

MCJA - BUILDING C LIMITED RENOVATIONS

15 OAK GROVE RD
VASSALBORO, ME 04989

PERMIT SET
DATE OF ISSUE: APR 16, 2025

ADDENDUM 4
MAY 13, 2025

PROJECT TEAM

OWNER:
Maine Criminal Justice Academy
15 Oak Grove RD
Vassalboro, ME 04989
Jack Peck, Director
jack.d.peck@maine.gov

ARCHITECTS:
Simons Architects
75 York Street
Portland, ME 04101
207.772.4656
Ryan Kanteres, AIA
ryan@simonsarchitects.com
Pat Barendt, AIA
pat@simonsarchitects.com

STRUCT ENGINEERING, MEP/FP ENGINEERING:
Allied Engineering | a Salas O'Brien Company
160 Veranda St.
Portland, ME 04103
207.221.2260
Anthony Davis, P.E., LEED AP
anthony.davis@salasobrien.com
Kenneth Coley, P.E.
kenneth.coley@salasobrien.com
Geoff Chartier
jeff.chartier@salasobrien.com
James Fox, P.E.
james.fox@salasobrien.com

ARCHITECTUAL ABBREVIATIONS

AR AB ADDL ADJ ADMIN AFF ALUM ALT AP APROX APV ARCH	ABUSE RESISTANT ANCHOR BOLT ACOUSTICAL CEILING TILE ADJACENT ADMINISTRATION ABOVE FINISH FLOOR ALUMINUM ALTERNATE ACCESS PANEL APPROXIMATELY ASPHALT PAVEMENT ARCHITECT	E EA EF EJ EL ELEV ELEC EQ EWC EXAM EXIST EXT	EAST EACH EXHAUST FAN EXPANSION JOINT ELEVATION ELEVATOR ELECTRIC/ELECTRICAL ELECTRIC WATER COOLER EXAMINATION EXISTING EXTERIOR	JAN JC JT KIT LAV LCC LF LOT LIN	JANITOR JANITOR CLOSET JOINT KITCHEN LAVATORY LEAD COATED COPPER LINEAR FOOT LIGHT LINEN	QT QUART	
BD BF BIT BLDG BLKG BM BRG BTW	BOARD BOTTLE FILLER BITUMINOUS BUILDING BLOCKING BENCHMARK BEARING BETWEEN	FBO FCO FD FOP FE FEC FEC/GR FEC/FR FG FIN FL FOS FT FTG F.O.	FURNISHED BY OWNER FLOOR CLEAN OUT FLOOR DRAIN FIRE CONTROL PANEL FIRE EXTINGUISHER FIRE EXTINGUISHER CABINET FEC, SEMI RECESSED FEC, FULLY RECESSED FIBERGLASS FINISH FLOOR FACE OF STUD FOOT FOOTING FACE OF	MTRL MAS MAX MECH MED MFR MGR MH MIN MISC MO MOLD MR MTD MTG MTL	MATERIAL MASONRY MAXIMUM MECHANICAL MEDICAL MANUFACTURER MANAGER MANHOLE MINIMUM MISCELLANEOUS MASONRY OPENING MOLDING MOISTURE RESISTANT MOUNTED MOUNTING METAL	Q R RD REC RECT REF REQ REFR REIN RESIL REV RFG RM RND RO	QUART RADIUS/RISER/RANGE ROOF DRAIN RECREATION RECTANGLE REFERENCE REQUIRED REFRIGERATOR REINFORCE/REINFORCING RESILIENT REVISE/REVISION ROOFING ROOM ROUND ROUGH OPENING
CAB CB CEM CF CG CIRC CJ CL CLG CLO CMU CLR COL CONC CONST CONT COORD COOR CRS CT CTV CUH CY	CABINET CATCH BASIN CEMENT CUBIC FEET CORNER GUARD CIRCLE/CIRCULAR CONTROL JOINT CENTER LINE CEILING CLOSET CONCRETE MASONRY UNIT CLEAN OUT COLUMN CONCRETE CONSTRUCTION CONTINUE, CONTINUOUS CORRUGATED COORDINATED COURSE CERAMIC TILE CABLE TELEVISION LINE CABINET UNIT HEATER CUBIC YARD	GA GAL GALV GC GL GR GW GYP	GAUGE GALLON GALVANIZED GENERAL CONTRACTOR GLASS GRANITE GYPSUM WALL BOARD GYPSUM	N NATL NIC NL NO NTS	NORTH NATURAL NOT IN CONTRACT GLASS NIGHT LIGHT NUMBER NOT TO SCALE	S SAN SC SD SECT SF SHT SIM SPEC SPFI SQ STC STD	SOUTH/SINK SANITARY SOLID CORE STORM DRAIN SECTION SQUARE FOOT SHEET SIMILAR SPECIFICATION(S) SPRAY FOAM INSULATION SQUARE SOUND TRANSMISSION COEFFICIENT STANDARD STEEL STORAGE STAINLESS STEEL SUSPENDED
DBL DEFL DEMO DF DIA DIAG DIM DR DIV DN DNL DWG	DOUBLE DEFLECTION DEMOLITION DRINKING FOUNTAIN DIAMETER DIAGONAL DIMENSION DIRECTOR/DOOR DIVISION DOWN DETAIL DRAWING	HD HR HC HWR HFS HGT HMT HO HORZ HTG HVAC HW HYD INCL ID IN INSUL INT INV	HIGH DENSITY HOUR HOLLOW CORE HARDWARE HOLLOW SCALE HEIGHT HOLLOW METAL HOLD OPEN HORIZONTAL HEATING, VENTILATION & AIR CONDITIONING HOT WATER HYDRANT INCLUDE/INCLUDING INSIDE DIAMETER INCH INSULATE/INSULATION INTERIOR INVERT	OC OCFI OZ PNL PNT PART BD PC PERM PL PLAS PLAM PLYWD PNT POLY PREP PSF PSI PTD PVM	ON CENTER OWNER FURNISHED CONTRACTOR INSTALLED ONCE PANEL PAINT PART BD PARTICLE BOARD PIECE PERIMETER PLATE PLASTER PLASTIC LAMINATE PLYWOOD PAINT POLYURETHANE PREPARATION POUNDS / SQUARE FOOT POUNDS / SQUARE INCH PRESERVATIVE TREATED PAINTED PAVEMENT		

MATERIALS

	COURSE GRAVEL
	CONCRETE
	STONE
	EARTH/COMPACT FILL
	GYPSUM/PLASTER
	PLYWOOD
	FINISH WOOD
	ROUGH WOOD
	BLOCKING WOOD
	CONCRETE MASONRY
	BRICK MASONRY
	SAND/FINE GRAVEL
	DENSE PAK CELLULOSE INSULATION
	SPRAY FOAM INSULATION
	BATT INSULATION
	XPS INSULATION
	EPS INSULATION

ARCHITECTURAL SYMBOLS

FINISH MATERIAL	CL1	PROPOSED ELEVATION	TOP OF FIN. FLOOR EL. + X'-X"
CASEWORK TYPE	CW1	BUILDING SECTION	X A XXX
ROOM NUMBER	101	BUILDING ELEVATION	X A XXX
DOOR NUMBER	101A	WALL SECTION	X A XXX
WINDOW TYPE	NO	INTERIOR ELEVATION	N X A XXX E S
PARTITION TYPE	MM 01	COLUMN REFERENCE	X
REVISION REFERENCE	1	NEW DOOR	X A XXX
FIRE EXTINGUISHER, RECESSED CABINET	FEC		
FIRE EXTINGUISHER SURFACE MOUNT	FE		
DETAIL			

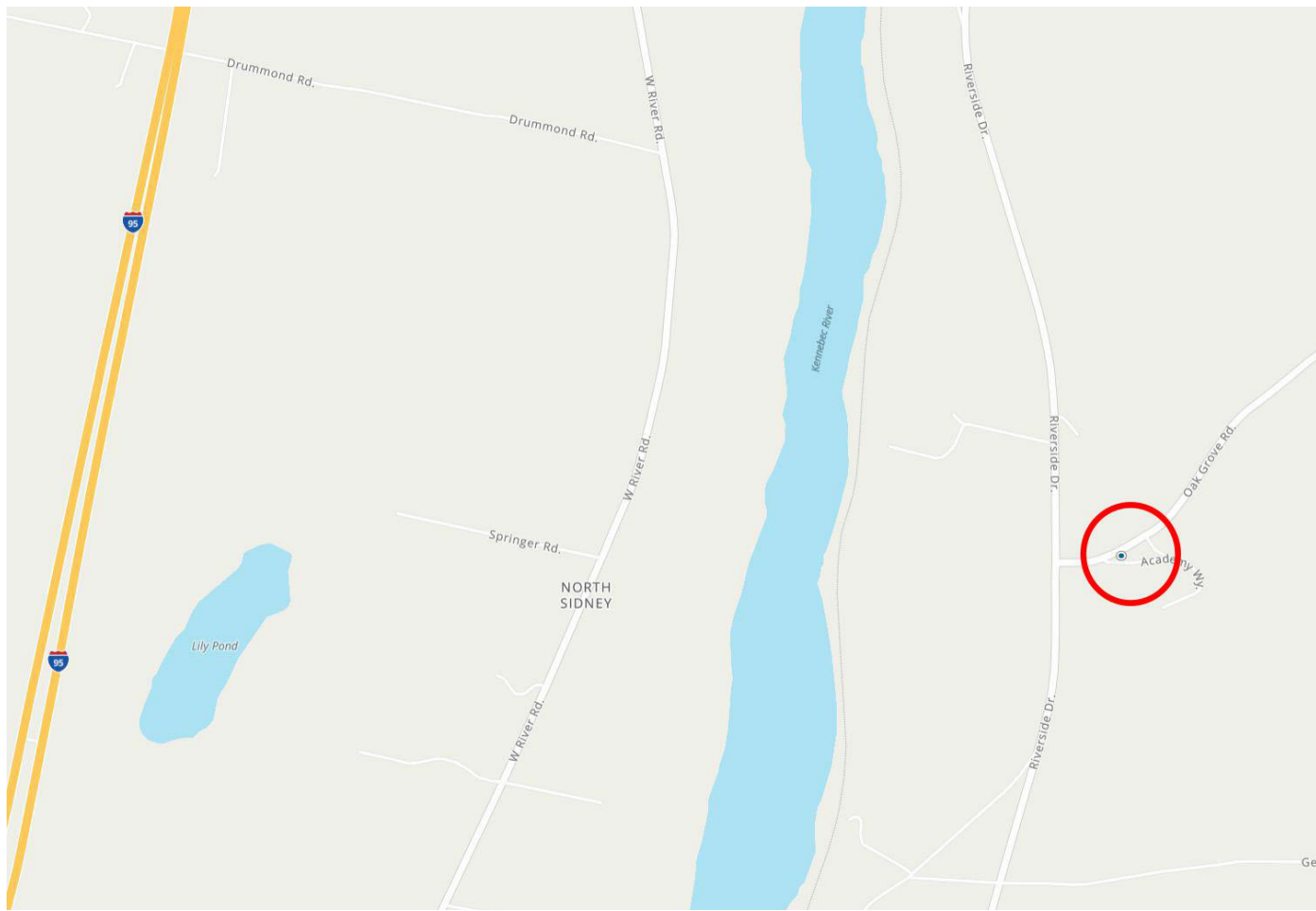
PROJECT SUMMARY

RENOVATION OF FLOORS 2, 3, AND 4 AT MCJA BUILDING C.

EXISTING DORMITORY SPACES ON FLOOR 3 WILL RECEIVE NEW MECHANICAL SYSTEMS AND REFRESHED FINISHES; SPATIAL RELATIONSHIPS WILL REMAIN AS EXISTING.

EXISTING DORMITORY SPACES ON FLOORS 3 AND 4 WILL BE RECONFIGURED WITH NEW WALLS, NEW RESTROOMS, AND NEW MEP SYSTEMS.

TOTAL PROJECT AREA EXCLUSIVE OF EXTERIOR WALLS IS 11,095 GSF.



DRAWING LIST

ISSUED IN SET INCORPORATED WITHOUT CHANGES X REMOVED FROM SET

SHEET NO.	SHEET NAME	2025.04.08 - ISS. FOR BID	2025.04.30 - ADDENDUM 1	2025.05.06 - ADDENDUM 2	2025.05.13 - ADDENDUM 4
G001	COVER SHEET				
G002	LIFE SAFETY PLANS				
G003	CODE SUMMARY				
G004	PARTITION TYPES & TYP. DETAILS				
G005	FIRE DETAILS				
G006	ACCESSIBILITY REQUIREMENTS				

AD102	SECOND FLOOR DEMO PLAN				
AD103	THIRD FLOOR DEMO PLAN				
AD104	FOURTH FLOOR DEMO PLAN				
AD105	ROOF DEMO PLAN				

A102	BUILDING C - SECOND FLOOR PLAN				
A103	BUILDING C - THIRD FLOOR PLAN				
A104	BUILDING C - FOURTH FLOOR PLAN				
A105	BUILDING C - ROOF PLAN				
A111	ENLARGED BATH PLANS & ELEVATIONS				
A112	INTERIOR ELEVATIONS - DORMS				
A113	INTERIOR ELEVATIONS - CORRIDORS				
A122	SECOND FLOOR FINISH PLAN				
A123	THIRD FLOOR FINISH PLAN				
A124	FOURTH FLOOR FINISH PLAN				
A125	RESTROOM TILE LAYOUT DETAILS				
A126	FINISHES BOARD				
A132	SECOND FLOOR RCP				
A133	THIRD FLOOR RCP				
A134	FOURTH FLOOR RCP				
A143	THIRD FLOOR FURNITURE PLAN				
A144	FOURTH FLOOR FURNITURE PLAN				
A301	BUILDING SECTIONS				
A302	BUILDING SECTIONS				
A303	BUILDING SECTIONS				
A400	DEDUCT ALT 1				
A401	PLAN DETAILS				
A411	VERTICAL DETAILS				
A421	MILLWORK DETAILS				
A422	TILE & TRANSITION DETAILS				
A601	DOOR SCHEDULES				
A602	DOOR DETAILS				
A603	SIGNAGE SCHEDULE				
A604	EXISTING WINDOWS FOR ROLLER SHADES				

S000	STRUCTURAL GENERAL INFORMATION				
S001	STRUCTURAL SPECIAL INSPECTIONS				
S102	EXISTING SECOND FLOOR PLAN				
S103	EXISTING THIRD FLOOR PLAN				
S104	EXISTING FOURTH FLOOR PLAN				
S105	EXISTING ROOF PLAN				
S110	STRUCTURAL FRAMING PART PLANS				
S500	STRUCTURAL DETAILS				

P000	PLUMBING AND HVAC NOTES, LEGEND, AND ABBREVIATIONS				
PD102	PLUMBING DRAINAGE DEMOLITION PLAN - SECOND FLOOR				
PD103	PLUMBING DRAINAGE DEMOLITION PLAN - THIRD FLOOR				
PD104	PLUMBING DRAINAGE DEMOLITION PLAN - FOURTH FLOOR				
PD201	PLUMBING SUPPLY DEMOLITION PART PLANS				
PD202	PLUMBING SUPPLY DEMOLITION PLAN - SECOND FLOOR				
PD203	PLUMBING SUPPLY DEMOLITION PLAN - THIRD FLOOR				

SHEET NO.	SHEET NAME	2025.04.08 - ISS. FOR BID	2025.04.30 - ADDENDUM 1	2025.05.06 - ADDENDUM 2	2025.05.13 - ADDENDUM 4
P101	PLUMBING DRAINAGE PART PLANS				
P102	PLUMBING DRAINAGE PLAN - SECOND FLOOR				
P103	PLUMBING DRAINAGE PLAN - THIRD FLOOR				
P104	PLUMBING DRAINAGE PLAN - FOURTH FLOOR				
P202	PLUMBING SUPPLY PLAN - SECOND FLOOR				
P203	PLUMBING SUPPLY PLAN - THIRD FLOOR				
P204	PLUMBING SUPPLY PLAN - FOURTH FLOOR				

MD101	MECHANICAL DEMOLITION PART PLANS				
MD102	MECHANICAL DEMOLITION PLAN - SECOND FLOOR				
MD103	MECHANICAL DEMOLITION PLAN - THIRD FLOOR				
MD104	MECHANICAL DEMOLITION PLAN - FOURTH FLOOR				
MD105	MECHANICAL DEMOLITION PLAN - ROOF LEVEL				
MD202	MECHANICAL PIPING DEMOLITION PLAN - SECOND FLOOR				
MD203	MECHANICAL PIPING DEMOLITION PLAN - THIRD FLOOR				
MD204	MECHANICAL PIPING DEMOLITION PLAN - FOURTH FLOOR				
MH101	MECHANICAL PART PLANS				
MH102	MECHANICAL PLAN - SECOND FLOOR				
MH103	MECHANICAL PLAN - THIRD FLOOR				
MH104	MECHANICAL PLAN - FOURTH FLOOR				
MH105	MECHANICAL PLAN - ROOF LEVEL				
MP102	MECHANICAL PIPING PLAN - SECOND FLOOR				
MP103	MECHANICAL PIPING PLAN - THIRD FLOOR				
MP104	MECHANICAL PIPING PLAN - FOURTH FLOOR				
M500	MECHANICAL DIAGRAMS				
M501	MECHANICAL DIAGRAM				
M600	MECHANICAL SCHEDULES				

E000	ELECTRICAL LEGEND AND ABBREVIATIONS				
E001	ELECTRICAL NOTES				
EL102	LIGHTING PLAN - SECOND FLOOR				
EL103	LIGHTING PLAN - THIRD FLOOR				
EL104	LIGHTING PLAN - FOURTH FLOOR				
EL600	LIGHTING SCHEDULE AND DETAILS				
EP100	POWER & SYSTEMS PLAN - BASEMENT				
EP102	POWER & SYSTEMS PLAN - SECOND FLOOR				
EP103	POWER & SYSTEMS PLAN - THIRD FLOOR				
EP104	POWER & SYSTEMS PLAN - FOURTH FLOOR				
EP105	POWER & SYSTEMS PLAN - ROOF				
E400	ELECTRICAL ENLARGED PLANS				
E500	ONLINE DIAGRAMS AND NOTES				
E501	ELECTRICAL DETAILS				
E600	ELECTRICAL SCHEDULES				
E601	PANEL SCHEDULES				

ALTERNATES

DEDUCT ALTERNATE 1

DELETE TYPE W6 WALLS FROM PROJECT.
PARTIAL LIST OF ASSOCIATED WORK:
- EXISTING EXTERIOR WALLS TO REMAIN AND BE REPAINTED ON INTERIOR SIDE.
- DELETE NEW WINDOW SILLS; REFINISH EXISTING WOOD WINDOW SILLS.
- REDUCE WORK AT WINDOW JAMBS AND HEADS.
- DELETE CEILING SOFFIT AT EXTERIOR WALLS ON FLOOR 3.
- DELETE ADJUSTMENT TO RADIATOR PIPING AT EXTERIOR WALLS ON FLOORS 3 AND 4.
- RETAIN EXISTING WIREMOLD AT EXTERIOR WALLS, RECONFIGURE OUTLETS.
REFER TO ARCHITECTURAL, MECHANICAL, PLUMBING, AND ELECTRICAL DRAWINGS FOR ADDITIONAL INFORMATION.

DEDUCT ALTERNATE 2

DELETE HEAT PUMPS AND CORRESPONDING OUTDOOR UNITS FROM FLOOR 2 SPACES ONLY. VENTILATION AIR TO REMAIN AS DOCUMENTED.

simons architects
designed for human potential

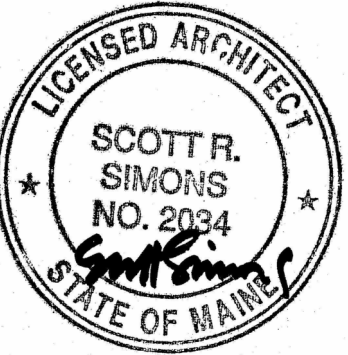
75 York Street
Portland, Maine 04101
simonsarchitects.com
207.772.4656

PROJECT NAME:

MCJA - BUILDING C LIMITED RENOVATIONS

15 OAK GROVE RD
VASSALBORO, ME 04989

SEAL:



THIS DRAWING IS THE PROPERTY OF SIMONS ARCHITECTS (SA) AND IS NOT TO BE COPIED OR REPRODUCED IN PART OR WHOLE.
2024 © SIMONS ARCHITECTS, LLC

REVISIONS

1	ADDENDUM 1	04.30.25
2	ADDENDUM 2	05.06.25
3	ADDENDUM 4	05.13.25

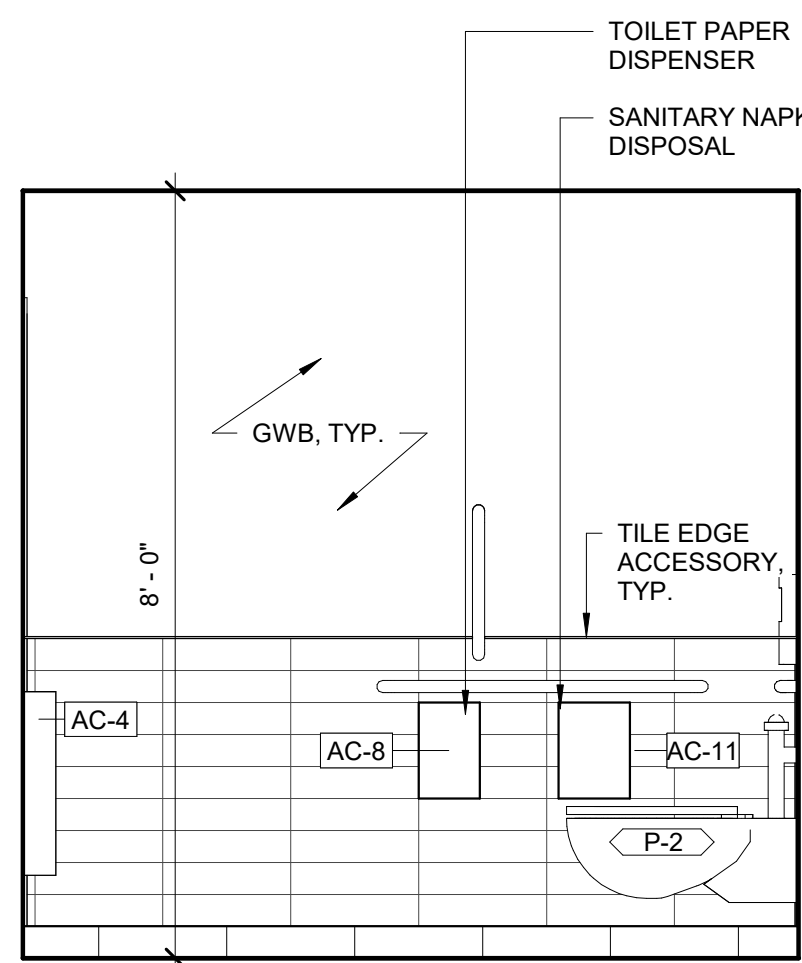
DATE OF ISSUE: APR 16, 2025

PROJECT NUMBER: 2023-0070

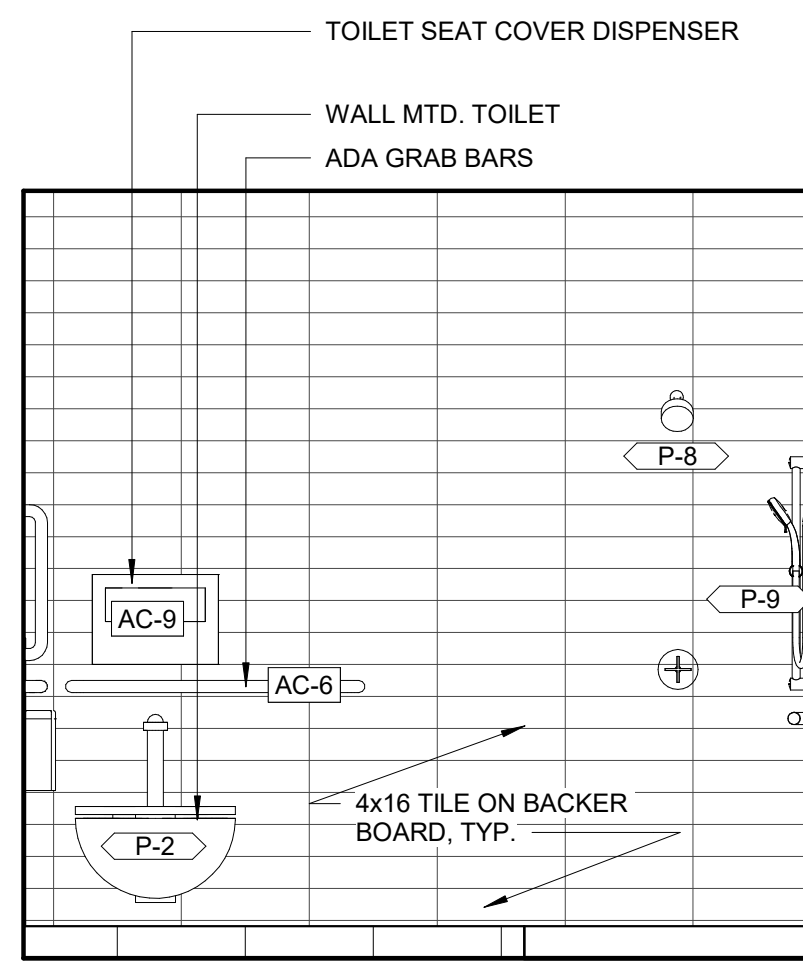
STATUS: PERMIT SET

COVER SHEET

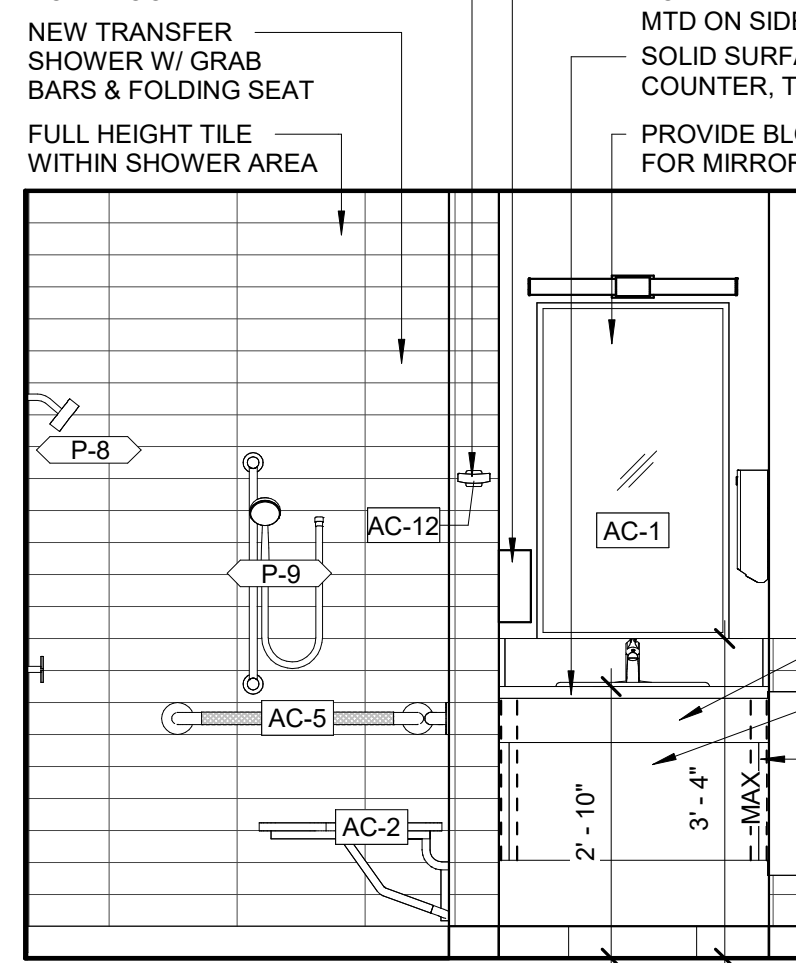
G001



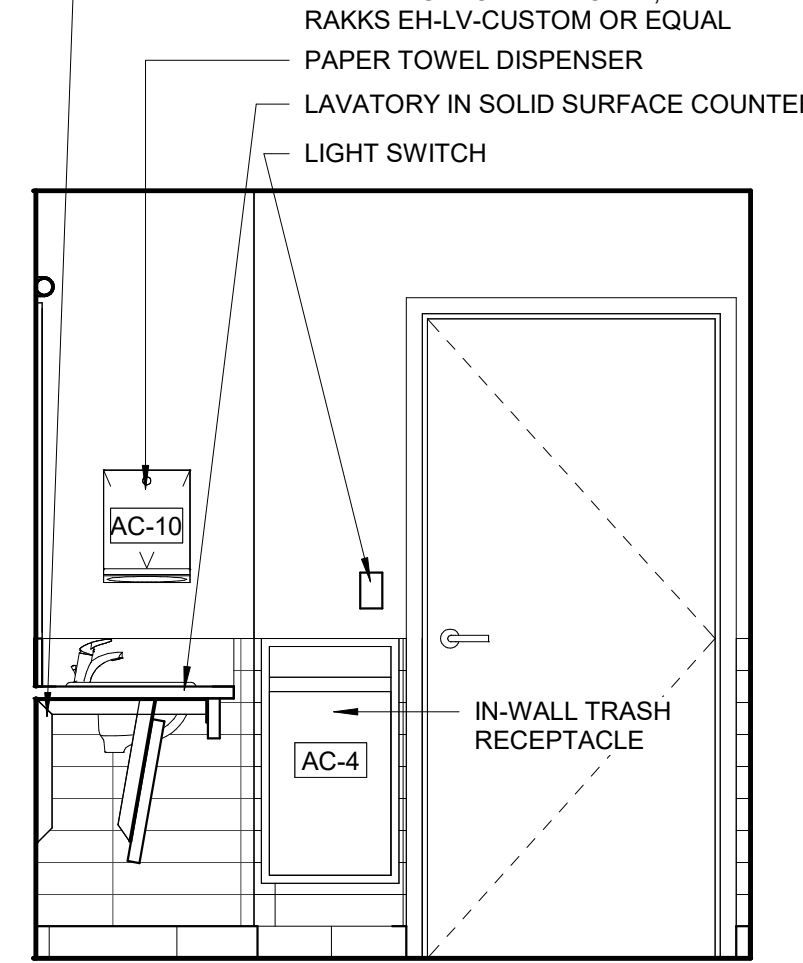
2 SINGLE USER RESTROOM ELEVATION 1
1/2" = 1'-0"



3 SINGLE USER RESTROOM ELEVATION 2
1/2" = 1'-0"



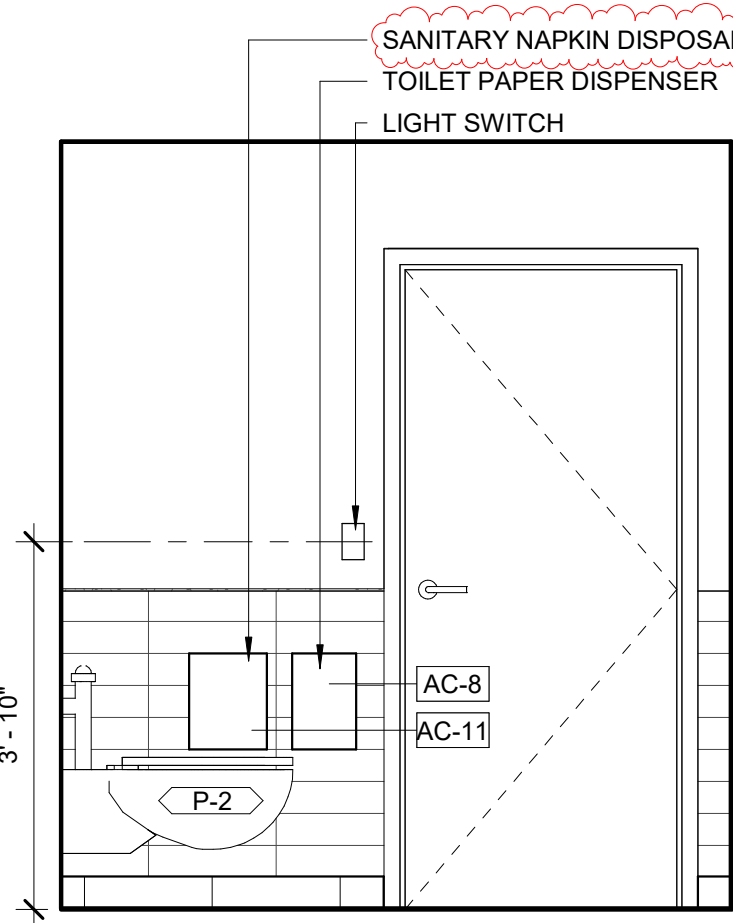
4 SINGLE USER RESTROOM ELEVATION 3
1/2" = 1'-0"



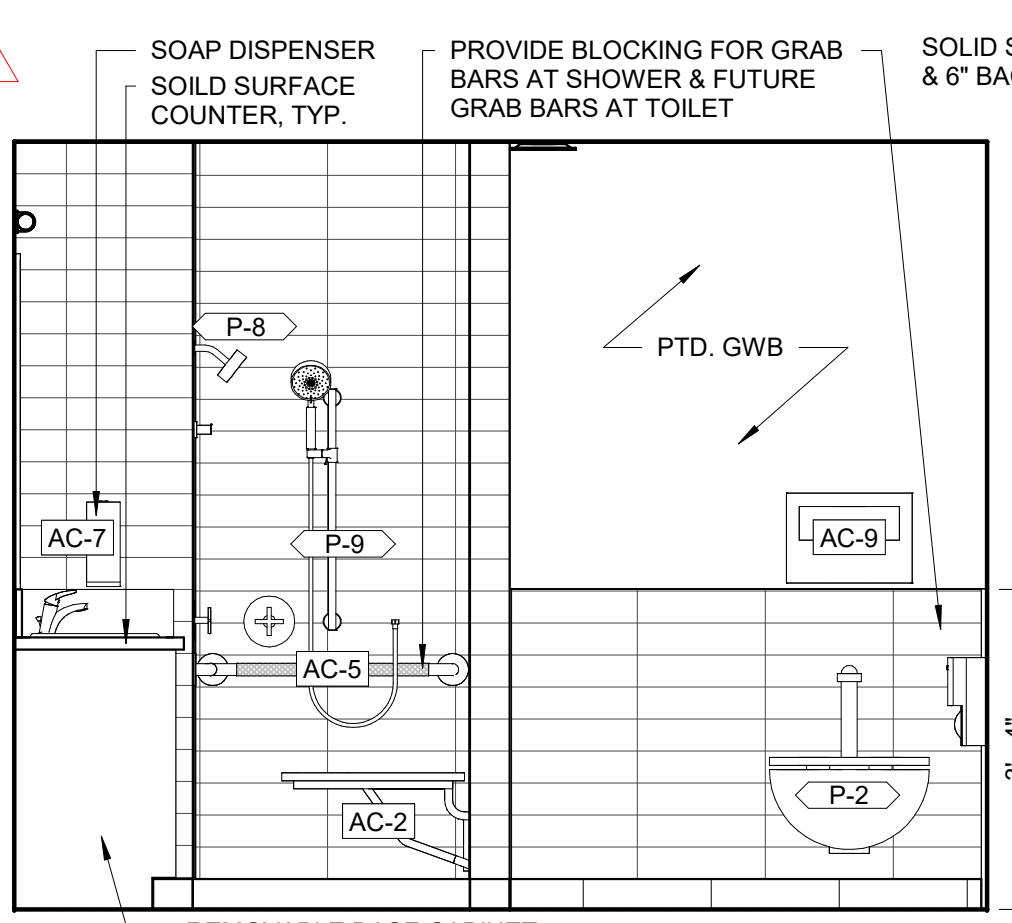
5 SINGLE USER RESTROOM ELEVATION 4
1/2" = 1'-0"

ACCESSORIES SCHEDULE	
Type Mark	Description
AC-1	24x42 MIRROR
AC-2	ADA SHOWER SEAT
AC-3	24x72 MIRROR
AC-4	RECESSED TRASH RECEPTACLE
AC-5	ADA SHOWER GRAB BARS
AC-6	ADA TOILET GRAB BARS
AC-7	WALL MTD. SOAP DISPENSER
AC-8	TOILET TISSUE DISPENSER
AC-9	SEAT COVER DISPENSER
AC-10	PAPER TOWEL DISPENSER
AC-11	SANITARY NAPKIN DISPOSAL
AC-12	ROBE HOOK

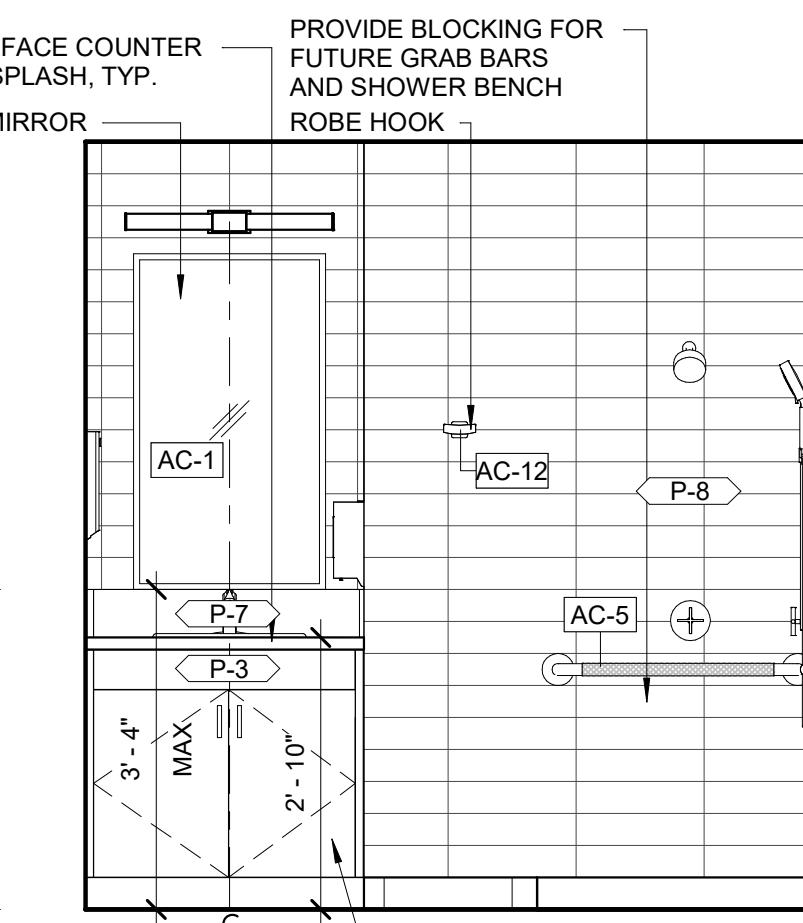
PLUMBING FIXTURE SCHEDULE	
Type Mark	Fixture
P-1	SHOWER PAN
P-2	WATER CLOSET
P-3	SINK
P-4	TRANSFER SHOWER PAN
P-5	ADA TRANSFER SHOWER PAN
P-6	BOTTLE FILLING STATION
P-7	SINK FAUCET
P-8	SHOWER HEAD
P-9	HAND SHOWER ON BAR



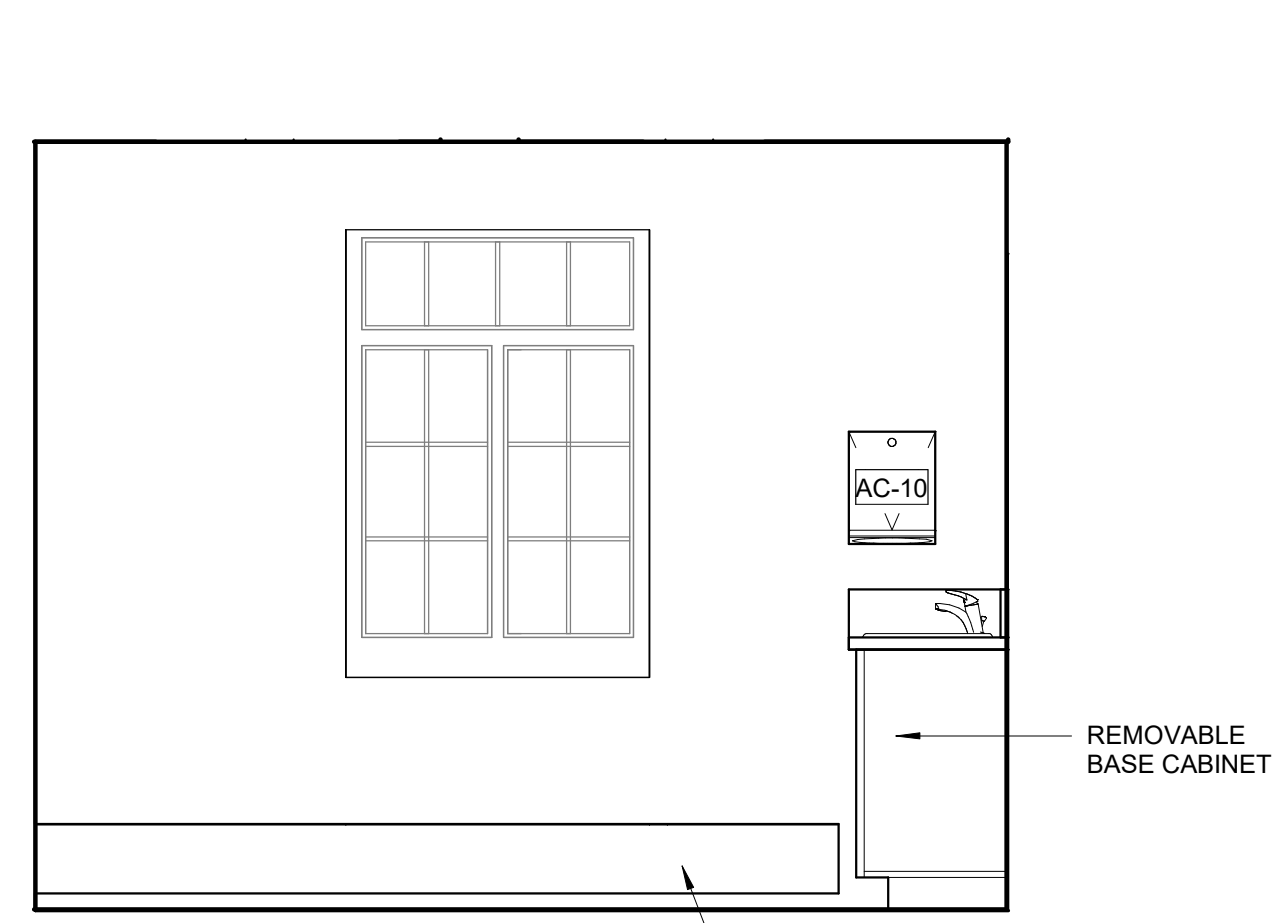
6 CADRE RESTROOM ELEVATION 1
1/2" = 1'-0"



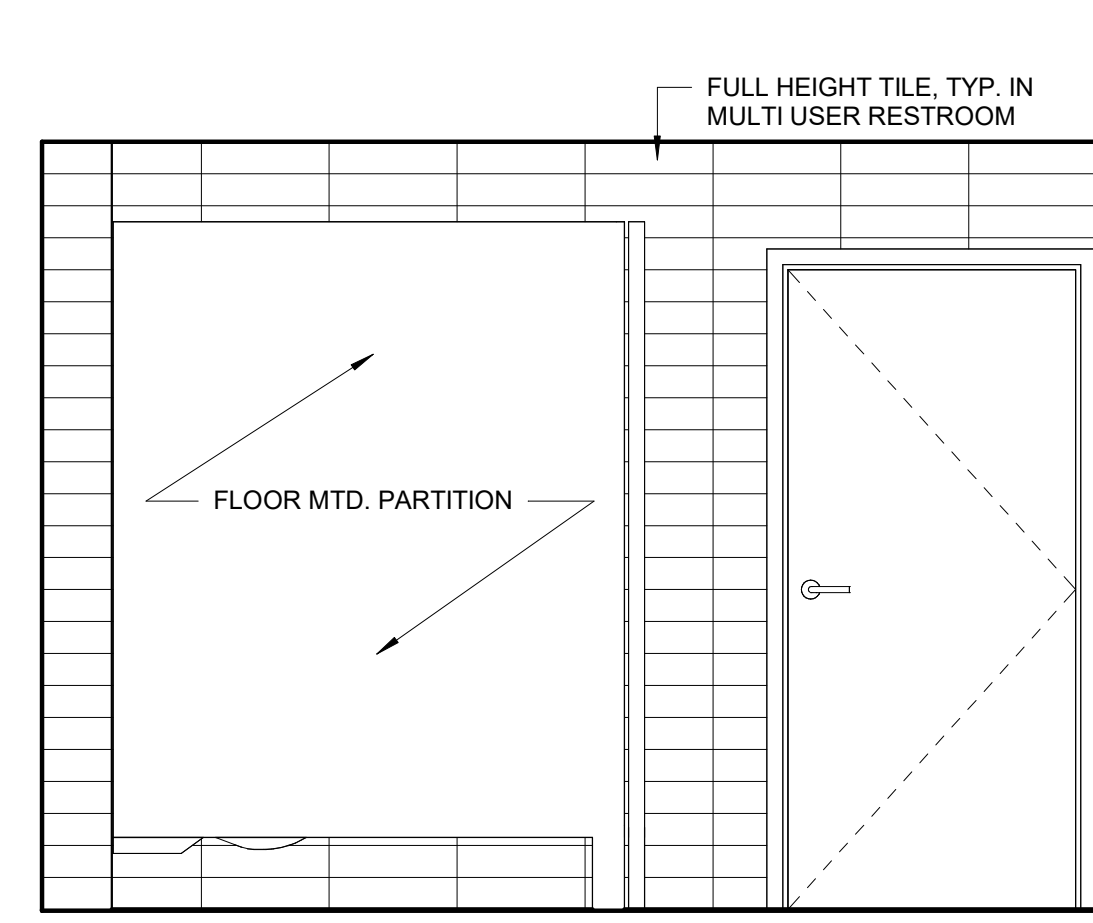
7 CADRE RESTROOM ELEVATION 2
1/2" = 1'-0"



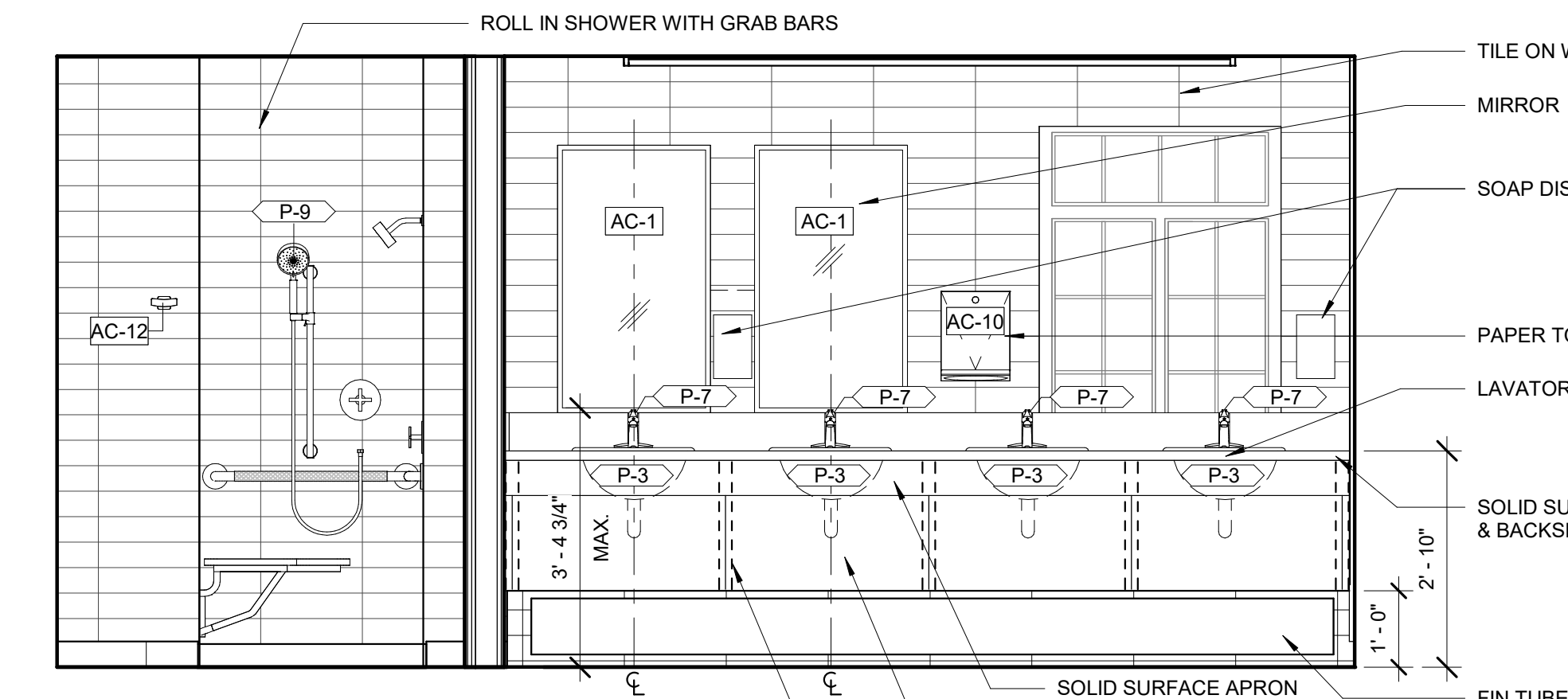
8 CADRE RESTROOM ELEVATION 3
1/2" = 1'-0"



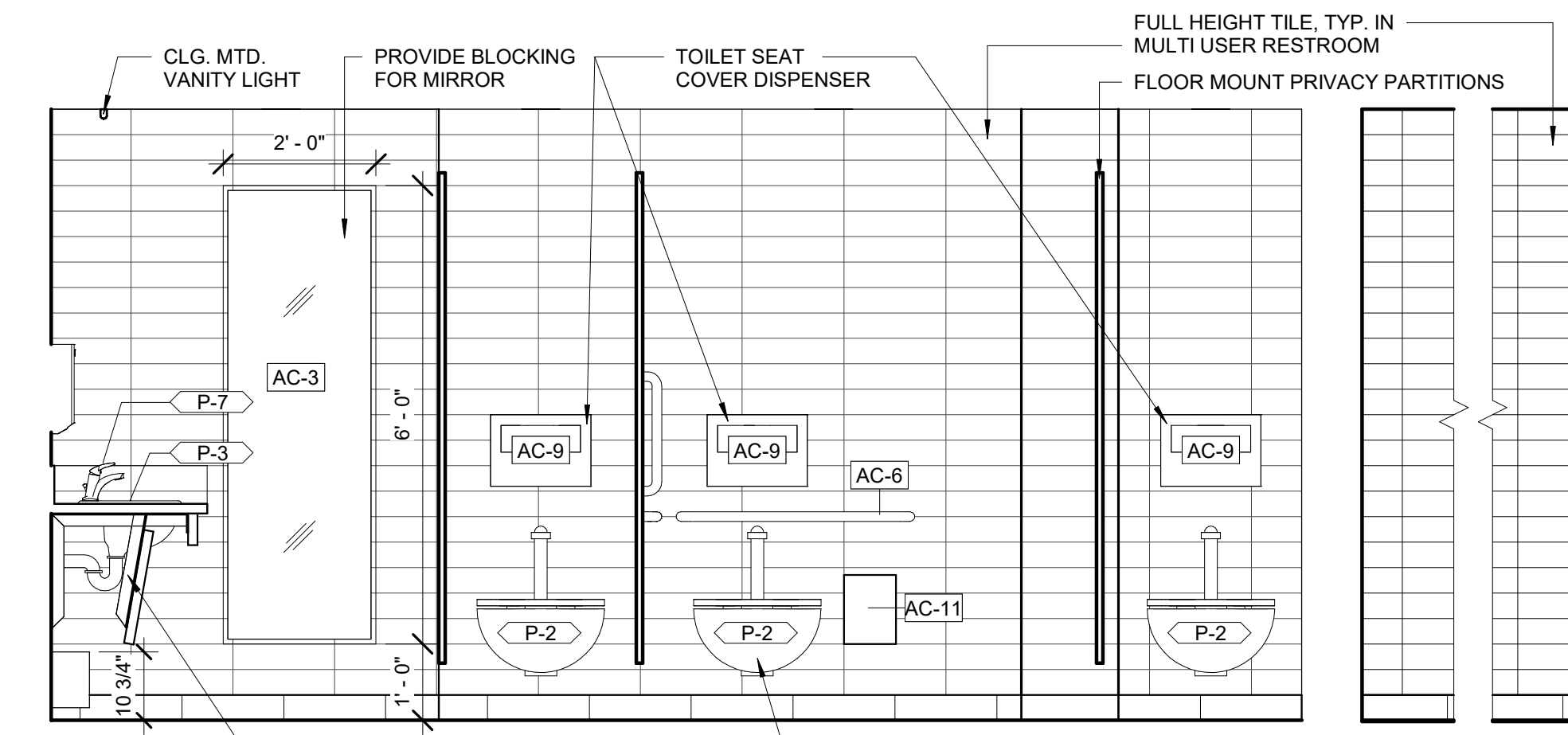
9 CADRE RESTROOM ELEVATION 4
1/2" = 1'-0"



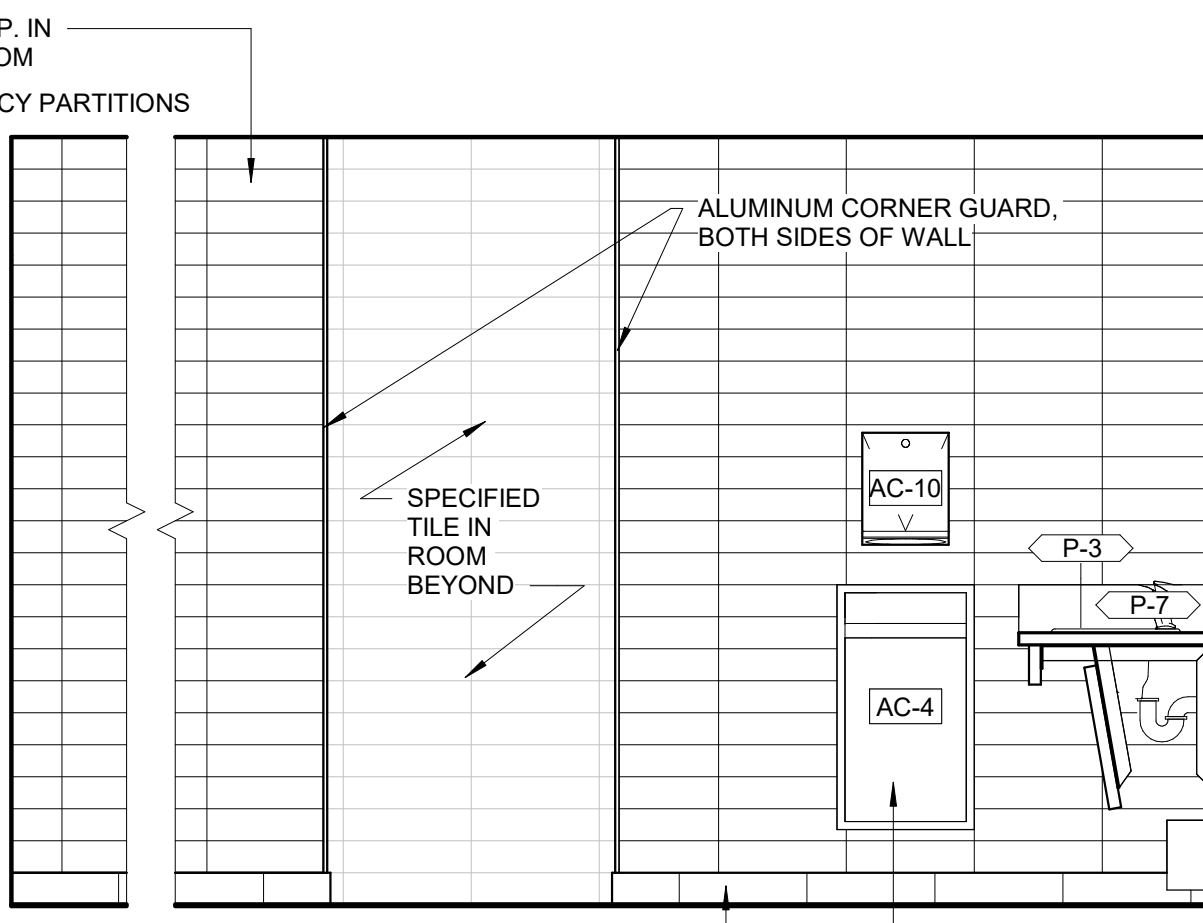
13 MULTI USER RESTROOM ELEVATION 4
1/2" = 1'-0"



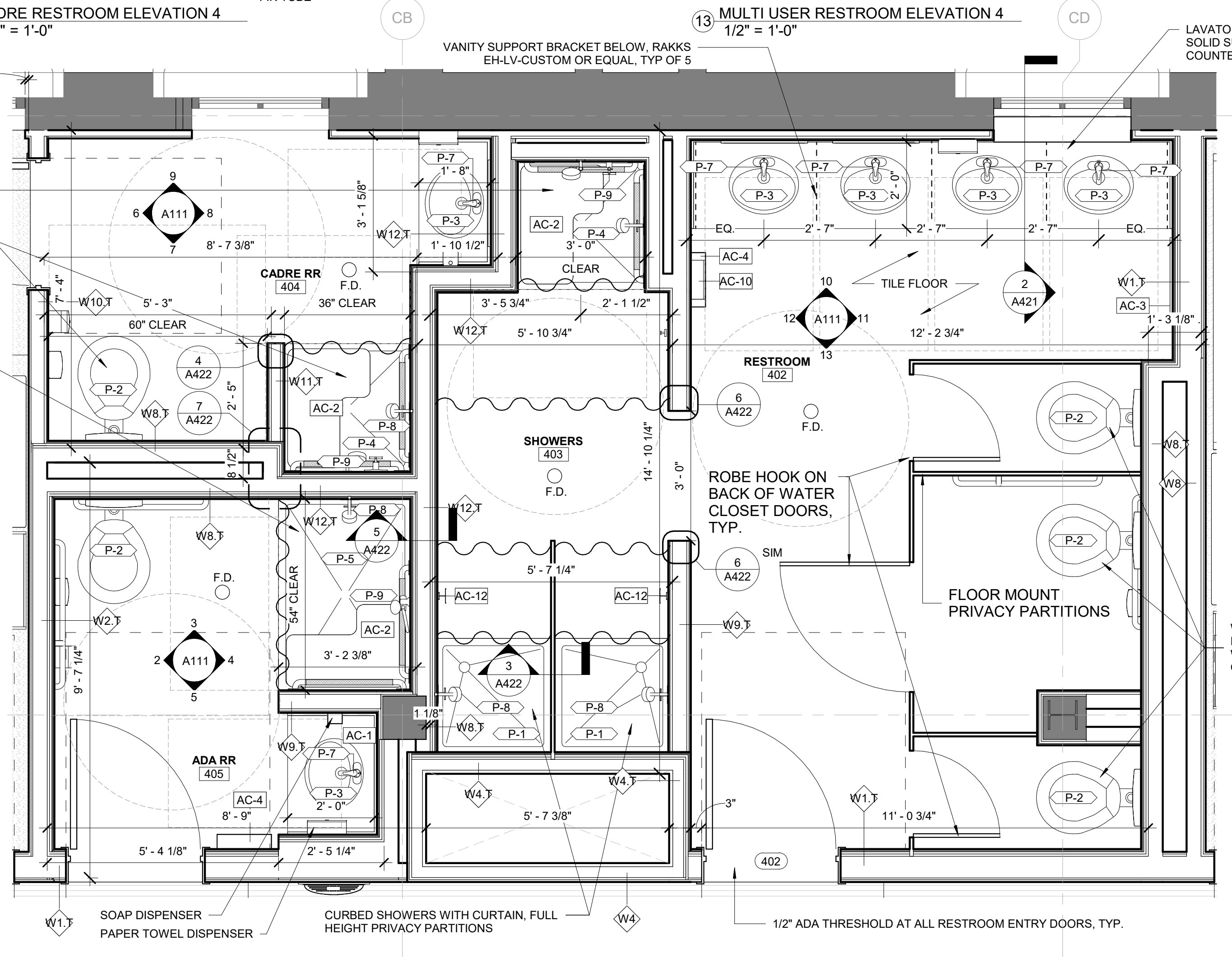
10 MULTI USER RESTROOM ELEVATION 2
1/2" = 1'-0"



11 MULTI USER RESTROOM ELEVATION 1
1/2" = 1'-0"



12 MULTI USER RESTROOM ELEVATION 3
1/2" = 1'-0"



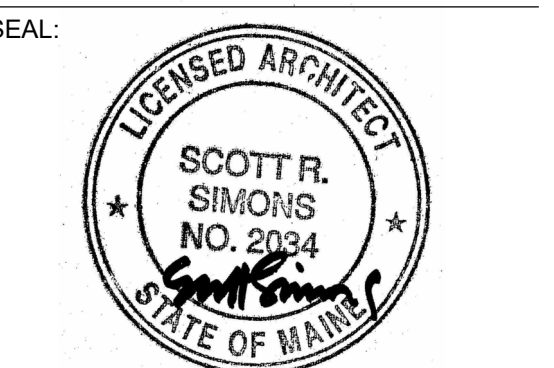
1 ENLARGED BATHROOM PLANS
1/2" = 1'-0"



75 York Street
Portland, Maine 04101
simonsarchitects.com
207.772.4656

MCJA - BUILDING C LIMITED RENOVATIONS

15 OAK GROVE RD
VASSALBORO, ME 04989



THIS DRAWING IS THE PROPERTY OF
SIMONS ARCHITECTS (SA) AND IS NOT TO
BE COPIED OR REPRODUCED IN PART OR
WHOLE.
2024 © SIMONS ARCHITECTS, LLC

REVISIONS		
3	ADDENDUM 4	05.13.25

DATE OF ISSUE: APR 16, 2025
PROJECT NUMBER: 2023-0070
STATUS: PERMIT SET

ENLARGED BATH PLANS & ELEVATIONS

A111



75 York Street
Portland, Maine 04101
simonsarchitects.com
207.772.4656



160 Veranda Street
Portland, Maine 04103
P: 207.221.2260
F: 207.221.2266

© COPYRIGHT 2025 ALLIED ENGINEERING, INC.
Allied Project No: 23030
Cad File:

PROJECT NAME:
**MCJA - BUILDING
C LIMITED
RENOVATIONS**
15 OAK GROVE RD
VASSALBORO, ME 04989



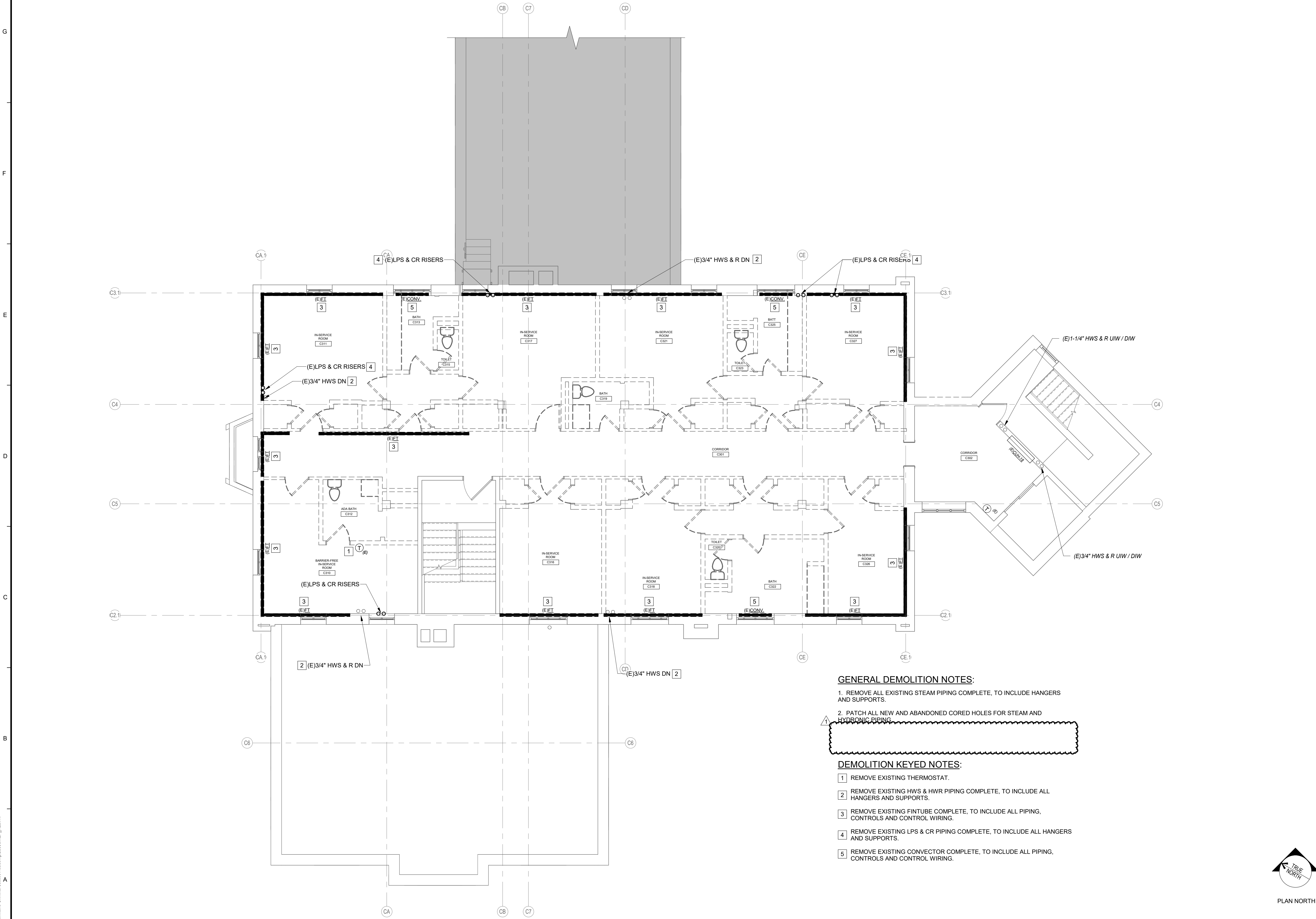
THIS DRAWING IS THE PROPERTY OF
SIMONS ARCHITECTS (SA) AND IS NOT
TO BE COPIED OR REPRODUCED IN
PART OR WHOLE.
2023 © SCOTT SIMONS ARCHITECTS, LLC

△ REVISIONS	
1 Addendum No.4	25-05-13

DATE OF ISSUE: APRIL 16, 2025
PROJECT NUMBER: 2023-0070
STATUS: PERMIT SET

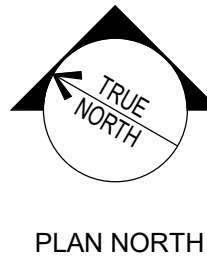
**MECHANICAL
PIPING
DEMOLITION PLAN -
THIRD FLOOR**

MD-203

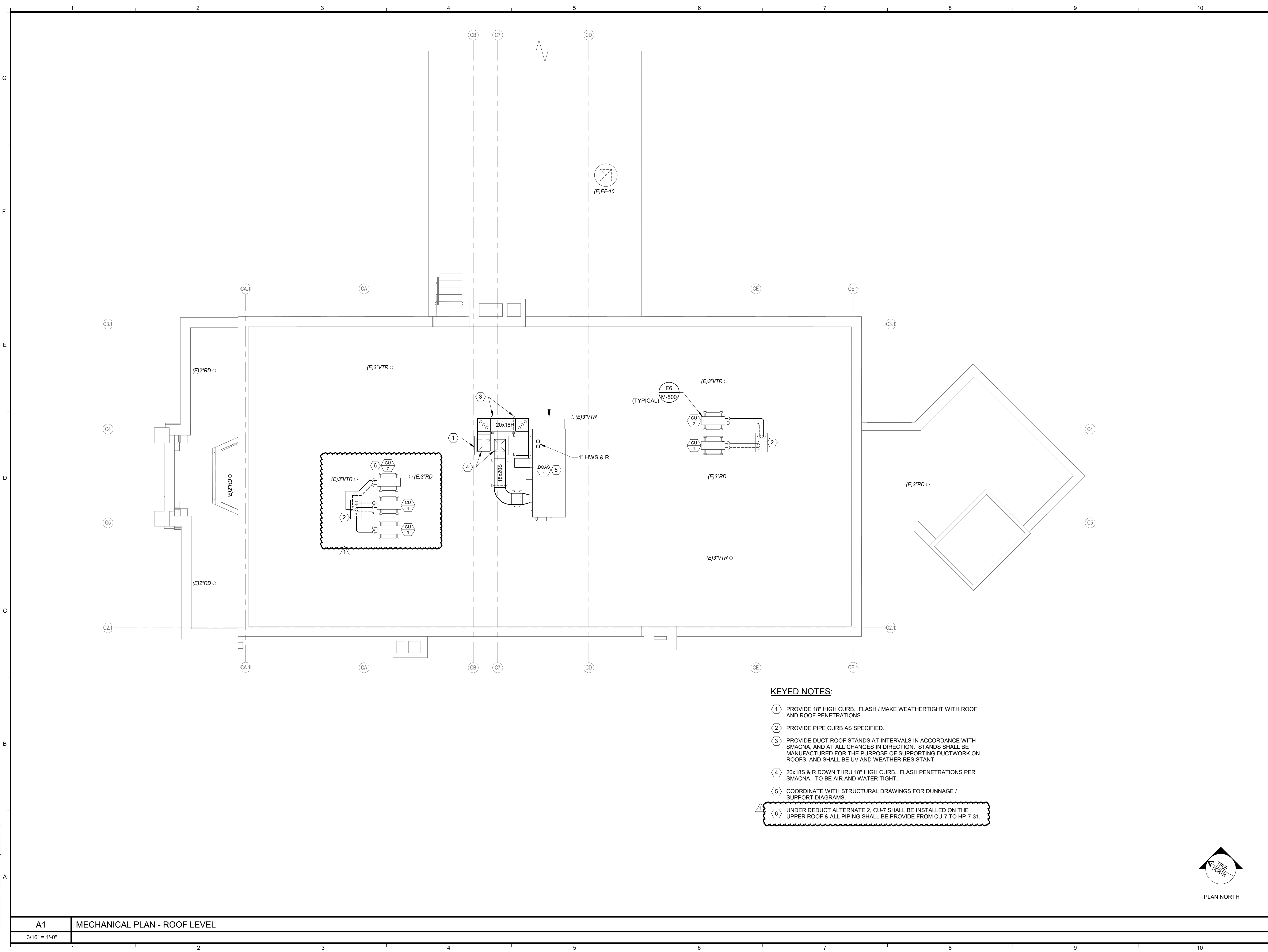


GENERAL DEMOLITION NOTES:
1. REMOVE ALL EXISTING STEAM PIPING COMPLETE, TO INCLUDE HANGERS AND SUPPORTS.
2. PATCH ALL NEW AND ABANDONED CORED HOLES FOR STEAM AND HYDRONIC PIPING.

- DEMOLITION KEYED NOTES:**
- 1 REMOVE EXISTING THERMOSTAT.
 - 2 REMOVE EXISTING HWS & HWR PIPING COMPLETE, TO INCLUDE ALL HANGERS AND SUPPORTS.
 - 3 REMOVE EXISTING FIN TUBE COMPLETE, TO INCLUDE ALL PIPING, CONTROLS AND CONTROL WIRING.
 - 4 REMOVE EXISTING LPS & CR PIPING COMPLETE, TO INCLUDE ALL HANGERS AND SUPPORTS.
 - 5 REMOVE EXISTING CONVECTOR COMPLETE, TO INCLUDE ALL PIPING, CONTROLS AND CONTROL WIRING.



Audodesk Docs\\Maine Criminal Justice Academy\\2303\\MEP_1023.rvt



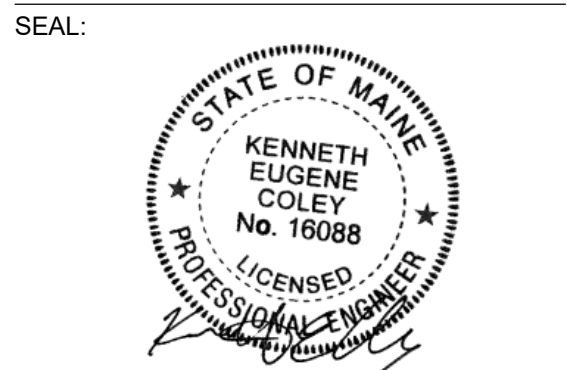
75 York Street
Portland, Maine 04101
simonsarchitects.com
207.772.4656



160 Veranda Street
Portland, Maine 04103
P: 207.221.2260
F: 207.221.2266

© COPYRIGHT 2025 ALLIED ENGINEERING, INC.
Allied Project No: 23030
Cad File:

PROJECT NAME:
**MCJA - BUILDING
C LIMITED
RENOVATIONS**
15 OAK GROVE RD
VASSALBORO, ME 04989



THIS DRAWING IS THE PROPERTY OF
SIMONS ARCHITECTS (SA) AND IS NOT
TO BE COPIED OR REPRODUCED IN
PART OR WHOLE.
2023 © SCOTT SIMONS ARCHITECTS, LLC

REVISIONS		
1	Addendum No.4	25-05-13

DATE OF ISSUE: APRIL 16, 2025
PROJECT NUMBER: 2023-0070
STATUS: PERMIT SET

**MECHANICAL PLAN
- ROOF LEVEL**

MH-105

Audodesk Docs\\Maine Criminal Justice Academy\\23030MEP - J23.rvt

simons architects
designed for human potential

75 York Street
Portland, Maine 04101
simonsarchitects.com
207.772.4656

Allied Engineering
A Salas O'Brien Company

160 Veranda Street
Portland, Maine 04103
P: 207.221.2260
F: 207.221.2266

© COPYRIGHT 2025 ALLIED ENGINEERING, INC.
Allied Project No: 23030
Cad File:

PROJECT NAME:

MCJA - BUILDING
C LIMITED
RENOVATIONS

15 OAK GROVE RD
VASSALBORO, ME 04989

SEAL:



THIS DRAWING IS THE PROPERTY OF
SIMONS ARCHITECTS (SA) AND IS NOT
TO BE COPIED OR REPRODUCED IN
PART OR WHOLE.
2023 © SCOTT SIMONS ARCHITECTS, LLC

△ REVISIONS

1 Addendum No.4 25-05-13

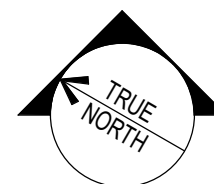
DATE OF ISSUE: APRIL 16, 2025

PROJECT NUMBER: 2023-0070

STATUS: PERMIT SET

MECHANICAL
PIPING PLAN -
SECOND FLOOR

MP-102



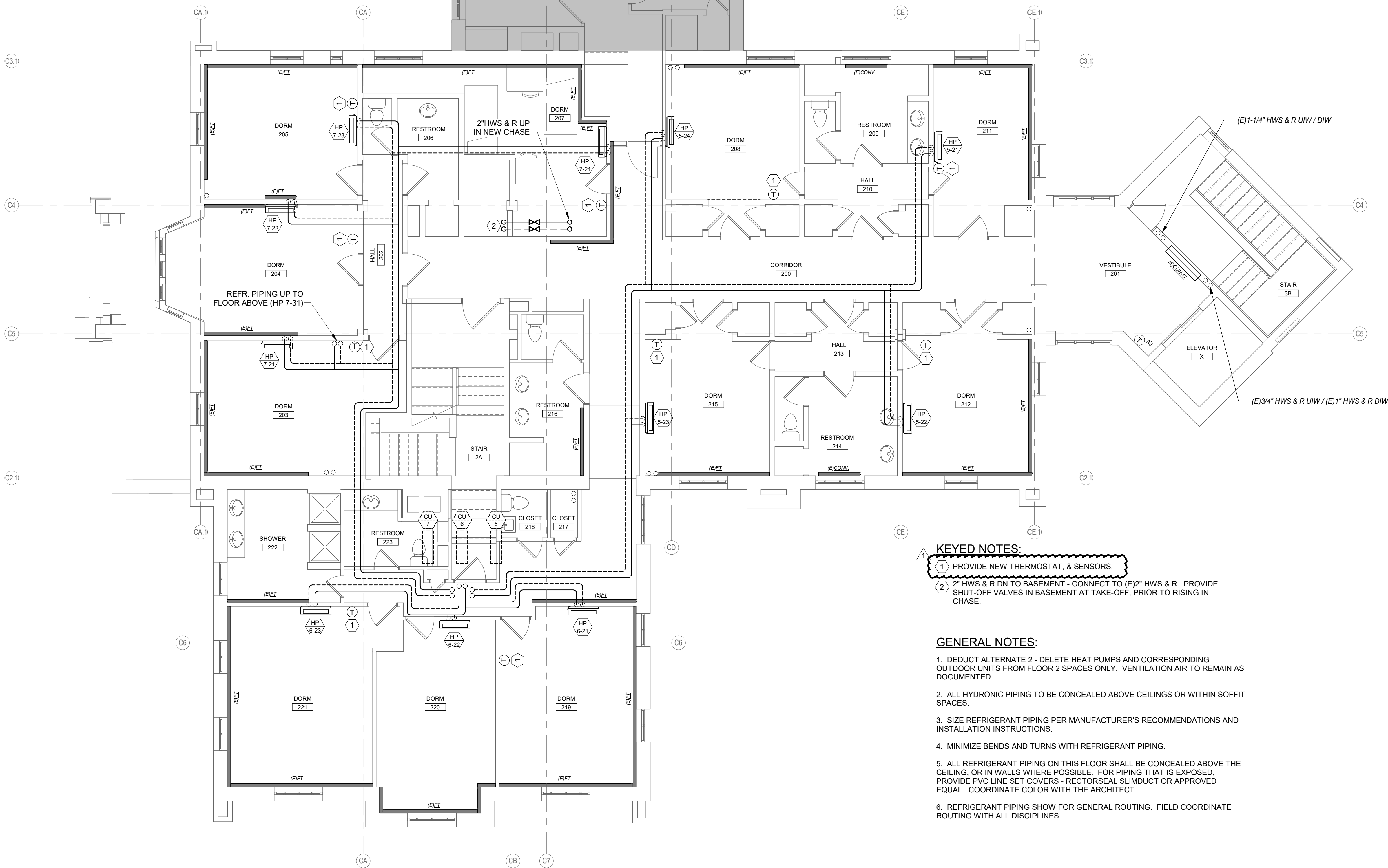
PLAN NORTH

KEYED NOTES:

- 1 PROVIDE NEW THERMOSTAT, & SENSORS.
- 2 2" HWS & R DN TO BASEMENT - CONNECT TO (E)2" HWS & R. PROVIDE SHUT-OFF VALVES IN BASEMENT AT TAKE-OFF, PRIOR TO RISING IN CHASE.

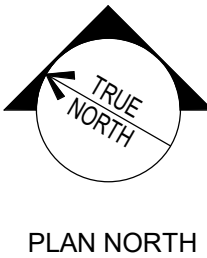
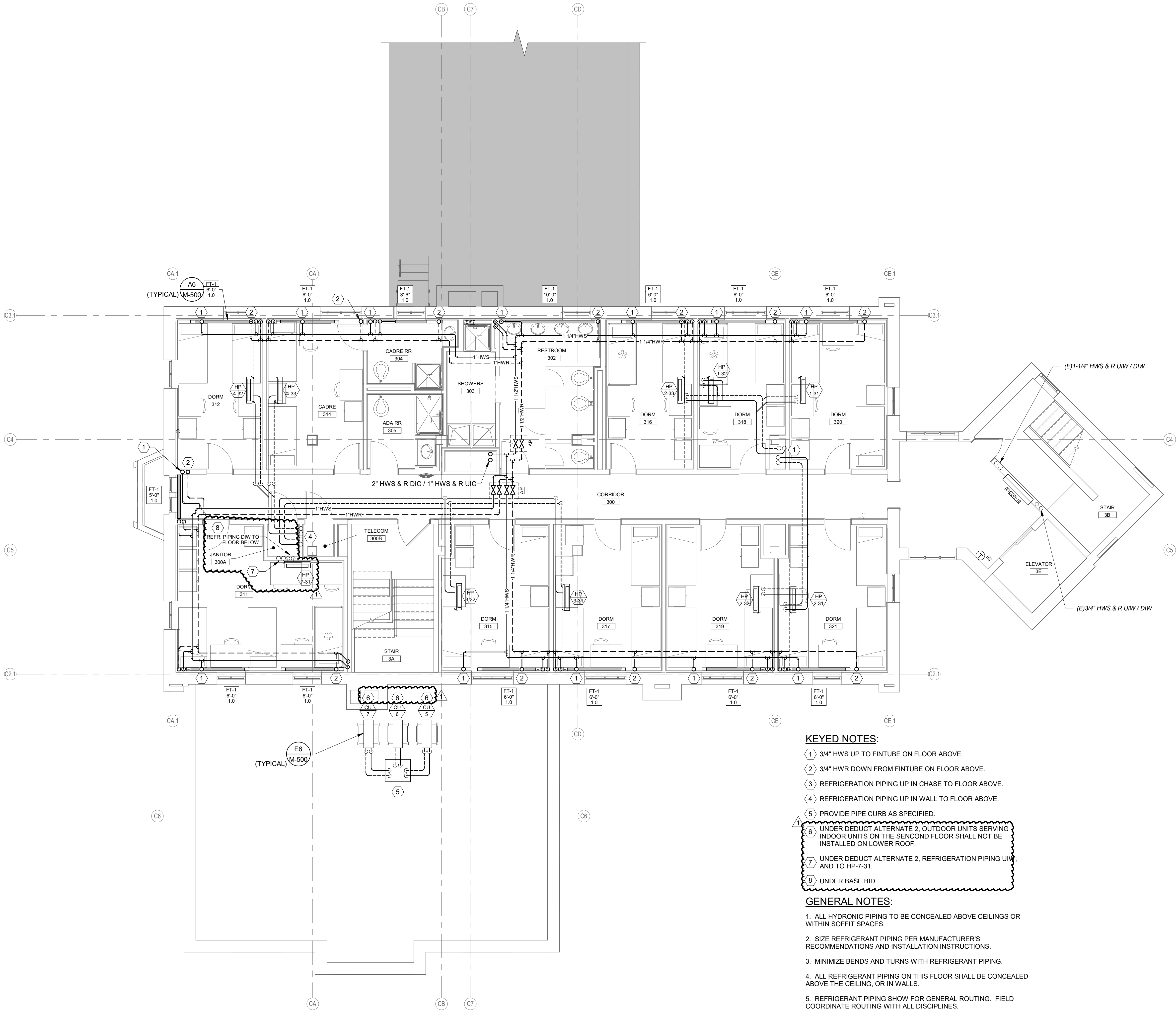
GENERAL NOTES:

1. DEDUCT ALTERNATE 2 - DELETE HEAT PUMPS AND CORRESPONDING OUTDOOR UNITS FROM FLOOR 2 SPACES ONLY. VENTILATION AIR TO REMAIN AS DOCUMENTED.
2. ALL HYDRONIC PIPING TO BE CONCEALED ABOVE CEILINGS OR WITHIN SOFFIT SPACES.
3. SIZE REFRIGERANT PIPING PER MANUFACTURER'S RECOMMENDATIONS AND INSTALLATION INSTRUCTIONS.
4. MINIMIZE BENDS AND TURNS WITH REFRIGERANT PIPING.
5. ALL REFRIGERANT PIPING ON THIS FLOOR SHALL BE CONCEALED ABOVE THE CEILING, OR IN WALLS WHERE POSSIBLE. FOR PIPING THAT IS EXPOSED, PROVIDE PVC LINE SET COVERS - RECTORSEAL SLIMDUCT OR APPROVED EQUAL. COORDINATE COLOR WITH THE ARCHITECT.
6. REFRIGERANT PIPING SHOW FOR GENERAL ROUTING. FIELD COORDINATE ROUTING WITH ALL DISCIPLINES.

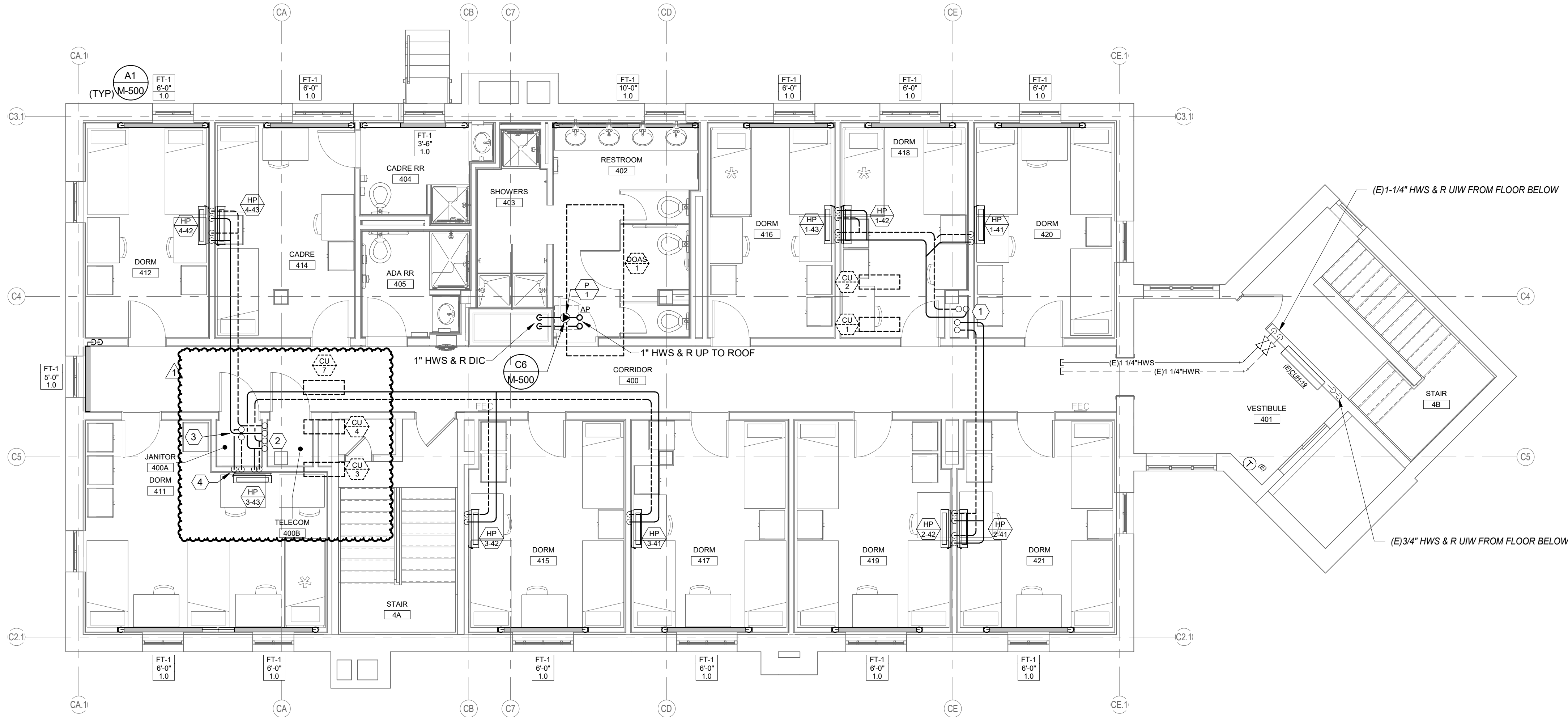


A1 MECHANICAL PIPING PLAN - SECOND FLOOR

3/16" = 1'-0"



Audodesk Docs\\Maine Criminal Justice Academy\\23030MEP_1023.rvt

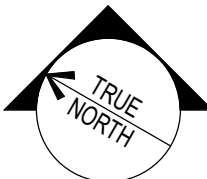


KEYED NOTES:

- 1 REFRIGERATION PIPING UP TO ROOF ABOVE, DOWN IN CHASE TO FLOOR BELOW.
- 2 REFRIGERATION PIPING UP TO ROOF ABOVE, DOWN IN WALL TO FLOOR BELOW.
- 3 UNDER DEDUCT ALTERNATE 2, REFRIGERATION PIPING UP TO ROOF ABOVE.
- 4 UNDER DEDUCT ALTERNATE 2, REFRIGERATION PIPING DIW TO HP-7-31 ON FLOOR BELOW.

GENERAL NOTES:

1. FINITUBE ON THIS FLOOR SHALL BE UPFD FROM FLOOR BELOW.
2. SIZE REFRIGERANT PIPING PER MANUFACTURER'S RECOMMENDATIONS AND INSTALLATION INSTRUCTIONS.
3. MINIMIZE BENDS AND TURNS WITH REFRIGERANT PIPING.
4. ALL REFRIGERANT PIPING ON THIS FLOOR SHALL BE CONCEALED ABOVE THE CEILING, OR IN WALLS.
5. REFRIGERANT PIPING SHOW FOR GENERAL ROUTING. FIELD COORDINATE ROUTING WITH ALL DISCIPLINES.



simons architects
designed for human potential

75 York Street
Portland, Maine 04101
simonsarchitects.com
207.772.4656

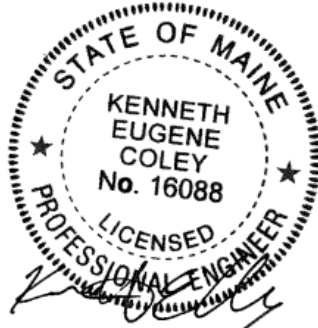
Allied Engineering
A Salas O'Brien Company

160 Veranda Street
Portland, Maine 04103
P: 207.221.2260
F: 207.221.2266

© COPYRIGHT 2025 ALLIED ENGINEERING, INC.
Allied Project No: 23030
Cad File:

PROJECT NAME:
MCJA - BUILDING
C LIMITED
RENOVATIONS
15 OAK GROVE RD
VASSALBORO, ME 04989

SEAL:



THIS DRAWING IS THE PROPERTY OF
SIMONS ARCHITECTS (SA) AND IS NOT
TO BE COPIED OR REPRODUCED IN
PART OR WHOLE.
2023 © SCOTT SIMONS ARCHITECTS, LLC

REVISIONS

1 Addendum No.4 25-05-13

DATE OF ISSUE: APRIL 16, 2025
PROJECT NUMBER: 2023-0070
STATUS: PERMIT SET

MECHANICAL
PIPING PLAN -
FOURTH FLOOR

MP-104

SINGLE-SPLIT HEAT-PUMP INDOOR & OUTDOOR UNIT SCHEDULE (DEDUCT ALTERNATE 2)	
INDOOR UNIT:	HP-7-31
COOLING BTUH	15,000
HEATING BTUH (@ 47F)	16,500
MITUBISHI MODEL NO.	MSZ-FX15NL-U1
ARRANGEMENT	WALL MOUNT
DIMENSIONS - D X W X H	39-9/32 x 9-3/4 x 12
WEIGHT, LBS.	31
CFM	504
EXT S.P., IN. W.C.	0
SOUND dBA - HIGH CFM dB(A)	46
ELECTRICAL	208-1-60
MCA	1A
COND. DRAIN CONN. SIZE	5/8"
LIQUID LINE SIZE	1/4"
GAS LINE SIZE	1/2"
OUTDOOR COND. UNITS	CU-7
NOMINAL SIZE	1.25 TON
MITSUBISHI MODEL NO.	MUZ-FX15NLHZ
COOLING BTUH	15,000
MAX HEATING AT 47F	28,400
MAX HEATING AT 5F	22,200
ELECTRICAL	208/1/60
MCA	23.0
MOP	40
SOUND dBA - HIGH	55
DIMENSIONS H X W x D	34-5/8 x 33-1/16 x 13
WEIGHT, LBS.	119
LIQUID LINE SIZE	1/4"
HOT GAS LINE SIZE	1/2"
NOTES:	
1. POWER TO CU'S BY DIV 26. WIRING BETWEEN AC AND CU PROVIDED BY DIV 23.	
2. REFRIGERANT SHALL BE R454B.	
3. PROVIDE PAN HEATERS FOR CONDENSING UNITS.	
4. PROVIDE CONDENSATE PUMP FOR ALL WALL MOUNTED INDOOR UNITS. CONDENSATE PUMP AND APPURTENANCES SHALL BE CAPABLE OF FITTING WITHIN THE INDOOR UNIT.	
5. PROVIDE HAIL AND SNOW GUARDS FOR CONDENSING UNITS.	

[illegible]

AIR HANDLING UNIT SCHEDULE		
GENERAL	TAG	DOAS-1
	LOCATION	ROOF
	TYPE	PACKAGED DOAS
	MFR.	TRANE
	MODEL	HORIZON - OABE084A3
	MAX. DIMENSIONS	161"L X 52"W X 55"H
	WEIGHT (LBS)	2,056
	MIN. OA CFM - AHU DESIGN	1,845
ELECTRICAL	MIN OA CFM - SET POINT	605
	OA %	100.0%
	VOLTAGE	208-3-60
	FLA	47.6
	MCA	53.5
	MOP	70
	VFD FURNISHED BY	UNIT MFR.
	DISCONNECT SW. FURN BY	UNIT MFR.
OA DAMPER	SMOKE DETECTOR (SD) - SUPPLY & RETURN	YES
	SD'S FURN BY	UNIT MFR.
	SD'S INSTALLED IN DUCT BY	UNIT MFR.
	SD'S WIRED TO HVAC CONTROLS BY	DIV 23
	SD'S WIRED TO FIRE ALARM BY	DIV 26
	SINGLE POINT POWER CONNECTION	YES
	OA DAMPER	2 POSITION - CLASS 1A
	SUPPLY FILTER SECTION	TYPE
MODULE PD, FILTER CONDITION: DIRTY		0.26"
MIN. AREA, SF		-----
EXHAUST FILTER SECTION	VELOCITY, FPM	-----
	TYPE	MERV 8
	MODULE PD, in. wc. - DIRTY	0.20"
AIR BLENDER	MIN. AREA, SF	-----
	VELOCITY, FPM	-----
		NO
FACE & BYPASS SECTION	INTERNAL	YES
PRIMARY HEATING; HEAT PUMP	EAT, deg-F.	51.5
	LAT, deg-F.	85.3
	TMBTUH	73.3
	COP	3.8
SECONDARY HEATING COIL	AMBIENT AIR	34.0
	EAT, deg-F.	51.5
	LAT, deg-F.	78.9
	TMBTUH	54.8
	MIN COIL AREA, SF	-
	MAX AIR PD, in. wc.	0.2
	COIL FACE VELOCITY	603.0
	FLUID	WATER
PACKAGED DX COOLING	EWT, deg-F	140.0
	LWT, deg-F	118.2
	GPM	5.0
	WATER PD, ft-H2O	0.3
	COMP. QTY.	1
	COMP. TYPE	DIGITAL SCROLL
	MIN. COOLING STAGES	MODULATING
	AMBIENT	95F
	MODULATING HOT GAS REHEAT	YES
	ASHRAE 90.1-2019 COMPLIANT?	YES
	EER AT AHRI CONDITIONS	15.7
	ISMRE (MOISTURE REMOVAL EFFICIENCY)	6.5
COOLING COIL	TYPE	DX
	ENT. AIR, DB / WB	78.9 / 66.0
	LVG. AIR, DB / WB	52.2 / 52.0
	TMBTUH	75.2
	SMBTUH	53.0
	MIN COIL AREA, SF	5.5
	MAX AIR PD, in. wc.	0.36"
	COIL FACE VELOCITY	335
SUPPLY FAN	REFRIGERANT	R-454B
	FAN TYPE	PLENUM
	FAN QTY.	1
	MOTOR TYPE	PREMIUM EFF.
	CFM STD. AIR	1,845
	ESP, in.wc.	2"
	TSP, in. wc.	3.70"
	MAX-BHP	1.55
EXHAUST FAN	MOTOR HP	3
	FAN SERVICE	EXHAUST
	QTY - TYPE	1 PLENUM
	MOTOR TYPE	PREMIUM EFF.
	CFM STD. AIR	1,825
	ESP, in.wc.	2"
	TSP, in. wc.	3.02"
	MAX-BHP	1.53
ENERGY RECOVERY	MOTOR HP	3
	TYPE	WHEEL
	WINTER OA DESIGN	-5°F
	WINTER SA °F DB	51.5
	SUMMER OA DESIGN	89°F DB / 74°F WB
	SUMMER SA °F DB/WB	78.9 / 66.0
	SUMMER SENSIBLE / LATENT EFFECTIVENESS	78% / 73%
	WINTER SENSIBLE / LATENT EFFECTIVENESS	78% / 74%
	BYPASS DAMPER	YES
	FROST CONTROL	MODULATING WHEEL
PROVIDE:		
1. STAINLESS STEEL DRAIN PAN		
2. CONDENSER HAIL GUARD		
3. HORIZONTAL RETURN & DISCHARGE		
4. FUSED DISCONNECT SWITCH W/115V OUTLET		
5. AIRFLOW MONITORING PIEZO RINGS		
6. HIGH STATIC ALARM SWITCH		

R, G, & D ROUND DUCT RUNOUT SIZE SCHEDULE	
DUCT SIZE (Ø IN.)	CFM RANGE
4"	TYPICALLY NOT USED
6"	0 ≤ CFM ≤ 100
7"	105 ≤ CFM ≤ 150
8"	150 ≤ CFM ≤ 215
9"	220 ≤ CFM ≤ 295

NOTE: ROUND DUCT RUNOUT SIZES, UNLESS NOTED OTHERWISE IN DOCUMENTS

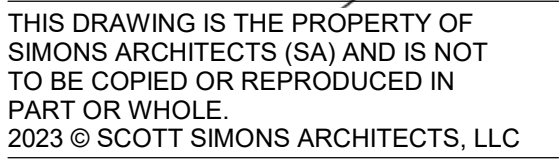
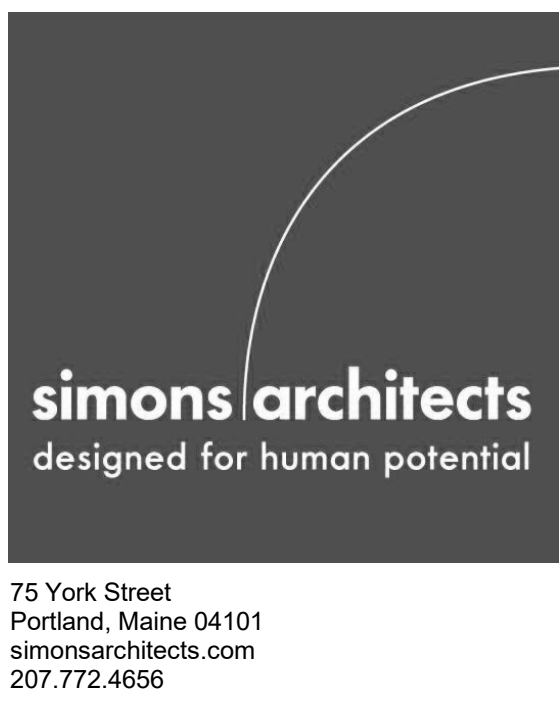
MULTI-SPLIT HEAT-PUMP INDOOR & OUTDOOR UNIT SCHEDULE					
INDOOR UNIT:	W-06	W-08	W-12	W-15	W-18
COOLING BTUH	6,000	8,000	12,000	15,000	18,000
HEATING BTUH (@ 47F)	6,700	9,000	13,500	17,000	20,000
MITSUBISHI MODEL NO.	PKFY-L06NLMU-A	PKFY-L08NLMU-A	PKFY-L12NLMU-A	PKFY-L15NLMU-A	PKFY-L18NLMU-A
ARRANGEMENT	WALL MOUNT	WALL MOUNT	WALL MOUNT	WALL MOUNT	WALL MOUNT
DIMENSIONS - D X W X H	30-7/16 x 9-11/32 x 11-25/32	30-7/16 x 9-11/32 x 11-25/32	30-7/16 x 9-11/32 x 11-25/32	35-23/64 x 9-11/32 x 11-25/32	35-3/8 x 9-11/32 x 11-25/32
WEIGHT, LBS.	25	25	25	28	28
CFM	191	237	297	353	438
EXT S.P., IN. W.C.	0	0	0	0	0
SOUND dBA - HIGH CFM dB(A)	31	35	41	40	46
ELECTRICAL	208-1-60	208-1-60	208-1-60	208-1-60	208-1-60
MCA	0.24A	0.24A	0.24A	0.24A	0.24A
COND. DRAIN CONN. SIZE	5/8"	5/8"	5/8"	5/8"	5/8"
LIQUID LINE SIZE	1/4"	1/4"	1/4"	1/4"	1/4"
GAS LINE SIZE	1/2"	1/2"	1/2"	1/2"	1/2"
OUTDOOR COND. UNITS					
NOMINAL SIZE	3 TON	3.5 TON	4 TON		
MITSUBISHI MODEL NO.	MXZ-SM36NLHZ	MXZ-SM42NLHZ	MXZ-SM48NLHZ		
COOLING BTUH	36,000	42,000	48,000		
HEATING AT 47F	42,000	48,000	54,000		
HEATING AT 5F	42,000	48,000	54,000		
ELECTRICAL	208/1/60	208/1/60	208/1/60		
MCA	45.0	45.0	45.0		
MOP	80	80	80		
SOUND dBA - HIGH	53	54	54		
DIMENSIONS H x W x D	53 x 42 x 13	53 x 42 x 13	53 x 42 x 13		
WEIGHT, LBS.	283	283	283		
LIQUID LINE SIZE	3/8"	3/8"	3/8"		
HOT GAS LINE SIZE	5/8"	5/8"	5/8"		
NOTES:					
1. POWER TO CU'S BY DIV 26. WIRING BETWEEN AC AND CU PROVIDED BY DIV 23.					
2. REFRIGERANT SHALL BE R454B.					
3. PROVIDE PAN HEATERS FOR CONDENSING UNITS.					
4. PROVIDE CONDENSATE PUMP FOR ALL WALL MOUNTED INDOOR UNITS. CONDENSATE PUMP AND APPURTENANCES SHALL BE CAPABLE OF FITTING WITHIN THE INDOOR UNIT.					
5. PROVIDE HAIL AND SNOW GUARDS FOR CONDENSING UNITS.					

HYDRONIC PIPE SIZE RUNOUT SCHEDULE	
PIPE SIZE	MAX GPM
1/2"	1.0
3/4"	2.8
1"	6.0
1-1/4"	10.5
1-1/2"	17
2"	35
2-1/2"	68

REGISTERS - GRILLES - DIFFUSERS (RGD) SCHEDULE										
TAG	MFR.	MODEL	TYPE	NECK SIZE	FACE SIZE	MAX CFM	MAX TOTAL P.D. (IN W.C.)	MAX NC LEVEL	BLOW	NOTES
S-1	METALAIRe	V4004-AF	ALUM. DOUBLE DEFL. SUPPLY, W/ DAMPER	6" X 4"	7.75" X 5.75"	100	0.10"	20	ADJUSTABLE	
S-2	METALAIRe	V4004-AF	ALUM. DOUBLE DEFL. SUPPLY, W/ DAMPER	8" X 6"	9.75" X 7.75"	180	0.10"	21	ADJUSTABLE	
S-3	METALAIRe	V4004-AF	ALUM. DOUBLE DEFL. SUPPLY, W/ DAMPER	8" X 8"	9.75" X 9.75"	250	0.10"	21	ADJUSTABLE	
R-1	METALAIRe	V4002R	ALUM. RETURN, 3/4" SPACING, 45 DEG VANES, W/ DAMPER	8" X 6"	9.75" X 7.75"	110	0.05"	20	-----	6" DIA RUNOUT
R-2	METALAIRe	V4002R	ALUM. RETURN, 3/4" SPACING, 45 DEG VANES, W/ DAMPER	8" X 8"	9.75" X 9.75"	220	0.05"	20	-----	8" DIA RUNOUT
GENERAL NOTE. ALL RGDs ON THE THIRD & FORTH FLOORS SHALL BE SW 6244 NAVAL (COORDINATE WITH ARCHITECTURAL DOCUMENTS), & ALL RGDs ON THE SECOND FLOOR SHALL MATCH THE COLOR OF THE EXISTING RGDs.										

HYDRONIC FIN TUBE SCHEDULE											
TAG	BTU/FT.	GPM	TUBE SIZE	FIN STYLE	FINS / FT.	EWT °F	EAT °F	ENCLOSURE			TYPICAL UNIT & MFG NO.
								H	D	STYLE	
FT-1	720	1.0	3/4	2-1/2" X 2-3/4"	60	180	65	10.75	3.125	LB2	STERLING
NOTES: FOR FUTURE; AT 140°F HEATING OUTPU = 390 BTU/FT.											

HYDRONIC PUMP SCHEDULE														
TAG	SYSTEM	MFR.	MODEL	SUCTION DISCH	TYPE	PUMPED FLUID	PERFORMANCE		ELECTRICAL COORDINATION					NOTES
							GPM	HEAD (FT.)	MOTOR HP	VOLTS/PH (60 Hz.)	STARTER TYPE	STARTER FURN. BY	BOTH PUMPS RUN?	
P-1	DOAS-1	GRUNDFOS	MAGNA3 - 32-60 GF	1 X 1	FREEZE PROTECTION	WATER	5	15	106	115/1/60	ECM	ECM BUILT-IN	NO, LEAD-LAG	DIV 26
<u>NOTES:</u>														

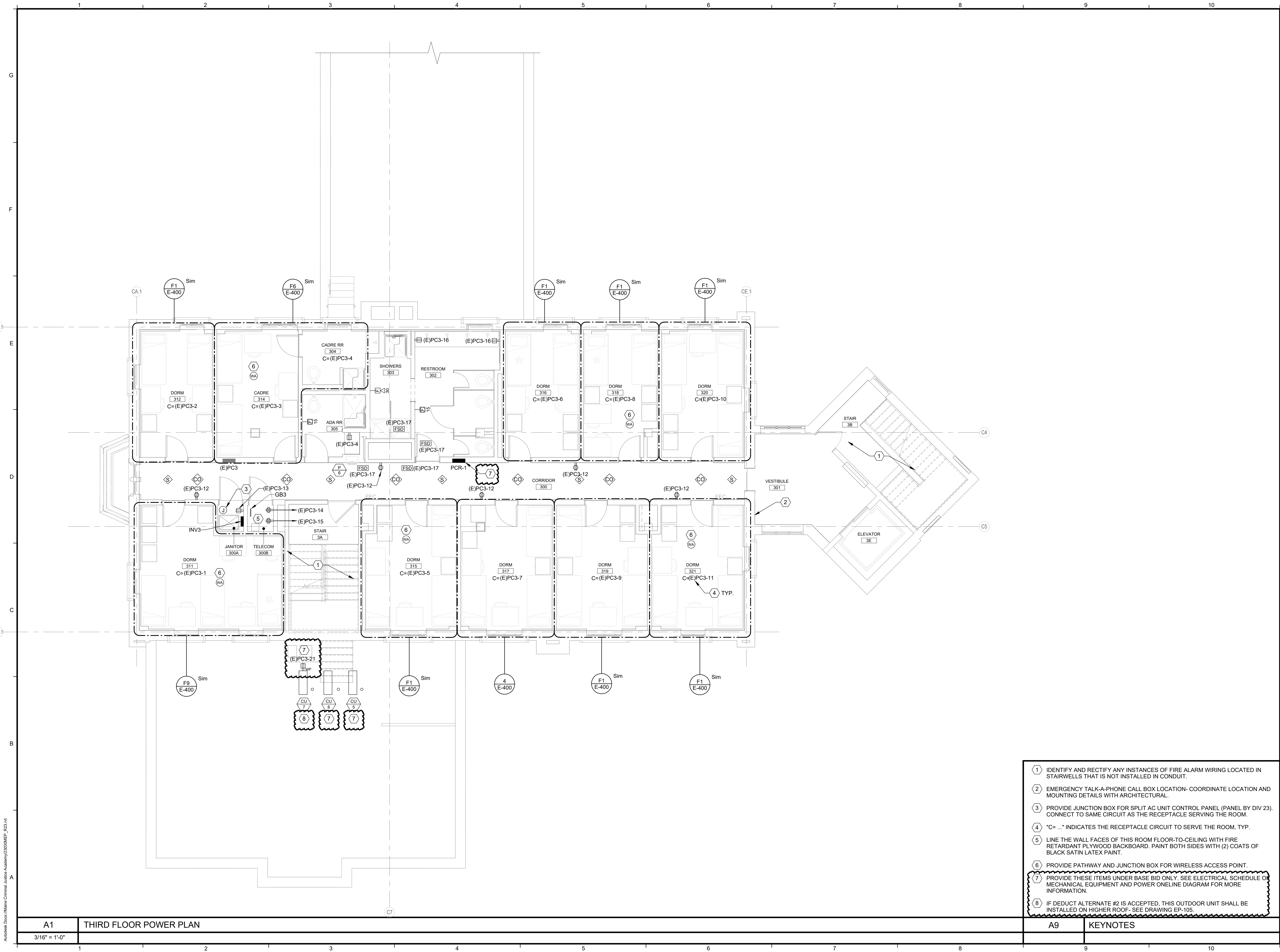


REVISIONS	
1	Addendum No.4 25-05-13



M-600

Autodesk Docs\\Maine Criminal Justice Academy\\2303\\MEP_FG3.rvt



- 1 IDENTIFY AND RECTIFY ANY INSTANCES OF FIRE ALARM WIRING LOCATED IN STAIRWELLS THAT IS NOT INSTALLED IN CONDUIT.
- 2 EMERGENCY TALK-A-PHONE CALL BOX LOCATION- COORDINATE LOCATION AND MOUNTING DETAILS WITH ARCHITECTURAL.
- 3 PROVIDE JUNCTION BOX FOR SPLIT AC UNIT CONTROL PANEL (PANEL BY DIV 23). CONNECT TO SAME CIRCUIT AS THE RECEPTACLE SERVING THE ROOM.
- 4 "C= ..." INDICATES THE RECEPTACLE CIRCUIT TO SERVE THE ROOM, TYP.
- 5 LINE THE WALL FACES OF THIS ROOM FLOOR-TO-CEILING WITH FIRE RETARDANT PLYWOOD BACKBOARD. PAINT BOTH SIDES WITH (2) COATS OF BLACK SATIN LATEX PAINT.
- 6 PROVIDE PATHWAY AND JUNCTION BOX FOR WIRELESS ACCESS POINT.
- 7 PROVIDE THESE ITEMS UNDER BASE BID ONLY. SEE ELECTRICAL SCHEDULE OR MECHANICAL EQUIPMENT AND POWER ONLINE DIAGRAM FOR MORE INFORMATION.
- 8 IF DEDUCT ALTERNATE #2 IS ACCEPTED, THIS OUTDOOR UNIT SHALL BE INSTALLED ON HIGHER ROOF. SEE DRAWING EP-105.

A9 KEYNOTES



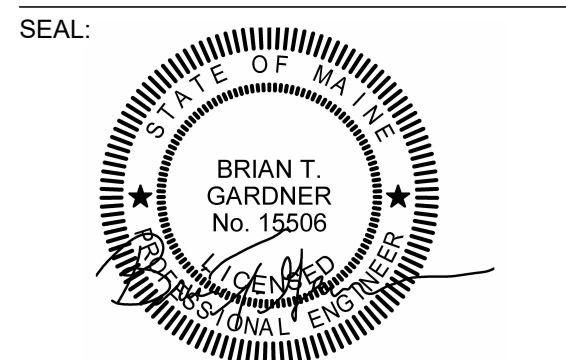
75 York Street
Portland, Maine 04101
simonsarchitects.com
207.772.4656



160 Veranda Street
Portland, Maine 04103
P: 207.221.2260
F: 207.221.2266

© COPYRIGHT 2025 ALLIED ENGINEERING, INC.
Allied Project No: 23030
Cad File:

PROJECT NAME:
**MCJA - BUILDING
C LIMITED
RENOVATIONS**
15 OAK GROVE RD
VASSALBORO, ME 04989



THIS DRAWING IS THE PROPERTY OF
SIMONS ARCHITECTS (SA) AND IS NOT
TO BE COPIED OR REPRODUCED IN
PART OR WHOLE.
2023 © SCOTT SIMONS ARCHITECTS, LLC

△ REVISIONS	
1 Addendum No.2	25-05-06
2 Addendum No.4	25-05-13

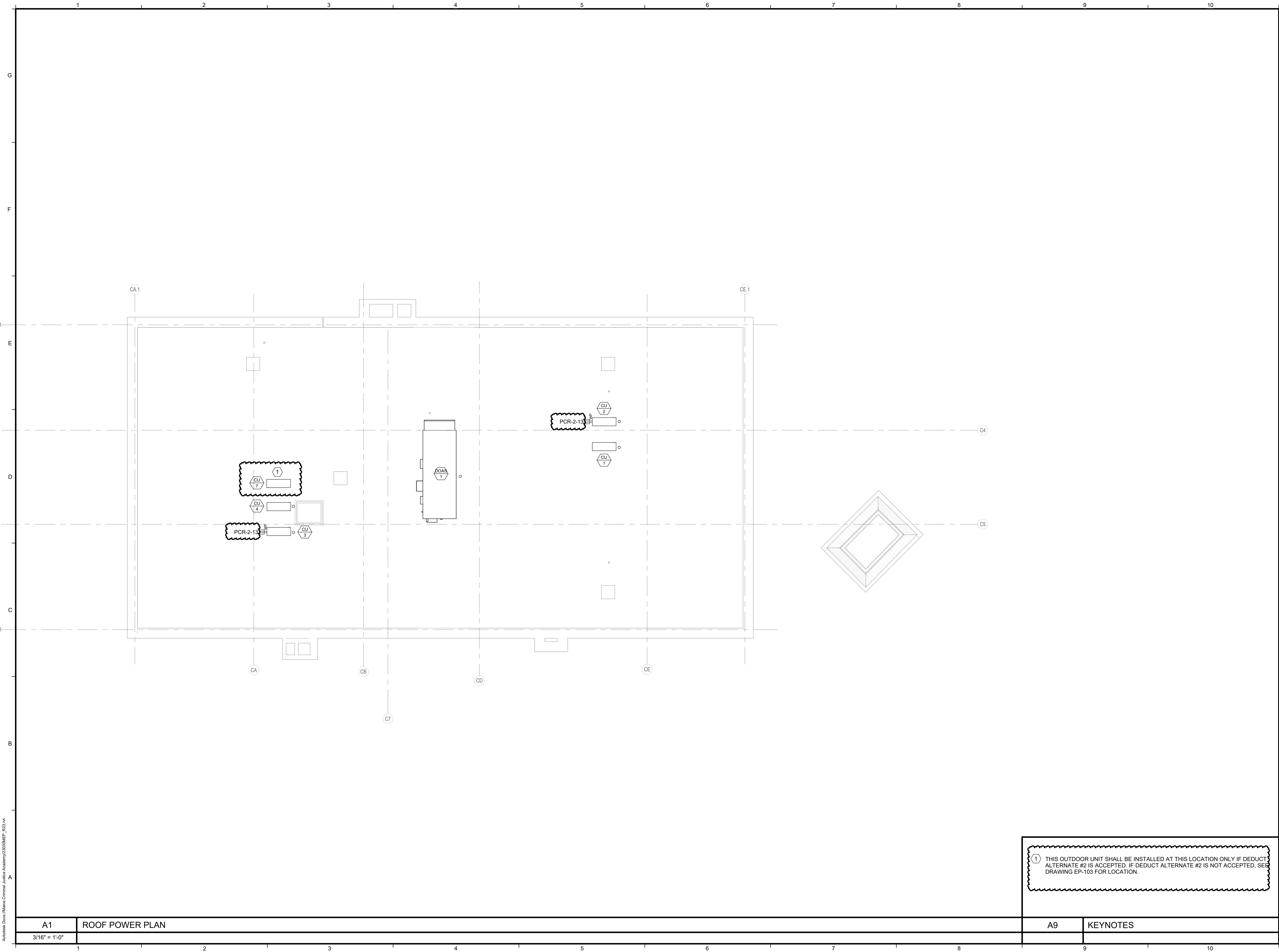
DATE OF ISSUE: APRIL 16, 2025
PROJECT NUMBER: 2023-0070
STATUS: PERMIT SET

**POWER & SYSTEMS
PLAN - THIRD
FLOOR**

EP-103

A1 THIRD FLOOR POWER PLAN

3/16" = 1'-0"



Autodesk Docs\\Maine Criminal Justice Academy\\23030MEP\\R23.rvt



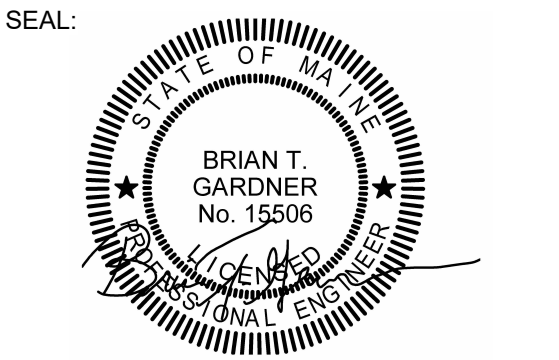
75 York Street
Portland, Maine 04101
simonsarchitects.com
207.772.4656



160 Veranda Street
Portland, Maine 04103
P: 207.221.2260
F: 207.221.2266

© COPYRIGHT 2025 ALLIED ENGINEERING, INC.
Allied Project No. 23030
Cad File:

PROJECT NAME:
**MCJA - BUILDING
C LIMITED
RENOVATIONS**
15 OAK GROVE RD
VASSALBORO, ME 04989



THIS DRAWING IS THE PROPERTY OF
SIMONS ARCHITECTS (SA) AND IS NOT
TO BE COPIED OR REPRODUCED IN
PART OR WHOLE.
2023 © SCOTT SIMONS ARCHITECTS, LLC

△	REVISIONS
1	Addendum No.4 25-05-13

DATE OF ISSUE: APRIL 16, 2025
PROJECT NUMBER: 2023-0070
STATUS: PERMIT SET

**POWER & SYSTEMS
PLAN - ROOF**

EP-105

① THIS OUTDOOR UNIT SHALL BE INSTALLED AT THIS LOCATION ONLY IF DEDUCT ALTERNATE #2 IS ACCEPTED. IF DEDUCT ALTERNATE #2 IS NOT ACCEPTED, SEE DRAWING EP-103 FOR LOCATION.

A1	ROOF POWER PLAN	A9	KEYNOTES
----	-----------------	----	----------

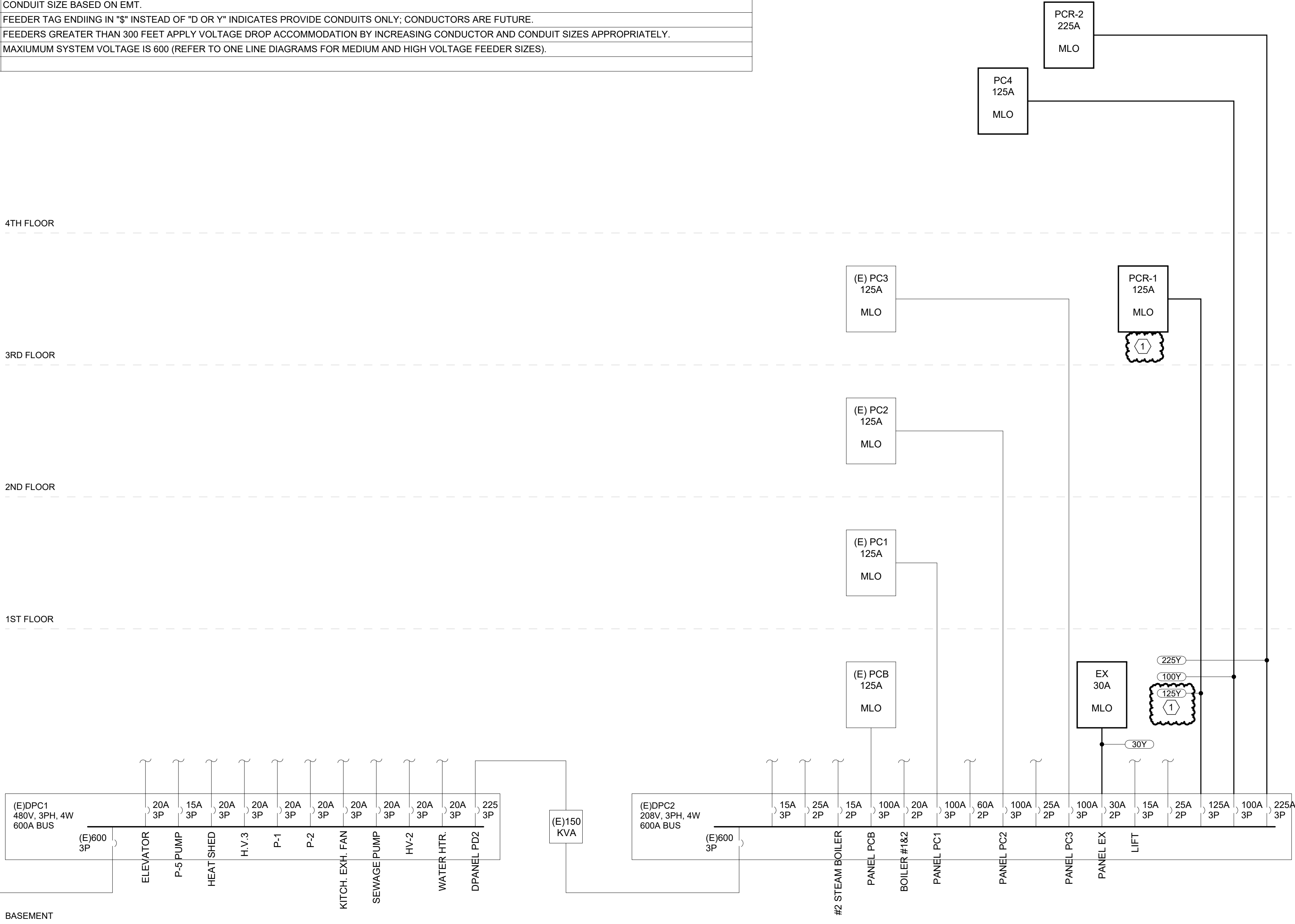
3/16" = 1'-0"

AutoCAD Docs\\Maine Criminal Justice Academy\\2003\\MEP_R23.rvt

FEEDER SCHEDULE									
TAG	MAXIMUM AMPERE RATING	PHASE AND NEUTRAL CONDUCTORS (NOTE 1)	GROUND CONDUCTOR (NOTE 2)	CONDUIT (NOTE 3)	TAG	MAXIMUM AMPERE RATING	PHASE AND NEUTRAL CONDUCTORS (NOTE 1)	GROUND CONDUCTOR (NOTE 2)	CONDUIT (NOTE 3)
15D	15	3#12	1#12	3/4"	400D	400	3#500 KCMIL	1#3	3 1/2"
15Y		4#12	1#12	3/4"	400Y		4#500 KCMIL	1#3	4"
30D	30	3#10	1#10	3/4"	450D	450	2 SETS OF 3#250 KCMIL	2 - #2	2 - 2 1/2"
30Y		4#10	1#10	3/4"	450Y		2 SETS OF 4#250 KCMIL	2 - #2	2 - 3"
50D	50	3#8	1#10	3/4"	500D	500	2 SETS OF 3#250 KCMIL	2 - #2	2 - 2 1/2"
50Y		4#8	1#10	1"	500Y		2 SETS OF 4#250 KCMIL	2 - #2	2 - 3"
60D	60	3#6	1#10	3/4"	600D	600	2 SETS OF 3#350 KCMIL	2 - #1	2 - 3"
60Y		4#6	1#10	1 1/4"	600Y		2 SETS OF 4#350 KCMIL	2 - #1	2 - 3"
80D	80	3#4	1#8	1 1/4"	700D	700	2 SETS OF 3#500 KCMIL	2 - #1/0	2 - 3 1/2"
80Y		4#4	1#8	1 1/4"	700Y		2 SETS OF 4#500 KCMIL	2 - #1/0	2 - 4"
100D	100	3#2	1#8	1 1/4"	800D	800	2 SETS OF 3#600 KCMIL	2 - #1/0	2 - 3 1/2"
100Y		4#2	1#8	1 1/4"	800Y		2 SETS OF 4#600 KCMIL	2 - #1/0	2 - 4"
125D	125	3#1	1#6	1 1/2"	900D	900	3 SETS OF 3#350 KCMIL	2 - #2/0	3 - 3"
125Y		4#1	1#6	1 1/2"	900Y		3 SETS OF 4#350 KCMIL	2 - #2/0	3 - 3"
150D	150	3#1/0	1#6	1 1/2"	10HD	1000	3 SETS OF 3#400 KCMIL	3 - #2/0	3 - 2 1/2"
150Y		4#1/0	1#6	2"	10HY		3 SETS OF 4#400 KCMIL	2 - #2/0	3 - 3"
175D	175	3#2/0	1#6	2"	12HD	1200	3 SETS OF 3#600 KCMIL	3 - #3/0	3 - 4"
175Y		4#2/0	1#6	2"	12HY		3 SETS OF 4#600 KCMIL	3 - #3/0	3 - 4"
200D	200	3#3/0	1#6	2"	16HD	1600	4 SETS OF 3#600 KCMIL	4 - #4/0	4 - 4"
200Y		4#3/0	1#6	2"	16HY		4 SETS OF 4#600 KCMIL	4 - #4/0	4 - 4"
225D	225	3#4/0	1#4	2"	20HD	2000	5 SETS OF 3#600 KCMIL	5 - #250 KCMIL	5 - 4"
225Y		4#4/0	1#4	2 1/2"	20HY		5 SETS OF 4#600 KCMIL	5 - #250 KCMIL	5 - 4"
250D	250	3#250 KCMIL	1#4	2 1/2"	25HD	2500	6 SETS OF 3#600 KCMIL	6 - #350 KCMIL	6 - 4"
250Y		4#250 KCMIL	1#4	3"	25HY		6 SETS OF 4#600 KCMIL	6 - #350 KCMIL	6 - 4"
300D	300	3#350 KCMIL	1#4	3"	30HD	3000	8 SETS OF 3#600 KCMIL	8 - #500 KCMIL	8 - 4"
300Y		4#350 KCMIL	1#4	3"	30HY		8 SETS OF 4#600 KCMIL	8 - #500 KCMIL	8 - 4"
350D	350	3#500 KCMIL	1#3	3 1/2"	40HD	4000	10 SETS OF 3#600 KCMIL	10 - #500 KCMIL	10-4"
350Y		4#500 KCMIL	1#3	4"	40HY		10 SETS OF 4#600 KCMIL	10 - #500 KCMIL	10-4"
TR5	REFER TO TRANSFORMER SCHEDULE FOR PRIMARY, SECONDARY AND GROUND FEEDER SIZES				50HD	5000	12 SETS OF 3#600 KCMIL	12 - #500 KCMIL	12-4"
					50HY		12 SETS OF 4#600 KCMIL	12 - #500 KCMIL	12-4"
	FEEDER SCHEDULE NOTES:								
1	WIRING BASED ON COPPER THWN/THHN.								
2	GROUNDING CONDUCTORS BASED ON USE AS A FEEDER (REFER TO ONE LINE DIAGRAMS FOR SERVICE ENTRANCE GROUNDING ELECTRODE SIZES).								
3	CONDUIT SIZE BASED ON EMT.								
4	FEEDER TAG ENDING IN "S" INSTEAD OF "D OR Y" INDICATES PROVIDE CONDUITS ONLY; CONDUCTORS ARE FUTURE.								
5	FEEDERS GREATER THAN 300 FEET APPLY VOLTAGE DROP ACCOMMODATION BY INCREASING CONDUCTOR AND CONDUIT SIZES APPROPRIATELY.								
6	MAXIMUM SYSTEM VOLTAGE IS 600 (REFER TO ONE LINE DIAGRAMS FOR MEDIUM AND HIGH VOLTAGE FEEDER SIZES).								

DRY TYPE TRANSFORMER SCHEDULE (STEP DOWN)						
TAG	KVA	480 VOLT OVERCURRENT	208 VOLT OVERCURRENT	480 VOLT FEEDER (DELTA)	120/208 VOLT FEEDER (WYE)	GROUNDING (NOTE 5)
T1	9	20A-3P	30A-3P	3#12 & 1#12GND - 3/4" C	4#10 & 1#8GND - 3/4" C.	1#8 - 3/4" C.
T2	15	30A-3P	50A-3P	3#10 & 1#10GND - 3/4" C	4#6 & 1#8GND - 1" C.	1#8 - 3/4" C.
T3	30	60A-3P	100A-3P	3#6 & 1#10GND - 1" C	4#2 & 1#8GND - 1 1/4" C.	1#8 - 3/4" C.
T4	45	80A-3P	150A-3P	3#4 & 1#8GND - 1 1/4" C	4#1/0 & 1#6GND - 2" C.	1#6 - 3/4" C.
T5	75	150A-3P	250A-3P	3#1/0 & 1#6GND - 1 1/2" C	4#250 KCMIL & 1#2GND - 3" C	1#2 - 3/4" C.
T6	112.5	200A-3P	400A-3P	3#3/0 & 1#6GND - 2" C	4#500 KCMIL & 1#1/0GND - 4" C	1#1/0 - 3/4" C.
T7	150	300A-3P	500A-3P	3#350 KCMIL & 1#4GND - 3" C	8#250 KCMIL & 2#1/0GND - (2) 3" C	1#1/0 - 3/4" C.
T8	225	400A-3P	800A-3P	3#500 KCMIL & 1#3GND - 3 1/2" C	8#600 KCMIL & 2#3/0GND - (2) 4" C	1#3/0 - 3/4" C.
T9	300	600A-3P	1000A-3P	6#350 KCMIL & 2#1GND - (2) 3" C	12#400 KCMIL & 3#3/0GND - (3) 3" C	1#3/0 - 3/4" C.
T10	500	900A-3P	1600A-3P	9#350 KCMIL & 3#2/0GND - (3) 3" C	16#600 KCMIL & 4#3/0GND - (4) 4" C	1#3/0 - 3/4" C. (NOTE 6)
TRANSFORMER SCHEDULE NOTES:						
1 BOND NEUTRAL OF TRANSFORMER SECONDARY TO THE TRANSFORMER CASE WITH BONDING JUMPER.						
2 GROUND THE CASING OF THE TRANSFORMER TO NEAREST AVAILABLE EFFECTIVELY GROUNDED WATER PIPE, STRUCTURAL STEEL AND/OR DRIVEN GROUND ROD IN ACCORDANCE WITH N.E.C. 250-50 AND 250-52.						
3 ALL CONDUCTOR SIZES ARE FOR COPPER CONDUCTORS PER N.E.C. TABLE 310-16.						
4 SECONDARY OVERCURRENT PROTECTION SHALL BE LOCATED WITHIN TEN (10) FEET OF THE TRANSFORMER SECONDARY TERMINALS EITHER IN A PANELBOARD (MAIN BREAKER) OR AN INDIVIDUALLY MOUNTED CIRCUIT BREAKER.						
5 TRANSFORMER BONDING JUMPER AND GROUNDING ELECTRODE CONDUCTOR, EXCEPT NOTED OTHERWISE.						
6 TRANSFORMER BONDING JUMPER (1) 300 KCMIL.						

ROOF



1 PROVIDE PANEL PCR-1 AND ITS FEEDER UNDER BASE BID ONLY.

A9	KEYNOTES
----	----------



75 York Street
Portland, Maine 04101
simonsarchitects.com
207.772.4656



160 Veranda Street
Portland, Maine 04103
P: 207.221.2260
F: 207.221.2266

© COPYRIGHT 2025 ALLIED ENGINEERING, INC.

Allied Project No. 23030

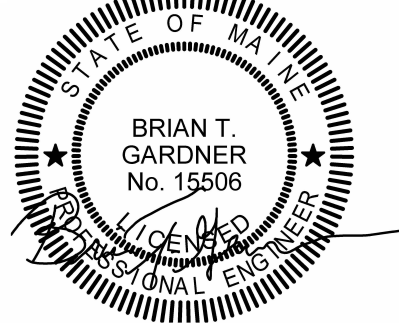
Cad File:

PROJECT NAME:

MCJA - BUILDING
C LIMITED
RENOVATIONS

15 OAK GROVE RD
VASSALBORO, ME 04989

SEAL:



THIS DRAWING IS THE PROPERTY OF
SIMONS ARCHITECTS (SA) AND IS NOT
TO BE COPIED OR REPRODUCED IN
PART OR WHOLE.
2023 © SCOTT SIMONS ARCHITECTS, LLC

REVISIONS

1 Addendum No.4 25-05-13

DATE OF ISSUE: APRIL 16, 2025

PROJECT NUMBER: 2023-0070

STATUS: PERMIT SET

ONLINE DIAGRAM
AND NOTES

E-500

G
F
E
D
C
B
A

AutoDesk Docs\Maine Criminal Justice Academy\2003MEP_R23.rvt

VOLTAGE DROP CHART				
MAXIMUM LOAD (VA)	MAXIMUM LENGTH PER CONDUCTOR SIZE			
	#12	#10	#8	
120 VOLT CIRCUITS				
800	155	245	390	
1000	125	195	310	
1200	105	165	260	
1400	90	140	220	
1600	80	125	195	
1800	70	110	175	
277 VOLT CIRCUITS				
2000	330	525	830	
2500	265	420	665	
3000	220	350	555	
3500	190	300	475	
4000	165	260	415	

BRANCH CIRCUITS SCHEDULE		
CIRCUIT BREAKER		CONDUCTOR
120 OR 277 VOLT, 1 PH., 2W CIRCUITS		
15A-1P, 20A-1P		2#12 & 1#12 GND - 3/4" C.
30A-1P		2#10 & 1#10 GND - 3/4" C.
40A-1P		2#8 & 1#10 GND - 3/4" C.
50A-1P		2#6 & 1#10 GND - 3/4" C.
60A-1P		2#6 & 1#10 GND - 3/4" C.
208 OR 480 VOLT, 1PH., 2W CIRCUITS		
15A-2P, 20A-2P		2#12 & 1#12 GND - 3/4" C.
30A-2P		2#10 & 1#10 GND - 3/4" C.
40A-2P		2#8 & 1#10 GND - 3/4" C.
50A-2P		2#6 & 1#10 GND - 3/4" C.
60A-2P		2#6 & 1#10 GND - 3/4" C.
208 OR 480 VOLT, 3PH., 3W CIRCUITS		
15A-3P, 20A-3P		3#12 & 1#12 GND - 3/4" C.
30A-3P		3#10 & 1#10 GND - 3/4" C.
40A-3P		3#8 & 1#10 GND - 3/4" C.
50A-3P		3#6 & 1#10 GND - 3/4" C.
60A-3P		3#6 & 1#10 GND - 3/4" C.
BRANCH CIRCUIT SCHEDULE NOTES:		
1. TYPE MC CABLE SHALL INCLUDE FULL SIZE INSULATED GROUND CONDUCTOR. SIZES AS INDICATED IN SCHEDULE.		
2. WIRING BASED ON MAXIMUM FEEDER LENGTH OF 150 FEET FOR 120 VOLT CIRCUITS AND 300 FEET FOR 277 VOLT CIRCUITS.		
3. UPGRADE WIRE AND CONDUIT SIZE AS REQUIRED TO ADDRESS VOLTAGE DROP.		

THREE PHASE AND SINGLE PHASE CIRCUIT SCHEDULE NOTES	
1	UNLESS OTHERWISE INDICATED, CONDUCTOR SIZING SHALL MATCH THE SIZE INDICATED FOR THE APPLICABLE OVERCURRENT DEVICE. PROVIDE LARGER CONDUCTORS AND RACEWAY WHERE INDICATED.
2	PROVIDE TYPE AND MINIMUM SIZE OF RACEWAY OR CABLE AS INDICATED IN SPECIFICATION OR ON THE DRAWINGS.
3	PROVIDE NEUTRAL IN CIRCUIT UNLESS DEVICE SERVED DOES NOT HAVE PROVISIONS FOR A NEUTRAL CONNECTION.
4	MINIMUM SIZE CONDUIT FOR SCHEDULE 80 OR ENT IS ONE STANDARD ELECTRICAL SIZE LARGER THAN INDICATED IN THE SCHEDULE. PROVIDE LARGER CONDUIT WHERE SPECIFICALLY INDICATED OTHERWISE. DO NOT INSTALL PVC INDOORS.
5	PROVIDE SEPARATE, INSULATED EQUIPMENT GROUNDING CONDUCTOR WITH EACH FEEDER AND BRANCH CIRCUIT.
6	PROVIDE ADDITIONAL ISOLATED GROUNDING CONDUCTOR SAME SIZE AS THE EQUIPMENT GROUND. IN CIRCUITS TO ISOLATED GROUND PANELS OR DEVICES, GREEN WITH YELLOW STRIPE.
7	FOR PANELS WITH 200% NEUTRAL PROVIDE 200% NEUTRAL USING TWO PHASE SIZED CONDUCTORS IF SIZE 1/0 OR LARGER, OTHERWISE PROVIDE (1) 3/0 NEUTRAL.
8	PROVIDE SEPARATE INDIVIDUAL NEUTRAL FOR ALL CIRCUITS EXCEPT LIGHTING CIRCUITS. PROVIDE A DEDICATED NEUTRAL FOR GFCI AND AFCI CIRCUITS.
9	CIRCUIT SIZING BASED ON 600 VOLT 90 DEGREE (C) RATED INSULATION. INTERIOR TYPE THHN/THWN OR XHHW-2 (LARGER THAN SIZE #6), FOR EXTERIOR OR BELOW GRADE UTILIZE RHW-2/USE-2 IN CONDUIT ONE SIZE LARGER. SIZING BASED ON 60 DEGREE (C) FOR AMPACITIES 100A OR LESS AND 75 DEGREE (C) AMPACITIES OVER 100A.
10	FOR SERVICE ENTRANCE CONDUCTORS IT IS NOT REQUIRED TO INSTALL THE GROUNDING CONDUCTOR. THE NEUTRAL CONDUCTOR IS FULL SIZED AND IS BONDED TO THE GROUNDING ELECTRODE CONDUCTOR AT THE TRANSFORMER AND THE SERVICE DISCONNECT.
11	FOR BATTERY CABLES, INSTALL AND GROUP IN PAIRS (ONE POSITIVE AND ONE NEGATIVE CONDUCTOR). MARK POSITIVE CONDUCTOR WITH (5) OVERLAPPING WRAPS OF RED ELECTRICAL TAPE ON EACH END.

ELECTRICAL SCHEDULE OF MECHANICAL EQUIPMENT																	
TAG	DESCRIPTION/ AREA SERVED	VOLTS	PH	LOAD	FLA	MCA	MOPD	DISCONNECT SWITCH				STARTER (NEMA)		POWER SOURCE	NOTES		
								FRAME	POLES	FUSE	NEMA ENCL	FBD	SIZE/ VFD			FBD	CBD
P-1	HYDRONIC PUMP	120	1		1	-	-	MRT	1	-	1	26	-	-	23	PC-4	
P-6	DRINKING FOUNTAIN	120	1		4.4	4.4	-	-	-	-	-	-	-	-	23	SEE PLAN 8, 9	
DOAS-1	AIR HANDLING UNIT	208	3	40.8 A	47.6	53.5	70		- FWE -			- FWE -	23	23	PCR-2	2	
CU-1	OUTDOOR UNIT	208	1	45 A	45.0		80	60	3	-	3R	26	-	-	23	PCR-2 3	
CU-2	OUTDOOR UNIT	208	1	45 A	45.0		80	60	3	-	3R	26	-	-	23	PCR-2 3	
CU-3	OUTDOOR UNIT	208	1	45 A	45.0		80	60	3	-	3R	26	-	-	23	PCR-2 3	
CU-4	OUTDOOR UNIT	208	1	45 A	45.0		80	60	3	-	3R	26	-	-	23	PCR-2 3	
CU-5	OUTDOOR UNIT	208	1	45 A	45.0		80	60	3	-	3R	26	-	-	23	PCR-1 3,10	
CU-6	OUTDOOR UNIT	208	1	45 A	45.0		80	60	3	-	3R	26	-	-	23	PCR-1 3,10	
CU-7	OUTDOOR UNIT	208	1	45 A	45.0		80	60	3	-	3R	26	-	-	23	SEE NOTE 5 3	
	NOTES:										ABBREVIATIONS:						
1	LEAD/LAG										FWE	FURNISHED WITH EQUIPMENT					
2	DUCT SMOKE DETECTORS FURNISHED BY DIVISION 26, INSTALLED BY DIVISION 23, WIRED TO FIRE ALARM BY DIVISION 26.										NF	NOT FUSED					
3	POWER TO OUTDOOR CU BY DIVISION 26. WIRING BETWEEN OUTDOOR CU AND INDOOR AC PROVIDED BY DIVISION 23.										SWBD	SWITCHBOARD					
4	PUMPS SHALL BE WIRED TO BOILER, SAME CIRCUIT AS RESPECTIVE BOILER.										FBD	FURNISHED BY DIVISION					
5	UNDER BASE BID, POWER SOURCE SHALL BE PCR-1. IF DEDUCT ALTERNATE #2 IS ACCEPTED, POWER SOURCE SHALL BE (E)PC3.										CBD	CONTROL WIRING BY DIVISION					
6	PROVIDE A SINGLE CIRCUIT TO SERVE THE RESPECTIVE HP UNITS SERVED BY A CU.										MRT	MOTOR RATED TOGGLE SWITCH					
7	PROVIDE 120V, 10A CIRCUIT TO PUMP CONTROLLER, POWER PUMP FROM CONTROLLER.																
8	CORD AND PLUG FURNISHED WITH EQUIPMENT. PROVIDE NEMA 5-15 RECEPTACLE. COORDINATE EXACT LOCATION FOR RECEPTACLE IN FIELD.																
9	PROVIDE GFCI CIRCUIT BREAKER IN INDICATED PANEL																
10	PROVIDE UNDER BASE BID ONLY, NOT UNDER DEDUCT ALTERNATE #2.																

TECHNOLOGY MATRIX

TECHNOLOGY GENERAL NOTES:

1. DIVISION 26 SHALL PROVIDE BOXES AND CONDUITS WITH PULL STRINGS UNO. DIVISION 27 SHALL PROVIDE CABLING, OUTLETS, AND TERMINATIONS.

2. FOR EACH TECHNOLOGY OUTLET, PROVIDE CONCEALED CONDUIT FROM EACH OUTLET BOX TO 6" ABOVE THE NEAREST ACCESSIBLE CORRIDOR CEILING THAT IS CONTIGUOUS TO THE NEAREST IT ROOM, J-HOOK, OR CABLE TRAY PATHWAY, U.N.O. IN ROOMS WITHOUT CEILINGS, CONDUIT SHALL BE RUN AT UNDERSIDE OF DECK TO 6" ABOVE THE NEAREST ACCESSIBLE CORRIDOR CEILING THAT IS CONTIGUOUS TO THE NEAREST IT ROOM, J-HOOK, OR CABLE TRAY PATHWAY, U.N.O. CONDUIT PATHWAYS SHALL BE PROVIDED FOR ANY PORTION OF THE PATH TO NEAREST IT ROOM, J-HOOK, OR CABLE TRAY THAT HAS EXPOSED DECK OR HAS INACCESSIBLE CEILINGS.

SINGLE GANG BOX

DOUBLE GANG BOX

FLUSH COVER/PLATE UNDERFLOOR BOX

SYMBOL	MTG HT AFF UNO	DESCRIPTION	KEY NOTE	CONDUIT SIZE	BOX TYPE		
	18"	(1) VOICE AND (1) DATA OUTLETS		3/4"	X		
	18"	(2) VOICE AND (2) DATA OUTLETS		3/4"	X		
	18"	(1) VOICE AND (2) DATA OUTLETS		3/4"	X		
	18"	(1) DATA OUTLET		3/4"	X		
	18"	(2) DATA OUTLETS		3/4"	X		
	45"	WALL PHONE OUTLET		3/4"			
	45"	ELEVATOR PHONE OUTLET		3/4"			
	18"	CATV OUTLET		3/4"	X		
	ABOVE CEILING	DATA OUTLET FOR WIRELESS ACCESS POINT			X		
		UNDERFLOOR/FLUSH COVER BOX WITH (1) DATA OUTLETS, (1) DUPLEX RECEPTACLES AND EMPTY 2-GANG FOR AV USE	2	(2) 1" UNDERSLAB & (1) 1 1/4" UNDERSLAB			X
		UNDERFLOOR/FLUSH FLOOR BOX WITH (1) GFI DUPLEX RECEPTACLE	2	(1) 1" UNDERSLAB			X
		UNDERFLOOR/FLUSH FLOOR BOX WITH (2) GFI DUPLEX RECEPTACLE	2	(1) 1" UNDERSLAB			X

NOTES:

1. MOUNTING HEIGHT AS NOTED ON PLANS.

2. SEE FLOOR BOX DETAIL. BASIS OF DESIGN: FSR, INC., FL-600P SERIES.

3. FOR AREAS WITH SUSPENDED CEILINGS, INSTALL BOX ABOVE CEILING. WIRING SHALL BE CONCEALED ABOVE CEILINGS OR IN CONDUIT WHERE EXPOSED. FOR AREAS WITHOUT CEILINGS, MOUNT BOX AT UNDERSIDE OF DECK AND PROVIDE CONDUIT PER TECHNOLOGY GENERAL NOTE 2 ABOVE.

SPECIAL RECEPTACLE SCHEDULE					
TAG	NEMA	DESCRIPTION (SINGLE DEVICE)	OCPD	BRANCH CIRCUIT	
A	5-15R	15A-125V 2P,3W	15A-1P	2#12 & 1#12GND - 3/4" C	
A1	5-15R	15A-125V 2P,3W, GFCI	15A-1P	2#12 & 1#12GND - 3/4" C	
B	5-20R	20A-125V 2P,3W	20A-1P	2#12 & 1#12GND - 3/4" C	
B1	5-20R	20A-125V 2P,3W, GFCI	20A-1P	2#12 & 1#12GND - 3/4" C	
C	5-30R	30A-125V 2P,3W	30A-1P	2#10 & 1#10GND - 3/4" C	
D	5-50R	50A-125V 2P,3W	50A-1P	2#6 & 1#10GND - 3/4" C	
E	6-15R	15A-250V 2P,3W	15A-2P	2#12 & 1#12GND - 3/4" C	
F	6-20R	20A-250V 2P,3W	20A-2P	2#12 & 1#12GND - 3/4" C	
G	6-30R	30A-250V 2P,3W	30A-2P	2#10 & 1#10GND - 3/4" C	
H	6-50R	50A-250V 2P,3W	50A-2P	2#6 & 1#10GND - 3/4" C	
I	14-20R	20A-125/250V 3P,4W	20A-2P	3#12 & 1#12GND - 3/4" C	
J	14-30R	30A-125/250V 3P,4W	30A-2P	2#10 & 1#10GND - 3/4" C	
K	14-50R	50A-125/250V 3P,4W	50A-2P	3#6 & 1#10GND - 1" C	
L	14-60R	60A-125/250V 3P,4W	60A-2P	3#6 & 1#10GND - 1" C	
M	15-20R	20A-250V 3PH,3P,4W	20A-3P	3#12 & 1#12GND - 3/4" C	
N	15-30R	30A-250V 3PH,3P,4W	30A-3P	3#10 & 1#10GND - 3/4" C	
P	15-50R	50A-250V 3PH,3P,4W	50A-3P	3#6 & 1#10GND - 1" C	
Q	15-60R	60A-250V 3PH,3P,4W	60A-3P	3#6 & 1#10GND - 1" C	
R	L5-20R	20A-125V 2P,3W, TWIST LOCK	20A-1P	2#12 & 1#12GND - 3/4" C	
S	L5-30R	30A-125V 2P,3W, TWIST LOCK	30A-1P	2#10 & 1#10GND - 3/4" C	
T	L6-15R	15A-250V 2P,3W, TWIST LOCK	15A-2P	2#12 & 1#12GND - 3/4" C	
U	L6-20R	20A-250V 2P,3W, TWIST LOCK	20A-2P	2#12 & 1#12GND - 3/4" C	
V	L6-30R	30A-250V 2P,3W, TWIST LOCK	30A-2P	2#10 & 1#10GND - 3/4" C	
W	L14-20R	20A -125/250V 3P,4W TWIST LOCK	20A-2P	3#12 & 1#12GND - 3/4" C	
X	L14-30R	30A -125/250V 3P,4W TWIST LOCK	30A-2P	3#10 & 1#10GND - 3/4" C	
Y	14-50R	50A - 125/250V 3P,4W	40A-3P	3#6 & 1#10GND - 1" C	
Z	L16-30R	30A-480V, 3P,4W, TWIST LOCK	30A-3P	3#10 & 1#10GND - 3/4" C	

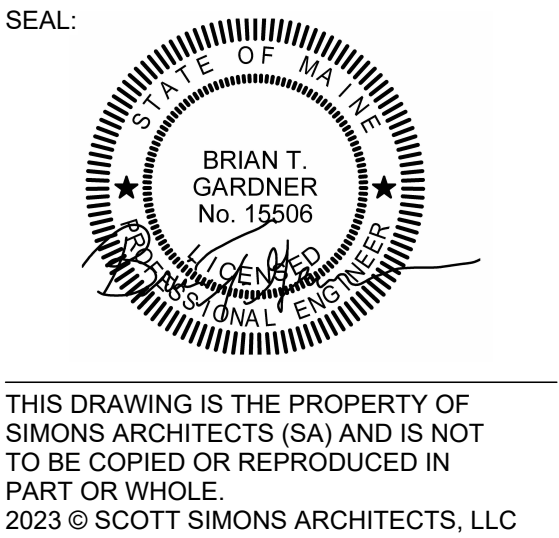


75 York Street
Portland, Maine 04101
simonsarchitects.com
207.772.4656

Allied Engineering
A Salas O'Brien Company
**160 Veranda Street
Portland, Maine 04103
P: 207.221.2260
F: 207.221.2266**

© COPYRIGHT 2025 ALLIED ENGINEERING, INC.
Allied Project No: 23030
Cad File:

PROJECT NAME:
**MCJA - BUILDING
C LIMITED
RENOVATIONS**
15 OAK GROVE RD
VASSALBORO, ME 04989



THIS DRAWING IS THE PROPERTY OF SIMONS ARCHITECTS (SA) AND IS NOT TO BE COPIED OR REPRODUCED IN PART OR WHOLE.
2023 © SCOTT SIMONS ARCHITECTS, LLC

REVISIONS
1 Addendum No.4 25-05-13

DATE OF ISSUE: APRIL 16, 2025
PROJECT NUMBER: 2023-0070
STATUS: PERMIT SET

**ELECTRICAL
SCHEDULES**

E-600