# ROSEMEAD SCHOOL DISTRICT HVAC REPLACEMENT AT BUILDINGS "C", "E", "F", "J" AND "K"

## MUSCATEL MIDDLE SCHOOL

4201 IVAR AVE, ROSEMEAD CA 91770

FILE NO: 19-91 A#: 03-122718

# GENERAL NOTES

- ALL WORK SHALL CONFORM TO THE MINIMUM STANDARDS OF THE 2019 CALIFORNIA BUILDING CODE. PART 1 AND 2. TITLE 24 C.C.R. AND ANY OTHER REGULATING AGENCIES WHICH HAVE AUTHORITY OVER ANY PORTION OF THE WORK, INCLUDING THE STATE OF CALIFORNIA, DIVISION OF INDUSTRIAL SAFETY AND THOSE CODES AND STANDARDS LISTED IN THE NOTES AND
- DO NOT SCALE THE CONSTRUCTION DOCUMENTS. DIMENSIONS SHALL TAKE PRECEDENCE OVER GRAPHIC SCALES SHOWN ON THE DRAWINGS. TYPICAL DETAILS & GENERAL NOTES ARE MINIMUM REQUIREMENTS TO BE USED WHEN CONDITIONS ARE NOT SHOWN OTHERWISE. IF ADDITIONAL DIMENSIONS ARE REQUIRED. CONTRACTOR SHALL NOTIFY THE ARCHITECT IN WRITING. WORK WITHIN THE AREA OF DISCREPANCY OR CONFLICT SHALL NOT PROCEED UNTIL GIVEN SUCH NOTICE BY THE ARCHITECT TO RESUME CONSTRUCTION.
- SPECIFIC NOTES & DETAILS ON DRAWINGS SHALL TAKE PRECEDENCE OVER GENERAL NOTES & TYPICAL DETAILS. WHERE NO DETAILS ARE SHOWN, CONSTRUCTION SHALL CONFORM TO SIMILAR WORK ON THE PROJECT.
- WHERE REFERENCE IS MADE TO VARIOUS TEST STANDARDS FOR MATERIALS, SUCH STANDARDS SHALL BE THE LATEST EDITION AND/OR ADDENDUM
- THIS SHEET IS ONE OF A SET OF DOCUMENTS WHICH INCLUDES, BUT IS NOT LIMITED TO, DRAWINGS, SPECIFICATIONS & ADDENDA ADDRESSING ALL TRADES, FULLY COORDINATE ARCHITECTURAL. STRUCTURAL. ELECTRICAL. AND/OR MECHANICAL DRAWINGS. DETAILS & SPECIFICATIONS TO ASCERTAIN THE FULL SCOPE OF THE WORK. IT SHALL BE THE RESPONSIBILITY OF THE GENERAL CONTRACTOR TO FURNISH COMPLETE SET OF CONSTRUCTION DOCUMENTS TO ALL BIDDERS. ALL BIDDERS SHALL REVIEW THE FULL SET OF CONSTRUCTION DOCUMENTS PRIOR TO SUBMITTING BIDS FOR THE WORK, ANY INCONSISTENCIES OR CONFLICTING INFORMATION INCORPORATED INTO THE CONTRACT DOCUMENTS SHALL BE IMMEDIATELY BROUGHT TO THE ATTENTION OF THE ARCHITECT FOR CLARIFICATIONS AND/OR ADJUSTMENTS BEFORE
- WHERE APPLICABLE, REFER TO THE PROJECT SPECIFICATION MANUAL FOR INFORMATION NOT COVERED BY THESE GENERAL NOTES OR THE DRAWINGS. INFORMATION GIVEN IN ONE PORTION OF THE CONTRACT DOCUMENTS SHALL BE CONSIDERED TO BE GIVEN IN ALL CONTRACT DOCUMENTS
- THE DRAWINGS & SPECIFICATIONS REPRESENT THE FINISHED STRUCTURE(S) OR MODIFICATION TO AN EXISTING STRUCTURE. THEY DO NOT INDICATE THE METHOD OF CONSTRUCTION. CHANGES TO THE APPROVED DRAWINGS AND SPECIFICATIONS SHALL BE MADE BY ADDENDA OR CONSTRUCTION CHANGE DOCUMENT (CCD) APPROVED BY THE DIVISION OF THE STATE ARCHITECT AS REQUIRED BY SECTION 4-338, PART 1, TITLE 24,
- FOR THE WORK INVOLVED SHALL BE MADE BY MEANS OF ADDENDA WHICH SHALL BE SUBMITTED TO & APPROVED BY DSA PRIOR TO DISTRIBUTION TO CONTRACTORS. ORIGINAL COPIES OF ADDENDA SHALL BE STAMPED & SIGNED BY THE ARCHITECT OR ENGINEER IN GENERAL RESPONSIBLE CHARGE OF PREPARATION OF THE PLANS & SPECIFICATIONS & BY THE ARCHITECT OR REGISTERED ENGINEER DELEGATED RESPONSIBILITY FOR THE PORTION AFFECTED BY THE ADDENDA. [SEE SECTION 4-317(h).] ONE COPY OF EACH ADDENDUM IS REQUIRED FOR THE FILES OF DSA.
- CHANGES OR ALTERATIONS OF THE APPROVED PLANS OR SPECIFICATIONS AFTER A CONTRACT FOR THE WORK HAS BEEN LET SHALL BE MADE ONLY BY MEANS OF CCD SUBMITTED TO & APPROVED BY DSA PRIOR TO COMMENCEMENT OF THE WORK SHOWN THEREON, CCDS SHALL STATE THE REASON OF THE CHANGE & THE SCOPE OF WORK TO BE ACCOMPLISHED. & WHERE NECESSARY, SHALL BE ACCOMPANIED BY SUPPLEMENTARY DRAWINGS REFERENCED IN THE TEXT OF THE CCD. ALL CCDS & SUPPLEMENTARY DRAWINGS SHALL BE STAMPED & SIGNED BY THE ARCHITECT OR ENGINEER IN GENERAL PONSIBLE CHARGE OF OBSERVATION OF THE WORK OF CONSTRUCTION OF THE PROJECT & BY THE ARCHITECT OR REGISTERED ENGINEER DELEGATED RESPONSIBILITY FOR OBSERVATION OF THE PORTION OF THE WORK OF CONSTRUCTION AFFECTED BY THE CCD, SHALL BEAR THE APPROVAL OF THE DISTRICT & SHALL INDICATE THE ASSOCIATED CHANGE IN THE PROJECT COST, IF ANY. ONE COPY OF EACH CCD IS REQUIRED FOR THE FILES OF DSA.
- CHANGE, ERASURE, ALTERATION, OR MODIFICATION OF ANY PLANS OR SPECIFICATIONS BEARING THE STAMP OF DSA MAY RESULT IN VOIDANCE OF THE APPROVAL OF THE APPLICATION, HOWEVER, THE WRITTEN APPROVAL OF PLANS MAY BE EXTENDED BY DSA TO INLCUDE REVISED PLANS & SPECIFICATIONS AFTER DOCUMENTS ARE SUBMITTED FOR REVIEW & APPROVED. (SEE SECTION 4-323 FOR REVISED PLANS & SECTION 4-338 FOR ADDENDA & CHANGE ORDERS.)
- PERFORMANCE OF THE WORK:
  THE CONTRACTOR SHALL CAREFULLY STUDY THE APPROVED PLANS & SPECIFICATIONS & SHALL PLAN A SCHEDULE OF OPERATIONS WELL AHEAD OF TIME. IF AT ANY TIME IT IS DISCOVERED THAT WORK IS BEING DONE WHICH IS NOT IN ACCORDANCE WITH THE APPROVED PLANS & SPECIFICATIONS, THE CONTRACTOR SHALL CORRECT THE WORK IMMEDIATELY. ALL INCONSISTENCIES OR ITEMS WHICH APPEAR IN ERROR IN THE PLANS & SPECIFICATIONS SHALL BE PROMPTLY CALLED TO THE ATTENTION OF THE ARCHITECT OR REGISTERED ENGINEER, THROUGH THE INSPECTOR, FOR INTERPRETATION OR CORRECTION. IN NO CASE. HOWEVER. SHALL THE INSTRUCTION OF THE ARCHITECT OR REGISTERED ENGINEER BE CONSTRUED TO CAUSE WORK TO BE DONE WHICH IS NOT IN CONFORMITY WITH THE APPROVED PLANS, SPECIFICATIONS AND CHANGE ORDERS. THE CONTRACTOR MUST NOTIFY THE PROJECT INSPECTOR, IN ADVANCE, OF THE COMMENCEMENT OF CONSTRUCTION OF EACH AND EVERY ASPECT OF THE WORK. SUBSTITUTIONS SHALL BE CONSIDERED AS A CHANGE
- THE GENERAL CONTRACTOR SHALL VERIFY ALL DIMENSIONS & SITE CONDITIONS BEFORE STARTING WORK. DIMENSIONS ARE NOT ADJUSTABLE WITHOUT THE REVIEW & CLARIFICATION OF THE ARCHITECT UNLESS NOTED AS (+/-) PLUS/MINUS OR (FIELD) VERIFY. THE ARCHITECT SHALL BE NOTIFIED OF ANY DISCREPANCY BEFORE PROCEEDING WITH WORK.
- . ALL INFORMATION SHOWN ON THE DRAWINGS RELATIVE TO EXISTING CONDITIONS IS GIVEN AS REPRESENTING THE BEST INFORMATION CURRENTLY AVAILABLE, BUT WITHOUT GUARANTEE OF ACCURACY. THE CONTRACTOR & SUBCONTRACTOR SHALL CAREFULLY EXAMINE THE SITE, COMPARE THE CONSTRUCTION DOCUMENTS WITH THE EXISTING CONDITIONS, BE RESPONSIBLE FOR ACCURACY OF ALL DIMENSIONS & THOROUGHLY FAMILIARIZE HIMSELF/HERSELF WITH THE SCOPE OF WORK, BY THE ACT OF SUBMITTING A BID THE CONTRACTOR SHALL BE DEEMED TO HAVE MADE SUCH AN EXAMINATION. HAVE ACCEPTED THE CONDITIONS & HAVE INCLUDED ALL RELATED SITE/BUILDING(S) CONDITION COST IN HIS/HER BID.
- 10. NO PART OF THESE CONTRACT DOCUMENTS SHALL BE CONSIDERED AS REQUIRING OR PERMITTING ANY WORK CONTRARY TO THE REQUIREMENTS OF ANY CODE REGULATION OR ORDINANCE WHICH HAS JURISDICTION OVER THE WORK.
- 1. ALL SYMBOLS & ABBREVIATIONS USED ON THE DRAWINGS ARE CONSIDERED TO BE CONSTRUCTION STANDARDS ABBREVIATION OR SYMBOLS. IF THE CONTRACTOR HAS A QUESTION REGARDING THE SAME OR THEIR EXACT MEANING, THE ARCHITECT SHALL BE NOTIFIED FOR CLARIFICATION.
- 2. THE CONTRACTOR SHALL PROVIDE ALL MEASURES NECESSARY TO PROTECT THE STRUCTURE(S) DURING CONSTRUCTION. THE CONTRACTOR SHALL PROVIDE TEMPORARY BRACES, SHORES & GUYS REQUIRED TO SUPPORT ALL LOADS TO WHICH THE BUILDING STRUCTURE & COMPONENTS, ADJACENT SOILS OR STRUCTURES, UTILITIES & RIGHT-OF-WAYS MAY BE SUBJECTED DURING CONSTRUCTION.

#### 13. IN ACCORDANCE WITH GENERALLY ACCEPTED CONSTRUCTION PRACTICE. THE CONTRACTOR SHALL ASSUME SOLE & COMPLETE RESPONSIBILITY FOR JOB SITE CONDITIONS DURING THE COURSE OF CONSTRUCTION OF THE PROJECT. INCLUDING SAFETY OF ALL PERSONS & PROPERTY ACCORDING TO THE REQUIREMENTS OF THE FEDERAL OCCUPATIONAL SAFETY AND HEALTH ADMINISTRATION (OSHA) & CALIFORNIA OCCUPATIONAL REGULATIONS. THIS STIPULATION SHALL BE CONSIDERED TO BE CONTINUOUS & NOT LIMITED TO NORMAL WORKING HOURS. THE CONTRACTOR SHALL INDEMNIFY & HOLD

WITH THE PERFORMANCE OF WORK ON THE PROJECT, EXCEPTING LIABILITY ARISING FROM THE SOLE NEGLIGENCE OF THE 14. THE DESIGN TEAM SHALL NOT HAVE CONTROL OR CHARGE OF & SHALL NOT BE RESPONSIBLE FOR CONSTRUCTION MEANS, METHODS, TECHNIQUES, SEQUENCES OR PROCEDURES, OR FOR SAFETY PRECAUTIONS & PROGRAMS IN CONNECTION WITH

DESIGN PROFESSIONALS, INSPECTORS, ET AL., HARMLESS FROM ANY & ALL LIABILITY, REAL OR ALLEGED, IN CONNECTION

ACCORDANCE WITH THE CONTRACT DOCUMENTS, APPLICABLE CODES AND STANDARDS. 15. CONTRACTOR SHALL PROVIDE CONSTRUCTION BARRICADES OR PROTECTIVE DEVICES OF SUFFICIENT HEIGHT & MAGNITUDE

THE WORK, THE ACTS OR OMISSIONS OF THE WORK, OR FOR THE FAILURE OF ANY OF THEM TO CARRY OUT THE WORK IN

- AS TO PREVENT ANY PERSONS OF ANY AGE FROM ACCIDENTALLY ENTERING THE WORK AREA. PROVIDE TEMPORARY PASSAGEWAYS AS REQUIRED. YELLOW TAPE BARRICADES SHALL NOT BE ALLOWED AT THESE SITES.
- 16. DELIVERY OF MATERIALS TO THE CONSTRUCTION ZONE & REMOVAL OF WASTE FROM THE SITE SHALL BE COORDINATED WITH THE DISTRICT FOR AN ACCEPTABLE ACCESS ROUTE & SCHEDULE. USE OF THE AREA OUTSIDE THE CONSTRUCTION ZONE SHALL NOT BE ALLOWED UNDER ANY CIRCUMSTANCES WITHOUT CLEARANCE FROM THE SCHOOL DISTRICT OR THE OWNER'S AUTHORIZED REPRESENTATIVE.
- 17. CONTRACTOR SHALL INVESTIGATE THE SITE DURING CLEARING & EARTHWORK OPERATIONS, AS MAY BE REQUIRED BY THE SCOPE OF THE WORK, FOR FILLED EXCAVATIONS OR BURIED STRUCTURES, SYSTEMS, UTILITIES OR FOUNDATIONS, ETC. IF ANY SUCH STRUCTURES ARE FOUND, THE ARCHITECT SHALL BE NOTIFIED IMMEDIATELY.
- 18. IN DEMOLITION OF EXISTING BUILDINGS, WORK SHALL NOT BE PERFORMED IN AREA CONTAMINATED BY MATERIALS MADE OF ASBESTOS &/OR LEAD UNTIL THE ASBESTOS AND/OR LEAD MATERIALS HAVE BEEN REMOVED OR ENCAPSULATED BY THE
- CONTRACTOR, IF ASBESTOS OR LEAD IS ENCOUNTERED, NOTIFICATION SHALL BE GIVEN PER SPECIFICATIONS. 19. IT SHALL BE THE RESPONSIBILITY OF THE GENERAL CONTRACTOR TO ENSURE SHOP DRAWINGS, PRODUCT LITERATURE PRODUCT SAMPLES, ETC. ARE SUBMITTED TO THE ARCHITECT IN A TIMELY MANNER SO AS NOT TO IMPACT THE
- CONSTRUCTION SCHEDULE 20. ALL DISSIMILAR METALS SHALL BE EFFECTIVELY ISOLATED FROM EACH OTHER TO PREVENT MOLECULAR BREAKDOWN. 21. CONTRACTOR SHALL REVIEW THE CONSTRUCTION DOCUMENTS BEFORE PERFORMING THE WORK SHOWN ON THE
- INSTALLED IN CONFLICT WITH THE CONSTRUCTION DOCUMENTS SHALL BE CORRECTED BY THE CONTRACTOR AT NO 22. INSTALL ALL EQUIPMENT COMPLETELY AS REQUIRED AND/OR AS RECOMMENDED BY THE MANUFACTURER, INCLUDING ALL

DRAWINGS SHALL BE BROUGHT TO THE ARCHITECT'S ATTENTION FOR CLARIFICATION & DIRECTION. CONSTRUCTION

- 23. TRADE NAMES & MANUFACTURERS REFERRED TO ARE FOR QUALITY STANDARDS ONLY. SUBSTITUTION WILL BE PERMITTED AS APPROVED BY THE SCHOOL DISTRICT OR ARCHITECT OF RECORD. CONTRACTOR SHALL STIPULATE THAT ALL PROPOSED SUBSTITUTIONS ARE FOUAL IN PERFORMANCE & COMPLY WITH THE APPLICABLE CODES & REGULATIONS. SUBSTITUTIONS OF ALTERNATE MATERIALS OR SYSTEMS SHALL BE AT NO ADDITIONAL COST TO THE DISTRICT.
- 24. ELECTRICAL GROUNDING SHALL BE PERFORMED IN THE PRESENCE OF THE DSA BUILDING INSPECTOR OF THE WORK.
- 25. ALL INSPECTION & TESTING SHALL CONFORM TO THE REQUIREMENTS OF PART 1 & 2, TITLE 24, C.C.R., 26. SHOP AND FIELD WELDING OPERATIONS SHALL BE PERFORMED BY A CERTIFIED WELDER. ALL WELDING SHALL SPECIALLY
- INSPECTED BY AN A WS-CWI QUALIFIED INSPECTOR APPROVED BT DSA/ORS. 27. GENERAL CONTRACTOR SHALL BE SOLELY RESPONSIBLE FOR THE COORDINATION OF THE VARIOUS TRADES PERFORMING THE WORK. CONTRACTOR SHALL SUBMIT FOR REVIEW A COMPLETE COORDINATION SCHEDULE ILLUSTRATING THE EXTENT & THE POSITION OF EACH SCOPE OF WORK TO AVOID CONFLICT & TO MAINTAIN REQUIRED SERVICE ACCESS & CODE REQUIRED
- 28. THE DISTRICT MUST PROVIDE FOR & REQUIRE COMPETENT, ADEQUATE. & CONTINUOUS INSPECTION BY AN INSPECTOR SATISFACTORY TO THE ARCHITECT OR REGISTERED ENGINEER IN GENERAL RESPONSIBLE CHARGE OF OBSERVATION OF THE NORK OF CONSTRUCTION, TO ANY ARCHITECT OR REGISTERED ENGINEER DELEGATED RESPONSIBILITY FOR A PORTION OF THE WORK, & TO DSA. THE COST OF THE PROJECT INSPECTION SHALL BE PAID FOR BY THE DISTRICT. AN INSPECTOR SHALL NOT HAVE ANY CURRENT EMPLOYMENT WITH ANY ENTITY THAT IS A CONTRACTING PARTY FOR THE CONSTRUCTION. AN APPROVED PROJECT INSPECTOR MAY BE REMOVED & REPLACED IF THE WORK PERFORMED IS NOT IN CONFORMANCE WITH ACCEPTED INSPECTION STANDARDS AS DETERMINED BY THE DISTRICT THE PROJECT ARCHITECT & ENGINEER WITH CONCURRENCE OF DSA. THE INSPECTOR SHALL HAVE PERSONAL KNOWLEDGE AS DEFINED IN SECTIONS 17309 & 81141 OF THE EDUCATION CODE OF ALL WORK DONE ON THE PROJECT OR ITS PARTS AS DEFINED IN SECTION 4-316 OF TITLE 24. NO WORK SHALL BE CARRIED ON EXCEPT UNDER THE INSPECTION OF A PROJECT INSPECTOR APPROVED BY DSA.THE EMPLOYMENT OF SPECIAL OR ASSISTANT INSPECTORS SHALL NOT BE CONSTRUED AS RELIEVING THE PROJECT INSPECTOR OF HIS/HER DUTIES & RESPONSIBILITIES UNDER SECTION 17309 & 81141 OF THE EDUCATION CODE AND SECTIONS 4-336 & 4342 OF TITLE24. A PROJECT INSPECTOR SHALL, UNDER THE DIRECTION OF THE ARCHITECTAND/OR ENGINEER, BE RESPONSIBLE. FOR MONITORING THE WORK OF THE SPECIAL INSPECTORS AND TESTING LABORATORIES TO ENSURE THAT THE TESTING PROGRAM IS SATISFACTORILY COMPLETED. THE PROJECT INSPECTOR AND ANY ASSISTANT INSPECTOR MUST BE APPROVED
- 29. THE INTENT OF THE DRAWINGS & SPECIFICATIONS IS TO MODIFY THE FACILITY FOR ACCESSIBILITY IN ACCORDANCE WITH TITLE 24, CCR, SHOULD ANY CONDITIONS DEVELOP NOT COVERED BY THE CONSTRUCTION DOCUMENTS SUCH THAT THE FINISHED WORK WILL NOT COMPLY WITH TITLE 24, CCR, A CCD DETAILING & SPECIFYING THE REQUIRED WORK SHALL BE

SUBMITTED TO & APPROVED BY DSA BEFORE PROCEEDING WITH THE WORK-SECTION 4-417, PART 1, TITLE 24, CCR.

- 30. 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 FINISHED WORK WILL NOT COMPLY WITH TITLE 24, CCR, A CCD, OR A SEPARATE SET OF PLANS AND SPECIFICATIONS, DETAILING AND SPECIFYING THE REQUIRED WORK SHALL BE SUBMITTED TO AND APPROVED BY DSA
- 31. CUTTING, BORING SAWCUTTING OR DRILLING THROUGH THE EXISTING OR NEW STRUCTURAL ELEMENTS IS NOT TO BE STARTED UNTIL THE DETAILS HAVE BEEN REVIEWED & APPROVED BY THE ARCHITECT, STRUCTURAL ENGINEER & THE DSA FIELD ENGINEER IF DETAILS DO NOT SHOW OR CONFORM TO THE APPROVED DRAWINGS
- 32. A DSA ACCEPTED TESTING LABORATORY DIRECTLY EMPLOYED BY THE DISTRICT SHALL CONDUCT ALL THE REQUIRED TESTS

#### 33. A "DSA CERTIFIED" PROJECT INSPECTOR EMPLOYED BY THE DISTRICT (OWNER) AND APPROVED BY THE DIVISION OF THE STATE ARCHITECT SHALL PROVIDE CONTINUOUS INSPECTION OF THE WORK, THE DUTIES OF THE INSPECTOR ARE DEFINED IN SECTION 4-342. CALIFORNIA BUILDING STANDARDS ADMINISTRATIVE CODE (PART 1, TITLE 424

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 PERFORMED 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

A "DSA CERTIFIED" INSPECTOR WITH CLASS 3 CERTIFICATION IS REQUIRED FOR THIS PROJECT

CONTRACTOR, ENGINEER/ARCHITECT OF RECORD OR THE OWNER'S AGENT.

- A LISTING OF CERTIFIED ATT CAN BE FOUND AT: HTTPS://WWW.ENERGY.CA.GOV/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
- ALL WORK SHALL CONFORM TO 2019 TITLE 24, CALIFORNIA CODE OF REGULATIONS (CCR).
- 37. THE SCOPE OF WORK CLEARLY INDICATE THE SCOPE OF WORK ON THE COVER SHEET OR GENERAL NOTE SHEET
- 38. FABRICATION AND INSTALLATION OF DEFERRED SUBMITTAL ITEMS SHALL NOT BE STARTED UNTIL CONTRACTOR'S DRAWINGS. SPECIFICATIONS. AND ENGINEERING CALCULATIONS FOR THE ACTUAL SYSTEMS TO BE INSTALLED HAVE BEEN ACCEPTED AND SIGNED BY THE ARCHITECT OR STRUCTURAL ENGINEER AND APPROVED BY THE DSA.
- 39. CHANGES TO THE APPROVED DRAWINGS AND SPECIFICATIONS SHALL BE MADE BY AN ADDENDUM OR A CONSTRUCTION CHANGED DOCUMENT (CCD) APPROVED BY THE DIVISION OF THE STATE ARCHITECT. AS REQUIRED BY SECTION 4-338. PART 1. TITLE 24. CCR. •A "DSA CERTIFIED" 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. INSPECTOR CLASS = ? A DSA ACCEPTED TESTING LABORATORY DIRECTLY EMPLOYED BY THE DISTRICT (OWNER) SHALL CONDUCT ALL THE REQUIRED TESTS AND INSPECTIONS FOR THE PROJECT.
- 41. 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)

GRADING PLANS, DRAINAGE IMPROVEMENTS, ROAD AND ACCESS REQUIREMENTS AND ENVIRONMENTAL HEALTH CONSIDERATIONS SHALL COMPLY WITH ALL LOCAL ORDINANCES.

## SHEET INDEX

	NO.	SHT. NO.	SHEET TITLE
	01	G0.1	TITLE SHEET, INDEX TO DRAWINGS AND NOTES
ļ	02	A101	SITE PLAN
	03	A5.01	ROOF DETAIL
	04	S0.01	SHEET INDEX, SYMBOLS AND ABBREVIATIONS
	05	S0.02	STRUCTURAL GENERAL NOTES
	06	S0.03	STRUCTURAL GENERAL NOTES
	07	S1.01	OVERALL SITE/ KEY PLAN
	08	S2.01	BUILDING C ROOF FRAMING PLAN
	09	S2.02	BUILDING E ROOF FRAMING PLAN
_	10	S2.03	BUILDING F ROOF FRAMING PLAN
	11	S2.04	BUILDING J & K ROOF FRAMING PLAN
)	12	S4.01	EQUIPMENT SUPPORT DETAILS
	13	S4.02	EQUIPMENT SUPPORT DETAILS
	14	M001	GENERAL NOTES, LEGENDS, ABBREVIATIONS, AND SHEET INDEX
	15	M002	SCHEDULES - MUSCATEL
	16	M101	MECHANICAL SITE PLAN MUSCATEL
	17	M601	DETAILS
	18	M602	DETAILS
	19	M701	TITLE 24 COMPLIANCE FORMS - MUSCATEL
	20	E001	GENERAL NOTES, LEGENDS, ABBREVIATIONS, AND SHEET INDEX
	21	E002	SCHEDULES - MUSCATEL
	22	E101	ELECTRICAL SITE PLAN MUSCATEL
	23	E601	DETAILS

Total Sheets = 23

GYPSUM BOARD; MOISTURE

RESISTANT GYPSUM BOARD

————— WORK ABOVE, BELOW, OR

BEYOND; (E) WORK TO

BE REMOVED; FUTURE

WORK AS NOTED ON

TO BREAK CONTINUITY

FINISH GRADE

LINE, ELEVATION

EARTH DIMENSION

CONTOUR LINE ON PLAN,

SECTIONS OR ELEVATIONS

## APPLICABLE CODES

PARTIAL LIST OF APPLICABLE CODES AS OF JANUARY 1, 2019 PART 1 2022 BUILDING STANDARDS ADMINISTRATIVE CODE, TITLE 24 C.C.R.

PART 2 2019 CALIFORNIA BUILDING CODE, TITLE 24 C.C.R.

PLUMBING & MECHANICAL OFFICIALS, IAPMO)

(2009 INTERNATIONAL BUILDING CODE OF THE INTERNATIONAL CODE COUNCIL, WITH CALIFORNIA AMENDMENTS) PART 3 2019 CALIFORNIA ELECTRICAL CODE, TITLE 24 C.C.R. (2008 NATIONAL ELECTRICAL CODE OF THE NATIONAL FIRE PROTECTION

PART 4 2019 CALIFORNIA MECHANICAL CODE, TITLE 24 C.C.R. (2009 UNIFORM MECHANICAL CODE OF THE INTERNATIONAL ASSOCIATION OF

PART 5 2019 CALIFORNIA PLUMBING CODE, PART 5, TITLE 24 C.C.R. (2009 UNIFORM PLUMBING CODE OF THE INTERNATIONAL ASSOCIATION OF PLUMBING & MECHANICAL OFFICIALS, IAPMO)

PART 6 2019 CALIFORNIA ENERGY CODE, TITLE 24 C.C.R. PART 9 2019 CALIFORNIA FIRE CODE, TITLE 24 C.C.R. (2009 INTERNATIONAL FIRE CODE OF THE INTERNATIONAL CODE COUNCIL)

PART 12 2019 CALIFORNIA REFERENCED STANDARDS, TITLE 24 C.C.R. TITLE 19 CCR, PUBLIC SAFETY, STATE FIRE MARSHAL REGULATIONS

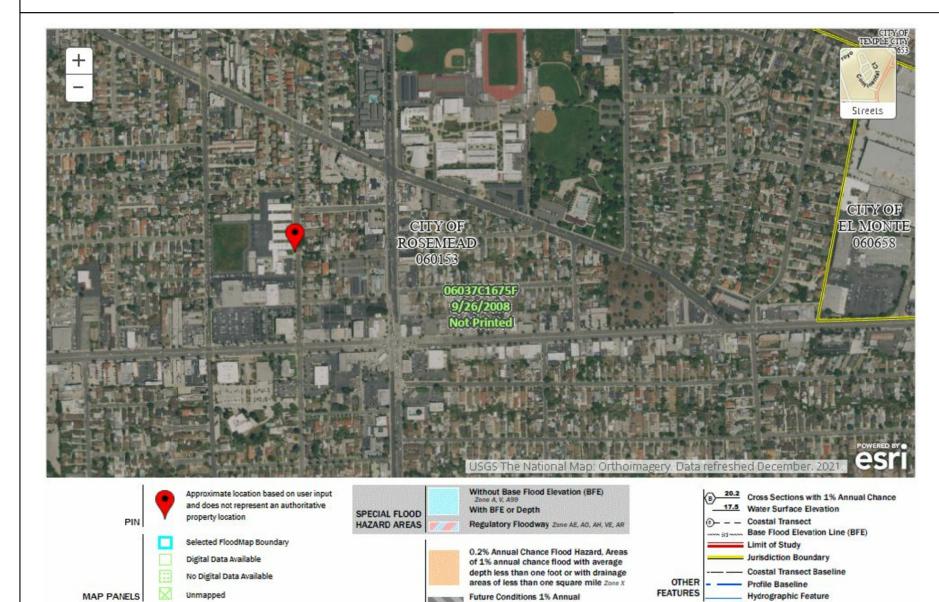
OCCUPANCY : E-1 ALLOWABLE AREA = 9,500EXISTING AREA

BLDG E = 6,256 S.F. OK

# CODE ANALYSIS

TYPE OF CONSTRUCTION: TYPE V-B NON-SPRINKLERED BLDGS J, K, & I COMBINED = 9,400 S.F. OK BLDG F = 6,256 S.F. OK

# FLOOD MAP



Chance Flood Hazard Zone X

FLOOD HAZARD Area with Flood Risk due to Levee Zone D

Effective LOMRs

OTHER AREAS Coastal Barrier Resource System Area

Otherwise Protected Area

Area of Undetermined Flood Hazard Zone D

Area with Reduced Flood Risk due to

GENERAL --- Channel, Culvert, or Storm Sewer

STRUCTURES IIIIII Levee, Dike, or Floodwall

## DIRECTORY

**ARCHITECT:** NAC | ARCHITECTURE 837 NORTH SPRING ST. THIRD FLOOR LOS ANGELES, CA. 90012-2323 TEL: 323.475.8075 FAX 323.859.3110 CONTACT: GARY CHRISTOFI EMAIL: gchristofi@nacarchitecture.com

#### STRUCTURAL:

700 S FLOWER ST #1200 LOS ANGELES, CA. 90017 CONTACT: BEN SEGURA EMAIL: benjamin.segura@kpff.com

#### **MECHANICAL:**

P2S ENG 5000 E.SPRING ST.8TH FLOOR LONG BEACH, CA. 90815 TEL: 562-497-2999 CONTACT: ANDREW SMITH

EMAIL: andrew.smith@p2sinc.com

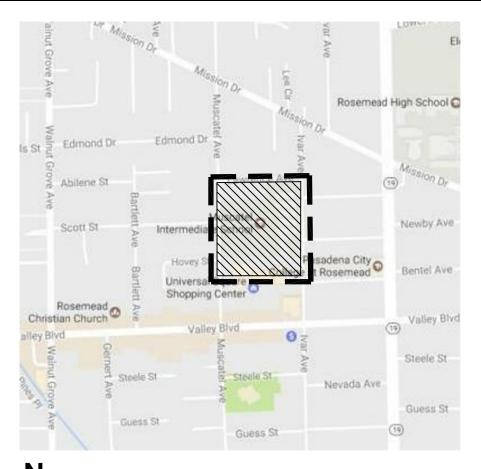
#### **ELECTRICAL**:

P2S ENG 5000 E.SPRING ST.8TH FLOOR LONG BEACH, CA. 90815 TEL: 562-497-2999 CONTACT: ALLEN SLY EMAIL: allen.sly@p2sinc.com

## SCOPE OF WORK

REMOVAL AND REPLACEMENT OF EXISTING ROOF TOP HVAC UNITS OVER EXISTING CURBS AT BUILDINGS "C". "E". "F"."J" AND "K"

# MUSCATEL M.S. SITE



PROJECT SITE: MUSCATEL MIDDLE SCHOOL

#### STATEMENT OF GENERAL CONFORMANCE

FOR ARCHITECTS/ENGINEERS WHO UTILIZE PLANS, INCLUDING BUT NOT LIMITED TO SHOP DRAWINGS. PREPARED BY OTHER LICENSED DESIGN PROFESSIONALS AND/OR CONSULTANTS (APPLICATION NO. A# 03-122718 FILE NO. 19-91) ( APPLICATION NO. <u>A# 03-122718</u> FILE NO. <u>19-91</u> )

GENERAL SYMBOLS

DETAIL NUMBER

WALL OR BUILDING

SECTION NUMBER

SHEET NUMBER

- EXTERIOR ELEVATION

SHEET NUMBER DETAIL NUMBER

SHEET NUMBER

WINDOW TYPE

CONSTRUCTION

**KEYNOTE** 

DEMOLITION

REVISION NUMBER

INTERNATIONAL

ACCESSIBILITY

SYMBOL (I.S.A.)

KEYNOTE

1A - INTERIOR ELEVATION

igert THE DRAWINGS OR SHEETS LISTED ON THE COVER OR ASSOCIATED WITH 03-122718 THIS DRAWING, PAGE OF SPECIFICATIONS/CALCULATIONS HAVE BEEN PREPARED BY OTHER DESIGN PROFESSIONALS OR CONSULTANTS WHO ARE LICENSED AND/OR AUTHORIZED TO

PREPARE SUCH DRAWINGS IN THIS STATE. IT HAS BEEN EXAMINED BY ME FOR: DESIGN INTENT AND APPEARS TO MEET THE APPROPRIATE REQUIREMENTS OF TITLE 24, CALIFORNIA CODE OF REGULATIONS AND THE PROJECT SPECIFICATIONS PREPARED BY ME, AND COORDINATION WITH MY PLANS AND SPECIFICATIONS AND IS ACCEPTABLE FOR INCORPORATION INTO THE CONSTRUCTION

THE STATEMENT OF GENERAL CONFORMANCE "SHALL NOT BE CONSTRUED AS RELIEVING ME OF MY RIGHTS, DUTIES, AND TITLE 24, PART 1 (TITLE 24, PART 1, SECTION 4-317 [b])

	ALL DRAWINGS OR SHE	ETS LISTED ON THE COVER OR	RINDEX SHEET	
IS/ARE IN GENERAL CON DESIGN INTENT, AND	FORMANCE WITH THE PROJECT	IS/ARE IN GENERAL CO DESIGN INTENT, AND	NFORMANCE WITH THE PROJECT	
HAS/HAVE BEEN COORD AND SPECIFICATIONS.	INATED WITH THE PROJECT PLANS	HAS/HAVE BEEN COORDINATED WITH THE PROJECT PLANS AND SPECIFICATIONS.		
The state of the s	11/17/2022			
SIGNATURE	DATE	SIGNATURE	DATE	
ARCHITECT OR ENGINEER DI GENERAL RESPONSIBLE CHA		ARCHITECT OR ENGINEER DELEGATED RESPONSIBILITY FOR THIS PORTION OF THE WORK		
HELENA JUBANY				
PRINT NAME		PRINT NAME		
C-22214	05/31/2023			
LICENSE NUMBER	EXPIRATION DATE	LICENSE NUMBER	EXPIRATION DATE	

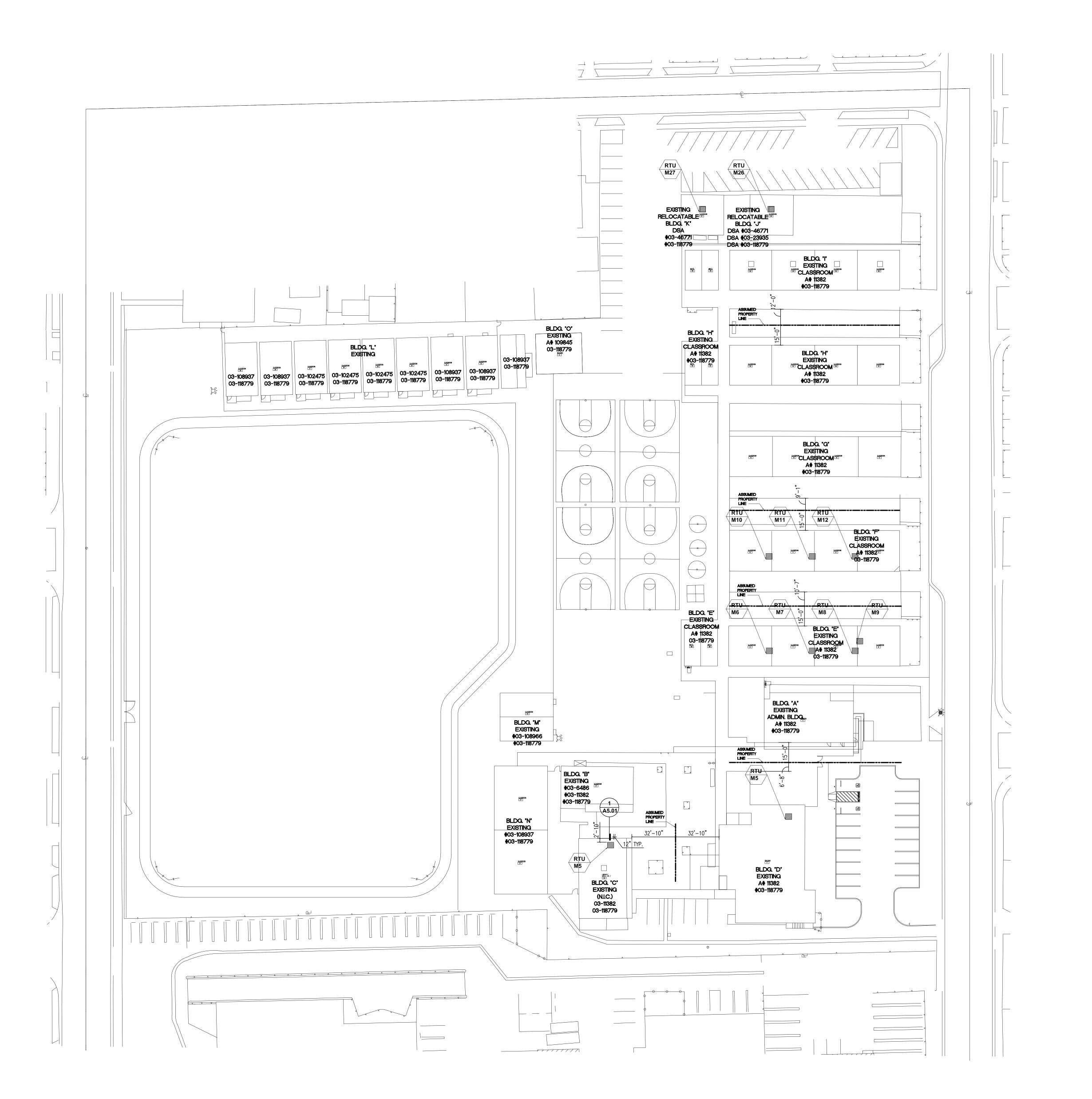
**ROSEMEAD** 

SCHOOL DISTRICT

NAC NO 161-21043 DSA SUBMITTA CHECKED DATE

02-14-2023

TITLE SHEET, INDEX TO DRAWINGS AND NOTES



**MUSCATEL HVAC** 

BUILDINGS IN SCOPE	DSA-A#	CERTIFICATION STATUS
BLDG - C	03-11382	CERTIFIED
BLDG - C	03-118779	CERTIFIED
DI DO E	03-11382	CERTIFIED
BLDG - E	03-118779	CERTIFIED
DI DO E	03-11382	CERTIFIED
BLDG - F	03-118779	CERTIFIED
	03-46771	CERTIFIED
BLDG - J	03-23935	CERTIFIED
	03-118779	CERTIFIED
BLDG - K	03-16771	CERTIFIED
DEDG - K	03-118779	CERTIFIED

FILE NO: 19-91 A#: 03-122718



SHOOL DISTRICT

JSCATEL MIDDLE SCHOOL

ACEMENT AT BUILDINGS C,E,F,J AND K



4201 IVAR AVENUE ROSEMEAD CA 91770

LEGEND

REMOVE EXISTING ROOFTOP
HVAC UNIT AND REPLACE AS
PER MECHANICAL DWGS.

NAC NO 161-2104

NAC NO 161-21043

FILE DSA SUBMITTAL

DRAWN CHECKED DATE 02-14-2023

SITE PLAN 88 A 10

DATE 02-14-2023

1 ROOF GUARDRAIL/FALL PROTECTION DETAIL
Scale: 3" = 1'-0"

24" PROVIDE ROOF PATCH TO MATCH

EXISTING ROOFING SYSTEM (TREMCO)

EQUAL

(E) ROOF SHEATHING ———

4X BLKG ———

CONT. ELASTOMERIC SEALANT —

CLAMP —

NOTE: SEE 3/S4.02 FOR MORE INFORMATION

—— ALIGN RAILS TO CENTER OF POST

— 2" DIA. STD. HOT DIPPED GALV. STEEL PIPE

— 3/4" DIA. STD. HOT DIPPED GALV. STEEL PIPE - TYP.

— 2" DIA. GALVINIZED STL. POSTS THROUGH ROOF@ 4'-0" O.C. MAX.

ROVIDE ROOF PATCH TO MATCH

EXISTING ROOFING SYSTEM (TREMCO)

DRAWBAND

PLATE PER STRUCTURAL 3/S4.02

STORM COLLAR, SET IN MASTIC, PRIME FLANGE

2" DIA. GALVINIZED STL.
POSTS THROUGH ROOF@
4'-0" O.C. MAX.
MIN. 22 GA. CALV. SM
BOOT

K:\2022\2200234 — Rosemead SD — HVAC REPL\5 SDraft\Muscatel Middle School\2200234\_ ted: 1/27/23 at 11:18am By: SDEJESUS

FILE NO: 19-91

11-17-01-31-

S

ROSEMEAD

SCHOOL DISTRICT

PARK ROSEMEAD

3907 ROSEMEAD BOULEVARD

ROSEMEAD, CA 91770

A#: 03-122718

SHEET INDEX, SYMBOLS AND ABBREVIATIONS

SO.01

11-17-2022

NAC NO 161-21043

THICKNESS GRADE

2" NOM. AND SMALLER GRADE NO. 1
LARGER THAN 2" NOM. GRADE NO. 1

- ALL STRUCTURAL PLYWOOD SHEATHING SHALL BE DOUGLAS FIR STANDARD GRADE RATED SHEATHING EXPOSURE 1 CONFORMING TO THE LATEST EDITION OF DOC PS1 ALL PANELS SHALL BEAR LEGIBLE DFPA STAMPS.
- ORIENTED STRAND BOARD (OSB) MAY BE SUBSTITUTED FOR PLYWOODS NOTED ABOVE, AND COMPLY WITH DOC PS2. PROVIDED IT IS RATED BY APA'S PERFORMANCE STANDARD RATING & ICC-ESR # NOTED.
- 4. ALL FLOOR & ROOF SHEATHING SHALL BE LAID FACE GRAIN PERPENDICULAR TO FRAMING AND SHALL BE APPROVED BY THE BUILDING INSPECTOR BEFORE COVERING.
- ALL NAILING SHALL CONFORM TO THE APPLICABLE BUILDING CODE AND REGULATIONS.
  ALL NAILS SHALL BE COMMON NAILS ASTM F1667. MINIMUM NAILING REQUIREMENTS
  OUTLINED IN TABLE 2304.9.1 OF THE CODE SHALL BE FOLLOWED UNLESS OTHERWISE
  NOTED.
- 6. LAG BOLTS (LAG SCREWS): PROVIDE LEAD HOLE 60%-70% OF THREADED SHANK DIAMETER AND FULL DIAMETER FOR SMOOTH SHANK PORTION. MINIMUM PENETRATION INTO MAIN MEMBER SHALL BE 8d.
- 7. UNLESS OTHERWISE NOTED, ALL WOOD SILL PLATE UNDER BEARING, EXTERIOR OR SHEAR WALLS IN CONTACT WITH CONCRETE OR MASONRY SHALL BE BOLTED TO CONCRETE OR MASONRY WITH 5/8"Ø BOLTS AT 4'-0" OC BEGINNING AT 9" OC MAX. FROM EACH END OF THE PLATES. BOLTS SHALL EXTEND A MINIMUM OF 8" INTO CONCRETE OR MASONRY. "HILTI 0.145"Ø DN PINS (ICC-ESR #1390) AT 16" MIN SPACING MAY BE SUBSTITUTED FOR ANCHOR BOLTS AT INTERIOR NON-SHEAR/NON-BEARING WALLS ONLY.
- 8. ALL BOLT HEADS AND NUTS WHICH BEAR AGAINST THE FACE OF WOOD MEMBERS SHALL BE PROVIDED WITH METAL WASHERS AS INDICATED ON PLANS OR PER WASHER PLATE SCHEDULE ON NOTE #11 AND HOLES SHALL BE DRILLED A MAXIMUM OF 1/16" OVERSIZED. INSPECTOR SHALL VERIFY THESE CONDITIONS IN THE FIELD.
- 9. ALL NUTS ON BOLTS SHALL BE TIGHTENED WHEN INSTALLED AND RE-TIGHTENED AT THE COMPLETION OF WORK OR BEFORE CLOSING IN. THREAD PROJECTION SHALL BE 1/16 INCH MINIMUM BEYOND THE NUT.
- 10. USE OF MACHINE NAILING IS SUBJECT TO A SATISFACTORY JOBSITE DEMONSTRATION AND THE APPROVAL BY THE INSPECTOR AND STRUCTURAL ENGINEER. THE APPROVAL IS SUBJECT TO CONTINUED SATISFACTORY PERFORMANCE. MACHINE NAILING WILL NOT BE APPROVED IN 5/16" PLYWOOD. IF NAILHEADS 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.
- 11. ALL 5/8" DIAMETER AND LARGER BOLTS CALLED OUT ON DRAWINGS, INCLUDING ANCHOR BOLTS (AB) SHALL HAVE STEEL SQUARE PLATE WASHERS AS LISTED BELOW UNDER THE HEAD AND/OR NUT BEARING ON WOOD.

DOLT DIAMETED

BOLI DIAMETER	1/2"	5/8"	3/4"	//8 <sup></sup>	1"
WASHER - THICKNESS	1/4"	5/16"	3/8"	7/16"	1/2"
WASHER - WIDTH	2 1/2"	2 3/4"	3"	3 1/2"	4"
MINIMUM EMBEDMENT	7"	8"	8"	8"	12"

FRAMING CONNECTORS: PER MANUFACTURER'S APPROVED PRODUCT EVALUATION REPORT (ICC-ESR) AND INSTALLED ACCORDINGLY. SIZE AND NUMBER OF NAILS TO BE MAXIMUM SPECIFIED BY THE MANUFACTURER UNO. THE FOLLOWING IS A LIST OF ICC-ESR NUMBERS CORRESPONDING TO SOME OF THE FRAMING CONNECTORS USED IN THE PROJECT:

DESCRIPTION_	ICC-ESR #
SIMPSON 'CMST'	2105
SIMPSON 'LPT4'	5313
SIMPSON 'HD'	5708
SIMPSON 'EPC, 'PC"	443
SIMPSON 'CC'	2011
SIMPSON 'PBS'	5709
SIMPSON 'LUS'	5708
SIMPSON 'A34', 'A35'	5672
SIMPSON 'HU'	5117
SIMPSON 'ITT'	2329

- 13. BOLTED HOLD DOWN ANCHORS: INSTALL PER MANUFACTURE'S APPROVED ICC PRODUCT EVALUATION REPORT. INSTALL HOLD DOWN 1/2 INCH MINIMUM ABOVE THE PLATE TO ALLOW FOR TIGHTENING POST BOLTS. USE EXTRA CARE IN BORING THE POST HOLES (1/32 TO 1/16 LARGER THAN THE BOLT DIAMETER). THE HOLD DOWN SHALL BE INSTALLED TIGHT TO THE HOLD DOWN POST WITHOUT FILLERS OR DAPPING. THE POST BOLTS SHALL NOT BE COUNTERSUNK INTO THE HOLD DOWN POST UNO. DO NOT BEND HOLD DOWN ANCHORS. (SIMPSON HD ICC-ESR# 5708).
- 14. SUBSTITUTIONS: PROVIDE MANUFACTURER'S APPROVED PRODUCT EVALUATION REPORT AND A LIST OF ALL PROPOSED SUBSTITUTIONS TO THE ENGINEER FOR REVIEW BEFORE FABRICATION. PROPOSED SUBSTITUTIONS SHALL BE APPROVED BY DSA.
- 15. PRESERVATIVE TREATED WOOD: WOOD EXPOSED TO THE WEATHER; FOUNDATION PLATES ON CONCRETE SLABS, FOUNDATIONS WHICH ARE IN DIRECT CONTACT WITH EARTH SHALL BE TREATED WOOD WITH PRESERVATIVE RETENTION CONFORMING TO AWPA AS REQUIRED FOR USE. NEWLY EXPOSED SURFACES RESULTING FROM FIELD CUTTING, BORING OR HANDLING SHALL BE FIELD TREATED IN ACCORDANCE WITH AWPA M-4.
- 16. TOP PLATES: TWO PIECES, SAME SIZE AS STUDS, STAGGER SPLICES 4'-0" MINIMUM. CENTER SPLICES OVER STUDS.
- 17. FULL-DEPTH SOLID BLOCKING OR CROSS BRACING: INSTALLED AT INTERVALS NOT EXCEEDING 8 FEET FOR ALL JOISTS AND RAFTERS.
- CUTTING AND NOTCHING: DO NOT CUT, BORE, COUNTERSINK OR NOTCH WOOD MEMBERS EXCEPT WHERE SHOWN IN THE DETAILS. HOLES THROUGH PLATES, STUDS AND DOUBLE PLATES IN WALLS SHALL NOT EXCEED 40% THE MEMBER WIDTH AND SHALL BE LOCATED IN THE CENTER OF THE MEMBER.
- 9. END SUPPORT: ROOF AND FLOOR JOISTS OVER 4 INCHES DEEP SHALL HAVE THEIR ENDS HELD IN POSITION WITH EITHER:
  FULL DEPTH SOLID BLOCKING;
  NAILED BRIDGING;
  NAILING OR BOLTING TO OTHER FRAMING MEMBERS; OR APPROVED JOIST HANGERS.
- 20. GALVANIZING: ALL EXPOSED STEEL TIMBER HARDWARE FASTENERS AND CONNECTORS SHALL BE GALVANIZED.

DESIGN LOADS

1. FLOOR AND ROOF LIVE LOADS:

OF 20 PSF (REDUCIBLE)

SNOW LOADS:

SNOW LOADS ARE IN ACCORDANCE WITH SECTION 1608A OF THE CODE. GROUND SNOW LOAD, Pg = ZERO

3. WIND LOADS:

WIND LOADS ARE IN ACCORDANCE WITH SECTION 1609A OF THE CODE. SEE TABLE ON THIS SHEET FOR PRESSURE AT EXTERIOR COMPONENTS AND CLADDING.

BASIC WIND SPEED, V = 101 MPH (3-SECOND GUST)

RISK CATEGORY III

WIND EXPOSURE C

WIND IMPORTANCE FACTOR, I = 1.0

DESIGN WIND PRESSURE = 37.96 PSF

EARTHQUAKE LOADS ON NONSTRUCTURAL COMPONENTS:

EARTHQUAKE LOADS ARE IN ACCORDANCE WITH SECTION 1613A OF THE CODE. RISK CATEGORY III Ip = 1.0 FOR ALL NONSTRUCTURAL COMPONENTS SEISMIC DESIGN CATEGORY (SDC) = D

SITE CLASS = D  $S_S = 1.972g$  $S_1 = 0.713g$ 

= 0.809g

 $S_{DS}^{-} = 1.577g$ 

EARTHQUAKE LOADS ON NONSTRUCTURAL COMPONENTS, SHALL BE DETERMINED IN ACCORDANCE WITH THE FOLLOWING PROCEDURE: CALCULATE Fp BASED ON ASCE 7-16 EQUATION 13.3-1 USING THE VALUE OF

S<sub>DS</sub> = 1.577g
THE MAXIMUM AND MINIMUM VALUES FOR Fp SHALL BE DETERMINED FROM ASCE 7-16 EQUATIONS 13.3-2 AND 13.3-3, RESPECTIVELY.

ALL EARTHQUAKE LOADS ON NONSTRUCTURAL COMPONENTS SHALL BE BASED ON VALUES OF ap AND Rp FROM ASCE 7-16 TABLES 13.5-1 AND 13.6-1.

5. EARTHQUAKE LOADS ON PRIMARY STRUCTURE:

EARTHQUAKE LOADS ARE IN ACCORDANCE WITH SECTION 1613A OF THE CODE.

R = 6 1/2 (WOOD SHEARWALL)

6. FLOOD DESIGN DATA:

THE PROJECT IS NOT LOCATED WITHIN A FLOOD HAZARD AREA

#### STRUCTURAL OBSERVATION:

- . STRUCTURAL OBSERVATION SHALL BE PERFORMED BY THE STRUCTURAL ENGINEER OF RECORD OR DESIGNEE IN ACCORDANCE WITH SECTION 1710A OF THE CODE.
- STRUCTURAL OBSERVATION IS THE VISUAL OBSERVATION OF THE ELEMENTS AND CONNECTIONS OF THE STRUCTURAL SYSTEM AT SIGNIFICANT CONSTRUCTION STAGES AND THE COMPLETED STRUCTURE FOR GENERAL CONFORMANCE TO THE APPROVED PLANS AND SPECIFICATION. STRUCTURAL OBSERVATION DOES NOT WAIVE THE RESPONSIBILITY FOR THE INSPECTIONS REQUIRED OF THE BUILDING INSPECTOR OR THE DEPUTY INSPECTOR.
- A CIVIL OR STRUCTURAL ENGINEER OR ARCHITECT SHALL PERFORM THE STRUCTURAL OBSERVATION THE ENGINEER OR ARCHITECT SHALL BE REGISTERED OR LICENSED IN THE STATE OF CALIFORNIA. THE DEPARTMENT OF BUILDING AND SAFETY REQUIRES THE USE OF THE ENGINEER OR ARCHITECT RESPONSIBLE FOR THE STRUCTURAL DESIGN WHEN THEY ARE INDEPENDENT OF THE CONTRACTOR.
- THE STRUCTURAL OBSERVER SHALL PROVIDE EVIDENCE OF EMPLOYMENT BY THE OWNER, A LETTER FROM THE OWNER OR A COPY OF THE AGREEMENT FOR SERVICES SHALL BE SENT TO THE BUILDING INSPECTOR BEFORE THE FIRST SITE VISIT, THE STRUCTURAL OBSERVER SHALL ALSO INFORM THE OWNER OF THE REQUIREMENTS FOR A PRECONSTRUCTION MEETING AND SHALL PRESIDE OVER THIS MEETING.
- THE CONTRACTOR SHALL COORDINATE AND CALL FOR A PRE-CONSTRUCTION MEETING BETWEEN THE ENGINEER OR ARCHITECT RESPONSIBLE FOR THE STRUCTURAL DESIGN, STRUCTURAL OBSERVER, CONTRACTOR, AFFECTED SUBCONTRACTORS AND DEPUTY INSPECTORS. THE PURPOSE OF THE MEETING SHALL BE TO IDENTIFY THE MAJOR STRUCTURAL ELEMENTS AND CONNECTIONS THAT AFFECT THE VERTICAL AND LATERAL LOAD SYSTEMS OF THE STRUCTURE AND TO REVIEW SCHEDULING OF THE REQUIRED OBSERVATIONS. A RECORD OF THE MEETING SHALL BE INCLUDED IN THE FIRST OBSERVATION REPORT SUBMITTED TO THE BUILDING INSPECTOR.
- THE STRUCTURAL OBSERVER SHALL PERFORM SITE VISITS AT THOSE STEPS IN THE PROGRESS OF THE WORK THAT ALLOW FOR CORRECTION OF DEFICIENCIES WITHOUT SUBSTANTIAL EFFORT OR UNCOVERING OF THE WORK INVOLVED. AT A MINIMUM, THE FOLLOWING SIGNIFICANT CONSTRUCTION STAGES REQUIRE A SITE VISIT AND AN OBSERVATION REPORT FROM THE STRUCTURAL OBSERVER.

CONSTRUCTION STAGES

ELEMENTS/CONNECTIONS TO BE OBSERVED

a. ROOF FRAMING

CONNECTORS / STRAPS

THE STRUCTURAL OBSERVER SHALL PREPARE A REPORT FOR EACH SIGNIFICANT STATE OF CONSTRUCTION OBSERVED. A COPY OF THE OBSERVATION REPORT SHALL BE

SENT TO DSA, OWNER, CONTRACTOR, AND PROJECT INSPECTOR.

**GENERAL** 

- 1. THE CONTRACTOR SHALL VERIFY ALL DIMENSIONS PRIOR TO STARTING CONSTRUCTION. THE ARCHITECT SHALL BE NOTIFIED OF ANY DISCREPANCIES OR INCONSISTENCIES.
- 2. ALL DRAWINGS ARE CONSIDERED TO BE A PART OF THE CONTRACT DOCUMENTS. THE CONTRACTOR SHALL BE RESPONSIBLE FOR THE REVIEW AND COORDINATION OF ALL DRAWINGS AND SPECIFICATIONS PRIOR TO THE START OF CONSTRUCTION. ANY DISCREPANCIES THAT OCCUR SHALL BE BROUGHT TO THE ATTENTION OF THE ARCHITECT PRIOR TO START OF CONSTRUCTION SO THAT A CLARIFICATION CAN BE ISSUED. ANY WORK PERFORMED IN CONFLICT WITH THE CONTRACT DOCUMENTS OR ANY CODE REQUIREMENTS SHALL BE CORRECTED BY THE CONTRACTOR AT THEIR OWN EXPENSE AND AT NO EXPENSE TO THE OWNER OR ARCHITECT.
  - EXISTING CONDITIONS SHOWN ARE BASED ON LIMITED AVAILABLE AS-BUILT DOCUMENTATION. THE CONTRACTOR IS RESPONSIBLE FOR VERIFYING ALL ACTUAL CONDITIONS. DISCREPANCIES BETWEEN ACTUAL FIELD CONDITIONS AND THOSE SHOWN ON THE DRAWINGS SHALL BE BROUGHT TO THE ATTENTION OF THE ENGINEER PRIOR TO START OF WORK. ARCHITECT AND ENGINEER SHALL REVIEW THE ACTUAL FIELD CONDITIONS AND DETERMINE THE EXTENT OF MODIFICATIONS WHICH WILL BE REQUIRED TO THE AFFECTED DETAILS. MODIFICATIONS TO THE CONTRACT DOCUMENTS MAY BE SUBJECT TO REVIEW & APPROVAL BY DSA.
- UNLESS NOTED OTHERWISE OR SPECIFICALLY APPROVED BY THE SEOR, PRIOR TO DRILLING INTO (E) CONCRETE ELEMENTS FOR INSTALLATION OF EPOXY/EXPANSION ANCHORS/DOWELS, THE CONTRACTOR SHALL SCAN (USING NON-DESTRUCTIVE METHODS) THE (E) CONCRETE IN THE AREA OF ANCHORAGE TO LOCATE (E) REINFORCING BARS OR OTHER (E) EMBEDDED OBJECTS IN THE CONCRETE. (E) REINFORCING BARS SHALL NOT BE CUT OR DAMAGED DURING INSTALLATION OF EPOXY/EXPANSION ANCHORS/DOWELS. IF CONFLICTS OCCUR BETWEEN THE (E) REINFORCING BARS AND EPOXY/EXPANSION ANCHORS/DOWELS, A COMPOSITE LAYOUT

OF THE (E) REINFORCING BARS AND EPOXY/EXPANSION ANCHORS/DOWELS SHALL BE PROVIDED TO THE STRUCTURAL ENGINEER AND ARCHITECT FOR REVIEW AND TO DETERMINE IF CONNECTION/ANCHORAGE DETAILS REQUIRE MODIFICATION, MODIFICATIONS TO THE APPROVED CONTRACT DOCUMENTS MAY BE SUBJECT TO REVIEW AND APPROVAL BY DSA.

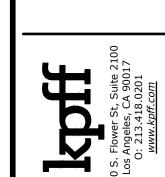
- 5. NOTES AND DETAILS ON DRAWINGS SHALL TAKE PRECEDENCE OVER GENERAL NOTES AND TYPICAL DETAILS. WHERE NO DETAILS ARE GIVEN, CONSTRUCTION SHALL BE AS SHOWN FOR SIMILAR WORK.
- 6. ALL WORK SHALL CONFORM TO THE MINIMUM STANDARDS OF THE FOLLOWING:

2019 CALIFORNIA BUILDING CODE, PART 2A, REFERRED TO HERE AS "THE CODE", AND ANY OTHER REGULATING AGENCIES WHICH HAVE AUTHORITY OVER WHICH ANY PORTION OF THE WORK, INCLUDING THE STATE OF CALIFORNIA DIVISION OF INDUSTRIAL SAFETY, AND THOSE CODES & STANDARDS LISTED IN THESE NOTES AND SPECIFICATIONS.

- SEE ARCHITECTURAL DRAWINGS FOR THE FOLLOWING:
- a. SIZE AND LOCATION OF ALL DOOR AND WINDOW OPENINGS, EXCEPT
- b. SIZE AND LOCATION OF ALL INTERIOR AND EXTERIOR NON-BEARING
- c. SIZE AND LOCATION OF ALL CONCRETE CURBS, EQUIPMENT PADS, PITS, FLOOR DRAINS, SLOPES, DEPRESSED AREAS, CHANGE IN LEVEL, CHAMFERS, GROOVES, INSERTS, ETC.
- d. SIZE AND LOCATION OF ALL FLOOR AND ROOF OPENINGS EXCEPT
- e. FLOOR AND ROOF FINISHES.
- f. DIMENSIONS NOT SHOWN ON STRUCTURAL DRAWINGS.
- 8. SEE MECHANICAL, PLUMBING AND ELECTRICAL DRAWINGS FOR THE FOLLOWING:
  - a. PIPE RUNS, SLEEVES, HANGERS, TRENCHES, WALL AND SLAB OPENINGS, ETC., EXCEPT AS SHOWN OR NOTED.
  - b. ELECTRICAL CONDUIT RUNS, BOXES, OUTLETS IN WALLS AND SLABS.
  - c. CONCRETE INSERTS FOR ELECTRICAL, MECHANICAL OR PLUMBING FIXTURES.
  - d. SIZE AND LOCATION OF MACHINE OR EQUIPMENT BASES, ANCHOR BOLTS FOR MOTOR MOUNTS.
- 9. THE CONTRACT STRUCTURAL DRAWINGS AND SPECIFICATIONS REPRESENT THE FINISHED STRUCTURE. THEY DO NOT INDICATE THE METHOD OF CONSTRUCTION. THE CONTRACTOR SHALL PROVIDE ALL MEASURES NECESSARY TO PROTECT THE STRUCTURE DURING CONSTRUCTION. SUCH MEASURES SHALL INCLUDE, BUT NOT BE LIMITED TO, BRACING, SHORING FOR LOADS DUE TO CONSTRUCTION EQUIPMENT, ETC. OBSERVATION VISITS TO THE SITE BY THE STRUCTURAL ENGINEER SHALL NOT INCLUDE INSPECTION OF THE ABOVE ITEMS.
- 10. OPENINGS, POCKETS, ETC., SHALL NOT BE PLACED IN CONCRETE SLABS, DECKS, WALLS, UNLESS SPECIALLY DETAILED ON THE STRUCTURAL DRAWINGS. NOTIFY THE STRUCTURAL ENGINEER WHEN DRAWINGS BY OTHERS SHOW OPENINGS, POCKETS, ETC., LARGER THAN 6" NOT SHOWN ON THE STRUCTURAL DRAWINGS, BUT WHICH ARE LOCATED IN STRUCTURAL MEMBERS. FOR ANY FURTHER RESTRICTIONS ON OPENINGS IN STRUCTURAL ELEMENTS, SEE APPLICABLE SECTIONS BELOW.
- 11. PIPES SHALL NOT BE EMBEDDED IN STRUCTURAL CONCRETE EXCEPT WHERE SPECIFICALLY APPROVED.
- 2. ASTM SPECIFICATIONS ON THE DRAWINGS SHALL BE OF THE LATEST REVISION.
- 13. CONTRACTOR SHALL INVESTIGATE SITE DURING CLEARING AND EARTHWORK OPERATIONS FOR FILLED EXCAVATIONS OR BURIED STRUCTURES, SUCH AS CESSPOOLS, CISTERNS, FOUNDATIONS, ETC. IF ANY SUCH STRUCTURES ARE FOUND, STRUCTURAL ENGINEER SHALL BE NOTIFIED IMMEDIATELY.
- 4. CONSTRUCTION MATERIAL SHALL BE SPREAD OUT IF PLACED ON FRAMED ROOF OR FLOOR. LOAD SHALL NOT EXCEED THE DESIGN LIVE LOAD PER SQUARE FOOT. PROVIDE ADEQUATE SHORING AND/OR BRACING WHERE STRUCTURE HAS NOT ATTAINED DESIGN STRENGTH.

FILE NO: 19-91 A#: 03-122718

11-17-2022





EMEAD SCHOOL DISTRICT

D - MUSCATEL MIDDLE SCHOOL

C REPLACEMENT AT BUILDINGS C,E,F,J AND K

ROSEMEAD
SCHOOL DISTRICT
PARK ROSEMEAD
3907 ROSEMEAD BOULEVARD

ROSEMEAD, CA 91770

8 **K** ±

C ARCHITECTURE

NAC NO 161-21043

FILE

DRAWN CC

CHECKED EMB/AL

DATE 11-17-2022

STRUCTURAL GENERAL NOTES

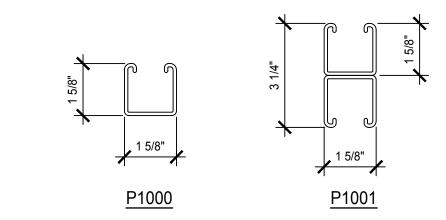
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- UNISTRUT METAL FRAMING SHALL BE BY UNISTRUT CORPORATION, WAYNE, MI
  OR ENGINEER APPROVED EQUAL. INSTALL PER MANUFACTURER'S
  RECOMMENDATIONS AND AS NOTED ON THE DRAWINGS.
- 2. ALL CHANNEL MEMBERS SHALL BE FABRICATED FROM STRUCTURAL GRADE STEEL CONFORMING TO ONE OF THE FOLLOWING ASTM SPECIFICATIONS: A 1011 SS GR 33, A 635 GR 33.
- ALL FITTINGS SHALL BE FABRICATED FROM STEEL CONFORMING TO ONE OF THE FOLLOWING ASTM SPECIFICATIONS: A 575, A 576, A 36 OR A 635.
- 4. ALL UNISTRUT MEMBERS AND FITTINGS SHALL BE HOT DIP GALVANIZED, UNO.
- 5. AREAS OF UNISTRUT MEMBERS WHERE GALVANIZATION HAS BEEN REMOVED TO ALLOW FOR WELDING SHALL BE COATED WITH ZINC-RICH, GALVANIZING PAINT AFTER WELDING.
- 6. MINIMUM UNISTRUT PROPERTIES SHALL BE AS FOLLOWS:

PARAMETER	P1000	P1001	
AREA OF SECTION	0.555 IN <sup>2</sup>	1.111 IN <sup>2</sup>	
AXIS 1-1			
MOMENT OF INERTIA (I)	0.185 IN <sup>4</sup>	0.928 IN <sup>4</sup>	
SECTION MODULUS (S)	0.202 IN <sup>3</sup>	0.571 IN <sup>3</sup>	
RADIUS OF GYRATION (r)	0.577 IN	0.914 IN	
AXIS 2-2			
MOMENT OF INERTIA (I)	0.236 IN <sup>4</sup>	0.471 IN <sup>4</sup>	
SECTION MODULUS (S)	0.290 IN <sup>3</sup>	0.580 IN <sup>3</sup>	
RADIUS OF GYRATION (r)	0.651 IN	0.651 IN	

#### 7. BOLT TORQUE REQUIREMENTS:

BOLT SIZE	1/4"	5/ <sub>16</sub> "	3/8"	1/2"	5/8"	3/4"
REC. TORQUE FT/LB	6	11	19	50	100	125
MAX TORQUE FT/LB	7	15	25	70	125	135



#### STRUCTURAL TESTS AND SPECIAL INSPECTIONS

- 1. STRUCTURAL TESTS AND SPECIAL INSPECTIONS SHALL BE PERFORMED IN ACCORDANCE WITH CHAPTER 17A OF THE CODE.
- 2. THE SPECIAL INSPECTOR MUST BE CERTIFIED BY DIVISION OF THE STATE ARCHITECT (DSA), IN THE CATEGORY OF WORK REQUIRED TO HAVE SPECIAL INSPECTION.
- 3. THE SPECIAL INSPECTORS AND TESTING FIRM MUST BE HIRED BY THE OWNER OR OWNER'S REPRESENTATIVE.
- 4. SPECIAL INSPECTORS SHALL KEEP RECORDS OF INSPECTIONS AND FURNISH COPIES TO THE BUILDING OFFICIAL, OWNER, AND STRUCTURAL ENGINEER OF RECORD. REPORTS SHALL INDICATE THAT WORK INSPECTED WAS, OR WAS NOT COMPLETED IN CONFORMANCE TO APPROVED CONSTRUCTION DOCUMENTS. SPECIAL INSPECTORS SHALL KEEP RECORDS OF INSPECTIONS AND FURNISH COPIES TO THE BUILDING OFFICIAL, COMPLETED IN CONFORMANCE WITH THE APPROVED CONSTRUCTION DOCUMENTS. DISCREPANCIES SHALL BE BROUGHT TO THE IMMEDIATE ATTENTION OF THE CONTRACTOR FOR CORRECTION.
- 5. SPECIAL INSPECTIONS FOR SEISMIC RESISTANCE SHALL BE PROVIDED IN ACCORDANCE WITH SECTION 1707A OF THE CODE FOR THE FOLLOWING ITEMS:
  - a) STRUCTURAL STEEL. SPECIAL INSPECTION FOR SPECIAL STEEL CONCENTRIC BRACED FRAMES AND OTHER STRUCTURAL STEEL ELEMENT THAT IS PART OF THE SEISMIC-FORCE-RESISTING SYSTEM SHALL BE IN ACCORDANCE WITH SECTION 1707A.2 OF THE CODE AND THE QUALITY ASSURANCE PLAN REQUIREMENTS OF AISC 341.
  - ARCHITECTURAL COMPONENTS. PERIODIC SPECIAL INSPECTION DURING THE ERECTION AND FASTENING OF EXTERIOR CLADDING, EXTERIOR NONBEARING WALLS, SUSPENDED THE STRUCTURE SHALL BE IN ACCORDANCE WITH SECTION 1707A.6 OF THE CODE. CEILING SYSTEMS AND THEIR ANCHORAGE, AND INTERIOR AND EXTERIOR VENEER IN
- c) MECHANICAL AND ELECTRICAL COMPONENTS (SECTION 1707A.7 OF THE CODE)
- PERIOD SPECIAL INSPECTION IS REQUIRED DURING THE ANCHORAGE OF ELECTRICAL EQUIPMENT FOR EMERGENCY OR STANDBY POWER SYSTEMS.
- ii. PERIOD SPECIAL INSPECTION IS REQUIRED DURING THE INSTALLATION OF ANCHORAGE OF OTHER ELECTRICAL EQUIPMENT IN THE STRUCTURE.
- iii. PERIOD SPECIAL INSPECTION IS REQUIRED DURING THE INSTALLATION OF VIBRATION ISOLATION SYSTEMS IN THE STRUCTURE.
- 6. STRUCTURAL TESTING FOR SEISMIC RESISTANCE SHALL BE PROVIDED IN ACCORDANCE WITH SECTION 1708A OF THE CODE FOR THE FOLLOWING ITEMS:
  - a) CONCRETE REINFORCEMENT BELOW MOMENT FRAMES SHALL COMPLY WITH SECTION 21.1.5.2 OF ACI 318-11. SPECIAL INSPECTOR SHALL VERIFY CERTIFIED MILL TEST REPORTS FOR EACH TESTING DEMONSTRATES REQUIREMENTS OF ACI 318-14 SECTION 21.1.5.2:
  - i. THE ACTUAL YIELD STRENGTH BASED ON MILL TESTS DOES NOT EXCEED fy BY MORE THAN 18,000 PSI.
  - ii. THE RATIO OF THE ACTUAL TENSILE STRENGTH TO THE ACTUAL YIELD STRENGTH IS NOT LESS THAN 1.25.
- b) STRUCTURAL STEEL. TESTING SHALL BE IN ACCORDANCE WITH THE QUALITY ASSURANCE PLAN REQUIREMENTS OF AISC 341.

#### INSPECTIONS

THE FOLLOWING ELEMENTS OF CONSTRUCTION SHALL HAVE CONTINUOUS INSPECTION BY A BUILDING INSPECTOR APPROVED BY DSA.

- 1. EXPANSION ANCHORS.\*
- 2. ADHESIVE ANCHORS.\*
- 3. POWDER ACTIVATED FASTENERS / SHOT PINS.\*
  - \* THESE ITEMS REQUIRE SPECIAL INSPECTION.
  - ALL SPECIAL INSPECTIONS SHALL BE PERFORMED IN ACCORDANCE WITH THE REQUIREMENTS OF SECTION 1704A OF THE CODE AND ANY ADDITIONAL REQUIREMENTS STATED IN THESE DRAWINGS AND/OR THE PROJECT SPECIFICATIONS.

REFER TO THE STRUCTURAL TESTS AND INSPECTIONS FORM FOR ADDITIONAL INFORMATION AND ADDITIONAL TESTING AND INSPECTION REQUIREMENTS.

FILE NO: 19-91 A#: 03-122718

11-17-202

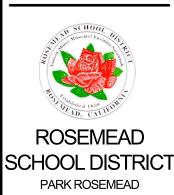




ROSEMEAD SCHOOL DISTRICT

RSD - MUSCATEL MIDDLE SCHOOL

HVAC REPLACEMENT AT BUILDINGS C,E,F,J AND K



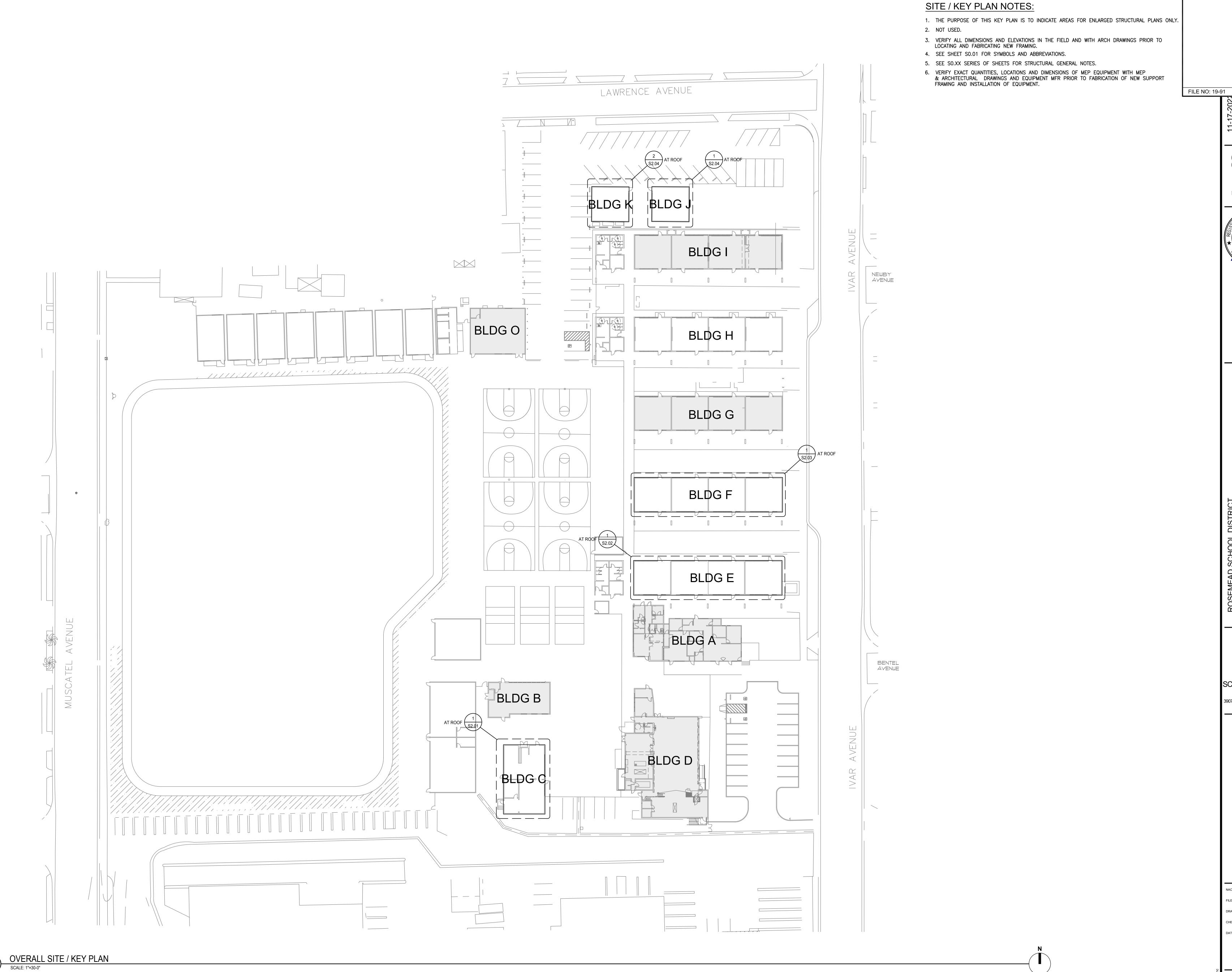
3907 ROSEMEAD BOULEVARD

ROSEMEAD, CA 91770

NO 161-21043

CC EMB/AL 11-17-2022

TRUCTURAL GENERA NOTES



A#: 03-122718



SCHOOL DISTRICT

NAC NO 161-21043

DATE 11-17-2022

OVERALL SITE / KEY PLAN

#### PLAN NOTES:

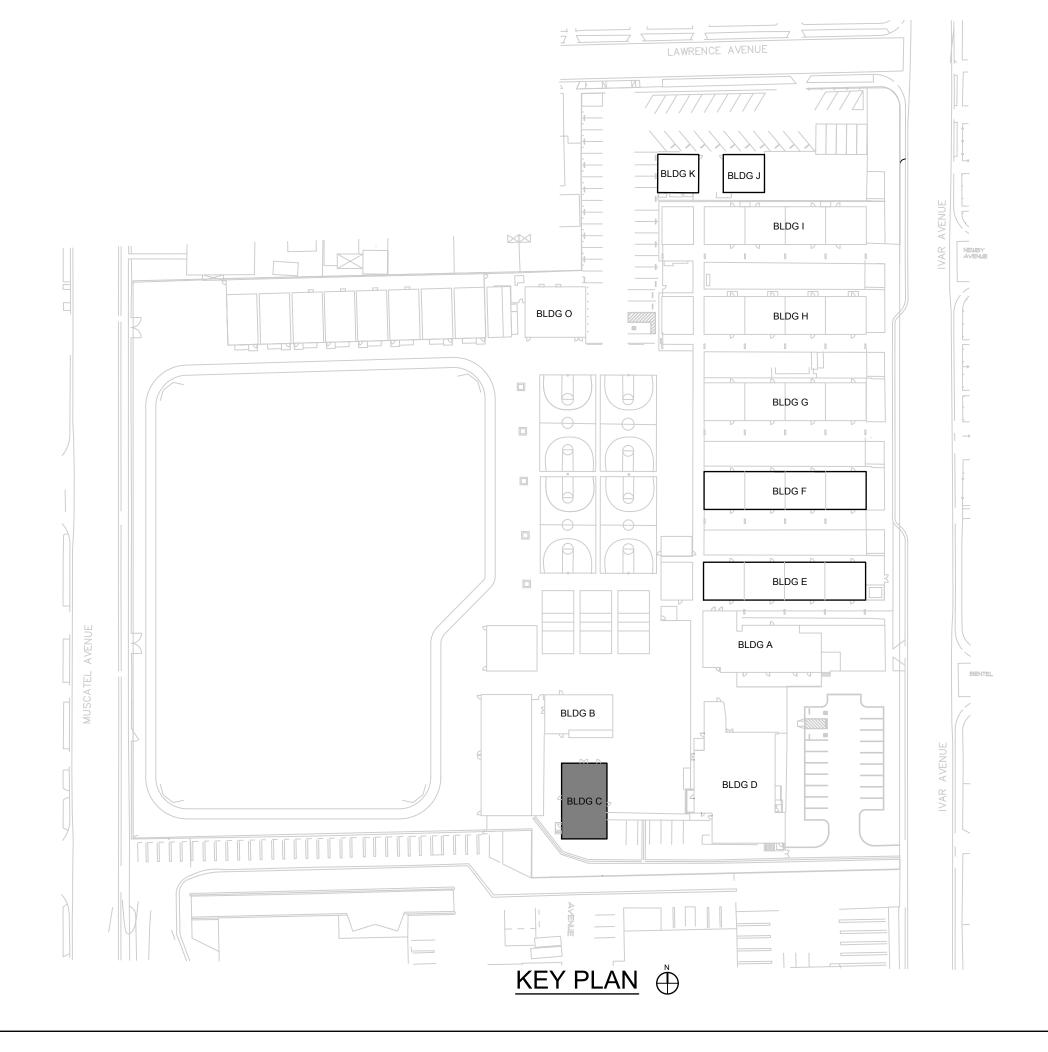
- 1. EXISTING CONDITIONS SHOWN ON PLANS, SECTIONS AND DETAILS ARE BASED ON LIMITED AVAILABLE AS-BUILT DOCUMENTATION. THE CONTRACTOR IS RESPONSIBLE FOR VERIFYING ALL ACTUAL CONDITIONS. DISCREPANCIES BETWEEN ACTUAL FIELD CONDITIONS AND THOSE SHOWN ON THE DRAWINGS SHALL BE BROUGHT TO THE ATTENTION OF THE ENGINEER PRIOR TO START OF WORK. ARCHITECT AND ENGINEER SHALL REVIEW THE ACTUAL FIELD CONDITIONS AND DETERMINE THE EXTENT OF MODIFICATIONS WHICH WILL BE REQUIRED TO THE AFFECTED DETAILS. MODIFICATIONS TO THE CONTRACT DOCUMENTS MAY BE SUBJECT TO REVIEW & APPROVAL BY DSA.
- VERIFY ALL DIMENSIONS AND ELEVATIONS IN THE FIELD AND WITH ARCH DRAWINGS PRIOR TO LOCATING AND FABRICATING NEW FRAMING.
- 3. ELEMENTS SHOWN SCREENED ARE EXISTING ELEMENTS WHICH ARE TO REMAIN, UNO. ELEMENTS SHOWN DARK ARE NEW ELEMENTS, UNO.
- 4. VERIFY ALL DIMENSIONS, ELEVATIONS, FINISH SURFACES, SLOPES, DRAINS, DEPRESSIONS, CURBS, ETC, WITH ARCHITECTURAL DRAWINGS PRIOR TO START OF CONSTRUCTION.
- 5. SEE ARCH FOR FINISHES, PARTITION WALLS, WATERPROOFING, ROOFING, AND OTHER NON-STRUCTURAL ELEMENTS.
- 6. SEE ARCHITECTURAL DRAWINGS FOR GRID DIMENSIONS & HORIZONTAL CONTROL.
- 7. MOVE AND REPLACE (E) CROSS BRIDGING IN KIND AS REQUIRED FOR INSTALLATION OF SISTERING JOISTS.
- 8. SEE SHEET S0.01 FOR SYMBOLS AND ABBREVIATIONS.
- 9. SEE S0.XX SERIES OF SHEETS FOR STRUCTURAL GENERAL NOTES.
- 10. SEE S4.XX SERIES OF SHEETS FOR EQUIPMENT SUPPORT DETAILS.

#### MECHANICAL EQUIPMENT NOTES:

- 1. XXX INDICATES (N) HVAC EQUIPMENT PER MECHANICAL DRAWINGS. SEE EQUIPMENT SCHEDULE FOR SUPPORT AND/OR ANCHORAGE DETAIL.
- 2. VERIFY EXACT QUANTITIES, LOCATIONS AND/OR DIMENSIONS OF MEP EQUIPMENT WITH MEP & ARCHITECTURAL DRAWINGS AND EQUIPMENT MFR PRIOR TO FABRICATION OF NEW SUPPORT FRAMING AND INSTALLATION OF EQUIPMENT.
- 3. ALL (N) DUCTS SHALL RUN THROUGH (E) ROOF AND WALL OPENINGS IN (E) WOOD STUD WALLS, TYP, UNO. NO (N) OPENINGS SHALL BE CUT IN (E) ROOF OR WALLS. SEE DETAIL 2/S4.01 FOR (N) FRAMING AT (E) WOOD ROOF OPENINGS AS REQ'D.
- 4. IF PIPING FROM MECH UNIT REQUIRE CORE THRU (E) ROOF OR WALL SHEATHING (2 INCH MAX DIAMETER), CORE SHALL BE LOCATED BETWEEN ADJACENT (E) JOISTS OR STUDS AND SHALL NOT CUT JOISTS OR STUDS.

### EQUIPMENT SCHEDULE

RTU UNITS							
MARK	OPERATING WEIGHT LBS.	DETAIL REFERENCE	REMARKS				
RTU-ML	675	4/S4.01	SEE MECH FOR ADDL INFORMATION				



FILE NO: 19-91 A#: 03-122718

11-17-2022 01-31-202;

S. Flower St, Suite 2100
Los Angeles, CA 90017
O: 213.418.0201
www.kpff.com



RSD - MUSCATEL MIDDLE SCHOOL
HVAC REPLACEMENT AT BUILDINGS C,E,F,J AND K

ROSEMEAD
SCHOOL DISTRICT
PARK ROSEMEAD
3907 ROSEMEAD BOULEVARD
ROSEMEAD, CA 91770

NACHITECTURE | ARCHITECTURE

NAC NO 161-21043

FILE

DRAWN CC

CHECKED EMB/AL

DATE 11-17-2022

BUILDING C

ROOF FRAMING PLAN

S2.01

BLDG E - ROOF FRAMING PLAN

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

#### PLAN NOTES:

- 1. EXISTING CONDITIONS SHOWN ON PLANS, SECTIONS AND DETAILS ARE BASED ON LIMITED AVAILABLE AS-BUILT DOCUMENTATION. THE CONTRACTOR IS RESPONSIBLE FOR VERIFYING ALL ACTUAL CONDITIONS. DISCREPANCIES BETWEEN ACTUAL FIELD CONDITIONS AND THOSE SHOWN ON THE DRAWINGS SHALL BE BROUGHT TO THE ATTENTION OF THE ENGINEER PRIOR TO START OF WORK. ARCHITECT AND ENGINEER SHALL REVIEW THE ACTUAL FIELD CONDITIONS AND DETERMINE THE EXTENT OF MODIFICATIONS WHICH WILL BE REQUIRED TO THE AFFECTED DETAILS. MODIFICATIONS TO THE CONTRACT DOCUMENTS MAY BE SUBJECT TO REVIEW & APPROVAL BY DSA.
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#### MECHANICAL EQUIPMENT NOTES:

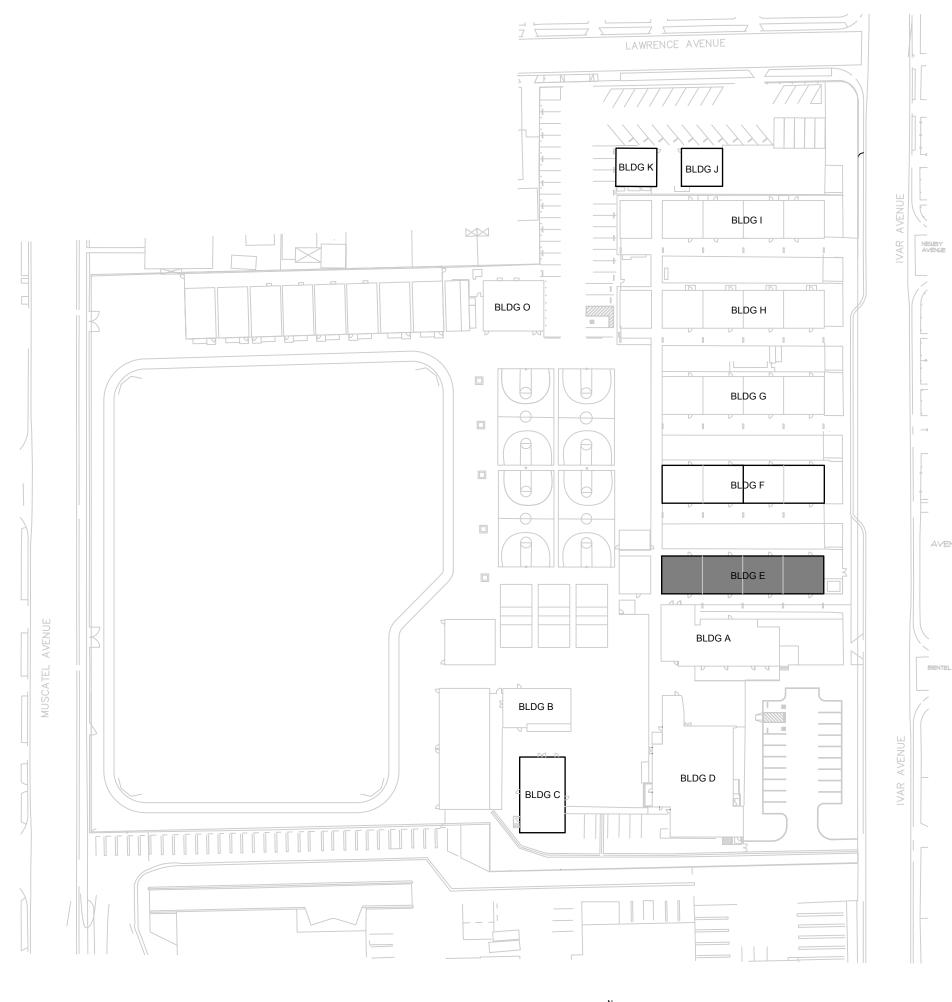


INDICATES (N) HVAC EQUIPMENT PER MECHANICAL DRAWINGS. SEE EQUIPMENT SCHEDULE FOR SUPPORT AND/OR ANCHORAGE DETAIL.

- VERIFY EXACT QUANTITIES, LOCATIONS AND/OR DIMENSIONS OF MEP EQUIPMENT WITH MEP &
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### **EQUIPMENT SCHEDULE**

RTU UNITS						
MARK	OPERATING WEIGHT LBS.	DETAIL REFERENCE	REMARKS			
RTU-M6	675	4/S4.01	SEE MECH FOR ADDL INFORMATION			
RTU-M7	675	4/S4.01	SEE MECH FOR ADDL INFORMATION			
RTU-M8	675	4/S4.01	SEE MECH FOR ADDL INFORMATION			
RTU-M9	675	4/S4.01	SEE MECH FOR ADDL INFORMATION			
	RTU-M6 RTU-M7 RTU-M8	MARK OPERATING WEIGHT LBS.  RTU-M6 675  RTU-M7 675  RTU-M8 675	MARK         OPERATING WEIGHT LBS.         DETAIL REFERENCE           RTU-M6         675         4/S4.01           RTU-M7         675         4/S4.01           RTU-M8         675         4/S4.01			

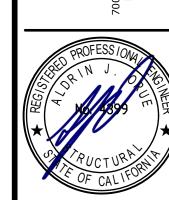


KEY PLAN 💍

FILE NO: 19-91 A#: 03-1227

11-17-202 01-31-202

00 S. Flower St, Suite 2100 Los Angeles, CA 90017 O: 213.418.0201



ROSEMEAD SCHOOL DISTRICT

RSD - MUSCATEL MIDDLE SCHOOL

HVAC REPLACEMENT AT BUILDINGS C,E,F,J AND K

ROSEMEAD
SCHOOL DISTRICT
PARK ROSEMEAD
3907 ROSEMEAD BOULEVARD
ROSEMEAD, CA 91770

MACHITECTURE

NAC NO 161-21043

FILE

DRAWN CC

CHECKED EMB/AL

DATE 11-17-2022

S2.02

BUILDING E ROOF FRAMING PLAN



BLDG F - ROOF FRAMING PLAN

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

#### PLAN NOTES:

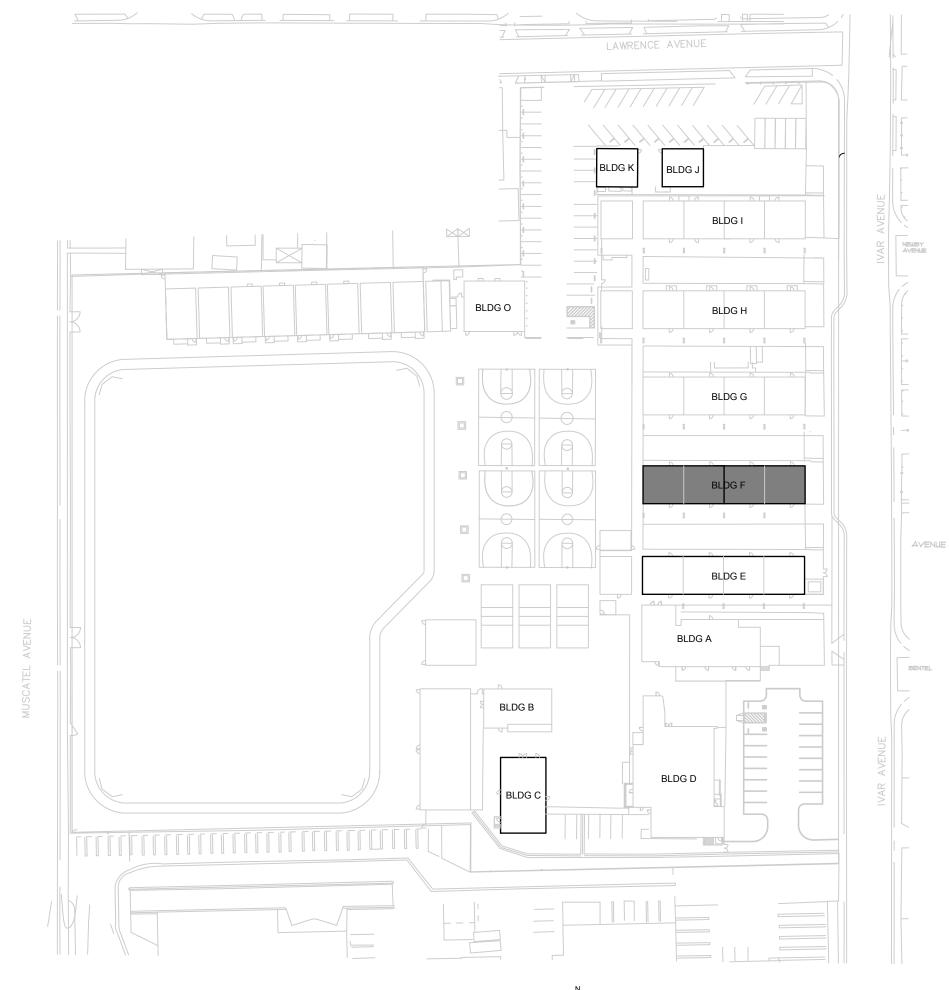
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- 6. SEE ARCHITECTURAL DRAWINGS FOR GRID DIMENSIONS & HORIZONTAL CONTROL.
- 7. MOVE AND REPLACE (E) CROSS BRIDGING IN KIND AS REQUIRED FOR INSTALLATION OF SISTERING JOISTS.
- 8. SEE SHEET S0.01 FOR SYMBOLS AND ABBREVIATIONS.
- 9. SEE S0.XX SERIES OF SHEETS FOR STRUCTURAL GENERAL NOTES.
- 10. SEE S4.XX SERIES OF SHEETS FOR EQUIPMENT SUPPORT DETAILS.

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- 1. INDICATES (N) HVAC EQUIPMENT PER MECHANICAL DRAWINGS. SEE EQUIPMENT SCHEDULE FOR SUPPORT AND/OR ANCHORAGE DETAIL.
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#### **EQUIPMENT SCHEDULE**

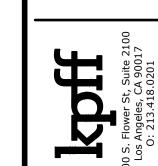
RTU UNITS						
MARK	OPERATING WEIGHT LBS.	DETAIL REFERENCE	REMARKS			
RTU-M10	675	4/\$4.01	SEE MECH FOR ADDL INFORMATION			
RTU-M11	675	4/\$4.01	SEE MECH FOR ADDL INFORMATION			
RTU-M12	675	4/S4.01	SEE MECH FOR ADDL INFORMATION			



KEY PLAN 🕀

FILE NO: 19-91 A#: 03-122718

11-17-2022





ROSEMEAD SCHOOL DISTRICT

RSD - MUSCATEL MIDDLE SCHOOL

HVAC REPLACEMENT AT BUILDINGS C,E,F,J AND K

ROSEMEAD
SCHOOL DISTRICT
PARK ROSEMEAD
3907 ROSEMEAD BOULEVARD
ROSEMEAD, CA 91770

ARCHITECTURE

NAC NO 161-21043

FILE

DRAWN CC

CHECKED EMB/AL

DATE 11-17-2022

BUILDING F ROOF FRAMING PLAN

S2.03

# **EQUIPMENT SCHEDULE**

RTU UNITS					
MARK	OPERATING WEIGHT LBS.	DETAIL REFERENCE	REMARKS		
RTU-M26	734	4/\$4.01	SEE MECH FOR ADDL INFORMATION		

(E) 3/4" PLYWOOD SHEATHING -17'-0" RTU UNIT PER MECH, TYP (SEE MECH EQUIP NOTES) ADD (1) 1 3/4"x14" LVL JOIST SISTÈRED TO ALL (E) JOISTS UNDER UNIT, (2) (E) JOISTS MINIMUM. SEE NOTE #1 (E) (2) 2x8 (E) (2) 2x8 (E) TJI35x @ 40"OC

# **EQUIPMENT SCHEDULE**

RTU UNITS							
MARK	OPERATING WEIGHT LBS.	DETAIL REFERENCE	REMARKS				
RTU-M27	734	4/\$4.01	SEE MECH FOR ADDL INFORMATION				

NOTE: IF CENTERED ON (E) I JOIST, SISTER (3) (E) JOIST MINIMUM.

BLDG J - ROOF FRAMING PLAN

# BLDG K - ROOF FRAMING PLAN

NOTE:

SEE 1/- FOR NOTES.

(E) 3/4" PLYWOOD SHEATHING —

16'-5"

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RTU UNIT PER MECH, TYP (SEE MECH EQUIP NOTES) ADD (1) 1 3/4"x14" LVL JOIST

SISTERED TO ALL (E) JOISTS UNDER UNIT, (2) (E) JOISTS MINIMUM. SEE NOTE #1

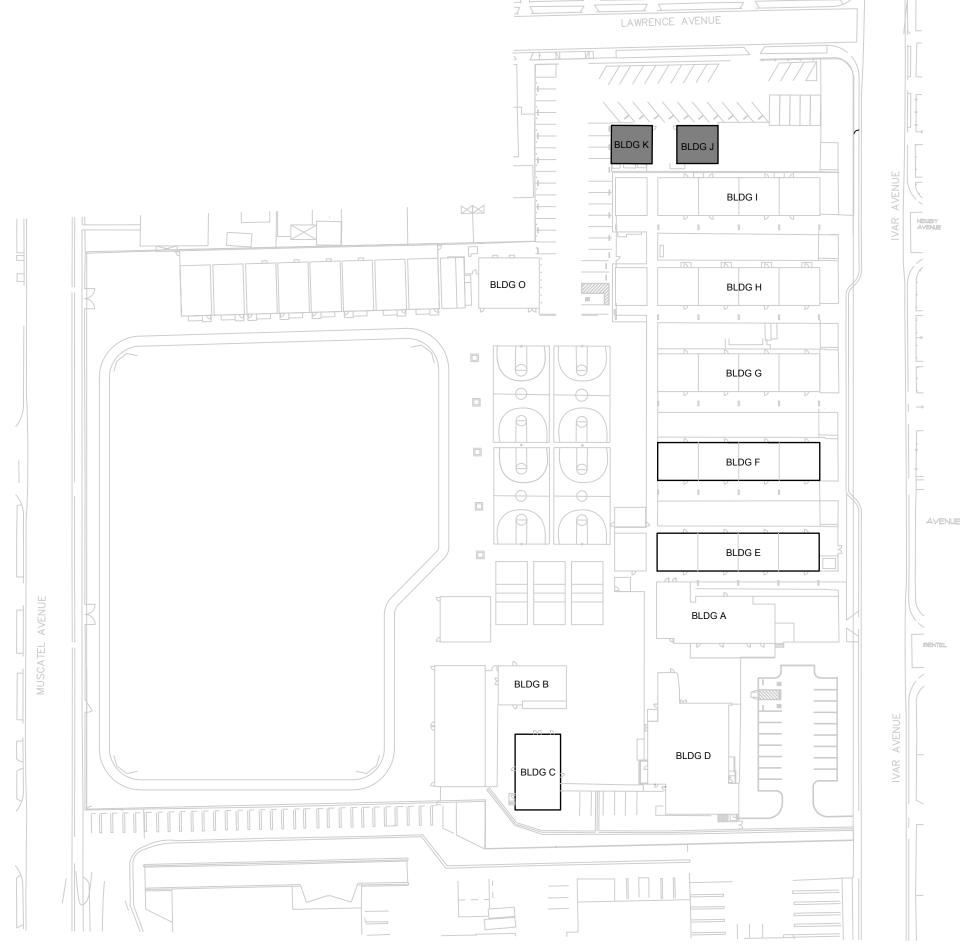
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- 5. SEE ARCH FOR FINISHES, PARTITION WALLS, WATERPROOFING, ROOFING, AND OTHER NON-STRUCTURAL
- 6. SEE ARCHITECTURAL DRAWINGS FOR GRID DIMENSIONS & HORIZONTAL CONTROL.
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XXX INDICATES (N) HVAC EQUIPMENT PER MECHANICAL DRAWINGS. SEE EQUIPMENT SCHEDULE FOR SUPPORT AND/OR ANCHORAGE DETAIL.

- 2. VERIFY EXACT QUANTITIES, LOCATIONS AND/OR DIMENSIONS OF MEP EQUIPMENT WITH MEP & ARCHITECTURAL DRAWINGS AND EQUIPMENT MFR PRIOR TO FABRICATION OF NEW SUPPORT FRAMING AND INSTALLATION OF EQUIPMENT.
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**BUILDINGS J & K** KEY PLAN  $\stackrel{^{\ }}{\oplus}$ 

NAC NO 161-21043

11-17-2022

ROSEMEAD SCHOOL DISTRICT

PARK ROSEMEAD

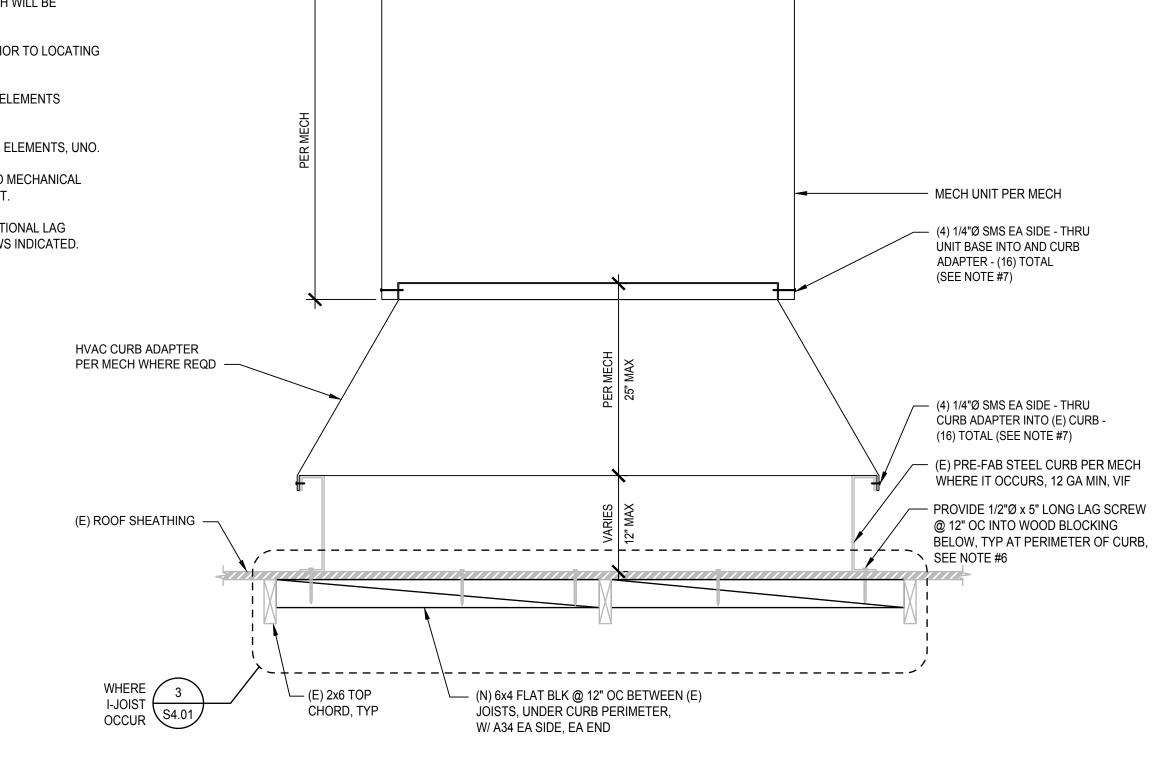
3907 ROSEMEAD BOULEVARD ROSEMEAD, CA 91770

**ROOF FRAMING PLAN** 

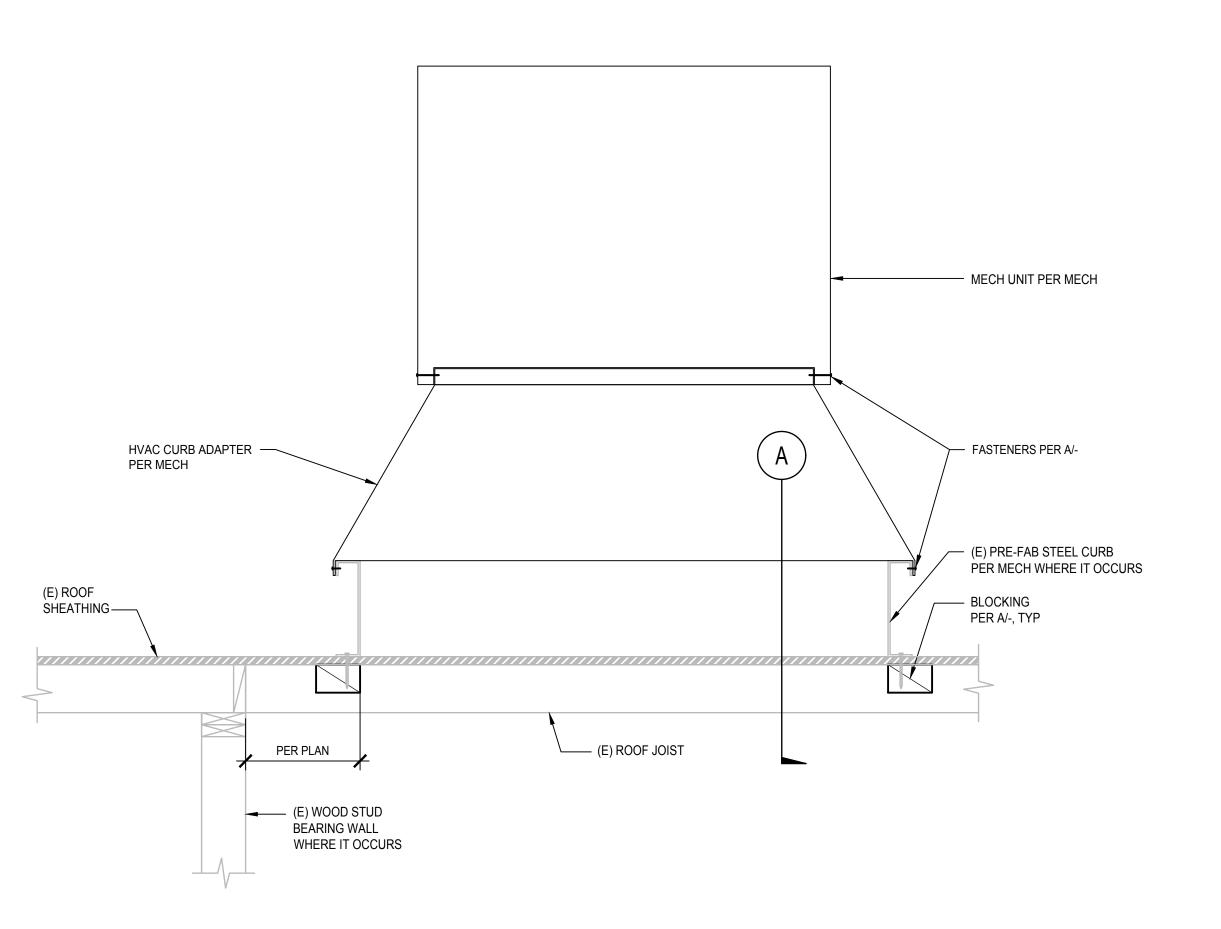
SEE 4/- FOR BALANCE OF INFORMATION AND NOTES

#### SISTER (N) JOIST TO (E) I-JOIST

- 1. EXISTING CONDITIONS SHOWN ARE BASED ON LIMITED AVAILABLE AS-BUILT DOCUMENTATION. THE CONTRACTOR IS RESPONSIBLE FOR VERIFYING ALL ACTUAL CONDITIONS. DISCREPANCIES BETWEEN ACTUAL FIELD CONDITIONS AND THOSE SHOWN ON THE DRAWINGS SHALL BE BROUGHT TO THE ATTENTION OF THE ENGINEER PRIOR TO START OF WORK. ARCHITECT AND ENGINEER SHALL REVIEW THE ACTUAL FIELD CONDITIONS AND DETERMINE THE EXTENT OF MODIFICATIONS WHICH WILL BE REQUIRED TO THE AFFECTED DETAILS.
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- 4. SEE ARCHITECTURAL FOR FLASHING, WATERPROOFING, AND OTHER NON-STRUCTURAL ELEMENTS, UNO.
- 5. VERIFY EXACT LOCATIONS AND DIMENSIONS OF EQUIPMENT WITH ARCHITECTURAL AND MECHANICAL DRAWINGS PRIOR TO FABRICATION OF NEW FRAMING AND INSTALLATION OF EQUIPMENT.
- 6. VERIFY (E) LAG SCREWS IN FIELD (DIAM AND PENETRATION). PROVIDE (N) AND/OR ADDITIONAL LAG SCREWS AS REQUIRED TO MATCH SIZE, PENETRATION AND/OR SPACING OF LAG SCREWS INDICATED.







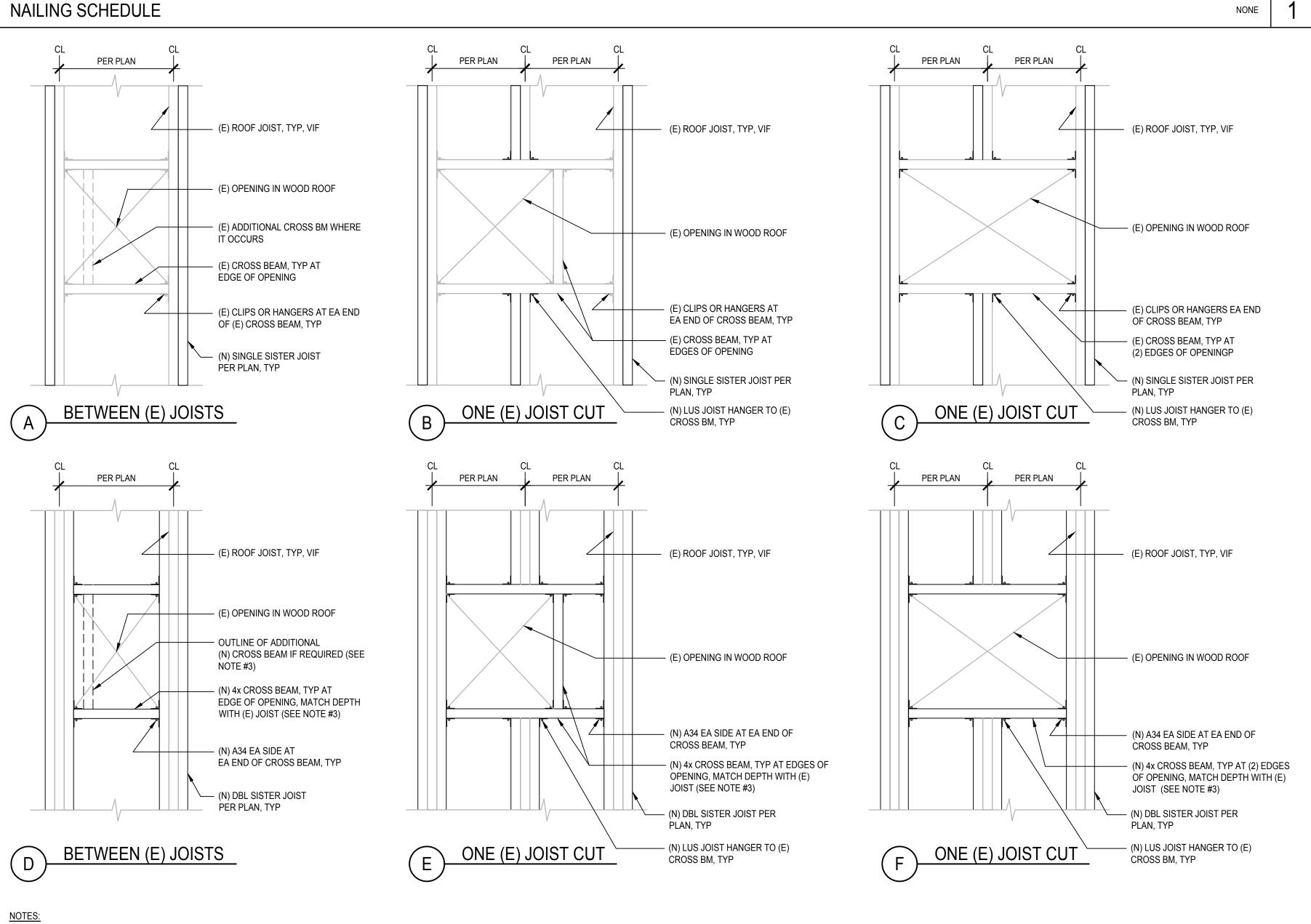
NOTES:

- 1. THIS NAILING SCHEDULE SHALL ONLY BE USED IF CONDITION IS NOT OTHERWISE DETAILED OR SPECIFIED ON THE CONSTRUCTION DOCUMENTS. COMMON NAILS SHALL BE USED EXCEPT WHERE OTHERWISE STATED.
- 2. NAILS SPACED AT 6 INCHES (152mm) ON CENTER AT EDGES, 12 INCHES (305mm) AT INTERMEDIATE SUPPORTS EXCEPT 6 INCHES (152mm) AT ALL SUPPORTS WHERE SPANS ARE 48 INCHES (1219mm) OR MORE. FOR NAILING OF WOOD STRUCTURAL PANEL AND PARTICLEBOARD DIAPHRAGMS AND SHEAR WALLS, REFER TO SECTIONS OF THE CODE.
- 3. COMMON OR DEFORMED SHANK.
- COMMON

1"=1'-0"

- DEFORM SHANK
- 6. CORROSION-RESISTANT SIDING OR CASING NAILS CONFORMING TO THE REQUIREMENTS OF
- 7. FASTENERS SPACED 3 INCHES (76mm) ON CENTER AT EXTERIOR EDGES AND 6 INCHES (152mm) ON CENTER AT INTERMEDIATE SUPPORTS.
- 8. CORRISION-RESISTANT ROOFING NAILS WITH 7/16-INCH-DIAMETER (11mm) HEAD AND 1 1/2-INCH (38mm) LENGTH FOR 1/2" INCH (12.7mm) SHEATHING AND 1 3/4-INCH (44mm) LENGTH FOR 25/32 -INCH (20mm) SHEATHING CONFORMING TO THE REQUIREMENTS OF THE CODE.
- CORROSION-RESISTANT STAPLES WITH NOMINAL 7/16-INCH (11mm) CROWN AND 1 1/8-INCH (29mm) LENGTH FOR 1/2-INCH (12.7mm) SHEATHING AND 1 1/2-INCH (38mm) LENGTH FOR 25/32 -INCH (20mm) SHEATHING CONFORMING TO THE REQUIREMENTS OF THE CODE.
- 10. PANEL SUPPORTS AT 16 INCHES (406mm) [20INCHES (508 mm) IF STRENGTH AXIS DIRECTION OF THE PANEL, UNLESS OTHERWISE MARKED]. CASING OR FINISH NAILS SPACED 6 INCHES (152mm) ON PANEL EDGES, 12 INCHES (305mm) AT INTERMEDIATE SUPPORTS.
- 11. PANEL SUPPORTY AT 24 INCHES (610mm). CASING OR FINISH NAILS SPACED 6 INCHES (152mm) ON PANEL EDGES, 12 INCHES (305mm) AT INTERMEDIATE SUPPORTS.

1. JOIST TO SILL OR DIRDER, TOEMAL. 2. RRIGHENDR TO JOIST TO SILL AND IRROR HAD 2. RRIGHENDR TO JOIST TO PAIR JEACH HAD 3. RRIGHENDR TO JOIST TO PAIR JEACH HAD 4. WIDER THAN T XE ("ESPIRA" XESPIRA" SUBPLICOR TO ELESS TO EACH JOIST, FACE MAIL 4. WIDER THAN T XE ("ESPIRA" XESPIRA" SUBPLICOR TO EACH JOIST, FACE MAIL 5. 21 SIRT MIN SUBPLICOR TO JOIST OR RIGHERS BLIND AND FACE MAIL 5. 22 SIRT PAIR TO JOIST OR RIGHERS BLIND AND FACE MAIL 6. SOLE PAIR TO JOIST OR RIGHERS BLIND AND FACE MAIL 6. SOLE PAIR TO JOIST OR RIGHERS BLIND AND FACE MAIL 6. SOLE PAIR TO JOIST OR RIGHERS AND FACE MAIL 6. SOLE PAIR TO JOIST OR RIGHERS BLIND AND FACE MAIL 6. DOUBLE STUDY, FACE MAIL 6. DOUBLE TO PAIR ST LYPICAL FACE MAIL 6. DOUBLE	CONNECTION	NAILING
2. REDGINST TO JUIST. TORNAL EACH END 2. If XP (2 Sem X 158mm) SUBFLOOR OR LESS TO EACH JUST. FACE NAIL 2. If XP (2 Sem X 158mm) SUBFLOOR OR LESS TO EACH JUST. FACE NAIL 3. If XP (2 Sem X 158mm) SUBFLOOR OR LESS TO EACH JUST. FACE NAIL 5. Z (5 Imm) SUBFLOOR TO JUST OR REDCKING, TYPICAL FACE NAIL 6. SULE FIATE TO JUST OR REDCKING, TYPICAL FACE NAIL 6. SULE FIATE TO JUST OR REDCKING, TYPICAL FACE NAIL 7. TOP PLATE TO SULE PLATE 7. TOP PLATE TO SULE PLATE 8. STUD TO SULE PLATE 8. ST		
3. T N OF CERSION AT ISSUING INCORD RESIST TO EACH LIJOST, FACE NAIL   2.48   MIDER THAN IT YAS ("BERNIN Y SIGNIN" SUBFLOOR TO EACH LIJOST, FACE NAIL   3.35   2. S ("Intrino SubFLOOR TO JOIST OR GROERE BLIND AND FACE NAIL   3.45   6. SOLE FRATE TO JOIST OR RED CORNE, TYPICAL FACE NAIL   4.68 AT 16° (REPRINT) OR SOLE FLATE TO JOIST OR RED CORNE, TYPICAL FACE NAIL   4.68 AT 16° (REPRINT) OR SOLE FLATE TO JOIST OR BED CORNE, TYPICAL FACE NAIL   4.68 AT 16° (REPRINT) OR SOLE FLATE TO JOIST OR BED CORNE, TYPICAL FACE NAIL   4.68 AT 16° (REPRINT) OR SOLE FLATE   4.68 AT 16° (REPRINT) OR SOLE FLATE   4.68 AT 16° (REPRINT) OR JOINT OR SOLE FLATE   4.68 AT 16° (REPRINT) OR JOINT OR SOLE FLATE   4.68 AT 16° (REPRINT) OR JOINT OR SOLE FLATE   4.68 AT 16° (REPRINT) OR JOINT OR SOLE FLATE   4.68 AT 16° (REPRINT) OR JOINT OR SOLE FLATE   4.68 AT 16° (REPRINT) OR JOINT OR SOLE FLATE   4.68 AT 16° (REPRINT) OR JOINT OR SOLE FLATE   4.68 AT 16° (REPRINT) OR JOINT OR SOLE FLATE   4.68 AT 16° (REPRINT) OR JOINT OR SOLE FLATE   4.68 AT 16° (REPRINT) OR JOINT OR SOLE FLATE   4.68 AT 16° (REPRINT) OR JOINT OR SOLE FLATE   4.68 AT 16° (REPRINT) OR JOINT OR JOINT OR SOLE FLATE   4.68 AT 16° (REPRINT) OR JOINT OR JOINT OR SOLE FLATE   4.68 AT 16° (REPRINT) OR JOINT		
4. WIGER THAN 1" X6" (25mm) SUBFLOOR TO LEACH JOIST, FACE NAIL 5. 2" (51mm) SUBFLOOR TO LOST OR GIBGER BLIND AND FACE NAIL 6. SOLE PLATE TO JOIST OR REJOCKING, TYPICAL FACE NAIL 7. TOP PLATE TO JOIST OR REJOCKING, TYPICAL FACE NAIL 7. TOP PLATE TO STUD, BIND MAIL 8. SOLE PLATE TO JOIST OR REJOCKING, TYPICAL FACE NAIL 9. DOUBLE STUDS FACE NAIL 1. GRAT 1" (40mm) OR 1.018 E. BIND MAIL 9. DOUBLE STUDS FACE NAIL 1. GRAT 1" (40mm) OR 1.018 E. BIND MAIL 9. DOUBLE STUDS FACE NAIL 1. GRAT 1" (40mm) OR 1.018 E. BIND MAIL 9. DOUBLE TOP PLATES, MAP SHOLE 9. SHOLE TO SHOLE TOP PLATES, MAP SHOLE 9. SHOLE TO SHOLE TOP PLATES, MAP SHOLE 9. SHOLE TOP PLATE		
5. 2'(6 timm) SUBPLOOR TO JUST OR GIRDER, BLIND AND FACE NAIL. 6. SOLE PLATE TO JUST OR BLICKING, TYPICAL FACE NAIL. 6. SOLE PLATE TO JUST OR BLICKING, TYPICAL FACE NAIL. 7. TOP PLATE TO STUD, END NAIL. 7. TOP PLATE TO STUD, END NAIL. 8. STUD TO SOLE PLATE 9. SOLED FACE TO JUST OR BLICKING, TYPICAL FACE NAIL. 9. STUD TO SOLE PLATE 9. STUD TO SOLE PLATE 9. STUD TO SOLE PLATE 9. SOLED FACE TO JUST OR BLICKING, TYPICAL FACE NAIL. 10. DOUBLE TOP FLATES TUDS, FACE NAIL. 10. DOUBLE TOP FLATES. PYPICAL FACE NAIL. 10. DOUBLE TOP FLATES. SPAN DEPARTMENT TO TOP PLATE, TOENAIL. 10. DOUBLE TOP FLATES. SPAN DEPARTMENT TO TOP PLATE, TOENAIL. 10. DOUBLE TOP FLATES. SPAN DEPARTMENT TO TOP PLATE, TOENAIL. 10. TOP PLATES. JUST SAY AND INTERSECTIONS, FACE NAIL. 10. TOP PLATES. JUST SAY AND INTERSECTIONS, FACE NAIL. 10. TOEN THAT SAY AND INTERSECTIONS, FACE NAIL. 10. CONTINUOUS HEADER TO STUD. TOENAIL. 10. CELLING JUSTS TOP FLATE. TOENAIL. 10. CELLING JUSTS TOP FLATE. TOENAIL. 10. CELLING JUSTS TOP FLATE. TOENAIL. 10. SECULING JUSTS TOP FLATE TOENAIL. 10. SECULING JUSTS TO PLATE TOENAIL. 10. SECULING JUSTS TOEN		
SOLE PLATE TO JOIST OR REJORNINS TYPICAL FACE NAIL  SOLE PLATE TO JOIST OR REJORNINS TYPICAL FACE NAIL  SOLE PLATE TO JOIST OR REJORNINS TYPICAL FACE NAIL  STUD TO SOLE PLATE  10 PLATE TO JOIST OR REJORNINS TYPICAL FACE NAIL  STUD TO SOLE PLATE  4.50 TOENAL OR 2.166. END NAIL  8. STUD TO SOLE PLATE  4.50 TOENAL OR 2.166. END NAIL  9. DOUBLELE TOPE PLATES, MYPORA FACE NAIL  10 BOAT 167 (40mm) OD DOUBLE TOP PLATES, MYPORA FACE NAIL  10 BOURSE TOP PLATES, MYPORA FACE NAIL  10 BOAT 167 (40mm) OD DOUBLE TOP PLATES, MYPORA FACE NAIL  10 BOAT 167 (40mm) OD DOUBLE TOP PLATES, MYPORA FACE NAIL  10 BOAT 167 (40mm) OD DOUBLE TOP PLATES, MYPORA FACE NAIL  10 BOAT 167 (40mm) OD DOUBLE TOP PLATES, MYPORA FACE NAIL  10 BOAT 167 (40mm) OD DOUBLE TOP PLATES, MYPORA FACE NAIL  10 CONTINUOUS HEADER TWO PIECES  10 BOAT 167 (40mm) OD ALONIS FACE NAIL  10 CELLINA JOISTS TO PLATE, TOENAL  10 CELINA JOINT JO		
SOLE PLATE TO JUST OR BLOCKING, AT BRACED WALL PANELS   2-16		
8. STUD TO SOLE PLATE		
9. DUBLE STUDS, FACE NAIL 164 AT 24' (\$10mm) O 10. DUBLE TOP PLATES, ITPICAL, FACE NAIL 164 AT 16' (*10mm) O 10. DUBLE TOP PLATES, ITPICAL, FACE NAIL 164 AT 16' (*10mm) O 10. DUBLE TOP PLATES, ITPICAL, FACE NAIL 164 AT 16' (*10mm) O 10. DUBLE TOP PLATES, ITPICAL, FACE NAIL 164 AT 16' (*10mm) O 10. DUBLE TOP PLATES, ITPICAL, FACE NAIL 164 AT 16' (*10mm) O 10. DUBLE TOP PLATES, ITPICAL, FACE NAIL 164 AT 16' (*10mm) O 10. DUBLE TOP PLATES, ITPICAL, FACE NAIL 164 AT 16' (*10mm) O 10. DUBLE TOP PLATES, ITPICAL, FACE NAIL 164 AT 16' (*10mm) O 10. DUBLE TOP PLATES, ITPICAL, FACE NAIL 165 AT 16' (*10mm) O 10. DUBLE TOP PLATES, ITPICAL, FACE NAIL 165 AT 16' (*10mm) O 10. DUBLE TOP PLATES, ITPICAL, FACE NAIL 165 AT 16' (*10mm) O 10. DUBLE TOP PLATES, ITPICAL, FACE NAIL 165 AT 16' (*10mm) O 10. DUBLE TOP PLATES, ITPICAL, FACE NAIL 165 AT 16' (*10mm) O 10. DUBLE TOP PLATES, ITPICAL, FACE NAIL 165 AT 16' (*10mm) O 10. DUBLE TOP PLATES, ITPICAL, FACE NAIL 165 AT 16' (*10mm) O 10. DUBLE TOP PLATES, ITPICAL, FACE NAIL 165 AT 16' (*10mm) O 10. DUBLE TOP PLATES, ITPICAL, FACE NAIL 165 AT 16' (*10mm) O 10. DUBLET TOP PLATES, ITPICAL, FACE NAIL 165 AT 16' (*10mm) O 10. DUBLET TOP PLATES, ITPICAL, FACE NAIL 165 AT 16' (*10mm) O 10. DUBLET TOP PLATES, ITPICAL, FACE NAIL 165 AT 16' (*10mm) O 10. DUBLET TOP PLATES, ITPICAL, FACE NAIL 165 AT 16' (*10mm) O 10. DUBLET TOP PLATES, ITPICAL, FACE NAIL 165 AT 16' (*10mm) O 10. DUBLET TOP PLATES, TOP PLATES, FACE NAIL 165 AT 16' (*10mm) O 10. DUBLET TOP PLATES, TOP PLATES, FACE NAIL 165 AT 16' (*10mm) O 10. DUBLET TOP PLATES, TOP PLATES, FACE NAIL 165 AT 16' (*10mm) O 10. DUBLET TOP PLATES, TOP PLATES, FACE NAIL 165 AT 16' (*10mm) O 10. DUBLET TOP PLATES, TOP PLATES, FACE NAIL 16' (*10mm) O 10. DUBLET TOP PLATES, TOP PLATES, FACE NAIL 16' (*10mm) O 10. DUBLET TOP PLATES, TOP PLATES, FACE NAIL 16' (*10mm) O 10. DUBLET TOP PLATES, TOP PLATES, FACE NAIL 16' (*10mm) O 10. DUBLET TOP PLATES, TOP PLATES, FACE NAIL 16' (*10mm) O 10. DUBLET TOP PLATES, TOP PLATES, FACE NAIL 16' (*10mm) O 10. DUBLET T	7. TOP PLATE TO STUD, END NAIL	2-16
10 DUBLE TOP PLATES, TAPICAL FACE NAIL	8. STUD TO SOLE PLATE	4-8d, TOENAIL OR 2-16d, END NAII
DOUBLE TOP PLATES, LAP SPLICE   8-156   8-15	9. DOUBLE STUDS, FACE NAIL	16d AT 24" (610mm) O
2. RIM JOIST TO TOP PLATE, TOENAIL 88 AT E° (152mm) 0. 3. TOP PLATES, LAPS AND INTERSECTIONS, FACE NAIL 2-18 4. CONTINUOUS HEADER, TWO PIECES 168 AT 16° (408mm) OC ALONG EACH EDG 5. CEILLING, JOISTS TO PLATE, TOENAIL 3-8 6. CONTINUOUS HEADER, TO STUD, TOENAIL 3-8 6. CONTINUOUS HEADER, TO STUD, TOENAIL 3-18 6. CEILLING, JOISTS TO PARELLEL RAFTERS, FACE NAIL 3-18 6. CEILLING, JOISTS TO PARELLEL RAFTERS, FACE NAIL 3-18 6. CEILLING, JOISTS TO PARELLEL RAFTERS, FACE NAIL 3-18 6. CEILLING, JOISTS TO PARELLEL RAFTERS, FACE NAIL 3-18 6. CEILLING, JOISTS TO PARELLEL RAFTERS, FACE NAIL 3-18 6. CEILLING, JOISTS TO PARELLEL RAFTERS, FACE NAIL 3-18 6. CEILLING, JOISTS TO PARELLEL RAFTERS, FACE NAIL 3-18 6. CEILLING, JOISTS TO PARELLEL RAFTERS, FACE NAIL 3-18 6. CEILLING, JOISTS TO PARELLEL RAFTERS, FACE NAIL 3-18 6. CEILLING, JOISTS TO PARELLEL RAFTERS, FACE NAIL 3-18 6. CEILLING, JOISTS TO PARELLEL RAFTERS, FACE NAIL 3-18 6. CEILLING, JOISTS TO PARELLEL RAFTERS, FACE NAIL 3-18 6. CEILLING, JOISTS TO PARELLEL RAFTERS, FACE NAIL 3-18 6. CEILLING, JOISTS TO PARELLEL RAFTERS, FACE NAIL 3-18 6. CEILLING, JOISTS TO PARELLEL RAFTERS, FACE NAIL 3-18 6. CEILLING, JOISTS TO PARELLEL RAFTERS, FACE NAIL 3-18 6. CEILLING, JOISTS TO PARELLEL RAFTERS, FACE NAIL 3-18 6. CEILLING, JOISTS TO PARELLEL RAFTERS, FACE NAIL 3-18 6. CEILLING, JOISTS TO PARELLE RAFTERS, FACE NAIL 3-18 6. CEILLING, JOISTS TO PARELLE RAFTERS, FACE NAIL 3-18 6. CEILLING, JOISTS TO PARELLE RAFTERS, FACE NAIL 3-18 6. CEILLING, JOISTS TO PARELLE RAFTERS, FACE NAIL 3-18 6. CEILLING, JOISTS TO PARELLE RAFTERS, FACE NAIL 3-18 6. CEILLING, JOISTS TO PARELLE RAFTERS, FACE NAIL 3-18 6. CEILLING, JOISTS TO PARELLE RAFTERS, FACE NAIL 3-18 6. CEILLING, JOISTS TO PARELLE RAFTERS, FACE NAIL 3-18 6. CEILLING, JOISTS TO PARELLE RAFTERS, FACE NAIL 3-18 6. CEILLING, JOISTS TO PARELLE RAFTERS, FACE NAIL 3-18 6. CEILLING, JOISTS TO PARELLE RAFTERS, FACE NAIL 3-18 6. CEILLING, JOISTS TO PARELLE RAFTERS, FACE NAIL 3-18 6. CEILLING, JOISTS TO PARELLE RAFTERS, FACE NAIL 3-18 6. CEILLING, JO		,
3. TOP PLATES, LAPS AND INTERSECTIONS, FACE NAIL   2-16   4. CONTINUOUS HEADER, TWO PIECES   16d AT 16" (406mm) OC ALONG EACH EDG   3-8   5. CELILING, JOISTS TO PLATE, TOENAIL   3-8   6. CONTINUOUS HEADER TO STUD, TOENAIL   4-8   7. CELILING, JOISTS TO PLATE, TOENAIL   3-16   8. CELILING, JOISTS TO PLATE, APS OVER PARTITIONS, FACE NAIL   3-16   8. CELILING, JOISTS TO PLATE, RAFTERS, FACE NAIL   3-16   9. RAFTER TO PLATE, TOENAIL   3-18   9. RAFTER TO PLATE, TOENAIL   3-28   10. 1" (25mm) BRACE TO EACH STUD AND PLATE, FACE NAIL   2-8   10. 1" (25mm) SHEADTHING OR LESS TO EACH BEARINS, FACE NAIL   2-8   10. 1" (25mm) SHEADTHING OR LESS TO EACH BEARINS, FACE NAIL   2-8   10. 1" (25mm) PLANES   25mm X 203mm) SHEATHING TO EACH BEARINS, FACE NAIL   2-8   10. 1" (25mm) PLANES   2-16d AT EACH SPLIC   2-16d AT	1. BLOCKING BETWEEN JOISTS OR RAFTERS TO TOP PLATE, TOENAIL	
4. CONTINUOUS HEADER, TWO PIECES 16d AT 16" (406mm) OC ALONG EACH EDGE 5. CEILING JOISTS TO PLATE, TOENAIL 3-88 6. CONTINUOUS HEADER TO STUD, TOENAIL 4-88 6. CEILING JOIST, LAPS OWER PARTITIONS, FACE NAIL 3-16 6. CEILING JOIST, LAPS OWER PARTITIONS, FACE NAIL 3-16 6. CEILING JOIST, LAPS OWER PARTITIONS, FACE NAIL 3-16 6. CEILING JOIST, LAPS OWER PARTITIONS, FACE NAIL 3-16 6. CEILING JOIST LAPS OWER PARTITIONS, FACE NAIL 3-16 6. CEILING JOIST STO PARELLEL RAFTERS, FACE NAIL 3-	2. RIM JOIST TO TOP PLATE, TOENAIL	8d AT 6" (152mm) 0
5. CEILING JOISTS TO PLATE, TOENAIL 3.8 6. CONTINUOUS HEADER TO STUD, TOENAIL 4.8 7. CEILING JOIST, LAPS OVER PARTITIONS, FACE NAIL 3.16 8. CEILING JOIST, LAPS OVER PARTITIONS, FACE NAIL 3.16 9. RAFTER TO PLATE, TOENAIL 3.16 9. RAFTER TO PLATE, TOENAIL 3.16 9. RAFTER TO PLATE, TOENAIL 2.8 10. 1° (25mm) BRACE TO EACH STUD AND PLATE, FACE NAIL 2.8 10. 1° (25mm) BRACE TO EACH STUD AND PLATE, FACE NAIL 2.8 10. 1° (25mm) SHEATHING OR LESS TO EACH BEARING, FACE NAIL 2.8 10. 1° (25mm X 203mm) SHEATHING OR LESS TO EACH BEARING, FACE NAIL 3.8 10. BUILT-UP CORNER STUDS 166 AT 24° (610mm) 2.8 10. BUILT-UP CORNER STUDS 166 AT 24° (610mm) 2.8 10. BUILT-UP GRODER AND BEAMS 20 d AT 32° (813mm) OC AT TOP AND BOTTOM AND STAGGERED 2.20d AT ENDS AND AT EACH SPLIC 2.5 10. CEILING JOINT AND WALL SHEATHING (TO FRAMING): 3.2° (15mm) PLANKS 2.16d AT EACH BEARING PLATE AND AT EACH SPLIC 3.8 10.02° 34° (15mm-19mm) 80 4 80 4 AND 80 80 80 90.32° 34° (15mm-25mm) 10 4 0 8 80 80 80 80 80 80 80 80 80 80 80 80	3. TOP PLATES, LAPS AND INTERSECTIONS, FACE NAIL	2-16
6. CONTINUOUS HEADER TO STUD, TOENAIL 7. CEILING JOIST, LAPS OVER PARTITIONS, FACE NAIL 8. CEILING JOIST TO PARELLEL RAFTERS, FACE NAIL 9. RAFTER TO PLATE, TOENAIL 9. RAFTER TO PLATE, TOENAIL 9. RAFTER TO PLATE, TOENAIL 9. L' X & (25mm X 203mm) SHEATHING OR LESS TO EACH BEARING, FACE NAIL 10. L' X & (25mm X 203mm) SHEATHING OR LESS TO EACH BEARING, FACE NAIL 11. L' X & (25mm X 203mm) SHEATHING OR LESS TO EACH BEARING, FACE NAIL 12. WIIDER THAN 1' X & (25mm X 203mm) SHEATHING TO EACH BEARING, FACE NAIL 13. BUILT-UP CORNER STUDS 160 AT 24' (610mm) 160 AT 32' (613mm) OC AT TOP AND BOTTOM AND STAGGERED 2:200 AT ENDS AND AT EACH SPILL 162. L' (51mm) PLANKS 163 AT 24' (610mm) 163 AT 24' (610mm) 164 AT 24' (610mm) 165 AT 24' (610mm) 165 AT 24' (610mm) 166 AT 24' (610mm) 167 AT 24' (610mm) 168 AT 24' (610mm)	4. CONTINUOUS HEADER, TWO PIECES	16d AT 16" (406mm) OC ALONG EACH EDG
7. CEILING JOIST, LAPS OVER PARTITIONS, FACE NAIL 3-16 8. CEILING JOISTS TO PARELLEL RAFTERS, FACE NAIL 3-16 8. CEILING JOISTS TO PARELLEL RAFTERS, FACE NAIL 3-16 9. RAFTER TO PLATE, TOENAIL 3-8 10. 1" (25mm) BRACE TO EACH STUD AND PLATE, FACE NAIL 2-8 10. 1" (25mm) SHACE TO EACH STUD AND PLATE, FACE NAIL 2-8 10. II" (25mm X 203mm) SHEATHING OR LESS TO EACH BEARING, FACE NAIL 3-8 10. II" (25mm X 203mm) SHEATHING OR LESS TO EACH BEARING, FACE NAIL 3-8 10. III (25mm X 203mm) SHEATHING OR LESS TO EACH BEARING, FACE NAIL 3-8 10. IIII (25mm X 203mm) SHEATHING TO EACH BEARING, FACE NAIL 3-8 10. IIII (25mm X 203mm) SHEATHING TO EACH BEARING, FACE NAIL 3-8 10. IIII (25mm X 203mm) SHEATHING TO EACH BEARING, FACE NAIL 3-8 10. IIII (25mm X 203mm) SHEATHING TO EACH BEARING, FACE NAIL 3-8 10. IIII (25mm X 203mm) SHEATHING TO EACH BEARING, FACE NAIL 3-8 10. IIII (25mm X 203mm) SHEATHING TO EACH BEARING, FACE NAIL 3-8 10. IIII (25mm X 203mm) SHEATHING TO EACH BEARING, FACE NAIL 3-8 10. III (25mm X 203mm) SHEATHING TO FRAMING): 3-10 (25mm X 203mm) SHEATHING TO FRAMING): 3-10 (25mm X 203mm) SHEATHING (TO FRAMING): 3-10 (25mm X 203mm) SHEATHING: 3-10 (25mm X 203mm) SHEATHING	5. CEILING JOISTS TO PLATE, TOENAIL	3-8
8. CEILING JOISTS TO PARELLEL RAFTERS, FACE NAIL 9. RAFTER TO PLATE, TOENAIL 2.80. 1° (25mm) BRACE TO EACH STUD AND PLATE, FACE NAIL 2.11° X 8° (25mm) X 203mm) SHEATHING OR LESS TO EACH BEARING, FACE NAIL 2.22. WIDER THAN 1° X 8° (25mm X 203mm) SHEATHING TO EACH BEARING, FACE NAIL 2.23. BUILT-UP CORNER STUDS 3. C 16d AT 24° (610mm) OC AT TOP AND BOTTOM AND STAGGERED 2-20d AT ENDS AND AT EACH SPUIC 3. C 2° (51mm) PLANKS 3. C 1-66 AT EACH BEARING 3. SUBFLOOR AND WALL SHEATHING (TO FRAMING): 3. 12° (12.7mm) AND LESS 3. 1932-34° (15mm-9imm) 3. 68 3. 1932-34° (15mm-9imm) 3. 68 3. 1932-34° (15mm-3imm) 3. 118°-114° (29mm-32mm) 3. 10d° OR 86 3. AND 06 3. A	6. CONTINUOUS HEADER TO STUD, TOENAIL	4-8
9. RAFTER TO PLATE, TOENAIL 3.8 20. 1° (25mm) BRACE TO EACH STUD AND PLATE, FACE NAIL 2.8 21. 1° X 8° (25mm X 203mm) SHEATHING OR LESS TO EACH BEARING, FACE NAIL 3.8 22. WIDER THAN 1° X 8° (25mm X 203mm) SHEATHING TO EACH BEARING, FACE NAIL 3.8 23. BUILT-UP CORNER STUDS 166 AT 24° (610mm) O. 24. BUILT-UP CORNER STUDS 2.06 AT 32° (813mm) OC AT TOP AND BOTTOM AND STAGGERED 2.20d AT ENDS AND AT EACH SPLIC 2.5 25. 2° (51mm) PLANKS 2.166 AT EACH BEARING. 2.106 AT EACH BEARING. 3.8 26. WOOD STRUCTURAL PANELS AND PARTICLEBOARD. 2.5 27. SUBFLOOR AND WALL SHEATHING (TO FRAMING): 12° (12.7mm) AND LESS 3.8 28. WOOD STRUCTURAL PANELS AND PARTICLEBOARD. 2.8 29. WOOD STRUCTURAL PANELS AND PARTICLEBOARD. 3.8 40. MORE STRUCTURAL PANELS AND PARTICLEBOARD. 3. 40. MORE STRUCTURAL PANELS AND PARTICLEBOARD		
10. 1° (25mm) BRACE TO EACH STUD AND PLATE, FACE NAIL   2.88   21. 1° X 26° (25mm) X 203mm) SHEATHING OR LESS TO EACH BEARING, FACE NAIL   3-8   22. WIDER THAN 1° X 26° (25mm X 203mm) SHEATHING TO EACH BEARING, FACE NAIL   3-8   23. BUILT-UP CORNER STUDS   16d AT 24° (610mm) O	· · · · · · · · · · · · · · · · · · ·	
1. 1		
22. WIDER THAN 1" X 8" (25mm X 203mm) SHEATHING TO EACH BEARING, FACE NAIL  23. BUILT-UP CORNER STUDS  24. BUILT-UP GIRDER AND BEAMS  25. 2" (51mm) PLANKS  26. WOOD STRUCTURAL PANELS AND PARTICLEBOARD:  27. SUBFLOOR AND WALL SHEATHING (TO FRAMING):  11/2" (12.7mm) AND LESS  7/8-1" (22mm-25mm)  11/8"-11/4" (29mm-32mm)  10d d OR 8d  7/8-1" (22mm-25mm)  10d d OR 8		
38. BUILT-UP CORNER STUDS 29. BUILT-UP CORNER STUDS 20. AT 32" (813mm) OC AT TOP AND BOTTOM AND STAGGERED 2-20d AT ENDS AND AT EACH SPLIC 29. BUILT-UP GIRDER AND BEAMS 20d AT 32" (813mm) OC AT TOP AND BOTTOM AND STAGGERED 2-20d AT ENDS AND AT EACH SPLIC 25. 2" (51mm) PLANKS 2-16d AT EACH BEARIN 26. WOOD STRUCTURAL PANELS AND PARTICLEBOARD: 27. SUBFLOOR AND WALL SHEATHING (TO FRAMING): 112" (12 7mm) AND LESS 1992"-34" (15mm-19mm) 28. 4 6 6 6 6 992"-34" (15mm-25mm) 29. 4 (19mm-25mm) 29. 4 (19mm-25mm) 20. 4 (19mm-32mm) 20. 4 (19mm-32mm) 20. 4 (19mm-32mm) 20. 5 (19mm-25mm) 20. 6 6 6 6 6 6 6 6 6 6 6 6 6 6 6 6 6 6 6		
24. BUILT-UP GIRDER AND BEAMS  20d AT 32" (813mm) OC AT TOP AND BOTTOM AND STAGGERED 2-20d AT ENDS AND AT EACH SPLIC 25. 2" (51mm) PLANKS  2-16d AT EACH BEARIN  26. WOOD STRUCTURAL PANELS AND PARTICLEBOARD: 26. WOOD STRUCTURAL PANELS AND PARTICLEBOARD: 27. SUBFLOOR AND WALL SHEATHING (TO FRAMING): 112" (12.7mm) AND LESS 1932"-34" (15mm-19mm) 10d <sup>4</sup> OR 8d 118"-114" (29mm-32mm) 10d <sup>4</sup> OR 8d 112" (12.7mm) OR LESS 58" (16mm) 8. FIBERBOARD SHEATHING: 112" (12.7mm) 104" OR 8d 112" (12.7mm) 105" OR 8d 112" (12.7mm) 105" OR 8d 112" (12.7mm) 106" OR 8d 112" (12.7mm) 107" OR 108" OR 8d 113" OR 108" OR 8d 114" OR 8d 114" OR 8d 115" OR 108" OR 8d 115" OR 108" OR 8d 118" OR 108" O		
25. 2" (51mm) PLANKS 2-16d AT EACH BEARING 26. WOOD STRUCTURAL PANELS AND PARTICLEBOARD: 2 SUBFLOOR AND WALL SHEATHING (TO FRAMING): 1/2" (12.7mm) AND LESS 19/32"-3/4" (15mm-19mm) 7/6"-1" (22mm-25mm) 10d <sup>4</sup> OR 8d  COMBINATION SUBFLOOR-UNDERLAYMENT (TO FRAMING): 3/4" (19mm) AND LESS 7/6"-1" (22mm-25mm) 11/8"-11/4" (29mm-32mm) 10d <sup>4</sup> OR 8d  7. PANEL SIDING (TO FRAMING): 2 1/2" (12.7mm) OR LESS 5/8" (16mm) 3. FIBERBOARD SHEATHING: 7 1/2" (12.7mm) NO.11 gas 16 Go NO.16 gas 16 G		
26. WOOD STRUCTURAL PANELS AND PARTICLEBOARD: 2 SUBFLOOR AND WALL SHEATHING (TO FRAMING):  1/2" (12.7mm) AND LESS  19/32"-3/4" (15mm-19mm) 8d <sup>4</sup> AND 6d 7/8"-1" (22mm-25mm) 10d <sup>4</sup> OR 8d  COMBINATION SUBFLOOR-UNDERLAYMENT (TO FRAMING):  3/4" (19mm) AND LESS 7/8"-1" (22mm-25mm) 10d <sup>4</sup> OR 8d  7.7" PANEL SIDING (TO FRAMING):  1 1/8"-1 1/4" (29mm-32mm) 10d <sup>4</sup> OR 8d  7. PANEL SIDING (TO FRAMING):  1/2" (12.7mm) OR LESS 5/8" (16mm) 8d  NO.11 ga 25/32" (20mm)		
3/4" (19mm) AND LESS 7/8"-1" (22mm-25mm) 1 1/8"-1 1/4" (29mm-32mm)  7. PANEL SIDING (TO FRAMING):  1/2" (12.7mm) OR LESS 5/8" (16mm)  3. FIBERBOARD SHEATHING: 1/2" (12.7mm)  NO.11 ga 6d NO.16 ga 25/32" (20mm)	26. WOOD STRUCTURAL PANELS AND PARTICLEBOARD: SUBFLOOR AND WALL SHEATHING (TO FRAMING): 1/2" (12.7mm) AND LESS 19/32"-3/4" (15mm-19mm) 7/8"-1" (22mm-25mm) 11/8"-11/4" (29mm-32mm)	6d 8d <sup>4</sup> AND 6d 8d
7/8"-1" (22mm-25mm) 1 1/8"-1 1/4" (29mm-32mm) 7. PANEL SIDING (TO FRAMING): 1/2" (12.7mm) OR LESS 5/8" (16mm) 7. FIBERBOARD SHEATHING: 1/2" (12.7mm) NO.11 ga NO.16 ga 25/32" (20mm)	COMBINATION SUBFLOOR-UNDERLAYMENT (TO FRAMING):	
7. PANEL SIDING (TO FRAMING):  1/2" (12.7mm) OR LESS 5/8" (16mm)  3. FIBERBOARD SHEATHING: 1/2" (12.7mm)  NO.11 ga 60 NO.16 ga NO.16 ga NO.11 ga	7/8"-1" (22mm-25mm)	8d
1/2" (12.7mm) OR LESS 5/8" (16mm)  8. FIBERBOARD SHEATHING: 1/2" (12.7mm)  NO.11 ga NO.16 ga NO.16 ga 25/32" (20mm)	<u> </u>	10d <sup>+</sup> OR 8d
5/8" (16mm) SHEATHING: 7  1/2" (12.7mm) NO.11 ga 60 NO.16 ga NO.11 ga 25/32" (20mm)	7. FAINEL SIDING (TO FRAINING).	
1/2" (12.7mm)  NO.11 ga 6d NO.16 ga 25/32" (20mm)		
6d NO.16 ga NO.11 ga 25/32" (20mm)	3. FIBERBOARD SHEATHING: 7	
NO.11 ga 25/32" (20mm)	1/2" (12.7mm)	6d
NO.16 ga	25/32" (20mm)	NO.11 ga



3/8" (9.5mm)

FILE NO: 19-91

7

kpff

A#: 03-122718

ROSEMEAD

SCHOOL DISTRICT PARK ROSEMEAD 3907 ROSEMEAD BOULEVARD ROSEMEAD, CA 91770

NAC NO 161-21043 11-17-2022

**EQUIPMENT SUPPORT** DETAILS

2. DETAILS A/- THRU C/- APPLY TO LOCATIONS W/ SINGLE (N) SISTERED JOIST ON ONE SIDE OF (E) JOIST.

DETAILS D/- THRU F/- APPLY TO LOCATIONS W/ DBL (N) SISTERED JOISTS. (ONE NEW JOIST ON EACH SIDE OF EXISTING JOIST.)

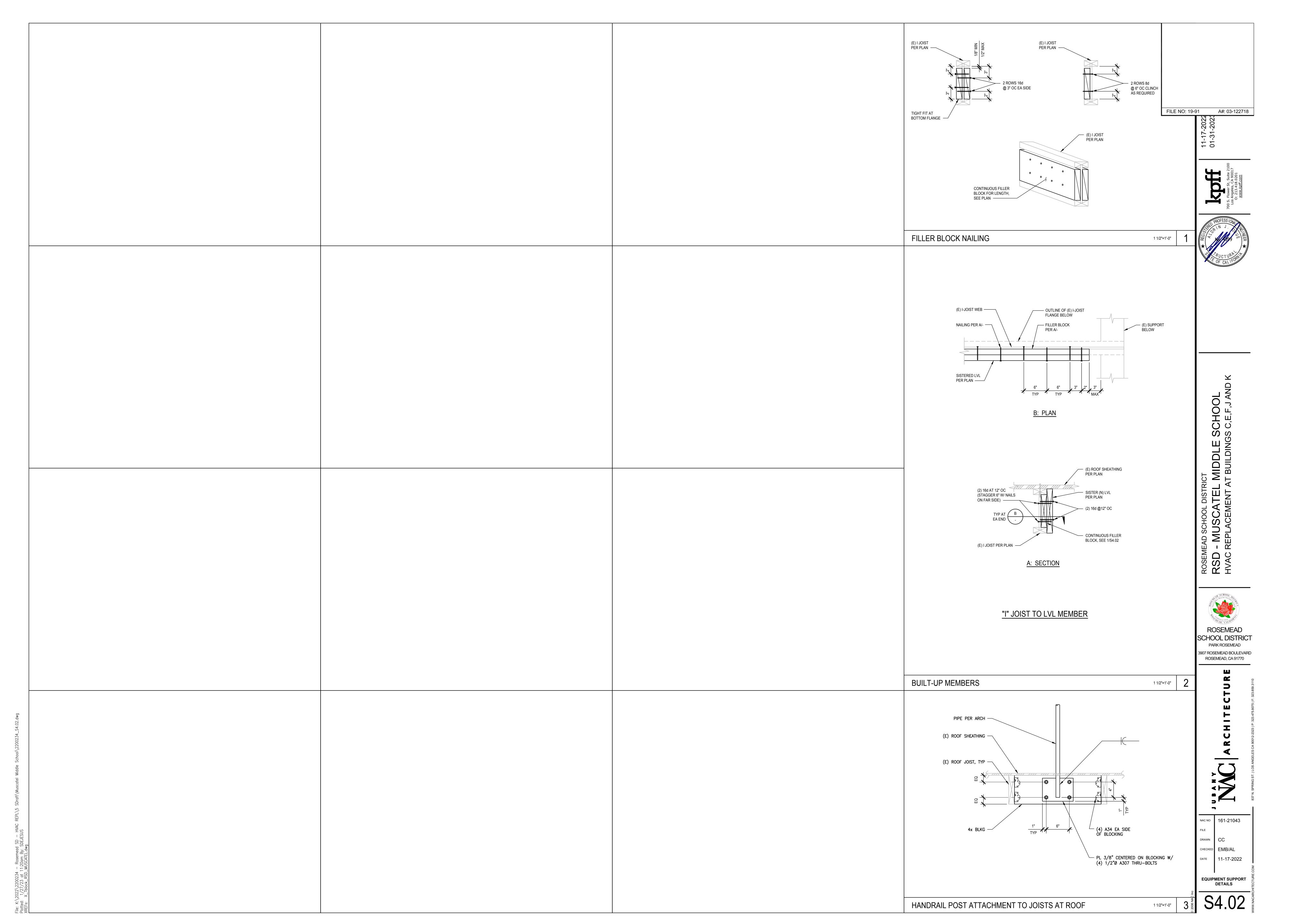
3. IN LIEU OF PROVIDING (N) CROSS BMS AS SHOWN, CONTRACTOR HAS THE OPTION OF CUTTING (E) CROSS BMS AS REQD AND

AC, CU & DOAS UNIT ANCHORAGE

(E) WOOD ROOF OPENING AT NEW FRAMING

REINSTALLING THEM W/ CONNECTOR HARDWARE AS SHOWN.

1. SEE 4/- FOR ADDITIONAL NOTES.



SECTION CALLOUT

NEW LINEWORK

EXISTING LINEWORK

DIRECTION OF FLOW

DEMOLITION LINEWORK

POINT OF CONNECTION

POINT OF DISCONNECTION

DUCTWORK LEGEND

<u>SYMBOL</u> 16"x12" 16"x12"

SHEET METAL DUCT HIDDEN SHEET METAL DUCT

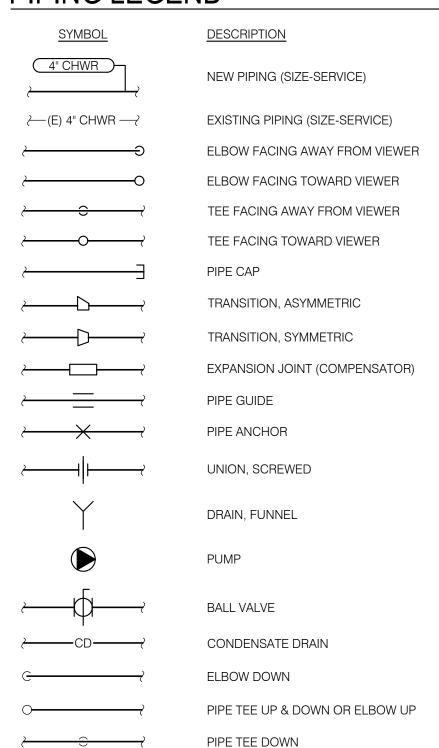
DESCRIPTION

INTERNALLY INSULATED SHEET METAL DUCT ► 16"x12" (1"L) • CLEAR INSIDE DIMENSION SHOWN, LINER THICKNESS IN **PARENTHESIS** 

LOUVER ACCESS DOOR OR ACCESS PANEL (AP) IN DUCTWORK

**FILTER** 

PIPING LEGEND



#### **ABBREVIATIONS**

DN DOWN PSIG POUNDS PER SQUARE INCH GAUGE DX DIRECT EXPANSION PVC POLYVINYL CHLORIDE (E) EXISTING RA RETURN AIR EAA EACH RF RETURN FAN EAT ENTERING AIR TEMPERATURE RLA RATED LOAD AMPS EC ELECTRICAL CONTRACTOR RPM REVOLUTIONS PER MINUTE EFF EFFICIENCY SA SUPPLY AIR EL ELEVATION SF SUPPLY FAN ESP EXTERNAL STATIC PRESSURE SPEC SPECIFICATION EWT ENTERING WATER TEMPERATURE SS STAINLESS STEEL 'F DEGREES FAHRENHEIT STD STANDARD FO FIRE DAMPER TAD TRANSFR AIR DUCT FG FILTER GRILLE TDH TOTAL DYNAMIC HEAD FLA FULL LOAD AMPS TEFC TOTALLY ENCLOSED FAN COOLED FLR FLOOR TSP TOTAL STATIC PRESSURE FOB FLAT ON BOTTOM TYP TYPICAL FOT FLAT ON TOP UC UNDERCUT FPI FINS PER INCH TYP TYPICAL FOT FLAT ON TOP UC UNDERCUT FPI FINS PER INCH TYP TYPICAL FOR FEET PER MINUTE V VOLTS FSD FIRE SMOKE DAMPER FALL ON GALVANIZED VAV VARIABLE AIR VOLUME FT FEET OR FOOT VD VARIABLE AIR VOLUME FT FEET OR FOOT WD VARIABLE FREQUENCY DRIVE GALV GALVANIZED VTR VENT THRU ROOF GC GENERAL CONTRACTOR W/ WITH GPM GALLONS PER HOUR WO WITHOUT GPM GALLONS PER MINUTE WB WET BULB HB HOSE BIBB WC WATER CAUGE HHWR HEATING HOT WATER SUPPLY WT WEIGHT	ABBREVIATION	DESCRIPTION	ABBREVIATION	DESCRIPTION
AHU         AIR HANDLING UNT         HZ         HERTZ           AL         ALUMMUM         D         INSIDE DUMETER           AP         ACCESS PANEL         IN         INCHES           APD         ARSDE PRESSURE DROP         KW         KW         KILOWATTS           BD         BLOWDOWN         LAT         LEAWING AIR TEMPERATURE           BDC         BEACK FILOW PREVENTER         LIS         POLINDS           BPP         BACK FLOW PREVENTER         LIVT         LEAWING WATER TEMPERATURE           BHP         BRAKE HORSEPOWER         MAX         MAXMUM           BLIG         BULDING         MBH         THOUSAND BIT UPEN HOUR           BOB         BOTTOM OF BRIM         MC         MCHANICAL CONTRACTOR           BOB         BOTTOM OF BRIM         MC         MCHANICAL CONTRACTOR           BOW         CHILLED WATER RETURN         MC         MCHANICAL CONTRACTOR           CHW         CHILLED WATER RETURN         MCO         MAXMUM OVERLOAD CIRCUIT PROTECT           CHWS         CHILLED WATER SUPPLY         NFA         NET FREE AREA           CH         CENTER LINE         NPSHR         NET FREE AREA           CH         CHILLED WATER SUPPLY         NFA         NET FREE AREA	AAV	AUTOMATIC AIR VENT	HP	HORSEPOWER
AL         ALUMINUM         ID         INSIDE DIMMETER           APD         ACCESS PANEL         IN         NOHES           APD         ARCOESS PANEL         IN         NOHES           BD         BLOWDOWN         LAT         LEAVING AIR TEMPERATURE           BDD         BACK PLOW PREVENTER         LIS         POONDS           BFC         BELOW FINDING PREVENTER         LIVT         LEAVING AIR TEMPERATURE           BHP         BBACK FLOW PREVENTER         LIVT         LEAVING AIR TEMPERATURE           BHB         BRAKE HORSEPOWER         MAX         MAXIMUM           BLDG         BULIDING         MBH         THOUSAND BTU PER HOUR           BOB         BOTTOM OF BEAM         MC         MECHANICAL CONTRACTOR           BOF         BOTTOM OF BEAM         MC         MINIMUM CIRCUIT AMPS           BTU         BRITISH THERMAL UNIT         MR         MINIMUM CIRCUIT AMPS           BTU         BRITISH THERMAL UNIT         MR         MINIMUM CIRCUIT AMPS           BTU         CHILLED WATER RETURN         MCOP         MAXIMUM OVERLOAD CIRCUIT PROTECT           CHW         CHILLED WATER RETURN         MCOP         MAXIMUM OVERLOAD CIRCUIT PROTECT           CHWS         CHILLED WATER RETURN         NIC<	AFF	ABOVE FINISHED FLOOR	HT	HEIGHT
AP         ACCESS PANEL         IN         INCHES           APO         ARSIDE PRESSURE DROP         KW         KLOWATTS           BD         BLOWDOWN         LAT         LEAVING AR TEMPERATURE           BDD         BLOWDOWN         LAT         LEAVING AR TEMPERATURE           BPF         BELOW FINSHED CELING         LF         LINEAR FEET           BPP         BACK FLOW PREVENTER         LVT         LEAVING WATER TEMPERATURE           BI-DB         BAAKE HORSEROWER         MAX         MAXMIMM           BIDG         BUILDING         MBH         THOUSAND BIT DER HOUR           BOB         BOTTOM OF BEAM         MC         MECHANICAL CONTRACTOR           BOB         BOTTOM OF BEAM         MC         MCA         MINIMUM CIRCUIT AMPS           BTU         BRITISH THERMAL UNIT         ML         MAN HOLD         MAX MANHOLE           CHWR         CHILLED WATER RETURN         MOCP         MAXMIM OWERLOAD CIRCUIT PROTECT           CHWS         CHILLED WATER SUPPLY         NPA         NET FREE APEA           CH         CONTENDER RETURN         NIC         NCT N CONTRACT           CH         CONDENSER WATER FUPILY         OAT         OUTSIDE DAMETER           CT         COOLING TOWER	AHU	AIR HANDLING UNIT	HZ	HERTZ
APD         ARBIDE PRESSURE DROP         KW         KILOWATTS           BDD         BLOWDOWN         LAT         LEANING AR TEMPERATURE           BDD         BACK DRAFT DAMPER         LBS         POUNDS           BPP         BACK FLOW PEVENTER         LIVI         LEANING WATER TEMPERATURE           BHP         BRACK HOW PEVENTER         LIVI         LEANING WATER TEMPERATURE           BHP         BRACK HOW PEVENTER         MX         MXXMUM           BUD         BUILDING         MBH         THOUSAND BIT PER HOUR           BOB         BOITOM OF BEAM         MC         MC-CHANCAL CONTRACTOR           BOB         BOTTOM OF PIPE         MCA         MINIMUM CIRCUIT AMPS           BTU         BRISH THERMAL LUIT         MH         MANIMUM CIRCUIT AMPS           BTU         BRITISH THERMAL LUIT         MH         MANIMUM CIRCUIT AMPS           BTU         BRITISH THERMAL LUIT         MH         MANIMUM CIRCUIT AMPS           CH         CHILLED WATER SUPPLY         NFA         NET FREE AREA           CI         CAST HRON         NIC         NOT IN CONTRACT           CI         CAST HRON         NIC         NOT IN CONTRACT           CI         CONDENSER WATER FLITT         NIC         NOT IN	AL	ALUMINUM	ID	INSIDE DIAMETER
BD         BLOWDOWN         LAT         LEANING AIR TEMPERATURE           BPD         BACK DART DAMPER         LIS         POUNDS           BPC         BELOW FINISHED CEILING         LF         LINEAR FEET           BPP         BACK LOW PREVENTER         LWT         LEANING WATER TEMPERATURE           BIPB         BACK LOW PREVENTER         LWT         LEANING WATER TEMPERATURE           BIDG         BOTTOM OF BEAM         MC         MECHANICAL CONTRACTOR           BOP         BOTTOM OF BEAM         MC         MINIMUM CIRCUIT AMPS           BTU         BIRISH THERMAL UNIT         MH         MANHOLE           CHWI         CHILLED WATER RETURN         MCO         MIXIMUM OVERLOAD CIRCUIT PROTECT           CHWI         CHILLED WATER RETURN         MCO         MIXIMUM OVERLOAD CIRCUIT PROTECT           CHWI         CHILLED WATER RETURN         MCA         NET FREE AREA           CHWI         CHILLED WATER RETURN         MCA         NET FREE AREA           CL         CASTIRON         NIC         NOT IN CONTRACT           CL         CASTIRON         NIC         NOT IN CONTRACT           CL         COLONESAR WATER SUPPLY         OCT         OUTSIDE AIR TEMPERATURE           CT         COOLINEST WATER RETURN	AP	ACCESS PANEL	IN	INCHES
BOD         BACK DRAFT DAMPER         LBS         POUNDS           BFC         BELOW FINISHED CSLUNG         LF         LINEAR FEET           BFP         BACK FLOW PREVENTER         LWT         LEARING WATER TEMPERATURE           BHP         BRAKE HORSEPOWER         MAX         MAXMIMIM           BOB         BOILDING         MBH         THOUSAND BTO PER HOUR           BOB         BOTTOM OF BEAM         MC         MECHANICAL CONTRACTOR           BOP         BOTTOM OF PIPE         MCA         MINIMUM CIRCUIT AMPS           BTU         BRITISH THERMAL UNIT         MH         MANHOUL AMPS           BTU         BRITISH THERMAL UNIT         MH         MINIMUM CIRCUIT AMPS           BTU         CHILLED WATER RETURN         MOCP         MXMMUM OVERLOAD CIRCUIT PROTECT           CFM         CHILLED WATER RETURN         MCP         MXMMUM OVERLOAD CIRCUIT PROTECT           CHWS         CHILLED WATER RETURN         NGC         NOT IN CONTRACT           CL         CAST IRON         NGC         NOT IN CONTRACT           CL         CONDENSER WATER RETURN         OG         ON CENTER           CL         CONDENSER WATER RETURN         OG         OUTSIDE AIR           CWB         CONDENSER WATER RETURN	APD	AIRSIDE PRESSURE DROP	KW	KILOWATTS
BFC         BELOW PINISHED CELING         LF         LINEAR FET           BFP         BACK FLOW PREVENTER         LWT         LEAWING WATER TEMPERATURE           BHP         BRAKE HORSEPOWER         MAX         MAXMMUM           BUDDION         MBH         THOUSAND BTI PER HOUR           BOB         BOTTOM OF BEAM         MC         MCHANCAL CONTRACTOR           BOP         BOTTOM OF BEAM         MC         MCHANCAL CONTRACTOR           BOP         BOTTOM OF BEAM         MC         MCHANCAL CONTRACTOR           BOP         BOTTOM OF BEAM         MC         MCHANCAL CONTRACTOR           BOTTOM OF PIPE         MAX         MINIMUM CIRCUIT AMPS           BT         BITISH THERMAL UNIT         MM         MANHOUS CRUIT AMPS           CHU         CHILLED WATER RETURN         MOC         MAXIMUM OVERLOAD CIRCUIT PROTECT           CHW         CHILLED WATER RETURN         NPS NR         NET POSSITUS SUCTION HEAD REQUIRED           CT         CONDENSATE PUMP         OAT         OUTSIDE AMR THEREPROTECT           CT         CONDENSATE WATER RETURN         OD         OUTSIDE DAMETER           CV         CONSTANT YOULME BOX         OD         OUTSIDE DAMETER           CWF         CONDENSER WATER FILTER RETURN         PERFE	BD	BLOWDOWN	LAT	LEAVING AIR TEMPERATURE
BEPP         BACK FLOW PREVENTER         LWT         LEAVING WATER TEMPERATURE           BHP         BRAKE HORSEPOWER         MAX         MAXMUM           BLIDING         MBH         THOUSAND BTU PER HOUR           BOB         BOTTOM OF DIPE         MC         MICHANICAL CONTRACTOR           BOP         BOTTOM OF PIPE         MC         MINIMUM CIRCUIT AMPS           BTU         BRITISH THERMAL UNIT         MH         MANHOLE           CPM         CUBIC FEET PER MINUTE         MH         MINIMUM           CHWR         CHILLED WATER RETURN         MOOP         MAXMUM OVERLOAD CIRCUIT PROTECT           CHWR         CHILLED WATER SUPPLY         NFA         NET FREE AREA           CI         CAST IRON         NG         NOT IN CONTRACT           CL         CAST IRON         NG         NOT IN CONTRACT           CL         CONDENSARE PUMP         OAT         OUT SIDE DAIL           CT         COOLINE TOWER         OBD         OPPOSED BLADE DAMPER           CU         CONDENSER WATER SUPPLY         OD         OUTSIDE DIAMETER           CW         CONDENSER WATER SUPPLY         PD         PRESSURE REDUCING           CWS         CONDENSER WATER FILTER BETURN         PCR         PERFORATED </td <td>BDD</td> <td>BACK DRAFT DAMPER</td> <td>LBS</td> <td>POUNDS</td>	BDD	BACK DRAFT DAMPER	LBS	POUNDS
BHP         BRAKE HORSEPOWER         MAX         MAXIMUM           BLDG         BUILDING         MBH         THOUSAND BTU PER HOUR           BOB         BOTTOM OF BIPE         MCA         MICHANICAL CONTRACTOR           BOP         BOTTOM OF PIPE         MCA         MINIMUM CIRCUIT AMPS           BTU         BRITCH THERMAL UNIT         MH         MANHOUS CRUIT AMPS           BTU         BRITCH THERMAL UNIT         MH         MINIMUM           CHWR         CUBLED WATER SUPPLY         NFA         MINIMUM           CHWR         CHILLED WATER SUPPLY         NFA         NET FREE AFEA           CI         CAST BON         NIC         NOT IN CONTRACT           CI         CAST BON         NIC         NOT IN CONTRACT           CI         COSTATION         NIC         NOT IN CONTRACT           CI         COSTATION         NIC         NOT IN CONTRACT           CI         COSTATION         NIC         NOT IN CONTRACT           CI         CODICING TOWER         OBD         OPPOSED BLADE DAMPER           CT         CODICING TOWER         OBD         OPPOSED BLADE DAMPER           CT         CONDENSER WATER SUPPLY         PD         PRESSURE DEDOP           CWF	BFC	BELOW FINISHED CEILING	LF	LINEAR FEET
BLDG	BFP	BACK FLOW PREVENTER	LWT	LEAVING WATER TEMPERATURE
BOTTOM OF BEAM	BHP	BRAKE HORSEPOWER	MAX	MAXIMUM
BOTTOM OF BEAM				THOUSAND BTU PER HOUR
BOTO         BOTTOM OF PIPE         MCA         MINIMUM CIRCUIT AMPS           BTU         BRITISH THERMAL UNIT         MH         MANHOLE           CFM         CUBIC FEET PER MINUTE         MIN         MINIMUM           CHWR         CHILLED WATER RETURN         MOCP         MAXIMUM OVERLOAD CIRCUIT PROTECT           CHWS         CHILLED WATER SUPPLY         NFA         NET FREE AREA           CI         CASTIRON         NIC         NOT IN CONTRACT           CL         CENTER LINE         NPSHR         NET POSITIVE SUCTION HEAD PROUIDED           CP         CONDENSATE PUMP         OAT         OUTSIDE AIR TEMPERATURE           CT         COOLING TOWER         OBD         OPPOSED BLADE DAMPER           CU         CONDENSER WATER FILTER         OD         OUTSIDE DIAMETER           CW         CONDENSER WATER SUPPLY         PD         PRESSUBE DROP           CWFS         CONDENSER WATER FILTER RETURN         PB         PERESSUBE DROP           CWFS         CONDENSER WATER FILTER SUPPLY         PH         PHASE           DB         DRY BULB         POD         POINT OF DISCONNECT           DEG         DEGREES         PR         PRESSUBE RELIEF           DIA         DIAMETER         PPV		BOTTOM OF BEAM		
BRITISH THERMAL LUNIT CPM CUBIC FEET PER MINUTE MIN MINIMUM CHWAY CHILLED WATER RETURN MOCP MAXIMUM OVERLOAD CIRCUIT PROTECT CHWS CHILLED WATER SUPPLY NFA NET FREE AREA CI CAST HIGHO CL CENTER LINE NPSHR CT CODIENS TOWER OBD OPPOSED BLADE DAMPER CT COOLING TOWER OBD OPPOSED BLADE DAMPER CU CONDENSING UNIT OC CONSTANT VOLUME BOX OD OUTSIDE AIR TEMPERATURE CY CONDENSING WATER RETURN OA CWS CONDENSER WATER RETURN OA CWS CONDENSER WATER RETURN OA CWS CONDENSER WATER SUPPLY PD PRESSURE DROP CWFR CONDENSER WATER SUPPLY PD PRESSURE BROP CWFR CONDENSER WATER FILTER SUPPLY PH PHASE DB DB DFY BULB DB DFY BULB DB DFY BULB DB DB DFY BULB DB				MINIMUM CIRCUIT AMPS
CFM CHILLED WATER RETURN MOCP MAXIMUM OVERLOAD CIRCUIT PROTECT CHWS CHILLED WATER SUPPLY NFA NET RETE AREA OF CHILLED WATER SUPPLY NFA NET RETE AREA OF CHILLED WATER SUPPLY NFA NET RETE AREA AND TO THE CONTRACT OF COLOR OF THE				
CHWR CHILLED WATER RETURN MOCP CHWS CHILLED WATER SUPPLY NA NET FREE AREA CI CAST IRON NIC NOT IN CONTRACT CL CENTER LINE NPSHR NET POSITIVE SUCTION HEAD REQUIRED CP CONDENSATE PUMP OAT OUTSIDE AIR TEMPERATURE CT COOLING TOWER OBD OPPOSED BLADE DAMPER CU CONDENSATE PUMP OAT OUTSIDE AIR TEMPERATURE CU CONDENSATE PUMP OAT OUTSIDE AIR TEMPERATURE CU CONDENSATE VERY CONDENSER WATER RETURN OA OUTSIDE DIAMETER CU CONDENSER WATER RETURN OA OUTSIDE DIAMETER CWS CONDENSER WATER RETURN PPD PRESSURE DROP CWFR CONDENSER WATER FILTER SUPPLY PD PRESSURE BELIEF DB DRY BULB POD POINT OF DISCONNECT DEG DEGREES PR PRESSURE REDURN PRICE DL DOOR LOUVER PSID POUNDS PER SOUARE INCH DIFFERENT DL DOOR LOUVER PRICE DL DOOR LOUVER PRICE DL DOOR LOUVER PRICE DL DOOR LOUVER PRICE DL DOOR LOU				
CHWS CHILLED WATER SUPPLY NFA NET FREE AREA CI CAST IRON NIC NOT IN CONTRACT CL CENTER LINE NPSHR NET POSITIVE SUCTION HEAD REQUIRED CP CONDENSATE PUMP OAT OUTSIDE AIR TEMPERATURE CT COOLING TOWER OBD OPPOSED BLADE DAMPER CU CONDENSING UNIT OC ON CENTER CV CONSTANT VOLUME BOX OD OUTSIDE DIAMPETER CWG CONDENSER WATER RETURN OA OUTSIDE AIR TEMPERATURE CWG CONDENSER WATER RETURN OA OUTSIDE DIAMPETER CWG CONDENSER WATER RETURN OA OUTSIDE DIAMPETER CWG CONDENSER WATER FILTER SUPPLY PD PERSURE DROP CWFR CONDENSER WATER FILTER SUPPLY PH PHASE DB DRY BULB POD POINT OF DISCONNECT DEG DEGREES PR PR PRESSURE RELIEF DIA DIAMETER PRY PRY PRESSURE RELIEF DIA DOOR LOUVER PSID POUNDS PER SQUARE INCH DIFFERENT DN DOWN PSIG POUNDS PER SQUARE INCH GAUGE DX DIRECT EXPANSION PVC POLYWINYL CHLORIDE EA EACH RETURN FAN EAT ENTERING AIR TEMPERATURE RIA RATED LOAD AMPS EC ELECTRICAL CONTRACTOR RPM EC ELECTRICAL CONTRACTOR RPM EC ELECTRICAL CONTRACTOR RPM ESP EXTERNAL STATIC PRESSURE ESP EXTERNAL STATIC PRESSURE SPE EXTERNAL STATIC PRESSURE FF EFFICIENCY SA SUPPLY AIR ENTERING WATER TEMPERATURE SPEC SPECIFICATION FF TYPICAL FOR THE DAMPER FILE FILE GRILLE TOH TOTAL DYNAMIC HEAD FILE FILE FILE SU				
CI CAST IRON NIC NOT IN CONTRACT CL CENTER LINE NYSHR NET POSITIVE SUCTION HEAD REQUIRED. CP CONDENSATE PUMP OAT OUTSIDE AIR TEMPERATURE CT COOLING TOWER OBD OPPOSED BLADE DAMPER CU CONDENSING UNIT OC ON CENTER CV CONSTANT VOLUME BOX OD OUTSIDE DIAMETER CV CONSTANT VOLUME BOX OD OUTSIDE DIAMETER CWR CONDENSER WATER RETURN OA OUTSIDE AIR CWS CONDENSER WATER SUPPLY PD PRESSURE DROP CWFR CONDENSER WATER FILTER RETURN PERF PERFORATED  DR DRY BULB DB DOOR LOUVER PSID POUNDS PER SQUARE INCH DIFFERENT DN DOWN PSIG POUNDS PER SQUARE INCH DIFFERENT DN DOWN PSIG POUNDS PER SQUARE INCH DIFFERENT DN DOWN PSIG POUNDS PER SQUARE INCH GAUGE  EXISTING RA RETURN AR RETURN AR RETURN AR SUPPLY AIR EAT ENTERING AIR TEMPERATURE RA SUPPLY AIR EAT ENTERING AIR TEMPERATURE SA SUPPLY AIR EFF EFFICIENCY SA SUPPLY AIR EFF EFFICIENCY SA SUPPLY AIR ESP EXTERNAL STATIC PRESSURE SPEC SPECIFICATION  ESP EXTERNAL STATIC PRESSURE SPEC SPECIFICATION  ENTERING BARDER TO THE TOTAL DAY AND AIR FILE DAMPER FILE DAMPER TAD THE TOTAL DAY AND AIR FILE DAMPER FILE DAMPER TAD THE TOTAL DAY AND AIR FILE DAMPER TO THE TOTAL DAY AND AIR FILE CALLEY AIR ON TO PUCL TO THE TOTAL DAY AND AIR FILE DAMPER TO THE TOTAL DAY AND AIR FILE DAY AND AIR FILE BAMCE DAMPER TO THE TOTAL STATIC PRESSURE FILE FILOOR TYP TYPICAL FILE BAMCE DAY AND AIR AIR THE PERF AIR FILE BAMCE DAY AND AIR THE PERF AIR FILE BAMCE DAMPER TO THE TOTAL STATIC PRESSURE FILE FILOOR TYP TYPICAL FILE BAMCE DAMPER TO THE TOTAL STATIC PRESSURE FILE FILOOR TYP TYPICAL FILE BAMCE DAMPER TO THE SOLUMN FILE BAMCE DAMPER TO THE SOLUMN FILE BAMCE DAMPER FILE FILEDAMPER WATER TERTURN WPD WATER PRESSURE DROP FILE BAMCE DAMPER BALLON FREITHIN WPD WATER PRESSURE DROP				
CL CENTER LINE NPSHR NET POSITIVE SUCTION HEAD REQUIRED CP CONDENSATE PUMP OAT OUTSIDE AIR TEMPERATURE CT COOLING TOWER OBD OPPOSED BLADE DAMPER OBD OPPOSED BLADE DAMPER OBD OPPOSED BLADE DAMPER OCC CONDENSING UNIT OC ON CENTER COOLING TOWER OBD OPPOSED BLADE DAMPER OCC CONSTANT VOLUME BOX OD OUTSIDE DIAMETER OCC ON CENTER CONDENSER WATER RETURN OA OUTSIDE AIR CONDENSER WATER SUPPLY PD PRESSURE DROP OCC CONDENSER WATER FLITER SUPPLY PD PRESSURE DROP OCC CONDENSER WATER FILTER SUPPLY PD PRESSURE DROP OCC CONDENSER WATER FILTER SUPPLY PH PHASE ON POINT OF DISCONNECT OCC CONDENSER WATER FILTER SUPPLY PH PHASE ON POINT OF DISCONNECT OCC CONDENSER WATER FILTER SUPPLY PH PHASE ON POINT OF DISCONNECT OCC CONDENSER WATER FILTER SUPPLY PH PRESSURE RELIEF ON PRESSURE RELIEF ON POINT OF DISCONNECT OCC CONDENSER WATER FILTER SUPPLY PH PRESSURE REDUCING VALVE ON POINT OF DISCONNECT OCC CONDENSER WATER FILTER SUPPLY PRESSURE REDUCING VALVE ON POINT OF DISCONNECT OCC CONDENSER WATER FILTER SUPPLY PH PRESSURE REDUCING VALVE ON PRISSURE DROP WATER COUNTY ON PRISSURE PRISSURE PRISSURE DROP WATER COUNTY ON PRISSURE PRISSURE PRISSURE DROP WATER REDUCING WATER SUBJECT DROP WATER REDUCING WATER SUPPLY WATER PRISSURE DROP				
CP         CONDENSATE PUMP         OAT         OUTSIDE AIR TEMPERATURE           CT         COOLING TOWER         OBD         OPPOSED BLADE DAMPER           CU         CONDENSING UNIT         OC         ON CENTER           CV         CONDENSER WATER RETURN         OA         OUTSIDE DIAMETER           CWR         CONDENSER WATER SUPPLY         PD         PRESSURE DROP           CWFR         CONDENSER WATER FILTER RETURN         PERF         PERFORATED           CWFS         CONDENSER WATER FILTER RETURN         PERF         PERFORATED           CWFS         CONDENSER WATER FILTER SUPPLY         PH         PHASE           DB         DRY BULB         POD         POINT OF DISCONNECT           DBG         DEGREES         PR         PRESSURE RELIEF           DIA         DIAMETER         PRV         PRESSURE RELIEF           DL         DOOR LOUVER         PSIG         POUNDS PER SQUARE INCH DIFFERENT           DN         DOWN         PSIG         POUNDS PER SQUARE INCH DIFFERENT           DN         DOWN         PSIG         POUNDS PER SQUARE INCH DIFFERENT           DN         DOWN         PSIG         POUNDS PER SQUARE INCH DIFFERENT           DN         DOYN         PSIG         POUNDS				
CT COOLING TOWER CU CONDENSING UNIT CV CONSTANT VOLUME BOX OD OUTSIDE DIAMETER CV CONSTANT VOLUME BOX OD OUTSIDE DIAMETER CWS CONDENSER WATER RETURN CWS CONDENSER WATER RETURN CWS CONDENSER WATER ITER RETURN CWFR CONDENSER WATER FILTER SUPPLY PD PHESSURE DROP CWFR CONDENSER WATER FILTER SUPPLY CWFR CONDENSER WATER FILTER SUPPLY DB DRY BULB DR				
CU         CONDENSING UNIT         OC         ON CENTER           CV         CONSTANT VOLUME BOX         OD         OUTSIDE DIAMETER           CWR         CONDENSER WATER RETURN         OA         OUTSIDE AIR           CWS         CONDENSER WATER RETURN         PD         PRESSURE DROP           CWFR         CONDENSER WATER FILTER RETURN         PERFORATED           CWFS         CONDENSER WATER FILTER SUPPLY         PH         PHASE           DB         DRY BULB         POD         POINT OF DISCONNECT           DEG         DEGREES         PR         PRESSURE REDICING VALVE           DIA         DIMAETER         PPV         PRESSURE REDICING VALVE           DL         DOOR LOUVER         PSID         POUNDS PER SQUARE INCH DIFFERENT           DN         DOWN         PSIG         POUNDS PER SQUARE INC				
CV CONSTANT VOLUME BOX OD OUTSIDE DIAMETER CWR CONDENSER WATER RETURN OA OUTSIDE AIR CWS CONDENSER WATER SUPPLY PD PRESSURE DROP  CWFR CONDENSER WATER FILTER RETURN PERF PERFORATED  CWFS CONDENSER WATER FILTER SUPPLY PH PHASE  DB DRY BULB POD POINT OF DISCONNECT  DEG DEGREES PR PRESSURE RELIEF  DIA DIAMETER PRIVER PRIV PH PHASE  DL DOOR LOUVER PSID POUNDS PER SQUARE INCH DIFFERENT  DN DOWN PSIG POUNDS PER SQUARE INCH DIFFERENT  PSIG POUNDS PER SQUARE INCH DIFFER  PSID PRESSURE P				
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DEG         DEGREES         PR         PRESSURE RELIEF           DIA         DIAMETER         PRV         PRESSURE REDUCING VALVE           DL         DOOR LOUVER         PSID         POUNDS PER SQUARE INCH DIFFERENT.           DN         DOWN         PSIG         POUNDS PER SQUARE INCH DIFFERENT.           DX         DIRECT EXPANSION         PVC         POLYVINYL CHLORIDE           EX         DIRECT EXPANSION         PVC         POLYVINYL CHLORIDE           EA         EACH         RF         RETURN AR           EA         EACH         RF         RETURN FAN           EAT         ENTERING AIR TEMPERATURE         RLA         RATED LOAD AMPS           EC         ELECTRICAL CONTRACTOR         RPM         REVOLUTIONS PER MINUTE           EFF         EFFICIENCY         SA         SUPPLY AIR           EC         ELECTRICAL CONTRACTOR         RPM         REVOLUTIONS PER MINUTE           EFF         EFFICIENCY         SA         SUPPLY AIR           EF         EFFICIENCY         SA         SUPPLY AIR           EL         ELECTRICAL CONTRACTOR         RPM         REVOLUTIONS PER MINUTE           EWT         ENTERING MATER TEMPERATURE         SL         SUPPLY AIR	CWFS	CONDENSER WATER FILTER SUPPLY	PH	PHASE
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DN         DOWN         PSIG         POUNDS PER SQUARE INCH GAUGE           DX         DIRECT EXPANSION         PVC         POLYVINYL CHLORIDE           (E)         EXISTING         RA         RETURN AIR           EA         EACH         RF         RETURN FAN           EAT         ENTERING AIR TEMPERATURE         RLA         RATED LOAD AMPS           EC         ELECTRICAL CONTRACTOR         RPM         REVOLUTIONS PER MINUTE           EFF         EFFICIENCY         SA         SUPPLY AIR           EL         ELEVATION         SF         SUPPLY FAN           ESP         EXTERNAL STATIC PRESSURE         SPEC         SPECIFICATION           EWT         ENTERING WATER TEMPERATURE         SS         STAINLESS STEEL           F         DEGREES FAHRENHEIT         STD         STANDARD           FO         FIRE DAMPER         TAD         TRANSFER AIR DUCT           FG         FILTER GRILLE         TDH         TOTAL DYNAMIC HEAD           FLA         FULL LOAD AMPS         TEFC         TOTALL STATIC PRESSURE           FOB         FLAT ON BOTTOM         TYP         TYPICAL           FOT         FLAT ON TOP         UC         UNDERCUT           FPI         FIR	DIA	DIAMETER	PRV	PRESSURE REDUCING VALVE
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(E)       EXISTING       RA       RETURN AIR         EA       EACH       RF       RETURN FAN         EAT       ENTERING AIR TEMPERATURE       RLA       RATED LOAD AMPS         EC       ELECTRICAL CONTRACTOR       RPM       REVOLUTIONS PER MINUTE         EFF       EFFICIENCY       SA       SUPPLY AIR         EL       ELEVATION       SF       SUPPLY FAN         ESP       EXTERNAL STATIC PRESSURE       SPEC       SPECIFICATION         EWT       ENTERING WATER TEMPERATURE       SS       STAINLESS STEEL         FF       DEGREES FAHRENHEIT       STD       STANDARD         FD       FIRE DAMPER       TAD       TRANSFER AIR DUCT         FG       FILTER GRILLE       TDH       TOTAL DYNAMIC HEAD         FLA       FULL LOAD AMPS       TEFC       TOTALLY ENCLOSED FAN COOLED         FLR       FLOOR       TSP       TOTAL STATIC PRESSURE         FOB       FLAT ON BOTTOM       TYP       TYPICAL         FOT       FLAT ON TOP       UC       UNDERCUT         FPI       FINS PER INCH       TYP       TYPICAL         FPM       FEET PER MINUTE       V       VOLTS         FSD       FIRE SMOKE DAMPER <td< td=""><td>DN</td><td>DOWN</td><td>PSIG</td><td>POUNDS PER SQUARE INCH GAUGE</td></td<>	DN	DOWN	PSIG	POUNDS PER SQUARE INCH GAUGE
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EC       ELECTRICAL CONTRACTOR       RPM       REVOLUTIONS PER MINUTE         EFF       EFFICIENCY       SA       SUPPLY AIR         EL       ELEVATION       SF       SUPPLY FAN         ESP       EXTERNAL STATIC PRESSURE       SPEC       SPECIFICATION         EWT       ENTERING WATER TEMPERATURE       SS       STAINLESS STEEL         °F       DEGREES FAHRENHEIT       STD       STANDARD         FD       FIRE DAMPER       TAD       TRANSFER AIR DUCT         FG       FILTER GRILLE       TDH       TOTAL DYNAMIC HEAD         FLA       FULL LOAD AMPS       TEFC       TOTALLY ENCLOSED FAN COOLED         FLR       FLOOR       TSP       TOTAL STATIC PRESSURE         FOB       FLAT ON BOTTOM       TYP       TYPICAL         FOT       FLAT ON TOP       UC       UNDERCUT         FPI       FINS PER INCH       TYP       TYPICAL         FPM       FEET OR FOOT       V       VOLTS         FSD       FIRE SMOKE DAMPER       VAV       VARIABLE AIR VOLUME         FT       FEET OR FOOT       VD       VOLUME DAMPER         GALV       GAUGE       VFD       VARIABLE FREQUENCY DRIVE         GALV       GALVANIZED <td>EAT</td> <td>ENTERING AIR TEMPERATURE</td> <td></td> <td></td>	EAT	ENTERING AIR TEMPERATURE		
EFF EFFICIENCY SA SUPPLY AIR  EL ELEVATION SF SUPPLY FAN  ESP EXTERNAL STATIC PRESSURE SPEC SPECIFICATION  EWT ENTERING WATER TEMPERATURE SS STAINLESS STEEL  "F DEGREES FAHRENHEIT STD STANDARD  FID FIRE DAMPER TAD TRANSFER AIR DUCT  FG FILTER GRILLE TDH TOTAL DYNAMIC HEAD  FLA FULL LOAD AMPS TEFC TOTALLY ENCLOSED FAN COOLED  FLR FLOOR TSP TOTAL STATIC PRESSURE  FOB FLAT ON BOTTOM TYP TYPICAL  FOT FLAT ON TOP UC UNDERCUT  FPI FINS PER INCH TYP TYPICAL  FPM FEET PER MINUTE V VOLTS  FSD FIRE SMOKE DAMPER VAV VARIABLE AIR VOLUME  FT FEET OR FOOT VD VOLUME DAMPER  GA GAUGE VFD VARIABLE FREQUENCY DRIVE  GALV GALVANIZED VTR VENT THRU ROOF  GC GENERAL CONTRACTOR W/ WITH  GPH GALLONS PER HOUR W/O WITHOUT  GPM GALLONS PER MINUTE WB WET BULB  HB HOSE BIBB WC WATER GAUGE  HHWR HEATING HOT WATER RETURN WPD WATER PRESSURE DROP  HHWS HEATING HOT WATER SUPPLY WT WEIGHT				REVOLUTIONS PER MINUTE
EL       ELEVATION       SF       SUPPLY FAN         ESP       EXTERNAL STATIC PRESSURE       SPEC       SPECIFICATION         EWT       ENTERING WATER TEMPERATURE       SS       STAINLESS STEEL         °F       DEGREES FAHRENHEIT       STD       STANDARD         FD       FIRE DAMPER       TAD       TRANSFER AIR DUCT         FG       FILTER GRILLE       TDH       TOTAL DYNAMIC HEAD         FLA       FULL LOAD AMPS       TEFC       TOTALLY ENCLOSED FAN COOLED         FLR       FLOOR       TSP       TOTAL STATIC PRESSURE         FOB       FLAT ON BOTTOM       TYP       TYPICAL         FOT       FLAT ON TOP       UC       UNDERCUT         FPI       FINS PER INCH       TYP       TYPICAL         FPM       FEET PER MINUTE       V       VOLTS         FSD       FIRE SMOKE DAMPER       VAV       VARIABLE AIR VOLUME         FT       FEET OR FOOT       VD       VOLUME DAMPER         GA       GAUGE       VFD       VARIABLE FREQUENCY DRIVE         GALV       GALVANIZED       VTR       VENT THRU ROOF         GC       GENERAL CONTRACTOR       W/       WITHOUT         GPH       GALLONS PER MINUTE				
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GA GAUGE  GALV  GALVANIZED  VTR  VENT THRU ROOF  GC  GENERAL CONTRACTOR  W/  GPH  GALLONS PER HOUR  W/O  WITHOUT  GPM  GALLONS PER MINUTE  WB  WET BULB  HOSE BIBB  WC  WATER COLUMN  HEAD  HEAD  WG  WATER GAUGE  HHWR  HEATING HOT WATER RETURN  WPD  WATER PRESSURE DROP  HHWS	FSD	FIRE SMOKE DAMPER		VARIABLE AIR VOLUME
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HHWR HEATING HOT WATER RETURN WPD WATER PRESSURE DROP HHWS HEATING HOT WATER SUPPLY WT WEIGHT				
HHWS HEATING HOT WATER SUPPLY WT WEIGHT				
	HP	HEAT PUMP	•••	

IN THE EVENT ABBREVIATIONS NOT MENTIONED HEREIN ARE USED, REFERENCE WILL BE MADE TO ANSI Y1.1, MILITARY

<u>ABBREVIATION</u>	DESCRIPTION	<u>ABBREVIATION</u>	DESCRIPTION
A	ALARM	PS	PRESSURE SWITCH
AFMS	AIRFLOW MONITORING STATION	PT	PRESSURE TRANSMITTER
Al	ANALOG INPUT	RH	RELATIVE HUMIDITY
AO	ANALOG OUTPUT	S	STATUS
CS	CURRENT SWITCH	SC	SPEED CONTROL
DI	DIGITAL INPUT	SI	SPEED INDICATOR
DO	DIGITAL OUTPUT	SP	SETPOINT
DP	DIFFERENTIAL PRESSURE	SS	START/STOP
FS	FLOW SWITCH	T	TEMPERATURE
FM	FLOW METER	TI	TEMPERATURE INDICATOR
HOA	HANDS-OFF-AUTO	VA	DAMPER/VALVE ACTUATOR
KW	KILOWATTS	VP	VELOCITY PRESSURE
LA	LEVEL ALARM	VSH	VIBRATION SWITCH
MOD	MOTOR OPERATED DAMPER	ZC	CLOSED END SWITCH
NC	NORMALLY CLOSED	ZI	POSITION INDICATOR
NO	NORMALLY OPEN	ZO	OPEN END SWITCH

IN THE EVENT ABBREVIATIONS NOT MENTIONED HEREIN ARE USED, REFERENCE WILL BE MADE TO ANSI Y1.1, MILITARY

M002 SCHEDULES - MUSCATEL

**DETAILS** 

STANDARD ABBREVIATIONS, AND OTHER STANDARD INDUSTRY CONVENTIONS.

#### CONTROL ABBREVIATIONS

ABBREVIATION	DESCRIPTION	ABBREVIATION	DESCRIPTION
Α	ALARM	PS	PRESSURE SWITCH
AFMS	AIRFLOW MONITORING STATION	PT	PRESSURE TRANSMITTER
Al	ANALOG INPUT	RH	RELATIVE HUMIDITY
AO	ANALOG OUTPUT	S	STATUS
CS	CURRENT SWITCH	SC	SPEED CONTROL
DI	DIGITAL INPUT	SI	SPEED INDICATOR
DO	DIGITAL OUTPUT	SP	SETPOINT
DP	DIFFERENTIAL PRESSURE	SS	START/STOP
FS	FLOW SWITCH	T	TEMPERATURE
FM	FLOW METER	TI	TEMPERATURE INDICATOR
HOA	HANDS-OFF-AUTO	VA	DAMPER/VALVE ACTUATOR
KW	KILOWATTS	VP	VELOCITY PRESSURE
LA	LEVEL ALARM	VSH	VIBRATION SWITCH
MOD	MOTOR OPERATED DAMPER	ZC	CLOSED END SWITCH
NC	NORMALLY CLOSED	ZI	POSITION INDICATOR
NO	NORMALLY OPEN	ZO	OPEN END SWITCH

STANDARD ABBREVIATIONS, AND OTHER STANDARD INDUSTRY CONVENTIONS.

#### SHEET INDEX

SHEET DESCRIPTION

GENERAL NOTES, LEGENDS, ABBREVIATIONS AND SHEET INDEX

MECHANICAL SITE PLAN - MUSCATEL M101

**DETAILS** 

TITLE 24 COMPLIANCE FORMS - MUSCATEL

#### **GENERAL NOTES**

- 1. ALL WORK SHALL COMPLY WITH THE 2016 EDITIONS OF THE CALIFORNIA BUILDING, MECHANICAL, PLUMBING, AND OTHER APPLICABLE FEDERAL, STATE, OR LOCAL CODES AS ADOPTED AND ENFORCED BY THE LOCAL JURISDICTION. IN CASE THE PLANS SHOW MORE STRINGENT REQUIREMENTS, THE PLANS SHALL GOVERN THE DESIGN, YET NOTHING ON THE DESIGN DOCUMENTS SHALL BE INTERPRETED AS AUTHORITY TO VIOLATE CODE(S) OR REGULATION(S).
- 2. SUBMISSION OF BID IN CONNECTION WITH THIS WORK SHALL IMPLY THAT THE BIDDER HAS EXAMINED THE JOB SITE UNDER WHICH THE CONTRACTOR WILL BE OBLIGATED TO OPERATE UNDER THIS CONTRACT. NO

EXTRA CHARGE WILL BE ALLOWED FOR FAILURE OF ANY BIDDER TO EXAMINE THE SITE PRIOR TO BID.

- 3. WHERE USED, THE TERM "PROVIDE" SHALL MEAN "FURNISH AND INSTALL".
- 4. IN THE EVENT OF A CONFLICT OR INCONSISTENCY BETWEEN ITEMS INDICATED ON DRAWINGS AND SPECIFICATIONS WITH CODE REQUIREMENTS, THE MORE STRINGENT STANDARD SHALL PREVAIL.
- 5. CARE SHALL BE EXERCISED TO MINIMIZE ANY INCONVENIENCE OR DISTURBANCE TO OTHER AREAS OF THE BUILDING WHICH ARE TO REMAIN IN OPERATION. ISOLATE WORK AREAS TO KEEP DUST AND DIRT WITHIN THE CONSTRUCTION AREA.
- 6. NO PIPING, EQUIPMENT, ETC. SHALL BE REMOVED, DISCONNECTED OR SHUT DOWN WITHOUT PRIOR REVIEW WITH THE OWNER TO CONFIRM THAT AREAS TO REMAIN IN OPERATION WILL NOT BE AFFECTED. IF ANY AREAS NOT WITHIN THE SCOPE OF WORK ARE AFFECTED BY ANY SHUTDOWN, REMOVAL OR DISCONNECTION, SUFFICIENT ADVANCE NOTICE MUST BE GIVEN TO THE OWNER INDICATING WHICH AREAS WILL BE AFFECTED, WHEN THE PROPOSED SHUTDOWN WILL OCCUR, AND FOR HOW LONG A PERIOD OF TIME.
- 7. THE ARRANGEMENT OF EQUIPMENT AND PIPING SHOWN ON THE DRAWINGS IS BASED UPON INFORMATION AVAILABLE TO THE ENGINEER AT THE TIME OF DESIGN AND IS NOT INTENDED TO SHOW EXACT DIMENSIONS. THIS CONTRACTOR SHALL VERIFY ALL DIMENSIONS AT THE SITE MAKING FIELD MEASUREMENTS AND SHOP DRAWINGS NECESSARY FOR FABRICATION OR ERECTION OF HVAC SYSTEMS. MAKE ALLOWANCE FOR BEAMS, PIPES AND OTHER OBSTRUCTIONS IN BUILDING CONSTRUCTION. CHECK DRAWINGS SHOWING WORK OF OTHER TRADES AND CONSULT WITH THE OWNER'S REPRESENTATIVE IN THE EVENT OF POTENTIAL INTERFERENCE. SHOP DRAWINGS SHALL BE MINIMUM 1/4"=1'-0" SCALE, INDICATING FITTINGS, SIZES, WELDS AND CONFIGURATIONS AND SUBMITTED TO ENGINEER FOR REVIEW.
- 8. THIS CONTRACTOR SHALL COORDINATE HIS WORK WITH ALL OTHER TRADES PRIOR TO FABRICATION, PURCHASE AND/OR INSTALLATION OF ALL WORK.
- 9. EXISTING MATERIALS THAT ARE REMOVED SHALL NOT BE REUSED IN NEW SYSTEMS, EXCEPT WHERE INDICATED AS BEING RELOCATED.
- 10. ALL EQUIPMENT SHALL BE INSTALLED IN STRICT COMPLIANCE WITH THE MANUFACTURER'S WRITTEN INSTRUCTIONS.
- 11. THIS CONTRACTOR SHALL NOT BORE, NOTCH, CUT, OR PENETRATE INTO A STRUCTURAL MEMBER WITHOUT WRITTEN APPROVAL FROM A DESIGNATED STRUCTURAL ENGINEER AND THE OWNER.
- 12. ALL PIPE ELBOWS SHALL BE LONG RADIUS UNLESS OTHERWISE SPECIFICALLY NOTED ON THE DRAWINGS.
- 13. INSTALL MANUAL VOLUME DAMPERS WITHIN DUCT BRANCHES TO BALANCE AIRFLOW CFM. ON INSULATED DUCTS, MOUNT DAMPER REGULATOR ON 2" STAND-OFF BRACKET TO CLEAR INSULATION.
- 14. ALL MATERIAL EXPOSED WITHIN RA PLENUMS SHALL BE NON-COMBUSTIBLE OR SHALL HAVE A FLAME SPREAD INDEX NOT GREATER THAN 25 AND SMOKE DEVELOPED INDEX NOT GREATER THAN 50. COMPLY WITH CMC-602.2.
- 15. COORDINATE ACCESS TO EQUIPMENT WITH WORK OF OTHER TRADES. PROVIDE DUCT ACCESS DOORS AND CEILING ACCESS DOORS TO ALLOW ACCESS FOR FILTER CHANGEOUT, CONTROLS ACCESS AND ACCESS TO SERVICE/REMOVE COMPONENTS INCLUDING, BUT NOT LIMITED TO, FANS, PULLEYS, SHEAVES, BELTS, ETC.
- 16. MEP COMPONENT ANCHORAGE NOTE:

ALL MECHANICAL 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 2019 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 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 HAVING 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 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.

17. PIPING AND DUCTWORK DISTRIBUTION SYSTEM BRACING NOTE:

PIPING AND DUCTWORK 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 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 SYSTEM ARE AS NOTED BELOW. WHEN BRACING AND ATTACHMENTS ARE BASED ON A PREAPPROVED 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 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 THE APPLICABLE OSHPD PRE-APPROVAL (OPM #) #\_\_\_\_\_

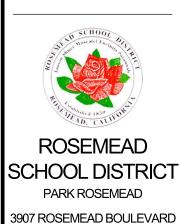
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ROSEMEAD, CA 91770

NAC NO 161-21043 DRAWN JL

DATE 10-06-2022 GENERAL NOTES,

CHECKED SN

ABBREVIATIONS, AND

PACK	AGED AIR COI	NDITIONII	NG UNITS

CONDENSATE DRAIN PIPING:

INSULATION OF CONDENSATE DRAIN PIPING:

3. GAS PIPING:

						SUPPL	Y FAN		C	COOLING CAPACIT	Υ			TOTA	AL HEATING CAPA	CITY				ELECTRICAL							
MARK	MANUFACTURER & MODEL	LOCATION	TYPE	SERVICE	AIRFLOW CFM	HP/(BHP)	ESP	RPM	TOTAL MBH	SENSIBLE MBH	TONS	SEER	INPUT MBH	OUTPUT MBH	ENTERING AIR	LEAVING AIR	THERMAL EFFICIENCY	VOLTAGE	PHASE	FLA	MCA	MOCP	OUTSIDE AIR CFM SETPOINT	OPERATING WEIGHT LBS.	CURB WEIGHT LBS.	MAX OPERATING WEIGHT LBS.	REMARKS
RTU-M6	CARRIER 48GCGM05A2A5-0A1A0	MUSCATEL G BLDG E ROOF	GAS HEAT/ELEC COOL	CLASSROOM 6	1,600	1.0/(0.62)	0.5	1,792	49.96	37.06	4	16.1	60.0	49.0	70.0	98.4	81%	230	3	26.0	27.0	30.0	450	675	0	675	1 3 4 5 6 11
RTU-M7	CARRIER 48GCGM05A2A5-0A1A0	MUSCATEL G	GAS HEAT/ELEC COOL	CLASSROOM 7	1,600	1.0/(0.62)	0.5	1,792	49.96	37.06	4	16.1	60.0	49.0	70.0	98.4	81%	230	3	26.0	27.0	30.0	450	675	0	675	1 3 4 5 6 11
RTU-M8	CARRIER 48GCGM05A2A5-0A1A0	MUSCATEL G	GAS HEAT/ELEC COOL	CLASSROOM 8	1,600	1.0/(0.62)	0.5	1,792	49.96	37.06	4	16.1	60.0	49.0	70.0	98.4	81%	230	3	26.0	27.0	30.0	450	675	0	675	1 3 4 5 6 11
RTU-M9	CARRIER 48GCGM05A2A5-0A1A0	MUSCATEL G	GAS HEAT/ELEC COOL	CLASSROOM 9	1,600	1.0/(0.62)	0.5	1,792	49.96	37.06	4	16.1	60.0	49.0	70.0	98.4	81%	230	3	26.0	27.0	30.0	450	675	0	675	1 3 4 5 6 11
RTU-M10	CARRIER 48GCGM07A2A5-0A1A0	MUSCATEL G	GAS HEAT/ELEC COOL	CLASSROOM 10	2,400	1.5/(1.14)	0.5	2,213	72.42	55.62	6	11.0/15.0	67.0	54.0	70.0	90.8	81%	230	3	27.0	28.0	45.0	600	675	0	675	1 3 4 5 6 11
RTU-M11	CARRIER 48GCGM05A2A5-0A1A0	MUSCATEL G	GAS HEAT/ELEC COOL	CLASSROOM 11	1,600	1.0/(0.62)	0.5	1,792	49.96	37.06	4	16.1	60.0	49.0	70.0	98.4	81%	230	3	26.0	27.0	30.0	450	675	0	675	1 3 4 5 6 11
RTU-M12	CARRIER 48GCGM05A2A5-0A1A0	MUSCATEL G	GAS HEAT/ELEC COOL	CLASSROOM 12	1,600	1.0/(0.62)	0.5	1,792	49.96	37.06	4	16.1	60.0	49.0	70.0	98.4	81%	230	3	26.0	27.0	30.0	450	675	0	675	1 3 4 5 6 11
RTU-ML	CARRIER 48GCGM06A2A3-0A1A0	MUSCATEL G BLDG C ROOF	GAS HEAT/ELEC COOL	LIBRARY / MEDIA ROOM	2,000	1.0/(0.62)	0.5	1,792	49.96	37.06	5	16.1	60.0	49.0	70.0	98.4	81%	230	1	35.0	37.0	50.0	525	675	0	675	1 3 4 5 6 11
RTU-M26	CARRIER 50GCQM05A2A3-0A1A0	MUSCATEL BLDG J ROOF	HEAT PUMP	CLASSROOM 26	1,600	1.0/(0.62)	0.5	1,792	49.96	37.06	4	16.2	-	45.6	70.0	98.4	8.3 / 3.7	230	1	33.0	35.0	50.0	450	590	144	590	1 3 4 5 14
RTU-M27	CARRIER 50GCQM05A2A3-0A1A0	MUSCATEL BLDG K ROOF	HEAT PUMP	CLASSROOM 27	1,600	1.0/(0.62)	0.5	1,792	49.96	37.06	4	16.2	-	45.6	70.0	98.4	8.3 / 3.7	230	1	33.0	35.0	50.0	450	590	144	590	1 3 4 5 14

	00000011100112110 0111110	BEBUILLIEGI								1	
1 UNIT SHAL	L BE VERTICAL DISCHARGE.				4 PRO	OVIDE WITH 2" ME	ERV-13 FILTERS.				
2 UNIT SHAL	L BE HORIZONTAL DISCHARGE.				5 PRO	OVIDE WITH 100%	OSA ECONOMIZ	ZER WITH BAROM	IETRIC RELIEF.		
3 PROVIDE T CAPABILIT	FITLE 24 COMPLIANT VENSTAR 2 Y. REPLACE IN PLACE OF EXIST	2800 THERMOSTAT WI ING THERMOSTAT.	TH ADJUSTABLE SET	POINT AND OVERRIDE	6 MO	T DISCHARGE CC UNTING.	DNFIGURATION S	SHALL MATCH EX	ISTING. NO ADAF	PTER CURB REQ	UIRED FOR
PLUMB	ING PIPING M	ATERIAL	S SCHED	ULE							

LEAD-FREE SOLDER JOINTS. ALL CONDENSATE DRAIN PIPING WITHIN THE BUILDING SHALL BE INSULATED.

BUTT STRIPS. JOHNS MANVILLE MICRO-LOK 'HP' OR EQUAL.

SHALL BE PAINTED WITH RUST INHIBITING PAINT.

PIPE PROTECTION: PROVIDE NON-CONDUCTING DIELECTRIC CONNECTIONS JOINING DISSIMILAR METALS.

TYPE 'L' COPPER TUBING, HARD DRAWN CONFORMING TO ASTM B 88, WITH WROUGHT COPPER SOLDER SWEAT FITTINGS AND

GLASS FIBER PIPE INSULATION WITH FACTORY-APPLIED JACKET CONFORMING TO ASTM C547. 1-INCH THICK FOR PIPE SIZES 1" &

SMALLER. 1½-INCH THICK FOR PIPE SIZES 1¼" INCHES & LARGER. SEAL ALL JOINTS WITH THE FACTORY-APPLIED, SELF-SEAL LAP AND

SCHEDULE 40 BLACK STEEL PIPE CONFORMING TO ASTM A 53 WITH 150 PSIG MALLEABLE IRON THREADED FITTINGS. WELDED JOINTS FOR

PIPE SIZES 21/2" AND LARGER OR WELDED THROUGHOUT WHEN USED FOR MEDIUM PRESSURE. OUTDOOR PIPING EXPOSED TO ATMOSPHERE

9	EXISTING UNIT MODEL : CARRIER 48NLT048. CONTRACTOR TO VERIFY MODEL AND DIMENSIONS FOR ADAPTER CURB ATTACHMENT.

7 PROVIDE WITH CA-CAR-537-YRK-560-RTAP-20 MICROMETL CURB ADAPTER.

8 PROVIDE WITH CA-CAR-537-CAR-005 MICROMETL CURB ADAPTER.

EXISTING UNIT MODEL: CARRIER 48NLT042. CONTRACTOR TO FIELD VERIFY MODEL AND DIMENSIONS FOR ADAPTER CURB ATTACHMENT.

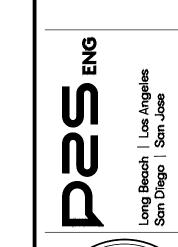
13 EXISTING UNIT MODEL: YORK D1EG048. CONTRACTOR TO FIELD VERIFY MODEL AND DIMENSIONS FOR ADAPTER CURB ATTACHMENT.

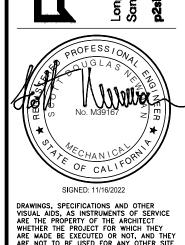
EXISTING UNIT MODEL : CARRIER 48HJD005, 48HDJ006 OR 48HJD007. CONTRACTOR TO FIELD VERIFY MODEL AND DIMENSIONS FOR CURB ATTACHMENT. EXISTING UNIT MODEL : BARD RPM36B. CONTRACTOR TO FIELD VERIFY MODEL AND DIMENSIONS FOR ADAPTER CURB. PROVIDE CDI 1959854-1-9999-4000 OR EQUAL ADAPTER.

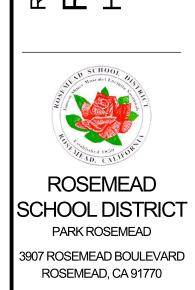
EXISTING UNIT MODEL: CARRIER 48HJD006. CONTRACTOR TO FIELD VERIFY MODEL AND DIMENSIONS FOR CURB ATTACHMENT.

12 EXISTING UNIT MODEL: CARRIER 48HJD006. CONTRACTOR TO FIELD VERIFY MODEL AND DIMENSIONS FOR HORIZONTAL DISCHARGE. ATTACH PER STRUCTURAL.

FILE NO: 19-91 A#: 03-122718







SCHEDULES - MUSCATEL

\_\_\_\_\_

#### **GENERAL NOTES**

- 1. WHERE EXISTING EQUIPMENT IS NOTED TO BE REPLACED, CONTRACTOR SHALL DEMOLISH EXISTING UNIT AND UTILITIES AS REQUIRED FOR NEW INSTALLATION. DISCONNECT GAS PIPING, UNIT DISCONNECT AND CONTROL WIRING AT UNIT LOCATION AND RECONNECT TO NEW UNIT. WALL AND ROOF OPENING SHALL BE COVERED UNTIL NEW WATERPROOFING IS COMPLETE.
- CONDENSATE AND GAS PIPING TO BE PAINTED TO MATCH THE EXTERIOR COLOR OF ROOF.

FILE NO: 19-91 A#: 03-122718

#### KEY NOTES

REPLACE EXISTING ROOFTOP UNIT WITH NEW EQUIPMENT IN SAME LOCATION ON ROOF PER DETAIL 1/M601. NEW UNIT TO MOUNT TO EXISTING CURB WITH CURB ADAPTER.

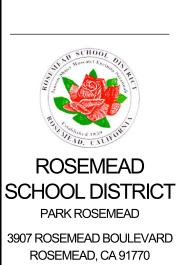
PROVIDE 3/4" CD FROM A/C UNIT AND INTERCEPT (E) 3/4" CD AT ROOF. FIELD VERIFY LOCATION OF (E) CD PIPE AND EXTEND AS REQUIRED. REFER TO DETAIL 5/M601.

PROVIDE 3/4" GAS TO A/C UNIT AND INTERCEPT (E) 3/4" GAS AT ROOF. FIELD VERIFY LOCATION OF (E) GAS PIPE AND EXTEND AS REQUIRED. REFER TO DETAIL 4/M601.





SCATEL MIDDLE SCHOOL
CEMENT AT BUILDINGS C,E,F,J AND K



A R C H I T E C T U R E

<b>∀</b> a = -	
1	161-21043

NAC NO 161-21043

FILE

DRAWN JL

CHECKED SN

DATE 10-06-2022

MECHANICAL SITE PLAN -MUSCATEL

M101

SCALE: 1" = 30'

ROSEMEAD SCHOOL DISTRICT PARK ROSEMEAD 3907 ROSEMEAD BOULEVARD ROSEMEAD, CA 91770

NAC NO 161-21043

DRAWN JL CHECKED SN DATE 10-06-2022

DETAILS

**GENERAL NOTE** 

A. REFER TO SPECIFICATION FOR PIPE SUPPORT SPACING. B. CONDENSATE DRAIN PIPING SHALL SLOPE AT MINIMUM 1%.

C. REFER TO STRUCTURAL DRAWINGS AND ARCHITECTURAL DRAWINGS FOR MAX ROOF SLOPE.

DETAIL NOTES

PIPE AT ROOF - REFER TO SPECIFICATIONS FOR PIPE MATERIAL.

2 PIPE CLAMP - UNISTRUT P1113 OR EQUAL.

B-LINE C-PORT SERIES PIPE SUPPORT SYSTEM OR EQUAL.

4 SET ON MASTIC OR RUBBER PADDING AT PVC ROOF CONSTRUCTION AREAS - TYPICAL.

MAX. # OF PIPES/SUPPORT = 2 MAX. SIZE OF PIPE (DIA.) = 1-1/4" MAX. OPER. WEIGHT AT EA = 10 LBS MAX. SUPPORT SPACING = 6 FEET 12" MAX. (h) TO CTR. OF PIPE 12" MAX. (h) TO CTR. OF PIPE

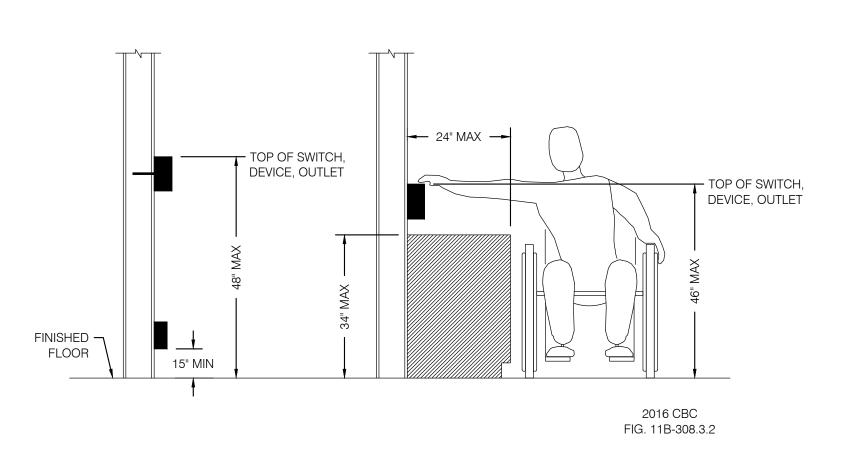
CONDENSATE DRAIN PIPE SUPPORT ON ROOF

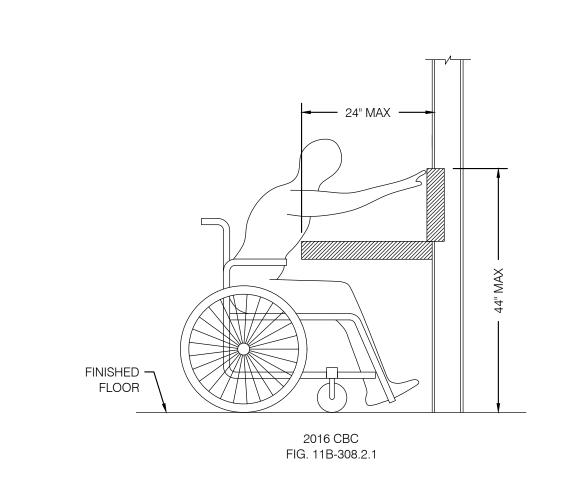
— 5'-0" MAX.—— - RIGHT HAND LEFT HAND COUPLING ----- CSA RATED FLEXIBLE MECH. EQUIPMENT CONNECTION - EXISTING PIPE PENETRATION THRU ROOF

DETAIL GENERAL NOTES

A. FIELD VERIFY EXACT POINT OF CONNECTION TO EXISTING UTILITIES.

GAS CONNECTOR DETAIL





NOTES

THIS DETAIL APPLIES TO MOUNTING OF ANY MECHANICAL AND ELECTRICAL DEVICE WHICH CONTAINS AN OPERABLE PART THAT IS ADJUSTABLE BY THE OCCUPANT. THIS DOES NOT APPLY TO SENSORS OR CONTROLS THAT ARE ONLY ADJUSTABLE THROUGH THE BUILDING AUTOMATION SYSTEM (IE: TEMPERATURE AND HUMIDITY SENSORS).

MOUNTING HEIGHT OVER OBSTRUCTION

MECHANICAL EQUIPMENT -CONDENSATE DRAIN CONNECTION. UNION (TYP) ---BRASS UNION WITH 6" BRASS NIPPLE. ( WHERE STEEL MEETS COPPER) 12" LONG FLEXIBLE NEOPRENE -U.V. PROTECTION HOSE CONNECTION WITH STAINLESS STEEL STEEL CLAMPS BRASS CLEANOUT ----PLUG (THREADED) CD VENT -MECH. EQUIPMENT P.O.C. 3/4"CD TO (E)3/4"CD (E) 3/4"CD-EXISTING PIPE — PENETRATION - BRASS CLEANOUT THRU ROOF PLUG (THREADED) DETAIL KEY NOTES

DEPTH OF SEAL TO OVERCOME OPERATING STATIC PRESSURE +1" (VERIFY IN FIELD) BUT LESS NOT LESS THAN 3" MIN. 2 3/4"CD, LENGTH VARIES, SEE ROOF PLANS FOR ROUTING. FOR CONDENSATE PIPE SUPPORT ON ROOF SEE DETAIL 5/M601. DETAIL GENERAL NOTES A. MANUALLY PRIME TRAP BEFORE START-UP. B. SUPPORT DRAIN LINE TO PREVENT SAGS AND TERMINATE TO AN APPROVED RECEPTOR. (LAVATORY TAILPIECE, SERVICE SINK, FLOOR

SINK OR ROOF RECEPTOR.)

TYPICAL CONDENSATE DRAIN DETAIL

ROOFTOP UNIT INSTALLATION W/ CURB ADAPTER

EXISTING SUPPLY DUCT. CONNECT TO ADAPTER CURB AT POC SHOWN.

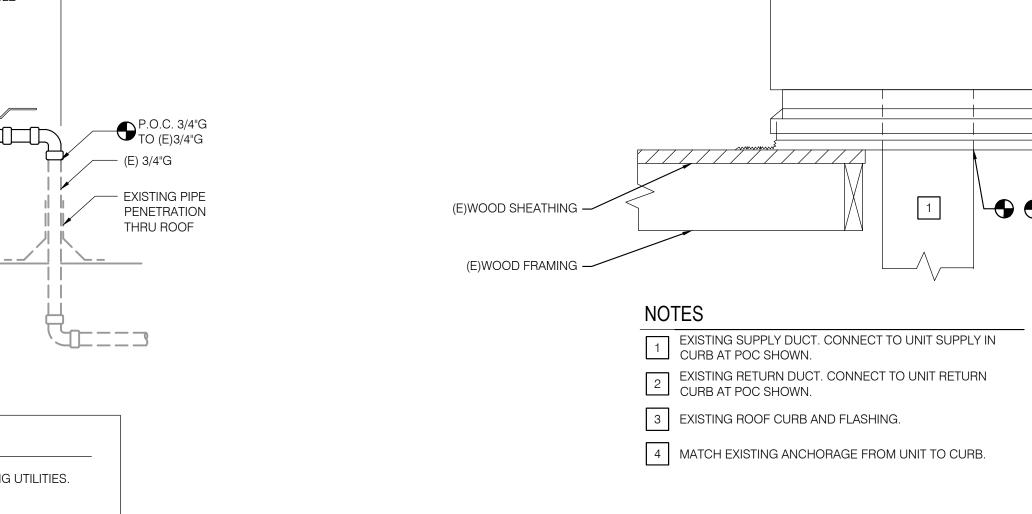
2 EXISTING RETURN DUCT. CONNECT TO ADAPTER CURB AT POC SHOWN.

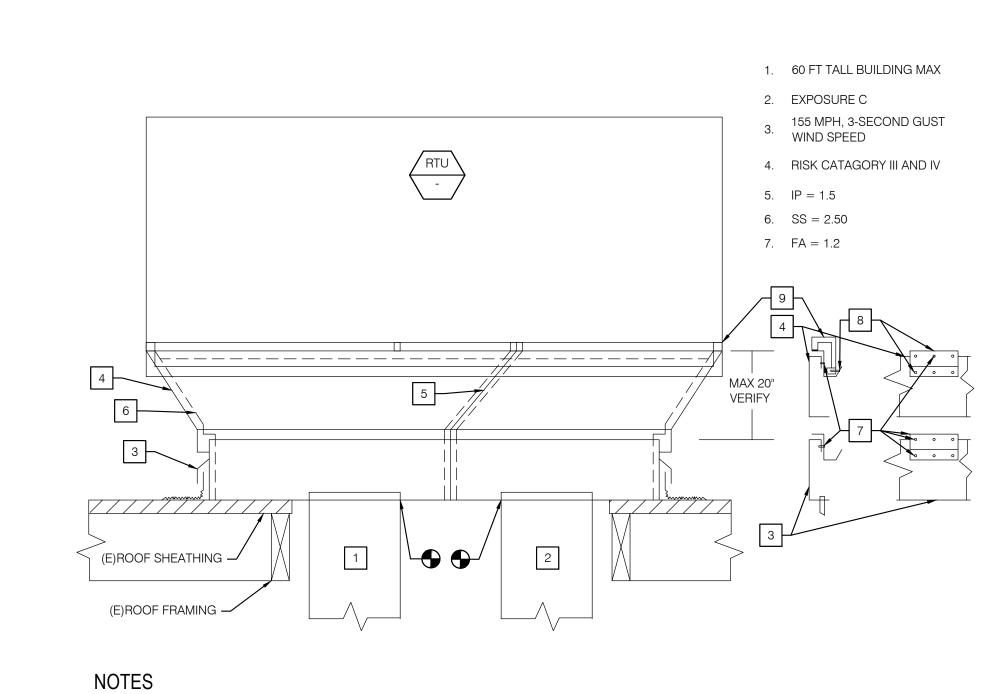
14 GA FULLY ASSEMBLED, ADAPTOR CURB. MOUNT TO EXISTING CURB PER STRUCTURAL DRAWINGS. REFER TO MECHANICAL SCHEDULE AND DETAIL FOR ACCESSORY.

3 EXISTING ROOF CURB AND FLASHING.

6 INTERNAL INSULATION WITH GASKETING.

5 INTERNAL DUCT TRANSITIONS





14 GA MICROHOLD CLIPS. ATTACH TO CURB W/ #10 X 1" 7 TEKS SCREW. MIN. (5) EQUALLY SPACED PER LONG SIDE,

8 14 GA MICROHOLD CLIPS. ATTACH TO UNIT W/ #12 X 1-1/2" TEKS SCREW.

REFER TO STRUCTURAL PLANS FOR CALCULATIONS AND ADDITIONAL DETAILING.

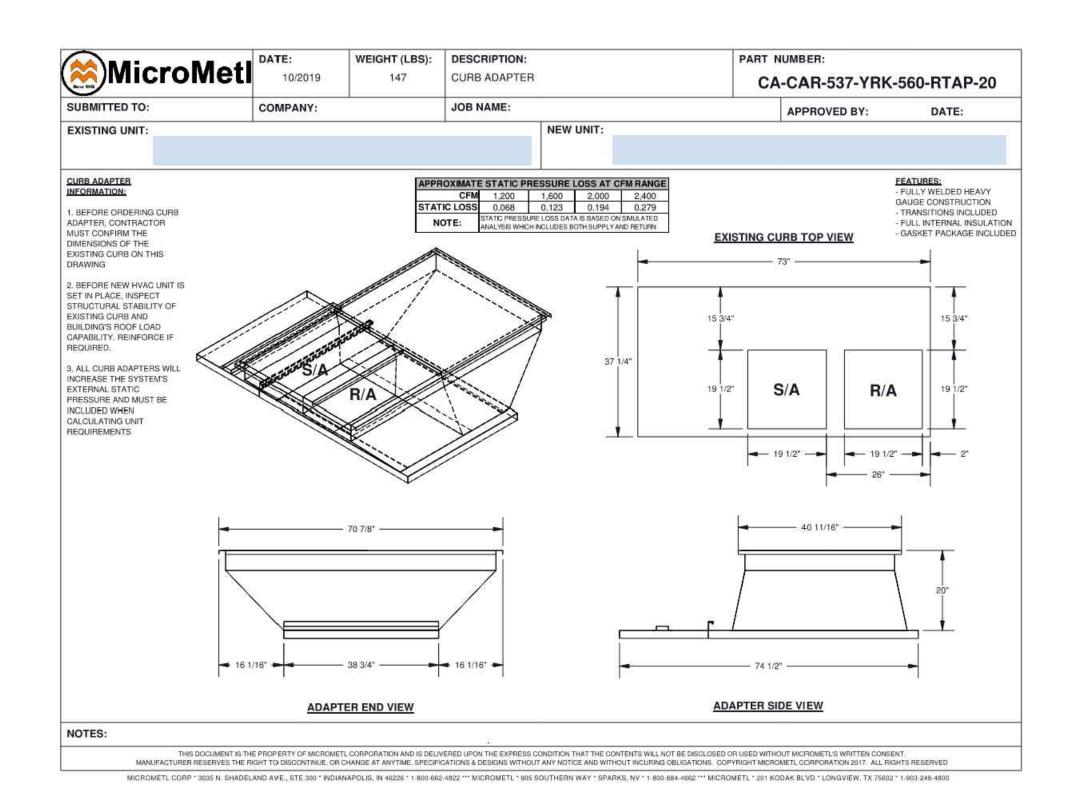
(3) EQUALLY SPACED PER SHORT SIDE

9 EQUIPMENT BASE RAIL.

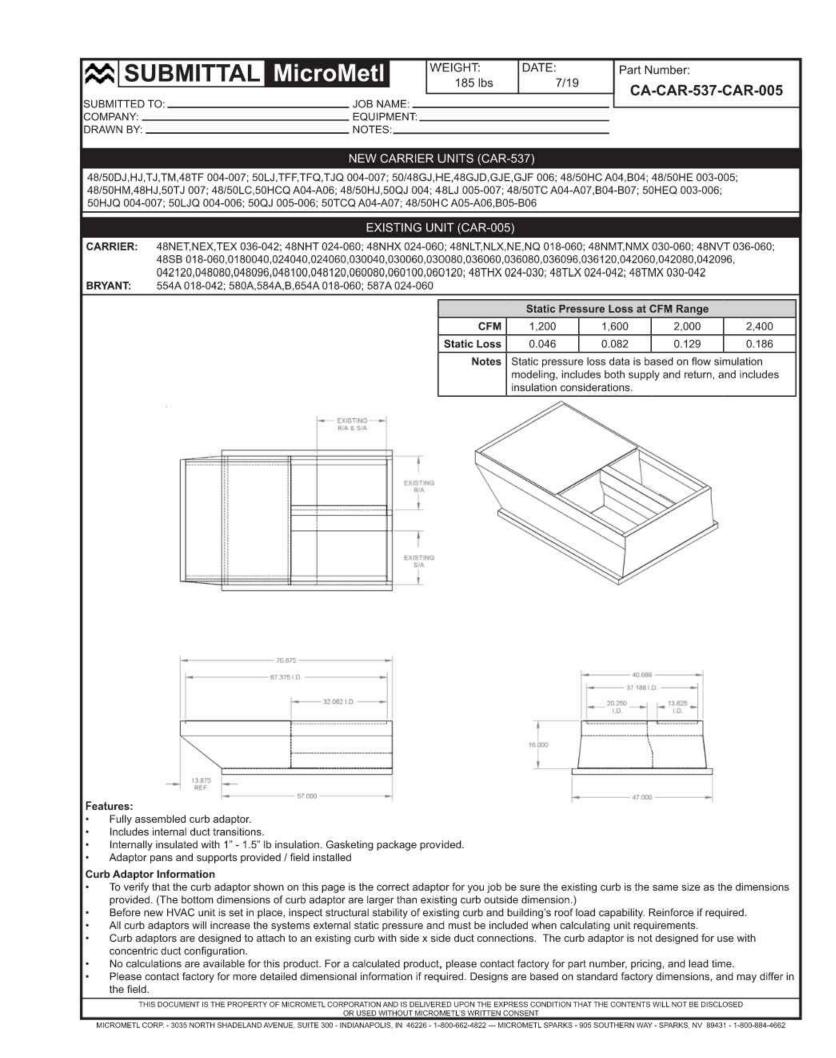
ROOFTOP UNIT INSTALLATION ON (E) CURB

\\crystal.cdicurbs.com\eng\files\CURBS\_CURB\_ADAPTERS\1-XXXX-XXXX\_CURB\_ADAPTERS\1-9999-2022\1959854-1-9999-4000

4) CURB ADAPTER: CDI 1959854-1-999-4000



3 CURB ADAPTER: CA-CAR-537-YRK-560-RTAP-20
NO SCALE

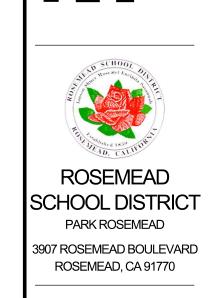


2 CURB ADAPTER: CA-CAR-537-CAR-005
NO SCALE

NOT USED
NO SCALE

FILE NO: 19-91

A#: 03-122718



NAC NO 161-21043 drawn JL CHECKED SN DATE 10-06-2022

DETAILS M602



CERTIFICATE OF COMPLIANCE

A. GENERAL INFORMATION

03 Occupancy Types Within Project:

☐ Hotel/ Motel Guest Rooms (R-1)

☐ High-Rise Residential (R-2/R-3)

§140.4, or <u>§141.0(b)2</u> for alterations.

Cooling Air System

or new)

Registration Number:

STATE OF CALIFORNIA

NRCC-MCH-E

Project Name:

Name:

01

Fan Name or

Item Tag

RTU-E10-E18

I. SYSTEM CONTROLS

space conditioning systems

01

System Name

RTU-E10-E18

have setback thermostats.

Registration Number:

**Mechanical Systems** 

CERTIFICATE OF COMPLIANCE

H. FAN SYSTEMS & AIR ECONOMIZERS

RTU-E10-E18

Fan Function

Supply

<sup>2</sup> The unit used for HP must be consistent for all fans within a system.

CA Building Energy Efficiency Standards - 2019 Nonresidential Compliance

03

Floor Area

(ft<sup>2</sup>)

Zoning Being Served

Single zone <= 25,000 ft<sup>2</sup>

Total System Design Supply Airflow (CFM):

Air System(s)

Mechanical Controls

Mechanical Controls (existing to remain, altered

CA Building Energy Efficiency Standards - 2019 Nonresidential Compliance

xempt from these requirements and do not need to be included in Table H.

01 Project Location (city)

02 Climate Zone

B. PROJECT SCOPE

Office (B)

path outlined in §140.4, or §141.0(b)2 for alterations.

NRCC-MCH-E

Project Name:

Project Address:

2022-11-16T18:16:49-05:00

7600

Dry System Components

Ductwork (existing to remain, altered or new)

Documentation Software: Energy Code Ace

Report Generated: 2022-11-16 15:16:53

CALIFORNIA ENERGY COMMISSION

2022-11-16T18:16:49-05:00

Constant Volume

Design Airflow through

Device (CFM)

1600

Window Interlocks per

§140.4(n)

NA: Alteration Project

Compliance ID: 77583

Documentation Software: Energy Code Ace

Report Generated: 2022-11-16 15:16:53

an Power Pressure Drop Adjustment - Table 140.4-

Fully ducted return,

exhaust

H2O)

Maximum System Fan

Power (B)HP:

ulated Adjustment (in

Temp. Reset

§140.4(f)

Compliance ID: 77583

(Page 4 of 8)

Air Economizer

☐ Electric Resistance Heat

Zonal Systems/ Terminal Boxes

49000 49000

Report Generated: 2022-11-16 15:16:53

Project Address:

F. HVAC SYSTEM SUMMARY (DRY & WET SYSTEMS)

This table is used to demonstrate compliance for mechanical equipment with mandatory requirements found in §110.1 and §110.2(a) and prescriptive requirements found in §140.4(a) §140.4(b) and §140.4(k) or §141.0(b)2 for alterations Dry System Equipment Sizing (includes air conditioners, condensers, heat pumps, VRF, furnaces and unit heaters) 05 06 07 08 09 10 11 Equipment Sizing per Mechanical Schedule (kBtu/h) Heating Output<sup>2,3</sup> Cooling Output<sup>2,3</sup> Load Calculations<sup>3</sup> Name or Item | Equipment Category per Equipment Type per Tables 110.2 / Tables 110.2 Per Design Rated Heating Per Design Heating Cooling (kBtu/h) (kBtu/h) Output (kBtu/h) Load (kBtu/h) (kBtu/h) (kBtu/h)

<sup>1</sup>FOOTNOTES: Equipment shall be the smallest size, within the available options of the desired equipment line, necessary to meet the design heating and cooling loads of the building per §140.4(a). Healthcare facilities are excepted.

<sup>2</sup>It is common practice to show rated output capacity on the equipment schedule. Sensible cooling output comes from specification sheet tables.

<sup>3</sup> If equipment is heating only, leave cooling output and load blank. If equipment is cooling only, leave heating output and load blank.

RTU-E10-E18 Sm. Commercial AC Air-cooled unitary AC/HP Pkg (3Ph)

<sup>4</sup> Authority Having Jurisdiction may ask for load calculations used for compliance per <u>§140.4(b)</u>.

Dry System Equipment Efficiency (other than Package Terminal Air Conditioners (PTAC) and Package Terminal Heat Pumps (PTHP))										
01	02	03	04	05	06	07	08	09		
			Heati	ing Mode		Cooling Mode				
Name or Item Tag	Size Category (Btu/h)	Rating Condition (°F)	Efficiency Unit	Minimum Efficiency Required per Tables 110.2 / Title 20	Design Efficiency	Efficiency Unit	Minimum Efficiency Required per Tables 110.2 / Title 20	Design Efficiency		
RTU-E10-E18	<65,000		HSPF	8	81	SEER	14	16.1		

Documentation Software: Energy Code Ace

Report Generated: 2022-11-16 15:16:53

Compliance ID: 77583

STATE OF CALIFORNIA

NRCC-MCH-E

This section does not apply to this project. Generated Date/Time: Documentation Software: Energy Code Ace Registration Number: Compliance ID: 77583 CA Building Energy Efficiency Standards - 2019 Nonresidential Compliance Report Version: 2019.1.003

Schema Version: rev 20200601

STATE OF CALIFORNIA

Mechanical Systems CALIFORNIA ENERGY COMMISSION NRCC-MCH-E CERTIFICATE OF COMPLIANCE NRCC-MCH-E RSD HVAC Replacement Report Page: (Page 6 of 8 Project Address: 2022-11-16T18:16:49-05:0 Date Prepared:

L. DISTRIBUTION (DUCTWORK and PIPING) In other unconditioned spaces The scope of the project includes extending an existing duct system, which is constructed, insulated or sealed with asbestos. The scope of the project includes an existing duct system that is documented to have been previously sealed as confirmed through field verification and diagnostic testing in accordance with procedures in the Reference Nonresidential Appendix NA2. Duct system shall be sealed in acordance with the California Mechanical Code

M. COOLING TOWERS

This section does not apply to this project.

N. DECLARATION OF REQUIRED CERTIFICATES OF INSTALLATION Selections have been made based on information provided in previous tables of this document. If any selection needs to be changed, please explain why in Table E Additional Remarks. These documents must be provided to the building inspector during construction and can be found online at https://www.energy.ca.gov/title24/2019standards/2019\_compliance\_documents/Nonresidential\_Documents/NRCI/

Form/Title

NRCI-MCH-01-E - Must be submitted for all buildings

O. DECLARATION OF REQUIRED CERTIFICATES OF ACCEPTANCE Selections have been made based on information provided in previous tables of this document. If any selection needs to be changed, please explain why in Table E Additional Remarks. These documents must be provided to the building inspector during construction and can be found online at https://www.energy.ca.gov/title24/2019standards/2019\_compliance\_documents/Nonresidential\_Documents/NRCA/

Form/Title	Systems/Spaces To Be Field Verified
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.	RTU-E10-E18
NRCA-MCH-05-A - Air Economizer Controls	RTU-E10-E18
NRCA-MCH-13-A Automatic FDD for Air Handling Units and Zone Terminal Units Acceptance	RTU-E10-E18
NRCA-MCH-18-A Energy Management Control Systems	RTU-E10-E18

Registration Number: Generated Date/Time: Documentation Software: Energy Code Ace CA Building Energy Efficiency Standards - 2019 Nonresidential Compliance Report Version: 2019.1.003 Compliance ID: 77583 Schema Version: rev 20200601 Report Generated: 2022-11-16 15:16:53

Space Conditioning Mandatory Measures: 110.2 CERTIFICATION BY MANUFACTURERS ANY SPACE CONDITIONING EQUIPMENT LISTED IN §110.2 SHALL ONLY BE INSTALLED IF CERTIFIED TO THE ENERGY COMMISSION TO MEET ALL APPLICABLE §110.2

110.5 PILOT LIGHTS PROHIBITED FOR NATURAL GAS EQUIPMENT PILOT LIGHTS ARE PROHIBITED ON NATURAL GAS FAN-TYPE CENTRAL FURNACES, POOL HEATERS, SPA HEATERS, AND FIREPLACES.

INSTALLED INSULATION SHALL BE CERTIFIED BY THE DEPARTMENT OF CONSUMER AFFAIRS PER TITLE 24, PART 12, CHAPTERS 12-13, ARTICLE 3 "STANDARDS FOR INSULATING MATERIAL."

110.8(b) UREA FORMALDEHYDE INSULATION UREA FORMALDEHYDE INSULATION SHALL NOT BE INSTALLED UNLESS IN EXTERIOR SIDE WALLS WITH A FOUR-MIL-THICK PLASTIC POLYETHYLENE VAPOR RETARDER OR EQUIVALENT PLASTIC SHEATHING VAPOR RETARDER INSTALLED BETWEEN THE UREA FORMALDEHYDE FOAM INSULATION AND THE INTERIOR SPACE.

ALL INSULATING MATERIALS SHALL BE INSTALLED IN COMPLIANCE WITH THE FLAME SPREAD RATING AND SMOKE DENSITY REQUIREMENTS OF THE CALIFORNIA BUILDING CODE

IF INSULATION IS INSTALLED ON AN EXISTING SPACE-CONDITIONING DUCT, IT SHALL COMPLY WITH SECTION 604.0 OF THE CMC. 120.1(a) GENERAL VENTILATION AND INDOOR AIR QUALITY REQUIREMENTS

ALL OCCUPIABLE SPACES IN HIGH-RISE RESIDENTIAL, HOTEL/MOTEL, AND NONRESIDENTIAL BUILDINGS OTHER THAN HEALTHCARE SHALL COMPLY WITH APPLICABLE REQUIREMENTS OF §120.1(a) THROUGH (g). THE REQUIRED OUTDOOR AIR VENTILATION RATE AND AIR-DISTRIBUTION SYSTEM DESIGN SHALL BE CLEARLY IDENTIFIED ON THE PLANS. 120.1(c)2 NATURAL VENTILATION

NATURALLY VENTILATED SPACES SHALL BE DESIGNED IN ACCORDANCE WITH 120.1(c)2A THROUGH 120.1(c)2C AND INCLUDE A MECHANICAL VENTILATION SYSTEMS

120.1(c)3 MECHANICAL VENTILATION OCCUPIABLE SPACES SHALL BE VENTILATED WITH A MECHANICAL VENTILATION SYSTEM CAPABLE OF PROVIDING AN OUTDOOR AIRFLOW RATE (Vz) TO THE ZONE NO LESS THAN THE LARGER OF (Vz) DESCRIBED IN 120.1(c)3A OR 120.1(c)3B.

120.1(d) TIMES OF OCCUPANCY

MINIMUM OUTDOOR AIR RATE SHALL BE MET AT TIMES WHEN THE SPACE IS USUALLY OCCUPIED IN ACCORDANCE WITH 120.1(c).

BUILDING DURING THE 1-HOUR PERIOD IMMEDIATELY BEFORE THE BUILDING IS NORMALLY OCCUPIED.

THE LESSER OF THE MINIMUM RATE OF OUTDOOR AIR REQUIRED BY SECTION 120.1(c) OR THREE COMPLETE AIR CHANGES SHALL BE SUPPLIED TO THE ENTIRE

STATE OF CALIFORNIA Mechanical Systems NRCC-MCH-E

CALIFORNIA ENERGY COMMISSION CERTIFICATE OF COMPLIANCE RSD HVAC Replacement Report Page: Project Address: Date Prepared 2022-11-16T18:16:49-05:00

C. COMPLIANCE RESULTS Table C will indicate if the project data input into the compliance document is compliant with mechanical requirements. This table is not editable by the user. 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 System Summary Pumps §110.1, Controls §140.4(k) \$140.4(0 §110.2(e)2 | Compliance Results §110.2, 5140.4 (See Table F) (See Table G) (See Table H) (See Table I) (See Table J) (See Table K) (See Table L (See Table M) Conditions COMPLIES Mandatory Measures 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.

The permit applicant has indicated on Table J that ventilation calculations have been attached or included elsewhere on the plans.

This table includes remarks made by the permit applicant to the Authority Having Jurisdiction.

CA Building Energy Efficiency Standards - 2019 Nonresidential Compliance

**Mechanical Systems** CALIFORNIA ENERGY COMMISSION NRCC-MCH-E CERTIFICATE OF COMPLIANCE RSD HVAC Replacement Report Page: 2022-11-16T18:16:49-05:0 Date Prepared Project Address:

Generated Date/Time:

Report Version: 2019.1.003

Schema Version: rev 20200601

I. SYSTEM CONTROLS

Registration Number:

E. ADDITIONAL REMARKS

\*Notes: Controls with a \* require a note in the space below explaining how compliance is achieved. EX: system 1: SA Temp Reset: Exempt because zones compliant with §140.4(d); EXCEPTION 1 to §140.4(f)

J. VENTILATION AND INDOOR AIR QUALITY

This table is used to demonstrate compliance with mandatory ventilation requirements in §120.1 and §120.2(e)3B for all nonresidential, high-rise residential and hotel/motel occupancies. For alterations, only ventialtion systems being altered within the scope of the permit application need to be documented in this table. In lieu of this table, the required outdoor ventilation rates and airflows may be shown on the plans or the calculations can be presented in a spreadsheet. ☐ Check this box if the project included Nonresidential or Hotel/Motel spaces 02 Check this box if the project included new or altered high-rise residential dwelling units.

O3 Check the box if the project is using natural ventilation in any nonresidential or hotel/motel spaces to meet required ventilation rates per §120.1(c)2.

K. TERMINAL BOX CONTROLS

This section does not apply to this project.

L. DISTRIBUTION (DUCTWORK and PIPING) This table is used to show compliance with mandatory pipe insulation requirements found in §120.3 and prescriptive requirements found in §140.4(1) for duct leakage testing. Existing Supply and Return The answers to the questions below apply to the following duct systems: Duct leakage testing triggered for these systems? No The scope of the project includes only duct systems serving healthcare facilities Yes Duct system provides conditioned air to an occupiable space for a constant volume, single zone, space-conditioning system. Yes The space conditioning system serves less than 5,000 ft<sup>2</sup> of conditioned floor area. No The <u>combined</u> surface area of the ducts in the following locations is more than 25% of the total surface area of the entire duct system: In a space directly under a roof that has a U-factor greater than the u-factor of the ceiling, or if the roof does not meet the

Registration Number: Generated Date/Time: Documentation Software: Energy Code Ace CA Building Energy Efficiency Standards - 2019 Nonresidential Compliance Report Version: 2019.1.003 Compliance ID: 77583

In an unconditioned crawl space

requirements of §140.3(a)18 or if the roof has fixed vents or openings to the outside/ unconditioned spaces

STATE OF CALIFORNIA Mechanical Systems

datory Measures Note Block

CALIFORNIA ENERGY COMMISSION CERTIFICATE OF COMPLIANCE NRCC-MCH-E Project Name: RSD HVAC Replacement Report Page: (Page 7 of 8) 2022-11-16T18:16:49-05:00 Project Address:

This document is used to demonstrate compliance for mechanical systems that are within the scope of the permit application and are demonstrating compliance using the prescriptive

This table Includes mechanical systems or components that are within the scope of the permit application and are demonstrating compliance using the prescriptive path outlined in

02

Wet System Components

Generated Date/Time:

RSD HVAC Replacement Report Page:

his table is used to demonstrate compliance with prescriptive requirements found in §140.4(c), §140.4(e) and §140.4(m) for fan systems. Fan systems serving only process loads are

Controls:

Maximum Design Supply Airflow

1600

1 FOOTNOTES: Computer room economizers must meet requirements of §140.9(a) and will be documented on the NRCC-PRC-E document.

Thermostats

§110.2(b) & (c)<sup>1</sup>,

§120.2(a)or §141.0(b)2E

Setback + DR Tstat per

Economizer Designed per §140.4(e) and

Design HP

Demand Response

§110.12 and §120.2(b)

05

HP Unit<sup>2</sup>

BHP

Total System Design

This table is used to demonstrate compliance with mandatory controls in §110.2 and §120.2 and prescriptive controls in §140.4(f) and (n) or requirements in §141.0(b)2E for altered

Shut-Off

Controls

§120.2(e)

**EMCS** 

<sup>1</sup>FOOTNOTES: Gravity gas wall heaters, gravity floor heaters, gravity room heaters, non-central electric heaters, fireplaces or decorative gas appliances, wood stoves are not required to

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Controls

§120.2(g)

NA: Single

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☐ Water Economizer

☐ System Piping

☐ Cooling Towers

Pumps

Chillers Boilers 04 Total Conditioned Floor Area

Healthcare Facility (I)

Other (Write In)

05 Total Unconditioned Floor Area

☐ Non-refrigerated Warehouse (S)

06 # of Stories (Habitable Above Grade)

RSD HVAC Replacement Report Page:

Rosemead

Retail (M)

☐ School (E)

☐ Relocatable Class Bldg (E)

P. DECLARATION OF REQUIRED CERTIFICATES OF VERIFICATION here are no NRCV forms required for this project. Q. MANDATORY MEASURES DOCUMENTATION LOCATION his table is used to indicate where mandatory measures are documented in the plan set or construction documentation. mpliance with Mandatory Measures documented through MCH

STATE OF CALIFORNIA Mechanical Systems

CALIFORNIA ENERGY COMMISSION NRCC-MCH-E CERTIFICATE OF COMPLIANCE NRCC-MCH-E RSD HVAC Replacement Report Page: (Page 8 of 8) Project Name: Date Prepared: 2022-11-16T18:16:49-05:00

Schema Version: rev 20200601

DOCUMENTATION AUTHOR'S DECLARATION STATEMENT I certify that this Certificate of Compliance documentation is accurate and complete. cumentation Author Name: cumentation Author Signature: Andrew Smith CEA/ HERS Certification Identification (if applicable) RESPONSIBLE PERSON'S DECLARATION STATEMENT certify the following under penalty of perjury, under the laws of the State of California:

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) 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. 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. 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 Signature: Responsible Designer Name: Date Signed:

Registration Number: Generated Date/Time: Documentation Software: Energy Code Ace CA Building Energy Efficiency Standards - 2019 Nonresidential Compliance Report Version: 2019.1.003

Schema Version: rev 20200601

Compliance ID: 77583 Report Generated: 2022-11-16 15:16:53

M001

Registration Number: CA Building Energy Efficiency Standards - 2019 Nonresidential Compliance

Report Version: 2019.1.003 Schema Version: rev 20200601

Generated Date/Time:

Documentation Software: Energy Code Ace Compliance ID: 77583 Report Generated: 2022-11-16 15:16:53

Report Generated: 2022-11-16 15:16:53

FILE NO: 19-91

A#: 03-122718



NAC NO 161-21043 CHECKED | SN 10-06-2022

FORMS - MUSCATEL

TITLE 24 COMPLIANCE

EMERGENCY LINEAR LIGHT FIXTURE, DIMENSIONS PER PLANS - LIGHT

© © ▼ 20A, 125V DUPLEX RECEPTACLE FIRE RATED TYPE

② 20A, 125V QUAD RECEPTACLE FIRE RATED TYPE

FIXTURE FED FROM GENERATOR/ INVERTER/ BATTERY BACKUP

INDICATES LIGHTING CONTROL ZONE.

 $\times \nabla \nabla$ 

LINEAR PENDANT LIGHT FIXTURE, DIMENSIONS PER PLANS - UPPER

TRACK LIGHTING - UPPER CASE LETTER INDICATES LIGHT FIXTURE CALLOUT. LOWER CASE LETTER INDICATES LIGHTING CONTROL ZONE.

LED STRIP LIGHT FIXTURE - UPPER CASE LETTER INDICATES LIGHT FIXTURE CALLOUT. LOWER CASE LETTER INDICATES LIGHTING CONTROL

CASE LETTER INDICATES LIGHT FIXTURE CALLOUT. LOWER CASE LETTER

UNDERCABINET / COVE FIXTURE - UPPER CASE LETTER INDICATES LIGHT FIXTURE CALLOUT. LOWER CASE LETTER INDICATES LIGHTING CONTROL

#### ABBREVIATIONS

<u>ABBKF</u>	<u>VIATIONS</u>		
ABBREVIATION	DESCRIPTION	ABBREVIATION	DESCRIPTION
1/C &	SINGLE CONDUCTOR AND	KVA KW	KILOVOLT-AMPERES KILOWATT
@ A OR AMP	AT AMPERES	LF LFMC	LINEAR FEET LIQUIDTIGHT FLEXIBLE METAL CONDUIT
ABV	ABOVE	LGST	LARGEST
A.C. AF	ASPHALT CONCRETE  AMPERE FUSE RATING	LIS LOC.	LOAD INTERRUPTER SWITCH LOCATION
AFC	AVAILABLE FAULT CURRENT	LOTO	LOCK-OUT & TAG-OUT
AFF AFG	ABOVE FINISHED FLOOR ABOVE FINISH GRADE	LSI LTG	LONG TERM, SHORT TERM, INSTANTANEOUS LIGHTING
AIC	AMPERE INTERRUPTING CAPACITY	LV	LOW VOLTAGE
AL APPROX.	ALUMINUM APPROXIMATE	M MAX	METER MAXIMUM
ARCH.	ARCHITECT; ARCHITECTURAL	MCA	MAXIMUM CIRCUIT AMPACITY
AS ASCC	AMPERE SWITCH RATING AVAILABLE SHORT CIRCUIT CURRENT	MCC MCP	MOTOR CONTROL CENTER MOTOR CIRCUIT PROTECTOR
ATC	AIR TERMINAL CHAMBER AUTOMATIC THROW-OVER (SWITCH)	MFGR, MFR	MANUFACTURER
ATO ATS	AUTOMATIC TRANSFER SWITCH	MH MI.	MANHOLE MECHANICAL INTERLOCK
AUTO AUX	AUTOMATIC AUXILIARY	MRCT MIN	MULTI-RATIO CURRENT TRANSFORMER MINIMUM
AWG	AMERICAN WIRE GAUGE	MOCP	MAXIMUM OVERCURRENT PROTECTION
BAT BEL	BATTERY BELOW	MTD MTG	MOUNTED MOUNTING
BKBD	BACKBOARD	MTR	MOTOR
BKR BLDG	BREAKER BUILDING	MTTB MV	MAIN TELEPHONE TERMINAL BOARD MEDIUM VOLTAGE
B.S.	BARE STRANDED	N	NORTH
C CB	CONDUIT CIRCUIT BREAKER	NAC NC	NOTIFICATION APPLIANCE CIRCUIT NORMALLY CLOSED
CC	CONSTANT CURRENT	NEC	NATIONAL ELECTRICAL CODE
CEC CF	CALIFORNIA ELECTRICAL CODE CUBIC FEET	NF NIC	NON-FUSED NOT IN CONTRACT
CKT CL	CIRCUIT CENTER LINE	NL NO.	NIGHT LIGHT- 24HRS ON NUMBER
CLG	CEILING	OC	ON CENTER
CMU C.O.	CONCRETE MASONRY UNIT CONDUIT ONLY WITH PULL WIRE	OCPD OD	OVERCURRENT PROTECTIVE DEVICE OUTSIDE DIAMETER
COL	COLUMN	OE	OVERHEAD ELECTRICAL
CP CPT	COMMUNICATION PROCESSOR CONTROL POWER TRANSFORMER	OFC OH	OIL FUSED CUTOUT OVERHEAD
CR	CONTROL RELAY	OL	OIL LEVER SWITCH
CSFD CT	COMBINATION SMOKE FIRE DAMPER CURRENT TRANSFORMER	P PAC	POLE PROGRAMMABLE AUTOMATION CONTROLLER
CW	COLD WATER	PB	PULL BOX
CU DIAG	COPPER DIAGRAM	PC PCB	PHOTOCELL POLYCHLORINATED BIPHENYL
DIST. DL	DISTANCE DAMP LOCATION LISTING	PDS PF	PRESSURE DIFFERENTIAL SWITCH POWER FACTOR
DM	DIGITAL METER	PH OR Ø	PHASE
DMM DP	DIGITAL METER MODULE DISTRIBUTION PANEL	PILC PIV	PAPER INSULATED, LEAD COVER POST INDICATING VALVE
DIST.	DISTANCE	PL	PLATE
DWG DWP	DRAWING DEPARTMENT OF WATER & POWER	PLC PNL	PROGRAMMABLE LOGIC CONTROLLER PANEL
EA	EACH	POC	POINT OF CONNECTION
ECM ELEC.	ELECTRONIC CIRCUIT MONITOR ELECTRICAL	PREF. PRI.	PREFERRED PRIMARY
EM	EMERGENCY	PVC	POLY-VINYL CHLORIDE
EMH EMT	ELECTRICAL MANHOLE ELECTRICAL METALLIC TUBING	PWR REC/RECEPT	POWER RECEPTACLE
EPO EPR	EMERGENCY POWER OFF ETHYLENE PROPYLENE RUBBER	REQ'D RGS	REQUIRED RIGID GALVANIZED STEEL
EQUIP	EQUIPMENT	RMC	RIGID METAL CONDUIT
ER ERR	EXISTING TO BE REMOVED  EXISTING TO BE RELOCATED AND -	RPBP RM	REDUCED PRESSURE BACK FLOW PREVENTER ROOM
	RECONNECTED	RTAC	REAL TIME AUTOMATION CONTROLLER
EXIST/(E) EXP	EXISTING EXPLOSION PROOF	SCCR SCE	SHORT CIRCUIT CURRENT RATING SOUTHERN CALIFORNIA EDISON
FA	FIRE ALARM	SF	SQUARE FEET
FFE FIN.	FINISHED FLOOR ELEVATION FINISH	SHT SIG.	SHEET SIGNAL
FIP. FIXT	FIELD INTERFACE PANEL FIXTURE	SP SPECS	SPARE SPECIFICATIONS
FLA	FULL LOAD AMPS	ST	STREET
FLR FLUOR	FLOOR FLUORESCENT	STD STP	STANDARD SHIELDED TWISTED PAIR
FT	FEET	SW	SWITCH
FACP FATC	FIRE ALARM CONTROL PANEL FIRE ALARM TERMINAL CABINET	SWBD SWGR	SWITCHBOARD SWITCHGEAR
FMC	FLEXIBLE METAL CONDUIT	SWST	SWITCHING STATION
FO FTG	FIBER OBTIC FOOTING	TB TEL./TELE	TERMINAL BLOCK TELEPHONE
GEN	GENERATOR	TMH	TELEPHONE MANHOLE TOP OF DUCTBANK
GFI GFR	GROUND FAULT INTERRUPTER GROUND FAULT RELAY	T.O.D. T.O.M.	TOP OF DUCTBANK TOP OF MANHOLE
GG GND	GREEN GROUND GROUND	TPS TRANSF,XFMR	TWISTED SHIELDED PAIR TRANSFORMER
HOA	HAND-OFF-AUTOMATIC	TS	TAMPER SWITCH
HP HT	HORSEPOWER HEIGHT	TYP UG	TYPICAL UNDERGROUND
HTR	HEATER	UON	UNLESS OTHERWISE NOTED
HZ ICON	HERTZ INTEGRATED COMMUNICATIONS OPTICAL -	V VA	VOLTS VOLT-AMPERES
	NETWORK	VB	VIBRATION SWITCH
IE IED	INVERT ELEVATION INTELLIGENT ELECTRONIC DEVICES	VFD W	VARIABLE FREQUENCY DRIVE WATTS
IMC ISC	INTERMEDIATE METAL CONDUIT SHORT CIRCUIT CURRENT	W/ W/O	WITH WITHOUT
INCAND	INCADESCENT	WCR	WITHSTAND CLOSE-ON RATING
J, JB, J-BOX KCMIL	JUNCTION BOX THOUSAND CIRCULAR MILS	WP Z	WEATHERPROOF IMPEDANCE
KV	KILOVOLT		

IN THE EVENT ABBREVIATIONS NOT MENTIONED HEREIN ARE USED, REFERENCE WILL BE MADE TO ANSI Y1.1, MILITARY STANDARD ABBREVIATIONS, AND OTHER STANDARD INDUSTRY CONVENTIONS.

#### GENERAL NOTES

- ALL WORK SHALL COMPLY WITH THE LATEST EDITION OF THE CALIFORNIA ELECTRICAL CODE AND ALL OTHER APPLICABLE FEDERAL AND STATE. WHERE THE CONSTRUCTION DOCUMENTS INDICATE MORE RESTRICTIVE REQUIREMENTS, THE CONSTRUCTION DOCUMENTS SHALL GOVERN BUT THE CONSTRUCTION DOCUMENTS SHALL NOT BE INTERPRETED AS AUTHORITY TO VIOLATE ANY CODE OR REGULATION.
- 2. ALL MATERIALS AND EQUIPMENT SHALL BE NEW AND SHALL BEAR THE UNDERWRITERS' LABEL (UL) AND SHALL BE INSTALLED IN THE MANNER FOR WHICH THEY ARE DESIGNED AND APPROVED.
- 3. THE CONTRACTOR SHALL NOT BORE, NOTCH OR IN ANY WAY CUT INTO ANY STRUCTURAL MEMBER
- WITHOUT WRITTEN APPROVAL FROM THE ARCHITECT OR STRUCTURAL ENGINEER.
- 4. MECHANICAL, ELECTRICAL AND PLUMBING EQUIPMENT ANCHORAGE NOTES:

ALL MECHANICAL, PLUMBING, AND ELECTRICAL COMPONENTS SHALL BE ANCHORED AND INSTALLED PER THE DETAILS ON THE APPROVED CONSTRUCTION DOCUMENTS. THE FOLLOWING COMPONENTS SHALL BE ANCHORED OR BRACED TO MEET THE FORCE AND DISPLACEMENT REQUIREMENTS PRESCRIBED IN THE 2019 CBC SECTIONS 1617A.1.18 THROUGH 1617A.1.26 AND ASCE 7-16 CHAPTERS 13, 26, AND 30.

A. ALL PERMANENT EQUIPMENT AND COMPONENTS.

- B. 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 110/220V RECEPTACLES HAVING A FLEXIBLE CABLE.
- C. 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 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 SUPPORTS 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.

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

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 2019 CBC, SECTIONS 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 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[X] OPTION 1: DETAILED ON THE APPROVED DRAWINGS WITH PROJECT SPECIFIC NOTES AND DETAILS.

MP[ ] MD[ ] PP[ ] E[ ] OPTION 2: SHALL COMPLY WITH HCAI PREAPPROVAL (OPM#) #:

### SHEET INDEX

SHEET DESCRIPTION

E001 GENERAL NOTES, LEGENDS, ABBREVIATIONS, AND SHEET INDEX

E002 SCHEDULES - MUSCATEL

E101 ELECTRICAL SITE PLAN - MUSCATEL

DETAILS

FILE NO: 19-91 A#: 03-122718

Long Beach | Los Angeles San Jose



ROSEMEAD SCHOOL DISTRICT

RSD - MUSCATEL MIDDLE SCHOOL

HVAC REPLACEMENT AT BUILDINGS C,E,F,J AND



3907 ROSEMEAD BOULEVARD

ROSEMEAD, CA 91770

ARCHITECTURE

JUBANY ARC

NAC NO 161-21043

FILE

DRAWN MT

CHECKED AS

DATE 10-06-2022

GENERAL NOTES,
LEGENDS,
ABBREVIATIONS, AND
SHEET INDEX

E001

1. WHERE EXISTING CIRCUIT BREAKERS AND FEEDERS ARE BEING RE-USED, CONTRACTOR SHALL VERIFY THE EXISTING CIRCUIT FOR THAT HVAC UNIT IS SERVING THE RESPECTIVE BUILDING PER THE SCHEDULE. MODIFY UNIT NAMES IN THE PANEL DIRECTORY AS REQUIRED TO MATCH THE RESPECTIVE UNIT THAT IS SERVED.

2. REFER TO MECHANICAL SCHEDULES FOR ADDITIONAL EQUIPMENT INFORMATION. 3. HVAC EQUIPMENT WHOSE EXISTING CIRCUIT BREAKER MATCHES THE MOCP OF THE NEW UNIT SHALL BE PROVIDED WITH A NON-FUSED DISCONNECT. IF THE EXISTING CIRCUIT BREAKER EXCEEDS THE MOCP, A FUSED DISCONNECT SHALL BE PROVIDED.

FILE NO: 19-91 A#: 03-122718

מ	Long Beach San Diego <b>p2sinc.com</b>
REGISTRA	SS 10NA (CAGO MEER )
	TRICA CALIFORNIA 11/16/2022
ARE THE PROPERTY C WHETHER THE PROJEC ARE MADE BE EXECU	RUMENTS OF SERVICE IF THE ARCHITECT CIT FOR WHICH THEY GED OR NOT, AND THEY O FOR ANY OTHER SITE WHICH THEY ARE

SCHOOL 3S C,E,F,J AND

ROSEMEAD SCHOOL DISTRICT PARK ROSEMEAD 3907 ROSEMEAD BOULEVARD

ROSEMEAD, CA 91770

NAC NO 161-21043

DATE 10-06-2022

SCHEDULES - MUSCATEL

MECHA	ANICAL EQUIPI	MENT ELI	ECTRIC	AL CON	INECTI	ON SCHED	ULE				
MARK	DESCRIPTION	LOCATION	VOLTAGE	PHASE	MCA	DISCONNECT	МОСР	FEEDER	PANEL	CIRCUIT	REMARKS
RTU-M6	PACKAGED A/C UNIT	BLDG E ROOF	208	3	27.0	30A/240VAC/3P	30	3/4"C - 3#10 & 1#10 G	EXISTING	EXISTING	1 2 3
RTU-M7	PACKAGED A/C UNIT	BLDG E ROOF	208	3	27.0	30A/240VAC/3P	30	3/4"C - 3#10 & 1#10 G	EXISTING	EXISTING	1 2 3
RTU-M8	PACKAGED A/C UNIT	BLDG E ROOF	208	3	27.0	30A/240VAC/3P	30	3/4"C - 3#10 & 1#10 G	EXISTING	EXISTING	1 2 3
RTU-M9	PACKAGED A/C UNIT	BLDG E ROOF	208	3	27.0	30A/240VAC/3P	30	3/4"C - 3#10 & 1#10 G	EXISTING	EXISTING	1 2 3
RTU-M10	PACKAGED A/C UNIT	BLDG F ROOF	208	3	27.0	60A/240VAC/3P	45	1"C - 3#8 & 1#10 G	"LF"	1, 3, 5	1
RTU-M11	PACKAGED A/C UNIT	BLDG F ROOF	208	3	27.0	30A/240VAC/3P	30	3/4"C - 3#10 & 1#10 G	"LF"	2, 4, 6	1 2
RTU-M12	PACKAGED A/C UNIT	BLDG F ROOF	208	3	27.0	30A/240VAC/3P	30	3/4"C - 3#10 & 1#10 G	"LF"	7, 9, 11	1 2
RTU-ML	PACKAGED A/C UNIT	BLDG C ROOF	208	1	35.0	60A/240VAC/2P	50	1"C - 3#4 & 1#10 G	"P"	1, 3	1
RTU-M26	HEAT PUMP	BLDG J ROOF	208	1	33.0	60A/240VAC/2P	50	1"C - 2#4 & 1#10 G	"JA"	7, 9	1
RTU-M27	HEAT PUMP	BLDG K ROOF	208	1	33.0	60A/240VAC/2P	50	3/4"C - 2#10 & 1#10 G	"KA"	5, 7	1
		•	1			1	1	•	1	1	

1 PROVIDE FUSED DISCONNECT FOR UNIT IN NEMA-3R ENCLOSURE. FUSED SIZED PER MOCP.

UNIT SHALL BE SERVED FROM EXISTING CIRCUIT. EXTEND EXISTING FEEDER AS REQUIRED FOR NEW CONNECTION TO DISCONNECT AND UNIT.

CONTRACTOR SHALL VERIFY EXISTING SOURCE OF POWER AND NOTIFY THE ENGINEER OF ANY DISCREPANCIES BEFORE PERFORMING ANY WORK.

A 1,920	MA OLT-AMI	BI NIN E PS CKT	BREAK BKR/ POLE 60/2	IPS: ER:	225A 225A BKR/		1Ø, 3W	DLT-AM	F	*	ROM: TING: 10,0	000 AIC
A 1,920	DLT-AMI B	NIN E	BKR/ POLE	ER:	225A BKR/	CKT			PS OUTLETS	*	SEE	700 / NO
A 1,920	DLT-AMI B	PS CKT	BKR/ POLE	ΑВ	BKR/	CKT						
A 1,920	В	CKT	POLE	ΑВ		CKT						
1,920					POLE	CKT	Α	R	LTC DECMISO	1		
***************************************	4,920	1	60/2			_			LIGINECIVIIO	,	NOTE	LOADS
	4,920		00/2	* -	30/2	2						(E) LOA
		3		_ *		4						
		5	20/2	* -		6						SPAC
		7		- *		8				***************************************		SPAC
3,850		9	45/2	* _		10				***************************************		SPAC
	3,850	11		_ *		12						SPAC
360		13	20/1	* _		14						SPAC
		15		_ *		16				T		SPAC
***************************************		17		* _		18				1		SPAC
		19		_ *		20						SPAC
		21		* _		22				1		SPAC
		23		_ *		24				1		SPAC
		25		* _		26						SPAC
		27		_ *						1		SPAC
		29		* _		30				1		SPAC
		31		_ *		32		<u> </u>				SPAC
		33		* _						T		SPAC
				_ *						1		SPAC
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				_ *						1		SPAC
				* _			3231323231323231323			-	<u> </u>	SPAC
	360		360 13 15 17 17 19 21 23 25	360	360     13     20/1     * -       15     - *       17     * -       19     - *       21     * -       23     - *       25     * -       27     - *       29     * -       31     - *       33     * -       35     - *       37     * -       39     - *	360     13     20/1     * -       15     - *       17     * -       19     - *       21     * -       23     - *       25     * -       27     - *       29     * -       31     - *       33     * -       35     - *       37     * -       39     - *	360     13     20/1     * -     14       15     - *     16       17     * -     18       19     - *     20       21     * -     22       23     - *     24       25     * -     26       27     - *     28       29     * -     30       31     - *     32       33     * -     34       35     - *     36       37     * -     38       39     - *     40	360     13     20/1     * -     14       15     - *     16       17     * -     18       19     - *     20       21     * -     22       23     - *     24       25     * -     26       27     - *     28       29     * -     30       31     - *     32       33     * -     34       35     - *     36       37     * -     38       39     - *     40	360       13       20/1       * -       14         15       - *       16         17       * -       18         19       - *       20         21       * -       22         23       - *       24         25       * -       26         27       - *       28         29       * -       30         31       - *       32         33       * -       34         35       - *       36         37       * -       38         39       - *       40	360       13       20/1       * -       14         15       - *       16         17       * -       18         19       - *       20         21       * -       22         23       - *       24         25       * -       26         27       - *       28         29       * -       30         31       - *       32         33       * -       34         35       - *       36         37       * -       38         39       - *       40	360       13       20/1       * -       14         15       - *       16         17       * -       18         19       - *       20         21       * -       22         23       - *       24         25       * -       26         27       - *       28         29       * -       30         31       - *       32         33       * -       34         35       - *       36         37       * -       38         39       - *       40	360       13       20/1       * -       14         15       - *       16         17       * -       18         19       - *       20         21       * -       22         23       - *       24         25       * -       26         27       - *       28         29       * -       30         31       - *       32         33       * -       34         35       - *       36         37       * -       38         39       - *       40

(E) PANE	L: "	K/	۸"													
	N : BUILDII	NG (	С		VOL					20V,	1Ø, 3W				ROM:	
	OR : FIRST	0.5					US AN							R/	ATING:	10,000 AIC
MOUNTIN	IG: SURFA	CE			MA	AIN E	BREAK	KER:	225A							
	SEE	*	OUTLETS	5 V	OLT-AM	PS	BKR/		BKR/		VC	DLT-AM	PSOL	ЛLETS	* SEE	
LOADS	NOTE	ī	LTG RECM		В	-	POLE	ΑВ	POLE	CKT	Α	В		RECMISC	NOTE	LOADS
E) LOAD				360		1	20/1	* _	20/1	2	360					(E) LOAD
E) LOAD					360	3	20/1	_ *	20/1	4		360				(E) LOAD
RTU-M27	1					5	50/2	* _	20/1	6	360					(E) LOAD
-						7		_ *	20/1	8		360				(E) LOAD
E) LOAD				360		9	20/1	* _	20/1	10	360					(E) LOAD
PANEL "EKA"					5,000	11	50/2	_ *	20/1	12		180			1	ROOF RECEPTACLE
				5,000		13		* _		14						SPACE
PACE						15		- *		16						SPACE
PACE						17		* _		18						SPACE
PACE						19		- *		20						SPACE
PACE						21		* -		22						SPACE
PACE						23		- *		24						SPACE
PACE						25		* _		26						SPACE
PACE						27		- *		28						SPACE
PACE						29		* _		30						SPACE
PACE						31		_ *		32						SPACE
PACE						33		* _		34				***************************************		SPACE
PACE						35		- *		36						SPACE
PACE						37		* _		38						SPACE
PACE						39		_ *		40						SPACE
PACE	***************************************					41		* _		42						SPACE

TOTAL PANEL = 13,060 VA @ 240V, 1Ø **54 AMPS** 

(E) PANEL:		LF"			VOI	TAC	E/DU	AQE ·	2007	1201/	, 3Ø, 4V	M			EEDE	ROM:	
FLOOR:		NGF			VOI				2081/ 225A		, 3D, 4V	V					10,000 AIC
MOUNTING :		CE			M		BREAL								117	villed.	10,0007110
					5,535												
	SEE	* OUTLETS		OLT-AM	PS		BKR/		BKR/			OLT-AM	PS	OUTL		* SEE	
LOADS	NOTE	LTG RECMISO	1	В	С	-			POLE	_		В	C	LTG RE	CMISC	NOTE	LOADS
RTU-M10	2		3,242			1	45/3	*	30/3	2	3,242					1	RTU-M1
_				3,242		3		_ * _		4		3,242	المتعدد				_
_					3,242	5		*		6			3,242				
RTU-M12	1		3,242			7	30/3	*	30/3	8	3,002						(E) RTU-M1
-				3,242		9		- * -		10		3,002					
-					3,242	11		*		12			3,002				
E) LOAD						13	20/1	*	20/1	14							(E) LOA
E) LOAD						15	20/1	- * -	20/1	16							(E) LOA
E) LOAD						17	20/1	*	20/1	18							(E) LOA
E) LOAD						19	20/1	*	20/1	20							(E) LOAI
E) LOAD						21	20/1	_ * _	20/1	22							(E) LOAI
E) LOAD						23	20/1	*	20/1	24							(E) LOA
ROOFTOP RECEPTACLE	2		180			25	20/1	*		26							SPAC
BPACE						27		_ * _		28							SPAC
SPACE						29		*		30							SPAC
TOTAL ØA = TOTAL ØB = TOTAL ØC =	12,728	VOLT-AMPS	106.1	AMPS AMPS AMPS				*	1.	REU PRC		ISTING CIRCUI	CIRCUT BREA	JIT BRE AKER T			VE UNIT. STING MANUFACTURER AND
		VA	106	AMPS													

LOADS	JNTING : SURFAC				M	VOLTAGE/PHASE: 240/120V, 1Ø, 3W FED FROM: BUS AMPS: 225A RATING: 10,000 AIC MAIN BREAKER: 225A												
NEW PROPERTY.		* OUTLE																
NEW PROPERTY.					OLT-AN	_	BKR/	1	BKR/			DLT-AM				SEE		
EV LOAD	NOTE	LTG REC	MISC	A	В		POLE	3	_			В	LTG	REC	1ISC	NOTE	LOADS	
E) LOAD				360	000	1	20/1	* - _ *	20/1	2	360	000					(E) LC	
E) LOAD				000	360	3	20/1		20/1	4		360					(E) LC	
E) LOAD				360		5	20/1	* -	00/4	6							SPA (E) LG	
RTU-M26	1				3,240	·	50/2	<u> </u>	20/1	8		360					(E) LC	
-				3,240	شنشنشنش فالمتنش فالمتراث	9		* -	-Į	10	360						(E) LC	
E) PANEL "EJA"					5,000		-		20/1			180				1	ROOF RECEPTAC	
-				5,000		13		* -		14							SPA	
SPACE			-			15		- *		16							SPA	
SPACE						17		* -		18							SPA	
SPACE						19		- *		20							SPA	
SPACE				0.0000000000000000000000000000000000000		21		* -		22							SPA	
SPACE					*	23		_ *		24		L					SPA	
SPACE						25		* -		26							SPA	
SPACE						27		- *		28							SPA	
SPACE						29		* -		30							SPA	
SPACE						31		- *		32							SPA	
SPACE						33		* -		34							SPA	
SPACE					· ·	35		- *		36							SPA	
SPACE						37		* -		38							SPA	
SPACE						39		_ *		40							SPA	
SPACE						41		* _		42							SPA	

(E) LOAD (E) LOAD SPACE (E) LOAD (E) LOAD (E) LOAD (E) LOAD SPACE (E) LOAD SPACE 360 | 17 | 20/1 | -- \* | 18 | 360 | 19 | 20/1 | \* -- | 20/1 | 20 | 360 | 360 | 360 | 21 | 20/1 | -\* - | 20/1 | 22 | 360 | 360 | 360 | 360 | 360 | 360 | 360 | 360 | 360 | 360 | 360 | 360 | 360 | 360 | 360 | 360 | 360 | 360 | 360 | 360 | 360 | 360 | 360 | 360 | 360 | 360 | 360 | 360 | 360 | 360 | 360 | 360 | 360 | 360 | 360 | 360 | 360 | 360 | 360 | 360 | 360 | 360 | 360 | 360 | 360 | 360 | 360 | 360 | 360 | 360 | 360 | 360 | 360 | 360 | 360 | 360 | 360 | 360 | 360 | 360 | 360 | 360 | 360 | 360 | 360 | 360 | 360 | 360 | 360 | 360 | 360 | 360 | 360 | 360 | 360 | 360 | 360 | 360 | 360 | 360 | 360 | 360 | 360 | 360 | 360 | 360 | 360 | 360 | 360 | 360 | 360 | 360 | 360 | 360 | 360 | 360 | 360 | 360 | 360 | 360 | 360 | 360 | 360 | 360 | 360 | 360 | 360 | 360 | 360 | 360 | 360 | 360 | 360 | 360 | 360 | 360 | 360 | 360 | 360 | 360 | 360 | 360 | 360 | 360 | 360 | 360 | 360 | 360 | 360 | 360 | 360 | 360 | 360 | 360 | 360 | 360 | 360 | 360 | 360 | 360 | 360 | 360 | 360 | 360 | 360 | 360 | 360 | 360 | 360 | 360 | 360 | 360 | 360 | 360 | 360 | 360 | 360 | 360 | 360 | 360 | 360 | 360 | 360 | 360 | 360 | 360 | 360 | 360 | 360 | 360 | 360 | 360 | 360 | 360 | 360 | 360 | 360 | 360 | 360 | 360 | 360 | 360 | 360 | 360 | 360 | 360 | 360 | 360 | 360 | 360 | 360 | 360 | 360 | 360 | 360 | 360 | 360 | 360 | 360 | 360 | 360 | 360 | 360 | 360 | 360 | 360 | 360 | 360 | 360 | 360 | 360 | 360 | 360 | 360 | 360 | 360 | 360 | 360 | 360 | 360 | 360 | 360 | 360 | 360 | 360 | 360 | 360 | 360 | 360 | 360 | 360 | 360 | 360 | 360 | 360 | 360 | 360 | 360 | 360 | 360 | 360 | 360 | 360 | 360 | 360 | 360 | 360 | 360 | 360 | 360 | 360 | 360 | 360 | 360 | 360 | 360 | 360 | 360 | 360 | 360 | 360 | 360 | 360 | 360 | 360 | 360 | 360 | 360 | 360 | 360 | 360 | 360 | 360 | 360 | 360 | 360 | 360 | 360 | 360 | 360 | 360 | 360 | 360 | 360 | 360 | 360 | 360 | 360 | 360 | 360 | 360 | 360 | 360 | 360 | 360 | 360 | 360 | 360 | 360 | 360 | 360 | 360 | 360 | 360 | 360 | 360 | 360 | 360 | 360 | 360 | 360 | 360 | 360 | 360 | 360 | 360 | 360 | 360 | 360 | 360 | 360 | 360 (E) LOAD (E) LOAD 360 23 20/1 20/1 24 360 (E) LOAD 20/1 26 360 (E) LOAD (E) MAIN ROOF RECEPTACLES 720 27 20/1 100/3 28 SPACE SPACE SPACE SPACE SPACE SPACE NOTES: TOTAL ØA = 3,740 VOLT-AMPS 31.17 AMPS \* "L" DENOTES LONG CONTINUOUS LOAD TOTAL ØB = 3,380 VOLT-AMPS 28.17 AMPS REUSE EXISTING CIRCUIT BREAKER TO SERVE LOAD. TOTAL ØC = 2,660 VOLT-AMPS 22.17 AMPS TOTAL PANEL = 9,780 VA @ 208V, 3Ø **27 AMPS** 

BUS AMPS: 100A

MAIN BREAKER: 100A

RATING: 10,000 AIC

(E) PANEL: "EE"

**LOCATION**: BUILDING F FLOOR: FIRST

**MOUNTING: SURFACE** 

\_\_\_\_\_\_

#### **GENERAL NOTES**

- 1. REFER TO MECHANICAL EQUIPMENT ELECTRICAL CONNECTION SCHEDULES AND PANEL SCHEDULES FOR ADDITIONAL CIRCUIT INFORMATION.
- 2. REFER TO MECHANICAL SCHEDULES FOR ADDITIONAL EQUIPMENT INFORMATION.
- 3. REFER TO SHEET E601 FOR INSTALLATION DETAILS. CONDUIT SHALL BE ROUTED ON CANOPIES AND ROOFS TO SERVE UNITS AS REQUIRED.
- 4. CARBON MONOXIDE DETECTION SYSTEM IS NOT REQUIRED UNDER CEBC 503.15.1 EXCEPTIONS 1 AND 2. SCOPE INCLUDES REPLACEMENT OF EXISTING FUEL-BURNING UNITS ALREADY PRESENT AND THE GROUP E BUILDING WAS CONSTRUCTED BEFORE THE ADOPTION OF THE 2016 CALIFORNIA BUILDING STANDARDS CODE.

FILE NO: 19-91 A#: 03-122718

DISCONNECT EXISTING HVAC UNIT AND DISCONNECT SWITCH.

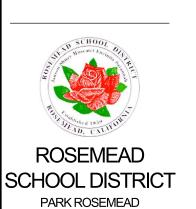
PROVIDE CONNECTION TO NEW HVAC UNIT. PROVIDE NEW DISCONNECT SWITCH. REFER TO PANEL SCHEDULES AND EQUIPMENT CONNECTION SCHEDULES FOR MORE INFORMATION.

PROVIDE 120V/20A WEATHERPROOF GFCI DUPLEX RECEPTACLE AT UNIT.









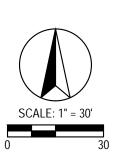
3907 ROSEMEAD BOULEVARD ROSEMEAD, CA 91770

0	161-21043
N.I	
N	I NAT

DRAWN MT CHECKED AS DATE 10-06-2022

ELECTRICAL SITE PLAN -MUSCATEL

E101



3 CONDUIT WALL SUPPORT
NO SCALE

B. CONDENSATE DRAIN PIPING SHALL SLOPE AT MINIMUM 1%.

**GENERAL NOTE** 

A. REFER TO SPECIFICATION FOR PIPE SUPPORT SPACING.

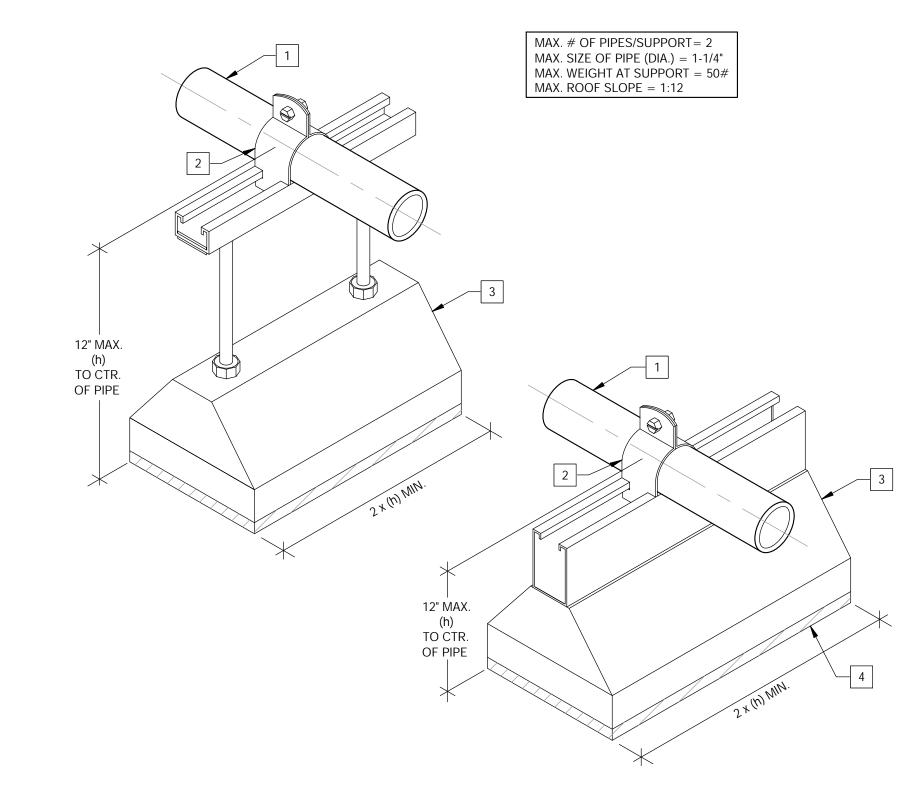
**DETAIL NOTES** 

1 PIPE AT ROOF - REFER TO SPECIFICATIONS FOR PIPE MATERIAL.

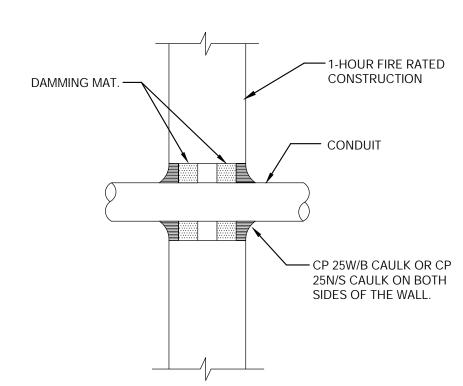
2 PIPE CLAMP - UNISTRUT P1113

B-LINE C-PORT SERIES PIPE SUPPORT SYSTEM OR EQUAL.

4 SET ON MASTIC OR RUBBER PADDING AT PVC ROOF CONSTRUCTION AREAS - TYPICAL.



2 CONDUIT ROOF SUPPORT
NO SCALE



- THIS IS UL STD #49 FOR CONCRETE WALLS OR UL SYSTEM #147 FOR 1HR. GYPSUM BOARD WALL.
- 2. THE MAXIMUM ANNULAR SPACE TO BE FILLED IS 2". THE MINIMUM ANNULAR SPACE IS 3/4"
- 3. FOR SOLID CONCRETE WALLS, THE CP 25 CAULK MAY BE CENTERED IN THE WALL WITH DAMMING MATERIAL ON BOTH SIDES OF THE GAULK.
- 4 USE CP 25S(SELF SEVELING) CAULK ON HORIZONTAL SURFACES WHEN SEALING OPENING FROM ABOVE THE PENETRATION. USE CP25N (NO SAG) CAULK ON VERTICAL SURFACES AND ON HORIZONTAL SURFACES WHEN SEALING OPENINGS FROM BELOW. USE CP 25WB CAULK ON EITHER
- 5. SHRINKAGE OF CP 25 CAULKS IS ACCEPTABLE AFTER INITIAL WET DEPTH INSTALLATION.
- 6. THE DEPTH OF THE CP 25 CAULKS DEPENDS ON THE
- INSULATION THICKNESS.

CAULK DEPTH (MIN.)

1" 1" THICK

2" 2-3" THICK

1 CONDUIT PENETRATION
NO SCALE

FILE NO: 19-91 A#: 03-122718







ROSEMEAD SCHOOL DISTRICT PARK ROSEMEAD 3907 ROSEMEAD BOULEVARD ROSEMEAD, CA 91770

NAC NO 161-21043 CHECKED AS

DATE 10-06-2022

**DETAILS** E601