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ADDENDUM NO. 01

PROJECT: Newburgh Enlarged City School District
2019 Capital Improvements Project – Phase 3

CPL PROJECT NO. 13940.18

SED PROJECT NO. Heritage Middle School SED # 44-16-00-01-0-039-011

DATE: September 21, 2021

Include this Addendum as part of the Contract Documents. It supplements portions of the original specifications and drawings, the extent of which shall remain, except as revised herein:

CLARIFICATIONS:

1.1 On drawing HMS I200A: All transition strips shall be part of alternate # GC-6

1.2 The existing Public Address System is Simplex. PA rack is located in the Main Office 101 on First Floor.

CHANGES TO THE PROJECT MANUAL:

2.1 After Section 000115, add the attached Section 000550 – Construction Schedule.

2.2 Add the attached Section 011200 "Multiple Contract Summary" after section 011000 "Summary"

2.3 Section 015001:

2.3.1 After Part 3.4.L, add the following:

"M. Project Identification and Temporary Signs: The General Contractor will prepare Project identification and other signs in sizes indicated. Install signs where indicated to inform public and persons seeking entrance to Project. Do not permit installation of unauthorized signs.

50 Front Street, Suite 202
Newburgh, NY 12550
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a. Engage an experienced sign painter to apply graphics for Project identification signs. Comply with details indicated.

b. Prepare temporary signs to provide directional information to construction personnel and visitors.

c. Construct signs of exterior-type Grade B-B high-density concrete form overlay plywood. Support on posts or framing of preservative-treated wood or steel.
   i. Size: 4-feet by 8-feet by 3/4-inch thick.

d. Paint sign panel and applied graphics with exterior-grade alkyd gloss enamel over exterior primer."

2.3.2 Add the attached "Site Logistics Plan" to the end of section 015001 "Temporary Facilities & Controls"

2.4 Section 042000: After Part 2.02.C add the following:

"D. Decorative CMUs: ASTM C 90.
1. Manufacturers
   a. Barnes and Cone. Split Faced CMU
   b. York Building Product
   c. Anchor an Oldcastle company
2. Unit Compressive Strength: Provide units with minimum average net-area compressive strength of 2150 psi.
3. Density Classification: Normal weight.
4. Size: 4"x 8"x16" nominal.
5. Pattern and Texture: Split Rib 2, split-face finish.
6. Colors: As selected from manufacturers full range."

2.4. Section 055000: Delete in its entirety

2.5 Section 096990: Delete in its entirety

TO THE DRAWINGS:

0.1 Drawing HMS S202: Revise note, "Conc. Chiller…" to read, "Concrete Movement Sensitive Equipment Pad. Refer to Detail 6/S802 and H drawings. Coordinate with Mechanical contractor for exact size and location.

3.2 Drawing HMS A100A & HMS A100B: Revise keynote M4 to read; "Remove existing ballasted system down to vapor barrier, cut back counter flashing to face of masonry."

3.3 Drawing HMS A200A: Replace with the attached revised HMS A200A.

3.4 Drawing HMS A204B; Replace sheet with attached revised HMS A204B

3.5 Drawing HMS A205: Replace sheet with attached revised HMS A205

3.6 Drawing HMS A206: Replace sheet with attached revised HMS A206

3.7 Drawing HMS A801:

3.7.1 Replace detail 6 with the attached detail shown on sketch AD01 SK-A01

3.7.2 Replace detail 10 per the attached sketch AD01 SK-A02

3.8 Drawing HMS I000; Interior Finish Schedule: Delete Note "Provide ARDEX or equal…" from SVT-1 and SVT-2

3.9 Drawing HMS I300B: Replace sheet with attached HMS I300B

3.10 Drawing HMS H100B: Replace with the attached revised HMS H100B.

3.11 Drawing HMS H100C:

3.11.1 Revise keynote 1 to read; "Remove existing unit ventilator, save control valve actuator and prepare control wiring for extension to new unit. Outdoor air louver to remain."

3.11.2 Add keynote 1 to existing UV-9.

3.11.3 Revise keynote 3 to read; "Remove existing unit ventilator, save control valve actuator and prepare control wiring for new unit."

3.12 Drawing HMS H100D:

3.12.1 Revise keynote 1 to read; "Remove existing unit ventilator, save control valve actuator and prepare control wiring for extension to new unit. Outdoor air louver to remain."

3.12.2 Add keynote 1 to existing UV-6.

3.12.3 Revise keynote 3 to read; "Remove existing unit ventilator, save control valve actuator and prepare control wiring for new unit."

3.12.4 Revise keynote 4 to read; "Remove existing dust collector, controls, equipment pad and ductwork.

3.13 Drawing HMS H101A: Add keynote 4 to "72x18" (E) openings in two locations.

3.14 Drawing HMS H101B:

3.14.1 Revise keynote 2 to read; "Remove existing 34x54 gravity relief in its entirety including curb."

3.14.2 Existing GRV-6 shall be removed.

3.15 Drawing HMS H101C:

3.15.1 Revise keynote 1 to read; "Remove existing unit ventilator, save control valve actuator and prepare control wiring for extension to new unit. Outdoor air louver to remain."

3.15.2 Remove keynote 8.

3.16 Drawing HMS H101D:

3.16.1 Revise keynote 1 to read; "Remove existing unit ventilator, save control valve actuator and prepare control wiring for extension to new unit. Outdoor air louver to remain."

3.16.2 Revise keynote 5 to read; "Note not used."

3.17 Drawing HMS H102C: Replace sheet with attached revised HMS H102C

3.18 Drawing HMS H102D:

3.18.1 Revise keynote 4 to read; "Remove RSL/RLL piping in its entirety."

3.18.2 Revise keynote 6 to read; "Remove existing unit ventilator, save control valve actuator and prepare control wiring for extension to new unit. Outdoor air louver to remain."

3.18.3 Revise keynote 1 to read; "Remove existing unit ventilator, save control valve actuator and prepare control wiring for extension to new unit. Outdoor air louver to remain."

3.19 Drawing H103C:

3.19.1 Delete General Notes.

3.19.2 Revise keynote 1 to read; "Remove existing unit ventilator, save control valve actuator and prepare control wiring for extension to new unit. Outdoor air louver to remain."

3.20 Drawing HMS H103D:

3.20.1 Revise keynote 1 to read; "Remove existing unit ventilator, save control valve actuator and prepare control wiring for extension to new unit. Outdoor air louver to remain."

3.20.2 Delete General Notes.

3.21 Drawing HMS H200B: Replace sheet with attached revised HMS H200B

3.22 Drawing HMS H200C:

3.22.1 Add keynote 3 to read; "Alternate MC-2 includes unit, ductwork and piping back to mains."

3.22.2 Add keynote 3 to FC-2 adjacent to Stair G.

3.23 Drawing HMS H200D:

3.23.1 Add keynote 6 to read; "Alternate MC-2 includes unit, ductwork and piping back to mains."

3.23.2 Add keynote 6 to FC-3 adjacent to Stair A.

3.24 Drawing HMS H201A: Replace sheet with attached revised HMS H201A

3.25 Drawing HMS H201C:

3.25.1 Keynotes:

3.25.1.1 Add keynote 4 to read; "Alternate MC-2 includes unit, ductwork and piping back to mains."

3.25.1.2 Revise keynote 3 to read; "Provide new duct and reinstall electric reheat coil."

3.25.2 Add keynote 4 to FC-4 adjacent to Stair FF and FC-8 adjacent to Guidance 170.

3.26 Drawing HMS H201D:

3.26.1 Revise keynote 3 to read: "Alternate MC-2 includes unit, ductwork and piping back to mains."

3.26.2 Add keynote 3 to FC-5 adjacent to Stair A.

3.27 Drawing HMS H202C:

3.27.1 Revise keynote 3 to read; "Alternate MC-2 includes unit, ductwork and piping back to mains."

3.27.2 Add keynote 3 to FC-6 adjacent to Stair FF.

3.27.3 Delete keynote bubble 3 from Faculty Room 210.

3.28 Drawing HMS H202D:

3.28.1 Keynotes:

3.28.1.1 Revise Keynote 3 to read; "Alternate MC-2 includes unit, ductwork and piping back to mains."

3.28.1.2 Delete keynote 5 and all references to it.

3.28.2 Add keynote 3 to FC-7.

3.29 Drawing HMS H203C:

3.29.1 Keynotes:

3.29.1.1 Revise keynote 8 to read "Alternate MC-2 includes unit, ductwork and piping back to mains."

3.29.1.2 Delete keynote 9 in its entirety.

3.29.2 Add keynote 8 to FC-11 adjacent to Math 401.

3.30 Drawing HMS H203D:

3.30.1 Revise keynote 5 to read "Alternate MC-2 includes unit, ductwork and piping back to mains."

3.30.2 Add keynote 5 to FC-9 adjacent to ELA 405.

3.31 Drawing HMS H300A: Replace sheet with attached revised HMS H300A.

3.32 Drawing HMS H300B:

3.32.1 Add keynote 4 to read; "Mount SSI as high as possible, coordinate location with existing, provide new temperature controls."

3.32.2 Add keynote 4 to SSI-9.

3.33 Drawing HMS H300C: Add keynote 3 to area page left where the new 6" chilled water piping enters from. Area has some congestion and will require stacking piping or rerouting piping to accommodate new work.

3.34 Drawing HMS H301A:

3.34.1 Revise keynote 1 to read; "Refer to H300A for control sensor locations."

3.34.2 Revise keynote 2 to read; "Condensate shall be routed through the interior and penetrate to the exterior 8" above grade maximum."

3.35 Drawing HMS H301B: Replace sheet with attached revised HMS H301B.

3.36 Drawing HMS H302D:

3.36.1 Add keynote 3 to floor mounted unit ventilators in rooms 313, 314, and 315.

3.36.2 Unit labels shall match sheet H202D.

3.37 Drawing HMS H303D: Replace sheet with attached revised HMS H303D

3.38 Drawing HMS H900: Replace sheet with attached revised HMS H900

3.39 Drawing HMS H901: Replace sheet with attached revised HMS H901

3.40 Drawing HMS E200B: Revise first sentence of keynote 3 to read, “Mount new projection equipment provided by owner on bottom of soffit.”

3.41 Drawing HMS E201B: Replace with the attached revised HMS E201B

3.42 Drawing HMS E900: Replace with the attached revised HMS E900

3.43 Drawing HMS E901: Replace with the attached revised HMS E901

END OF ADDENDUM NO. 01

SECTION 000550
CONSTRUCTION SCHEDULE

PART 1-GENERAL

1.1 CONSTRUCTION SCHEDULE

1.01 CONTRACTOR SHALL COMPLETE WORK OF THIER CONTRACT PER THE ATTACHED CONSTRUCTION SCHEDULE.

PART 2 - PRODUCTS (NOT USED)

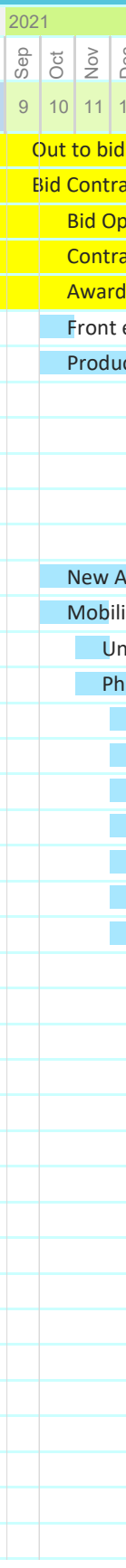
PART 3 - EXECUTION (NOT USED)

END OF SECTION 000550

Heritage

Project Lead: TPG

WBS	Task Name	Start	Finish	Duration	RESPONSIBILTY	LOCATION
1	Out to bid	Mon 06-Sep-21	Tue 05-Oct-21	22		
2	Bid Contractor Walkthrough	Wed 22-Sep-21	Wed 22-Sep-21	1		
3	Bid Opening	Tue 05-Oct-21	Tue 05-Oct-21	1		
4	Contractor qualification	Thu 07-Oct-21	Mon 11-Oct-21	3		
5	Award contracts	Tue 12-Oct-21	Wed 13-Oct-21	2		
6	Front end submittals	Thu 14-Oct-21	Fri 29-Oct-21	12		
7	Product submittals	Thu 14-Oct-21	Wed 15-Dec-21	45		
8	Substantial Completeion	Thu 01-Sep-22	Thu 01-Sep-22	1		
9	C of O Inspection	Tue 23-Aug-22	Tue 23-Aug-22	1		
10	Startup and balancing	Tue 24-May-22	Mon 05-Dec-22	140		
11	Closeout	Tue 06-Sep-22	Mon 10-Oct-22	25		
12	Demobilize	Tue 06-Sep-22	Mon 10-Oct-22	25		
13	**New Addition Construction**	Thu 14-Oct-21	Mon 15-Aug-22	218		
14	Mobilization / Site fence	Thu 14-Oct-21	Wed 03-Nov-21	15		
15	Under ground utility re-route	Thu 04-Nov-21	Wed 24-Nov-21	15		
16	Phase one site prep	Thu 25-Nov-21	Wed 01-Dec-21	5		
17	Survey stakeout	Thu 02-Dec-21	Thu 02-Dec-21	1		
18	Phase two site/pad prep	Fri 03-Dec-21	Mon 06-Dec-21	2		
19	Excavation footings	Tue 07-Dec-21	Thu 09-Dec-21	3		
20	Footing rebar	Fri 10-Dec-21	Tue 21-Dec-21	8		
21	Form and pour footings	Wed 22-Dec-21	Tue 28-Dec-21	5		
22	Strip footings	Wed 29-Dec-21	Thu 30-Dec-21	2		
23	Rebar FO walls / set sleeves	Fri 31-Dec-21	Mon 10-Jan-22	7		
24	Install anchor bolts	Tue 11-Jan-22	Tue 11-Jan-22	1		
25	Form and Pour FO walls	Wed 12-Jan-22	Wed 19-Jan-22	6		
26	Strip walls	Thu 20-Jan-22	Fri 21-Jan-22	2		
27	Waterproof FO Walls	Mon 24-Jan-22	Tue 25-Jan-22	2		
28	Backfill FO Walls	Wed 26-Jan-22	Fri 28-Jan-22	3		
29	Prep SOG	Mon 31-Jan-22	Thu 03-Feb-22	4		
30	Stone for SOG	Fri 04-Feb-22	Wed 09-Feb-22	4		
31	Underground MEP / outlets	Thu 10-Feb-22	Wed 16-Feb-22	5		
32	Waterproof SOG	Thu 17-Feb-22	Mon 21-Feb-22	3		
33	Rebar SOG	Tue 22-Feb-22	Tue 01-Mar-22	6		
34	Pour SOG + cure time	Wed 02-Mar-22	Tue 15-Mar-22	10		
35	Set structural steel framing	Wed 16-Mar-22	Tue 29-Mar-22	10		
36	Set roof deck	Wed 30-Mar-22	Tue 12-Apr-22	10		
37	Install temp roof	Wed 13-Apr-22	Tue 26-Apr-22	10		
38	Set Storefront	Wed 20-Apr-22	Tue 03-May-22	10		
39	interior framing	Wed 20-Apr-22	Tue 10-May-22	15		
40	Mechanical rough / duct work	Thu 07-Apr-22	Wed 27-Apr-22	15		



41	Electrical rough	Wed 11-May-22	Tue 31-May-22	15	
42	Plumbig rough	Wed 11-May-22	Mon 30-May-22	14	
43	exterior finish	Wed 04-May-22	Tue 31-May-22	20	
44	finish roofing / tie in	Wed 30-Mar-22	Tue 26-Apr-22	20	
45	Exterior concrete Sidewalks	Sat 28-May-22	Fri 24-Jun-22	20	
46	Sheet rock / tapingc/ Paint	Tue 07-Jun-22	Mon 18-Jul-22	30	
47	Ceilings	Tue 19-Jul-22	Mon 08-Aug-22	15	
48	Architechtural finishes	Tue 19-Jul-22	Mon 08-Aug-22	15	
49	MEP finishes	Tue 19-Jul-22	Mon 15-Aug-22	20	
50	Final Cleaning / training / turnover	Tue 16-Aug-22	Mon 05-Sep-22	15	
51	C of O Inspection	Tue 23-Aug-22	Tue 23-Aug-22	1	
52	startup and balancing	Tue 16-Aug-22	Mon 05-Dec-22	80	
53	**Existing Cafeteria Renovation**	Tue 28-Jun-22	Tue 06-Sep-22	51	
54	Demo Space/MEPS	Tue 28-Jun-22	Thu 07-Jul-22	8	
55	New Mechanical / MEP rough	Fri 08-Jul-22	Thu 04-Aug-22	20	
56	Framing	Fri 05-Aug-22	Tue 16-Aug-22	8	
57	Sheetrock	Fri 12-Aug-22	Mon 29-Aug-22	12	
58	Paint / finishes	Tue 30-Aug-22	Tue 06-Sep-22	6	
59	Mechanical Startup and balancing	Wed 07-Sep-22	Fri 09-Dec-22	68	
60	**GYM MEP Second Shift work**	Thu 16-Dec-21	Mon 15-Aug-22	173	
61	New unit install	Tue 01-Feb-22	Mon 04-Apr-22	45	
62	Duct work install	Tue 05-Apr-22	Mon 09-May-22	25	
63	Copper runs	Tue 05-Apr-22	Mon 09-May-22	25	
64	Diffusers and grills	Tue 10-May-22	Mon 23-May-22	10	
65	Demo Existing Mechanical	Tue 28-Jun-22	Mon 29-Aug-22	45	
66	Mechanical Startup and balancing	Tue 24-May-22	Fri 09-Dec-22	144	
67	**Existing BLDG MEP / ceilings Second**	Thu 16-Dec-21	Mon 15-Aug-22	173	
68	Chiller line / ceiling removal	Thu 16-Dec-21	Wed 23-Mar-22	70	
69	New Ceiling unit install	Tue 28-Jun-22	Mon 19-Sep-22	60	
70	New Copper runs / condensate	Thu 16-Dec-21	Wed 23-Mar-22	70	
71	Electrical tie ins	Tue 28-Jun-22	Mon 29-Aug-22	45	
72	New ceilings	Tue 12-Jul-22	Mon 29-Aug-22	35	
73	Demo Existing Mechanical	Tue 28-Jun-22	Mon 08-Aug-22	30	
74	New units tie ins	Mon 04-Jul-22	Thu 01-Sep-22	44	
75	Floor / finishes repair	Tue 05-Jul-22	Mon 15-Aug-22	30	
76	Mechanical Start up And balancing	Tue 16-Aug-22	Fri 09-Dec-22	84	
77	**Site work summer 2022**	Tue 28-Jun-22	Thu 01-Sep-22	48	
78	Concrete sidewalk demo	Tue 28-Jun-22	Mon 22-Aug-22	40	
79	New conc. Sidewalk forms	Tue 05-Jul-22	Mon 08-Aug-22	25	
80	New Conc. Sidewalk pour	Tue 19-Jul-22	Mon 29-Aug-22	30	
81	New Asphalt at entrance + stripeing	Tue 05-Jul-22	Wed 03-Aug-22	22	
82	Soil and seeding	Thu 04-Aug-22	Wed 24-Aug-22	15	
83	**Submittals Long Leed Submission**	Thu 14-Oct-21	Wed 10-Nov-21	20	Submi
84	Casework / Shop drawings	Thu 14-Oct-21	Wed 27-Oct-21	10	Casew
85	Windows / Shop Drawings	Thu 14-Oct-21	Wed 27-Oct-21	10	Windo

86	Mechanical units	Thu 14-Oct-21	Wed 27-Oct-21	10		Mecha
87	Doors	Thu 14-Oct-21	Wed 27-Oct-21	10		Doors
88	Steel / rebar / Shop Drawings	Thu 14-Oct-21	Wed 27-Oct-21	10		Steel /
89	Main electrical Equipment	Thu 14-Oct-21	Wed 27-Oct-21	10		Main e
90	Gym Equipment	Thu 14-Oct-21	Wed 27-Oct-21	10		Gym E
91	Lighting fixtures	Thu 14-Oct-21	Wed 27-Oct-21	10		Lightin
92	Roof insulation	Thu 14-Oct-21	Wed 27-Oct-21	10		Roof in
93	Brick	Thu 14-Oct-21	Wed 27-Oct-21	10		Brick
94	Drinking fountains	Thu 14-Oct-21	Wed 27-Oct-21	10		Drinkin
95	Coordination drawings	Thu 14-Oct-21	Wed 27-Oct-21	10		Coordi
96	Site work catch basins / vaults	Thu 14-Oct-21	Wed 27-Oct-21	10		Site wo
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SECTION 011200 - SUMMARY MULTIPLE PRIMES

1.1 RELATED DOCUMENTS

A. Drawings and general provisions of the Contract, including the General and Supplemental Conditions and Division 1 Specification Section, apply to this Section.

1.2 SUMMARY

A. Section includes:
   a) Project information.
   b) Work covered by Contract Documents.
   c) Construction schedule.
   d) Requirements and assignments for each Contract.
   e) Owner-furnished products.
   f) Access to site.
   g) Coordination with occupants.
   h) Work restrictions.

B. Section includes a summary of each contract, including responsibilities for coordination and temporary facilities and controls.

C. Each Contractor is responsible to review all Drawings and Specifications for every contract to gain a complete understanding and knowledge of the entire Project, to determine how the work of each contract is to interface with every other contract.

1.3 DEFINITIONS

A. Project Identification: Project consists of all labor, materials, equipment, appliances, services, and incidentals necessary for layout, installing, and performing Additions and Alterations at the Newburgh Enlarged City School District as shown on the Contract Drawings and described in the Specifications.

B. The work will be constructed under multiple prime contracts. One set of contract documents is issued covering the multiple contracts. Each Prime Contract is defined as:
   a) CONTRACT 1 GC – GENERAL CONSTRUCTION WORK
   b) CONTRACT 2 MC – MECHANICAL/PLUMBING CONSTRUCTION WORK
      1) Plumbing will be covered in the Mechanical Construction Scope and contract.
   c) CONTRACT 3 EC – ELECTRICAL CONSTRUCTION WORK

C. Architect Identification: The Contract Documents were prepared for the Project by CPL Architecture-Engineering-Planning

D. Construction Manager: The Palombo Group has been engaged as Construction Manager for this Project to serve as an advisor to Owner and to provide assistance in administering the Contract for Construction between Owner and Contractor, according to a separate contract between Owner and Construction Manager.

E. Building Code in Effect for Project: 2020 NYS Building Code.

F. Comply with the following: New York State buildings Code and the building standards of the New York State Education Department.

1.4 THE CONTRACT

A. The Project will be constructed under a multiple prime contracting arrangement with the Owner awarding and holding the separate Contracts. Each contractor shall furnish all labor, material, tools, equipment, supervision, layout, delivery, trucking, shop drawings, submittals, etc. necessary to complete the work described in the Division of Work of their respective Contracts and based upon a complete set of Contract Documents.

B. Each Contractor has been given the opportunity prior to bid to inspect the entire Project site for interferences to their Contract work and agrees to accept the site as it exists on the date of the bid opening.

a) It is the Owner's intention to continue to occupy the existing buildings and site for normal School operations during the Construction process. The Contractors all agree to:

b)

1) Cooperate with the Owner’s personnel in maintaining and facilitating access to the school buildings and its facilities by the School staff, Students, Owner’s agents, service consultants and the public, throughout the construction process.

2)

3) Keep driveways and entrances serving the occupied School buildings clear and available to the Owner, the Owner’s employees, the public, and to emergency vehicles always. Do not obstruct access to, or use these areas for parking, staging of equipment or materials. All access through these existing areas must be coordinated in advance and in accordance with the Owner’s usage and occupancy schedule.

4)

5) Schedule construction operations to minimize any conflicts or interruptions to the daily school functions. Coordinate any necessary interruptions with the designated project representative.

6)

b) All existing Owner-occupied areas of buildings (not turned over to the Project Contractors) need to always remain operational. The contractors are responsible to maintain all systems, such as but not limited to: fire alarm, clocks, electric, public address system, gas service, heat etc.

c)

c) Each contractor will provide sign in sheets of their respective manpower to the CM Daily.

C. Each Prime Contractor shall:

a) Provide field-engineering services, in addition to those provided by the General Work Prime Contract, to install site utilities included in the applicable Prime Contract.

b) Coordinate construction schedule information to formulate one master schedule for the entire Project by the GC.

c) Provide reflective vests and PPE to be always worn by all on-site personnel. Parties that do not abide by this requirement will be escorted off the premises.

d) Provide erosion and Sediment Control and dewatering as it relates to any excavation associated with the site work Prime Contract.

e) Provide potable drinking water for its own employees.

f) Provide access to all concealed systems as required for system maintenance and repair for items installed in their Prime Contract. This specifically talks to access panels needed for future maintenance by the district.

g) Provide and maintain material lifting equipment required for the completion of their Contract requirements, and complying with NYS Labor Laws, OSHA Regulations, and other Federal, State, and local laws.

h) Provide and maintain additional temporary stairs, ladders, ramps, scaffolding, and platforms required specifically for completion of work of their own Contract, and as further detailed in this section. All work needs to comply with the NYS Labor Laws, OSHA regulation, and other Federal, State, and local laws.

i) Provide Fire Prevention materials and equipment for fire protection related to the work of their own Prime Contract. Provide fire extinguishers, fire blankets, and fire watch during all cutting and welding operations.

j) Provide any supplemental lighting required to install the work of its own Contract, beyond the minimum OSHA levels provided under the Electrical Work Prime Contract.

k) Provide any supplemental heat required to install the work of its own Contract.

l) Provide traffic control for deliveries, and equipment needed to perform the work of their own Prime Contract.

m) Provide protection of its own finished Work, after installation, until accepted by the Owner.

n) Provide fireproofing for any penetration related to the work for its own Prime Contract.

o) Provide any office and storage trailers required to complete the work of their own Prime Contract.

p) Provide final cleaning of all surfaces and areas within the work areas to the satisfaction of the CM.

q) Provide for a thorough final cleaning of the site, building, and equipment provided under their Prime Contract immediately before the final inspection. Each Prime

Contractor is responsible for cleaning and dust and debris generated from the work of their own Contract.

u) Maintain areas in a cleaned condition until the Owner occupies the space.

D. Definition of Extent of Prime Contract Work; Additional Prime Contract Work not previously described

a) All Prime Contractors are responsible for reviewing plans and specs as it pertains to their scope of work mentioned in the contract documents. Scopes of work referenced may be found in multiple locations throughout the plans and specifications.

b) Local custom and trade union jurisdictional settlements do not control the scope of work included in each prime contract. When a potential jurisdictional dispute or similar interruption of work is first identified or threatened, the affected prime contracts shall promptly negotiate a reasonable settlement to avoid or minimize the pending interruption and delays.

c) All OSHA safety and hazardous materials regulations will be enforced on this project. All Contractors must submit a safety program, a hazardous materials program, (all required data must be maintained at the job site) and attend safety meetings. Toolbox talks will be required from each prime contractor daily.

d) All Contractors are responsible for any debris caused by their work. A daily clean-up and disposal is required by each Contractor for the periods which that Contractor is performing work on site, on a day selected by the Construction Manager. Each trade will assign at least one person to the weekly clean-up; the name of this person is to be submitted to the Construction Manager. Any Contractor not providing personnel will be “back-charged” for labor provided by the Construction Manager.

e) All Contractors are responsible for cutting/patching required to complete their work unless structural support is need and if needed, work to be performed by the GC. All exposed finishes must be ready to receive paint, etc.; all concealed openings (piping, ductwork, conduit, etc.) must be repaired to comply with specified wall or deck conditions.

f) Multiple Crews: To maintain the project schedule, each Prime Contractor is to provide multiple crews. Each crew is to be furnished with its own supervision, cranes, scaffold and other means necessary to maintain the Project Schedule.

g) Supervision: The proposed project manager and field superintendent for the project is to have at least five years’ experience in the proposed position. Each successful bidder shall submit resumes to the Construction Manager for the proposed project manager and field superintendent for the project. This information will be reviewed with the Owner, Architect and Construction Manager for approval. Should the Project Manager and/or Superintendent prove unqualified for the position at any point in the project, the Construction Manager shall issue a

letter stating that the person is to be removed from involvement in the project. Action by the contractor must be made within seven working days of receipt of such letter.

h) Each prime contractor shall return areas disturbed by their work activities to condition prior to start of work.

i) Each prime contractor shall maintain within its field office a complete and current set of Contract Documents (including any Addenda, Change Orders, and Modifications thereto), approved shop drawings, samples, color schedules and other data pertinent to the Project.

j) Each prime contractor is to survey existing work and submit to the Construction Manager a list of damaged areas (i.e. plaster walls, woodwork) prior to commencing work. Any damaged areas not identified prior to the work shall be the responsibility of the contractor/ Contractors working in that area. Construction Manager will have photos of existing conditions on file for reference.

k) Unless a specific item or material is noted as to remain the Owner's property or to become the Contractor's property (or similar words), any material having salvage or reuse value shall be inspected by the Owner. If the Owner wishes to retain this material, it shall be turned over to him on the site where directed. If the Owner designates the material as scrap, it shall become the Construction Manager's property and removed from the site. Material having salvage value shall be carefully removed. If the Construction Manager designates the material as scrap, it shall become the contractor's property and removed from the site by the contractor. Material having salvage value shall be carefully removed.

l) When the building is occupied and fire alarm and safety system work is in progress, the General Contractor (Contract #1) shall continuously maintain the existing building's fire alarm and detection system and exit and emergency lighting system or provisions must be made to provide equivalent safety. Contractor must notify the local fire department of any non-operating systems.

m) All personnel required to be on site shall at all times have all required personnel protective equipment on at all times.

n) All personnel on site shall always have a photo ID displayed where visible. Those without will be removed from site at once. If the same individual fails to have the ID a second time they will be removed from site and not be allowed back on site.

1.5 SUMMARY OF WORK

A. The work will be constructed under multiple prime contracts. One set of contract documents is issued covering the multiple contracts. Each Prime Contract is defined as:
   a) CONTRACT 1 GC – GENERAL CONSTRUCTION WORK
   b) CONTRACT 2 MC - MECHANICAL/PLUMBING CONSTRUCTION WORK
   c) CONTRACT 3 EC - ELECTRICAL CONSTRUCTION WORK

B. Phase 3: 2019 Capital Improvement project (Heritage Middle School): The work consists of but not limited to the following:

d) General Contractor. New Addition, site work and renovations. Day and Night shift mandatory
e) Electrical Contractor - New Addition, site work and renovations. Main service upgrade and Mechanical connections. Day and Night shift mandatory
f) Mechanical and plumbing will be combined to the Mechanical Contract. New Addition, site work and renovations. New mechanical units throughout building. Day and Night shift mandatory

1.6 WORK UNDER SEPARATE CONTRACTS

A. The project will be constructed under a multiple-prime contracting arrangement

B. One set of documents is issued covering all prime contracts scope of work. Each prime contractor is to review ALL drawings and specifications for complete understanding and knowledge of the work to be performed.

C. The following Contract Documents are specifically included and defined as integral to each Prime Contract.
a) Bidding Requirements
b) Performance and Payment Bonds
c) Conditions of the Contract, including
a) General Conditions & Supplementary Conditions
b) Insurance Requirements
c) NYS Prevailing Wage Rates
d) Project Labor Agreement

D. Extent of Contract**:** Unless the Contract Documents contain a more specific description of the work, names and terminology on Drawings and in Specification Sections determine which contract includes a specific element of Project.

a) Unless otherwise indicated, the Work described in this Section for each contract shall be complete systems and assemblies, including products, components, accessories, and installation required by the Contract Documents.

b) The Mechanical contract to include all Plumbing scope of work as described in the project documents.

c) The General Construction Contract shall provide excavation for all trades work. The General Construction contractor is to refer to Mechanical, Plumbing, Electrical and Plumbing drawings for locations of utilities requiring excavation, removals, placements, and backfilling. Include concrete encasement of new electrical service if required by utility company.

d) Concrete Work of each contract shall be provided by the General contractor, unless specifically assigned to another Contract.

e) Provide all cutting, core drilling & patching associated with the Work of its Prime Contract. All patching is to be performed by mechanics qualified and experienced with the materials and finishes being patched and hired by the responsible Prime Contractor. New openings requiring structural reinforcing will be the responsibility of the General construction contract.

f) Lead Based Paint precautions for the Work of each contract shall be provided by each contract for its own Work. Each Prime Contractor shall provide procedures for OSHA Lead precautions.

g) Each Prime Contractor shall designate a full-time superintendent to supervise the work of the Prime Contractor, who shall always be present on the job site when work is being performed; this person shall be familiar with Project and authorized to conclude matters relating to progress. This person shall also represent their company at weekly contractor meetings.

h) Termination and removal of its temporary facilities shall be provided by each contract for its own Work.

E. Temporary Facilities and Controls**:** In addition to specific responsibilities for temporary facilities and controls indicated in this Section and in Division 1 Section 01 5000 "Temporary Facilities and Controls," each Contract is responsible for the following:

a) Installation, operation, maintenance, and removal of each temporary facility usually considered as its own normal construction activity, and costs and use charges associated with each facility

b) Generators, plug-in electric power cords and extension cords, supplementary plug-in task lighting, and special lighting necessary exclusively for its own activities.

c) Its own field office, complete with necessary furniture, and telephone service. Electrical Contractor to provide power to CM’s trailer.

d) Its own storage and fabrication sheds.

e) Temporary heat for construction at isolated work areas by Mechanical Contractor.

f) Temporary enclosures for its own construction activities.

g) Hoisting requirements for its own construction activities.

h) Each Prime Contractor is to stockpile his debris on a daily basis and place it in the dumpster. Dumpsters will be provided by the General construction contract for use by the prime contractors, recycling of materials will be instituted daily.

i) Secure lockup of its own tools, materials, and equipment.

j) Construction aids and miscellaneous services and facilities necessary exclusively for its own construction activities.

k) Safety procedures as dictated by the district, OSHA, and the NYS Department of Labor.

l) Labor for daily clean-up.

m) General Contractor to include Temp Site fence around areas of work at the site as directed by the CM and shown on the logistics plan.

n) Electrical Contractor to provide generators for temp power to be used by all trades until a permanent service from the utility provider can be established.

o) The Electrical Contractor shall provide temporary power and lighting at the areas of work for all trades within the work site.

p) Mechanical Contractor to provide temp water as required. Including hose bibs.

1.7 CONTRACT 1 - GENERAL CONSTRUCTION

A. The Work of the General Construction Work Contract includes but is not limited to, the following descriptions:

a) Includes Landscaping, Site grading, Site clearing, site storm, site utilities, site pavement, new building construction, renovations and alterations. This includes, but is not limited to, *work shown* on the following:

B. Drawings:

a) All “G” Drawings (General)
b) All “A” Drawings (Architectural)
c) All “I” Drawings (Interiors)
d) All “S” Drawings (Structural)
e) All “C” Drawings (Civil)
f) All “U” Drawings (Universal)

b) Coordination:

1) Coordination with the work of all the other contractors.

2) Each trade will participate in producing coordination drawings. The mechanical, Plumbing and electrical contractors will overlap their new work and coordinate locations, heights, routes, Etc. to eliminate hits and or obstructions from existing or new work. Each trade will meet once a week to coordinate their drawings. Ductwork and mechanical piping first, plumbing second and electrical third. A full set of coordination drawings must be completed within four weeks after award of contract.

3) General Work Contractor is to pay particular attention to coordination of work of the mechanical contractor scope and what is needed to accommodate their work.

4) This trade to provide a complete coordinated schedule including all trades durations for the span of the project, including weekly updates if necessary.

c) Demolition:

1) Removal of masonry walls, doors, and interior partitions as required for new work. General work contractor is responsible for shoring, demolition and protection of areas associated with new work.

2) Provide protection to all materials to remain intact.

3) Removal of finishes noted on plans including but not limited to flooring, ceilings, and misc. items attached to existing walls to be removed. Review patch to match conditions. Patch openings from removed unit ventilators and plumbing pipes.

4) Removal and disposal of miscellaneous equipment including all existing wall mounted specialty items and/or equipment not shown if impacting work to be demolished. Coordinate shutdown of water and electric with trades associated with the area of demolition. See demolition plans for additional demolition notes.

5) Removal and disposal of equipment and materials as indicated on the drawings.

6) All cutting and patching necessary for work of this contract, including layout, sleeves, coring, debris removal, saw cuts of existing slabs, providing lintels, drywall work, plaster work, grouting, painting, ceiling removal and replacement, etc, this trade contractor will be responsible for other trades openings (cutting and infill) if structural support is required.

7) Temporary Facilities

8) Provide temporary access and continuous exits in and out of all construction areas.

9) Provide dust protection. Including but not limited to adjacent louvers and air intakes within forty feet of the exterior work area.

10) Provide frost protection during excavation; protect concrete slab and masonry from cold temperatures during and after pour. Provide winter mix concrete as well all winter procedures if applicable.

11) Provide continuous exits for occupied areas of the building.

12) Protect exterior wall and interior spaces when performing tie in work for new addition and any type of window wall replacements.

13) Provide all temporary partitions, egress doors, and temporary egress parameters indicated by the CM inside and outside the building. Restore all areas to original condition upon completion.

14) Provide Temporary Facilities indicated as Work of this Contract in Division 1 Section 01 5000, "Temporary Facilities and Controls"

15) Provide all temporary fall protection, guardrails, handrails, slab and roof opening protection, temporary stairs and ramps as required. Include maintaining these items throughout the project as well as removal when no longer needed.

16) Provide Temporary storage for salvaged materials as indicated on the drawings until reinstallation of such materials

17) Removal of any existing curbing, stairs, bituminous paving, and walks as shown or described.

18) Removal of all underground utilities and/or equipment as shown or described.

19) Removal and disposal of miscellaneous equipment including equipment not shown if impacting work to be demolished.

20) General contractor to patch all walls after Mechanical contractor removes piping from UV demolition.

21) General Contractor to infill all louvers from the inside at the UVs after demolition.

C. Temporary Facilities

a) Provide dust protection and temporary site/security fencing with mesh as shown on phasing and logistics plan for the period of the contract.

b) Provide temporary roads/ access and continuous exits in and out of the construction area as shown. Provide stone entry pad at staging yard. Repair back to natural state when complete. Provide work as shown on the phasing and logistics plan.

c) Provide all necessary erosion / waste-water control measures specific to the site construction process.

d) Provide wash out area for construction vehicles designated by the CM.

e) Provide Portable toilets for all trades at each site. One toilet per five men. Provide one additional ADA toilet for the Construction managers use, include weekly service

f) Provide all Site lighting as required to maintain a safe site at night.

g) Provide snow removal for contractor staging and work areas.

h) Provide and install Project information signs at the site as directed by the CM. Signs provided by GC and designed by Architect. See specifications for size and materials. 2 signs

i) Provide Temporary Facilities indicated as Work of this Contract in Division 1 Section 01 5000, “Temporary Facilities and Controls”

D. New Construction:

a) The General Construction Work Contract shall perform all necessary trenching and excavation, backfilling, and compaction and field required concrete for all other primes within the construction documents.

b) Provide multiple shifts work as needed to complete work as shown on milestone schedule.

c) General Requirements, including but not limited to, additional items specifically indicated as the Work of this Contract.

E. Earthwork :

a) GENERAL: All earthwork shall be confined to the construction area as shown on the plans and shall be done in an approved manner with proper equipment. Earthwork shall be suspended during rain and inclement weather, or when unsatisfactory field conditions are encountered, unless otherwise directed by the ARCHITECT AND CONSTRUCTION MANAGER. At all times during construction, the CONTRACTOR shall maintain proper drainage in the construction area, and shall take all measures necessary for erosion and sediment control.

b) Existing Utilities: CONTRACTOR shall take every precaution to protect existing utility services from damage during construction operations. If damage occurs, the OWNER of the utility shall be notified immediately and repairs shall be made promptly at the CONTRACTOR’S expense. All repair work shall be satisfactory to the ARCHITECT AND CONSTRUCTION MANAGER and the OWNER of the utility. When interruptions of existing utilities occur, temporary service shall be provided as approved by the ARCHITECT AND CONSTRUCTION MANAGER and OWNER of the utility.

F. Dressing Off:

a) All cuts, fills and slopes shall be neatly dressed off to the required grade or subgrade, as indicated on the plans. Work in this section includes all three buildings to be demolished per the contract drawings.

b) Cleanup: Cleanup of the site shall be made upon completion of grading work or any major part thereof. Unless otherwise noted, excess or surplus material shall be

wasted and dressed off on the site, or adjacent thereto, to the ARCHITECT AND CONSTRUCTION MANAGER'S satisfaction. Excess or surplus material wasted in off-site spoil areas shall be spread and leveled as directed.

c) Topsoil Placement: Topsoil shall consist of a natural friable loam, occurring usually in a surface layer 6 to 18 inches thick, and free of roots, grass, weeds, stone and other foreign matter. Topsoil may be obtained from the graded area, if available, and stockpiled for future use. Otherwise, the CONTRACTOR shall provide topsoil from other sources at his own expense. All topsoil shall be acceptable to the ARCHITECT AND CONSTRUCTION MANAGER. Topsoil shall be placed on the entire graded area as shown on the plans, or as directed by the ARCHITECT AND CONSTRUCTION MANAGER. Topsoil shall be distributed to a depth of 4 inches, measured loose, and dressed off neatly to finish grade, with all debris removed.

d) Provide temporary driveway, parking lot paving and drainage if required.

e) Areas modified for construction/staging/ Etc. to be placed back to its natural state once construction is complete by this trade.

f) Provide all site signage as requested by the CM. Example; Gate A-B, Hard hat area, No smoking, Construction personnel only, Exit signs, Project information sign, Etc.

g) Contractor shall obtain and pay for any permits, inspections, or certifications from governing authorities having jurisdiction over the work to be performed, or over the finished product to be installed by this Contractor. Project Building Permit is by others. Include in this contract. hydrant use permits and temp electric hook-up fees from power company at CTE site, unless a generator is provided.

G. The Work of the General Construction Contract includes but is not limited to, the following descriptions

a) Provide protection to all materials to remain intact.

b) Provide all fall and perimeter protection

c) This trade is responsible to maintain a secure site at all times, including but not limited to locking all gates at the end of each day.

d) This trade to maintain a clean, dust and debris free roadway outside of the site perimeters.

e) Build and maintain stone tracking pads at each entrance and exit to the site if applicable.

f) Provide topsoil and seeding on all disturbed areas as directed by the CM.

g) Provide all sheathing and shoring to perform the work of this trade

h) Removal of finishes noted on plans including but not limited to flooring, ceilings, Roofing, misc., building materials and misc. items attached to existing walls to be removed.

i) Removal and disposal of miscellaneous equipment including all existing wall mounted specialty items and/or equipment not shown if impacting work to be demolished. Coordinate shutdown of water and or electric associated with the area of demolition. See demolition plans for additional demolition notes.

j) Removal and disposal of equipment and materials as indicated on the drawings.

k) All cutting and patching necessary for work of this contract, including layout, sleeves, coring, debris removal, saw cuts of existing slabs/footings, ceiling removal and replacement, etc. This trade contractor will be responsible for other trades openings (cutting and infill) if structural support is required.

l) Provide temporary access and continuous exits in and out of all construction areas.

m) Provide dust protection. Water use is the preferred option.

n) Provide all temporary partitions, egress doors/gates, and temporary egress parameters indicated by the CM within the site and existing occupied building. Restore all areas to original condition upon completion.

o) Provide Temporary Facilities indicated as Work of this Contract in Division 1 Section 01 5000, “Temporary Facilities and Controls”

p) Provide all temporary fall protection, guardrails, handrails, , temporary stairs and ramps as required. Include maintaining these items throughout the project as well as removal when no longer needed.

q) Provide Temporary storage for salvaged materials as indicated on the drawings until reinstallation of such materials.

r) Provide temporary driveway, parking lot paving and drainage if required.

s) Areas modified for construction/staging to be placed back to its natural state once construction is complete.

t) Provide all site signage as requested by the CM. Example; Gate A-B, Hard hat area, No smoking, Construction personnel only, Exit signs, Project information sign, Etc.

u) General Construction Contractor shall obtain and pay for any permits, inspections, or certifications from governing authorities having jurisdiction over the work to be

performed, or over the finished product to be installed by this Contractor. Project Building Permit is by others. Include in this contract. hydrant use permits

v) Provide all roofing work for existing and new additions. Roof blocking and plywood, including:

1) Provide roof penetrations and blocking for mechanical equipment curbs furnished by MECHANICAL/PLUMBING CONSTRUCTION contractor. Roof drains are to be furnished by the MECHANICAL/PLUMBING CONSTRUCTION contractor and installed by the General Construction Contractor. MECHANICAL/PLUMBING CONSTRUCTION contractor to coordinate with General Construction Contractor.

2) For cutting holes through existing deck, the following shall apply:
   a) General Construction contractor shall cut and remove material.
   b) All contractors requiring holes shall provide the necessary layout.
   c) Temporary and final roofing and weather-tight protection for roof at new additions shall be by the General Construction Contractor.
   d) See H and P drawings for extent of work.

w) Contractor shall provide paint, stone, brick, ceiling tile, gypsum, plaster and floor tile patch to match existing at the following conditions (patching shall commence one tile distant from the affected areas):
1) At all removed existing walls.
2) At all removed existing millwork and casework items.

3) At all removed existing console unit ventilators as shown on the drawings: Louvers shall remain. GC to infill openings per details provided and patch to match existing floor at areas where old UV's are removed.

4) At all relief grills removed in corridors.

5) At all new door openings cut through existing walls.

6) At all new walls in existing construction. At all removed existing walls.

x) Provide (unless noted otherwise):
1) Provide interior equipment and housekeeping pads for all Prime Contracts, coordinate as necessary for size and locations.

2) Include in base bid to furnish and install the following access doors beyond those already shown on drawings:
   a) Four 18" x 18" fire-rated access doors for gypsum wallboard construction.
   b) Four 18" x 18" fire-rated access doors for masonry construction.
   c) Four 12" x 12" stainless steel access doors for masonry construction.
   d) Four 8" x 8" non-rated, primed steel, trimless, access doors for gypsum wallboard construction.

y) Provide and install window shades

z) Salvage and reinstall ceiling tile as indicated.

aa) Provide and install in an addition to the contract allowance, seven boxes of new ceiling tile to match existing as part of base bid

bb) Include all site work in this contract

cc) The use of a surveyor for new addition layout by General Contractor.

dd) Work at the interior of the existing building will take place on a night shift from roughly February 2022 until summer of 2022. See schedule for dates that may change based on situation and materials.

ee) Provide engineered shoring plan at the cafeteria wall opening for Architect review.

ff) All underground utilities excluding electrical is the responsibility of the general contractor.

gg) All access doors to be provided and installed by the general contractor.

hh) All concrete, rebar and forms provided and installed by the general contractor.

ii) All fine cleaning at the end of each night shift will be the responsibility of this contractor. A $500 fine will be assessed for each night this is not successfully performed.

jj) All ceiling removal and replacement for other trades will be the responsibility of this trade, including night shift work.

H. The Work of the General Construction Contract includes but is not limited to the Work that is specified in the Project Manual(s) and as shown on the drawings that form the contract plans. The Contractor is directed to examine all drawings since certain details and/or notes may appear anywhere therein that apply to his/her particular work. This prime contract is defined as, and includes, all Sections in the Divisions indicated by reference, and specific Sections noted:

a) Division 00 – Procurement and Contracting Requirement, all Sections.
b) Division 1 –General Requirements, all Sections, including Temporary Facilities indicated.
c) Division 2 – Selective Structure Demolition
d) Division 3 – Concrete, all Sections.
e) Division 4 – Masonry, all Sections.
f) Division 5 – Metals, all Sections.
g) Division 6 – Woods, Plastics and Composites, all Sections.
h) Division 7 –Thermal and Moisture Protection, all Sections
i) Division 8 – Openings, all Sections
j) Division 9 – Finishes, all Sections.
k) Division 10 – Specialties, all Sections
l) Division 11 – Equipment, all Sections, all Sections

m) Division 12 – Furnishings, all Sections
n) Division 31 – Earthwork All sections
o) Division 32 – Exterior Improvements
p) Division 33 – Utilities, all Sections

1.8 CONTRACT 2 - MECHANICAL CONTRACT

A. Work of this Contract includes, but is not limited to, the following descriptions:
a) New mechanical units, piping, connections, and startup. Demolition and removal of old equipment and associated hardware, ductwork, RTU's, balancing, Etc.

b) All "Title sheets, general notes, code compliance and Phasing Drawings"
a) All "G" Drawings" (General)
b) All "A" Drawings (Architectural) For coordination
c) All "H" Drawings (Mechanical)
d) All "P" Drawings (Plumbing)
e) All "U" Drawings (Universal)

B. Work of this Contract includes, but is not limited to, the following descriptions:
a) Includes HVAC Equipment, Piping, ductwork, control systems, plus other construction operations traditionally recognized as heating, ventilating and cooling work. This includes, but is not limited *to,* all work shown on the "H" drawings, and applicable information shown on the "A" "P" "E" drawings, unless noted otherwise. It also includes Administrative and coordination responsibilities.

b) Coordination:
1) Coordination with the work of all of the other contractors.

2) Each trade will participate in producing coordination drawings. The mechanical, Plumbing and electrical contractors will overlap their new work and coordinate locations, heights, routes, Etc. to eliminate hits and or obstructions from existing or new work. Each trade will meet once a week to coordinate their drawings. Ductwork and mechanical piping first, plumbing second and electrical third. A full set of coordination drawings must be completed within four weeks after award of contract.

c) Demolition
1) Provide demolition of all HVAC equipment and piping as shown and as required at the existing building. Salvage equipment for reinstallation as indicated on the drawings.

2) All cutting and patching necessary for work of this contract, including layout, sleeves, coring, debris removal, saw cuts, lintels (furnish and install), drywall work, plaster work, grouting, painting, ceiling removal and replacement, etc.

d) Temporary Facilities
1) Provide Temporary Facilities indicated as Work of this Contract in Division 1 "Temporary Facilities and Controls"

2) Temp Heat for all trades work to be provided by this trade and as directed by the CM.

e) Construction:

1) the General Construction Contractor is to provide rough opening in walls that require structural support. Submit to the Construction Manager the name and qualification of the subcontractor performing the installation prior to starting the work.

2) The General Construction Work Contract shall perform all necessary trenching and excavation, backfilling, and compaction and field required concrete for all other primes.

3) All low voltage for HVAC equipment by this trade.

4) Provide and install all controls components into air and hydronic systems as required maintaining the integrity of the system:
   a) Install motor actuated dampers.
   b) Install airflow measuring stations.
   c) Install airside temperature and pressure sensors.
   d) Install hydronic control valves.
   e) Install hydronic temperature and pressure sensor wells
   f) Provide TAB and participate in commissioning work of the EMCS as required for controls of the work of this contract.
   g) Provide all ductwork as indicated on the drawings
   h) Lifts and scaffold for means and methods of installation of work under this trade the responsibility of the trade.
5) Provide and install new RTUs and associated Condensing Units.
6) Provide and install Hydronic and refrigerant piping and pumps
7) Provide and install new exhaust fans and ductwork as shown.
8) Provide and install unit heaters and humidifiers
9) Provide and install Air Handling Units and Roof top units
10) Provide all equipment as scheduled on drawing H900, H901, and H902
11) Provide new connections to shop equipment
12) Provide and install new unit heaters, piping controls.
13) Provide contractor filters, final replacement filters and final duct cleaning.
14) Provide and install all insulation, painting and labeling of new and modified piping, ductwork and equipment as required.
15) Provide all testing, adjusting and balancing of all new and existing modified HVAC systems.
16) All fees required for inspections and permits.
17) Provide support framing for HVAC equipment, i.e. mechanical equipment curbs.
18) Provide firestopping and sealing at all HVAC penetrations
19) Furnish motor controllers/disconnects to Electrical Contract for installation and wiring.
20) Provide the necessary layout for all roofing penetrations to the General Work Contractor. Provide curbs for mechanical equipment.

21) Provide owner training / commissioning of equipment more than once if needed.
22) Work at the interior of the existing building will take place on a night shift from roughly February 2022 until summer of 2022. See schedule for dates that may change based on situation and materials.
23) Provide replacement of all new unit filters on start up.

f) Controls:
1)Manufacturers: Johnson controls, Inc., Controls Group., All controls shall be comparable with the Johnson facility explorer system that has been recently installed and part of the Energy Performance Contract. All control equipment including but not limited to wiring, modules, etc. shall be removed from the existing equipment, salvaged, and re-installed on the new equipment with the exception of the valves. New valves will be provided by the Owner for installation by the Mechanical Contractor for the existing units being replaced. In the Classrooms, most new units relocate from floor mounted to ceiling mounted units. All new equipment (equipment new to the building, not replacing existing equipment) shall receive all new controls including but not limited to low voltage wiring, equipment boards, modules, valves, etc. provided by the Mechanical Contract. The front-end equipment shall not be replaced. However, the program shall be adjusted to accommodate the new chilled water component and newly equipment. Existing thermostats for replacement units shall remain unless noted otherwise on the drawings. New units to the building get new thermostats.

g) General Requirements:
1) including but not limited to, additional items specifically indicated as the Work of this Contract.
2) multiple shifts work and Saturdays is mandatory, see schedule for details.

C. The Work of the MECHANICAL/PLUMBING CONSTRUCTION Work Contract includes but is not limited to the Work that is specified in the Project Manual(s) and as shown on the drawings that form the contract plans. The Contractor is directed to examine all drawings since certain details and/or notes may appear anywhere therein that apply to his/her particular work. This prime contract is defined as, and includes, all Sections in the Divisions indicated by reference, and specific Sections noted:
a) Division 00 –Procurement and Contracting Requirement, all Sections.
b) Division 01 –General Requirements all Sections, including Temporary Facilities indicated
c) Division 02 – Demolition as required for the Work of this Contract
d) Division 05 – Metals as required for the Work of this Contract
e) Division 07 Thermal and moisture protection as required for the Work of this Contract
f) Section 078400, Firestopping, as required for the Work of this Contract
g) Section 079200 Joint Sealants
h) Division 22 – Plumbing, all Sections
i) Division 23 – HVAC, all Sections.
j) Division 26 – Electrical as required for the Work of this Contract

1.9 CONTRACT 3 - ELECTRICAL WORK CONTRACT

A. Work of this Contract includes, but is not limited to, the following descriptions:

a) Includes Electrical Distribution Service, Lighting, CATV systems, Communications, Fire Alarm, Intercom Systems, Security Systems, Emergency Lighting, and other systems traditionally recognized as Electrical work. This includes but is not limited to, all work shown on the "E" as it relates to your scope of work, and applicable information shown on the

1) All "G" Drawings (General)
2) All "A" Drawings (Architectural) As required for the work of this contract
3) All "H" Drawings (Mechanical) As required for the work of this contract
4) All "P" Drawings (Plumbing) As required for the work of this contract
5) All "E" Drawings (Electrical)
6) All "U" Drawings (Universal

b) Coordination:

1) Coordination with the work of all of the other contractors.

2) Each trade will participate in producing coordination drawings. The mechanical, Plumbing and electrical contractors will overlap their new work and coordinate locations, heights, routes, Etc. to eliminate hits and or obstructions from existing or new work. Each trade will meet once a week to coordinate their drawings. Ductwork and mechanical piping first, plumbing second and electrical third. A full set of coordination drawings must be completed within four weeks after award of contract.

c) Demolition:

1) Removal of items as shown and/or required.

2) Removal and disconnections of electrical devices in walls, ceilings and floors scheduled to be removed in the portion of the building to remain.

3) Removal of lighting fixtures scheduled to be removed in the portion of the building to remain.

4) Coordinate with the General, and Mechanical/Plumbing Construction Work Contractor for necessary shutdowns and disconnects.

5) Removal of exterior lighting fixtures and wiring.

6) All cutting and patching necessary for work of this contract, including layout, sleeves, coring, debris removal, saw cuts, drywall work, plaster work, grouting, painting, ceiling removal and replacement, etc.

d) Temporary Facilities

1) Provide Temporary Facilities indicated as Work of this Contract in Division 1 Section 01 5000, "Temporary Facilities and Controls"

2) Provide night/day security camera system with DVR and monitor for the purpose of the construction staging/yard security during the construction

schedule only. System will be equipped with local and remote access. System will be set up in location chosen by the CM.

3) Provide power connection to CM trailer.

4) Provide temporary lighting at construction staging/yard area

5) Provide temp and permanent power outlets, panels and connections for other trades tools and equipment.

e) Construction:

1) The General Construction Work Contract shall provide all openings in walls, floors, and roofs for all other Prime Contractors, that require lintels, and structural framing only. All other openings will be the responsibility of this trade.

2) The General Construction Work Contract shall perform all necessary trenching and excavation, backfilling, and compaction and field required concrete for all other primes.

3) Provide recessed floor outlets as shown on the plans.

4) Provide ALL power wiring to ALL HVAC and Plumbing equipment. (Install motor controllers/disconnects supplied by Mechanical/Plumbing Construction Contract)

5) Provide all interior and exterior lighting including lighting control.

6) Provide all fire alarms, CATV, and networking systems.

7) Provide public address systems, including full installation and training.

8) Provide all cutting and patching required installing all electrical fixtures, devices, wire and conduit.

9) Provide all fees required for inspections and permits.

10) Provide support framing for Electrical equipment and conduits.

11) Furnish access doors for electrical access (to be installed by GC)

12) Provide firestopping and sealing of all electrical penetrations

13) Provide owner training

14) Provide and maintain a temporary electric service, including lighting and power, for the site office trailers off of the temporary service being provided above. Maximum of 1 trailer per Prime Contractor. Each trailer to have a

100 amp, 240 Volt single-phase connections. Assume a diversified peak connected load factor of 12KW per trailer.

15) All underground electrical utility work is the responsibility of this contractor.

16) Provide new building service as shown on the drawings

17) This trade responsible for all communications and coordination with utility companies.

f) General Requirements, including but not limited to, additional items specifically indicated as the Work of this Contract.

g) Multiple shifts work 6 days a week is mandatory Interior work will take place during the night shift until summer 2022.

h) Theatrical lighting and rigging is a part of this scope of work.

B. The Work of the Electrical Work Contract includes but is not limited to the Work that is specified in the Project Manual(s) and as shown on the drawings that form the contract plans. The Contractor is directed to examine all drawings since certain details and/or notes may appear anywhere therein that apply to his/her particular work. This prime contract is defined as, and includes, all Sections in the Divisions indicated by reference, and specific Sections noted:

a) Division 00 –Procurement and Contracting Requirement, all Sections.
b) Division 1 –General Requirements all Sections, including Temporary Facilities indicated
c) Division 7 – Section 078400, Penetration Firestopping and 079200, Joint Sealants, as required for the Work of this Contract.
d) Division 10 – Specialties -Section 102239, folding panel partitions (as it relates to this contract for power connections to equipment)
e) Division 19 – Theatrical – Section 191000 Performance Sound System and Section 192000 Theatrical Lighting Systems
f) Division 22 - All sections (as relates to this contract for power connections to equipment)
g) Division 23 - All sections (as relates to this contract for power connections to equipment)
h) Division 26 - Electrical - All Sections.
i) Division 27 – Communications installation - All Sections
j) Division 28 – Cabling for electronic safety and security - All Sections

1.10 TESTING

A. Required testing and test procedures are indicated under each Division of the Technical Specifications. Other testing shall be performed per generally accepted standards.

B. The Architect shall reserve the right to require additional information as is deemed necessary to fully evaluate testing results.

C. The Owner shall employ and pay for an independent testing and inspection agency for testing requirements of their work as assigned by this scope of work. All testing shall be per technical specification requirements The Prime Contractor requiring testing will notify the Construction Manager twenty-four hours in advance of the required testing to allow for coordination and scheduling. Failure to give sufficient notice will require the prime contractor to pay for alternate testing to satisfy the specification.

1.11 WORK SEQUENCE

A. The Work will be conducted to provide the least possible interference to the activities of the Owner's personnel.

B. Work cannot be performed in occupied areas. Work shall be scheduled off-hours, vacations, and weekends for occupied areas if applicable. A Construction Manager Superintendent must be on site at all times that work is being performed. If a contractor fails to maintain the progress as indicated by the milestone schedule by no other fault but its own and requires overtime to complete the work; the contractor shall make arrangements with the Construction Manager 24 hours in advance and pay for a Construction Manager's superintendent at $150.00 per hour. In the event that the cause for delay is multi-contract, then the costs shall be distributed evenly among contracts. Advise the Construction Manager 48 hours prior to commencing work inside the building.

C. Coordination of any utility and/or power interruption must be done with the Construction Manager. Shutdowns must occur during off-hours and on days when the building is not occupied by the owner.

D. Construction access to the site shall be limited to those designated for contractor's personnel, equipment and deliveries by the Owner. Contractors' staging, parking and storage shall be coordinated by the Construction Manager.

E. Each Contractor shall inspect the site and review the AHERA report on file for the presence of asbestos. Unless otherwise noted, there will be asbestos containing material in place that will require work to take place in the vicinity of, around and/or next to. Each prime contractor that will be working above ceilings, demolishing, in crawl spaces, boiler rooms and all other areas that may contain asbestos per the AHERA report, shall employ "Allied Trades: certified/licensed tradesman as part of the onsite workforce".

1.12 OCCUPANCY REQUIREMENTS

A. The General Work Contractor (Contract #1) shall provide Outdoor air quality management as specified by the Department of Labor and OSHA during construction
   a) Provide an exhaust air system for the project indoor areas that could produce fumes, VOC's off-gasses, gasses, dusts, mists, or other emissions.
   b) Exhaust air system for the project areas that could produce emissions listed in Paragraph 'a' shall be utilized.
   c) Provide Water for dust control.

B. Quality assurance:
   a) Maintain a negative pressure between the work area and the space surrounding the work area.

b) Before start of work, submit a design for the exhaust air system. Do not begin work until approval of the Owner is obtained.
a) The number of machines required.
b) Location of the machines in the workspace.
c) Description of the methods used to test air flow and pressure differential.

C. System operation:

a) A sufficient quantity of exhaust fans in existing window openings or other approved locations shall be operated in accordance with the following applicable standards.
b) Exhaust air system shall operate for a minimum of 72 hours after work is completed, or until all materials have cured sufficiently as to stop out gassing of fumes or odors and area has been ventilated to remove all detectable traces of odors and fumes.
c) Maintain twenty-five (25) feet clearance from all temporary exhaust outlets to all active building outdoor air intakes.

1.13 PROJECT MILESTONE SCHEDULE

A. See the milestone schedule in Section 000550.

B. All Prime Contractors are required to submit a schedule based on the milestone dates to the Construction Manager for review and comment no later than 10 days after a Notice to Proceed for the work is issued.

C. This is a 6 day a week double shift mandatory project

1.14 ALLOWANCES

A. See Specification Section 01 2100.

1.15 ALTERNATES

A. The Contractor shall state where requested on the Bid Form the amount to be added to or deducted from the base bid for the alternates described in Section 012300 - Alternates.

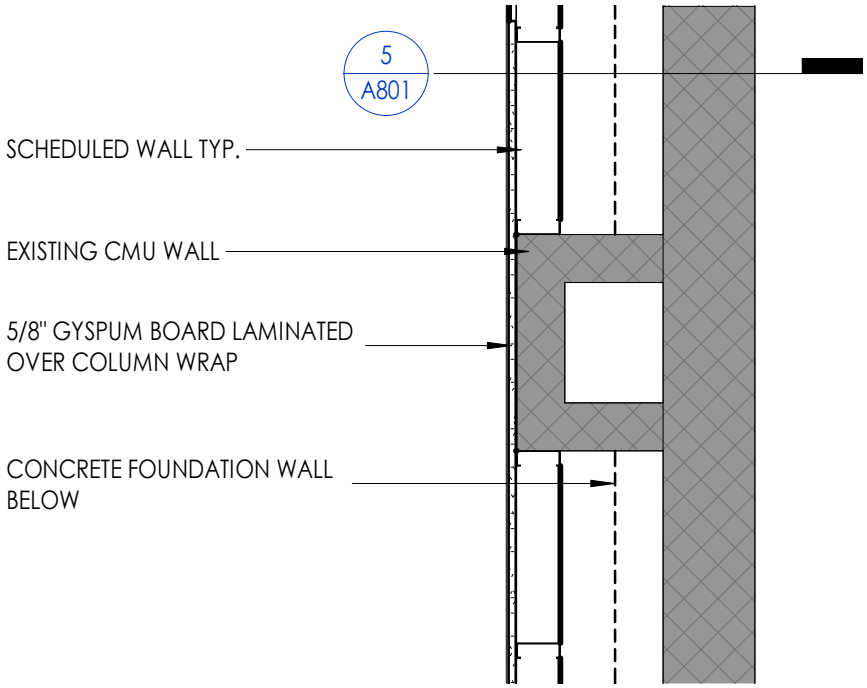
END OF SECTION 011200

Night Shift Fall 2021 / Summer 2022
.Gym Mechanical systems
.Hallways piping and duct work
.Classroom/Hallway Ceilings removed and reinstalled.
.Areas cleaned and back to normal for day school activity

Summer 2022
.Complete Gym mechanicals.
.Completely renovate cafeteria
.Open Hallway & Classroom Ceilings to install new mechanical units
.Tie new addition into cafeteria
.Exterior sidewalks and roadways

Day Shift fall 2021 / Summer 2022
New Addition construction from start to finish / entire length of schedule

Logistic Plan



6
A801

WALL FURRING DETAIL - ALTERNATE

3/4" = 1'-0"

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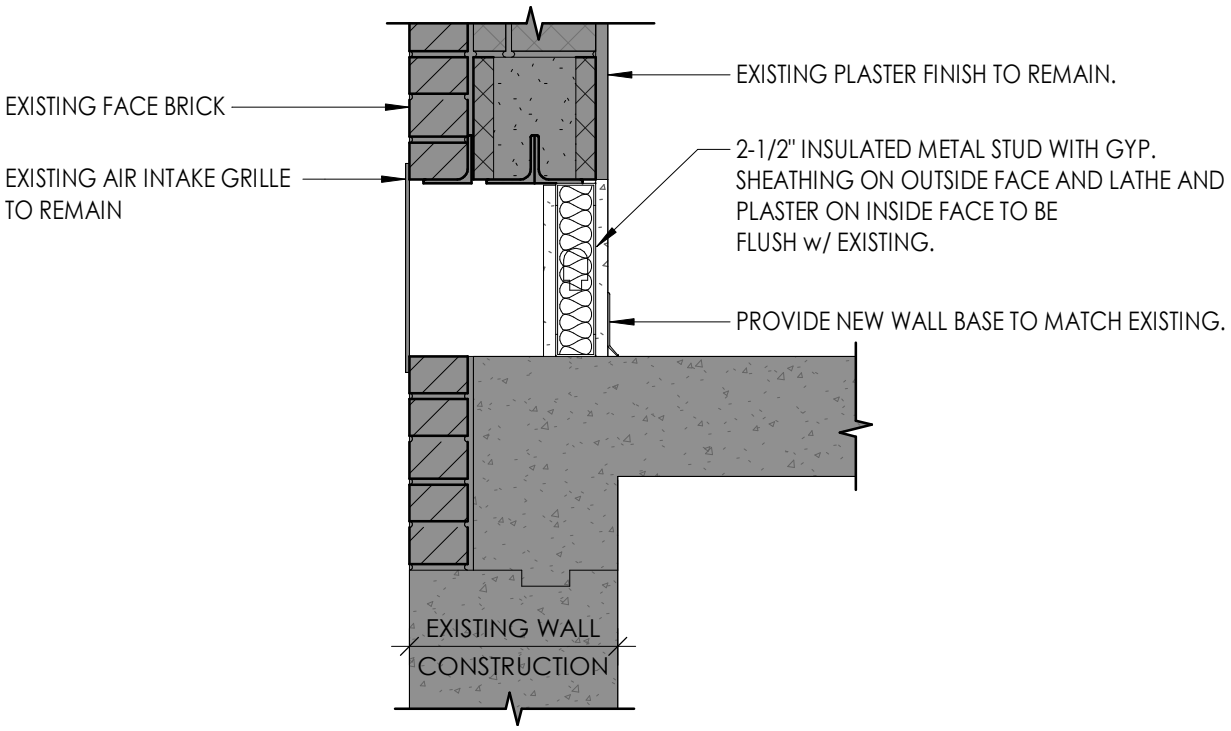
Project Number
13940.18

Client Name
NEWBURGH ENLARGED CITY SCHOOL DISTRICT

Project Name
PHASE 3: HERITAGE MIDDLE SCHOOL 2019 CAPITAL IMPROVEMENT PROJECT

Issue Date
09/21/21

AD 01
SK-A01



10
A801

TYP. UNIT VENTILATOR INFILL DETAIL

1" = 1'-0"

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13940.18

Issue Date
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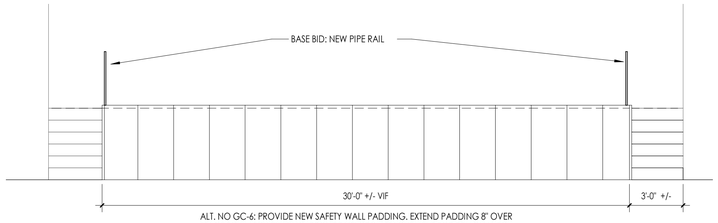
Client Name
NEWBURGH ENLARGED CITY SCHOOL DISTRICT

Project Name
PHASE 3: HERITAGE MIDDLE SCHOOL 2019 CAPITAL IMPROVEMENT PROJECT

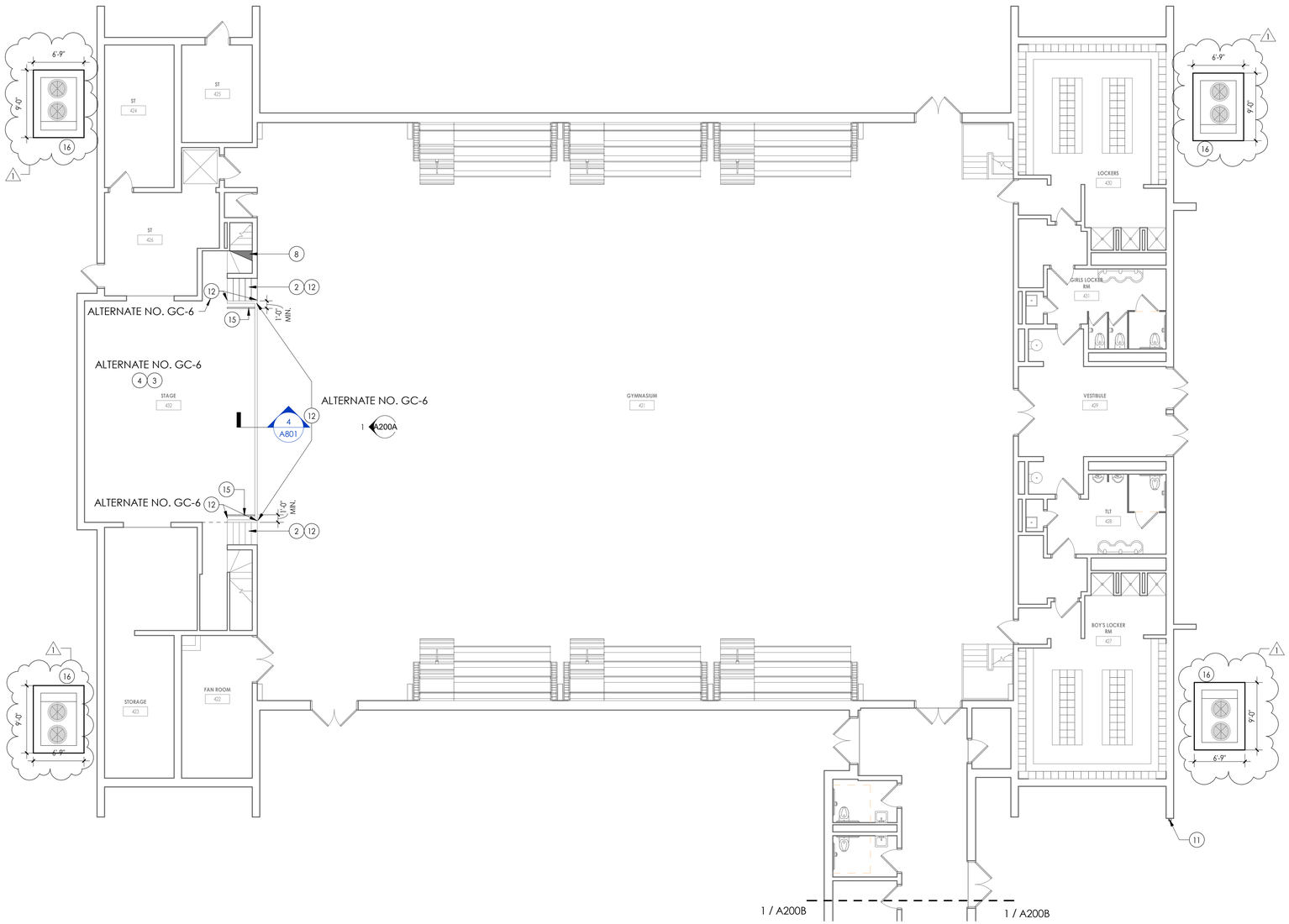
AD 01
SK-A02



ALT. NO GC-6: PROVIDE NEW SAFETY WALL PADDING. EXTEND PADDING 8' OVER STAGE TO MATCH EXISTING. PROVDE VELCRO ATTACHEMENT FOR REMOVAL TO ACCESS STORAGE.

1 / A200A GYM STAGE INTERIOR ELEVATION

1/4" = 1'-0"



2 / A200A GROUND FLOOR AREA A - NEW WORK

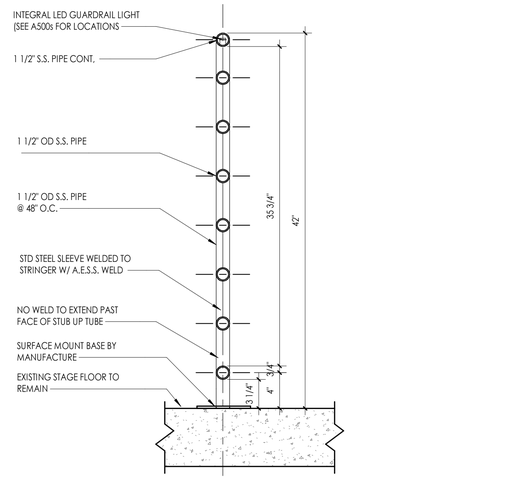
1/8" = 1'-0"

FLOOR PLAN GENERAL NOTES

1. ALL DRAWINGS ARE GRAPHIC REPRESENTATIONS OF APPROXIMATE LOCATIONS OF NEW MATERIALS. IT IS THE CONTRACTOR'S RESPONSIBILITY TO FIELD VERIFY ALL EXISTING CONDITIONS PRIOR TO COMMENCEMENT OF WORK.
2. THE GENERAL CONTRACTOR IS RESPONSIBLE TO FIRESTOP ALL NEW PARTITIONS TO THE STRUCTURAL DECK ABOVE. FIRESTOPPING HEADS OF WALLS IS TO OCCUR AT ALL NEW WALL CONSTRUCTION WITHIN THE PROJECT.
3. ALL WALL DIMENSIONS INDICATED ON FLOOR PLANS ARE TO FACE OF STUD FRAMING OR MASONRY UNLESS OTHERWISE NOTED.
4. SEE SHEET A400 FOR INTERIOR PARTITION TYPES
5. SEE A900s FOR INTERIOR AND EXTERIOR DOORS, WINDOWS, CURTAINWALLS, AND STOREFRONTS
6. PROVIDE AN EDGE/TRANSITION STRIP CENTERED UNDER ALL DOORS WHERE ADJACENT FLOOR FINISHES ARE OF DIFFERENT MATERIALS.
7. PROVIDE ACCESS PANELS, MINIMUM 24" x 24", OR OF SIZES REQUIRED, WHERE PLUMBING AND HEATING VALVES, WATER SWITCHES, VENTILATION SPLITTER DAPMERS, ETC. ARE SHOWN ON PLUMBING, HEATING AND VENTILATION DRAWINGS.
8. WORK AREAS SHALL BE MAINTAINED AND ALL WORK AREAS SHALL BE LEFT BROOMED CLEAN AT END OF EACH DAY.
9. ALL DOORS AND WINDOW SYSTEMS TO HAVE SEALANT AROUND THE ENTIRE PERIMETER (BOTH SIDES) OF FRAMES.
10. CONTRACTOR TO COORDINATE WITH OTHER TRADES FOR SEQUENCING OF WORK.
11. REFER TO A700 FOR TYPICAL FIXTURE MOUNTING HEIGHTS AND ACCESSORIES LEGEND.

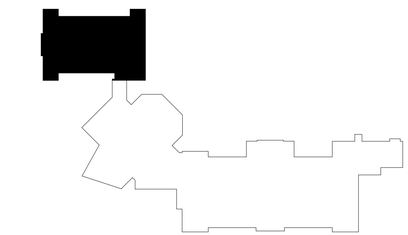
FLOOR PLAN KEY NOTES

1. PATCH TO MATCH FLOOR AT MECHANICAL EQUIPMENT REMOVAL WHERE INDICATED BY HATCH.PROVIDE NEW FINISHED END PANELS AT CASEWORK AFFECTED BY UV REMOVALS. MATCH EXISTING FINISH AND COLOR
2. NEW RUBBER STAIR RISERS AND TREADS. REFER TO INTERIOR DRAWINGS.
3. ALTERNATE - PROVIDE NEW WOOD FLOORING AT EXISTING STAGE AREA. REFER TO INTERIOR DRAWINGS FOR FLOOR FINISH.
4. NEW LIGHTING, SOUND AND STAGE RIGGING. COORDINATE WORK WITH EC. REFER TO TL, TR, TS SERIES.
5. PROVIDE NEW COLUMN WRAP. REFERENCE DETAIL ON A800.
6. PROVIDE NEW CEILING HUNG OPERABLE PARTITION.
7. PATCH EXISTING WALL. COORDINATE WORK WITH MC. REFER TO A801 FOR DETAILS. GC TO PAINT SURFACE CORNER TO CORNER AND FLOOR TO CEILING TO MATCH EXISTING COLOR.
8. PROVIDE NEW WOOD STAIR TREAD TO MATCH EXISTING. REPAIR ANY MOUNTING COMPONENTS AS NECESSARY.
9. NEW DRINKING FOUNTAIN. COORDINATE WORK WITH PLUMBING CONTRACTOR.
10. PATCH CONCRETE S.O.G. TO MATCH EXISTING.
11. PROVIDE NEW DOWNSPOUT. COORDINATE WORK WITH CIVIL DRAWINGS.
12. PROVIDE NEW SAFETY WALL PADDING. PROVIDE FASTENIING SYSTEM TO ENSURE TEMPORARY REMOVAL AND REINSTALLATION.
13. PATCH TO MATCH EXISTING WALL, BASE, FLOOR AND CEILING FINISHES IN AREAS AFFECTED BY DEMOLITION AND/OR NEW CONSTRUCTION.
14. LAMINATE 5/8" GYPSUM BOARD OVER CMU WALL.
15. NEW PIPE RAIL. REFER TO DETAIL 3/200A
16. CONCRETE MOVEMENT ALLOWED EQUIPMENT PAD. REFER TO DETAIL 6/S802 AND H DRAWINGS. COORDINATE WITH MECHANICAL CONTRACTOR FOR EXACT SIZE AND LOCATION.



3 / A200A HANDRAIL INTO CONCRETE

1 1/2" = 1'-0"



KEYPLAN AREA A

NTS

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PROJECT INFORMATION

Project Number
13940.18

Client Name
NEWBURGH ENLARGED CITY SCHOOL DISTRICT

Project Name
PHASE 3: HERITAGE MIDDLE SCHOOL 2019 CAPITAL IMPROVEMENT PROJECT

Project Address
405 Union Avenue, New Windsor, NY 12553

SED Number
44-16-00-01-0-039-011

PROJECT ISSUE SCHEDULE

No.	Date	Description
1	09/21/21	BID ADDENDA 1

SHEET INFORMATION

Issued
9/9/2021

Scale
As indicated

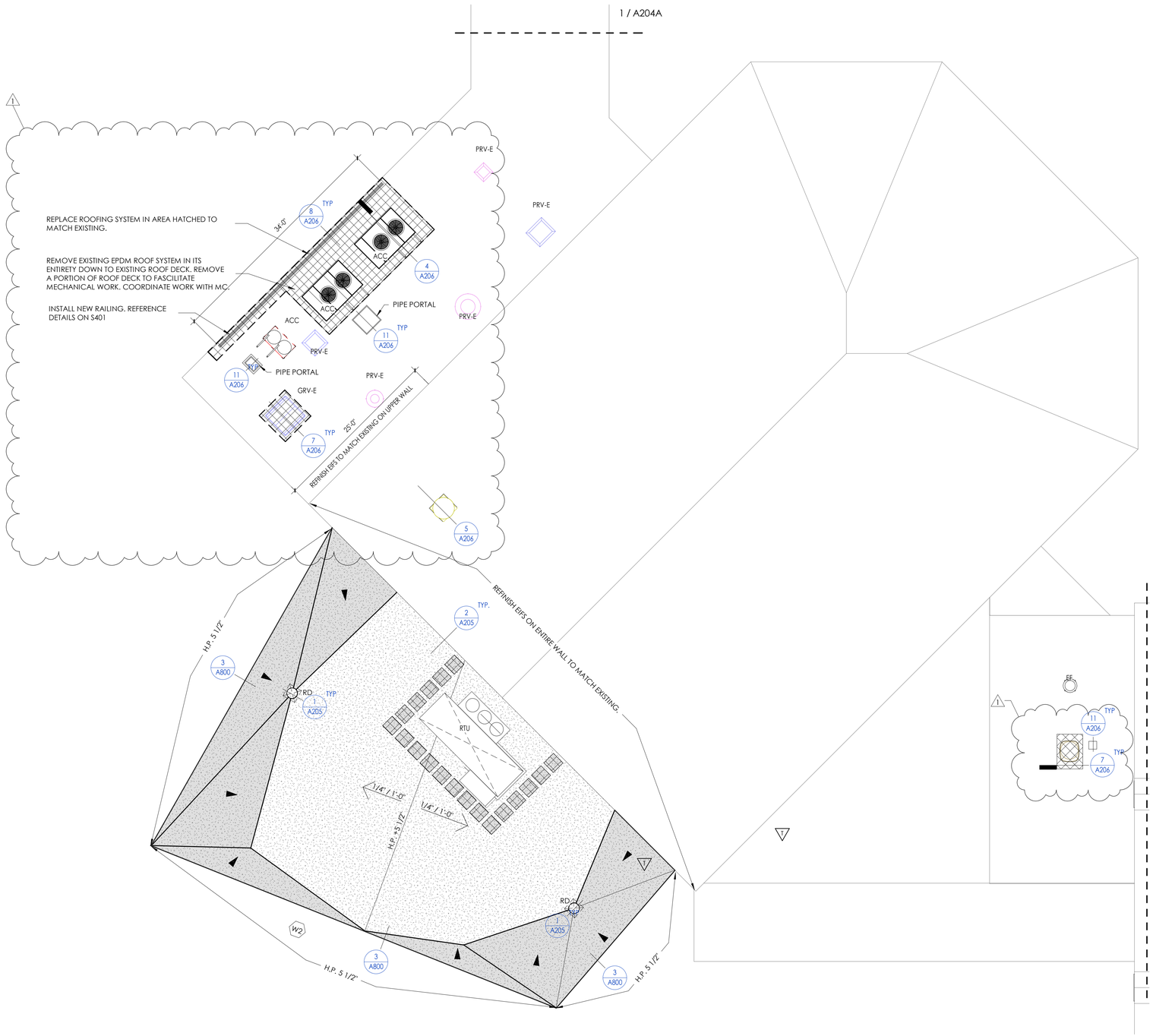
Project Status
CONSTRUCTION DOCUMENTS

Drawn By
CPL

Checked By
CPL

Drawing Title
GROUND FLOOR AREA A - NEW WORK PLAN

Drawing Number
HMS
A200A



ROOF PLAN AREA B

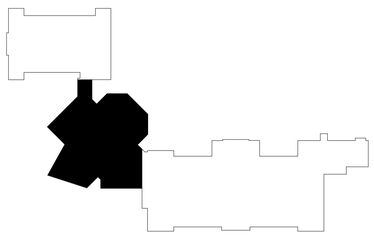
1/8" = 1'-0"

ROOF PLAN GENERAL NOTES

1. ALL DRAWINGS ARE GRAPHIC REPRESENTATIONS OF APPROXIMATE LOCATIONS OF MATERIALS. IT IS THE CONTRACTORS RESPONSIBILITY TO FIELD VERIFY ALL CONDITIONS PRIOR TO THE COMMENCEMENT OF WORK.
2. REFER TO ALL DRAWINGS IN THE SET FOR LOCATIONS OF ALL ROOF PENETRATIONS. PROVIDE FRAMING AS REQUIRED.
3. CONTRACTOR SHALL PAINT ALL ROOF FASTENERS EXPOSED TO VIEW AT UNDERSIDE OF DECK TO MATCH.
4. WORK AREAS SHALL BE MAINTAINED AND ALL WORK AREAS SHALL BE BROOM CLEAN AT THE END OF EACH DAY.
5. ALL WOOD BLOCKING USED SHALL BE PRESSURE TREATED.
6. THE CONTRACTOR SHALL BE RESPONSIBLE FOR INSTALLING ALL ROOF DRAINS AND CUTTING THE HOLES IN THE DECK FOR ANY DRAINS AND PROVIDING STRUCTURAL SUPPORTS.
7. THE ROOF ELEVATIONS SHOWN ON THE PLAN ARE SHOWN TO ESTABLISH RELATIVE HEIGHTS OF THE INDIVIDUAL ROOFS.
8. NO WEEP HOLES SHALL BE COVERED OR PLUGGED AS A RESULT OF THE ROOFING WORK, UNLESS OTHERWISE DIRECTED.
9. THE CONTRACTOR SHALL BE RESPONSIBLE TO MAINTAIN WATER TIGHTNESS AND PROVIDE PROTECTION AT ANY/ALL OPENINGS IN THE ROOF LEFT AT THE END OF EACH DAY.
10. PROVIDE CRICKETS FOR WATER DIVERSION AT ALL CURBS, RAILS, ETC. WHICH RUN PERPENDICULAR TO THE SLOPE OF THE INSULATION/SLOPED STRUCTURE.
11. ALL ROOF TOP UNITS SHALL BE MOUNTED ON 16" MIN. INSULATED METAL CURBS. PROVIDE TAPERED INSULATION CRICKETS AS REQUIRED TO SHED WATER. WOOD BLOCKING SHALL BE PROVIDED SO CURBS ARE 8" ABOVE FINISHED ROOF SURFACE.
12. THE MINIMUM INSULATION THICKNESS SHALL BE 5.5". SLOPE OF TAPERED INSULATION TO BE A MINIMUM OF 1/4" PER FOOT FOR NEW CONSTRUCTION AND 1/8" PER FOOT OVER EXISTING STRUCTURE.

ROOF PLAN LEGEND

RD	ROOF DRAIN W/ SECONDARY
H.P. XX"	SLOPED INSULATION HIGH POINT (MIN. 5 1/2")
	SLOPED INSULATION ROOF CRICKET. PROVIDE 1/2"/ 1'-0" POSITIVE DRAINAGE
	MECH. CURB (W/ CRICKET), PROVIDE FLASHING PER ROOF MANUFACTURER'S DETAILS
1/4" / 1'-0"	ROOF SLOPE
	2'-0" x 2'-0" ROOF MEMBRANE WALKWAY SYSTEM
	NEW EPDM ROOF SYSTEM AS SPECIFIED



KEYPLAN AREA B

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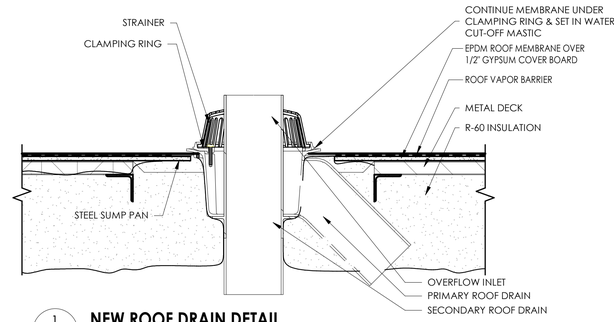
CPL	CPL

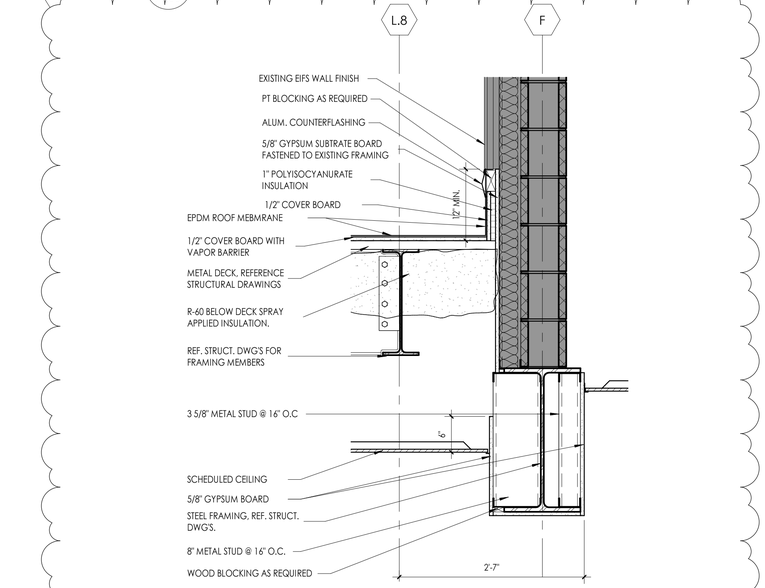
Drawing Title
ROOF PLAN AREA B

Drawing Number
HMS
A204B



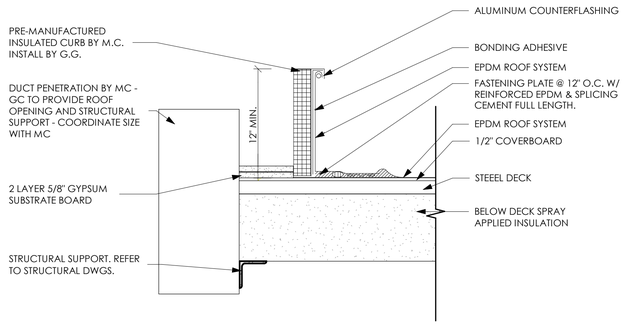
1 A205 NEW ROOF DRAIN DETAIL

1 1/2" = 1'-0"



2 A205 ROOF TO EXISTING WALL DETAIL

1" = 1'-0"



3 A205 TYPICAL ROOF CURB FLASHING DETAIL

1 1/2" = 1'-0"

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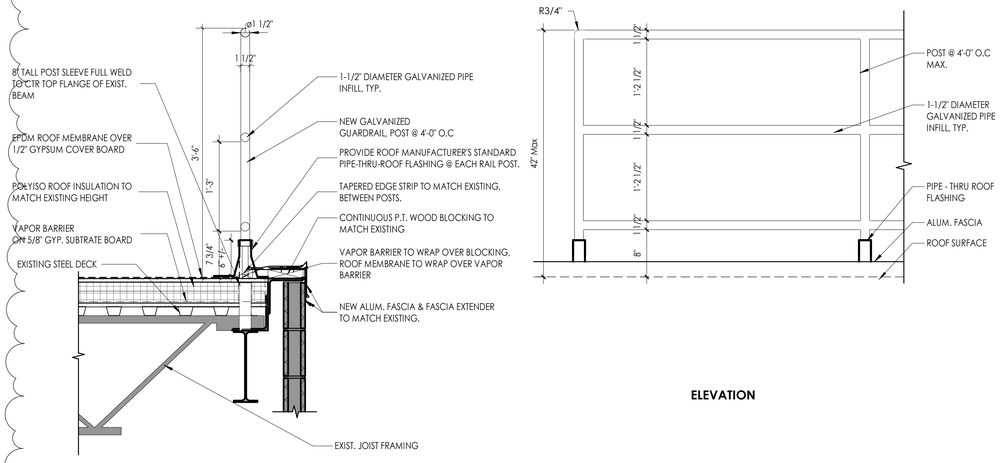
CPL

Drawing Title
ROOF DETAILS AT NEW ROOF

Drawing Number
HMS
A205

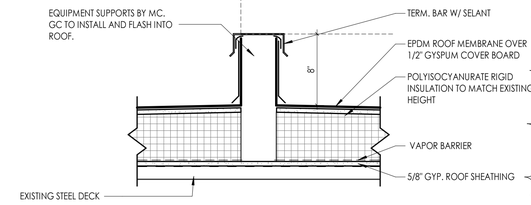


SECTION

ELEVATION

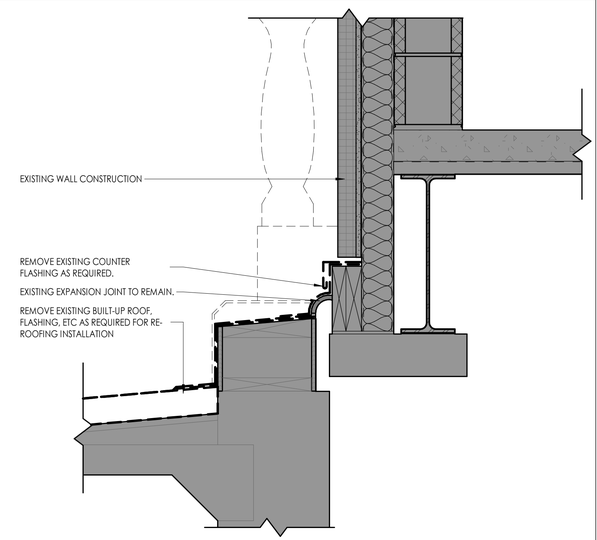
8 A206 ROOF EDGE RAILING CONNECTION DETAIL-SK

1" = 1'-0"



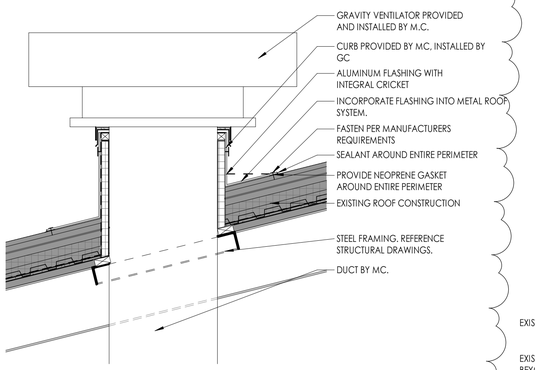
4 A206 TYPICAL ROOF EQUIPMENT RAIL DETAIL

1 1/2" = 1'-0"



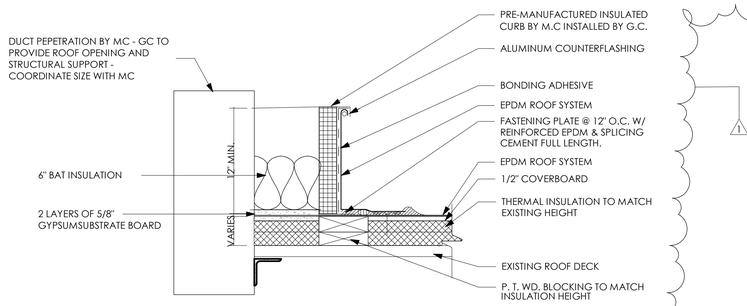
1 A206 ROOF DETAIL @ EXISTING BUILDING EJ DEMOLITION

1 1/2" = 1'-0"



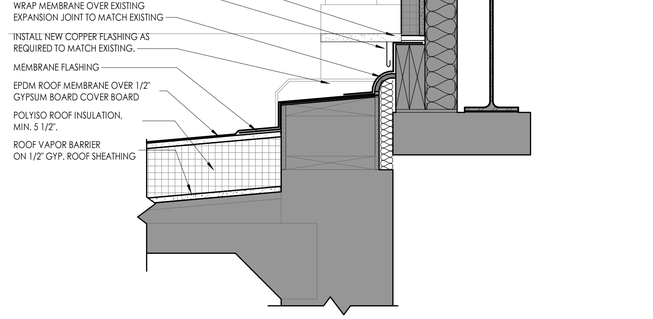
5 A206 ROOF DETAIL @ EXHAUST FAN

3/4" = 1'-0"



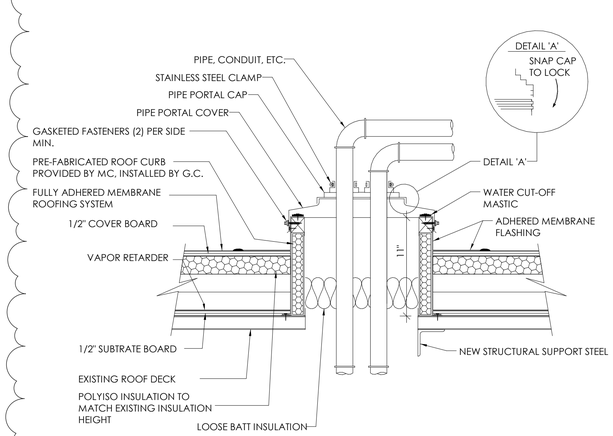
6 A206 TYPICAL NEW ROOF CURB FLASHING- EXISTING

1 1/2" = 1'-0"



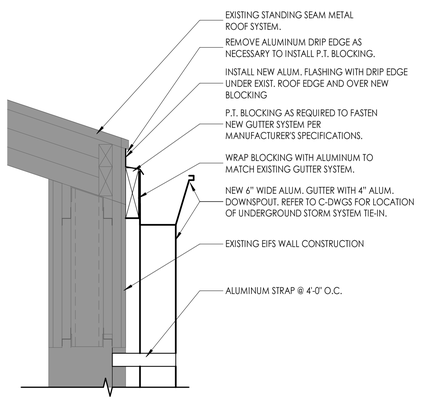
2 A206 ROOF DETAIL @ EXISTING BUILDING EJ NEW WORK

1 1/2" = 1'-0"



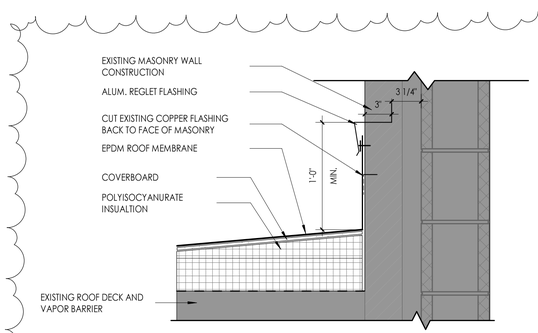
11 A206 PIPE PORTAL DETAL

1 1/2" = 1'-0"



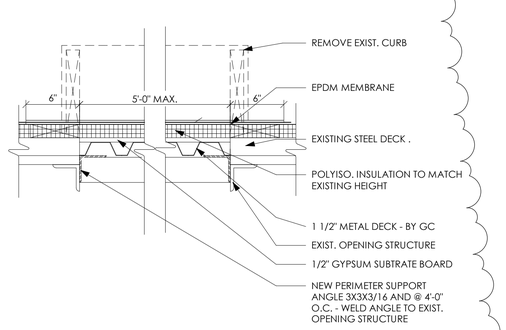
9 A206 NEW GUTTER DETAIL

1 1/2" = 1'-0"



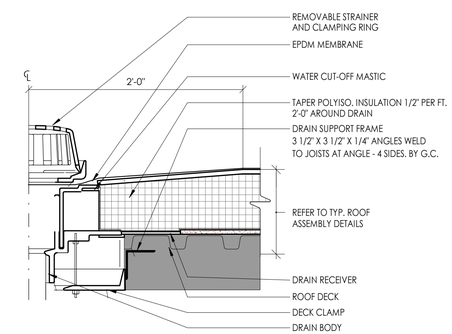
10 A206 ROOF DETAIL AT EXISTING BUILDING

1 1/2" = 1'-0"



7 A206 TYPICAL ROOF DECK INFILL DETAIL

1 1/2" = 1'-0"



3 A206 TYP. ROOF DRAIN DETAIL

1 1/2" = 1'-0"

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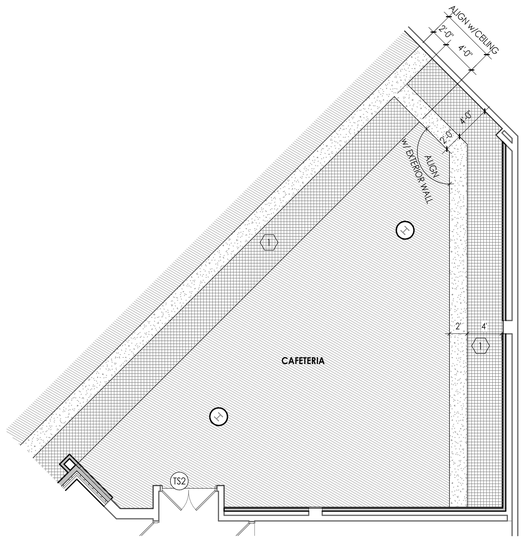
CONSTRUCTION DOCUMENTS

Drawn By	Checked By
Author	Checker

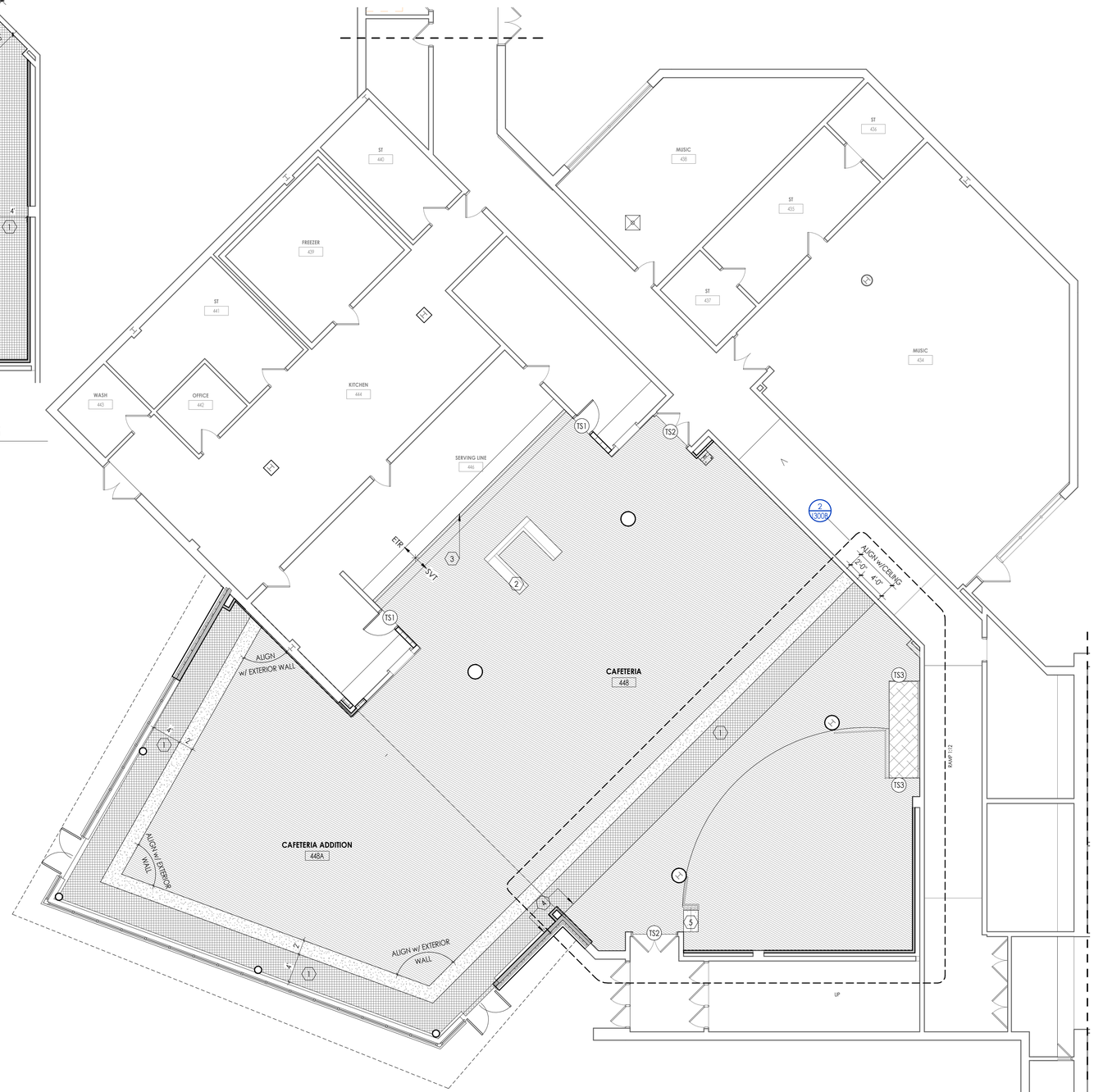
Drawing Title
ROOF DETAILS AT EXISTING ROOF

Drawing Number
HMS
A206



2 / 1300B **GROUND FLOOR PATTERN PLAN - AREA B ALTERNATE GC-5**

1/8" = 1'-0"



1 / 1300B **GROUND FLOOR PATTERN PLAN - AREA B BASE BID**

1/8" = 1'-0"

FLOOR PATTERNING GENERAL NOTES

1. ALL FLOOR FINISHES SHALL TRANSITION AT THE CENTERLINE OF THE DOOR, UNLESS NOTED OTHERWISE (U.N.O.). INSTALL TRANSITION STRIPS PER DETAILS ON I300.
2. PATCH TO MATCH EXISTING WALL, BASE, FLOOR AND CEILING FINISHES IN AREAS AFFECTED BY DEMOLITION AND/OR NEW CONSTRUCTION.
3. ALL GROUT TO BE SEALED A MINIMUM OF TWO TIMES PRIOR TO COMPLETION.
4. WHERE KICKSPACES OCCUR AT MILLWORK, FLOOR FINISH SHOWN ON PLANS SHALL RUN UNDERNEATH KICKSPACE AS WELL.

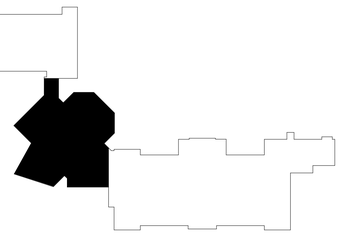
FLOOR PATTERNING KEY NOTES

1. FLOOR TILE (SVT-1) TO BE ALIGNED WITH CEILING ACCENT (ACT-5) ABOVE.
2. EXISTING MILLWORK REMAINS. INSTALL SCHEDULED FLOOR TILE. PROVIDE WALL BASE (RB-2) AT EXISTING MILLWORK.
3. VINYL TILE TO CONTINUE UNDER SERVING STATION; G.C. TO VERIFY IN FIELD EXACT LOCATION.
4. ALIGN EDGE OF FLOORING WITH EXTERIOR WALL OF ADDITION.
5. RUBBER STAIR TREAD & RISER.

FLOOR PATTERNING LEGEND

SVT-1/VCT-1 | SVT-2/VCT-2 | SVT-3/VCT-3 | RT-1

INSTALLATION DIRECTION | XXX ◄ ► XXX MATERIAL TRANSITION | TSX TRANSITION STRIP



KEYPLAN AREA B

NTS

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13940.18

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SED Number
44-16-00-01-0-039-011

PROJECT ISSUE SCHEDULE

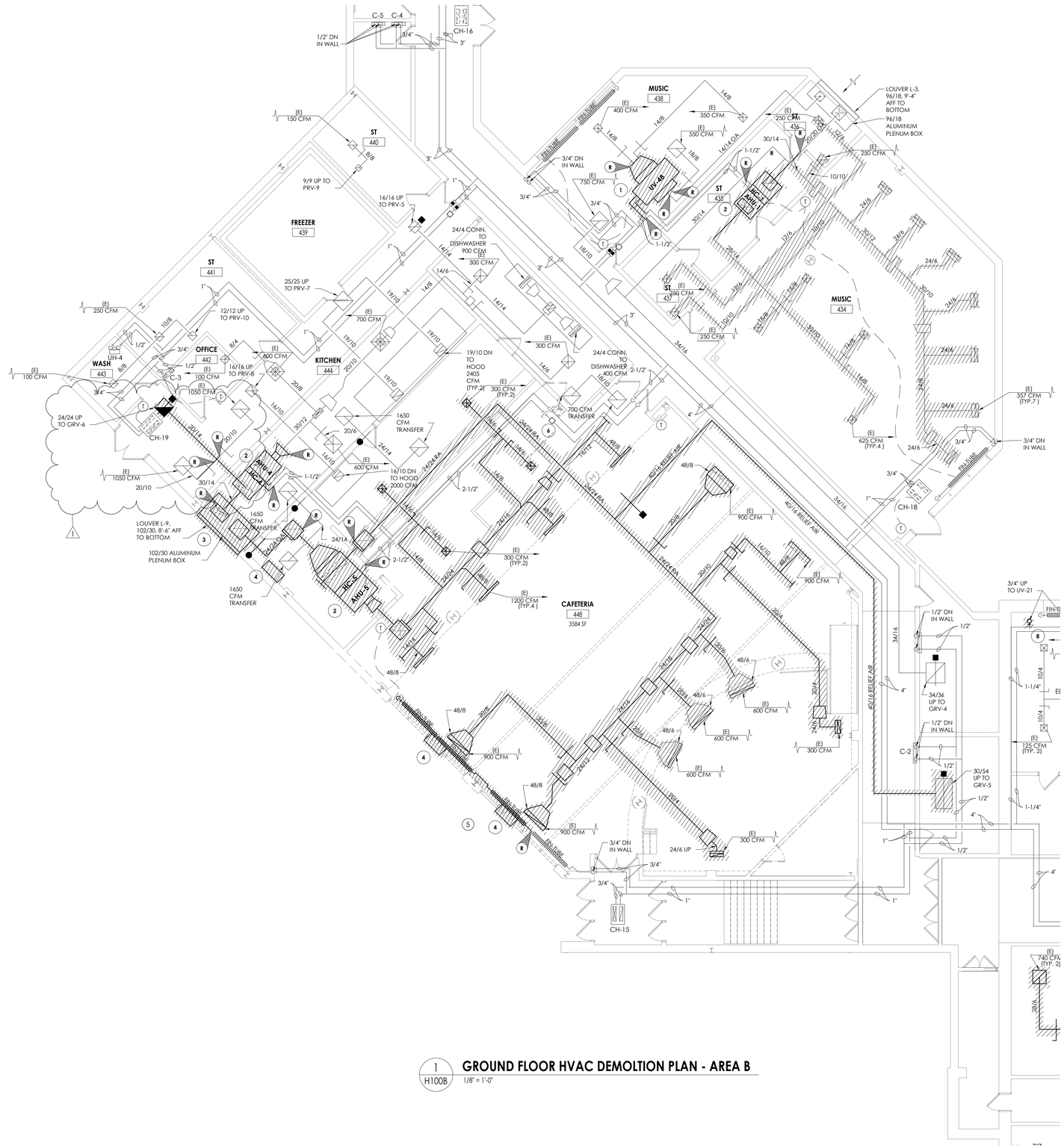
No.	Date	Description
1	09/21/21	BID ADDENDA 1

SHEET INFORMATION

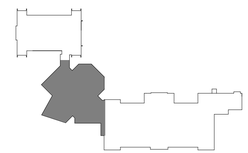
Issued: 9/9/2021
Scale: As indicated
Project Status: CONSTRUCTION DOCUMENTS
Drawn By: DS
Checked By: CTV
Drawing Title: GROUND FLOOR AREA B - FLOOR PATTERNING PLAN
Drawing Number: HMS I300B

KEY NOTES

1. REMOVE EXISTING UNIT VENTILATOR, SAVE CONTROL VALVE ACTUATOR AND PREPARE CONTROL WIRING FOR NEW UNIT.
2. REMOVE EXISTING AIR HANDLING UNIT AND ASSOCIATED SUPPORTS AND DUCTWORK TO POINTS INDICATED. SALVAGE CONTROLS WIRING. PREPARE CONTROL, PIPING AND DUCTWORK FOR NEW UNIT.
3. REMOVE EXISTING OUTDOOR AIR LOUVER AND PLENUM.
4. REMOVE EXISTING EXHAUST FAN AND CONTROLS.
5. REMOVE EXISTING FINTUBE AND ENCLOSURE TO POINTS INDICATED. PREPARE PIPING FOR NEW CONNECTION.
6. RELOCATE APPROXIMATELY 20 LINEAR FEET OF EXISTING 2-1/2" HHWS/R PIPING TO ALLOW FOR INSTALLATION OF NEW DIVIDING WALL.



1 H100B **GROUND FLOOR HVAC DEMOLTION PLAN - AREA B**
1/8" = 1'-0"



KEYPLAN

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Project Status
CONSTRUCTION DOCUMENTS

Drawn By
NRH

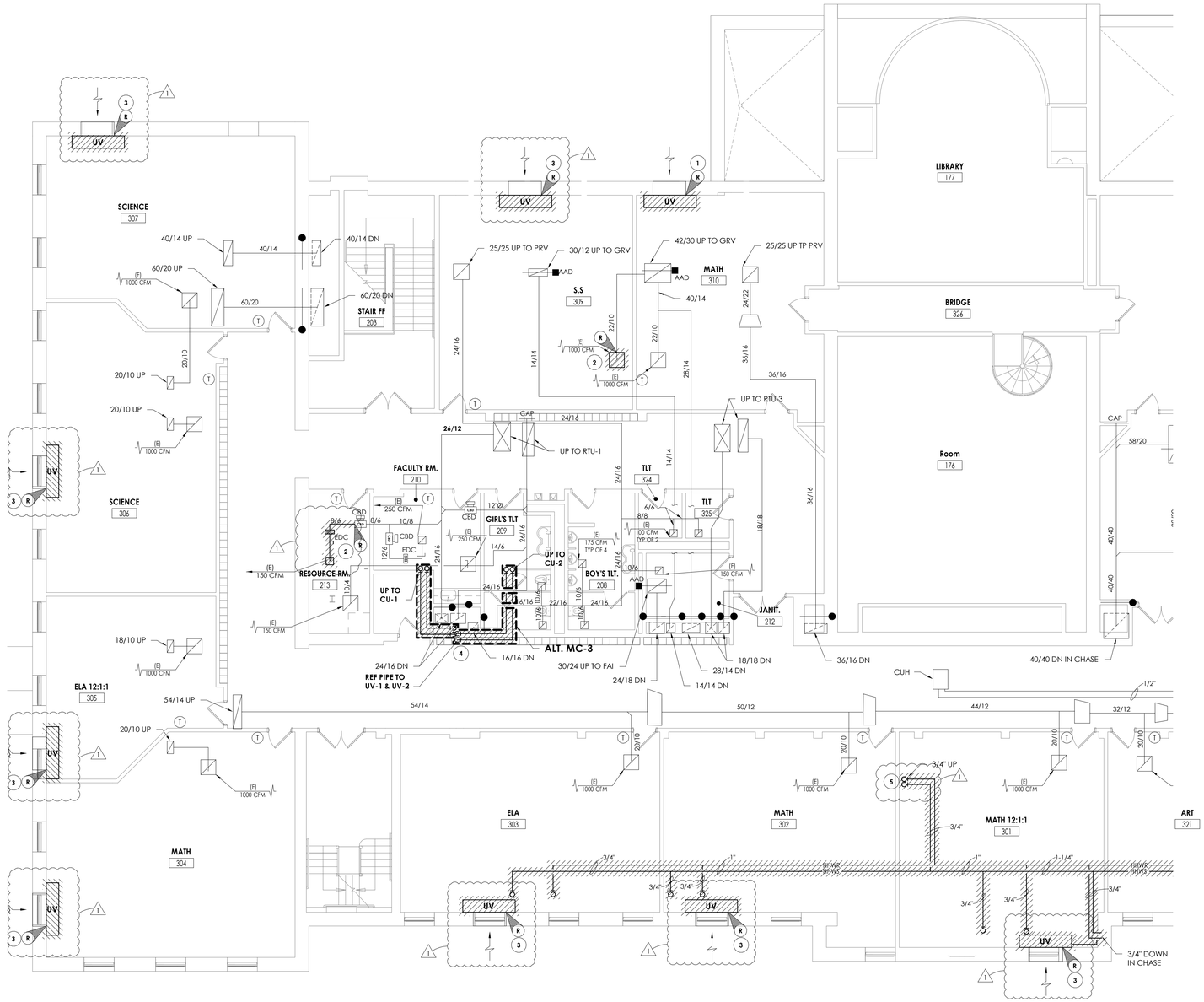
Checked By
JJM

Drawing Title
GROUND FLOOR HVAC DEMOLITION PLAN - AREA B

Drawing Number
HMS H100B

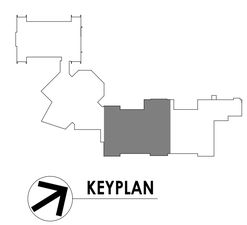
KEY NOTES

1. REMOVE EXISTING UNIT VENTILATOR AND OUTDOOR AIR LOUVER. SAVE CONTROLS AND CONTROL WIRING.
2. REMOVE DUCTWORK TO POINT INDICATED AND PREPARE DUCTWORK FOR NEW CONNECTION.
3. REMOVE EXISTING UNIT VENTILATOR. SAVE CONTROL VALVE ACTUATOR AND PREPARE CONTROL WIRING FOR EXTENSION TO NEW UNIT. OUTDOOR AIR LOUVER TO REMAIN.
4. REMOVE EXISTING REFRIGERANT LINES IN ENTIRETY.
5. REMOVE PIPING TO POINT INDICATED AND PREPARE FOR NEW CONNECTION.



1 SECOND FLOOR HVAC DEMOLTION PLAN - AREA C
H102C

1/8" = 1'-0"



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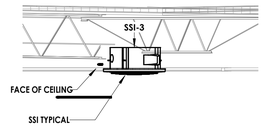
Drawn By	Checked By
NRH	JJM

Drawing Title
SECOND FLOOR HVAC DEMOLITION PLAN - AREA C

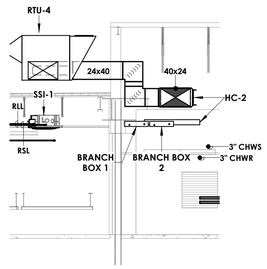
Drawing Number
HMS H102C

1 H200B **GROUND FLOOR HVAC DUCTWORK - AREA B**
1/8" = 1'-0"

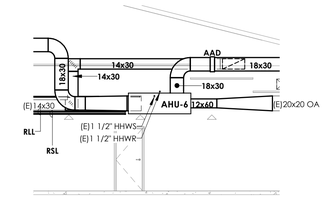
SEE H902 FOR AIR BALANCE



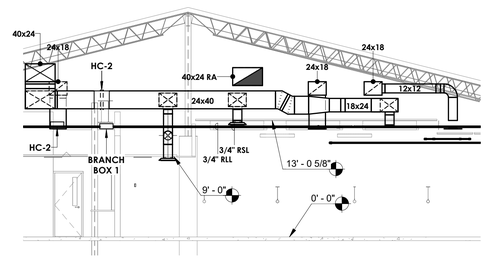
2 H200B **TYPICAL MOUNTING SSI SECTION**
1/4" = 1'-0"



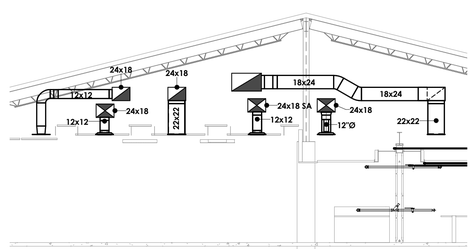
3 H200B **CAFETERIA RTU-4 SECTION**
1/8" = 1'-0"



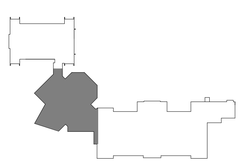
4 H200B **MUSIC ROOM ELEVATION**
1/8" = 1'-0"



5 H200B **CAFETERIA DUCTWORK ELEVATION**
1/8" = 1'-0"



6 H200B **CAFETERIA DUCTWORK SECTION**
1/8" = 1'-0"



KEYPLAN

KEY NOTES

1. MOUNT UNIT VENTILATOR ABOVE CEILING. COORDINATE WITH ANY CEILING UTILITIES. MAINTAIN ACCESS FOR FILTER CHANGES. EXTEND EXISTING CONTROLS TO NEW UNIT LOCATION.
2. PROVIDE NEW AIR HANDLING UNIT ABOVE CEILING. PROVIDE VIBRATION ISOLATION. CONNECT DUCTWORK TO POINTS INDICATED. COORDINATE UNIT SERVICE ACCESS WITH ABOVE CEILING STRUCTURE.
3. 24X36 OUTDOOR AIR DUCT UP TO GV-1 ON SLOPED ROOF.
4. MOUNT VRF UNIT TIGHT TO STRUCTURE. VRF SHALL BE PROVIDED WITH SQUARE CASING. COORDINATE WITH ARCHITECTURAL CEILING GRID AND LIGHTING.
5. COORDINATE DUCT ROUTING WITH STRUCTURAL STEEL.
6. COORDINATE NEW DUCTWORK WITH NEW DIVIDER.
7. COORDINATE CEILING WITH GC.
8. PROVIDE OPENING FOR NEW SUPPLY AND RETURN DUCTWORK. PROVIDE WATER TIGHT FLASHING.

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09/09/2021

Scale
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CONSTRUCTION DOCUMENTS

Drawn By
NRH

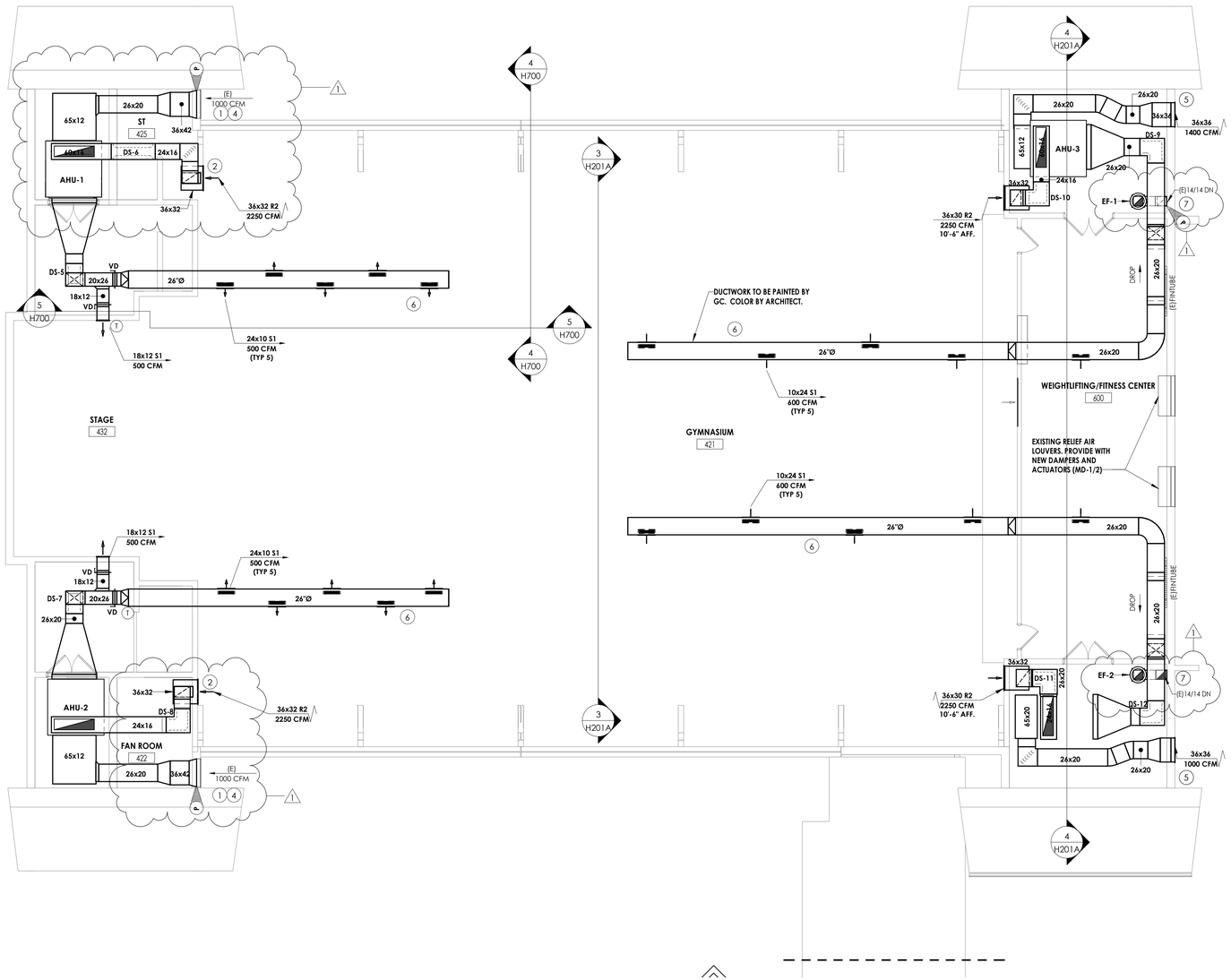
Checked By
JJM

Drawing Title
GROUND FLOOR HVAC DUCTWORK PLAN - AREA B

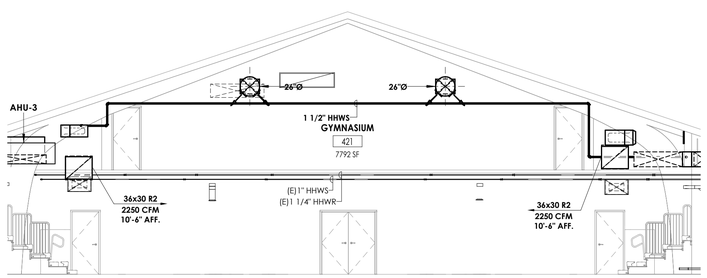
Drawing Number
HMS
H200B

KEY NOTES

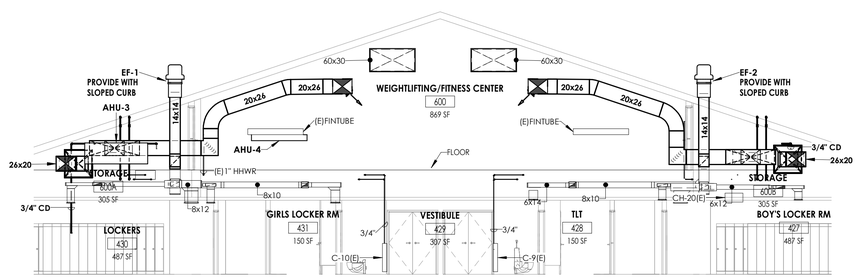
1. MOUNT AIR HANDLING UNIT 12" ABOVE FINISHED FLOOR. MAINTAIN EQUIPMENT ACCESS REQUIREMENTS. EXTEND EXISTING CONTROLS TO NEW UNIT.
2. RE-USE EXISTING OPENING IN WALL. PROVIDE GRILLE.
3. PROVIDE NEW RETURN AIR LOUVER. COLOR BY ARCHITECT.
4. REUSE EXISTING 36"×42" SUPPLY AIR LOUVER.
5. PROVIDE NEW OUTDOOR AIR LOUVER. PROVIDE WITH BIRDSCREEN AND DRAINABLE BLADES.
6. HANG DUCTWORK WITH CABLE.
7. CONNECT NEW FAN TO EF WITH 14"X14" DUCTWORK.



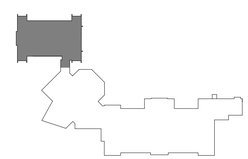
1 H201A **FIRST FLOOR HVAC DUCTWORK PLAN - AREA A**
1/8" = 1'-0"



3 H201A **GYMNASIUM ELEVATIONS**
1/8" = 1'-0"



4 H201A **LOCKER AND WEIGHTLIFTING SECTION**
1/8" = 1'-0"



KEYPLAN

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Drawn By
NRH

Checked By
JJM

Drawing Title
FIRST FLOOR HVAC DUCTWORK PLAN - AREA A

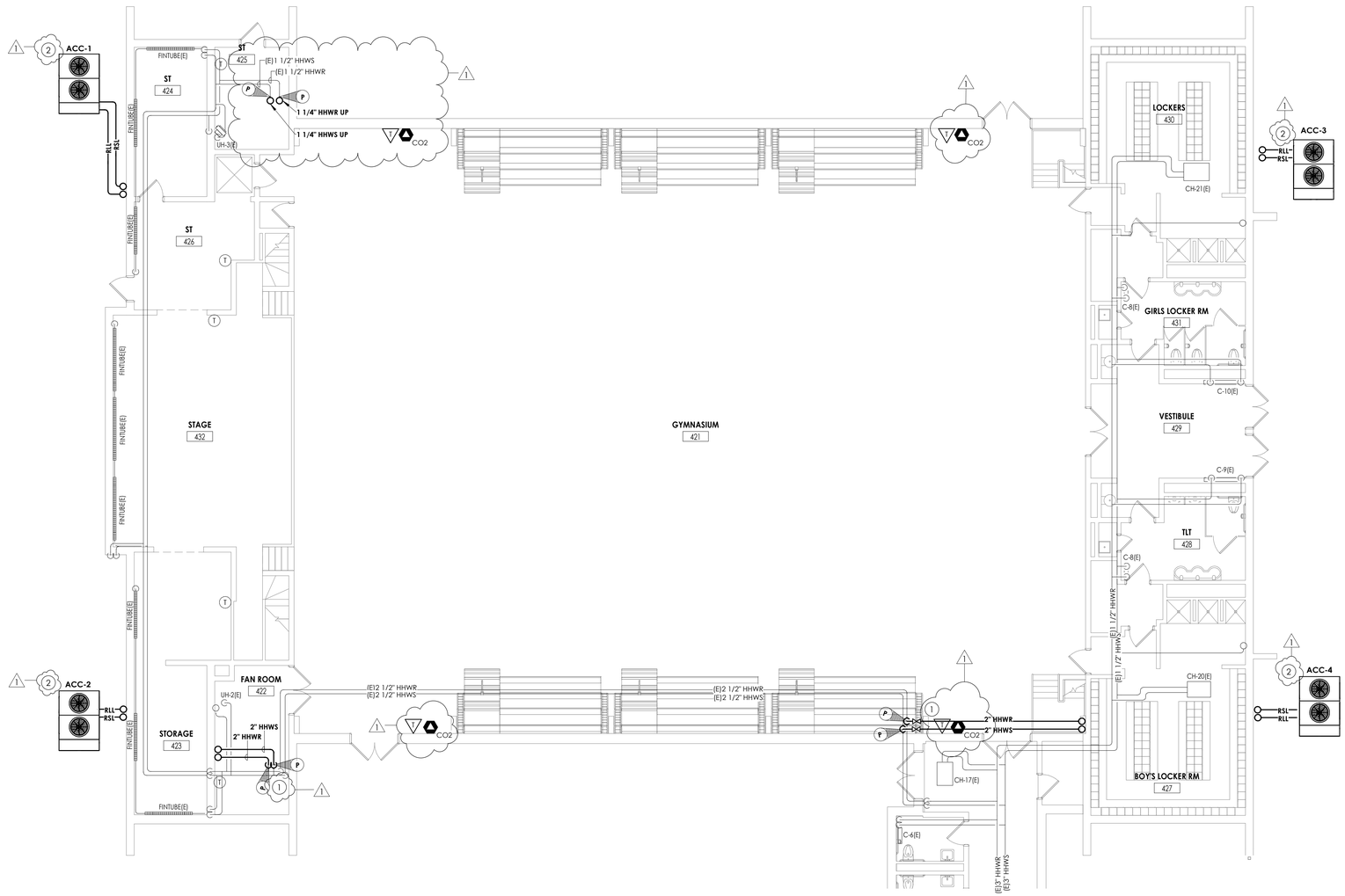
Drawing Number
HMS
H201A

GENERAL NOTES

1. ALL COOLING EQUIPMENT ABOVE THE CEILING SHALL HAVE SECONDARY DRAIN PANS WITH FLOAT OVERFLOW ALARM CONNECTED TO THE BMS.
2. EXTEND ALL EXISTING CONTROL WIRING TO NEW UNITS. COORDINATE WITH JOHNSON CONTROLS SYSTEMS. SENSORS BY JCS.

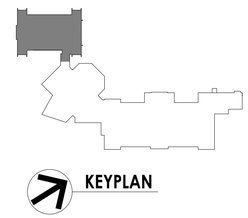
KEY NOTES

1. CONNECT TO EXISTING PIPING MAIN AT POINT INDICATED.
2. MOUNT ACC ON PAD BY G.C. RSL/RLL PIPING TO AHU'S INSIDE SECURE TO WALL.



1 H300A **GROUND FLOOR HVAC PIPING PLAN - AREA A**

1/8" = 1'-0"



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Project Status
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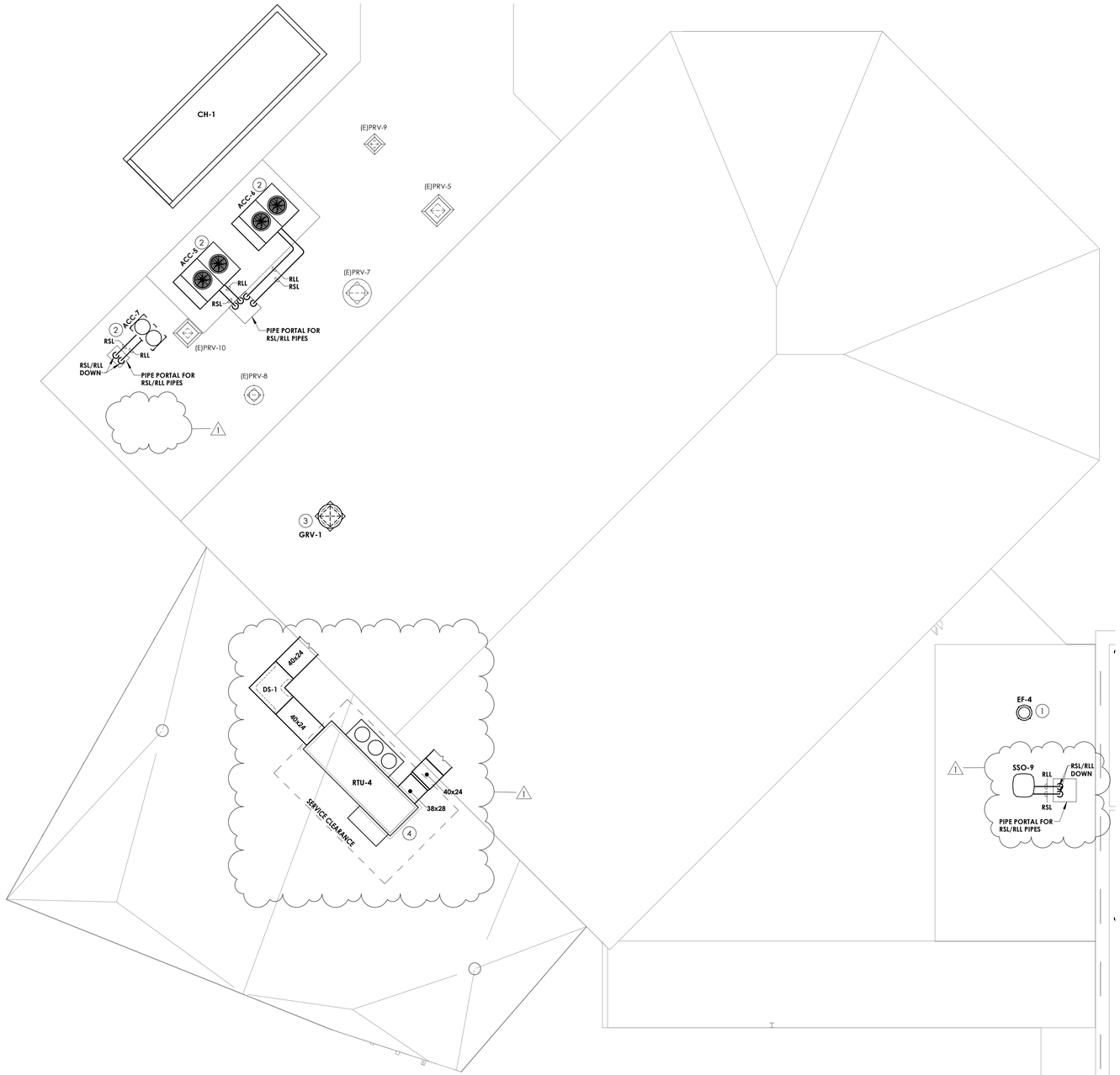
Drawn By
NRH

Checked By
JJM

Drawing Title
GROUND FLOOR HVAC PIPING PLAN - AREA A

Drawing Number
HMS
H300A



1 H301B **FIRST FLOOR HVAC PIPING PLAN - AREA B**
1/8" = 1'-0"

GENERAL NOTES

1. ALL COOLING EQUIPMENT ABOVE THE CEILING SHALL HAVE SECONDARY DRAIN PANS WITH FLOAT OVERFLOW ALARM CONNECTED TO THE BMS.
2. EXTEND ALL EXISTING CONTROL WIRING TO NEW UNITS. COORDINATE WITH JOHNSON CONTROLS SYSTEMS. SENSORS BY JCS.

KEY NOTES

1. INSTALL NEW RELIEF FAN ON EXISTING CURB.
2. PROVIDE NEW RAILS WITH VIBRATION ISOLATION FOR NEW CONDENSING UNIT.
3. PROVIDE NEW GRAVITY INTAKE AND SLOPED CURB. FIELD VERIFY ROOF SLOPE.
4. PROVIDE NEW ROOFTOP UNIT WITH 12" CURB.

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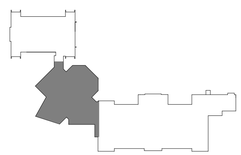
Drawn By
NRH

Checked By
JJM

Drawing Title
FIRST FLOOR HVAC PIPING PLAN - AREA B

Drawing Number
HMS
H301B



KEYPLAN

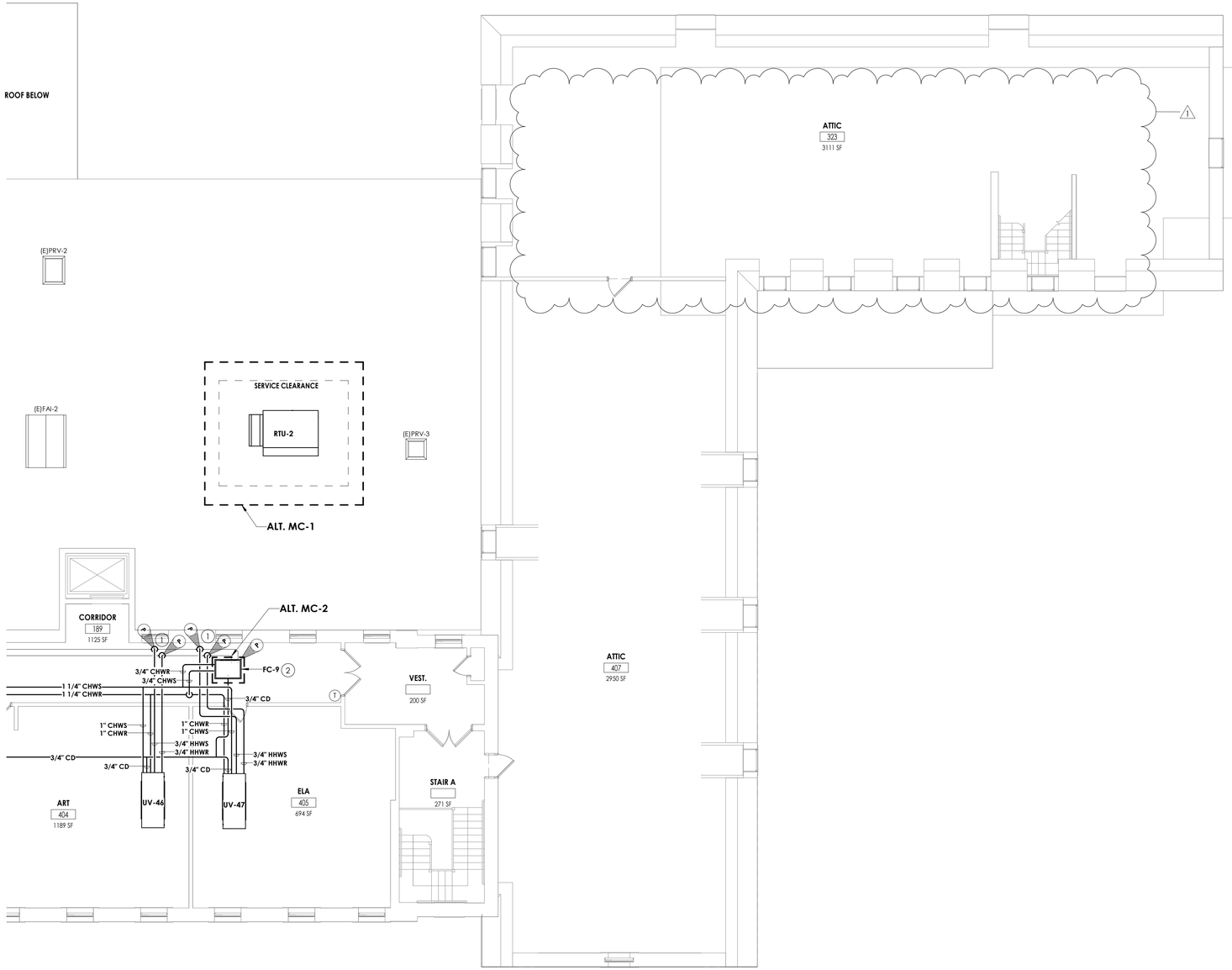
GENERAL NOTES

1. ALL COOLING EQUIPMENT ABOVE THE CEILING SHALL HAVE SECONDARY DRAIN PANS WITH FLOAT OVERFLOW ALARM CONNECTED TO THE BMS.
2. EXTEND ALL EXISTING CONTROL WIRING TO NEW UNITS. COORDINATE WITH JOHNSON CONTROLS SYSTEMS. SENSORS BY JCS.

KEY NOTES

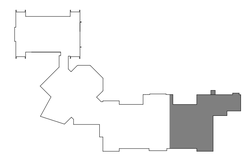
(1) CONNECT NEW PIPING TO EXISTING PIPING AT POINTS INDICTAED. RE-INSULATE ANY EXISTING PIPING AT CONNECTED LOCATIONS.

(2) CONNECT TO EXISTING TEMPERATURE CONTROLS.



1 H303D **THIRD FLOOR HVAC PIPING PLAN - AREA D**

1/8" = 1'-0"



KEYPLAN

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Drawn By
NRH

Checked By
JJM

Drawing Title
THIRD FLOOR HVAC PIPING PLAN - AREA D

Drawing Number
HMS
H303D

ROOF TOP ENERGY RECOVERY UNIT

MARK	LOCATION	AREA SERVED	SA (CFM)	EA (CFM)	RA (CFM)	COOLING COIL					SUPPLY FAN					EXHAUST FAN					TOTAL MBH SAVED SUMMER	TOTAL MBH SAVED WINTER	OPERATING WEIGHT (LBS)	FILTERS	ELECTRICAL REQUIREMENTS			TYPICAL UNIT MFG & MODEL NO.	REMARKS:
						TOTAL MBH	SENS MBH	EAT	LAT	AMB	FAN TYPE	E.S.P. (IN. WC)	RPM	BHP	HP	FAN TYPE	E.S.P. (IN. WC)	RPM	BHP	HP					V/Ø/HZ	FLA	MCA		
RTU-4	CAFÉ ROOF	CAFETERIA	9100	6000	6000	486	320	79.7	54.07	75	PLENUM	1	1760	11.89	15	PLENUM	0.5	1760	9.39	10	183	511	3780	MERV 13	208/360	195	207	AAON RN-025-8-0-EB09-EJK	1,2,3,4

REMARKS:
1. FACTORY MOUNTED AND WIRED DISCONNECT. 115V CONVIENIENCE OUTLET, FACTORY WIRED. CLOGGED FILTER SWITCH,
2. ECM CONDENSER FAN, HEAT PRESSURE CONTROL WITH SIGHT GLASS. REMOTE SAFETY SHUTDOWN TERMINAL.
3. TERMINAL STRIP FOR BMS CONTROL OF FAN AND DAMPERS. COMPATIBLE WITH JOHNSON CONTROLS FACILITY EXPLORER.
4. DOUBLE WALL, R-13 FOAM INSULATION. STAINLESS STEEL DRAIN PAN.

AIR SEPARATOR SCHEDULE

MARK	LOCATION	SERVED	GPM	WEIGHT (LBS)	DIA. (IN)	LNG. (IN)	STRAINER SQ. IN. FA	TYPICAL UNIT MFG & MODEL NO.
AS-1	CHILLER PUMP ROOM	CHILLED WATER	300	579	18	44	6	B&G R-6F

REMARKS: 1. 30% PROPYLENE GLYCOL.

PUMP SCHEDULE

MARK	LOCATION	SERVICE	GPM	HD (FT.)	ELECTRICAL DATA			TYPICAL UNIT MFG & MODEL NO.	REMARKS:
					HP	VOLTS	PH		
P-1	STORAGE 423	CHILLED WATER	300	80	15	208	3	B&G E-1510 3BD	1,2,3
P-2	STORAGE 423	CHILLED WATER	300	80	15	208	3	B&G E-1510 3BD	1,2,3

REMARKS:
1. 30% PROPYLENE GLYCOL.
2. SUCTION DIFFUSER.
3. WALL MOUNTED VFD UNIT DISCONNECT.

VRF FAN COIL UNITS

MARK	TOTAL AIRFLOW CFM	NOM.HEATING CAPACITY BTU/HR	NOM.COOLING CAPACITY BTU/HR	WEIGHT (LBS)	POWER (Ø/V/HZ)	AMPS	TYPICAL UNIT MFG & MODEL NO.	REMARKS:
SSI-1	1500	27000	24000	47	1 / 208 / 60	0.28	SAMSUNG - AM024KN4DCH/AA	1,2,3,4,5
SSI-2	1500	27000	24000	47	1 / 208 / 60	0.28	SAMSUNG - AM024KN4DCH/AA	1,2,3,4,5
SSI-3	1500	27000	24000	47	1 / 208 / 60	0.28	SAMSUNG - AM024KN4DCH/AA	1,2,3,4,5
SSI-4	1500	27000	24000	47	1 / 208 / 60	0.28	SAMSUNG - AM024KN4DCH/AA	1,2,3,4,5
SSI-5	1500	27000	24000	47	1 / 208 / 60	0.28	SAMSUNG - AM024KN4DCH/AA	1,2,3,4,5
SSI-6	1500	27000	24000	47	1 / 208 / 60	0.28	SAMSUNG - AM024KN4DCH/AA	1,2,3,4,5
SSI-7	1500	27000	24000	47	1 / 208 / 60	0.28	SAMSUNG - AM024KN4DCH/AA	1,2,3,4,5
SSI-8	1500	27000	24000	47	1 / 208 / 60	0.28	SAMSUNG - AM024KN4DCH/AA	1,2,3,4,5
SSI-9	250-430	21500	15000	23.4	1 / 208 / 60	-	SAMSUNG - AR12TSFABWKNCV	1,2,3,4,5

REMARKS:
1. UNIT MOUNTED AND WIRED DISCONNECT.
2. BAC NET INTERGRATION TO BMS, JOHNSON CONTROLS FACILITY EXPLORER.
3. COLOR WHITE.
4. DRAIN PAN LEVEL SESORS.
5. CONDENSATE PUMP.

EXPANSION TANK SCHEDULE

MARK	LOCATION	SERVED	ACCEPT. GAL.	DIA (IN.)	HEIGHT (IN.)	WEIGHT FULL (LBS.)	TYPICAL UNIT MFG & MODEL NO.	REMARKS:
ET-1	CHILLER PUMP ROOM	CHILLED WATER	79	20	58	992	TACO CA-300	1,2

REMARKS:
1. REMOVABLE BLADDER TYPE
2. CHARGE TO 12PSI.
3. 30% PROPYLENE GLYCOL.

FIN TUBE SCHEDULE

MARK	BTU/FT.	GPM	TUBE SIZE (IN.)	FINS / FT.	EWT (°F)	EAT (°F)	ENCLOSURE			TYPICAL UNIT MFG & MODEL NO.	REMARKS:
							H (IN.)	D (IN.)	STYLE		
FT-1	720	5	3/4	40	180	65	10-3/4	6-1/16	PEDESTAL	STERLING JVB	1,2,3,4

REMARKS:
1. CONTROL VALVES ABOVE THE CEILING.
2. COLOR BY ARCHITECT.
3. ELEMENT LENGTH LISTED ON PLANS. CAT - 66289C RETURN
4. COORDINATE HEIGHT WITH ELECTRICAL DEVICES.

CHILLER SCHEDULE

MARK	NOMINAL CAPACITY (TONS)	% PROP GLYCOL	CHILLED WATER					REFRIGERANT		ELECTRICAL DATA			WEIGHT (LBS)	TYPICAL UNIT MFG & MODEL NO.	REMARKS
			FLOW (GPM)	DELTA P (FT)	IPLV	EWT (°F)	LWT (°F)	REF. TYPE.	CHARGE (LB)	VOLTS/Ø	MCA	MOP			
CH-1	180	30	270	17.42	20.516	56.97	42.00	134A	420.00	230/3	654	800	15700	TRANE-ACRB1805B	1,2,3,4

REMARKS:
1. FACTORY MOUNTED AND WIRED DISCONNECT.
2. THE SCHEDULED REFRIGERANT CHARGE IS A MANUFACTURERS ESTIMATE, COORDINATE THE CORRECT CHARGE BASED ON FIELD CONDITIONS.
3. FIVE YEAR COMPRESSOR WARRANTY.
4. HEAT TRACED EVAPORATOR BARREL AND EXTERIOR PIPING. HEAT TRACE SHALL BE ON SEPARATE 120V/20AMP CIRCUIT.

FAN COIL UNIT SCHEDULE

MARK	TYPE	LOCATION	MAX CFM	COOLING			HEATING				WPD FT.WC	ELECTRICAL DATA			TYPICAL UNIT MFG & MODEL NO.	REMARKS:
				MBH	GPM	WPD	MBH	EWT (°F)	WATER ΔT	GPM		WATTS	VOLTS	PHASE		
FC-1	DUCTED	159 CUSTODIAN	1020	20	5	3.1	42	180	160	4.5	5.6	150	115	60	AIRTHERM 101-1	1,2,3,4,5
FC-2	CEILING RECESSED	GROUND FLOOR HALL	1020	20	5	3.1	42	180	160	4.5	5.6	150	115	60	AIRTHERM 101-1	1,2,3,4
FC-3	CEILING RECESSED	GROUND FLOOR HALL	1020	20	5	3.1	42	180	160	4.5	5.6	150	115	60	AIRTHERM 101-1	1,2,3,4,5
FC-4	CEILING RECESSED	1ST FLOOR HALL	1020	20	5	3.1	42	180	160	4.5	5.6	150	115	60	AIRTHERM 101-1	1,2,3,4,5
FC-5	CEILING RECESSED	1ST FLOOR HALL	1020	20	5	3.1	42	180	160	4.5	5.6	150	115	60	AIRTHERM 101-1	1,2,3,4,5
FC-6	CEILING RECESSED	2ND FLOOR HALL	1020	20	5	3.1	42	180	160	4.5	5.6	150	115	60	AIRTHERM 101-1	1,2,3,4,5
FC-7	CEILING RECESSED	2ND FLOOR HALL	1020	20	5	3.1	42	180	160	4.5	5.6	150	115	60	AIRTHERM 101-1	1,2,3,4,5
FC-8	CEILING RECESSED	1ST FLOOR HALL	1020	20	5	3.1	42	180	160	4.5	5.6	150	115	60	AIRTHERM 101-1	1,2,3,4,5
FC-9	CEILING RECESSED	3RD FLOOR HALL	1020	20	5	3.1	42	180	160	4.5	5.6	150	115	60	AIRTHERM 101-1	1,2,3,4,5
FC-10	DUCTED	105B SCHOOL PYCHOLOGIST	1020	20	5	3.1	42	180	160	4.5	5.6	150	115	60	AIRTHERM 101-1	1,2,3,4
FC-11	CEILING RECESSED	3RD FLOOR HALL	1020	20	5	3.1	42	180	160	4.5	5.6	150	115	60	AIRTHERM 101-1	1,2,3,4,5

REMARKS:
1. FACTORY MOUNTED AND WIRED DISCONNECT.
2. PROVIDE WITH 1" MERV 7 FILTERS
3. 30% PROPYLENE GLYCOL COOLING COIL.
4. CONDENSATE PUMP.
5. ALTERNATE NO. MC-2

AIR HANDLING UNIT SCHEDULE

MARK	ROOM SERVED	CFM	MIN. OA CFM	EXT. SP W.C.	COOLING MBH				HOT WATER HEATING COIL DATA						SUPPLY FAN MOTOR DATA			TYPICAL UNIT MFG & MODEL NO.	REMARKS:
					TOTAL	SENS	ROWS	EAT °F DB/WB	LAT °F DB/WB	MBH	EWT	LWT	EAT °F	LAT °F	GPM	WPD FT-W.C.	BHP/HP	RPM	VOLTS/Θ		
AHU-1	GYM	3500	750	1.5	145	102	4	83.2/68.8	57.9/56	204	180	138	58.7/55.6	111.5/72.7	10	0.7	3.3/4	1935	208/3/60	AAON: H3-DRB-8-0-162D-12F	1,2,3,4,5
AHU-2	GYM	3500	750	1.5	145	102	4	83.2/68.8	57.9/56	204	180	138	58.7/55.6	111.5/72.7	10	0.7	3.3/4	1935	208/3/60	AAON: H3-DRB-8-0-162D-12F	1,2,3,4,5
AHU-3	GYM	3500	750	1.5	145	102	4	83.2/68.8	57.9/56	204	180	138	58.7/55.6	111.5/72.7	10	0.7	3.3/4	1935	208/3/60	AAON: H3-DRB-8-0-162D-12F	1,2,3,4
AHU-4	GYM	3500	750	1.5	145	102	4	83.2/68.8	57.9/56	204	180	138	58.7/55.6	111.5/72.7	10	0.7	3.3/4	1935	208/3/60	AAON: H3-DRB-8-0-162D-12F	1,2,3,4
AHU-5	KITCHEN	2600	500	1	98.3	70.57	6	80/67	56.1/44.7	128.7	180	127	60.4/56.6	105.4/71.3	5	0.3	1.68/4	1552	208/3/60	AAON:H3-CRB-8-0-162C-12F	1,2,3,4,5
AHU-6	MUSIC	4200	1500	1.2	185.6	129.7	6	85.4/70.2	57.8/56.3	266.4	180	122.3	47.9/47.9	104.2/68.5	9.5	0.7	3.12/4	1901	208/3/60	AAON: H3-DRB-8-0-162C-12F	1,2,3,4,5

REMARKS:
1. FACTORY MOUNTED AND WIRED DISCONNECT. ALL UNITS SHALL BE SINGLE POINT CONNECTION.
2. DAMPER ACTUATORS BY MANUFACTURER. FULLY MODULATING ACCUATORS. MERV 13 FILTERS. MAGNEHELIC HAUGE CLOG FILTER SWITCH. THERMAL EXPANSION VALVES.
3. CONNECT TO EXISTING JOHNSON CONTROLS, FACILITY EXPLORER.
4. VIBRATION ISOLATION.
5. CONTROLS RELOCATED BY OTHERS FROM EXISTING UNIT.

HOT WATER COIL SCHEDULE

MARK	SERVICE	AIR DATA					WATER DATA					MFG SIZE HXL (IN.)	ROWS	TYPICAL UNIT MFG & MODEL NO.	REMARKS:
		CFM	TEMP (°F)		MAX APD (IN. WC)	MIN. MBH	GPM	TEMP (°F)		MAX APD (IN. WC)					
			ENT	LVG				ENT	LVG						
HC-1	SF-9	2250	-2	70	0.76	174,960	18.8	180	160	3.8		15X22	2	CAPITAL COIL W8-2215-12B-HCA-R	1,2
HC-2	RTU-4	9100	-2	70	0.56	707,616	70.8	180	160	4.5		46X30	4	CAPITAL COIL	1

REMARKS:
1. TUBE OD 0.625, TUBE SPACING 1.50X1.299
2. ALTERNATE MC-05.

REGISTERS, GRILLES, AND DIFFUSERS

MARK	APPLICATION	MATERIAL	TYPE	FINISH	DESIGN EQUIP.	REMARKS
D1	SUPPLY	STEEL	LAY-IN	WHITE	PRICE SPD	4
D2	SUPPLY	STEEL	DUCT GRILLE	WHITE	PRICE SDG	1,3
S1	SUPPLY	STEEL	DUCT GRILLE	WHITE	PRICE HCD	1
R1	RETURN/EA	STEEL	LAY-IN	WHITE	PRICE PDR	4
R2	RETURN/EA	STEEL	WALL GRILLE	WHITE	PRICE 90	2,3

REMARKS:
1. OPPOSED BLADE DAMPER.
2. CONCEALED MOUNTING.
3. SINGLE DEFLECTION, BLADES PARALLEL TO LENGTH.
4. INSULATED BACK PAN.

FAN SCHEDULE

MARK	LOCATION	SERVICE	TYPE	CFM	SP IN W.G.	RPM	ELECTRICAL DATA				TYPICAL UNIT MFG & MODEL NO.	REMARKS:
							HP	VOLTS	PHASE	AMPS		
EF-1	GYM	LOCKER ROOM EXHAUST	CENTRIFUGAL	1500	0.75	1457	.25	115	1	3.8	GREENHECK G-100-VG	1,2,4
EF-2	GYM	LOCKER ROOM EXHAUST	CENTRIFUGAL	1500	0.75	1457	.25	115	1	3.8	GREENHECK G-100-VG	1,2,4
EF-3	ROOF	CLASSROOM EXHAUST	CENTRIFUGAL	2000	0.5	948	1/2	208	1	5.4	GREENHECK GB-161	1,2
EF-4	ROOF	MUSIC ROOM	CENTRIFUGAL	1400	1	1725	1/2	208	1	5.4	GREENHECK G-123-A	1,2
EF-5	ROOF	CLASSROOM EXHAUST	CENTRIFUGAL	1250	1	1725	1/2	208	1	4.9	GREENHECK G-123-1	1,2
EF-6	ROOF	CLASSROOM EXHAUST	CENTRIFUGAL	4500	1	1102	2	208	1	12	GREENHECK G-200	1,2
SF-1	ATTIC	CLASSROOM OA	INLINE	10000	1.5	824	5	208	3	16.7	GREENHECK BSQ-300	1
SF-2	ATTIC	CLASSROOM OA	INLINE	3750	0.4	539	1/2	208	3	2.4	GREENHECK BSQ-240	1
SF-3	ATTIC	CLASSROOM OA	INLINE	8750	1.5	1147	5	208	3	16.7	GREENHECK BSQ-240	1
SF-4	-	-	-	-	-	-	-	-	-	-	NOT USED	-
SF-5	-	-	-	-	-	-	-	-	-	-	NOT USED	-
SF-6	ATTIC	CLASSROOM OA	INLINE	7000	0.75	875	2	208	3	7.5	GREENHECK BSQ-240	1
SF-7	ATTIC	CLASSROOM OA	INLINE	7500	1	964	3	208	3	10.6	GREENHECK BSQ-240	1
SF-8	ATTIC	CLASSROOM OA	INLINE	6750	1.5	1012	5	208	3	16.7	GREENHECK BSQ-240	1
SF-9	TECH	CLASSROOM OA	INLINE	2250	0.5	992	1/2	208	1	5.4	GREENHECK BSQ-160	1,3
RF-1	ATTIC	CLASSROOM EA	INLINE	13750	1.25	675	7-1/2	208	3	24.2	GREENHECK BSQ-360	1
RF-2	ATTIC	CLASSROOM EA	INLINE	3750	0.8	949	1-1/2	208	3	6.6	GREENHECK BSQ-200	1
RF-3	ATTIC	CLASSROOM EA	INLINE	3750	0.4	539	1/2	208	3	2.4	GREENHECK BSQ-240	1
RF-4	ATTIC	CLASSROOM EA	INLINE	2500	0.25	585	1/3	208	3	2.4	GREENHECK BSQ-200	1
RF-5	ATTIC	CLASSROOM EA	INLINE	1250	0.25	623	1/4	208	3	2.4	GREENHECK BSQ-160	1
RF-6	ATTIC	CLASSROOM EA	INLINE	6250	0.75	816	2	208	3	7.5	GREENHECK BSQ-240	1
RF-7	ATTIC	CLASSROOM EA	INLINE	4000	1	1038	1-1/2	208	3	6.6	GREENHECK BSQ-200	1
RF-8	ATTIC	CLASSROOM EA	INLINE	7250	1	945	3	208	3	10.6	GREENHECK BSQ-240	1

REMARKS:
1. FACTORY MOUNTED AND WIRED DISCONNECT.
2. HINGED BASE AND BIRD SCREEN.
3. ALTERNATE MC-5.
4. PROVIDE WITH SLOPPED CURBS.

AIR COOLED CONDENSER UNIT SCHEDULE

MARK	LOCATION	SERVES	NOMINAL TONS	ELECTRICAL DATA						OPERATING WEIGHT (LBS.)	TYPICAL UNIT MFG & MODEL NO.	REMARKS:
				FAN		COMPRESSOR		VOLT/Ø	MCA			
				NO.	HP	QTY	RLA					
ACC-1	GYM	AHU-1	13	2	.75	2	20.4	208/3	59	1141	AAON CFA-013-B-A-8-DC00K	1,3
ACC-2	GYM	AHU-2	13	2	.75	2	20.4	208/3	59	1141	AAON CFA-013-B-A-8-DC00K	1,3
ACC-3	GYM	AHU-3	13	2	.75	2	20.4	208/3	59	1141	AAON CFA-013-B-A-8-DC00K	1,3
ACC-4	GYM	AHU-4	13	2	.75	2	20.4	208/3	59	1141	AAON CFA-013-B-A-8-DC00K	1,3
ACC-5	KITCHEN ROOF	AHU-5	8	2	1/3	2	16.1	208/3	39	1078	AAON CFA-009-B-A-8-DC00K	1,3,4
ACC-6	KITCHEN ROOF	AHU-6	15	2	.75	2	25	208/3	66	1143	AAON CFA-015-B-A-8-DC00K	1,3,4
ACC-7	KITCHEN ROOF	SSI-1 THRU 8	16	2	920W	2	28	208/3	73	763	SAMSUNG AM192HXVAFH2AA	1,2,3,4
SSO-9	KITCHEN ROOF	SSI-9	1	1	40W	1	9.2	208/1	12.5	70.8	SAMSUNG AR12TSFABWKXCV	1,2

REMARKS:
1. FACTORY MOUNTED AND WIRED DISCONNECT AND HAIL GUARDS.
2. LOW AMBIENT KIT.
3. VARIABLE SPEED COMPRESSORS.
4. SPRING ISOLATORS.

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PROJECT INFORMATION

Project Number
13940.18

Client Name
NEWBURGH ENLARGED CITY SCHOOL DISTRICT

Project Name
PHASE 3: HERITAGE MIDDLE SCHOOL 2019 CAPITAL IMPROVEMENT PROJECT

Project Address
405 Union Avenue, New Windsor, NY 12553

SED Number
44-16-00-01-0-039-011

PROJECT ISSUE SCHEDULE

No.	Date	Description
1	9/17/21	BID ADDENDUM #1

SHEET INFORMATION

Issued
09/09/2021

Scale
12" = 1'-0"

Project Status
CONSTRUCTION DOCUMENTS

Drawn By
NRH

Checked By
JJM

Drawing Title
HVAC SCHEDULES

Drawing Number
HMS H900

UNIT VENTILATOR SCHEDULE

MARK	ROOM SERVES	OA FAN	EA FAN	UNIT TYPE	CFM	EXT. SP.	ELECTRICAL		MIN. OA CFM	WINTER		HW COIL CAPACITY					CW COIL CAPACITY					TYPICAL UNIT MFG & MODEL NO.	REMARKS:
							MCA	VOLT/Ø		OA °F	RA °F	EWT °F	EAT °F	LAT °F	MBH	GPM	EWT °F	EAT °F	LAT °F	MBH	GPM		
UV-1	438	-	-	HORIZONTAL	1500	0.625	5.9	120/1	600	5	72	180	45.2	95	81049.5	4.2	45	79.8	56	38734.5	6.7	MAGICAIRE MAUH	1,2,4,5,6
UV-2	105	SF-8	RF-8	HORIZONTAL	1000	0.625	5	120/1	550	5	72	180	35.2	95	64937.3	3.3	45	81.6	56	27776.0	4.8	MAGICAIRE MAUH	1,2,4,5,6
UV-3	105A	SF-8	RF-8	HORIZONTAL	1000	0.625	5	120/1	450	5	72	180	41.9	95	57667.8	3.0	45	80.4	56	26474.0	4.5	MAGICAIRE MAUH	1,2,4,5,6
UV-4	106	SF-8	RF-8	HORIZONTAL	1000	0.625	5	120/1	475	5	72	180	40.2	95	59485.1	3.1	45	80.7	56	26799.5	4.6	MAGICAIRE MAUH	1,2,4,5,6
UV-5	104	(E)GRV-2	EF-6	HORIZONTAL	1500	0.625	5.9	120/1	675	5	72	180	41.9	95	86501.6	4.5	45	80.4	56	39711.0	6.8	MAGICAIRE MAUH	1,2,4,5,6,8
UV-6	101	(E)GRV-2	EF-5	HORIZONTAL	1000	0.625	5	120/1	525	5	72	180	36.8	95	63119.9	3.3	45	81.3	56	27450.5	4.7	MAGICAIRE MAUH	1,2,4,5,6,8
UV-7	114	SF-3	EF-6	HORIZONTAL	1500	0.625	5.9	120/1	675	5	72	180	41.9	95	86501.6	4.5	45	80.4	56	39711.0	6.8	MAGICAIRE MAUH	1,2,4,5,6,8
UV-8	113A	SF-3	RF-1	HORIZONTAL	1000	0.625	5	120/1	550	5	72	180	35.2	95	64937.3	3.3	45	81.6	56	27776.0	4.8	MAGICAIRE MAUH	1,2,4,5,6
UV-9	113B	SF-3	RF-1	HORIZONTAL	1000	0.625	5	120/1	550	5	72	180	35.2	95	64937.3	3.3	45	81.6	56	27776.0	5.7	MAGICAIRE MAUH	1,2,4,5,6
UV-10	112	SF-3	RF-1	HORIZONTAL	1000	0.625	5	120/1	500	5	72	180	38.5	95	61302.5	3.2	45	81.0	56	27125.0	5.6	MAGICAIRE MAUH	1,2,4,5,6
UV-11	109	SF-3	RF-1	HORIZONTAL	1000	0.625	5	120/1	470	5	72	180	40.5	95	59121.7	3.0	45	80.6	56	26734.4	5.5	MAGICAIRE MAUH	1,2,4,5,6
UV-12	110	SF-3	RF-2	HORIZONTAL	1250	0.625	5.9	120/1	525	5	72	180	43.9	95	69358.6	3.6	45	80.0	56	32604.2	6.7	MAGICAIRE MAUH	1,2,4,5,6
UV-13	111	SF-3	RF-2	HORIZONTAL	1250	0.625	5.9	120/1	525	5	72	180	43.9	95	69358.6	3.6	45	80.0	56	32604.2	6.7	MAGICAIRE MAUH	1,2,4,5,6
UV-14	206	SF-7	RF-8	HORIZONTAL	1000	0.625	5	120/1	650	5	72	180	28.5	95	72206.8	3.7	45	82.8	56	29078.0	6.0	MAGICAIRE MAUH	1,2,4,5,6
UV-15	204	SF-8	RF-8	HORIZONTAL	1000	0.625	5	120/1	475	5	72	180	40.2	95	59485.1	3.1	45	80.7	56	26799.5	5.5	MAGICAIRE MAUH	1,2,4,5,6
UV-16	203	SF-8	RF-8	HORIZONTAL	1000	0.625	5	120/1	500	5	72	180	38.5	95	61302.5	3.2	45	81.0	56	27125.0	5.6	MAGICAIRE MAUH	1,2,4,5,6
UV-17	202	SF-7	RF-8	HORIZONTAL	1250	0.625	5.9	120/1	575	5	72	180	41.2	95	72993.4	3.8	45	80.5	56	33255.3	6.9	MAGICAIRE MAUH	1,2,4,5,6
UV-18 (NOT USED)	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
UV-19	209	SF-1	RF-1	HORIZONTAL	1000	0.625	5	120/1	475	5	72	180	40.2	95	59485.1	3.1	45	80.7	56	26799.5	5.5	MAGICAIRE MAUH	1,2,4,5,6
UV-20	215	SF-1	RF-1	HORIZONTAL	1000	0.625	5	120/1	500	5	72	180	38.5	95	61302.5	3.2	45	81.0	56	27125.0	5.6	MAGICAIRE MAUH	1,2,4,5,6
UV-21	214	SF-1	RF-1	HORIZONTAL	1000	0.625	5	120/1	500	5	72	180	38.5	95	61302.5	3.2	45	81.0	56	27125.0	5.6	MAGICAIRE MAUH	1,2,4,5,6
UV-22	216	SF-1	RF-1	HORIZONTAL	1000	0.625	5	120/1	500	5	72	180	38.5	95	61302.5	3.2	45	81.0	56	27125.0	5.6	MAGICAIRE MAUH	1,2,4,5,6
UV-23	212	SF-1	RF-1	HORIZONTAL	1000	0.625	5	120/1	475	5	72	180	40.2	95	59485.1	3.1	45	80.7	56	26799.5	5.5	MAGICAIRE MAUH	1,2,4,5,6
UV-24	213	SF-1	RF-1	HORIZONTAL	1250	0.625	5.9	120/1	575	5	72	180	41.2	95	72993.4	3.8	45	80.5	56	33255.3	6.9	MAGICAIRE MAUH	1,2,4,5,6
UV-25	210	SF-1	RF-1	HORIZONTAL	1000	0.625	5	120/1	500	5	72	180	38.5	95	61302.5	3.2	45	81.0	56	27125.0	5.6	MAGICAIRE MAUH	1,2,4,5,6
UV-26	306	SF-7	RF-7	HORIZONTAL	1000	0.625	5	120/1	500	5	72	180	38.5	95	61302.5	3.2	45	81.0	56	27125.0	5.6	MAGICAIRE MAUH	1,2,4,5,6
UV-27	305	SF-7	RF-7	HORIZONTAL	750	0.625	4.6	120/1	325	5	72	180	43.0	95	42342.1	2.2	45	80.2	56	19692.8	4.1	MAGICAIRE MAUH	1,2,4,5,6
UV-28	304	SF-6	RF-7	HORIZONTAL	1250	0.625	5.9	120/1	525	5	72	180	43.9	95	69358.6	3.6	45	80.0	56	32604.2	6.7	MAGICAIRE MAUH	1,2,4,5,6
UV-29	309	SF-7	EF-6	HORIZONTAL	1000	0.625	5	120/1	500	5	72	180	38.5	95	61302.5	3.2	45	81.0	56	27125.0	5.6	MAGICAIRE MAUH	1,2,4,5,6
UV-30	310	-	EF-6	VERTICAL	1000	0.625	5	120/1	500	5	72	180	38.5	95	61302.5	3.2	45	81.0	56	27125.0	5.6	MAGICAIRE MAUV	1,2,3,4,5,7
UV-31	303	SF-6	RF-6	HORIZONTAL	1000	0.625	5	120/1	500	5	72	180	38.5	95	61302.5	3.2	45	81.0	56	27125.0	5.6	MAGICAIRE MAUH	1,2,4,5,6
UV-32	302	SF-6	RF-6	HORIZONTAL	1000	0.625	5	120/1	500	5	72	180	38.5	95	61302.5	3.2	45	81.0	56	27125.0	5.6	MAGICAIRE MAUH	1,2,4,5,6
UV-33	311	-	EF-7	VERTICAL	1000	0.625	5	120/1	500	5	72	180	38.5	95	61302.5	3.2	45	81.0	56	27125.0	5.6	MAGICAIRE MAUV	1,2,3,4,5,7
UV-34	312	SF-2	EF-7	HORIZONTAL	1000	0.625	5	120/1	500	5	72	180	38.5	95	61302.5	3.2	45	81.0	56	27125.0	5.6	MAGICAIRE MAUH	1,2,4,5,6
UV-35	301	SF-6	RF-6	HORIZONTAL	1000	0.625	5	120/1	500	5	72	180	38.5	95	61302.5	3.2	45	81.0	56	27125.0	5.6	MAGICAIRE MAUH	1,2,4,5,6
UV-36	321	SF-6	RF-6	HORIZONTAL	750	0.625	4.6	120/1	300	5	72	180	45.2	95	40524.8	2.1	45	79.8	56	19367.3	4.0	MAGICAIRE MAUH	1,2,4,5,6
UV-37	320	SF-6	RF-6	HORIZONTAL	1000	0.625	5	120/1	500	5	72	180	38.5	95	61302.5	3.2	45	81.0	56	27125.0	5.6	MAGICAIRE MAUH	1,2,4,5,6
UV-38	318	SF-1	RF-3	HORIZONTAL	1000	0.625	5	120/1	500	5	72	180	38.5	95	61302.5	3.2	45	81.0	56	27125.0	5.6	MAGICAIRE MAUH	1,2,4,5,6
UV-39	317	SF-2	RF-3	HORIZONTAL	1000	0.625	5	120/1	500	5	72	180	38.5	95	61302.5	3.2	45	81.0	56	27125.0	5.6	MAGICAIRE MAUH	1,2,4,5,6
UV-40	316	SF-2	RF-3	HORIZONTAL	1000	0.625	5	120/1	500	5	72	180	38.5	95	61302.5	3.2	45	81.0	56	27125.0	5.6	MAGICAIRE MAUH	1,2,4,5,6
UV-41	313	-	RF-4	VERTICAL	1000	0.625	5	120/1	475	5	72	180	40.2	95	59485.1	3.1	45	80.7	56	26799.5	5.5	MAGICAIRE MAUV	1,4,5,6
UV-42	314	-	RF-4	VERTICAL	1000	0.625	5	120/1	475	5	72	180	40.2	95	59485.1	3.1	45	80.7	56	26799.5	5.5	MAGICAIRE MAUV	1,4,5,6
UV-43	315	-	RF-5	VERTICAL	1000	0.625	5	120/1	500	5	72	180	38.5	95	61302.5	3.2	45	81.0	56	27125.0	5.6	MAGICAIRE MAUV	1,4,5,6
UV-44	307	SF-7	RF-7	HORIZONTAL	1000	0.625	5	120/1	500	5	72	180	38.5	95	61302.5	3.2	45	81.0	56	27125.0	5.6	MAGICAIRE MAUH	1,2,4,5,6
UV-45	402	SF-6	RF-9	HORIZONTAL	1500	0.625	5.9	120/1	625	5	72	180	44.1	95	82866.9	4.3	45	80.0	56	39060.0	8.1	MAGICAIRE MAUH	1,2,4,5,6
UV-46	404	SF-1	RF-10	HORIZONTAL	1500	0.625	5.9	120/1	575	5	72	180	46.3	95	79232.1	4.1	45	79.6	56	38409.0	7.9	MAGICAIRE MAUH	1,2,4,5,6
UV-47	403	SF-1	RF-11	HORIZONTAL	1000	0.625	5	120/1	500	5	72	180	38.5	95	61302.5	3.2	45	81.0	56	27125.0	5.6	MAGICAIRE MAUH	1,2,4,5,6
UV-48	401	SF-6	RF-12	HORIZONTAL	1000	0.625	5	120/1	500	5	72	180	38.5	95	61302.5	3.2	45	81.0	56	27125.0	5.6	MAGICAIRE MAUH	1,2,4,5,6

REMARKS:
1. FACTORY MOUNTED AND WIRED DISCONNECT. ALL UNIT CONTROL ACTUATORS FROM EXISTING RELOCATED BY OTHERS TO NEW UNIT.
2. CONDENSATE PUMP, LITTLE GIANT VCC-20S, DRAIN PAN ALARM.
3. FULL ADAPTER WITH ENCLOSED PIPE TUNNEL, FINISHED ENDS.
4. ECM MOTORS.
5. MERV 14 FILTERS.
6. MOUNTED ABOVE THE CEILING.
7. FLOOR MOUNTED, PROVIDE WITH NEW LOUVER AND LINTLE.
8. ALTERNATE NO. MC-3

DUST COLLECTOR SCHEDULE - ALTERNATE NO. MC-5

MARK	MANUFACTURER	MODEL	SERVICE	DESIGN AIRFLOW	FAN BLOWER					SHAKER MOTOR				REMARKS:
					ESP. (IN.WG)	RPM	HP	ENCL.	V/PH/HZ	RPM	HP	ENCL.	V/PH/HZ	
DC-1	STERNVENT	DKPD 36007-2	TECH 08	2250 CFM	8	3450	7.5	TEFC	208/3/60	1150	1/3	TEFC	208/3/60	1,2,3,4,5,6

REMARKS:
1. BLOWER MOTOR SHALL BE AMCA "C" SPARK RESISTANT CONSTRUCTION.
2. FACTORY MOUNTED AND WIRED NEMA 4 MAGNETIC STARTERS FOR BLOWER AND SHAKER.
3. TWO 55-GALLON DRUMS FOR DUST COLLECTION.
4. EXPLOSION RELIEF DOOR.
5. DUST SWITCH SYSTEM FOR INTERLOCKING DUST COLLECTOR OPERATION WITH SHOP EQUIPMENT.
6. FLAMEX SPARK SUPPRESION SYSTEM.

LOUVER SCHEDULE

MARK	LOCATION	SERVICE	FREE AREA (SQ. FT.)	CFM	SP (IN. WG)	SIZE W&H (IN.)	TYPICAL UNIT MFG. & MODEL NO.	REMARKS:
L-1	GYM	AHU-3	4.2	1400	0.15	36x36	RUSKIN ELF375D	1,2,3,
L-2	GYM	AHU-4	4.2	1400	0.15	36x36	RUSKIN ELF375D	1,2,3

REMARKS:
1. 54% FREE AREAS, HIGH PERFORMANCE FRAME SYSTEM WITH DRAINABLE HEAD.
2. DRAIN GUTTERS IN BLADES.
3. 4" DEEP, 37-1/2 DEGREE BLADES.

ROOFTOP AIR CONDITIONING UNIT SCHEDULE

MARK	LOCATION	NOM. TONS	SUPPLY FAN				DX COOLING					ELECTRICAL		TYPICAL UNIT MFG & MODEL NO.	REMARKS:
			CFM	OA CFM	ESP (IN. W.C.)	BHP / HP	TOTAL MBH	SENS MBH	EAT°F		LAT°F	AMB °F	VOLT/Ø	MCA	
									DB	WB					
RTU-1	3RD FLOOR ROOF	12	4400	1100	1.2	3.8/5	127	109	79.25	65.3	58.04	75	208/3	61	AAON RN010-8-0-EB09	1,2,3,4
RTU-2	3RD FLOOR ROOF	12	4400	1100	1.2	3.8/5	127	109	79.25	65.3	58.04	75	208/3	61	AAON RN010-8-0-EB09	1,2,3,4
RTU-3	3RD FLOOR ROOF	10	3600	900	1.2	2.0/5	124	98	79.5	65.5	55.6	75	208/3	61	AAON RN010-8-0-EB09	1,2,3

REMARKS:
1. 14" INSULATED CURB. ALL UNIT CONTROL ACTUATORS FROM EXISTING UNIT RELOCATED BY OTHERS TO NEW UNIT.
2. FACTORY MOUNTED AND WIRED DISCONNECT. 2" PREFILTER. 4" MERV 14 FILTER.
3. DOUBLE WAS: R-13 FOAM INSULATION.
4. ALTERNATE MC-1.

SOUND ATTENUATOR SCHEDULE

MARK	SERVES	CFM	WIDTH (IN)	HEIGHT (IN)	LENGTH (IN)	AIR DIRECTION	VELOCITY (FPM)	PD (IN. H2O)	TYPICAL UNIT MFG & MODEL NO.	DYNAMIC INSERTION LOSS (DB)								REMARKS:
										63	125	250	500	1K	2K	4K	8K	
DS-1	RTU-1	9100	40	24	80	SUPPLY	1365	0.12	ERM80/4A	9	13	20	32	35	34	29	25	1,2,3
DS-2	RTU-1	9100	40	24	80	RETURN	1365	0.12	RM80/XB	9	12	17	25	17	13	11	10	1,2,3
DS-3	AHU-6	4200	30	14	45	SUPPLY	1440	0.13	ERM45/2A	7	10	16	21	26	26	23	20	1,2,3
DS-4	AHU-6	4200	30	14	45	RETURN	1440	0.13	ERM45/2A	7	11	19	23	27	26	22	20	1,2,3
DS-5	AHU-1	3500	26	20	48	SUPPLY	969	0.09	ERM48/1B	7	12	21	27	36	35	30	26	1,2,3
DS-6	AHU-1	2250	24	16	48	RETURN	844	0.05	ERM48/1A	7	11	19	25	31	31	26	23	1,2,3
DS-7	AHU-2	3500	26	20	48	SUPPLY	969	0.09	ERM48/1B	7	12	21	27	36	35	30	26	1,2,3
DS-8	AHU-2	2250	24	16	48	RETURN	844	0.05	ERM48/1A	7	11	19	25	31	31	26	23	1,2,3
DS-9	AHU-3	3500	26	20	48	SUPPLY	969	0.09	ERM48/1B	7	12	21	27	36	35	30	26	1,2,3
DS-10	AHU-3	2250	24	16	48	RETURN	844	0.05	ERM48/1A	7	11	19	25	31	31	26	23	1,2,3
DS-11	AHU-4	3500	26	20	48	SUPPLY	969	0.09	ERM48/1B	7	12	21	27	36	35	30	26	1,2,3
DS-12	AHU-4	2250	24	16	48	RETURN	844	0.05	ERM48/1A	7	11	19	25	31	31	26	23	1,2,3

REMARKS:
1. GALVANIZED, CL1 (22 GA), 22 GA PERF LINER, FIBERGLASS
2. INLET: 2" SLIP, OUTLET 2" SLIP
3. VERIFY SIZES IN FIELD.

GRAVITY VENTILATOR SCHEDULE

MARK	LOCATION	SERVICE	THROAT AREA (SQ. FT.)	ROOF OPENING (IN)	AIR FLOW (CFM)	SP (IN. W.G.)	TYPICAL UNIT MFG & MODEL NO.	REMARKS:
GRV-1	ROOF	CAFETERIA	4	26.5X26.5	1900	0.06	GREENHECK GRSI-24	1,2

REMARKS:
1. WIRE MESH BIRD SCREEN.
2. 18" INSULATED SLOPED CURB.

GLYCOL FEED SYSTEM

MARK	PRESSURE RANGE (PSI)	CAPACITY GAL	V/PH/HZ	DIMENSIONS (WXDXH) IN	WEIGHT	TYPICAL UNIT MFG & MODEL NO.	REMARKS:
GMP-1	10-70	50	110/1/60	34X34X45	134	WESSELS COMPANY GMP-13050	1,2,3,4

REMARKS:
1. ALARM KIT WITH PANEL AND FLOAT
2. FILL THE SYSTEM FULL TO 30% PROPYLENE GLYCOL.
3. INTERNAL PRV.
4. FACTORY MOUNTED AND WIRED DISCONNECT.

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PROJECT INFORMATION

Project Number
13940.18

Client Name
NEWBURGH ENLARGED CITY SCHOOL DISTRICT

Project Name
PHASE 3: HERITAGE MIDDLE SCHOOL 2019 CAPITAL IMPROVEMENT PROJECT

Project Address
405 Union Avenue, New Windsor, NY 12553

SED Number
44-16-00-01-0-039-011

PROJECT ISSUE SCHEDULE

No.	Date	Description
1	9/17/21	BID ADDENDUM #1

SHEET INFORMATION

Issued
09/09/2021

Scale
1/2" = 1'-0"

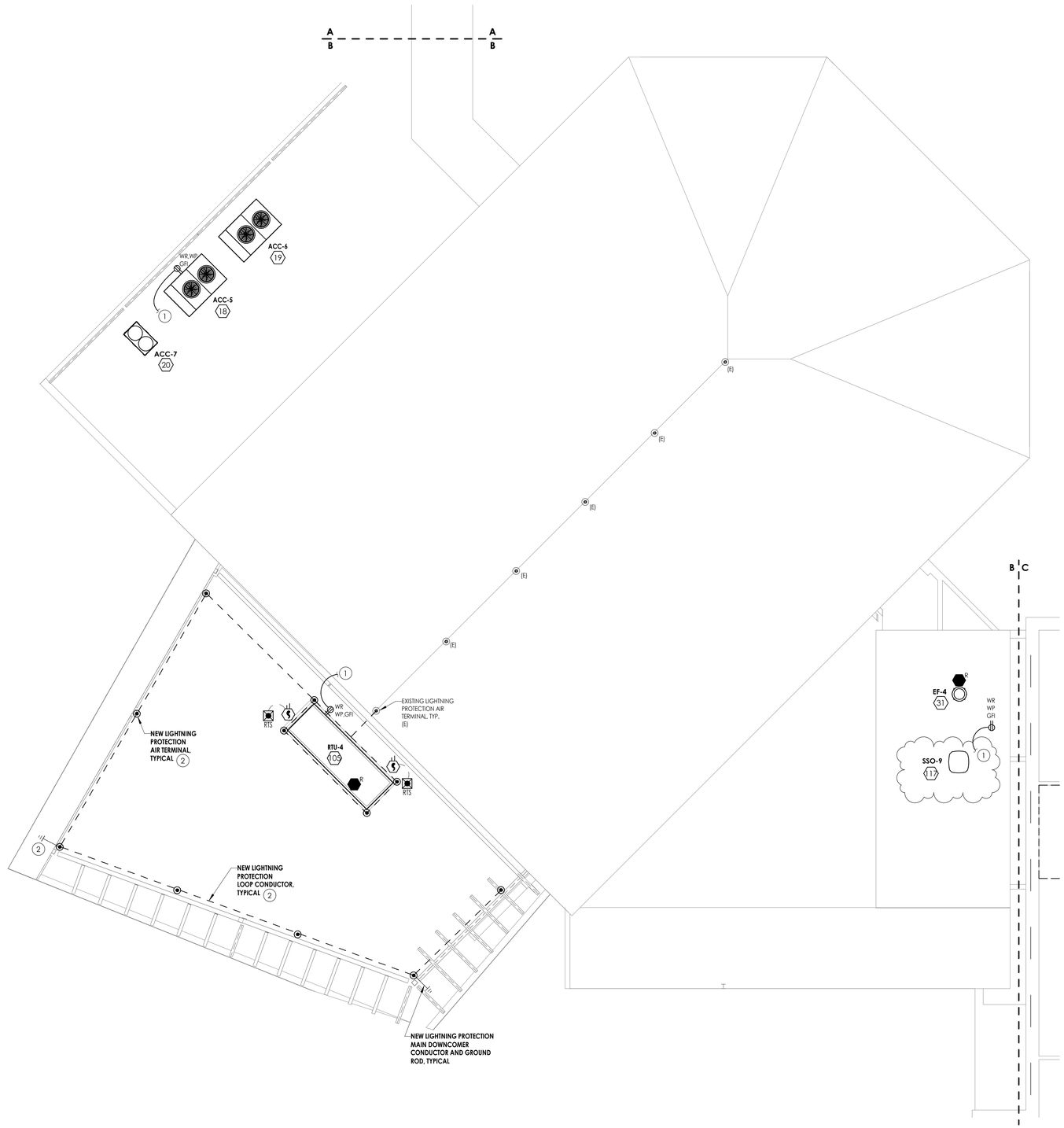
Project Status
CONSTRUCTION DOCUMENTS

Drawn By
NRH

Checked By
JJM

Drawing Title
HVAC SCHEDULES

Drawing Number
HMS
H901



1 E201B **FIRST FLOOR OVERALL POWER AND SYSTEMS PLAN**

1/8" = 1'-0"

GENERAL NOTES:

A. FIXTURES, DEVICES, AND EQUIPMENT LABELED AS "(E)" ARE EXISTING AND ARE SHOWN FOR REFERENCE ONLY. ALL OF THESE DEVICES SHALL REMAIN OPERATIONAL FOLLOWING CONSTRUCTION.

B. EQUIPMENT DESIGNATED WITH A NUMBER INSIDE OF A HEXAGON ARE SCHEDULED ON DRAWING E900. REFER TO EQUIPMENT WIRING SCHEDULE FOR BREAKER AND CIRCUITING INFORMATION.

C. DISCONNECT SWITCHES AND STARTER DEVICES ASSOCIATED WITH HVAC EQUIPMENT SHALL BE FURNISHED AND INSTALLED BY THE MECHANICAL CONTRACTOR, AND WIRED BY THE ELECTRICAL CONTRACTOR. INCLUDE AN ADDITIONAL 10' OF CIRCUITING IN PRICING FOR INSTANCES WHERE A DISCONNECT MAY NOT BE MOUNTED DIRECTLY ON UNIT. E.C. IS RSPONSIBLE TO WIRE BOTH LINE AND LOAD SIDES OF DISCONNECT.

D. UPDATE PANELBOARD DIRECTORIES TO REFLECT CHANGES MADE TO CIRCUITS WITH LOAD(S) AND ROOM(S) SERVED. LABEL ANY UNUSED BREAKER AS SPARE AND TURN TO OFF POSITION.

E. FIRE ALARM SCOPE OF THIS PROJECT INCLUDES INSTALLING A NEW SIMPLEX 4100ES PANEL TO SERVE NEW AND RENOVATED AREAS WHILE MAINTAINING EXISTING SIMPLEX 4020 PANEL. ALL EXISTING DEVICES REMOVED IN THE DEMOLITION PHASE OF THE PROJECT SHALL BE REMOVED FROM THE SYSTEM PROGRAMMING OF THE 4020 PANEL. NEW INITIATION AND NOTIFICATION DEVICES SHOWN SHALL BE CONNECTED TO AND COMPATIBLE WITH THE NEW SIMPLEX 4100ES FIRE ALARM CONTROL PANEL LOCATED IN CUSTODIAN ROOM 50. PROVIDE NEW NOTIFICATION APPLIANCE CIRCUIT PANELS (WITH SMOKE DETECTOR WITHIN 5') WITH BATTERIES WHERE REQUIRED TO ACCOMMODATE NEW NOTIFICATION DEVICES. LOCATE SAID NAC PANEL IN A STORAGE OR ELEC/MECH ROOM. AND WIRE TO NEAREST AVAILABLE PANELBOARD WITH (2)#12, #12 GND, IN 3/4" CONDUIT. FOR PRICING PURPOSES, ASSUME 150' PER CIRCUIT. PROVIDE 20/1 CIRCUIT BREAKER AS REQUIRED.

F. FIRE ALARM SPACING SHALL COMPLY WITH NFPA 72 REQUIREMENTS. ALL FIRE ALARM INITATION DEVICES SHOWN SHALL NOT BE LOCATED IN DIRECT AIRFLOW PATH OR CLOSER THAN 3' OF AN AIR SUPPLY DIFFUSER OR RETURN AIR OPENING.

G. THE OPERABLE PART OF PULL STATIONS SHALL BE MOUNTED MORE THAN 3'-6" BUT LESS THAN 4'-0" ABOVE FINISHED FLOOR.

H. FOR PUBLIC MODE, WALL MOUNTED VISUALS AND AUDIBLE/VISUALS SHALL BE MOUNTED SUCH THAT THE ENTIRE LENS IS NOT LESS THAN 80" AND NOT GREATER THAN 96" ABOVE FINISHED FLOOR.

I. THE MINIMUM REQUIRED CANDELA LEVEL IS INDICATED ADJACENT TO NEW VISUAL DEVICES. IF NOT INDICATED, MINIMUM ALLOWABLE SETTING IS 15 CANDELA.

J. ACTIVATION OF BUILDING FIRE ALARM SYSTEM SHALL AUTOMATICALLY SHUT DOWN ALL FANS ASSOCIATED WITH HVAC UNITS IN THE BUILDING AS REQUIRED BY LOCAL, STATE, AND NATIONAL CODES. PROVIDE FIRE ALARM SHUT DOWN RELAYS IN EACH UNIT.

K. FINAL TESTING OF FIRE ALARM SYSTEM SHALL COMPLY WITH ALL NFPA 72 REQUIREMENTS. ANY ALTERED CIRCUIT(S) SHALL HAVE ALL FIRE ALARM INITIATION DEVICES TESTED IN THEIR ENTIRETY AND 10% OF NEIGHBORING ZONE/LOOP DEVICES.

L. PROVIDE 8" ROUND, FLUSH MOUNTED, WHITE CEILING SPEAKERS WHERE SHOWN. NEW SPEAKERS SHALL BE CONNECTED TO AND COMPATIBLE WITH EXISTING BUILDING PUBLIC ADDRESS SYSTEM. EXPAND EXISTING SYSTEM WITH ADDITIONAL AMPLIFIERS AS REQUIRED AT HEAD END LOCATION FOR A COMPLETE OPERATIONAL SYSTEM. COORDINATE EXACT REQUIREMENTS WITH OWNER.

M. ALL CABLING ABOVE ACCESSIBLE CEILINGS SHALL BE SUPPORTED VIA J-HOOK. J-HOOKS SHALL NOT EXCEED 5'-0" SPACING. ALL CABLING ABOVE INACCESSIBLE SPACES AND CEILINGS OPEN TO STRUCTURE SHALL BE IN CONDUIT.

N. ALL EXPOSED RACEWAY SHALL BE PAINTED TO MATCH CEILING/WALL FINISH. CONTRACTOR SHALL USE APPROVED PAINT COLOR/TYPE.

O. NEW CARBON MONOXIDE DETECTORS SHALL BE ADDRESSABLE AND BE CONNECTED TO THE BUILDING FIRE ALARM SYSTEM.

KEY NOTES:

1. WIRE NEW GFI ROOFTOP SERVICE RECEPTACLE TO NEAREST 120V CONVENIENCE RECEPTACLE CIRCUIT IN CAFETERIA SPACE BELOW. WIRE WITH (2)#12, #12 GND, IN 1/2" CONDUIT.

2. PROVIDE EXTENSION TO EXISTING LIGHTNING PROTECTION SYSTEM.
   INSTALLATION SHALL INCLUDE: AIR TERMINALS, MAIN CONDUCTORS (DOWNCOMERS, ROOF LOOP CONDUCTORS, CONNECTION CONDUCTORS, AND GROUND LOOP CONDUCTORS), GROUND RODS, AND ALL CONNECTIONS. DOWNCOMERS TO BE INSTALLED IN 1" PVC CONDUIT AND ARE TO BE CONCEALED WITHIN BUILDING BLOCK OR STRUCTURE. GROUND ROD TO BE 3/4" X 10' MINIMUM COPPER CLAD STEEL ROD, MINIMUM 2 FEET FROM BUILDING. STEEL FRAMING OF BUILDING SHALL BE TIED INTO LIGHTNING PROTECTION SYSTEM.

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1	9/17/21	BID ADDENDUM #1

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Issued
09/06/2021

Scale
AS NOTED

Project Status
CONSTRUCTION DOCUMENTS

Drawn By
RJD

Checked By
ARM

Drawing Title
FIRST FLOOR POWER AND SYSTEMS PLAN - AREA B

Drawing Number
HMS
E201B

EQUIPMENT WIRING SCHEDULE

ITEM #	MARK	Room Location	VOLTS	PH	HP	FLA	WIRING/CONDUIT	BREAKER	PANEL	CIRCUIT	REMARKS
1	AHU-1	STORAGE 604	208 V	3		8.0 A	(3)#12, #12G IN 3/4"C	15/3	P-10	2,4,6	1
2	AHU-2	STORAGE 606	208 V	3		8.0 A	(3)#12, #12G IN 3/4"C	15/3	P-10	8,10,12	1
3	AHU-3	STORAGE 600A	208 V	3		8.0 A	(3)#10, #10G IN 3/4"C	15/3	P-9	8,10,12	1
4	AHU-4	STORAGE 600B	208 V	3		8.0 A	(3)#12, #12G IN 3/4"C	15/3	P-9	14,16,18	1
5	AHU-5	KITCHEN	208 V	3		8.0 A	(3)#12, #12G IN 3/4"C	15/3	PK-1	2,4,6	1, 5
6	AHU-6	STORAGE 435	208 V	3		8.0 A	(3)#12, #12G IN 3/4"C	15/3	PK-1	8,10,12	1, 6
7	SSI-9	SECURITY OFFICE	208 V	1		0.3 A	(2)#12, #12G IN 3/4"C	20/2	P-9	28,30	1, 7, 19
8	RTU-1	ROOF	208 V	3		54.0 A	(3)#4, #8G IN 1-1/4"C	90/3	MSB	-	1, 2, 5, 9
9	RTU-2	ROOF	208 V	3		54.0 A	(3)#4, #8G IN 1-1/4"C	90/3	MSB	-	1, 2, 5, 9
10	RTU-3	ROOF	208 V	3		54.0 A	(3)#4, #8G IN 1-1/4"C	90/3	MSB	-	1, 5, 9
11	PUMP P-1	PUMP ROOM 423	208 V	3	15 HP	48.3 A	(3)#4, #8G IN 1-1/4"C	90/3	P-9	1,3,5	1
12	PUMP P-2	PUMP ROOM 423	208 V	3	15 HP	48.3 A	(3)#4, #8G IN 1-1/4"C	90/3	P-9	7,9,11	1
13	FC-1	CUSTODIAN ROOM 159	120 V	1		1.0 A	(2)#12, #12G IN 3/4"C	20/1	P3, SEC. 1	11	1, 5, 18
14	ACC-1	EXTERIOR AT GRADE	208 V	3		57.0 A	(3)#4, #8G IN 1-1/4"C	80/3	P-10	1,3,5	1
15	ACC-2	EXTERIOR AT GRADE	208 V	3		57.0 A	(3)#4, #8G IN 1-1/4"C	80/3	P-10	7,9,11	1
16	ACC-3	EXTERIOR AT GRADE	208 V	3		57.0 A	(3)#4, #8G IN 1-1/4"C	80/3	P-10	13,15,17	1
17	ACC-4	EXTERIOR AT GRADE	208 V	3		57.0 A	(3)#4, #8G IN 1-1/4"C	80/3	P-10	19,21,23	1
18	ACC-5	KITCHEN ROOF	208 V	3		38.0 A	(3)#8, #10G IN 1"C	50/3	P-9	19,21,23	1
19	ACC-6	KITCHEN ROOF	208 V	3		63.0 A	(3)#4, #8G IN 1-1/4"C	90/3	P-9	25,27,29	1
20	ACC-7	KITCHEN ROOF	208 V	3		70.0 A	(3)#4, #8G IN 1-1/4"C	90/3	P-9	31,33,35	1
21	EF-2	STORAGE 600B	120 V	1	1/4 HP	3.8 A	(3)#12, #12G IN 3/4"C	20/1	P-9	13	1
22	SSI-1	CAFETERIA 448	208 V	1		0.3 A	(2)#12, #12G IN 3/4"C	15/2	P-9	2,4	1, 7
23	SSI-2	CAFETERIA 448	208 V	1		0.3 A	(2)#12, #12G IN 3/4"C	15/2	P-9	2,4	1, 7
24	SSI-3	CAFETERIA 448	208 V	1		0.3 A	(2)#12, #12G IN 3/4"C	15/2	P-9	2,4	1, 7
25	SSI-4	CAFETERIA 448	208 V	1		0.3 A	(2)#12, #12G IN 3/4"C	15/2	P-9	2,4	1, 7
26	SSI-5	CAFETERIA 448	208 V	1		0.3 A	(2)#12, #12G IN 3/4"C	15/2	P-9	2,4	1, 7
27	SSI-6	CAFETERIA 448	208 V	1		0.3 A	(2)#12, #12G IN 3/4"C	15/2	P-9	2,4	1, 7
28	CH-1	EXTERIOR GRADE	208 V	3		560.0 A	2 SETS OF (3)#500, #1/0G IN 3-1/2"C	800/3	DP-HVAC	-	1, 17
29	EF-1	STORAGE 600A	120 V	1	1/4 HP	3.8 A	(2)#12, #12G IN 3/4"C	20/1	P-8	-	1, 5
30	EF-3	ROOF	208 V	1	1/2 HP	5.4 A	(2)#12, #12G IN 3/4"C	20/2	P-11	16,18	1
31	EF-4	ROOF	208 V	1	1/2 HP	5.4 A	(2)#12, #12G IN 3/4"C	20/2	P3, SEC. 2	38,40	1, 8
32	EF-5	ROOF	208 V	1	1/2 HP	4.9 A	(2)#12, #12G IN 3/4"C	20/2	P-11	16,18	1
33	EF-6	ROOF	208 V	1	2 HP	12.0 A	(2)#12, #12G IN 3/4"C	20/2	P-11	20,22	1
34	FC-2	GROUND FLOOR CORRIDOR	120 V	1		1.0 A	(2)#12, #12G IN 3/4"C	20/1	P-1A	14	1, 2, 15, 18
35	UV-1	MUSIC 438	120 V	1		4.7 A	(2)#12, #12G IN 3/4"C	20/1	P-8	-	1, 5, 18
36	UV-2	ROOM 105	120 V	1		4.0 A	(2)#12, #12G IN 3/4"C	20/1	P1, SEC. 1	32	1, 10, 18
37	UV-3	ROOM 105A	120 V	1		4.0 A	(2)#12, #12G IN 3/4"C	20/1	P1, SEC. 1	32	1, 10, 18
38	UV-4	CORRIDOR - GROUND	120 V	1		4.0 A	(2)#12, #12G IN 3/4"C	20/1	P1, SEC. 1	32	1, 10, 18
39	UV-5	ROOM 104	120 V	1		4.7 A	(2)#12, #12G IN 3/4"C	20/1	P1, SEC. 1	33	1, 2, 5, 18
40	UV-6	ROOM 101	120 V	1		4.0 A	(2)#12, #12G IN 3/4"C	20/1	P1, SEC. 1	35	1, 2, 5, 18
41	UV-7	ROOM 114	120 V	1		4.7 A	(2)#12, #12G IN 3/4"C	20/1	P-2	-	1, 2, 5, 18
42	UV-8	ROOM 113A	120 V	1		4.0 A	(2)#12, #12G IN 3/4"C	20/1	P2, SEC. 2	35	1, 10, 18
43	UV-9	ROOM 113B	120 V	1		4.0 A	(2)#12, #12G IN 3/4"C	20/1	P2, SEC. 2	35	1, 10, 18
44	UV-10	ROOM 112	120 V	1		4.0 A	(2)#12, #12G IN 3/4"C	20/1	P2, SEC. 2	35	1, 10, 18
45	UV-11	ROOM 109	120 V	1		4.0 A	(2)#12, #12G IN 3/4"C	20/1	P2, SEC. 2	33	1,10, 18
46	UV-12	ROOM 110	120 V	1		4.7 A	(2)#12, #12G IN 3/4"C	20/1	P2, SEC. 2	33	1,10, 18
47	UV-13	ROOM 111	120 V	1		4.7 A	(2)#12, #12G IN 3/4"C	20/1	P2, SEC. 2	33	1, 10, 18
48	UV-14	ROOM 206	120 V	1		4.0 A	(2)#12, #12G IN 3/4"C	20/1	P3, SEC. 1	35	1, 10, 18
49	UV-15	ROOM 204	120 V	1		4.0 A	(2)#12, #12G IN 3/4"C	20/1	P3, SEC. 1	35	1, 10, 18
50	UV-16	ROOM 203	120 V	1		4.0 A	(2)#12, #12G IN 3/4"C	20/1	P3, SEC. 1	35	1, 10, 18
51	UV-17	ROOM 202	120 V	1		4.7 A	(2)#12, #12G IN 3/4"C	20/1	P3, SEC. 1	20	1, 10, 18
53	UV-19	ROOM 209	120 V	1		4.0 A	(2)#12, #12G IN 3/4"C	20/1	P4, SEC. 2	40	1, 8, 18
54	UV-20	ROOM 215	120 V	1		4.0 A	(2)#12, #12G IN 3/4"C	20/1	P4, SEC. 2	9	1, 10, 18
55	UV-21	ROOM 214	120 V	1		4.0 A	(2)#12, #12G IN 3/4"C	20/1	P4, SEC. 2	9	1, 10, 18
56	UV-22	ROOM 216	120 V	1		4.0 A	(2)#12, #12G IN 3/4"C	20/1	P4, SEC. 2	9	1, 10, 18
57	UV-23	ROOM 212	120 V	1		4.0 A	(2)#12, #12G IN 3/4"C	20/1	P4, SEC. 2	40	1, 8, 18
58	UV-24	ROOM 213	120 V	1		4.7 A	(2)#12, #12G IN 3/4"C	20/1	P4, SEC. 1	19	1, 11, 18
59	UV-25	ROOM 210	120 V	1		4.0 A	(2)#12, #12G IN 3/4"C	20/1	P4, SEC. 2	40	1, 8, 18
60	UV-26	ROOM 306	120 V	1		4.0 A	(2)#12, #12G IN 3/4"C	20/1	P5, SEC. 1	17	1,10, 18
61	UV-27	ROOM 305	120 V	1		3.7 A	(2)#12, #12G IN 3/4"C	20/1	P5, SEC. 1	17	1,10, 18
62	UV-28	ROOM 304	120 V	1		4.7 A	(2)#12, #12G IN 3/4"C	20/1	P5, SEC. 1	33	1,8, 18
63	UV-29	ROOM 309	120 V	1		4.0 A	(2)#12, #12G IN 3/4"C	20/1	P5, SEC. 1	20	1, 10, 18
64	UV-30	ROOM 310	120 V	1		4.0 A	(2)#12, #12G IN 3/4"C	20/1	P5, SEC. 1	20	1, 10, 18
65	UV-31	ROOM 303	120 V	1		4.0 A	(2)#12, #12G IN 3/4"C	20/1	P5, SEC. 1	22	1,10, 18
66	UV-32	ROOM 302	120 V	1		4.0 A	(2)#12, #12G IN 3/4"C	20/1	P5, SEC. 1	22	1, 10, 18
67	UV-33	ROOM 311	120 V	1		4.0 A	(2)#12, #12G IN 3/4"C	20/1	P6, SEC. 2	18	1, 10, 18
68	UV-34	ROOM 312	120 V	1		4.0 A	(2)#12, #12G IN 3/4"C	20/1	P6, SEC. 2	18	1,10, 18
69	UV-35	ROOM 301	120 V	1		4.0 A	(2)#12, #12G IN 3/4"C	20/1	P5, SEC. 1	22	1, 10, 18
70	UV-36	ROOM 321	120 V	1		3.7 A	(2)#12, #12G IN 3/4"C	20/1	P6, SEC. 1	29	1, 11, 18
71	UV-37	ROOM 320	120 V	1		4.0 A	(2)#12, #12G IN 3/4"C	20/1	P6, SEC. 2	18	1,10, 18
72	UV-38	ROOM 318	120 V	1		4.0 A	(2)#12, #12G IN 3/4"C	20/1	P6, SEC. 1	27	1, 10, 18
73	UV-39	ROOM 317	120 V	1		4.0 A	(2)#12, #12G IN 3/4"C	20/1	P6, SEC. 1	27	1, 10, 18
74	UV-40	ROOM 316	120 V	1		4.0 A	(2)#12, #12G IN 3/4"C	20/1	P6, SEC. 1	27	1, 10, 18
75	UV-41	ROOM 313	120 V	1		4.0 A	(2)#12, #12G IN 3/4"C	20/1	P-11	14	1, 18
76	UV-42	ROOM 314	120 V	1		4.0 A	(2)#12, #12G IN 3/4"C	20/1	P-11	14	1, 18
77	UV-43	ROOM 315	120 V	1		4.0 A	(2)#12, #12G IN 3/4"C	20/1	P-11	14	1, 18
78	UV-44	ROOM 307	120 V	1		4.0 A	(2)#12, #12G IN 3/4"C	20/1	P5, SEC. 1	20	1, 10, 18
79	UV-45	ROOM 402	120 V	1		4.7 A	(2)#12, #12G IN 3/4"C	20/1	P7	29	1, 10, 18
80	UV-46	ROOM 404	120 V	1		4.7 A	(2)#12, #12G IN 3/4"C	20/1	P7	18	1, 10, 18
81	UV-47	ROOM 405	120 V	1		4.0 A	(2)#12, #12G IN 3/4"C	20/1	P7	18	1, 10, 18
82	UV-48	ROOM 401	120 V	1		4.0 A	(2)#12, #12G IN 3/4"C	20/1	P7	29	1, 10, 18
83	FC-5	FIRST FLOOR CORRIDOR	120 V	1		1.0 A	(2)#12, #12G IN 3/4"C	20/1	P4, SEC. 1	20	1, 2, 16, 18
84	SF-1	ATTIC	208 V	3	5 HP	16.7 A	(3)#8, #10G IN1"C	35/3	P-11	31,33,35	1
85	SF-2	ATTIC	208 V	3	1/2 HP	2.4 A	(3)#12, #12G IN 3/4"C	20/3	P-11	25,27,29	1
86	SF-3	ATTIC	208 V	3	5 HP	16.7 A	(3)#8, #10G IN 1"C	35/3	P-11	2,4,6	1
89	SF-6	ATTIC	208 V	3	2 HP	7.5 A	(3)#12, #12G IN 3/4"C	20/3	P-11	7,9,11	1
90	SF-7	ATTIC	208 V	3	3 HP	10.6 A	(3)#12, #12G IN 3/4"C	20/3	P-11	13,15,17	1
91	SF-8	ATTIC	208 V	3	5 HP	16.7 A	(3)#8, #10G IN 1"C	35/3	P-11	1,3,5	1
92	RF-1	ATTIC	208 V	3	7-1/2 HP	24.2 A	(3)#8, #10G IN 1"C	50/3	P-11	37,39,41	1
93	RF-2	ATTIC	208 V	3	1-1/2 HP	6.6 A	(3)#12, #12G IN 3/4"C	20/3	P-11	25,27,29	1
94	RF-3	ATTIC	208 V	3	1/2 HP	2.4 A	(3)#12, #12G IN 3/4"C	20/3	P-11	25,27,29	1
95	RF-4	ATTIC	208 V	3	1/3 HP	2.4 A	(3)#12, #12G IN 3/4"C	20/3	P-11	8,10,12	1
96	RF-5	ATTIC	208 V	3	1/4 HP	2.4 A	(3)#12, #12G IN 3/4"C	20/3	P-11	8,10,12	1
97	RF-6	ATTIC	208 V	3	2 HP	7.5 A	(3)#12, #12G IN 3/4"C	20/3	P-11	19,21,23	1
98	RF-7	ATTIC	208 V	3	1-1/2 HP	6.6 A	(3)#12, #12G IN 3/4"C	20/3	P-11	28,30,32	1
99	RF-8	ATTIC	208 V	3	3 HP	10.6 A	(3)#12, #12G IN 3/4"C	20/3	P-11	34,36,38	1
100	DC-1 FAN MOTOR	EXTERIOR AT GRADE	208 V	3	7.5 HP	25.3 A	(3)#8, #10G IN 1"C	50/3	PT-2	3,5,7	1, 2, 4, 8, 14
101	DC-1 SHAKER MOTOR	EXTERIOR AT GRADE	208 V	3	1/3 HP	2.5 A	(3)#12, #12G IN 3/4"C	20/3	PT-2	32,34,36	1, 2, 4, 8
102	EJECTOR PUMP EP-1	BOILER ROOM	120 V	1	1/3 HP	7.2 A	(2)#12, #12G IN 3/4"C	20/1	P1, SEC. 1	41	3, 8,12
103	EJECTOR PUMP EP-2	BOILER ROOM	120 V	1	1/3 HP	7.2 A				-	3, 13
104	GMP-1	PUMP ROOM	120 V	1	1/3 HP	7.2 A	(2)#12, #12G IN 3/4"C	20/1	P-9	6	1
105	RTU-4	CAFETERIA ROOF	208 V	3		195.0 A	(3)#500, #2G IN 3-1/2"C	250/3	MSB	-	1
106	SSI-7	CAFETERIA 448	208 V	1		0.3 A	(2)#12, #12G IN 3/4"C	15/2	P-9	2,4	1, 7
107	SSI-8	CAFETERIA 448	208 V	1		0.3 A	(2)#12, #12G IN 3/4"C	15/2	P-9	2,4	1, 7
108	SF-9	TECH ROOM 113B	208 V	1	1/2 HP	5.4 A	(2)#12, #12G IN 3/4"C	20/2	PT-2	38,40	1, 2, 8
109	FC-6	SECOND FLOOR CORRIDOR	120 V	1		1.0 A	(2)#12, #12G IN 3/4"C	20/1	P5, SEC. 1	31	1, 2, 8
110	FC-7	SECOND FLOOR CORRIDOR	120 V	1		1.0 A	(2)#12, #12G IN 3/4"C	20/1	P6, SEC. 1	25	1, 2, 16
111	FC-8	FIRST FLOOR CORRIDOR	120 V	1		1.0 A	(2)#12, #12G IN 3/4"C	20/1	P-3A	22	1, 2, 15, 18
112	FC-9	THIRD FLOOR CORRIDOR	120 V	1		1.0 A	(2)#12, #12G IN 3/4"C	20/1	P7	18	1, 2, 5, 18
113	FC-10	GROUND FLOOR CONF. ROOM	120 V	1		1.0 A	(2)#12, #12G IN 3/4"C	20/1	P-1A	14	1, 15, 18
114	FC-11	THIRD FLOOR CORRIDOR	120 V	1		1.0 A	(2)#12, #12G IN 3/4"C	20/1	P7	30	1, 2, 5, 18
115	FC-3	GROUND FLOOR CORRIDOR	120 V	1		1.0 A	(2)#12, #12G IN 3/4"C	20/1	P2, SEC. 1	42	1, 2, 8, 18
116	FC-4	FIRST FLOOR CORRIDOR	120 V	1		1.0 A	(2)#12, #12G IN 3/4"C	20/1	P3, SEC. 1	24	1, 2, 10, 18
117	SSO-9	ROOF	208 V	1		9.8 A	(2)#12, #12G IN 3/4"C	20/2	P-9	28,30	1, 19

GENERAL NOTES:

A. UNLESS NOTED OTHERWISE, PROVIDE NEW CIRCUIT BREAKER IN PANELBOARD FOR EQUIPMENT AS SCHEDULED. BREAKER SHALL BE U.L. LISTED AND LABELED FOR USE IN PANELBOARD. INTERRUPTING RATING OF BREAKER SHALL MATCH PANELBOARD.

B. REVISE PANELBOARD DIRECTORY WITH NEW CIRCUIT LOADS ADDED. REFER TO IDENTIFICATION SPECIFICATION SECTION.

REMARKS:

1. ELECTRICAL CONTRACTOR IS RESPONSIBLE FOR THE MOUNTING, AND LINE/LOAD SIDE CONNECTIONS OF DISCONNECT AND/OR STARTER DEVICE ASSOCIATED WITH UNIT. MEANS OF DISCONNECT AND/OR STARTER DEVICE ASSOCIATED WITH UNIT PROVIDED BY MECHANICAL CONTRACTOR. ELECTRICAL CONTRACTOR IS RESPONSIBLE FOR ALL FINAL CONNECTIONS TO EQUIPMENT.
2. EQUIPMENT AND ASSOCIATED BREAKER AND BRANCH CIRCUIT WIRING ARE PART OF AN ALTERNATE. REFER TO AREA POWER AND SYSTEMS PLANS AND MECHANICAL NEW WORK PLANS.
3. PROVIDE 20A GFI RECEPTACLE FOR EQUIPMENT CORD CONNECTED PUMP AS SHOWN ON POWER AND SYSTEMS PLAN.
4. PROVIDE EXTERIOR SAFETY DISCONNECT AS SHOWN ON POWER PLAN.
5. WIRE TO EXISTING BRANCH CIRCUIT LEFT FROM DEMOLITION OF HVAC UNIT IN SAME LOCATION. SPLICE AND EXTEND EXISTING CIRCUIT WITH WIRING NOTED.
6. PROVIDE NEW BREAKER IN SPACE LEFT FROM DEMOLITION OF HVAC OCP. PANEL PK-1 IS A 400A CUTLER-HAMMER PRL1 PANEL.
7. PROVIDE 120V POWER IN J-BOX AT EACH SSI UNIT FOR CONNECTION TO UNIT REMOTE CONDENSATE PUMP. WIRE ALL (9) SSI PUMP CONNECTIONS TOGETHER WITH (2) #12, #12 GND IN 1/2" CONDUIT AND WIRE TO PANEL P-9, CIRCUIT 15.
8. PROVIDE NEW BREAKER IN EXISTING PANELBOARD. PANEL IS A 208/120V CUTLER-HAMMER PRL1 PANEL.
9. EXISTING FEEDER WILL BE REUSED FOR NEW EQUIPMENT. BREAKER WILL BE REPLACED AS PART OF THE MSB REPLACEMENT.
10. WIRE TO SPARE 20/1 BREAKER IN PANEL LEFT FROM DEMOLITION OF UV'S.
11. WIRE TO EXISTING BRANCH CIRCUIT LEFT IN ROOM FROM DEMOLITION OF UV. NOTE THAT OTHER EXISTING TO REMAIN CEILING HEATERS WILL CONTINUE TO SHARE THIS CIRCUIT.
12. PROVIDE NEW GFI RECEPTACLE AND BRANCH CIRCUIT AS NOTED FOR NEW EP-1.
13. REMOVE EXISTING DUPLEX RECEPTACLE. INSTALL NEW GFI RECEPTACLE AND CONNECT TO EXISTING BRANCH CIRCUIT WIRING.
14. INSTALL NEW DUST COLLECTOR FAN MOTOR BREAKER IN SPACE LEFT FROM DEMOLITION OF OLD DUST COLLECTOR.
15. BREAKER NOTED IS AN EXISTING SPARE, UNUSED 20A/1P BREAKER IN PANEL.
16. EXISTING 20/1 BREAKER IN PANEL WITH SHARED CORRIDOR HVAC UNITS.
17. PROVIDE 20A, 120V CIRCUIT FOR HEAT TRACE ON EXTERIOR PIPING AND EVAPORATOR. WIRE TO PANEL P-9, CIRCUIT 17. MECHANICAL CONTRACTOR TO PROVIDE AND INSTALL HEAT TRACE AND ELECTRICAL CONTRACTOR SHALL MAKE ALL WIRING TERMINATIONS.
18. WIRE ASSOCIATED REMOTE CONDENSATE PUMP TO BRANCH WIRING SERVING ASSOCIATED UV/FC HVAC UNIT. WIRE WITH (2) #12, #12 GND IN 1/2" CONDUIT.
19. OUTDOOR UNIT SSO-9 SHALL PROVIDE 208V SINGLE PHASE POWER TO INDOOR UNIT SSI-9 VIA #14 AWGx3 INTERCONNECT CABLE. ELECTRICAL CONTRACTOR SHALL PROVIDE AND INSTALL CABLE.

LUMINAIRE SCHEDULE

TYPE	DESCRIPTION	MANUFACTURER	MODEL	LOAD	COMMENTS
E1	UNIVERSAL MOUNT DIE-CAST ALUMINUM EXIT SIGN WITH WHITE FINISH, RED LETTERS, EMERGENCY BATTERY UNIT, AND SELF-DIAGNOSTICS	DUAL-LITE	SE-S-R-W-E-I	3 VA	7
L1	RECESSED 2X4 EDGE-LIT FLAT PANEL WITH 0-10V DIMMING, FROSTED LENS, AND SWITCHABLE LUMEN OUTPUT	COLUMBIA LIGHTING	CFP24-55/41/3440	40 VA	1, 3
L2	4' LONG, EXTERIOR WALL MOUNTED FIXTURE WITH 12" FIXED ARM MOUNTING, 2,000 LUMEN OUTPUT, ALUMINUM FINISH, INTEGRAL OCCUPANCY SENSOR WITH DAYLIGHT DIMMING CONTROL, AND BATTERY BACK UP EMERGENCY UNIT	ARCHITECTURAL AREA LIGHTING	RND-4-5-4K8-AS-DL-UNV-PSS-F12-NXOSW-EM	25 VA	9
L3	RECESSED 2X2 EDGE-LIT FLAT PANEL WITH 4072 LUMEN OUTPUT, 0-10V DIMMING, AND FROSTED LENS	COLUMBIA LIGHTING	CFP22-4040 (PLD10M-PLRTS)	40 VA	1, 2
L4-4'	4' LINEAR PENDANT WITH 3-9/16" DIAMETER ALUMINUM HOUSING, CABLE MOUNTING, SATINE LENS, 0-10V DIMMING, AND 1126 LUMENS PER FOOT	SELUX	PL9LR-1C45-940-SD-C-04'-WH-U-DIM (EMR)	44 VA	2, 4, 10
L4-8'	8' LINEAR PENDANT WITH 3-9/16" DIAMETER ALUMINUM HOUSING, CABLE MOUNTING, SATINE LENS, 0-10V DIMMING, AND 1126 LUMENS PER FOOT	SELUX	PL9LR-1C45-940-SD-C-08' RUN-WH-U-DIM (EMR)	89 VA	2, 4, 10
L4-12'	12' LINEAR PENDANT WITH 3-9/16" DIAMETER ALUMINUM HOUSING, CABLE MOUNTING, SATINE LENS, 0-10V DIMMING, AND 1126 LUMENS PER FOOT	SELUX	PL9LR-1C45-940-SD-C-12' RUN-WH-U-DIM	133 VA	4
L5	48" DIAMETER RING PENDANT WITH CUSTOM COLOR (BLUE) METAL OUTER BODY, MATTE WHITE ACRYLIC INNER DIFFUSER, DIRECT/INDIRECT DISTRIBUTION, 0-10V DIMMING, 7773 LUMEN OUTPUT, AND CABLE MOUNTING	CAMMAN LIGHTING	P2410-48-LH-40K-CLV-MV-WM-STBD-ACC (REM)	69 VA	2, 5
L6	18" DIAMETER PENDANT WITH MATTE WHITE METAL OUTER BAND, FLAT WHITE ACRYLIC BOTTOM LENS, 0-10V DIMMING, CABLE MOUNTING, AND 4027 LUMEN OUTPUT	CAMMAN LIGHTING	P1003-18-LH-40K-CLV-MV-WM-STBD-AC	63 VA	5
L7	4" WIDE RECESSED PERIMETER LUMINAIRE WITH 645 LUMEN/FOOT OUTPUT, 7W/FT, SATIN ACRYLIC REGRESSED LENS, GRID MOUNTING, AND 0-10V DIMMING	DAY-O-LITE	WPPL-4-SI-40-SO-XFT-G-W		6
L8	RECESSED 1X4 EDGE-LIT FLAT PANEL WITH 5500 LUMEN OUTPUT, 0-10V DIMMING, AND FROSTED LENS	COLUMBIA LIGHTING	CFP14-5540 (PLD10M-PLRTS)	50 VA	1, 2
S	EXISTING SALVAGED LUMINAIRE RE-INSTALLED			40 VA	8

COMMENTS:

1. FIXTURE SHALL BE DLC QUALIFIED WITH A MINIMUM 5 YEAR WARRANTY.
2. WHERE NOTED ON PLAN AS "/EM" OR "/NL", PROVIDE FIXTURE WITH EMERGENCY BATTERY BACK-UP UNIT TO PROVIDE A MINIMUM OF 90 MINUTES OF ILLUMINATION. PROVIDE ASSOCIATED REMOTE TEST SWITCH AND CHARGE INDICATOR MODULE. INSTALL IN SINGLE GANG RECESSED BOX ADJACENT TO FIXTURE.
3. SET INITIAL LUMEN OUTPUT OF SWITCHABLE FIXTURE TO 4100.
4. FINAL END CAP COLOR TO BE DETERMINED AT SUBMITTAL TIME.
5. PROVIDE FINISH COLOR SAMPLES FOR FINAL OUTER RING SELECTION. PROVIDE SAMPLES OF PAL (ALUMINUM), PMW (MATTE WHITE), PSG (SATIN GOLD), AND PBL (SIGNAL BLUE). INCLUDE COST OF A CUSTOM COLOR TO MATCH SCHOOL BLUE IN QUOTE.
6. PERIMETER FIXTURE SHALL BE WALL TO WALL BETWEEN ROOM CORNERS AND COLUMNS. CONTRACTOR SHALL VERIFY FINAL LENGTHS IN FIELD PRIOR TO FINAL ORDERING OF FIXTURES. COORDINATE WITH GENERAL CONTRACTOR DURING INSTALLATION.
7. PROVIDE EXIT SIGN FIXTURE WITH EMERGENCY BATTERY BACK-UP UNIT TO PROVIDE A MINIMUM OF 90 MINUTES OF ILLUMINATION.
8. FIXTURE TO BE RE-INSTALLED IN NEW CEILING GRID. ELECTRICAL CONTRACTOR SHALL BE RESPONSIBLE TO REPLACE ANY FIXTURE AND/OR LENS THAT WAS DAMAGED DURING REMOVAL/REINSTALLATION. FIXTURE AND/OR LENS SHALL BE OF MATCHING STYLE AS REMOVED EQUIPMENT.
9. FIXTURE FINISH SHALL MATCH NEW ALUMINUM WINDOW AND DOOR TRIM. PROVIDE COLOR SAMPLE WITH SUBMITTAL.
10. "EMR" INVERTER EMERGENCY UNITS WILL BE PROVIDED FOR FIXTURES NOTED. MOUNT ABOVE DROP CEILING AT FIXTURE.

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PROJECT INFORMATION

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Client Name
NEWBURGH ENLARGED CITY SCHOOL DISTRICT

Project Name
PHASE 3: HERITAGE MIDDLE SCHOOL 2019 CAPITAL IMPROVEMENT PROJECT

Project Address
405 Union Avenue, New Windsor, NY 12553

SED Number

PROJECT ISSUE SCHEDULE

No.	Date	Description
1	9/17/21	BID ADDENDUM #1

SHEET INFORMATION

Issued: 09/06/2021 | Scale: AS NOTED
Project Status: CONSTRUCTION DOCUMENTS
Drawn By: RJD | Checked By: ARM

Drawing Title
EQUIPMENT WIRING AND LUMINAIRE SCHEDULES

Drawing Number
HMS E900

PANEL NAME: P-9 — **PANEL LOCATION: Ground Floor Storage Room 440** — Revised: 09/16/21 — Notes: — **22KAIC RATING**

	VOLTS	AMPS	PHASE	# CCTS	LUGS	BKR
	208/120	400	3	42		400A

	DESCRIPTION	BREAKER	LINE 1	LINE 2	LINE 3	BREAKER	DESCRIPTION	
1	Pump P-1	90/3	48.3 2.7			15/2	CAFETERIA SSI UNITS 1-8	2
3				48.3 2.7				4
5					48.3 7.2	20/1	GMP-1	6
7	Pump P-2	90/3	48.3 8			15/3	AHU-3	8
9				48.3 8				10
11					48.3 8			12
13	EF-2	20/1	3.8 8			15/3	AHU-4	14
15	SSI CONDENSATE PUMPS	20/1		9 8				16
17	HEAT TRACE - CHILLER	20/1			10 8			18
19	ACC-5	50/3	38			20/3	SPARE	20
21				38				22
23					38			24
25	ACC-6	90/3	63 5			20/1	CHEMICAL POT FEEDER	26
27				63 9.8		20/2	SSO-9 & SSI-9	28
29					63 9.8			30
31	ACC-7	90/3	70			20/1	SPARE	32
33				70		20/1	SPARE	34
35					70	20/1	SPARE	36
37	SPARE	20/3				20/1	SPARE	38
39							SPACE	40
41							SPACE	42
			295.1	305.1	310.6			

PANEL NAME: P-10 — **PANEL LOCATION: STORAGE ROOM 606** — Revised: 07/15/21 — Notes: — **22KAIC RATING**

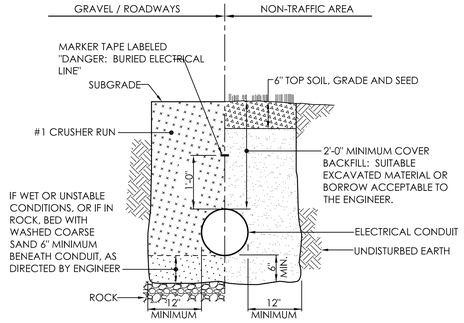
	VOLTS	AMPS	PHASE	# CCTS	LUGS	BKR
	208/120	400	3	30		350A

	DESCRIPTION	BREAKER	LINE 1	LINE 2	LINE 3	BREAKER	DESCRIPTION	
1	ACC-1	80/3	57 8			15/3	AHU-1	2
3				57 8				4
5					57 8			6
7	ACC-2	80/3	57 8			15/3	AHU-2	8
9				57 8				10
11					57 8			12
13	ACC-3	80/3	57 4.5			20/1	HVAC SERVICE RECEPT.	14
15				57		20/1	SPARE	16
17					57	20/1	SPARE	18
19	ACC-4	80/3	57			20/1	SPARE	20
21				57			SPACE	22
23					57		SPACE	24
25	SPARE	20/3					SPACE	26
27							SPACE	28
29							SPACE	30
			248.5	244	244			

PANEL NAME: P-11 — **PANEL LOCATION: Attic** — Revised: 08/11/21 — Notes: — **22KAIC Rating**

	VOLTS	AMPS	PHASE	# CCTS	LUGS	BKR
	208/120	225	3	42		225

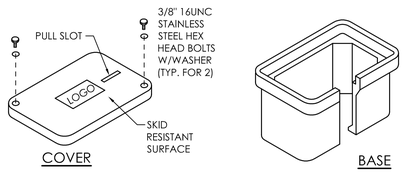
	DESCRIPTION	BREAKER	LINE 1	LINE 2	LINE 3	BREAKER	DESCRIPTION	
1	SF-8	35/3	16.7 16.7			35/3	SF-3	2
3				16.7 16.7				4
5					16.7 16.7			6
7	SF-6	20/3	7.5 4.8			20/3	RF-4, RF-5	8
9				7.5 4.8				10
11					7.5 4.8			12
13	SF-7	20/3	10.6 12			20/1	UV-41, UV-42, UV-43	14
15				10.6 10.3		20/2	EF-3, EF-5	16
17					10.6 10.3			18
19	RF-6	20/3	7.5 12			20/2	EF-6	20
21				7.5 12				22
23					7.5 1.5	20/1	ROOF SERVICE RECEPT.	24
25	SF-2, RF-2, RF-3	20/3	11.4 10.5			20/1	HVAC SERVICE RECEPT.	26
27				11.4 6.6				28
29					11.4 6.6	20/3	RF-7	30
31	SF-1	35/3	16.7 6.6					32
33				16.7 10.6				34
35					16.7 10.6	20/3	RF-8	36
37	RF-1	50/3	24.2 10.6					38
39				24.2		20/1	SPARE	40
41					24.2	20/1	SPARE	42
			167.8	155.6	145.1			



NOTES:

1) ALL MATERIAL PLACED IN GRAVEL/ROADWAY AREAS SHALL BE COMPACTED IN MAXIMUM 6" LIFTS.
2) THIS TRENCH DETAIL SHALL INCLUDE THE REQUIREMENTS COMMON TO MORE THAN ONE SECTION OF DIVISION 2 OF THE SPECIFICATIONS.

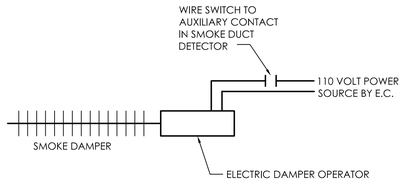
1 / E901 **TYPICAL TRENCH DETAIL FOR CONDUIT**
NOT TO SCALE



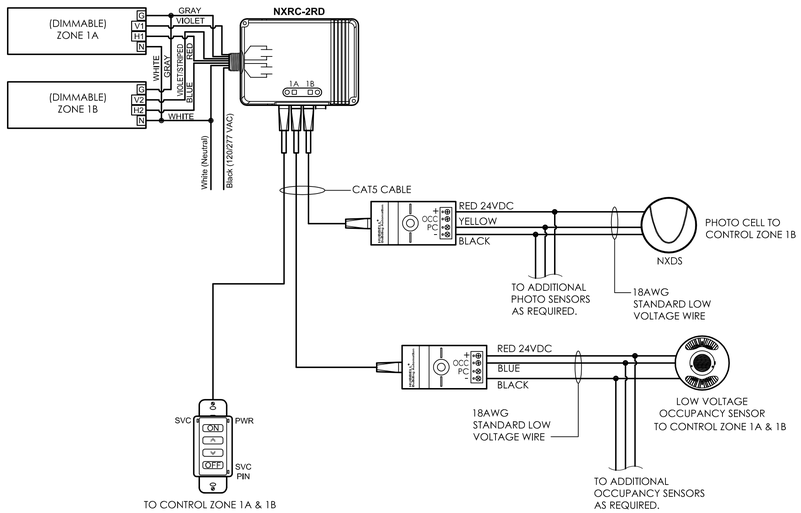
NOTES:

1. PROVIDE QUAZITE OPEN BOTTOM POLYMER HANDHOLE OR EQUAL.
2. COORDINATE DEPTH OF HANDHOLES WITH FIELD CONDITIONS. HANDHOLES TO BE LOCATED IN NON-TRAFFIC GRASS AREAS WITH TOP FLUSH WITH FINISHED GRADE.
3. PROVIDE 12" MINIMUM CRUSHED STONE BELOW HANDHOLE FOR DRAINAGE.
4. FILL AND COMPACT THE SOIL AROUND THE HANDHOLE TO GRADE LEVEL WITH THE COVER ON THE ENCLOSURE.

2 / E901 **TYPICAL HANDHOLE DETAIL**
NOT TO SCALE



3 / E901 **SMOKE DAMPER CONTROL DETAIL**
NOT TO SCALE



4 / E901 **TYPICAL LIGHTING CONTROL DIAGRAM**
NOT TO SCALE

LIGHTING CONTROL NOTES:

A. DETAIL SHOWN IS A TYPICAL LAYOUT AND SHOWN FOR CLARITY OF COMPONENTS AND WIRING. IT IS NOT INTENDED TO SHOW EVERY SCENARIO IN DIFFERENT TYPE SPACES. CONTRACTOR SHALL BE RESPONSIBLE TO PROVIDE ALL MATERIALS REQUIRED TO PROVIDE THE QUANTITY OF CONTROL ZONES, CIRCUITS, AND DIMMING ARRANGEMENTS SHOWN ON LIGHTING PLANS.

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PROJECT INFORMATION

Project Number
13940.18

Client Name
NEWBURGH ENLARGED CITY SCHOOL DISTRICT

Project Name
PHASE 3: HERITAGE MIDDLE SCHOOL 2019 CAPITAL IMPROVEMENT PROJECT

Project Address
405 Union Avenue, New Windsor, NY 12553

SED Number
44-16-00-01-0-039-011

REVISION SCHEDULE

No.	Date	Description
1	9/17/21	BID ADDENDUM #1

SHEET INFORMATION

Issued: 09/06/2021 — Scale: AS NOTED
CONSTRUCTION DOCUMENTS
Drawn By: RJD — Checked By: ARM

Drawing Title
ELECTRICAL DETAILS AND PANELBOARD SCHEDULES

Drawing Number
HMS E901

Plotted By: Robin DeRue
Date last plotted: 9/16/2021 8:22 AM
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