0*	*8-14 FT*
48" BOX	*2.5*	*5.0*	*14-26 FT*	*2.5*	*5.0*	*14-22 FT*	*2.5*	*5.0*	*9-16 FT*

** TYPE 2 TREE HEIGHTS SHALL NOT BE LESS THAN TWO-THIRDS THE LISTED HEIGHT RANGE.*

*** TYPE 3 TREES SHALL HAVE A MINIMUM OF SEVEN BRANCHES*

**** TYPE 4 TREES SHALL HAVE A MINIMUM OF EIGHT BRANCHES*

CALIPER MEASUREMENT FOR CLUMP OR MULTI-STEM TREES IS ONE-HALF THE SUM OF THE THREE LARGEST TRUNK CALIPERS

CALIPER MEASUREMENT FOR <4" TRUNK IS +6" ABOVE ROOTBALL (NOT INCLUDING ROOTSTOCK). >4" TRUNK IS +12"

TREES SHALL HAVE A CENTRAL LEADER. NEW LEADERS LESS THAN HALF THE DIAMETER OF A HEADED LEADER, BROKEN OR CO-DOMINATE LEADERS ARE NOT ACCEPTABLE

SCAFFOLD BRANCHES SHALL BE LESS THAN 2/3 THE DIAMETER OF THE TRUNK, WITHOUT INCLUDED BARK AT ATTACHMENT. SCAFFOLD BRANCHES SHALL BE BALANCED, WELL SPACED VERTICALLY, AND WITH A RADIALLY BLANK SECTOR NO GREATER THAN 1/3 OF THE CANOPY CIRCUMFERENCE.

TEMPORARY BRANCHES ON THE LOWER TRUNK SHALL BE LESS THAN 3/8 INCH DIAMETER; AND THE CLEAR TRUNK HEIGHT SHALL BE NO MORE THAN 40% OF THE TOTAL TREE HEIGHT.

THE ROOT COLLAR AND ROOTBALL SHALL BE FREE OF DEFECTS INCLUDING CIRCLING, KINKED AND GIRDLING ROOTS. ROOTS THE EDGE AND BOTTOM OF THE CONTAINER SHALL BE LESS THAN 1/4 INCH DIAMETER, AND UNIFORM THROUGHOUT THE CONTAINER.

TREE CANOPY WIDTH SHALL BE A MINIMUM OF 25% OF THE STANDARD FORM TREE HEIGHT.

DO NOT HEAD BACK OR PRUNE TREES UNLESS APPROVED AND/OR DIRECTED TO BY THE LANDSCAPE ARCHITECT

SEE SHEET LA1 FOR PLANTING PLAN AND CALCULATIONS

811 Know what's below. Call before you dig.

LICENSED LANDSCAPE ARCHITECT — KEVIN W. BRILEY NO. 4794 — Signature 12/31/24 Renewal Date — STATE OF CALIFORNIA

Blair, Church & Flynn CONSULTING ENGINEERS
Blair, Church & Flynn Consulting Engineers
4521 Clovis Avenue, Suite 200
Clovis, California 93612
Tel (559) 326-1400
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APPROVALS

FILE # 10-28 | APPLICATION # 02-122132

IDENTIFICATION STAMP
DIV. OF THE STATE ARCHITECT
APP: 02-122132 INC:
REVIEWED FOR
SS ☑ FLS ☑ ACS ☑
DATE: 08/06/2024

LICENSED ARCHITECT — MICHAEL J. SCOTT JR — No. C-34290 — REN: 08-31-25 — STATE OF CALIFORNIA

DATE: JANUARY 31, 2024

NEW TK CLASSROOM AT CHENEY KINDERGARTEN

COALINGA-HURON UNIFIED SCHOOL DISTRICT
COALINGA, FRESNO COUNTY, CA

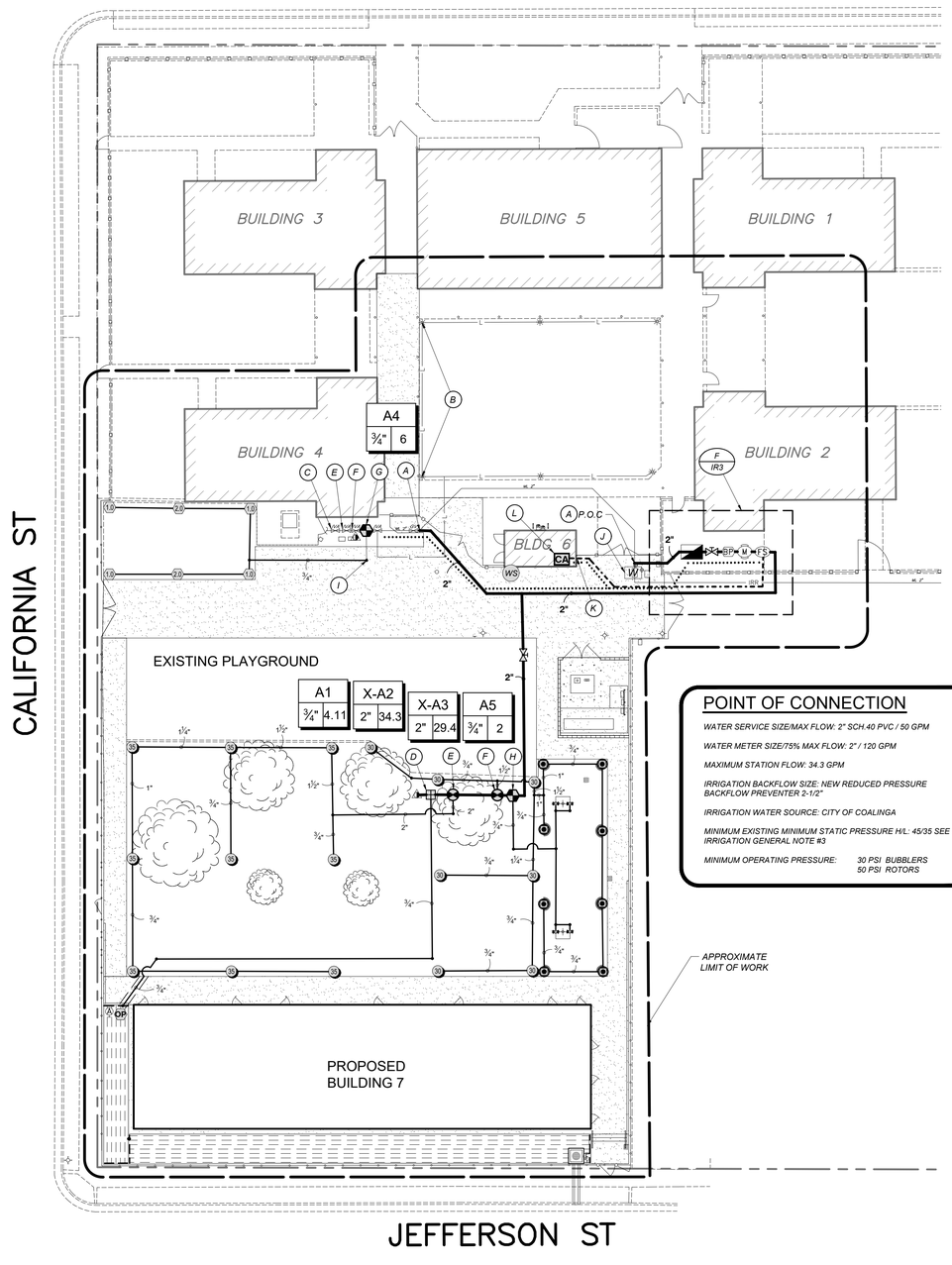
REVISIONS

MANGINI ARCHITECTURE ENGINEERING SURVEYING
BARENG MORRELLI SCOTT
MANGINI ASSOCIATES INC.
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Visalia, California 93291
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TITLE
PLANTING DETAILS

LA2

PROJECT 23044



POINT OF CONNECTION

WATER SERVICE SIZE/MAX FLOW: 2" SCH.40 PVC / 50 GPM

WATER METER SIZE/75% MAX FLOW: 2" / 120 GPM

MAXIMUM STATION FLOW: 34.3 GPM

IRRIGATION BACKFLOW SIZE: NEW REDUCED PRESSURE BACKFLOW PREVENTER 2-1/2"

IRRIGATION WATER SOURCE: CITY OF COALINGA

MINIMUM EXISTING MINIMUM STATIC PRESSURE H/L: 45/35 SEE IRRIGATION GENERAL NOTE #3

MINIMUM OPERATING PRESSURE: *30 PSI BUBBLERS*
50 PSI ROTORS

IRRIGATION LEGEND

SYMBOL	MANUFACTURER/MODEL/DESCRIPTION	ARC	PSI	GPM	RADIUS	DETAIL
	RAIN BIRD R-VAN24 RD-04-SAM-P45 RV-24	ADJ	45		23'	M/IR2
	TREE BUBBLER 50H HUNTER PROS-04-PRS30-CV-MSBN-10F	180	30	0.5	1'	J/IR2

SYMBOL	MANUFACTURER/MODEL	PSI	GPM	RADIUS	DETAIL
30	RAIN BIRD 5004-PC-MPR 30	45		30'	K/IR2
35	RAIN BIRD 5004-PC-MPR 35	45		35'	K/IR2
1.0	RAIN BIRD 5004-PC-R-LA 1.0	45	0.99	29'	K/IR2
2.0	RAIN BIRD 5004-PC-R-LA 2.0	45	2.02	32'	K/IR2

SYMBOL	MANUFACTURER/MODEL/DESCRIPTION	DETAIL
	DRIP CONTROL KIT 3/4" RAIN BIRD LFV-075	A/IR4
F	FLUSH VALVE ASSEMBLY	E/IR4
A	AIR/ VACCUM RELIEF VALVE RAIN BIRD ARV050. INSTALL AT HIGHEST TUBING ELEVATION IN EACH DRIP ZONE. INSTALL IN A ROUND GREEN VALVE BOX	F/IR4
OP	DRIP SYSTEM OPERATION INDICATOR HUNTER ECO-ID	D/IR4
	AREA TO RECEIVE DRIPLINE HUNTER HDL-06-18-COP PRESSURE COMPENSATING LANDSCAPE DRIPLINE WITH CHECK VALVE. 0.6 GPH EMITTERS AT 18" O.C. DRIPLINE LATERALS SPACED AT 18" APART, WITH EMITTERS OFFSET FOR TRIANGULAR PATTERN. MINIMUM 3" COVER	C/IR4

SYMBOL	MANUFACTURER/MODEL/DESCRIPTION	DETAIL
	EXISTING REMOTE CONTROL VALVE 2" IRRITROL 100 SERIES	
	REMOTE CONTROL VALVE - 3/4" IRRITROL 700B- 75	F/IR2
	QUICK COUPLER VALVE HUNTER-44RC WITH HK44 KEY AND HS2 HOSE SWIVEL	G/IR2
	GATE VALVE LARGE LEEMCO LMV-BB WITH 2" NUT PUSH-ON BELL ENDS WITH PIPE RESTRAINT, OR EQUAL	H/IR2
M	MASTER VALVE SUPERIOR 1-1/2" MODEL 3200 BRASS MASTER VALVE, NORMALLY CLOSED	B/IR3
	NEW REDUCED PRESSURE BACKFLOW PREVENTER 2-1/2" ZURN 375-BP	A/IR3
XA	EXISTING CONTROLLER TO BE REPLACED (SEE NEW CONTROLLER) RAIN BIRD SST-400IN 4 STATIONS/ 4 USED - 1 SPARE WIRE. LOCATED INSIDE BUILDING '6'.	
CA	NEW CONTROLLER RAIN BIRD ESP4ME1 WITH ESP-SM6. INDOOR	C/IR3
FS	NEW FLOW SENSOR 2" CST MODEL FSI-T20-001	B/IR3
BP	NEW VDF BOOSTER PUMP ASSEMBLY WITH ENCLOSURE	F/IR3
SB	SPLICE BOX	L/IR2
WS	WIRED WEATHER SENSOR, HUNTER SOLAR-SYNC-SEN MOUNT IN SENSOR GUARD OUTSIDE OF CONTROLLER'S PEDESTAL ENCLOSURE	D/IR3
	IRRIGATION LATERAL LINE: PVC SCHEDULE 40 SOLVENT WELD, SIZE AS NOTED	C/IR2
	IRRIGATION MAINLINE: PVC SCHEDULE 40	A/IR2
	PIPE SLEEVE: PVC SCHEDULE 40 TWICE PIPE SIZE	D/IR2

— VALVE NUMBER
#" — #• VALVE FLOW (GPM) / VALVE SIZE

	DRIPLINE MANIFOLD: PVC SCHEDULE 40	B/IR3
	SENSOR CABLE IN ELECTRICAL CONDUIT. USE METAL CONDUIT FOR EXPOSED ABOVE-GRADE LOCATIONS	
	CONTROL WIRE PLUS ONE (1) COMMON WIRE	E/IR2
L	EXISTING LATERAL LINE	
IRR	EXISTING MAIN LINE	
+	PROPOSED TREE, SEE PLANTING PLAN ON SHEET LA1 FOR VARIETY AND SIZE.	
A	CONNECT NEW MAIN LINE TO EXISTING MAIN LINE.	
B	RELOCATE HEADS FOR NEW HARDSCAPE. REPLACE NOZZLES TO MATCH NEW IMPROVEMENTS. SEE GENERAL IRRIGATION NOTE #17.	
C	REMOVE EXISTING IRRIGATION VALVE. RETURN TO OWNER.	
D	NEW 3/4" DRIP CONTROL KIT. USE EXISTING CONTROL STATION XA-1 AND WIRE.	
E	REMOVE AND RELOCATE EXISTING 2" REMOTE CONTROL IRRIGATION VALVE. USE EXISTING CONTROL STATION XA-2 AND WIRE.	
F	REMOVE AND RELOCATE EXISTING 2" REMOTE CONTROL IRRIGATION VALVE. USE EXISTING CONTROL STATION XA-3 AND WIRE.	
G	REMOVE EXISTING IRRIGATION VALVE. RETURN TO OWNER. REPLACE WITH A 3/4" REMOTE CONTROL IRRIGATION VALVE. USE EXISTING CONTROL STATION AND WIRE AND XA-4	
H	NEW 3/4" REMOTE CONTROL IRRIGATION VALVE.	
I	CONNECT NEW LATERAL LINE TO EXISTING LATERAL LINE.	
J	EXISTING IRRIGATION WATER METER SHALL REMAIN	
K	PROVIDE CONDUIT AND SENSOR CABLE FROM EXISTING CONTROLLER. USE CONDUIT SWEEP TO BUILDING EXTERIOR. SEE DETAIL G/IR3	
L	INTERCEPT EXISTING CONTROL WIRES AND CONNECT TO NEW IRRIGATION CONTROLLER.	

SCALE: N 1"=20'

0 5 20 40
SCALE IN FEET

IRRIGATION SYSTEM OBSERVATION LOG				
		REVIEWED & ACCEPTED BY OWNER'S REP OR LAND ARCH		
ITEM NO.	WORK ITEM DESCRIPTION	PRINT NAME	SIGNATURE	DATE
IR-1	EXISTING SYSTEM OPERATION & PRESSURE CHECK			
IR-2	PIPING/WIRE SLEEVES UNDER PAVEMENT			
IR-3	MAIN LINE INSTALLATION & PRESSURE TEST			
IR-4	VALVE INSTALLATIONS			
IR-5	IRRIGATION COVERAGE PRIOR TO PLANTING			
IR-6	CONTROL EQUIPMENT INSTALLATION			
IR-7	BOOSTER PUMP INSTALLATION & START-UP (MANUF.)			
IR-8	FINAL SYSTEM OPERATION REVIEW			

NOTE: THE ORIGINAL VERSION OF THIS LOG SHALL BE MAINTAINED ON THE AS-BUILT RECORD DRAWING SET.
WORK ITEMS MAY NOT BE REVIEWED IF PRIOR WORK ITEMS HAVE NOT BEEN ACCEPTED.

WATER CONSERVATION COMPLIANCE STATEMENT:

I HAVE COMPLIED WITH THE CRITERIA OF THE LANDSCAPE WATER CONSERVATION ORDINANCE AND GUIDELINES, AND HAVE APPLIED THEM FOR THE EFFICIENT USE OF WATER IN THE IRRIGATION DESIGN PLAN.

DAVID W. BRILEY, RLA 3787

SEE SHEETS IR1 TO IR4 FOR IRRIGATION DETAILS AND NOTES

Know what's below. Call before you dig.

LICENSED LANDSCAPE ARCHITECT — DAVID W. BRILEY NO. 3787 — Signature 12/31/24 Renewal Date — Date — STATE OF CALIFORNIA

APPROVALS

FILE # 10-28 | APPLICATION # 02-122132

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DIV. OF THE STATE ARCHITECT
APP: 02-122132 INC:
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SS ☑ FLS ☑ ACS ☑
DATE: 08/06/2024

LICENSED ARCHITECT — MICHAEL J. SCOTT JR. — No. C-34290 — REN: 05-31-25 — STATE OF CALIFORNIA

DATE: JANUARY 31, 2024

NEW TK CLASSROOM AT CHENEY KINDERGARTEN

COALINGA-HURON UNIFIED SCHOOL DISTRICT
COALINGA, FRESNO COUNTY, CA

REVISIONS

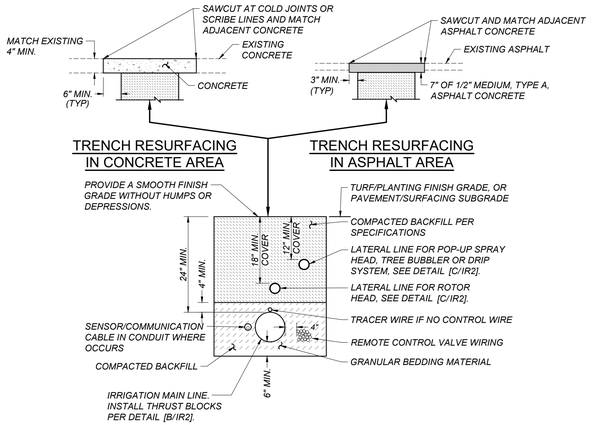
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TITLE
IRRIGATION PLAN

IR1

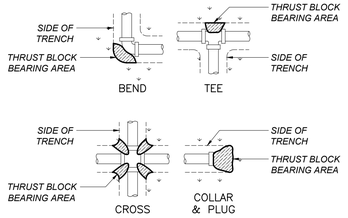
PROJECT 23044

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CONSULTING ENGINEERS
Blair, Church & Flynn Consulting Engineers
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TYPICAL TRENCH SHOWN IN PLANTING AREA

A IR2 IRRIGATION TRENCH BACKFILL
NOT TO SCALE

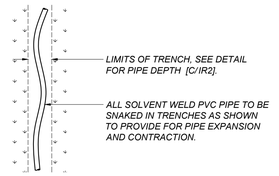


NOTE: CONCRETE PER SPECIFICATIONS. THRUST BLOCKS NOT REQUIRED WITH LESS THAN 2" MAIN LINE

TABLE OF BEARING AREAS REQUIRED (IN SQUARE FEET)

PIPE DIAMETER	≦4"	6"	8"	10"	12"
CROSS, TEE, 90° BEND, PLUG, FIRE HYDRANT	1	3	5	8	11
45° BEND	1	2	3	4	6
22-1/2° BEND	0.5	1	2	2	3
11-1/4° BEND	0	0	1	1	2
GATE VALVE (IN-LINE)	0	1	2.5	4	9

B IR2 CONCRETE THRUST BLOCKS
NOT TO SCALE

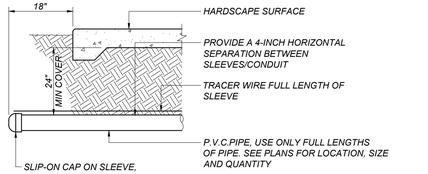


C IR2 SOLVENT WELD PIPE
NOT TO SCALE

CONDUIT/SLEEVE FOR CONTROL WIRE

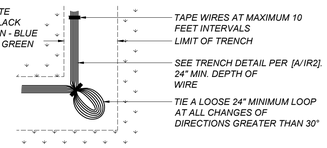
CONDUIT/SLEEVE SIZE	QTY. 14 GA. WIRE
1"	8 OR LESS
1-1/4"	15
1-1/2"	20
2"	32
2-1/2"	45
3"	70
4"	120

NOTE: SLEEVE FOR PIPE IS 2X THE PIPE DIAMETER



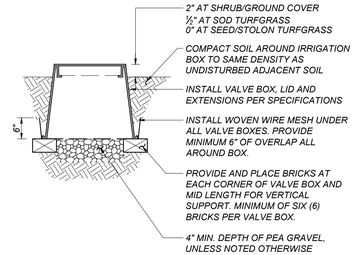
NOTE:
IF CONTROL WIRES ARE ROUTED IN CONDUIT, SLEEVE FOR WIRES IS NOT REQUIRED

NOTES:
1. WIRES UNDER PAVEMENT OR WALKS SHALL BE INSTALLED WITHIN A CONDUIT WHICH HAS BEEN PLACED BY BORING, JACKING OR DRILLING. CONDUIT TO BE PVC SCH 40 TYPE II PIPE. WIRES SHALL NOT BE TAPED TOGETHER INSIDE THE CONDUIT.
2. NO SPLICES ARE ALLOWED BETWEEN POINTS OF CONNECTIONS.
3. A VALVE BOX MUST BE PROVIDED AT ALL UNDERGROUND SPLICE CONNECTIONS.
4. HOT - RED
COMMON - WHITE
SPARE HOT - BLACK
SPARE COMMON - BLUE
TRACER WIRE - GREEN



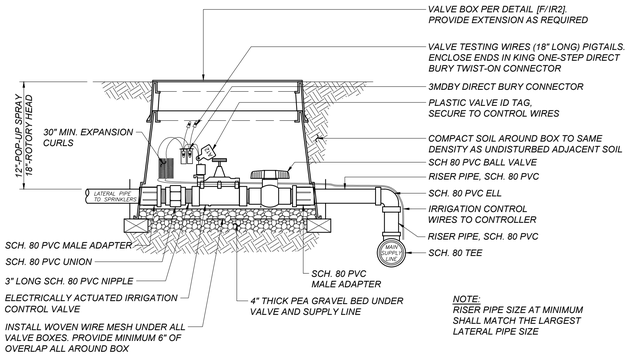
E IR2 IRRIGATION WIRE
NOT TO SCALE

D IR2 IRRIGATION SLEEVE/CONDUIT
NOT TO SCALE



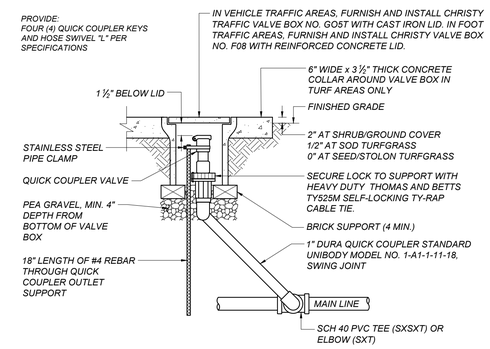
NOTE:
PROVIDE A TRAFFIC RATED CONCRETE BOX AND LID FOR ANY BOX LOCATED IN HARDSCAPE PAVEMENT AND SET FLUSH TO FINISHED SURFACE. PROVIDE A 6"X6" CONCRETE COLLAR AROUND THE BOX IF LOCATED IN ASPHALTIC CONCRETE.

I IR2 IRRIGATION VALVE BOX
NOT TO SCALE

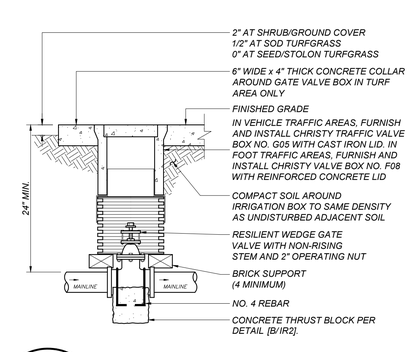


NOTE:
RISER PIPE SIZE AT MINIMUM SHALL MATCH THE LARGEST LATERAL PIPE SIZE

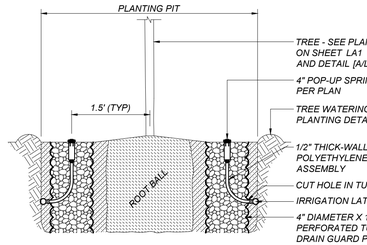
F IR2 REMOTE CONTROL VALVE WITH BALL VALVE - GLOBE
NOT TO SCALE



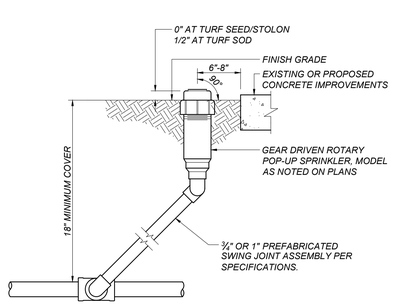
G IR2 QUICK COUPLER VALVE
NOT TO SCALE



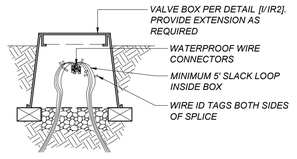
H IR2 2" AND LARGER GATE VALVE
NOT TO SCALE



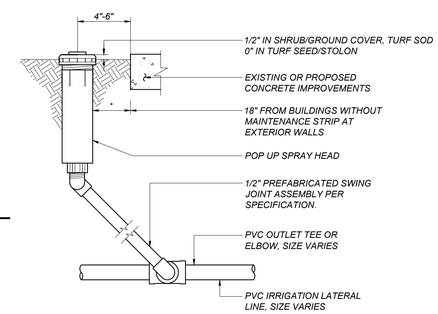
J IR2 TREE BUBBLERS
NOT TO SCALE



K IR2 POP-UP ROTOR
NOT TO SCALE

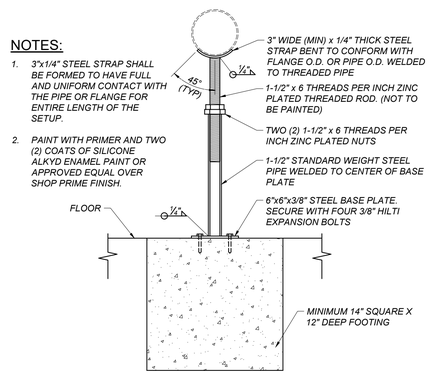


L IR2 SPLICEBOX
NOT TO SCALE



M IR2 POP-UP SPRAY
NOT TO SCALE

NOTES:
1. 3"x1/4" STEEL STRAP SHALL BE FORMED TO HAVE FULL AND UNIFORM CONTACT WITH THE PIPE OR FLANGE FOR ENTIRE LENGTH OF THE SETUP.
2. PAINT WITH PRIMER AND TWO (2) COATS OF SILICONE ALKYD ENAMEL PAINT OR APPROVED EQUAL OVER SHOP PRIME FINISH.



N IR2 VALVE/PIPE SUPPORT JACK
NOT TO SCALE

SEE SHEET IR1 FOR IRRIGATION PLAN

Know what's below. Call before you dig.

Licensed Landscape Architect — Briley No. 2980 — Renewal Date 12/31/24 — State of California

Blair, Church & Flynn CONSULTING ENGINEERS
Blair, Church & Flynn Consulting Engineers
453 Clovis Avenue, Suite 200
Clovis, California 93612
Tel (559) 326-1400
Fax (559) 326-1500

APPROVALS
FILE # 10-28 | APPLICATION # 02-122132

IDENTIFICATION STAMP
DIV. OF THE STATE ARCHITECT
APP: 02-122132 INC:
REVIEWED FOR
SS ☑ FLS ☑ ACS ☑
DATE: 08/06/2024

LICENSED ARCHITECT — MICHAEL J. SCOTT — No. C-34290 — REN: 08-31-25 — STATE OF CALIFORNIA

DATE: JANUARY 31, 2024

NEW TK CLASSROOM AT CHENEY KINDERGARTEN

COALINGA-HURON UNIFIED SCHOOL DISTRICT
COALINGA, FRESNO COUNTY, CA

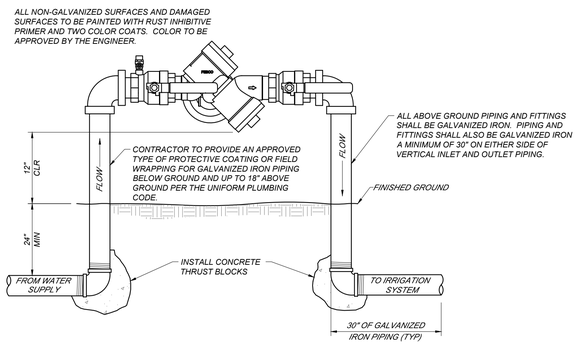
REVISIONS

MANGINI | ARCHITECTURE | ENGINEERING
BARENG MORRELLI SCOTT
MANGINI ASSOCIATES INC.
4320 West Mineral king Avenue
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(559) 627-1926 Fax

TITLE
IRRIGATION DETAILS

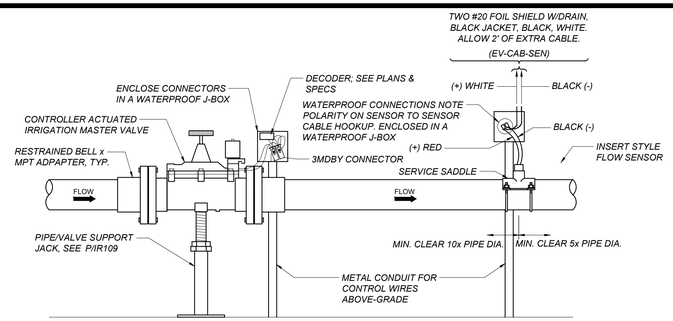
IR2

PROJECT 23044



A IR3 FEBCO MODEL 825Y BACKFLOW PREVENTER

NOT TO SCALE

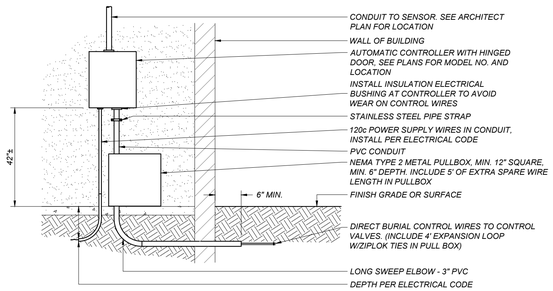


NOTES:

1. *FLOW SENSOR WITH INSERT (TOP) POSITIONED VERTICALLY AND PIPE LEVEL.*
2. *RUN FLOW SENSOR CABLE AND CONTROL WIRES IN 1" CONDUIT FROM FLOW SENSOR TO CONTROLLER ENCLOSURE.*

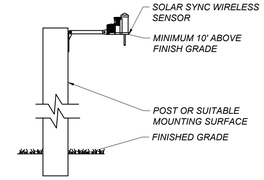
B IR3 FLOW SENSOR AND MASTER VALVE

NOT TO SCALE



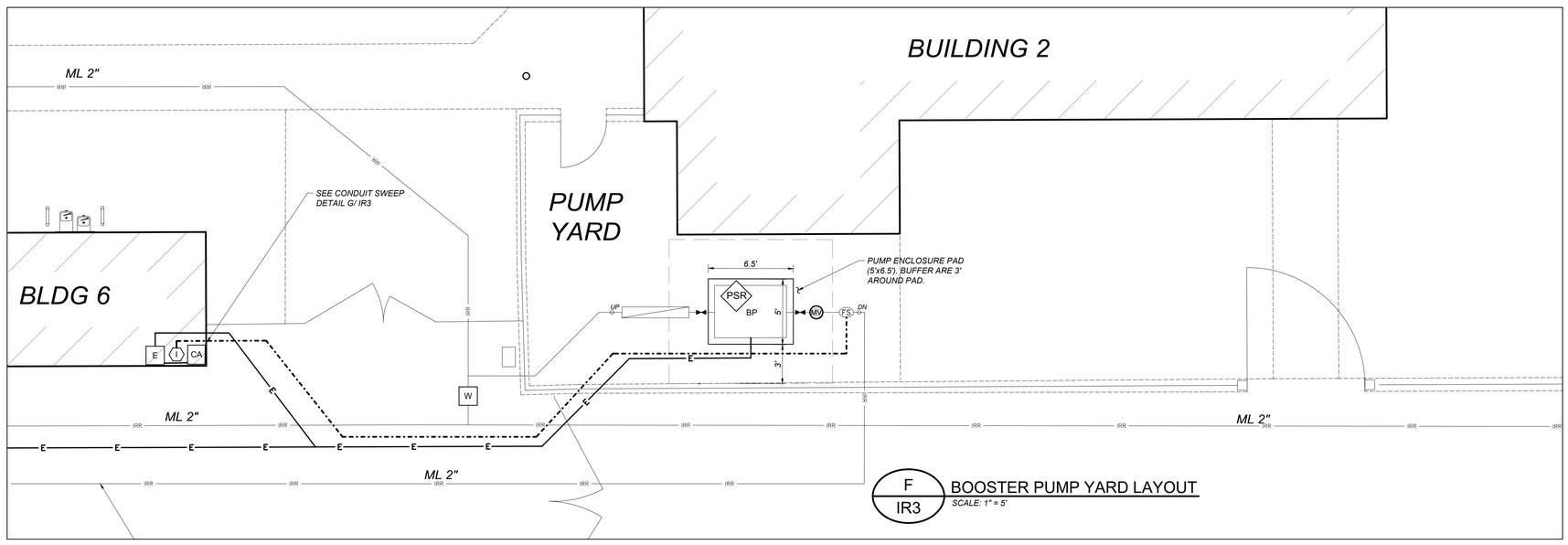
C IR3 INTERIOR WALL MOUNTED CONTROLLER

NOT TO SCALE



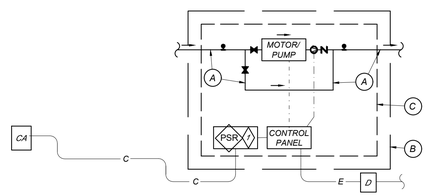
D IR3 SOLAR SYNC WIRELESS

NOT TO SCALE



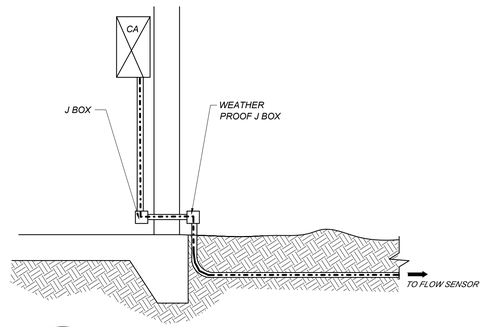
F IR3 BOOSTER PUMP YARD LAYOUT

SCALE: 1" = 5'



E IR3 VFD BOOSTER PUMP SCHEMATIC

NOT TO SCALE



G IR3 CONDUIT AND SENSOR CABLE SWEEP

NOT TO SCALE

LEGEND:

NOTE: SEE PLAN SHEET 'IRRIGATION LEGEND' FOR ADDITIONAL INFORMATION

2"IRR	*PVC SCH.40 IRRIGATION MAIN LINE; SIZE AS NOTED*
C	*LOW VOLTAGE ETHERNET CONNECTION, SEE ELECTRICAL PLAN*
	CONTROL WIRE PLUS ONE (1) COMMON WIRE
E	*ELECTRICAL POWER LINE, FROM EXISTING ELECTRICAL PANEL*
	EXISTING CHAINLINK FENCE
	2-1/2" BACKFLOW ASSEMBLY
UP/ DN	*2" RISER*
BP	*BOOSTER PUMP ASSEMBLY IN A METAL ENCLOSURE*
CA	*CONTROLLER "A"*
E	*EXISTING ELECTRICAL PANEL*
1	*FLOW ISOLATOR BY CREATIVE SENSOR TECHNOLOGY*
FS	*FLOW SENSOR*
	GATE VALVE, SEE IRRIGATION LEGEND. PROVIDE SUPPORT JACK PER DETAIL P/IR109
MV	*1-1/2" MASTER VALVE (PROVIDE SUPPORT JACK PER DETAIL N/IR2*
PSR	*PUMP START RELAY*

LEGEND:

C	*CONTROL WIRE IN ELECTRICAL CONDUIT*
	ELECTRICAL SERVICE IN ELECTRICAL CONDUIT
	SIGNAL CABLE IN ELECTRICAL CONDUIT, EV-CAB-SEN
	BUTTERFLY VALVE
N	*CHECK VALVE*
	PRESSURE GAUGE
	PRESSURE TRANSDUCER
CA	*IRRIGATION CONTROLLER*
A	*PIPE SUPPORTS ON ABOVE-GRADE PIPE AS NEEDED*
B	*RAISED CONCRETE PAD FOR PUMP ASSEMBLY, MINIMUM 12" WIDER THAN ENCLOSURE*
C	*PUMP ASSEMBLY ENCLOSURE WITH POWDERCOATED OR STAINLESS STEEL FINISH*
PSR	*PUMP START RELAY FROM CA CONTROLLER. INSTALL IN PUMP CONTROL PANEL ENCLOSURE*
PC	*VFD PUMP CONTROL PANEL*
UP/DN	*PIPE RISER. UP = UP RISER DN = DOWN RISER*
D	*ELECTRICAL POWER DISCONNECT SWITCH PER ELECTRICAL PLANS*

VFD BOOSTER PUMP PARAMETERS:

LOCATED AT PUMP YARD - PARKING LOT

SUPPLY PIPE SIZE:	*2"*
DISCHARGE PIPE SIZE:	*2"*
MINIMUM STATIC SERVICE PRESSURE:	*35 PSI (CONTRACTOR SHALL VERIFY PRIOR TO PUMP ORDER))*
PUMP SUPPLY PRESSURE:	*27 PSI*
DISCHARGE PRESSURE:	*85 PSI*
MAXIMUM BOOST REQUIRED AT 3500 RPM:	*58 PSI*
MAXIMUM FLOW REQUIRED AT 3500 RPM:	*435 GPM*
ELECTRICAL SERVICE:	*480 VAC 60HZ, 3 PHASE*
PUMP ACTIVATION:	*CONTROLLER PROGRAM ACTIVATION WITH PUMP START RELAY*

VFD BOOSTER PUMP NOTES:

1. *THE CONTRACTOR SHALL COORDINATE WITH THE PUMP ASSEMBLY VENDOR AS TO THE FINAL LAYOUT, ORIENTATION AND CONFIGURATION OF THE PUMP ASSEMBLY, CONTROL PANEL, INLET AND OUTLET PIPING, UTILITY PIPING AND WIRING/CABLE CONDUITS TO ACCOMMODATE THE EXISTING AND/OR PROPOSED CONDITIONS AND IMPROVEMENTS. PUMP ASSEMBLY LAYOUT SHALL COMPLY WITH CODE REQUIRED CLEARANCES FOR EXISTING AND PROPOSED EQUIPMENT.*
2. *A CONCRETE PAD SHALL EXTEND AROUND THE ENTIRE PUMP ASSEMBLY SUPPORT BASE FRAME A MINIMUM OF 6 INCHES ON ALL SIDES. PAD SHALL BE A MINIMUM 8 INCHES THICK WITH A MINIMUM 6 INCHES BELOW GRADE OVER 6 INCHES OF SCARIFIED AND COMPACTED SOIL SUBGRADE. THE PAD SHALL HAVE #4 REBAR AT 24 INCHES-ON-CENTER, BOTH WAYS. THE TOP OF THE PAD SHALL BE A MINIMUM OF 2 INCHES ABOVE THE ADJACENT FINISH HARD SURFACE, OR 4 INCHES ABOVE ADJACENT DIRT OR DG SURFACE. SECURE THE PUMP TO THE PAD WITH NON-CORROSIVE ANCHOR OR EXPANSION BOLTS OF THE MAXIMUM SIZE ALLOWABLE BY THE SUPPORT SKID, BUT AT LEAST 0.5 INCH DIAMETER.*
3. *A REPRESENTATIVE OF THE PUMP ASSEMBLY MANUFACTURE SHALL BE RESPONSIBLE FOR ALL START-UP PROCEDURES AND CERTIFYING THAT THE PUMP OPERATES WITHIN DESIGN PARAMETERS. PUMP MANUFACTURER SHALL TRAIN THE CONTRACTOR AND OWNER IN PROPER PUMP OPERATION. A STARTUP REPORT CONTAINING VOLTAGE AND AMPERAGE READINGS, SUCTION AND DISCHARGE PRESSURE READINGS, ESTIMATED FLOW CONDITIONS, AND GENERAL OPERATING CHARACTERISTICS SHALL BE SUBMITTED TO THE DISTRICT WITHIN 7 DAYS OF A SUCCESSFUL CERTIFICATION. CONTRACTOR SHALL MAKE ALL ADJUSTMENTS AS NECESSARY FOR PROPER PUMP AND CONTROLS OPERATION.*
4. *WELDED OR GROOVED STEEL OR BRAZED/SOLDERED COPPER TUBING PIPING SYSTEMS SHALL BE PROVIDED. THREADED CONNECTIONS ARE ALLOWED ONLY AT THE INTERFACE OF THREADED MECHANICAL APPURTENANCES.*

SEE SHEET IR1 FOR IRRIGATION PLAN

811 Know what's below. Call before you dig.

LICENSED LANDSCAPE ARCHITECT — BRILEY NO. 2587 — 12/31/24 Renewal Date — Date — STATE OF CALIFORNIA

Blair, Church & Flynn CONSULTING ENGINEERS

Blair, Church & Flynn Consulting Engineers
453 Clovis Avenue, Suite 200
Clovis, California 93612
Tel (559) 326-1400
Fax (559) 326-1500

APPROVALS

FILE # 10-28 | APPLICATION # 02-122132

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SS ☑ FLS ☑ ACS ☑
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LICENSED ARCHITECT — MICHAEL J. SCOTT — No. C-34290 — REN: 05-31-25 — STATE OF CALIFORNIA

DATE: JANUARY 31, 2024

NEW TK CLASSROOM AT CHENEY KINDERGARTEN

COALINGA-HURON UNIFIED SCHOOL DISTRICT
COALINGA, FRESNO COUNTY, CA

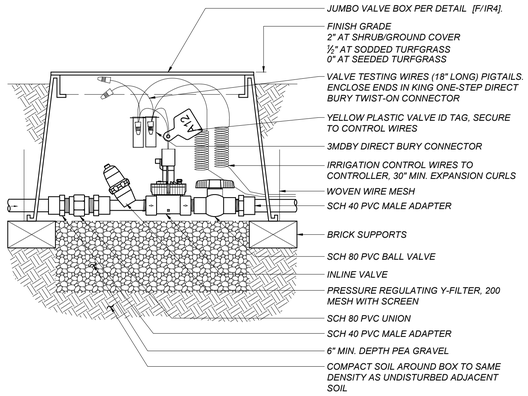
REVISIONS

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TITLE: IRRIGATION DETAILS

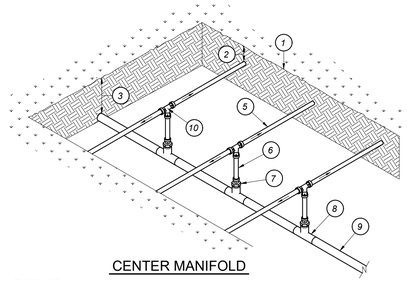
IR3

PROJECT 23044



A / IR4 DRIP ZONE ASSEMBLY

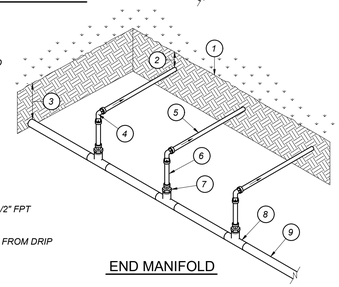
NOT TO SCALE



CENTER MANIFOLD

LEGEND:

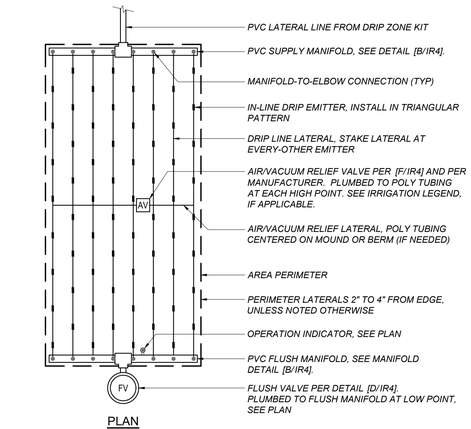
1. FINISH GRADE
2. DEPTH OF TUBING BELOW FINISHED GRADE - SEE LEGEND
3. MIN. 12" DEPTH OF PVC SUPPLY / FLUSH MANIFOLD BELOW FINISHED GRADE
4. ELBOW
5. DRIPLINE LATERAL, SEE PLAN
6. POLY TUBING, LENGTH AS NECESSARY
7. MALE ADAPTER
8. SCH 40 PVC TEE (SxSxT) WITH 1/2" FPT OUTLET
9. SCH 40 PVC SUPPLY MANIFOLD FROM DRIP ZONE KIT
10. TEE



END MANIFOLD

B / IR4 DRIPLINE MANIFOLD

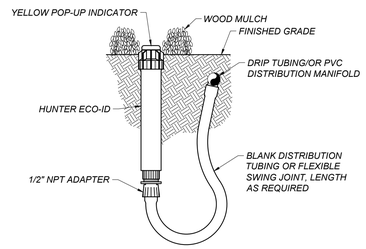
NOT TO SCALE



PLAN

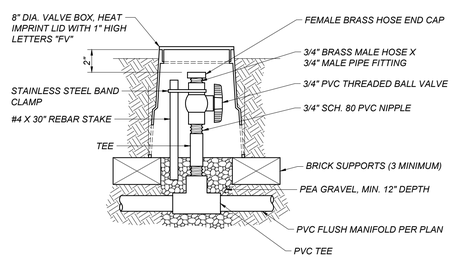
C / IR4 DRIPLINE LAYOUT SCHEMATIC

NOT TO SCALE



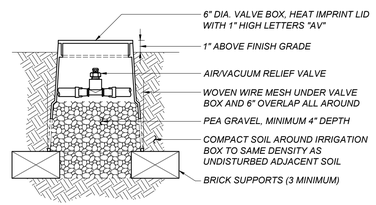
D / IR4 HUNTER ECO-INDICATOR

NOT TO SCALE



E / IR4 DRIPLINE FLUSH VALVE

NOT TO SCALE



F / IR4 DRIPLINE AIR/VACUUM RELIEF VALVE

NOT TO SCALE

GENERAL IRRIGATION NOTES:

1. *ALL ITEMS IN THE LEGEND ARE TO BE FURNISHED AND INSTALLED, UNLESS NOTED OTHERWISE. THE CONTRACTOR SHALL FURNISH THE ARTICLES, EQUIPMENT, MATERIALS OR PROCESSES SPECIFIED BY NAME. NO SUBSTITUTION WILL BE ALLOWED WITHOUT PRIOR WRITTEN APPROVAL OF THE DESIGN ENGINEER. (ALL MATERIAL REQUIRED SHALL BE NEW AND OF THE BEST QUALITY AVAILABLE)*
2. *THE DESIGN ENGINEER RESERVES THE RIGHT TO REJECT ANY MATERIAL OR WORK WHICH DOES NOT CONFORM TO THE CONTRACT PLANS AND SPECIFICATIONS WITHOUT THE PRIOR WRITTEN APPROVAL OF THE DESIGN ENGINEER.*
3. *PRIOR TO STARTING WORK, THE CONTRACTOR SHALL VERIFY THE EXISTING SYSTEM COMPONENTS' LOCATION, SIZES AND ROUTING FOR BACKFLOW PREVENTERS, CONTROLLERS, MAIN AND LATERAL PIPING, VALVES, SPRINKLER HEADS AND CONTROL WIRE; AND SHALL CONFIRM THEIR OPERATIONAL STATUS IN THE PRESENCE OF THE OWNER'S REPRESENTATIVE. THE CONTRACTOR SHALL ALSO VERIFY THE AVAILABLE STATIC PRESSURE AT THE POINT-OF-CONNECTION. FAILURE TO NOTIFY THE OWNER'S REPRESENTATIVE BEFORE STARTING WORK OF ANY DEVIATION FROM THE INFORMATION SHOWN ON THE CONTRACT DOCUMENTS, OR NECESSARY REPAIRS TO THE EXISTING SYSTEM, SHALL MAKE THE CONTRACTOR RESPONSIBLE TO PROVIDE, AT HIS OWN EXPENSE, ANY CORRECTIVE WORK OR COMPONENTS NECESSARY FOR A FULLY FUNCTIONAL SYSTEM WITH FULL COVERAGE.*
4. *THE CONTRACTOR IS RESPONSIBLE TO PROTECT AND KEEP ANY EXISTING IRRIGATION SYSTEM SCHEDULED TO REMAIN OPERATIONAL AT ALL TIMES DURING THE COURSE OF THIS WORK. THE CONTRACTOR SHALL REPLACE ANY PLANTS DEAD OR DISTRESSED DUE TO THE INTERRUPTION OF EXISTING IRRIGATION SCHEDULES AND SHALL PERFORM ALL WORK NECESSARY TO MAINTAIN THE EXISTING SYSTEM'S OPERATIONAL.*
5. *THE CONTRACTOR IS RESPONSIBLE TO LOCATE AND PROTECT ALL EXISTING UTILITIES. UTILITIES SHOWN ARE FOR THE CONTRACTOR'S AWARENESS AND NO SURVEY HAS BEEN COMPLETE TO VERIFY THE ACCURACY OF THE UTILITIES SHOWN, IT IS THE CONTRACTORS RESPONSIBILITY TO REPAIR ANY DAMAGED UTILITIES CAUSED BY CONSTRUCTION ACTIVITIES.*
6. *THE CONTRACTOR SHALL BE RESPONSIBLE TO VERIFY ALL DIMENSIONS SHOWN AND TO ADJUST SAID DIMENSIONS TO FIT SITE CONDITIONS AND ACTUAL EQUIPMENT INSTALLED.*
7. *THE CONTRACTOR SHALL NOT WILLFULLY INSTALL THE IRRIGATION FACILITIES AS INDICATED ON THE DRAWINGS WHEN IT IS OBVIOUS IN THE FIELD THAT UNKNOWN OBSTRUCTIONS MIGHT NOT HAVE BEEN CONSIDERED IN THE DESIGN. SUCH OBSTRUCTIONS OR DIFFERENCES SHALL BE BROUGHT TO THE ATTENTION OF THE DESIGN ENGINEER.*
8. *THE IRRIGATION PLAN IS DIAGRAMMATIC. ALL PIPING, VALVES, AND HEADS SHALL BE LOCATED IN PLANTING AREAS WHENEVER POSSIBLE.*
9. *THE CONTRACTOR SHALL PROVIDE ADEQUATE SAFETY MEASURES TO WARN AND PROTECT THE PUBLIC, OTHER SITE CONTRACTORS AND HIS WORKERS FROM POSSIBLE INJURY DUE TO HIS CONSTRUCTION EQUIPMENT AND OPERATIONS.*
10. *DUE TO THE SCALE OF THE DRAWINGS, IT IS NOT POSSIBLE TO INDICATE ALL OFFSETS, FITTINGS, ETC. WHICH MAY BE REQUIRED. THE CONTRACTOR SHALL CAREFULLY INVESTIGATE THE STRUCTURAL AND FINISHED CONDITIONS AFFECTING ALL HIS WORK, AND PLAN HIS WORK ACCORDINGLY, FURNISHING SUCH FITTINGS, ETC., AS MAY BE REQUIRED TO INSTALL THE PROPOSED FACILITIES AND ACCOMMODATE THE SITE CONDITIONS. DRAWINGS ARE GENERALLY DIAGRAMMATIC AND INDICATIVE OF THE WORK TO BE DONE TO PROVIDE A COMPLETE AND OPERATIONAL IRRIGATION SYSTEM. ALL WORK TO BE DONE IN ACCORDANCE WITH MANUFACTURER'S RECOMMENDATIONS, LOCAL CODES AND ORDINANCES.*
11. *VALVES SHALL BE LOCATED IN SHRUB/GROUND COVER AREAS INSTEAD OF IN TURFGRASS AREAS WHENEVER POSSIBLE. VALVES IN ATHLETIC SPORTS FIELDS SHALL BE LOCATED OUTSIDE OF THE FIELD-OF-PLAY TO THE GREATEST EXTENT POSSIBLE.*
12. *THE CONTRACTOR SHALL REPLACE ANY EXISTING PLANTS SCHEDULED TO REMAIN (SEE LANDSCAPE PLANS) THAT ARE DAMAGED BY THIS WORK WITH NEW PLANTS OF THE SAME SPECIES/VARIETY AND SIZE AS THE ORIGINAL.*
13. *ANY EXISTING TURFGRASS REMOVED FOR THIS WORK SHALL BE REPLANTED IF VIABLE, OR NEW SOD OF THE SAME SPECIES/VARIETY INSTALLED. THE UPPER 6 INCHES OF THE COMPACTED TRENCH BACKFILL SHALL BE CONDITIONED PER LANDSCAPE SPECIFICATIONS PRIOR TO SOD INSTALLATION. THE NEW SOD SURFACE SHALL BE FLUSH TO THE ADJACENT TURFGRASS WITHOUT HUMPS OR DEPRESSIONS.*
14. *INSTALL SLEEVES UNDER ALL ASPHALT/CONCRETE IMPROVEMENTS. SLEEVES SHALL BE PVC SCH. 40 PVC OR SDR 35 AND TWICE THE DIAMETER OF THE PIPE UNLESS OTHERWISE NOTED. CONTROL WIRING SHALL BE SLEEVED IN 2" SCH 40 PVC UNLESS OTHERWISE NOTED. MINIMUM DEPTH OF SLEEVES UNDER ALL ASPHALT/CONCRETE IMPROVEMENTS IS 18" BELOW SUBGRADE OR 24" BELOW FINISHED GRADE, WHICHEVER IS GREATER.*
15. *CONTRACTOR SHALL SAWCUT TO EXISTING JOINTS. REMOVE AND REPLACE SURFACING (CONCRETE, ASPHALT) AS NECESSARY TO INSTALL THE IRRIGATION SYSTEM.*
16. *THE CONTRACTOR SHALL PROVIDE AND KEEP AN UP-TO-DATE "RECORD DRAWING" SHOWING ALL CHANGES TO THE ORIGINAL DRAWINGS AND EXACT LOCATIONS OF THE FACILITIES INSTALLED. BEFORE FINAL INSPECTION, THE CONTRACTOR SHALL FURNISH MARKED "RECORD DRAWINGS" TO THE INSPECTOR.*
17. *THE CONTRACTOR SHALL PROVIDE ADJUSTMENT OF NOZZLE ARC AND RADIUS, INCLUDING ANY ALTERNATE NOZZLE TYPES, NECESSARY TO PROVIDE COMPLETE COVERAGE, TO SUIT ACTUAL SITE CONDITIONS, AND TO MINIMIZE OVERSPRAY ONTO HARDSCAPE, PAVEMENT AND/OR STRUCTURES.*
18. *CONCRETE ANCHORS OR THRUST BLOCKS SHALL BE PROVIDED ON ALL MAIN LINE PIPING. THEY ARE TO BE LOCATED AT ALL ABRUPT CHANGES IN PIPELINE GRADE, CHANGES IN HORIZONTAL ALIGNMENT, REDUCTION IN PIPE SIZES, END OF LINE AND IN-LINE VALVES TO ABSORB ANY AXIAL THRUST OF THE PIPE. THE PIPE MANUFACTURER'S RECOMMENDATIONS FOR THRUST CONTROL SHALL BE FOLLOWED. THRUST BLOCKS MUST BE FORMED AGAINST UNDISTURBED EARTH.*
19. *ALL MAIN LINE AND LATERAL LINE PIPES UNDER PAVEMENT SHALL BE PRESSURE TESTED WITH THE VALVES INSTALLED. THE CONTRACTOR SHALL PROVIDE ALL EQUIPMENT NEEDED. IF ANY LEAKS DEVELOP, THE REPAIRS ARE TO BE MADE AND THE TEST REPEATED UNTIL THE SYSTEM IS PROVEN WATERTIGHT. THE CONTRACTOR IS TO CENTER LOAD THE PIPE AND LEAVE ALL JOINTS EXPOSED FOR INSPECTION. THE PRESSURE TEST SHALL BE OBSERVED AND APPROVED BY THE OWNER'S REPRESENTATIVE. WHEN THE PIPE IS PROVEN WATERTIGHT AND ONLY THEN MAY THE LINE BE BACKFILLED.*
20. *WIRED CONNECTIONS BETWEEN THE CONTROLLER AND REMOTE CONTROL VALVES SHALL BE MADE WITH ONE CONTINUOUS DIRECT BURIAL WIRE RUN. A VALVE BOX MUST BE PROVIDED AT THE CONTRACTOR'S EXPENSE AT ALL UNDERGROUND SPLICES.*
21. *ONLY TEFLON TAPE OR AN APPROVED TEFLON PASTE MAY BE USED AS THE SEALING MATERIAL TO MAKE ALL THREADED CONNECTIONS. A MINIMUM OF TWO (2) WRAPS IN THE DIRECTION OF THE THREADS TO BE USED FOR TAPE. NO OTHER PIPE JOINT MATERIAL WILL BE ALLOWED WITHOUT THE WRITTEN AUTHORIZATION FROM THE DESIGN ENGINEER.*
22. *THE CONTRACTOR SHALL PROVIDE TWO (2) INDIVIDUALLY BOUND SETS OF OPERATION AND MAINTENANCE MANUALS. THE MANUAL SHALL CONTAIN THE FOLLOWING INFORMATION:*
    - *A. CONTRACTOR'S ADDRESS AND PHONE NUMBER.*
    - *B. DURATION OF GUARANTEE PERIOD (ONE YEAR AFTER FINAL ACCEPTANCE).*
    - *C. NAMES, ADDRESSES AND PHONE NUMBERS OF LOCAL MANUFACTURER REPRESENTATIVES.*
    - *D. COMPLETE SET OF MANUFACTURER'S LITERATURE AND SPECIFICATIONS.*
    - *E. COMPLETE OPERATING AND MAINTENANCE INSTRUCTIONS ON ALL MAJOR EQUIPMENT.*
    - *F. ISSUE A "CERTIFICATE OF CONSTRUCTION COMPLIANCE" WHICH STATES THAT ALL WORK DONE AND MATERIALS AND EQUIPMENT USED ARE IN CONFORMANCE WITH THE APPROVED PLANS, SPECIFICATIONS AND ALL AUTHORIZED REVISIONS.*
    - *G. INITIAL ELECTRICAL DATA ON EACH VALVE:*
        - *(1) OHMMS READING FOR EACH VALVE TAKEN AT THE CONTROLLER.*
        - *(2) VOLTAGE READING FOR EACH VALVE TAKEN BOTH AT THE CONTROLLER AND AT THE VALVE.*
23. *THE CONTRACTOR SHALL PROVIDE TWO SETS OF CONTROLLER CHARTS. THE CHARTS TO BE A REDUCED DRAWING OF THE ACTUAL PLANS. THE CHARTS SHALL BE COLORED WITH A DIFFERENT COLOR FOR EACH IRRIGATION CIRCUIT. THE CHARTS SHALL BE COVERED IN A WATERTIGHT ENVELOPE.*
24. *IRRIGATION LINE TRENCHING AND PIPE INSTALLATION LOCATED WITHIN THE CANOPY DRIP LINE OF EXISTING TREES SHALL BE PERFORMED BY HAND OR BY AIR SPADE WITHOUT CUTTING OR DAMAGING EXISTING ROOTS GREATER THAN ONE INCH IN DIAMETER. SEE EXISTING LANDSCAPE PROTECTION SECTION FOR ADDITIONAL REQUIREMENTS.*
25. *REPLACE ALL DAMAGED EXISTING VALVE BOXES AND/OR LIDS WITHIN THE AREA OF WORK. ADJUST THE ELEVATION OF ALL EXISTING VALVE BOXES WITHIN THE AREA OF WORK TO FINISH GRADE AS NECESSARY TO COMPLY WITH THE VALVE BOX DETAIL.*

DRIP SYSTEM IRRIGATION NOTES:

1. *ALL ITEMS, ACCESSORIES, FITTINGS, ETC. NECESSARY FOR A COMPLETE AND PROPERLY FUNCTIONING SUB-SURFACE DRIP SYSTEM ARE TO BE FURNISHED AND INSTALLED BY THE CONTRACTOR, UNLESS NOTED OTHERWISE.*
2. *THE EQUIPMENT AND COMPONENTS CALLED OUT ON THE DRAWING LEGEND ARE THE PREFERENCE OF THE OWNER AND ARE SELECTED TO MATCH EQUIPMENT AND COMPONENTS IN USE IN OTHER SIMILAR IRRIGATION SYSTEMS OF THE OWNER.*
3. *PRIOR TO STARTING WORK, THE CONTRACTOR SHALL VERIFY ANY EXISTING SYSTEM COMPONENTS' LOCATION, SIZES AND ROUTING FOR BACKFLOW PREVENTERS, CONTROLLERS, MAIN AND LATERAL PIPING, VALVES, SPRINKLER HEADS AND CONTROL WIRE; AND SHALL CONFIRM THEIR OPERATIONAL STATUS IN THE PRESENCE OF THE OWNER'S REPRESENTATIVE. THE CONTRACTOR SHALL ALSO VERIFY THE AVAILABLE STATIC PRESSURE AND AVAILABLE SAFE FLOW AT THE POINT-OF-CONNECTION. FAILURE TO NOTIFY THE OWNER'S REPRESENTATIVE AND THE ENGINEER BEFORE STARTING WORK, OF ANY DEVIATION FROM THE INFORMATION SHOWN ON THE CONTRACT DOCUMENTS OR NECESSARY REPAIRS TO THE EXISTING SYSTEM, SHALL MAKE THE CONTRACTOR RESPONSIBLE TO PROVIDE, AT HIS OWN EXPENSE, ANY CORRECTIVE WORK OR COMPONENTS NECESSARY FOR A FULLY FUNCTIONAL SYSTEM WITH FULL COVERAGE.*
4. *THE IRRIGATION PLAN IS DIAGRAMMATIC. ALL PIPING, VALVES, AND COMPONENTS SHALL BE LOCATED IN PLANTING AREAS, UNLESS NOTED OTHERWISE. VALVES SHALL BE LOCATED IN SHRUB/GROUND COVER AREAS INSTEAD OF IN TURFGRASS AREAS WHENEVER POSSIBLE.*
5. *INSTALL DRIP EMITTERS IN A TRIANGULAR OR STAGGERED PATTERN AND AT A CONSISTENT DEPTH BELOW GRADE AS SHOWN OR INDICATED IN THE DRAWINGS.*
6. *STAKE THE EMITTER TUBING USING THE MANUFACTURER'S RECOMMENDED STAKES DIRECTLY OVER EVERY OTHER EMITTER. FOR EXAMPLE, IF THE EMITTERS ARE SPACED AT 18 INCHES O.C., THEN STAKE AT 36 INCHES O.C.*
7. *PRIOR TO BACKFILLING THE DRIP TUBING AND THE START OF PLANTING OPERATIONS, THE SYSTEM SHALL BE REVIEWED FOR PROPER OPERATION BY THE OWNER'S REPRESENTATIVE.*
8. *PROGRAM THE CONTROLLER TO OPERATE THE CONTROL VALVE(S) FOR THE DRIP SYSTEM USING THE CONTROLLER'S "CYCLE AND SOAK" FEATURE IN ORDER TO APPLY THE REQUIRED WATER AMOUNT IN THREE EQUAL CYCLES.*
9. *PRIOR TO THE START OF PLANTING OPERATIONS, THE DRIP SYSTEM SHALL BE OPERATED FOR A FREQUENCY AND DURATION TO ADEQUATELY MOISTEN THE TOPSOIL TO A MINIMIM DEPTH OF 12 INCHES AT ANY LOCATION WITHIN THE PLANTING AREA .*
10. *THE CONTRACTOR SHALL PROVIDE ONE HUNDRED (100) FEET OF IN-LINE EMITTER TUBING OF THE SAME MODEL AS SPECIFIED, ENOUGH STAKES FOR THE 100 FEET, AND TEN (10) OF EACH TYPE OF FITTINGS USED ON THE PROJECT FOR THE OWNER'S USE AS SPARE PARTS.*
11. *IT IS THE CONTRACTOR'S RESPONSIBILITY TO KEEP ANY EXISTING IRRIGATION SYSTEM SCHEDULED TO REMAIN OPERATIONAL AT ALL TIMES DURING THE COURSE OF THIS WORK. THE CONTRACTOR SHALL REPLACE ANY PLANTS DEAD OR DISTRESSED DUE TO THE INTERRUPTION OF EXISTING IRRIGATION SCHEDULES, AND SHALL PERFORM ALL WORK NECESSARY TO MAINTAIN THE EXISTING SYSTEM'S OPERATION.*
12. *THE CONTRACTOR SHALL REPLACE ANY EXISTING PLANTS SCHEDULED TO REMAIN THAT ARE DAMAGED BY THIS WORK WITH NEW PLANTS OF THE SAME SPECIES/VARIETY AND SIZE AS THE ORIGINAL PRIOR TO THE START OF WORK. ANY EXISTING TURFGRASS REMOVED FOR THIS WORK SHALL BE REPLANTED IF VIABLE, OR NEW SOD OF THE SAME SPECIES/VARIETY INSTALLED. THE UPPER 6 INCHES OF THE COMPACTED TRENCH BACKFILL SHALL BE CONDITIONED PER THE PLANTING SPECIFICATIONS PRIOR TO SOD INSTALLATION. THE NEW SOD SURFACE SHALL BE FLUSH TO THE ADJACENT TURFGRASS WITHOUT HUMPS OR DEPRESSIONS.*

CONTRACTOR SPECIAL IRRIGATION NOTES:

1. *THE CONTRACTOR SHALL PERFORM AN OPERATIONAL ASSESSMENT OF THE EXISTING IRRIGATION SYSTEM WITHIN THE AREA OF WORK WITH THE OWNER'S REPRESENTATIVE PRIOR TO THE START OF CONSTRUCTION OPERATIONS.*
2. *THE CONTRACTOR SHALL ENSURE THAT ALL EXISTING PLANTING SCHEDULED TO REMAIN SHALL CONTINUE TO BE IRRIGATED THROUGHOUT THE COURSE OF CONSTRUCTION OPERATIONS. ANY DAMAGE TO THE EXISTING IRRIGATION SYSTEM THAT IMPACTS EXISTING PLANTING TO REMAIN SHALL BE IMMEDIATELY REPAIRED TO THE OWNER'S SATISFACTION.*
3. *PRIOR TO THE START OF ANY SHRUB, GROUND COVER, AND/OR TURFGRASS PLANTING, AN OPERATIONAL REVIEW OF THE IRRIGATION SYSTEM SHALL BE PERFORMED FOR PROPER COVERAGE AND SOIL MOISTURE DEPTH BY THE OWNER'S REPRESENTATIVE. ALL CORRECTIONS AND/OR ADJUSTMENTS SHALL BE COMPLETED AND VERIFIED BY THE OWNER'S REPRESENTATIVE BEFORE GROUND LEVEL PLANTING MAY COMMENCE.*
4. *THE ORIGINAL IRRIGATION SYSTEM OBSERVATION LOG SHALL BE MAINTAINED ON THE AS-BUILT RECORD DRAWING SET.*
5. *THE AS-BUILT RECORD DRAWING SET AND OTHER CLOSE-OUT ITEMS SHALL BE SUBMITTED AND ACCEPTED PRIOR TO THE SCHEDULING OF A FINAL ACCEPTANCE REVIEW.*
6. *UNLESS NOTED OTHERWISE, SALVAGE AND RETURN TO THE OWNER ALL IRRIGATION VALVES, HEADS AND OTHER EQUIPMENT COMPONENTS REMOVED AS PART OF THE WORK. SALVAGED COMPONENTS SHALL BE CLEAN AND IN WORKING CONDITION UNLESS NOTED AS NON-OPERATIONAL DURING THE OPERATIONAL ASSESSMENT.*

CERTIFICATE OF COMPLETION REQUIREMENTS:

PER MWELO SECTION 492.9, UPON COMPLETION OF THE LANDSCAPE PLANTING AND IRRIGATION SYSTEM, AND AS A CONDITION OF FINAL ACCEPTANCE AND/OR THE ISSUANCE OF A CERTIFICATE OF OCCUPANCY, THE LICENSED LANDSCAPE CONTRACTOR SHALL SUBMIT TO THE CITY AND TO THE OWNER THE FOLLOWING ITEMS IN A FORM ACCEPTABLE TO THE CITY:

- *PROJECT INFORMATION AND CONTACT INFORMATION FOR THE OWNER AND APPLICANT.*
- *A CERTIFICATION THAT THE INSTALLATION COMPLIES WITH THE APPROVED DOCUMENTATION PACKAGE.*
- *IRRIGATION SCHEDULING PARAMETERS USED IN PROGRAMMING THE CONTROLLER.*
- *A PLANTING AND IRRIGATION MAINTENANCE SCHEDULE.*
- *AN IRRIGATION AUDIT REPORT PREPARED BY A CERTIFIED LANDSCAPE IRRIGATION AUDITOR.*
- *A HORTICULTURAL SOILS ANALYSIS REPORT AND RECOMMENDATIONS IF NOT SUBMITTED EARLIER WITH THE LANDSCAPE DOCUMENTATION PACKAGE.*
- *DOCUMENTATION IN THE FORM OF MATERIAL RECEIPTS, INVOICES AND/OR OTHER DOCUMENTS THAT THE RECOMMENDATIONS OF THE HORTICULTURAL SOILS ANALYSIS REPORT AS MODIFIED AND APPROVED BY THE LANDSCAPE ARCHITECT HAVE BEEN IMPLEMENTED AND INSTALLED.*

SEE SHEET IR1 FOR IRRIGATION PLAN

811 Know what's below. Call before you dig.

LICENSED LANDSCAPE ARCHITECT — MARK A. BRILEY, NO. 2606 — Signature — 12/31/24 Renewal Date — Date — STATE OF CALIFORNIA

Blair, Church & Flynn CONSULTING ENGINEERS
Blair, Church & Flynn Consulting Engineers
453 Clovis Avenue, Suite 200
Clovis, California 93612
Tel (559) 326-1400
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APPROVALS

FILE # 10-28 | APPLICATION # 02-122132

IDENTIFICATION STAMP
DIV. OF THE STATE ARCHITECT
APP: 02-122132 INC:
REVIEWED FOR
SS ☑ FLS ☑ ACS ☑
DATE: 08/06/2024

LICENSED ARCHITECT — MICHAEL J. SCOTT — No. C-34290 — REN: 08-31-25 — STATE OF CALIFORNIA

DATE: JANUARY 31, 2024

NEW TK CLASSROOM AT CHENEY KINDERGARTEN

COALINGA-HURON UNIFIED SCHOOL DISTRICT
COALINGA, FRESNO COUNTY, CA

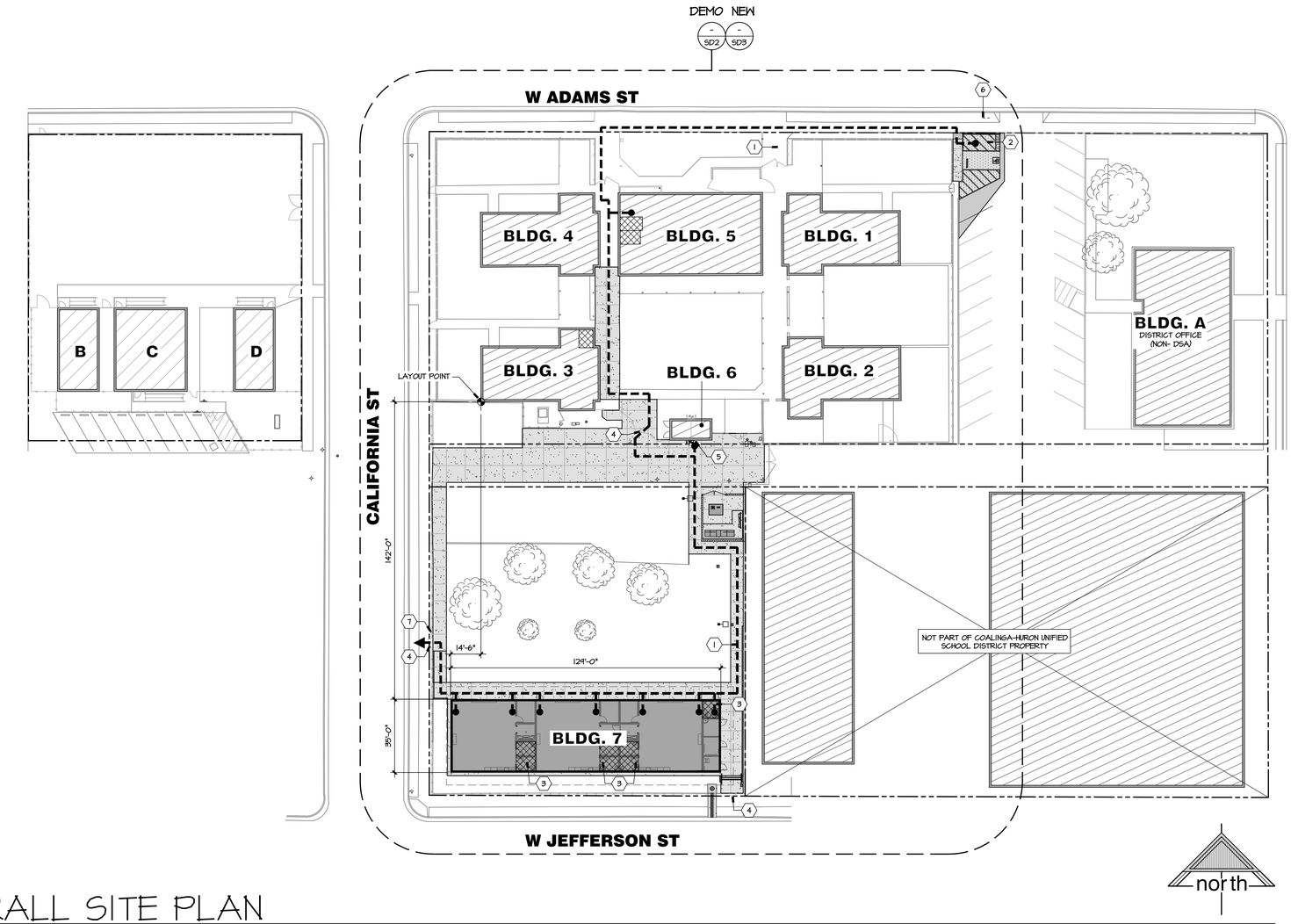
REVISIONS

MANGINI ARCHITECTURE INCORPORATED
SCOTT MORRELLI BARENG
MANGINI ASSOCIATES INC.
4320 West Mineral King Avenue
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TITLE
IRRIGATION DETAILS

IR4

PROJECT 23044



OVERALL SITE PLAN

SCALE: 1" = 30'-0"

NOTES AND LEGEND :

- NEW BUILDING
- EXIST. BUILDING
- ACCESSIBLE RESTROOMS
- NEW 4" CONCRETE PAVING
- NEW AC PAVING
- ACCESSIBLE PATH OF TRAVEL
- PROPERTY LINE
- EXISTING DECORATIVE METAL FENCE

(1) ACCESSIBLE PATH OF TRAVEL :

PATH OF TRAVEL (P.O.T.) AS VERIFIED BY THE ARCHITECT IS:
– A COMMON BARRIER FREE ACCESSIBLE ROUTE AT LEAST 48" WIDE WITHOUT ANY ABRUPT VERTICAL CHANGES EXCEEDING 1/2" BEVELED AT 1:2 MAXIMUM SLOPE, EXCEPT THAT LEVEL CHANGES DO NOT EXCEED 1/4" VERTICAL.
– THE PATH SURFACE IS SLIP RESISTANT, STABLE, FIRM, AND SMOOTH.
– PASSING SPACES AT LEAST 60" x 60" ARE LOCATED NOT MORE THAN 200' APART (11B–403.5.3).
– CONTINUOUS GRADIENTS HAVE 60" LEVEL AREAS NOT MORE THAN 400' APART (11B–403.7).
– CROSS–SLOPE DOES NOT EXCEED 2%.
– SLOPE IN THE DIRECTION OF TRAVEL IS 5% OR LESS UNLESS OTHERWISE INDICATED AS A RAMP.
– MAINTAIN P.O.T. FREE OF OVERHANGING OBSTRUCTIONS TO 80" MINIMUM, PROTRUDING OBJECTS GREATER THAN 4" PROJECTION FROM WALL OR EDGE AND 27" ABOVE FINISH GRADE (11B–307.2).

(2) ACCESSIBLE PARKING :

NEW ACCESSIBLE PARKING, SEE DETAIL 1/SD4.
21 EXISTING PARKING STALLS, 1 ACCESSIBLE PARKING STALL REQUIRED.
1 EXISTING PARKING STALL PROVIDED PER DSA# 58150.
1 ACCESSIBLE VAN PARKING STALL PER THIS APPLICATION.
2 ACCESSIBLE STALLS PROVIDED, 2>1 THEREFORE OK.

(3) ACCESSIBLE TOILETS

NEW ACCESSIBLE BOYS & GIRLS STUDENT TOILET ROOMS & UNISEX STAFF TOILET ROOM PER THIS APPLICATION. SEE SHEET A1.

(4) ACCESSIBLE GATE

ALL C.L. AND DECORATIVE METAL 4'–0" WIDE GATES IN THE PATH OF TRAVEL SHALL HAVE LEVER–TYPE LATCH AND 10" HIGH KICK–PLATES SECURE TO C.L. MESH BOTH SIDES AND ALL CAVITIES CREATED BY KICKPLATE TO BE CAPPED PER 11B–404.2.10, 5 LBS MAX FORCE TO PUSH OR PULL OPEN (11B–404.2.9) AND 5 LBS MAX TO ACTIVATE OPERABLE PARTS (11B–3.4.9) AND STRIKE SIDE (MANEUVERING) CLEARANCE PER. CBC 11B–404.2.4.1.

(5) ACCESSIBLE DRINKING FOUNTAIN

ACCESSIBLE DRINKING FOUNTAIN PER THIS APPLICATION, SEE DETAIL 16/SD5

(6) ACCESSIBLE PARKING ENTRANCE SIGN

ACCESSIBLE ENTRANCE SIGN PER DSA# 58150

(7) KNOX BOX SITE ACCESS

KNOX BOX, SEE DETAIL 8/SD5

DESIGN PROFESSIONAL IN GENERAL RESPONSIBLE CHARGE STATEMENT: THE POT IDENTIFIED IN THESE CONSTRUCTION DOCUMENTS IS COMPLIANT WITH THE CURRENT APPLICABLE CALIFORNIA BUILDING CODE ACCESSIBILITY PROVISIONS FOR PATH OF TRAVEL REQUIREMENTS FOR ALTERATIONS, ADDITIONS AND STRUCTURAL REPAIRS. AS PART OF THE DESIGN OF THIS PROJECT, THE POT WAS EXAMINED AND ANY ELEMENTS, COMPONENTS OR PORTIONS OF THE POT THAT WERE DETERMINED TO BE NONCOMPLIANT 1) HAVE BEEN IDENTIFIED AND 2) THE CORRECTIVE WORK NECESSARY TO BRING THEM INTO COMPLIANCE HAS BEEN INCLUDED WITHIN THE SCOPE OF THIS PROJECT'S WORK THROUGH DETAILS, DRAWINGS AND SPECIFICATIONS INCORPORATED INTO THESE CONSTRUCTION DOCUMENTS. ANY NONCOMPLIANT ELEMENTS, COMPONENTS OR PORTIONS OF THE POT THAT WILL NOT BE CORRECTED BY THIS PROJECT BASED ON VALUATION THRESHOLD LIMITATIONS OR A FINDING OF UNREASONABLE HARDSHIP ARE SO INDICATED IN THESE CONSTRUCTION DOCUMENTS.

DURING CONSTRUCTION, IF POT ITEMS WITHIN THE SCOPE OF THE PROJECT REPRESENTED AS CODE COMPLIANT ARE FOUND TO BE NONCONFORMING BEYOND REASONABLE CONSTRUCTION TOLERANCES, THEY SHALL BE BROUGHT INTO COMPLIANCE WITH THE CBC AS PART OF THIS PROJECT BY MEANS OF A CONSTRUCTION CHANGE DOCUMENT.

APPROVALS

FILE # 10–28 | APPLICATION # 02–122132

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LICENSED ARCHITECT
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No. C-34290
REN: 05-31-25
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DATE: JANUARY 31, 2024

NEW TK CLASSROOM AT CHENEY KINDERGARTEN
COALINGA-HURON UNIFIED SCHOOL DISTRICT
COALINGA, FRESNO COUNTY, CA

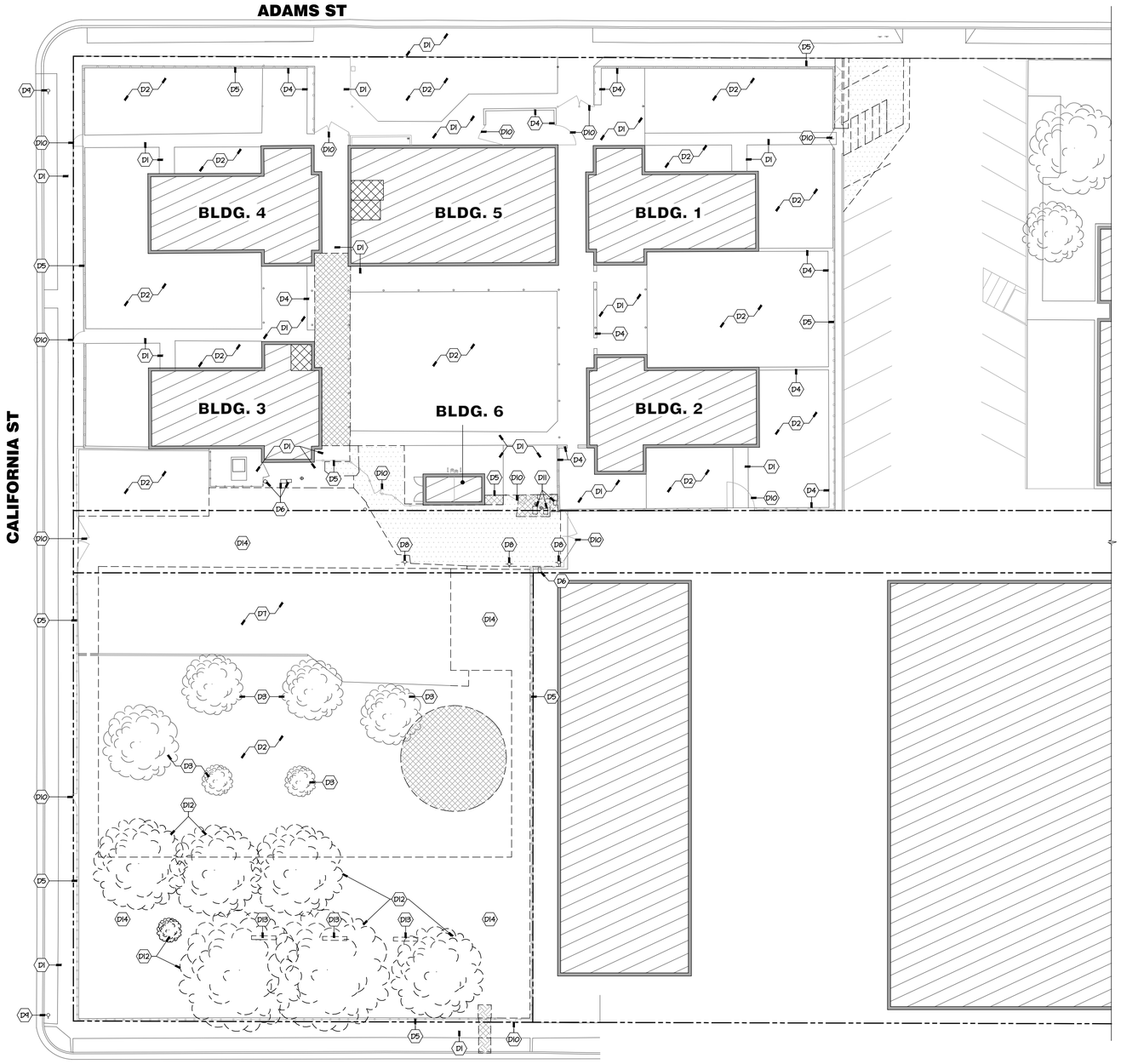
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TITLE
OVERALL SITE PLAN, LEGEND, & NOTES

SD1

PROJECT 23044



DEMOLITION PLAN LEGEND:

- EXISTING BUILDING
- EXIST. CONCRETE TO BE REMOVED
- EXIST. ASPHALT PAVING TO BE REMOVED
- PROPERTY LINE

DEMOLITION KEYNOTES:

- D1 EXIST. CONCRETE PAVING TO REMAIN
- D2 EXIST. TURF/ PLANTING TO REMAIN
- D3 EXIST. TREE TO REMAIN
- D4 EXIST. CONCRETE WALL TO REMAIN
- D5 EXIST. FENCING TO REMAIN
- D6 EXIST. IRRIGATION CONTROLS, SEE LANDSCAPE DWGS.
- D7 EXIST. PLAY AREA SURFACING TO REMAIN
- D8 EXIST. POWER POLE TO REMAIN, PROTECT, TYP.
- D9 EXIST. FIRE HYDRANT TO REMAIN, PROTECT, TYP.
- D10 EXIST. GATE TO REMAIN, PROTECT
- D11 EXIST. GAS & WATER METERS, SEE PLUMBING DWGS.
- D12 REMOVE EXIST. TREE
- D13 REMOVE EXIST. BENCH, SALVAGE TO OWNER
- D14 EXIST. TURF/PLANTER TO BE REMOVED

north

ENLARGED DEMO SITE PLAN

SCALE: 1" = 20'-0"

APPROVALS

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DATE: JANUARY 31, 2024

NEW TK CLASSROOM AT CHENEY KINDERGARTEN
COALINGA-HURON UNIFIED SCHOOL DISTRICT
COALINGA, FRESNO COUNTY, CA

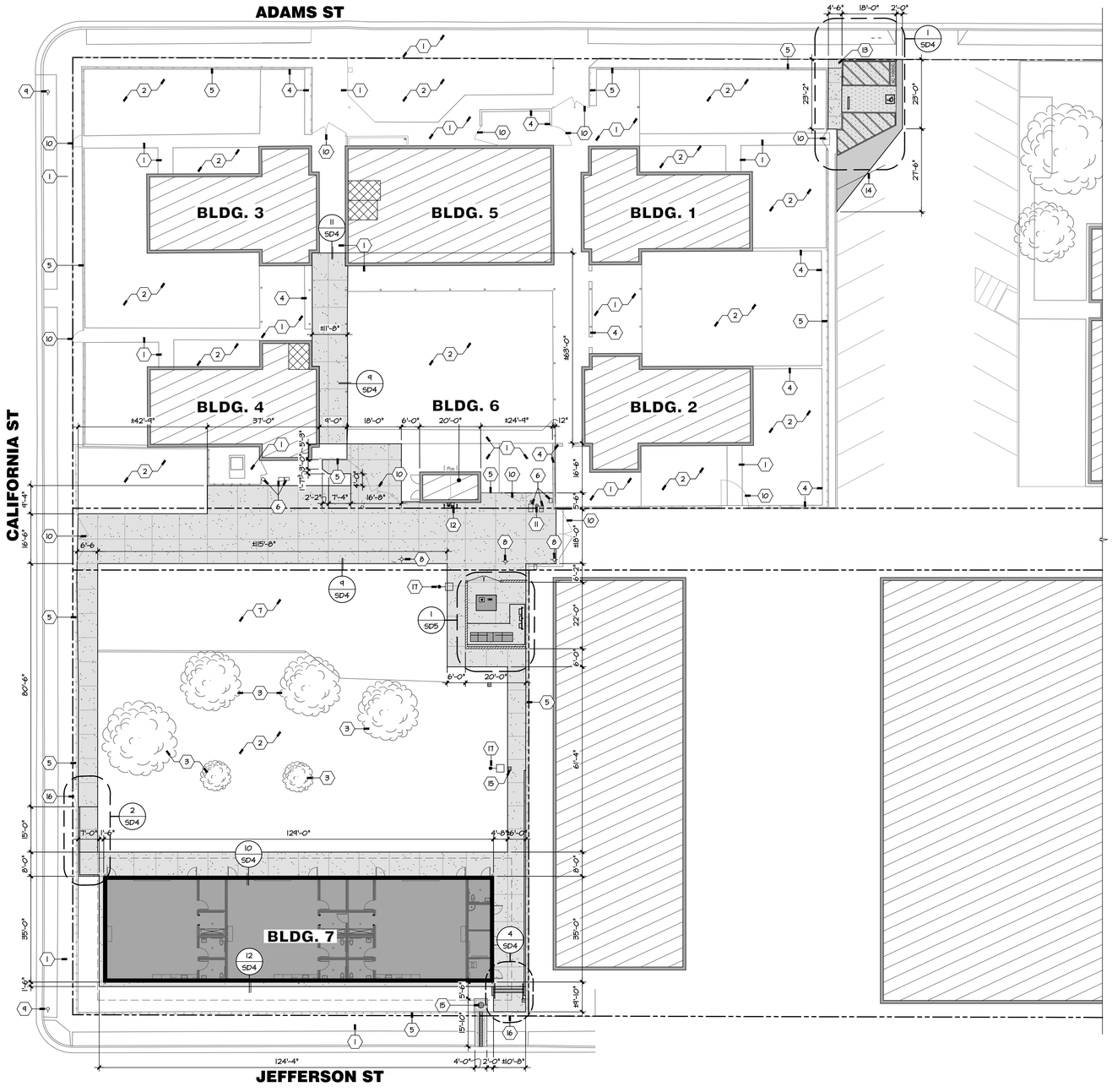
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TITLE
ENLARGED DEMO SITE PLAN

SD2

PROJECT 23044



ENLARGED SITE PLAN

SCALE: 1" = 20'-0"

SITE PLAN LEGEND:

- EXISTING BUILDING
- NEW BUILDING
- NEW 4" CONCRETE WALK, SEE 6/SD4
- NEW 4" CONCRETE OVER 4" AGGREGATE BASE, OVER 12" COMPACTED SUBGRADE
- PROPERTY LINE

SITE PLAN KEYNOTES

1. EXIST. CONCRETE PAVING TO REMAIN
2. EXIST. TURF/PLANTING TO REMAIN
3. EXIST. TREE TO REMAIN
4. EXIST. CONCRETE WALL TO REMAIN
5. EXIST. FENCING TO REMAIN
6. EXIST. IRRIGATION CONTROLS, SEE LANDSCAPE DWGS.
7. EXIST. PLAY AREA SURFACING TO REMAIN
8. EXIST. POWER POLE TO REMAIN, PROTECT, TYP.
9. EXIST. FIRE HYDRANT TO REMAIN, PROTECT, TYP.
10. EXIST. GATE TO REMAIN
11. EXIST. GAS & WATER METERS, SEE PLUMBING DWGS.
12. HI-LOW DRINKING FOUNTAIN, SEE 16/SD5
13. 36" WIDE TACTILE WARNING MAT, TYP., SEE 18/SD4
14. 4" WIDE WHITE PAINTED STRIPING, TYP.
15. DRAIN INLET, SEE CIVIL DWGS.
16. EXISTING 3'-0" WIDE ACCESS. GATE TO REMAIN, SEE 10/SD5
17. LIGHT POST, SEE ELECTRICAL

north

APPROVALS

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TITLE: ENLARGED SITE PLAN

SD3

PROJECT 23044

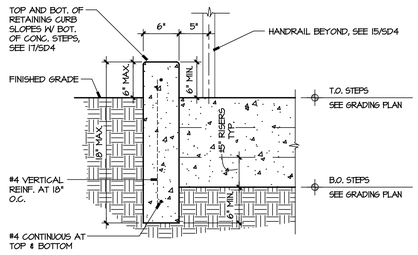
APPROVALS

FILE # 10-28 | APPLICATION # 02-122132

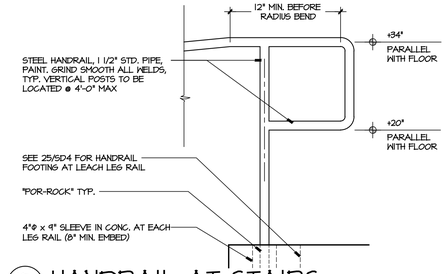
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DIV. OF THE STATE ARCHITECT
APP: 02-122132 INC:
REVIEWED FOR
SS ☑ FLS ☑ ACS ☑
DATE: 08/06/2024

LICENSED ARCHITECT
MICHAEL J. SCOTT JR.
No. C-34290
REN: 05-31-25
STATE OF CALIFORNIA

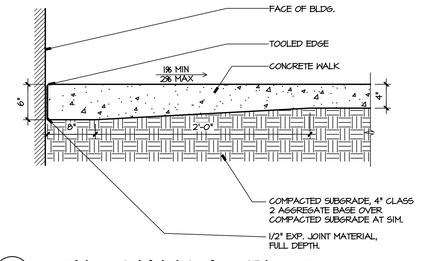
DATE: JANUARY 31, 2024



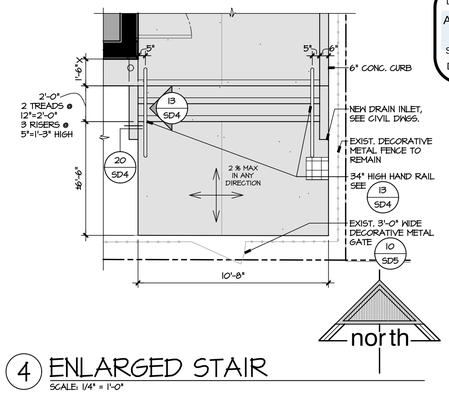
20 SECTION AT STAIRS
SCALE: 1" = 1'-0"



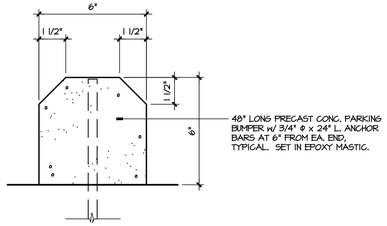
15 HANDRAIL AT STAIRS
SCALE: 1" = 1'-0"



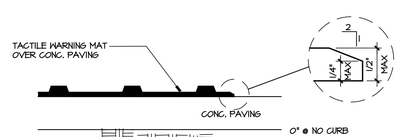
10 CONC. WALK AT BLDG.
SCALE: 1" = 1'-0"

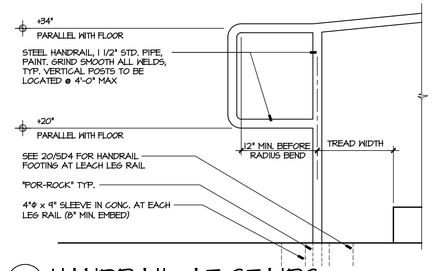


4 ENLARGED STAIR
SCALE: 1/4" = 1'-0"

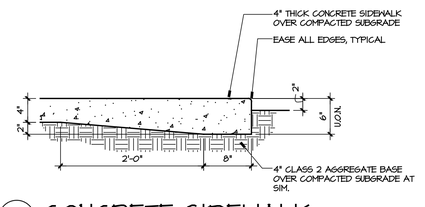


24 CONCRETE WHEEL STOP
SCALE: 3" = 1'-0"

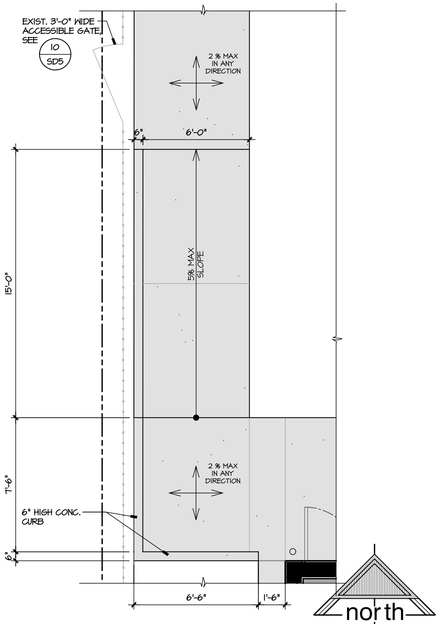




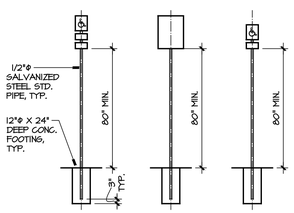
14 HANDRAIL AT STAIRS
SCALE: 1" = 1'-0"

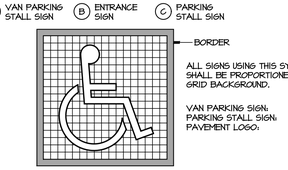


9 CONCRETE SIDEWALK
SCALE: 1" = 1'-0"



2 ENLARGED RAMP
SCALE: 1/4" = 1'-0"

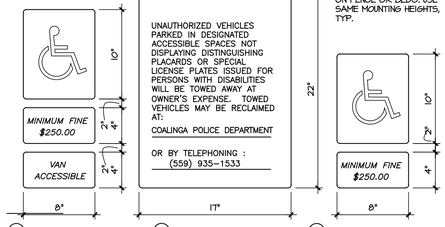




21 SITE SIGNAGE
SCALE 1/4" = 1'-0"

GENERAL NOTES:
1. SIGNS TO BE REFLECTORIZED AND EQUAL TO PORCELAIN ON STEEL WITH BEADED TEXT.
2. TEXT SHALL BE PROPORTIONED TO GIVEN OVERALL SIGN DIMENSIONS, SEE SIGN DESCRIPTIONS BELOW FOR SYMBOL OR TEXT.

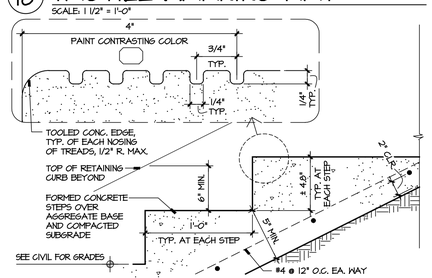
SIGN DESCRIPTIONS:



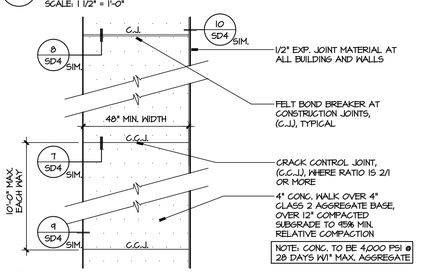
A VAN PARKING STALL SIGN — TOP SIGN TO BE TYPE © WITH SYMBOL OF ACCESSIBILITY & BOTTOM SIGN SHALL READ AS NOTED ABOVE.

B ENTRANCE SIGN — PER CBC 1129B.4, SIGN TO READ AS NOTED ABOVE:
NOTE : THE CONTRACTOR SHALL PROVIDE THE RECLAIM INFORMATION PRIOR TO FABRICATION OF THE PROPOSED SIGN. SIGN WILL NOT BE INSTALLED WITHOUT THE APPROPRIATE INFORMATION.

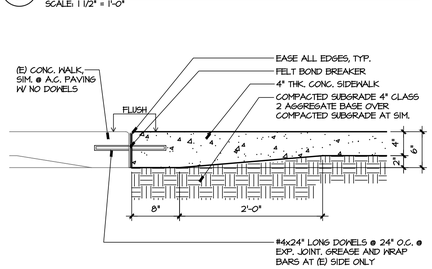
C CAR PARKING STALL SIGN — SIGN TO SHOW SYMBOL OF ACCESSIBILITY & TEXT SHALL READ "MINIMUM FINE $250"



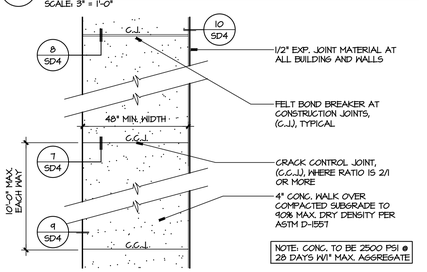
17 EXTERIOR STAIRS
SCALE: 1 1/2" = 1'-0"



12 CONCRETE MOWSTRIP
SCALE: 1 1/2" = 1'-0"

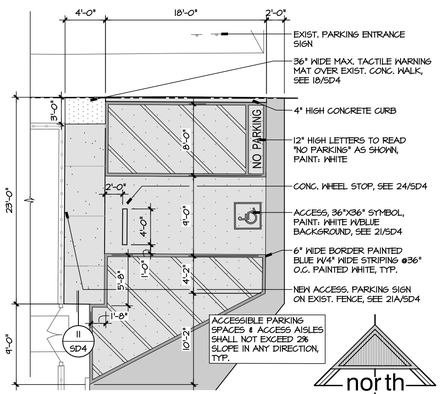


11 (N) CONC. WALK @ (E)
SCALE: 1" = 1'-0"



7 CRACK CONTROL JOINT (CCJ)
SCALE: 3" = 1'-0"

6 CONCRETE WALK
SCALE: 1/4" = 1'-0"



1 ACCESSIBLE PARKING
SCALE: 1/8" = 1'-0"

NEW TK CLASSROOM AT CHENEY KINDERGARTEN
COALINGA-HURON UNIFIED SCHOOL DISTRICT
COALINGA, FRESNO COUNTY, CA

REVISIONS

MANGINI ARCHITECTURE INGENUITY
MANGINI ASSOCIATES INC.
4330 West Mineral King Avenue
Visalia, California 93291
www.mangini.us
(559) 627-0530 Office
(559) 627-1926 Fax

TITLE: SITE DETAILS

SD4

PROJECT 23044

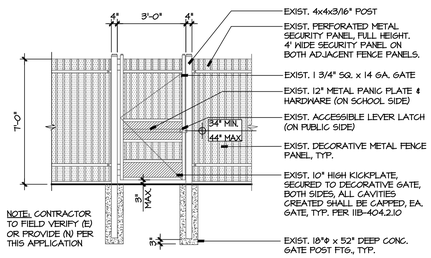
APPROVALS

FILE # 10-28 | APPLICATION # 02-122132

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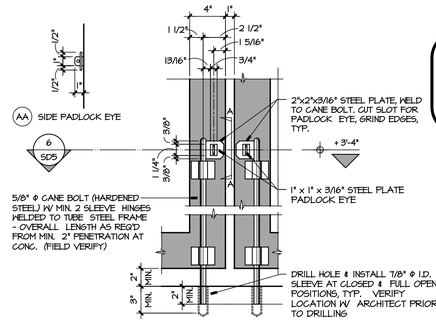
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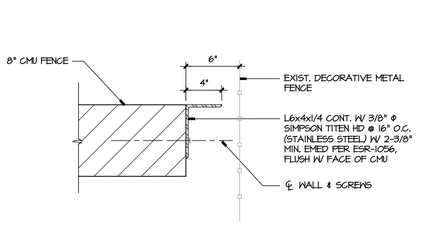
10 DECORATIVE MAN GATE

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



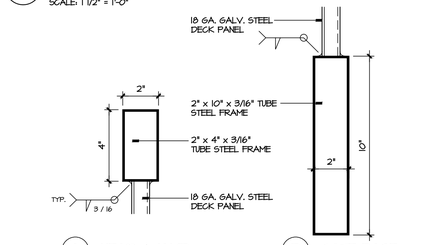
5 CANE BOLT LOCK ASSEMBLY

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



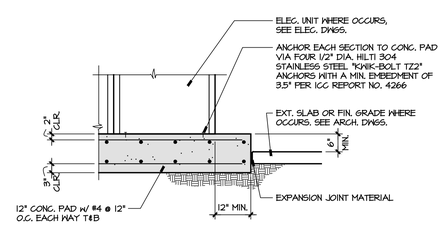
9 ST. STL. ANGLE @ CMU WALL

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



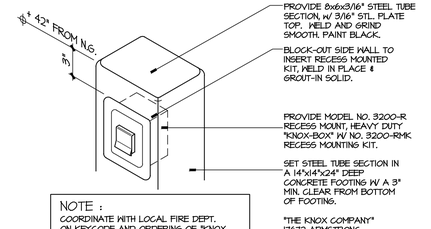
4 CMU ENCLOSURE GATE FRAME

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



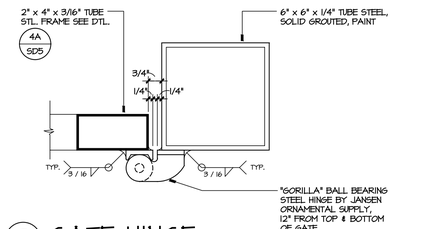
13 EQUIPMENT PAD

SCALE: N.T.S.



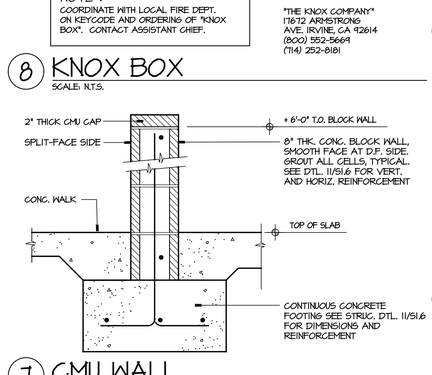
8 KNOX BOX

SCALE: N.T.S.



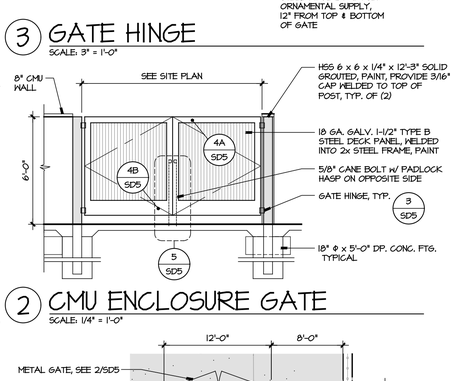
3 GATE HINGE

SCALE: 3" = 1'-0"



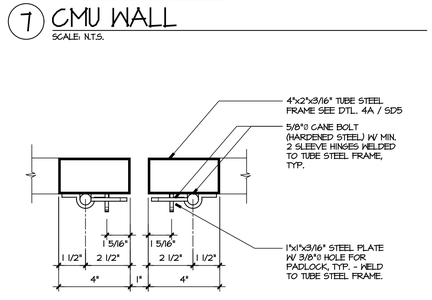
16 DRINKING FOUNTAIN

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



2 CMU ENCLOSURE GATE

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

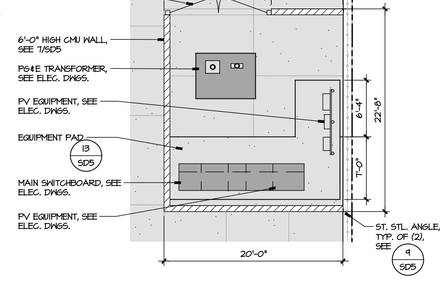


7 CMU WALL

SCALE: N.T.S.

6 CANE BOLT

SCALE: 3" = 1'-0"



1 ENLARGED CMU ENCLOSURE

SCALE: 1/8" = 1'-0"

NEW TK CLASSROOM AT CHENEY KINDERGARTEN

COALINGA-HURON UNIFIED SCHOOL DISTRICT

COALINGA, FRESNO COUNTY, CA

REVISIONS

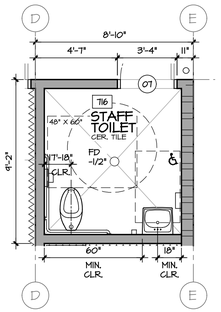
MANGINI ARCHITECTURE | INGENUITY.
MANGINI ASSOCIATES INC.
4320 West Mineral King Avenue
Visalia, California 93291
www.mangini.us
(559) 627.7639 Office
(559) 627.1926 Fax

TITLE: SITE DETAILS

SD5

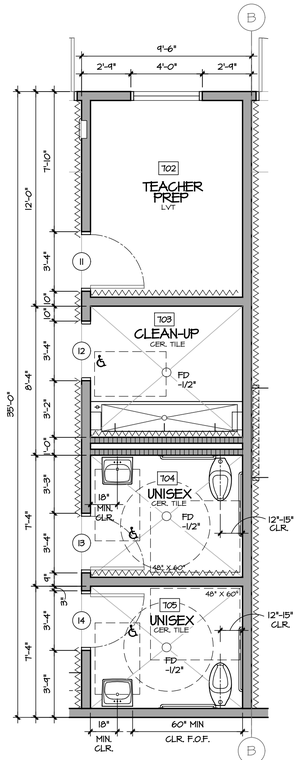
PROJECT 23044

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2 ENLARGED FLOOR PLAN

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



1 ENLARGED FLOOR PLAN

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

ENLARGED FLOOR PLAN NOTES

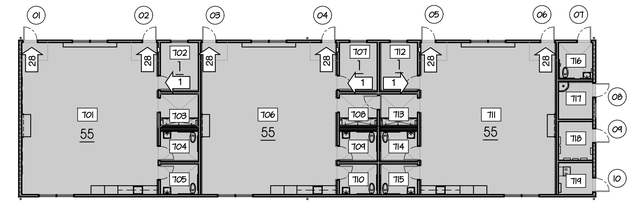
1. CONSTRUCT ALL WALLS PER ASSEMBLY DETAILS ON SHEET A4
2. REFER TO ELEVATIONS AND DOOR SCHEDULE FOR ALL ROOM AND BUILDING SIGNAGES.
3. FOR TYP. ACCESSIBLE MOUNTING HEIGHTS & REQ., SEE INTERIOR ELEVATIONS & DETAILS 16/A14 & 17/A14
4. FINISH ALL GYPSUM BOARD EDGES PER DETAIL 15/A14
5. DIMENSIONS ARE TO FACE OF PLYWOOD OR FACE OF STUD U.O.N.

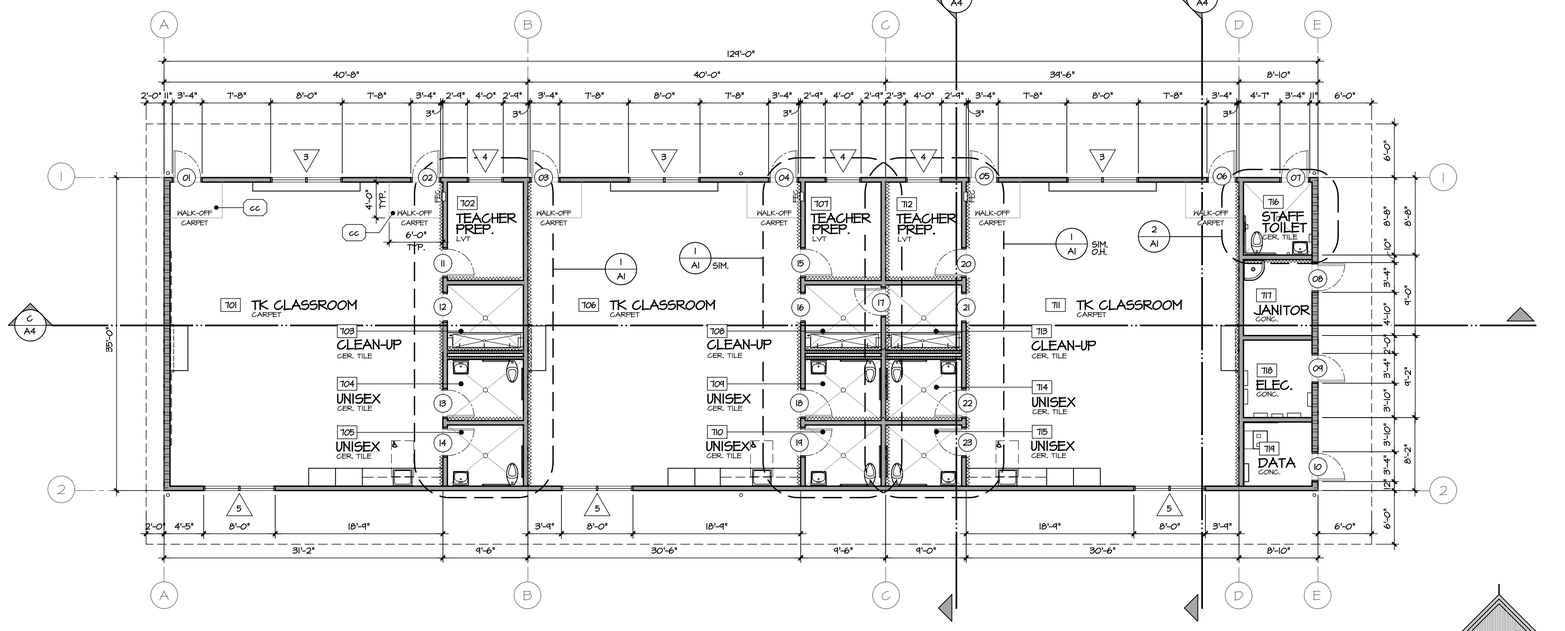
ENLARGED FLOOR PLAN LEGEND

- 2 x 4 WOOD STUDS @ 16" O.C.
- 2 x 6 WOOD STUDS @ 16"O.C.
- 2 x 8 WOOD STUDS @ 16"O.C.
- SOUND ATTENUATION BATT INSULATION (FULL HGT)
- INDICATES 30"x48" CLEAR FLOOR SPACE
- 5'-0" INDICATES 5' DIAMETER M.C. ROTATION SPACE

EXIT ANALYSIS

BLDG.	ROOM #	NAME	AREA (SF)	SQ FT. / OCCUP.	# OCCUPANTS	TOTAL # OCCUPANTS	NUMBER OF REQUIRED EXITS CBC 1006	NUMBER OF PROVIDED EXITS	EGRESS WIDTH PER OCCUPANT SERVED CBC 1005.1	EXIT #	# OF OCC. THROUGH EXIT	REQ. EXIT WIDTH CALCULATION	EXIT WIDTH PROVIDED	DOOR ID #
		CALCULATED OCCUPANTS OF PRIMARY SPACES WITH ACCESSORY OCCUPANTS EXITING THROUGH CBC 1004.5					EXITING CALCULATIONS OF SPACES			EGRESS WIDTH CALCULATIONS				
BUILDING 7	101	TK CLASSROOM	1,042	20	55	56	56 > 50 = 2 EXIT REQ.	2	.20 PER OCC.	EXIT 1 & 2	56 / 2 = 28	28 x 0.20 =5.6"	36"	1 & 2
	102	TEACHER PREP.	94	100	1	1								
	103	CLEAN-UP	63	ACCESSORY										
	104	UNISEX	52	ACCESSORY										
	105	UNISEX	52	ACCESSORY										
	106	TK CLASSROOM	1,042	20	55	56	56 > 50 = 2 EXIT REQ.	2	.20 PER OCC.	EXIT 1 & 2	56 / 2 = 28	28 x 0.20 =5.6"	36"	3 & 4
	107	TEACHER PREP.	94	100	1	1								
	108	CLEAN-UP	63	ACCESSORY										
	109	UNISEX	52	ACCESSORY										
	110	UNISEX	52	ACCESSORY										
	111	TK CLASSROOM	1,042	20	55	56	56 > 50 = 2 EXIT REQ.	2	.20 PER OCC.	EXIT 1 & 2	56 / 2 = 28	28 x 0.20 =5.6"	36"	5 & 6
	112	TEACHER PREP.	94	100	1	1								
	113	CLEAN-UP	63	ACCESSORY										
	114	UNISEX	52	ACCESSORY										
	115	UNISEX	52	ACCESSORY										
	116	STAFF TOILET	64	ACCESSORY										
	117	JANITOR	61	100	1	1	1 > 50 = 1 EXIT REQ.	1	.20 PER OCC.	EXIT 1	1 / 1 = 1	1 x 0.20 =0.20"	36"	07
	118	ELECTRICAL	62	ACCESSORY										
	119	DATA	51	ACCESSORY										





FLOOR PLAN

SCALE: 1/8" = 1'-0"

FLOOR LEGEND

- 2 x 4 WOOD STUDS @ 16" O.C.
- 2 x 6 WOOD STUDS @ 16" O.C.
- 2 x 8 WOOD STUDS @ 16" O.C.
- SOUND ATTENUATION BATT INSULATION (FULL HGT)
- INDICATES 30"x48" CLEAR FLOOR SPACE

GENERAL FLOOR PLAN NOTES:

1. DIMENSIONS ARE TO FACE OF PLYWOOD OR FACE OF STUD U.O.N.
2. REFER TO THIS SHEET FOR EXIT ANALYSIS
3. CONSTRUCT ALL WALLS PER ASSEMBLY DETAILS ON SHEET A4
4. REFER TO ELEVATIONS AND DOOR SCHEDULE FOR ALL ROOM AND BUILDING SIGNAGES
5. FOR TYPICAL ACCESSIBLE MOUNTING HEIGHTS AND REQUIREMENTS, SEE INTERIOR ELEVATIONS AND DETAILS 16/A14 & 17/A14
6. FINISH ALL GYPSUM BOARD EDGES PER DETAIL 15/A14
7. FOR FIRE EXTINGUISHERS, SEE 20/A14
8. (#) = MATERIAL DEFINITION, SEE FINISH SCHEDULE
9. SOUND INSULATION & THERMAL INSULATION SHALL RUN FULL HEIGHT OF WALL. INSULATION LOCATED WHERE SHOWN ON WALL ASSEMBLIES, SHEET A9
10. FOR WALL PENETRATIONS OF PIPE OR CONDUIT, REFER TO DETAIL 25/A14

APPROVALS

FILE # 10-28 | APPLICATION # 02-122132

IDENTIFICATION STAMP
DIV. OF THE STATE ARCHITECT
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SS ☑ FLS ☑ ACS ☑
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LICENSED ARCHITECT
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No. C-34290
REN: 05-31-25
STATE OF CALIFORNIA

DATE: JANUARY 31, 2024

NEW TK CLASSROOM AT CHENEY KINDERGARTEN

COALINGA-HURON UNIFIED SCHOOL DISTRICT

COALINGA, FRESNO COUNTY, CA

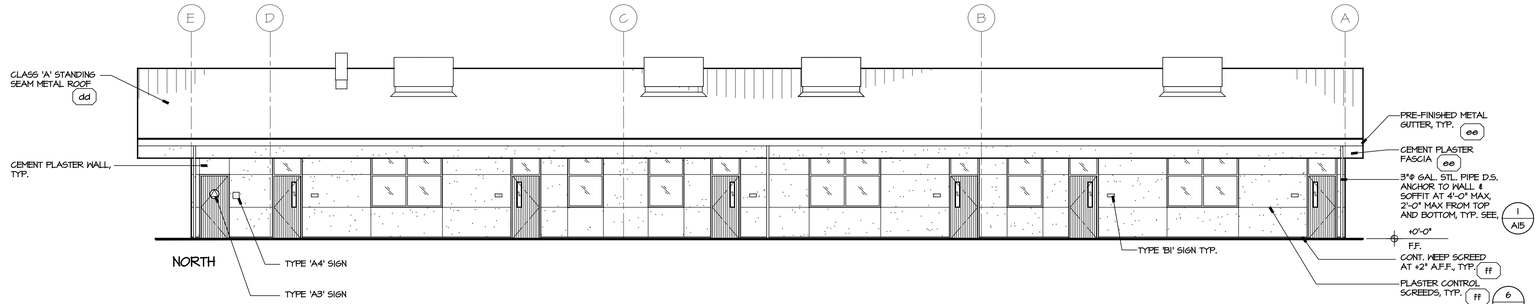
REVISIONS

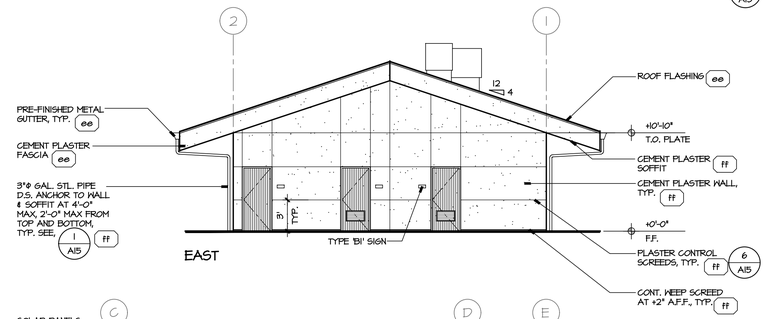
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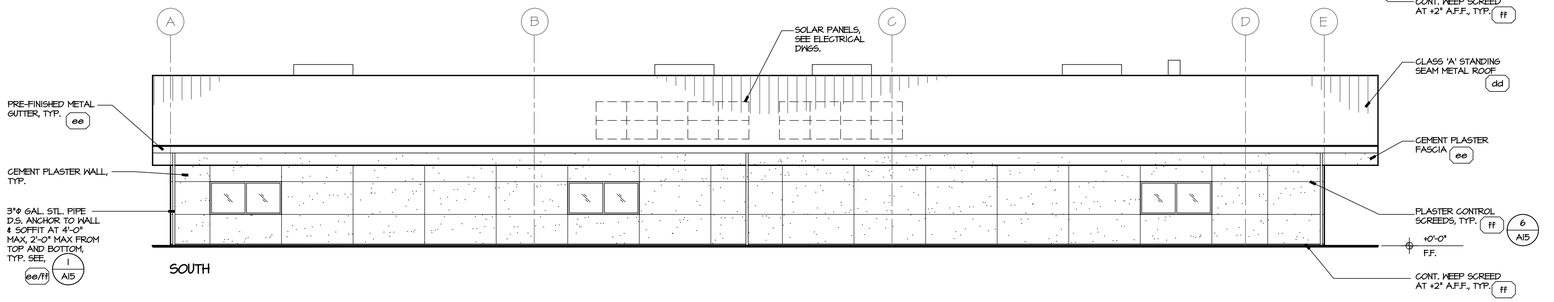
TITLE
FLOOR PLAN, EXIT ANALYSIS, & ENLARGED FLOOR PLAN

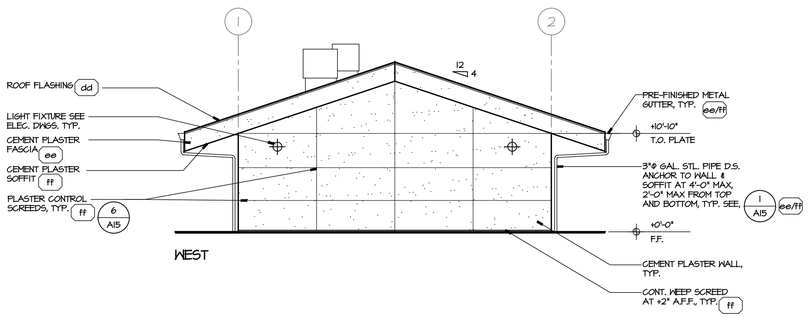
A1

PROJECT 23044









ELEVATION NOTES

1. REFER TO DOOR SCHEDULE & DETAIL 1/A10 FOR SIGNAGE INFORMATION
2. FOR WALL ASSEMBLIES, SEE SHEET A9

EXTERIOR ELEVATIONS

1/8" = 1'-0"

APPROVALS

FILE # 10-28 | APPLICATION # 02-122132

IDENTIFICATION STAMP
DIV. OF THE STATE ARCHITECT
APP: 02-122132 INC:
REVIEWED FOR
SS ☑ FLS ☑ ACS ☑
DATE: 08/06/2024

LICENSED ARCHITECT
MICHAEL J. SCOTT JR.
No. C-34290
REN: 05-31-25
STATE OF CALIFORNIA

DATE: JANUARY 31, 2024

NEW TK CLASSROOM AT CHENEY KINDERGARTEN

COALINGA-HURON UNIFIED SCHOOL DISTRICT
COALINGA, FRESNO COUNTY, CA

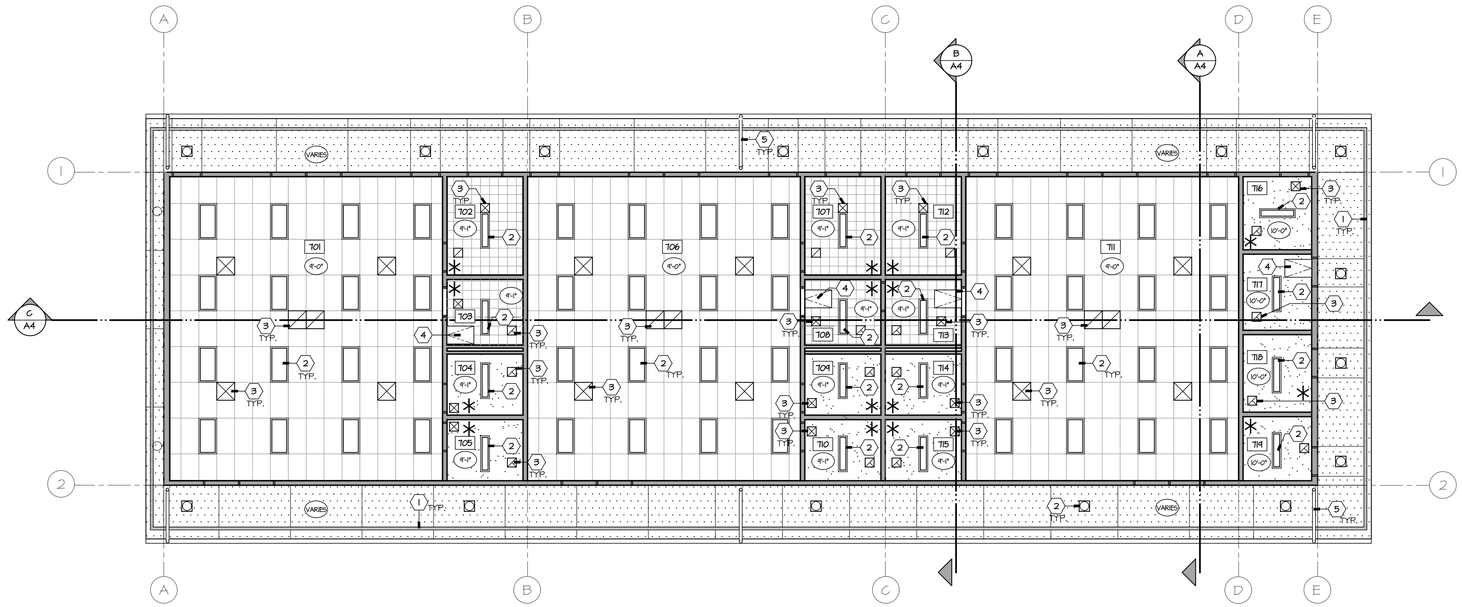
REVISIONS

MANGINI ARCHITECTURE INGENUITY
MANGINI ASSOCIATES INC.
4320 West Mineral King Avenue
Visalia, California 93291
www.mangini.us
(559) 627.0530 Office
(559) 627.1926 Fax

TITLE
EXTERIOR ELEVATIONS

A2

PROJECT 23044



REFLECTED CEILING PLAN LEGEND

- TAPED, TEXTURED AND PAINTED TYPE 'X' 5/8" THICK GYP. BD.
- CEMENT PLASTER SYSTEM (II / A15)
- 24" x 48" SUSP. LAY-IN CEILING SYSTEM (6 / A14)
- 12" X 12" GLUE UP TILE o/ 5/8" THICK TYPE 'X' GYP. BD.
- ASTERISK INDICATES 3 1/2" SOUND INSULATION BATTS ABOVE CEILING, TYP.
- (XX'-X") INDICATES HEIGHT OF FINISH CEILING AS MEASURED ABOVE FIN. FLOOR BELOW

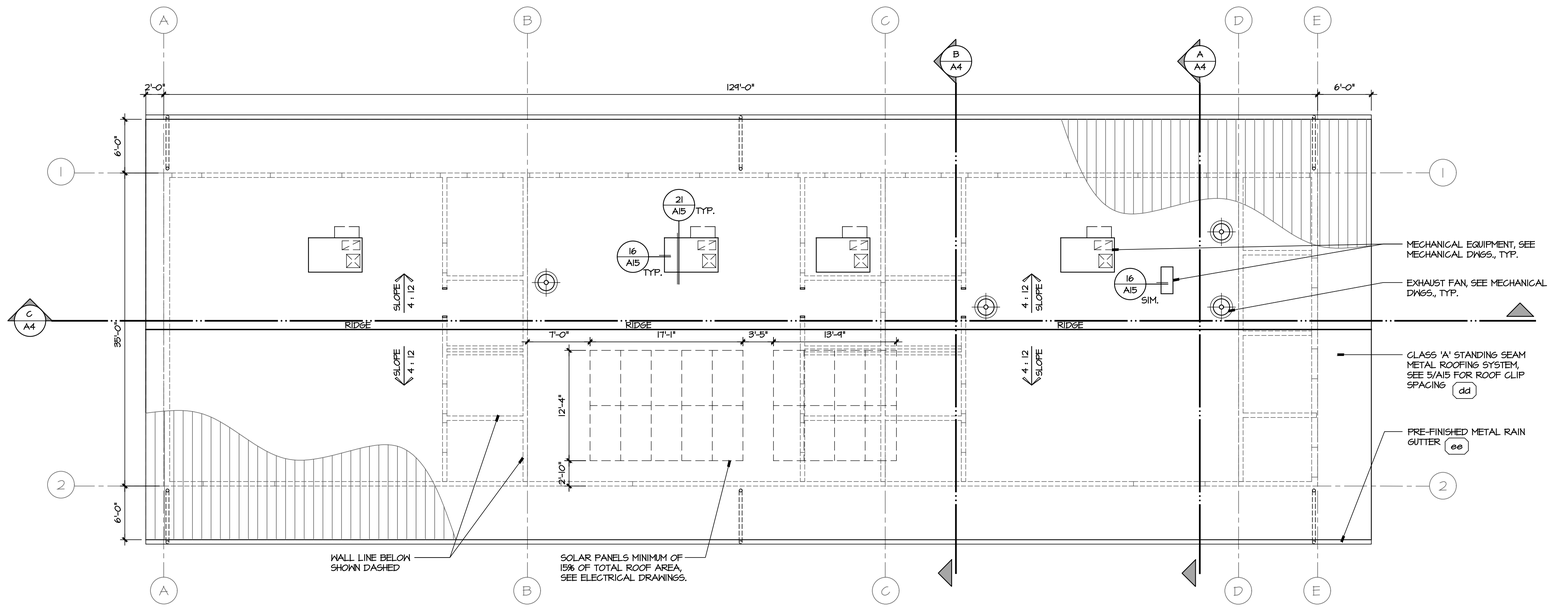
REFLECTED CEILING PLAN KEYNOTES

1. 4" CONTINUOUS SOFFIT VENT, TYP. PAINT (s)
2. LIGHT FIXTURE AS SHOWN, SEE ELECTRICAL DWGS.
3. AIR REGISTER AS SHOWN, SEE MECHANICAL DWGS.
4. ATTIC ACCESS, SEE (21 / A14)
5. DOWNSPOUT PIPE, SEE PLUMBING DWGS.

north

REFELECTED CEILING PLAN

1/8" = 1'-0"



north

ROOF PLAN

1/8" = 1'-0"

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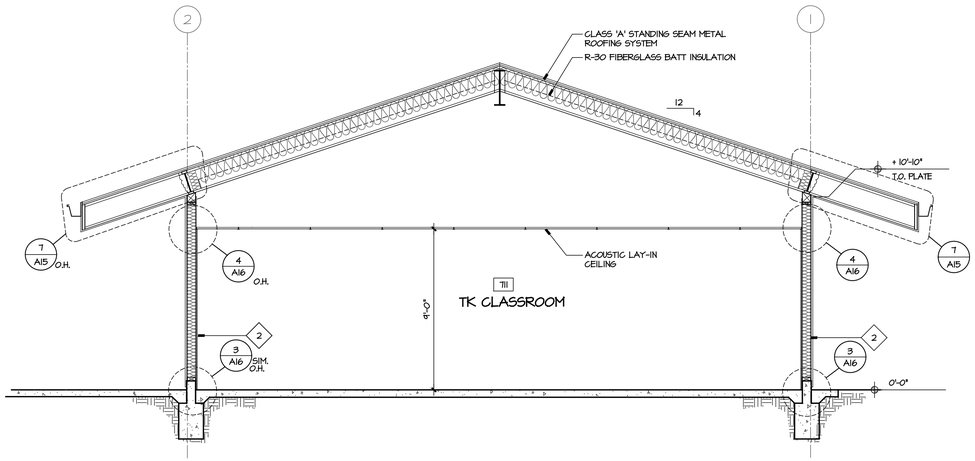
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REFLECTED CEILING PLAN & ROOF PLAN

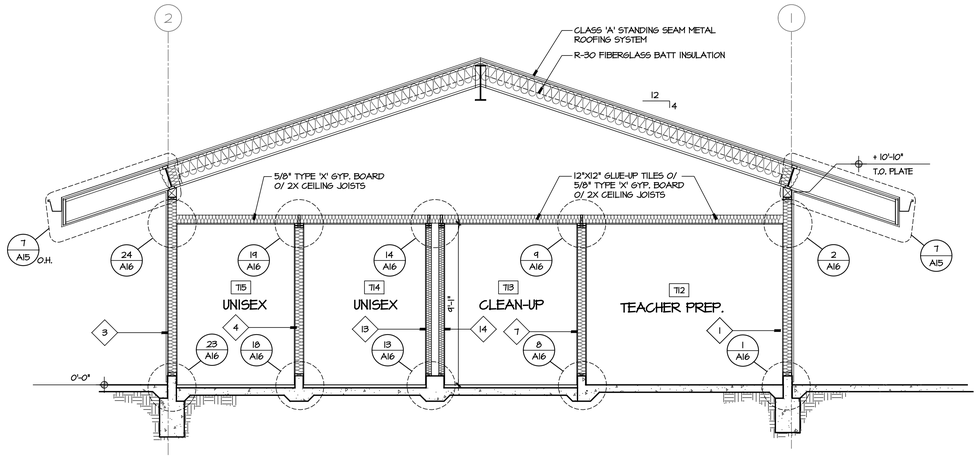
A3

PROJECT 23044



A BUILDING SECTION

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



B BUILDING SECTION

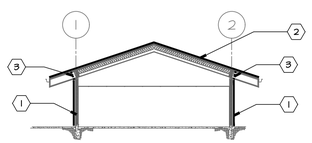
SCALE: 1/4" = 1'-0"

AIR BARRIER SECTION KEYNOTES

1. CEMENT PLASTER & PLYWOOD AS AIR BARRIER
2. STANDING SEAM METAL ROOFING UNDERLAYMENT
3. FOAM-IN-PLACE INSULATION TO COMPLETE AIR BARRIER

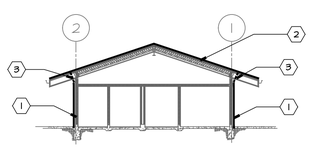
AIR BARRIER SECTION NOTES

1. BRIDGE AND SEAL AIR LEAKAGE PATHWAYS AND GAPS, INCLUDING, BUT NOT LIMITED TO:
   - -CONNECTIONS OF THE WALLS TO THE ROOF AIR BARRIER
   - -CONNECTIONS OF THE WALLS TO THE FOUNDATIONS
   - -SEISMIC AND EXPANSION JOINTS
   - -OPENINGS AND PENETRATIONS OF WINDOW AND DOOR FRAMES, STORE FRONT, CURTAIN WALL
   - -PIPING, CONDUIT, DUCT, AND SIMILAR PENETRATIONS
   - -MASONRY TIES, SCREWS, BOLTS, AND SIMILAR PENETRATIONS
   - -FLASHING AND SHEET METAL ASSEMBLIES
   - -ALL OTHER AIR LEAKAGE PATHWAYS IN THE BUILDING ENVELOPE
2. REFER TO OT 2100 AIR BARRIER SYSTEM FOR ADDITIONAL REQUIREMENTS



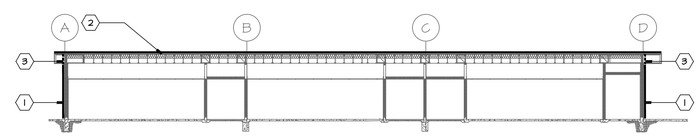
A AIR BARRIER SECTION

SCALE: 1/16" = 1'-0"



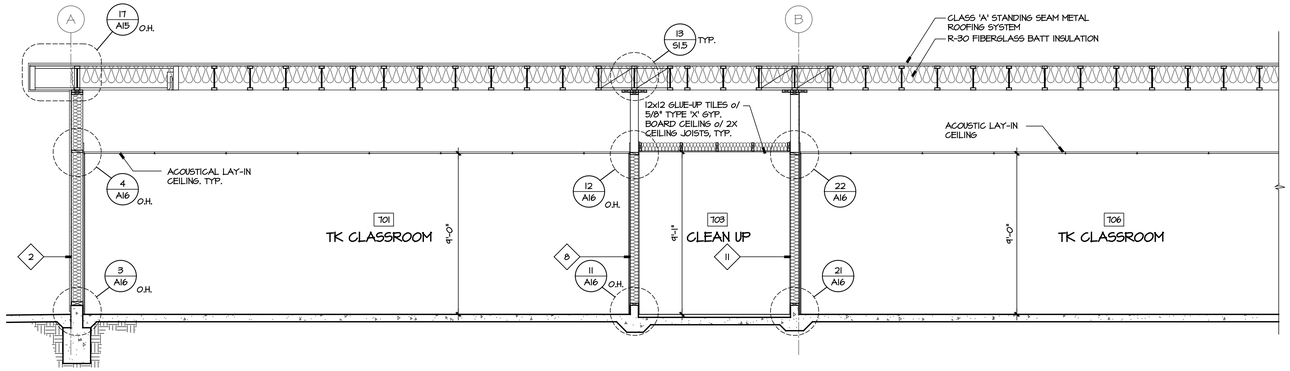
B AIR BARRIER SECTION

SCALE: 1/16" = 1'-0"



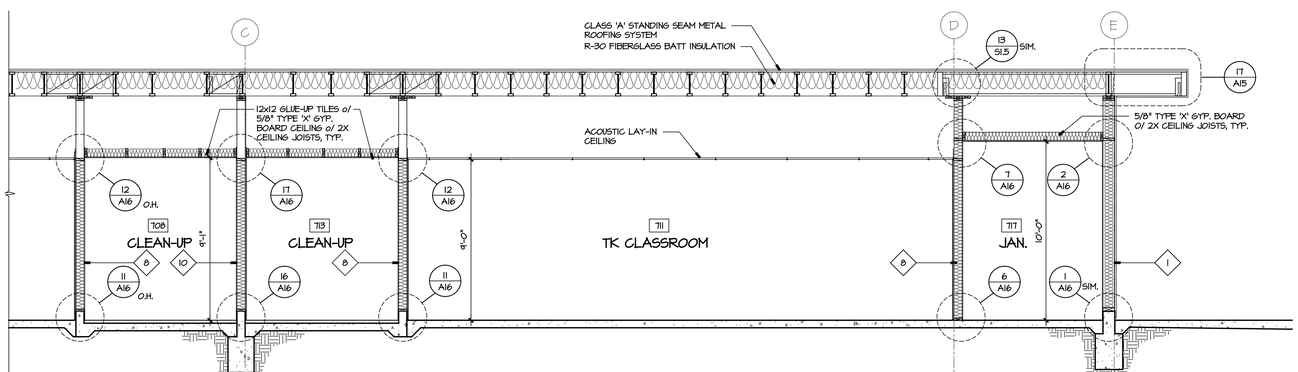
C AIR BARRIER SECTION

SCALE: 1/16" = 1'-0"



C BUILDING SECTION

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



C BUILDING SECTION (CONT'D.)

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

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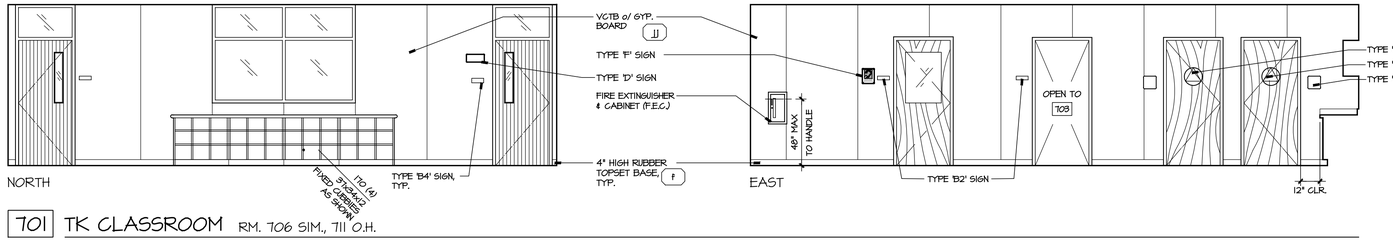
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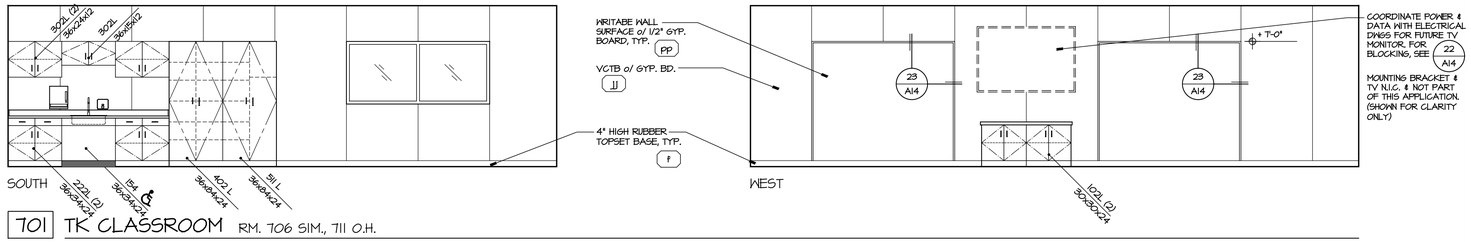
TITLE
SECTIONS & AIR BARRIER SECTIONS

A4

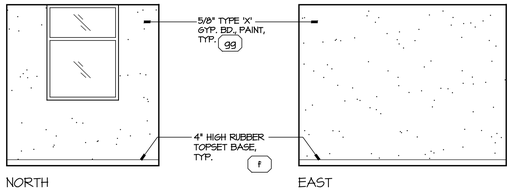
PROJECT 23044

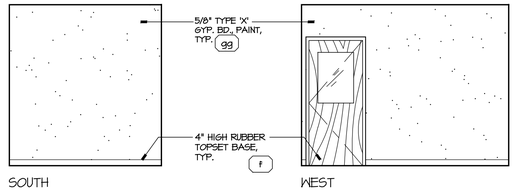


701 TK CLASSROOM RM. 706 SIM., 711 O.H.

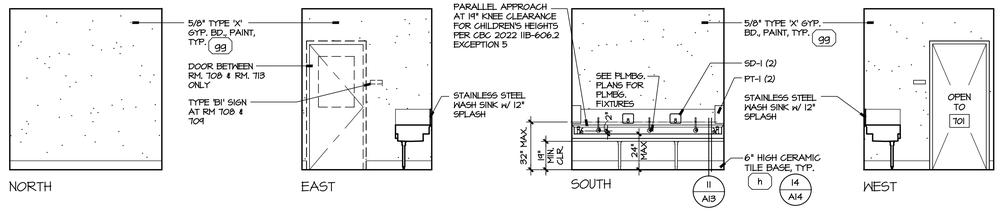


701 TK CLASSROOM RM. 706 SIM., 711 O.H.





702 TEACHER PREP. RM. 707 SIM., 712 O.H.



703 CLEAN-UP RM. 708 SIM., 713 O.H.

INTERIOR ELEVATION NOTES

1. (#) = MATERIAL DEFINITION REFER TO SHEET A8
2. REFER TO FINISH SCHEDULE SHEET A8 FOR DESIGNATION OF FINISHES.
3. REFER TO 16/A14 & 17/A14 FOR TYPICAL ACCESSIBLE MOUNTING HEIGHTS AND REQUIREMENTS, U.O.N.
4. REFER TO SPECIFICATIONS FOR TOILET ACCESSORY ABBREVIATIONS.
5. REFER TO 5/A13 FOR TYPICAL COUNTERTOP AND BACKSPLASH DETAILS, U.O.N.
6. REFER TO 1/A13 FOR TYPICAL CABINET AND SHELVING ANCHORAGE.
7. FOR ACCESSIBLE LAVATORY, SEE DETAILS 18/A14 & 19/A14
8. SEE 1/A10 AND DOOR SCHEDULE FOR TYPICAL DOOR SIGNAGE.
9. REFER TO 15/A14 FOR TYPICAL GYPSUM BOARD EDGE DETAILS.
10. SEE 20/A14 FOR RECESSED FIRE EXTINGUISHER CABINET INFORMATION.
11. SEE 24/A14 FOR TYPICAL GRAB BAR ANCHORAGE.
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15. OPEN KNEE SPACE AT WORK STATIONS TO HAVE NO SHARP OR ABRASIVE EDGES UNDER COUNTER.

INTERIOR ELEVATIONS

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

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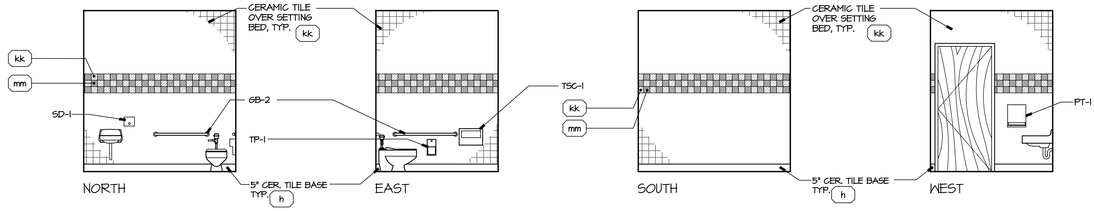
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TITLE
INTERIOR ELEVATIONS

A5

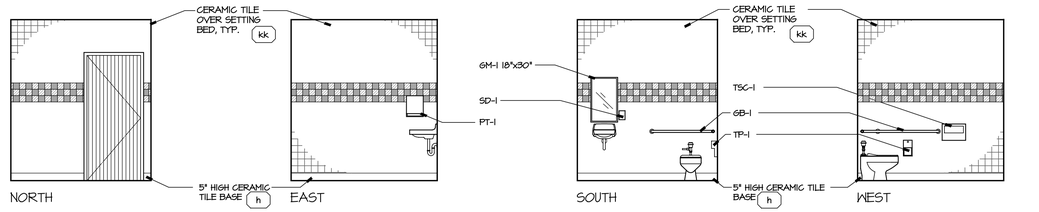
PROJECT 23044



704 UNISEX (AGES 5 THROUGH 8)

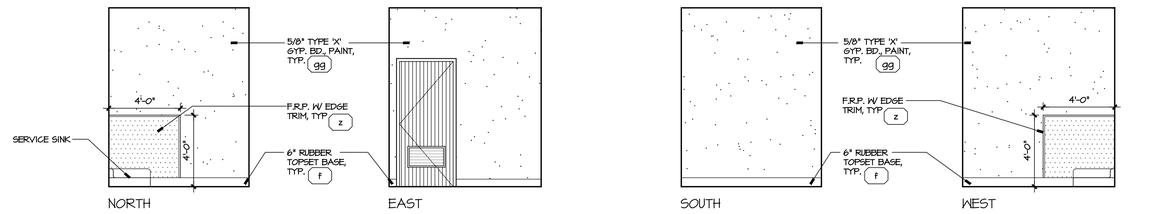
RM. 709, 715 SIM
RM. 705, 710, 714 O.H.

REFER TO I6 / A14 FOR TYPICAL ACCESSIBLE MOUNTING HEIGHTS AND REQUIREMENTS U.O.N.

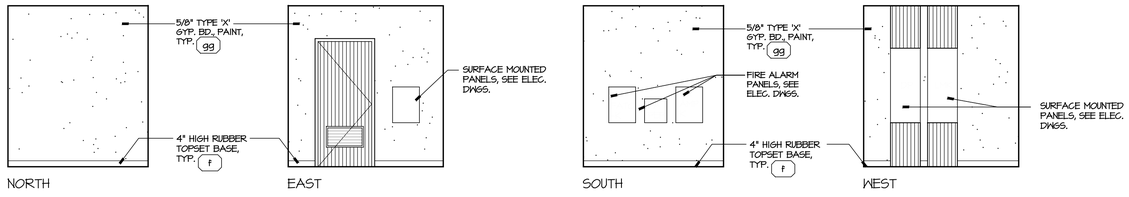


716 STAFF TOILET (ADULT)

REFER TO I7/A14 FOR TYPICAL ACCESSIBLE MOUNTING HEIGHTS AND REQUIREMENTS, U.O.N.



717 JANITOR



718 ELECTRICAL

INTERIOR ELEVATION NOTES

1. (#) = MATERIAL DEFINITION REFER TO SHEET A8
2. REFER TO FINISH SCHEDULE SHEET A8 FOR DESIGNATION OF FINISHES.
3. REFER TO I6/A14 & I7/A14 FOR TYPICAL ACCESSIBLE MOUNTING HEIGHTS AND REQUIREMENTS, U.O.N.
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INTERIOR ELEVATIONS

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

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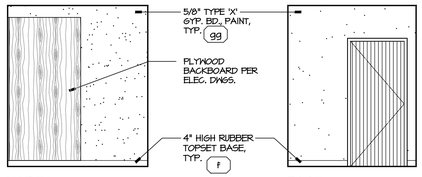
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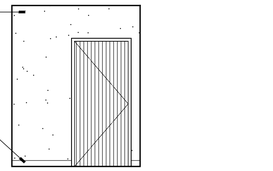
TITLE
INTERIOR ELEVATIONS

A6

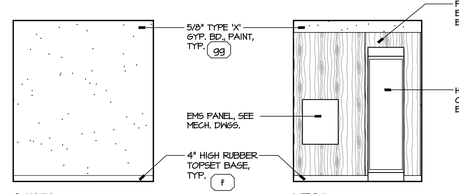
PROJECT 23044



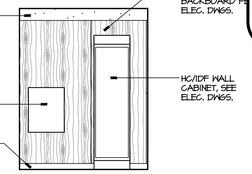
NORTH



EAST



SOUTH



WEST

719 DATA

INTERIOR ELEVATION NOTES

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TITLE
INTERIOR ELEVATIONS

A7

PROJECT 23044

INTERIOR ROOM FINISH SCHEDULE

BLDG.	ROOM NUMBER & NAME	FLOOR		BASE		WAIN-SCOT		WALLS								CEILING		REMARKS:	COUNTER TOPS		MILLWORK				REMARKS:
								NORTH		EAST		SOUTH		WEST							LOWER		UPPER		
		MAT'L	FIN.	MAT'L	FIN.	MAT'L	FIN.	MAT'L	FIN.	MAT'L	FIN.	MAT'L	FIN.	MAT'L	FIN.	MAT'L	FIN.		MAT'L	FIN.	MAT'L	FIN.	MAT'L	FIN.	
NEW TK CLASSROOM	101 TK CLASSROOM	11	b/cc	20	f	-	-	43	jj	43	jj	43	jj	43/44	jj/pp	50	a	9'-0"							
	102 TEACHER PREP.	13	oo	20	f	-	-	40	gg	40	gg	40	gg	40	gg	51	a	9'-1"							
	103 CLEAN-UP	12	h	23	h	-	-	40	gg	40	gg	40	gg	40	gg	51	a	9'-1"							
	104 UNISEX	12	h	22	h	_	_	41	kk/mm	41	kk/mm	41	kk/mm	41	kk/mm	52	gg	9'-1"	REFER TO INTERIOR ELEVATIONS FOR WALL TILE PATTERN						
	105 UNISEX	12	h	22	h	_	_	41	kk/mm	41	kk/mm	41	kk/mm	41	kk/mm	52	gg	9'-1"	REFER TO INTERIOR ELEVATIONS FOR WALL TILE PATTERN						
	106 TK CLASSROOM	11	b/cc	20	f	-	-	43	jj	43	jj	43	jj	43/44	jj/pp	50	a	9'-0"							
	107 TEACHER PREP.	13	oo	20	f	-	-	40	gg	40	gg	40	gg	40	gg	51	a	9'-1"							
	108 CLEAN-UP	12	h	23	h	-	-	40	gg	40	gg	40	gg	40	gg	51	a	9'-1"							
	109 UNISEX	12	h	22	h	-	-	41	kk/mm	41	kk/mm	41	kk/mm	41	kk/mm	52	gg	9'-1"	REFER TO INTERIOR ELEVATIONS FOR WALL TILE PATTERN						
	110 UNISEX	12	h	22	h	-	-	41	kk/mm	41	kk/mm	41	kk/mm	41	kk/mm	52	gg	9'-1"	REFER TO INTERIOR ELEVATIONS FOR WALL TILE PATTERN						
	111 TK CLASSROOM	11	b/cc	20	f	-	-	43	jj	43/44	jj/pp	43	jj	43	jj	50	a	9'-0"							
	112 TEACHER PREP.	13	oo	20	f	-	-	40	gg	40	gg	40	gg	40	gg	51	a	9'-1"							
	113 CLEAN-UP	12	h	23	h	-	-	40	gg	40	gg	40	gg	40	gg	51	a	9'-1"							
	114 UNISEX	12	h	22	h	-	-	41	kk/mm	41	kk/mm	41	kk/mm	41	kk/mm	52	gg	9'-1"	REFER TO INTERIOR ELEVATIONS FOR WALL TILE PATTERN						
	115 UNISEX	12	h	22	h	-	-	41	kk/mm	41	kk/mm	41	kk/mm	41	kk/mm	52	gg	9'-1"	REFER TO INTERIOR ELEVATIONS FOR WALL TILE PATTERN						
	116 STAFF TOILET	12	h	22	h	-	-	41	kk/mm	41	kk/mm	41	kk/mm	41	kk/mm	52	gg	9'-0"	REFER TO INTERIOR ELEVATIONS FOR WALL TILE PATTERN						
	117 JANITOR	10	a	21	f	-	-	40/42	gg	40	gg/z	40	gg/z	40/42	gg	52	gg	10'-0"							
	118 ELECTRICAL ROOM	10	a	20	f	-	-	40	gg	40	gg	40	gg	40	gg	52	gg	9'-0"							
	119 DATA	10	a	20	f	-	-	40	gg	40	gg	40	gg	40	gg	52	gg	9'-0"							

FINISHES

- a — REFER TO SPECIFICATIONS FOR MATERIAL / COLOR DESIGNATION
- b — 'TARKETT' APPLAUSE III #02803-MOSAIC 28502, 24" X 24" TILES, POWERBOND
- c — NOT USED
- d — NOT USED
- e — NOT USED
- f — 'ROPPE' PINNACLE- TYPE TS #110 BROWN
- g — NOT USED
- h — 'DAL TILE' KEYSTONE 2 X 2 #D147 BUFFSTONE RANGE WITH CUSTOM BUILD. PRISM GROUT #10 ANTIQUE WHITE
- i — NOT USED
- j — NOT USED
- k — NOT USED
- m — NOT USED
- p — 'WILSONART' #10734-60 LIMBER MAPLE
- q — 'WILSONART' #4674-60 EVENING TIGRIS
- r — NOT USED
- s — NOT USED
- t — NOT USED
- u — NOT USED
- v — NOT USED
- w — NOT USED
- x — NOT USED
- z — 'GLASBORD' FRP #84 IVORY, CLASS C FIRE-RATED
- bb — NOT USED
- cc — 'TARKETT'- ABRASIVE ACTION II #02578- CORK 19107-24" X 24" TILE-QUARTER TURN INSTALLATION
- dd — 'METAL SALES' KYNAR #N12 TERRA COTTA
- ee — 'SHERWIN WILLIAMS' #SW 7548 SIERRA REDWOOD
- ff — 'SHERWIN WILLIAMS' #SW 9111 ANTLER VELVET
- gg — 'SHERWIN WILLIAMS' #SW 7571 CASA BLANCA
- hh — 'SHERWIN WILLIAMS' #SW 7020 BLACK FOX
- jj — 'CHATFIELD AND CLARKE'-KASPER
- kk — 'DAL TILE' 4-1/4 X 4-1/4 #0100 WHITE WITH CUSTOM BUILD. PRISM GROUT #381 BRIGHT WHITE
- mm — 'DAL TILE' 4-1/4 X 4-1/4 #0166 ELEMENTAL TAN WITH CUSTOM BUILD. PRISM GROUT #381 BRIGHT WHITE
- oo — 'SHAW CONTRACT-CROSSING PATHS 5.0 STYLE #43912V COLOR-SPINDLE #41140- 18" X 18" TILE- MONOLITHIC INSTALLATION
- pp — 'KOROSEAL' WALLTALKERS MAG-RITE, WHITE #M248

MATERIALS

FLOOR
- 10 CONCRETE, SEALED
- 11 CARPET
- 12 2" SQUARE CERAMIC MOSAIC TILE
- 13 LVT

BASE
- 20 4" RUBBER TOPSET
- 21 6" RUBBER TOPSET
- 22 5" H. 2" X 2" COVED CERAMIC MOSAIC TILE
- 23 6" H. 2" X 2" COVED CERAMIC MOSAIC TILE

WALLS
- 40 SEMI-GLOSS ENAMEL o/ GYP. BOARD
- 41 4 1/4" x 4 1/4" CERAMIC TILE o/ SETTING BED
- 42 FIBERGLASS REINFORCED PANELING OVER GYP. BOARD
- 43 VINYL COVERED TACKBOARD o/ GYP. BOARD
- 44 WRITABLE WALL SURFACE

CEILINGS
- 50 2' x 4' LAY-IN ACOUSTICAL TILE
- 51 12" x 12" ACOUSTICAL GLUE-UP TILE OVER GYP. BOARD
- 52 SEMI-GLOSS ENAMEL OVER GYP. BOARD

COUNTER TOPS
- 70 PLASTIC LAMINATE

MILLWORK
- 80 PLASTIC LAMINATE

EXTERIOR FINISHES

- ff — CEMENT PLASTER
- ff — CEMENT PLASTER SOFFIT
- ee — CEMENT PLASTER FASCIA
- ee — METAL GUTTER
- ee/ff — DOWNSPOUTS
- hh — WINDOW FRAME
- hh — HOLLOW METAL DOOR FRAME
- ee — HOLLOW METAL DOOR
- ee — ROOF FLASHING
- dd — METAL ROOF

FINISH SCHEDULE NOTES

1. CEILING HEIGHTS NOTED ON THIS SCHEDULE ARE FROM THE FLOOR BELOW IN THAT ROOM. THIS IS FOR THE PURPOSE OF ESTIMATING & DETERMINING INSTALLATION REQUIREMENTS.
2. REFER TO FLOOR PLANS, REFLECTED CEILING PLANS AND INTERIOR ELEVATIONS FOR EXTENT AND LOCATION OF INTERIOR FINISHES.
3. REFER TO EXTERIOR ELEVATIONS FOR EXTENT AND LOCATION OF EXTERIOR FINISHES.
4. REFER TO SPECIFICATIONS FOR METHOD OF APPLICATION AND MATERIALS DESCRIPTION.
5. WHERE MORE THAN ONE FINISH OR COLOR DESIGNATION OCCURS IN A BOX REFER TO THE APPROPRIATE PLAN OR INTERIOR ELEVATION FOR THE EXTENT AND DESIGNATION OF FINISH.
6. ALL GYP. BD. SHALL BE 5/8" THICK TYPE "X" UNLESS OTHERWISE NOTED.
7. REFER TO "INTERIOR ELEVATION NOTES" ON INTERIOR ELEVATION SHEETS FOR LOCATION IN THE DRAWINGS OF TYPICAL DETAILS.
8. FOR CABINET LAYOUT, VERIFY DIMENSIONS IN FIELD. DIMENSIONS NOTED ON DRAWINGS ARE NOMINAL - PROVIDE FILLERS @ END UNITS INCLUDING TOP OF CABINET AS REQUIRED FOR PROPER OPERATION AND CLOSING OF VOID SPACES.
9. PAINT METAL DOOR AND WINDOW FRAMES. PAINT METAL DOOR INTERIOR FACE, EXTERNAL FACE, AND ALL EDGES. WHERE INTERIOR AND EXTERIOR COLORS ARE DIFFERENT, PAINT EDGES TO MATCH THE SIDE TO WHICH THE DOOR OPENS.
10. PROTECT UNFINISHED CONCRETE FLOORS FROM DAMAGE DURING CONSTRUCTION . PREPARE FOR FINISH / SEALING BY HIGH PRESSURE WATER OR BEAD BLASTING AS REQUIRED TO REMOVE STAINS AND RESIDUE. GET APPROVAL OF ARCHITECT OR OWNER BEFORE SEALING. (TAKE EXTRA CARE WITH OCCUPIABLE ROOMS)
11. FINISH COLORS ARE SHOWN THUS: ( )
12. WHERE MORE THAN ONE COLOR IS SHOWN THE DESIGNATION IS: (x/y) x = INTERIOR, y = EXTERIOR
13. AT ALL VINYL COVERED TACKBOARD EDGES, PROVIDE TACKBOARD MANUFACTURED TRIM

APPROVALS

FILE # 10-28 | APPLICATION # 02-122132

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DIV. OF THE STATE ARCHITECT
APP: 02-122132 INC:
REVIEWED FOR
SS ☑ FLS ☑ ACS ☑
DATE: 08/06/2024

LICENSED ARCHITECT
MICHAEL J. SCOTT JR.
No. C-34290
REN: 05-31-25
STATE OF CALIFORNIA

DATE: JANUARY 31, 2024

NEW TK CLASSROOM AT CHENEY KINDERGARTEN
COALINGA-HURON UNIFIED SCHOOL DISTRICT
COALINGA, FRESNO COUNTY, CA

REVISIONS

MANGINI ARCHITECTURE INGENUITY
MANGINI ASSOCIATES INC.
4320 West Mineral King Avenue
Visalia, California 93291
www.mangini.us
(559) 627.0530 Office
(559) 627.1926 Fax

TITLE: FINISH SCHEDULE

A8

PROJECT 23044

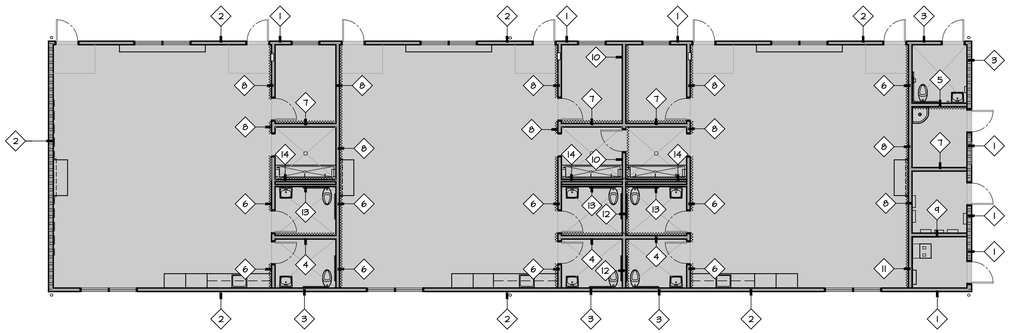
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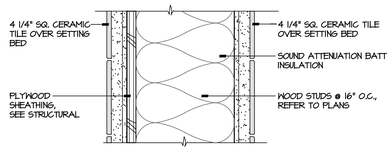
LEGEND

— WALL ASSEMBLY DETAIL ON THIS PAGE

north

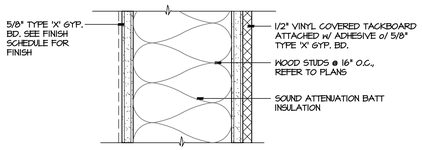
WALL ASSEMBLY KEY PLAN

1"=10'-0"



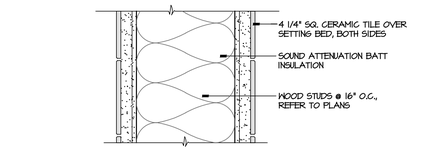
12 WALL ASSEMBLY

SCALE: 3" = 1'-0"



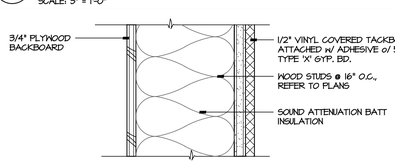
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SCALE: 3" = 1'-0"



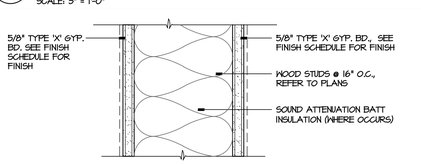
4 WALL ASSEMBLY

SCALE: 3" = 1'-0"



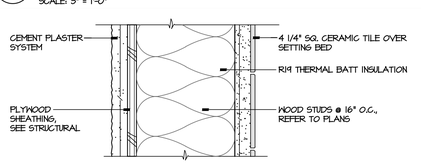
11 WALL ASSEMBLY (NOT USED)

SCALE: 3" = 1'-0"



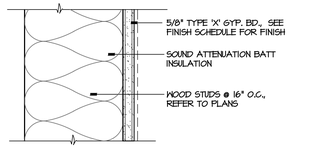
7 WALL ASSEMBLY

SCALE: 3" = 1'-0"



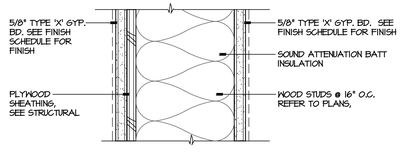
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SCALE: 3" = 1'-0"



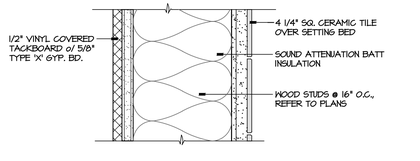
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SCALE: 3" = 1'-0"



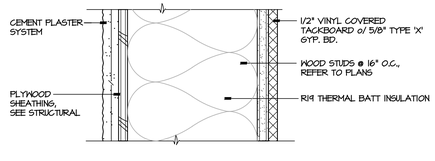
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SCALE: 3" = 1'-0"



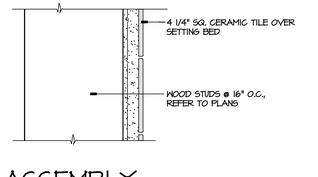
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SCALE: 3" = 1'-0"



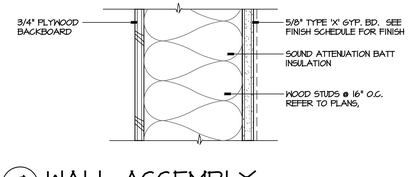
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SCALE: 3" = 1'-0"



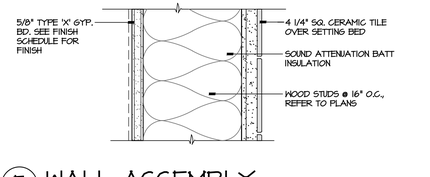
13 WALL ASSEMBLY

SCALE: 3" = 1'-0"



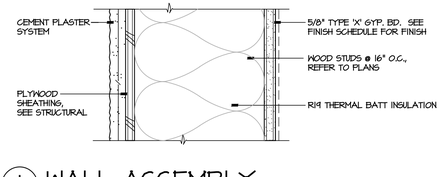
9 WALL ASSEMBLY

SCALE: 3" = 1'-0"



5 WALL ASSEMBLY

SCALE: 3" = 1'-0"



1 WALL ASSEMBLY

SCALE: 3" = 1'-0"

NEW TK CLASSROOM AT CHENEY KINDERGARTEN

COALINGA-HURON UNIFIED SCHOOL DISTRICT

COALINGA, FRESNO COUNTY, CA

REVISIONS

MANGINI ARCHITECTURE | INGENUITY

MANGINI ASSOCIATES INC.
4320 West Mineral King Avenue
Visalia, California 93291

www.mangini.us
(559) 627.0530 Office
(559) 627.1926 Fax

TITLE
WALL ASSEMBLIES

A9

PROJECT 23044

APPROVALS

FILE # 10-28 | APPLICATION # 02-122132

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APP: 02-122132 INC:
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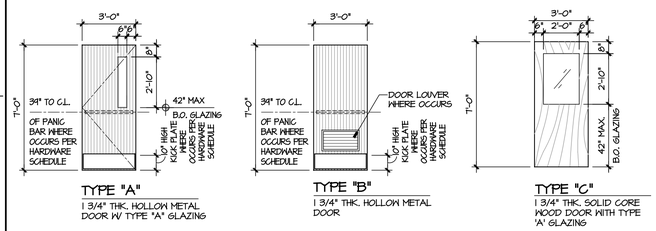
LICENSED ARCHITECT
MICHAEL J. SCOTT MANGINI
No. C-34290
REN: 05-31-25
STATE OF CALIFORNIA

DATE: JANUARY 31, 2024

DOOR SCHEDULE

BLDG.	DOOR	TYPE	DIMENSIONS WIDTH	HGT.	THK.	HDWR SET	FINISH	FIRE RATING	FRAME TYPE	FRAME DEPTH	FRAME FINISH	DETAILS HEAD	JAMB	JAMB	SILL	SIGNAGE TYPE	SIGNAGE TEXT	REMARKS:
NEW TK CLASSROOM	01	A	3'-0"	7'-0"	1 3/4"	01	ee	-	1	8 3/8"	hh	2/A11	1/A12	1/A12	8/A11	B1	**	
																B4	EXIT	
	02	A	3'-0"	7'-0"	1 3/4"	02	ee	-	1	8 3/8"	hh	2/A11	1/A12	1/A12	8/A11	B1	**	
																B4	EXIT	
	03	A	3'-0"	7'-0"	1 3/4"	02	ee	-	1	8 3/8"	hh	2/A11	1/A12	1/A12	8/A11	B1	**	
																B4	EXIT	
	04	A	3'-0"	7'-0"	1 3/4"	02	ee	-	1	8 3/8"	hh	2/A11	1/A12	1/A12	8/A11	B1	**	
																B4	EXIT	
	05	A	3'-0"	7'-0"	1 3/4"	02	ee	-	1	8 3/8"	hh	2/A11	1/A12	1/A12	8/A11	B1	**	
																B4	EXIT	
	06	A	3'-0"	7'-0"	1 3/4"	02	ee	-	1	8 3/8"	hh	2/A11	1/A12	1/A12	8/A11	B1	**	
																B4	EXIT	
	07	B	3'-0"	7'-0"	1 3/4"	04	ee	-	2	8 3/8"	hh	4/A12	4/A12	4/A12	1/A11	A3/A4	STAFF	A3 MOUNTED ON DOOR, A4 AT PULLSIDE
	08	B	3'-0"	7'-0"	1 3/4"	05	ee	-	2a	10"-1/8"	hh	6/A12	6/A12	6/A12	5/A11	B2	JANITOR	12"X24" DOOR LOUBER
	09	B	3'-0"	7'-0"	1 3/4"	05	ee	-	2a	10"-1/8"	hh	6/A12	6/A12	6/A12	5/A11	B2	ELECTRICAL	12"X24" DOOR LOUBER
	10	B	3'-0"	7'-0"	1 3/4"	03	ee	-	2a	10"-1/8"	hh	6/A12	6/A12	6/A12	5/A11	B2	DATA	
	11	C	3'-0"	7'-0"	1 3/4"	07	ee	-	2a	8"	hh	11/A12	11/A12	11/A12	8/A11	B2	TEACHER PREP.	
	12	NO DOOR, 3'-0" WIDE x 7'-0" HIGH FRAMED OPENING						-	2a	8"		13/A12	13/A12	13/A12	-	B2	CLEAN-UP	
	13	D	3'-0"	7'-0"	1 3/4"	08	ee	-	2a	8"	hh	12/A12	12/A12	12/A12	7/A11	A3/A4	UNISEX	A3 MOUNTED ON DOOR, A4 AT PUSH SIDE
	14	D	3'-0"	7'-0"	1 3/4"	08	ee	-	2a	8"	hh	12/A12	12/A12	12/A12	7/A11	A3/A4	UNISEX	A3 MOUNTED ON DOOR, A4 AT PUSH SIDE
	15	C	3'-0"	7'-0"	1 3/4"	07	ee	-	2a	8"	hh	11/A12	11/A12	11/A12	8/A11	B2	TEACHER PREP.	
	16	NO DOOR, 3'-0" WIDE x 7'-0" HIGH FRAMED OPENING						-	2a	8"		13/A12	13/A12	13/A12	-	B2	CLEAN-UP	
	17	C	3'-0"	7'-0"	1 3/4"	06	ee	-	2a	8 1/2"	hh	7/A12	7/A12	7/A12	3/A11	B2	**	
																B2	**	
	18	D	3'-0"	7'-0"	1 3/4"	08	ee	-	2a	8"	hh	12/A12	12/A12	12/A12	7/A11	A3/A4	UNISEX	A3 MOUNTED ON DOOR, A4 AT PUSH SIDE
	19	D	3'-0"	7'-0"	1 3/4"	08	ee	-	2a	8"	hh	12/A12	12/A12	12/A12	7/A11	A3/A4	UNISEX	A3 MOUNTED ON DOOR, A4 AT PUSH SIDE
	20	C	3'-0"	7'-0"	1 3/4"	07	ee	-	2a	8"	hh	11/A12	11/A12	11/A12	8/A11	B2	TEACHER PREP.	
	21	NO DOOR, 3'-0" WIDE x 7'-0" HIGH FRAMED OPENING						-	2a	8"		13/A12	13/A12	13/A12	-	B2	CLEAN-UP	
	22	D	3'-0"	7'-0"	1 3/4"	08	ee	-	2a	8"	hh	12/A12	12/A12	12/A12	7/A11	A3/A4	UNISEX	A3 MOUNTED ON DOOR, A4 AT PUSH SIDE
	23	D	3'-0"	7'-0"	1 3/4"	08	ee	-	2a	8"	hh	12/A12	12/A12	12/A12	7/A11	A3/A4	UNISEX	A3 MOUNTED ON DOOR, A4 AT PUSH SIDE

DOOR TYPES



TYPE "A"
1 3/4" THK. HOLLOW METAL DOOR W/ TYPE "A" GLAZING

TYPE "B"
1 3/4" THK. HOLLOW METAL DOOR

TYPE "C"
1 3/4" THK. SOLID CORE WOOD DOOR WITH TYPE 'A' GLAZING

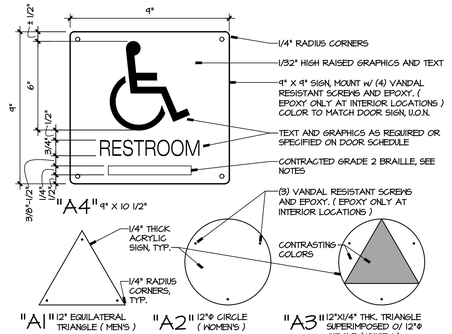
TYPE "D"
1 3/4" THK. SOLID CORE WOOD DOOR

DOOR SCHEDULE NOTES:

1. VERIFY DOOR SWINGS WITH FLOOR PLAN.
2. METAL FRAMES SHALL FIT TIGHT TO WALL. SHIM GYP. BD. AS REQUIRED FOR PLUMB TOLERANCE AT FRAME AND GYP. BD.
3. PAINT H.M. DOORS AND FRAMES SEMI-GLOSS ENAMEL IN ACCORDANCE WITH SPECIFICATIONS. REFER TO FINISH COLORS FOR DESIGNATION.
4. PAINT DOORS AND FRAMES SEMI-GLOSS IN ACCORDANCE WITH SPECIFICATIONS. DO NOT PAINT OR ALTER FIRE RESISTANCE RATING LABELS, WHERE OCCURS.
5. PAINT DOORS THE SAME COLOR ON BOTH SIDES UNLESS OTHERWISE NOTED THUS:
   INTERIOR
   EXTERIOR
   WHEN INTERIOR AND EXTERIOR COLORS ARE DIFFERENT, LATCH EDGE SHALL MATCH EXTERIOR COLOR AND HINGE EDGE SHALL MATCH INTERIOR COLOR. FINISH ALL EDGES.
6. REFER TO SPECIFICATIONS FOR DOOR SIGNAGE TYPES. ALL SIGNS SHALL INCLUDE BRAILLE IDENTIFICATION IN ACCORDANCE WITH CBC. FOR TYPICAL SIGNAGE / MOUNTING, SEE DETAIL 1/A10
7. VERIFY ALL ROOM SIGNAGE TEXT WITH OWNER PRIOR TO LAYOUT.
8. REFER TO SPECIFICATIONS FOR DOOR HARDWARE AND SCHEDULES.
9. (8) SEE SHEET A11 FOR FRAME TYPES
10. REFER TO GLAZING SCHEDULE ON SHEET A11 AND THE SPECIFICATIONS FOR TYPES OF GLAZING NOTED.
11. ALL CLASSROOM AND ROOMS WITH AN OCCUPANT LOAD OF 5 OR MORE MUST BE LOCKABLE FROM THE INTERIOR.
12. ALL DIMENSIONS ARE +/-, VERIFY IN THE FIELD (OR WITH FLOOR PLAN FOR APPROXIMATE AS INDICATED).



"A4" GRAPHICS OPTIONS



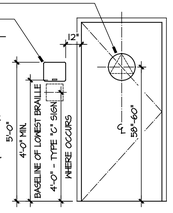
TYPE "A" SIGNS

SIGN TYPES "A1, A2, OR A3"

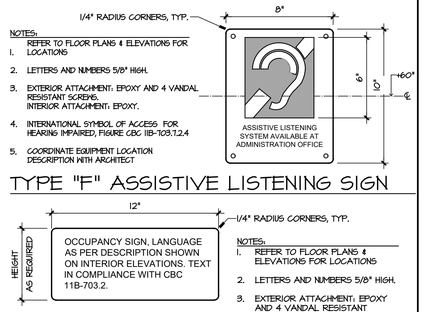
SIGN TYPE "A4" OR "B" ROOM I.D.

NOTES:

1. IN ADDITION TO SIGN TYPES "A1, A2, AND A3" MOUNTED ON RESTROOM DOORS, PROVIDE SIGN TYPE "A4", LOCATED AS SHOWN.
2. TYPE "B" SIGNS TO BE MOUNTED ON LATCH SIDE OF SINGLE DOOR. AT DOUBLE DOORS, MOUNT SIGN ON INACTIVE LEAF. IF BOTH LEAVES ARE ACTIVE MOUNT SIGN ON RIGHT SIDE OF DOUBLE DOOR. WHERE THERE IS NO WALL SPACE AT THE LATCH SIDE OF A SINGLE DOOR OR AT THE RIGHT SIDE OF DOUBLE DOORS, SIGNS SHALL BE LOCATED ON THE NEAREST ADJACENT WALL.
3. REFER TO DOOR SCHED. & ELEVATIONS FOR LOCATIONS.
4. USE 60" TO TOP OF THE UPPER SIGN TO SET SIGNS. CBC ALLOWS 80" MAX. TO BASELINE OF HIGHEST RAISED CHARACTERS & 48" MIN. TO BASELINE OF LOWEST LINE OF BRAILLE.



SIGN LOCATIONS



NOTES:

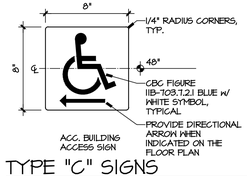
1. REFER TO FLOOR PLANS & ELEVATIONS FOR LOCATIONS
2. LETTERS AND NUMBERS 5/8" HIGH.
3. EXTERIOR ATTACHMENT: EPOXY AND 4 VANDAL RESISTANT SCREWS. INTERIOR ATTACHMENT: EPOXY.
4. INTERNATIONAL SYMBOL OF ACCESS FOR HEARING IMPAIRED, FIGURE CBC 11B-703.7.2.4
5. COORDINATE EQUIPMENT LOCATION DESCRIPTION WITH ARCHITECT

TYPE "F" ASSISTIVE LISTENING SIGN

NOTES:

1. REFER TO FLOOR PLANS & ELEVATIONS FOR LOCATIONS
2. LETTERS AND NUMBERS 5/8" HIGH.
3. EXTERIOR ATTACHMENT: EPOXY AND 4 VANDAL RESISTANT SCREWS. INTERIOR ATTACHMENT: EPOXY.

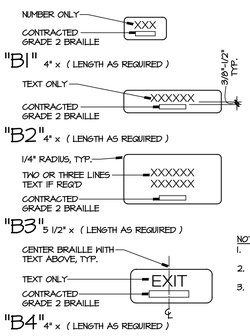
SIGN TYPE "D" OCCUPANCY SIGNS



NOTES:

1. REFER TO FLOOR PLANS & ELEVATIONS FOR LOCATIONS
2. EXTERIOR ATTACHMENT: EPOXY AND 4 VANDAL RESISTANT SCREWS. INTERIOR ATTACHMENT: EPOXY.

TYPE "C" SIGNS



NOTES:

1. NUMBERS 2" HIGH.
2. LETTERS 1" HIGH.
3. EXTERIOR ATTACHMENT: EPOXY AND A MINIMUM OF 2 VANDAL RESISTANT SCREWS. INTERIOR ATTACHMENT: EPOXY.

TYPE "B" SIGNS

NOTES:

1. CONSTRUCT SIGNS OF 1/8" THK. PLASTIC UNLESS OTHERWISE NOTED. ALL CHARACTERS AND PICTOGRAMS SHALL BE RAISED 1/32".
2. COLOR TO BE SELECTED BY ARCHITECT. (SIGN BACKGROUND COLORS TO CONTRAST WITH DOOR COLOR) TOW CONTRAST BETWEEN CHARACTERS AND BACKGROUND. CIRCLE COLOR TO CONTRAST WITH TRIANGLE.
3. ALL EDGES SHALL BE EASED OR ROUNDED AT 1/16".
4. AT LOCATIONS WHERE AN EXIT SIGN AND A ROOM I.D. SIGN ARE BACK TO BACK ON GLASS, ALIGN & MAKE SIGNS THE SAME SIZE. WHEN SIGN IS MOUNTED ON GLASS WITH NO SIGN ON BACK SIDE, PROVIDE BLANK SIGN THE SAME SIZE ON THE BACK SIDE.
5. ROOM I.D. SIGNAGE ; RAISED CHARACTERS (LETTERS) (RAISED 1/32", ALL UPPER CASE CALIBRI) SHALL BE PROVIDED & SHALL BE ACCOMPANIED BY CONTRACTED (GRADE 2) BRAILLE.
6. RAISED CHARACTERS (LETTERS) SHALL COMPLY WITH CBC 11B-703.2.
7. CONTRACTED (GRADE 2) BRAILLE SHALL COMPLY WITH CBC 11B-703.3.

1 SIGN TYPES

N.T.S.

REVISIONS

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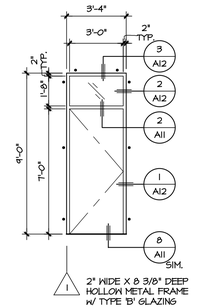
NEW TK CLASSROOM AT CHENEY KINDERGARTEN
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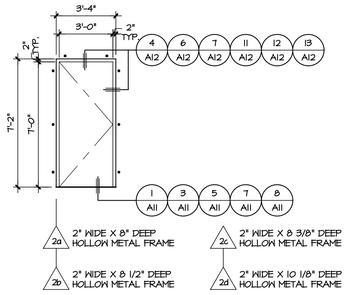
TITLE
DOOR SCHEDULE

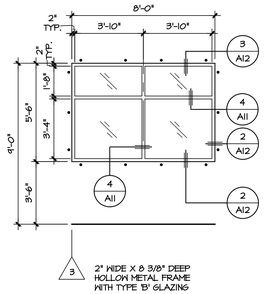
A10

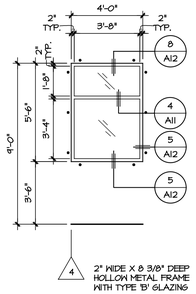
PROJECT 23044

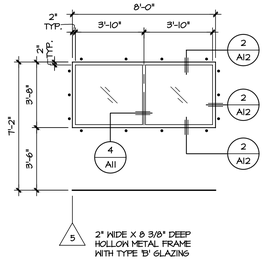
FRAME TYPES











DOOR & WINDOW FRAME TYPE NOTES

1. ALL GLASS SHALL BE TYPE AS NOTED.
2. GLAZING SCHEDULE : SEE SPECIFICATIONS

   TYPE "A" : 1/4" THICK, CLEAR, FULLY TEMPERED GLASS

   TYPE "B" : 1" THICK, TINTED, FULLY TEMPERED GLASS
3. METAL FRAMES SHALL FIT TIGHT TO WALL. CENTER FRAME THROAT OPENING BETWEEN OUTSIDE FACE OF MATERIALS BEING WARPED BY FRAME. SHIM GYPSUM BOARD AS REQUIRED FOR PLUMB TOLERANCE AT FRAME / GYPSUM BOARD.
4. "LABEL" SHALL MEAN "ASSEMBLY" AS DEFINED IN CBC SECTION 43066).
5. PAINT WINDOW FRAMES (hh) BOTH SIDES, UNLESS OTHERWISE NOTED ON THE INTERIOR ELEVATIONS
6. PAINT FRAMES AND DOORS SEMI-GLOSS ENAMEL IN ACCORDANCE WITH SPECIFICATION SECTION 09 9100, AS NOTED ON THE DOOR SCHEDULE. REFER TO FINISH COLORS FOR DESIGNATION. PAINT BOTH SIDES THE SAME COLOR U.O.N. DO NOT PAINT FRAME LABELS
7. ALL DIMENSIONS ARE +/-. VERIFY IN THE FIELD (OR WITH FLOOR PLAN FOR APPROXIMATE AS INDICATED).
8. VERIFY DOOR SWINGS WITH FLOOR PLAN.
9. MINIMUM ANCHOR REQUIREMENTS, (U.O.N.) :

   FRAME HEIGHTS UP TO 4'-0" : 2 JAMB ANCHORS
   FRAME HEIGHTS UP TO 7'-4" : 3 JAMB ANCHORS
   FRAME HEIGHTS UP TO 10'-0" : 4 JAMB ANCHORS
   FRAME HEIGHTS OVER 10'-0" : 1 ADDITIONAL ANCHOR PER 3'-0" OR PORTION THEREOF

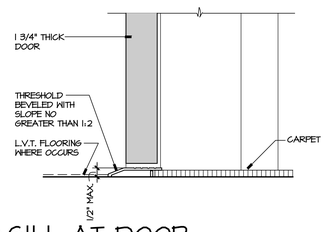
   FRAME WIDTHS UP TO 4'-0" : 2 HEAD ANCHORS
   FRAME WIDTHS UP TO 7'-4" : 3 HEAD ANCHORS
   FRAME WIDTHS UP TO 10'-0" : 4 HEAD ANCHORS
   FRAME WIDTHS OVER 10'-0" : 1 ADDITIONAL ANCHOR PER 3'-0" OR PORTION THEREOF

   PROVIDE 6" EDGE DISTANCE AT FIRST HEAD ANCHOR.
10. FRAMES SHALL BE ANCHORED AT THE FLOOR WITH MANUFACTURER'S STANDARD FLOOR ANCHORS AS REQ'D.
11. ALL FRAME ANCHORS SHALL BE MANUFACTURER'S STANDARD CONCEALED ANCHORS, UL LISTED WHERE REQUIRED BY THE DOOR SCHEDULE.
12. EXPOSED DIMPLE FASTENERS WILL ONLY BE ALLOWED UPON PRIOR WRITTEN ACCEPTANCE BY THE ARCHITECT.
13. WHERE FRAMES ARE ALLOWED TO BE DIMPLED FOR ANCHORAGE, COUNTERSINK SCREW HEADS.
14. TYPICAL FRAME ANCHOR FASTENERS :

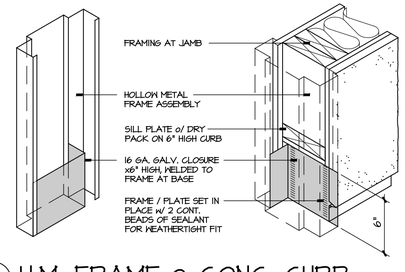
    a. WOOD STUDS : 2-#8d EACH SIDE
    b. DIMPLED FRAME : 3/8" DIA. WOOD SCREW OR EXPOSED ANCHOR, MIN. 3" EMBEDMENT
    c. CONC. SLAB : (2) 1/4" Ø x 2 1/2" EXP. ANCHOR AT 24" O.C. MIN. PROVIDE MIN. 2 SETS
15. VERTICAL AND HORIZONTAL FRAMING MEMBERS ARE 2" THICK UNLESS OTHERWISE NOTED.
16. FOR TYP. SIGNAGE / MOUNTING SEE DTLS. 1/A10
17. FOR HOLLOW METAL FRAMES AT CONCRETE CURBS, SEE DETAIL 6/A11

LEGEND

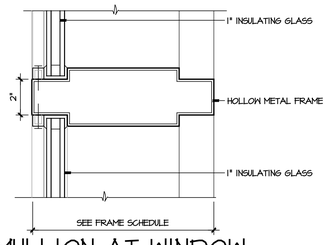
DOT INDICATED ANCHOR LOCATION, TYPICAL EQUALLY SPACED PER FRAME ELEVATIONS



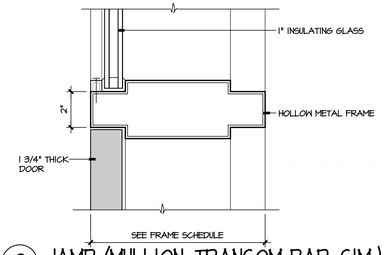
8 SILL AT DOOR
SCALE: 3" = 1'-0"



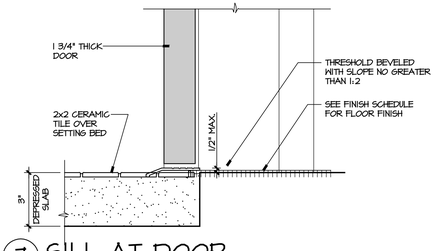
6 H.M. FRAME @ CONC. CURB.
SCALE: N.T.S.



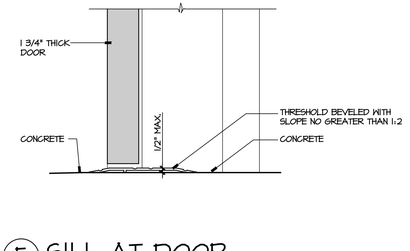
4 MULLION AT WINDOW
SCALE: 3" = 1'-0"



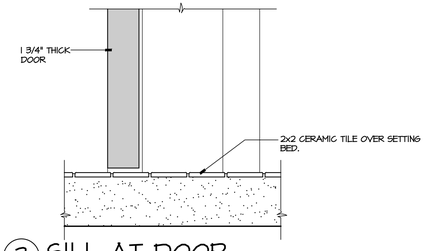
2 JAMB (MULLION, TRANSOM BAR, SIM.)
SCALE: 3" = 1'-0"



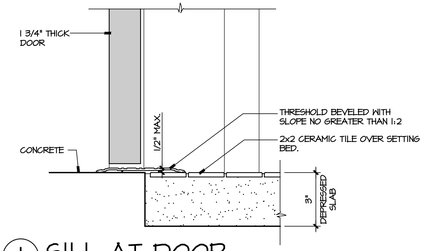
7 SILL AT DOOR
SCALE: 3" = 1'-0"



5 SILL AT DOOR
SCALE: 3" = 1'-0"



3 SILL AT DOOR
SCALE: 3" = 1'-0"



1 SILL AT DOOR
SCALE: 3" = 1'-0"

APPROVALS

FILE # 10-28 | APPLICATION # 02-122132

IDENTIFICATION STAMP
DIV. OF THE STATE ARCHITECT
APP: 02-122132 INC:
REVIEWED FOR
SS ☑ FLS ☑ ACS ☑
DATE: 08/06/2024

LICENSED ARCHITECT
MICHAEL J. SCOTT JR
No. C-34290
REN: 05-31-25
STATE OF CALIFORNIA

DATE: JANUARY 31, 2024

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COALINGA, FRESNO COUNTY, CA

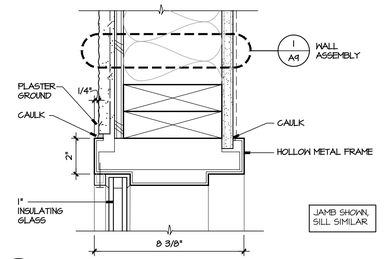
REVISIONS

MANGINI ARCHITECTURE INGENUITY
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www.mangini.us
(559) 627-0510 Office
(559) 627-1926 Fax

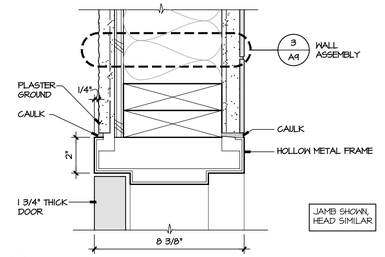
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FRAME TYPE SCHEDULE

A11

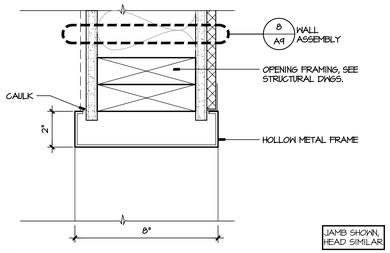
PROJECT 23044



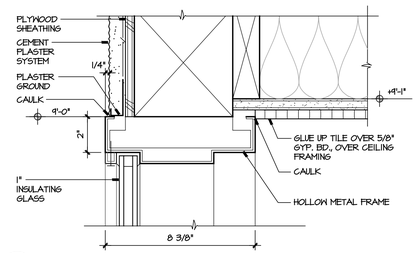
5 JAMB/SILL AT WINDOW
SCALE: 3" = 1'-0"



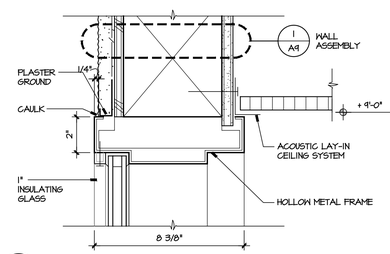
4 HEAD/JAMB AT DOOR
SCALE: 3" = 1'-0"



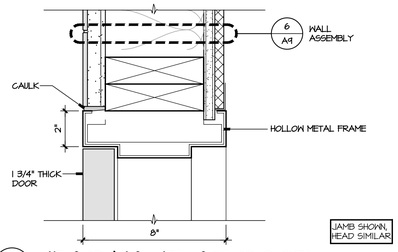
13 JAMB AT DOOR / HEAD SIM.
SCALE: 3" = 1'-0"



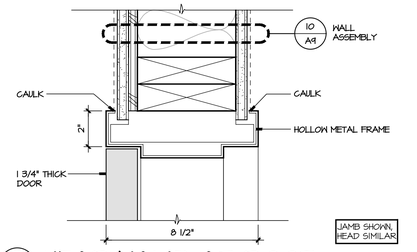
8 HEAD AT WINDOW
SCALE: 3" = 1'-0"



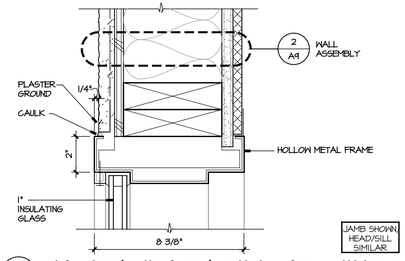
3 HEAD AT WINDOW
SCALE: 3" = 1'-0"



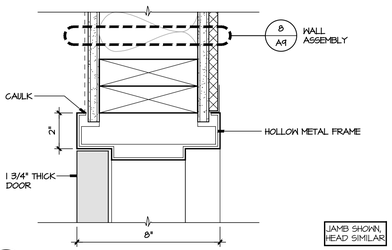
12 HEAD/JAMB AT DOOR
SCALE: 3" = 1'-0"



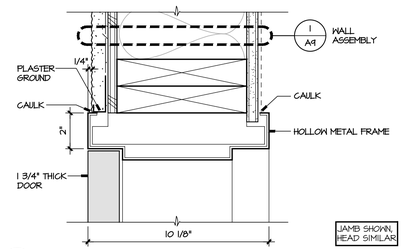
7 HEAD/JAMB AT DOOR
SCALE: 3" = 1'-0"



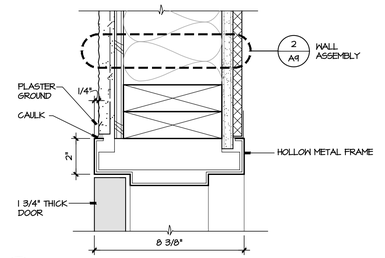
2 JAMB/ HEAD/ SILL AT WINDOW
SCALE: 3" = 1'-0"



11 HEAD/JAMB AT DOOR
SCALE: 3" = 1'-0"



6 HEAD/JAMB AT DOOR
SCALE: 3" = 1'-0"



1 JAMB AT DOOR
SCALE: 3" = 1'-0"

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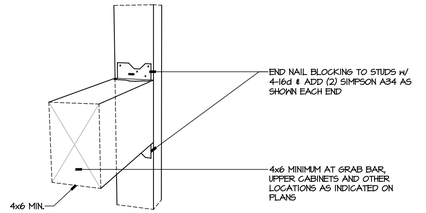
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TITLE
FRAME DETAILS

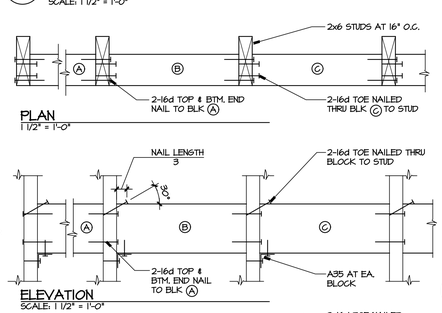
A12

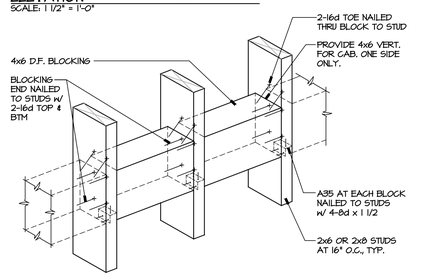
PROJECT 23044



10 4x BLOCKING ATTACHMENT WD. STUDS

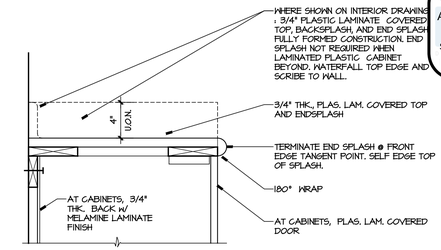
SCALE: 1 1/2" = 1'-0"





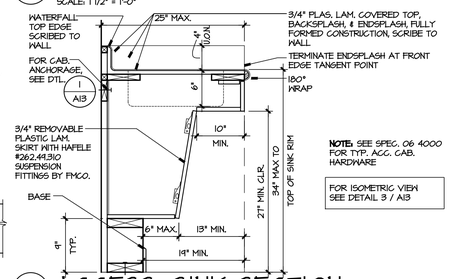
8 4x6 BLKG. AT WALL

SCALE: N.T.S.



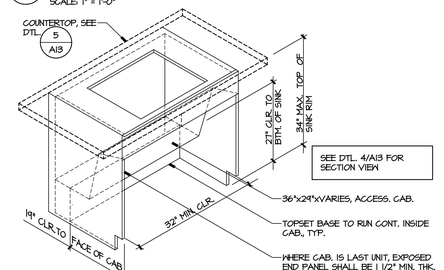
5 COUNTERTOP w/ SPLASH

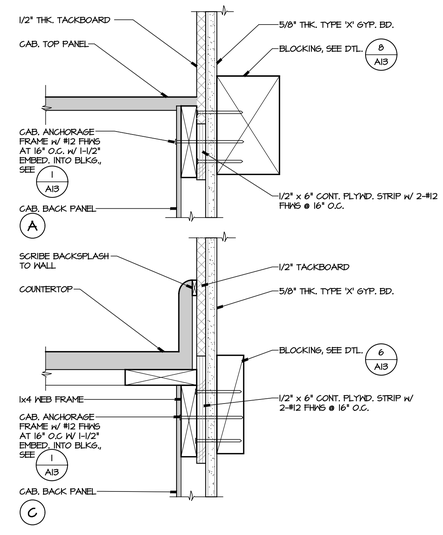
SCALE: 1 1/2" = 1'-0"



4 ACCESS. SINK SECTION

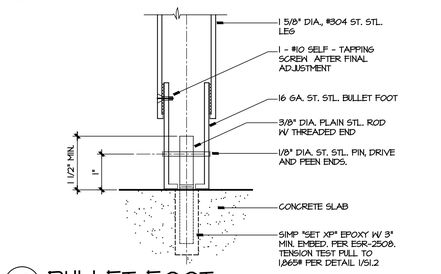
SCALE: 1" = 1'-0"





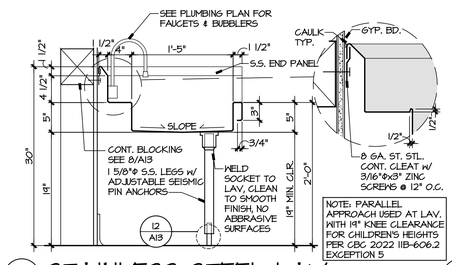
13 CAB. ANCHORAGE AT VCTB

SCALE: 3" = 1'-0"



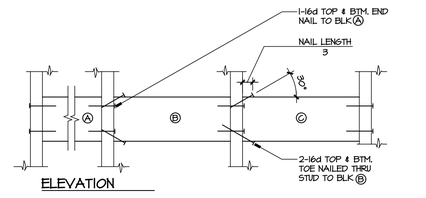
12 BULLET FOOT

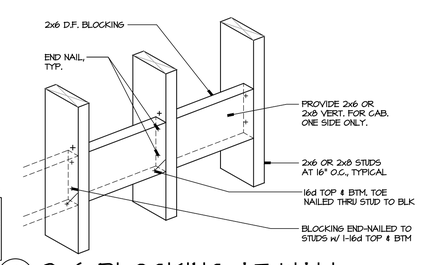
SCALE: 1/2" = 1'-0"



11 STAINLESS STEEL LAV.

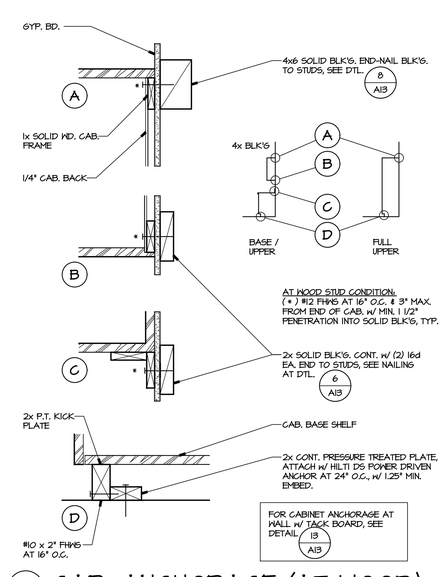
SCALE: 1" = 1'-0"





6 2x6 BLOCKING AT WALL

SCALE: N.T.S.



1 CAB. ANCHORAGE (AT WOOD)

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

APPROVALS

FILE # 10-28 | APPLICATION # 02-122132

IDENTIFICATION STAMP
DIV. OF THE STATE ARCHITECT
APP: 02-122132 INC:
REVIEWED FOR
SS ☑ FLS ☑ ACS ☑
DATE: 08/06/2024

LICENSED ARCHITECT
MICHAEL J. SCOTT JR
No. C-34290
REN: 05-31-25
STATE OF CALIFORNIA

DATE: JANUARY 31, 2024

NEW TK CLASSROOM AT CHENEY KINDERGARTEN

COALINGA-HURON UNIFIED SCHOOL DISTRICT

COALINGA, FRESNO COUNTY, CA

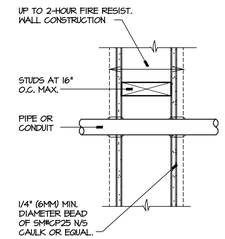
REVISIONS

MANGINI ARCHITECTURE INGENUITY
MANGINI ASSOCIATES INC.
4320 West Mineral King Avenue
Visalia, California 93291
www.mangini.us
(559) 627.0530 Office
(559) 627.1926 Fax

TITLE
MILLWORK DETAILS

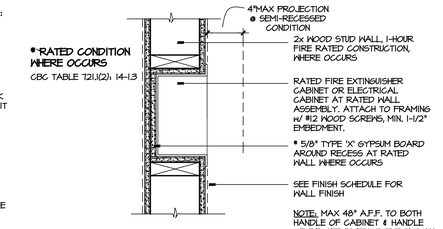
A13

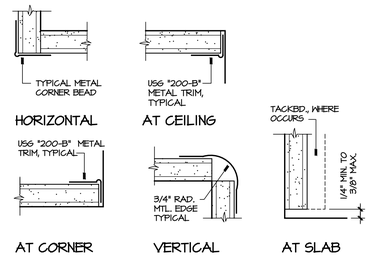
PROJECT 23044

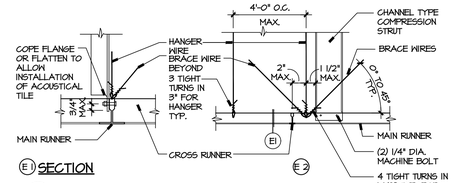


WALL PENETRATION NOTES :

1. CAULK IS TO BE FORCED INTO THE ANNULAR SPACE TO THE MAX. EXTENT POSSIBLE FLUSH W/ EXTERIOR OF THE PENETRATION SURFACE.
2. FINISH CAULKING W/ A 1/4" (6MM) MIN. BEAD OF 3M #CP25 N/S CAULK APPLIED TO PERIMETER OF CONDUIT PIPE AT ITS EGRESS FROM THE WALL.
3. THE MAX. ANNULAR SPACE IS NOT TO EXCEED 3/16" (5MM).
4. INSTALL FIRESTOP ON BOTH SIDES OF THE WALL.
5. THESE RECOMMENDATIONS ARE BASED ON PRODUCT PERFORMANCE PER ASTM E-814 (UL #L1001) FIRE TEST AND UL THROUGH PENETR. FIRESTOP SYSTEM #147.







E1 SECTION

E CHANNEL STRUT

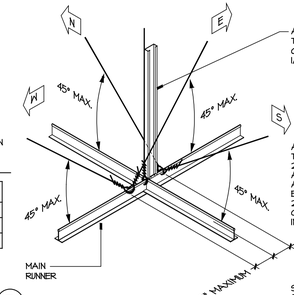
EMT SIZE	AREA	R	MAXIMUM HEIGHT
	sq. in.	in.	ft. - in.
1/2"	0.088	.235	4'-1"
3/4"	0.134	.309	5'-2"
1"	0.218	.342	6'-6"
1 1/4"	0.295	.511	8'-6"
1 1/2"	0.342	.593	9'-11"
2"	0.435	.794	12'-7"

EMT COMPRESSION STRUT ALLOWABLE LENGTHS

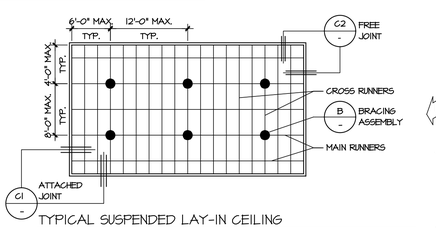
SINGLE STUD 362S137-33	AREA	Ry	MAXIMUM HEIGHT
	sq. in.	in.	ft. - in.
20 ga. x 3-5/8"	.236	.501	8'-0"

METAL STUD COMPRESSION STRUT ALLOWABLE LENGTHS

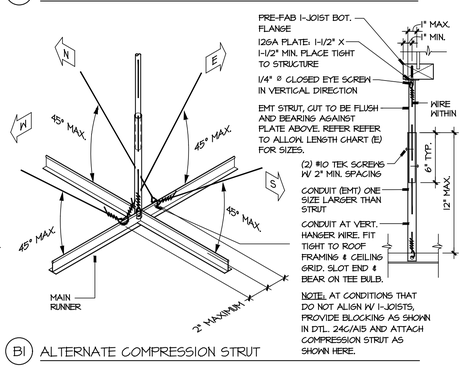
COMPRESSION STRUT: MINIMUM 20 GA. x 3-5/8" STEEL C STUD TO SUPPORT A TRIBUTARY AREA OF 96 SQUARE FEET MAXIMUM. STRUT TO HAVE L/R RATIO EQUAL TO OR LESS THAN 300. ATTACH TO MAIN RUNNERS WITH (2) 1/4" MIN. AND TO WOOD I-JOIST BLOCKING WITH 2-#12 WOOD SCREWS, SEE DETAIL B. COMPRESSION STRUT SHALL NOT REPLACE HANGER WIRE.



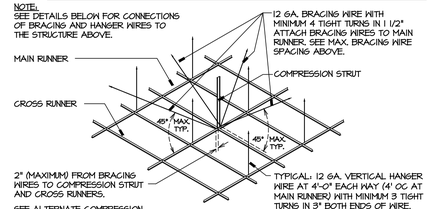
B COMPRESSION STRUT



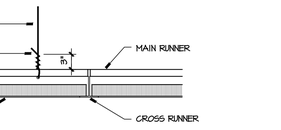
TYPICAL SUSPENDED LAY-IN CEILING



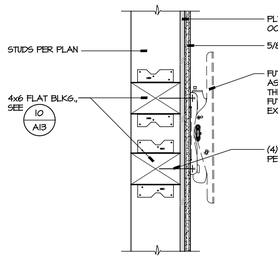
B1 ALTERNATE COMPRESSION STRUT



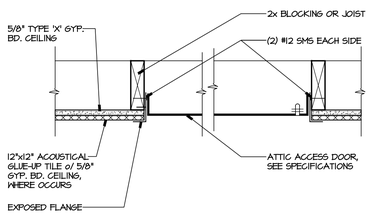
A ACOUSTICAL CEILING GRID ATTACHMENT



D HANGER WIRE CONNECTION TO GRID

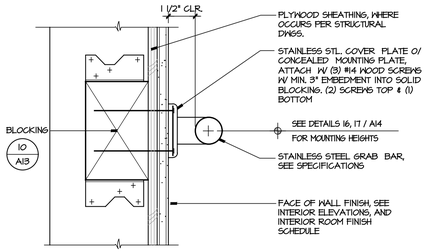


22 BLOCKING FOR FUTURE T.V.
SCALE: 1 1/2" = 1'-0"



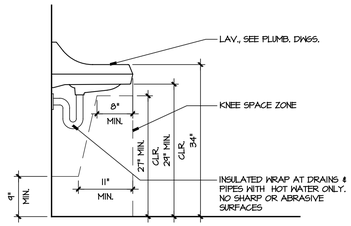
21 ATTIC ACCESS DOOR
SCALE: 1 1/2" = 1'-0"

25 PENTRATIONS THRU WALL
SCALE: N.T.S.

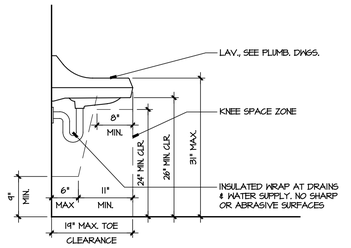


24 GRAB BAR ANCHORAGE
SCALE: 3" = 1'-0"

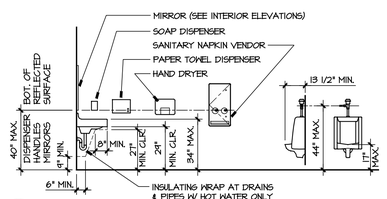
20 RECESSED FIRE EXTING. CABINET
SCALE: 1 1/2" = 1'-0"



19 ACCESS LAV. - ADULT
SCALE: 3/4" = 1'-0"

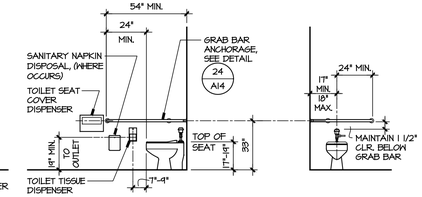


18 ACCESS. LAV. - AGES 5-8
SCALE: 3/4" = 1'-0"

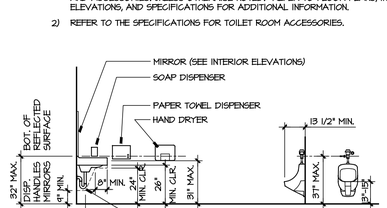


17 TYPICAL ACCESSIBLE MOUNTING HEIGHTS - ADULT
SCALE: 1/4" = 1'-0"

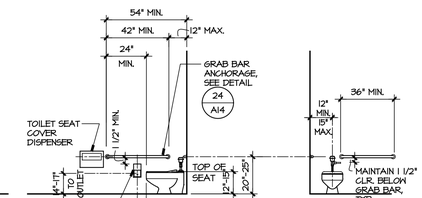
NOTES: 1) THESE DIMENSIONS ARE FOR TYPICAL MOUNTING HEIGHTS FOR ACCESSIBLE FIXTURES AND ACCESSORIES, UNLESS OTHERWISE NOTED. REFER TO FLOOR PLANS, INTERIOR ELEVATIONS, AND SPECIFICATIONS FOR ADDITIONAL INFORMATION.
2) REFER TO THE SPECIFICATIONS FOR TOILET ROOM ACCESSORIES.



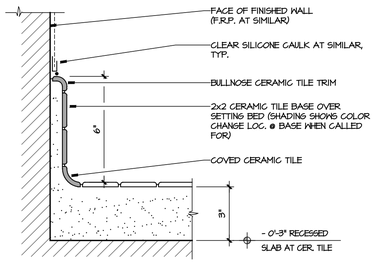
16 TYPICAL ACCESSIBLE MOUNTING HEIGHTS - AGES 5-8
SCALE: 1/4" = 1'-0"



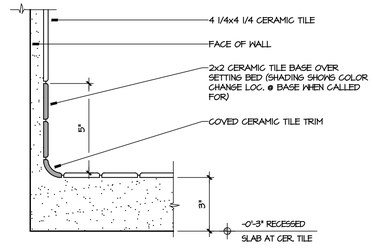
NOTES: 1) THESE DIMENSIONS ARE FOR TYPICAL MOUNTING HEIGHTS FOR ACCESSIBLE FIXTURES AND ACCESSORIES, UNLESS OTHERWISE NOTED. REFER TO FLOOR PLANS, INTERIOR ELEVATIONS, AND SPECIFICATIONS FOR ADDITIONAL INFORMATION.
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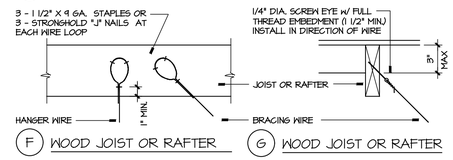
14 COVED TILE BASE
SCALE: 3" = 1'-0"



15 TYP. GYP. METAL EDGES
SCALE: 1 1/2" = 1'-0"

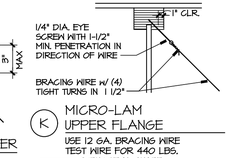


13 CERAMIC TILE BASE
SCALE: 3" = 1'-0"



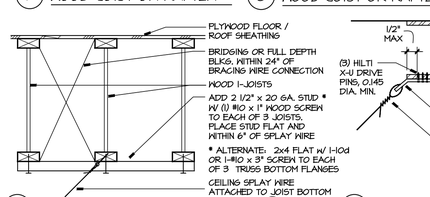
F WOOD JOIST OR RAFTER

G WOOD JOIST OR RAFTER

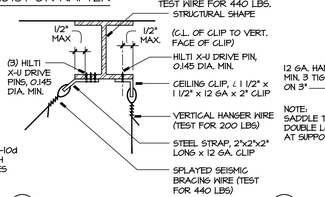


K MICRO-LAM UPPER FLANGE

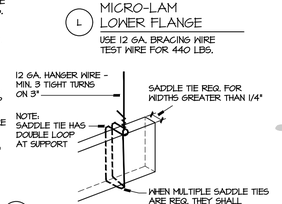
USE 12 GA. BRACING WIRE TEST WIRE FOR 440 LBS. STRUCTURAL SHAPE



N WOOD I-JOIST



O AT STEEL BEAMS



M TYP. SADDLE TIE

6 SUSPENDED CEILING DETAILS
SCALE: N.T.S.

APPROVALS
FILE # 10-28
APPLICATION # 02-122132
IDENTIFICATION STAMP
DIV. OF THE STATE ARCHITECT
APP: 02-122132 INC: A
REVIEWED FOR
SS ☑ FLS ☑ ACS ☑
DATE: 08/06/2024
LICENSED ARCHITECT MICHAEL J. SCOTT JR. No. C-34290 REN: 05-31-25 STATE OF CALIFORNIA
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NEW TK CLASSROOM AT CHENEY KINDERGARTEN
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COALINGA, FRESNO COUNTY, CA

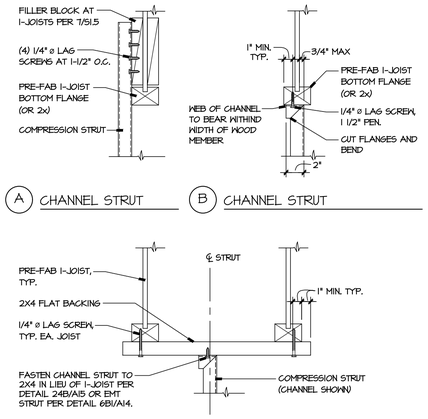
REVISIONS

MANGINI ARCHITECTURE INGENUITY.
MANGINI ASSOCIATES INC.
4320 West Mineral King Avenue
Visalia, California 93291
www.mangini.us
(559) 627.0530 Office
(559) 627.1926 Fax

TITLE: TYPICAL DETAILS

A14

PROJECT 23044



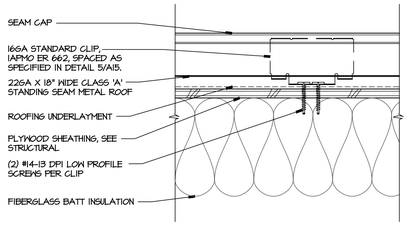
A CHANNEL STRUT

B CHANNEL STRUT

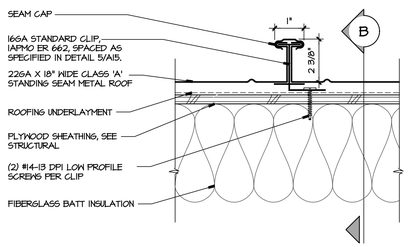
C CHANNEL OR EMT STRUT BETWEEN I-JOIST

24 COMPRESSION STRUT

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

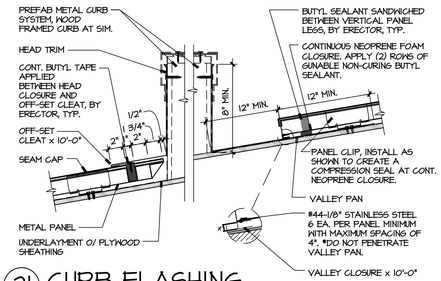


B PERPENDICULAR VIEW



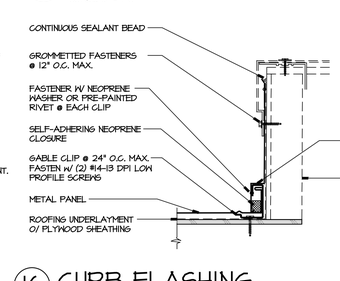
22 ROOF ASSEMBLY

3" = 1'-0"



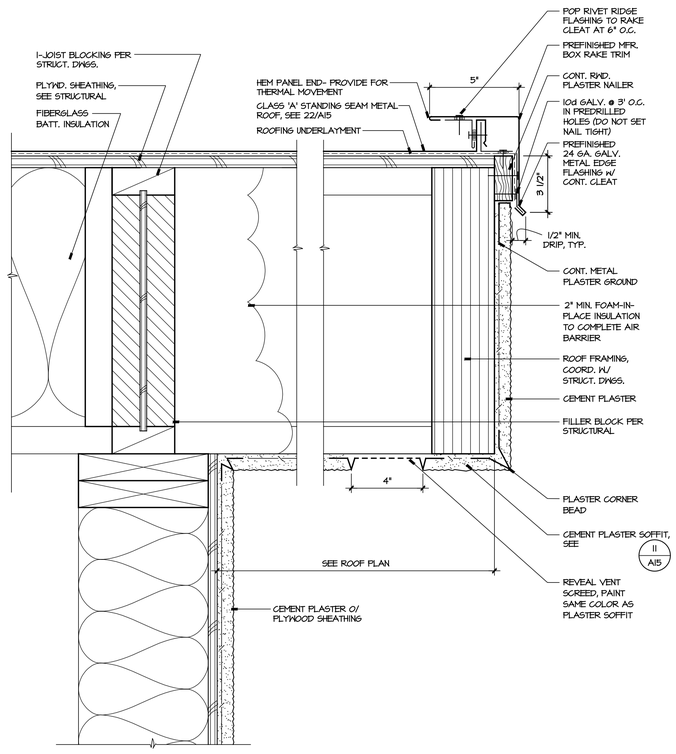
21 CURB FLASHING

SCALE: N.T.S.



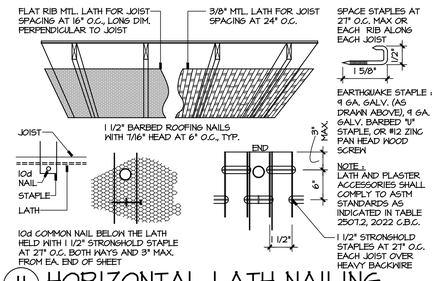
16 CURB FLASHING

SCALE: N.T.S.



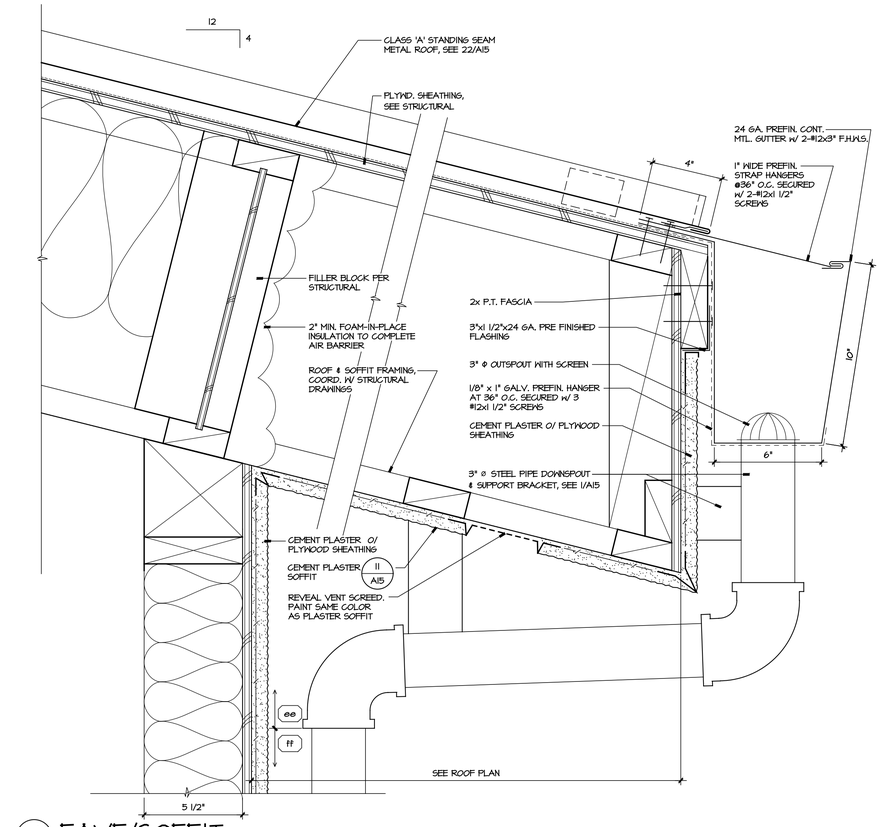
17 RAKE AT WALL

SCALE: 3" = 1'-0"



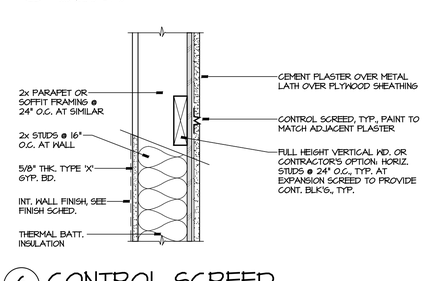
11 HORIZONTAL LATH NAILING

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



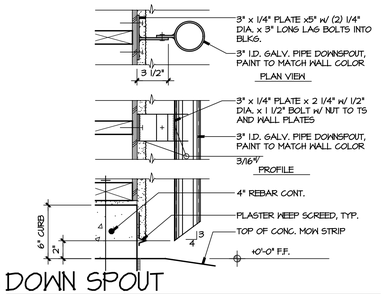
7 EAVE/SOFFIT

SCALE: 3" = 1'-0"



6 CONTROL SCREED

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



1 DOWN SPOUT

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

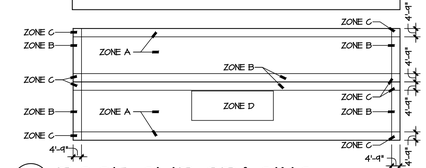
APPROVALS

FILE # 10-28 | APPLICATION # 02-122132

IDENTIFICATION STAMP
DIV. OF THE STATE ARCHITECT
APP: 02-122132 INC:
REVIEWED FOR
SS ☑ FLS ☑ ACS ☑
DATE: 08/06/2024

ZONE	MAX CLIP SPACING (ALONG PANEL JOINT)
ZONE A (1 ℄ 2e)	2'-2" O.C. MAX.
ZONE B (2n ℄ 2r)	1'-8" O.C. MAX.
ZONE C (3r ℄ 3e)	1'-3" O.C. MAX.
ZONE D (SOLAR PANELS)	2'-2" O.C. MAX.

EACH CLIP IS TO BE FASTENED TO ROOF SHEATHING w/ (2) #14-13 DPI LOW PROFILE SCREWS.



5 ROOF CLIP SPACING

SCALE: N.T.S.

LICENSED ARCHITECT
MICHAEL J. SCOTT JR
No. C-34290
REN: 05-31-25
STATE OF CALIFORNIA

DATE: JANUARY 31, 2024

NEW TK CLASSROOM AT CHENEY KINDERGARTEN

COALINGA-HURON UNIFIED SCHOOL DISTRICT

COALINGA, FRESNO COUNTY, CA

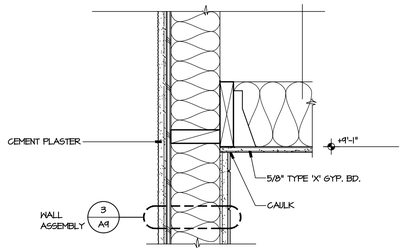
REVISIONS

MANGINI ARCHITECTURE INGENUITY
MANGINI ASSOCIATES INC.
4320 West Mineral King Avenue
Visalia, California 93291
www.mangini.us
(559) 627.0530 Office
(559) 627.1926 Fax

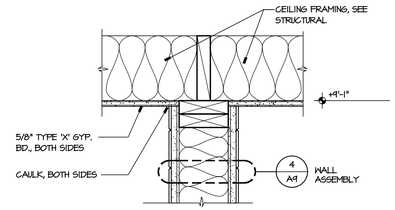
TITLE: DETAILS

A15

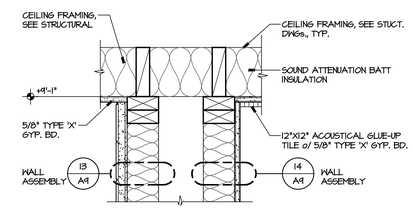
PROJECT 23044



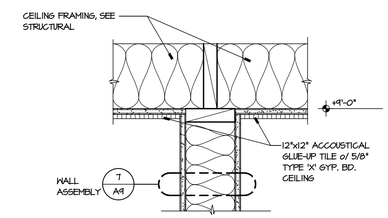
24 WALL AT CEILING
SCALE: 1 1/2" = 1'-0"



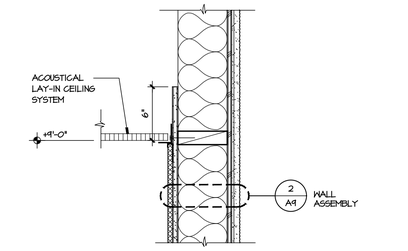
19 WALL AT CEILING
SCALE: 1 1/2" = 1'-0"



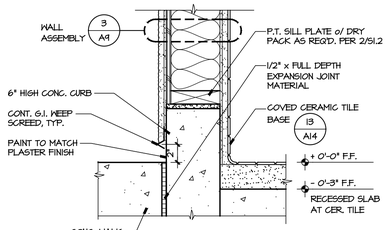
14 WALL AT CEILING
SCALE: 1 1/2" = 1'-0"



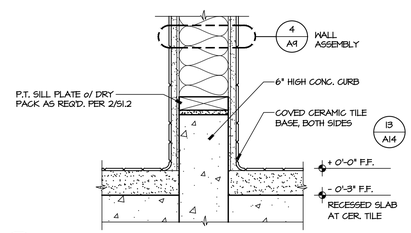
9 WALL AT CEILING
SCALE: 1 1/2" = 1'-0"



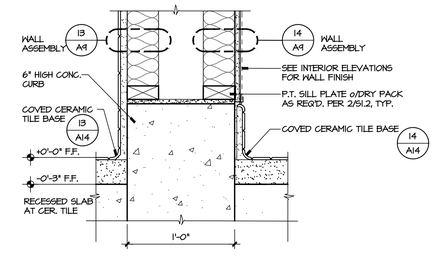
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SCALE: 1 1/2" = 1'-0"



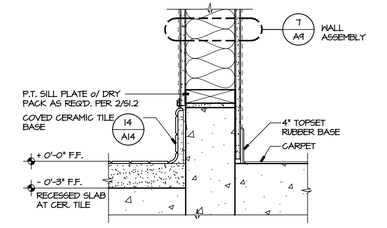
23 WALL AT BASE
SCALE: 1 1/2" = 1'-0"



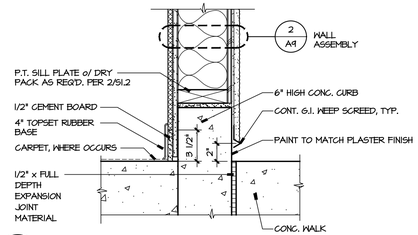
18 WALL AT BASE
SCALE: 1 1/2" = 1'-0"



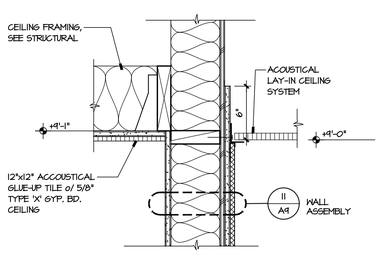
13 WALL AT BASE
SCALE: 1 1/2" = 1'-0"



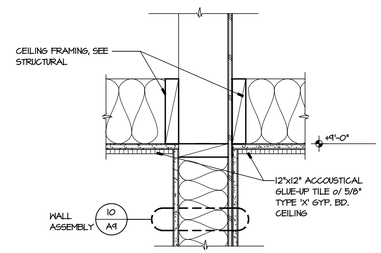
8 WALL AT BASE
SCALE: 1 1/2" = 1'-0"



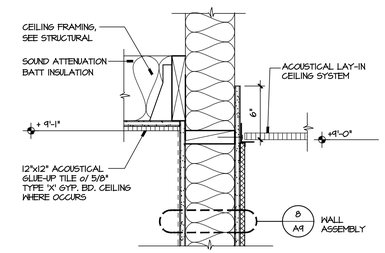
3 WALL AT BASE
SCALE: 1 1/2" = 1'-0"



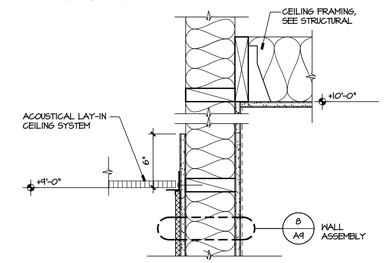
22 WALL AT CEILING
SCALE: 1 1/2" = 1'-0"



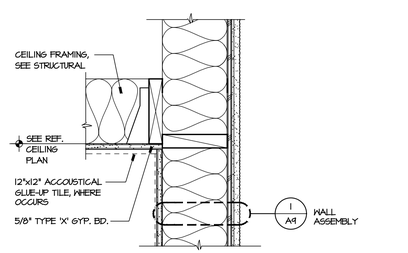
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SCALE: 1 1/2" = 1'-0"



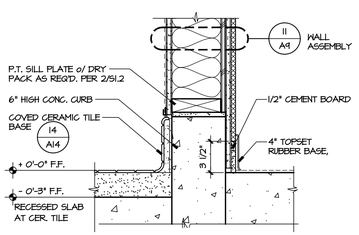
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SCALE: 1 1/2" = 1'-0"



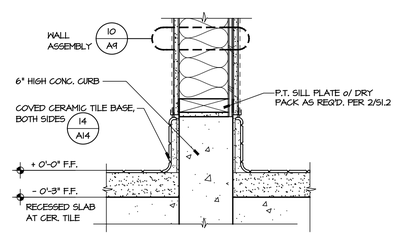
7 WALL AT CEILING
SCALE: 1 1/2" = 1'-0"



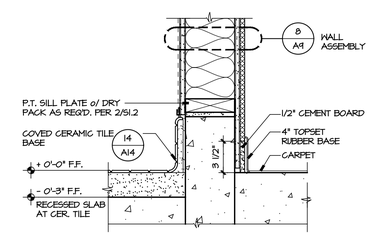
2 WALL AT CEILING
SCALE: 1 1/2" = 1'-0"



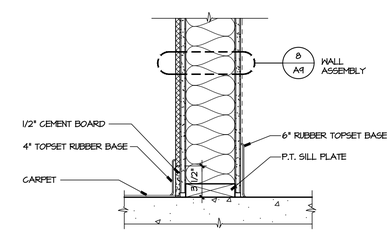
21 WALL AT BASE
SCALE: 1 1/2" = 1'-0"



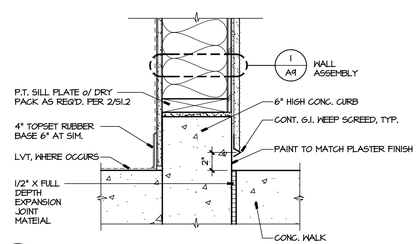
16 WALL AT BASE
SCALE: 1 1/2" = 1'-0"



11 WALL AT BASE
SCALE: 1 1/2" = 1'-0"



6 WALL AT BASE
SCALE: 1 1/2" = 1'-0"



1 WALL AT BASE
SCALE: 1 1/2" = 1'-0"

APPROVALS

FILE # 10-28 | APPLICATION # 02-122132

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LICENSED ARCHITECT
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No. C-34290
REN: 05-31-25
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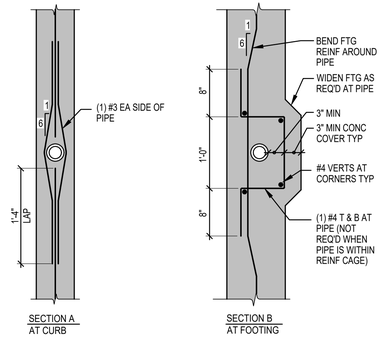
REVISIONS

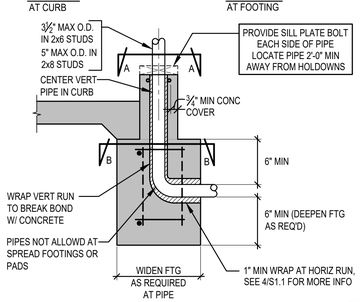
MANGINI ARCHITECTURE | INGENUITY.
MANGINI ASSOCIATES INC.
4320 West Mineral King Avenue
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www.mangini.us
(559) 627-1926 Office
(559) 627-1926 Fax

TITLE: DETAILS

A16

PROJECT 23044

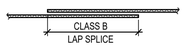




DRAIN PIPE AT FOOTING

NTS 3008-04 — 9 / S1.1

BAR SIZE	TENSION LAP SPLICE LENGTH (INCHES)					
	CONC COVER = 0.75"		CONC COVER = 1.5"		CONC COVER = 2"	
	TOP	OTHER	TOP	OTHER	TOP	OTHER
#3	17	13	17	13	17	13
#4	28	22	23	18	23	18
#5	41	32	28	22	28	22
#6	56	43	34	26	34	26
#7	90	69	55	43	49	38
#8	112	86	70	54	56	43
#9	135	104	86	66	69	53
#10	162	125	105	81	85	66
#11	190	146	126	97	102	79

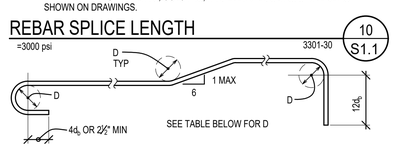


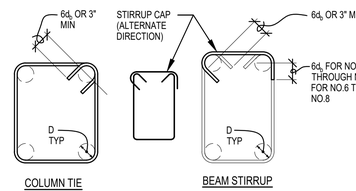
NOTES:

1. LAP SPLICES SHOWN CONFORM TO CLASS "B" SPLICES FOR NORMAL WEIGHT CONCRETE PER ACI 318-19.
2. USE THE SPLICE LENGTH GIVEN FOR TOP BARS WHEN MORE THAN 12" OF CONCRETE IS CAST BELOW HORIZONTAL BARS IN THE MEMBER. USE THE SPLICE LENGTH FOR BOTTOM BARS FOR ALL OTHER CONDITIONS.
3. SPLICES IN FOOTINGS, WALLS, AND SLABS ON GRADE SHALL BE STAGGERED AT LEAST 24". SPLICE IN BEAMS, COLUMNS, AND ELEVATED SLABS SHALL BE AS SHOWN ON DRAWINGS.

REBAR SPLICE LENGTH

=3000 psi — 3301-30 — 10 / S1.1



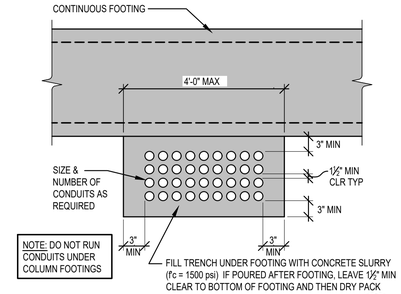


MINIMUM DIAMETERS OF BEND		
SIZE	TIES & STIRRUPS	BARS OTHER THAN TIES & STIRRUPS
	D	D
NO. 3 THROUGH NO. 5	4 d_b	6 d_b
NO. 6 THROUGH NO. 8	6 d_b	6 d_b
NO. 9 THROUGH NO. 11	8 d_b	8 d_b
NO. 14 THROUGH NO. 18	10 d_b	10 d_b

d_b = BAR DIAMETER
D = MINIMUM INSIDE BEND DIAMETER

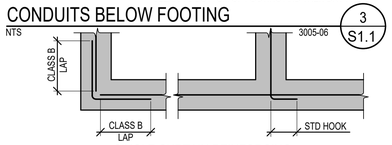
TYP REINFORCING BENDS

NTS 3303-03 — 11 / S1.1

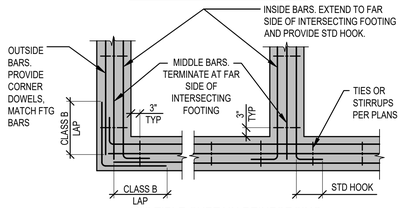


CONDUITS BELOW FOOTING

NTS 3005-06 — 3 / S1.1



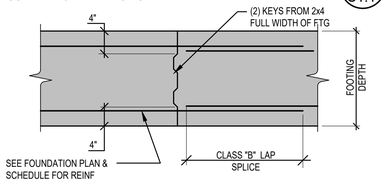
SINGLE CURTAIN REINFORCING



MULTIPLE CURTAIN REINFORCING

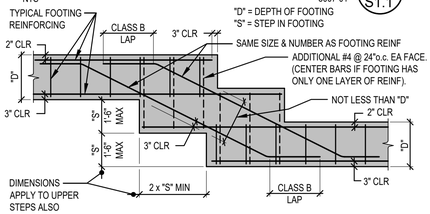
TYPICAL REINF AT FTG

CORNERS & INTERSECTIONS — NTS 3006-01 — 4 / S1.1



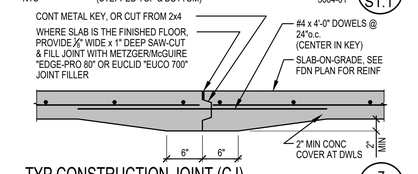
COLD JOINT AT CONT FTG

NTS 3007-01 — 5 / S1.1



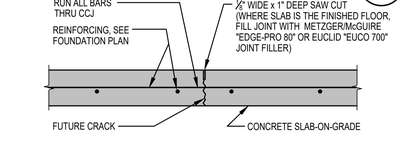
TYPICAL STEPPED FOOTING

NTS (STEPPED TOP & BOTTOM) 3004-01 — 6 / S1.1



TYP CONSTRUCTION JOINT (CJ)

(AT SLAB WITH REBAR) NTS 3102-01 — 7 / S1.1



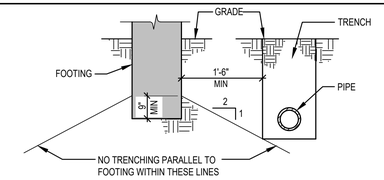
SAW CUTS MUST BE MADE AT EACH LOCATION AS SOON AS THE SLAB WILL SUPPORT THE WEIGHT OF THE SAW AND THE OPERATOR, NORMALLY WITHIN 2 HOURS AFTER FINISHING. USE A SAW WHICH IS SPECIALLY DESIGNED FOR CUTTING FRESH CONCRETE, SUCH AS "SOFF-CUT" OR EQUAL.

CRACK CONTROL JOINT (CCJ)

(AT SLAB WITH REBAR) NTS 3102-02 — 8 / S1.1

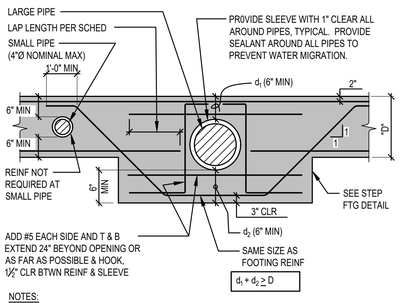
ABBREVIATIONS

AB	ANCHOR BOLT	(E)	EXISTING	O.C.	ON CENTER
ACI	AMERICAN CONCRETE INSTITUTE	EA	EACH	O.D.	OUTSIDE DIAMETER
		EJ	EXPANSION JOINT	O.H.	OPPOSITE HAND
ADD'L	ADDITIONAL	ELEV	ELEVATION	OPNG	OPENING
AISC	AMERICAN INSTITUTE OF STEEL CONSTRUCTION	EN	EDGE NAILING	OPP	OPPOSITE
		ENGR	ENGINEER	PC	PRE-CAST
		EQ	EQUAL	PERP	PERPENDICULAR
ALT	ALTERNATE	EQUIP	EQUIPMENT	PJP	PARTIAL JOINT PENETRATION
ARCH	ARCHITECTURAL	EXIST	EXISTING		
ASTM	AMERICAN SOCIETY FOR TESTING AND MATERIALS	EXP	EXPOSED		PLATE
		EXT	EXTERIOR	PLYWD	PLYWOOD
		FDN	FOUNDATION	PSF	POUNDS PER SQUARE FOOT
BEV	BEVELED	FHWS	FLAT HEAD WOOD SCREW		
BLDG	BUILDING			PSI	POUNDS PER SQUARE INCH
BLK	BLOCK	FIN	FINISH, FINISHED		
BLKG	BLOCKING	FLG	FLANGE	PT	PRESSURE TREATED
BLT	BOLT	FLR	FLOOR	R	RADIUS
BM	BEAM	F.O.	FACE OF	REF	REFERENCE
BN	BOUNDARY NAILING	FOB	FACE OF BLOCK	REINF	REINFORCING
B.O.	BOTTOM OF, BY OTHERS	FOC	FACE OF CONCRETE	REQD	REQUIRED
		FOS	FACE OF STUDS, FACE OF STEEL	RND	ROUND
BOT	BOTTOM			RHWS	ROUND HEAD WOOD SCREW
BP	BASE PLATE	FRMG	FRAMING		
BRG	BEARING	FS	FAR SIDE	SCHED	SCHEDULE
BTWN	BETWEEN	FT (')	FEET, FOOT	SDS	SELF-DRILLING SCREW
CBC	CALIFORNIA BUILDING CODE	FTG	FOOTING		
		GA	GAGE, GAUGE	SECT	SECTION
C.C.	CENTER TO CENTER	GALV	GALVANIZED	SHT	SHEET
CCJ	CRACK CONTROL JOINT	GC	GENERAL CONTRACTOR	SHTG	SHEATHING
		GL	GLU-LAM	SIM	SIMILAR
CIP	CAST IN PLACE	GLB	GLU-LAM BEAM	SIMP	SIMPSON (BRAND NAME)
CJ	CONSTRUCTION JOINT	GR	GRADE		
CJP	COMPLETE JOINT PENETRATION	GSM	GAUGE SHEET METAL	SLRS	SEISMIC LOAD RESISTING
		GYP BD	GYPSUM BOARD	SMS	SHEET METAL SCREW
	CENTER LINE	HD	HOLDOWN	SPEC	SPECIFICATION
CLG	CEILING	HDR	HEADER	SPECS	SPECIFICATIONS
CLR	CLEAR	HORIZ	HORIZONTAL	SQ	SQUARE
CMU	CONCRETE MASONRY UNIT	HSS	HOLLOW STEEL SECTIONS	STAGG	STAGGER
				STAGG'D	STAGGERED
COL	COLUMN	HT	HEIGHT	STD	STANDARD
CONC	CONCRETE	I.D.	INSIDE DIAMETER	STL	STEEL
COND	CONDITION	IN. (")	INCH	STIFF	STIFFENER
CONN	CONNECTION	INFO	INFORMATION	STRUCT	STRUCTURAL
COORD	COORDINATE	INT	INTERIOR	SUSP	SUSPENDED
CONSTR	CONSTRUCTION	LAM	LAMINATED	SYMM	SYMMETRICAL
CONT	CONTINUOUS	LBS (#)	POUNDS	T & B	TOP AND BOTTOM
CONT'D	CONTINUED	LLH	LONG LEG HORIZONTAL	TEMP	TEMPORARY
CONTR	CONTRACTOR	LLV	LONG LEG VERTICAL	THK	THICK
CSK	COUNTER SINK	LOC	LOCATION	T.O.	TOP OF
DBL	DOUBLE	LONGIT	LONGITUDINAL	TOS	TOP OF STEEL
DEMO	DEMOLITION	LT	LIGHT	TRANS	TRANSVERSE
DET	DETAIL	LT WT	LIGHT WEIGHT	TYP	TYPICAL
DETS	DETAILS	MAS	MASONRY	UBC	UNIFORM BUILDING CODE
DF	DOUGLAS FIR	MAX	MAXIMUM		
DIA (Ø)	DIAMETER	MB	MACHINE BOLT	UON	UNLESS OTHERWISE NOTED
DIAG	DIAGONAL	MCJ	MASONRY CONTROL JOINT		
DIM	DIMENSION	MECH	MECHANICAL	VERT	VERTICAL
DIST	DISTANCE	MFR	MANUFACTURER	W/	WITH
DO	DITTO	MIN	MINIMUM	WD	WOOD
DP	DEEP	MTL	METAL	WF	WIDE FLANGE
DWG	DRAWING	(N)	NEW	WP	WORK POINT
DWGS	DRAWINGS	NS	NEAR SIDE, NON-SHRINK	WT	WEIGHT
DWL	DOWEL	NSA	NELSON STUD ANCHOR	WWF	WELDED WIRE FABRIC
		NTS	NOT TO SCALE		



TRENCHING NEAR FOOTINGS

NTS 3005-03 — 2 / S1.1



NOTES:

1. ALL PENETRATIONS SHALL BE PERPENDICULAR TO THE LINE OF THE FOOTING, TYPICAL.
2. NO PIPES ALLOWED THRU COLUMN PADS.
3. NO PIPES ALLOWED WITHIN 24" OF HOLDOWN BOLTS
4. SLEEVES FOR ADJACENT PIPES SHALL BE SPACED NO CLOSER THAN THREE DIAMETERS, CENTER LINE TO CENTER LINE, BASED ON DIAMETER OF LARGER SLEEVE.
5. ADDITIONAL REINFORCING SHOWN AROUND LARGE PIPE IS REQ'D FOR ALL PIPES LARGER THAN 4"Ø EVEN IF PIPE DOES NOT INTERRUPT REINFORCING.

PIPES THRU FOOTINGS

NTS 3005-04 — 3 / S1.1

CONCRETE NOTES

1. FORMWORK: ALL MOLDS, ORNAMENTS, GROOVES ETC. SHOWN ON THE ARCHITECTURAL DRAWINGS SHALL BE PROVIDED FOR IN THE FORMWORK BEFORE THE CONCRETE IS POURED.
2. EMBEDDED ITEMS: ALL REINFORCING STEEL, ANCHOR BOLTS, DOWELS AND OTHER EMBEDS SHALL BE IN PLACE AND SECURED TO FORMWORK PRIOR TO POURING OF CONCRETE.
3. PLUMBING: REFER TO BOTH ARCHITECTURAL AND MECHANICAL DRAWINGS FOR LOCATION OF PLUMBING FIXTURES.
4. PIPES: NO PIPES OR DUCTS SHALL BE PLACED IN CONCRETE WALLS OR STRUCTURAL SLABS UNLESS SPECIFICALLY DETAILED.
5. CONSTRUCTION JOINTS: CONSTRUCTION JOINTS NOT INDICATED ON THE DRAWINGS SHALL BE SO MADE AND LOCATED AS NOT TO IMPAIR THE STRENGTH OF THE STRUCTURE. PROVISION SHALL BE MADE FOR THE TRANSFER OF SHEAR AND OTHER FORCES THROUGH THE JOINTS. THE CONTRACTOR SHALL OBTAIN THE ARCHITECT'S APPROVAL OF CONSTRUCTION JOINT LOCATION IN ALL STRUCTURAL SLABS, BEAMS, AND SHEAR WALLS.
6. HORIZONTAL JOINTS: THE SURFACE OF ALL HORIZONTAL CONSTRUCTION JOINTS, INCLUDING JOINTS BETWEEN FOOTINGS AND SLABS ON GRADE, SHALL BE CLEANED AND ROUGHENED BY SANDBLASTING OR OTHER PRE-APPROVED MEANS, IN ORDER TO REMOVE THE ENTIRE SURFACE AND EXPOSE CLEAN AGGREGATE SOLIDLY EMBEDDED IN MORTAR MATRIX. IN THE EVENT THAT THE CONTACT SURFACE BECOMES COATED WITH EARTH, SAWDUST, ETC, AFTER BEING CLEANED, THE ENTIRE SURFACE SO COATED SHALL BE RECLEANED.
7. QUALITY: THE QUALITY AND DESIGN OF CONCRETE SHALL BE IN ACCORDANCE WITH THE CALIFORNIA BUILDING CODE EXCEPT ITEMS NOT SPECIFICALLY COVERED THEREIN SHALL ALSO CONFORM WITH ACI 318.
8. REINFORCING: ALL REINFORCING SHALL BE NEW STOCK DEFORMED BARS CONFORMING TO ASTM A615, EXCEPT STEEL TO BE WELDED SHALL BE ASTM A706.
   a.) #3 BARS AND SMALLER.....GRADE 40
   b.) #4 BARS AND LARGER.....GRADE 60 (EXCEPT THAT TIES & STIRRUPS MAY BE GRADE 40)
   c.) COLUMN SPIRALS, IF USED, SHALL CONFORM TO "STANDARD SPECIFICATION FOR CARBON-STEEL WIRE AND WELDED WIRE REINFORCEMENT, PLAIN AND DEFORMED, FOR CONCRETE" ASTM A1064 WITH A MINIMUM YIELD STRENGTH OF 70,000 psi. FABRICATION SHALL CONFORM TO ACI MANUAL OF STANDARD PRACTICE.
   d.) SEPARATE BARS 1 ½ DIAMETERS CLEAR OR 1 ½" CLEAR WHICHEVER IS LARGER.
9. SPLICES: SPLICES FOR REINFORCING STEEL SHALL BE "CLASS B" AS DEFINED BY THE CBC AND ACI CODES UNLESS SPECIFICALLY SHOWN OTHERWISE. THE LENGTH OF LAP SHALL BE BASED ON GRADE 60 STEEL AND THE CONCRETE STRENGTH SHOWN BELOW. SEE REBAR SPLICE DETAIL.
10. FIELD SPLICES: FIELD SPLICES NOT ORIGINALLY SHOWN ON SHOP DRAWINGS WILL BE PERMITTED ONLY WITH APPROVAL FROM THE ARCHITECT. SUCH SPLICES SHALL BE MADE WITH FULL PENETRATION BUTT WELDING UNLESS OTHERWISE NOTED OR DETAILED.
11. WELDING OF REINFORCING: ALL WELDING OF REINFORCING STEEL SHALL BE WITH LOW HYDROGEN ELECTRODES AND SHALL COMPLY WITH ANSI/AWS D1.4. WELDING IS ALLOWED ONLY WHERE INDICATED ON DRAWINGS. REINFORCING SHALL COMPLY WITH ASTM A706. SHOP FUSION WELDED STIRRUP/TIE CAGES (OR SPIRAL ASSEMBLIES) CONSISTING OF ASTM A706 REINFORCING STIRRUPS/TIES AND LONGITUDINAL HOLDING WIRES OF MAXIMUM SIZE W5 AND CONFORMING TO ASTM A1064 SHALL BE PERMITTED.
12. CONCRETE COVER: MINIMUM CONCRETE COVER FOR REINFORCING SHALL BE AS FOLLOWS:
    CAST AGAINST EARTH (EXCEPT SLABS ON GRADE).....3"
    SLABS ON GRADE (TO BOTTOM).....2"
    EXPOSED TO EARTH OR WEATHER:
    #5 BARS AND SMALLER.....1½"
    #6 BARS AND LARGER.....2"
    NOT EXPOSED TO WEATHER OR IN CONTACT WITH THE GROUND:
    SLABS, WALLS, JOISTS:
    #11 BARS AND SMALLER.....¾"
    #14 AND #18 BARS.....1½"
    BEAMS, GIRDERS, AND COLUMNS: PRINCIPLE REINFORCING, TIES, STIRRUPS, OR SPIRALS.....1½"
    SHELLS AND FOLDED PLATE MEMBERS:
    #5 BARS AND SMALLER.....½"
    #6 BARS AND LARGER.....¾"
13. WIRE MESH: WELDED WIRE FABRIC SHALL COMPLY WITH ASTM A1064.
14. ANCHOR BOLTS: ALL ANCHOR BOLTS SHALL BE HEADED BOLTS AND SHALL COMPLY WITH ASTM A307 OR ASTM F1554 Gr. 36, UON. NO UPSET THREADS ALLOWED.
15. AGGREGATE SIZE: MAXIMUM AGGREGATE SIZE SHALL BE:
    1 ½" AT INTERIOR SLABS ON GRADE
    1" AT ALL OTHER CONCRETE
    SEE PROJECT SPECIFICATIONS FOR COMBINED GRADATION LIMITS.
16. MIX DESIGN: CONCRETE SHALL HAVE 5 ½ SACKS MINIMUM TYPE-I/II PORTLAND CEMENT PER CUBIC YARD AND SHALL CONTAIN 15% TO 20% FLY ASH PER ASTM C-618 CLASS F. EXCEPTION: FLY ASH IS NOT PERMITTED IN CONCRETE TO BE POLISHED.
17. CONCRETE STRENGTH: CONCRETE SHALL HAVE A MINIMUM ULTIMATE COMPRESSIVE STRENGTH IN 28 DAYS AS FOLLOWS:
    f'_c = 3,000 psi AT INTERIOR SLABS ON GRADE
    f'_c = 3,500 psi AT POLISHED CONCRETE
    f'_c = 3,000 psi AT ALL OTHER CONCRETE
18. WATER/CEMENT RATIO: MAXIMUM WATER/CEMENT RATIO SHALL BE:
    0.50 AT INTERIOR SLABS ON GRADE
    0.56 AT ALL OTHER CONCRETE

LEGEND

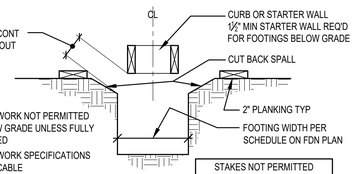
CONCRETE
MASONRY
STEEL
CURB
CONTINUOUS WOOD MEMBER
DISCONTINUOUS WOOD MEMBER (BLOCKING)

1 / S1.1 — DETAIL NO. / SHEET DRAWN ON
FOOTING STEP
ELEVATION BOTTOM OF FOOTING
ELEVATION
ELEVATION TOP OF STEEL

FOUNDATIONS: MANDATORY MINIMUM FORMWORK

(UNLESS FULLY FORMED)

FOUNDATION CONCRETE MAY BE PLACED DIRECTLY INTO NEAT EXCAVATIONS PROVIDED THE FOUNDATION TRENCH WALLS ARE STABLE AS DETERMINED BY THE ARCHITECT (STRUCTURAL ENGINEER) SUBJECT TO THE APPROVAL OF THE DIVISION OF THE STATE ARCHITECT, IN SUCH CASE THE MINIMUM FORMWORK SHOWN ON THE DRAWINGS IS MANDATORY TO INSURE CLEAN EXCAVATIONS IMMEDIATELY PRIOR TO AND DURING THE PLACING OF THE CONCRETE.



NOTES:

1. FORMWORK NOT PERMITTED BELOW GRADE UNLESS FULLY FORMED
2. FORMWORK SPECIFICATIONS APPLICABLE
3. AFTER CONCRETE HAS SET, REMOVE LAITANCE AND SCUM

STAKES NOT PERMITTED WITHIN FOOTING SECTIONS

STARTER WALL REQUIRED FOR ALL MASONRY OR CONCRETE WALLS WHEN BELOW GRADE

FOUNDATION TRENCHING AND FORMING DETAIL

NTS (CCR TITLE 24) 3001-02 — 1 / S1.1

GENERAL NOTES

1. DISCREPANCIES: THE CONTRACTOR SHALL VERIFY ALL DIMENSIONS, ELEVATIONS, AND CONDITIONS BEFORE STARTING WORK; AND SHALL NOTIFY THE ARCHITECT IMMEDIATELY IF ANY DISCREPANCIES ARE FOUND.
2. TYPICAL DETAILS: THE TYPICAL DETAILS AND NOTES SHOWN ON THESE SHEETS SHALL APPLY IN ALL CASES UNLESS SHOWN OTHERWISE. WHERE NO DETAILS ARE SHOWN, CONSTRUCTION SHALL BE AS SHOWN FOR OTHER SIMILAR WORK. NOTES AND DETAILS ON DRAWINGS SHALL TAKE PRECEDENCE OVER GENERAL NOTES AND TYPICAL DETAILS. ALL WORK AND CONSTRUCTION SHALL COMPLY WITH APPLICABLE BUILDING CODES, REGULATIONS, AND SAFETY REQUIREMENTS.
3. OTHER TRADES: SEE ARCHITECTURAL, ELECTRICAL, AND MECHANICAL DRAWINGS FOR SIZE AND LOCATION OF PIPE, VENT, DUCT, AND OTHER OPENINGS AND DETAILS NOT SHOWN ON STRUCTURAL DRAWINGS. VERIFY ALL DIMENSIONS WITH THE ARCHITECTURAL DRAWINGS.
4. SHORING AND BRACING: IT SHALL BE THE CONTRACTOR'S RESPONSIBILITY TO DESIGN AND PROVIDE ADEQUATE SHORING, BRACING, AND FORMWORK AS REQUIRED FOR THE CONSTRUCTION OF THIS BUILDING. PROVIDE TEMPORARY BRACING AS REQUIRED TO HOLD THE VARIOUS ELEMENTS IN PLACE UNTIL FINAL SUPPORT IS SECURELY ANCHORED.
5. EXCAVATION: THE CONTRACTOR SHALL BE RESPONSIBLE FOR ALL EXCAVATION PROCEDURES AND FOR PROTECTION OF ADJACENT PROPERTY, STRUCTURES, STREETS, AND UTILITIES IN ACCORDANCE WITH THE LOCAL BUILDING DEPARTMENT.
6. BACKFILL: DO NOT BACKFILL AROUND THE EXTERIOR PERIMETER WALLS UNTIL AFTER THE WALLS ARE SUPPORTED BY THE COMPLETION OF INTERIOR FLOOR SYSTEMS. IF THE FLOOR SLABS ARE CONCRETE, DO NOT BACKFILL UNTIL 7 DAYS MINIMUM AFTER COMPLETION OF THE FLOOR SLABS. DO NOT BACKFILL UNTIL AFTER COMPLETION AND INSPECTION OF DAMPPROOFING.
7. DESIGN INTENT: IT IS THE INTENTION OF THESE DRAWINGS TO PROVIDE THE FOLLOWING CONTINUITIES IN THE STRUCTURE:
   a.) ALL ROOF AND FLOOR MEMBERS LABELED AS STRUTS SHALL BE CONTINUOUSLY CONNECTED FOR THE FULL LENGTH OF THE ROOF OR FLOOR SYSTEM UNLESS OTHERWISE NOTED.
   b.) ALL WALL BRACING AND/OR SHEAR PANELS SHALL BE CONNECTED TO THE ROOF AND/OR FLOOR STRUTS.
   c.) ALL MASONRY AND CONCRETE WALLS SHALL BE POSITIVELY ANCHORED TO THE ROOF AND FLOOR SYSTEMS AT MAXIMUM INTERVALS OF 4'-0"o.c. UON.

   IF DETAILS REQUIRED TO PROVIDE THE ABOVE CONTINUITIES ARE NOT EVIDENT ON THE DRAWINGS, THE CONTRACTOR SHALL CONTACT THE ARCHITECT FOR CLARIFICATION.
8. REGARDING SCHEDULES: NOT ALL ITEMS SHOWN ON SCHEDULES ARE NECESSARILY USED ON EACH SHEET WHERE SCHEDULE APPEARS.

DESIGN DATA

GOVERNING CODE: 2022 CALIFORNIA BUILDING CODE (CBC) (PART II TITLE 24 CCR)

DESIGN LOADS:	UNIFORM:		CONCENTRATED:
ROOF LIVE LOAD:	20 psf	*	300 lbs.
FLOOR LIVE LOAD:	N/A psf	**	N/A lbs.
ROOF SNOW LOAD:	N/A psf		

* LIVE LOAD REDUCTION PER CBC 1607A.14.2.1

** LIVE LOAD REDUCTION PER CBC 1607A.12.1 FOR LOADS LESS THAN 100 psf.

FLOOD DESIGN DATA: THIS PROJECT DOES NOT FALL WITHIN A FLOOD HAZARD ZONE.

WIND DESIGN:
METHOD: DIRECTIONAL PROCEDURE (ASCE 7-16, CH27)
BASIC WIND SPEED: 93 MPH
EXPOSURE CATEGORY: C

SEISMIC DESIGN:
RISK CATEGORY: II
IMPORTANCE FACTOR, I_e: 1.0
SEISMIC DESIGN CATEGORY: D
S_s = 1.782 S_1 = 0.592
S_{DS} = 1.426 S_{D1} = 0.671
SYSTEM: WOOD SHEAR WALLS: R = 6.5
SEISMIC RESPONSE COEFFICIENT: C_s = 0.219
ANALYSIS PROCEDURE: EQUIVALENT LATERAL FORCE

IRREGULARITIES:
HORIZONTAL: N/A
VERTICAL: N/A
BASE LEVEL: +0'-0"

SOIL DATA:
CHARACTER OF SOIL: SILTY SAND
SITE CLASS: D
DESIGN SOIL PRESSURE: 3,000 psf

GEOTECHNICAL REPORT No. 012-23220
PREPARED BY KRAZAN & ASSOCIATES INC AND DATED FEBRUARY 7, 2024

FOUNDATION NOTES

1. REFERENCE ELEVATION: REFERENCE ELEVATION (0'-0") IS TOP OF FINISHED FLOOR UNLESS OTHERWISE NOTED (UON).
2. EARTHWORK: PREPARE BUILDING PAD AS SHOWN ON DETAIL 1/S2.2 AND IN ACCORDANCE WITH THE RECOMMENDATIONS OF THE SOILS REPORT LISTED UNDER "DESIGN DATA".
3. FOOTINGS: ALL FOOTINGS SHALL EXTEND TO FIRM BEARING IN UNDISTURBED SOIL OR ENGINEERED FILL. IN THE EVENT THAT FOOTINGS ARE OVER-EXCAVATED, THEY SHALL BE FILLED WITH CONCRETE OR PROPERLY COMPACTED AND TESTED ENGINEERED FILL. ALL LOOSE SOIL AND DEBRIS MUST BE REMOVED PRIOR TO PLACING CONCRETE.
4. FOOTING TRENCHES: SEE FOUNDATION FORMING AND TRENCHING DETAIL FOR TRENCHING OF FOOTINGS.
5. STEPPED FOOTINGS: FOUNDATIONS FOR ALL BUILDINGS WHERE THE SURFACE OF THE GROUND SLOPES MORE THAN 1 FOOT IN 10 SHALL BE LEVEL OR SHALL BE STEPPED SO THAT BOTH TOP AND BOTTOM OF SUCH FOUNDATIONS ARE LEVEL.
6. EXTERIOR SLABS AND WALKWAYS: REFER TO ARCHITECTURAL DRAWINGS FOR LOCATION AND EXTENT OF EXTERIOR SLABS AND WALKWAYS.
7. NON-BEARING WALLS: REFER TO ARCHITECTURAL DRAWINGS FOR NON-BEARING WALLS NOT SHOWN ON STRUCTURAL DRAWINGS.
8. SLABS ON GRADE: ALL SLABS ON GRADE SHALL HAVE THICKNESS AND REINFORCING SHOWN ON 2/S2.2
9. EMBEDDED ITEMS: ALL REINFORCING STEEL, ANCHOR BOLTS, AND OTHER EMBEDDED ITEMS SHALL BE SECURELY POSITIONED AND ANCHORED TO THE FORMS PRIOR TO POURING OF CONCRETE.
10. CRACK CONTROL JOINTS: REFER TO FOUNDATION PLAN FOR LOCATION OF CRACK CONTROL JOINTS IN FLOOR SLABS. IF NOT SHOWN, JOINT SPACING SHALL NOT EXCEED 12 FEET IN EACH DIRECTION.
11. CONSTRUCTION JOINTS: PROVIDE CONSTRUCTION JOINTS WHERE CONCRETE POURS ARE STOPPED AND WHERE SHOWN ON FOUNDATION PLAN.
12. WALL DOWELS: ALL CONCRETE AND MASONRY WALLS SHALL BE DOWELED INTO FOOTINGS WITH BARS OF THE SAME SIZE AND SPACING AS THE WALL BARS UNLESS OTHERWISE NOTED. SEE CONCRETE NOTES FOR LAP REQUIREMENTS.
13. CONTINUOUS FOOTING REINFORCEMENT: ALL CONTINUOUS FOOTING REINFORCEMENT SHALL CONTINUE THROUGH PAD FOOTINGS. SEE DET 9/S1.2

REGISTERED PROFESSIONAL ENGINEER JACK D. BRENGER No. S5792 Exp. 6-30-25 STRUCTURAL STATE OF CALIFORNIA

ASD
advanced structural design, inc.
STRUCTURAL ENGINEERS
7112 N. FRESNO STREET, suite 311
Fresno, California 93720
(559) 432-4151 Fax 432-9315
asdi@asdiengr.com

APPROVALS

FILE # 10-28 — APPLICATION # 02-122132

IDENTIFICATION STAMP
DIV. OF THE STATE ARCHITECT
APP: 02-122132 INC: A
REVIEWED FOR
SS ☑ FLS ☑ ACS ☑
DATE: 08/06/2024

LICENSED ARCHITECT MICHAEL J. SCOTT No. C-34290 REN: 08-31-25 STATE OF CALIFORNIA

DATE: JANUARY 31, 2024

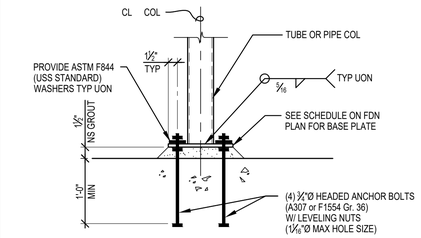
NEW TK CLASSROOM AT CHENEY KINDERGARTEN

COALINGA-HURON UNIFIED SCHOOL DISTRICT
COALINGA, FRESNO COUNTY, CA

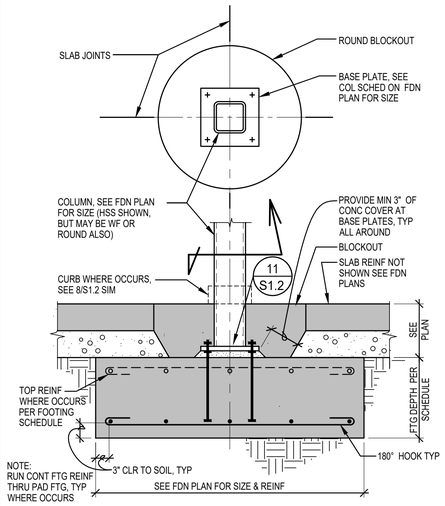
REVISIONS

MANGINI ARCHITECTURE
BARENG MORRELLI SCOTT
MANGINI ASSOCIATES INC.
4320 West Mineral King Avenue
Visalia, California 93291
www.mangini.us
(559) 627.0530 Office
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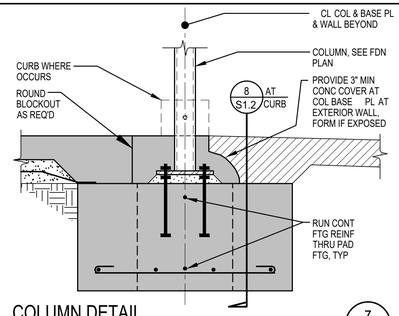
TITLE
TYPICAL NOTES AND D



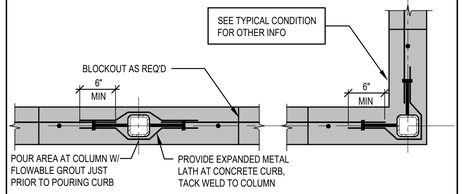
BASE PLATE DETAIL
TUBE OR PIPE COLUMN — NTS — 5101-01 — 11 / S1.2

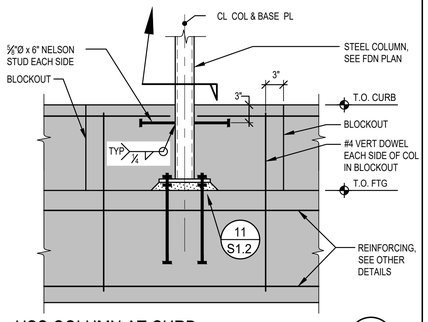


COLUMN FOOTING
NTS — 3501-02 — 12 / S1.2

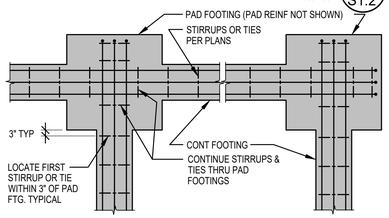


COLUMN DETAIL
NTS — 3501-04 — 7 / S1.2



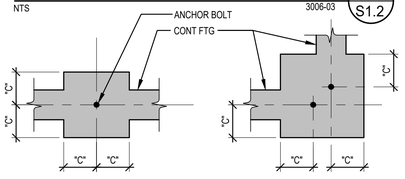


HSS COLUMN AT CURB
NTS — 3501-03 — 8 / S1.2



NOTES:
1. EXTEND GRADE BEAM BARS TO FAR SIDE OF PAD FOOTING AND PROVIDE STD HOOK. (TURN UP/DOWN)
2. PROVIDE SLAB DOWELS AND WALL DOWELS SHOWN ON CONT FOOTING DETAILS IN PAD FOOTING REGION ALSO.

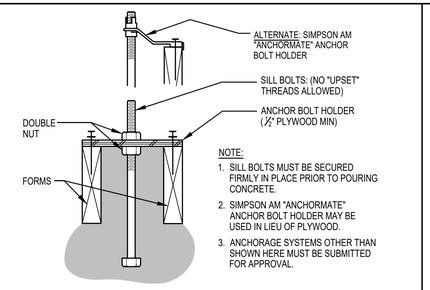
CONT FTG REINF AT PAD FTGS
NTS — 3006-03 — 9 / S1.2



HOLDOWN	"C"
HDU2	9"
HDU4	9"
HDU5	9"
HDU8	15"
HDU11	17"
HDU14	17"

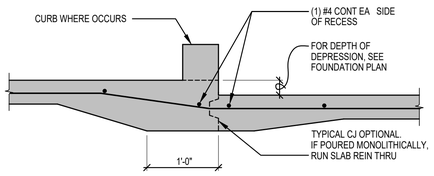
NOTES:
1. WIDEN FOOTINGS AS REQUIRED TO PROVIDE MINIMUM CONCRETE COVER "C" AT EACH ANCHOR BOLT.
2. WIDENED FOOTINGS ARE NOT SHOWN ON FOUNDATION PLANS.
3. NO ADDITIONAL REINF IS REQUIRED UON.

CONC COVER AT HD ANCHORS
NTS — 3206-01 — 10 / S1.2

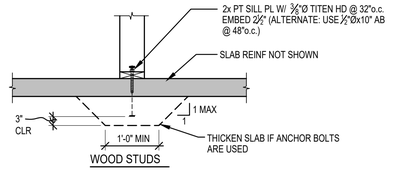


NOTE:
1. SILL BOLTS MUST BE SECURED FIRMLY IN PLACE PRIOR TO POURING CONCRETE.
2. SIMPSON AM "ANCHORMATE" ANCHOR BOLT HOLDER MAY BE USED IN LIEU OF PLYWOOD.
3. ANCHORAGE SYSTEMS OTHER THAN SHOWN HERE MUST BE SUBMITTED FOR APPROVAL.

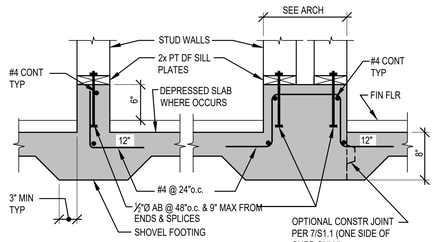
SILL BOLT SETTING DETAIL
NTS — 3205-02 — 3 / S1.2

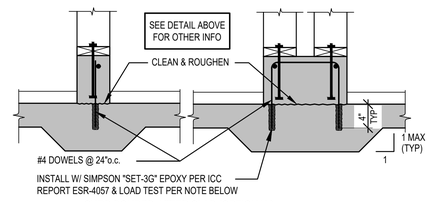


TYPICAL DEPRESSED SLAB
NTS — 3104-01 — 4 / S1.2



TYPICAL INTERIOR NON-BEARING WALL
NTS — 3101-03D — 5 / S1.2





TESTING: TENSION TEST 25% OF ANCHORS TO 2,700 LBS. IF ANY ANCHOR FAILS TEST ALL ANCHORS NOT PREVIOUSLY TESTED UNTIL 20 CONSECUTIVE ANCHORS PASS, THEN RESUME THE 25% TEST FREQUENCY.

CURBS AT INTERIOR WALLS
(NON-BEARING & NON-SHEAR) — 3101-00 — 6 / S1.2

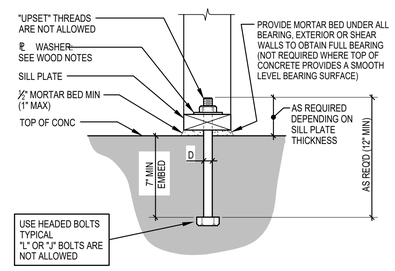
ANCHOR DIAMETER	INSTALLATION REQUIREMENTS (CARBON STEEL ANCHORS)								
	HILTI KB-TZ2		SIMPSON STRONG-BOLT 2		DEWALT POWER-STUD+ SD2		SIMPSON TITEN HD	HILTI KH-EZ	DEWALT SCREW-BOLT+
	MINIMUM NOMINAL EMBED	INSTALL TORQUE (FT-LBS)	MINIMUM NOMINAL EMBED	INSTALL TORQUE (FT-LBS)	MINIMUM NOMINAL EMBED	INSTALL TORQUE (FT-LBS)	MINIMUM NOMINAL EMBED	MINIMUM NOMINAL EMBED	MINIMUM NOMINAL EMBED
¼"	1¾"	4	1¾"	4	-	-	1¾"	1¾"	1¾"
⅜"	3"	30	2⅜"	30	2⅜"	20	2⅜"	2⅜"	2⅜"
½"	3¾"	50	3⅜"	60	3⅜"	40	3⅜"	3"	2⅜"
⅝"	4⅜"	40	5⅛"	90	4⅜"	60	4"	3⅜"	3⅜"
¾"	5⅜"	110	5⅜"	150	5⅛"	110	5⅛"	4"	4⅜"
1"	6⅜"	185	9⅜"	230	-	-	-	-	-

GENERAL NOTES:
1. THE TESTING OF POST-INSTALLED ANCHORS SHALL BE DONE IN THE PRESENCE OF THE SPECIAL INSPECTOR AND A REPORT OF THE TEST RESULTS SHALL BE SUBMITTED TO THE ENFORCEMENT AGENCY. TEST ANCHORS, AS FOLLOWS:
   10% OF SILL PLATE BOLTS
   50% OF EQUIPMENT ANCHORAGE BOLTS
   100% OF ALL OTHER STRUCTURAL ANCHORS
   IF ANY ANCHOR FAILS, TEST ALL ANCHORS OF THE SAME CATEGORY NOT PREVIOUSLY TESTED UNTIL 20 CONSECUTIVE ANCHORS PASS THE TEST REQUIREMENTS. THE INITIAL TESTING FREQUENCY SHALL THEN BE RESUMED.
2. TEST PROCEDURE SHALL BE AS PERMITTED BY AN APPROVED TEST REPORT USING CRITERIA ADOPTED IN THE CALIFORNIA BUILDING CODE (CBC). TORQUE CONTROLLED POST-INSTALLED ANCHORS SHALL BE PERMITTED TO BE TESTED USING TORQUE BASED ON APPROVED TEST REPORT AS SHOWN IN TABLE ABOVE.
3. HOLES FOR ANCHORS SHALL BE DRILLED USING A CARBIDE-TIPPED DRILL BIT CONFORMING TO ANSI B212.15 W/ THE SAME NOMINAL DIAMETER AS THE ANCHOR.
4. TESTING IS NOT REQUIRED FOR POWER ACTUATED FASTENERS USED TO ATTACH TRACKS OF INTERIOR NON-SHEAR WALL PARTITIONS FOR SHEAR ONLY, WHERE THERE ARE AT LEAST THREE FASTENERS PER SEGMENT OF TRACK.
5. USE POST-INSTALLED ANCHORS ONLY WHERE SHOWN ON DRAWINGS.

REQUIREMENTS FOR TORQUE CONTROLLED ANCHORS:
1. ACCEPTANCE CRITERIA FOR POST-INSTALLED ANCHORS SHALL BE BASED ON APPROVED TEST REPORT USING CRITERIA ADOPTED IN THE CBC. FIELD TORQUE TESTS SHALL SATISFY THE FOLLOWING MINIMUM REQUIREMENTS:
   TORQUE WRENCH METHOD: ANCHORS TESTED WITH A CALIBRATED TORQUE WRENCH MUST ATTAIN THE SPECIFIED TORQUE WITHIN ¼ TURN OF THE NUT.
   EXCEPTIONS:
   a. WEDGE OR SLEEVE TYPE: ONE-QUARTER (¼) TURN OF THE NUT FOR A ¾" DIAMETER SLEEVE ANCHOR ONLY.
   b. THREADED (SCREW) TYPE: ONE-QUARTER (¼) TURN OF THE SCREW AFTER INITIAL SEATING OF THE SCREW HEAD.
2. TORQUE CONTROLLED ANCHORS MUST BE LISTED IN A CURRENT APPROVED TEST REPORT INCLUDING, BUT NOT LIMITED TO THE FOLLOWING:
   a. HILTI KB-TZ2 (ESR-4266)
   b. SIMPSON STRONG BOLT 2 (ESR-3037)
   c. DEWALT\POWERS POWER-STUD+ SD2 (ESR-2502)
   d. HILTI KH-EZ SCREW ANCHOR (ESR-3027)
   e. SIMPSON TITEN HD SCREW ANCHOR (ESR-2713)
   f. DEWALT\POWERS SCREWBOLT+ SCREW ANCHOR (ESR-3889)
3. INSTALL SCREW ANCHORS PER MANUFACTURER'S APPROVED TEST REPORT. DO NOT EXCEED MAXIMUM INSTALLATION TORQUE VALUES LISTED IN REPORT.

REQUIREMENTS FOR ADHESIVE ANCHORS:
1. FIELD TENSION TESTS SHALL SATISFY THE FOLLOWING MINIMUM REQUIREMENTS:
   HYDRAULIC RAM METHOD:
   ANCHORS TESTED WITH A HYDRAULIC JACK OR SPRING LOADED DEVICES SHALL MAINTAIN THE TEST LOAD FOR A MINIMUM OF 15 SECONDS AND SHALL EXHIBIT NO DISCERNIBLE MOVEMENT DURING THE TENSION TEST, E.G., AS EVIDENCED BY LOOSENING OF THE WASHER UNDER THE NUT.
2. TESTING OF SHEAR DOWELS ACROSS COLD JOINTS IN SLABS ON GRADE, WHERE THE SLAB IS NOT PART OF THE LATERAL FORCE-RESISTING SYSTEM SHALL NOT BE REQUIRED.
3. TENSION TEST LOAD SHALL BE AS INDICATED ON DETAILS.
4. ADHESIVE ANCHORS IDENTIFIED IN THE CONSTRUCTION DOCUMENTS AS INSTALLED IN A HORIZONTAL OR UPWARDLY INCLINED ORIENTATION TO RESIST SUSTAINED TENSILE LOADS SHALL BE INSTALLED BY CERTIFIED INSTALLERS IN ACCORDANCE WITH ACI 318-19 (SECTION 26.7.2). PROOF OF CURRENT CERTIFICATION SHALL BE SUBMITTED TO THE ARCHITECT & SEOR PRIOR TO INSTALLATION.
5. ADHESIVE ANCHORS SHALL BE INSTALLED IN CONCRETE HAVING A MINIMUM AGE OF 21 DAYS AT THE TIME OF ANCHOR INSTALLATION PER ACI 318-19 (SECTION 26.7.2(I)).

POST-INSTALLED ANCHORS IN CONCRETE
NTS — 3305-01(14) — 1 / S1.2



SILL BOLT DETAIL
NTS — 3205-01 — 2 / S1.2

APPROVALS

FILE # 10-28 — APPLICATION # 02-122132

IDENTIFICATION STAMP
DIV. OF THE STATE ARCHITECT
APP: 02-122132 INC: A
REVIEWED FOR
SS ☑ FLS ☑ ACS ☑
DATE: 08/06/2024

LICENSED ARCHITECT
MICHAEL J. SCOTT JR.
No. C-34290
REN: 08-31-25
STATE OF CALIFORNIA

DATE: JANUARY 31, 2024

NEW TK CLASSROOM AT CHENEY KINDERGARTEN
COALINGA-HURON UNIFIED SCHOOL DISTRICT
COALINGA, FRESNO COUNTY, CA

REVISIONS

MANGINI | ARCHITECTURE INGENUITY
BARENG MORRELLI SCOTT
MANGINI ASSOCIATES INC.
4320 West Mineral King Avenue
Visalia, California 93291
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(559) 627.0530 Office
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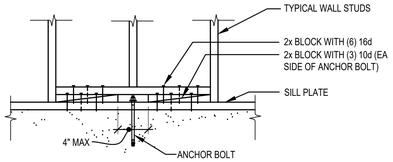
TITLE
TYPICAL NOTES AND DETAILS

S1.2

PROJECT 23044

REGISTERED PROFESSIONAL ENGINEER
JACK D. BRENGER
No. S5792
Exp. 6-30-25
STATE OF CALIFORNIA
STRUCTURAL

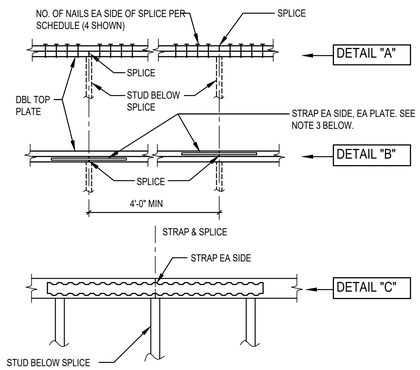
ASD
advanced structural design, inc.
STRUCTURAL ENGINEERS
7112 N. FRESNO STREET, suite 311
Fresno, California 93720
(559) 432-4151 Fax 432-9315
asdi@asdiengr.com



NOTE:
THIS DETAIL APPLIES WHERE ANCHOR BOLTS INTERFERE WITH STUDS.
(NOT ALLOWED UNDER KING STUDS OR JAMB STUDS)

SILL BOLT FALLS AT STUD

NTS 6304-02 — 7 / S1.3

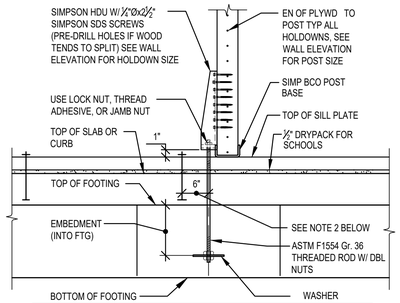


DETAIL "A" (NAILS)		DETAIL "B" (STRAPS)		DETAIL "C" (STRAPS AT 4x OR 6x)	
TYPE	NAIL SIZE	TYPE	SIMP STRAP	TYPE	SIMP STRAP
1	(4) - 16d	4	MSTA18	7	ST6236
2	(6) - 16d	5	MSTA24	8	-
3	(8) - 16d	6	MSTA30	9	-

NOTES:
1. BOTH TOP AND BOTTOM PLATES MUST BE SPLICED.
2. ALL SPLICES ARE TO OCCUR OVER A STUD.
3. USE 10d x ½" NAILS WHEN STRAPS ARE APPLIED DIRECTLY TO TOP PLATES.
   USE 10d x 2½" MIN NAILS WHEN STRAPS ARE APPLIED OVER PLYWOOD.

TOP PLATE SPLICE DETAIL

NTS 6301-05 — 8 / S1.3

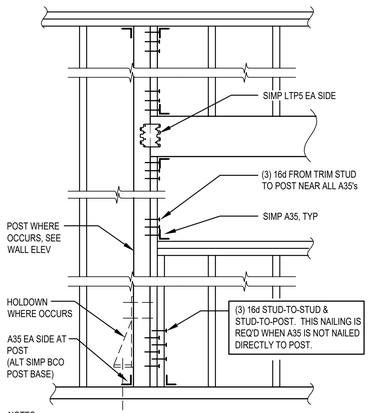


HOLDOWN SIZE	NO. OF SCREWS TO POST	ANCHOR DIA	MIN EMBED DEPTH	WASHER SIZE
HDU2	(6)	⅝"	20"	3"x3" SQ
HDU4	(10)			
HDU5	(14)			
HDU8	(20)	⅞"	20"	3"x3" SQ
HDU11	(30)	1"	20"	3"x3" SQ
HDU14	(36)	1"	20"	3"x3" SQ

NOTES:
1. DEEPEN FTG AS REQUIRED TO PROVIDE 3" MIN CONCRETE COVER AT ANCHOR BOLT & PLATE WASHER, AND WIDEN FTG AS REQ'D AT ANCHORS PER 10/S1.2.
2. WHEN HOLDOWN (HD) OCCURS NEAR END OF SILL PLATE, LOCATE A SILL BOLT 6" MAX FROM HD BOLT.
3. PIPES OR CONDUITS IN FOOTINGS SHALL NOT BE LOCATED WITHIN "C" DISTANCE OF HOLDOWN ANCHORS AS SHOWN ON 10/S1.2.

HOLDOWN DETAIL

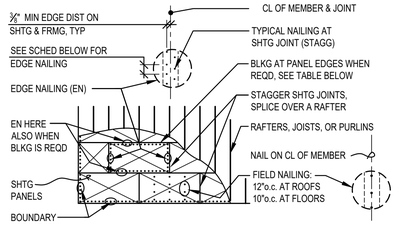
NTS 6310-02B — 9 / S1.3



NOTES:
1. THIS DETAIL APPLIES AT ALL CONDITIONS WHERE A 3x STUD/POST (OR LARGER) REPLACES THE 2x FULL HEIGHT KING STUDS SHOWN ON DETAIL 2/S1.3, TYP UON.
2. SEE DETAIL 2/S1.3 FOR OTHER INFO.

TYP POST AT OPNG

NTS 6303-01C — 4 / S1.3



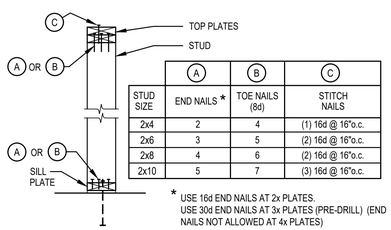
KEY PLAN

SHEATHING PANEL SCHEDULE						
TYPE	THICK	INDEX	BN	EN	EDGE BLOCKING	USE
A	⅞	40/20	10d @ 4"o.c.	10d @ 6"o.c.	3x4 FLAT PER 15/S1.4	ROOF
B						
C						
D						

NOTES:
1. ALL NAILS SHALL BE COMMON WIRE NAILS. NAILS DRIVEN INTO PRESSURE TREATED LUMBER SHALL BE HOT DIPPED GALVANIZED PER ASTM A153 CLASS D.
2. ALL SHEATHING SHALL BE MARKED "APA RATED GROUP I DF, C-D, EXPOSURE 1".
3. INDIVIDUAL PIECES OF SHEATHING SHALL NOT BE LESS THAN 24" IN THE LEAST DIMENSION NOR LESS THAN 8 SQ-FT IN AREA.
4. EDGE BLOCKING, IF CALLED FOR ABOVE, IS FOR DIAPHRAGM SHEAR REQUIREMENTS ONLY. IF BLOCKING IS NOT REQUIRED FOR SHEAR, VERIFY ADEQUACY OF UNBLOCKED EDGES WITH ROOF INSTALLER BEFORE APPLYING SHEATHING. USE T & G SHTG ON ALL FLOORS.
5. PROVIDE BOUNDARY NAILING ALONG ALL SHEAR WALL LINES AND MEMBERS LABELED AS STRUTS. USE TWO ROWS OF BOUNDARY NAILING AT ALL INTERIOR SHEAR WALL LINES AND STRUTS.
6. PREDRILL HOLES WHERE WOOD TENDS TO SPLIT.
7. USE DEFORMED SHANK NAILS FOR ALL FLOOR SHEATHING USED AS COMBINATION SUBFLOOR-UNDERLAYMENT.
8. FLOOR SHEATHING SHALL BE GLUED TO ALL FRAMING MEMBERS.

ROOF / FLOOR SHEATHING

NTS 6002-01 — 5 / S1.3

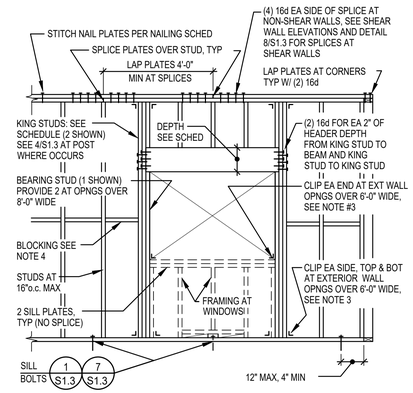


STUD SIZE	A END NAILS *	B TOE NAILS (8d)	C STITCH NAILS
2x4	2	4	(1) 16d @ 16"o.c.
2x6	3	5	(2) 16d @ 16"o.c.
2x8	4	6	(2) 16d @ 16"o.c.
2x10	5	7	(3) 16d @ 16"o.c.

* USE 16d END NAILS AT 2x PLATES.
USE 30d END NAILS AT 3x PLATES (PRE-DRILL) (END NAILS NOT ALLOWED AT 4x PLATES)

STUD NAILING

NTS 6403-01A — 6 / S1.3

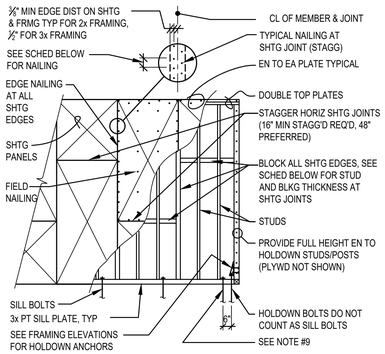


HEADER SPAN	NOMINAL HEADER DEPTH		NO. OF KING STUDS	
	BEARING WALL	NON-BRG WALL	EXTERIOR WALL	INTERIOR WALL
UP TO 4'-0"	6"	4"	1	1
OVER 4' TO 8'-0"	8"	6"	2	1
OVER 8' TO 10'-0"	12"	8"	3	2
OVER 10' TO 12'-0"	14"	10"	3	2

NOTES:
1. UNLESS OTHERWISE NOTED, HEADERS SHALL BE THE SAME WIDTH AS STUDS. FUR GLU-LAM HEADERS WITH PLYWOOD TO FLUSH WITH WALL STUDS.
2. SEE NAILING SCHEDULE FOR TYPICAL NAILING. STITCH NAIL ALL MULTIPLE STUDS PER SCHEDULE.
3. UNLESS OTHERWISE NOTED: USE SIMPSON LS30 OR A34 @ 2x4 STUDS, LS50 OR A35 @ 2x6 STUDS, LS70 @ 2x8 STUDS AND LS90 @ 2x10 STUDS.
4. BLOCKING REQUIRED AT ALL PLYWOOD SPLICES. (10'-0"o.c. MAX FOR FIRE BLOCKING.)
5. SEE DET 4/S1.3 WHERE POST OCCURS AT OPNG.

TYP WALL AND OPENING FRAMING (UON)

NTS 6303-01 — 2 / S1.3



SHEATHING PANEL SCHEDULE			
TYPE	EDGE NAILING (EN)	NOMINAL THICKNESS STUDS & BLKG AT PLYWD JOINTS	SILL BOLTS *
1	10d @ 6"o.c.	2x	⅝" Ø x 12" @ 48"o.c.
2	10d @ 4"o.c.	3x	⅝" Ø x 12" @ 32"o.c.
3			
4			

NOTE: * ANCHOR BOLTS WITH UPSET THREADS ARE NOT ALLOWED. (7" MIN EMBED)
1. ALL NAILS SHALL BE COMMON WIRE NAILS. NAILS DRIVEN INTO PRESSURE TREATED LUMBER SHALL BE HOT DIPPED GALVANIZED PER ASTM A153 CLASS D.
2. ALL SHEATHING SHALL BE MARKED "A.P.A. RATED SHEATHING, STRUCT I, EXPOSURE 1".
3. INDIVIDUAL PIECES OF SHEATHING SHALL NOT BE LESS THAN 16" IN THE LEAST DIMENSION NOR LESS THAN 8 SQ-FT IN AREA.
4. ALL SHEATHING SHALL BE ½" OR ⁱ⁹⁄₃₂" THICK UNLESS OTHERWISE NOTED.
5. SPACE NAILS AT 12"o.c. ALONG INTERMEDIATE FRAMING MEMBERS (FIELD NAILING).
6. PROVIDE EDGE NAILS FULL HEIGHT OF JAMB STUDS, TYPICAL AT WALL OPENINGS AND ALL STUDS WITH HOLDOWNS.
7. PREDRILL HOLES WHERE WOOD TENDS TO SPLIT.
8. STAGGER NAILS WHERE SPACED @ 3"o.c. OR LESS.
9. WHEN HOLDOWN (HD) BOLT OCCURS NEAR END OF SILL PLATE, LOCATE SILL BOLT 6" FROM HD BOLT.

SHEAR WALL DETAIL

NTS 6309-01 — 3 / S1.3

NAILING SCHEDULE

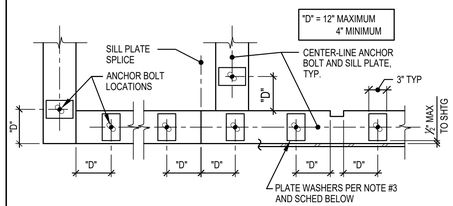
2022 CBC

NOTE: NAILING SHOWN BELOW IS MINIMUM PERMISSIBLE. DETAILS SHALL GOVERN WHEN THEIR NAILING IS MORE STRINGENT. ALL NAILS SHALL BE COMMON WIRE NAILS AND THEY SHALL BE DRIVEN PERPENDICULAR TO THE GRAIN INSTEAD OF TOENAILED IF POSSIBLE.

CONNECTION	NAILING	LOCATION
1. JOISTS TO SILL OR GIRDER:	(3) 8d	TOENAIL
2. BRIDGING TO JOIST	(2) 8d	TOENAIL EACH END
3. 1"x6" SUBFLOOR OR LESS TO EACH JOIST	(2) 8d	FACE NAIL
4. WIDER THAN 1"x6" SUBFLOOR TO EACH JOIST	(3) 8d	FACE NAIL
5. 2" SUBFLOOR TO JOIST OR GIRDER	(2) 16d	BLIND AND FACE NAIL
6. SOLE PLATE TO JOIST OR BLOCKING SOLE PLATE TO JOIST OR BLOCKING AT BRACED WALL PANEL	16d @ 16"o.c. (2) 16d @ 16"o.c.	TYPICAL FACE NAIL BRACED WALL PANELS
7. TOP PLATE TO STUD 8. STUD TO SILL (SOLE PLATE)	SEE STUD NAILING DETAIL 6/S1.3	
9. DOUBLE STUDS	16d @ 24"o.c.	FACE NAIL
10. DOUBLE TOP PLATES DOUBLE TOP PLATES	16d @ 16"o.c. (8) 16d	TYPICAL FACE NAIL LAP SPLICE, UON
11. BLOCKING BETWEEN JOISTS OR RAFTERS TO TOP PLATE	(3) 8d	TOENAIL
12. RIM JOIST TO TOP PLATE	8d @ 6"o.c.	TOENAIL
13. TOP PLATE, LAPS AND INTERSECTIONS	(2) 16d	FACE NAIL
14. CONTINUOUS HEADER, TWO PIECES	16d @ 16"o.c.	ALONG EACH EDGE
15. CEILING JOISTS TO PLATE	(3) 8d	TOENAIL
16. CONTINUOUS HEADER TO STUD	(4) 8d	TOENAIL
17. CEILING JOISTS, LAPS OVER PARTITIONS	(3) 16d	FACE NAIL
18. CEILING JOISTS TO PARALLEL RAFTERS	(3) 16d	FACE NAIL
19. RAFTERS TO PLATE	(3) 8d	TOENAIL
20. 1" DIAGONAL BRACE TO EACH STUD AND PLATE	(2) 8d	FACE NAIL
21. 1"x8" SHEATHING, OR LESS TO EA BEARING	(3) 8d	FACE NAIL
22. WIDER THAN 1"x8" SHTG TO EA BEARING	(3) 8d	FACE NAIL
23. BUILT-UP CORNER STUDS	16d @ 24"o.c.	FACE NAIL
24. BUILT-UP GIRDER AND BEAMS	20d @ 32"o.c. 10d @ 24"o.c. (2) 20d (3) 10d	FACE NAIL AT TOP AND BOTTOM, STAGG'D ON OPPOSITE SIDES FACE NAIL AT ENDS AND AT EACH SPLICE
25. 2" PLANKS	(2) 16d	EACH BEARING
26. COLLAR TIE TO RAFTER	(3) 10d	FACE NAIL
27. JACK RAFTER TO HIP	(3) 10d (2) 16d	TOENAIL FACE NAIL
28. ROOF RAFTER TO 2x RIDGE BEAM	(2) 16d (2) 16d	TOENAIL FACE NAIL
29. JOIST TO BAND JOIST	(3) 16d	FACE NAIL
30. LEDGER STRIP	(3) 16d	FACE NAIL AT EA JOIST

MACHINE NAILING OF PLYWOOD

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 AND THE DIVISION OF THE STATE ARCHITECT. THE APPROVAL IS SUBJECT TO CONTINUED SATISFACTORY PERFORMANCE. MACHINE NAILING WILL NOT BE ACCEPTED IN ⅜" PLYWOOD. IF NAIL HEADS PENETRATE THE OUTER PLY MORE THAN WOULD BE NORMAL FOR A HAND HAMMER OR IF MINIMUM ALLOWABLE EDGE DISTANCES ARE NOT MAINTAINED THE PERFORMANCE WILL BE DEEMED UNSATISFACTORY, AND MACHINE NAILING SHALL BE DISCONTINUED.



ANCHOR BOLT WASHER SCHEDULE		
WALL SIZE	MINIMUM WASHER SIZE	
2x4	PLATE 0.229" x 3" x 3"	(ALT SIMP BPS5/8-3)
2x6	PLATE 0.229" x 3" x 4½"	(ALT SIMP BPS5/8-6)
2x8	PLATE ¼" x 3" x 6¼"	
2x10	PLATE ¾" x 3" x 8½"	

NOTES:
1. WHERE SILL PLATE IS NOTCHED OR DRILLED MORE THAN ⅓ OF ITS WIDTH, A BOLT SHALL BE PLACED ON EACH SIDE OF THE NOTCH.
2. PROVIDE 2 BOLTS MINIMUM EACH PIECE OF SILL PLATE. FOR WALL LESS THAN 2'-0" LONG, THE MINIMUM END DISTANCE MAY BE REDUCED TO 4x BOLT DIAMETER.
3. PROVIDE PLATE WASHERS PER SCHEDULE AT ALL SILL BOLTS. THE HOLE IN THE PLATE WASHER IS PERMITTED TO BE DIAGONALLY SLOTTED WITH A WIDTH OF UP TO ⅜" LARGER THAN THE BOLT DIAMETER AND A SLOT LENGTH NOT TO EXCEED 1¾", PROVIDED A STANDARD CUT WASHER IS PLACED BETWEEN THE PLATE WASHER AND THE NUT. THE WASHER PLATE SHALL EXTEND TO WITHIN ½" OF THE EDGE OF THE SILL PLATE ON THE SIDES WITH SHEATHING. ANCHOR BOLTS SHALL BE CENTERED ON THE SILL PLATE, TYP UON.
4. STANDARD CUT WASHERS MAY BE USED AT INTERIOR NON-BRG, NON-SHEAR WALLS.

TYPICAL SILL FRAMING

NTS 6304-01 — 1 / S1.3

WOOD NOTES

1. LUMBER GRADES: ALL FRAMING LUMBER INCLUDING JOISTS, RAFTERS, BEAMS, STUDS, POSTS, PLATES AND BLOCKING SHALL BE GRADE MARKED DOUGLAS FIR NO. 1, UNLESS OTHERWISE NOTED. ALL FRAMING LUMBER 3x AND LARGER SHALL BE FREE OF HEART CENTER.
2. GRADE MARKS: ALL GRADE MARKS ON FRAMING LUMBER AND PLYWOOD SHEATHING SHALL BE LEGIBLE.
3. SILL PLATES: SILL PLATES SHALL BE PRESSURE TREATED DOUGLAS FIR NO. 1 UNLESS OTHERWISE NOTED. EACH PIECE SHALL BEAR THE STAMP OF AN APPROVED INDEPENDENT AGENCY OPERATING UNDER ALSC OVERVIEW. TREATED WOOD, WHERE CUT, DRILLED OR NOTCHED, SHALL BE FIELD TREATED WITH PRESERVATIVE.
4. FASTENERS AND CONNECTORS FOR PRESERVATIVE-TREATED AND FIRE-RETARDANT-TREATED WOOD: FASTENERS, INCLUDING NUTS AND WASHERS, SHALL BE OF HOT-DIPPED ZINC-COATED GALVANIZED STEEL COMPLYING WITH ASTM A153. FASTENERS OTHER THAN NAILS, WOOD SCREWS, AND LAG SCREWS SHALL BE PERMITTED TO BE OF MECHANICALLY DEPOSITED ZINC-COATED STEEL WITH COATING WEIGHTS IN ACCORDANCE WITH ASTM B 695, CLASS 55 MINIMUM. CONNECTORS USED IN EXTERIOR APPLICATIONS AND IN CONTACT WITH PRESERVATIVE-TREATED WOOD SHALL HAVE COATING TYPES AND WEIGHTS IN ACCORDANCE WITH THE TREATED WOOD OR CONNECTOR MANUFACTURERS RECOMMENDATIONS. IN THE ABSENCE OF MANUFACTURES RECOMMENDATIONS, A MIN OF ASTM A653, TYPE G185 ZINC-COATED GALVANIZED STEEL, OR EQUIVALENT, SHALL BE USED.
5. SILL BOLTS/PLATE WASHERS: PROVIDE PLATE WASHERS NOT LESS THAN 0.229"x3"x3" AT ALL SILL BOLTS - USE A LARGER PLATE AS REQ'D BY STUD SIZE (SEE DETAIL 1/S1.3). THE HOLE IN THE PLATE WASHER IS PERMITTED TO BE DIAGONALLY SLOTTED WITH A WIDTH OF UP TO ⅜" LARGER THAN THE BOLT DIAMETER AND A SLOT LENGTH NOT TO EXCEED 1¾", PROVIDED A STANDARD CUT WASHER IS PLACED BETWEEN THE PLATE WASHER AND THE NUT. THE PLATE WASHER SHALL EXTEND TO WITHIN ½" OF THE EDGE OF THE SILL PL ON THE SIDE(S) WITH SHEATHING. STANDARD WASHERS MAY BE USED AT INTERIOR NON-BEARING, NON-SHEAR WALLS. SEE TYPICAL SILL FRAMING DETAIL. BOLTS AND PLATE WASHERS SHALL BE GALVANIZED AS REQUIRED BY NOTE #4 ABOVE.
6. HANGERS: ALL JOISTS AND BEAMS WHICH DO NOT BEAR DIRECTLY ON A SUPPORT SHALL BE PROVIDED WITH SIMPSON 'LU' AND 'HU' TYPE HANGERS, RESPECTIVELY, OF MATCHING SIZE OR EQUIVALENT, UNLESS HEAVIER CONNECTIONS ARE SHOWN. USE MAXIMUM NAILS POSSIBLE UON. PROVIDE SLOPED AND/OR SKEWED HANGERS AT SLOPED AND/OR SKEWED MEMBERS. JOISTS SHALL BEAR COMPLETELY ON THE CONNECTOR SEATS, AND THE GAP BETWEEN THE JOIST END AND THE HEADER SHALL NOT EXCEED ½".
7. POST CAPS/BASES: ALL POSTS SHALL HAVE SIMPSON 'PCZ' POST CAPS AND 'BC' POST BASES AS APPLICABLE, OR EQUIVALENT, UNLESS HEAVIER CONNECTIONS ARE SHOWN.
8. NAILS: ALL NAILS, INCLUDING MACHINE NAILS, SHALL BE COMMON NAILS WITH FULL SIZE HEAD PER ASTM F1667. ALL NAILS FOR PRESSURE TREATED OR FIRE-RETARDANT LUMBER SHALL BE HOT-DIP GALVANIZED PER ASTM A153, CLASS D. NAILS WITH OTHER TYPES OF GALVANIZING MAY BE USED IF PRE-APPROVED BY THE ENFORCEMENT AGENCY. PROVIDE SUFFICIENT EDGE DISTANCE, END DISTANCE, AND SPACING TO PREVENT SPLITTING. REPLACE MEMBER IF SPLITTING OCCURS.
9. PREDRILLING: PREDRILL NAIL HOLES WHERE WOOD TENDS TO SPLIT. PREDRILL HOLES FOR ALL SCREWS AND LAG BOLTS.
10. BOLTS: ALL BOLTS, INCLUDING SILL ANCHOR BOLTS, SHALL BE FULL-DIAMETER CUT-THREAD BOLTS PRODUCED BY AN AMERICAN MANUFACTURER. NO "UPSET" THREADS ARE ALLOWED.
11. BOLT HOLES: ALL BOLT HOLES IN WOOD, INCLUDING SILL PLATES, SHALL BE ⅛" MAX OVERSIZE.
12. BOLT SPACING: SPACE ALL BOLTS IN WOOD 4 DIAMETERS MINIMUM WITH 7 DIAMETERS MINIMUM END DISTANCE UNLESS OTHERWISE NOTED.
13. STANDARD WASHERS: PROVIDE STANDARD CUT WASHERS UNDER ALL BOLT HEADS AND NUTS BEARING ON WOOD UNLESS OTHERWISE NOTED. PROVIDE WASHERS UNDER ALL LAG SCREW HEADS.
14. BOLT RETIGHTENING: RETIGHTEN ALL BOLTS PRIOR TO APPLICATION OF SHEATHING, PLASTER, ETC.
15. LAG SCREWS: ALL LAG SCREWS SHALL BE FULL BODY DIAMETER CUT THREAD LAG SCREWS WITH STANDARD HEX HEAD. "REDUCED BODY DIAMETER" SCREWS ARE NOT ALLOWED.
16. WOOD SCREWS: ALL WOOD SCREWS SHALL BE CUT THREAD WOOD SCREWS WITH FULL BODY DIAMETER.
17. BLOCKING AT BEARINGS: PLACE 2x SOLID BLOCKING BETWEEN JOISTS OR RAFTERS OVER ALL SUPPORTS. BLOCKING SHALL BE FULL DEPTH OF JOISTS.
18. BLOCKING/BRIDGING AT JOISTS AND RAFTERS: PROVIDE 2x FULL DEPTH SOLID BLOCKING FOR ROOF RAFTERS OVER 8" DEEP AND FLOOR JOISTS OVER 4" DEEP AT 8'-0"o.c. MAXIMUM. APPROVED METAL BRIDGING OR 2x3 CROSS BRIDGING MAY BE USED AT SAME SPACING. WHERE CROSS BRIDGING IS USED, THE LOWER ENDS SHALL BE DRIVEN UP AND NAILED AFTER THE FLOOR, SUBFLOOR, OR ROOF HAS BEEN NAILED.
19. BLOCKING IN WALLS: PROVIDE 2x BLOCKING SAME WIDTH AS WALL STUDS AT 10'-0"o.c. MAXIMUM IN STUD WALLS. PROVIDE 2x MINIMUM BLOCKING AT ALL EDGES OF PLYWOOD APPLIED TO STUD WALLS. UON. IT SHALL BE THE CONTRACTOR'S RESPONSIBILITY TO PROVIDE SOLID BLOCKING AT 48"o.c. MAX, OR OTHER MEANS OF LATERAL SUPPORT FOR STUDS IN BEARING WALLS WHICH ARE LOADED PRIOR TO RECEIVING SHEATHING OR GYP BOARD.
20. BLOCKING AT UNSHEATHED REGIONS OF WALLS: ALL BEARING WALLS REQUIRE SHEATHING OR GYP BOARD FULL HEIGHT TO PREVENT BUCKLING OF STUDS. REGIONS OF WALLS WHICH DO NOT RECEIVE PERMANENT SHEATHING OR GYP BOARD ON AT LEAST ONE FACE SHALL BE PROVIDED WITH ROWS OF SOLID BLOCKING SPACED AT 48"o.c. MAX.
21. MISC. BLOCKING: IT IS NOT THE INTENT OF THESE DRAWINGS TO SHOW BLOCKING REQUIRED FOR FINISHES, FIRE BLOCKING, OR BLOCKING FOR THE ATTACHMENT OF NON-STRUCTURAL ITEMS. CONTRACTOR SHALL PROVIDE ALL REQUIRED BLOCKING. SEE ARCHITECTURAL DWGS AND SPECIFICATIONS FOR ADDITIONAL INFORMATION.
22. HOLES IN JOISTS AND BEAMS: HOLES OR NOTCHES ARE NOT ALLOWED IN JOISTS OR BEAMS UNLESS SPECIFICALLY SHOWN AND DETAILED ON DRAWINGS.
23. HOLES IN STUDS: HOLES IN STUDS SHALL COMPLY WITH DETAIL 3/S1.4. HOLES IN POSTS ARE NOT ALLOWED UNLESS SHOWN ON STRUCTURAL DRAWINGS. NOTCHES ARE NOT ALLOWED.
24. HOLES IN TOP PLATES: HOLES ARE NOT ALLOWED IN TOP PLATES OF BEARING WALLS OR SHEAR WALLS. HOLES IN TOP PLATES OF NON-BEARING NON-SHEAR WALLS SHALL COMPLY WITH DETAIL 1/S1.4.
25. STRAPS THROUGH SHEATHING: STRAPS PASSING THROUGH PLYWOOD SHEATHING SHALL PASS THROUGH NEATLY DRILLED ROUND HOLES, OR NEATLY SLOTTED HOLES. THE DIAMETER OF HOLES OR THE LENGTH OF SLOTS SHALL NOT EXCEED THE STRAP WIDTH PLUS ⅛". WIDTH OF SLOTS SHALL NOT EXCEED ½".
26. TIMBER CONNECTORS: ALL TIMBER CONNECTORS SPECIFIED ON THESE DRAWINGS REFERS TO SIMPSON STRONG TIE CATALOG NO. C-C-2024. ALL CONNECTORS SHALL BE STAMPED AT THE FACTORY WITH AN IDENTIFYING MARK. ALL CONNECTORS IN CONTACT WITH PRESSURE TREATED LUMBER SHALL BE COATED WITH ZMAX (G-180) OR HOT DIPPED GALVANIZED.
27. MOISTURE CONTENT: THE MAXIMUM MOISTURE CONTENT OF ALL FRAMING LUMBER SHALL NOT EXCEED 19% AT THE TIME OF INSTALLATION.
28. HARD CEILINGS: IT IS NOT THE INTENT OF THESE DRAWINGS TO SHOW FRAMING PLANS OR SECTION CUTS AT ALL HARD CEILINGS AND SUSPENDED SOFFITS. SEE ARCHITECTURAL DRAWINGS FOR LOCATIONS OF HARD (GYP) CEILINGS AND SOFFITS. FRAME CEILINGS PER TYPICAL CEILING FRAMING DETAILS UON FRAME SOFFITS PER TYPICAL SOFFIT FRAMING DETAILS OR OTHER SIMILAR SOFFIT DETAILS SHOWN ON DRAWINGS.

APPROVALS

FILE # 10–28 — APPLICATION # 02–122132

IDENTIFICATION STAMP
DIV. OF THE STATE ARCHITECT
APP: 02-122132 INC: A
REVIEWED FOR
SS ☑ FLS ☑ ACS ☑
DATE: 08/06/2024

LICENSED ARCHITECT — MICHAEL J. SCOTT — No. C-34290 — REN: 08-31-25 — STATE OF CALIFORNIA

DATE: JANUARY 31, 2024

NEW TK CLASSROOM AT CHENEY KINDERGARTEN
COALINGA-HURON UNIFIED SCHOOL DISTRICT
COALINGA, FRESNO COUNTY, CA

REVISIONS

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4320 West Mineral king Avenue
Visalia, California 93291
www.mangini.us
(559) 627-0530 Office
(559) 627-1926 Fax

TITLE
TYPICAL NOTES AND DETAILS

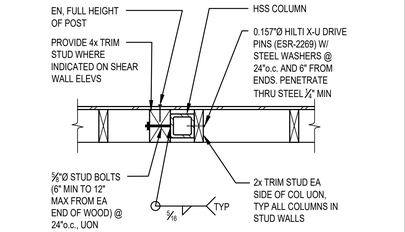
S1.3

PROJECT 23044

REGISTERED PROFESSIONAL ENGINEER — JACK D. BRENGER — No. S5792 — Exp. 6-30-25 — STRUCTURAL — STATE OF CALIFORNIA

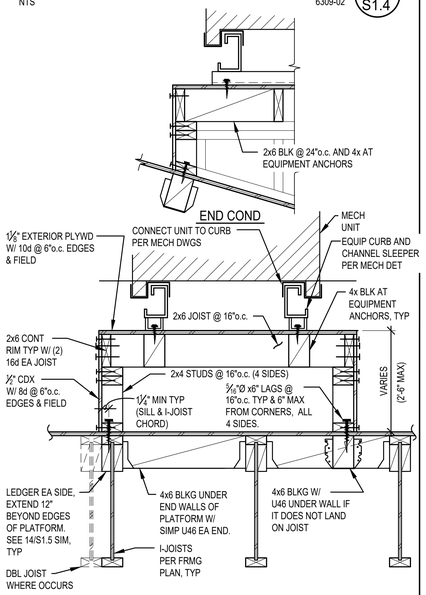
ASD
advanced structural design, inc.
STRUCTURAL ENGINEERS
7112 N. FRESNO STREET, suite 311
Fresno, California 93720
(559) 432-4151 Fax 432-9315
asdi@asdiengr.com

P:\M62321 Cheney Kinder TK\Struct\S1.3_Typ.dwg Aug 02 2024 12:49pm



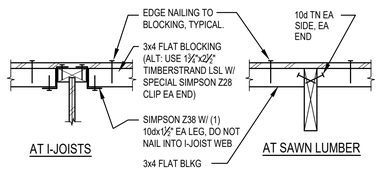
TYP COL IN STUD WALL

NTS 6309-02 — 13 / S1.4



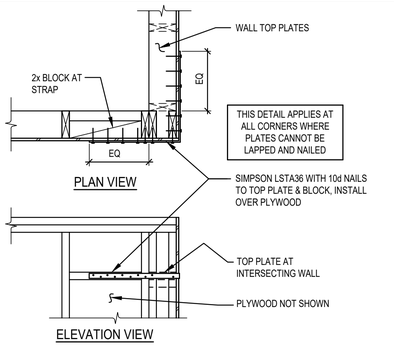
EQUIPMENT PLATFORM

NTS 6102-06 — 14 / S1.4



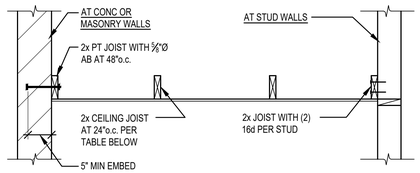
PLYWOOD EDGE BLOCKING

NTS 6006-01 — 15 / S1.4

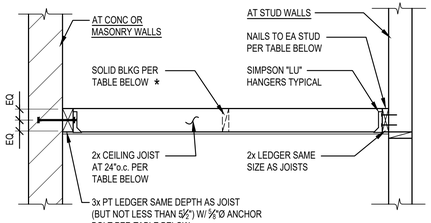


TYPICAL CORNER SPLICE

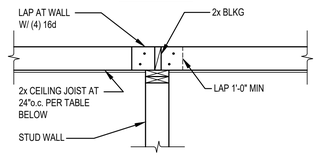
(WALL PLATES AT DIFFERENT HT) NTS 6401-01 — 11 / S1.4



AT JOISTS PARALLEL TO WALL



AT LEDGERS



AT INTERIOR WALL

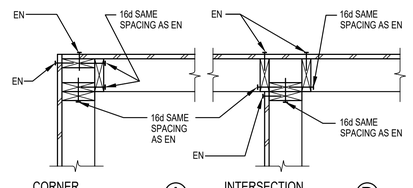
JOIST SIZE	MAX SPAN		LEDGER NAILS	BOLT SPACING	BLOCKING (NOTE #5)
	GYP BD	PLASTER			
2x4	6'-0"	4'-0"	(2) 16d	48"o.c.	NOT REQ'D
2x6	12'-0"	8'-0"	(2) 16d	48"o.c.	MID-SPAN
2x8	16'-0"	12'-0"	(3) 16d	32"o.c.	MID-SPAN
2x10	20'-0"	16'-0"	(3) 16d	32"o.c.	TWO ROWS
2x12	24'-0"	20'-0"	(4) 16d	24"o.c.	TWO ROWS

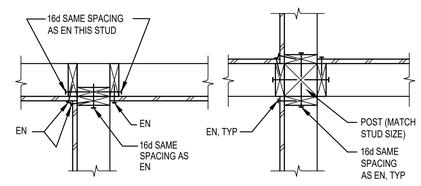
NOTES:

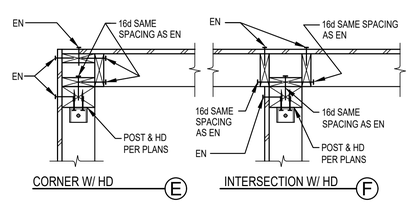
1. DESIGN LOADS: DL=6psf AT GYP BD; 10psf AT PLASTER
   LL=10psf
2. AT CONTRACTOR'S OPTION, 10d x 1½" NAILS MAY BE USED FOR ATTACHMENT OF JOIST HANGERS TO LEDGERS.
3. SPACE CEILING JOISTS @ 16"o.c. AT FIRE RATED CONSTRUCTION, WHERE REQ'D PER ARCH DWGS.
4. SEE "TYPICAL FRAMING AT OPENINGS" FOR FRAMING AT OPENINGS OR RECESSED FIXTURES
5. ROWS OF BLOCKING TO BE EQUALLY SPACED BETWEEN SUPPORTS.

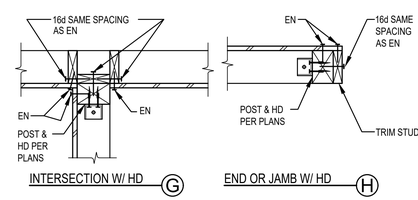
TYPICAL CEILING FRAMING

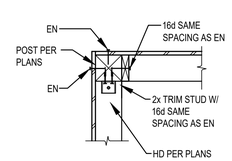
NTS 6009-03 — 12 / S1.4





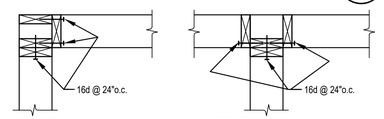


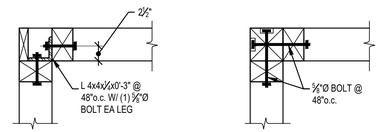


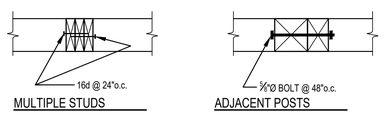


PLAN VIEW OF SHEAR WALL DETAILS

NTS 6306-00 — 9 / S1.4



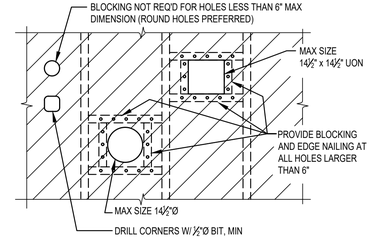




NOTE: USE THESE DETAILS AS A MINIMUM UNLESS MORE STRINGENT CONDITIONS ARE SHOWN ELSEWHERE ON THESE DRAWINGS. SEE DETAIL 9/S1.4 AT SHEAR WALL CONDITIONS.

TYPICAL FRAMING DETAILS

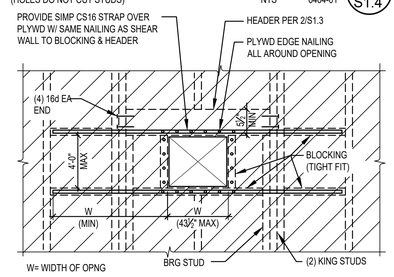
NTS 6306-04 — 10 / S1.4



NOTE: THIS DETAIL APPLIES TO ALL HOLES THRU SHEAR WALLS UON. SEE DETAIL 6/S1.4 FOR HOLES WHICH CUT THRU STUDS OR EXCEED THESE DIMENSIONS.

HOLES AT SHEAR WALLS

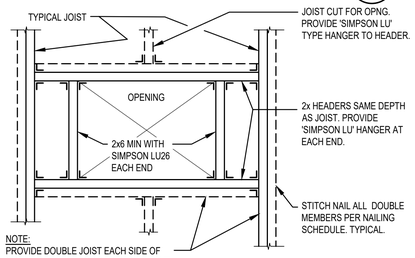
(HOLES DO NOT CUT STUDS) NTS 6404-01 — 5 / S1.4



NOTE: THIS DETAIL APPLIES TO ALL HOLES THRU SHEAR WALLS UON. SEE DETAIL 5/S1.4 FOR HOLES WHICH DO NOT CUT THRU STUDS.

HOLES AT SHEAR WALLS

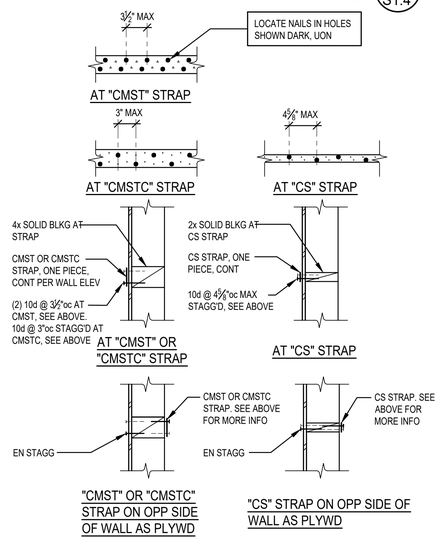
(HOLES CUT 1 OR 2 STUDS) N.T.S. 6404-02 — 6 / S1.4



NOTE:
PROVIDE DOUBLE JOIST EACH SIDE OF OPENING WHERE 1 OR 2 JOISTS ARE CUT.
IF MORE THAN 2 JOISTS ARE CUT, SEE FRAMING PLAN.

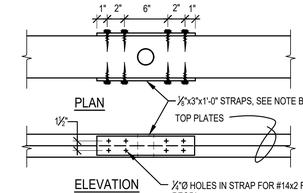
TYP FRMG AT CLG OPENINGS

N.T.S. 6011-02 — 7 / S1.4



STRAP DETAIL

NTS 6302-01 — 8 / S1.4

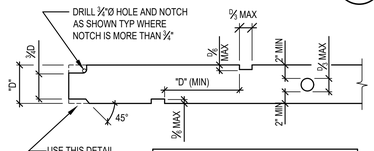


NOTE:
⅛"x3"x1'-0" STRAPS REQUIRED FOR HOLE DIAMETERS OF ⅞ TO ½ THE WIDTH OF WOOD PLATES. HOLES HAVING DIAMETERS GREATER THAN ½ OF THE PLATE WIDTH ARE NOT PERMITTED. NO HOLES PERMITTED IN TOP PLATES LESS THAN 5½" WIDE.

THIS DETAIL APPLIES AT NON-BEARING, NON-SHEAR WALLS ONLY. NO HOLES PERMITTED IN BEARING WALLS OR SHEAR WALLS.

HOLES IN TOP PLATES

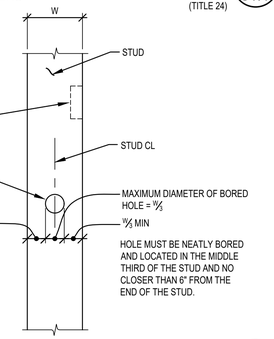
NTS 6307-01 — 1 / S1.4



NOTCHES SHALL NOT BE LOCATED IN MIDDLE THIRD OF SPAN. NOTCHES OR HOLES ARE NOT PERMITTED EXCEPT WHERE SPECIFICALLY SHOWN ON THE STRUCTURAL DRAWINGS.

NOTCHES & HOLES AT

JOISTS OR RAFTERS NTS 6010-01 (TITLE 24) — 2 / S1.4



NOTCHES AND HOLES

IN STUDS (CBC) NTS 6010-03 — 3 / S1.4

NOT USED

4 / S1.4

APPROVALS

FILE # 10-28 — APPLICATION # 02-122132

IDENTIFICATION STAMP
DIV. OF THE STATE ARCHITECT
APP: 02-122132 INC: A
REVIEWED FOR
SS ☑ FLS ☑ ACS ☑
DATE: 08/06/2024

LICENSED ARCHITECT — MICHAEL J. SCOTT '98 — No. C-34290 — REN: 08-31-25 — STATE OF CALIFORNIA

DATE: JANUARY 31, 2024

NEW TK CLASSROOM AT CHENEY KINDERGARTEN
COALINGA-HURON UNIFIED SCHOOL DISTRICT
COALINGA, FRESNO COUNTY, CA

REVISIONS

MANGINI ARCHITECTURE INGENUITY
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MANGINI ASSOCIATES INC.
4320 West Mineral King Avenue
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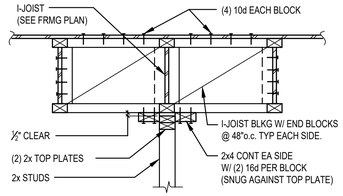
TITLE
TYPICAL NOTES AND DETAILS

S1.4

PROJECT 23044

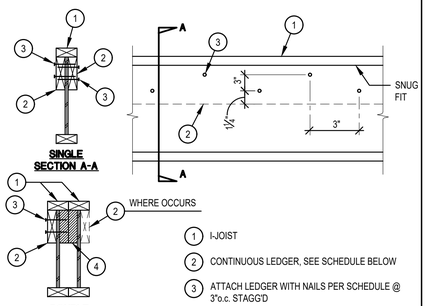
REGISTERED PROFESSIONAL ENGINEER — JACK D. BRENNER — No. S5792 — Exp. 6-30-25 — STRUCTURAL — STATE OF CALIFORNIA

ASD
advanced structural design, inc.
STRUCTURAL ENGINEERS
7112 N. FRESNO STREET, suite 311
Fresno, California 93720
(559) 432-4151 Fax 432-9315
asdi@asdiengr.com



WALL PARALLEL TO JOISTS

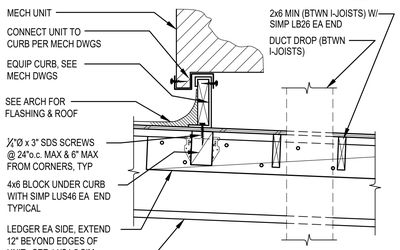
NON-BEARING WALL
TOP PLATE DETAIL — NTS — 6305-03i — 13 / S1.5



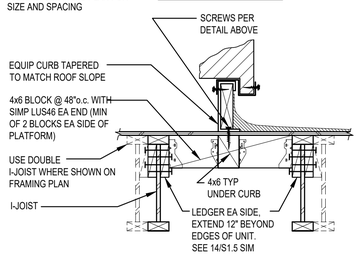
1. I-JOIST
2. CONTINUOUS LEDGER, SEE SCHEDULE BELOW
3. ATTACH LEDGER WITH NAILS PER SCHEDULE @ 3"o.c. STAGG'D
4. CONT FILLER PER DBL I-JOIST DETAIL

I-JOIST FLANGE WIDTH (IN)	LEDGER			FASTENER
	DEPTH	THICKNESS	MATERIAL	
3½"	5½"	1½"	LSL OR LVL	16d
2½"	5½"	1"	LSL OR LVL	8d

CONTINUOUS LEDGER AT I-JOIST
NTS — 6110-05 — 14 / S1.5

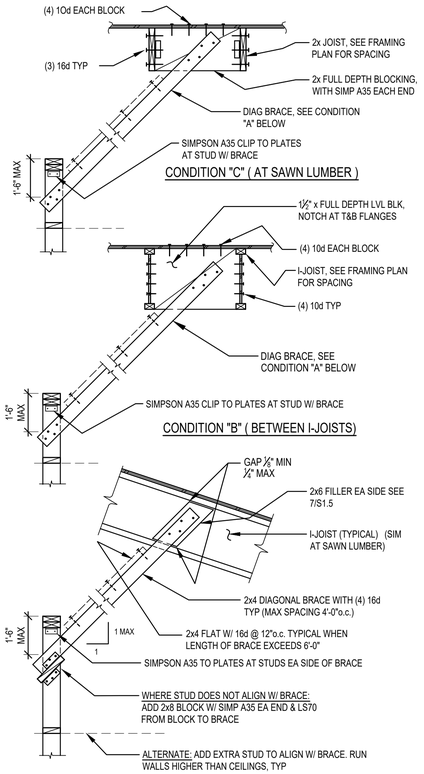


PERPENDICULAR TO JOISTS

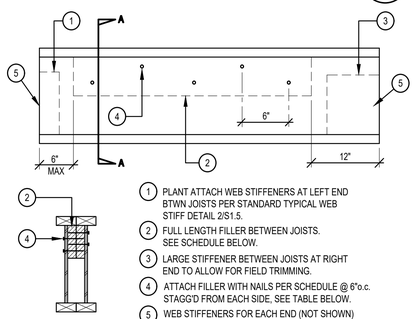


BETWEEN JOISTS

FRAMING AT MECH EQUIP
(AT I-JOIST FRAMING) — NTS — 6102-01i — 15 / S1.5



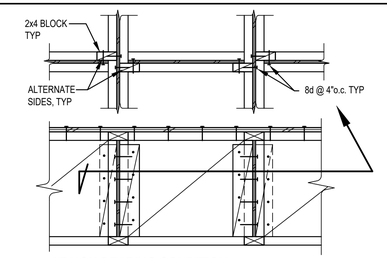
WALL BRACE DETAIL
NTS — (INTERIOR WALLS) — 6110-03A — 11 / S1.5

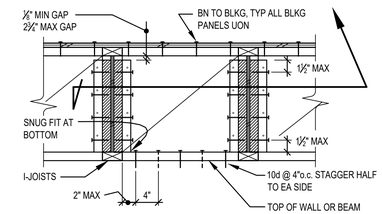


1. PLANT ATTACH WEB STIFFENERS AT LEFT END BTWN JOISTS PER STANDARD TYPICAL WEB STIFF DETAIL 2/S1.5.
2. FULL LENGTH FILLER BETWEEN JOISTS. SEE SCHEDULE BELOW.
3. LARGE STIFFENER BETWEEN JOISTS AT RIGHT END TO ALLOW FOR FIELD TRIMMING.
4. ATTACH FILLER WITH NAILS PER SCHEDULE @ 6"o.c. STAGG'D FROM EACH SIDE, SEE TABLE BELOW.
5. WEB STIFFENERS FOR EACH END (NOT SHOWN) ARE SHIPPED LOOSE.

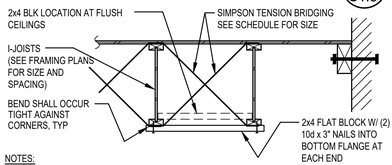
I-JOIST FLANGE WIDTH (IN)	FILLER			FASTENER
	DEPTH	THICKNESS	MATERIAL	
3½"	5½"	2-1½"	LVL	16d
2½"	5½"	2-1"	LVL	8d

DOUBLE I-JOIST DETAIL
NTS — 6014-03 — 12 / S1.5





I-JOIST BLOCKING DETAIL
NTS — 6013-01Ai — 8 / S1.5

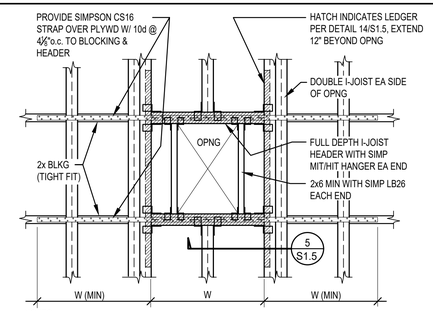


NOTES:
1. PROVIDE CONTINUOUS ROWS OF BRIDGING @ MIDSPAN W/ 14'-0"o.c. MAX FOR I-90. PROVIDE ONE ROW WITHIN 1'-0" OF ENDS OF JOISTS SUPPORTED BY TOP FLANGE HANGERS.
2. APPLY BRIDGING BETWEEN JOISTS W/ (2) 10d x 1½" NAILS EA END.
3. LOWER ENDS OF CROSS BRIDGING SHALL BE DRIVEN UP AND NAILED AFTER THE ROOF SHEATHING HAS BEEN NAILED, TYPICAL.
4. BRIDGING SHALL BE STRAIGHT. NO BOWING OR KINKS ALLOWED, TYPICAL.

JOIST HEIGHT	JOIST SPACING (INCHES)								
	12	16	19.2	24	30	32	36	42	48
9½	TB20	TB27	TB27	TB30	TB36	TB36	TB42	TB48	TB54
10	TB20	TB27	TB27	TB30	TB36	TB36	TB42	TB48	TB54
11⅞	TB20	TB27	TB27	TB30	TB36	TB36	TB42	TB48	TB54
12	TB20	TB27	TB27	TB30	TB36	TB36	TB42	TB48	TB54
14	TB27	TB27	TB27	TB36	TB36	TB42	TB42	TB48	TB54
16	TB27	TB27	TB30	TB36	TB42	TB42	TB42	TB48	TB54
18	TB27	TB30	TB30	TB36	TB42	TB42	TB48	TB54	TB56
20	TB30	TB30	TB36	TB36	TB42	TB42	TB48	TB54	TB56
22	TB30	TB36	TB36	TB36	TB42	TB42	TB48	TB54	TB56
24	TB36	TB36	TB36	TB42	TB42	TB48	TB48	TB54	TB56

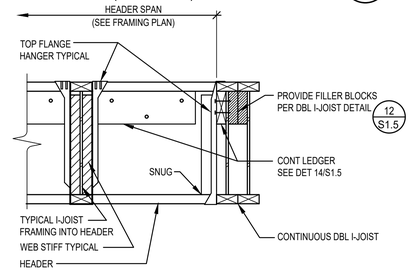
I-JOIST BRIDGING DETAIL
NTS — 6111-01i — 9 / S1.5

NOT USED
NTS — 10 / S1.5

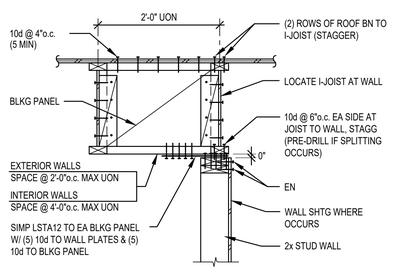


NOTES:
1. PROVIDE STRAPS AT ALL ROOF OPENINGS WITH EITHER DIMENSION 2'-0" OR GREATER.
2. MAXIMUM SIZE OF OPENING = 4'-0" SQUARE UNLESS DETAILED ON PLANS.
3. PROVIDE DOUBLE JOIST EACH SIDE OF OPENING WHERE JOISTS ARE CUT.
4. PROVIDE PLYWOOD EDGE NAILING ALL AROUND OPENING.

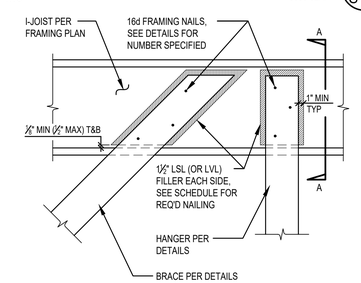
TYPICAL FRAMING AT OPENINGS
(AT I-JOISTS) — NTS — 6103-02Ai — 4 / S1.5



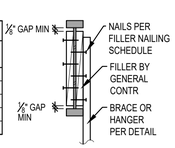
HEADER AT I-JOIST
NTS — 6015-03i — 5 / S1.5



LATERAL WALL SUPPORT
NTS — 6300-02Ai — 6 / S1.5

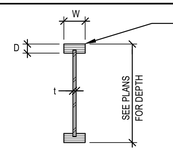


FILLER NAILING SCHEDULE	
FRAMING NAILS PER DETAILS	REQ'D FILLER NAILS (EACH SIDE)
(2) 16d	(2) 16d
(3) 16d	(2) 16d
(4) 16d	(3) 16d
(5) 16d	(4) 16d
(6) 16d	(5) 16d



SECTION A-A

FILLER BLOCK DETAIL
NTS — 6110-04 — 7 / S1.5

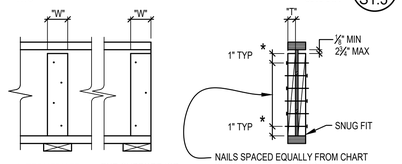


I-JOIST	FLANGE		WEB	
	W	D	THICK "t"	MATERIAL
16" RED-I90	3½"	1½"	7/16"	OSB

MINIMUM SECTION PROPERTIES			
I-JOIST	M allow (#-ft) AT 100%	V allow (#) AT 100%	EI (10^6 #-in^2)
16" RED-I90	13,115	2,810	1,246

NOTES:
1. RED- I JOISTS ARE MANUFACTURED BY RED BUILT, LLC. THE RED- I SECTION PROPERTIES ARE BASED ON ICC ESR-2994.

I-JOIST PROPERTIES
NTS — 6016-01A — 1 / S1.5

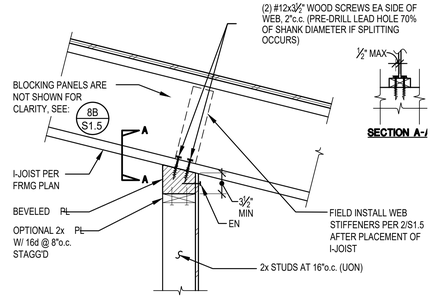


* ½" TYP AT 2x4 WEB STIFFENERS

I-JOIST DEPTH/SERIES	NO. OF NAILS REQUIRED		MIN WEB STIFFENER WIDTH "W"	MIN WEB STIFFENER THICK "T"
	END OR HANGER	INTERMEDIATE		
16" RED-I90	(6) 16d	(11) 16d	3½"	1½"

NOTES:
1. ALL STIFFENERS ARE TO BE SUPPLIED BY MFR.
2. WEB STIFFENERS ARE REQUIRED AT ALL BEARINGS AND AT HANGERS.
3. GAP MUST BE AT THE TOP FOR ALL BEARING CONDITIONS. STIFFENER MUST BE SNUG TO BOTTOM CHORD.
4. WEB STIFFENER MATERIAL FOR RED-I90 SHALL BE 2x4 CONSTR GRADE OR LVL.

I-JOIST WEB STIFFENERS
NTS — 6013-02i — 2 / S1.5



I-JOIST CONNECTION
NTS — 6017-01i — 3 / S1.5

APPROVALS

FILE # 10-26 — APPLICATION # 02-122132

IDENTIFICATION STAMP
DIV. OF THE STATE ARCHITECT
APP: 02-122132 INC: A
REVIEWED FOR
SS ☑ FLS ☑ ACS ☑
DATE: 08/06/2024

LICENSED ARCHITECT
MICHAEL J. SCOTT MORRELLI
No. C-34290
REN: 08-31-25
STATE OF CALIFORNIA

DATE: JANUARY 31, 2024

NEW TK CLASSROOM AT CHENEY KINDERGARTEN
COALINGA-HURON UNIFIED SCHOOL DISTRICT
COALINGA, FRESNO COUNTY, CA

REVISIONS

MANGINI ARCHITECTURE INGENUITY
BARENG MORRELLI SCOTT
MANGINI ASSOCIATES INC.
4320 West Mineral king Avenue
Visalia, California 93291
www.mangini.us
(559) 627-0530 Office
(559) 627-1926 Fax

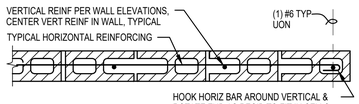
TITLE
TYPICAL NOTES
AND DETAILS

S1.5

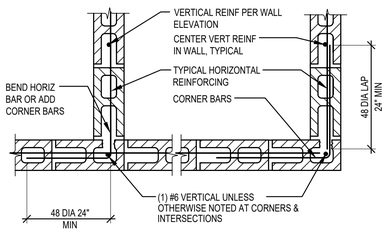
PROJECT 23044

REGISTERED PROFESSIONAL ENGINEER
JACK D. BRENGER
No. S5792
Exp. 6-30-25
STRUCTURAL
STATE OF CALIFORNIA

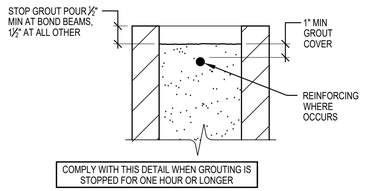
ASD
advanced structural design, inc.
STRUCTURAL ENGINEERS
7112 N. FRESNO STREET, suite 311
Fresno, California 93720
(559) 432-4151 Fax 432-9315
asdi@asdiengr.com



ENDS AND OPENINGS



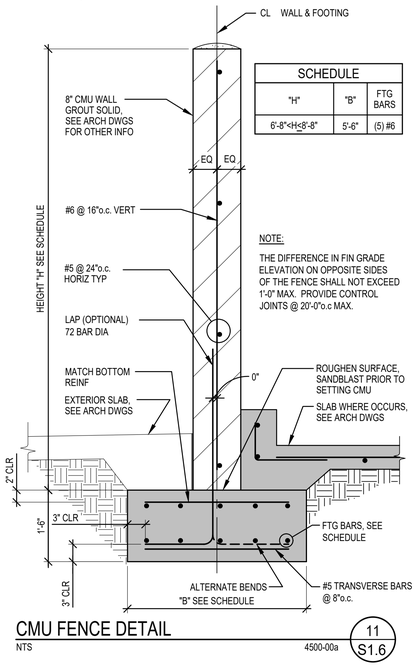
CMU WALL REINFORCING
(SINGLE CURTAIN) NTS 4001-01 — 12 / S1.6



CMU HORIZONTAL CONSTRUCTION JOINT
NTS 4005-05 — 13 / S1.6

CONCRETE BLOCK NOTES
(TITLE 24)

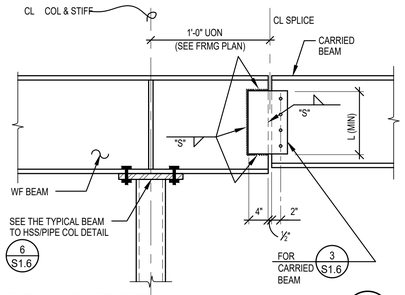
1. BLOCK UNITS: ALL CONCRETE BLOCK UNITS SHALL BE LIGHT WEIGHT OR MEDIUM WEIGHT, AND SHALL BE MANUFACTURED IN COMPLIANCE WITH ASTM C-90, GRADE N, AND UNITS SHALL BE PLACED IN A RUNNING BOND PATTERN. TYPICAL UNLESS NOTED OTHERWISE. VERTICAL BARS SHALL BE SPACED @ 16"o.c. MAX FOR STACKED BOND.
2. GROUTING: ALL CELLS SHALL BE SOLIDLY FILLED WITH GROUT. GROUT SHALL BE CONSOLIDATED BY MECHANICAL VIBRATION DURING PLACING & RECONSOLIDATED AFTER EXCESS MOISTURE HAS BEEN ABSORBED, BUT BEFORE WORKABILITY IS LOST. THE GROUTING OF ANY SECTION OF A WALL SHALL BE COMPLETED IN ONE DAY, WITH NO INTERRUPTIONS GREATER THAN ONE HOUR.
3. WEBS & CELLS: WEBS OF EACH COURSE SHALL BE CENTERED ON WEBS BELOW. VERTICAL CELLS SHALL HAVE VERTICAL ALIGNMENT TO MAINTAIN A CLEAN UNOBSTRUCTED VERTICAL FLUE MEASURING NOT LESS THAN 3" x 3".
4. OPEN END UNITS: OPEN END UNITS SHALL BE USED WITH ALL REINFORCED CELLS EXCEPT AT JAMBS. ALL CELLS, REINFORCED OR NOT, SHALL BE FILLED WITH GROUT. HORIZONTAL REINFORCEMENT SHALL BE PLACED IN BOND BEAM UNITS WITH A MINIMUM GROUT COVER OF 1" ABOVE THE STEEL FOR EACH GROUT POUR.
5. FOOTING DOWELS: FOOTING DOWELS TO MATCH VERTICAL WALL REINFORCING SHALL BE PROVIDED AT ALL POINTS WHERE CELLS ARE TO BE REINFORCED.
6. REINFORCING: SEE CONCRETE NOTES FOR REINFORCING STEEL GRADES. MAXIMUM SIZE OF REINFORCING IN 8" WALLS IS #6. MAX SIZE IN 12" CMU IS #8.
7. REINFORCING POSITIONERS: REINFORCING SHALL BE STRAIGHT AND PLACED ACCURATELY IN POSITION. VERTICAL BARS IN CELLS SHALL BE HELD IN PLACE BY AN APPROVED MECHANICAL DEVICE AT TOP AND BOTTOM AND AT INTERVALS NOT TO EXCEED 192 BAR DIAMETERS NOR 10 FEET.
8. SPLICES: SPLICES IN REINFORCING STEEL SHALL BE 48 BAR DIAMETERS FOR #5 AND SMALLER BARS AND 62 BAR DIAMETERS FOR #6 AND LARGER BARS UNLESS NOTED OTHERWISE. WHEN ADJACENT SPLICES ARE SEPARATED BY 3" OR LESS, INCREASE THE LAP LENGTH TO 72 DIAMETERS. IF SPLICES ARE STAGGERED AT LEAST 24 BAR DIAMETERS, NO INCREASE IS REQUIRED. PILASTER BARS SHALL BE ONE PIECE FULL HEIGHT UNLESS DETAILED OTHERWISE.
9. CHORD BARS: PROVIDE (2) #5 HORIZONTAL BARS MINIMUM IN WALLS AT ALL ROOFS AND FLOORS IN ADDITION TO TYPICAL HORIZONTAL REINFORCING. LAP BARS 72 BAR DIAMETERS AT SPLICES. RUN BARS CONTINUOUS THROUGH MCJ's.
10. CLEANOUTS: WHERE BLOCK IS LAID TO A MAXIMUM OF FOUR FEET BEFORE GROUTING, NO CLEANOUTS SHALL BE REQUIRED. WHERE THE BLOCK IS LAID TO HEIGHTS GREATER THAN FOUR FEET BEFORE GROUTING, CLEANOUTS SHALL BE PROVIDED AT THE BOTTOM OF ALL CELLS. CLEANOUTS SHALL BE OF SUFFICIENT SIZE AND LOCATION TO ALLOW THOROUGH FLUSHING AWAY OF ALL MORTAR DROPPINGS AND DEBRIS.
11. HIGH LIFT: THE MAXIMUM HEIGHT OF POURS FOR HIGH LIFT SHALL BE LIMITED TO 12 FEET FOR 8" CMU AND 16 FEET FOR 12" CMU. BETWEEN GROUT POURS, HORIZONTAL CONSTRUCTION JOINTS SHALL BE FORMED BY STOPPING ALL MASONRY UNITS AT THE SAME ELEVATION AND WITH THE GROUT STOPPING A MINIMUM OF ½" BELOW THE MORTAR JOINT, EXCEPT AT THE TOP OF THE WALL. WHERE BOND BEAMS OCCUR, THE GROUT SHALL BE STOPPED A MINIMUM OF ½" BELOW THE TOP OF THE MASONRY.
12. REINFORCING IN WALLS: SEE TYPICAL DETAILS FOR MIN REINFORCING AT ENDS, CORNERS, INTERSECTIONS AND OPENINGS IN WALLS, UNLESS OTHERWISE NOTED.
13. EMBEDDED ITEMS: ALL REINFORCING AND EMBEDDED ITEMS SHALL BE PLACED AND SECURELY ANCHORED AGAINST MOVING PRIOR TO GROUTING. BOLTS SHALL BE ACCURATELY SET WITH TEMPLATES OR APPROVED EQUIVALENT MEANS AND HELD IN PLACE TO PREVENT DISLOCATION DURING GROUTING. ALL BOLTS AND ANCHORS SHALL BE GROUTED IN PLACE WITH AT LEAST 1 INCH OF GROUT ALL AROUND BETWEEN THE BOLT AND THE MASONRY.
14. GROUT: CEMENT GROUT SHALL CONSIST OF ONE PART PORTLAND CEMENT, 2¼ TO 3 PARTS SAND, AND 1 TO 2 PARTS OF ⅜" PEA GRAVEL. CEMENT CONTENT SHALL CONTAIN 15% TO 20% FLY ASH PER ASTM C-618 CLASS F. ALL GROUT SHALL CONTAIN "SIKA GROUT AID" TO COUNTERACT GROUT SHRINKAGE.
15. GROUT STRENGTH: GROUT SHALL ATTAIN A MINIMUM COMPRESSIVE STRENGTH OF 2000 psi AT 28 DAYS AND TEST SPECIMENS SHALL BE PREPARED PER ASTM C-1019.
16. MORTAR (TYPE S): CEMENT MORTAR SHALL CONSIST OF ONE PART PORTLAND CEMENT, OVER ¼ TO ½ PARTS LIME PUTTY, AND 2¼ TO 3 TIMES THE SUM OF THE SEPARATE VOLUMES OF CEMENTITIOUS MATERIALS OF SAND. LIME SHALL BE THE LAST MATERIAL ADDED TO THE MIXER.
17. MORTAR STRENGTH: MORTAR SHALL ATTAIN A MINIMUM COMPRESSIVE STRENGTH OF 1800 psi AT 28 DAYS AND TEST SPECIMENS SHALL BE PREPARED PER ASTM C 1586 AND ASTM C-270.
18. PIPES/CONDUITS: PIPE OR CONDUIT SHALL NOT BE EMBEDDED IN ANY MASONRY UNLESS SPECIFICALLY DETAILED. ANY PIPE OR CONDUIT MAY PASS PERPENDICULAR THROUGH ANY MASONRY BY MEANS OF A SLEEVE AT LEAST LARGE ENOUGH TO PASS ANY HUB OR COUPLING ON THE PIPE LINE. SUCH SLEEVES SHALL BE PLACED NOT CLOSER THAN THREE DIAMETERS, CENTER TO CENTER.
19. CODES: ALL WORK SHALL CONFORM TO THE REQUIREMENTS OF THE CBC, TITLE 24 AND IR 21-2.13.
20. MASONRY STRENGTH: MINIMUM ULTIMATE COMPRESSIVE STRENGTH IN 28 DAYS: f'm = 2000 psi



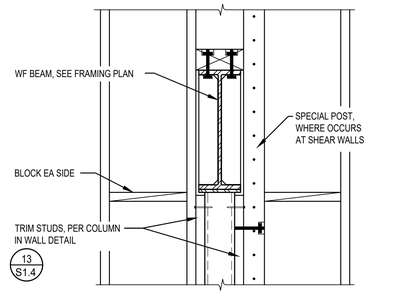
SCHEDULE		
"H"	"B"	FTG BARS
6'-8"<H≤8'-8"	5'-6"	(5) #6

NOTE:
THE DIFFERENCE IN FIN GRADE ELEVATION ON OPPOSITE SIDES OF THE FENCE SHALL NOT EXCEED 1'-0" MAX. PROVIDE CONTROL JOINTS @ 20'-0"o.c MAX.

CMU FENCE DETAIL
NTS 4500-00a — 11 / S1.6



BEAM SPLICE DETAIL
NTS 5211-02 — 7 / S1.6

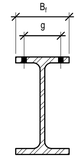


TYP WF BEAM TO STUD WALL
NTS 6306-07 — 8 / S1.6

NOT USED — 9 / S1.6

NOT USED — 10 / S1.6

B_f (IN)	g (IN)
4 ≤ B_f < 5	2¼"
5 ≤ B_f < 6	2½"
6 ≤ B_f < 8	3½"
8 ≤ B_f < 15	5½"

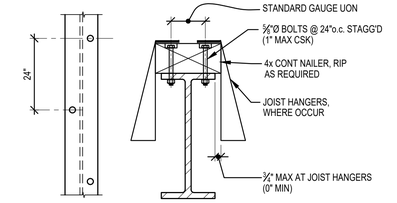


USUAL BOLT GAGE FOR STEEL BEAMS UON
NTS 5206-00 — 2 / S1.6

SCHEDULE A SINGLE-PLATE SHEAR CONNECTION					
BEAM SIZE	BOLTS	TYPE	SHEAR PLATE		
			MIN L	t	WELD "S"
W8,W10	(2) ¾"Ø	A307	6"	¼"	3/16"
W12,W14	(3) ¾"Ø	A307	9"	5/16"	¼"
W16	(4) ¾"Ø	A307	12"	5/16"	¼"
W18	(5) ¾"Ø	A307	15"	⅜"	5/16"
W21,W24	(6) ¾"Ø	A307	18"	⅜"	5/16"

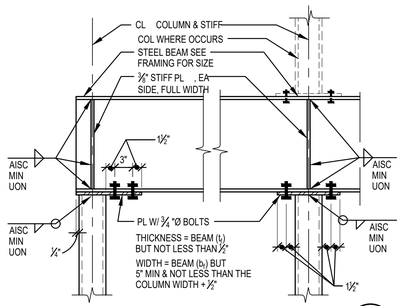
NOTE:
1. BOLT HOLES SHALL BE STANDARD UON.

BEAM CONN SCHEDULE
¾"Ø A307 5206-05(15th) — 3 / S1.6



NAILER ON STEEL BEAMS
NTS 5001-01A — 4 / S1.6

NOT USED — 5 / S1.6



BEAM TO HSS/PIPE COLUMN
NTS 5203-01 — 6 / S1.6

STRUCTURAL STEEL NOTES

1. GRADES: STRUCTURAL STEEL SHALL CONFORM TO THE FOLLOWING (UNLESS OTHERWISE NOTED):

STRUCTURAL SHAPE	ASTM SPECIFICATION	Fy (MIN)
W-SHAPES, WT-SHAPES	ASTM A992	50 ksi
CHANNELS, PLATES, AND ANGLES	ASTM A36	36 ksi
STEEL PIPE	ASTM A53 GRADE B	35 ksi
ROUND HSS	ASTM A500 GRADE C	46 ksi
SQUARE AND RECTANGULAR HSS	ASTM A500 GRADE C	50 ksi

2. NATURAL CAMBER: WHEN FABRICATING BEAMS, PLACE NATURAL CAMBER UP.
3. FABRICATION AND ERECTION: FABRICATION AND ERECTION OF STRUCTURAL STEEL SHALL BE IN ACCORDANCE WITH THE AISC MANUAL OF STEEL CONSTRUCTION. SHOP DRAWINGS SHALL BE SUBMITTED BEFORE FABRICATION.
4. BOLTS: ALL UNFINISHED BOLTS FOR WOOD TO STEEL SHALL BE ASTM A307 UNLESS OTHERWISE NOTED. BOLTS FOR STEEL TO STEEL CONNECTIONS SHALL BE A307 UON, EXCEPT THAT BOLTS FOR BEAM CONNECTIONS SHALL BE PER BEAM CONNECTION SCHEDULE. BOLT HOLES SHALL BE STANDARD SIZE UON.
5. HIGH STRENGTH BOLTS: HIGH STRENGTH (HS) BOLTS, IN SLIP CRITICAL CONNECTIONS (SC), SHALL BE ASTM A325. ASSEMBLY SHALL COMPLY WITH AISC SPECIFICATIONS FOR STRUCTURAL JOINTS USING ASTM A325 BOLTS AND SHALL COMPLY WITH THE REQUIREMENTS FOR SLIP CRITICAL TYPE CONNECTION, CLASS A SURFACE. INSTALLATION SHALL BE BY EITHER "CALIBRATED WRENCH TIGHTENING", "TURN OF THE NUT TIGHTENING METHOD", OR "TIGHTENING BY USE OF A DIRECT TENSION INDICATOR". HIGH STRENGTH BOLTS IN NON-SLIP CRITICAL CONNECTIONS (A325N) REQUIRE TIGHTENING TO THE SNUG TIGHT CONDITION ONLY.
6. MINIMUM CONNECTION: IF DETAILS ARE NOT SHOWN, BEAMS SHALL BE CONNECTED USING ¾"Ø A325N BOLTS PER PART 7, TABLE 7-1 OF AISC MANUAL OF STEEL CONSTRUCTION 15th EDITION. THE NUMBER OF BOLTS SHALL BE THE MAXIMUM POSSIBLE FOR THE PARTICULAR BEAM DEPTH. NO CONNECTION SHALL HAVE FEWER THAN 2 BOLTS.
7. WELDING:
   a.) ALL WELDS SHALL BE MADE WITH PREQUALIFIED JOINTS PER AISC, USING THE ELECTRIC ARC PROCESS AND E-70XX ELECTRODES IN ACCORDANCE WITH AWS STANDARDS.
   b.) ALL WELDING SHALL BE DONE BY APPROVED CERTIFIED WELDERS.
   c.) NO WELDING IS PERMITTED ON MEMBERS SUPPORTING LOADS.
   d.) ALL SHOP AND FIELD WELDING SHALL HAVE SPECIAL INSPECTION. ALL COMPLETE PENETRATION WELDS SHALL BE TESTED BY NON-DESTRUCTIVE TESTING (NDT) PROCEDURES IN ACCORDANCE WITH AWS STANDARDS).
   e.) ALL WELDS USED IN MEMBERS AND CONNECTIONS IN THE SFRS (SEISMIC FORCE RESISTING SYSTEM) SHALL BE MADE WITH A FILLER METALS MEETING THE REQUIREMENTS SPECIFIED IN CLAUSE 6.3 OF "STRUCTURAL WELDING CODE - SEISMIC SUPPLEMENT" (AWS D1.8 / D1.8M).
8. TEMPORARY BRACING: THE STEEL FABRICATOR SHALL PROVIDE ADEQUATE TEMPORARY BRACING FOR ERECTION.
9. SLOTTED AND OVERSIZED HOLES: WHERE SLOTTED OR OVERSIZED HOLES ARE SPECIFIED IN THE DRAWINGS, PROVIDE WASHERS PER AISC UNDER BOLT HEADS AND NUTS WHICH ARE IN CONTACT WITH SLOTTED AND OVERSIZED HOLES.
10. SHIMS: PROVIDE STEEL SHIMS AT SPLICES OF PARTS HAVING MORE THAN ¼" DIFFERENCE IN THICKNESS.
11. BEVELED WASHERS: PROVIDE BEVELED WASHERS ON ALL CONNECTIONS TO SLOPING FLANGES OF WIDE FLANGE SECTIONS AND CHANNELS.
12. STITCH BOLTS: PROVIDE ¾"Ø STITCH BOLTS AND FILL PLATE (OR EQUIVALENT WELDED FILL PLATES) CONNECTING ALL DOUBLE ANGLE MEMBERS AT 2'-0"o.c. MAX.
13. MINIMUM WELDS: WHERE MINIMUM AISC FILLET WELD THICKNESS REQUIREMENT EXCEEDS WELDS SHOWN ON DETAILS, PROVIDE MINIMUM AISC WELD.
14. OPENINGS IN STEEL MEMBERS: OPENINGS SHALL NOT BE PLACED IN STEEL MEMBERS UNLESS SPECIFICALLY DETAILED. STEEL MEMBERS SHALL BE SHORED WHEN PERMISSIBLE HOLES ARE CUT WITH TORCH AFTER STEEL IS ERECTED. THE SHORES SHALL REMAIN IN PLACE UNTIL STEEL TEMPERATURE HAS RETURNED TO AIR TEMPERATURE.
15. STUD BOLTS: ALL STUD BOLTS SHALL BE NELSON STUDS OR EQUIV PER ESR 2856 AND SHALL BE INSTALLED BY A LICENSED FABRICATOR.
16. STEEL EXPOSED TO EARTH: ALL STEEL EXPOSED TO EARTH SHALL HAVE A MINIMUM CONCRETE COVER OF 3" UON.
17. LIGHT GAGE STEEL: LIGHT GAGE COLD-FORMED STRUCTURAL STEEL SHALL CONFORM TO THE SPECIFICATIONS OF THE AISI MANUAL UNLESS OTHERWISE NOTED.
18. SHEAR CONNECTORS: SHEAR CONNECTORS SHALL BE ASTM A108 WITH Fu = 65 KSI.

UNLESS LARGER SIZES ARE SHOWN, THE MINIMUM SIZE OF FILLET WELDS SHALL BE AS SHOWN IN TABLE J2.4. THESE PROVISIONS DO NOT APPLY TO FILLET WELD REINFORCEMENTS OF PARTIAL-OR COMPLETE-JOINT-PENETRATION GROOVE WELDS.

TABLE J2.4 AISC MINIMUM SIZE OF FILLET WELDS	
MATERIAL THICKNESS OF THINNER PART JOINED (IN)	MINIMUM SIZE OF FILLET WELD (IN) *
TO ¼ INCLUSIVE	ⓧ USE 3/16 MIN
OVER ¼ TO ½	3/16
OVER ½ TO ¾	¼
OVER ¾ TO 1½"	5/16

* LEG DIMENSION OF FILLET WELDS. SINGLE-PASS WELDS MUST BE USED.

FILLET WELDS
NTS 5001-02 — 1 / S1.6

APPROVALS

FILE # 10–28 APPLICATION # 02–122132

IDENTIFICATION STAMP
DIV. OF THE STATE ARCHITECT
APP: 02-122132 INC: A
REVIEWED FOR
SS ☑ FLS ☑ ACS ☑
DATE: 08/06/2024

LICENSED ARCHITECT — MICHAEL J. SCOTT — No. C-34290 — REN: 08-31-25 — STATE OF CALIFORNIA

DATE: JANUARY 31, 2024

NEW TK CLASSROOM AT CHENEY KINDERGARTEN
COALINGA-HURON UNIFIED SCHOOL DISTRICT
COALINGA, FRESNO COUNTY, CA

REVISIONS

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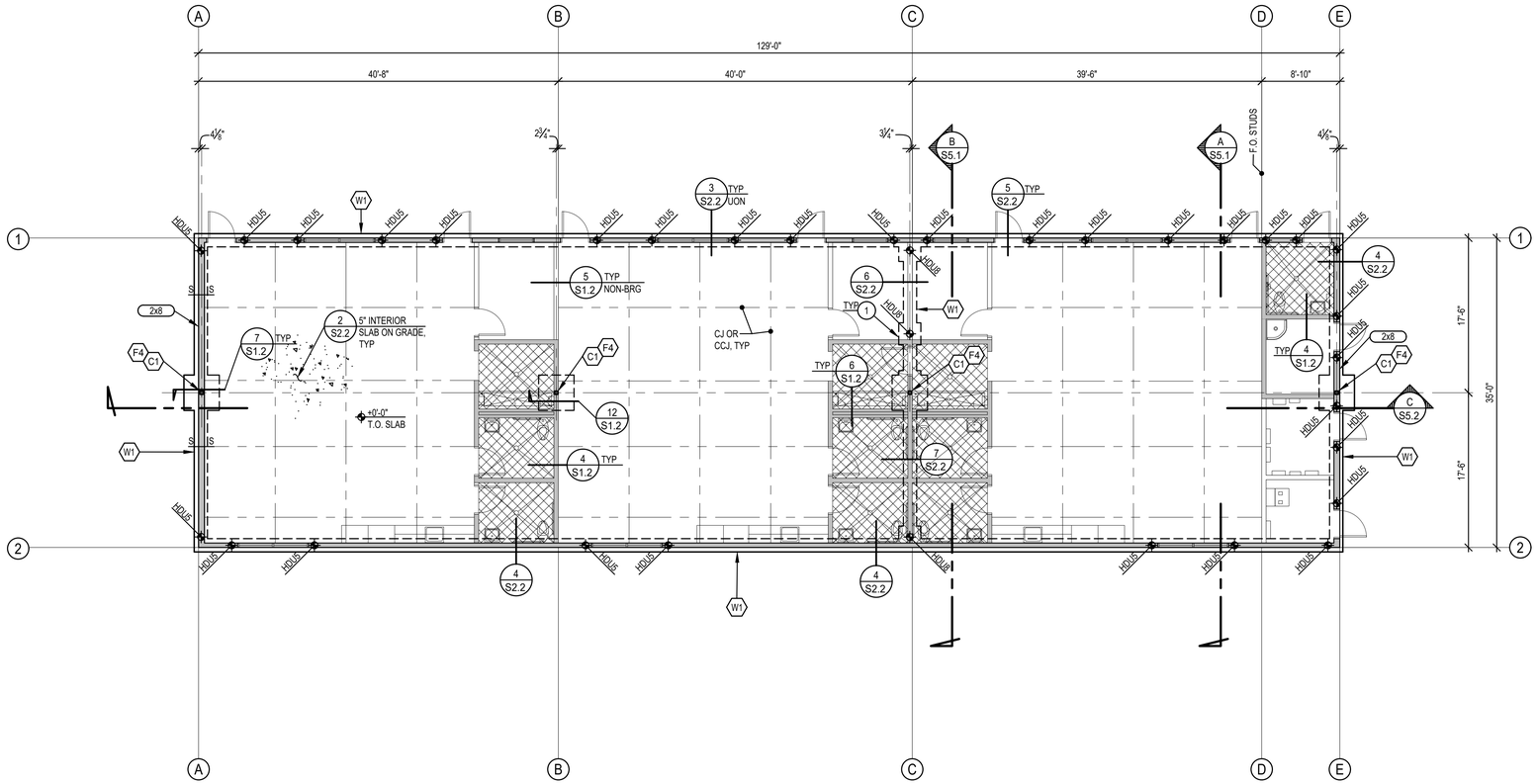
TITLE
TYPICAL NOTES AND DETAILS

S1.6

PROJECT 23044

REGISTERED PROFESSIONAL ENGINEER — JACK D. BRENGER — No. S5792 — Exp. 6-30-25 — STRUCTURAL — STATE OF CALIFORNIA

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(559) 432-4151 Fax 432-9315
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FOUNDATION PLAN

1/8" = 1'-0"

B.O. FOOTING ELEV = -3'-0" TYP UON

north

FOUNDATION NOTES

1. SEE SHEET S1.1 FOR GENERAL NOTES AND FOUNDATION NOTES.
2. REVIEW ALL DETAILS RELATED TO FOUNDATIONS ON THE TYPICAL DETAIL SHEETS PRIOR TO STARTING ANY WORK. TYPICAL DETAILS APPLY UNLESS SPECIFICALLY SHOWN OTHERWISE.
3. ALL REINFORCING AT CONTINUOUS FOOTINGS, INCLUDING TIES OR STIRRUPS, SHALL CONTINUE THRU PAD FOOTINGS.
4. SEE ARCHITECTURAL DRAWINGS AND/OR CIVIL DRAWINGS FOR LOCATIONS OF SIDEWALKS, PLANTERS, AND MOW STRIPS AROUND THE BUILDING PERIMETER.
5. PROVIDE SLIP DOWELS AT BUILDING SLAB TO EXTERIOR SLABS AND SIDEWALKS AT ALL DOOR OPENINGS.
6. SEE ARCHITECTURAL AND PLUMBING DRAWINGS FOR FLOOR DRAIN LOCATIONS WHICH MAY NOT NECESSARILY BE SHOWN ON FOUNDATION PLANS. SLOPE SLABS TO DRAINS.
7. COORDINATE LOCATION AND DEPTH OF ALL DEPRESSED SLABS WITH ARCHITECTURAL DRAWINGS.
8. DIMENSIONS AND GRID LINES ARE FROM F.O. PLYWOOD OR CL OF COLUMNS, TYP UON.

LEGEND

CCJ = CRACK CONTROL JOINT PER DET 8/S1.1

CJ = CONSTRUCTION JOINT PER DET 7/S1.1

= COLUMN / FOOTING TYPE

= BOTTOM OF FOOTING ELEVATION

HDU = SIMPSON HOLDOWN PER DET 9/S1.3

= 6" HIGH CONC CURB

= DEPRESSED SLAB AREA (-3" UON), SEE DET 4/S1.2

XxX = NOMINAL SIZE OF STUDS WHEN OTHER THAN 2x6. SEE ALSO SHEAR WALL ELEVATIONS.

= FOOTING STEP PER DET 6/S1.1

FOOTING SCHEDULE

MARK	PLAN DIMENSION	DEPTH	REINFORCEMENT
W1	1'-6" WIDE	2'-0"	(2) #5 CONT T & B W/ #3 STIRRUPS @ 24"o.c.
F4	4'-0" SQ	2'-0"	(5) #6 EA WAY BOTT

COLUMN SCHEDULE

MARK	SIZE	BASE PLATE	REF DET
C1	HSS 5x5x5/16	3/4"x1'-1" SQ	11/S1.2

KEY NOTES

1. WIDEN FOOTING AT HOLDOWN ANCHOR PER DET 10/S1.2

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TITLE: FOUNDATION PLAN

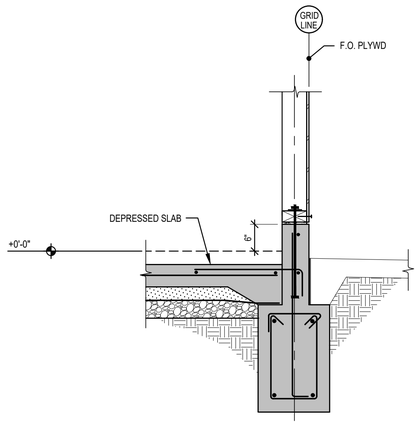
S2.1

PROJECT 23044

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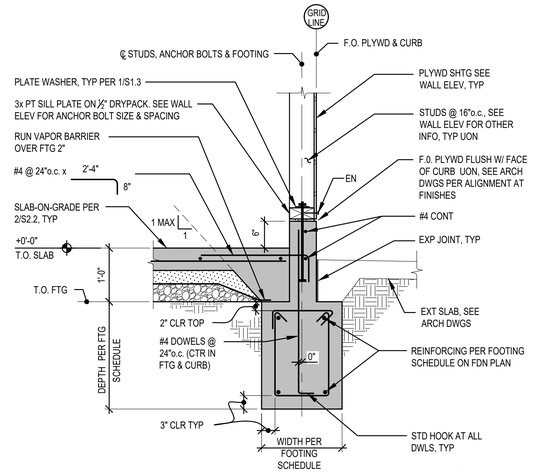
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FOOTING DETAIL

3/4" ~ 1'-0"

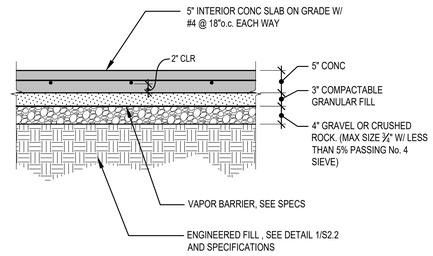
4 / S2.2



TYPICAL EXTERIOR FOOTING DETAIL

3/4" ~ 1'-0"

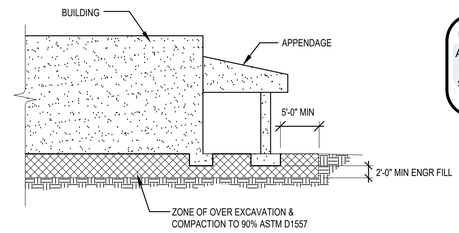
3 / S2.2



SLAB ON GRADE

3/4" ~ 1'-0"

2 / S2.2



1. PRIOR TO EARTHWORK OPERATIONS, THE AREA TO BE DEVELOPED SHALL BE STRIPPED AND CLEARED ACCORDING TO THE REQUIREMENTS OF THE SOILS REPORT.
2. AFTER STRIPPING AND CLEARING, THE PROPOSED BUILDING AREAS SHOULD BE OVER EXCAVATED TO A MINIMUM DEPTH OF 3 FEET BELOW THE STRIPPED GROUND SURFACE OR 2 FEET BELOW THE BOTTOM OF PROPOSED FOOTINGS, WHICHEVER IS DEEPER. ALL FOOTINGS SHALL BE SUPPORTED ON A MINIMUM OF 24" OF ENGINEERED FILL.
3. SCARIFY THE EXPOSED SURFACE TO A DEPTH OF 6 INCHES, MOISTURE CONDITION TO A MINIMUM OF 2% ABOVE OPTIMUM MOISTURE CONTENT, AND COMPACT TO AT LEAST 90% OF MAXIMUM DRY DENSITY.
4. ALL FILLS SHALL BE PLACED IN UNIFORM LAYERS NOT EXCEEDING 6-INCHES IN LOOSE THICKNESS , MOISTURE CONDITIONED ABOVE OPTIMUM MOISTURE CONTENT AND COMPACTED TO AT LEAST 90 PERCENT OF MAXIMUM DRY DENSITY AS DETERMINED BY ASTM D1557.
5. EXTEND THE ZONE OF OVER-EXCAVATION AND COMPACTION A MIN OF 5 FEET BEYOND THE PERIMETER OF BUILDINGS.
6. SEE SOILS REPORT AND SPECIFICATIONS FOR OTHER INFO.

EXCAVATION AND COMPACTION DETAIL

NTS

1 / S2.2



INTERIOR WALL FOOTING WITH CURB

3/4" ~ 1'-0"

3108-05

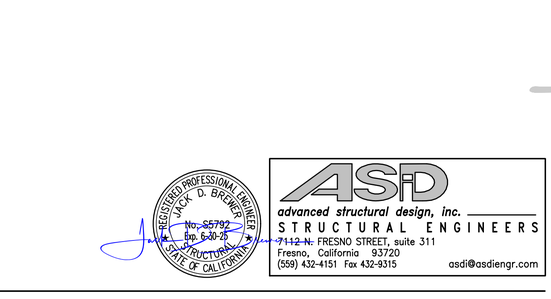
7 / S2.2

INTERIOR WALL FOOTING

3/4" ~ 1'-0"

3108-04

6 / S2.2



FOOTING AT OPENING DETAIL

3/4" ~ 1'-0"

5 / S2.2

APPROVALS

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No. C-34290
REN: 08-31-25
STATE OF CALIFORNIA

DATE: JANUARY 31, 2024

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COALINGA-HURON UNIFIED SCHOOL DISTRICT

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(559) 627.1926 Fax

TITLE
FOOTING DETAILS

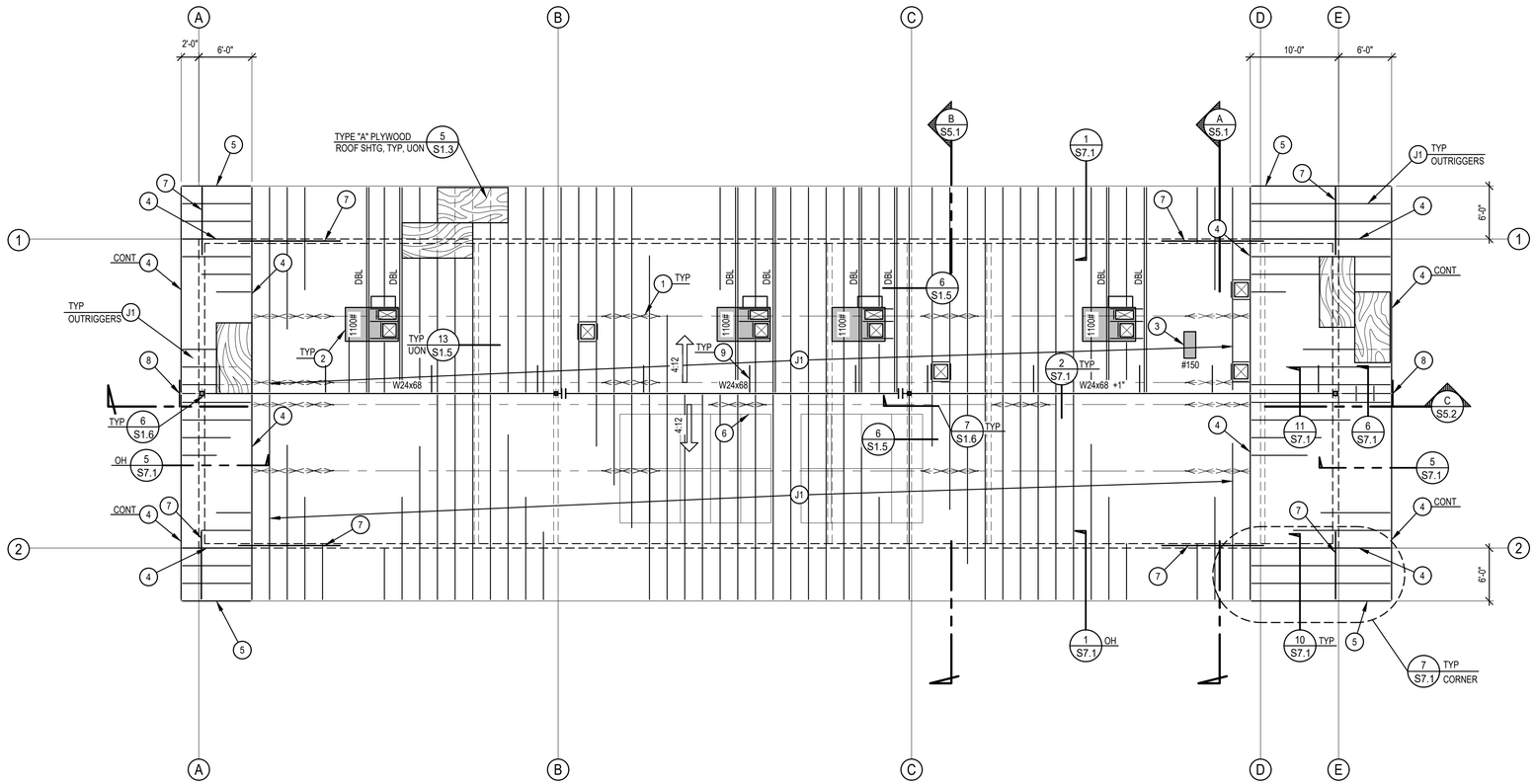
S2.2

PROJECT 23044

REGISTERED PROFESSIONAL ENGINEER
JACK D. BRENGER
No. S5792
Exp. 6-30-25
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ROOF FRAMING PLAN

1/8" = 1'-0"

north

I-JOIST SCHEDULE

MARK	SIZE	SPACING
J1	16" RED I-90	24"o.c.

WOOD FRAMING NOTES

1. ELEVATIONS ARE GIVEN TO TOP OF FRAMING (BOTTOM OF SHEATHING) UON.
2. SEE TYPICAL DETAIL SHEETS FOR GENERAL NOTES, SCHEDULES, AND TYPICAL DETAILS. WHERE SPECIFIC DETAILS ARE NOT SHOWN, THE TYPICAL DETAILS SHALL APPLY.
3. VERIFY SIZE AND LOCATION OF OPENINGS FOR EQUIPMENT WITH MECHANICAL AND ELECTRICAL DRAWINGS. LOCATE UNITS SO DUCT DROPS FALL BETWEEN JOISTS AS SHOWN. DO NOT CUT JOISTS EXCEPT WHERE SHOWN ON DRAWINGS. UNIT WEIGHTS SHOWN ARE THE WEIGHTS USED FOR DESIGN OF THE FRAMING. WEIGHTS OF UNITS SHALL NOT EXCEED THESE WEIGHTS WITHOUT THE ADVANCE APPROVAL OF THE STRUCTURAL ENGINEER.
4. SEE TYPICAL DETAILS FOR FRAMING AT ROOF OPENINGS, UON.
5. SEE TYPICAL DETAILS FOR FRAMING OF EQUIPMENT PLATFORMS.
6. PROVIDE POSTS UNDER ALL BEAMS UNLESS DETAILS SHOW OTHERWISE. POSTS SHALL BE AT LEAST AS WIDE AS THE BEAMS AND AS DEEP AS THE WALL STUDS.
7. PROVIDE PLYWOOD BOUNDARY NAILING (BN) ALONG ALL RAFTERS, BLOCKING, AND STRUTS ALONG SHEAR WALL LINES.
8. ALL SIMPSON CONNECTORS ARE TAKEN FROM CATALOG C-C 2024 BY SIMPSON STRONGTIE INC.
9. IT IS NOT THE INTENT OF THESE DRAWINGS TO SHOW FIRE BLOCKING OR BLOCKING REQUIRED FOR FINISHES OR OTHER NON-STRUCTURAL ELEMENTS. SEE ARCHITECTURAL DRAWINGS AND SPECIFICATIONS.
10. SEE ARCHITECTURAL DRAWINGS FOR SIZE AND LOCATIONS OF ROOF ACCESSES. PROVIDE FRAMING AND BLOCKING AROUND OPENINGS PER TYPICAL DETAILS UON WHERE APPLICABLE, FRAME OPENING IN CEILING FRAMING ALSO.
11. PROVIDE FRAMING AT ALL HARD CEILINGS PER DET 12/S1.4 UON. REFER TO THE ARCHITECTURAL DRAWINGS FOR LOCATIONS OF HARD CEILINGS.

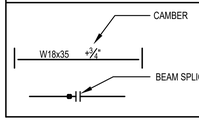
I-JOIST NOTES

1. SEE DETAIL 1/S1.5 FOR I-JOIST PROPERTIES.
2. SEE DETAIL 8/S1.5 FOR I-JOIST BLOCKING.
3. SEE DETAIL 8/S1.5 FOR ATTACHMENT OF I-JOIST TO BEARINGS.
4. PROVIDE X-BRIDGING AT MIDSPAN OF ALL I-JOIST'S, SEE DETAIL 9/S1.5.
5. SEE DETAIL 12/S1.5 FOR DOUBLE I -JOIST'S. PROVIDE SPECIAL HANGER MADE FOR DOUBLE JOISTS.
6. EACH I-JOIST SHALL BE IDENTIFIED BY A STAMP INDICATING THE JOIST TYPE, ESR REPORT NUMBER, MANUFACTURER'S NAME, PLANT NUMBER, AND PFS CORPORATION LOGO AND THEIR REPORT NUMBER.

KEY NOTES

1. I-JOIST X-BRIDGING PER DETAIL 9/S1.5
2. ROOF MOUNTED MECH UNIT, SEE DETAIL 15/S1.5 & MECH DWGS FOR OTHER INFO
3. ROOF-MOUNTED MECH. EQUIP ON WOOD PLATFORM SEE MECH DWGS & DET 14/S1.4 FOR PLATFORM
4. 3½"x16" REDLAM LVL (2.0E-2900Fb)
5. 1½"x18" REDLAM LVL (2.0E-2900Fb) SHAPED TOP & BOT
6. SOLAR PANEL ARRAY, SEE ELECT DWGS
7. SIMPSON STRAP OVER PLYWOOD SHEATHING OVER BLKG BELOW, PER WALL ELEVATION
8. SIMPSON MSTA36 OVER ROOF PLYWD SHTG TO LVL BELOW, CTR ON RIDGE
9. L3x3x¼ BRACE AT BOTTOM FLANGE OF STEEL BEAM PER 7/S7.1. LOCATE @ 12'-0" o.c. MAX AND 2'-0" MAX FROM COLUMNS.

LEGEND



APPROVALS

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TITLE
ROOF FRAMING PLAN

S3.1

PROJECT 23044

REGISTERED PROFESSIONAL ENGINEER
JACK D. BRENGER
No. S5792
Exp. 6-30-25
STRUCTURAL
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ASD
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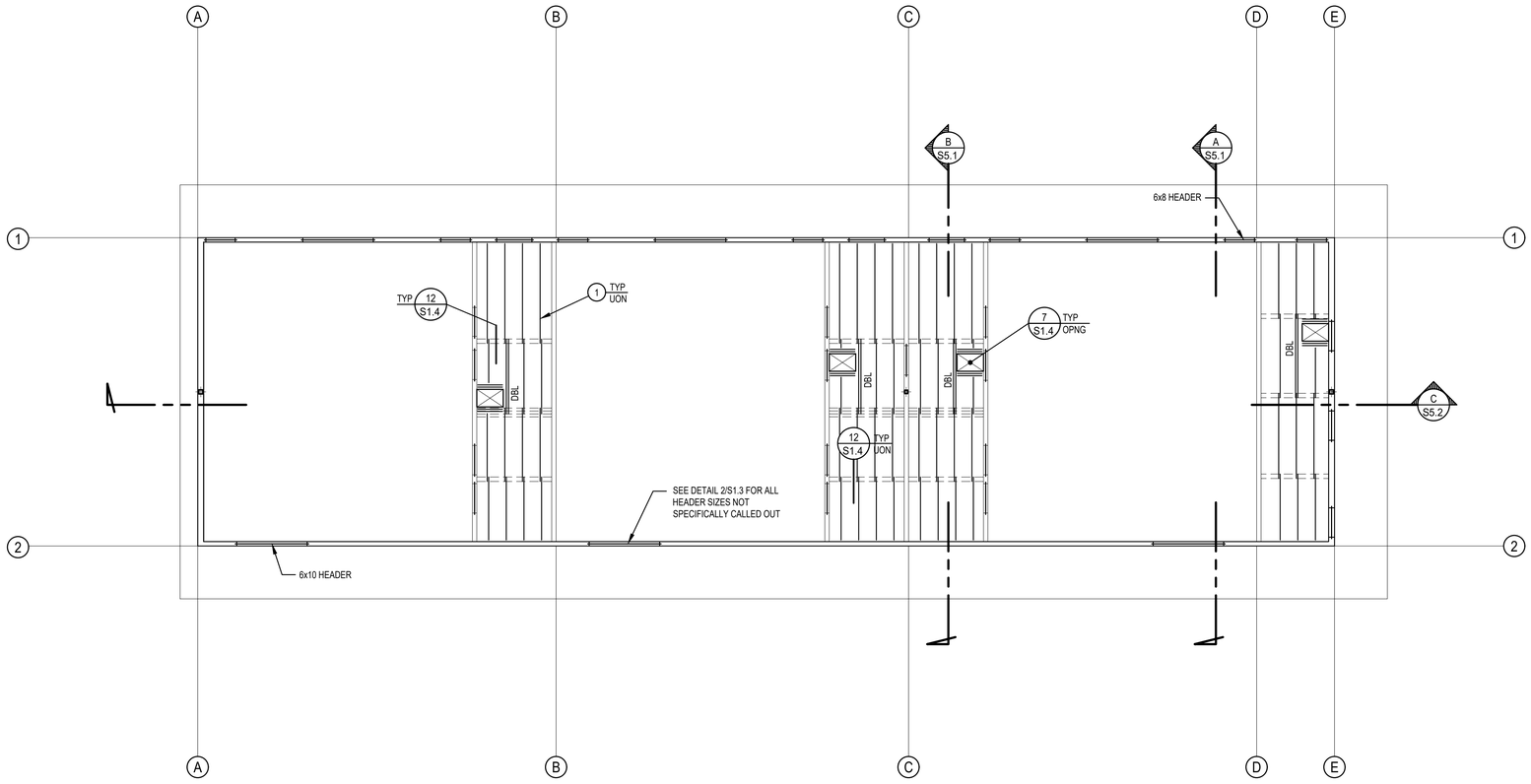
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CEILING FRAMING NOTES

1. SEE WOOD FRAMING NOTES ON SHEET S3.1.
2. COORDINATE FIXTURE LOCATIONS WITH ARCH AND ELECTRICAL DRAWINGS.
3. FOR TYPICAL CEILING FRAMING SEE DETAIL 12/S1.4.
4. SEE ROOF FRAMING PLANS FOR BEAM SIZES TYPICAL UON.
5. FOR TYPICAL HEADER SIZES NOT SPECIFICALLY CALLED OUT ON PLANS SEE DETAIL 2/S1.3.
6. SEE WOOD NOTES ON SHEET S1.3.

KEY NOTES

(1) 2x CEILING JOISTS @ 24"o.c., UON, SEE DETAIL 12/S1.4



CEILING FRAMING PLAN

1/8" = 1'-0"

north

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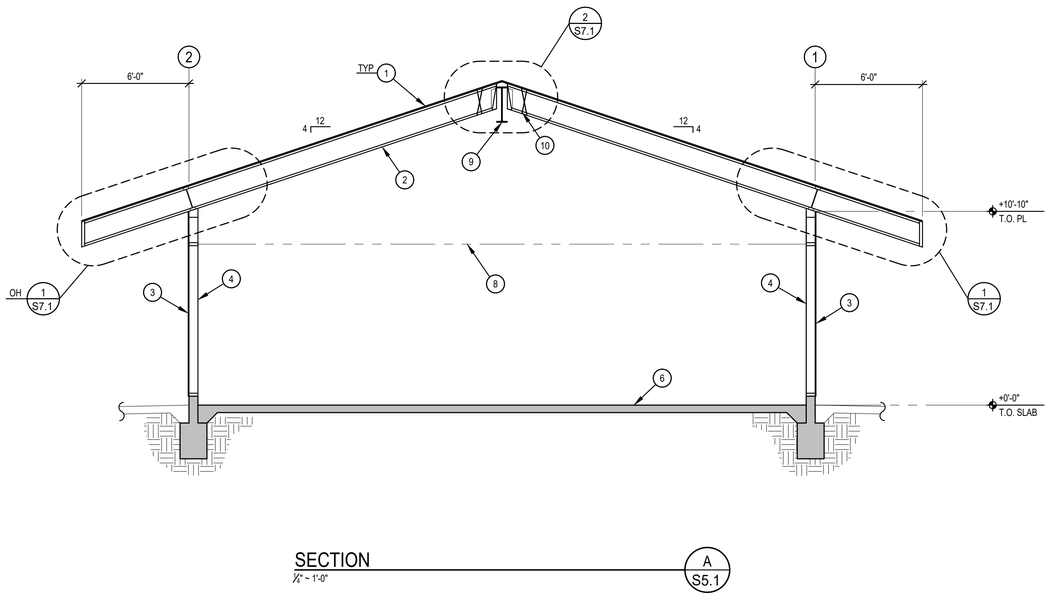
TITLE
CEILING FRAMING PLAN

S4.1

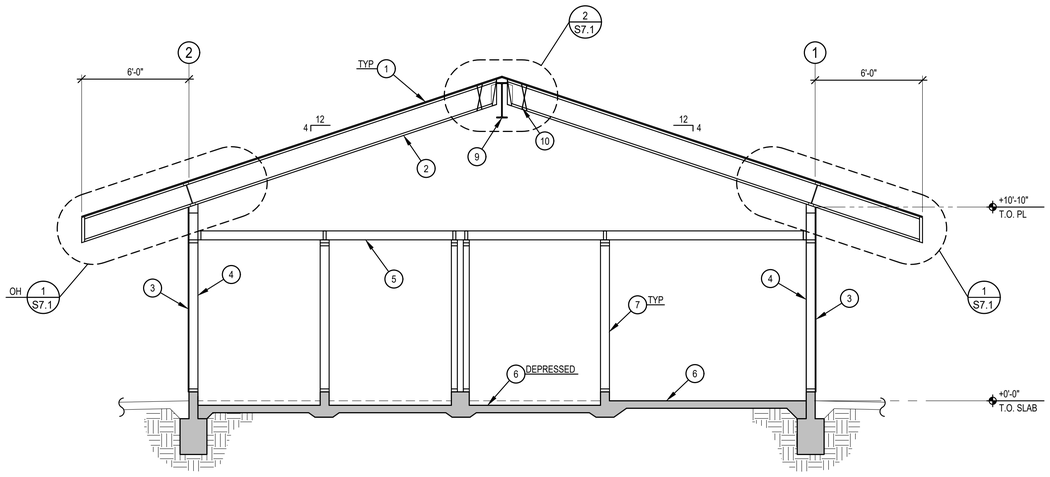
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SECTION A
1/2" = 1'-0"
S5.1



SECTION B
1/2" = 1'-0"
S5.1

KEY NOTES

1. PLYWOOD ROOF SHEATHING PER FRAMING PLAN
2. I-JOISTS PER ROOF FRAMING PLAN
3. PLYWOOD WALL SHEATHING PER WALL ELEVATIONS
4. STUDS @ 16"o.c. PER WALL ELEVATIONS
5. CEILING JOISTS PER CEILING FRAMING PLAN & DETAIL 12/S1.4
6. CONCRETE SLAB ON GRADE PER FOUNDATION PLAN
7. STUDS @ 16"o.c. PER ARCH DWGS
8. SUSPENDED CEILING PER ARCH DWGS
9. BEAM PER FRAMING PLAN
10. X-BRIDGING PER FRAMING PLAN & DET 9/S1.5

APPROVALS

FILE # 10-28 | APPLICATION # 02-122132

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APP: 02-122132 INC:
REVIEWED FOR
SS ☑ FLS ☑ ACS ☑
DATE: 08/06/2024

LICENSED ARCHITECT
MICHAEL J. SCOTT MORRELLI
No. C-34290
REN: 08-31-25
STATE OF CALIFORNIA

DATE: JANUARY 31, 2024

NEW TK CLASSROOM AT CHENEY KINDERGARTEN

COALINGA-HURON UNIFIED SCHOOL DISTRICT
COALINGA, FRESNO COUNTY, CA

REVISIONS

MANGINI | ARCHITECTURE INGENUITY
BARENG MORRELLI SCOTT
MANGINI ASSOCIATES INC.
4320 West Mineral King Avenue
Visalia, California 93291
www.mangini.us
(559) 627.0530 Office
(559) 627.1926 Fax

TITLE
BUILDING SECTIONS

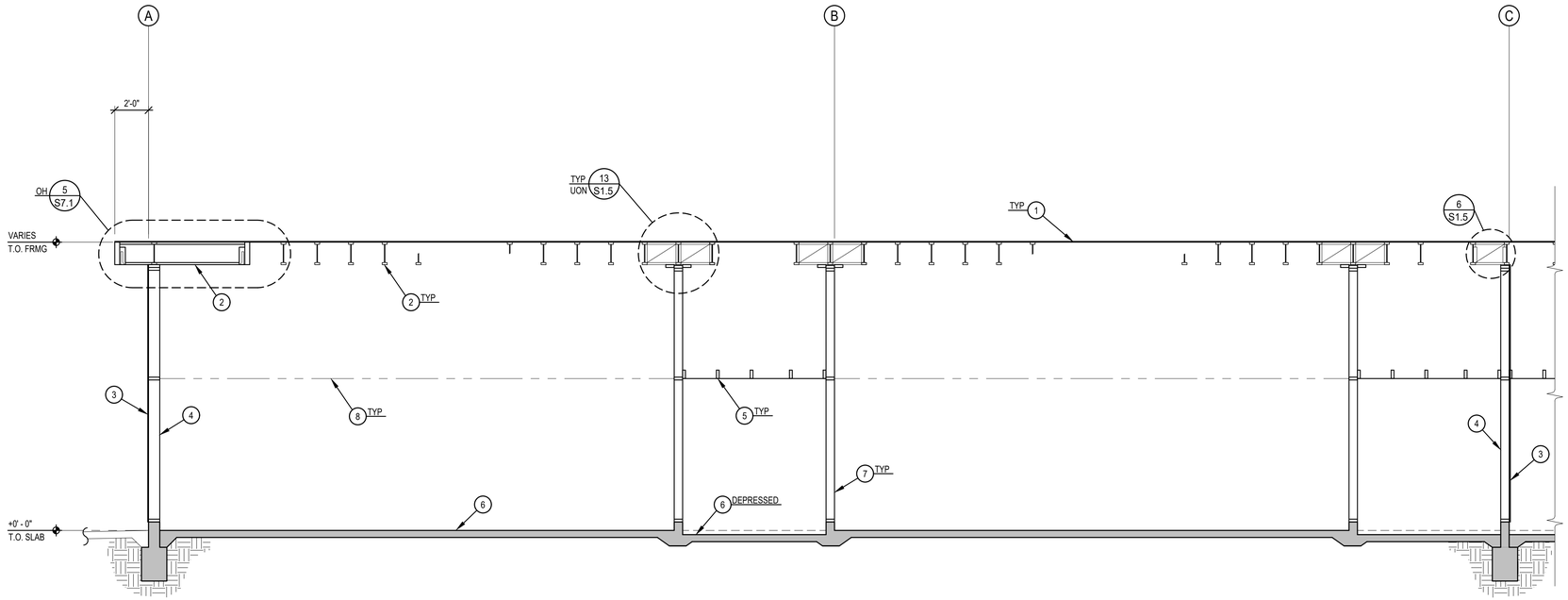
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PROJECT 23044

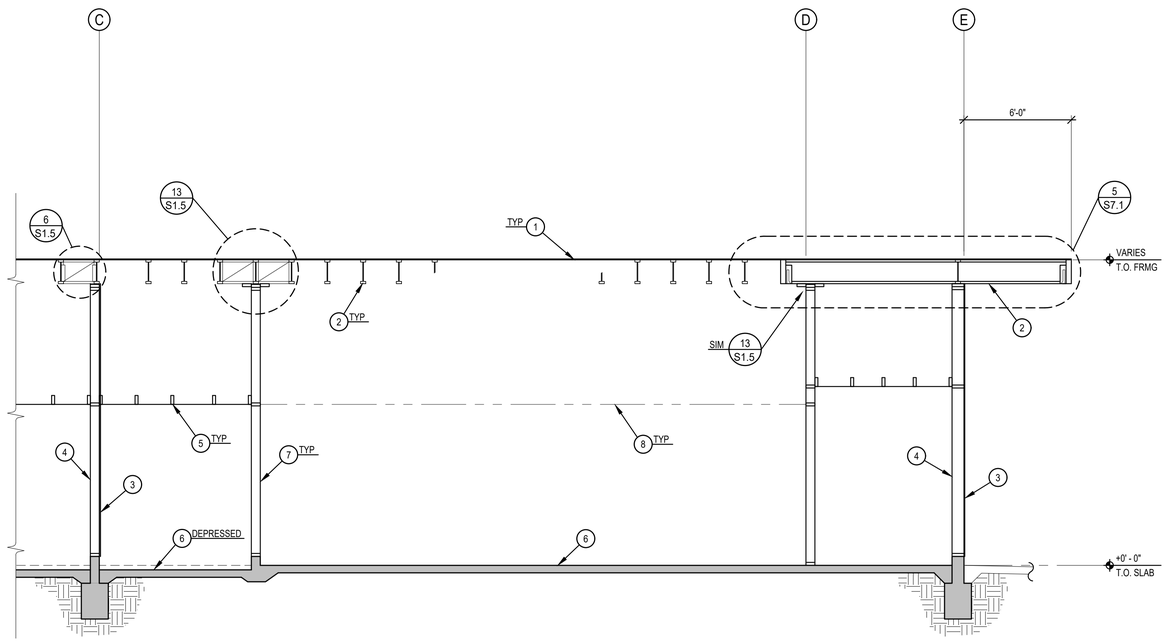
REGISTERED PROFESSIONAL ENGINEER
JACK D. BREWER
No. S5792
Exp. 6-30-25
STRUCTURAL
STATE OF CALIFORNIA

ASD
advanced structural design, inc.
STRUCTURAL ENGINEERS
~~1112 N.~~ FRESNO STREET, suite 311
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P:\M62321 Cheney Kinder TK\Struct\S5.1_BLdg Sect.dwg Aug 02 2024 12:50pm



PARTIAL SECTION (CONTINUED) — C S5.2
1/4" = 1'-0"



PARTIAL SECTION (CONTINUED) — C S5.2
1/4" = 1'-0"

KEY NOTES

1. PLYWOOD ROOF SHEATHING PER FRAMING PLAN
2. I-JOISTS PER ROOF FRAMING PLAN
3. PLYWOOD WALL SHEATHING PER WALL ELEVATIONS
4. STUDS @ 16"o.c. PER WALL ELEVATIONS
5. CEILING JOISTS PER CEILING FRAMING PLAN & DETAIL 12/S1.4
6. CONCRETE SLAB ON GRADE PER FOUNDATION PLAN
7. STUDS @ 16"o.c. PER ARCH DWGS
8. SUSPENDED CEILING PER ARCH DWGS

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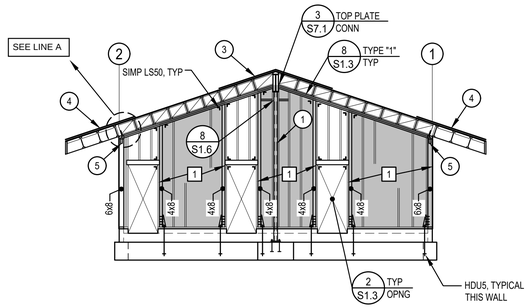
TITLE
BUILDING SECTIONS

S5.2

PROJECT 23044

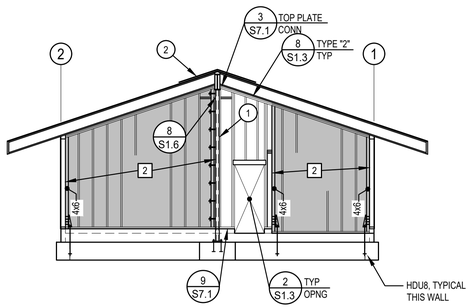
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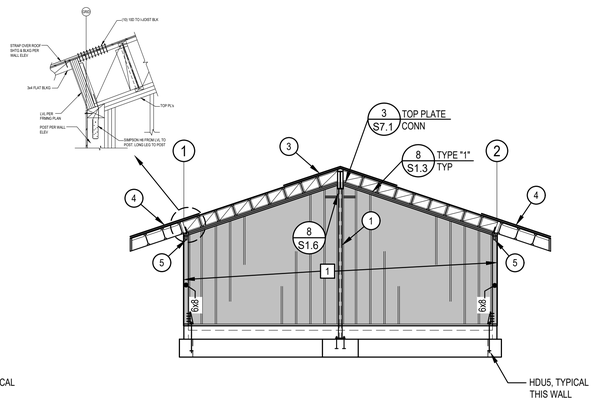
WALL LINE "E"

1/8" ~ 1'-0" 2x8 @ 16"o.c.



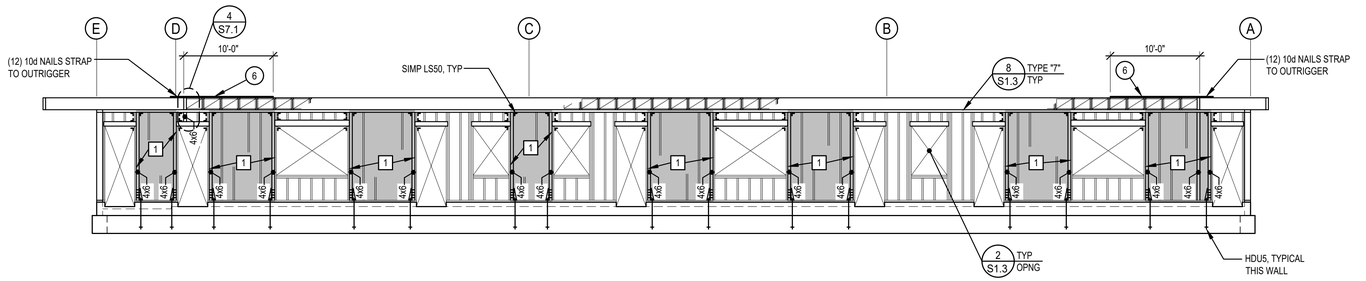
WALL LINE "C"

1/8" ~ 1'-0" 2x6 @ 16"o.c.
(3x STUDS & BLKG AT TYPE 2 PLYWD JOINTS)



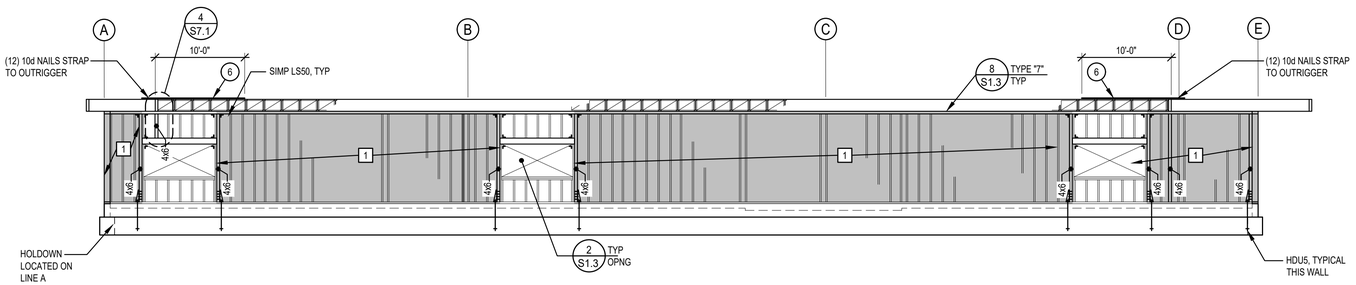
WALL LINE "A"

1/8" ~ 1'-0" 2x8 @ 16"o.c.



WALL LINE "1"

1/8" ~ 1'-0" 2x6 @ 16"o.c.



WALL LINE "2"

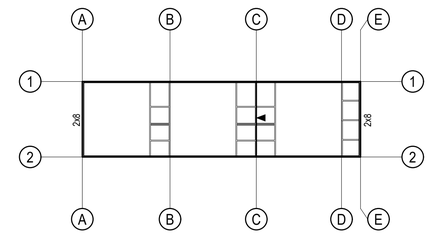
1/8" ~ 1'-0" 2x6 @ 16"o.c.

SHEAR WALL NOTES

1. SHADED AREAS ON WALLS INDICATE REGIONS OF STRUCTURAL SHEAR PANELS. OTHER REGIONS ON WALL SHALL HAVE THE SAME SHEATHING WITH NAILS AT 6"o.c AT EDGES AND 12"o.c. FIELD.
2. PROVIDE PLYWOOD ON ALL EXTERIOR SURFACES OF FASCIAS AND EXTERIOR WALLS PER NOTE #1 "OTHER REGIONS", EVEN IF WALL ELEVATIONS ARE NOT DRAWN.
3. (EN) "EDGE NAILING" SPACE NAILS AS REQUIRED FOR SHEAR PANEL EDGES EVEN IF NOT AT AN EDGE.
4. [#] - INDICATES SHEATHING TYPE AND ANCHOR BOLT SPACING PER SCHEDULE ON DETAIL 3/S1.3.
5. SILL BOLTS AT NON-SHEAR REGIONS OF WALLS SHALL BE ⅝"Øx 12" SPACED AT 48"o.c. MAXIMUM.
6. STUDS OR POSTS AT EDGES OF SHEAR PANELS AND AT HOLD DOWNS SHALL BE ONE PIECE FULL HEIGHT OF WALL AND SHALL RECEIVE EDGE NAILING FULL HEIGHT.
7. PROVIDE EDGE NAILING TO EACH TOP PLATE OF WALL. SEE DETAIL 8/S1.3 FOR SCHEDULE OF PLATE SPLICES.
8. ALL MEMBERS DESIGNATED AS "STRUTS" SHALL RECEIVE EN FOR THEIR ENTIRE LENGTH.
9. SEE DETAIL 9/S1.3 FOR HOLD DOWNS, UNLESS OTHERWISE NOTED.
10. FRAME WALLS AND OPENINGS PER 2/S1.3 UNLESS OTHERWISE NOTED.
11. FRAME ALL HOLES THRU SHEAR WALLS PER DETAILS 5/S1.4 & 6/S1.4 UON.
12. PROVIDE SOLID CONTINUOUS BLOCKING AT 48"o.c. AT ALL WALL REGIONS WHICH DO NOT HAVE PLYWOOD OR GYP BOARD ON BOTH FACES.
13. STUD SIZES INDICATED ON THE WALL ELEVATIONS ARE FOR THE TYPICAL STUDS. REFER TO THE SHEATHING PANEL SCHEDULE ON THE TYPICAL SHEAR WALL DETAIL FOR REGIONS REQUIRING 3x STUDS AND BLOCKING AT PANEL JOINTS.

KEY NOTES

1. HSS COLUMN PER FOUNDATION PLAN
2. SIMPSON MST130 CTR'D ON RIDGE
3. SIMPSON CS16 STRAP x 12'-0" OVER PLYWD W/ 10d @ 4½" o.c. TO I-JOIST BLKG (CTR ON RIDGE).
4. SIMPSON CS16 OVER PLYWD W/ (10) 10d TO LAST I-JOIST BLKG PANEL & 10d @ 4 ½ " o.c. TO 3x4 FLAT BLKG AT FULL LENGTH OF OVERHANG.
5. STRAP LVL TO WALL PER DETAIL 7/S7.1
6. SIMPSON CS16 STRAP OVER ROOF SHEATHING W/ 10d 4½" o.c. TO I-JOIST BLKG PANELS



KEY PLAN

NO SCALE

◄ - INDICATES FACE TO RECEIVE SHEAR WALL PLYWOOD AT INTERIOR WALLS. ALL EXTERIOR WALLS HAVE PLYWOOD ON THE OUTSIDE FACE UON. STUD SIZES INDICATED ON KEY PLAN ARE THE NOMINAL STUD SIZE. ALL WALLS NOT LABELED SHALL BE 2x6 NOMINAL UON.

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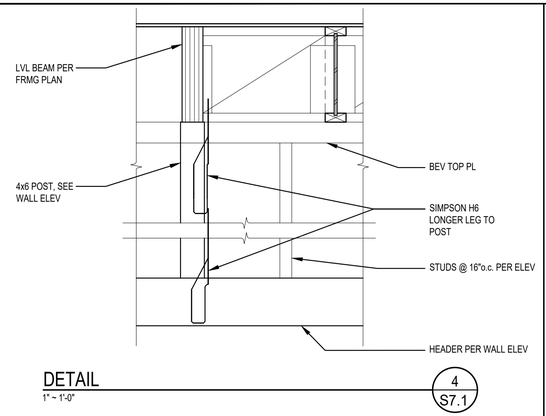
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SHEAR WALL ELEVATIONS

S6.1

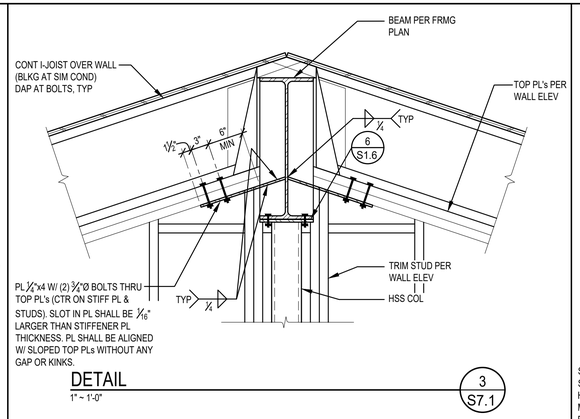
PROJECT 23044

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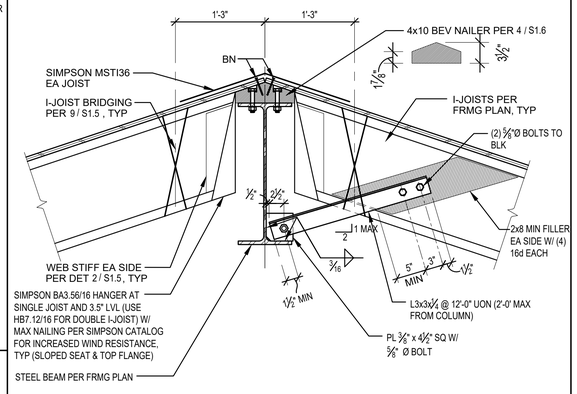
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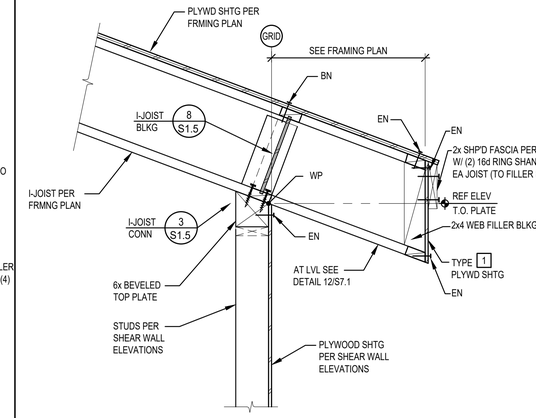
DETAIL 4 S7.1
1" ~ 1'-0"



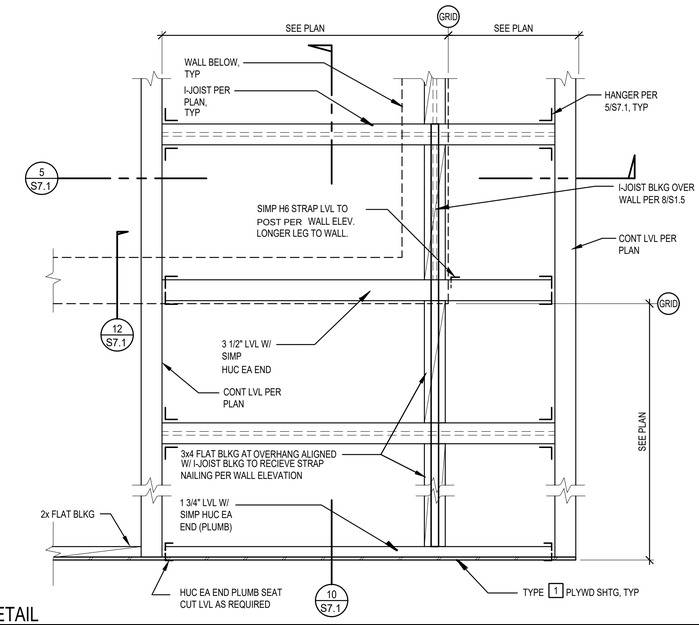
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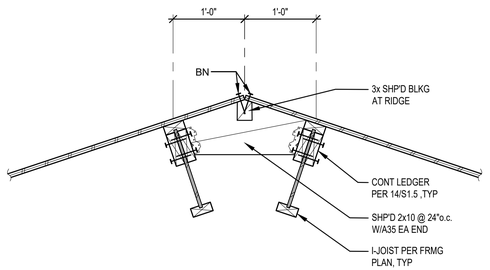
DETAIL 2 S7.1
1" ~ 1'-0"



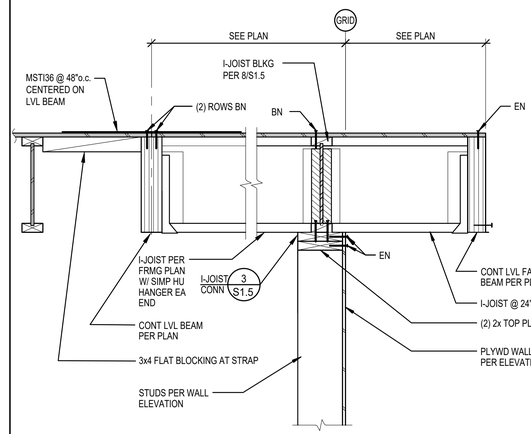
DETAIL 1 S7.1
1" ~ 1'-0"



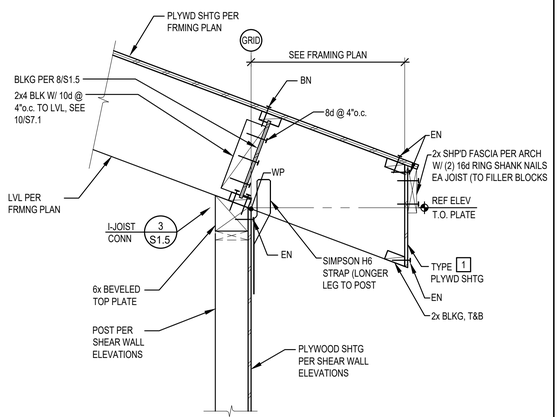
DETAIL 7 S7.1
1" ~ 1'-0"



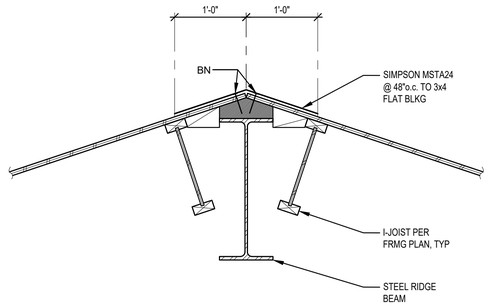
DETAIL 6 S7.1
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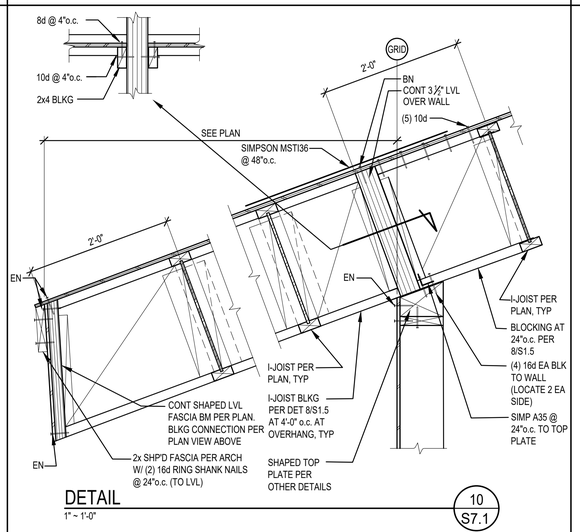
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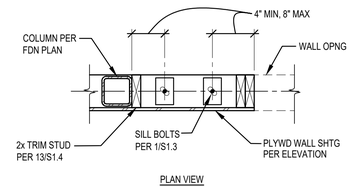
DETAIL 12 S7.1
1" ~ 1'-0"



DETAIL 11 S7.1
1" ~ 1'-0"



DETAIL 10 S7.1
1" ~ 1'-0"



DETAIL 9 S7.1

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TITLE
FRAMING DETAILS

S7.1

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GENERAL PLUMBING NOTES:

1. THE INTENT OF THE DRAWINGS AND SPECIFICATIONS IS TO CONSTRUCT THE BUILDING IN ACCORDANCE WITH THE 2022 EDITION OF TITLE 24, CALIFORNIA CODE OF REGULATIONS. SHOULD ANY CONDITIONS DEVELOP NOT COVERED BY THE CONTRACT DOCUMENTS WHEREIN THE FINISHED WORK WOULD NOT COMPLY WITH SAID TITLE 24, CALIFORNIA CODE OF REGULATIONS, A CHANGE ORDER DETAILING AND SPECIFYING THE REQUESTED WORK SHALL BE SUBMITTED TO AND APPROVED BY DSA BEFORE PROCEEDING WITH THE WORK.

2. THE APPLICABLE CODES AND REGULATIONS FOR THIS PROJECT INCLUDE, BUT ARE NOT LIMITED TO, THE FOLLOWING:

   CALIFORNIA CODE OF REGULATIONS
   TITLE 8, INDUSTRIAL RELATIONS
   TITLE 19, PUBLIC SAFETY, STATE FIRE MARSHAL REGULATIONS
   TITLE 24, PART 1, ADMINISTRATIVE REGULATIONS
   2022 CALIFORNIA BUILDING CODE, PART 2, TITLE 24 CCR
   2022 CALIFORNIA ELECTRICAL CODE, PART 3, TITLE 24 CCR
   2022 CALIFORNIA MECHANICAL CODE, PART 4, TITLE 24 CCR
   2022 CALIFORNIA PLUMBING CODE, PART 5, TITLE 24 CCR
   2022 CALIFORNIA FIRE CODE, PART 9, TITLE 24 CCR

   NFPA 101 2021 EDITION
   OSHA - OCCUPATIONAL SAFETY AND HEALTH ACT

3. LAYOUT OF MATERIALS, EQUIPMENT AND SYSTEMS IS GENERALLY DIAGRAMMATIC UNLESS SPECIFICALLY DIMENSIONED. SOME WORK MAY BE SHOWN OFFSET FOR CLARITY. THE PLUMBING BUILDING PLANS HAVE BEEN PREPARED TO MATCH THE ARCHITECTURAL PLANS. IF DIFFERENCES OCCUR, THE ARCHITECTURAL PLANS ARE TO TAKE PRECEDENCE. THE ACTUAL LOCATIONS OF ALL MATERIALS, PIPING, DUCTWORK, FIXTURES, EQUIPMENT, SUPPORTS, ETC. SHALL BE CAREFULLY PLANNED, PRIOR TO INSTALLATION OF ANY WORK, TO AVOID ALL INTERFERENCE WITH EACH OTHER, OR WITH STRUCTURAL, ELECTRICAL, ARCHITECTURAL, OR OTHER ELEMENTS. ALL PIPE OFFSET ELBOWS FOR COORDINATION BETWEEN TRADES ARE NOT SHOWN. CONTRACTOR SHALL INCLUDE SUFFICIENT FUNDS FOR THE COORDINATION OFFSETS IN THE BID. VERIFY THE PROPER VOLTAGE AND PHASE OF ALL EQUIPMENT WITH THE ELECTRICAL PLANS. ALL CONFLICTS SHALL BE CALLED TO THE ATTENTION OF THE ARCHITECT AND THE ENGINEER PRIOR TO INSTALLATION OF ANY WORK OR THE ORDERING OF ANY EQUIPMENT.

4. WHEN INSTALLING DRILLED-IN ANCHORS AND/OR POWDER-DRIVEN PINS IN EXISTING NON-PRESTRESSED CONCRETE, USE CARE AND CAUTION TO AVOID CUTTING OR DAMAGING THE EXISTING REINFORCING BARS. WHEN INSTALLING THEM INTO EXISTING PRE-STRESSED CONCRETE (PRE- OR POST-TENSIONED), LOCATE THE PRESTRESSED TENDONS BY USING A NON-DESTRUCTIVE METHOD PRIOR TO INSTALLATION. MAINTAIN A MINIMUM CLEARANCE OF ONE INCH BETWEEN THE REINFORCEMENT AND THE DRILLED-IN ANCHOR AND/OR PIN.

5. **MEP COMPONENT ANCHORAGE NOTE:**

   ALL MECHANICAL, PLUMBING, AND ELECTRICAL COMPONENTS SHALL BE ANCHORED AND INSTALLED PER THE DETAILS ON THE DSA APPROVED CONSTRUCTION DOCUMENTS. THE FOLLOWING COMPONENTS SHALL BE ANCHORED OR BRACED TO MEET THE FORCE AND DISPLACEMENT REQUIREMENTS PRESCRIBED IN THE 2022 CBC, SECTIONS 1617A.1.18 THROUGH 1617A.1.26 AND ASCE 7-16 CHAPTERS 13, 26 AND 30.

   1. ALL PERMANENT EQUIPMENT AND COMPONENTS.
   2. TEMPORARY OR MOVABLE EQUIPMENT THAT IS PERMANENTLY ATTACHED (E.G. HARD WIRED) TO THE BUILDING UTILITY SERVICES SUCH AS ELECTRICITY, GAS OR WATER.
   3. TEMPORARY, MOVABLE, OR MOBILE EQUIPMENT WHICH IS HEAVIER THAN 400 POUNDS OR HAS A CENTER OF MASS LOCATED 4 FEET OR MORE ABOVE THE ADJACENT FLOOR OR ROOF LEVEL THAT DIRECTLY SUPPORT THE COMPONENT IS REQUIRED TO BE RESTRAINED IN A MANNER APPROVED BY DSA.

   THE FOLLOWING MECHANICAL AND ELECTRICAL COMPONENTS SHALL BE POSITIVELY ATTACHED TO THE STRUCTURE, BUT NEED NOT DEMONSTRATE DESIGN COMPLIANCE WITH THE REFERENCES NOTED ABOVE. THESE COMPONENTS SHALL HAVE FLEXIBLE CONNECTIONS PROVIDED BETWEEN THE COMPONENT AND ASSOCIATED DUCTWORK, PIPING, AND CONDUIT. FLEXIBLE CONNECTIONS MUST ALLOW MOVEMENT IN BOTH TRANSVERSE AND LONGITUDINAL DIRECTIONS.

   A. COMPONENTS WEIGHING LESS THAN 400 POUNDS AND HAVE A CENTER OF MASS LOCATED 4 FEET OR LESS ABOVE THE ADJACENT FLOOR OR ROOF LEVEL THAT DIRECTLY SUPPORT THE COMPONENT.

   B. COMPONENTS WEIGHING LESS THAN 20 POUNDS, OR IN THE CASE OF DISTRIBUTED SYSTEMS, LESS THAN 5 POUNDS PER FOOT, WHICH ARE SUSPENDED FROM A ROOF OR FLOOR OR HUNG FROM A WALL.

   THE ANCHORAGE OF ALL MECHANICAL, ELECTRICAL AND PLUMBING COMPONENTS SHALL BE SUBJECT TO THE APPROVAL OF THE DESIGN PROFESSIONAL IN GENERAL RESPONSIBLE CHARGE OR STRUCTURAL ENGINEER DELEGATED RESPONSIBILITY AND ACCEPTANCE BY DSA. THE PROJECT INSPECTOR WILL VERIFY THAT ALL COMPONENTS AND EQUIPMENT HAVE BEEN ANCHORED IN ACCORDANCE WITH ABOVE REQUIREMENTS.

PIPING, DUCTWORK, AND ELECTRICAL DISTRIBUTION SYSTEM BRACING NOTE:

PIPING, DUCTWORK, AND ELECTRICAL DISTRIBUTION SYSTEMS SHALL BE BRACED TO COMPLY WITH THE FORCES AND DISPLACEMENTS PRESCRIBED IN ASCE 7-16 SECTION 13.3 AS DEFINED IN ASCE 7-16 SECTION 13.6.5, 13.6.6, 13.6.7, 13.6.8, AND 2022 CBC, SECTIONS 1617A.1.24, 1617A.1.25, 1617A.1.26.

THE METHOD OF SHOWING BRACING AND ATTACHMENTS TO THE STRUCTURE FOR THE IDENTIFIED DISTRIBUTION SYSTEM ARE AS NOTED BELOW. WHEN BRACING AND ATTACHMENTS ARE BASED ON A PREAPPROVED INSTALLATION GUIDE (E.G., HCAI OPM FOR 2013 CBC OR LATER), COPIES OF THE BRACING SYSTEM INSTALLATION GUIDE OR MANUAL SHALL BE AVAILABLE ON THE JOBSITE PRIOR TO THE START OF AND DURING THE HANGING AND BRACING OF THE DISTRIBUTION SYSTEMS. THE STRUCTURAL ENGINEER OF RECORD SHALL VERIFY THE ADEQUACY OF THE STRUCTURE TO SUPPORT THE HANGER AND BRACE LOADS.

MP ☐ MD ☐ PP ☒ A. OPTION 1: DETAILED ON THE APPROVED DRAWINGS WITH PROJECT SPECIFIC NOTES AND DETAILS.

MP ☐ MD ☐ PP ☐ B. OPTION 2: PLUMBING PIPING (PP) - SHALL COMPLY WITH OPM-0043-13 HCAI PRE-APPROVAL AS INCLUDED IN THESE DRAWINGS WITH PROJECT SPECIFIC NOTES AND DETAILS (MASON WEST, SEISMIC RESTRAINT GUIDELINES FOR SUSPENDED DISTRIBUTION SYSTEMS).

6. BRACE ALL PIPING 4" DIAMETER AND GREATER; USE Ip=1.0 FOR SEISMIC DESIGN CALCULATIONS. EXCEPTION: NATURAL GAS PIPING 1"DIAMETER AND GREATER, USE Ip=1.5 FOR SEISMIC DESIGN CALCULATIONS.

7. PENETRATIONS THROUGH FIRE RATED WALLS, FLOOR/CEILING, AND ROOF/CEILING ASSEMBLIES SHALL BE SEALED USING AN APPROVED SYSTEM CAPABLE OF PREVENTING THE PASSAGE OF FLAMES AND HOT GASES WHEN SUBJECTED TO THE REQUIREMENTS OF THE TEST STANDARD SPECIFIC TO FIRE STOPS PER 2022 CBC SECTION 714. THIS INCLUDES EXISTING PIPE AND CONDUIT THROUGH NEW ASSEMBLIES. CUSTOM DESIGNED SYSTEMS WHICH COMBINE COMPONENTS FROM DIFFERENT APPROVED SYSTEMS BUT HAVE NOT BEEN TESTED AS A COMPLETE ASSEMBLY WILL NOT BE ACCEPTABLE. FOR FIRE STOPS FOR PIPE PENETRATIONS SEE SPECIFICATIONS.

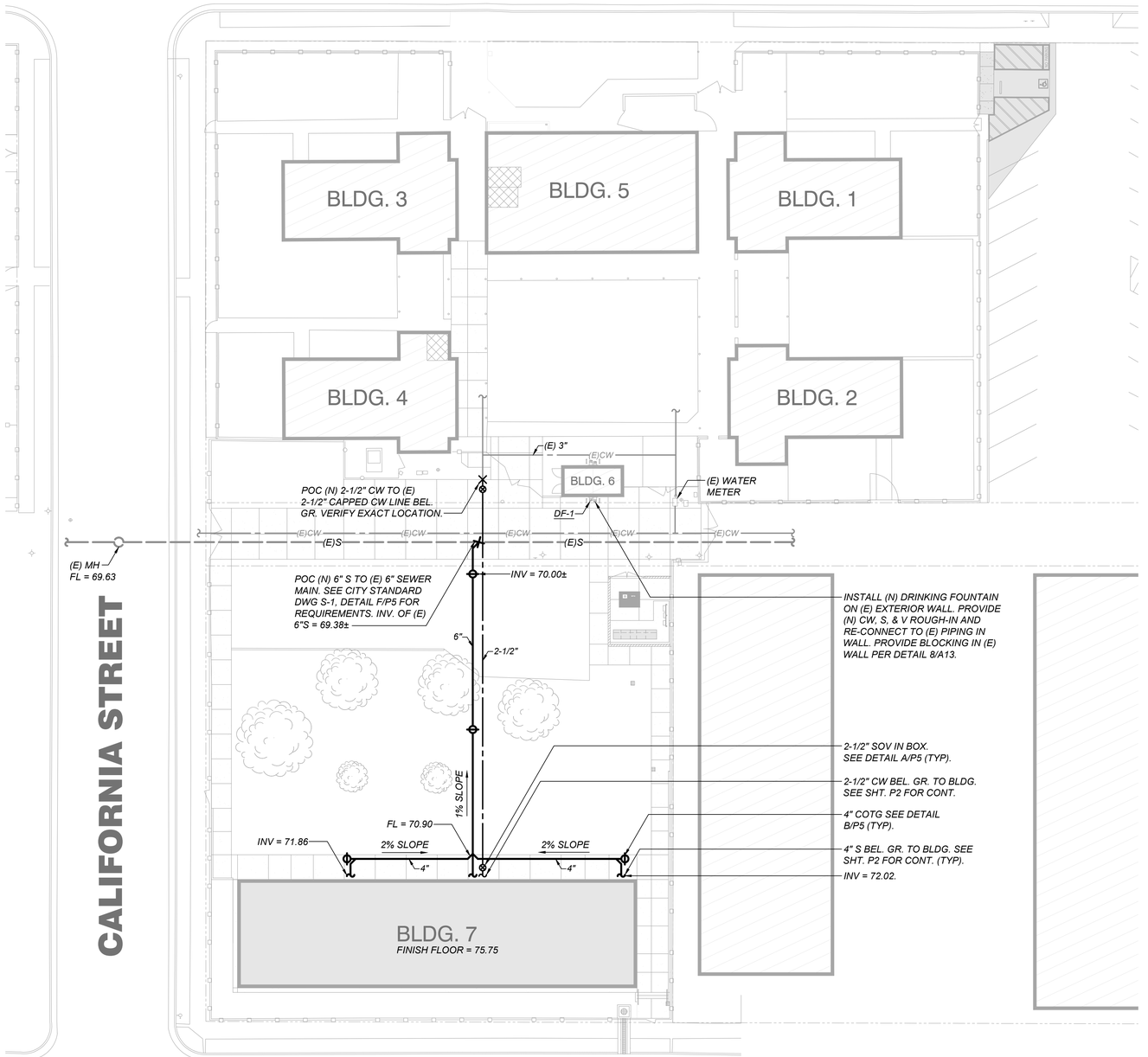
8. FIELD VERIFY THE EXACT LOCATION, DEPTH AND SIZE OF ALL NEW POINTS OF CONNECTION TO EXISTING UTILITIES PRIOR TO COMMENCING NEW UTILITY WORK.

9. INSTALLATION OF NEW UTILITIES FROM EXISTING MAINS IN THE STREET SHALL BE DONE IN STRICT ACCORDANCE WITH GOVERNING AUTHORITY REQUIREMENTS.

10. INSTALLATION, TYPE AND MANUFACTURERS MODELS OF DOMESTIC WATER METERS, BACKFLOW PREVENTERS, FIRE HYDRANTS, DETECTOR CHECK VALVES, MANHOLES, DRAIN INLETS/OUTLETS AND OTHER APPURTENANCE OF SITE UTILITY SYSTEMS SHALL BE DONE IN STRICT ACCORDANCE WITH GOVERNING AUTHORITY REQUIREMENTS.

11. CONTRACTOR SHALL EXCAVATE AND BACKFILL THE GAS SERVICE TRENCH FOR THE LOCAL GAS UTILITY. THE LOCAL GAS UTILITY SHALL INSTALL THEIR GAS SERVICE LINE TO THE GAS METER. TRENCHING SHALL BE IN ACCORDANCE WITH UTILITY STANDARDS. ALL CHARGES AND FEES INCURRED BY THE UTILITY FOR NEW GAS SERVICE SHALL BE PAID BY THE CONTRACTOR.

12. ALL DOMESTIC WATER PIPING SHALL BE A MINIMUM OF 1/2" SIZE UNLESS NOTED OTHERWISE. USE A REDUCING DROP ELL AT FIXTURE CONNECTION WHEN APPLICABLE.



	PLUMBING LEGEND	
SYMBOL	ITEM	ABBR
———	SOIL or WASTE	S or W
- - - -	VENT	V
	VENT RISER	VR
	VENT THRU ROOF	VTR
——-——	DOMESTIC COLD WATER	CW
——--——	DOMESTIC HOT WATER	HW
——-·——	DOMESTIC HOT WATER RETURN	HWR
——G——	LOW PRESSURE NATURAL GAS	G
——2#G——	2 PSI GAS	2#G
——5#G——	5 PSI GAS	5#G
——GSM——	GAS SERVICE MAIN BY THE LOCAL GAS UTILITY	GSM
——C——	CONDENSATE DRAIN	CD
——RWL——	RAIN WATER LEADER	RWL
——OD——	OVERFLOW DRAIN	OD
——SD——	STORM DRAIN	SD
——IW——	INDIRECT WASTE	IW
——F——	FIRE PROTECTION LINE	F
———	EXISTING PIPING	(E)
(E)	EXISTING	
(N)	NEW	
	ABOVE CEILING	ABV CLG
	BELOW FLOOR	BEL FLR
	BELOW GRADE	BEL GR
	TYPICAL	TYP
	CONTINUATION	CONT
	DOWN	DN
	FLOOR CLEANOUT	FCO
	CLEANOUT TO GRADE	COTG
	WALL CLEANOUT	WCO
	PIPING TURN UP	
	PIPING TURN DOWN	
	POINT OF CONNECTION	POC
	SHUT-OFF VALVE IN BOX	SOV
	SHUT-OFF VALVE	SOV
	SHUT-OFF VALVE IN RISER	-
	SHUT-OFF VALVE IN DROP	-
	GATE VALVE	-
	BUTTERFLY VALVE	-
	GLOBE VALVE	-
	CHECK VALVE	-
	PLUG VALVE	-
	BALL VALVE	-
	BALANCE COCK	-
	REDUCER	-
	MANHOLE	MH
	FLOW LINE	FL
	UNION	-
	RELIEF VALVE	-
	BALANCING VALVE	-
	PRESSURE GAUGE	-
	THERMOMETER	-
	INVERT ELEVATION	INV.

PLUMBING SITE PLAN

1" = 20'-0"

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NEW TK CLASSROOM AT CHENEY KINDERGARTEN
COALINGA-HURON UNIFIED SCHOOL DISTRICT
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REVISIONS

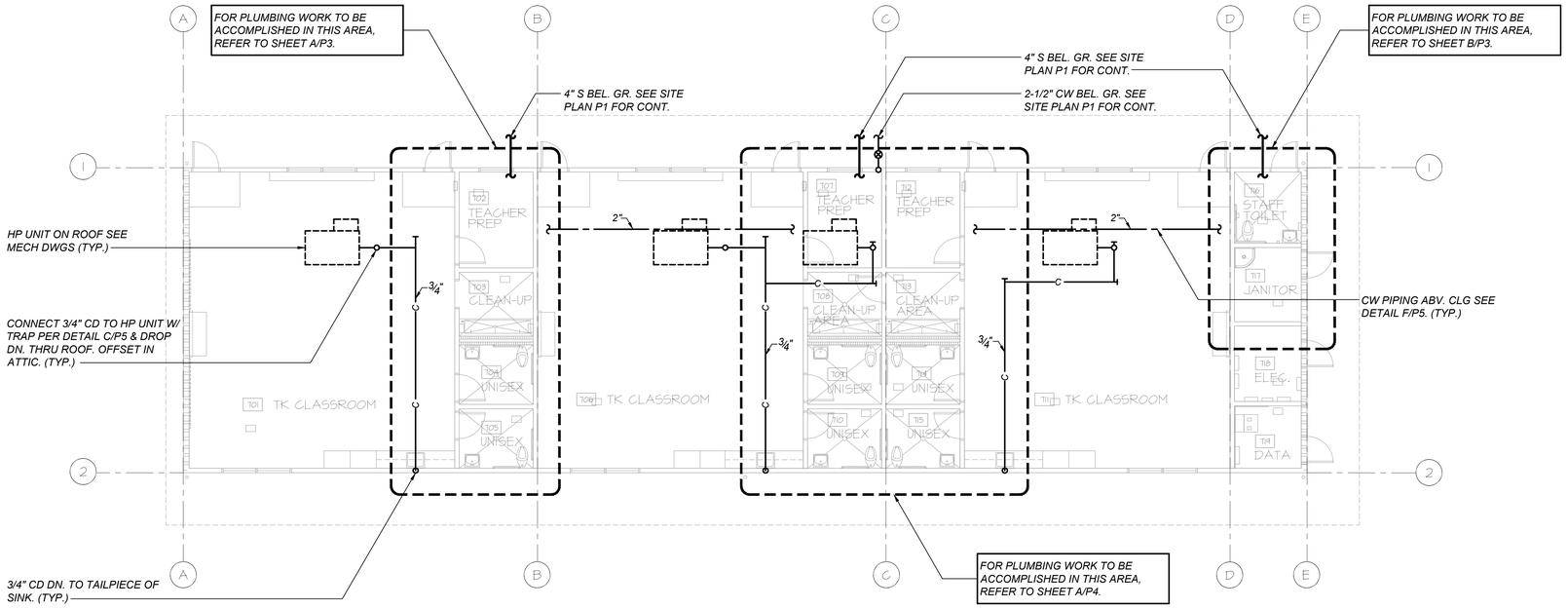
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TITLE
PLUMBING SITE PLAN

P1

PROJECT 23044

26 July 2024 8:57 AM P:\2023\23143 Cheney ES - New TK Classroom\4-Drawings\5 P\P1 - PLUMBING SITE PLAN.dwg mark d



PLUMBING FLOOR PLAN

1/8" = 1'-0"

north

APPROVALS

FILE # 10-28 | APPLICATION # 02-122132

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DATE: 08/06/2024

LICENSED ARCHITECT
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No. C-34290
REN: 05-31-25
STATE OF CALIFORNIA

DATE: JANUARY 31, 2024

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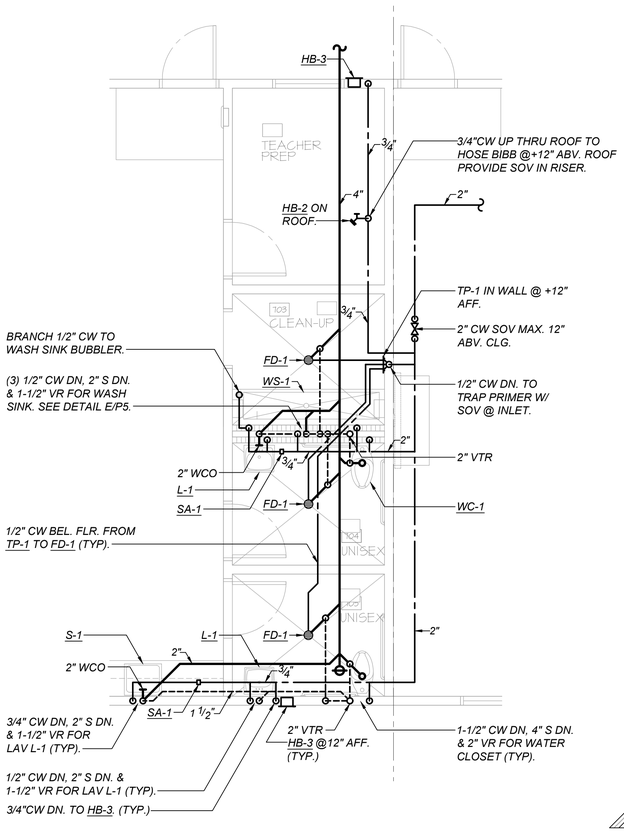
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TITLE
PLUMBING FLOOR PLAN

P2

PROJECT 23044

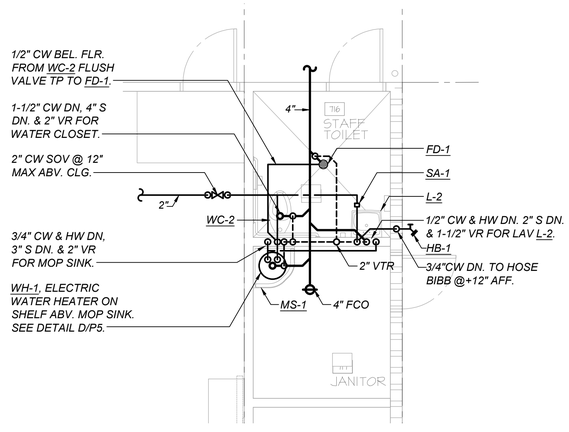
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ENLARGED PLUMBING FLOOR PLAN

A / P3

1/4"=1'-0"



ENLARGED PLUMBING FLOOR PLAN

B / P3

1/4"=1'-0"

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ENLARGED PLUMBING PLAN

P3

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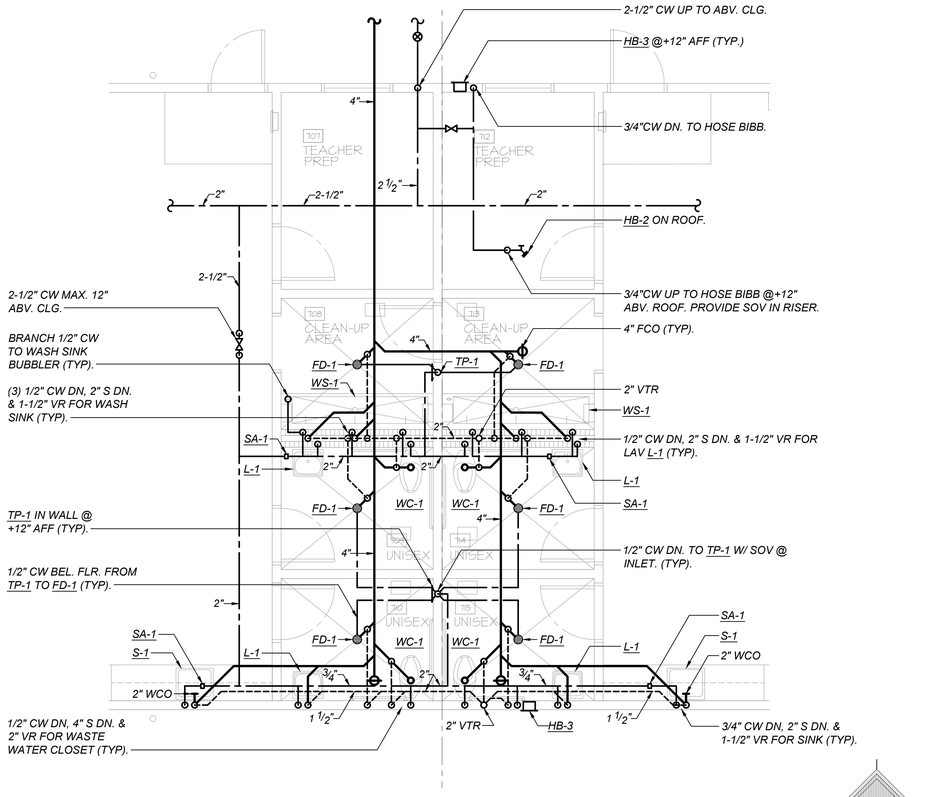
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ENLARGED PLUMBING FLOOR PLAN

A
P4

1/4"=1'-0"

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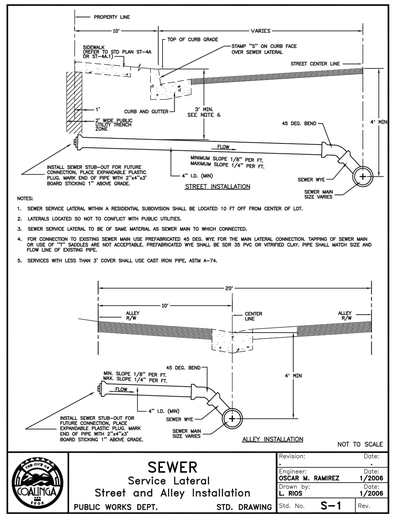
TITLE
ENLARGED PLUMBING PLAN

P4

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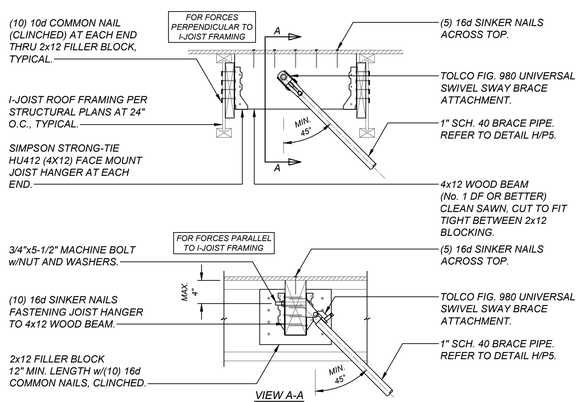
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SEWER CONNECTION DETAIL

F P5

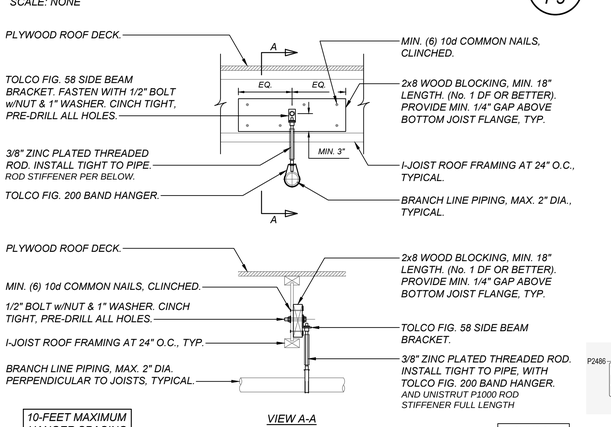
SCALE: NONE



SEISMIC BRACING ATTACHMENT AT I-JOIST

G P5

SCALE: NONE

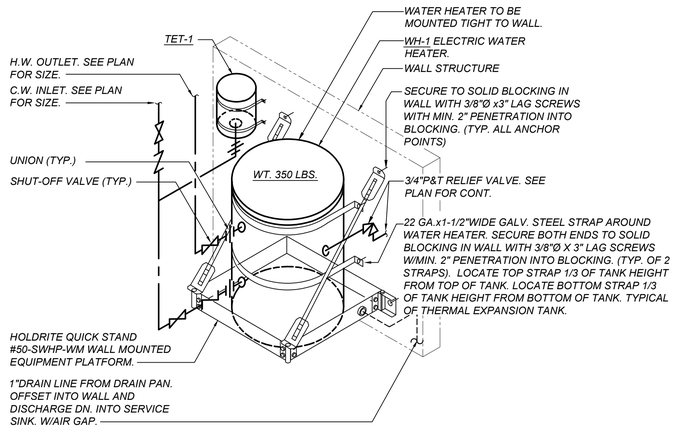


BRANCH LINE HANGER SUPPORT AT I-JOIST FRAMING (2" MAX. PIPE DIAMETER)

J P5

SCALE: NONE

FSS101-11.19

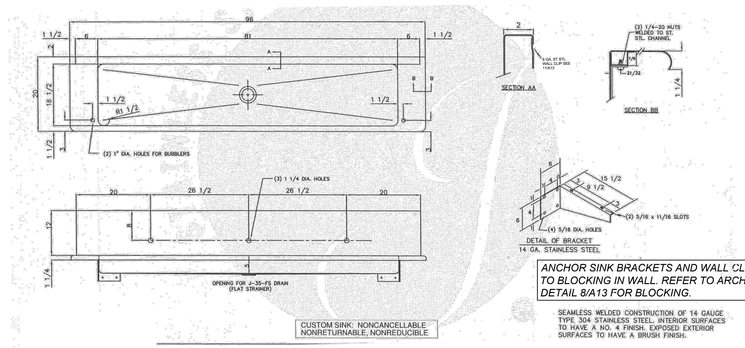


FOR BLOCKING DETAIL REFER TO ARCHITECTURAL DETAIL 10/A13.

WATER HEATER DETAIL

D P5

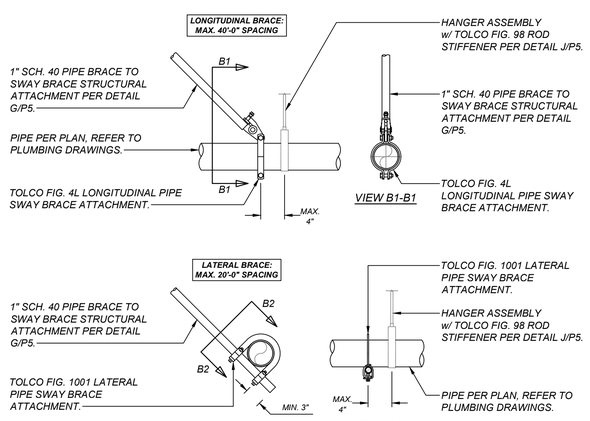
SCALE: NONE



CUSTOM SINK WS-1 SHOP DRAWING

E P5

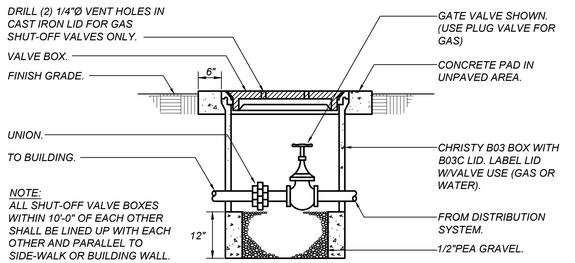
SCALE: NONE



LOWER SEISMIC BRACING ATTACHMENT AT PIPE

H P5

SCALE: NONE

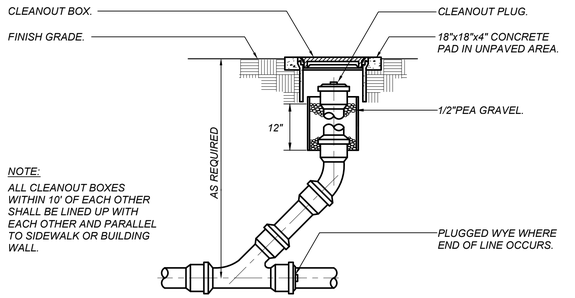


SHUT-OFF VALVE IN BOX DETAIL

A P5

SCALE: NONE

P159

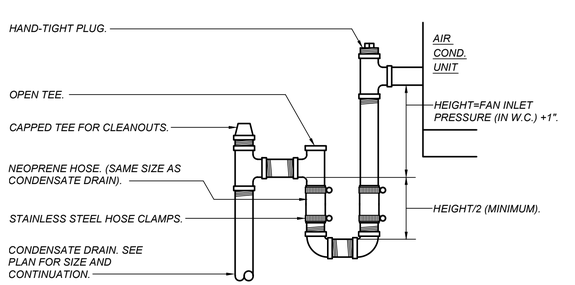


CLEANOUT TO GRADE DETAIL

B P5

SCALE: NONE

P114



CONDENSATE DRAIN CONNECTION DETAIL

C P5

SCALE: NONE

P020

APPROVALS

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TITLE
PLUMBING DETAILS

P5

PROJECT 23044

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PLUMBING FIXTURE SCHEDULE

WC-1
"KOHLER" #K-96059 JUVENILE ULTRA, ACCESSIBLE FOR T-K STUDENT USE (+15" TO TOP OF SEAT), 1.28 GPF, FLOOR MOUNTED, ELONGATED WATER CLOSET, "CHURCH" #295SSC OPEN-FRONT SEAT WITH CHECK STAINLESS STEEL HINGE POSTS AND FASTENERS AND SELF-SUSTAINING HINGES, LESS COVER, BOLT CAPS, ZURN #Z6200-HET METROFLUSH HIGH EFFICIENCY PISTON FLUSH VALVE WITH LEVER HANDLE POINTED TOWARDS WIDE SIDE OF ROOM, 1" C.W., 4" S., 2" V.

WC-2
"KOHLER" K-96057, HIGHCLIFF ULTRA, ACCESSIBLE FOR ADULT USE (+ 18" TO TOP OF SEAT), 1.28 GPF, FLOOR MOUNTED ELONGATED WATER CLOSET, "CHURCH" #295SSC OPEN-FRONT SEAT WITH CHECK STAINLESS STEEL HINGE POSTS AND FASTENERS AND SELF-SUSTAINING HINGES, LESS COVER, BOLT CAPS, AND "ZURN" #ZTR6200EV-TPO BATTERY SENSOR OPERATED AUTOMATIC FLUSH VALVE, 1.28 GPF, WITH MECHANICAL OVERRIDE BUTTON, AND WITH TRAP PRIMER CONNECTION, 1" C.W., 4" S., 2" V.

L-1
"KOHLER" KINGSTON #K-2005 WALL MOUNTED VITREOUS CHINA LAVATORY, WITH 4" CENTER FAUCET HOLES, "CHICAGO" #3400ABCP, DECK MOUNTED MANUAL METERING FAUCET WITH 0.5 GPM VANDAL RESISTANT SPRAY OUTLET, ADJUST FAUCET TO OPERATE ON FOR 10-15 SECONDS, "MCGUIRE" #155WC GRID DRAIN, AND "JAY R. SMITH" #700-Z SUPPORT CARRIER, 1/2" C.W., 2" S.,1- 1/2" V.

L-2
"KOHLER" KINGSTON #K-2005 WALL MOUNTED VITREOUS CHINA LAVATORY, WITH 4" CENTER FAUCET HOLES, "CHICAGO" #EVR-A12A-11ABCP BATTERY SENSOR FAUCET WITH, 0.5 GPM OUTLET, "MCGUIRE" 155WC OFFSET GRID DRAIN, "JAY R. SMITH" #700-Z FLOOR MOUNTED, CONCEALED ARM CARRIER. PROVIDE "LEONARD" #170A-LF-BRKT THERMOSTATIC MIXING VALVE WALL MOUNTING BRACKET BELOW LAV, SET H.W. OUTLET TO 108° F. SEE ARCHITECTURAL DRAWINGS FOR ACCESSIBLE MOUNTING HEIGHT, (2) LOOSE KEY COMPRESSION ANGLED WALL STOPS WITH SUPPLIES, 17 GA. C.P. P-TRAP/TAILPIECE WITH ESCUTCHEON, (WRAP C.W., H.W. AND TRAP/TAILPIECE PER SPECIFICATIONS) 1/2" H.W./C.W., 2" W.,1- 1/2" V.

WS-1
"JUST" CUSTOM FABRICATED SIMILAR TO THE MULTI-STATION SURGEON'S WASH-UP SINK, (SEE DETAIL), ACCESSIBLE WALL MOUNTED 14 GAUGE, TYPE 304 STAINLESS STEEL, 3-STATION WASH SINK, 96" X 20" X 5" DEEP WITH 8" STAINLESS STEEL BACKSPLASH, "JUST" J-ADA-35 OFFSET GRID STRAINER, AND (3) "CHICAGO" HYTRONIC ECAST #116.204.AB.1-GN2A BATTERY POWERED, BACKSPLASH MOUNTED FAUCETS WITH GOOSENECK SPOUT MODIFIED WITH "CHICAGO" #E35VPJKABCP AERATOR OUTLET, AND "CHICAGO" #748-665ABCP DRINKING BUBBLER LOCATED AT LEFT FRONT 6" WIDE LEDGE. REFER TO ARCHITECTURAL DRAWINGS FOR MOUNTING HEIGHTS. (3) LOOSE KEY ANGLED WALL STOPS WITH SUPPLIES, 17 GA. C.P. TRAP/TAILPIECE WITH ESCUTCHEON, (WRAP C.W. AND TRAP/TAILPIECE PER SPECIFICATIONS) 1/2" C.W., 2" S., 1-1/2" V., 2" W.C.O.

S-1
"JUST" #CRA-ADA-1931-A-GR, ACCESSIBLE 19" X 31" X 5" DEEP, 18 GAUGE STAINLESS STEELWITH #J-35-SSF STRAINER, "CHICAGO" 350-LH-ABCP GOOSENECK FAUCET WITH LEVER HANDLE AT CENTER OF LEFT LEDGE, MODIFIED WITH #E35JKABCP, 1.5 GPM AERATOR, AND "CHICAGO"
#748-665CP DRINKING BUBBLER AT RIGHT FRONT, (2) LOOSE KEY ANGLED WALL STOPS WITH SUPPLIES, 17 GA. C.P. TRAP/TAILPIECE WITH ESCUTCHEON, (WRAP C.W. AND TRAP/TAILPIECE PER SPECIFICATIONS), (2) 1/2" C.W., 2" S., 1-1/2" V., 2" W.C.O.

MS-1
"KOHLER" #K-6710 WHITBY, FLOOR MOUNTED ENAMELED CAST IRON 28" X 28" MOP SINK WITH #K-8940 RIM GUARD, AND #K-9146 GRID DRAIN, "CHICAGO" # 897-CP FAUCET WITH VACUUM BREAKER AND TOP BRACE, "FLORESTONE" #MR-0360 5 FT. HOSE WITH WALL BRACKET, AND "FLORESTONE" #MR-372 MOP HANGER,
3" P-TRAP, 3/4" H.W./C.W., 3" S., 2" V., 3" W.C.O.

HB-1
"WOODFORD" # 24P, WALL MOUNTED BENT NOSE ROUGH CHROME PLATED BRASS LOOSE TEE KEY HOSE BIBB WITH INTEGRAL VACUUM BREAKER, 3/4" C.W.

HB-2
"WOODFORD" # Y24, STANDPIPE MOUNTED BENT NOSE ROUGH CHROME PLATED BRASS LOOSE TEE KEY HOSE BIBB, WITH INTEGRAL VACUUM BREAKER, 3/4" C.W.

HB-3
WOODFORD #B74, RECESSED WALL HOSE BOX WITH LOCKING DOOR AND DRAIN PORT, 3/4" INLET BRASS HOSE CONNECTION WITH LOCKSHIELD, NON-REMOVEABLE VACUUM BREAKER, AND OPTIONAL LOOSE TEE KEY HANDLE, 3/4" C.W.

TP-1
"PRECISION PLUMBING PRODUCTS" #PR-500, TRAP PRIMER IN WALL ACCESS DOOR, WITH #DU-4/DU-U DISTRIBUTION UNIT AS REQUIRED FOR MULTIPLE TRAPS, AND 12" X 12" STAINLESS STEEL ACCESS DOOR WITH CYLINDER LOCK, 1/2" C.W. W/ BALL VALVE TO PRIMER INLET.

FD-1
"JAY R.SMITH" # 2005BY02-P050-HP-NB CAST IRON FLOOR DRAIN, , WITH 5" SQUARE NICKEL BRONZE HEEL-PROOF ADA GRATE AND 1/2" C.W. TRAP PRIMER CONNECTION, 2" S., 2" P-TRAP AND 1-1/2" V. BELOW SLAB.

SA-1
"SIOUX CHIEF" HYDRA-RESTER MODELS 653-AS SEAMLESS COPPER CHAMBER APPROVED FOR CONCEALED INSTALLATIONS, (PDI B) OR 654-AS (PDI C) SIZE AS REQUIRED.

WH-1
"AO SMITH" #DEL-30, COMMERICIAL ELECTRIC WATER HEATER, 30 GALLON GLASS LINED TANK, 4.5 KW, 208V/1PH., 3/4" T&P RELIEF VALVE WITH FULL SIDE DISCHARGE, 3/4" C.W., 3/4" H.W, OPERATING WEIGHT = 350 LBS.

TET-1
"THERM-X-TROL" #ST-5-C, STAINLESS STEEL CONNECTIONS, POTABLE WATER APPROVED IN-LINE EXPANSION TANK, 2.0 GALLON CAPACITY, 0.9 GALLON ACCEPTANCE VOLUME, ASME RATED. OPERATING WEIGHT = 22 LBS.

DF-1
"HAWS" MODEL 1119.14-1920, HI-LO WALL MOUNTED VANDAL-RESISTANT ADA DRINKING FOUNTAIN AND BOTTLE FILLER, DUAL 14 GAUGE TYPE 304 STAINLESS STEEL SATIN FINISH BASINS, 14 GAUGE BOTTLE FILLER BRACKET, VANDAL-RESISTANT PUSH-BUTTON OPERATED STAINLESS STEEL VALVES WITH FRONT-ACCESSIBLE CARTRIDGE AND FLOW ADJUSTMENT, 100% LEAD-FREE WATERWAYS, POLISHED CHROME-PLATED BRASS VANDAL RESISTANT BUBBLER HEADS WITH INTEGRAL LAMINAR ANTI-SQUIRT FLOW, 1 GPM (3.78 L) LAMINAR FLOW BOTTLE FILLER, POLISHED CHROME-PLATED BRASS VANDAL-RESISTANT WASTE STRAINERS, VANDAL-RESISTANT BOTTOM PLATES, STAINLESS STEEL SATIN FINISH BACK PANELS, HIGH AND LOW FOUNTAIN MOUNTING LEVELS, AND 1-1/4" NPT TRAPS. THE BOTTE FILLER REQUIRES #6700R ON-WALL SUPPORT MOUNTING PLATE. PROVIDE OPTIONAL #6469 DRIP TRAY, AND #BP32 BACK PANEL. OPERATING WEIGHT = 60 LBS.

APPROVALS

FILE # 10-28 | APPLICATION # 02-122132

IDENTIFICATION STAMP
DIV. OF THE STATE ARCHITECT
APP: 02-122132 INC:
REVIEWED FOR
SS ☑ FLS ☑ ACS ☑
DATE: 08/06/2024

LICENSED ARCHITECT
MICHAEL J. SCOTT MANGINI
No. C-34290
REN: 08-31-25
STATE OF CALIFORNIA

DATE: JANUARY 31, 2024

NEW TK CLASSROOM AT CHENEY KINDERGARTEN

COALINGA-HURON UNIFIED SCHOOL DISTRICT
COALINGA, FRESNO COUNTY, CA

REVISIONS

MANGINI | ARCHITECTURE ENGINEERING
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Visalia, California 93291
www.mangini.us
(559) 627-0530 Office
(559) 627-1926 Fax

TITLE
PLUMBING SCHEDULES

P6

PROJECT 23044

REGISTERED PROFESSIONAL ENGINEER
RYAN W. CARLSON
No. M34846
Exp. 6-30-26
MECHANICAL
STATE OF CALIFORNIA

LAWRENCE ENGINEERING GROUP
4910 E. Clinton Way, Suite 101
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23143

26 July 2024 8:57 AM P:\2023\23143 Cheney ES - New TK Classroom\4-Drawings\5 P\P6 - PLUMBING SCHEDULES.dwg mark d

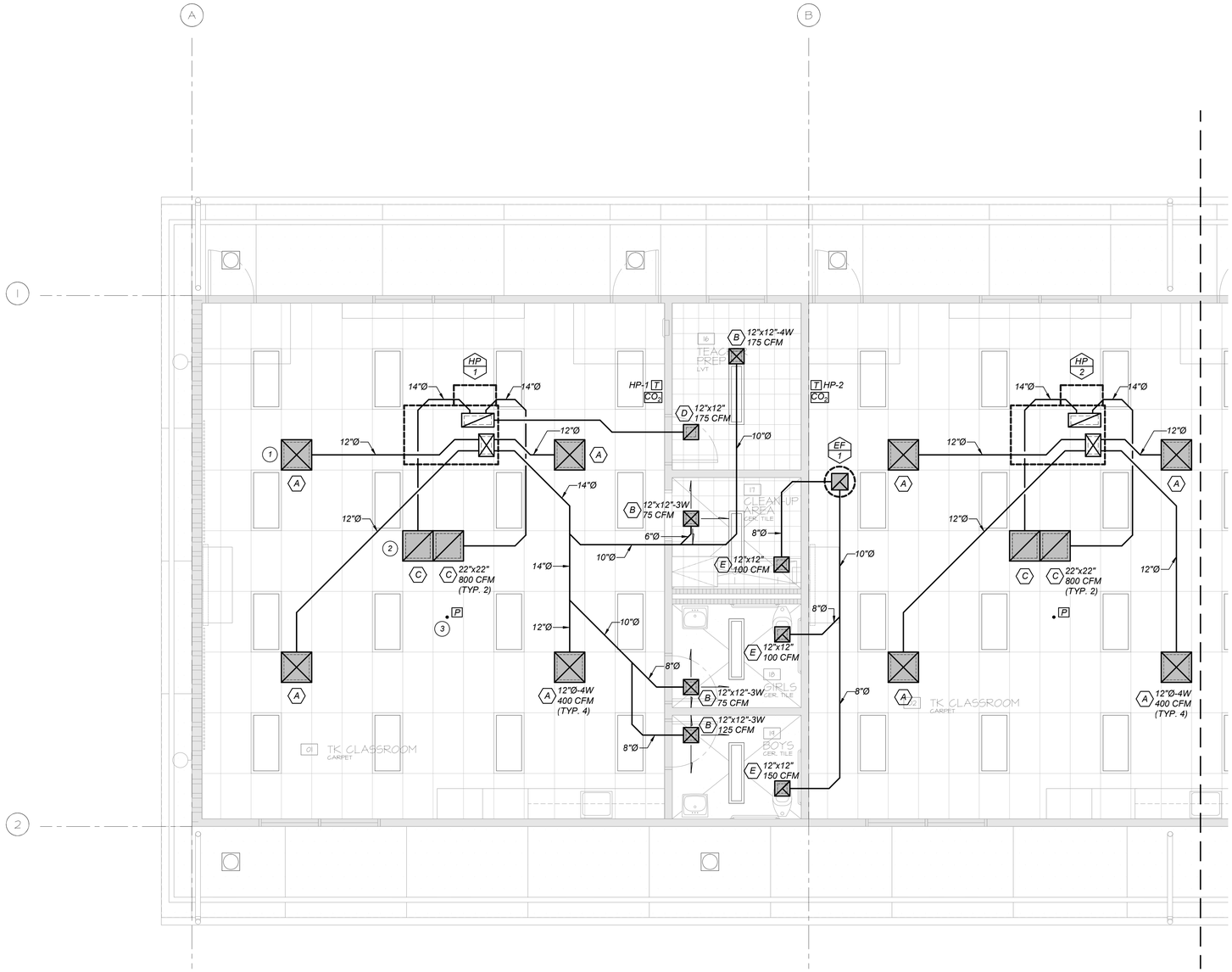
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REN: 05-31-25
STATE OF CALIFORNIA

DATE: JANUARY 31, 2024



KEYNOTES: (THIS SHEET ONLY)

1. *SEE DETAIL A/M4.1 FOR S/A GRILLE AND BRANCH DUCT REQUIREMENTS. (TYP.)*
2. *SEE DETAIL B/M4.1 FOR R/A & E/A GRILLE AND BRANCH DUCT REQUIREMENTS (TYP.)*
3. *SEE DETAIL F/M4.1 FOR PRESSURE TUBE MOUNTING DETAIL. (TYP.)*

NEW TK CLASSROOM AT CHENEY KINDERGARTEN

COALINGA-HURON UNIFIED SCHOOL DISTRICT
COALINGA, FRESNO COUNTY, CA

REVISIONS

KEY PLAN

north

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TITLE
PARTIAL MECHANICAL FLOOR PLAN

M1.1

PROJECT 23044

PARTIAL MECHANICAL PLAN

1/4" = 1'-0"

26 July 2024 8:43 AM P:\2023\23143 Cheney ES - New TK Classroom\4-Drawings\4 M\M1.1 - M1.2 Partial Mechanical Plan.dwg mark d

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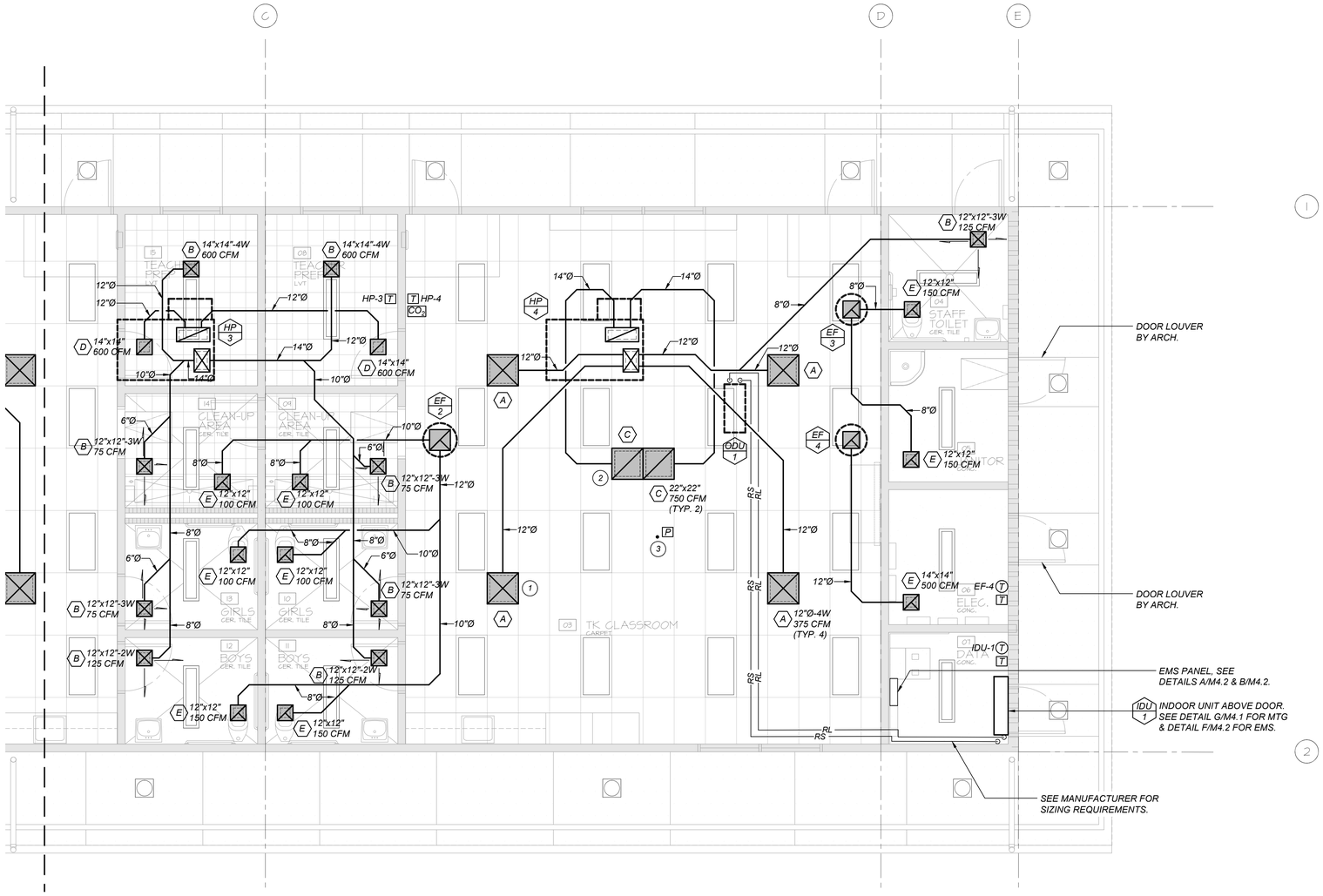
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No. C-34290
REN: 08-31-25
STATE OF CALIFORNIA

DATE: JANUARY 31, 2024



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3. SEE DETAIL F/M4.1 FOR PRESSURE TUBE MOUNTING DETAIL. (TYP.)

PARTIAL MECHANICAL PLAN

1/4" = 1'-0"

north

KEY PLAN

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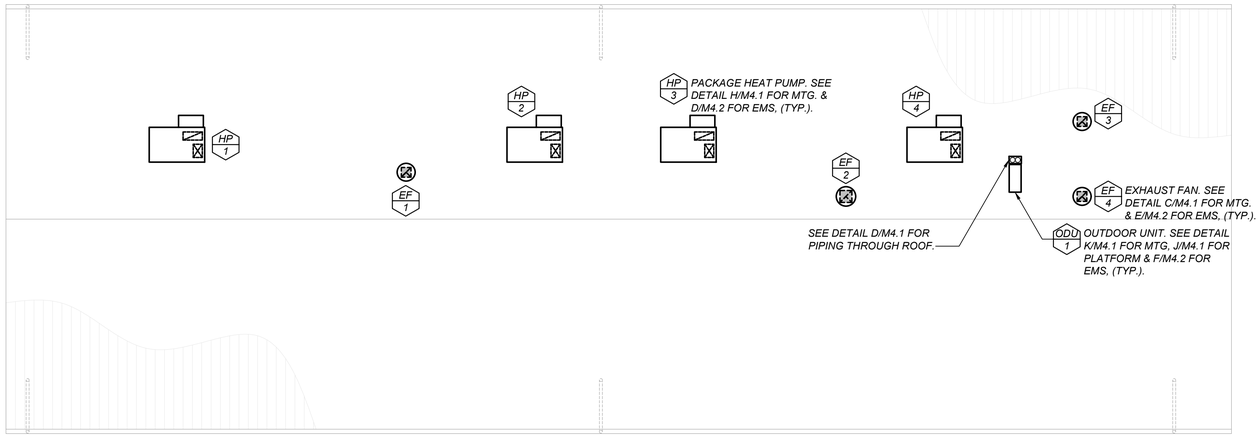
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TITLE
PARTIAL MECHANICAL FLOOR PLAN

M1.2

PROJECT 23044

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MECHANICAL ROOF PLAN

1/8" = 1'-0"

north

APPROVALS

FILE # 10-28 | APPLICATION # 02-122132

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TITLE
MECHANICAL ROOF PLAN

M2.1

PROJECT 23044

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GENERAL NOTES

1. THE INTENT OF THE DRAWING AND SPECIFICATIONS IS TO CONSTRUCT THE BUILDING IN ACCORDANCE WITH THE 2022 EDITION OF TITLE 24, CALIFORNIA CODE OF REGULATIONS. CHANGES TO THE STRUCTURAL, ACCESSIBILITY OR FIRE AND LIFE-SAFETY PORTIONS OF THE APPROVED PLANS AND SPECIFICATIONS SHALL BE MADE BY AN ADDENDUM OR CONSTRUCTION CHANGE DOCUMENT AS REQUIRED IN SECTION 4-338, PART 1, TITLE 24, CCR, AND SHALL BE SUBMITTED TO AND APPROVED BY DSA PRIOR TO COMMENCEMENT OF THE WORK. DOCUMENTS SHALL BE PREPARED AND SUBMITTED TO DSA IN COMPLIANCE WITH DSA INTERPRETATION OF REGULATION IR A-6.

2. LAYOUT OF MATERIALS, EQUIPMENT AND SYSTEMS IS GENERALLY DIAGRAMMATIC UNLESS SPECIFICALLY DIMENSIONED. SOME WORK MAY BE SHOWN OFFSET FOR CLARITY. THE HVAC BUILDING PLANS HAVE BEEN PREPARED TO MATCH THE ARCHITECTURAL PLANS. IF DIFFERENCES OCCUR, THE ARCHITECTURAL PLANS ARE TO TAKE PRECEDENCE. THE ACTUAL LOCATIONS OF ALL MATERIALS, PIPING, DUCTWORK, FIXTURES, EQUIPMENT, SUPPORTS, ETC. SHALL BE CAREFULLY PLANNED, PRIOR TO INSTALLATION OF ANY WORK, TO AVOID ALL INTERFERENCE WITH EACH OTHER, OR WITH STRUCTURAL, ELECTRICAL, ARCHITECTURAL, OR OTHER ELEMENTS. ALL DUCT AND PIPE OFFSET ELBOWS FOR COORDINATION BETWEEN TRADES ARE NOT SHOWN. CONTRACTOR SHALL INCLUDE SUFFICIENT FUNDS FOR THE COORDINATION OFFSETS IN THE BID. VERIFY THE PROPER VOLTAGE AND PHASE OF ALL EQUIPMENT WITH THE ELECTRICAL PLANS. ALL CONFLICTS SHALL BE CALLED TO THE ATTENTION OF THE ARCHITECT AND THE ENGINEER PRIOR TO THE INSTALLATION OF ANY WORK OR THE ORDERING OF ANY EQUIPMENT.

3. WHEN INSTALLING DRILLED-IN ANCHORS AND/OR POWDER-DRIVEN PINS IN EXISTING NON-PRESTRESSED CONCRETE, USE CARE AND CAUTION TO AVOID CUTTING OR DAMAGING THE EXISTING REINFORCING BARS. WHEN INSTALLING THEM INTO EXISTING PRESTRESSED CONCRETE (PRE- OR POST-TENSIONED), LOCATE THE PRESTRESSED TENDONS BY USING A NON-DESTRUCTIVE METHOD PRIOR TO INSTALLATION. EXERCISE EXTREME CARE AND CAUTION TO AVOID CUTTING OR DAMAGING THE TENDONS DURING INSTALLATION. MAINTAIN A MINIMUM CLEARANCE OF ONE INCH BETWEEN THE REINFORCEMENT AND THE DRILLED-IN ANCHOR AND/OR PIN.

4. ALL MECHANICAL, PLUMBING, AND ELECTRICAL COMPONENTS SHALL BE ANCHORED AND INSTALLED PER THE DETAILS ON THE DSA APPROVED CONSTRUCTION DOCUMENTS. WHERE THERE NO DETAIL IS INDICATED, THE FOLLOWING COMPONENTS SHALL BE ANCHORED OR BRACED TO MEET THE FORCE AND DISPLACEMENT REQUIREMENTS PRESCRIBED IN THE 2022 CBC, SECTIONS 1617A.1.18 THROUGH 1617A.1.26 AND ASCE 7-16 CHAPTERS 13, 26 AND 30.

   1. ALL PERMANENT EQUIPMENT AND COMPONENTS.

   2. TEMPORARY OR MOVABLE EQUIPMENT THAT IS PERMANENTLY ATTACHED (E.G. HARD WIRED) TO THE BUILDING UTILITY SERVICES SUCH AS ELECTRICITY, GAS OR WATER.

   3. MOVABLE EQUIPMENT WHICH IS STATIONED IN ONE PLACE FOR MORE THAN 8 HOURS AND HEAVIER THAN 400 POUNDS ARE REQUIRED TO BE ANCHORED WITH TEMPORARY ATTACHMENTS.

   THE ATTACHMENT OF THE FOLLOWING MECHANICAL AND ELECTRICAL COMPONENTS SHALL BE POSITIVELY ATTACHED TO THE STRUCTURE, BUT NEED NOT BE DETAILED ON THE PLANS. THESE COMPONENTS SHALL HAVE FLEXIBLE CONNECTIONS PROVIDED BETWEEN THE COMPONENT AND ASSOCIATED DUCTWORK, PIPING, AND CONDUIT.

   A. COMPONENTS WEIGHING LESS THAN 400 POUNDS AND HAVE A CENTER MASS LOCATED 4 FEET OR LESS ABOVE THE ADJACENT FLOOR OR ROOF LEVEL THAT DIRECTLY SUPPORT THE COMPONENT.

   B. COMPONENTS WEIGHING LESS THAN 20 POUNDS, OR IN THE CASE OF DISTRIBUTED SYSTEMS, LESS THAN THAN 5 POUNDS PER FOOT, WHICH ARE SUSPENDED FROM A ROOF OR FLOOR OR HUNG FROM A WALL.

   FOR THOSE ELEMENTS THAT DO NOT REQUIRE DETAILS ON THE APPROVED DRAWINGS, THE INSTALLATION SHALL BE SUBJECT TO THE APPROVAL OF THE STRUCTURAL ENGINEER OF RECORD AND THE DSA DISTRICT STRUCTURAL ENGINEER. THE PROJECT INSPECTOR WILL VERIFY THAT ALL COMPONENTS AND EQUIPMENT HAVE BEEN ANCHORED IN ACCORDANCE WITH ABOVE REQUIREMENTS.

5. PIPING, DUCTWORK, AND ELECTRICAL DISTRIBUTION SYSTEM BRACING NOTE:

   PIPING, DUCTWORK, AND ELECTRICAL DISTRIBUTION SYSTEMS SHALL BE BRACED TO COMPLY WITH THE FORCES AND DISPLACEMENTS PRESCRIBED IN ASCE 7-16 SECTION 13.3 AS DEFINED IN ASCE 7-16 SECTION 13.6.5, 13.6.6, 13.6.7, 13.6.8, AND 2022 CBC, SECTIONS 1617A.1.24, 1617A.1.25, 1617A.1.26.

   THE METHOD OF SHOWING BRACING AND ATTACHMENTS TO THE STRUCTURE FOR THE IDENTIFIED DISTRIBUTION SYSTEM ARE AS NOTED BELOW. WHEN BRACING AND ATTACHMENTS ARE BASED ON A PREAPPROVED INSTALLATION GUIDE (E.G., HCAI OPM FOR 2022 CBC OR LATER), COPIES OF THE BRACING SYSTEM INSTALLATION GUIDE OR MANUAL SHALL BE AVAILABLE ON THE JOBSITE PRIOR TO THE START OF AND DURING THE HANGING AND BRACING OF THE DISTRIBUTION SYSTEMS. THE STRUCTURAL ENGINEER OF RECORD SHALL VERIFY THE ADEQUACY OF THE STRUCTURE TO SUPPORT THE HANGER AND BRACE LOADS. MECHANICAL PIPING (MP), MECHANICAL DUCTS (MD), PLUMBING PIPING (PP):

   MP☒ MD☒ PP☐ OPTION 1: DETAILED ON THE APPROVED DRAWINGS WITH PROJECT SPECIFIC NOTES AND DETAILS.

   MP☐ MD☐ PP☐ OPTION 2: SHALL COMPLY WITH THE APPLICABLE OSHPD PRE-APPROVAL MASON WEST OPM #0043-13.

6. PENETRATIONS THROUGH FIRE RATED WALLS, FLOOR/CEILING, AND ROOF/CEILING ASSEMBLIES SHALL BE SEALED USING AN APPROVED SYSTEM CAPABLE OF PREVENTING THE PASSAGE OF FLAMES AND HOT GASES WHEN SUBJECTED TO THE REQUIREMENTS OF THE TEST STANDARD SPECIFIC TO FIRE STOPS PER 2022 CBC SECTION 714. THIS INCLUDES EXISTING PIPE AND CONDUIT THROUGH NEW ASSEMBLIES. CUSTOM DESIGNED SYSTEMS WHICH COMBINE COMPONENTS FROM DIFFERENT APPROVED SYSTEMS BUT HAVE NOT BEEN TESTED AS A COMPLETE ASSEMBLY WILL NOT BE ACCEPTABLE. FOR FIRE STOPS FOR PIPE PENETRATIONS SEE SPECIFICATIONS.

7. DUCTWORK SIZES SHOWN ARE INSIDE CLEAR DIMENSIONS. WHERE ACOUSTIC LINING IS SHOWN, INCREASE EACH SHEET METAL DIMENSION TO ACCOMMODATE LINING & MAINTAIN CLEAR INSIDE DUCT DIMENSIONS SHOWN.

8. SA DUCTWORK SHALL BE 1" PRESSURE CLASS, AND] RA & EA DUCTWORK SHALL 1" PRESSURE CLASS UNLESS OTHERWISE NOTED.

9. A DSA CERTIFIED PROJECT INSPECTOR (CLASS 2) EMPLOYED BY THE DISTRICT & APPROVED BY DSA SHALL PROVIDE CONTINUOUS INSPECTION OF THE WORK. THE DUTIES OF THE INSPECTOR ARE DEFINED IN SECTION 4-338, PART 1, TITLE 24, CCR.

10. A DSA ACCEPTED TESTING LABORATORY DIRECTLY EMPLOYED BY THE DISTRICT SHALL CONDUCT ALL THE REQUIRED TESTS AND INSPECTIONS FOR THE PROJECT.

GRILLE SCHEDULE

MARK	DUTY	DESCRIPTION
A	CEILING SUPPLY	TITUS TDC (TYPE 3) FULL LOUVER FACE OR RECTANGULAR NECK DIFFUSER FOR STD. LAY-IN CEILING WITH NO. 26 WHITE FINISH. (18"x18" NECK, ADAPTER SIZE SHOWN)
B	CEILING SUPPLY	TITUS TDC (TYPE 1) LOUVER FACE SQUARE OR RECTANGULAR NECK DIFFUSER FOR SURFACE MOUNTING WITH NO. 26 WHITE FINISH.
C	CEILING RETURN	TITUS CORE 50F (TYPE 1) ALUMINUM EGG CRATE REGISTER W/ 1/2"x1/2" GRID FOR STD. LAY-IN CEILING WITH NO. 26 WHITE FINISH.
D	CEILING RETURN	TITUS CORE 50F (TYPE 3) ALUMINUM EGG CRATE REGISTER WITH 1/2"x1/2" GRID FOR SURFACE MOUNTING WITH NO. 26 WHITE FINISH.
E	CEILING EXHAUST	TITUS CORE 50F (TYPE 3) ALUMINUM EGG CRATE REGISTER WITH 1/2"x1/2" GRID FOR SURFACE MOUNTING WITH NO. 26 WHITE FINISH.

AIR CONDITIONING LEGEND

SYMBOL	ITEM	ABBR
	ROUND DUCT	Ø
	FLAT OVAL DUCT	
	SHEET METAL DUCT	—
	ACOUSTIC LINING FOR DUCT OR GRILLES	(L)
	DUCT W/EXT INSULATION & GALV. SM SUNSHIELD	—
	SUPPLY AIR DUCT DROP	—
	RETURN AIR DUCT DROP	—
	EXHAUST DUCT AIR DROP	—
	SUPPLY AIR DUCT RISE	—
	RETURN AIR DUCT RISE	—
	EXHAUST AIR DUCT RISE	—
	TURNING VANES	TV
	EXTRACTOR	—
	VOLUME CONTROL DAMPER W/LOCKING QUADRANT	VCD
	OPPOSED BLADE DAMPER	OBD
	BACKDRAFT DAMPER	BDD
	VOLUME CONTROL DAMPER W/ REMOTE REGULATOR	VCR
& ■	FIRE/SMOKE DAMPER WITH ACCESS PANEL	F/SD
& ▲	FIRE DAMPER WITH ACCESS PANEL	FD
& ◆	SMOKE DAMPER WITH ACCESS PANEL	SD
CFM	CUBIC FEET OF AIR PER MINUTE	CFM
M	EMS MOTORIZED DUCT DAMPER/ PIPE VALVE ACTUATOR	—
T	THERMOSTAT @ +4'-0" TOP OF BOX	T'STAT
H	HUMIDISTAT @ +4'-0" TOP OF BOX	H'STAT
C	CO_2 SENSOR @ +4'-0" TOP OF BOX	CO_2
T	EMS TEMPERATURE SENSOR @ +4'-0" TOP OF BOX	—
H	EMS HUMIDITY SENSOR @ +4'-0" TOP OF BOX	—
C	EMS CO_2 SENSOR @ +4'-0" TOP OF BOX	CO_2
SP	EMS STATIC PRESSURE SENSOR	SP
DP	EMS DIFFERENTIAL PRESSURE SENSOR	DP
CS	EMS CURRENT SENSOR	CS
	DIRECTION OF FLOW	—
	SUPPLY AIR	SA
	RETURN AIR	RA
	EXHAUST AIR	EA
	OUTSIDE AIR	OSA
	PIPE/DUCT TURN DOWN	—
	PIPE/DUCT TURN UP	—
	POINT OF CONNECTION	POC
	EXISTING (DESIGNATED)	(E)
	NEW (DESIGNATED)	(N)
SD	DUCT SMOKE DETECTOR	SD
A/V	AUDIBLE/VISUAL ALARM	A/VA
	BYPASS TIMER	BPT
P	EMS SPACE PRESSURE SENSOR MTD. @ CEILING	P

TITLE 24 ACCEPTANCE TESTING TABLE

DESIGNATION		HP 1	HP 2	HP 3	HP 4	IDU 1
FORM / TITLE	NRCA-MCH-02-A OUTDOOR AIR.	X	X	X	X	
	NRCA-MCH-03-A CONSTANT VOLUME SINGLE ZONE HVAC.	X	X	X	X	X
	NRCA-MCH-04-A AIR DISTRIBUTION DUCT LEAKAGE.					
	NRCA-MCH-05-A AIR ECONOMIZER CONTROLS.	X	X	X	X	
	NRCA-MCH-06-A DEMAND CONTROL VENTILATION SYSTEMS.	X	X		X	
	NRCA-MCH-07-A SUPPLY FAN VARIABLE FLOW CONTROLS.					
	NRCA-MCH-08-A VALVE LEAKAGE TEST.					
	NRCA-MCH-09-A SUPPLY WATER TEMPERATURE RESET CONTROLS.					
	NRCA-MCH-10-A HYDRONIC SYSTEM VARIABLE FLOW CONTROLS.					
	NRCA-MCH-11-A AUTOMATIC DEMAND SHED CONTROLS.					
	NRCA-MCH-12-A FDD FOR PACKAGED DIRECT EXPANSION UNITS.	X	X	X	X	
	NRCA-MCH-13-A AUTOMATIC FDD FOR AIR HANDLING UNITS AND ZONE TERMINAL UNITS.					
	NRCA-MCH-14-A DISTRIBUTED ENERGY STORAGE DX AC SYSTEMS.					
	NRCA-MCH-15-A THERMAL ENERGY STORAGE (TES) SYSTEM.					
	NRCA-MCH-16-A SUPPLY AIR TEMPERATURE RESET CONTROLS.					
	NRCA-MCH-17-A CONDENSER WATER TEMPERATURE RESET CONTROLS.					
	NRCA-MCH-18-A ENERGY MANAGEMENT CONTROL SYSTEMS.					
	NRCA-MCH-19-A OCCUPANCY SENSOR CONTROLS.					
	NRCA-MCH-20 MULTI-FAMILY VENTILATION.					
	NRCA-MCH-21 MULTI-FAMILY ENVENLOPE LEAKAGE.					
	NRCA-MCH-22-A MF DUCT LEAKAGE.					
	NRCA-MCH-23-A MF HRV/ERV VERIFICATION.					

1. REFER TO TITLE-24 DOCUMENTS FOR ADDITIONAL INFORMATION.
2. NRCA MUST BE SUMBITTED AND COMPLETED BY A CERTIFED ACCEPTANCE TEST TECHNICIAN TO COMPLY WITH CALIFORNIA ENERGY CODE.
3. SUBMIT ACCEPTANCE FORMS TO PROJECT INSPECTOR & MEOR FOR REVIEW.

OUTDOOR UNIT SCHEDULE

DESIGNATION	ODU 1
COOLING CAPACITY (MBH)	24.0
HEATING CAPACITY (MBH)	24.0
NOMINAL TONS	2
VOLTS/PHASE	208-230 / 1
FLA	N/A
MCA / MOCP	25 / 35
SEER / EER (AT ARI)	25.1 / 13
AMBIENT (°F)	105
REFRIG. LINE SIZE	
LIQUID (IN.OD)	3/8
SUCTION (IN. OD)	5/8
REFRIG. TYPE	R-410A
MANUFACTURER	CARRIER
TYPE	HEAT PUMP
MODEL NUMBER	38MARBQ24
SERVICE	DATA 07
OPER. WT (LBS)	150
ACCESSORIES	-

INDOOR UNIT SCHEDULE

DESIGNATION		IDU 1
BLOWER	SUPPLY AIR (CFM)	600
	EXT. S P (IN. WC)	N/A
	MIN. O.S.A. (CFM)	N/A
	MOCP	N/A
	MCA / FLA (AMPS)	.625 / - 1
	VOLTS/PHASE	208-230 / 1
	SEER / EER	25.1 / 13
COOLING	SENSIBLE (MBH)	24.0
	TOTAL (MBH)	24.0
	EADB/EAWB (°F)	N/A
	REFRIGERANT	R-410A
HEATING	CAPACITY (MBH) @47°F	24.0
	KW	N/A
	STAGES	VARIABLE
FILTER	QUANTITY/SIZE	FACTORY
	TYPE	FACTORY
	P D (IN. WC)	FACTORY
MANUFACTURER		CARRIER
TYPE		HEAT PUMP
MODEL NUMBER		40MAHBQ24
CONDENSING UNIT		ODU-1
LOCATION		DATA 07
OPER. WT (LBS)		45
ACCESSORIES		1, 2, 3

1. POWERED BY ASSOCIATED ODU
2. WIRED WALL CONTROLLER
3. FACTORY CONDENSATE PUMP

PACKAGE HEAT PUMP SCHEDULE

DESIGNATION		HP 1	HP 2	HP 3	HP 4
VOLTS/PHASE		208 / 3	208 / 3	208 / 3	208 / 3
M.C.A.		74 1.	69 1.	74 1.	69 1.
M.O.C.P.		80	70	80	70
SEER/EER @ ARI		17.0 / 8.99	17.0 / 9.51	17.0 / 9.35	17.0 / 9.51
BLOWER	SUPPLY AIR (CFM)	2050	1600	2000	1625
	EXT. SP (IN. WC)	.80"	.80"	.80"	.80"
	MIN. O.S.A. (CFM)	615 / 400	525 / 150	700	540 / 300
	BHP	1.06	0.79	1.06	0.79
	RPM	2156	1942	2156	1942
	DRIVE	DIRECT	DIRECT	DIRECT	DIRECT
COOLING	SENSIBLE (MBH)	52.9	42.5	55.2	42.5
	TOTAL (MBH)	52.9	42.8	55.2	42.8
	EADB/EAWB (°F)	85 / 66	86 / 66	86 / 66	86 / 66
	AMBIENT AIR (°F)	105	105	105	105
	UNIT DISCH. TEMP (°F)	58.7	59.5	58.8	59.5
	REFRIGERANT TYPE	R-410A	R-410A	R-410A	R-410A
	REFRIG. CLASSIFICATION	A-1	A-1	A-1	A-1
	TONS OF REFRIGERATION	5	4	5	4
HEATING	CAPACITY @ 47 DEG. (MBH)	43.2	35.0	43.5	35.0
	HSPF	8.9	8.7	8.9	8.7
	AUXILIARY ELEC. (KW)	10.6 5.	10.6 5.	10.6 5.	10.6 5.
	NO. OF STAGES	VARIABLE	VARIABLE	VARIABLE	VARIABLE
FILTERS	QUANTITY/SIZE (RETURN)	4 / 16x16x2	4 / 16x16x2	4 / 16x16x2	4 / 16x16x2
	TYPE	MERV 13	MERV 13	MERV 13	MERV 13
	QUANTITY/SIZE (OSA)	FACTORY	FACTORY	FACTORY	FACTORY
	TYPE	FACTORY	FACTORY	FACTORY	FACTORY
	P D (IN WC)	N/A	N/A	N/A	N/A
MANUFACTURER		CARRIER	CARRIER	CARRIER	CARRIER
TYPE		HEAT PUMP	HEAT PUMP	HEAT PUMP	HEAT PUMP
MODEL NUMBER		50GCQJ06	50GCQJ05	50GCQJ06	50GCQJ05
CONDENSING UNIT		N/A	N/A	N/A	N/A
LOCATION		ROOF	ROOF	ROOF	ROOF
OPER. WT (LBS)		1,100	1,100	1,100	1,100
ACCESSORIES		1 2 3 4 5 6 7	1 2 3 4 5 6	1 2 3 4 5	1 2 3 4 5 6

1. MODULATING POWERED EXHAUST w/ SEPARATE DISCONNECT. 8.2 FLA @208 / 3.
2. MODULATING ECONOMIZER.
3. SEISMIC SLOPED CURB.
4. UVC LIGHTS
5. ELECTRIC RESISTANCE HEAT STRIP
6. EMS CO_2 SENSOR w/ DEMAND CONTROL VENTILATION.
7. AUTOMATIC SHUT OFF IN COORDINATION WITH CMC 609.1.

EXHAUST FAN SCHEDULE

DESIGNATION	EF 1	EF 2	EF 3	EF 4
CFM	350	700	300	500
EXT. S.P. (IN. WC)	0.4	0.6	0.4	0.4
HP / BHP	0.25 / 0.084	0.333 / 0.167	0.25 / 0.073	0.25 / 0.131
VOLTS / PHASE	120 / 1	120 / 1	120 / 1	120 / 1
MCA / MOP (AMPS)	3.7 / 15	5.4 / 15	3.7 / 15	3.7 / 15
FLA (AMPS)	N/A	N/A	N/A	N/A
RPM	1268	1378	1210	1471
TIP SPEED/ SONES	3486 / -	4239 / -	3326 / -	4044 / -
DRIVE	DIRECT	DIRECT	DIRECT	DIRECT
MOUNTING	ROOF CURB	ROOF CURB	ROOF CURB	ROOF CURB
MANUFACTURER	THERMOTEK	THERMOTEK	THERMOTEK	THERMOTEK
TYPE	DOWNBLAST	DOWNBLAST	DOWNBLAST	DOWNBLAST
MODEL NUMBER	DR12HTH	DR33HTH	DR12HTH	DR12HTH
CONTROL	EMS	EMS	EMS	T-STAT
LOCATION	ROOF	ROOF	ROOF	ROOF
OPER. WT. (LBS)	72	76	72	72
ACCESSORIES	1 2 3 4	1 2 3 4	1 2 3 4	1 2 3

1. FACTORY SLOPED CURVE.
2. ECM.
3. B.D.D.
4. DIAL ON MOTOR FOR BALANCING.

APPROVALS

FILE # 10-28 APPLICATION # 02-122132

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APP: 02-122132 INC:
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SS ☑ FLS ☑ ACS ☑
DATE: 08/06/2024

LICENSED ARCHITECT — MICHAEL J. SCOTT JR — No. C-34290 — REN: 08-31-25 — STATE OF CALIFORNIA

DATE: JANUARY 31, 2024

NEW TK CLASSROOM AT CHENEY KINDERGARTEN
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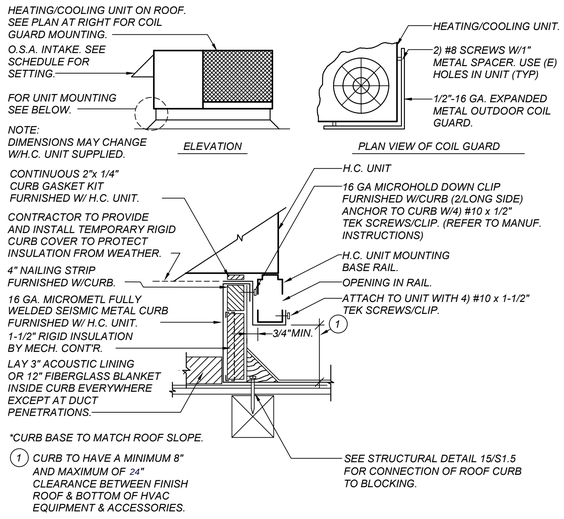
REGISTERED PROFESSIONAL ENGINEER — RYAN W. CARLSON — No. M34846 Exp. 6-30-26 — MECHANICAL — STATE OF CALIFORNIA

LAWRENCE ENGINEERING GROUP
4910 E. Clinton Way, Suite 101 (559) 431-0101
23143
Fresno, CA 93727 FAX (559) 431-1362

TITLE
MECHANICAL SCHEDULE

M3.1

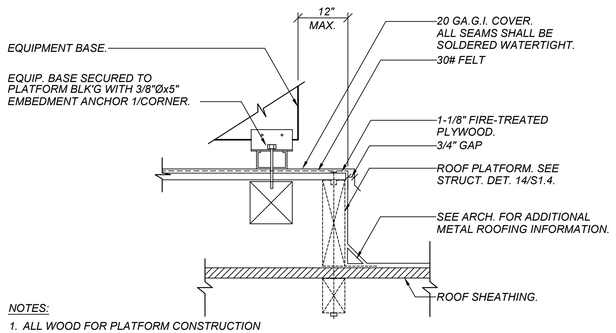
PROJECT 23044



H.C. UNIT ROOF MOUNTING DETAIL

H / M4.1

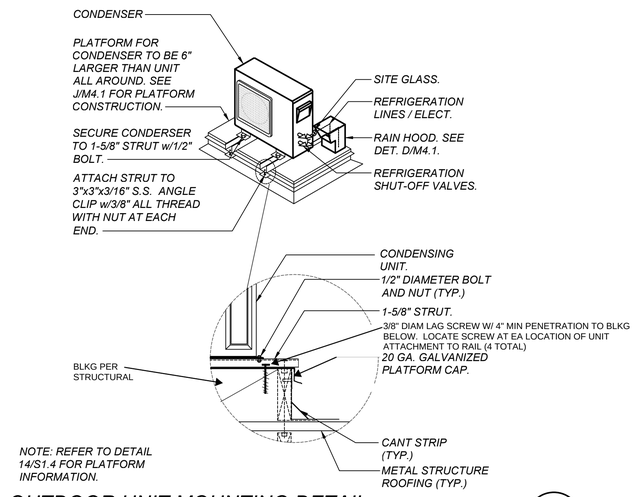
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ROOF PLATFORM DETAIL

J / M4.1

SCALE: NONE

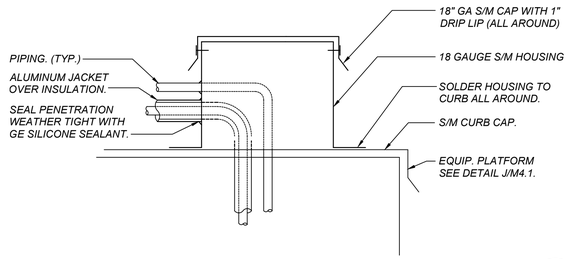


OUTDOOR UNIT MOUNTING DETAIL

K / M4.1

SCALE: NONE

MM064B

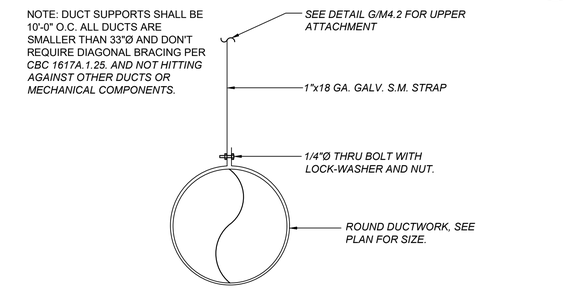


PIPE THRU PLATFORM DETAIL

D / M4.1

SCALE: NONE

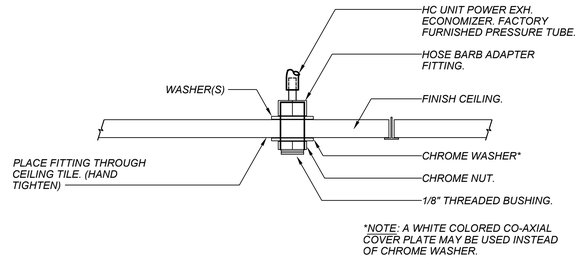
MP198



ROUND DUCT HANGING DETAIL

E / M4.1

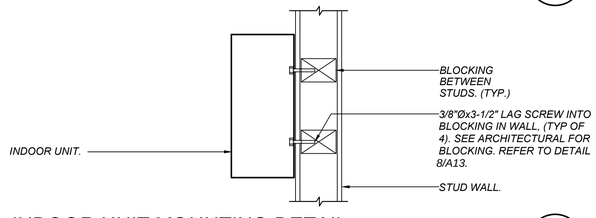
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PRESSURE SENSOR TUBE MOUNTING DETAIL

F / M4.1

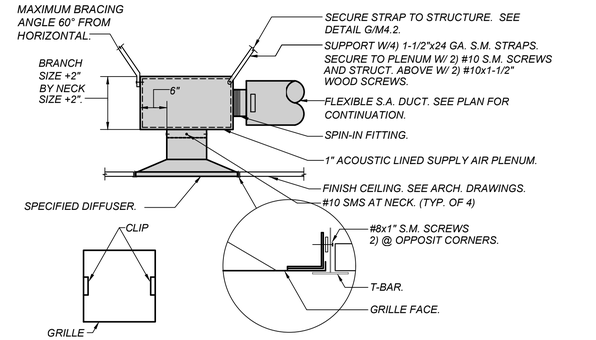
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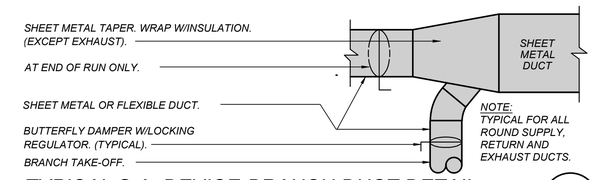
INDOOR UNIT MOUNTING DETAIL

G / M4.1

SCALE: NONE



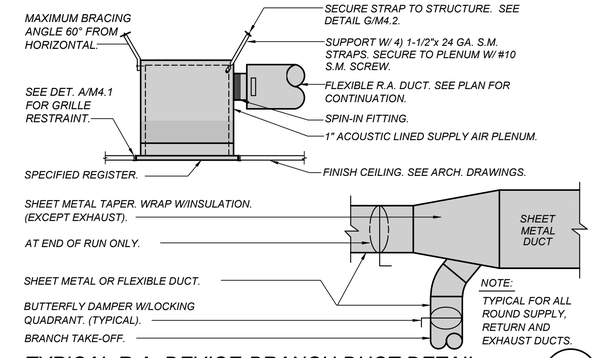
PLAN VIEW



TYPICAL S.A. DEVICE-BRANCH DUCT DETAIL

A / M4.1

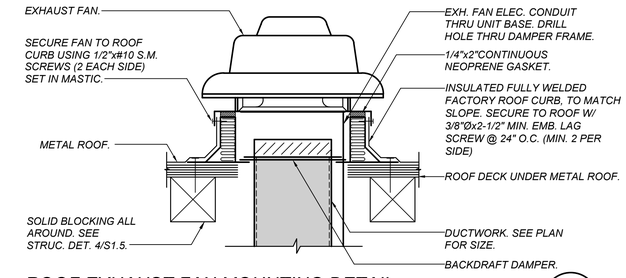
SCALE: NONE



TYPICAL R.A. DEVICE-BRANCH DUCT DETAIL

B / M4.1

SCALE: NONE



ROOF EXHAUST FAN MOUNTING DETAIL

C / M4.1

SCALE: NONE

MM120

APPROVALS

FILE # 10-28 | APPLICATION # 02-122132

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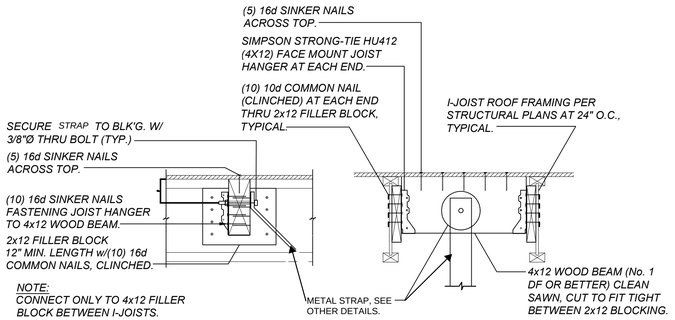
TITLE
MECHANICAL DETAILS

M4.1

PROJECT 23044

LAWRENCE ENGINEERING GROUP
4910 E. Clinton Way, Suite 101
(559) 431-0101
23143
Fresno, CA 93727
FAX (559) 431-1362

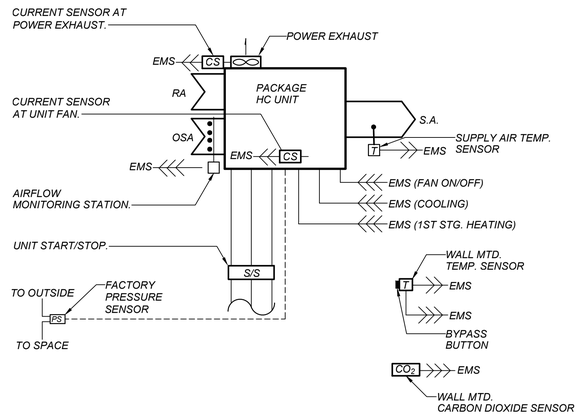
26 July 2024 8:43 AM P:\2023\23143 Cheney ES – New TK Classroom\4–Drawings\4 M\M4.1 Mechanical Details.dwg mark d
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UPPER HANGER CONNECTION

SCALE: NONE

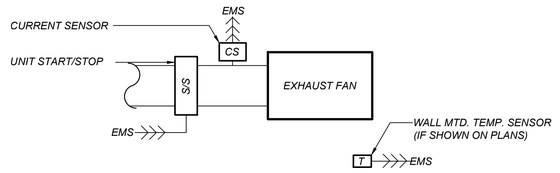
G / M4.2



PACKAGE HC UNIT DIAGRAM

SCALE: NONE

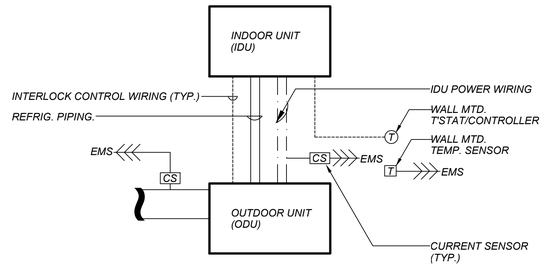
D / M4.2



EXHAUST FAN DIAGRAM

SCALE: NONE

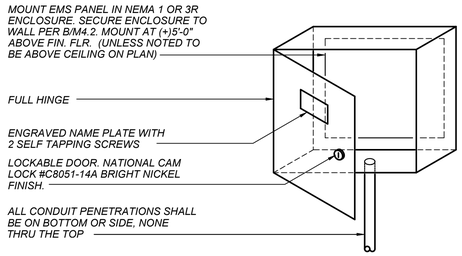
E / M4.2



SPLIT SYSTEM DIAGRAM

SCALE: NONE

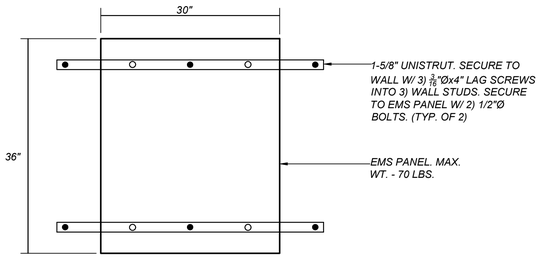
F / M4.2



EMS PANEL ENCLOSURE DETAIL

SCALE: NONE

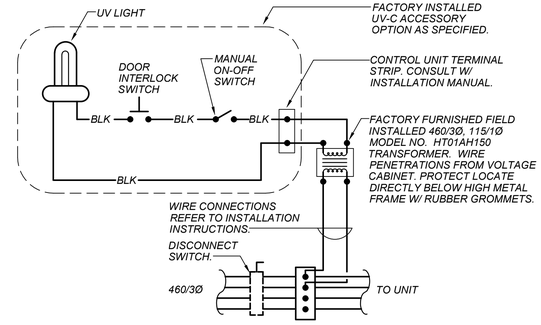
A / M4.2



EMS PANEL MOUNTING DETAIL

SCALE: NONE

B / M4.2



WIRING DIAGRAM FOR UV-C TRANSFORMER

SCALE: NONE

C / M4.2

APPROVALS

FILE # 10-28 | APPLICATION # 02-122132

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Fresno, CA 93727
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TITLE: MECHANICAL DETAILS

M4.2

PROJECT 23044

C1. COMPLIANCE SUMMARY

	COMPLIES[3]		
	Time Dependent Valuation (TDV)		Source Energy Use
	Efficiency[1] (kBtu/ft² - yr)	Total[2] (kBtu/ft² - yr)	Total[2] (kBtu/ft² - yr)
Standard Design	310.12	254.82	20.15
Proposed Design	306.02	245.91	19.13
Compliance Margins	**4.1**	**8.91**	**1.02**
	Pass	**Pass**	**Pass**

[1] *Efficiency measures include improvements like a better building envelope and more efficient equipment*
[2] *Compliance Totals include efficiency, photovoltaics and batteries*
[3] *Building complies when efficiency and total compliance margins are greater than or equal to zero and unmet load hour limits are not exceeded*

B. PROJECT SUMMARY

Table B shows which building components are included in the performance calculation. If indicated as not included, the project must show compliance prescriptively if within the permit application.

Building Components Complying via Performance					Building Components Complying Prescriptively	
Envelope (See Table G)	Nonres	Performance	Solar Thermal Water Heating (See Table I3)	☐ Performance	The following building components are ONLY eligible for prescriptive compliance and should be documented on the NRCC form listed if within the scope of the permit application (i.e. compliance will not be shown on the NRCC-PRF-E).	
	MultiFam	Not Included		☒ Not Included		
Mechanical (See Table H)	Nonres	Performance	Covered Process: Commercial Kitchens (see Table J)	☐ Performance	Indoor Lighting (Unconditioned) 140.6 & 170.2(e)	NRCC-LTI-E is required
	MultiFam	Not Included		☒ Not Included	Outdoor Lighting 140.7 & 170.2(e)	NRCC-LTO-E is required
Domestic Hot Water (See Table I)	Nonres	Not Included	Covered Process: Laboratory Exhaust (see Table J)	☐ Performance	Sign Lighting 140.8 & 170.2(e)	NRCC-LTS-E is required
	MultiFam	Not Included		☒ Not Included	**Building Components Complying with Mandatory Measures**	
Lighting (Indoor Conditioned, see Table K)	Nonres	Not Included	Photovoltaics (see Table F)	☒ Performance	Electrical power systems, commissioning, solar ready, elevator and escalator requirements are mandatory and should be documented on the NRCC form listed if applicable (i.e. compliance will not be shown on the NRCC-PRF-E.)	
	MultiFam	Not Included		☐ Not Included	Electrical Power Distribution 110.11	NRCC-ELC-E is required
			Battery (see Table F)	☒ Performance	Commissioning 120.8	NRCC-CXR-E is required
				☐ Not Included	Solar and Battery 110.10	NRCC-SAB-E is required

Project Name: Cheney ES- New TK Classroom — **Date Prepared:** 2023-12-28

A. General Information

1	Project Name	Cheney ES- New TK Classroom		
2	Run Title	Title 24 Analysis		
3	Project Location	149 Adams ST.		
4	City	Coalinga	5 Standards Version	Compliance 2022
6	Zip code	93210	7 Compliance Software (version)	EnergyPro 9.1
8	Climate Zone	13	9 Building Orientation (deg)	0
10	Building Type(s)	• Nonresidential	11 Weather File	LEMORE-NAS_STYP20.epw
12	Project Scope	• New envelope and mechanical	13 Number of Dwelling Units	0
14	Total Conditioned Floor Area in Scope (ft²)	4261	15 Total # of hotel/motel rooms	0
16	Total Unconditioned Floor Area (ft²)	62	17 Fuel Type	Natural gas
18	Nonresidential Conditioned Floor Area	4261	19 Total # of Stories (Habitable Above Grade)	1
20	Residential Conditioned Floor Area	0		

C4. SOURCE ENERGY COMPLIANCE RESULTS FOR PERFORMANCE COMPONENTS (Annual SOURCE Energy Use, kBtu/ft² /yr)

	COMPLIES[2]		
Energy Component	Standard Design (SOURCE)	Proposed Design (SOURCE)	Compliance Margin (SOURCE)[1]
Space Heating	1.44	1.21	0.23
Space Cooling	3.98	4.27	-0.29
Indoor Fans	11.87	10.81	1.06
Heat Rejection	0	0	0
Pumps & Misc.	0	0	0
Domestic Hot Water	2.84	2.85	-0.01
Indoor Lighting	2.59	2.59	0
Flexibility	---	---	---
EFFICIENCY COMPLIANCE TOTAL	**22.72**	**21.73**	**0.99 (4.4%)**
Photovoltaics	-1.83	-2.05	0.22
Batteries	-0.74	-0.55	-0.19
TOTAL COMPLIANCE	**20.15**	**19.13**	**1.02 (5.1%)**

[1] *Notes: This number in parenthesis following the Compliance Margin in column 4, represents the Percent Better than Standard.*

C3. TDV ENERGY RESULTS FOR NON-REGULATED COMPONENTS[1]

Non-Regulated Energy Component	Standard Design (TDV)	Proposed Design (TDV)	Compliance Margin (TDV)[1]
Receptacle	62.06	62.06	---
Process	140.46	140.46	---
Other Ltg	0.31	0.31	---
Process Motors	---	---	---
TOTAL (TOTAL COMPLIANCE + NON-REGULATED COMPONENTS)	**457.65**	**448.74**	**8.91 (1.9%)**

[1] *Notes: This table is not used for Energy Code Compliance.*

C2. TDV ENERGY COMPLIANCE RESULTS FOR PERFORMANCE COMPONENTS (Annual TDV Energy Use, kBtu/ft² - yr)

	COMPLIES[2]		
Energy Component	Standard Design (TDV)	Proposed Design (TDV)	Compliance Margin (TDV)[1]
Space Heating	10.86	8.63	2.23
Space Cooling	98.24	111.02	-12.78
Indoor Fans	137.59	122.57	15.02
Heat Rejection	0	0	0
Pumps & Misc.	0	0	0
Domestic Hot Water	31.16	31.53	-0.37
Indoor Lighting	32.27	32.27	0
Flexibility	---	---	---
EFFICIENCY COMPLIANCE TOTAL	**310.12**	**306.02**	**4.1 (1.3%)**
Photovoltaics	-51.79	-58.78	6.99
Batteries	-3.51	-1.33	-2.18
TOTAL COMPLIANCE	**254.82**	**245.91**	**8.91 (3.5%)**

[1] *Notes: This number in parenthesis following the Compliance Margin in column 4, represents the Percent Better than Standard.*

C8. ENERGY USE INTENSITY (EUI)

	Standard Design (kBtu/ft² / yr)	Proposed Design (kBtu/ft² / yr)	Margin (kBtu/ft² / yr)	Margin Percentage
GROSS EUI[1]	63.06	61.42	1.64	2.6
NET EUI[1]	54.22	51.55	2.67	4.92

[1] *Notes: Gross EUI is Energy Use Total (not including PV)/Total Building Area. Net EUI is Energy Use Total (including PV)/Total Building Area.*

D1. EXCEPTIONAL CONDITIONS

• The project uses the Simplified Geometry Performance Modeling Approach which is not capable of modeling daylighting controls and assumes the prescriptive Secondary Daylit Control requirements are met. PRESCRIPTIVE COMPLIANCE documentation (form NRCC-LTI-02-E) for the requirements of section 140.6(d) Automatic Daylighting Controls in Secondary Daylit Zones is required.
• The building does not include service water heating. Verify that service water heating is not required and is not included in the design.

F1. REQUIRED PV SYSTEMS

01	02	03	04	05	06	07	08	09	10	11	12
DC System Size (kWdc)	Exception[1]	Module Type	Array Type	Power Electronics	CFI	Azimuth (deg)	Tilt Input	Array Angle (deg)	Tilt: (x in 12)	Inverter Eff. (%)	Annual Solar Access (%)
7.47	n/a	Standard (14-17%)	Fixed	none	false	180	Degrees	22	4.85	96	100

[1] *See Table D1 for any PV exceptions used.*

C7. ENERGY USE SUMMARY

Energy Component	Standard Design Site (MWh)	Proposed Design Site (MWh)	Margin (MWh)	Standard Design Site (MBtu)	Proposed Design Site (MBtu)	Margin (MBtu)
Space Heating	1.4	1	0.4	---	0.4	---
Space Cooling	11.8	12	-0.2	---	---	---
Indoor Fans	20.5	18.4	2.1	---	---	---
Heat Rejection	---	---	---	---	---	---
Pumps & Misc.	---	---	---	---	---	---
Domestic Hot Water	5.5	5.6	-0.1	---	---	---
Indoor Lighting	5.3	5.3	0	---	---	---
Flexibility	---	---	---	---	---	---
EFFICIENCY TOTAL	**44.5**	**42.3**	**2.2**	**0**	**0.4**	**-0.4**
Photovoltaics	-11.2	-12.5	1.3	---	---	---
Batteries	0.1	0.1	0	---	---	---
ENERGY USE SUBTOTAL	**33.4**	**29.9**	**3.5**	**0**	**0.4**	**-0.4**
Receptacle	10.6	10.6	0	---	---	---
Process	24.6	24.6	0	---	---	---
Other Ltg	0.1	0.1	0	---	---	---
Process Motors	---	---	---	---	---	---
ENERGY USE TOTAL	**68.7**	**65.2**	**3.5**	**0**	**0.4**	**-0.4**

C5. SOURCE ENERGY RESULTS FOR NON-REGULATED COMPONENTS[1]

Non-Regulated Energy Component	Standard Design (SOURCE)	Proposed Design (SOURCE)	Compliance Margin (SOURCE)[1]
Receptacle	4.64	4.64	---
Process	10.35	10.35	---
Other Ltg	0.02	0.02	---
Process Motors	---	---	---
TOTAL (TOTAL COMPLIANCE + NON-REGULATED COMPONENTS)	**35.16**	**34.14**	**1.02 (2.9%)**

[1] *Notes: This table is not used for Energy Code Compliance.*

C6. 'ABOVE CODE' QUALIFICATIONS

☐ This project is pursuing CalGreen Tier 1 ☐ This project is pursuing CalGreen Tier 2

APPROVALS

FILE # 10-28 — APPLICATION # 02-122132

IDENTIFICATION STAMP
DIV. OF THE STATE ARCHITECT
APP: 02-122132 INC: A
REVIEWED FOR
SS ☑ FLS ☑ ACS ☑
DATE: 08/06/2024

LICENSED ARCHITECT
MICHAEL J. SCOTT JR
No. C-34290
REN: 08-31-25
STATE OF CALIFORNIA

DATE: JANUARY 31, 2024

NEW TK CLASSROOM AT CHENEY KINDERGARTEN
COALINGA-HURON UNIFIED SCHOOL DISTRICT
COALINGA, FRESNO COUNTY, CA

REVISIONS

MANGINI | ARCHITECTURE INGENUITY
MANGINI ASSOCIATES INC.
4310 West Mineral King Avenue
Visalia, California 93291
www.mangini.us
(559) 627-0530 *Office*
(559) 627-1926 *Fax*

REGISTERED PROFESSIONAL ENGINEER
RYAN W. CARLSON
No. M34846
Exp. 6-30-26
STATE OF CALIFORNIA
MECHANICAL

LAWRENCE ENGINEERING GROUP
4910 E. Clinton Way, Suite 101
(559) 431-0101
23143
Fresno, CA 93727
FAX (559) 431-1362

TITLE
T-24 DOCUMENTS

M5.1

PROJECT 23044

26 July 2024 8:43 AM P:\2023\23143 Cheney ES - New TK Classroom\4-Drawings\4 M\M5.1 T-24 Documents.dwg mark d

G5. OPAQUE SURFACE ASSEMBLY SUMMARY

01	02	03	04	05	06		07	08	09	10
Surface Name	Construction Type	Area (ft²)	Framing Type	Cavity R-Value	Continuous R-Value		Units	Value	Description of Assembly Layers	Status[1]
					Interior	Exterior				
23143 R-19 Wall7	Exterior Wall	3,602	Wood	19	N/A	N/A	U-factor	0.0675	Plaster/Sand Aggregate - 1 in. Vapor permeable felt - 1/8 in. Plywood - 1/2 in. Composite-1 Gypsum Board - 5/8 in.	N
23143 R-30 Roof18	Roof	4,272	Metal	30	N/A	N/A	U-factor	0.0547	AsphaltShingles0_25in Vapor permeable felt - 1/8 in. Plywood - 1/2 in. Air - Ceiling - 3/4 in. Composite-2 Acoustic Tile - 3/8 in.	N
Slab On Grade20	Underground Floor	4,323	N/A	0	N/A	N/A	F-factor	0.73	Slab Type =Unheated slab on grade Insulation Orientation =None Insulation R-Value =none	N
23143 R-0 Wall26	Interior Wall	60	Wood	0	N/A	N/A	U-factor	0.334	Gypsum Board - 5/8 in. Composite-3 Gypsum Board - 5/8 in.	N
R-38 Roof Attic105	Roof	51	Wood	38	N/A	N/A	U-factor	0.0329	AsphaltShingles0_25in Vapor permeable felt - 1/8 in. Plywood - 1/2 in. Air - Cavity - Wall Roof Ceiling - 4 in. or more Composite-4 Gypsum Board - 1/2 in.	N

[1] *Status: N - New, A - Altered, E - Existing*

G1. ENVELOPE GENERAL INFORMATION (conditioned spaces only)

01	02	03	04
Opaque Surfaces & Orientation	Total Gross Surface Area (ft²)	Total Fenestration Area (ft²)	Window to Wall Ratio (%)
North-Facing[1]	1374	294	21.4
East-Facing[2]	304	0	0
South-Facing[3]	1374	88.08	6.41
West-Facing[4]	438	0	0
Total	**3490**	**382.08**	**10.95**
Roof	4261	0	0

Notes
[1] *North-Facing is oriented to within 45 degrees of true north, including 45 00'00" east of north (NE), but excluding 45 00'00" west of north (NW),*
[2] *East-Facing is oriented to within 45 degrees of true east, including 45 00'00" south of east (SE), but excluding 45 00'00" north of east (NE),*
[3] *South-Facing is oriented to within 45 degrees of true south, including 45 00'00" west of south (SW), but excluding 45 00'00" east of south (SE),*
[4] *West-Facing is oriented to within 45 degrees of true west, including 45 00'00" north of west (NW), but excluding 45 00'00" south of west (SW),*

G4. NONRESIDENTIAL AIR BARRIER

01	02
Building Story Name	Air Barrier
Com-Floor 1	No air barrier

CA Building Energy Efficiency Standards - 2022 Nonresidential Compliance Report Version: 2022.0.000 Schema Version: rev 20220601 Report Generated: 2023-12-28 08:41:55 Compliance ID: EnergyPro-2975-1223-0523

F1B. PV BATTERY BUILDING TYPE(S)

01	02	03
Building Occupancy Type* (From Table 140.10-A/B and 170.2-U/V)	Conditioned Floor Area (ft²)	Unconditioned Floor Area (ft²)
Grocery	0	0
High-Rise Multifamily	0	0
Office, Financial Institutions, Unleased Tenant Space	0	0
Retail	0	0
School	4261	62
Warehouse	0	0
Auditorium, Convention Center, Hotel/Motel, Library, Medical Office Building/Clinic, Restaurant, Theater	0	0
None	0	0

**Building Occupancy Types are defined in Section 100.1 of the Energy Code*

F2. BATTERY SYSTEMS[1]

01	02	03	04	05	06	07
Control	Capacity (kWh)	Charging Efficiency	Charging Rate (kW)	Discharging Efficiency	Discharging Rate (kW)	Round Trip Efficiency
Basic	14.2	N/A	5	N/A	5	0.9

[1] *See Table D1 for any Battery exceptions used.*

CA Building Energy Efficiency Standards - 2022 Nonresidential Compliance Report Version: 2022.0.000 Schema Version: rev 20220601 Report Generated: 2023-12-28 08:41:55 Compliance ID: EnergyPro-2975-1223-0523

H3. NONRESIDENTIAL / COMMON USE AREA FAN SYSTEMS SUMMARY

01	02	03	04	05	06	07	08	09	10	11	12	13
Name or Item Tag	Qty	Design OA CFM	Supply Fan				Return / Relief Fan					Status[1]
			CFM	Power	Power Units	Control	Fan Type	CFM	Power	Power Units	Control	
HP-1: 50GCQJ06	1	516.8	2,050	1.06	BHP	Constant Vol	N/A	N/A	N/A	N/A	N/A	N
HP-2: 50GCQJ05	1	414.96	1,600	0.79	BHP	Constant Vol	N/A	N/A	N/A	N/A	N/A	N
HP-3: 50GCQJ06	1	0	2,000	1.06	BHP	Constant Vol	N/A	N/A	N/A	N/A	N/A	N
HP-4: 50GCQJ05	1	464.36	1,625	0.79	BHP	Constant Vol	N/A	N/A	N/A	N/A	N/A	N
IDU / ODU 1: 40MAHBQ24 /	1	7.65	600	0.06	BHP	Constant Vol	N/A	N/A	N/A	N/A	N/A	N

[1] *Status: N - New, A - Altered, E - Existing*

H5. GENERAL EXHAUST FAN SUMMARY

01	02	03	04	05	06	07	08
System ID	Zone Name	Qty	CFM	Power	Power Units	Continuous Operation?	Status[1]
Zone 11	1-Zone 1	1	350	0.08	BHP	No	N
Zone 345	3-Zone 3	1	700	0.17	BHP	No	N
Zone 476	4-Zone 4	1	300	0.07	BHP	No	N
Zone 597	5-Zone 5	1	500	0.13	BHP	No	N

[1] *Status: N - New, A - Altered, E - Existing*

CA Building Energy Efficiency Standards - 2022 Nonresidential Compliance Report Version: 2022.0.000 Schema Version: rev 20220601 Report Generated: 2023-12-28 08:41:55 Compliance ID: EnergyPro-2975-1223-0523

H1. DRY SYSTEM EQUIPMENT (FURNACES, AIR HANDLING UNITS, HEAT PUMPS, VRF, ECONOMIZERS ETC.)

01	02	03	04	05	06	07	08	09	10	11	12
Equipment Name	Equipment Type	Qty	Heating				Cooling			Economizer Type (if present)	Status[1]
			Total Heating Output (kBtu/h)	Supp Heat Output (kBtu/h)	Efficiency Unit	Efficiency	Total Cooling Output (kBtu/h)	Efficiency Unit	Efficiency		
HP-2: 50GCQJ05	Single Zone Heat Pump (SZHP) Air System	1	36.45	0	N/A	NA	41.09	EER SEER	9.5 17	Differential DB	N
HP-3: 50GCQJ06	Single Zone Heat Pump (SZHP) Air System	1	45.31	0	N/A	NA	53	EER SEER	9.35 17	Differential DB	N
HP-4: 50GCQJ05	Single Zone Heat Pump (SZHP) Air System	1	36.45	0	N/A	NA	41.09	EER SEER	9.5 17	Differential DB	N
IDU / ODU 1: 40MAHBQ24 /	Single Zone Air Conditioner (SZAC) Air System	1	24	0	AFUE	81	23.04	EER	13	No Economizer	N

[1] *Status: N - New, A - Altered, E - Existing*

CA Building Energy Efficiency Standards - 2022 Nonresidential Compliance Report Version: 2022.0.000 Schema Version: rev 20220601 Report Generated: 2023-12-28 08:41:55 Compliance ID: EnergyPro-2975-1223-0523

G6A. OPAQUE DOOR SUMMARY (NONRESIDENTIAL)

01	02	03	04
Assembly Name	Area (ft²)	Overall U-factor	Status[1]
Metal Door12	168	0.7	N

[1] *Status: N - New, A - Altered, E - Existing*

G7A. FENESTRATION ASSEMBLY SUMMARY (NONRESIDENTIAL)

01	02	03	04	05	06	07	08	09
Fenestration Assembly Name	Fenestration Type/ Product Type / Frame Type	Certification Method[1]	Assembly Method	Area (ft²)	Overall U-factor	Overall SHGC	Overall VT	Status[2]
23143 Double Metal Tinted	Vertical fenestration Fixed window N/A	NFRC	Site built	382.08	0.3	0.3	0.42	N

[1] *Notes: Newly installed fenestration shall have a certified NFRC Label Certificate or use the CEC default tables found in Table 110.6-A and Table 110.6-B. Center of Glass (COG) values are for the glass-only, determined by the manufacturer, and are shown for ease of verification. Site-built fenestration values are calculated per Nonresidential Appendix NA6 and are used in the analysis.*
[2] *Status: N - New, A - Altered, E - Existing*

H1. DRY SYSTEM EQUIPMENT (FURNACES, AIR HANDLING UNITS, HEAT PUMPS, VRF, ECONOMIZERS ETC.)

01	02	03	04	05	06	07	08	09	10	11	12
Equipment Name	Equipment Type	Qty	Heating				Cooling			Economizer Type (if present)	Status[1]
			Total Heating Output (kBtu/h)	Supp Heat Output (kBtu/h)	Efficiency Unit	Efficiency	Total Cooling Output (kBtu/h)	Efficiency Unit	Efficiency		
HP-1: 50GCQJ06	Single Zone Heat Pump (SZHP) Air System	1	44.99	0	N/A	NA	50.79	EER SEER	9 17	Differential DB	N

[1] *Status: N - New, A - Altered, E - Existing*

CA Building Energy Efficiency Standards - 2022 Nonresidential Compliance Report Version: 2022.0.000 Schema Version: rev 20220601 Report Generated: 2023-12-28 08:41:55 Compliance ID: EnergyPro-2975-1223-0523

M. DECLARATION OF REQUIRED CERTIFICATES OF ACCEPTANCE

Selections made by Documentation Author indicate which Certificates of Acceptance must be submitted for the features to be recognized for compliance. These documents must be provided to the building inspector during construction and must be completed through an Acceptance Test Technician Certification Provider (ATTCP).

Building Component	Form/Title
Mechanical	NRCA-MCH-06-A Demand Control Ventilation Systems must be submitted for all systems required to employ demand controlled ventilation (refer to) can vary outside ventilation flow rates based on maintaining interior carbon dioxide (CO2) concentration setpoints.
Mechanical	NRCA-MCH-12-A FDD for Packaged Direct Expansion Units

N. DECLARATION OF REQUIRED CERTIFICATES OF VERIFICATION

Selections made by Documentation Author indicate which Certificates of Verification must be submitted for the features to be recognized for compliance. These documents must be retained and provided to the building inspector during construction and can be found online

There are no Certificates of Verification applicable to this project

CA Building Energy Efficiency Standards - 2022 Nonresidential Compliance Report Version: 2022.0.000 Schema Version: rev 20220601 Report Generated: 2023-12-28 08:41:55 Compliance ID: EnergyPro-2975-1223-0523

H11. ZONAL SYSTEM AND TERMINAL UNIT SUMMARY

01	02	03	04	05	06	07	08	09	10	11	12
System ID	System Type	Qty	Rated Capacity (kBtuh)		Airflow (cfm)			Fan			VSD
			Heating	Cooling	Design	Min.	Min. Ratio	Power	Power Units	Cycles	
1-Zone 1-Trm	Uncontrolled	1	N/A	N/A	2,050	N/A	0	N/A	N/A	N/A	☐
2-Zone 2-Trm	Uncontrolled	1	N/A	N/A	1,600	N/A	0	N/A	N/A	N/A	☐
3-Zone 3-Trm	Uncontrolled	1	N/A	N/A	2,000	N/A	0	N/A	N/A	N/A	☐
4-Zone 4-Trm	Uncontrolled	1	N/A	N/A	1,625	N/A	0	N/A	N/A	N/A	☐
5-Zone 5-Trm	Uncontrolled	1	N/A	N/A	600	N/A	0	N/A	N/A	N/A	☐

L. DECLARATION OF REQUIRED CERTIFICATES OF INSTALLATION

Selections made by Documentation Author indicate which Certificates of Installation must be submitted for the features to be recognized for compliance. These documents must be retained and provided to the building inspector during construction and can be found online

Building Component	Form/Title
Envelope	NRCI-ENV-01-E - Must be submitted for all buildings
Envelope	NRCI-ENV-E - Envelope (for all buildings)
Mechanical	NRCI-MCH-01-E - Must be submitted for all buildings
Mechanical	NRCI-MCH-E - For all buildings with Mechanical Systems

M. DECLARATION OF REQUIRED CERTIFICATES OF ACCEPTANCE

Selections made by Documentation Author indicate which Certificates of Acceptance must be submitted for the features to be recognized for compliance. These documents must be provided to the building inspector during construction and must be completed through an Acceptance Test Technician Certification Provider (ATTCP).

Building Component	Form/Title
Envelope	NRCA-ENV-02-F - NRFC label verification for fenestration
Mechanical	NRCA-MCH-02-A - Outdoor Air must be submitted for all newly installed HVAC units. Note: MCH-02-A can be performed in conjunction with MCH-07-A Supply Fan VFD Acceptance (if applicable) since testing activities overlap
Mechanical	NRCA-MCH-03-A - Constant Volume Single Zone HVAC
Mechanical	NRCA-MCH-05-A - Air Economizer Controls

CA Building Energy Efficiency Standards - 2022 Nonresidential Compliance Report Version: 2022.0.000 Schema Version: rev 20220601 Report Generated: 2023-12-28 08:41:55 Compliance ID: EnergyPro-2975-1223-0523

H8. SYSTEM SPECIAL FEATURES

01	02	03	04
System Name	Equipment Type	Interlocks per 140.4(n)[1]	Other Special Features and Controls
HP-1: 50GCQJ06	Single Zone Heat Pump (SZHP) Air System	N/A	Zone(s) With CO2 Sensor Vent. Control Differential DB
HP-2: 50GCQJ05	Single Zone Heat Pump (SZHP) Air System	N/A	Zone(s) With CO2 Sensor Vent. Control Differential DB
HP-3: 50GCQJ06	Single Zone Heat Pump (SZHP) Air System	N/A	Differential DB
HP-4: 50GCQJ05	Single Zone Heat Pump (SZHP) Air System	N/A	Zone(s) With CO2 Sensor Vent. Control Differential DB

Notes: This table includes controls related to the performance path only. For projects using the prescriptive path, mandatory and prescriptive controls requirements are documented on the NRCC-MCH-E.
[1] *Yes = interlocks are provided, No = interlocks are not provided, NA means no operable openings.*

H9. NONRESIDENTIAL / COMMON USE AREA & HOTEL/MOTEL VENTILATION

01	02	03	04	05	06	07
Zone Name	Ventilation Function	Mechanical Ventilation			Conditioned Area (sf)	DCV or Occupant Sensor Controls, or Both
		# of People	Supply OA CFM	Exhaust CFM		
1-Zone 1	Education - Classrooms (ages 5-8)	48.4	516.8	350	1360	DCV
2-Zone 2	Education - Classrooms (ages 5-8)	35	414.96	0	1092	DCV
3-Zone 3	Exhaust - Toilets, public	2.68	0	700	536	N/A
4-Zone 4	Education - Classrooms (ages 5-8)	41.5	464.36	300	1222	DCV
5-Zone 5	Misc - All others	0.08	7.65	500	51	N/A

CA Building Energy Efficiency Standards - 2022 Nonresidential Compliance Report Version: 2022.0.000 Schema Version: rev 20220601 Report Generated: 2023-12-28 08:41:55 Compliance ID: EnergyPro-2975-1223-0523

APPROVALS
FILE # 10-28 APPLICATION # 02-122132

IDENTIFICATION STAMP
DIV. OF THE STATE ARCHITECT
APP: 02-122132 INC: A
REVIEWED FOR
SS ☑ FLS ☑ ACS ☑
DATE: 08/06/2024

LICENSED ARCHITECT
MICHAEL J. SCOTT JR
No. C-34290
REN: 08-31-25
STATE OF CALIFORNIA
DATE: JANUARY 31, 2024

NEW TK CLASSROOM AT CHENEY KINDERGARTEN
COALINGA-HURON UNIFIED SCHOOL DISTRICT
COALINGA, FRESNO COUNTY, CA

REVISIONS

MANGINI ARCHITECTURE INTERIORS

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REGISTERED PROFESSIONAL ENGINEER
RYAN W. CARLSON
No. M34846
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MECHANICAL
STATE OF CALIFORNIA

TITLE
T-24 DOCUMENTS

M5.2

PROJECT 23044

LAWRENCE ENGINEERING GROUP
4910 E. Clinton Way, Suite 101 Fresno, CA 93727
(559) 431-0101 23143 FAX (559) 431-1362

26 July 2024 8:43 AM P:\2023\23143 Cheney ES – New TK Classroom\4-Drawings\4 M\M5.1 T-24 Documents.dwg mark d
P:\2023\23143 Cheney ES – New TK Classroom\4-Drawings\4 M\M5.1 T-24 Documents.dwg Jul 26 2024 8:43am

STATE OF CALIFORNIA
Domestic Water Heating System CALIFORNIA ENERGY COMMISSION

CERTIFICATE OF COMPLIANCE		NRCC-PLB-E
Project Name: Cheney ES- New TK Classroom	Report Page:	(Page 2 of 6)
	Date Prepared:	12/28/2023

E. ADDITIONAL REMARKS

This table includes remarks made by the permit applicant to the Authority Having Jurisdiction.

F. DOMESTIC HOT WATER EQUIPMENT

This table is used to demonstrate compliance with mandatory equipment requirements in 110.1 and 110.3. Compliance with prescriptive requirements in 140.5(c) / 170.2(d) must also be demonstrated and with 141.0 / 180.1/ 180.2 for addition and alteration scopes.

Equipment Schedule: Water Heating Efficiency and Standby Loss

03	04			05	06			
System Name	A O Smith DEL-30	Exception to 140.5(c)/ 170.2(d)3		☐	Gas Service Water Heating System >= 1MMBtu/h[1]	Capacity-weighted Average Efficiency %		
07	08	09	10		11	12	13	14	15
Name or Item Tag	Equipment Type	Volume (gal)	Rated Input Capacity (Btu/h)	Max GPM/ First Hour Rating (FHR)	Rated Efficiency	Minimum Efficiency Required	Efficiency Unit	Designed Standby Loss	Maximum Standby Loss
A O Smith DEL-30	Consumer Rated Electric Storage	30	15,358	51 <= FHR <75	0.92	0.93	UEF		

[1]*FOOTNOTE: In systems >= 1MMBtu/h with multiple units, gas water heaters with input capacity > 100,000 Btu/h may meet 90% Et requirements via an input capacity-weighted average.*

Water Heating Equipment All Occupancies

	Yes	No	Not Applicable	Requirement
18	☐	☐	☒	Unfired storage tank insulation shall have Internal + External >=R-16 OR External >=R-3.5. Label required per 110.3(c)3
19	☐	☐	☒	New state buildings 60% of energy for service water heating from site solar energy or recovered energy per 110.3(c)5
20	☐	☐	☒	Isolation valves for instantaneous water heater with input rating >6.8 kBTUH or 2 kW has been specified per 110.3(c)6
21	☐	☐	☒	School buildings < 25,000 ft² and < 4 stories must install a heat pump water heating system per 140.5(a)1. Water heating systems serving an individual bathroom space may be an instantaneous electric water heater.

STATE OF CALIFORNIA
Domestic Water Heating System CALIFORNIA ENERGY COMMISSION

CERTIFICATE OF COMPLIANCE		NRCC-PLB-E
Project Name: Cheney ES- New TK Classroom	Report Page:	(Page 1 of 6)
Project Address: 149 Adams ST	Date Prepared:	12/28/2023

This document is used to demonstrate compliance for nonresidential occupancies with requirements in 110.1, 110.3, 120.3, and 140.5, and with requirements in 141.0 for additions and alterations, for domestic water heating scopes using the prescriptive path. For high-rise residential and hotel/motel occupancies compliance is demonstrated with requirements in 110.1, 110.3, 160.4 and 170.2(d), and with requirements 180.1 for additions and 180.2 for alterations.

A. GENERAL INFORMATION

01	Project Location (city)	Coalinga	02	Climate Zone	13
03	Occupancy Types Within Project (select all that apply):				

● Classroom ● Support Areas ● All Other Occupancies

B. PROJECT SCOPE

This table includes domestic water heating systems that are within the scope of the permit application and are demonstrating compliance using the prescriptive paths outlined in 140./ 170.2(d) and 141.0(a)/ 180.1, or 141.0(b)2N / 180.2 for additions or alterations. Solar water heating systems are documented on the NRCC-SAB compliance document. Combined hydronic water heating systems are documented on the NRCC-MCH compliance document.

01	02	03
My project consists of (check all that apply):	System Type[1,2]	System Components
☒ New system (DHW system being installed for the first time)	Individual System (serving nonresidential spaces)	☒ Equipment ☒ Distribution ☒ Controls
☐ System Alteration (equipment, distribution or controls)		☐ Equipment ☐ Distribution ☐ Controls

[1]*FOOTNOTES: Point of use water heaters, or other non-central systems used to serve nonresidential spaces, are considered individual systems.*
[2] *Dwelling units refers to hotel/motel guest rooms and units in a multifamily residential occupancy.*
[3] *DHW systems serving 2 or more dwelling units are considered "Central Systems" for multifamily occupancies*

C. COMPLIANCE RESULTS

Table C will indicate if the project data input into the compliance document is compliant with water heating requirements. If this table says "DOES NOT COMPLY" or "COMPLIES with Exceptional Conditions" refer to Table D. or the table indicated as not compliant for guidance.

01	02	03	04
Domestic Hot Water Equipment	Distribution Systems	Controls	Compliance Results
Table F	Table G	Table H	
Yes	Yes	Yes	COMPLIES

D. EXCEPTIONAL CONDITIONS

This table is auto-filled with uneditable comments because of selections made or data entered in tables throughout the form.

CERTIFICATE OF COMPLIANCE - NONRESIDENTIAL PERFORMANCE COMPLIANCE METHOD	NRCC-PRF-E
Nonresidential Performance Compliance Method	(Page 19 of 19)

Documentation Author's Declaration Statement

1. I certify that this Certificate of Compliance documentation is accurate and complete.	
Documentation Author Name: Brent Yang	Documentation Author Signature: Brent Yang
Company: Lawrence Engineering Group	Signature Date: 2023-12-28
Address: 4910 E Clinton Way	CEA/HERS Certification Identification (if applicable):
City/State/Zip: Fresno, CA 93727	Phone: 5594310101

Responsible Person's Declaration statement

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

1. The information provided on this Certificate of Compliance is true and correct.
2. I am eligible under Division 3 of the Business and Professions Code to accept responsibility for the building design or system design identified on this Certificate of Compliance (responsible designer)
3. The energy features and performance specifications, materials, components, and manufactured devices for the building design or system design identified on this Certificate of Compliance conform to the requirements of Title 24, Part 1 and Part 6 of the California Code of Regulations.
4. 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.
5. I understand that a registered copy of this Certificate of Compliance shall be made available with the building permit(s) issued for the building, and made available to the enforcement agency for all applicable inspections. I understand that a completed signed copy of this Certificate of Compliance is required to be included with the documentation the builder provides to the building owner at occupancy.
6. I understand that a registered copy of this Certificate of Compliance is required to be included with the documentation the builder provides to the building owner at occupancy, and I will take the necessary steps to accomplish these requirements.

Responsible Designer Name: Michael J. Scott JR.	Responsible Designer Signature: MScott	
Company: Mangini Associates Inc		
Address: 4320 W Mineral King Ave	Date Signed: 08-05-24	
City/State/Zip: Visalia, CA 93291	License #: C-34290	
Phone: 559-627-0530	Title:	Scope:
Responsible Designer Name: Ryan W. Carlson	Responsible Designer Signature: Ryan Carlson	
Company: Lawrence Engineering Group		
Address: 4910 E Clinton Way	Date Signed: 2023-12-28	
City/State/Zip: Fresno, CA 93727	License #: M34846	
Phone: 559-431-0101	Title:	Scope:

STATE OF CALIFORNIA
Domestic Water Heating System CALIFORNIA ENERGY COMMISSION

CERTIFICATE OF COMPLIANCE		NRCC-PLB-E
Project Name: Cheney ES- New TK Classroom	Report Page:	(Page 5 of 6)
	Date Prepared:	12/28/2023

I. DECLARATION OF REQUIRED CERTIFICATES OF INSTALLATION

Selections have been made based on information provided in this document. If any selection have been changed by permit applicant, an explanation should be included in Table E. Additional Remarks. These documents must be provided to the building inspector during construction and can be found online

Form/Title
NRCI-PLB-E - Must be submitted for all buildings

J. DECLARATION OF REQUIRED CERTIFICATES OF ACCEPTANCE

There are no forms required for this project.

K. DECLARATION OF REQUIRED CERTIFICATES OF VERIFICATION

There are no forms required for this project.

STATE OF CALIFORNIA
Domestic Water Heating System CALIFORNIA ENERGY COMMISSION

CERTIFICATE OF COMPLIANCE		NRCC-PLB-E
Project Name: Cheney ES- New TK Classroom	Report Page:	(Page 4 of 6)
	Date Prepared:	12/28/2023

H. DOMESTIC HOT WATER CONTROLS

This table is used to demonstrate compliance with control requirements in 110.3 for all occupancies. For multifamily residential and hotel/motel occupancies, compliance is also demonstrated with requirements in 160.4(e) / 170.2(d).

	Yes	No	Not Applicable	Requirement
01	☒	☐	☐	Construction documents require manufacturer certification that service water-heating systems are equipped with automatic temperature controls capable of adjusting temperature settings per 110.3(a).
02	☐	☐	☒	Systems with capacity > 167,000 BTUH equipped with outlet temperature controls per 110.3(c)1 unless covered by California Plumbing Code 613.0.
03	☐	☐	☒	Controls for circulating pumps or electrical heat trace systems are capable of automatically turning off the system per §110.3(c)2 unless systems serves healthcare facility.
04	☐	☐	☒	For recirculation systems serving multiple dwelling units, design includes automatic pump controls per 170.2(d) or 180.1(b)3 for additions.
05	☐	☐	☒	For recirculation systems serving individual dwelling units, design includes manual on/off controls as specified in Reference Appendix RA4.4.9 per 170.2(d).
06	☐	☐	☒	Combustion air positive shut-off shall be provided per 160.4(3).on all newly installed commercial boilers as follows: • Boilers with input capacity >= 2.5 MMBtu/h, in which the boiler is designed to operate with a nonpositive vent static pressure • Boilers where one stack serves two or more boilers with a total combined input capacity per stack of 2.5 MMBtu/h.
07	☐	☐	☒	Boiler combustion air fans with motor >= 10 hp shall meet one of the following • The fan motor shall be driven by a variable speed drive OR • The fan motor shall include controls that limit the fan motor demand to <=30% of the total design wattage at 50% of the design air volume.
08	☐	☐	☒	Newly installed boilers with an input capacity (d:gte/) 5MMBtu/h and a steady state full-load combustion efficiency < 90% shall maintain excess (stack-gas) oxygen concentrations <= 5% by volume on a dry basis over firing rates of 20-100%. Combustion air volume shall be controlled with respect to firing rate or flue gas oxygen concentration. Use of a common gas and combustion air control linkage or jack shaft is prohibited.

STATE OF CALIFORNIA
Domestic Water Heating System CALIFORNIA ENERGY COMMISSION

CERTIFICATE OF COMPLIANCE		NRCC-PLB-E
Project Name: Cheney ES- New TK Classroom	Report Page:	(Page 3 of 6)
	Date Prepared:	12/28/2023

G. DOMESTIC HOT WATER DISTRIBUTION SYSTEM

This table is used to demonstrate compliance for nonresidential occupancies with distribution requirements in 120.3 and 140.5. For multifamily and hotel/motel occupancies, compliance is demonstrated with requirements 110.3(c), 160.4, 170.2(d).

Mandatory Pipe Insulation All Occupancies

13	☐	For systems serving dwelling units, pipe insulation must meet the minimum insulation requirements in Table 160.4-A (see blow) except: • Piping that penetrates framing members shall not be required to have pipe insulation for the distance of the framing penetration. Piping that penetrates metal framing shall use grommets, plugs, wrapping or other insulating material to assure that no contact is made with the metal framing. Insulation shall abut securely against all framing members • 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. • 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.
14	☒	For systems serving nonresidential spaces, pipe insulation for the following applications is specified to comply with Table 120.3-A (see below) per 120.3: • Recirculating system piping, including supply and return piping of the water heater • The first 8 ft of hot and cold outlet piping, including between storage tank and heat trap, for a nonrecirculating storage system • Pipes that are externally heated
15	☐	Insulation shall be protected from damage, including that due to sunlight, moisture, equipment maintenance, and wind. Insulation exposed to weather shall be installed with a cover suitable for outdoor service per 120.3(b) / 160.4(f). Pipe insulation buried below grade must be installed in a water proof and non-crushable casing or sleeve.

TABLE 120.3-A / 160.4-A PIPE INSULATION THICKNESS

Fluid Temperature Range (°F)	Conductivity Range (Btu-in per hour per ft² per °F)	Insulation Mean Rating Temp (°F)	Nominal Pipe Diameter (in)			
			< 1	1 to < 1.5	1.5 to < 4	1.5 to < 4 Multifamily & Hotel/Motel
			Minimum Insulation Required			
105-140	0.22 - 0.28	100	1.0 in or R-7.7	1.5 in or R-12.5	1.5 in or R-11	2.0 in or R-16

STATE OF CALIFORNIA
Domestic Water Heating System CALIFORNIA ENERGY COMMISSION

CERTIFICATE OF COMPLIANCE		NRCC-PLB-E
Project Name: Cheney ES- New TK Classroom	Report Page:	(Page 6 of 6)
Project Address: 149 Adams ST	Date Prepared:	12/28/2023

DOCUMENTATION AUTHOR'S DECLARATION STATEMENT

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

Documentation Author Name: Brent Yang	Documentation Author Signature: Brent Yang
Company: Lawrence Engineering Group	Signature Date: 2023-12-28
Address: 4910 E Clinton Way	CEA/ HERS Certification Identification (if applicable):
City/State/Zip: Fresno CA 93727	Phone: 5594310101

RESPONSIBLE PERSON'S DECLARATION STATEMENT

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

1. The information provided on this Certificate of Compliance is true and correct.
2. I am eligible under Division 3 of the Business and Professions Code to accept responsibility for the building design or system design identified on this Certificate of Compliance (responsible designer)
3. The energy features and performance specifications, materials, components, and manufactured devices for the building design or system design identified on this Certificate of Compliance conform to the requirements of Title 24, Part 1 and Part 6 of the California Code of Regulations.
4. 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.
5. I will ensure that a completed signed copy of this Certificate of Compliance shall be made available with the building permit(s) issued for the building, and made available to the enforcement agency for all applicable inspections. I understand that a completed signed copy of this Certificate of Compliance is required to be included with the documentation the builder provides to the building owner at occupancy.

Responsible Designer Name: Ryan W. Carlson	Responsible Designer Signature: Ryan Carlson
Company: Lawrence Engineering Group	Date Signed: 2023-12-28
Address: 4910 E Clinton Way	License: M34846
City/State/Zip: Fresno CA 93727	Phone: 559-431-0101

REGISTERED PROFESSIONAL ENGINEER
RYAN W. CARLSON
No. M34846
Exp. 6-30-26
MECHANICAL
STATE OF CALIFORNIA

LAWRENCE ENGINEERING GROUP
4910 E. Clinton Way, Suite 101 (559) 431-0101 | 23143 | Fresno, CA 93727 FAX (559) 431-1362

APPROVALS
FILE # 10–28 | APPLICATION # 10–122132

IDENTIFICATION STAMP
DIV. OF THE STATE ARCHITECT
APP: 02-122132 INC: A
REVIEWED FOR
SS ☑ FLS ☑ ACS ☑
DATE: 08/06/2024

LICENSED ARCHITECT
MICHAEL J. SCOTT JR.
No. C-34290
REN: 08-31-25
STATE OF CALIFORNIA
DATE: JANUARY 31, 2024

NEW TK CLASSROOM AT CHENEY KINDERGARTEN
COALINGA-HURON UNIFIED SCHOOL DISTRICT
COALINGA, FRESNO COUNTY, CA

REVISIONS

MANGINI | ARCHITECTURE ENGINEERING
MANGINI ASSOCIATES INC.
4320 West Mineral King Avenue
Visalia, California 93291
www.mangini.us
(559) 627-0530 Office
(559) 627-1926 Fax

TITLE
T-24 DOCUMENTS

M5.3

PROJECT 23044

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FIXTURE SCHEDULE

FIXTURE SYMBOL (3-A-39): 3 = CIRCUIT NUMBER, A = FIXTURE TYPE, 39 = FIXTURE WATTAGE

TYPE	WATTS	LAMPS	VOLT	MANUFACTURER	CATALOG NO.	MOUNT	NOTES
A	39	L.E.D.	120-277V	LITHONIA	2BLT4-48L-ADP-MVOLT-WZ1-LP840-N100	FLUSH T-BAR	PER #1/E3.2
AE	39	L.E.D.		LITHONIA	2BLT4-48L-ADP-MVOLT-WZ1-LP840-N100-E10WLP	FLUSH T-BAR	PER #1/E3.2 (1)
B	35	L.E.D.		LITHONIA	5TL4-40L-DSO-LP840-N100	SURFACE	PER #2/E3.2
BE	35	L.E.D.		LITHONIA	5TL4-40L-DSO-LP840-N100-E14L	SURFACE	PER #2/E3.2 (1)
C	30	L.E.D.		GOTHAM	EVOVR-4O-25-6AR-WD-LSS-MVOLT	RECESS	PER #6/E3.2 EXTERIOR (3)
CE	30	L.E.D.		GOTHAM	EVOVR-4O-25-6AR-WD-LSS-MVOLT-E10WCP	RECESS	PER #6/E3.2 EXTERIOR (2), (3)
D	25	L.E.D.		LITHONIA	WST-LED-P2-40K-VF-MVOLT-DBLXD	WALL	EXTERIOR (4)
DE	25	L.E.D.		LITHONIA	WST-LED-P2-40K-VF-MVOLT-DBLXD-E2OWH	WALL	EXTERIOR (2), (4)
P1	138	L.E.D.		LITHONIA	DSX1-LED-P5-40K-T4LG RPA-MVOLT-PIRH-DNAXD	POLE	PER #7/E3.2 (5)
P2	138	L.E.D.		LITHONIA	DSX1-LED-P5-40K-BLC3 RPA-MVOLT-PIRH-DNAXD	POLE	PER #7/E3.2 (5)
X	2	L.E.D.	120-277V	LITHONIA	LE-S-W-1-R-120/277-ELNSD	SURFACE	SINGLE FACE EXIT SIGN WITH EMERGENCY BATTERY PACK

FIXTURE SCHEDULE NOTES:

(1) LIGHT FIXTURE SHALL BE EQUIPPED WITH AN EMERGENCY BATTERY PACK TO OPERATE THE L.E.D. DRIVER IN THE EMERGENCY MODE FOR A MINIMUM OF 90 MINUTES. PULL UNSWITCHED CIRCUIT TO EMERGENCY BATTERY PACK. REFER TO LIGHTING PLANS FOR EXACT LOCATIONS AND DETAIL PER #4/E3.2 FOR WIRING REQUIREMENTS.

(2) LIGHT FIXTURE SHALL BE EQUIPPED WITH AN EMERGENCY BATTERY PACK TO OPERATE THE L.E.D. DRIVER IN THE EMERGENCY MODE FOR A MINIMUM OF 90 MINUTES. PULL UNSWITCHED CIRCUIT TO EMERGENCY BATTERY PACK. REFER TO LIGHTING PLANS FOR EXACT LOCATIONS AND DETAIL PER #4/E3.2 FOR WIRING REQUIREMENTS.

(3) PROVIDE BAR HANGERS AS REQUIRED.

(4) SEE LIGHTING PLANS FOR MOUNTING HEIGHTS.

(5) SET FIXTURE TO DIM TO 50% AFTER FIRST 15 MINUTES, THEN TO OFF AT 30 MINUTES.

ELECTRICAL SYMBOLS NOTES:

(A) REFER TO FIRE ALARM DEVICES ELEVATION, DETAIL #1/E2.3 FOR RESPECTIVE MOUNTING HEIGHTS.

(B) AT EXTERIOR LOCATIONS, PROVIDE WEATHER-RESISTANT TYPE G.F.C.I. DUPLEX RECEPTACLES, LEVITON #GFWT2-W OR EQUAL. AT DAMP LOCATIONS, PROVIDE A DIECAST WEATHERPROOF LOCKABLE COVER, RACO #5028-0 OR EQUAL. AT WET LOCATIONS, PROVIDE A DIECAST WEATHERPROOF 'WHILE-IN-USE' LOCKABLE COVER, RED DOT #CKSUV OR EQUAL.

(C) "nLIGHT" ENABLED LIGHT FIXTURE PER FIXTURE SCHEDULE ON SHEET #EG1.1.

(D) LIBERTY WIRE CABLE, INC #18-2C-LVB OR EQUAL.

(E) ACUITY CONTROLS #CAT 5e * J1 OR EQUAL. * ASTERISK INDICATES LENGTH OF CABLE. CABLES ARE AVAILABLE IN 6", 1', 2', 5', 10', 15', 30', AND 50' LENGTHS.

(F) ACUITY CONTROLS #nOM-PDT-10-ADCX-RJB OR EQUAL.

(G) ACUITY CONTROLS #nPODMA-DX-WH OR EQUAL. PROVIDE A DECORATOR STYLE STAINLESS STEEL WALLPLATE.

(H) ACUITY CONTROLS #nOM-PDT-10-RJB OR EQUAL.

(J) ACUITY CONTROLS #nWSXA-PDT-LV-WH OR EQUAL. PROVIDE A DECORATOR STYLE STAINLESS STEEL WALLPLATE.

(K) ACUITY CONTROLS #WSD-PDT-WH OR EQUAL. PROVIDE A DECORATOR STYLE STAINLESS STEEL WALLPLATE.

(L) ACUITY CONTROLS #nPODMA-2P-DX-WH OR EQUAL. PROVIDE A DECORATOR STYLE STAINLESS STEEL WALLPLATE.

(M) ACUITY CONTROLS #nPODMA-4P-DX-WH OR EQUAL. PROVIDE A DECORATOR STYLE STAINLESS STEEL WALLPLATE.

ELECTRICAL SYMBOLS
ALL DIMENSIONS TO CENTER OF BOX, U.O.N.

3-	CIRCUIT NUMBER (3-A-39)
-A-	FIXTURE TYPE (3-A-39)
-39	FIXTURE WATTAGE (3-A-39)
	HOME RUN 3/4"C - MIN. (PANEL A, CIRCUIT #3)
	CONDUIT RUN IN WALL OR ATTIC (1/2"C - 2 #12 AWG THWN + 1 #12 GND)
	CONDUIT RUN IN FLOOR OR UG (1/2"C - 2 #12 AWG THWN + 1 #12 GND)
	ANY CONDUIT RUN - 1/2"C - 3 #12 AWG THWN + 1 #12 GND
	" " - 3/4"C - 4 #12 AWG THWN + 1 #12 GND
	" " - 3/4"C - 5 #12 AWG THWN + 1 #12 GND
	" " - 1"C - 6 #12 AWG THWN + 1 #12 GND
	CONDUIT STUB - CAPPED AND LABELED.
1	ELECTRICAL KEYNOTE #1, REFER TO NOTES ON SAME SHEET.
U.O.N.	UNLESS OTHERWISE NOTED
W.P.	WEATHERPROOF
PDZ	DENOTES BOUNDARY OF PRIMARY DAYLIT ZONE.
SDZ	DENOTES BOUNDARY OF SECONDARY DAYLIT ZONE.
	TERMINAL CABINET (SIZE AS SHOWN)
	ELECTRICAL PANELBOARD
	TAMPER-RESISTANT SINGLE 20A RECEPTACLE IN WALL (+15" MIN. TO BOTTOM OF BOX)
	TAMPER-RESISTANT DUPLEX RECEPTACLE IN WALL (+15" MIN. TO BOTTOM OF BOX)
	TAMPER-RESISTANT DUPLEX RECEPTACLE IN FLUSH FLOOR BOX
	TAMPER-RESISTANT QUADRUPLEX RECEPTACLE IN FLUSH FLOOR BOX
	TAMPER-RESISTANT SPECIAL OUTLET AS NOTED ON DWGS. (+15" MIN. TO BOTTOM OF BOX)
	TAMPER-RESISTANT QUADRUPLEX RECEPTACLE IN WALL (+15" MIN. TO BOTTOM OF BOX)
(B)	TAMPER-RESISTANT G.F.C.I. DUPLEX RECEPTACLE IN WALL (+15" MIN. TO BOTTOM OF BOX)
	EXIT LIGHT, WALL MOUNTED
	EXIT LIGHT, CEILING MOUNTED
	RECESSED MOUNTED LIGHT FIXTURE IN CEILING
	LIGHT FIXTURE
(E)	--C5-- NETWORK CABLE - CATEGORY 5e CABLE, LENGTH AS REQUIRED
(D)	--DC-- 0-10V DIMMING CONTROL CABLE, LENGTH AS REQUIRED
(C)	LIGHT FIXTURE WITH 'nLIGHT' EMBEDDED CONTROLS
	EM RECESSED MOUNTED LIGHT FIXTURE EQUIPPED WITH EMERGENCY BATTERY PACK
	EM LIGHT FIXTURE EQUIPPED WITH EMERGENCY BATTERY PACK.
	SINGLE HEAD AREA LIGHT
	TWIN HEAD AREA LIGHT
	$ LIGHT SWITCH (+4'-0" MAX. TO TOP OF BOX, U.O.N.)
(F)	360° OCCUPANCY SENSOR (DUAL TECHNOLOGY) WITH AUTOMATIC DIMMING CONTROL PHOTOCELL, CEILING MOUNTED
(G)	D ON/OFF SWITCH WITH RAISE/LOWER DIMMING CONTROL (+4'-0" MAX. TO TOP OF BOX, U.O.N.)
(H)	OS 360° OCCUPANCY SENSOR (DUAL TECHNOLOGY), CEILING MOUNTED
(J)	OS OCCUPANCY SENSOR WALL SWITCH, LOW VOLTAGE (+4'-0" MAX. TO TOP OF BOX, U.O.N.)
(K)	S OCCUPANCY SENSOR WALL SWITCH, LINE VOLTAGE (+4'-0" MAX. TO TOP OF BOX, U.O.N.)
(L)	D2 ON/OFF SWITCH WITH RAISE/LOWER DIMMING CONTROL (TWO CHANNELS) (+4'-0" MAX. TO TOP OF BOX, U.O.N.)
(M)	D4 ON/OFF SWITCH WITH RAISE/LOWER DIMMING CONTROL (FOUR CHANNELS) (+4'-0" MAX. TO TOP OF BOX, U.O.N.)
	J JUNCTION BOX EQUIPPED WITH BLANK COVER
	J JUNCTION BOX EQUIPPED WITH BLANK COVER AND FLEX CONNECTION
	COMBINATION HEAVY-DUTY FUSED SAFETY SWITCH/MAGNETIC STARTER
	MOTOR
	HEAVY-DUTY FUSED SAFETY SWITCH
	SD ADDRESSABLE SMOKE DETECTOR MOUNTED ON CEILING
	HD HEAT DETECTOR MOUNTED IN ATTIC
	RM ADDRESSABLE RELAY MODULE
	SCM ADDRESSABLE SIGNAL CONTROL MODULE
(A)	V 15 FIRE ALARM VISUAL STROBE, 15 CANDELA, CEILING MOUNTED
(A)	SV 15 FIRE ALARM SPEAKER/15 CANDELA VISUAL STROBE (CEILING MOUNTED)
(A)	SV 75 FIRE ALARM SPEAKER/75 CANDELA VISUAL STROBE (CEILING MOUNTED)
	V 15 FIRE ALARM VISUAL STROBE, 15 CANDELA, WALL MOUNTED
	V 30 FIRE ALARM VISUAL STROBE, 30 CANDELA, WALL MOUNTED
(A)	SP W.P. FIRE ALARM EXTERIOR SPEAKER IN WALL. SEE FIRE ALARM PLANS FOR MOUNTING HEIGHT(S).

MINIMUM BATTERY STORAGE RATED ENERGY CAPACITY

PER BUILDING ENERGY EFFICIENCY STANDARDS
EQUATION 140.10-B
kWh(batt) = kW (PVdc) x B / (D ^ 0.5)

kW (PVdc) = 7.47 kW
B = 1.87 (PER TABLE 140.10-B)
D = 0.965 (PER EG4 ELECTRONICS 15kWh BATTERY)

kWh (batt) = 14.2
MORE THAN 10 kWh

DIVISION OF THE STATE ARCHITECT APPLICABLE CODES AND STANDARDS

CODES:

2022 CALIFORNIA ADMINISTRATIVE CODE, PART 1, TITLE 24 C.C.R.

2022 CALIFORNIA BUILDING CODE (C.B.C.), PART 2, TITLE 24 C.C.R. (2021 INTERNATIONAL BUILDING CODE, VOLUMES 1 AND 2 WITH 2022 CALIFORNIA AMENDMENTS)

2022 CALIFORNIA ELECTRICAL CODE (C.E.C.), PART 3, TITLE 24 C.C.R. (2020 NFPA 70 NATIONAL ELECTRICAL CODE WITH 2022 CALIFORNIA AMENDMENTS)

2022 CALIFORNIA MECHANICAL CODE (C.M.C.), PART 4, TITLE 24 C.C.R. (2021 UNIFORM MECHANICAL CODE WITH 2022 CALIFORNIA AMENDMENTS)

2022 CALIFORNIA PLUMBING CODE (C.P.C.), PART 5, TITLE 24 C.C.R. (2021 UNIFORM PLUMBING CODE WITH 2022 CALIFORNIA AMENDMENTS)

2022 CALIFORNIA ENERGY CODE (CEnC), PART 6, TITLE 24 C.C.R.

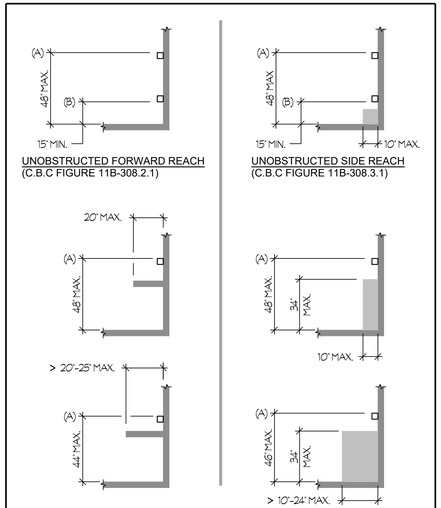
2022 CALIFORNIA FIRE CODE (C.F.C.), PART 9, TITLE 24 C.C.R. (2021 INTERNATIONAL FIRE CODE WITH 2022 CALIFORNIA AMENDMENTS)

2022 CALIFORNIA REFERENCED STANDARDS CODE (C.R.S.C.), PART 12, TITLE 24 C.C.R.

TITLE 19, C.C.R. PUBLIC SAFETY, STATE FIRE MARSHAL REGULATIONS.

STANDARDS AND GUIDES:

NFPA 72	NATIONAL FIRE ALARM CODE, 2022 EDITION (CALIFORNIA AMENDED)
ADAAG	AMERICANS WITH DISABILITIES ACT, ACCESSIBILITY GUIDELINES
UL 38	MANUAL ACTUATED SIGNALING BOXES, 2005 EDITION
UL 268	SMOKE DETECTORS FOR FIRE PROTECTIVE SIGNALING SYSTEMS, 2016 EDITION
UL 268A	SMOKE DETECTORS FOR DUCT APPLICATIONS, 2016 EDITION
UL 464	AUDIBLE SIGNAL APPLIANCES, 2003 EDITION
UL 521	HEAT DETECTORS FOR FIRE PROTECTIVE SIGNALING SYSTEMS, 1999 EDITION (WITH REVISIONS THROUGH JULY 2005)
UL 864	CONTROL UNITS FOR FIRE PROTECTIVE SIGNALING SYSTEMS, 2014 EDITION



(A) TOP OF OUTLET BOX FOR RECEPTACLES, SWITCHES AND CONTROLS.

(B) BOTTOM OF OUTLET BOX FOR RECEPTACLES, SWITCHES AND CONTROLS.

1 ELECTRICAL RECEPTACLE, SWITCH AND CONTROL HEIGHTS

NTS

TITLE 24, PART 6

THE CALIFORNIA ENERGY EFFICIENCY STANDARDS FOR NONRESIDENTIAL BUILDINGS HAS BEEN REVIEWED AND THE BUILDING DESIGN DESCRIBED ON THESE PAGES IS IN SUBSTANTIAL CONFORMANCE.

CODE, RULES AND REGULATIONS

ALL WORK AND MATERIALS SHALL COMPLY WITH THE LATEST REGULATIONS OF THE STATE FIRE MARSHAL, CALIFORNIA CODE OF REGULATIONS, SERVING UTILITY COMPANIES AND OTHER APPLICABLE STATE ORDINANCES. NOTHING IN THESE PLANS OR SPECIFICATIONS IS TO BE CONSTRUED AS TO PERMIT WORK NOT CONFORMING TO THESE CODES. WHERE WORK OF A HIGHER DEGREE IS INDICATED IN THE PLANS OR SPECIFICATIONS THIS REQUIREMENT SHALL GOVERN.

SEISMIC ANCHORAGE REQUIREMENTS

MECHANICAL, ELECTRICAL AND PLUMBING ANCHORAGE NOTE

ALL MECHANICAL, PLUMBING AND ELECTRICAL COMPONENTS SHALL BE ANCHORED AND INSTALLED PER THE DETAILS ON THE DSA APPROVED CONSTRUCTION DOCUMENTS. THE FOLLOWING COMPONENTS SHALL BE ANCHORED OR BRACED TO MEET THE FORCE AND DISPLACEMENT REQUIREMENTS PRESCRIBED IN THE 2022 CBC, SECTIONS 1617A.1.18 THROUGH 1617A.1.26 AND ASCE 7-16 CHAPTERS 13, 26 AND 30.

1. ALL PERMANENT EQUIPMENT AND COMPONENTS.
2. TEMPORARY, MOVABLE OR MOBILE EQUIPMENT THAT IS PERMANENTLY ATTACHED (e.g. HARD WIRED) TO THE BUILDING UTILITY SERVICES SUCH AS ELECTRICITY, GAS OR WATER. "PERMANENTLY ATTACHED" SHALL INCLUDE ALL ELECTRICAL CONNECTIONS EXCEPT PLUGS FOR 110/220 VOLT RECEPTACLES HAVING A FLEXIBLE CABLE.
3. TEMPORARY, MOVABLE OR MOBILE EQUIPMENT WHICH IS HEAVIER THAN 400 POUNDS OR HAS A CENTER OF MASS LOCATED 4 FEET OR MORE ABOVE THE ADJACENT FLOOR OR ROOF LEVEL, THAT DIRECTLY SUPPORT THE COMPONENT IS REQUIRED TO BE RESTRAINED IN A MANNER APPROVED BY DSA.

THE FOLLOWING MECHANICAL AND ELECTRICAL COMPONENTS SHALL BE POSITIVELY ATTACHED TO THE STRUCTURE BUT NEED NOT DEMONSTRATE DESIGN COMPLIANCE WITH THE REFERENCES NOTED ABOVE. THESE COMPONENTS SHALL HAVE FLEXIBLE CONNECTIONS PROVIDED BETWEEN THE COMPONENT AND ASSOCIATED DUCTWORK, PIPING AND CONDUIT. FLEXIBLE CONNECTIONS MUST ALLOW MOVEMENT IN BOTH TRANSVERSE AND LONGITUDINAL DIRECTIONS:

A. COMPONENTS WEIGHING LESS THAN 400 POUNDS AND HAVE A CENTER OF MASS LOCATED 4 FEET OR LESS ABOVE THE ADJACENT FLOOR OR ROOF LEVEL THAT DIRECTLY SUPPORT THE COMPONENT.

B. COMPONENTS WEIGHING LESS THAN 20 POUNDS, OR IN THE CASE OF DISTRIBUTED SYSTEMS, LESS THAN 5 POUNDS PER FOOT, WHICH ARE SUSPENDED FROM A ROOF OR FLOOR OR HUNG FROM A WALL.

THE ANCHORAGE OF ALL MECHANICAL, ELECTRICAL AND PLUMBING COMPONENTS SHALL BE SUBJECT TO THE APPROVAL OF THE DESIGN PROFESSIONAL IN GENERAL RESPONSIBLE CHARGE OR STRUCTURAL ENGINEER DELEGATED RESPONSIBILITY AND ACCEPTANCE BY DSA. THE PROJECT INSPECTOR WILL VERIFY THAT ALL COMPONENTS AND EQUIPMENT HAVE BEEN ANCHORED IN ACCORDANCE WITH THE ABOVE REQUIREMENTS.

PIPING, DUCTWORK, AND ELECTRICAL DISTRIBUTION SYSTEM BRACING NOTE

PIPING, DUCTWORK, AND ELECTRICAL DISTRIBUTION SYSTEMS SHALL BE BRACED TO COMPLY WITH THE FORCES AND DISPLACEMENTS PRESCRIBED IN ASCE 7-16 SECTION 13.3 AS DEFINED IN ASCE 7-16 SECTIONS 13.6.5, 13.6.6, 13.6.7, 13.6.8 AND 2022 CBC, SECTIONS 1617A.1.24, 1617A.1.25, AND 1617A.1.26.

THE METHOD OF SHOWING BRACING AND ATTACHMENTS TO THE STRUCTURE FOR THE IDENTIFIED DISTRIBUTION SYSTEM ARE AS NOTED BELOW. WHEN BRACING AND ATTACHMENTS ARE BASED ON A PREAPPROVED INSTALLATION GUIDE (e.g., HCAI OPM FOR 2013 CBC OR LATER), COPIES OF THE BRACING SYSTEM INSTALLATION GUIDE OR MANUAL SHALL BE AVAILABLE ON THE JOBSITE PRIOR TO THE START OF AND DURING THE HANGING AND BRACING OF THE DISTRIBUTION SYSTEMS. THE STRUCTURAL ENGINEER OF RECORD SHALL VERIFY THE ADEQUACY OF THE STRUCTURE TO SUPPORT THE HANGER AND BRACE LOADS.

MECHANICAL PIPING (MP), MECHANICAL DUCTS (MD), PLUMBING PIPING (PP), ELECTRICAL DISTRIBUTION SYSTEMS (E):

MP☐ MD☐ PP☐ E☑ - OPTION 1: DETAILED ON THE APPROVED DRAWINGS WITH PROJECT SPECIFIC NOTES AND DETAILS.

MP☐ MD☐ PP☐ E☐ - OPTION 2: SHALL COMPLY WITH HCAI PRE-APPROVAL

COMPLETE AUTOMATIC FIRE ALARM SYSTEM PLAN SUBMITTAL

THE FIRE ALARM SYSTEM SHOWN ON THESE PLANS HAS BEEN SUBMITTED AND APPROVED BY THE DIVISION OF THE STATE ARCHITECT. ANY SUBSTITUTION OF THE FIRE ALARM SYSTEM SHALL BE RESUBMITTED TO THE ARCHITECT FOR REVIEW AND APPROVAL. THE CONTRACTOR SHALL PAY ANY ADDITIONAL FEES THAT ARE INCURRED DUE TO THIS SUBSTITUTION.

THE FIRE ALARM SYSTEM SHALL BE A TOTAL (COMPLETE) AUTOMATIC HEAT AND SMOKE DETECTION SYSTEM, PER C.F.C. SECTION 907.2.3.6, AND SHALL COVER EVERY ROOM AND/OR AREA. UPON THE ACTIVATION OF ANY INITIATION DEVICE THE FIRE ALARM SYSTEM SHALL ALERT ALL OCCUPANTS AND TRANSMIT THE ALARM, SUPERVISORY, AND TROUBLE SIGNALS TO AN APPROVED SUPERVISING STATION (C.F.C. SECTION 907.2.3.5).

APPROVALS
FILE # 10-28 APPLICATION # 02-122132

IDENTIFICATION STAMP
DIV. OF THE STATE ARCHITECT
APP: 02-122132 INC:
REVIEWED FOR
SS ☑ FLS ☑ ACS ☑
DATE: 08/06/2024

LICENSED ARCHITECT
MICHAEL J. SCOTT JR
No. C-34296
REN: 08-31-25
STATE OF CALIFORNIA

DATE: JANUARY 31, 2024

NEW TK CLASSROOM AT CHENEY KINDERGARTEN
COALINGA-HURON UNIFIED SCHOOL DISTRICT
COALINGA, FRESNO COUNTY, CA

REVISIONS

MANGINI ARCHITECTURE INGENUITY
MANGINI ASSOCIATES INC.
4320 West Mineral King Avenue
Visalia, California 93291
www.mangini.us
(559) 627.7530 Office
(559) 627.1926 Fax

TITLE
ELEC CODES, NOTES SYMBOLS AND FIXTURE SCHEDULE

EG1.1

PROJECT 23044

Rose Sing Eastham & Associates
Electrical Consultants
131 S. Dunworth - (559)733-2671
Visalia, California 93292-6705

REGISTERED PROFESSIONAL ENGINEER
ROSEANN KIRK SING EASTHAM
No. E-18766
Exp. 6/30/25
ELECTRICAL
STATE OF CALIFORNIA

Z:\Drafting\Jobs\RSES\23-044\CLS\Coalinga-Huron USD\Cheney Kindergarten\EG1.1.dwg DATE SAVED: 08/07/24 BY: Casey DATE PLOTTED: 08/07/24 JOB # 23-123-JJ

APPROVALS

FILE # 10-28 | APPLICATION # 02-122132

IDENTIFICATION STAMP
DIV. OF THE STATE ARCHITECT
APP: 02-122132 INC: A
REVIEWED FOR
SS ☑ FLS ☑ ACS ☑
DATE: 08/06/2024

LICENSED ARCHITECT
MICHAEL J. SCOTT JR
No. C-31296
REN: 08-31-25
STATE OF CALIFORNIA

DATE: JANUARY 31, 2024

STATE OF CALIFORNIA
Indoor Lighting
CALIFORNIA ENERGY COMMISSION

CERTIFICATE OF COMPLIANCE — **NRCC-LTI-E**

This document is used to demonstrate compliance with requirements in 110.9, 110.12(c), 130.0, 130.1, 140.6 and 141.0(b)2 for indoor lighting scopes using the prescriptive path for nonresidential and hotel/motel occupancies. It is also used to document compliance with requirements in 160.5, 170.2(e) and 180.2(b)4 for indoor lighting scopes using the prescriptive path for multifamily occupancies. Multifamily includes dormitory and senior living facilities.

Project Name: CHENEY ELEMENTARY SCHOOL TK CLASSROOM	**Report Page:** (Page 1 of 7)
Project Address: 149 W ADAMS ST	**Date Prepared:** 2024-01-23T11:41:28-05:00

A. GENERAL INFORMATION

01	Project Location (city)	COALINGA	04	Total Conditioned Floor Area (ft²)	4,515
02	Climate Zone	13	05	Total Unconditioned Floor Area (ft²)	0
03	Occupancy Types Within Project (select all that apply):		06	# of Stories (Habitable Above Grade)	1

● Classroom ● School or Classroom

B. PROJECT SCOPE

This table includes any lighting systems that are within the scope of the permit application and are demonstrating compliance using the prescriptive path outlined in 140.6 / 170.2(e) or 141.0(b)2 / 180.2(b)4 for alterations.

Scope of Work	Conditioned Spaces		Unconditioned Spaces	
01	02	03	04	05
My Project Consists of (check all that apply):	Calculation Method	Area (ft²)	Calculation Method	Area (ft²)
☒ New Lighting System	Complete Building Method	4515	N/A	0
☐ New Lighting System - Parking Garage	N/A	0	N/A	0
Total Area of Work (ft²)	4515			

STATE OF CALIFORNIA
Indoor Lighting
CALIFORNIA ENERGY COMMISSION

CERTIFICATE OF COMPLIANCE — **NRCC-LTI-E**

Project Name: CHENEY ELEMENTARY SCHOOL TK CLASSROOM | **Report Page:** (Page 2 of 7)
Date Prepared: 2024-01-23T11:41:28-05:00

C. COMPLIANCE RESULTS

If any cell on this table says "DOES NOT COMPLY" or "COMPLIES with Exceptional Conditions" refer to Table D. for guidance.

Lighting in conditioned and unconditioned spaces must not be combined for compliance per 140.6(b)1 / 170.2(e)	Allowed Lighting Power per 140.6(b) / 170.2(e) (Watts)						Adjusted Lighting Power per 140.6(a) / 170.2(e) (Watts)				Compliance Results
	01	02	03	04	05		06	07		08	09
	Complete Building 140.6(c)1	Area Category 140.6(c)2 / 170.2(e)4	Area Category Additional 140.6(c)2G / 170.2(e)4Av (+)	Tailored 140.6(c)3 / 170.2(e)4B (+)	Total Allowed (Watts)		Total Designed (Watts)	Adjustments PAF Lighting Control Credits 140.6(a)2 / 170.2(e)1B (-)		Total Adjusted (Watts) *Includes Adjustments	05 must be >= 08 140.6 / 170.2(e)
	(See Table I)	(See Table I)	(See Table J)	(See Table K)			(See Table F)	(See Table P)			
Conditioned	2,709				= 2,709	≥	2,432		=	2432	COMPLIES
Unconditioned					=	≥			=		
Controls Compliance (See Table H for Details)											COMPLIES
Rated Power Reduction Compliance (See Table Q for Details)											

D. EXCEPTIONAL CONDITIONS

This table is auto-filled with uneditable comments because of selections made or data entered in tables throughout the form.

E. ADDITIONAL REMARKS

This table includes remarks made by the permit applicant to the Authority Having Jurisdiction.

STATE OF CALIFORNIA
Indoor Lighting
CALIFORNIA ENERGY COMMISSION

CERTIFICATE OF COMPLIANCE — **NRCC-LTI-E**

Project Name: CHENEY ELEMENTARY SCHOOL TK CLASSROOM | **Report Page:** (Page 3 of 7)
Date Prepared: 2024-01-23T11:41:28-05:00

F. INDOOR LIGHTING FIXTURE SCHEDULE

This table includes all planned permanent and portable lighting other than dwelling unit/ hotel/ motel room lighting. Multifamily dwelling unit and hotel/motel room lighting is documented in Table T. If using Table T to document lighting in multifamily common use areas providing shared provisions for living, eating, cooking or sanitation, those luminaires are not included here.

Designed Wattage: Conditioned Spaces

01	02	03	04	05	06	07	08	09	10	
Name or Item Tag	Complete Luminaire Description	Modular (Track) Fixture	Small Aperture & Color Change[1]	Watts per luminaire[2]	How is Wattage determined	Total Number of Luminaires	Excluded per 140.6(a)3 / 170.2(e)2C	Design Watts	Field Inspector Pass	Field Inspector Fail
A, AE	2' x 4' L.E.D. GRID TROFFER	No	NA	39	Mfr. Spec	48	No	1,872	☐	☐
B, BE	1' x 4' SURFACE L.E.D.	No	NA	35	Mfr. Spec	16	No	560	☐	☐
					Total Designed Watts: CONDITIONED SPACES			2,432		

[1] *FOOTNOTE: Design Watts for small aperture and color changing luminaires which qualify per 140.6(a)4B / 170.2(e)2D is adjusted to be 75% /80% of their rated wattage. Table F automatically makes this adjustment, the permit applicant should enter full rated wattage in column 05.*

[2] *Authority Having Jurisdiction may ask for Luminaire cut sheets to confirm wattage used for compliance per 130.0(c) / 160.5(b). Wattage used must be the maximum rated for the luminaire, not the lamp.*

G. MODULAR LIGHTING SYSTEMS

This section does not apply to this project.

H. INDOOR LIGHTING CONTROLS (Not including PAFs)

This table includes lighting controls for conditioned and unconditioned spaces.

Building Level Controls

01	02	03	
		Field Inspector	
Mandatory Demand Response 110.12(c)	Shut-off controls 130.1(c) / 160.5(b)4C	Pass	Fail
NA < 4,000W subject to multilevel	See Area/Space Level Controls	☐	☐

STATE OF CALIFORNIA
Indoor Lighting
CALIFORNIA ENERGY COMMISSION

CERTIFICATE OF COMPLIANCE — **NRCC-LTI-E**

Project Name: CHENEY ELEMENTARY SCHOOL TK CLASSROOM | **Report Page:** (Page 4 of 7)
Date Prepared: 2024-01-23T11:41:28-05:00

H. INDOOR LIGHTING CONTROLS (Not including PAFs)

Area Level Controls

04	05	06	07	08	09	10	11	12	
Area Description	Complete Building or Area Category Primary Function Area	Manual Area Controls 130.1(a) / 160.5(b)4A	Multi-Level Controls 130.1(b) / 160.5(b)4B	Shut-Off Controls 130.1(c) // 160.5(b)4C	Primary/Skylit Daylighting 130.1(d) / 160.5(b)4D	Secondary Daylighting 130.1(d) / 160.5(b)4D	Interlocked Systems 140.6(a)1/ 170.2(e)2A	Field Inspector Pass	Field Inspector Fail
CLASSROOM BUILDING	School or Classroom	Readily Accessible	Dimmer	Occupancy Sensor	Included	Included	No	☐	☐
							13		
							Plan Sheet Showing Daylit Zones:		
							E1.1		

I. LIGHTING POWER ALLOWANCE: COMPLETE BUILDING OR AREA CATEGORY METHODS

Each area complying using the Complete Building or Area Category Methods per 140.6(b) are included in this table. Column 06 indicates if additional lighting power allowances per 140.6(c) or adjustments per 140.6(a) are being used .

Conditioned Spaces

01	02	03	04	05	06	
Area Description	Complete Building or Area Category Primary Function Area	Allowed Density (W/ft²)	Area (ft²)	Allowed Wattage (Watts)	Additional Allowance / Adjustment Area Category	PAF
CLASSROOM BUILDING	School or Classroom	0.6	4,515	2,709	No	No
	TOTALS:		4,515	2,709	See Tables J, or P for detail	

J. ADDITIONAL ALLOWANCE: AREA CATEGORY METHOD QUALIFYING LIGHTING SYSTEM

This section does not apply to this project.

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CERTIFICATE OF COMPLIANCE — **NRCC-LTI-E**

Project Name: CHENEY ELEMENTARY SCHOOL TK CLASSROOM | **Report Page:** (Page 5 of 7)
Date Prepared: 2024-01-23T11:41:28-05:00

K. TAILORED METHOD GENERAL LIGHTING POWER ALLOWANCE

This section does not apply to this project.

L. ADDITIONAL LIGHTING ALLOWANCE: TAILORED WALL DISPLAY

This section does not apply to this project.

M. ADDITIONAL LIGHTING ALLOWANCE: TAILORED FLOOR AND TASK LIGHTING

This section does not apply to this project.

N. ADDITIONAL LIGHTING ALLOWANCE: TAILORED DECORATIVE /SPECIAL EFFECTS

This section does not apply to this project.

O. ADDITIONAL LIGHTING ALLOWANCE: TAILORED VERY VALUABLE MERCHANDISE

This section does not apply to this project.

P. POWER ADJUSTMENT: LIGHTING CONTROL CREDIT (POWER ADJUSTMENT FACTOR (PAF))

This section does not apply to this project.

Q. RATED POWER REDUCTION COMPLIANCE FOR ONE-FOR-ONE ALTERATIONS

This section does not apply to this project.

R. 80% LIGHTING POWER FOR ALL ALTERATIONS - CONTROLS EXCEPTIONS

This section does not apply to this project.

STATE OF CALIFORNIA
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CALIFORNIA ENERGY COMMISSION

CERTIFICATE OF COMPLIANCE — **NRCC-LTI-E**

Project Name: CHENEY ELEMENTARY SCHOOL TK CLASSROOM | **Report Page:** (Page 6 of 7)
Date Prepared: 2024-01-23T11:41:28-05:00

S. DAYLIGHT DESIGN POWER ADJUSTMENT FACTOR (PAF)

This section does not apply to this project.

T. DWELLING UNIT LIGHTING

This section does not apply to this project.

U. DECLARATION OF REQUIRED CERTIFICATES OF INSTALLATION

Selections have been made based on information provided in this document. If any selections have been changed by permit applicant, an explanation should be included in Table E. Additional Remarks. These documents must be provided to the building inspector during construction and can be found online

Form/Title
NRCI-LTI-E - Must be submitted for all buildings

V. DECLARATION OF REQUIRED CERTIFICATES OF ACCEPTANCE

Selections have been made based on information provided in this document. If any selections have been changed by the permit applicant, an explanation should be included in Table E. Additional Remarks. These documents must be provided to the building inspector during construction and any with "-A" in the form name must be completed through an Acceptance Test Technician Certification Provider (ATTCP). For more information visit: http://www.energy.ca.gov/title24/attcp/providers.html

Form/Title	Systems/Spaces To Be Field Verified
NRCA-LTI-02-A - Must be submitted for occupancy sensors and automatic time switch controls.	CLASSROOM BUILDING
NRCA-LTI-03-A - Must be submitted for automatic daylight controls.	CLASSROOM BUILDING

STATE OF CALIFORNIA
Indoor Lighting
CALIFORNIA ENERGY COMMISSION

CERTIFICATE OF COMPLIANCE — **NRCC-LTI-E**

Project Name: CHENEY ELEMENTARY SCHOOL TK CLASSROOM | **Report Page:** (Page 7 of 7)
Project Address: 149 W ADAMS ST | **Date Prepared:** 2024-01-23T11:41:28-05:00

DOCUMENTATION AUTHOR'S DECLARATION STATEMENT

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

Documentation Author Name: Jeff Jackson	Documentation Author Signature:
Company: Rose Sing Eastham & Associates	Signature Date: 24-01-23
Address: 131 S DUNWORTH	CEA/ HERS Certification Identification (if applicable):
City/State/Zip: VISALIA, CA 93292	Phone: 559-733-2671 EXT. 104

RESPONSIBLE PERSON'S DECLARATION STATEMENT

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

1. The information provided on this Certificate of Compliance is true and correct.
2. I am eligible under Division 3 of the Business and Professions Code to accept responsibility for the building design or system design identified on this Certificate of Compliance (responsible designer)
3. The energy features and performance specifications, materials, components, and manufactured devices for the building design or system design identified on this Certificate of Compliance conform to the requirements of Title 24, Part 1 and Part 6 of the California Code of Regulations.
4. 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.
5. I will ensure that a completed signed copy of this Certificate of Compliance shall be made available with the building permit(s) issued for the building, and made available to the enforcement agency for all applicable inspections. I understand that a completed signed copy of this Certificate of Compliance is required to be included with the documentation the builder provides to the building owner at occupancy.

Responsible Designer Name: Steven Eastham	Responsible Designer Signature:
Company: Rose Sing Eastham	Date Signed: 24-01-23
Address: 131 S DUNWORTH	License: E-18786
City/State/Zip: VISALIA, CA 93292	Phone: 559-733-2671 EXT. 101

NEW TK CLASSROOM AT CHENEY KINDERGARTEN

COALINGA-HURON UNIFIED SCHOOL DISTRICT
COALINGA, FRESNO COUNTY, CA

REVISIONS

MANGINI ARCHITECTURE INGENUITY
MANGINI ASSOCIATES INC.
4320 West Mineral King Avenue
Visalia, California 93291
www.mangini.us
(559) 627.0530 Office
(559) 627.1926 Fax

TITLE
INDOOR LIGHTING COMPLIANCE

EG1.2

PROJECT 23044

REGISTERED PROFESSIONAL ENGINEER
STEVEN KIRK EASTHAM
No. E-18786
Exp. 6/30/25
ELECTRICAL
STATE OF CALIFORNIA

Rose Sing Eastham & Associates
Electrical Consultants
131 S. Dunworth – (559)733-2671
Visalia, California 93292-6705

Z:\Drafting\Jobs\PDF\SCHOOLS\Coalinga-Huron USD\Cheney Kindergarten\EG1.2.dwg DATE: SAVED: 01/23/24 BY: Casey DATE PLOTTED: 08/02/24 JOB #: 23-123-JJ

APPROVALS

FILE # 10-28 | APPLICATION # 02-122132

IDENTIFICATION STAMP
DIV. OF THE STATE ARCHITECT
APP: 02-122132 INC: A
REVIEWED FOR
SS ☑ FLS ☑ ACS ☑
DATE: 08/06/2024

LICENSED ARCHITECT
MICHAEL J. SCOTT JR
No. C-31286
REN: 08-31-25
STATE OF CALIFORNIA

DATE: JANUARY 31, 2024

STATE OF CALIFORNIA
Outdoor Lighting
CALIFORNIA ENERGY COMMISSION

CERTIFICATE OF COMPLIANCE — **NRCC-LTO-E**

This document is used to demonstrate compliance with requirements in 110.9, 130.0, 130.2, 140.7, and 141.0(b)2L for outdoor lighting scopes using the prescriptive path for nonresidential and hotel/motel occupancies. It is also used to document compliance with requirements in 160.5, 170.2(e)6, 180.1(a) and 180.2(b)4Bv for outdoor lighting scopes using the prescriptive path for multifamily and mixed-use occupancies. Multifamily includes dormitory and senior living facilities.

Project Name: CHENEY ELEMENTARY SCHOOL TK CLASSROOM | **Report Page:** (Page 1 of 8)
Project Address: 149 W ADAMS ST | **Date Prepared:** 2024-01-24T13:19:09-05:00

A. GENERAL INFORMATION

01	Project Location (city)	COALINGA	04	Total Illuminated Hardscape Area (ft²)	12370
02	Climate Zone	13			
03	Outdoor Lighting Zone per Title 24 Part 1	10.114 or as designated by Authority Having Jurisdiction (AHJ):			

☐ LZ-0: Very Low - Undeveloped Parkland ☐ LZ-2: Moderate - Urban Clusters ☐ LZ-4: High - Must be reviewed by CA Energy Commission for Approval
☐ LZ-1: Low - Rural Areas ☒ LZ-3: Moderately High - Urban Areas

05 Occupancy Types within Project

● Classroom ● School or Classroom

B. PROJECT SCOPE

This table includes outdoor lighting systems that are within the scope of the permit application and are demonstrating compliance using the prescriptive path outlined in 140.7 / 170.2(e)6 or 141.0(b)2L / 180.2(b)4Bv for alterations.

My Project Consists of:

01	02
☒ New Lighting System	Must Comply with Allowances from 140.7 / 170.2(e)6
☐ Altered Lighting System	Is your alteration increasing the connected lighting load (Watts)? ○ Yes ○ No

03	04	05
% of Existing Luminaires Being Altered[1]	Sum Total of Luminaires Being Added or Altered	Calculation Method
☐ < 10% ☐ >= 10% and < 50% ☐ >= 50%		

Please proceed to Table F. Outdoor Lighting Fixture Schedule to define the project's luminaires.

[1] *FOOTNOTES: % of Existing Luminaires Being Altered = (Sum Total of Luminaires Being Added or Altered / Existing Luminaires within the Scope of the Permit Application) x 100.*

STATE OF CALIFORNIA
Outdoor Lighting
CALIFORNIA ENERGY COMMISSION
CERTIFICATE OF COMPLIANCE — **NRCC-LTO-E**
Project Name: CHENEY ELEMENTARY SCHOOL TK CLASSROOM | **Report Page:** (Page 2 of 8)
Date Prepared: 2024-01-24T13:19:09-05:00

C. COMPLIANCE RESULTS

Results in this table are automatically calculated from data input and calculations in Tables F through N. Note: If any cell on this table says "COMPLIES with Exceptional Conditions" refer to Table D. Exceptional Conditions for guidance or see applicable Table referenced below.

Calculations of Total Allowed Lighting Power (Watts) 140.7 / 170.2(e)6 or 141.0(b)2L / 180.2(b)4Bv												Compliance Results		
01		02		03		04		05		06		07	08	09
General Hardscape Allowance 140.7(d)1 / 170.2(e)6 (See Table I)	+	Per Application 140.7(d)2 / 170.2(e)6 (See Table J)	+	Sales Frontage 140.7(d)2 (See Table K)	+	Ornamental 140.7(d)2 / 170.2(e)6 (See Table L)	+	Per Specific Area 140.7(d)2 / 170.2(e)6 (See Table M)	OR	Existing Power Allowance 141.0(b)2L / 180.2(b)4Bv (See Table N)	=	**Total Allowed** (Watts)	≥	**Total Actual** (Watts)	**07 must be >= 08**
714.17	+	---	+	---	+	---	+	---	OR	---	=	714.17	≥	701	COMPLIES
Shielding Compliance (See Table G for Details)															COMPLIES
Controls Compliance (See Table H for Details)															COMPLIES

D. EXCEPTIONAL CONDITIONS

This table is auto-filled with uneditable comments because of selections made or data entered in tables throughout the form.

E. ADDITIONAL REMARKS

This table includes remarks made by the permit applicant to the Authority Having Jurisdiction.

Generated Date/Time: | Documentation Software: Energy Code Ace
CA Building Energy Efficiency Standards - 2022 Nonresidential Compliance | Report Version: 2022.0.000 | Schema Version: rev 20220101 | Compliance ID: 148313-0124-0006 | Report Generated: 2024-01-24 10:19:12

STATE OF CALIFORNIA
Outdoor Lighting
CALIFORNIA ENERGY COMMISSION
CERTIFICATE OF COMPLIANCE — **NRCC-LTO-E**
Project Name: CHENEY ELEMENTARY SCHOOL TK CLASSROOM | **Report Page:** (Page 3 of 8)
Date Prepared: 2024-01-24T13:19:09-05:00

F. OUTDOOR LIGHTING FIXTURE SCHEDULE

For new or altered lighting systems demonstrating compliance with 140.7 / 170.2(e)6 all new luminaires being installed and any existing luminaires remaining or being moved within the spaces covered by the permit application are included in the Table below. For altered lighting systems using the Existing Power method per 141.0(b)2L only new luminaires being installed and replacement luminaires being installed as part of the project scope are included (ie, existing luminaires remaining or existing luminaires being moved are not included). Outdoor lighting attached to multifamily buildings and controlled from the inside of a dwelling unit are included in Table H. and are not included here. All other multifamily outdoor lighting is included here.

Designed Wattage:

01	02		03	04	05	06	07	08	09	10	
Name or Item Tag	Complete Luminaire Description		Watts per luminaire[1, 2]	How is Wattage determined	Total Number Luminaires [2]	Luminaire Status[3]	Excluded per 140.7(a) / 170.2(e)6A	Design Watts	Cutoff Req. > 6,200 initial lumen output 130.2(b) / 160.5(c)1[4]	Field Inspector	
										Pass	Fail
C, CE	RECESSED L.E.D. DOWNLIGHT	☐ Linear	25	Mfr. Spec	15	New	☐	375	NA: < 6200 lumens	☐	☐
D, DE	L.E.D. WALL WASH	☐ Linear	25	Mfr. Spec	2	New	☐	50	NA: < 6200 lumens	☐	☐
P1	L.E.D. POLE LIGHT	☐ Linear	138	Mfr. Spec	1	New	☐	138	Provided	☐	☐
P2	L.E.D. POLE LIGHT	☐ Linear	138	Mfr. Spec	1	New	☐	138	Provided	☐	☐
							Total Design Watts:	701			

* NOTES: Selections with a * require a note in the space below explaining how compliance is achieved.
EX: Luminaire is lighting a statue; EXCEPTION 2 to 130.2(b)

[1] *FOOTNOTES: Authority Having Jurisdiction may ask for Luminaire cut sheets to confirm wattage used for compliance per 130.0(c) / 160.5(b)*
[2] *For linear luminaires, wattage should be indicated as W/lf instead of Watts/luminaire. Total linear feet should be indicated in column 05 instead of number of luminaires.*
[3] *Select "New" for new luminaires in a new outdoor lighting project, or for added luminaires in an alteration. Select "Altered" for replacement luminaires in an alteration. Select "Existing to Remain" for existing luminaires within the project scope that are not being altered and are remaining. Select "Existing Reinstalled" for existing luminaires which are being removed and reinstalled as part of the project scope.*
[4] *Compliance with mandatory shielding requirements is required for luminaires with initial lumen output >= 6,200 unless exempted by 130.2(b)/ 160.5(c)*

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CA Building Energy Efficiency Standards - 2022 Nonresidential Compliance | Report Version: 2022.0.000 | Schema Version: rev 20220101 | Compliance ID: 148313-0124-0006 | Report Generated: 2024-01-24 10:19:12

STATE OF CALIFORNIA
Outdoor Lighting
CALIFORNIA ENERGY COMMISSION
CERTIFICATE OF COMPLIANCE — **NRCC-LTO-E**
Project Name: CHENEY ELEMENTARY SCHOOL TK CLASSROOM | **Report Page:** (Page 4 of 8)
Date Prepared: 2024-01-24T13:19:09-05:00

G. SHIELDING REQUIREMENTS (BUG)

This table includes fixtures of >=6,200 initial lumens indicated on Table F as needing to comply with Shielding Requirements. Maximum lumens can be found in Title 24, Part 11, Section 5.106.8.

01	02	03	04	05	06	07	08	09	10	11	12	
Name or Item Tag	Complete Luminaire Description	Backlight Rating[1]			Uplight Rating[2]			Glare Rating (Lumens)[2]			Field Inspector	
		Mounting Height[1]	Max Allowable Backlight Rating[3]	Backlight Rating Per Design	Lighting type	Max Allowable Uplight Rating[3]	Uplight Rating Per Design	Mounting Height[1]	Max Allowable Glare Rating[3]	Glare Rating Per Design	Pass	Fail
P1	L.E.D. POLE LIGHT	2 MH from property line	No Limit	B2	Area Lighting	U0	U0	> 2 MH from property line	G3	G2	☐	☐
P2	L.E.D. POLE LIGHT	2 MH from property line	No Limit	B0	Area Lighting	U0	U0	> 2 MH from property line	G3	G3	☐	☐

[1] *FOOTNOTES: Mounting Height is labeled MH in this table.*
[2] *Authority Having Jurisdiction may ask for Luminaire cut sheets or other documentation to confirm luminaire type, uplight ratings and glare ratings used for compliance per 130.2(b)/ 160.5(c)*
[3] *BUG ratings with a lower number than the 'Max Allowable' are compliant. Ex. If Max Allowable is Bug Rating B4, then B0, B1, B2 and B3 are all compliant.*

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CA Building Energy Efficiency Standards - 2022 Nonresidential Compliance | Report Version: 2022.0.000 | Schema Version: rev 20220101 | Compliance ID: 148313-0124-0006 | Report Generated: 2024-01-24 10:19:12

STATE OF CALIFORNIA
Outdoor Lighting
CALIFORNIA ENERGY COMMISSION
CERTIFICATE OF COMPLIANCE — **NRCC-LTO-E**
Project Name: CHENEY ELEMENTARY SCHOOL TK CLASSROOM | **Report Page:** (Page 5 of 8)
Date Prepared: 2024-01-24T13:19:09-05:00

H. OUTDOOR LIGHTING CONTROLS

This table demonstrates compliance with controls requirements for all new or altered luminaires installed as part of the permit application. For alteration projects, luminaires which are existing to remain (ie untouched) and luminaires which are removed and reinstalled (wiring only) do not need to be included in this table even if they are within the spaces covered by the permit application.
Outdoor lighting for nonresidential buildings, parking garages and common service areas in multifamily buildings must be documented separately from outdoor lighting attached to multifamily buildings and controlled from the inside of a dwelling unit

Mandatory Controls for Nonresidential Occupancies, Parking Garages & Common Areas in Multifamily Buildings

01	02	03	04	05	
Area Description	Shut-Off 130.2(c)1 / 160.5(c)	Auto-Schedule 130.2(c)2 / 160.5(c)	Motion Sensor 130.2(c)3 / 160.5(c)	Field Inspector	
				Pass	Fail
WALKWAY: "C, CE"	Astronomical Timer	Provided	NA: Each Luminaire <= 40 Watts	☐	☐
WALKWAY: "D, DE"	Astronomical Timer	Provided	NA: Each Luminaire <= 40 Watts	☐	☐
WALKWAY: "P1"	Astronomical Timer	Provided	Provided	☐	☐
WALKWAY: "P2"	Astronomical Timer	Provided	Provided	☐	☐

[1] *FOOTNOTE: Text has been abbreviated, please refer to Table 160.5-A to confirm compliance with the specific light source technologies listed.*
[2] *Authority having jurisdiction may ask for cutsheets or other documentation to confirm compliance of light source.*
[3] *Recessed luminaires marked for use in fire-rated installations, and recessed luminaires installed in non-insulated ceilings are excepted from ii and iii.*

Generated Date/Time: | Documentation Software: Energy Code Ace
CA Building Energy Efficiency Standards - 2022 Nonresidential Compliance | Report Version: 2022.0.000 | Schema Version: rev 20220101 | Compliance ID: 148313-0124-0006 | Report Generated: 2024-01-24 10:19:12

STATE OF CALIFORNIA
Outdoor Lighting
CALIFORNIA ENERGY COMMISSION
CERTIFICATE OF COMPLIANCE — **NRCC-LTO-E**
Project Name: CHENEY ELEMENTARY SCHOOL TK CLASSROOM | **Report Page:** (Page 6 of 8)
Date Prepared: 2024-01-24T13:19:09-05:00

I. LIGHTING POWER ALLOWANCE (per 140.7 / 170.2(e))

This table includes areas using allowance calculations per 140.7 / 170.2(e). General Hardscape Allowance is per Table 140.7-A/Table 170.2-R while "Use it or lose it" Allowances are per Table 140.7-B /Table 170.2-S. Indicate which allowances are being used to expand sections for user input. Luminaires that qualify for one of the "Use it or lose it" allowances shall not qualify for another "Use it or lose it" allowance.
Outdoor lighting attached to multifamily buildings and controlled from the inside of a dwelling unit are included in Table H. and are not included here. All other multifamily outdoor lighting is included here.

	01				
	"Use it or lose it" Allowance (select all that apply) (select all that apply)				
☒ General Hardscape Allowance Table I (below)	☐ Per Application Table J	☐ Sales Frontage Table K	☐ Ornamental Table L	☐ Per Specific Area Table M	

Calculated General Hardscape Lighting Power Allowance per Table 140.7-A for Nonresidential & Hotel/Motel

02	03	04	05	06	07	08	09
Area Description	Area Wattage Allowance (AWA)			Linear Wattage Allowance (LWA)			Total General AWA + LWA (Watts)
	Illuminated Area (ft²)	Allowed Density (W/ft²)	Area Allowance (Watts)	Perimeter Length (lf)	Allowed Density (W/lf)	Linear Allowance (Watts)	
WALKWAY	12370	0.021	259.77	1022	0.2	204.4	464.17
Initial Wattage Allowance for Entire Site (Watts):							250
Instances of Initial Wattage Allowance (LZ 0 only)[1]							
Total General Hardscape Allowance (Watts):							714.17

J. LIGHTING ALLOWANCE: PER APPLICATION

This section does not apply to this project.

K. LIGHTING ALLOWANCE: SALES FRONTAGE

This section does not apply to this project.

L. LIGHTING ALLOWANCE: ORNAMENTAL

This section does not apply to this project.

Generated Date/Time: | Documentation Software: Energy Code Ace
CA Building Energy Efficiency Standards - 2022 Nonresidential Compliance | Report Version: 2022.0.000 | Schema Version: rev 20220101 | Compliance ID: 148313-0124-0006 | Report Generated: 2024-01-24 10:19:12

STATE OF CALIFORNIA
Outdoor Lighting
CALIFORNIA ENERGY COMMISSION
CERTIFICATE OF COMPLIANCE — **NRCC-LTO-E**
Project Name: CHENEY ELEMENTARY SCHOOL TK CLASSROOM | **Report Page:** (Page 7 of 8)
Date Prepared: 2024-01-24T13:19:09-05:00

M. LIGHTING ALLOWANCE: PER SPECIFIC AREA

This section does not apply to this project.

N. EXISTING CONDITIONS POWER ALLOWANCE (alterations only)

This section does not apply to this project.

O. DECLARATION OF REQUIRED CERTIFICATES OF INSTALLATION

Selections have been made based on information provided in this document. If any selection has been changed by permit applicant, an explanation should be included in Table E. Additional Remarks. These documents must be provided to the building inspector during construction and can be found online

Form/Title
NRCI-LTO-E - Must be submitted for all buildings

P. DECLARATION OF REQUIRED CERTIFICATES OF ACCEPTANCE

Selections have been made based on information provided in this document. If any selection has been changed by permit applicant, an explanation should be included in Table E. Additional Remarks. These documents must be provided to the building inspector during construction and must be completed through an Acceptance Test Technician Certification Provider (ATTCP). For more information visit: http://www.energy.ca.gov/title24/attcp/providers.html

Form/Title	Systems/Spaces To Be Field Verified
NRCA-LTO-02-A - Must be submitted for all outdoor lighting controls except for alterations where controls are added to <= 20 luminaires.	WALKWAY: "C, CE"; WALKWAY: "D, DE"; WALKWAY: "P1"; WALKWAY: "P2"

Generated Date/Time: | Documentation Software: Energy Code Ace
CA Building Energy Efficiency Standards - 2022 Nonresidential Compliance | Report Version: 2022.0.000 | Schema Version: rev 20220101 | Compliance ID: 148313-0124-0006 | Report Generated: 2024-01-24 10:19:12

STATE OF CALIFORNIA
Outdoor Lighting
CALIFORNIA ENERGY COMMISSION
CERTIFICATE OF COMPLIANCE — **NRCC-LTO-E**
Project Name: CHENEY ELEMENTARY SCHOOL TK CLASSROOM | **Report Page:** (Page 8 of 8)
Project Address: 149 W ADAMS ST | **Date Prepared:** 2024-01-24T13:19:09-05:00

DOCUMENTATION AUTHOR'S DECLARATION STATEMENT

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

Documentation Author Name: Jeff Jackson	Documentation Author Signature:
Company: Rose Sing Eastham & Associates	Signature Date: 24-01-23
Address: 131 S DUNWORTH	CEA/ HERS Certification Identification (if applicable):
City/State/Zip: VISALIA, CA 93292	Phone: 559-733-2671 EXT. 101

RESPONSIBLE PERSON'S DECLARATION STATEMENT

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

1. The information provided on this Certificate of Compliance is true and correct.
2. I am eligible under Division 3 of the Business and Professions Code to accept responsibility for the building design or system design identified on this Certificate of Compliance (responsible designer)
3. The energy features and performance specifications, materials, components, and manufactured devices for the building design or system design identified on this Certificate of Compliance conform to the requirements of Title 24, Part 1 and Part 6 of the California Code of Regulations.
4. 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.
5. I will ensure that a completed signed copy of this Certificate of Compliance shall be made available with the building permit(s) issued for the building, and made available to the enforcement agency for all applicable inspections. I understand that a completed signed copy of this Certificate of Compliance is required to be included with the documentation the builder provides to the building owner at occupancy.

Responsible Designer Name: Steven Eastham	Responsible Designer Signature:
Company: Rose Sing Eastham	Date Signed: 24-01-23
Address: 131 S DUNWORTH	License: E-18786
City/State/Zip: VISALIA, CA 93292	Phone: 559-733-2671 EXT. 101

Generated Date/Time: | Documentation Software: Energy Code Ace
CA Building Energy Efficiency Standards - 2022 Nonresidential Compliance | Report Version: 2022.0.000 | Schema Version: rev 20220101 | Compliance ID: 148313-0124-0006 | Report Generated: 2024-01-24 10:19:12

NEW TK CLASSROOM AT CHENEY KINDERGARTEN
COALINGA-HURON UNIFIED SCHOOL DISTRICT
COALINGA, FRESNO COUNTY, CA

REVISIONS

MANGINI | ARCHITECTURE INGENUITY
MANGINI ASSOCIATES INC
4320 West Mineral King Avenue
Visalia, California 93291
www.mangini.us
(559) 627 1650 Office
(559) 627 1926 Fax

TITLE
OUTDOOR LIGHTING COMPLIANCE

EG1.3

PROJECT 23044

REGISTERED PROFESSIONAL ENGINEER
BRIAN KIRK EASTHAM
No. E-18786
Exp. 6/30/25
ELECTRICAL
STATE OF CALIFORNIA

Rose Sing Eastham & Associates
Electrical Consultants
131 S. Dunworth – (559)733-2671
Visalia, California 93292-6705

Z:\Drafting\Jobs\KRS\SCHOOLS\Coalinga-Huron USD\Cheney Kindergarten\Gr1-3.dwg [DATE SAVED: 05/14/24 By: Casey [DATE PLOTTED: 08/02/24 JOB #: 23-122-U

STATE OF CALIFORNIA
Electrical Power Distribution
CALIFORNIA ENERGY COMMISSION

CERTIFICATE OF COMPLIANCE — **NRCC-ELC-E**

This document is used to demonstrate compliance with mandatory requirements in 130.5, for electrical systems in newly constructed nonresidential and hotel/motel occupancies and 160.6 and 160.9 for electrical systems in newly constructed multifamily occupancies. Additions and alterations to electrical service systems in nonresidential and hotel/motel occupancies will also use this document to demonstrate compliance per 141.0(a) or 141.0(b)2P for alterations. For multifamily addition or alterations compliance will be documented per 180.1(a) or 180.2 (b)4Bvii

Project Name: CHENEY ELEMENTARY SCHOOL TK CLASSROOM	**Report Page: (Page 1 of 6)**
Project Address: 149 W ADAMS ST	**Date Prepared:** 2024-01-23T11:40:01-05:00

A. GENERAL INFORMATION

01	Project Location (city)	COALINGA	02	Climate Zone	13
			03	Occupancy Types Within Project:	ClassroomSchool or Classroom

B. PROJECT SCOPE

This table includes electrical systems that are within the scope of the permit application.

01	02	03	04	05	06	07
Electrical Service Designation/ Description	Scope of Work[1]	Rating[2] (kVA)	Utility Provided Metering System Exception to 130.5(a)/ 160.6(a)[3]	System subject to CA Elec Code Article 517 Exception to 130.5(a)and (b)	Demand Response Controls	Provides power to dwelling units/common living areas only in multifamily occupancy
NEW MAIN SWITCHBOARD "MSB"	New electrical service equipment and meter	288	☒	☐	Where required, demand response controls must be specified which are capable of receiving and automatically responding to at least one standards based messaging protocol which enables demand response after receiving a demand response signal. Sections 120.2/ 160.3, 130.1/ 160.5, and 130.3/ 160.5, and mechanical, indoor lighting, and sign lighting Certificate of Compliance documents will indicate when demand response controls are required.	☐

[1] *FOOTNOTES: Adding only new feeders and branch circuits triggers Voltage Drop 130.5(c)/160.6(c), no other requirements from 130.5/160.6 are required.*
[2] *If common use areas in a multifamily are submetered, rating is for submeter size serving common use areas.*
[3] *Applicable if the utility company is providing a metering system that indicates instantaneous kW demand and kWh for a utility-defined period.*

STATE OF CALIFORNIA
Electrical Power Distribution
CALIFORNIA ENERGY COMMISSION

CERTIFICATE OF COMPLIANCE — **NRCC-ELC-E**

Project Name: CHENEY ELEMENTARY SCHOOL TK CLASSROOM	**Report Page: (Page 2 of 6)**
	Date Prepared: 2024-01-23T11:40:01-05:00

C. COMPLIANCE RESULTS

Results in this table are automatically calculated from data input and calculations in Tables F through J. Note: If any cell on this table says "COMPLIES with Exceptional Conditions" refer to Table D. Exceptional Conditions for guidance or see applicable Table referenced below.

01		02		03		04	05	06
Service Electrical Metering 130.5(a)/ 160.6(a) (See Table F)	AND	Separation for Monitoring 130.5(b)/ 160.6(b) (See Table G)	AND	Voltage Drop 130.5(c)/ 160.6(c) (See Table H)	AND	Controlled Receptacles 130.5(d)/ 160.6(d) (See Table I)	Electric Ready 160.9 (See Table J)	**Compliance Results**
	AND	Yes	AND	Yes	AND	Yes		COMPLIES with Exceptional Conditions

D. EXCEPTIONAL CONDITIONS

This table is auto-filled with uneditable comments because of selections made or data entered in tables throughout the form.

Table B indicates the project is exempt from 130.5(a) Service Electrical Metering requirements because the utility company has provided the project a metering system that indicates instantaneous kW demand and kWh for a utility-defined period.

E. ADDITIONAL REMARKS

This table includes remarks made by the permit applicant to the Authority Having Jurisdiction.

STATE OF CALIFORNIA
Electrical Power Distribution
CALIFORNIA ENERGY COMMISSION

CERTIFICATE OF COMPLIANCE — **NRCC-ELC-E**

Project Name: CHENEY ELEMENTARY SCHOOL TK CLASSROOM	**Report Page: (Page 3 of 6)**
	Date Prepared: 2024-01-23T11:40:01-05:00

G. SEPARATION OF ELECTRICAL CIRCUITS FOR ENERGY MONITORING

This table includes entirely new or complete replacement electrical power distribution systems to demonstrate compliance with 130.5(b)/ 160.6(b). Any load types that are not included in the service do not need to be shown. For multifamily occupancies, submetered systems that provide power to dwelling units do not need to meet these separation requirements and therefore load types on those submetered systems also do not need to be shown.

01	02	03	04	05	
Load Type per Table 130.5-B[1]	Minimum Required Separation of Load per Table 130.5-B	Compliance Method[2]	Location of Requirements in Construction Documents	Field Inspector Pass	Fail
NEW MAIN SWITCHBOARD "MSB"					
Lighting including exit, egress and exterior	All lighting disaggregated by floor, type or area	Method 3: Branch circuits serve load types individually & provisions for adding future branch curcuit monitoring	E1.1	☐	☐
Plug Loads and appliances less than 25kVA	All plug loads separated by floor, type or area Groups of plug loads exceeding 25 kVA connected load in an area less than 5000 sf	Method 3: Branch circuits serve load types individually & provisions for adding future branch curcuit monitoring	E1.2	☐	☐
HVAC systems and components	All HVAC in aggregate and each HVAC load rated at least 50 kVA	Method 3: Branch circuits serve load types individually & provisions for adding future branch curcuit monitoring	E1.2	☐	☐

STATE OF CALIFORNIA
Electrical Power Distribution
CALIFORNIA ENERGY COMMISSION

CERTIFICATE OF COMPLIANCE — **NRCC-ELC-E**

Project Name: CHENEY ELEMENTARY SCHOOL TK CLASSROOM	**Report Page: (Page 4 of 6)**
	Date Prepared: 2024-01-23T11:40:01-05:00

G. SEPARATION OF ELECTRICAL CIRCUITS FOR ENERGY MONITORING

This table includes entirely new or complete replacement electrical power distribution systems to demonstrate compliance with 130.5(b)/ 160.6(b). Any load types that are not included in the service do not need to be shown. For multifamily occupancies, submetered systems that provide power to dwelling units do not need to meet these separation requirements and therefore load types on those submetered systems also do not need to be shown.

01	02	03	04	05	
Load Type per Table 130.5-B[1]	Minimum Required Separation of Load per Table 130.5-B	Compliance Method[2]	Location of Requirements in Construction Documents	Field Inspector Pass	Fail

** NOTES: If "Other*" is selected under Compliance Method above, please indicate how compliance has been achieved in the space provided below.*

[1] *FOOTNOTES: For each separate load type, up to 10% of the connected load may be of any type.*
[2] *Method 1: Switchboards/ motor control centers/ panelboard loads disaggregated for each load type.*
Method 2: Switchboards/ motor control centers/ panelboard supply other distribution equipment with loads disaggregated for each load type.
Method 3: Branch circuits serve load types individually and provisions for adding future branch circuit monitoring.
Method 4: Complete metering system measures and reports loads by type.
See Chapter 8 of the Nonresidential Compliance Manual for more detail on Compliance Methods.

H. VOLTAGE DROP

This table includes entirely new or complete replacement electrical power distribution systems, or alterations that add, modify or replace both feeders and branch circuits to demonstrate compliance with 130.5(c)/ 160.6(c). For alterations, only the altered circuits must demonstrate compliance per 141.0(b)2Piii/ 180.2(b)4Bviic.

01	02			03	04	05	
Electrical Service Designation/Description	Combined Voltage Drop on Installed Feeder/Branch Circuit Conductors Compliance Method			Location of Voltage Drop Calculations[1]	Sheet Number for Voltage Drop Calculations in Construction Documents	Field Inspector Pass	Fail
NEW MAIN SWITCHBOARD "MSB"	☒	Voltage drop less than 5%	☐	Permitted by CA Elec Code (Exception to 130.5(c))*	In construction documents	E3.1	☐	☐

** NOTES: If "Permitted by CA Elec Code *" is selected under Compliance Method above, please indicate where the exception applies in the space provided below.*

[1] *FOOTNOTES: Voltage drop calculations may be attached to the permit application outside the construction documents if allowed by the Authority Having Jurisdiction. Select "attached" if applicable. If calculations will be the responsibility of the installing contractor, select "Contractor Responsible".*

I. CIRCUIT CONTROLS FOR 120-VOLT RECEPTACLES AND CONTROLLED RECEPTACLES

This table includes entirely new or complete replacement electrical power distribution systems to demonstrate compliance with 130.5(d)/ 160.6(d).. Both controlled and uncontrolled receptacles must be provided in office areas, lobbies, conference rooms, kitchen areas in office spaces, copy rooms and hotel/motel guest rooms.

STATE OF CALIFORNIA
Electrical Power Distribution
CALIFORNIA ENERGY COMMISSION

CERTIFICATE OF COMPLIANCE — **NRCC-ELC-E**

Project Name: CHENEY ELEMENTARY SCHOOL TK CLASSROOM	**Report Page: (Page 5 of 6)**
	Date Prepared: 2024-01-23T11:40:01-05:00

I. CIRCUIT CONTROLS FOR 120-VOLT RECEPTACLES AND CONTROLLED RECEPTACLES

01	02	03	04	05	06	07	
Room name or Description	Location/ Type of Controlled Receptacles[1]	Shut-Off Controls	Demand Responsive Controls	Permanent Durable Marking Will be Used	Location of Requirements in Construction Documents	Field Inspector Pass	Fail
E1.2	---	---		☐		☐	☐

** NOTES: If "Other*" is selected under Shut-Off Controls above, please indicate how compliance has been achieved in the space provided below.*

[1] *FOOTNOTES: Receptacles dedicated to refrigerators and water dispensers in kitchens, located a minimum of 6ft above the floor specifically for clocks, network copiers, fax machines, A/V and data equipment other than personal computers in copy rooms, circuits rated more than 20 Amps, or connected to a UPS that are intended to be in continuous use and are marked to differentiate them from other receptacles or circuits are excepted from the requirements. .*

K. DECLARATION OF REQUIRED CERTIFICATES OF INSTALLATION

Selections have been made based on information provided in this document. If any selection have been changed by permit applicant, an explanation should be included in Table E. Additional Remarks. These documents must be provided to the building inspector during construction and can be found online

Form/Title
NRCI-ELC-E - Must be submitted for all buildings

L. DECLARATION OF REQUIRED CERTIFICATES OF ACCEPTANCE

There are no forms required for this project.

STATE OF CALIFORNIA
Electrical Power Distribution
CALIFORNIA ENERGY COMMISSION

CERTIFICATE OF COMPLIANCE — **NRCC-ELC-E**

Project Name: CHENEY ELEMENTARY SCHOOL TK CLASSROOM	**Report Page: (Page 6 of 6)**
Project Address: 149 W ADAMS ST	**Date Prepared:** 2024-01-23T11:40:01-05:00

DOCUMENTATION AUTHOR'S DECLARATION STATEMENT

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

Documentation Author Name: Jeff Jackson	Documentation Author Signature:
Company: Rose Sing Eastham & Associates	Signature Date: 24-01-23
Address: 131 S DUNWORTH	CEA/ HERS Certification Identification (if applicable):
City/State/Zip: VISALIA, CA 93292	Phone: 559-733-2671 EXT. 104

RESPONSIBLE PERSON'S DECLARATION STATEMENT

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

1. The information provided on this Certificate of Compliance is true and correct.
2. I am eligible under Division 3 of the Business and Professions Code to accept responsibility for the building design or system design identified on this Certificate of Compliance (responsible designer)
3. The energy features and performance specifications, materials, components, and manufactured devices for the building design or system design identified on this Certificate of Compliance conform to the requirements of Title 24, Part 1 and Part 6 of the California Code of Regulations.
4. 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.
5. I will ensure that a completed signed copy of this Certificate of Compliance shall be made available with the building permit(s) issued for the building, and made available to the enforcement agency for all applicable inspections. I understand that a completed signed copy of this Certificate of Compliance is required to be included with the documentation the builder provides to the building owner at occupancy.

Responsible Designer Name: Steven Eastham	Responsible Designer Signature:
Company: Rose Sing Eastham	Date Signed: 24-01-23
Address: 131 S DUNWORTH	License: E-18786
City/State/Zip: VISALIA, CA 93292	Phone: 559-733-2671 EXT. 101

APPROVALS
FILE # 10-28 APPLICATION # 02-122132

IDENTIFICATION STAMP
DIV. OF THE STATE ARCHITECT
APP: 02-122132 INC: A
REVIEWED FOR
SS ☑ FLS ☑ ACS ☑
DATE: 08/06/2024

LICENSED ARCHITECT — MICHAEL J. SCOTT JR — No. C-31295 — REN: 08-31-25 — STATE OF CALIFORNIA

DATE: JANUARY 31, 2024

NEW TK CLASSROOM AT CHENEY KINDERGARTEN
COALINGA-HURON UNIFIED SCHOOL DISTRICT
COALINGA, FRESNO COUNTY, CA

REVISIONS

MANGINI ARCHITECTURE + INGENUITY
MANGINI ASSOCIATES INC.
4320 West Mineral King Avenue
Visalia, California 93291
www.mangini.us
(559) 627-2650 Office
(559) 627-1926 Fax

TITLE
POWER COMPLIANCE

EG1.4

PROJECT 23044

REGISTERED PROFESSIONAL ENGINEER — JEREMIAH KIRK EASTHAM — No. E-18786 — Exp. 6/30/25 — ELECTRICAL — STATE OF CALIFORNIA

Rose Sing Eastham & Associates
Electrical Consultants
131 S. Dunworth – (559)733-2671
Visalia, California 93292-6705

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STATE OF CALIFORNIA
Solar And Battery
CALIFORNIA ENERGY COMMISSION

CERTIFICATE OF COMPLIANCE — **NRCC-SAB-E**

This document is used to demonstrate compliance with prescriptive PV and battery requirements in 140.10/ 170.2 for nonresidential, multifamily and mixed-use buildings and prescriptive solar thermal requirements in 170.2(d)3C for multifamily and hotel/ motel occupancies. When PV/battery/solar thermal requirements don't apply or are traded using the performance approach, this document demonstrates compliance with mandatory solar readiness requirements in 110.10/ 160.8 for newly constructed buildings which are either multifamily ten stories or fewer, hotel/motel ten stories or fewer or all other nonresidential buildings three stories or fewer. It is also used to demonstrate compliance with solar readiness in 110.10/ 160.8 for additions to nonresidential, multifamily or hotel/motel building types which add more than 2,000 ft² of roof area. Alterations, or additions of less than 2,000 ft² of roof area, are not required to comply with solar readiness, solar PV and battery requirements and do not need to complete this document.

Project Name:	CHENEY ELEMENTARY SCHOOL TK CLASSROOM	**Report Page:**	**(Page 1 of 5)**
Project Address: 149 W ADAMS ST		**Date Prepared:**	2024-01-23T11:45:04-05:00

A. GENERAL INFORMATION

01	Project Location (city)	COALINGA	04	Building Occupancies	School or Classroom
02	Climate Zone	13	05	Construction Type	New construction
03	Conditioned Floor Area (ft²)	4515	06	Number of Stories	Bldg <= 3 stories

B. PROJECT SCOPE

The compliance path the project is using to comply per 110.10(b)1B/ 140.10/ 170.2(g and h) is indicated below.

Compliance with Solar Photovoltaic (PV) and Battery Requirements in 140.10/ 170.2(g and h)

	01	
☐	Provided PV system and battery storage sized per 140.10/ 170.2 (g and h)	The project has included an installed PV system and battery storage system per requirements in 140.10/ 170.2(g and h) as documented in Table J.
☐	Exception to PV and Battery: Not enough Solar Access Roof Area	The total of all available Solar Access Roof Area(s) of the project site is less than three percent of the conditioned floor area as documented in Table J.
☐	Exception to PV and Battery: Required PV < 4kW	The required PV system size is less than 4 kW dc as documented in Table J..
☐	Exception to PV and Battery: No contiguous Solar Access Roof Area	The Solar Access Roof Area(s) of the project site contains less than 80 contiguous square feet as documented in Table J.
☐	Exception to PV and Battery: Can't meet snow load	The project has a roof design where the enforcement authority has verified it is not possible for the PV system, including panels, modules, components, supports, and attachments to the roof structure, to meet ASCE 7-16 Chapter 7, Snow Loads.
☐	Exception to PV and Battery: Multi-tenant without VNEM or Community Solar	The project is a multi-tenant building in an area where a load serving entity does not provide either a Virtual Net Metering (VNEM) or community solar program.
☐	The prescriptive PV/battery requirement has been traded off using the performance compliance approach as documented on the PRF Certificate of Compliance form.	

STATE OF CALIFORNIA
Solar And Battery
CALIFORNIA ENERGY COMMISSION

CERTIFICATE OF COMPLIANCE — **NRCC-SAB-E**

Project Name:	CHENEY ELEMENTARY SCHOOL TK CLASSROOM	**Report Page:**	**(Page 2 of 5)**
		Date Prepared:	2024-01-23T11:45:04-05:00

Compliance with Solar Thermal Water Heating Requirements in 170.2(d)3C (Multifamily and hotel/ motel occupancies only)

	01
☐	The project includes a hotel/motel or multifamily occupancy with a gas or propane central water-heating system (serves 2+ dwelling units) and includes a permanently installed domestic solar water-heating system to comply with 170.2(d)3C and Reference Residential Appendix RA4, as documented in Table H. Compliance meets Exception 2 to solar ready requirements in 110.10(b).

C. COMPLIANCE RESULTS

Results in this table are automatically calculated from data input and calculations in Tables F through I. Note: if any cell on this table says "DOES NOT COMPLY" or "COMPLIES with Exceptional Conditions" refer to Table D. for guidance or see the applicable Table referenced below.

Allocated Solar Zone				Installed PV System				Installed SWH System				Smart Tstat and Alternative EE Measure		Compliance Results
01		02		03		04		05		06		07	08	
Required Minimum Area (ft²)	<=	Designated Area (ft²)	OR	Required Minimum DC Power Rating (Watts)	<=	Designed DC Power Rating (Watts)	OR	Required Minimum Solar Savings Fraction	<=	Designed/Rated Solar Savings Fraction	OR	JA5 Compliant Thermostat Specified?	Alternative Energy Efficiency Measure	COMPLIES
(See Table F)				(See Tables G or J)				(See Table H)				(See Table I)		
	<=		OR	7,360	<=	7,470	OR		<=		OR			
Location in construction documents showing the location for inverters and metering equipment and a pathway for the routing of conduit/ plumbing to the electrical service/ water heating system per §110.10[c].														
Battery storage system design meets the minimum requirements in Joint Appendix JA12 and the minimum energy (kWh)/ power (kW) capacity per Table J.														Not Applicable

D. EXCEPTIONAL CONDITIONS

This table is auto-filled with uneditable comments because of selections made or data entered in tables throughout the form.

Table F indicates a subarea that is not in compliance with the requirements. Please revisit Table F

STATE OF CALIFORNIA
Solar And Battery
CALIFORNIA ENERGY COMMISSION

CERTIFICATE OF COMPLIANCE — **NRCC-SAB-E**

Project Name:	CHENEY ELEMENTARY SCHOOL TK CLASSROOM	**Report Page:**	**(Page 3 of 5)**
		Date Prepared:	2024-01-23T11:45:04-05:00

E. ADDITIONAL REMARKS

This table is includes remarks made by the permit applicant to the Authority Having Jurisdiction.

F. ALLOCATED SOLAR ZONE

This section does not apply to this project.

G. PERMANENTLY INSTALLED SOLAR PV FOR SOLAR READY EXCEPTION

This section does not apply to this project.

H. PERMANENTLY INSTALLED SOLAR HOT WATER SYSTEMS

This section does not apply to this project.

I. SMART THERMOSTATS AND ALTERNATIVE EFFICIENCY MEASURE FOR SOLAR READY EXCEPTION

This section does not apply to this project.

STATE OF CALIFORNIA
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CALIFORNIA ENERGY COMMISSION

CERTIFICATE OF COMPLIANCE — **NRCC-SAB-E**

Project Name:	CHENEY ELEMENTARY SCHOOL TK CLASSROOM	**Report Page:**	**(Page 4 of 5)**
		Date Prepared:	2024-01-23T11:45:04-05:00

J. PHOTOVOLTAIC (PV) AND BATTERY SYSTEMS

This table documents compliance with prescriptive photovoltaic and battery system requirements in 140.10/ 170.2(g and h). Unless the project meets one of the listed exceptions, or trades-off PV in an energy model using performance path, 140.10/ 170.2(g and h) requires installed photovoltaic and battery systems for newly constructed buildings. The installed PV systems must meet the minimum requirements in Joint Appendix 11.

Photovoltaic (PV) System

01	02	03	04	05	06	07	08
Occupancy	Conditioned Floor Area (ft²)	Area of New Roof[1] (ft²)	Roof Area < 70% Solar Access[2] (ft²)	Plansheet or Document showing Solar Access Calculations	Occupied Roof Area[3] (ft²)	Solar Access Roof Area (SARA) (ft²)	Min Size of PV System Required (kWdc)
School or Classroom	4,515	6,576	0	EG1.1	100	6,476	7.35
					Total Min Size PV System Required for all Spaces (kWdc):		7.36
					Total Size PV System in Design (kWdc):		7.47

[1]*FOOTNOTES: Includes the area of the building's roof space capable of structurally supporting a PV system and the area of all roof space on covered parking areas, carports, and all other newly constructed structures on the site that are compatible with supporting a PV system per Title 24, Part 2 Section 1511.2.*
[2]*Solar access must be determined using CEC approved solar access calculation tools found at https://www.energy.ca.gov/programs-and-topics/programs/building-energy-efficiency-standards/solar-assessment-tools.*
[3]*As specified by CBC Section 503.1.4.*

K. DECLARATION OF REQUIRED CERTIFICATES OF INSTALLATION

Selections have been made based on information provided in this document. If any selections have been changed by the permit applicant, an explanation should be included Table E. Additional Remarks and ExceptionalConditionMessageCCSABE += UserChangedSelectionInCI. These documents must be provided to the building inspector during construction and can be found online

Form/Title
NRCI-SAB-01-E - Must be submitted for all buildings that must comply with solar readiness or PV/Battery requirements.

L. DECLARATION OF REQUIRED CERTIFICATES OF ACCEPTANCE

There are no forms required for this project.

STATE OF CALIFORNIA
Solar And Battery
CALIFORNIA ENERGY COMMISSION

CERTIFICATE OF COMPLIANCE — **NRCC-SAB-E**

Project Name:	CHENEY ELEMENTARY SCHOOL TK CLASSROOM	**Report Page:**	**(Page 5 of 5)**
Project Address:	**149 W ADAMS ST**	**Date Prepared:**	2024-01-23T11:45:04-05:00

DOCUMENTATION AUTHOR'S DECLARATION STATEMENT

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

Documentation Author Name: Jeff Jackson	Documentation Author Signature:
Company: Rose Sing Eastham & Associates	Signature Date: 24-01-23
Address: 131 S DUNWORTH	CEA/ HERS Certification Identification (if applicable):
City/State/Zip: VISALIA, CA 93292	Phone: 559-733-2671 EXT. 104

RESPONSIBLE PERSON'S DECLARATION STATEMENT

I certify the following under penalty of perjury, under the laws of the State of California:
1. The information provided on this Certificate of Compliance is true and correct.
2. I am eligible under Division 3 of the Business and Professions Code to accept responsibility for the building design or system design identified on this Certificate of Compliance (responsible designer)
3. The energy features and performance specifications, materials, components, and manufactured devices for the building design or system design identified on this Certificate of Compliance conform to the requirements of Title 24, Part 1 and Part 6 of the California Code of Regulations.
4. 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.
5. I will ensure that a completed signed copy of this Certificate of Compliance shall be made available with the building permit(s) issued for the building, and made available to the enforcement agency for all applicable inspections. I understand that a completed signed copy of this Certificate of Compliance is required to be included with the documentation the builder provides to the building owner at occupancy.

Responsible Designer Name: Steven Eastham	Responsible Designer Signature:
Company: Rose Sing Eastham	Date Signed: 24-01-23
Address: 131 S DUNWORTH	License: E-18786
City/State/Zip: VISALIA, CA 93292	Phone: 559-733-2671 EXT. 101

APPROVALS
FILE # 10-28
APPLICATION # 02-122132

IDENTIFICATION STAMP
DIV. OF THE STATE ARCHITECT
APP: 02-122132 INC: A
REVIEWED FOR
SS ☑ FLS ☑ ACS ☑
DATE: 08/06/2024

LICENSED ARCHITECT
MICHAEL J. SCOTT JR
No. C-31296
REN: 08-31-25
STATE OF CALIFORNIA
DATE: JANUARY 31, 2024

NEW TK CLASSROOM AT CHENEY KINDERGARTEN
COALINGA-HURON UNIFIED SCHOOL DISTRICT
COALINGA, FRESNO COUNTY, CA

REVISIONS

MANGINI ARCHITECTURE | INGENUITY
MANGINI ASSOCIATES INC.
4320 West Mineral King Avenue
Visalia, California 93291
www.mangini.us
(559) 627 1926 Office
(559) 627 1926 Fax

TITLE
SOLAR AND BATTERY COMPLIANCE

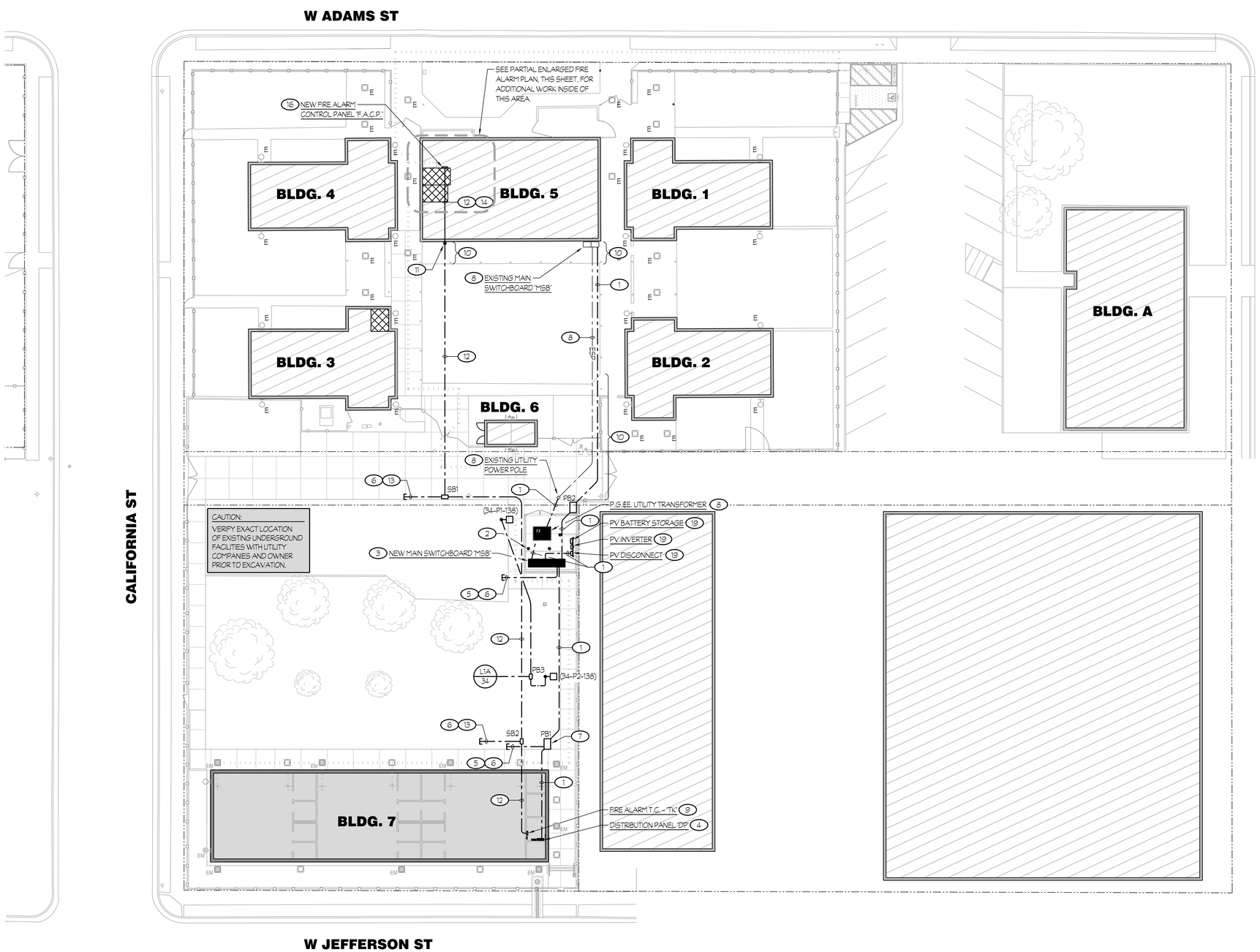
EG1.5

PROJECT 23044

Rose Sing Eastham & Associates
Electrical Consultants
131 S. Dunworth – (559)733-2671
Visalia, California 93292-6705

REGISTERED PROFESSIONAL ENGINEER
STEVEN KIRK EASTHAM
No. E-18786
Exp. 6/30/25
ELECTRICAL
STATE OF CALIFORNIA

Z:\Drafting\Jobs\KRCS\SCHOOLS\Coalinga-Huron USD\Cheney Kindergarten\EG1.5.dwg DATE SAVED: 01/23/24 BY: Casey DATE PLOTTED: 08/02/24 JOB #: 23-123-U

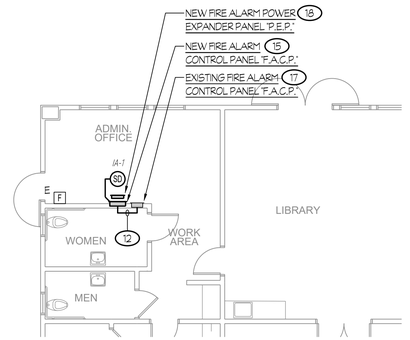


SITE ELECTRICAL PLAN

1" = 20'-0"

NOTES (THIS SHEET ONLY):

1. FEEDER PER ONE LINE DIAGRAM, #1/E3.1.
2. BONDING AND GROUNDING PER DETAIL #5/E3.3.
3. MOUNT PER DETAIL #1/E3.4.
4. SEE SHEET #E1.2 FOR EXACT LOCATION AND REQUIREMENTS.
5. SPARE CONDUIT STUBS PER ONE LINE DIAGRAM, #1/E3.1.
6. STUB OUT 36" PAST EDGE OF CONCRETE.
7. PULL BOX PER DETAILS #3/E3.3 AND #4/E3.3. TYPICAL, U.O.N..
8. SEE ONE LINE DIAGRAM, #1/E3.1 FOR ADDITIONAL INFORMATION.
9. SEE SHEET #E1.3 FOR EXACT LOCATION AND REQUIREMENTS.
10. SAWCUT AND PATCH EXISTING CONCRETE TO UNDERGROUND NEW CONDUITS AS SHOWN.
11. PROVIDE AN L.B. CONDUIT BODY ON EXTERIOR WALL. SEAL ALL PENETRATIONS TO PREVENT LEAKS.
12. FIRE ALARM CONDUIT AND WIRING PER FIRE ALARM SYSTEM RISER DIAGRAM, #1/E2.2.
13. SPARE CONDUIT STUBS PER FIRE ALARM SYSTEM RISER DIAGRAM, #1/E2.2.
14. ROUTE CONDUIT OVERHEAD IN CONCEALED ATTIC SPACE.
15. CUT AND PATCH WALL AS REQUIRED TO FLUSH IN NEW FIRE ALARM CONTROL PANEL 'F.A.C.P.' PER DETAIL #8/E2.3.
16. SEE FIRE ALARM SPECIFICATIONS ON SHEET #E2.1 FOR ADDITIONAL INFORMATION.
17. CUT AND PATCH WALL ABOVE CABINET TO INSTALL NEW CONDUITS PER FIRE ALARM RISER DIAGRAM, #1/E2.2.
18. CUT AND PATCH WALL AS REQUIRED TO FLUSH IN NEW FIRE ALARM POWER EXPANDER PANEL PER DETAIL #8/E2.3.
19. MOUNT PER DETAIL #2/E3.4.



PARTIAL ENLARGED FIRE ALARM PLAN

1/8" = 1'-0"

north

COMPLETE AUTOMATIC FIRE ALARM SYSTEM PLAN SUBMITTAL

THE FIRE ALARM SYSTEM SHOWN ON THESE PLANS HAS BEEN SUBMITTED AND APPROVED BY THE DIVISION OF THE STATE ARCHITECT. ANY SUBSTITUTION OF THE FIRE ALARM SYSTEM SHALL BE RESUBMITTED TO THE ARCHITECT FOR REVIEW AND APPROVAL. THE CONTRACTOR SHALL PAY ANY ADDITIONAL FEES THAT ARE INCURRED DUE TO THIS SUBSTITUTION.

THE FIRE ALARM SYSTEM SHALL BE A TOTAL (COMPLETE) AUTOMATIC HEAT AND SMOKE DETECTION SYSTEM, PER C.F.C. SECTION 907.2.3.6, AND SHALL COVER EVERY ROOM AND/OR AREA. UPON THE ACTIVATION OF ANY INITIATION DEVICE THE FIRE ALARM SYSTEM SHALL ALERT ALL OCCUPANTS AND TRANSMIT THE ALARM, SUPERVISORY, AND TROUBLE SIGNALS TO AN APPROVED SUPERVISING STATION (C.F.C. SECTION 907.2.3.5).

APPROVALS

FILE # 10-28 | APPLICATION # 02-122132

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DIV. OF THE STATE ARCHITECT
APP: 02-122132 INC:
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SS ☑ FLS ☑ ACS ☑
DATE: 08/06/2024

LICENSED ARCHITECT
MICHAEL J. SCOTT JR
No. C-34296
REN: 08-31-25
STATE OF CALIFORNIA

DATE: JANUARY 31, 2024

NEW TK CLASSROOM AT CHENEY KINDERGARTEN

COALINGA-HURON UNIFIED SCHOOL DISTRICT
COALINGA, FRESNO COUNTY, CA

REVISIONS

MANGINI ARCHITECTURE INGENUITY.
MANGINI ASSOCIATES INC.
4320 West Mineral King Avenue
Visalia, California 93291
www.mangini.us
(559) 627 2630 Office
(559) 627 1926 Fax

TITLE: SITE ELECTRICAL PLAN

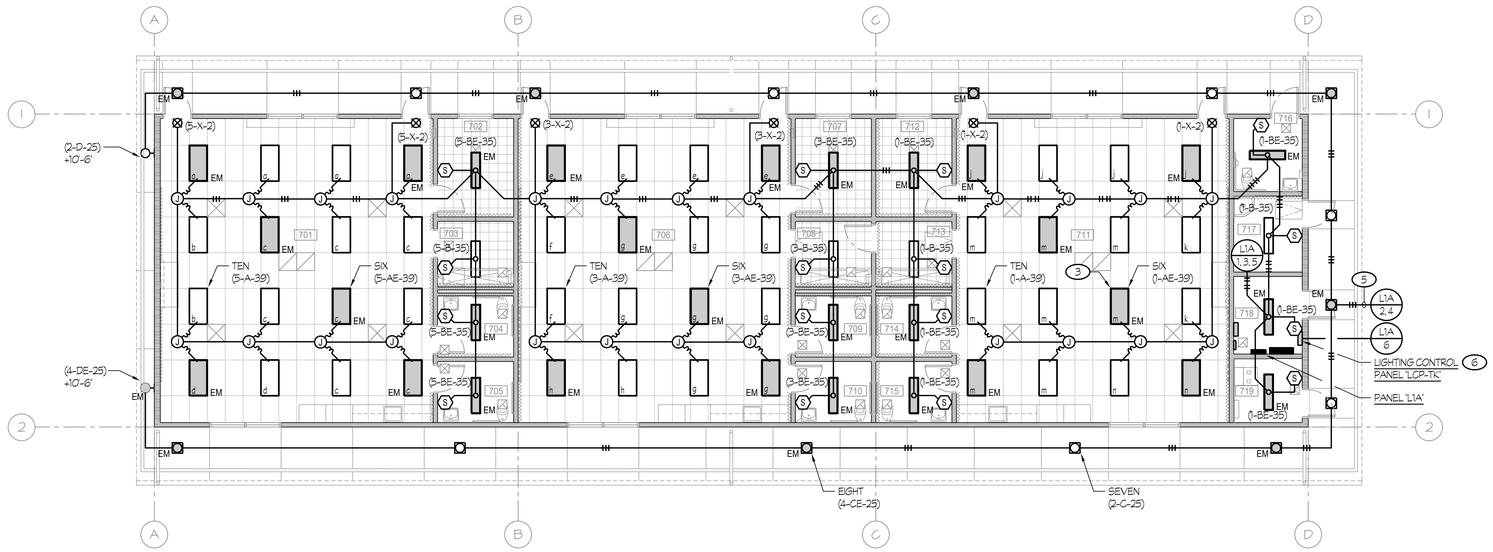
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PROJECT 23044

Rose Sing Eastham & Associates
Electrical Consultants
131 S. Dunworth – (559)733-2671
Visalia, California 93292-6705

REGISTERED PROFESSIONAL ENGINEER
BRIAN KIRK EASTHAM
No. E-18706
Exp. 6/30/25
ELECTRICAL
STATE OF CALIFORNIA

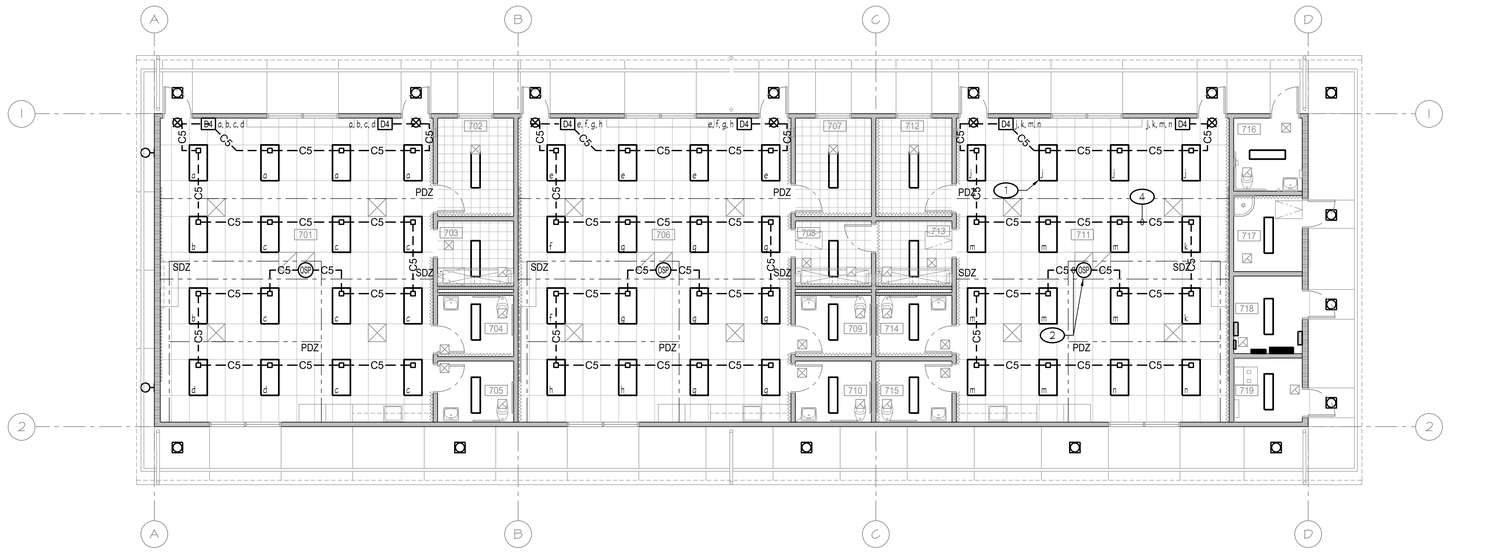
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LIGHTING PLAN

1/8" = 1'-0"

north



LIGHTING CONTROLS PLAN

1/8" = 1'-0"

north

NOTES (THIS SHEET ONLY):

1. LOWER CASE LETTER DENOTES CONTROLLING SWITCH, TYPICAL.
2. REFER TO DETAIL #3/E3.2 FOR LOW VOLTAGE DEVICES AND LIGHTING CONTROL WIRING REQUIREMENTS, TYPICAL.
3. SYMBOL EM (SHADED LIGHT FIXTURE) DENOTES LIGHT FIXTURE EQUIPPED WITH AN EMERGENCY L.E.D. DRIVER. CONNECT PER DETAIL #4/E3.2.
4. — —C5— — DENOTES CAT. 5e CABLE. ELECTRICAL CONTRACTOR MAY USE PRETERMINATED CAT. 5e CABLING OR PROVIDE CAT. 5e CABLING, MODULAR JACKS ON EACH END AND TERMINATE THE MODULAR JACKS USING THE TIA/EIA-568-B.2 PIN-PAIR SPECIFICATION. ELECTRICAL CONTRACTOR SHALL PROVIDE CONDUIT AND OUTLET BOXES IN WALLS FOR ROUTING OF CABLING. CABLE MAY BE ROUTED IN FREE-AIR, WHEN LOCATED IN ACCESSIBLE ATTIC SPACE ABOVE T-BAR CEILINGS. AT GYPBOARD CEILINGS, PROVIDE A DOUBLE-GANG LOW VOLTAGE MOUNTING PLATE BRACKET, CADDY #MPLS2 OR EQUAL, AT THE RJ-45 JACKS (EMBEDDED CONTROLS) OF THE SURFACE MOUNTED LIGHT FIXTURES FOR PASSAGE OF CAT. 5e CABLING.
5. ROUTE CIRCUIT(S) THROUGH LIGHTING CONTROL PANEL.
6. PROVIDE AN nLIGHT LIGHTING RELAY PANEL nLIGHT #ARPINTENC08-SM ENCLOSURE WITH #BFCR-MVOLT-HLK-DTC INTERIORS.

GENERAL NOTE:

1. REFER TO DETAIL #7/E3.3 FOR CONDUIT SUPPORT DETAILS.

ROOM LEGEND

#	ROOM NAME	CEILING HEIGHT	#	ROOM NAME	CEILING HEIGHT
701	TK CLASSROOM	+9'-0"	711	TK CLASSROOM	+9'-1"
702	TEACHER PREP	+9'-0"	712	TEACHER PREP	+9'-1"
703	CLEAN-UP	+9'-0"	713	CLEAN-UP	+9'-1"
704	UNISEX	+9'-0"	714	UNISEX	+9'-1"
705	UNISEX	+10'-0"	715	UNISEX	+9'-1"
706	TK CLASSROOM	+9'-0"	716	STAFF TOILET	+10'-0"
707	TEACHER PREP	+9'-0"	717	JANITOR	+10'-0"
708	CLEAN-UP	+9'-1"	718	ELEC.	+10'-0"
709	UNISEX	+9'-1"	719	DATA	+10'-0"
710	UNISEX	+9'-1"			

APPROVALS

FILE # 10-28 | APPLICATION # 02-122132

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MICHAEL J. SCOTT JR
No. C-34286
REN: 08-31-25
STATE OF CALIFORNIA

DATE: JANUARY 31, 2024

NEW TK CLASSROOM AT CHENEY KINDERGARTEN
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(559) 627-1926 Fax

TITLE
LIGHTING AND LIGHTING CONTROLS PLANS

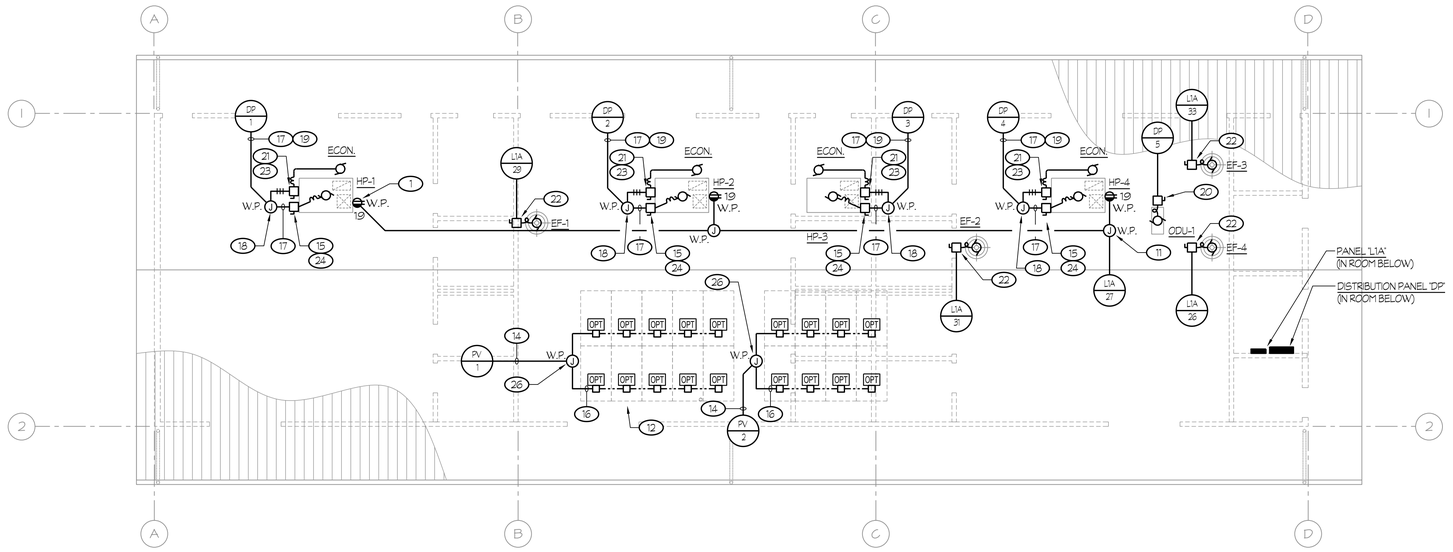
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PROJECT 23044

Rose Sing Eastham & Associates
Electrical Consultants
131 S. Dunworth - (559)733-2671
Visalia, California 93292-6705

REGISTERED PROFESSIONAL ENGINEER
KIRK STEVEN EASTHAM
No. E-19766
Exp. 6/30/25
ELECTRICAL
STATE OF CALIFORNIA

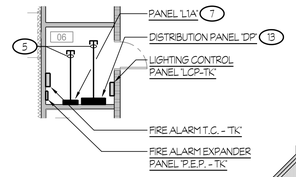
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ROOF ELECTRICAL PLAN

1/8" = 1'-0"

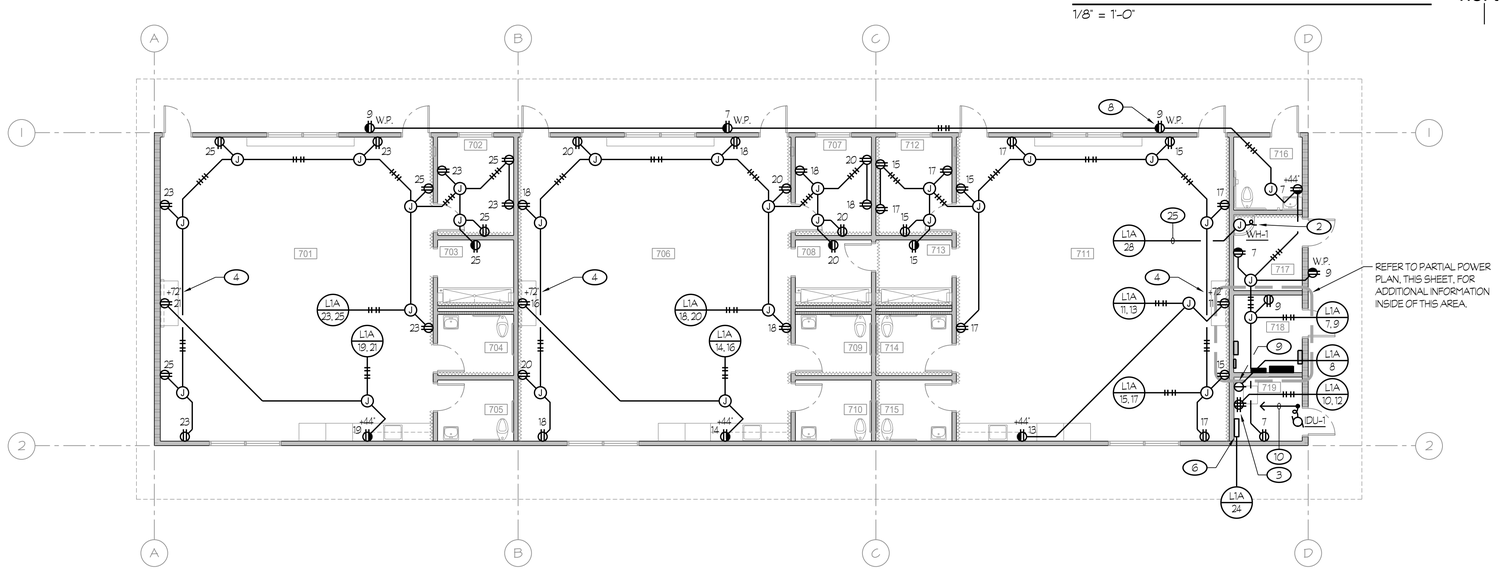
north



PARTIAL POWER PLAN

1/8" = 1'-0"

north



POWER PLAN

1/8" = 1'-0"

north

NOTES (THIS SHEET ONLY):

1. PROVIDE G.F.C.I. DUPLEX RECEPTACLE INSIDE A WEATHERPROOF OUTLET BOX WITH LOCKABLE WEATHERPROOF 'WHILE-IN-USE' COVER (RED-DOT #CKSUV, OR EQUAL) AND MOUNT ONTO HVAC UNIT. COORDINATE EXACT LOCATION WITH MECHANICAL CONTRACTOR PRIOR TO ROUGH-IN. TYPICAL OF 3.
2. CONNECT INSTANTANEOUS WATER HEATER, 208V, 1ph, 4.5 kW.
3. PROVIDE DEDICATED DOUBLE DUPLEX RECEPTACLE FOR HORIZONTAL CROSS-CONNECT. COORDINATE AND VERIFY EXACT LOCATION WITH DATA SYSTEMS CONTRACTOR PRIOR TO ROUGH-IN.
4. FOR CONNECTION OF T.V..
5. STUB TWO 1"C AND TWO 3/4"C INTO ACCESSIBLE ATTIC SPACE FROM RESPECTIVE PANEL.
6. CONNECT EMS PANEL, 120V.
7. MOUNT PANEL PER DETAIL #1/E3.3. PROVIDE CONDUIT ENCLOSING SHROUD PER DETAIL #2/E3.3.
8. PROVIDE G.F.C.I. DUPLEX RECEPTACLE INSIDE A WEATHERPROOF OUTLET BOX AT +18" A.F.F. WITH LOCKABLE WEATHERPROOF 'WHILE-IN-USE' COVER (RED-DOT #CKSUV, OR EQUAL). TYPICAL OF 4.
9. PROVIDE A 30A, 1-POLE RECEPTACLE (NEMA 5-30R) FOR I.D.F. CONNECTIONS.
10. RUN A 1"C TO RESPECTIVE ODU FOR CONTROLS. COORDINATE EXACT REQUIREMENTS WITH MECHANICAL.
11. MOUNT JUNCTION BOX IN ACCESSIBLE ATTIC SPACE BELOW, TYPICAL, U.O.N..
12. 415W SOLAR PV MODULE. REFER TO ONE-LINE DIAGRAM ON SHEET #E3.1 AND DETAIL #3/E3.5, FOR ADDITIONAL REQUIREMENTS.
13. MOUNT DISTRIBUTION PANEL 'DP' PER DETAIL #9/E3.3.
14. 3/4"C - 2 #10 + 1 #10 EG + 1 #8 CU BARE. ROUTED IN ACCESSIBLE ATTIC SPACE BELOW ROOF.
15. PROVIDE AND ENGRAVED NAMEPLATE: 'HC DISCONNECT'.
16. PV CABLE WITH MC4 CONNECTOR MOUNTED TO UNDERSIDE OF PV MODULE. TYPICAL FOR PV MODULE INTERCONNECTIONS.
17. 1"C - 3 #4 + 1 #6 GND.
18. PROVIDE A NEW N3R SCREW COVER CAN (8" SQ. x 4" DP.) AND LOCATE AT WHERE THE BRANCH CIRCUIT ROUTES UP THRU THE ROOF.
19. TYPICAL AT ALL H.V.A.C. EQUIPMENT: ROUTE BRANCH CIRCUITING UP THRU OPENING OF ROOF CURB AND THEN THRU UNIT TO DISCONNECT SWITCH. PROVIDE LIQUIDTIGHT FLEXIBLE METALLIC CONDUIT INSIDE UNIT FOR ROUTING OF CONDUCTORS.
20. PROVIDE A 60A, 3-POLE, HEAVY-DUTY RATED, FUSED SAFETY SWITCH AND MOUNT ONTO H.V.A.C. UNIT. PROVIDE FUSES PER MANUFACTURER RECOMMENDATIONS. COORDINATE EXACT LOCATION WITH MECHANICAL CONTRACTOR PRIOR TO ROUGH-IN.
21. PROVIDE ENGRAVED NAMEPLATE: 'ECONOMIZER DISCONNECT'.
22. PROVIDE A 30A, 1-POLE, HEAVY-DUTY RATED, FUSED SAFETY SWITCH AND MOUNT ONTO H.V.A.C. UNIT. PROVIDE FUSES PER MANUFACTURER RECOMMENDATIONS. COORDINATE EXACT LOCATION WITH MECHANICAL CONTRACTOR PRIOR TO ROUGH-IN.
23. PROVIDE A 30A, 3-POLE, HEAVY-DUTY RATED, FUSED SAFETY SWITCH AND MOUNT ONTO H.V.A.C. UNIT. PROVIDE FUSES PER MANUFACTURER RECOMMENDATIONS. COORDINATE EXACT LOCATION WITH MECHANICAL CONTRACTOR PRIOR TO ROUGH-IN.
24. PROVIDE A 200A, 3-POLE, HEAVY-DUTY RATED, FUSED SAFETY SWITCH AND MOUNT ONTO H.V.A.C. UNIT. PROVIDE FUSES PER MANUFACTURER RECOMMENDATIONS. COORDINATE EXACT LOCATION WITH MECHANICAL CONTRACTOR PRIOR TO ROUGH-IN.
25. 3/4"C - 2 #10 + 1 #10 GND.
26. PROVIDE 6' x 6' WEATHERPROOF ENCLOSURE FOR COMBINING OF PV STRINGS AS REQUIRED.

GENERAL NOTES:

1. REFER TO DETAIL #7/E3.3 FOR CONDUIT SUPPORT DETAILS.
2. VERIFY EXACT LOCATION AND REQUIREMENTS OF ALL HVAC EQUIPMENT WITH MECHANICAL CONTRACTOR PRIOR TO ROUGH-IN. CONDUIT AND WIRING FOR CONTROLS, BOTH LINE AND LOW VOLTAGE, SHALL BE BY MECHANICAL CONTRACTOR.

ROOM LEGEND

#	ROOM NAME	CEILING HEIGHT	#	ROOM NAME	CEILING HEIGHT
701	TK CLASSROOM	+9'-0"	711	TK CLASSROOM	+9'-1"
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703	CLEAN-UP	+9'-0"	713	CLEAN-UP	+9'-1"
704	UNISEX	+9'-0"	714	UNISEX	+9'-1"
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APPROVALS

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TITLE
POWER AND ROOF ELECTRICAL PLANS

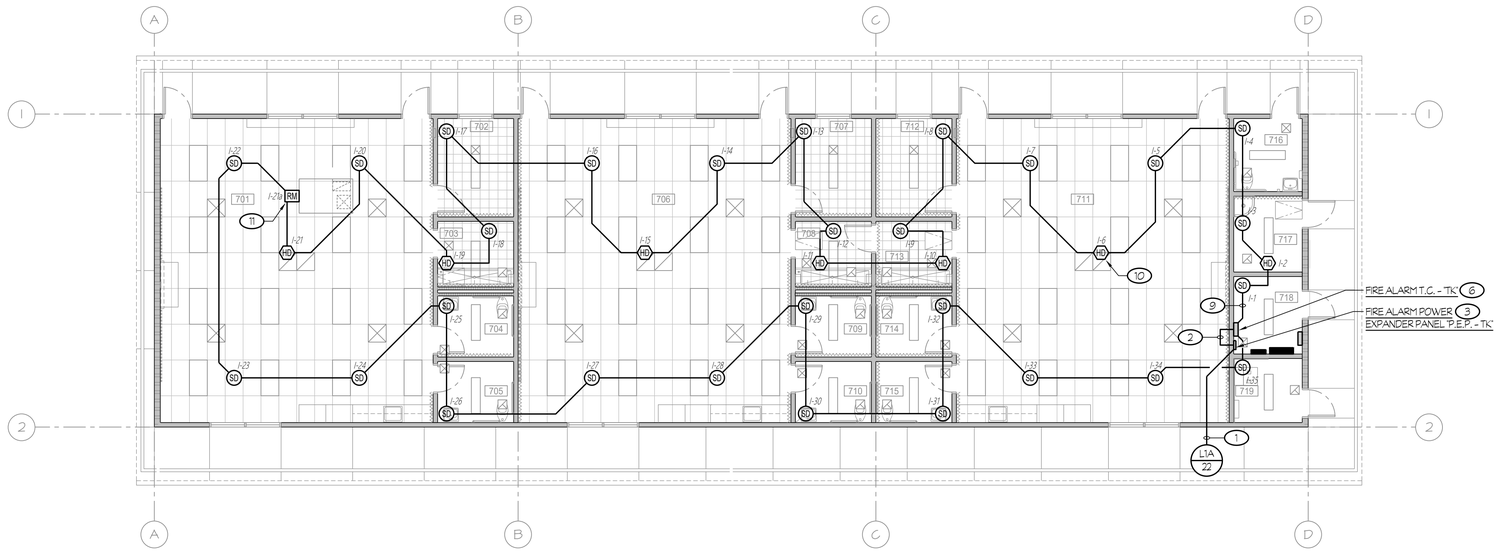
E1.2

PROJECT 23044

Rose Sing Eastham & Associates
Electrical Consultants
131 S. Dunworth - (559)733-2671
Visalia, California 93292-6705

REGISTERED PROFESSIONAL ENGINEER
JEREMY KIRK EASTHAM
No. E-24960
Exp. 6/30/25
ELECTRICAL
STATE OF CALIFORNIA

Z:\Drafting\Jobs\RSES\23-123-JJ\Coalinga-Huron USD\Cheney Kindergarten\E1.2.dwg DATE SAVED: 08/19/24 BY: Casey DATE PLOTTED: 08/02/24 JOB # 23-123-JJ



FIRE ALARM PLAN - INITIATION

1/8" = 1'-0"

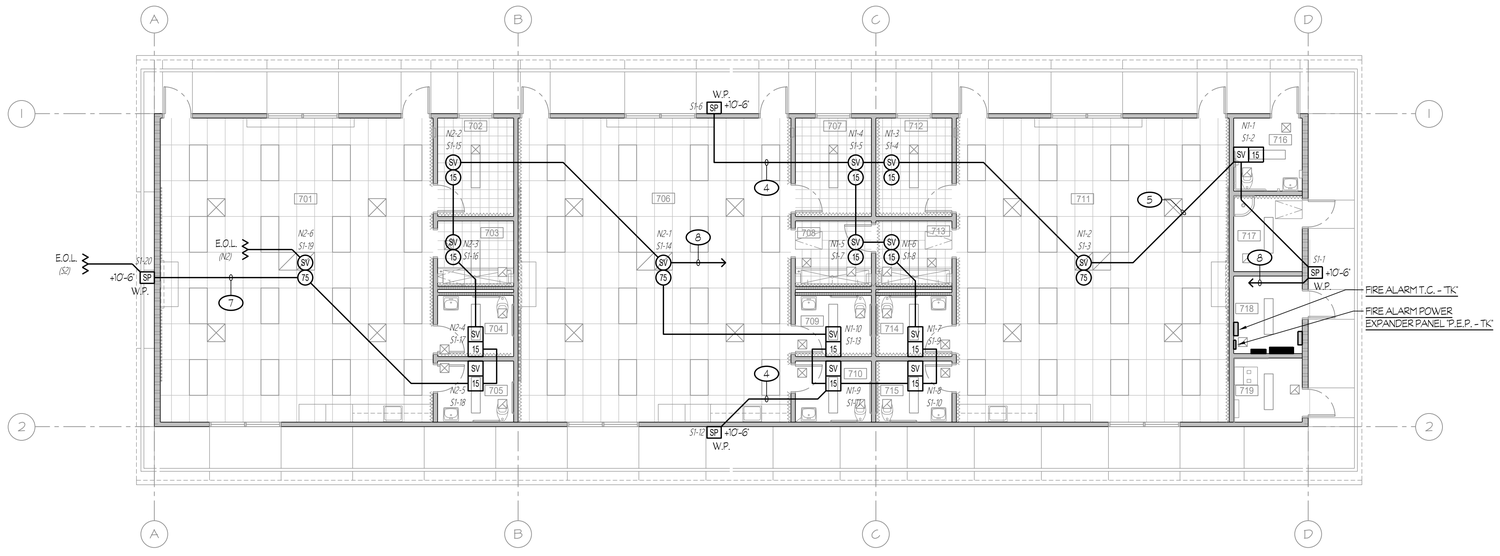
north

NOTES (THIS SHEET ONLY):

1. RUN 1/2"C - 2 #12 + 1 #12 GND TO PANEL AND CONNECT TO DEDICATED 120V, 20 AMP, 1-POLE CIRCUIT BREAKER. CIRCUIT BREAKER SHALL BE EQUIPPED WITH A LOCK-ON ACCESSORY. PROVIDE AN ENGRAVED NAMEPLATE: 'FIRE ALARM - LEAVE ON'. NAMEPLATE SHALL HAVE WHITE LETTERS ON A RED BACKGROUND. PAINT CIRCUIT BREAKER HANDLE OR LOCK-ON ACCESSORY 'RED' IN COLOR.
2. REFER TO FIRE ALARM SYSTEM RISER DIAGRAM, DETAIL #1/E2.2 FOR CONDUIT AND CABLING REQUIREMENTS BETWEEN FIRE ALARM TERMINAL CABINET.
3. MOUNT FIRE ALARM POWER EXPANDER PANEL 'P.E.P. - TK' PER DETAIL #3/E2.3.
4. 3/4"C - TWO 'FSP' CABLES.
5. 1"C - ONE 'FSP' CABLE, 2 #12. TYPICAL, U.O.N.
6. MOUNT FIRE ALARM T.C. 'F.A.T.C. - TK' PER DETAIL #7/E2.3.
7. 3/4"C - ONE 'FSP' CABLE.
8. TO FIRE ALARM T.C. 'F.A.T.C. - TK'.
9. 3/4"C - ONE 'FA' CABLE, ONE 'FAP' CABLE (24VDC AUXILIARY POWER FOR SOUNDER BASE AT CO DETECTOR). TYPICAL, U.O.N..
10. MOUNT HEAT DETECTOR WITHIN THREE FEET OF HIGHEST POINT OF THE RESPECTIVE ATTIC SPACE. TYPICAL, U.O.N..
11. PROVIDE A RELAY MODULE FOR 'UNIT SHUTDOWN' OF RESPECTIVE AC UNIT. FLUSH MOUNT IN T-BAR CEILING (OR GYPBOARD CEILING), U.O.N.. COORDINATE WITH MECHANICAL CONTRACTOR TO PROVIDE THE INTERCONNECTION CONDUIT/ CONDUCTORS AND ANY ADDITIONAL REQUIREMENTS . PROVIDE AN ENGRAVED NAMEPLATE: 'UNIT SHUTDOWN, HP-1'.

GENERAL NOTE:

1. REFER TO DETAIL #7/E3.3 FOR CONDUIT SUPPORT DETAILS.



FIRE ALARM PLAN - NOTIFICATION

1/8" = 1'-0"

north

ROOM LEGEND					
#	ROOM NAME	CEILING HEIGHT	#	ROOM NAME	CEILING HEIGHT
701	TK CLASSROOM	+9'-0"	711	TK CLASSROOM	+9'-1"
702	TEACHER PREP	+9'-0"	712	TEACHER PREP	+9'-1"
703	CLEAN-UP	+9'-0"	713	CLEAN-UP	+9'-1"
704	UNISEX	+9'-0"	714	UNISEX	+9'-1"
705	UNISEX	+10'-0"	715	UNISEX	+9'-1"
706	TK CLASSROOM	+9'-0"	716	STAFF TOILET	+10'-0"
707	TEACHER PREP	+9'-0"	717	JANITOR	+10'-0"
708	CLEAN-UP	+9'-1"	718	ELEC.	+10'-0"
709	UNISEX	+9'-1"	719	DATA	+10'-0"
710	UNISEX	+9'-1"			

COMPLETE AUTOMATIC FIRE ALARM SYSTEM PLAN SUBMITTAL

THE FIRE ALARM SYSTEM SHOWN ON THESE PLANS HAS BEEN SUBMITTED AND APPROVED BY THE DIVISION OF THE STATE ARCHITECT. ANY SUBSTITUTION OF THE FIRE ALARM SYSTEM SHALL BE RESUBMITTED TO THE ARCHITECT FOR REVIEW AND APPROVAL. THE CONTRACTOR SHALL PAY ANY ADDITIONAL FEES THAT ARE INCURRED DUE TO THIS SUBSTITUTION.

THE FIRE ALARM SYSTEM SHALL BE A TOTAL (COMPLETE) AUTOMATIC HEAT AND SMOKE DETECTION SYSTEM, PER C.F.C. SECTION 907.2.3.6, AND SHALL COVER EVERY ROOM AND/OR AREA. UPON THE ACTIVATION OF ANY INITIATION DEVICE THE FIRE ALARM SYSTEM SHALL ALERT ALL OCCUPANTS AND TRANSMIT THE ALARM, SUPERVISORY, AND TROUBLE SIGNALS TO AN APPROVED SUPERVISING STATION (C.F.C. SECTION 907.2.3.5).

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Visalia, California 93292-6705

REGISTERED PROFESSIONAL ENGINEER JOSEPH KIRK STEPHENS No. E-24766 Exp. 6/30/25 ELECTRICAL STATE OF CALIFORNIA

APPROVALS

FILE # 10-28 | APPLICATION # 02-122132

IDENTIFICATION STAMP
DIV. OF THE STATE ARCHITECT
APP: 02-122132 INC:
REVIEWED FOR
SS ☑ FLS ☑ ACS ☑
DATE: 08/06/2024

LICENSED ARCHITECT MICHAEL J. SCOTT JR No. C-34296 REN: 08-31-25 STATE OF CALIFORNIA

DATE: JANUARY 31, 2024

NEW TK CLASSROOM AT CHENEY KINDERGARTEN
COALINGA-HURON UNIFIED SCHOOL DISTRICT
COALINGA, FRESNO COUNTY, CA

REVISIONS

MANGINI ARCHITECTURE INGENUITY
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TITLE
FIRE ALARM PLANS

E1.3

PROJECT 23044

Z:\Drafting\Jobs\RSES\23-123-JJ\Coalinga-Huron USD\Cheney Kindergarten\E1.3.dwg DATE SAVED: 07/11/24 BY: Casey DATE PLOTTED: 08/02/24 JOB # 23-123-JJ

FIRE ALARM SYSTEM GENERAL NOTES

1. APPLICABLE STANDARD NFPA 72, AS ADOPTED AND AMENDED IN CBC CHAPTER 35.
2. INSTALLATION OF THE SYSTEMS SHALL NOT BE STARTED UNTIL DETAILED DESIGN DOCUMENTS AND SPECIFICATION, INCLUDING STATE FIRE MARSHAL LISTING NUMBERS FOR EACH COMPONENT OF THE SYSTEM, HAS BEEN APPROVED BY DSA.
3. UPON COMPLETION OF SYSTEM INSTALLATION, A SATISFACTORY TEST OF THE ENTIRE SYSTEM SHALL BE MADE IN THE PRESENCE OF A DSA PROJECT INSPECTOR TEST SHALL INCLUDE ALL INFORMATION PER NFPA 72 14.6.2.4 AND FIGURE 7.8.2(6) AND READ OUT VERIFICATION FORM FROM CENTER STATION.
4. A STAMPED SET OF APPROVED FIRE ALARM DESIGN DOCUMENTS SHALL BE ON THE JOB SITE AND USED FOR INSTALLATION.
5. ANY DISCREPANCIES BETWEEN THE DRAWINGS AND THE CODE OR RECOGNIZED STANDARDS SHALL BE BROUGHT TO THE ATTENTION OF DSA AND THE ARCHITECT/ ENGINEER OF THE PROJECT.
6. DSA, ARCHITECT/ENGINEER AND OWNER SHALL BE NOTIFIED A MINIMUM OF 48 HOURS PRIOR TO THE FINAL INSPECTION AND/OR TESTING.
7. ALL PENETRATIONS THROUGH RATED ASSEMBLIES REQUIRING OPENING PROTECTION SHALL BE PROVIDED WITH A PENETRATION FIRE STOP SYSTEM AS IDENTIFIED IN CBC CHAPTER 7, UL OR OTHER APPROVED LAB TESTING CRITERIA. APPROVED TYPES OF MATERIALS SHALL BE IDENTIFIED WITHIN THE PROJECT SPECIFICATIONS WITHIN THE FIRE ALARM SECTION.
8. WALL MOUNTED VISIBLE NOTIFICATION DEVICES SHALL HAVE THEIR BOTTOMS MOUNTED AT 80" MINIMUM AND 96" MAXIMUM FROM FINISHED FLOOR.
9. WALL MOUNTED AUDIBLE NOTIFICATION DEVICES SHALL HAVE THEIR TOPS MOUNTED AT 90" MINIMUM AND 100" MAXIMUM FROM FINISHED FLOOR AND NO CLOSER THAN 6" TO A HORIZONTAL STRUCTURE.
10. AUDIBLE DEVICES SHALL PROVIDE A SOUND PRESSURE LEVEL OF 15 DECIBELS (dBA) ABOVE THE AVERAGE AMBIENT SOUND LEVEL OR FIVE dBA ABOVE THE MAXIMUM SOUND LEVEL HAVING A DURATION OF AT LEAST 60 SECONDS, WHICHEVER IS GREATER, IN EVERY OCCUPIABLE SPACE WITHIN THE BUILDING.
11. AUDIBLE DEVICES SHALL BE SYNCHRONIZED TEMPORAL CODE 3 PATTERN FOR FIRE ALARM SIGNAL.
12. THE CONTRACTOR SHALL ADJUST/INSTALL ALL DEVICES TO MAXIMIZE PERFORMANCE AND TO MINIMIZE FALSE ALARMS.
13. VISIBLE DEVICES SHOULD NOT EXCEED TWO FLASHES PER SECOND AND SHOULD NOT BE SLOWER THAN ONE FLASH EVERY SECOND. THE DEVICE SHALL HAVE A PULSING LIGHT SOURCE NOT LESS THAN 15 CANDELA. VISIBLE DEVICES WITHIN 55' FROM EACH OTHER SHALL BE SYNCHRONIZED.
14. UNDERGROUND AND EXTERIOR CONDUITS TO HAVE WATER TIGHT FITTINGS AND WIRE TO BE APPROVED FOR WET LOCATIONS.
15. ALL FIRE ALARM WIRING SHALL BE FPL OR FPLP (FIRE POWER LIMITED OR FIRE POWER LIMITED PLENUM) AS REQUIRED FOR APPLICATION. WIRING IN CONDUIT ABOVE GROUND MAY BE TYPE THHN OR THWN.
16. PER CEC STANDARDS, ALL WIRING IS TO BE PULLED THROUGH EACH JUNCTION BOX AND CONNECTED DIRECTLY TO EACH FIRE DEVICE. DO NOT SPLICE THE WIRE. ALL BOXES TO BE SIZED PER CEC.
17. SMOKE DETECTORS SHALL NOT BE ANY CLOSER THAN 1' FROM FIRE SPRINKLERS OR 3' FROM ANY SUPPLY DIFFUSER. IN AREA OF CONSTRUCTION OR POSSIBLE DAMAGE/ CONTAMINATION ON NEWLY INSTALLED FIRE ALARM, DEVICES SHALL BE COVERED UNTIL THAT AREA IS READY TO BE TURNED OVER TO THE OWNER.
18. ALL FIRE ALARM CIRCUITS SHALL BE IN CONDUIT, SURFACE RACEWAY OR OPEN RUN ABOVE CEILING, UNDER FLOORS AND IN WALLS IN A NEAT AND PROTECTED MANNER AS INDICATED ON DESIGN DOCUMENTS. EXPOSED CIRCUITS ARE ONLY PERMITTED WHEN NOTED AS EXPOSED ON DESIGN DOCUMENTS.
19. FIRE ALARM PANEL, REMOTES, AND COMPONENTS SHALL BE SECURED TO MOUNTING SURFACES PER MANUFACTURERS SPECIFICATIONS. NO SINGLE DEVICE SHALL EXCEED 20 LBS. WITHOUT SPECIAL MOUNTING DETAILS.
20. A DEDICATED BRANCH CIRCUIT SHALL BE PROVIDED FOR FIRE ALARM EQUIPMENT. THIS CIRCUIT SHALL BE ENERGIZED FROM THE COMMON USE AREA PANEL AND SHALL HAVE NO OTHER OUTLETS. THE BREAKER SHALL HAVE A RED LOCKING DEVICE TO BLOCK THE HANDLE IN THE "ON" POSITION. THE CIRCUIT BREAKER SHALL BE LABELED "FIRE ALARM CIRCUIT CONTROL". CIRCUIT ID TO BE LABELED AT FIRE PANELS/EXTENDERS.
21. THE INSTALLING CONTRACTOR SHALL PROVIDE A COMPLETED "SYSTEM RECORD OF COMPLETION" PER NFPA 72, FIGURE 17.8.2.
22. FIRE ALARM CONTROL PANELS AND REMOTE ANNUNCIATORS SHALL BE INSTALLED WITH THEIR BOTTOMS MOUNTED AT 48" ABOVE THE FINISHED FLOOR.
23. MICROPHONES ASSOCIATED WITH EMERGENCY VOICE ALARM COMMUNICATION SYSTEMS (EVAC) SHALL BE ACCESSIBLE FOR USE, INSTALLED IN COMPLIANCE WITH CBC SECTIONS 11B-305 AND 11B-308.
24. THE INSTALLING CONTRACTOR SHALL PROVIDE SYSTEM PROGRAMMING FOR SUPERVISORY MONITORING PER CBC SECTION 907.6.2.
25. SUPERVISORY MONITORING SHALL BE TESTED AND VERIFIED AS SENDING CORRECT SIGNALS IN CONJUNCTION WITH FINAL ACCEPTANCE TEST.
26. OWNER SHALL BE RESPONSIBLE FOR ESTABLISHING A FIRE SYSTEM MONITORING CONTRACT OR PROVISIONS.
27. PROVIDE AN ENGRAVED NAMEPLATE INDICATING THE D.S.A. APPLICATION NUMBER, FILE NUMBER AND DATE OF INSTALLATION OF FIRE ALARM CONTROL PANEL "F.A.C.P. #LRC", AND AT EACH FIRE ALARM NAC REPEATER PANEL "N.A.C.".
    - A. THE PRIMARY POWER SUPPLY TO FIRE ALARM CONTROL PANEL "F.A.C.P. #LRC" AND TO EACH FIRE ALARM NAC REPEATER PANEL "N.A.C." SHALL BE IN ACCORDANCE WITH NFPA 72 10.6.5 AND AS FOLLOWS:
        - a) THE CIRCUIT BREAKER FEEDING THE RESPECTIVE PANEL SHALL BE LOCATED IN A LOCKED ROOM OR BEHIND A LOCKABLE DOOR AND BE READILY ACCESSIBLE TO AUTHORIZED PERSONNEL ONLY.
        - b) THE CIRCUIT BREAKER SHALL BE EQUIPPED WITH A LOCK-ON ACCESSORY. PAINT LOCK-ON ACCESSORY "RED" IN COLOR.
        - c) THE CIRCUIT BREAKER SHALL HAVE AN ENGRAVED NAMEPLATE THAT IDENTIFIES IT AS A "FIRE ALARM CIRCUIT". THIS ENGRAVED NAMEPLATE SHALL HAVE WHITE LETTERS ON A RED BACKGROUND. MOUNT ONTO THE INTERIOR TRIM AND LOCATE ADJACENT TO CIRCUIT BREAKER WHERE POSSIBLE.
        - d) THE LOCATION OF THE CIRCUIT DISCONNECTING MEANS SHALL BE PERMANENTLY IDENTIFIED AT FIRE ALARM CONTROL PANEL "F.A.C.P. #LRC" AND AT EACH FIRE ALARM NAC REPEATER PANEL "N.A.C.". PROVIDE AN ENGRAVED NAMEPLATE (WHITE LETTERS ON A RED BACKGROUND) WHICH INDICATES THIS.
    - B. ALL ENGRAVED NAMEPLATES SHALL BE ATTACHED TO THE FRONT OF THE RESPECTIVE ENCLOSURE WITH SCREWS OR RIVETS.
28. PROVIDE A COPY OF THE BATTERY CALCULATION AT FIRE ALARM CONTROL PANEL "F.A.C.P. #LRC" AND AT EACH FIRE ALARM NAC REPEATER PANEL "N.A.C.". BATTERY CALCULATION SHALL CONTAIN INFORMATION AS NOTED ON SCHEDULES AND BE PLASTIC LAMINATED. MOUNT ONTO INSIDE FACE OF DOOR.

FIRE ALARM SYSTEM EQUIPMENT SPECIFICATIONS

	SYMBOL	DESCRIPTION	MODEL #	CSFM LISTING #	BACKBOX REQUIREMENTS (2)	MOUNTING HEIGHT (TO CENTER U.O.N.)
	FACP	FIRE ALARM CONTROL PANEL "F.A.C.P."	SIMPLEX #4100ES	7165-0026:0251	ONE 3-BAY ENCLOSURE AND ONE 1-BAY ENCLOSURE	PER DETAIL #6/E2.3
	FAVP	FIRE ALARM VOICE EVAC. PANEL AND HANDSET "F.A.V.P."	SIMPLEX #4003-9302	6911-0026:0332	ONE 3-BAY ENCLOSURE AND ONE 1-BAY ENCLOSURE	PER DETAIL #8/E2.3
	PEP	FIRE ALARM POWER EXPANDER PANEL "P.E.P."	SIMPLEX #4009-9601	7300-0026:0375	ONE 3-BAY ENCLOSURE AND ONE 1-BAY ENCLOSURE	PER DETAIL #3/E2.3 & #9/E2.3
	HD	ADDRESSABLE ATTIC HEAT DETECTOR	SIMPLEX #4098-9733 #4098-9792	7270-0026:0216	4" OCTAGONAL x 1 1/2" DP. OUTLET BOX	PER DETAIL #1/E2.3
	SD	ADDRESSABLE PHOTOELECTRIC SMOKE DETECTOR WITH STANDARD BASE	SIMPLEX #4098-9714 #4098-9792	7272-0026:0218 7300-0026:0217	4" OCTAGONAL x 1 1/2" DP. OUTLET BOX	PER DETAIL #1/E2.3
	RM	ADDRESSABLE RELAY MODULE	SIMPLEX #4090-9002	7300-0026:0223	4" SQ. x 2 1/8" DP. OUTLET BOX	———
	SV 15/30	SPEAKER/STROBE, CEILING MOUNTED CANDELA RATING AS NOTED	SIMPLEX #498V-APPLC #498VC-CRFIRE	7125-0026:0384 7300-0026:0502	4" SQ. x 2 1/8" DP. OUTLET BOX	PER DETAIL #1/E2.3
	SV 15 30, 110	SPEAKER/STROBE, WALL MOUNTED CANDELA RATING AS NOTED	SIMPLEX #498V-APPLW #498VC-WRFIRE	7125-0026:0384 7300-0026:0502	4" SQ. x 2 1/8" DP. OUTLET BOX	PER DETAIL #1/E2.3
	SP W.P.	EXTERIOR SPEAKER	SIMPLEX #4950-APPLW-O #49WPBB-SOWR	7320-0026:0501	WEATHERPROOF BACKBOX	———
(1)	E.O.L.	END OF LINE RESISTOR	SIMPLEX	———	———	———
	"A" CABLE	ADDRESSABLE NOTIFICATION	ANIXTER #FA-1202C-1-1N-03	———	———	———
	"B" CABLE	RUI + COMMUNICATION	ANIXTER #FA-1802C-1-1N-03	———	———	———
	"FA" CABLE	IDNET	ANIXTER #FA-1802C-1-1N-03	———	———	———
	"P" CABLE	POWER	ANIXTER #FA-1402C-1-1S-03	———	———	———
	"FSP" CABLE	AUDIO-SPEAKER	ANIXTER #FA-1802C-1-1N-03	———	———	———

NOTES (FIRE ALARM SYSTEM EQUIPMENT LEGEND):

(1) PROVIDE 10k ohm, 1/2W FOR NOTIFICATION APPLIANCE CIRCUITS FEEDING FROM THE FIRE ALARM CONTROL PANEL AND 4.7k ohm, 1/2W FOR NOTIFICATION APPLIANCE CIRCUITS FEEDING FROM THE POWER EXPANDER PANEL.

(2) VERIFY BACKBOX REQUIREMENTS WITH FIRE ALARM SYSTEM EQUIPMENT SUPPLIER PRIOR TO ROUGH-IN.

FIRE ALARM SYSTEM SEQUENCE OF OPERATIONS

	RESULT OF OPERATION ⇩	TYPE OF INITIATION: MANUAL PULL STATION	AREA SMOKE/ HEAT DETECTOR (1)	LOSS OF POWER	SHORT CIRCUIT/ GROUND FAULT	FIRE SPRINKLER RISER WATER FLOW SWITCH	FIRE SPRINKLER P.I.V. TAMPER SWITCH
	ANNUNCIATE ALARM AT FIRE ALARM CONTROL PANEL	YES	YES	———	———	YES	———
	ANNUNCIATE TROUBLE AT FIRE ALARM CONTROL PANEL	———	———	YES	YES	———	———
	ANNUNCIATE SUPERVISORY AT FIRE ALARM CONTROL PANEL	———	———	———	———	———	YES
	ACTIVATE ALL AUDIBLE AND VISUAL ALARM SIGNALS	YES	YES	———	———	YES	———
	TRANSFER TO BATTERY BACK-UP	———	———	YES	———	———	———
(1)	SHUTDOWN RESPECTIVE A/C UNIT	———	YES	———	———	———	———
(2)	ANNUNCIATE SUPERVISORY AT THE REMOTE ANNUNCIATOR	———	———	———	———	———	———
	ANNUNCIATE AT 24 HR. ATTENDED LOCATION	YES	YES	YES	———	YES	YES
	CENTRAL STATION FOR MONITORING (ALARM)	YES	YES	———	———	YES	———
	CENTRAL STATION FOR MONITORING (TROUBLE)	———	———	YES	———	———	———
	CENTRAL STATION FOR MONITORING (SUPERVISORY)	———	———	———	———	———	YES

(1) THIS OPERATION SHALL BE ACCOMPLISHED BY UTILIZING THE TOTAL SMOKE COVERAGE SYSTEM TO ACTIVATE THE RESPECTIVE RELAY MODULE. THE CONTACTS SHALL BE PROGRAMMED TO "OPEN", THUS DE-ENERGIZING THE 120V POWER TO THE ACTUATOR OF THE SMOKE/FIRE DAMPER OR "OPENING" THE H.V.A.C. CONTROL CIRCUIT.

(2) UPON DETECTION OF CARBON MONOXIDE, A SUPERVISORY SIGNAL SHALL ANNUNCIATE AT BOTH THE FIRE ALARM CONTROL PANEL "F.A.C.P. 'A'" AND AT THE FIRE ALARM REMOTE ANNUNCIATOR, LOCATED IN THE LOBBY #A102.

FIRE ALARM LEVEL OF AUDIBILITY

ALARM INDICATING DEVICES OF A FIRE ALARM SYSTEM INTENDED TO ALERT ALL OCCUPANTS SHALL BE SO LOCATED AND UNOBSTRUCTED AS TO CAUSE A LEVEL OF AUDIBILITY OF NOT LESS THAN 15db ABOVE AMBIENT NOISE LEVELS MEASURED FOUR FEET ABOVE THE FLOOR INSIDE BUILDING.

AMBIENT NOISE LEVELS SHALL BE CONSTRUED TO MEAN THAT WHICH CAN NORMALLY BE EXPECTED TO EXIST WHEN THE FACILITY, BUILDING, ROOM OR AREA IS FUNCTIONING UNDER NORMAL OPERATIVE OR WORKING CONDITIONS.

THE FIRE ALARM SIGNAL SHALL COMPLY WITH THE CALIFORNIA EDUCATION CODE, SECTIONS 32000 AND 32004, AND BE A TEMPORAL PATTERN, CODE 3 AND THEN FOLLOWED BY ANY VOICE MESSAGES.

SCHOOLS FIRE ALARM REQUIREMENTS

THE FIRE ALARM SYSTEM SHALL CONFORM TO CALIFORNIA BUILDING CODE, SECTION 907.2.3; CALIFORNIA ELECTRICAL CODE, ARTICLE 760 AND CALIFORNIA FIRE CODE, CHAPTER 9, SECTION 907.

UPON COMPLETION OF THE INSTALLATION OF THE FIRE PROTECTIVE SIGNALING EQUIPMENT, A SATISFACTORY TEST OF THE ENTIRE SYSTEM SHALL BE MADE IN THE PRESENCE OF THE ENFORCING FIRE AGENCY, NFPA 72. IF TESTING RESULTS DETERMINE FIRE ALARM AUDIBILITY DOES NOT MEET 15db OVER AMBIENT NOISE LEVELS, ADDITIONAL FIRE ALARM SIGNALING DEVICES MAY BE REQUIRED BY THE ENFORCING FIRE AGENCY.

FIRE ALARM SYSTEM CERTIFICATION AND DESCRIPTION SHALL BE PROVIDED FOR TESTING AND A PLASTIC LAMINATED COPY SHALL REMAIN (WITH INSTRUCTIONS) AT THE FIRE ALARM CONTROL PANEL PER NFPA 72.

THE FIRE ALARM "CERTIFICATE OF COMPLETION" FORM IN NFPA 72 SHALL BE COMPLETED, SIGNED AND SUBMITTED.

SCOPE OF WORK

1. PROVIDE A NEW AUTOMATIC FIRE ALARM SYSTEM WITH SUPPLEMENTAL MANUAL FIRE DETECTION.
2. PROVIDE A FIRE ALARM CONTROL PANEL, FIRE ALARM POWER EXPANDER PANEL, ADDRESSABLE INITIATION DEVICES, NOTIFICATION APPLIANCES, CONDUIT, CABLING AND CONDUCTORS AS SHOWN ON THE DRAWINGS.

FIRE ALARM MONITORING NOTE

AUTOMATIC FIRE ALARM SYSTEMS SHALL TRANSMIT THE ALARM, SUPERVISORY AND TROUBLE SIGNALS TO AN APPROVED SUPERVISING STATION IN ACCORDANCE WITH NFPA 72. THE SUPERVISING STATION SHALL BE LISTED AS EITHER UUFX (CENTRAL STATION) OR UUJS (REMOTE AND PROPRIETARY) BY UNDERWRITERS LABORATORY (UL) OR SHALL COMPLY WITH THE REQUIREMENTS OF STANDARD FM 3011. SUPERVISION OF SYSTEM AND LEASED TELEPHONE LINES SHALL BE ARRANGED BY OWNER.

FIRE ALARM RECORD DOCUMENTS CABINET NFPA 72, 7.7.2

- EVERY NEW FIRE ALARM SYSTEM SHALL PROVIDE A DOCUMENTATION CABINET, INSTALLED AT THE SYSTEM CONTROL PANEL OR OTHER APPROVED LOCATION.
- THE DOCUMENTATION CABINET SHALL BE PROMINENTLY LABELED, "SYSTEM RECORD DOCUMENTS".
- ALL RECORD AND TESTING DOCUMENTATION SHALL BE STORED IN THE CABINET.
- CONTENTS SHALL BE ACCESSIBLE BY AUTHORIZED PERSONNEL ONLY.
- WHERE CABINET IS INSTALLED IN A LOCATION OTHER THAN THE SYSTEM CONTROL UNIT, ITS LOCATION SHALL BE IDENTIFIED AT THE SYSTEM CONTROL UNIT.

SYSTEM DOCUMENTS AS APPLICABLE:

- RECORD DRAWINGS/AS-BUILTS.
- EQUIPMENT CUT SHEETS AND CA SFM LISTINGS.
- ALTERNATIVE MEANS AND METHODS.
- PERFORMANCE BASED DESIGN DOCUMENTATION (NFPA 72, 7.3.7).
- SYSTEM RECORD OF COMPLETION AND ANY SUPPLEMENTAL INSPECTION AND TESTING DOCUMENTATION (NFPA 72, 7.8.2).
- EMERGENCY RESPONSE PLAN (NFPA 72, 7.3.8.).
- EVALUATION DOCUMENTATION (NFPA 72, 7.3.9.).
- RISK ANALYSIS DOCUMENTATION (NFPA 72, 7.3.6).
- SOFTWARE AND FIRMWARE CONTROL DOCUMENTATION (NFPA 72, 23.2.2).

COMPLETE AUTOMATIC FIRE ALARM SYSTEM PLAN SUBMITTAL

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THE FIRE ALARM SYSTEM SHALL BE A TOTAL (COMPLETE) AUTOMATIC HEAT AND SMOKE DETECTION SYSTEM, PER C.F.C. SECTION 907.2.3.6, AND SHALL COVER EVERY ROOM AND/OR AREA. UPON THE ACTIVATION OF ANY INITIATION DEVICE THE FIRE ALARM SYSTEM SHALL ALERT ALL OCCUPANTS AND TRANSMIT THE ALARM, SUPERVISORY, AND TROUBLE SIGNALS TO AN APPROVED SUPERVISING STATION (C.F.C. SECTION 907.2.3.5).

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REGISTERED PROFESSIONAL ENGINEER — JASON KIRK EASTHAM — Lic. No. E 18966 — Exp. 6/30/25 — ELECTRICAL — STATE OF CALIFORNIA

APPROVALS

FILE # 10-28 | APPLICATION # 02-122132

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APP: 02-122132 INC:
REVIEWED FOR
SS ☑ FLS ☑ ACS ☑
DATE: 08/06/2024

LICENSED ARCHITECT — MICHAEL J. SCOTT JR — No. C-34296 — REN: 08-31-25 — STATE OF CALIFORNIA

DATE: JANUARY 31, 2024

NEW TK CLASSROOM AT CHENEY KINDERGARTEN
COALINGA-HURON UNIFIED SCHOOL DISTRICT
COALINGA, FRESNO COUNTY, CA

REVISIONS

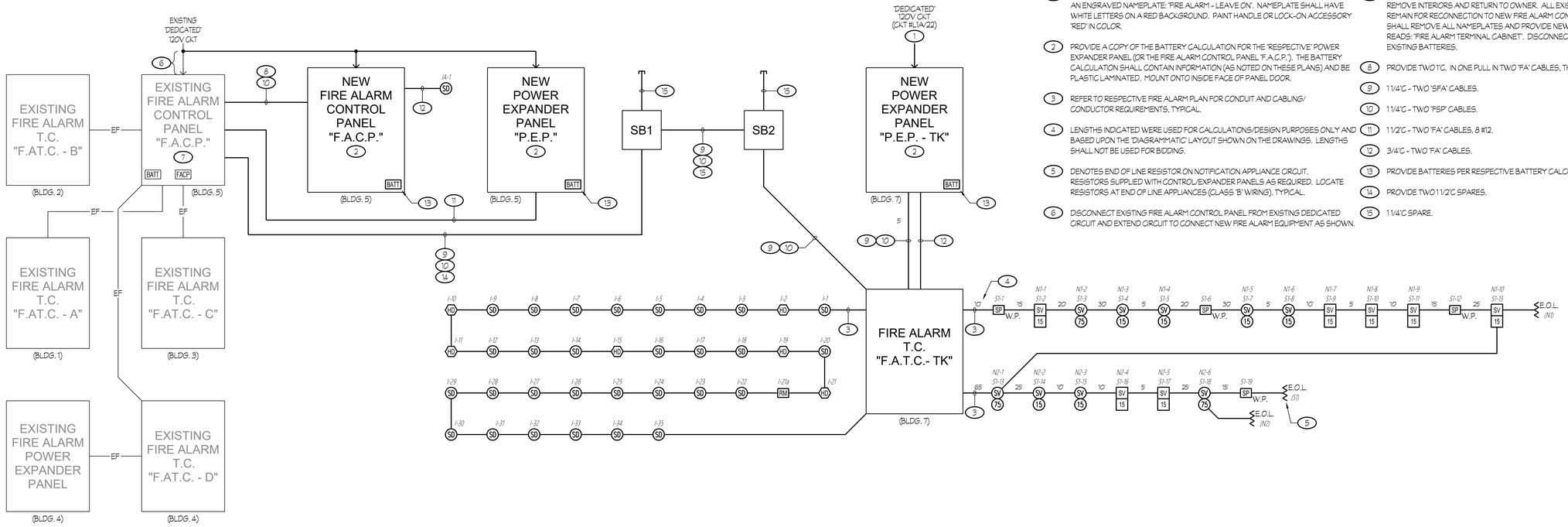
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TITLE
FIRE ALARM SPECS, CODES AND NOTES.

E2.1

PROJECT 23044

Z:\Drafting\Jobs\RSES\23XXX3\Coalinga-Huron USD\Cheney Kindergarten\E2.1.dwg, DATE: 24AUG, 07/11/24 BY: Casey, DATE PLOTTED: 08/02/24 JOB #: 23-123-JJ



1 FIRE ALARM SYSTEM RISER DIAGRAM

NTS

NOTES (THIS SHEET ONLY):

1. CIRCUIT BREAKER SHALL BE EQUIPPED WITH A LOCK-ON ACCESSORY. PROVIDE AN ENGRAVED NAMEPLATE: "FIRE ALARM - LEAVE ON". NAMEPLATE SHALL HAVE WHITE LETTERS ON A RED BACKGROUND. PAINT HANDLE OR LOCK-ON ACCESSORY "RED" IN COLOR.
2. PROVIDE A COPY OF THE BATTERY CALCULATION FOR THE 'RESPECTIVE' POWER EXPANDER PANEL (OR THE FIRE ALARM CONTROL PANEL "F.A.C.P."). THE BATTERY CALCULATION SHALL CONTAIN INFORMATION (AS NOTED ON THESE PLANS) AND BE PLASTIC LAMINATED. MOUNT ONTO INSIDE FACE OF PANEL DOOR.
3. REFER TO RESPECTIVE FIRE ALARM PLAN FOR CONDUIT AND CABLING/ CONDUCTOR REQUIREMENTS, TYPICAL.
4. LENGTHS INDICATED WERE USED FOR CALCULATIONS/DESIGN PURPOSES ONLY AND BASED UPON THE 'DIAGRAMMATIC' LAYOUT SHOWN ON THE DRAWINGS. LENGTHS SHALL NOT BE USED FOR BIDDING.
5. DENOTES END OF LINE RESISTOR ON NOTIFICATION APPLIANCE CIRCUIT. RESISTORS SUPPLIED WITH CONTROL/EXPANDER PANELS AS REQUIRED. LOCATE RESISTORS AT END OF LINE APPLIANCES (CLASS 'B' WIRING), TYPICAL.
6. DISCONNECT EXISTING FIRE ALARM CONTROL PANEL FROM EXISTING DEDICATED CIRCUIT AND EXTEND CIRCUIT TO CONNECT NEW FIRE ALARM EQUIPMENT AS SHOWN.
7. EXISTING FIRE ALARM CONTROL PANEL CABINET TO REMAIN. DISCONNECT AND REMOVE INTERIORS AND RETURN TO OWNER. ALL EXISTING CONDUIT AND WIRING TO REMAIN FOR RECONNECTION TO NEW FIRE ALARM CONTROL PANEL. CONTRACTOR SHALL REMOVE ALL NAMEPLATES AND PROVIDE NEW ENGRAVED NAMEPLATE THAT READS: 'FIRE ALARM TERMINAL CABINET'. DISCONNECT, REMOVE AND DISPOSE OF EXISTING BATTERIES.
8. PROVIDE TWO 1"C. IN ONE PULL IN TWO '1"FA' CABLES, THE OTHER IS TO REMAIN SPARE.
9. 1 1/4"C - TWO '3"FA' CABLES.
10. 1 1/4"C - TWO '1"SP' CABLES.
11. 1 1/2"C - TWO '1"FA' CABLES, 8 #12.
12. 3/4"C - TWO '1"FA' CABLES.
13. PROVIDE BATTERIES PER RESPECTIVE BATTERY CALCULATION ON SHEET #E2.2.
14. PROVIDE TWO 1 1/2"C SPARES.
15. 1 1/4"C SPARE.

VOLTAGE DROP CALCULATIONS (OHM'S LAW)

VOLTAGE DROP = 2 (DC RESISTANCE AT 75°C FROM TABLE 8, C.E.C.) (LENGTH OF CIRCUIT / 1000) (CURRENT I)

PERCENT VOLTAGE DROP = VOLTAGE DROP / NOMINAL VOLTAGE x 100

1. NOTIFICATION APPLIANCE CIRCUIT 'N1':

(SV 15) : 4 x 0.041 A = 0.164 A

(SV 75) : 1 x 0.111 A = 0.111 A

(SV 15) : 5 x 0.043 A = 0.215 A

0.490 A

VOLTAGE DROP = 2 (1.98) (200 / 1000) (0.49) = 0.388 V.D.

PERCENT VOLTAGE DROP = 0.388 / 24 x 100 = 1.61 %

VOLTAGE DROP CALCULATIONS (OHM'S LAW)

VOLTAGE DROP = 2 (DC RESISTANCE AT 75°C FROM TABLE 8, C.E.C.) (LENGTH OF CIRCUIT / 1000) (CURRENT I)

PERCENT VOLTAGE DROP = VOLTAGE DROP / NOMINAL VOLTAGE x 100

2. NOTIFICATION APPLIANCE CIRCUIT 'N2':

(SV 15) : 2 x 0.041 A = 0.082 A

(SV 75) : 2 x 0.111 A = 0.222 A

(SV 15) : 2 x 0.043 A = 0.086 A

0.390 A

VOLTAGE DROP = 2 (1.98) (155 / 1000) (0.39) = 0.239 V.D.

PERCENT VOLTAGE DROP = 0.239 / 24 x 100 = 1.00 %

NEW FIRE ALARM POWER EXPANDER PANEL "P.E.P. - TK" BATTERY CALCULATION

	DESCRIPTION	QUANTITY	SUPV. CURRENT EACH	SUPV. CURRENT SUB-TOTAL	ALARM CURRENT EACH	ALARM CURRENT SUB-TOTAL
	POWER EXPANDER PANEL	1	0.070	0.070	0.096	0.096
(A)	SPEAKER/15cd STROBE (CEILING)	6	——	——	0.041	0.246
(A)	SPEAKER/75cd STROBE (CEILING)	3	——	——	0.111	0.333
(A)	SPEAKER/15cd STROBE (WALL)	7	——	——	0.043	0.301
		TOTALS		0.070		0.976

TOTAL ALARM CURRENT OF 0.976 x 0.250 (15 MINUTES) = 0.244 A.H.
TOTAL SUPERVISORY CURRENT OF 0.070 x 24 HOURS = 1.68 A.H.
TOTAL AMP HOURS REQUIRED 1.924 A.H.
x 1.25 SAFETY FACTOR
2.405 A.H.

7.0 AMP HOUR BATTERIES ARE EXISTING.

(A) THE CURRENT VALUES LISTED ARE FOR THE STROBES ONLY. THE SPEAKER CURRENT IS INCLUDED IN THE VALUES LISTED UNDER THE DIGITAL AMPLIFIER.

NEW FIRE ALARM POWER EXPANDER PANEL "P.E.P." BATTERY CALCULATION

DESCRIPTION	QUANTITY	SUPV. CURRENT EACH	SUPV. CURRENT SUB-TOTAL	ALARM CURRENT EACH	ALARM CURRENT SUB-TOTAL
POWER EXPANDER PANEL	1	0.070	0.070	0.096	0.096
EXISTING HORN	3	——	——	0.018	0.054
EXISTING VISUAL ALARM	8	——	——	0.085	0.68
EXISTING EXTERIOR HORN	6	——	——	0.065	0.39
	TOTALS		0.070		1.22

TOTAL ALARM CURRENT OF 1.22 x 0.250 (15 MINUTES) = 0.305 A.H.
TOTAL SUPERVISORY CURRENT OF 0.070 x 24 HOURS = 1.68 A.H.
TOTAL AMP HOURS REQUIRED 1.985 A.H.
x 1.25 SAFETY FACTOR
2.481 A.H.

7.0 AMP HOUR BATTERIES ARE EXISTING.

FIRE ALARM CONTROL PANEL "F.A.C.P." BATTERY CALCULATION

DESCRIPTION	QUANTITY	SUPV. CURRENT EACH	SUPV. CURRENT SUB-TOTAL	ALARM CURRENT EACH	ALARM CURRENT SUB-TOTAL
FIRE ALARM CONTROL PANEL	1	0.277	0.277	0.321	0.321
EXISTING HORN	5	——	——	0.018	0.09
EXISTING VISUAL ALARM	7	——	——	0.085	0.595
EXISTING EXTERIOR HORN	2	——	——	0.065	0.13
SMOKE DETECTOR	29	0.0008	0.0232	0.001	0.029
ATTIC HEAT DETECTOR	6	0.00027	0.00162	0.000028	0.000168
RELAY MODULE	1	0.0008	0.0008	0.001	0.001
	TOTALS		0.30262		1.1662

TOTAL ALARM CURRENT OF 1.1662 x 0.250 (15 MINUTES) = 0.29155 A.H.
TOTAL SUPERVISORY CURRENT OF 0.30262 x 24 HOURS = 7.26288 A.H.
TOTAL AMP HOURS REQUIRED 7.55443 A.H.
x 1.25 SAFETY FACTOR
9.4430 A.H.

12.0 AMP HOUR BATTERIES ARE EXISTING.

SPEAKER dB LOSS CALCULATION

SPEAKER CIRCUIT	SPEAKER VOLTAGE	WIRE SIZE	RESISTANCE PER FOOT	FEET REQUIRED ON CIRCUIT	WIRE RESISTANCE	TOTAL WATTAGE OF SPEAKERS ON CIRCUIT	SPEAKER CURRENT (AMPS)	RESISTANCE OF SPEAKER LOAD	WIRE SIZE	ACTUAL VOLTAGE AT SPEAKER LOAD	ACTUAL WATTS AT SPEAKER LOAD	dB LOSS
S1	70	18	0.01278	355	4.54	24	0.34	204.17	18	68.47831	22.9678941	-0.19

NOTE:

CALCULATION IS BASED ON EACH OF THE 'INTERIOR' SPEAKERS TAPPED AT 1 WATT AND EACH OF THE 'EXTERIOR' SPEAKERS TAPPED AT 2 WATTS.

COMPLETE AUTOMATIC FIRE ALARM SYSTEM PLAN SUBMITTAL

THE FIRE ALARM SYSTEM SHOWN ON THESE PLANS HAS BEEN SUBMITTED AND APPROVED BY THE DIVISION OF THE STATE ARCHITECT. ANY SUBSTITUTION OF THE FIRE ALARM SYSTEM SHALL BE RESUBMITTED TO THE ARCHITECT FOR REVIEW AND APPROVAL. THE CONTRACTOR SHALL PAY ANY ADDITIONAL FEES THAT ARE INCURRED DUE TO THIS SUBSTITUTION.

THE FIRE ALARM SYSTEM SHALL BE A TOTAL (COMPLETE) AUTOMATIC HEAT AND SMOKE DETECTION SYSTEM, PER C.F.C. SECTION 907.2.3.6, AND SHALL COVER EVERY ROOM AND/OR AREA. UPON THE ACTIVATION OF ANY INITIATION DEVICE THE FIRE ALARM SYSTEM SHALL ALERT ALL OCCUPANTS AND TRANSMIT THE ALARM, SUPERVISORY, AND TROUBLE SIGNALS TO AN APPROVED SUPERVISING STATION (C.F.C. SECTION 907.2.3.5).

APPROVALS

FILE # 10-28 APPLICATION # 02-122132

IDENTIFICATION STAMP
DIV. OF THE STATE ARCHITECT
APP: 02-122132 INC:
REVIEWED FOR
SS ☑ FLS ☑ ACS ☑
DATE: 08/06/2024

LICENSED ARCHITECT
MICHAEL J. SCOTT JR
No. C-34286
REN: 08-31-25
STATE OF CALIFORNIA

DATE: JANUARY 31, 2024

NEW TK CLASSROOM AT CHENEY KINDERGARTEN

COALINGA-HURON UNIFIED SCHOOL DISTRICT
COALINGA, FRESNO COUNTY, CA

REVISIONS

MANGINI ARCHITECTURE INGENUITY
MANGINI ASSOCIATES INC.
4320 West Mineral King Avenue
Visalia, California 93291
www.mangini.us
(559) 627.0530 Office
(559) 627.1926 fax

TITLE
FIRE ALARM SYSTEM RISER DIAGRAM AND CALCS

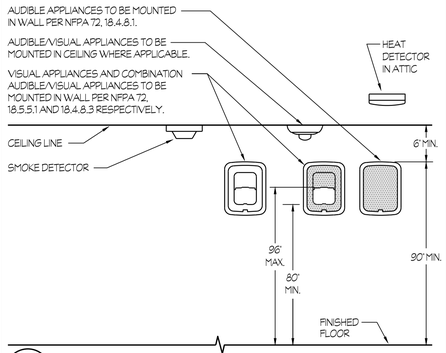
E2.2

PROJECT 23044

Rose Sing Eastham & Associates
Electrical Consultants
131 S. Dunworth – (559)733-2671
Visalia, California 93292-6705

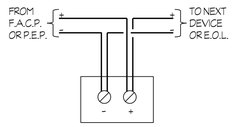
REGISTERED PROFESSIONAL ENGINEER
KIRK EASTHAM
No. E-14016
Exp. 6/30/25
ELECTRICAL
STATE OF CALIFORNIA

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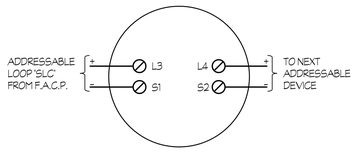


1 FIRE ALARM DEVICES ELEVATION

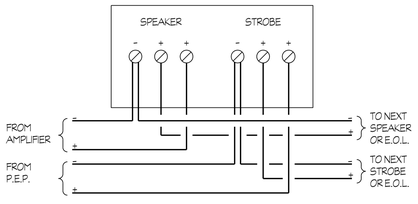
NTS



STROBE OR SPEAKER



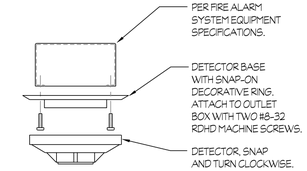
SMOKE OR HEAT DETECTOR



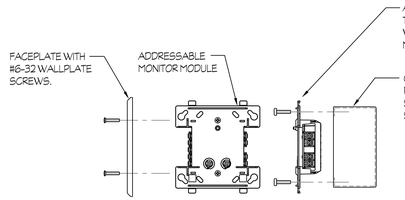
SPEAKER/STROBE

2 FIRE ALARM SYSTEM WIRING DIAGRAMS

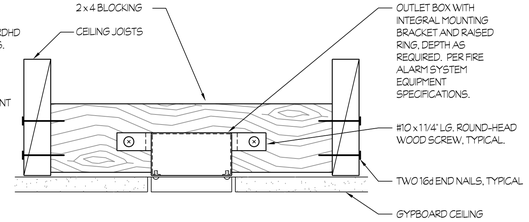
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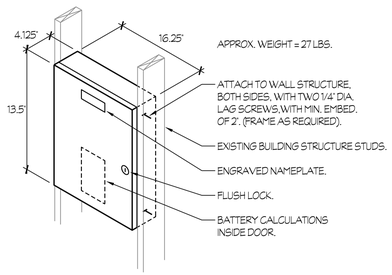
ADDRESSABLE SMOKE OR HEAT DETECTOR



ADDRESSABLE MONITOR MODULE
(SIMILAR MOUNTING FOR ADDRESSABLE DUAL MONITOR, SUPERVISED OUTPUT, AND RELAY CONTROL MODULES)

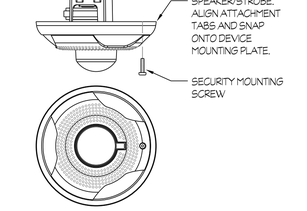


OUTLET BOX MOUNTING AT CEILING JOIST
(SIMILAR MOUNTING FOR OUTLET BOX BETWEEN WOOD STUDS)

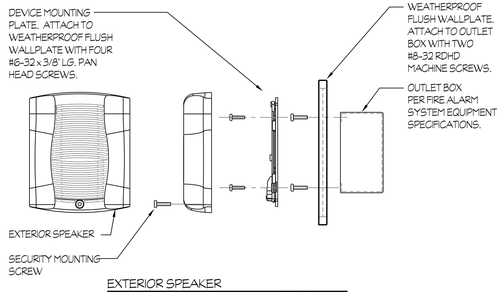


8 FIRE ALARM EXPANDER PANEL "P.E.P." MOUNTING

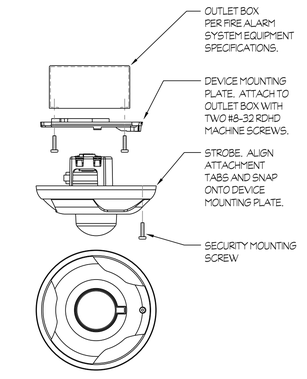
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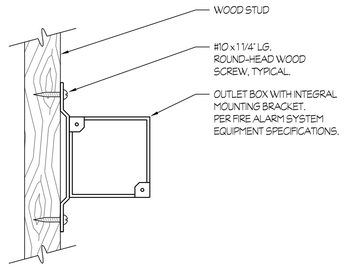
CEILING SPEAKER/STROBE



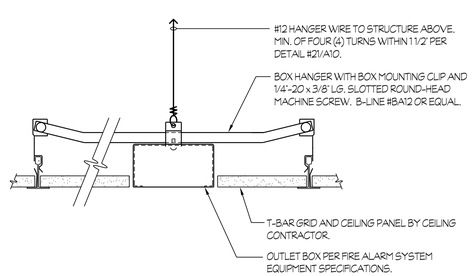
EXTERIOR SPEAKER
(WITH WEATHERPROOF FLUSH WALLPLATE 'WTP')



CEILING STROBE



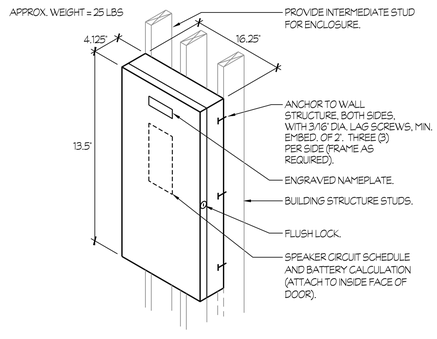
OUTLET BOX MOUNTING ONTO WOOD STUD
(SIMILAR MOUNTING FOR OUTLET BOX AT CEILING JOISTS)



OUTLET BOX MOUNTING AT SUSPENDED T-BAR CEILING

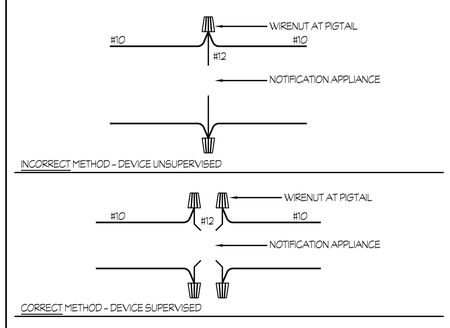
4 FIRE ALARM DEVICES MOUNTING

NTS



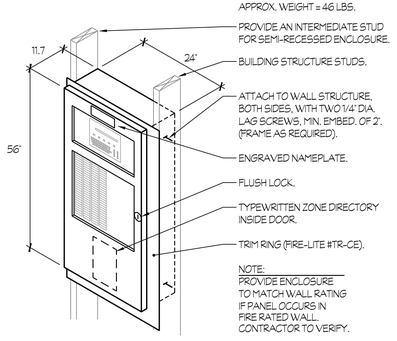
3 FIRE ALARM EXPANDER PANEL "P.E.P. - TK" MOUNTING

NTS



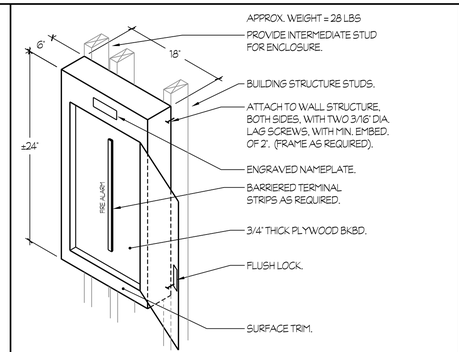
5 PIGTAIL WIRING DETAIL

NTS



6 FIRE ALARM CONTROL PANEL "F.A.C.P." MOUNTING

NTS



7 FIRE ALARM T.C. "F.A.T.C. - TK" MOUNTING

NTS

APPROVALS

FILE # 10-28 | APPLICATION # 02-122132

IDENTIFICATION STAMP
DIV. OF THE STATE ARCHITECT
APP: 02-122132 INC:
REVIEWED FOR
SS ☑ FLS ☑ ACS ☑
DATE: 08/06/2024

LICENSED ARCHITECT
MICHAEL J. SCOTT JR
No. C-34286
REN: 08-31-25
STATE OF CALIFORNIA

DATE: JANUARY 31, 2024

NEW TK CLASSROOM AT CHENEY KINDERGARTEN
COALINGA-HURON UNIFIED SCHOOL DISTRICT
COALINGA, FRESNO COUNTY, CA

REVISIONS

MANGINI ARCHITECTURE INGENUITY
MANGINI ASSOCIATES INC.
4320 West Mineral King Avenue
Visalia, California 93291
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(559) 627-0630 Office
(559) 627-1926 Fax

TITLE
FIRE ALARM DETAILS

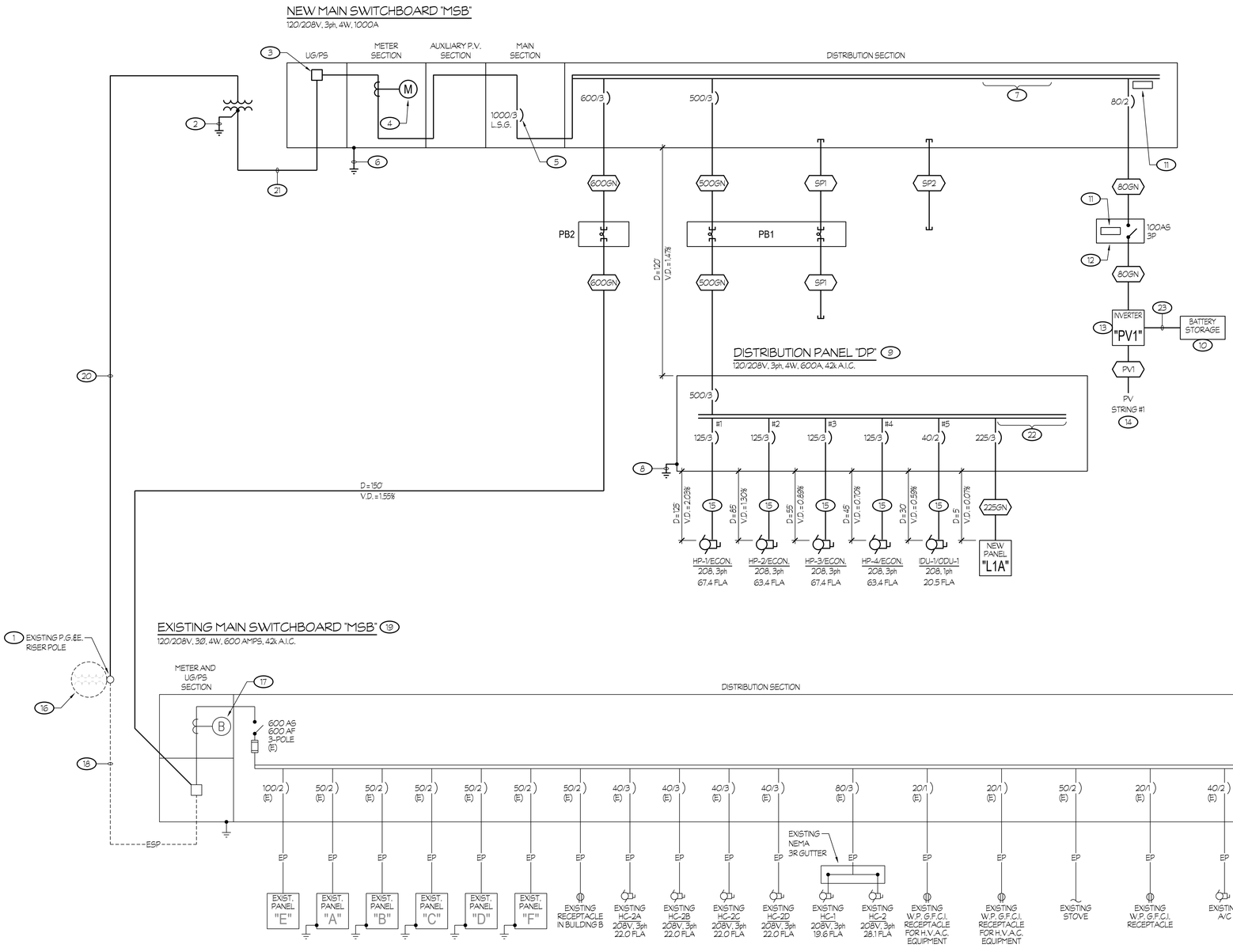
E2.3

PROJECT 23044

REGISTERED PROFESSIONAL ENGINEER
ROGER K TRK ENGLUND
No. E-14766
Exp. 6/30/25
ELECTRICAL
STATE OF CALIFORNIA

Rose Sing Eastham & Associates
Electrical Consultants
131 S. Dunworth - (559)733-2671
Visalia, California 93292-6705

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1 ONE LINE DIAGRAM

NTS

ONE LINE DIAGRAM NOTES (THIS SHEET ONLY):

1. EXISTING P.G.&E. POWER POLE. VERIFY EXACT LOCATION AND RISER QUADRANT WITH P.G.&E. PRIOR TO ROUGH-IN.
2. PROVIDE A 106"L x 90"W CONCRETE PAD (STYLE I I E), GROUNDING AND BARRIER POSTS (FIXED AND REMOVABLE) FOR P.G.&E. PAD MOUNTED TRANSFORMER PER P.G.&E. REQUIREMENTS.
3. PROVIDE LANDING LUGS PER P.G.&E. REQUIREMENTS.
4. PROVIDE METERING FACILITIES PER P.G.&E. REQUIREMENTS.
5. MAIN CIRCUIT BREAKER SHALL BE 100% RATED ELECTRONIC TYPE, EQUIPPED WITH LONG-TIME, SHORT-TIME, INSTANTANEOUS-OFF TYPE AND GROUND FAULT TYPE CONFIGURATIONS. MAIN CIRCUIT BREAKER SHALL ALSO BE EQUIPPED WITH A TRIP INDICATOR AND LOCAL CURRENT METER. SQUARE D #RK SERIES OR EQUAL.
6. 1 #3/0 TO GROUNDING ELECTRODE SYSTEM PER DETAIL #6/E3.3.
7. PROVIDE SPACE AND MOUNTING HARDWARE FOR A MINIMUM OF ONE 400A, 3-POLE AND TWO 225 AMP, 3-POLE CIRCUIT BREAKERS.
8. BOND AND GROUND REMOTE PANEL PER DETAIL #6/E3.3.
9. PROVIDE SQUARE 'D', HCJ, I-LINE WITH 72 INCHES OF CIRCUIT BREAKER MOUNTING SPACE, MAIN CIRCUIT BREAKER AS NOTED IN NEMA 1 ENCLOSURE.
10. PROVIDE EG4 ELECTRONICS 15 kWh BATTERY STORAGE SYSTEM. CONNECT TO SYSTEM PER MANUFACTURER REQUIREMENTS.
11. PROVIDE SOLAR NAME PLATE AS REQUIRED BY C.E.C.. SEE SHEET #E3.5 FOR ADDITIONAL INFORMATION.
12. PROVIDE WEATHERPROOF VISIBLE STYLE DISCONNECT SWITCH PER UTILITY REQUIREMENTS.
13. PROVIDE SOL-ARC HYBRID INVERTER #15K-2P-N. CONNECT PV STRING CIRCUITS PER MANUFACTURER REQUIREMENTS.
14. PROVIDE 415W PV MODULES AS MANUFACTUERED BY Q CELLS, MODEL Q.PEAK DUO ML-G10+ AND SOL-ARK OPTIMIZER #0300-80V AT EACH UNIT. REFER TO PLANS FOR QUANTITY AND LOCATION OF MODULES.
15. SEE ROOF ELECTRICAL PLAN, SHEET #E1.2, FOR FEEDER INFORMATION.
16. COORDINATE WITH P.G.&E. TO DISCONNECT AND REMOVE EXISTING POLE MOUNTED TRANSFORMER.
17. COORDINATE WITH P.G.&E. TO DISCONNECT AND REMOVE EXISTING METER.
18. COORDINATE WITH P.G.&E. TO DISCONNECT AND REMOVE EXISTING SECONDARY FEEDER.
19. RECONNECT EXISTING SWITCHBOARD TO NEW SERVICE AS SHOWN. CONTRACTOR SHALL REMOVE THE NEUTRAL LINK.
20. ONE 5"C (PRIMARY) PER UTILITY COMPANY REQUIREMENTS.
21. FOUR 4"C (SECONDARY) PER UTILITY COMPANY REQUIREMENTS.
22. SPACE AND MOUNTING HARDWARE PER KEYNOTE #9.
23. 1 1/4"C - 3 #4 + 1 #8 GND + 1 #CAT. 5e" CABLE.

NEW FEEDER SCHEDULE:

(ALL UNDERGROUND CONDUCTORS, OF A 480/277V POWER SYSTEM, SHALL BE TYPE CU-XHHW-2. ALL OTHER CONDUCTORS, INCLUDING THE EQUIPMENT GROUNDING CONDUCTOR, SHALL BE CU-THWN-2 FOR #8 AWG OR LARGER, AND CU-THWN FOR #10 AWG OR SMALLER).

- PV1 — 3/4"C - 4 #10 + 1 #10 GND + 1 #10 CU BARE.
- 80GN — 1"C - 3 #4 + 1 #8 GND.
- 225GN — 2"C - 4 #3/0 + 1 #6 GND.
- 500GN — TWO 2 1/2"C - 4 #4/0 + 1 #2 GND EACH.
- 600GN — TWO 3"C - 4 #350 kcmil + 1 #1 GND EACH.
- SP1 — TWO 4"C SPARE.
- SP2 — ONE 2 1/2"C SPARE.

EXISTING MAIN SWITCHBOARD "MSB" LOAD CALCULATION:

EXISTING LOAD:

EXISTING 600A SWITCHBOARD	140.4 kVA
AT 120/208V, 3ph, 4W	390 AMPS

NEW MAIN SWITCHBOARD "MSB" LOAD CALCULATION:

NEW LOAD:

LIGHTING x 125%	4.5 kVA
RECEPTACLES (FIRST 10 kVA AT 100% REMAINDER AT 50%)	13.23 kVA
H.V.A.C. AT 100%	104.5 kVA
MISCELLANEOUS AT 100%	6 kVA
TOTAL	128.23 kVA
NEW + EXISTING	268.63 kVA
AT 120/208, 3ph, 4W	745.6 AMPS

THEREFORE THE EXISTING 1000 AMP SERVICE IS ADEQUATE.

SHORT CIRCUIT CURRENT (SCC) CALCULATIONS

DESIGNATION	CALCULATED SCC	MINIMUM EQUIPMENT A.I.C. RATING
MAIN SWITCHBOARD "MSB"	30,000 (3)	42,000
DISTRIBUTION PANEL "DP"	14,190	22,000
PANEL "L1A"	13,491	22,000
(E) MAIN SWITCHBOARD "MSB"	14,751	42,000

(1) SERIES RATINGS MAY BE USED TO ACHIEVE THE REQUIRED MINIMUM EQUIPMENT A.I.C. RATING. PROVIDE AN ENGRAVED NAMEPLATE WHICH INDICATES THIS APPLICATION TO COMPLY WITH C.E.C. ARTICLES 110.22(C), 240.83(C) AND 240.86(B).

(2) THE SHORT CIRCUIT CURRENT CALCULATIONS AND MINIMUM EQUIPMENT A.I.C. RATINGS ARE "PRELIMINARY" AND ARE FOR BIDDING PURPOSES ONLY. THE SHORT CIRCUIT AND PROTECTIVE DEVICE COORDINATION STUDY, REQUIRED BY THE PROJECT MANUAL, WILL DETERMINE THE ACTUAL SHORT CIRCUIT CURRENT VALUES.

(3) THE AVAILABLE FAULT CURRENT SHALL BE LEGIBLY MARKED IN THE FIELD WITH THE MAXIMUM AVAILABLE FAULT CURRENT TO COMPLY WITH C.E.C. ARTICLE 110.24. THE FIELD MARKING SHALL INCLUDE THE DATE THAT THE FAULT CURRENT CALCULATION WAS PERFORMED. THE LABEL SHALL BE PRINTED IN COLOR AND ON SELF-ADHESIVE NYLON OR VINYL DIE CUT STOCK.

Rose Sing Eastham & Associates
Electrical Consultants
131 S. Dunworth - (559)733-2671
Visalia, California 93292-6705

REGISTERED PROFESSIONAL ENGINEER — JOSEPH KIRK SINGH — ELECTRICAL — Exp. 6/30/25 — STATE OF CALIFORNIA

APPROVALS

FILE # 10-28 — APPLICATION # 02-122132

IDENTIFICATION STAMP
DIV. OF THE STATE ARCHITECT
APP: 02-122132 INC:
REVIEWED FOR
SS ☑ FLS ☑ ACS ☑
DATE: 08/06/2024

LICENSED ARCHITECT — MICHAEL J. SCOTT JR — No. C-31296 — REN: 08-31-25 — STATE OF CALIFORNIA

DATE: JANUARY 31, 2024

NEW TK CLASSROOM AT CHENEY KINDERGARTEN

COALINGA-HURON UNIFIED SCHOOL DISTRICT
COALINGA, FRESNO COUNTY, CA

REVISIONS

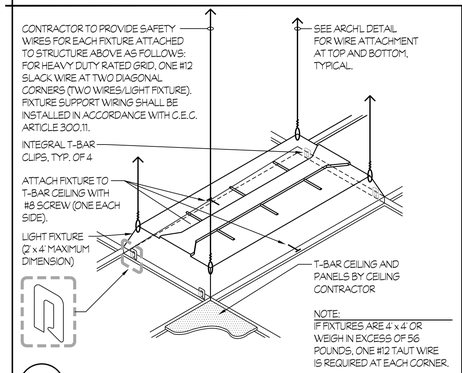
MANGINI ARCHITECTURE INGENUITY
MANGINI ASSOCIATES INC.
430 West Mineral King Avenue
Visalia, California 93291
www.mangini.us
(559) 627-0530 Office
(559) 627-1926 Fax

TITLE: ONE LINE DIAGRAM

E3.1

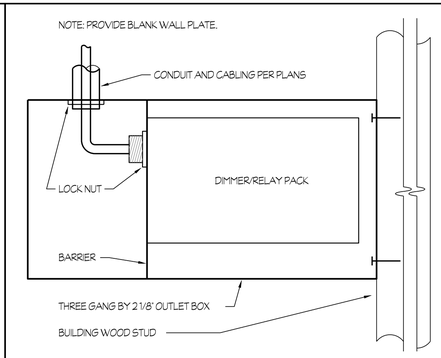
PROJECT 23044

Z:\Drafting\Jobs\RSES\23-123-JJ\Coalinga-Huron USD\Cheney Kindergarten\23.1.dwg DATE SAVED: 08/19/24 BY: Casey DATE PLOTTED: 08/02/24 JOB # 23-123-JJ



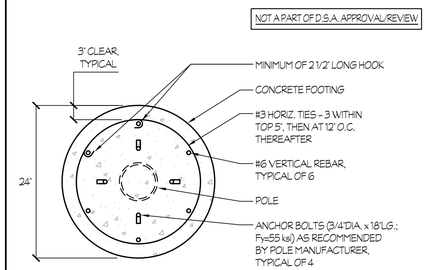
1 RECESSED FIXTURE MOUNTING

NTS



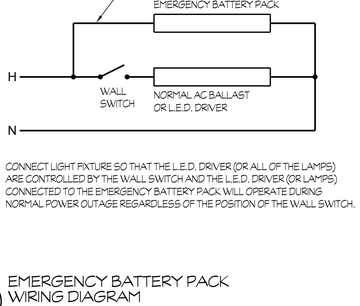
5 DIMMER/RELAY PACK MOUNTING

NTS



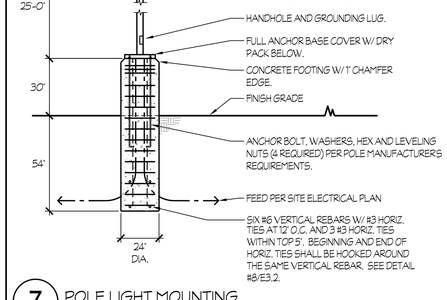
8 CROSS SECTION OF CONCRETE FOOTING

NTS



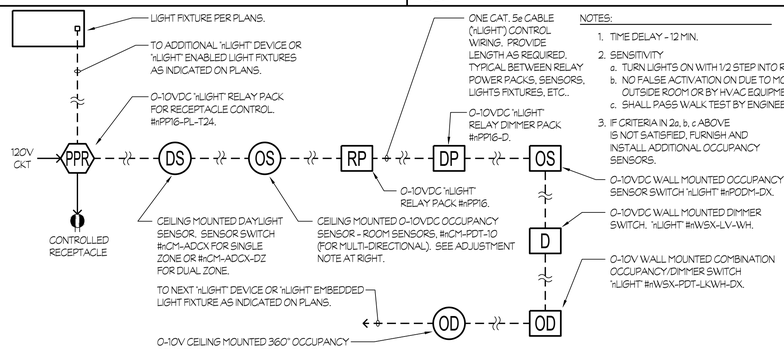
2 SURFACE FIXTURE MOUNTING

NTS



6 RECESSED DOWNLIGHT MOUNTING

NTS



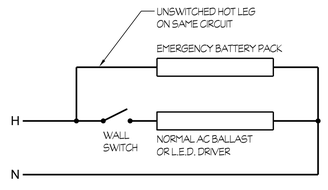
NOTES:

1. TIME DELAY - 12 MIN.
2. SENSITIVITY
   a. TURN LIGHTS ON WITH 1/2 STEP INTO ROOM.
   b. NO FALSE ACTIVATION ON DUE TO MOTION OUTSIDE ROOM OR BY HVAC EQUIPMENT.
   c. SHALL PASS WALK TEST BY ENGINEER.
3. IF CRITERIA IN 2a, b, c ABOVE IS NOT SATISFIED, FURNISH AND INSTALL ADDITIONAL OCCUPANCY SENSORS.

3 SENSOR SWITCH, "nLIGHT" DEVICES WIRING DIAGRAM

(NOTE: ACTUAL SEQUENCE OF DEVICES IS TO BE PER PLANS)

NTS



CONNECT LIGHT FIXTURE SO THAT THE L.E.D. DRIVER (OR ALL OF THE LAMPS) ARE CONTROLLED BY THE WALL SWITCH AND THE L.E.D. DRIVER (OR LAMPS) CONNECTED TO THE EMERGENCY BATTERY PACK WILL OPERATE DURING NORMAL POWER OUTAGE REGARDLESS OF THE POSITION OF THE WALL SWITCH.

4 EMERGENCY BATTERY PACK WIRING DIAGRAM

NTS

7 POLE LIGHT MOUNTING

NTS

APPROVALS

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LICENSED ARCHITECT
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No. C-34296
REN: 08-31-25
STATE OF CALIFORNIA

DATE: JANUARY 31, 2024

NEW TK CLASSROOM AT CHENEY KINDERGARTEN
COALINGA-HURON UNIFIED SCHOOL DISTRICT
COALINGA, FRESNO COUNTY, CA

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TITLE
DETAILS

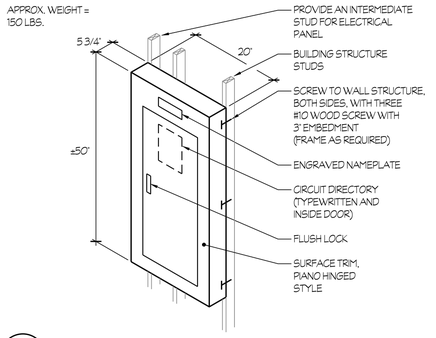
E3.2

PROJECT 23044

Rose Sing Eastham & Associates
Electrical Consultants
131 S. Dunworth - (559)733-2671
Visalia, California 93292-6705

REGISTERED PROFESSIONAL ENGINEER
JEREMY KIRK EASTHAM
Exp. 6/30/25
ELECTRICAL
STATE OF CALIFORNIA

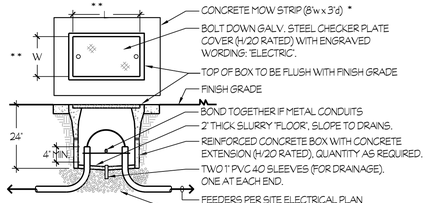
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1 SURFACE MOUNTED PANEL

NTS

PULL BOX	PB1	PB2	SB1	PB3, SB2
W	30 1/4"	30 1/4"	17"	13 1/4"
L	48 1/4"	48 1/4"	30"	24"



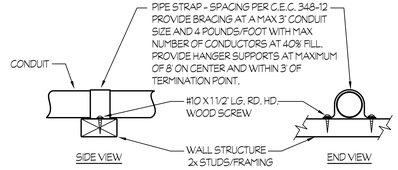
* NOTE: WHERE PULL BOX IS ADJACENT TO CONCRETE WALK, EXTEND MOWSTRIP TO CONNECT WITH WALK. FOAM SEAL ALL CONDUITS IN YARD BOXES.

** NOTE: INTERIOR DIMENSIONS MEASURED AT 'OPENING' OF PULL BOX.

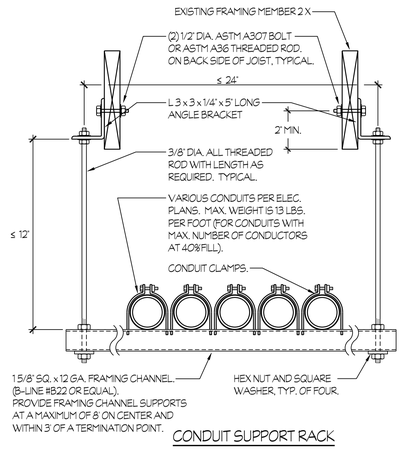
4 PULL BOX MOUNTING

NTS

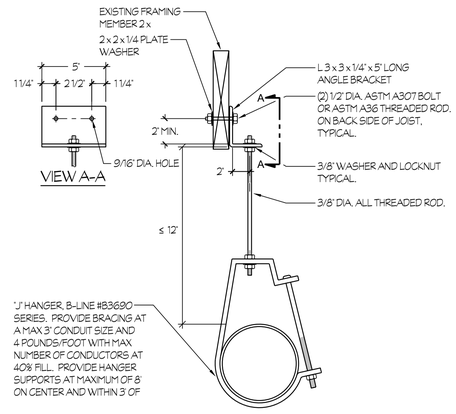
NOTE:
HANGERS ARE TO BE PROVIDED AT A MAXIMUM OF 4' O.C. AND WITHIN 18" OF ALL CONDUIT COUPLINGS.



CONDUIT BRACING AT WALL STRUCTURE

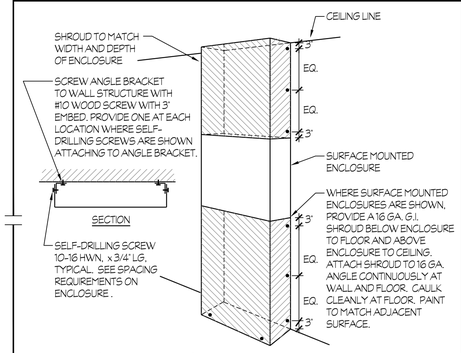


CONDUIT SUPPORT RACK



7 CONDUIT SUPPORT DETAILS

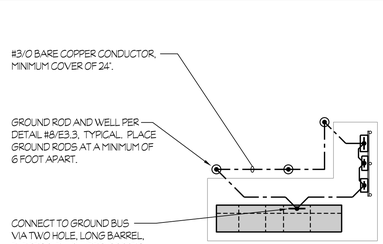
NTS



2 SHROUD AT SURFACE MOUNTED PANELS/SIGNAL T.C.'S

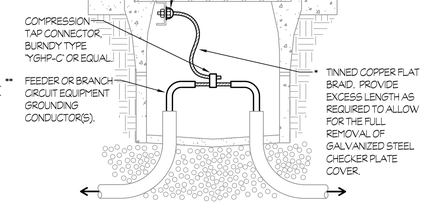
(FOR ENCLOSING OF EXPOSED CONDUITS. PROVIDE AT ALL SURFACE MOUNTED ENCLOSURES)

NTS



5 MAIN SWITCHBOARD 'MSB', PV DISCONNECT, INVERTER & BATTERY - GROUNDING & BONDING

NTS



* THIS TYPICAL WORK SHALL BE PROVIDED FOR EACH SECTION OF A MULTIPLE SECTION COVER.

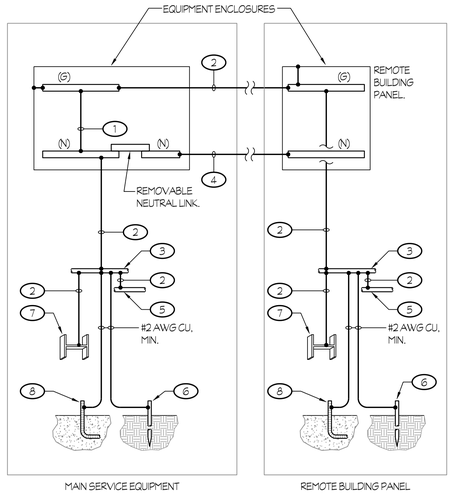
** THIS TYPICAL WORK SHALL BE DONE FOR EACH OF THE LARGEST FEEDER (OR BRANCH CIRCUIT) EQUIPMENT GROUNDING CONDUCTOR, PASSING THRU THE RESPECTIVE PULL BOX, WHICH ORIGINATE FROM SEPARATE SOURCES/VOLTAGES.

MATRIX FOR TINNED COPPER FLAT BRAID		
SIZE OF EQUIPMENT GROUNDING CONDUCTOR (g)	ALPHA WIRE PART #	OLYMPIC WIRE AND CABLE PART #
#8	1233	708
#6	1235	710
#4	1239	710
#2 THRU #1/0	1240	713
#2/0 THRU #4/0	1241	714

(g) CONTAINED IN THE LARGEST FEEDER (OR BRANCH CIRCUIT) PASSING THRU THE RESPECTIVE PULL BOX.

3 GROUNDING AND BONDING OF STEEL CHECKER PLATE COVERS

NTS



NOTES (THIS DETAIL ONLY):

1. MAIN BONDING JUMPER PER C.E.C. 250.28.
2. FULL SIZE GROUNDING ELECTRODE CONDUCTOR PER C.E.C., TABLE 250.66.
3. METAL WATER PIPING PER C.E.C. 250.104.
4. NEUTRAL CONDUCTOR PER FEEDER SCHEDULE.
5. OTHER ABOVEGROUND METALLIC PIPING SYSTEMS PER C.E.C. 250.104.
6. 5/8" DIA. ROD ELECTRODE PER C.E.C. 250.52 (A), (3).
7. BUILDING STRUCTURAL STEEL PER C.E.C. 250.104.
8. CONCRETE ENCASED ELECTRODE PER C.E.C. 250.52 (A), (3).

LEGEND:

(G) DENOTES THE GROUND BUS OR BAR.

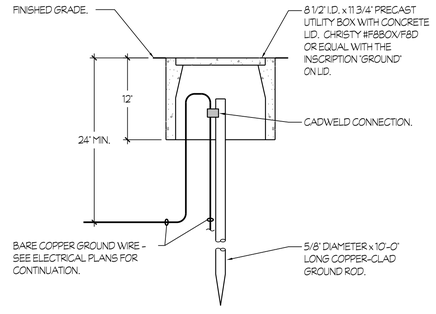
(N) DENOTES THE NEUTRAL BUS OR BAR.

GENERAL NOTE:

ALL MATERIALS AND METHODS USED IN GROUNDING AND BONDING SHALL COMPLY WITH C.E.C. ARTICLE 250.

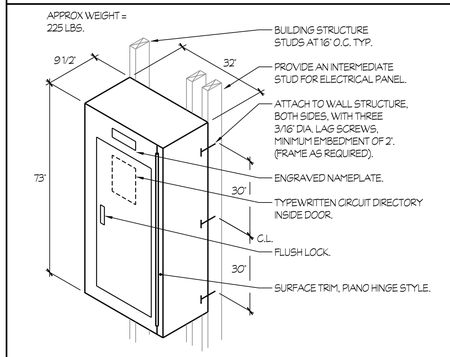
6 MAIN SERVICE EQUIPMENT AND REMOTE BUILDING PANEL - GROUNDING AND BONDING

NTS



8 GROUND WELL DETAIL

NTS



9 DISTRIBUTION PANEL "DP"

NTS

APPROVALS

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LICENSED ARCHITECT
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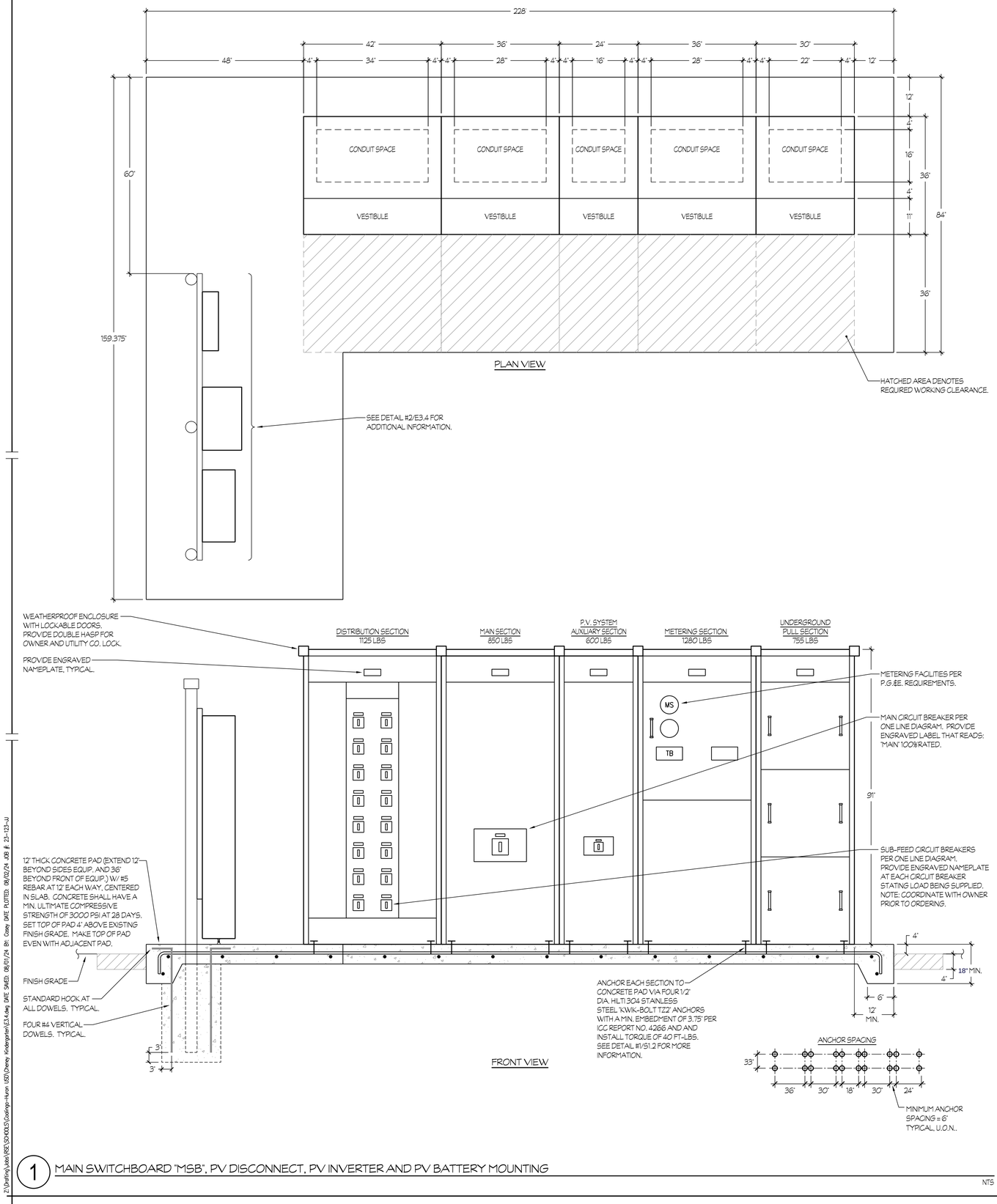
E3.3

PROJECT 23044

Rose Sing Eastham & Associates
Electrical Consultants
131 S. Dunworth - (559)733-2671
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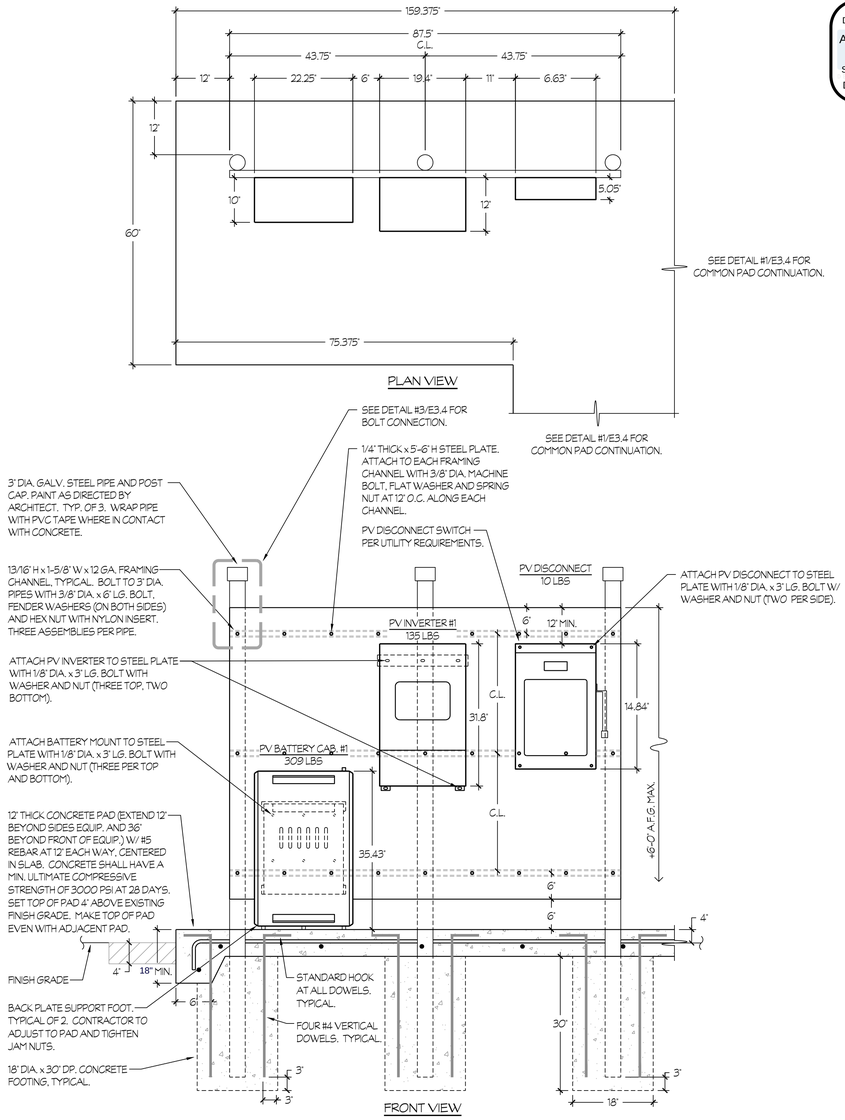
REGISTERED PROFESSIONAL ENGINEER
BENJAMIN KIRK EASTHAM
No. E-24978
Exp. 6/30/25
ELECTRICAL
STATE OF CALIFORNIA

Z:\Drafting\Jobs\RDS\SCHOOLS\Coalinga-Huron USD\Cheney Kindergarten\E3.3.dwg DATE SAVED: 04/10/24 BY: Casey DATE PLOTTED: 08/02/24 JOB #: 23-123-JJ



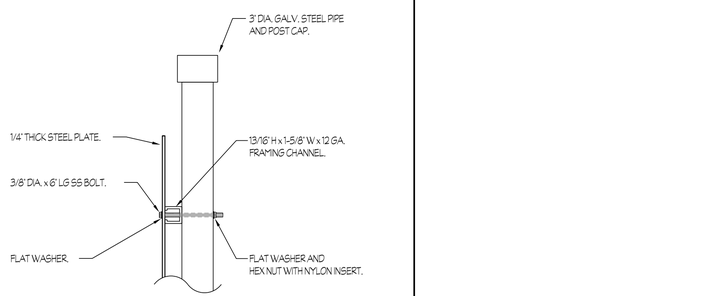
1 MAIN SWITCHBOARD "MSB", PV DISCONNECT, PV INVERTER AND PV BATTERY MOUNTING

NTS



2 PV DISCONNECT, PV INVERTER AND PV BATTERY MOUNTING

NTS



3 CHANNEL, BACKBOARD AND POLE ASSEMBLY

NTS

APPROVALS

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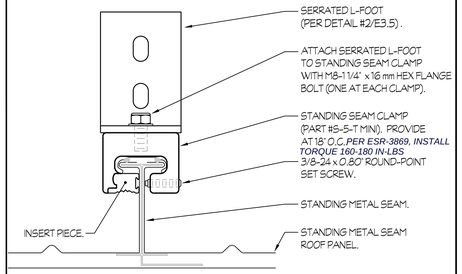
E3.4

PROJECT 23044

REGISTERED PROFESSIONAL ENGINEER
ANDREW KIRK SINGLETON
No. 34166
Exp. 6/30/25
ELECTRICAL
STATE OF CALIFORNIA

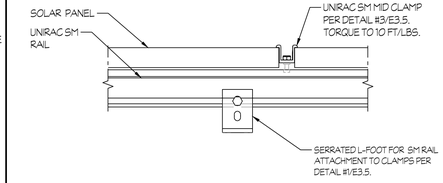
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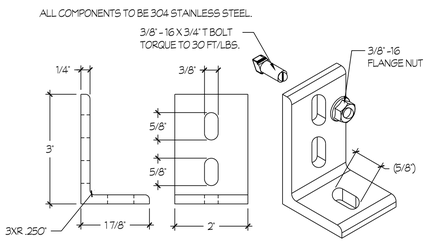
1 SOLAR ATTACHMENT - L FOOT

(FOR STANDING METAL SEAM ROOF) NTS



4 SOLAR PANEL MOUNT - SIDE

FOR WOOD FRAME ROOF NTS



PART # TABLE	
P/N	DESCRIPTION
304001C	L-FOOT SERR W/ T-BOLT CLR

2 SERRATED L-FOOT DETAIL

NTS

SOLAR PANEL DIMENSIONS	
WIDTH	41.1"
LENGTH	74.0"
THICKNESS	1.26"
WEIGHT	48.5 LBS.

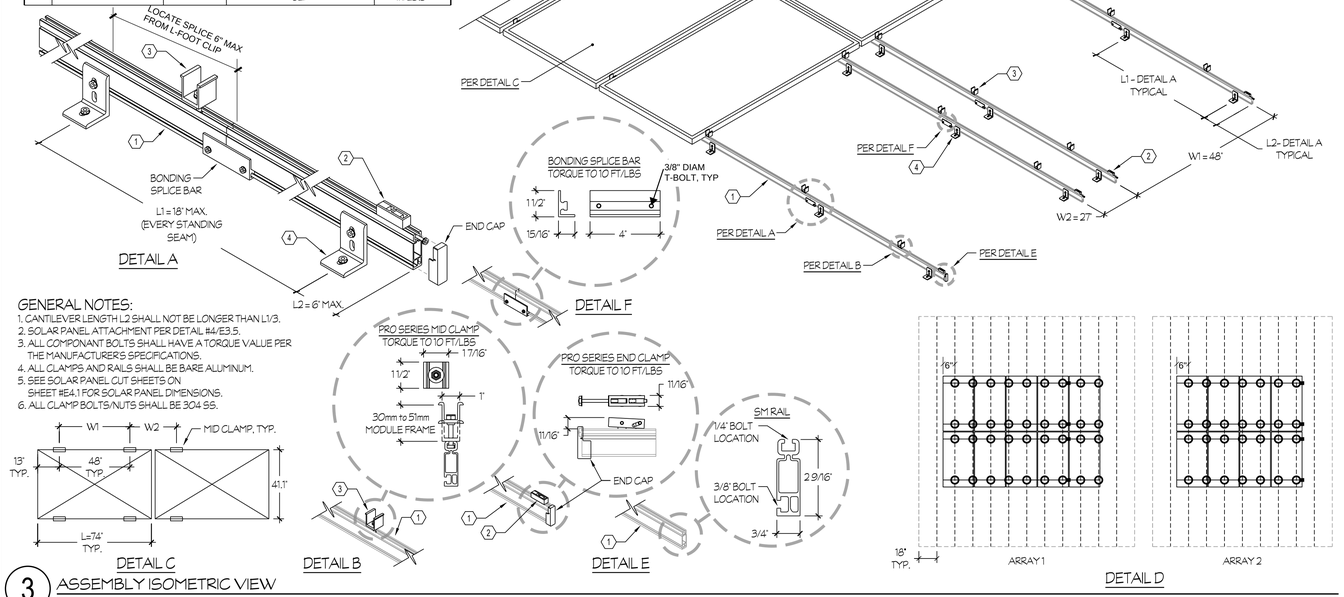
PANEL LOAD RATING (psf) (1)		
	PUSH	PULL
ALLOWABLE	75	55
STRENGTH LEVEL	113	84

(1) BASED ON ONE PANEL AS THE EFFECTIVE AREA.

LEGEND	
	SOLAR PANELS
o	ATTACHMENT POINT
▪	SPLICE
———	RAIL LINES
- - - - -	ROOF DECK RIB
DISTRIBUTED DEAD LOAD	2.75 psf
AVERAGE ROOF POINT DEAD LOAD	11.34 psf

LOADS USED FOR DESIGN	
BUILDING CODE	ASCE 7-16
BASIC WIND SPEED	93.00 mph
GROUND SNOW LOAD	0.00 psf
SEISMIC SS	1.782
ELEVATION	15 ft
RISK CATEGORY	II
WIND EXPOSURE	C
TOPOGRAPHICAL FACTOR	1.00
VELOCITY PRESSURE	15.59 psf

UNIRAC RACKING COMPONENTS				
1	RAIL	320168M	SM RAIL 168" MILL	DETAILS #3/E3.5
1	RAIL	320246m	SM RAIL 246" MILL	DETAILS #3/E3.5
2	PRO SERIES END CLAMP	302035M	ENDCLAMP PRO	DETAILS #3/E3.5
3	PRO SERIES MID CLAMP	302030M	MIDCLAMP PRO - MILL	DETAILS #3/E3.5
4	L-FOOT	304001C	L -FOOT SERRATED W/T-BOLT, CLR	DETAILS #1/E3.5



GENERAL NOTES:

1. CANTILEVER LENGTH L2 SHALL NOT BE LONGER THAN L1/3.
2. SOLAR PANEL ATTACHMENT PER DETAIL #4/E3.5.
3. ALL COMPONANT BOLTS SHALL HAVE A TORQUE VALUE PER THE MANUFACTURER'S SPECIFICATIONS.
4. ALL CLAMPS AND RAILS SHALL BE BARE ALUMINUM.
5. SEE SOLAR PANEL CUT SHEETS ON SHEET #EA.1 FOR SOLAR PANEL DIMENSIONS.
6. ALL CLAMP BOLTS/NUTS SHALL BE 304 SS.

3 ASSEMBLY ISOMETRIC VIEW

NTS

PHOTOVOLTAIC SOLAR SYSTEMS - GENERAL NOTES

1. THESE DRAWINGS HAVE BEEN PREPARED WITH INFORMATION PROVIDED IN ORIGINAL DESIGN DOCUMENTS AND HAVE NOT BEEN VERIFIED FOR ACCURACY. NEW DESIGN AND REQUIREMENTS WERE BASED ON THE ASSUMPTION OF EXISTING INFORMATION BEING ACCURATE. ANY DISCREPANCIES OR QUESTIONABLE POINTS SHALL BE IMMEDIATELY REPORTED TO THE ENGINEER.
2. ALL ELECTRICAL MATERIALS AND EQUIPMENT SHALL BE NEW AND SHALL BE LISTED BY UNDERWRITER'S LABORATORIES (UL) AND BEAR THEIR LABEL, OR LISTED AND CERTIFIED BY A NATIONALLY RECOGNIZED TESTING AUTHORITY. ALL LIKE EQUIPMENT, MATERIAL, FIXTURES, ETC. SHALL BE OF SAME MANUFACTURER AT ALL TIMES - NO EXCEPTIONS. CUSTOM MADE EQUIPMENT SHALL HAVE COMPLETE TEST DATA SUBMITTED BY THE MANUFACTURER ATTESTING TO ITS SAFETY. IN ADDITION, THE MATERIALS, EQUIPMENT AND INSTALLATION SHALL COMPLY WITH THE REQUIREMENTS, STANDARDS, RULES, AND REGULATIONS OF THE FOLLOWING AND BE MOST SUITABLE TO THE PURPOSE INTENDED:

   AMERICAN SOCIETY OF TESTING MATERIALS (ASTM)
   INSULATED POWER CABLE MANUFACTURERS ASSOCIATION (IPCMA)
   NATIONAL ELECTRICAL MANUFACTURERS ASSOCIATION (NEMA)
   AMERICAN STANDARD ASSOCIATION (ASA)
   NATIONAL FIRE PROTECTION AGENCY (NFPA)
   AMERICAN NATIONAL STANDARD INSTITUTE (ANSI)
   CALIFORNIA ELECTRICAL CODE (CEC), 2022 EDITION
   CALIFORNIA CODE OF REGULATIONS TITLE 24 (CCR)
   INSTITUTE OF ELECTRICAL AND ELECTRONIC ENGINEERS (IEEE)
   NATIONAL ELECTRICAL CODE (NEC), 2020 EDITION
   ELECTRONIC INDUSTRY ASSOCIATION (EIA)
   TELECOMMUNICATIONS INDUSTRY ASSOCIATION (TIA)
3. ELECTRICAL DOCUMENTS ARE DIAGRAMMATIC AND INDICATE THE GENERAL LAYOUT OF THE COMPLETE CONSTRUCTION WORK. DO NOT SCALE THE ELECTRICAL DRAWINGS FOR LOCATIONS OF ANY ELECTRICAL, ARCHITECTURAL, STRUCTURAL, CIVIL, OR MECHANICAL ITEMS OR FEATURES. DUE TO STRUCTURAL CONDITIONS, MECHANICAL DUCTING, OR PIPING REASONS, ELECTRICAL CONTRACTOR MAY DESIRE TO INSTALL THE WORK IN A MANNER DIFFERENT FROM THAT SHOWN. ROUTING OF RACEWAYS SHALL BE AT THE OPTION OF THE CONTRACTOR UNLESS OTHERWISE NOTED AND SHALL BE COORDINATED WITH OTHER SECTIONS.
4. ALL WIRING AND CABLING SHALL BE IN CONDUIT. ALL EXPOSED CONDUITS SHALL BE RIGID, GALVANIZED STEEL OR INTERMEDIATE METAL CONDUITS (IMC) OR ELECTRICAL METALLIC TUBING (EMT). ALL CONDUITS SHALL BE INSTALLED PARALLEL WITH, OR AT RIGHT ANGLES TO THE BUILDING LINES, BEAMS, OR CEILING. ALL LONG CONDUIT RUNS SHALL INCLUDE PULL BOXES AT 100-FOOT INCREMENTS AND SIZED AS REQUIRED OR NOTED. IN ADDITION, ALL CONDUITS CROSSING CEILING STRUCTURE EXPANSIONS SHALL HAVE APPROVED EXPANSION FITTINGS ACCORDINGLY. FLEXIBLE CONDUIT IS PERMITTED ONLY FOR SHORT LENGTHS TO EQUIPMENT TERMINATION AS REQUIRED (NOT TO EXCEED 5' IN LENGTH).
5. ALL CONDUCTORS SHALL BE COPPER. CONDUCTORS #10-AWG AND LARGER SHALL BE STRANDED TYPE WITH "THWN/THHN" INSULATION (75 DEGREES CELSIUS, WET OR DRY). ALUMINUM CONDUCTORS ARE NOT PERMITTED.
6. ALL FINAL CONNECTIONS TO AND INSTALLATION OF FURNISHED BY OTHERS EQUIPMENT SHALL BE MADE BY THE ELECTRICAL CONTRACTOR.
7. UTILITY PENETRATIONS OF ANY KIND IN FIRE AND SMOKE PARTITIONS AND CEILING ASSEMBLIES SHALL BE FIRE STOPPED AND SEALED WITH AN APPROVED MATERIAL SECURELY INSTALLED.
8. REFER TO SHEET #EG1.1, "SEISMIC ANCHORAGE REQUIREMENTS", FOR THE SEISMIC BRACING AND ANCHORAGE OF ELECTRICAL CONDUITS.
9. SOLAR PANELS AND SUPPORT SYSTEM TO BE GROUNDED PER CEC 250 AND 690.
10. INVERTER INCLUDES INTEGRAL DC DISCONNECT UNLESS OTHERWISE NOTED.
11. SECURELY FASTEN ALL ELECTRICAL EQUIPMENT BY MEANS OF RODS, HANGERS, SUPPORTS, GUIDES, ANCHORS AND SWAY BRACES TO MAINTAIN ALIGNMENT, TO PREVENT EQUIPMENT MOVEMENT, AND TO RESIST SEISMIC FORCES. DO NOT SECURE ANY ELECTRICAL EQUIPMENT TO ACOUSTICAL CEILING SUPPORT WIRES OR NON STRUCTURAL ELEMENTS.
12. STRAIGHT FEEDER, BRANCH CIRCUIT AND CONDUIT RUNS SHALL BE PROVIDED WITH SUFFICIENT PULL BOXES TO LIMIT THE MAXIMUM LENGTH OF ANY SINGLE CABLE PULL TO 100 FEET. PULL BOXES SHALL BE SIZED PER CODE OR AS INDICATED ON DRAWINGS. LOCATIONS SHALL BE DETERMINED IN THE FIELD OR AS INDICATED ON THE DRAWINGS.
13. FEEDERS:

13.A. CONDUITS FOR SOLAR SYSTEMS SHALL BE IDENTIFIED WITH STENCIL MARKINGS AT 100 FOOT INCREMENTS, AT EACH INTERSECTION, AND AT EACH CROSSOVER FROM ONE AREA TO ANOTHER, PENETRATION OF WALLS, AND FLOORS WITH LETTERING 3/4" MINIMUM FOR 1" CONDUIT OR LESS, 1" MINIMUM FOR 2" CONDUIT OR LESS, AND 1-1/2" MINIMUM FOR 4" OR LESS IN THE COLORS AS FOLLOWS:

208/240 VOLTS: BLACK
1000 VOLTS: RED

14. ALL CONDUCTORS AND CABLES SHALL BE IDENTIFIED AT EACH JUNCTION BOX, OUTLET BOX, CABINET, PULL BOX, ETC., WITH VINYL SELF-ADHESIVE TAPE SHOWING PANEL AND CIRCUIT NUMBERS, CONTROL WIRE NUMBER OR OTHER APPROPRIATE INFORMATION REGARDING THE SYSTEM IT REPRESENTS.
15. DRAWINGS DO NOT SHOW ALL OFFSETS, BENDS, SPECIFIC FITTINGS, JUNCTION BOXES NOR PULL BOXES NECESSARY TO MEET JOB CONDITIONS. THESE ITEMS SHALL BE PROVIDED WHERE NECESSARY.
16. ALL EXISTING EQUIPMENT, MATERIAL, CONDUCTORS AND CABLES THAT ARE NOT TO BE REUSED IN THEIR PRESENT LOCATIONS SHALL BE CAREFULLY DISCONNECTED (CONDUCTORS AND CABLES REMOVED TO SOURCE OF SUPPLY) AND STORED IN A SAFE PLACE. IT SHALL BE MADE AVAILABLE FOR INSPECTION BY THE OWNER WHO WILL DESIGNATE WHAT IS TO BE STORED BY THE OWNER AND WHAT IS TO BE REMOVED FROM THE PREMISES BY THE ELECTRICAL CONTRACTOR.
17. THE ALTERATION OF THE EXISTING BUILDING IS WORK OF A COMPLEX NATURE WHICH WILL REQUIRE PLANNING, CAREFUL PREPARATION AND EXECUTION, ATTENTION TO DETAIL AND CLOSE SUPERVISION BY THE ELECTRICAL CONTRACTOR. ELECTRICAL CONTRACTOR WILL BE REQUIRED TO DO THIS WORK IN FULL COOPERATION WITH THE OTHER CONSTRUCTION TRADES AND, SUBJECT TO SCHEDULING, ARRANGE TO MINIMIZE DISRUPTION OF THE NORMAL ACTIVITIES OF THE FACILITY. ELECTRICAL CONTRACTOR TO COORDINATE ALL ACTIVITIES WITH OWNER.
18. IN AREAS WHERE THERE ARE NO ALTERATIONS INDICATED, THE EXISTING FACILITIES SHALL REMAIN IN SERVICE. IN CASE OF DOUBT, ASSUME THAT THE EXISTING ELECTRICAL SERVICE IS TO REMAIN IN OPERATION THROUGHOUT THE CONSTRUCTION PERIOD.
19. INSTALLATION OF ALL ELECTRICAL EQUIPMENT SHALL BE CAREFULLY COORDINATED WITH EXISTING CONDITIONS TO AVOID POSSIBLE INTERFERENCE PROBLEMS.
20. OUTDOOR ELECTRICAL EQUIPMENT SHALL BE INSTALLED IN SUITABLE ENCLOSURES AND SHALL BE PROTECTED FROM ACCIDENTAL CONTACT BY UNAUTHORIZED PERSONNEL, OR BY VEHICULAR TRAFFIC, OR BY ACCIDENTAL SPILLAGE OR LEAKAGE FROM PIPING SYSTEMS.
21. REFER TO MANUFACTURERS MOUNTING INSTALLATION REQUIREMENTS FOR PROPER SUPPORT SPACING AND ATTACHMENTS PER CALIFORNIA BUILDING CODE. INSTALL AS REQUIRED.
22. EXACT LOCATION OF SOLAR SYSTEM TO BE FIELD VERIFIED AND INSTALLED AS REQUIRED BY MANUFACTURER AND APPLICABLE CALIFORNIA BUILDING CODE.
23. SOLAR CIRCUIT BREAKERS SHALL BE INSTALLED ON OPPOSITE ENDS OF THE BUS BAR FROM OTHER SOURCE FEEDS (i.e. MAIN CIRCUIT BREAKER).
24. ACCESS AND WORKING SPACE SHALL BE PROVIDED AND MAINTAINED ABOUT ALL ELECTRICAL EQUIPMENT TO PERMIT READY AND SAFE OPERATION AND MAINTENANCE OF SUCH EQUIPMENT. THERE SHALL BE A MINIMUM CLEAR SPACE OF 36" IN FRONT OF EQUIPMENT; THE WIDTH OF CLEAR SPACE SHALL BE 32" AND A HEIGHT OF 6-1/2 FEET FROM GRADE.
25. THE DESIGN OF SUPPORT FRAME SYSTEM SHALL BE BASED ON CALCULATIONS OR ON TESTING IN COMPLIANCE WITH ICC-ES AC428 "ACCEPTANCE CRITERIA FOR MODULAR FRAMING SYSTEM USED TO SUPPORT PHOTOVOLTAIC (PV) MODULES," OR EQUAL, PER IR A-5 AND IR 16-8.
26. SOLAR PANEL SYSTEM REQUIREMENTS
    a. SOLAR PANELS SHALL BE LISTED AND LABELED IN ACCORDANCE WITH UL 1703 OR WITH BOTH UL 61730-1 AND UL 61730-2 (CBC 3111.3.1) FOR THE PANEL ORIENTATIONS SHOWN ON PLANS, AND THIS SHALL BE INDICATED ON THE DRAWINGS.
    b. SOLAR PANEL ORIENTATION (PORTRAIT AND/OR LANDSCAPE LAYOUTS), ANCHORAGE POINT LOCATION, AND INSTALLATION TOLERANCE RANGE SHALL BE SPECIFIED ON THE DRAWINGS. PANEL CONNECTION GEOMETRY SHALL BE CONSISTENT WITH UL 1703 TESTS (AND UL 2703 TEST IF UTILIZED). IF HORIZONTAL SLIP JOINTS (e.g., THERMAL EXPANSION JOINTS) IN FRAMING MEMBERS ARE PRESENT, PANELS MUST NOT SPAN ACROSS NOR BE CONNECTED ON OPPOSING SIDES OF THE SLIP JOINTS.
    c. DRAWINGS MUST SPECIFY OVERALL SOLAR PANEL DIMENSIONS AND FULLY-DIMENSIONED FRAME CONFIGURATION OF THE SPECIFIED PANEL INCLUDING HEIGHT, LENGTH, WIDTH, THICKNESS OF EACH WEB/FLANGE, AND MATERIAL GRADE.
    d. DRAWINGS MUST SPECIFY THE SOLAR PANEL LOAD RATING IN POUNDS PER SQUARE FOOT (psf) BASED ON AN EFFECTIVE AREA EQUAL TO THE AREA OF ONE PV PANEL. THE LOAD RATING SHALL BE PROVIDED AS BOTH ALLOWABLE AND STRENGTH LEVEL CAPACITIES, FOR CLARITY.

CALIFORNIA STATE FIRE MARSHAL PHOTOVOLTAIC INSTALLATION GUIDELINES LABELS

PLACE ON ALL CONDUIT, LOCATED ON ROOF, INTERIOR AND EXTERIOR, EVERY 5 FEET, AT TURNS AND ABOVE AND/OR BELOW PENETRATIONS AND ALL DC COMBINER AND JUNCTION BOXES. IN ½" WHITE LETTERING ON RED BACKGROUND, ON FADE-RESISTANT MATERIAL:

WARNING: PHOTOVOLTAIC POWER SOURCE

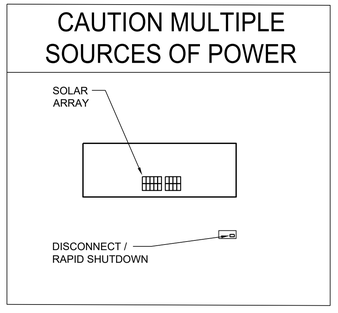
PLACE THIS LABEL WITHIN MAIN SERVICE DISCONNECT
(OR ON OUTSIDE IF DISCONNECT IS OPERABLE WITH COVER CLOSED)

CAUTION: SOLAR ELECTRIC SYSTEM

REFLECTIVE, WHITE LETTERING ON RED BACKGROUND, TYPICAL UNLESS OTHERWISE NOTED

CEC 705.10
PLACE A PERMANENT PLAQUE DENOTING ALL ELECTRIC POWER SOURCES ON OR IN THE PREMISES AT THE SERVICE EQUIPMENT LOCATION AND AT ALL ELECTRIC POWER PRODUCTION SOURCES CAPABLE OF INTERCONNECTION

CAUTION MULTIPLE SOURCES OF POWER



CEC 690.13 (B) & 706.15 (C)
PLACE THIS LABEL ON ALL DISCONNECTING MEANS WHERE ENERGIZED IN AN OPEN POSITION

WARNING
ELECTRIC SHOCK HAZARD
DO NOT TOUCH TERMINALS
TERMINALS ON BOTH THE
LINE AND LOAD SIDE MAY
BE ENERGIZED IN THE
OPEN POSITION

CEC 690.53
PLACE THIS LABEL ON ALL PHOTOVOLTAIC DC DISCONNECTING MEANS (ON INVERTER IF INTEGRATED DC DISCONNECTS AND AT SEPARATE DC DISCONNECT IF APPLICABLE)

PHOTOVOLTAIC SYSTEM DISCONNECT	
RATED MAX POWER POINT CURRENT (IMP):	10.6A
RATED MAX POWER POINT VOLTAGE (VMP):	560V
MAX SYSTEM VOLTAGE (VOC):	600V
SHORT CIRCUIT CURRENT (ISC):	11.1A

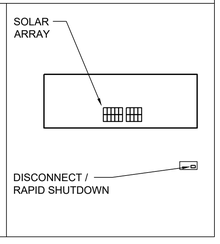
CEC 690.54
PLACE THIS LABEL AT "INTERACTIVE POINT OF INTERCONNECTION" (AT MAIN SERVICE PANEL AND SUBPANEL IF APPLICABLE)

INVERTER "INV-1" INTERACTIVE PHOTOVOLTAIC POWER SOURCE	
RATED AC OUTPUT CURRENT (A):	27.8A
NOMINAL OPERATING AC VOLTAGE (V):	208V, 3-PH

CEC 690.56(C)
PLACE THIS LABEL AT SERVICE EQUIPMENT LOCATION.

SOLAR PV SYSTEM IS EQUIPPED WITH RAPID SHUTDOWN

TURN RAPID SHUTDOWN SWITCH TO THE "OFF" POSITION TO SHUTDOWN PV SYSTEM AND REDUCE SHOCK HAZARD IN ARRAY



BLACK LETTERING ON YELLOW BACKGROUND

CEC 705.10(D)(4)
PLACE THIS LABEL AT UTILITY METER.

WARNING
DUAL POWER SOURCES SECOND SOURCE IS PHOTOVOLTAIC SYSTEM

CEC 690.13(B)
PLACE THIS LABEL AT ALL PV DISCONNECTION POINTS.

PV SYSTEM DISCONNECT

CEC 690.56(C)(2)
PLACE THIS LABEL AT PV RAPID SHUTDOWN SWITCH.

RAPID SHUTDOWN SWITCH FOR SOLAR PV SYSTEM

CEC 705.12(B)(3)
PLACE THIS LABEL AT P.O.C. TO SERVICE DISTRIBUTION EQUIPMENT (I.E. MAIN PANEL (AND SUBPANEL IF APPLICABLE))

WARNING
POWER SOURCE OUTPUT CONNECTION
DO NOT RELOCATE THIS
OVERCURRENT DEVICE

APPROVALS

FILE # 10-28 APPLICATION # 02-122132

IDENTIFICATION STAMP
DIV. OF THE STATE ARCHITECT
APP: 02-122132 INC: A
REVIEWED FOR
SS ☑ FLS ☑ ACS ☑
DATE: 08/06/2024

LICENSED ARCHITECT
MICHAEL J. SCOTT JR
No. C-34286
REN: 08-31-25
STATE OF CALIFORNIA

DATE: JANUARY 31, 2024

NEW TK CLASSROOM AT CHENEY KINDERGARTEN
COALINGA-HURON UNIFIED SCHOOL DISTRICT
COALINGA, FRESNO COUNTY, CA

REVISIONS

MANGINI ARCHITECTURE + INGENUITY
MANGINI ASSOCIATES INC.
4320 West Mineral King Avenue
Visalia, California 93291
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(559) 627-0630 Office
(559) 627-1926 Fax

TITLE
SOLAR DETAILS AND NOTES

E3.5

PROJECT 23044

Rose Sing Eastham & Associates
Electrical Consultants
131 S. Dunworth - (559)733-2671
Visalia, California 93292-6705

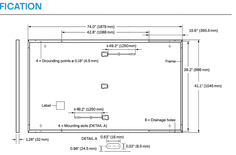
REGISTERED PROFESSIONAL ENGINEER
ROBERT KIRK EASTHAM
No. E-14766
Exp. 6/30/25
ELECTRICAL
STATE OF CALIFORNIA

Z:\Drafting\Jobs\RSES\23003.5\Coalinga-Huron USD\Cheney Kindergarten\E3.5.dwg DATE SAVED: 07/23/24 By: Casey DATE PLOTTED: 08/02/24 JOB # 23-123-JJ



MECHANICAL SPECIFICATION

Format	74.0 in × 41.1 in × 1.26 in (including frame) (1879 mm × 1045 mm × 32 mm)
Weight	48.5 lbs (22.0 kg)
Front Cover	0.13 in (3.2 mm) thermally pre-stressed glass with anti-reflection technology
Back Cover	Composite film
Frame	Black anodized aluminum
Cell	6 × 22 monocrystalline Q.ANTUM solar half cells
Junction Box	2.09–3.98 in × 1.26–2.36 in × 0.59–0.71 in (53–101 mm × 32–60 mm × 15–18 mm), IP67, with bypass diodes
Cable	4 mm² Solar cable; (+) ≥ 49.2 in (1250 mm), (−) ≥ 49.2 in (1250 mm)
Connector	Stäubli MC4; IP68

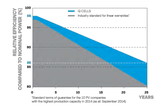


ELECTRICAL CHARACTERISTICS

POWER CLASS			395	400	405	410	415
MINIMUM PERFORMANCE AT STANDARD TEST CONDITIONS, STC¹ (POWER TOLERANCE +5 W / −0 W)							
Minimum	Power at MPP²	P_{MPP} [W]	395	400	405	410	415
	Short Circuit Current³	I_{SC} [A]	11.13	11.16	11.19	11.22	11.26
	Open Circuit Voltage³	V_{OC} [V]	45.03	45.06	45.09	45.13	45.16
	Current at MPP	I_{MPP} [A]	10.58	10.64	10.70	10.76	10.82
	Voltage at MPP	V_{MPP} [V]	37.32	37.59	37.85	38.11	38.37
	Efficiency²	η [%]	≥20.1	≥20.4	≥20.6	≥20.9	≥21.1
MINIMUM PERFORMANCE AT NORMAL OPERATING CONDITIONS, NMOT²							
Minimum	Power at MPP	P_{MPP} [W]	296.4	300.1	303.9	307.6	311.4
	Short Circuit Current	I_{SC} [A]	8.97	8.99	9.02	9.04	9.07
	Open Circuit Voltage	V_{OC} [V]	42.46	42.49	42.52	42.56	42.59
	Current at MPP	I_{MPP} [A]	8.33	8.38	8.43	8.48	8.53
	Voltage at MPP	V_{MPP} [V]	35.59	35.82	36.04	36.27	36.49

¹ Measurement tolerances P_{MPP} ±3%; I_{SC}; V_{OC} ±5% at STC: 1000 W/m², 25 ± 2 °C, AM 1.5 according to IEC 60904-3 • ² 800 W/m², NMOT, spectrum AM 1.5

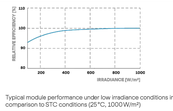
Q CELLS PERFORMANCE WARRANTY



At least 98 % of nominal power during first year. Thereafter max. 0.5 % degradation per year. At least 93.5 % of nominal power up to 10 years. At least 86 % of nominal power up to 25 years.

All data within measurement tolerances. Full warranties in accordance with the warranty terms of the Q CELLS sales organisation of your respective country.

PERFORMANCE AT LOW IRRADIANCE



Typical module performance under low irradiance conditions in comparison to STC conditions (25 °C, 1000 W/m²)

TEMPERATURE COEFFICIENTS

Temperature Coefficient of I_{SC}	α	[%/K]	+0.04	Temperature Coefficient of V_{OC}	β	[%/K]	−0.27
Temperature Coefficient of P_{MPP}	γ	[%/K]	−0.34	Nominal Module Operating Temperature	NMOT	[°F]	109 ± 5.4 (43 ± 3 °C)

PROPERTIES FOR SYSTEM DESIGN

Maximum System Voltage V_{SYS}	[V]	1000 (IEC)/1000 (UL)	PV module classification	Class II
Maximum Series Fuse Rating	[A DC]	20	Fire Rating based on ANSI / UL 61730	TYPE 2
Max. Design Load, Push / Pull²	[lbs/ft²]	75 (3600 Pa)/55 (2660 Pa)	Permitted Module Temperature on Continuous Duty	−40 °F up to +185 °F (−40 °C up to +85 °C)
Max. Test Load, Push / Pull²	[lbs/ft²]	113 (5400 Pa)/84 (4000 Pa)		

² See installation Manual

QUALIFICATIONS AND CERTIFICATES

UL 61730, CE-compliant, Quality Controlled PV - TÜV Rheinland, IEC 61215:2016, IEC 61730:2016, U.S. Patent No. 9,893,215 (solar cells), QCPV Certification ongoing.

PACKAGING INFORMATION

Horizontal packaging	76.4 in 1940 mm	43.3 in 1100 mm	48.0 in 1220 mm	1656 lbs 751 kg	24 pallets	24 pallets	32 modules

Note: Installation instructions must be followed. See the installation and operating manual or contact our technical service department for further information on approved installation and use of this product.

Hanwha Q CELLS America Inc.
400 Spectrum Center Drive, Suite 1400, Irvine, CA 92618, USA | **TEL** +1 949 748 59 96 | **EMAIL** inquiry@us.q-cells.com | **WEB** www.q-cells.us

Specifications subject to technical changes © **Q CELLS** Q.PEAK DUO ML-G10+ 395-415_2020-06_Rev02_NA

120/208V, 3 PH, 4 W
225 A. BUSSING NO MAIN BKR.
42 CIRCUIT

PANEL "L1A"

22K BREAKER A.I.C.
5 3/4" MAX. ENCL. DEPTH
SURF MOUNTING

CKT.	BKR	LOAD: V.A. A	B	C	DESCRIPTION	DESCRIPTION	LOAD: V.A. C	B	A	BKR	CKT.
1	20/1	1052			LIGHTS - EAST	LIGHTS - EXTERIOR			200	20/1	2
3	20/1		912		LIGHTS - CENTER	LIGHTS - EXTERIOR		225		20/1	4
5	20/1			912	LIGHTS - WEST	LIGHTING CONTROL PNL	500			20/1	6
7	20/1	720			RECEPT - JAN. EXTERIOR	RECEPT- DATA RACK			2500	30/1	8
9	20/1		720		RECEPT - ELEC. EXTERIOR	RECEPT- DATA RACK		1250		20/1	10
11	20/1			500	RECEPT - T.V.	RECEPT- DATA RACK	1250			20/1	12
13	20/1	500			RECEPT- COUNTER	RECEPT - T.V.			500	20/1	14
15	20/1		1080		RECEPT - CLASSRROM	RECEPT- COUNTER		500		20/1	16
17	20/1			1080	RECEPT - CLASSRROM	RECEPT - CLASSRROM	1080			20/1	18
19	20/1	500			RECEPT - T.V.	RECEPT - CLASSRROM			1080	20/1	20
21	20/1		500		RECEPT- COUNTER	F.A. EXPANDER PANEL		500		20/1	22 (1)
23	20/1			1080	RECEPT - CLASSRROM	EMS PANEL	500			20/1	24
25	20/1	1080			RECEPT - CLASSRROM	EF-4, 1/4 H.P.			696	20/1	26
27	20/1		540		RECEPT - W.P. ON ROOF	WH-1		2250		30/2	28
29	20/1			696	EF-1, 1/4 H.P.		2250				30
31	20/1	894			EF-2, 1/3 H.P.	SPARE				20/1	32
33	20/1		696		EF-3, 1/4 H.P.	LIGHTS - WALKWAY		276		20/1	34
35	20/1				SPARE	SPARE				20/1	36
37					SPACE	SPACE					38
39					SPACE	SPACE					40
41					SPACE	SPACE					42

LOAD SUMMARY	A	B	C	
CONNECTED LOAD (VA) :	9722	9449	9848	TOTAL CALCULATED LOAD FOR PANEL: 29913 VA
25% LCL/LML (VA) :	313	353	228	
TOTAL LOAD (VA) :	10035	9802	10076	
TOTAL LOAD (AMPS) :	83.6	81.7	84.0	

TYPICAL PANEL SCHEDULE NOTES:

(1) PROVIDE A LOCK-ON DEVICE AT THIS CIRCUIT BREAKER, 'RED IN COLOR', SPACEAGE #LOCK-FA OR EQUAL. PROVIDE AN ENGRAVED NAMEPLATE: 'FIRE ALARM CIRCUIT', WHITE LETTERS ON A RED BACKGROUND. MOUNT NAMEPLATE ONTO INTERIOR TRIM AND ADJACENT TO CIRCUIT BREAKER.

APPROVALS

FILE # 10-26 APPLICATION # 02-122132

IDENTIFICATION STAMP
DIV. OF THE STATE ARCHITECT
APP: 02-122132 INC: A
REVIEWED FOR
SS ☑ FLS ☑ ACS ☑
DATE: 08/06/2024

LICENSED ARCHITECT
MICHAEL J. SCOTT JR
No. C-31296
REN: 08-31-25
STATE OF CALIFORNIA

DATE: JANUARY 31, 2024

NEW TK CLASSROOM AT CHENEY KINDERGARTEN
COALINGA-HURON UNIFIED SCHOOL DISTRICT
COALINGA, FRESNO COUNTY, CA

REVISIONS

MANGINI ARCHITECTURE | INGENUITY
MANGINI ASSOCIATES INC.
4320 West Mineral King Avenue
Visalia, California 93291
www.mangini.us
(559) 627 1939 Office
(559) 627 1926 Fax

TITLE
PANEL SCHEDULES

E4.1

PROJECT 23044

Rose Sing Eastham & Associates
Electrical Consultants
131 S. Dunworth – (559)733-2671
Visalia, California 93292-6705

REGISTERED PROFESSIONAL ENGINEER
BRIAN KIRK EASTHAM
No. E-19706
Exp. 6/30/25
ELECTRICAL
STATE OF CALIFORNIA

Z:\Drafting\Jobs\RSES\CHOCO\Coalinga-Huron USD\Cheney Kindergarten\E4.1.dwg DATE: 2024/01 03/29/24 BY: Casey PLOTTED: 08/02/24 JOB #: 23-123-JJ

SIGNALS SYMBOLS

ALL DIMENSIONS TO CENTER OF BOX, U.O.N.

	U.O.N.	UNLESS OTHERWISE NOTED
	▬	TERMINAL CABINET (SIZE AS SHOWN)
	⟶	CONDUIT STUB - CAPPED AND LABELED.
(A)	◁	DATA OUTLET IN WALL (+18" U.O.N.)
	WA	DATA OUTLET IN CEILING WIRELESS ACCESS POINT (2 'D' CABLES)
(C)	◷	PUBLIC ADDRESS CLOCK, ON WALL (+96" U.O.N.)
(B)	S	PUBLIC ADDRESS SPEAKER, FLUSH MOUNTED IN T-BAR CEILING
(B)	H	PUBLIC ADDRESS HORN, FLUSH MOUNTED IN WALL +120", U.O.N. (WEATHERPROOF)
(A)	C	IP CAMERA, FLUSH MOUNTED BOX IN WALL +120", U.O.N.
(C)	K	INTRUSION ALARM KEY PAD (+48" U.O.N.)
	✕	INTRUSION ALARM DOOR CONTACT IN DOOR FRAMING
(C)	M	INTRUSION ALARM PASSIVE INFRARED DETECTOR ON CEILING
(C)	IS	INTRUSION ALARM SIREN, ON WALL (+96" U.O.N.)
	HC	HC LOCATION

SIGNALS SYMBOLS NOTES:

(A) ELECTRICAL CONTRACTOR SHALL PROVIDE A 5" SQUARE x 2 7/8" DEEP OUTLET BOX WITH SINGLE GANG RAISED RING, DEPTH AS REQUIRED. UNLESS OTHERWISE NOTED, RUN 1-1/4"C FROM OUTLET BOX AND STUB INTO ACCESSIBLE ATTIC SPACE ABOVE T-BAR CEILING. PROVIDE AN INSULATING BUSHING, BRIDGEPORT #TWB-54 OR EQUAL, AT STUB.

(B) ELECTRICAL CONTRACTOR SHALL PROVIDE SPECIAL BACK BOX PER MFG.

(C) ELECTRICAL CONTRACTOR SHALL PROVIDE A 4-11/16" SQUARE x 2 1/8" DEEP OUTLET BOX WITH SINGLE GANG RAISED RING, DEPTH AS REQUIRED. UNLESS OTHERWISE NOTED, RUN 3/4"C FROM OUTLET BOX AND STUB INTO ACCESSIBLE ATTIC SPACE ABOVE T-BAR CEILING. PROVIDE AN INSULATING BUSHING, BRIDGEPORT #TWB-52 OR EQUAL, AT STUB.

ASSISTIVE LISTENING SYSTEMS

PROVIDE ASSISTIVE LISTENING AS REQUIRED BY CBC SECTIONS 11B.219 & 11B.706 AND ADA 706. REFER TO SPECIFICATIONS FOR CLASSROOMS SYSTEMS. REFER TO DETAIL DRAWINGS FOR INSTALLED SOLUTIONS. CLASSROOM SYSTEMS ARE TO BE PORTABLE 'BRIEFCASE' STYLE FOR USE WHEN REQUESTED BY USERS.

SIGNALS / TELECOMMUNICATIONS APPLICABLE CODES AND STANDARDS

CODES:

2022 CALIFORNIA ELECTRICAL CODE (C.E.C.)

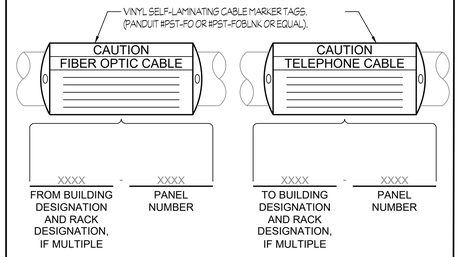
STANDARDS AND GUIDES:

NFPA 72 - NATIONAL FIRE ALARM CODE, (CALIFORNIA AMENDED)

ANSI/BICSI - TELECOMMUNICATIONS DISTRIBUTION METHODS MANUAL (TDMM), 13TH EDITION OR NEWER.

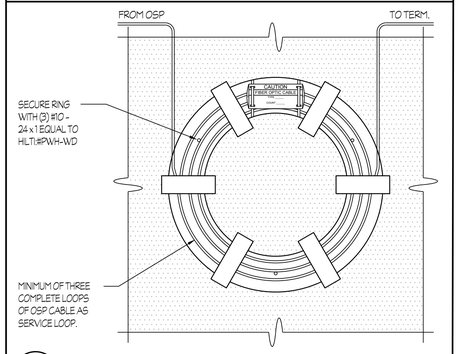
ANSI/BICSI 001-2017 - INFORMATION AND COMMUNICATION TECHNOLOGY SYSTEMS DESIGN AND IMPLEMENTATIONS BEST PRACTICES FOR EDUCATIONAL INSTITUTIONS AND FACILITIES.

ANSI/BICSI 005-2016 - ELECTRONIC SAFETY AND SECURITY (ESS) SYSTEM DESIGN AND IMPLEMENTATIONS BEST PRACTICES.



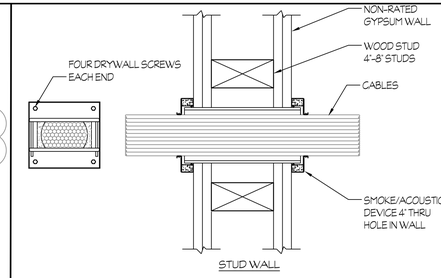
4 CABLE MARKER TAG

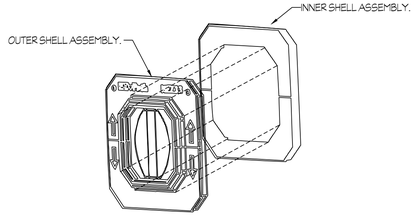
NTS



5 STORAGE RING FOR OSP CABLES

NTS



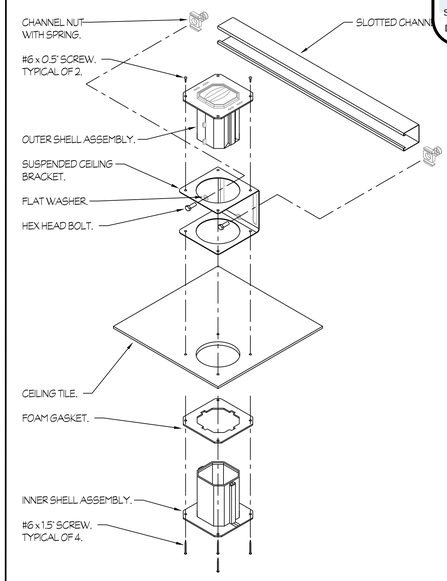


NOTES:

1. Cables – Aggregate cross-sectional area of cables in the sleeve to be 0% to max. 60% of the aggregate cross-sectional area of the sleeve. When there is no cable fill, device cover is to be tightly closed. Cables to be rigidly supported on both sides of the wall assembly.
2. Smoke/Acoustic Device – Device to be installed in accordance with the accompanying installation instructions.
3. STI FIRE STOP DEVICE # NEZDP233

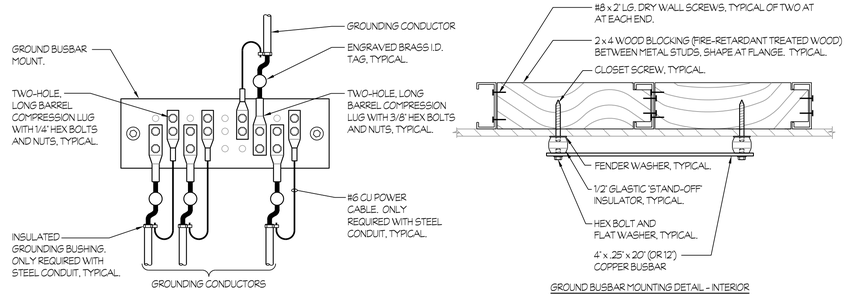
7 SMOKE AND ACOUSTICAL PATHWAY THRU WALL KIT

NTS



9 SMOKE AND ACOUSTICAL PATHWAY WITH CEILING KIT

NTS

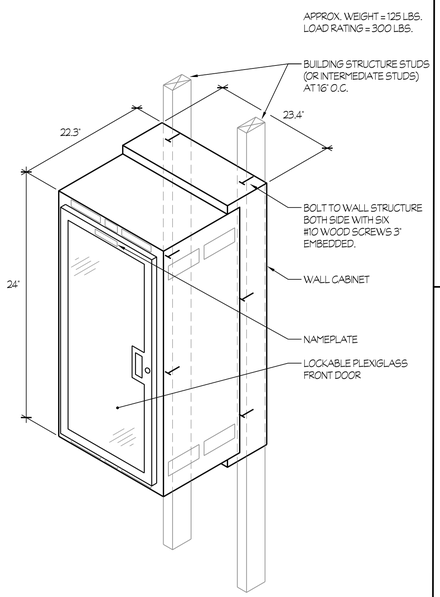


GROUND BUSBAR MOUNTING DETAIL - INTERIOR

GENERAL NOTE: THIS DETAIL ONLY
ALL CONNECTIONS TO BE NON-REVERSIBLE CRIMP CONNECTOR.
LABEL ALL CONNECTIONS WITH ENGRAVED BRASS I.D. TAGS.

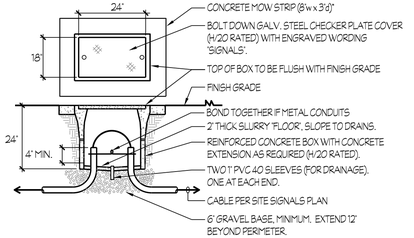
1 GROUND BUSBAR CONNECTION

NTS



6 HC/IDF CABINET WALL RACK MOUNTING

NTS

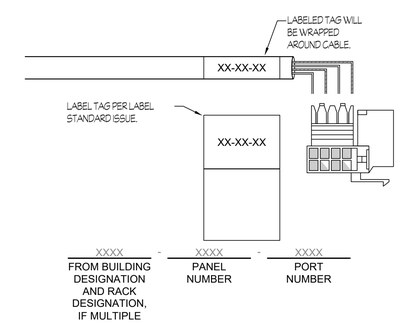


. NOTE: WHERE PULL BOX IS ADJACENT TO CONCRETE WALK, EXTEND MOWSTRIP TO CONNECT WITH WALK. FOAM SEAL ALL CONDUITS IN YARD BOXES.

.. NOTE: INTERIOR DIMENSIONS MEASURED AT 'OPENING' OF PULL BOX.

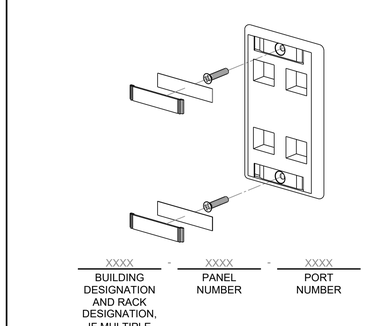
8 PULL BOX MOUNTING

NTS



2 CABLE LINK IDENTIFIER LABELING FORMAT

NTS

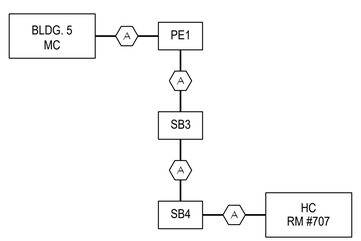


3 DATA OUTLET IDENTIFICATION MATRIX

NTS

SCHEDULE:

(A) NEW TWO 2"C. ONE FOR 6 STRAND OSP FIBER OPTIC CABLE. ONE FOR 25 PAIR CAT 3 OSP.



10 WIRING DIAGRAM

NTS

APPROVALS

FILE # 10-28 APPLICATION # 02-122132

IDENTIFICATION STAMP
DIV. OF THE STATE ARCHITECT
APP: 02-122132 INC:
REVIEWED FOR
SS ☑ FLS ☑ ACS ☑
DATE: 08/06/2024

LICENSED ARCHITECT
MICHAEL J. SCOTT JR
No. C-34296
REN: 08-31-25
STATE OF CALIFORNIA

DATE: JANUARY 31, 2024

NEW TK CLASSROOM AT CHENEY KINDERGARTEN
COALINGA-HURON UNIFIED SCHOOL DISTRICT
COALINGA, FRESNO COUNTY, CA

REVISIONS

MANGINI ARCHITECTURE INGENUITY
www.mangini.us
(559) 627.0630 Office
(559) 627.1926 Fax
MANGINI ASSOCIATES INC.
4320 West Mineral King Avenue
Visalia, California 93291

TITLE
SIGNALS SYMBOLS, CODES AND NOTES

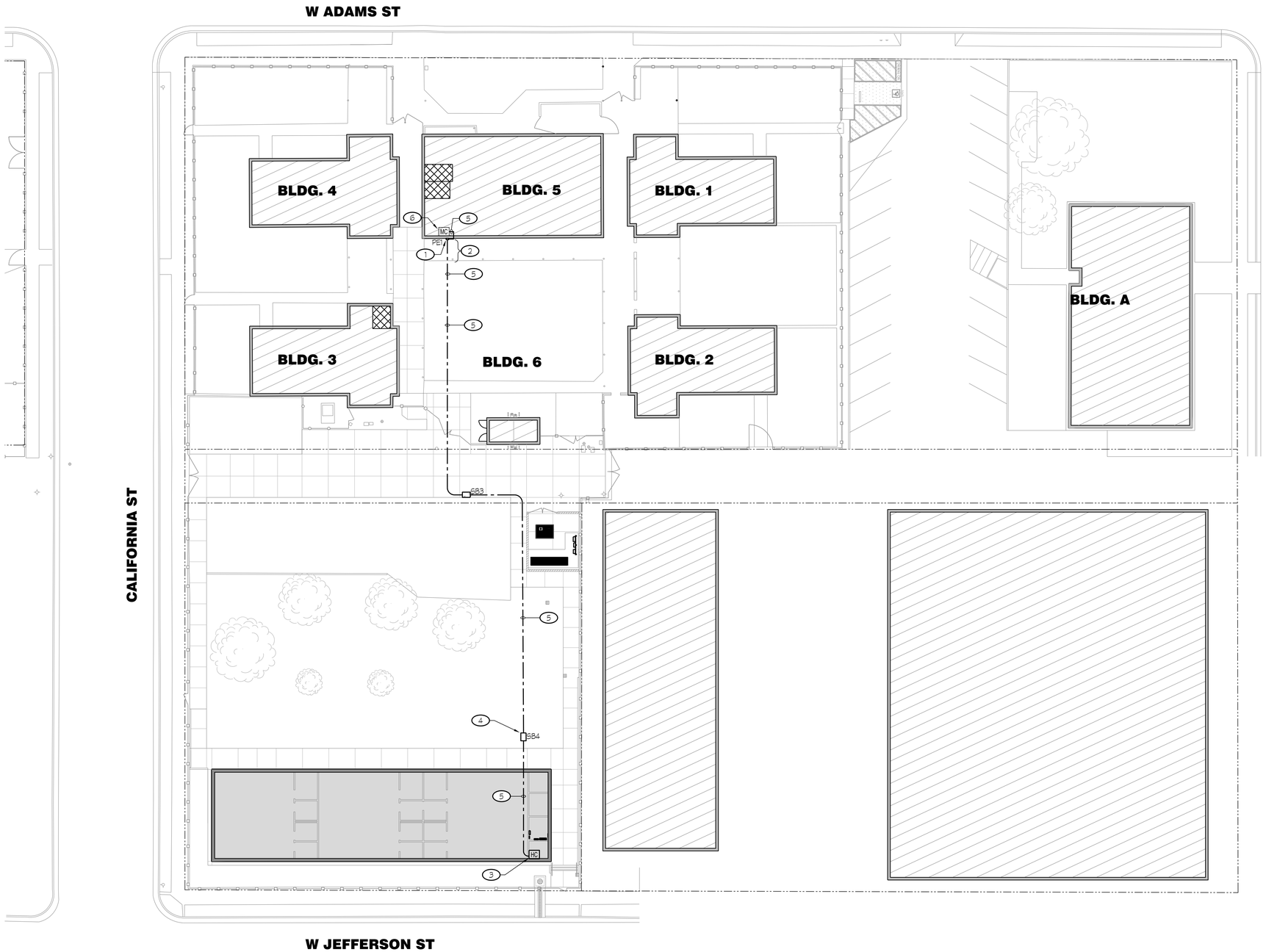
TG1.1

PROJECT 23044

Rose Sing Eastham & Associates
Electrical Consultants
131 S. Dunworth - (559)733-2671
Visalia, California 93292-6705

REGISTERED PROFESSIONAL ENGINEER
KIRK EASTHAM
No. E-19066
Exp. 6/30/25
ELECTRICAL
STATE OF CALIFORNIA

Z:\Drafting\Jobs\KRS\SCHOOLS\Coalinga-Huron USD\Cheney Kindergarten\TG1.1.dwg DATE SAVED: 08/19/24 BY: LonceSmith DATE PLOTTED: 08/02/24 JOB # 23-123-JJ



NOTES (THIS SHEET ONLY):

1. PROVIDE A SIGNALS PULL ENCLOSURE HIGH ON EXTERIOR WALL ABOVE INTERIOR CEILING. SEAL ALL PENETRATIONS TO PREVENT LEAKS.
2. SAWCUT AND PATCH EXISTING CONCRETE TO UNDERGROUND NEW CONDUITS AS SHOWN.
3. PROVIDE HC CABINET PER DETAIL #6/TG1.1. PROVIDE BONDING AND GROUNDING PER DETAIL #1/TG1.1.
4. NEW PULL BOX PER DETAIL #8/TG1.1. TYPICAL, U.O.N..
5. SIGNALS CONDUIT AND WIRING PER SIGNALS SYSTEM RISER DIAGRAM, #10/TG1.1.
6. EXISTING MC.

SITE SIGNALS PLAN

1" = 20'-0"

APPROVALS

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TITLE
SITE SIGNALS PLAN

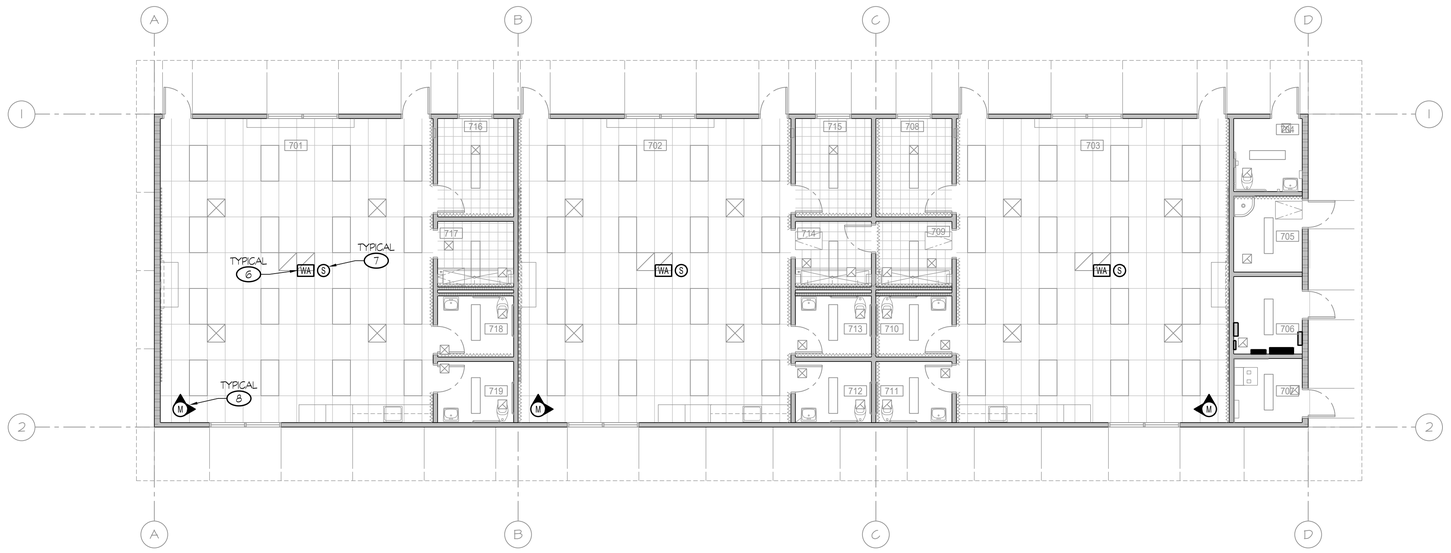
TS1.1

PROJECT 23044

Rose Sing Eastham & Associates
Electrical Consultants
131 S. Dunworth – (559)733-2671
Visalia, California 93292-6705

REGISTERED PROFESSIONAL ENGINEER
BRIAN KIRK EASTHAM
No. E-14766
Exp. 6/30/25
ELECTRICAL
STATE OF CALIFORNIA

Z:\Drafting\Jobs\RSES\23400.5\Coalinga-Huron USD\Cheney Kindergarten\TS1.1.dwg DATE SAVED: 06/19/24 BY: Corey DATE PLOTTED: 08/02/24 JOB # 23-123-JJ



SIGNALS CEILING PLAN

1/8" = 1'-0"

north

NOTES (THIS SHEET ONLY):

1. NEW 'HC-TK' CABINET, REFER TO DETAILS #1/TG1.1, #4/TG1.1, #5/TG1.1, #6/TG1.1, #7/TG1.1 AND #9/TG1.1.
2. VOICE/DATA OUTLET. PROVIDE THREE 'CAT-6' CABLE AND JACKS, IN FOUR PORT SINGLE GANG PLATE. OUTLET BOX SHALL BE 5'S TYPE 2 7/8' DEEP, 1G TRIM RING, ONE 1 1/4'C TO ACCESSIBLE SPACE.
3. INTRUSION DOOR CONTACT. PROVIDE ONE 'N' CABLE, ONE 3/4'C TO ACCESSIBLE SPACE. COORDINATE ROUGH-IN WITH ALL TRADES.
4. INTERCOM HORN. PROVIDE ONE 'CAT 6' CABLE IN SPECIAL BACK BOX, ONE 3/4'C TO ACCESSIBLE SPACE.
5. CAMERA OUTLET. PROVIDE TWO 'CAT 6' CABLES AND JACKS IN TWO PORT SURFACE BOX. OUTLET BOX SHALL BE 4 11/16 SQR TYPE 2 1/8' DEEP, 3/O FIXTURE TRIM RING, ONE 1'C TO ACCESSIBLE SPACE. PROVIDE BLANK COVER.
6. CEILING GRID MOUNTED WIRELESS AP. PROVIDE TWO 'CAT6' CABLES AND JACKS IN SURFACE BOX ABOVE GRID. LABEL GRID LOCATION AND OUTLET NUMBER ON GRID TEE.
7. INTERCOM CEILING SPEAKER. PROVIDE ONE 'CAT 6' CABLE TO SPECIAL CEILING BOX AND HANGER AS REQUIRED BY AHJ. ONE 3/4'C TO ACCESSIBLE SPACE.
8. INTRUSION MOTION OR GLASS BREAK DETECTOR. PROVIDE ONE 'N' CABLE IN LOW VOLTAGE RING ON GRID.
9. ACOUSTIC/SMOKE FIRE-THRU, REFER TO DETAIL #7/TG1.1 AND #9/TG1.1.

APPROVALS

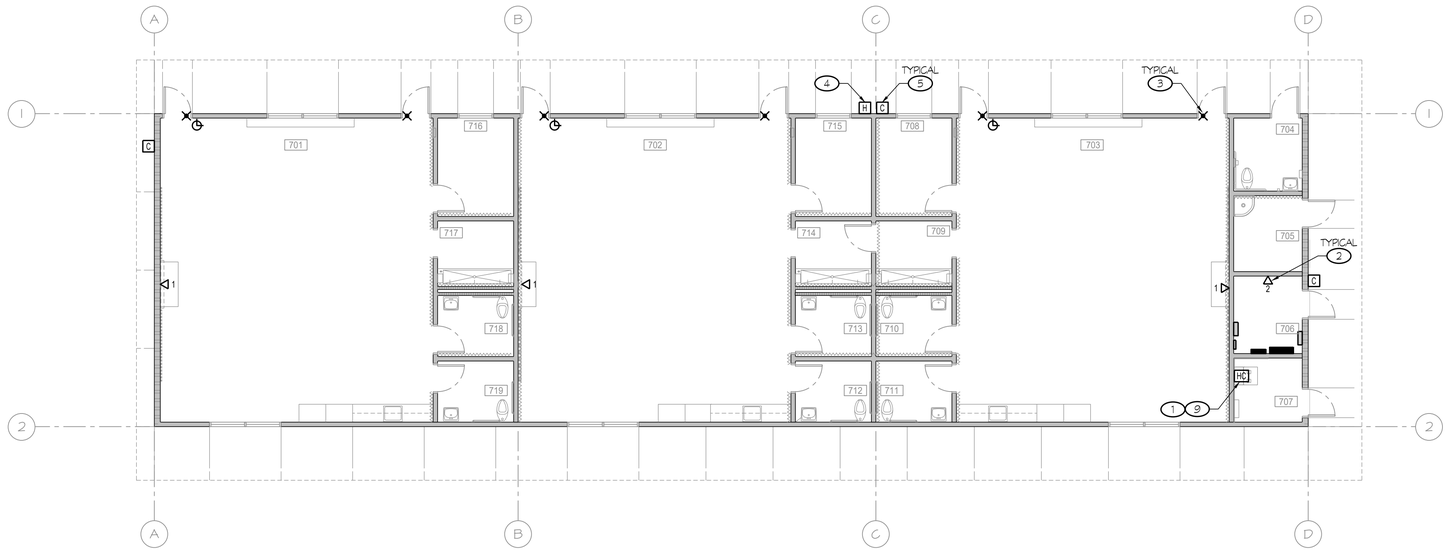
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LICENSED ARCHITECT
MICHAEL J. SCOTT JR
No. C-31296
REN: 08-31-25
STATE OF CALIFORNIA

DATE: JANUARY 31, 2024

NEW TK CLASSROOM AT
CHENEY KINDERGARTEN
COALINGA-HURON UNIFIED SCHOOL DISTRICT
COALINGA, FRESNO COUNTY, CA



SIGNALS FLOOR PLAN

1/8" = 1'-0"

north

ROOM LEGEND					
#	ROOM NAME	CEILING HEIGHT	#	ROOM NAME	CEILING HEIGHT
701	TK CLASSROOM	+9'-0"	711	TK CLASSROOM	+9'-1"
702	TEACHER PREP	+9'-0"	712	TEACHER PREP	+9'-1"
703	CLEAN-UP	+9'-0"	713	CLEAN-UP	+9'-1"
704	UNISEX	+9'-0"	714	UNISEX	+9'-1"
705	UNISEX	+10'-0"	715	UNISEX	+9'-1"
706	TK CLASSROOM	+9'-0"	716	STAFF TOILET	+10'-0"
707	TEACHER PREP	+9'-0"	717	JANITOR	+10'-0"
708	CLEAN-UP	+9'-1"	718	ELEC.	+10'-0"
709	UNISEX	+9'-1"	719	DATA	+10'-0"
710	UNISEX	+9'-1"			

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