- 3. CONTRACTOR SHALL BE RESPONSIBLE FOR THE SAFETY OF PERSONS AND PROPERTY AND SHALL PROVIDE INSURANCE COVERAGE AS NECESSARY FOR LIABILITY AND PERSONAL, PROPERTY DAMAGE, TO FULLY PROTECT THE OWNER, ARCHITECT AND ENGINEER FROM ANY AND ALL CLAIMS RESULTING FROM THIS WORK
- CONTRACTOR SHALL MAINTAIN RECORD DRAWINGS AT THE PROJECT SITE INDICATING ALL MODIFICATIONS TO ELECTRICAL SYSTEMS. THE CONTRACTOR SHALL AT THE CONCLUSION OF THE PROJECT PROVIDE ACCURATE "AS-BULT" DRAWINGS ACCEPTABLE TO THE ARCHITECT.
- ALL MATERIALS PROVIDED TO THE PROJECT SHALL BE NEW. THE CONTRACTOR SHALL BE RESPONSIBLE TO PROVIDE AND INSTALL ALL INCIDENTAL MATERIALS REQUIRED FOR A COMPLETE INSTALLATION.
- CONTRACTOR SHALL PROVIDE TO THE ARCHITECT A CONSTRUCTION SCHEDULE OF ELECTRICAL WORK. THE CONSTRUCTION SCHEDULE SHALL IDENTIFY ALL SIGNIFICANT MILESTONES WITH COMPLETION DATES. CONTRACTOR SHALL PROVIDE ALL REQUIRED "CUTTING, PATCHING, EXCAVATION, BACKFILL AND REPAIRS"
- ECESSARY TO RESTORE DAMAGED SURFACES TO EQUAL OR BETTER THAN ORIGINAL CONDITIONS EXISTING
- 8. CONTRACTOR SHALL BE RESPONSIBLE FOR PAINTING ALL EXPOSED CONDUITS AND ELECTRICAL EQUIPMENT REFER TO ARCHITECTS PAINTING SECTION FOR REQUIREMENTS.
- 9 ALL ELECTRICAL EQUIPMENT INSTALLED OUTDOORS SHALL BE WEATHERPROOF EXTERIOR CONDUITS RUN ITO BUILDINGS SHALL BE INSTALLED WITH FLASHING CALLIKED AND SEALED CONDUITS FOR EXTERIOR ELECTRICAL DEVICES SHALL BE RUN INSIDE BUILDING UNLESS OTHERWISE NOTED ON DRAWINGS.
- 10. ALL CONDUITS UNLESS OTHERWISE NOTED ON DRAWINGS SHALL HAVE AS A MINIMUM: TWO (2) #12S WITH ONE (1) #12 GROUND. "TICK" MARKS SHOWN ON CIRCUITRY ARE FOR ROUGH ESTIMATING ONLY. THE CONTRACTOR SHALL BE RESPONSIBLE FOR ALL WIRES AND WIRE SIZES REQUIRED BY LATEST CODE.
- 11. ALL BRANCH CIRCUITS SHALL HAVE INDIVIDUAL NEUTRALS. SHARED NEUTRALS ON MULTIWIRE CIRCUITS IS NO
- 12. ALL 120/277V LIGHT SWITCHES AND WALL OCCUPANT SENSORS SHALL HAVE A NEUTRAL INSTALLED TO THE DEVICE BOX EXCEPT WHERE A CONDUIT OR SURFACE RACEWAY SYSTEM IS INSTALLED.
- 13. COORDINATE ALL CONDUIT RUNS, ELECTRICAL EQUIPMENT AND PANELS WITH ALL OTHER WORK TO AVOID
- 14. SEE ARCHITECTURAL DOCUMENTS FOR EXACT PLACEMENT OF LIGHTING FIXTURES AND DEVICES. THE ELECTRICAL CONTRACTOR SHALL BE RESPONSIBLE FOR VERIFICATION OF CEILING TYPES FROM ARCHITECTURAL DOCUMENTS AND PROVIDE AND INSTALL ALL REQUIRED FIXTURE MOUNTING HARDWARE PROVIDE AND INSTALL U.L. LISTED FIRE STOP ENCLOSURES FOR ALL RECESSED FIXTURES IN FIRE RATED CEILINGS.
- FROM ALL NEW FLUSH MOUNT PANELS; THE CONTRACTOR SHALL STUB UP INTO ACCESSIBLE CEILING SPACE A MINIMUM OF FOUR (4) 3/4" CONDUITS FOR FUTURE USE.
- 16. CONTRACTOR SHALL PROVIDE IN EVERY NEW EMPTY CONDUIT A DRAW STRING FOR USE IN FUTURE
- 17 ALL CONDUIT SHALL BE CONCEALED WHERE POSSIBLE CUIT AND PATCH EXISTING WALLS WHERE NECESSARY WHERE IT IS NECESSARY TO CUT OR BORE EXISTING STRUCTURAL WALLS FOR NEW ELECTRICAL WORK OBTAIN PERMISSION FROM THE ARCHITECT PRIOR TO STARTING WORK. REUSE EXISTING CONDUIT WHERE POSSIBLE.
- 18. WHERE IT IS NOT POSSIBLE TO REUSE EXISTING CONDUIT OR RUN NEW CONCEALED CONDUIT US NON-METALLIC SURFACE RACEWAY AND BOXES. ROUTING OF ALL NON-METALLIC RACEWAYS SHALL BE APPROVED BY THE ARCHITECT OR OWNER'S REPRESENTATIVE PRIOR TO ROUGH-IN.
- 19. EXTENSION RINGS OR RESET BOXES TO BE FLUSH WITH NEW WALL THICKNESS.
- 20. CONTRACTOR SHALL BE RESPONSIBLE FOR ALL DAMAGE TO EXISTING UNDERGROUND SYSTEMS (GAS, WATER TELEPHONE, ELECTRICAL, SEWER, ETC.). THE CONTRACTOR SHALL REPAIR & PAY ALL EXPENSES FOR DAMAGE TO EXISTING UNDERGROUND SYSTEMS AS A RESULT OF NEW WORK. REPAIR TO DAMAGED UNDERGROUND SYSTEMS SHALL BE TO THE OWNERS SATISFACTION WITHOUT EXTRA EXPENSE TO THE OWNER
- 21. EXISTING WIRING SHOWN HAS BEEN TAKEN FROM OLD PLANS AND IS ASSUMED TO BE CORRECT. ELECTRICAL CONTRACTOR SHALL FIELD VERIFY ACTUAL CONDITIONS AND MAKE ADJUSTMENTS TO SUIT ACTUAL CONDITIONS AND TO MEET THE INTENT OF THE CONTRACT DOCUMENTS.
- WHERE NON-METALLIC SHEATHED CONDUCTORS ARE FOUND, THE CONTRACTOR SHALL REMOVE TO FULLEST EXTENT PER THE GENERAL DEMOLITION NOTES AND REPLACE WITH CONDUIT. METAL CLAD CABLE WILL BE PERMITTED ON A CASE-BY-CASE BASIS ONLY BY WRITTEN APPROVAL FROM THE ARCHITECT.
- 23. ALL INSTALLATION OF EXPOSED SURFACE MOUNTED RACEWAY IN PUBLIC AREAS SHALL BE REVIEWED BY ARCHITECT BEFORE ROUGH-IN. CONTRACTOR IS TO DETERMINE THE ACCESSIBILITY OF ATTIC, FURRED SPACE, HOLLOW MULLIONS, ETC. IN EACH AREA AND REVIEW WITH ARCHITECT. IF SYSTEM CAN BE ROUTED CONCEALED EITHER BY FISHING OR ACCESSIBILITY, CONTRACTOR IS TO DO SO. IF INACCESSIBILITY IS DETERMINED, CONTRACTOR SHALL INSTALL SURFACE MOUNTED RACEWAY IN THE MOST AESTHETICALLY PLEASING MEANS AS DETERMINED BY THE ARCHITECT. NO ALLOWANCE FOR ADDITIONAL COMPENSATION DUE TO ROUTING AS DIRECTED BY THE ARCHITECT WILL BE MADE.
- 24. UNLESS SPECIFICALLY SHOWN ON THESE DRAWINGS, NO STRUCTURAL MEMBER SHALL BE CUT. DRILLED NOR NOTCHED WITHOUT PRIOR AUTHORIZATION IN WRITING BY THE STRUCTURAL ENGINEER OF RECORD AND DSA
- 25. CONTRACTOR SHALL COORDINATE PLANS AND SPECIFICATIONS FOR ALL OTHER DISCIPLINES FOR ADDITIONAL SCOPE OF WORK THAT MAY NOT BE SHOWN HERE. COORDINATE WITH GENERAL CONTRACTOR TO CONFIRM ENTIRE SCOPE OF WORK HAS BEEN INCLUDED."



ELECTRICAL SYMBOLS & ABBREVIATIONS

SYMBOLS & ABBREVIATIONS SHOWN ARE FOR GENERAL USE DISREGARD THOSE WHICH DO NOT APPEAR ON THE PLANS FLUORESCENT OR LED LUMINAIRE -SEE SCHEDULF 0 SECURITY DOOR CONTACTS PANELBOARD - FLUSH MOUNTED 2 DETAIL NOTE REFERENCE SYMBOL SEE ASSOCIATED NOTE ON SAME DETAIL EQUIPMENT PANEL - FLUSH MOUNTED HMD→ SECURITY MOTION DETECTOR EMERGENCY OR NIGHT LIGHT 0 PANEL BOARD - SURFACE MOUNTED F301 - INDICATES QUANTITY OF TELEPHONE OUTLET HSCI⊲ CCTV CAMERA STRIP FLUORESCENT OR LED LUMINAIRE 222 FOUIPMENT PANEL - SURFACE MOUNTED SEE SCHEDULE -INDICATES QUANTITY OF DATA OUTLETS \longrightarrow METER W/ CURRENT TRANSFORMER LUMINAIRE - RECESSED - SEE SCHEDULE H KP SECURITY SYSTEM KEYPAD ABBREVIATIONS JUNCTION BOX - CEILING OR WALL MOUNTED, SIZE PER CODE, TAPE AND TAG WIRES \rightarrow RECESSED WALL WASHER ΗO DOOR BELL PUSHBUTTON ⊕/ю NOT TO SCALE OVERALL HEIGHT ON CENTER NTS OAH OC OH PA PB GROUND FAULT GFCI GFI ABOVE FINISHED FLOOR INTERRUPTING НСН DOOR CHIME WITH LED Ø LUMINAIRE - SURFACE MOUNTED -MOTOR CONNECTION GND, G GRS GROUND GALVANIZED RIGID ARCH AWG SEE SCHEDULE ARCHITECT OVERHEAD Ф ㅁ NON-FUSED DISCONNECT SWITCH PUBLIC ADDRESS RECEPTACLE - DUPLEX * •0 LUMINAIRE - POLE OR POST MOUNTED -FUSED DISCONNECT SWITCH; FUSED WITH DUAL-ELEMENT FUSES SIZED PER EQUIPMENT MFGR'S NAMEPLATE DATA POWER FACTOR DUPLEX RECEPTACLE MOUNTED ABOVE COUNTER -PF PH PIR PNL PV PVC П'n IC IDF INTERMEDIATE DISTRIBUTION FRAME CONDUIT CABLE TV LUMINAIRE - WALL MOUNTED SEE SCHEDULE IVF INFRARED Ю CIRCUIT BREAKER INCANDESCENT GFCI CONVENIENCE RECEPTACLE - DUPLEX* CB CCTV CKT COMBINATION STARTER/FUSED DISCONNECT SWITCH; CLOSED CIRCUIT TV OVOLTAIC Ω'n BOLLARD OR PATH LIGHT - SEE SCHEDULE FUSED DISCONNECT SWITCH ELEMENT FUSES SIZED PER EQUIPMENT MFGRS NAMEPLATE DATA CIRCUIT GFCI CONVENIENCE DUPLEX RECEPTACLE MOUNTED ABOVE COUNTER - FIELD VERIFY HEIGHT KILOVOLT KILOVOLT AMPERES n CENTER LINE CHLORIDE EXIT LIGHT - DIRECTIONAL ARROWS AS INDICATED - SEE SCHEDULE CEILING KW LCP MAGNETIC STARTER - NEMA SIZE INDICATED Ø CONDUIT ONLY CENTER # LIGHTING CONTROL RELOCATED RECEPTACLE DOUBLE DUPLEX* NEMA 3R ENCLOSURE UNLESS OTHERWISE SPECIFIED REMOVABLE POLE TRACK LIGHTING - SEE SCHEDULE ___ LTG LIGHTING CIRCUIT BREAKER DIMMER RECPT'S RECEPTACLES HALF SWITCHED DUPLEX RECEPTACLE * DIMENSION LOW VOLTAGE REQD REQUIRED LV KCM EMERGENCY LIGHT REQMT'S REQUIREMENT(S) ĐHI GROUND ROD WITH GROUNDWELL BOX THOUSAND CIRCULAR MILS SINGLE RECEPTACLE* SHEET SINGLE LINE DIAGRAM SYSTEMS TERMINATION SHT SLD STC DIGITAL DUAL TECHNOLOGY OCC. SENSOR GROUND ELECTRODE 0 ELECTRICAL CONTRACTOR MAIN CIRCUIT BREAKER Φ DUPLEX RECEPTACLE - CEILING MOUNTED \dashv \vdash NORMALLY OPEN CONTACT CABINET MINIMUM CIRCUIT AMPS < LIGHTING CONTROL OCCUPANCY SENSOR CORNER MOUNTED MDF MAIN DISTRIBUTION FRAME —И— NORMALLY CLOSED CONTACT LETTER INDICATES DUPLEX HALF CONTROLLED RECEPTACLE * Ф MECHANICAL TELEPHONE TERMINAL DRC MH MLO MPOE MTD MTG MOCP METAL HALIDE
MAIN LUGS ONLY
MAIN POINT OF ENTRANCE
MOUNTED
MOUNTING DIMMER ROOM CONTROLLER \boxtimes TRANSFORMER - SEE SINGLE LINE FOR SIZE EQUIP EQUIPMEN' LETTER INDICATES DUPLEX FULLY ELECTRICAL VEHICLE PC PLUG LOAD CONTROLLER \square FIRE ALARM FACE FIRE ALARM UNDERGROUND ⊚ FLOOR MOUNTED DUPLEX RECEPTACLE RC ROOM LIGHTING CONTROLLER \sim ELEX CONDUIT WITH CONNECTION LTAGE DROF \odot FOOT CANDLE LCP LIGHTING CONTROL PANEL CONDUIT - UP ₽ POWER OUTLET - SEE PLANS FOR NEMA TYPE* WEATHERPROOF DIGITAL DAYLIGHT SENSOR CONDUIT - DOWN XFMR (NL) NO. NOM POWER POLE SINGLE POLE SWITCH ** FUTURE GENERAL CONTRACTOR — E — CONDUIT EMERGENCY SYSTEM WALL TELEPHONE OUTLET ** ∇ FIRE ALARM - I V - I OW VOLTAGE WIRING \mathbf{A} VOICE/DATA WALL OUTLET★ NOTE: SEE FIRE ALARM DRAWINGS FOR QUANTITIES AND MOUNTING HEIGHTS THREE WAY SWITCH** SURFACE METAL OR NON-METALLIC RACEWAY VOICE/DATA OUTLET MOUNTED ABOVE **Y** FOUR WAY SWITCH** CONDUIT - CONCEALED IN WALLS OR CEILING P MANUAL PULL STATION DUCT SMOKE DETECTOR APS AUXILIARY POWER SUPPLY SURFACE MOUNTED VOICE/DATA WALL OUTLET # MANUAL MOTOR STARTER ----- CONDUIT - EXISTING STROBE ONLY SURFACE MOUNTED VOICE/DATA OUTLET TAMPER SWITCH FSA FIRE SYSTEM ANNUNCIATOR X KEY OPERATED SWITCH ** MOUNTED ABOVE COUNTER - FIELD VERIFY HEIGHT CONDUIT - BELOW SLAB OR ň HORN ONL WIRELESS ACCESS POINT (WAP) -CEILING MOUNTED (1) LIGHTING DIMMER ++ FLOW SWITCH FTR FIRE ALARM TRANSPONDER OR TRANSMITTER -**(a)**≻ CAPPED OR STUB-OUT CONDUIT \$ DIGITAL ON/OFF SWITCH ** MINI HORN POST INDICATING VALVE CONDUIT CONTINUATION ESR ELEVATOR STATUS/RECALL DIGITAL DIMMER SWITCH ** CONDUIT - HOME RUN TO PANEL TERMINAL HORN/STROBE FIRE SMOKE DAMPER DIGITAL MULTI SCENE CONDUIT - HOME RON TO PANEL, TERMINAL CABINET, ETC. RUNS MARKED WITH CROSSHATCHES INDICATE NUMBER OF #12 AWG WIRES WHEN MORE THAN TWO. SIZE CONDUIT ACCORDING TO SPECIFICATIONS FAC FIRE ALARM COMMUNICATOR VOICE/DATA OUTLET - FLOOR MOUNTED DIGITAL DUAL TECHNOLOGY WALL OCC. SENSOR ** \mathbf{A} **\$**s CHIME/STROBE BELL (GONG) ANN REMOTE ANNUNCIATORS AND APPLICABLE CODE, CROSS HATCHES VOICE/DATA OUTLET - CEILING MOUNTED WALL OCCUPANCY SENSOR ** **③** FCP FIRE ALARM CONTROL PANEL EOL FND OF LINE WITH NUMBER ADJACENT INDICATES WIRE (I) HEAT DETECTOR DOUBLE SWITCHED WALL OCCUPANCY SENSOR ** SIZE OTHER THAN #12 AWG **\$**>. S INTERIOR SPEAKERS CEILING MOUNTED SHEET NOTE REFERENCE SYMBOL; SEE ASSOCIATED NOTE ON SAME SHEET SMOKE DETECTOR * +15" A.F.F. TO BOTTOM OF BOX, U.O.N ** +48" A.F.F. TO TOP OF BOX, U.O.N. KS) DIMMING DUAL TECHNOLOGY
WALL SWITCH OCCUPANCY SENSOR ** INTERIOR SPEAKERS WALL MOUNTED CARBON MONOXIDE ALARM CLOCK +8'-0" AFF U.O.N. VERIFY BEFORE INSTALLATION Ю $\langle 3 \rangle$ SCHEDULE SYMBOL; SEE ASSOCIATED NOTE ON SAME SHEET [#] NUMBER IN BRACKETS DENOTES NUMB OF CABLE DROPS WHEN MORE THAN (2)

EQUIPMENT ANCHORAGE

M/E/P COMPONENT ANCHORAGE NOTES:

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ALL MECHANICAL, PLUMBING AND ELECTRICAL COMPONENTS SHALL BE ANCHORED AND INSTALLED PER THE DETAILS ON THE DSA APPROVED CONSTRUCTION DOCUMENTS. WHERE NO DETAIL IS INDICATED, THE FOLLOWING COMPONENTS SHALL BE ANCHORED OR BRACED TO MEET THE FORCE AND DISPLACEMENT REQUIREMENTS PRESCRIBED IN THE 2019 CBC, SECTION 1617A.1.18 THROUGH 1617A.1.26 AND ASCE 7-16 CHAPTER 13, 26 & 30:

- ALL PERMANENT EQUIPMENT AND COMPONENTS.
- TEMPORARY OR MOVABLE EQUIPMENT THAT IS PERMANENTLY ATTACHED(e.g. HARD WIRE) TO THE BUILDING UTILITY SERVICES SUCH AS ELECTRICITY, GAS OR WATER. "PERMANENTLY ATTACHED" SHALL INCLUDE ALL ELECTRICAL CONNECTIONS EXCEPT PLUGS FOR 120 / 220 VOLT RECEPTACLES HAVING A FLEXIBLE CABLE.
- 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 BE DETAILED IN THE PLANS. THESE COMPONENTS SHALL HAVE FLEXIBLE CONNECTIONS PROVIDED BETWEEN THE COMPONENT AND ASSOCIATED DUCTWORK, PIPING AND CONDUIT. FELXIBLE CONNECTIONS MUST ALLOW MOVEMENT IN BOTH TRANSVERSE AND LONGITUDINAL DIRECTIONS.

- A. COMPONENTS WEIGHTING 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 WEIGHTING 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 OF 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 2019 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 THE ME HOD OF SHOWING BRACING AND ATTACHMENTS TO THE STRUCT LIVE FOR THE IDENTIFIED DISTRIBUTION. SYSTEM ARE AS NOTED BELOW. WHEN BRACING AND ATTACHMENTS ARE BASED ON PRE-APPROVED INSTALLATION GUIDE (e.g. OSHPD OPM FOR 2013 CBC OR LATER), COPIES OF THE BRACING SYSTEM INSTALLATION GUIDE OR MANUAL SHALL BE AVAILABLE ON THE JOSSITE PRIOR TO THE STATT OF AND DURING THE HANDIGK AND BRACING OF THE DISTRIBUTION SYSTEMS. THE STRUCTURAL ENGINEER OF RECORD SHALL VERIFY THE ADEQUACY OF THE STRUCTURE TO SUPPORT THE HANDER AND BRACE LOAD.

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

MP ☐ MD ☐ PP ☐ E ☐ - OPTION 2: SHALL COMPLY WITH THE APPLICABLE OSHPD PRE-APPROVED (OPM #)

APPLICABLE CODES & STANDARDS

CODES:

- 1. 2019 CALIFORNIA ADMINISTRATIVE CODE C.C.R., TITLE 24, PART 1
- 2019 CALIFORNIA BUILDING CODE (CBC) C.C.R., TITLE 24, VOL. 1 & 2 BASED ON THE 2018 INTERNATIONAL BUILDING CODE (IBC) WITH CALIFORNIA AMENDMENTS.
- 2019 CALIFORNIA ELECTRICAL CODE (CEC) C.C.R., TITLE 24, PART 3 BASED ON THE 2017 NATIONAL ELECTRICAL CODE (NEC) WITH CALIFORNIA AMENDMENTS.
- 4. 2019 CALIFORNIA MECHANICAL CODE (CMC) C.C.R., TITLE 24, PART 4 BASED ON THE 2018 UNIFORM MECHANICAL CODE (UMC) WITH CALIFORNIA AMENDMENTS.
- 5. 2019 CALIFORNIA PLUMBING CODE (CPC) C.C.R., TITLE 24, PART 5 BASED ON THE 2018 UNIFORM PLUMBING CODE (UPC) WITH CALIFORNIA AME
- 6 2019 CALIFORNIA ENERGY CODE C.C.R. TITLE 24 PART 6
- 7 2019 CALIFORNIA FIRE CODE (CEC) C.C.R. TITLE 24 PART 9 BASED ON THE 2018 INTERNATIONAL FIRE CODE (IEC) WITH CALIFORNIA AMENDMENTS
- 8. 2019 CALIFORNIA GREEN BUILDING STANDARDS CODE C.C.R., TITLE 24, PART 11.
- 9. 2019 CALIFORNIA REFERENCED STANDARDS CODE C.C.R., TITLE 24, PART 12.
- 10. TITLE 19 C.C.R., PUBLIC SAFETY, STATE FIRE MARSHAL REGULATIONS.
- 11. NATIONAL FIRE ALARM CODE (NFPA 72) 2016

STANDARDS:

- AMERICAN NATIONAL STANDARDS INSTITUTE (ANSI)
- 2. ELECTRONICS INDUSTRIES ASSOCIATION (EIA
- INSTITUTE OF ELECTRICAL AND ELECTRONIC ENGINEERS (IEEE)
- 4. NATIONAL ELECTRICAL MANUFACTURERS ASSOCIATION (NEMA)
- 5. NATIONAL ELECTRICAL TESTING ASSOCIATION (NETA)
- 6. UNDERWRITER LABORATORIES (UL)
- 7. CALIFORNIA OCCUPATIONAL SAFETY AND HEALTH ACT STANDARDS (CAL/OSHA)

SHEET INDEX

E4.1 POWER & SYSTEM PLAN - FIRST FLOOR.

E4.2 POWER & SYSTEM PLAN - SECOND FLOOR

E6.1 ELECTRICAL DETAILS.

E6.2 FLECTRICAL DETAILS

Regulatory Agency Approval

DSA: 01 -120361 / File: 43-7



Engineer Seal





ENGINEERS MONTEREY BAY, INC.

0 Garden Court

Suite 210

Monterey, CA 93940 T.831.646.3330 • F.831.646.3336 • www.acemb.com

DISTRICT OFFICE TI

SAN JOSE, CA 95131

BERRYESSA UNION SCHOOL DISTRICT 1376 PIEDMONT RD. SAN JOSE, CA 95132

July 19, 2022

Drawing Numbe

CD

AURUM CONSULTING

Project No. 22-149.00

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Architect Seal

Project Title

981 RIDDER PARK DR

Client

SYMBOLS, ABBREVIATIONS, CODES, STANDARDS, NOTES & SHEET INDEX

2203

E0.1

○ SHEET NOTES

- PROVIDE & INSTALL 12" SQ. x 4" DEEP PULLCAN AT ACCESSIBLE CEILING SPACE.
- 2. INTERCEPT EXISTING BRANCH CIRCUITS PRESERVED DURING DEMOLITION WORK WITH NEW PULLCAN AT ACCESSIBLE CEILING SPACE.
- 3. IN PULLCAN, SPLICE & EXTEND EXISTING BRANCH CIRCUITS VIA IN POLLOWN, SPILICE & EXTEND EXISTING BRANCH CIRCUITS V
 (5) %*C. WITH #10 AWG TO PANEL 'A'. CONTRACTOR SHALL
 ASSUME (15) EXISTING BRANCH CIRCUITS TO BE EXTENDED
 AND RE-TERMINATED AT PANEL.
- 4. FOR PROJECTOR: 120V.
- 5. FOR TV/SCREEN: 120V. FIELD VERIFY LOCATION AND MOUNTING HEIGHT WITH ARCHITECT/DISTRICT PRIOR TO ROUGH-IN.
- FOR AV; 120V. FIELD VERIFY LOCATION AND MOUNTING HEIGHT WITH ARCHITECT/DISTRICT PRIOR TO ROUGH-IN.
- 7. FIELD VERIFY LOCATION WITH ARCHITECT/DISTRICT PRIOR TO ROUGH-IN.
- 8. FOR DRINKING FOUNTAIN; 6A, 120V.
- PROVIDE & INSTALL FEEDER FROM PANEL 'A' TO EXISTING MAIN SWITCHBOARD 'MSB'. SEE ELECTRICAL SINGLE LINE DIAGRAM 1/E1.1 FOR FEEDER SIZE AND REQUIREMENTS.
- CUT & PATCH EXISTING CONCRETE SLAB FOR INSTALLATION OF UNDERGROUND CONDUITS.
- 12. FOR VAV; 120V.
- 13. PROVIDE & INSTALL FEEDER FROM EXISTING PANEL 'L1' TO EXISTING MAIN SWITCHBOARD 'MSB'. SEE ELECTRICAL SINGLE LINE DIAGRAM 1/E1.1 FOR FEEDER SIZE AND REQUIREMENTS.
- 4. PROVIDE & INSTALL FEEDER FROM EXISTING PANEL 'X' TO EXISTING HOUSE METER. SEE ELECTRICAL SINGLE LINE DIAGRAM 1/E1.1 FOR FEEDER SIZE AND REQUIREMENTS.
- 15. PROVIDE & INSTALL FEEDERS FROM EXISTING MAIN SWITCHBOARD 'MSB' TO EXISTING ELEVATOR & EXISTING A/C UNIT LOCATED ON ROOF. SEE ELECTRICAL SINGLE LINE DIAGRAM 1/E1.1 FOR FEEDER SIZE AND REQUIREMENTS.
- 16. PROVIDE & INSTALL NEW COVER PLATES TO EXISTING RECEPTACLES/DEVICES NOT IMPACTED BY DEMOLITION WORK NEW COVER PLATES SHALL BE COLOR WHITE. COORDINATE WITH ARCHITECT FOR COVER PLATES FINISH REQUIREMENTS.
- CONTRACTOR SHALL VERIFY EXISTING LAMPING OF OUTDOOR LIGHT FIXTURES (FIELD VERIFY QUANTITY, ASSUME MINIMUM 6 LIGHT FIXTURES) AND REPLACE EXISTING LAMPS WITH NEW.

BRANCH CIRCUIT CONDUCTOR SIZING TABLE

AMPACITY/VOLTAGE	CIRCUIT LENGTH	REQUIREMENT
20/120	56'-90'	½" C., 2 #10 & 1 #10 GND.
20/120	91'-140'	½" C., 2#8 & 1#10 GND.
20/277	131'-205'	½" C., 2#10 & 1#10 GND.
20/277	206'-330'	½" C., 2#8 & 1#10 GND.

NOTE:
CONTRACTOR SHALL SIZE BRANCH CIRCUIT CONDUCTORS PER THE
TABLE ABOVE AS DETERMINED BY THE CIRCUIT CONDUCTOR LENGT
U.O.N. CONTRACTOR SHALL SPLICE TO #12 AWG WITHIN TERMINATIC
BOX FOR DEVICE CONNECTION IF NECESSARY.

LEGEND

EXISTING DUPLEX RECEPTACLE

EXISTING DOUBLE DUPLEX RECEPTACLE

GENERAL NOTES:

- WHERE GECL RECEPTACLES ARE INSTALLED THE GROUND-FAULT CIRCUIT-INTERRUPTER SHALL BE INSTALLED READILY ACCESSIBLE LOCATION.
- SEAL ALL EXTERIOR/INTERIOR BUILDING PENETRATIONS, CUT AND PATCH WALLS/CEILINGS FOR CONDUIT ROUTING AS NECESSARY. PAINT/FINISH EXPOSED CONDUITS/BOXES TO MATCH BUILDING FINISH. COORDINATE WITH ARCHITECT FOR EXACT REQUIREMENTS.
- COORDINATE WITH MECHANICAL PLANS FOR EXACT LOCATION AND REQUIREMENTS OF MECHANICAL EQUIPMENT.
- IN CONFERENCE ROOMS., THE OCCUPANCY SENSOR/LIGHTING CONTROL SYSTEM SHALL BE CAPABLE OF TRIGGERING THE HVAC WITHOUT FULLY TRIGGERING THE LIGHTING LOAD. PROVIDE & INSTALL LRML-100, SEE 6/E6.3 FOR REQUIREMENTS.
- SECURITY SYSTEM SCOPE IS DONE BY OTHERS.

Regulatory Agency Approval

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AURUM CONSULTING ENGINEERS MONTEREY BAY, INC.

Project No. 22-149.00

60 Garden Court

Suite 210

Monterey, CA 93940 T.831.646.3330 • F.831.646.3336 • www.acemb.com

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Architect Seal

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DISTRICT OFFICE TI

981 RIDDER PARK DR SAN JOSE, CA 95131

Client

BERRYESSA UNION SCHOOL DISTRICT 1376 PIEDMONT RD. SAN JOSE, CA 95132

POWER & SYSTEMS PLAN -FIRST FLOOR

2203

July 19, 2022

Drawing Number CD E4.1

POWER & SYSTEMS PLAN - FIRST FLOOR



○ SHEET NOTES

- FOR TV/SCREEN. FIELD VERIFY LOCATION AND MOUNTING
- 2. FIELD VERIFY LOCATION WITH ARCHITECT/DISTRICT PRIOR TO ROUGH-IN.
- 4. FOR ELECTRIC STOVE; 7.9KW, 208V, 1Ø. INSTALL PER MANUFACTURERS INSTALLATION INSTRUCTIONS

- 8. CUT & PATCH EXISTING CONCRETE SLAB FOR INSTALLATION OF

- 11. ¾"C. TO RAF CONTROL PANEL LOCATED IN IT ROOM.
- PROVIDE & INSTALL TWO WAY COMMUNICATION, IP COMMAND CENTER AND DISTRIBUTION MODULE; RATH AREA OF REFUGE 2500 SERIES, VERIEY EXACT LOCATION WITH LOCAL AUTHORIT HAVING JURISDICTION (AHJ).
- 3. THE EMERGENCY COMMUNICATION HARDWARE SHALL COMPLY WITH THE AMERICANS WITH DISABILITIES ACT (ADA). THE IP CALL BOX SHALL HAVE THE ABILITY TO BE PROGRAMMED WITH UP TO 2 EMERGENCY PHONE NUMBERS (EITHER BOTH OFF-SITE OR BASE STATION AND OFF-SITE). UPON ACTIVATION OF THE EMERGENCY PUSH BUTTON, A CALL WILL BE AUTOMATICALLY PLACED TO THE IP COMMAND CENTER. IF NO ONE ANSWERS AT THE IP CALL BOX MUST DIAL SECONDARY LOCATION OUTSIDE THE BUILDING TO ACTIVATE TWO WAY OFF-SITE PERSON TO PERSON VOICE COMMUNICATIONS.
- 14. PROVIDE & INSTALL FEEDER FROM PANEL 'A' TO PANEL 'B'. SEE ELECTRICAL SINGLE LINE DIAGRAM 1/E1.1 FOR FEEDER SIZE AND REQUIREMENTS.
- 15. PROVIDE & INSTALL FEEDER FROM PANEL 'A' TO EXISTING MAIN SWITCHBOARD 'MSB'. SEE ELECTRICAL SINGLE LINE DIAGRAM 1/E1.1 FOR FEEDER SIZE AND REQUIREMENTS.
- 16. PROVIDE & INSTALL NEW COVER PLATES TO EXISTING RECEPTACLES/DEVICES NOT IMPACTED BY DEMOLITION WORK, NEW COVER PLATES SHALL BE COLOR WHITE. COORDINATE WITH ARCHITECT FOR COVER PLATES FINISH REQUIREMENTS.

7. FOR GARBAGE DISPOSAL; 120V.

	BRANCH CIRCUIT CONDUCTOR SIZING TABLE			
	CIRCUIT AMPACITY/VOLTAGE	CIRCUIT LENGTH	REQUIREMENT	
	20/120	56'-90'	½" C., 2 #10 & 1 #10 GND.	
	20/120	91'-140'	½" C., 2#8 & 1#10 GND.	
	20/277	131'-205'	½" C., 2#10 & 1#10 GND.	
•	20/277	206'-330'	½" C., 2#8 & 1#10 GND.	

NOTE:
CONTRACTOR SHALL SIZE BRANCH CIRCUIT CONDUCTORS PER THE
TABLE ABOVE AS DETERMINED BY THE CIRCUIT CONDUCTOR LENGT
U.O.N. CONTRACTOR SHALL SPLICE TO #12 AWG WITHIN TERMINATIC
BOX FOR DEVICE CONNECTION IF NECESSARY.

LEGEND

EXISTING DUPLEX RECEPTACLE

EXISTING GFCI DUPLEX RECEPTACLE

- WHERE GECL RECEPTACLES ARE INSTALLED THE GROUND-FAULT CIRCUIT-INTERRUPTER SHALL BE INSTALLED READILY ACCESSIBLE LOCATION.
- SEAL ALL EXTERIOR/INTERIOR BUILDING PENETRATIONS, CUT AND PATCH WALLS/CEILINGS FOR CONDUIT ROUTING AS NECESSARY. PAINT/FINISH EXPOSED CONDUITS/BOXES TO MATCH BUILDING FINISH. COORDINATE WITH ARCHITECT FOR EXACT REQUIREMENTS.
- COORDINATE WITH MECHANICAL PLANS FOR EXACT LOCATION AND REQUIREMENTS OF MECHANICAL EQUIPMENT.
- IN CONFERENCE ROOMS., THE OCCUPANCY SENSOR/LIGHTING CONTROL SYSTEM SHALL BE CAPABLE OF TRIGGERING THE HVAC WITHOUT FULLY TRIGGERING THE LIGHTING LOAD. PROVIDE & INSTALL LRML-100, SEE 6/E6.3 FOR REQUIREMENTS.
- SECURITY SYSTEM SCOPE IS DONE BY OTHERS.

DSA: 01 -120361 / File: 43-7

Regulatory Agency Approval





AURUM CONSULTING ENGINEERS MONTEREY BAY, INC.

60 Garden Court ◆ Suite 210 ◆ Monterey, CA 93940 T.831.646.3330 ◆ F.831.646.3336 ◆ www.acemb.com

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Project Title

DISTRICT OFFICE TI

981 RIDDER PARK DR SAN JOSE, CA 95131

Client

BERRYESSA UNION SCHOOL DISTRICT 1376 PIEDMONT RD. SAN JOSE, CA 95132

POWER & SYSTEMS PLAN -SECOND FLOOR

July 19, 2022 Drawing Number

E4.2

CD

POWER & SYSTEMS PLAN - SECOND FLOOR

FOR HOOD; 1A, 120V.

FOR STACK MICROWAVES, 120V.

6. ¾" C., 2 #6 & 1 #10 GND.

7. FOR VAV; 120V.

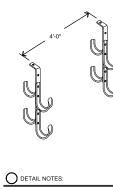
9. PROVIDE & INSTALL FEEDER FROM PANEL 'A' TO PANEL 'B1'. SEE ELECTRICAL SINGLE LINE DIAGRAM 'YE': 1 FOR FEEDER SIZE AND REQUIREMENTS.

10. IP RECESSED MOUNTED TWO WAY COMMUNICATION SYSTEM CALL BOX. MOUNT AT 48" TO TOP OF CALL BOX. RATH ELECTRONICS 2100 SERIES.

DSA: 01 -120361 / File: 43-7



X" DIA. SHEET METAL SCREW FOR PAN DECK. #12 x 1X" DHSM SCREW FOR WOOD, SEE GENERAL CONSTRUCTION NOTES ON E0.1 ACCESSIBLE CEILING SPACE OR UNDER FLOOR.



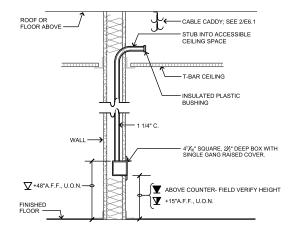
ANGLE HANGER BRACKET CADDY #CATHBA OR EQUAL.

2" DIAMETER CABLE HOOK: CADDY
"CABLE CAT" #CAT32 OR EQUAL.

ACCESSIBLE OR ACOUSTICAL T-BAR CEILING.

NOT TO EXCEED 12" SAG IN CABLE.

J-HOOK MOUNTING DETAIL NO SCALE



TELE/DATA OUTLET DETAIL

MONTEREY BAY, INC. Project No. 22-149.00

60 Garden Court ◆ Suite 210 ◆ Monterey, CA 93940 T.831.646.3330 ◆ F.831.646.3336 ◆ www.acemb.com

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Project Title

DISTRICT OFFICE TI

981 RIDDER PARK DR SAN JOSE, CA 95131

Client BERRYESSA UNION SCHOOL DISTRICT 1376 PIEDMONT RD. SAN JOSE, CA 95132

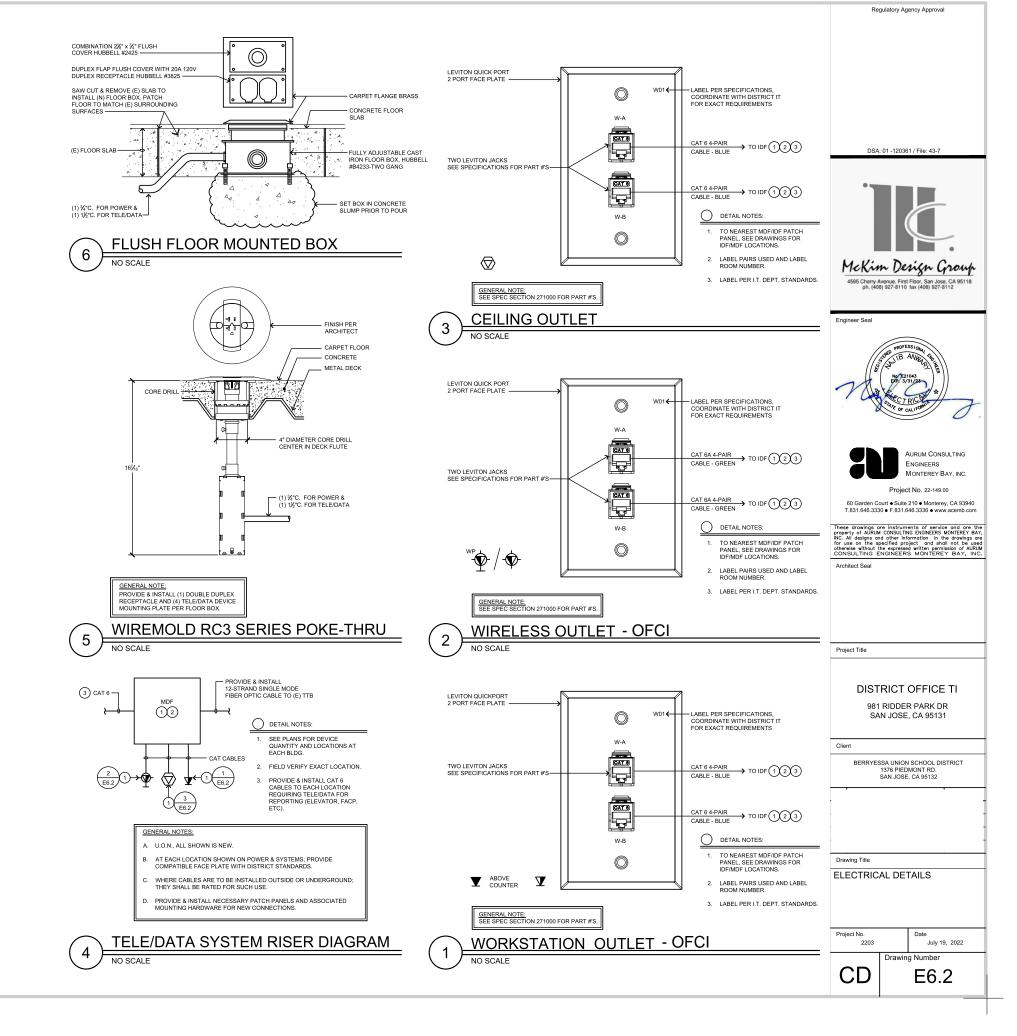
Drawing Title

ELECTRICAL DETAILS

Project No. 2203 Date July 19, 2022

Drawing Number CD

E6.1



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