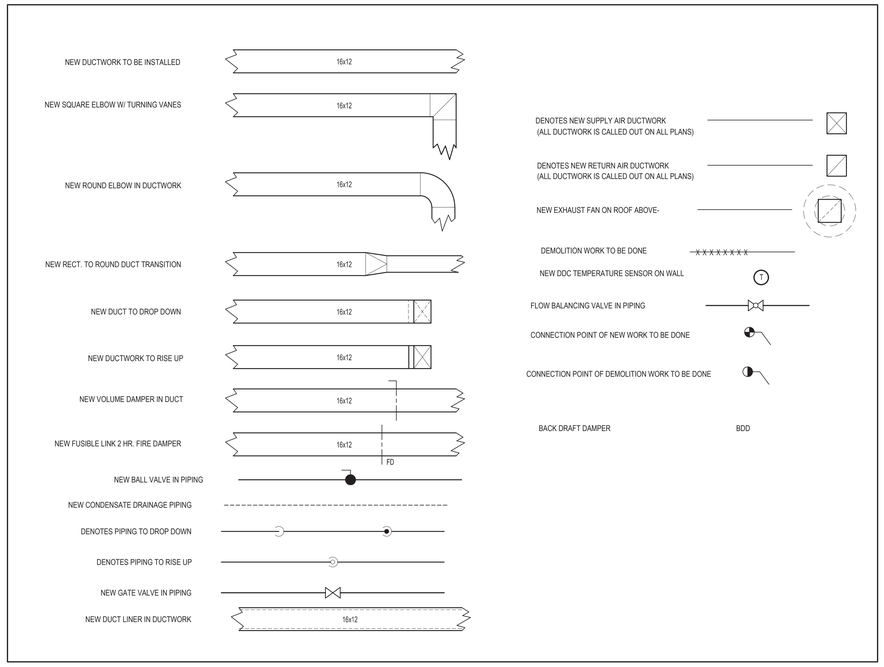
MECHANICAL LEGEND, SYMBOLS, AND ABBREVIATIONS



CONTRACTOR ABBREVIATIONS:	
M.C. = MECHANICAL CONTRACTOR	P.C. = PLUMBING CONTRACTOR
C.C. = CONTROLS CONTRACTOR	E.C. = ELECTRICAL CONTRACTOR
R.C. = CERTIFIED ROOFING CONTRACTOR	

VENTILATION SCHEDULE

Room Number	Occupancy Classification	Occupancy Density (People Per 1000SF)	People Outdoor Airflow Rate in Breathing Zone, Rp (CFM/Person)	Area Outdoor Airflow Rate in Breathing Zone, Ra (CFM/SF)	Exhaust Airflow Rate (CFM/SF)	Area (SF)	Number of People (Pz)	Ventilation in Breathing Zone, Vbz (CFM)	Zone Air Distribution Effectiveness, Ez	Corrected Zone Outdoor Airflow CFM, Voz	OAI (CFM) Supplied
_001	Classroom (ages 5-8)	25	10	0.12	0	746	19	280	0.9	312	320
_002	Classroom (ages 5-8)	25	10	0.12	0	746	19	280	0.9	312	320
_003	Classroom (ages 5-8)	25	10	0.12	0	674	17	251	0.9	279	280
_004	Classroom (ages 5-8)	25	10	0.12	0	599	15	222	0.9	247	250
_002A	Classroom (ages 5-8)	25	10	0.12	0	155	4	59	0.9	66	70
_002B	Classroom (ages 5-8)	25	10	0.12	0	151	4	59	0.9	66	70
Office-001	Office space	5	5	0.06	0	165	1	15	0.8	19	30
Office-002	Office space	5	5	0.06	0	230	2	24	0.8	30	30
Nurse Office	Office space	5	5	0.06	0	152	1	15	0.8	19	30

GENERAL NOTES

1. REMOVAL & RELOCATION OF CERTAIN EXISTING WORK SHALL BE NECESSARY FOR THE PERFORMANCE OF THE NEW WORK SHOWN HEREIN. ALL EXISTING CONDITIONS ARE NOT COMPLETELY DETAILED ON THE DRAWINGS. THE CONTRACTOR SHALL SURVEY THE SITE & MAKE ALL NECESSARY CHANGES BASED ON EXISTING CONDITIONS AS REQUIRED FOR PROPER DEMOLITION OF EXISTING WORK & SHALL INCLUDE ALL MATERIALS & LABOR FOR SAME IN HIS BID PRICE. NO ALLOWANCE WILL BE MADE FOR FAILURE TO DO SO.
2. PRIOR TO SUBMITTING A BID, THE CONTRACTOR SHALL VISIT THE PREMISES OF THE PROPOSED WORK & SHALL CAREFULLY EXAMINE THE ENGINEERING DRAWINGS, EXISTING CONDITIONS & LIMITATIONS THEREOF. VERIFY ACTUAL LOCATIONS WHERE THE NEW PIPING WILL BE ROUTED. COORDINATE WITH NEW & EXISTING WORK & PROVIDE CLEARANCE W/ BUILDING STRUCTURE, OTHER SERVICES, ETC. THE CONTRACTOR SHALL INCLUDE ALL COSTS WHATSOEVER WHICH ARE INCURRED AS A RESULT OF LIMITATIONS OF THE EXISTING & NEW CONDITIONS. LATER CLAIMS FOR EXTRA LABOR, EQUIPMENT, MATERIALS, ETC. REQUIRED DUE TO DIFFICULTIES WHICH COULD HAVE BEEN FORESEEN WILL NOT BE CONSIDERED AS EXTRA WORK.
3. INSTALL WORK SO AS TO BE READILY ACCESSIBLE FOR OPERATING, MAINTENANCE & REPAIR. MINOR DEVIATIONS FROM DRAWINGS MAY BE MADE TO ACCOMPLISH THIS, BUT CHANGES OF MAGNITUDE WHICH INVOLVE EXTRA COST SHALL NOT BE MADE WITHOUT APPROVAL.
4. INVESTIGATE EACH SPACE THROUGH WHICH EQUIPMENT MUST BE MOVED. WHEN NECESSARY, EQUIPMENT SHALL BE SHIPPED FROM MANUFACTURER IN CRATED SECTIONS OF SIZE SUITABLE FOR MOVING THROUGH AREAS AVAILABLE. ASCERTAIN FROM BUILDING OWNER AT WHAT TIMES OF DAY EQUIPMENT MAY BE MOVED THROUGH THE BUILDING.
5. COORDINATE THE EXACT SIZE & LOCATION OF NEW OPENINGS WITH EXISTING STRUCTURE. PATCH / INSULATE AS REQUIRED. CONTRACTOR SHALL FIRESTOP ALL PENETRATIONS FROM NEW PIPING, CONDUIT, DUCTWORK, ETC. THROUGH EXISTING OR NEW FIRE/ SMOKE BARRIERS. REFER TO SPECIFICATION SECTION 15511 FOR FURTHER DETAILS.
6. IT IS THE INTENT OF THIS CONTRACT FOR REMAINING SYSTEMS TO BE LEFT IN GOOD WORKING ORDER, READY FOR OPERATION. COORDINATE ANY REQUIRED SYSTEM SHUTDOWNS WITH OWNER 48 HOURS IN ADVANCE. EXISTING SYSTEM SHUTDOWNS WILL NOT BE PERMITTED IF THEY INTERFERE WITH THE DAILY OPERATIONS OF THE BUILDING. CONTRACTOR WILL BE REQUIRED TO TAKE PROPER PRECAUTIONS AGAINST DAMAGING OR DISRUPTING BUILDING SYSTEMS, WIRING, PIPING OR CONTROL TUBING. ANY DAMAGE TO THESE ITEMS SHALL BE REPAIRED AT THE CONTRACTOR'S COST AS A PART OF THIS CONTRACT.
7. THE CONTRACTOR SHALL REPAIR / RESTORE TO ORIGINAL CONDITION ANY EXISTING EQUIPMENT OR MATERIALS DAMAGED IN THE PROCESS OF INSTALLATION, OR DEMOLITION TO THE SATISFACTION OF THE OWNER'S REPRESENTATIVE. CONTRACTOR SHALL MAKE REPAIRS USING THE SAME OR EQUIVALENT MATERIALS. WORK WILL BE PERFORMED AT THE CONTRACTOR'S COST.
8. CONTRACTOR SHALL INCUR ANY COSTS OR BURDENS ASSOCIATED WITH LOST OR STOLEN EQUIPMENT / MATERIALS.
9. DURING THE LIFE OF THE CONTRACT PERIOD, CONTRACTOR SHALL REMOVE ALL RUBBISH / EXCESS MATERIAL ACCUMULATED AS A RESULT OF HIS OPERATIONS ON A DAILY BASIS. ALL AREAS / EQUIPMENT AFFECTED UNDER THIS CONTRACT SHALL BE KEPT CLEAN OF DUST / DEBRIS. ALL AREAS SHALL RECEIVE A FINAL CLEANING PRIOR TO FINAL ACCEPTANCE BY THE OWNER.
10. PROVIDE FOR LEGAL REMOVAL / DISPOSAL OF ALL RUBBISH / DEBRIS FROM THE BUILDING & SITE. PROTECT ALL WORK NOT SLATED FOR DEMOLITION.
11. THIS CONTRACTOR SHALL COORDINATE HIS WORK WITH ALL OTHER TRADES PRIOR TO SCHEDULING THE WORK. WORK SHALL BE PERFORMED IN PROPER SEQUENCE, AS AGREED TO BY ALL TRADES. ANY COSTS INCURRED BY THE OWNER DUE TO IMPROPER SEQUENCING OF WORK WILL BE PAID FOR BY THIS CONTRACTOR.
12. CONTRACTOR SHALL OBTAIN ALL PERMITS, PAY ALL FEES, CONNECTION CHARGES, ETC. ASSOCIATED WITH THE WORK UNDER THEIR CONTRACT.
13. PAINT / TOUCH UP ALL SURFACES MARRED AS A RESULT OF THE PERFORMANCE OF THE CONTRACT WORK.
14. THE MECHANICAL CONTRACTOR SHALL REFER TO / REVIEW ALL OTHER TRADE DRAWINGS IN THE BID PACKAGE & SHALL BE RESPONSIBLE FOR / PERFORM ALL WORK INDICATED AS (M.C.) MECHANICAL WORK AS A PART OF THE BASE BID UNLESS SPECIFICALLY NOTED OTHERWISE.
15. SUBSTITUTED EQUIPMENT OF GREATER OR LARGER POWER, DIMENSIONS, CAPACITIES & RATINGS MAY BE FURNISHED PROVIDED THAT SAID EQUIPMENT IS APPROVED IN WRITING PRIOR TO ORDER. ANY CONNECTING MECHANICAL SERVICES, ELECTRICAL SERVICES, BASES, STRUCTURAL APPURTENANCES, ETC. REQUIRED TO BE INCREASED DUE TO THE USE OF SAID EQUIPMENT WILL BE PAID FOR IN FULL BY THE MECHANICAL CONTRACTOR, INCLUDING ANY ADDITIONAL REQUIRED ENGINEERING FEES.
16. EACH PIECE OF EQUIPMENT SHALL BE PROVIDED WITH A PERMANENT TYPE LAMINATED, BLACK FINISH, WHITE CORE, PHENOLIC NAMEPLATE. NAMEPLATES SHOULD INDICATE THE NAME & NUMBER OF THE UNIT, UNIT VOLTAGE, & ANY INTERLOCK REFERENCE. STARTERS / DISCONNECT SWITCHES SHOULD ALSO BE EQUIPPED WITH AN IDENTICAL NAMEPLATE WITH THE SAME INFORMATION.
17. "ATTIC STOCK" - UPON COMPLETION OF THE PROJECT, MECHANICAL CONTRACTOR SHALL COMPLETELY REMOVE / DISPOSE OF FILTERS USED DURING CONSTRUCTION & START-UP PROCEDURES. INSTALL NEW FILTERS IN ALL EQUIPMENT, MERV-8 OR BETTER UPON TURN OVER OF THE PROJECT TO THE OWNER. IN ADDITION, PROVIDE (2) COMPLETE SETS OF FILTERS FOR EACH PEICE OF EQUIPMENT & TURN OVER TO OWNER.
18. MECHANICAL CONTRACTOR SHALL PROVIDE (1) SPARE MOTOR FOR EACH SIZE MOTOR USED ON THE PROJECT. IN INSTANCES WHERE MORE THAN TEN OF THE SAME MOTOR ARE USED, MECHANICAL CONTRACTOR SHALL PROVIDE (1) SPARE MOTOR FOR EVERY TEN MOTORS OF A GIVEN SIZE USED ON THE PROJECT.
19. MAINTENANCE MANUAL: UPON COMPLETION OF THE PROJECT, THE MECHANICAL CONTRACTOR SHALL PROVIDE A BINDER CONTAINING THE OPERATIONS & MAINTENANCE MANUALS FOR EACH NEW PEICE OF EQUIPMENT INSTALLED UNDER THIS PROJECT. THE FIRST SECTION OF THE MAINTENANCE MANUAL SHALL CONTAIN A LIST OF EACH PEICE OF EQUIPMENT, COMPLETE WITH INFORMATION SHOWING APPROPRIATE REPLACEMENT FILTER SIZES / TYPES, APPROPRIATE REPLACEMENT BELT SPECIFICATIONS, REPLACEMENT MOTOR SPECIFICATIONS, REPLACEMENT BEARING SPECIFICATIONS, VOLTAGES OF UNIT, ETC. THIS SHALL SERVE AS A WRITTEN DATABASE DESCRIBING ALL MAINTENANCE INFORMATION FOR EACH NEW PEICE OF EQUIPMENT USED.

FIRE STOPPING NOTES

1. ALL PENETRATIONS RELATED TO MECHANICAL WORK THROUGH FIRE RATED WALLS, FLOORS OR OTHER STRUCTURES SHALL BE FIRE STOPPED AS REQUIRED TO MAINTAIN THE RATING OF THE WALL BY MECHANICAL CONTRACTOR. IT IS ASSUMED THAT ALL WALLS IN THE CONSTRUCTION CARRY A MINIMUM FIRE RATING OF 1 HR. IT SHOULD BE ASSUMED THAT ALL MACHINE ROOM WALLS / BOILER ROOM WALLS / ELECTRIC ROOM WALLS CARRY A RATING OF 2 HR. MECHANICAL CONTRACTOR SHALL BE RESPONSIBLE FOR A COMPLETE REVIEW OF THE ARCHITECTURAL DRAWINGS IN ORDER TO DETERMINE FIRE RATINGS OF ALL WALLS / PARTITIONS RELATED TO WORK UNDER THIS CONTRACT.
2. MECHANICAL CONTRACTOR SHALL REVIEW THE COMPLETE ARCHITECTURAL SET OF DRAWINGS IN ORDER TO DETERMINE WHERE DUCT PENETRATIONS THROUGH RATED BARRIERS. DUCTS PENETRATING SAID RATED BARRIERS SHALL BE EQUIPPED WITH A UL LISTED FUSIBLE LINK TYPE FIRE DAMPER, RATED FOR SERVICE FOR WHICH IT IS BEING USED. FIRE DAMPERS SHALL BE PROVIDED & INSTALLED BY THE MECHANICAL CONTRACTOR, COMPLETE W/ DUCT ACCESS DOORS DIRECTLY ADJACENT TO THE DAMPER, POSITIONED FOR EASY REPLACEMENT OF THE LINK.
3. MECHANICAL CONTRACTOR SHALL REVIEW THE COMPLETE ARCHITECTURAL SET OF DRAWINGS IN ORDER TO DETERMINE WHERE DUCT PENETRATIONS THROUGH RATED BARRIERS OCCUR BETWEEN SEPARATE SMOKE ZONES. DUCTS PENETRATING SAID FIRE / SMOKE BARRIERS SHALL BE EQUIPPED WITH A UL LISTED COMBINATION FIRE / SMOKE DAMPER, RATED FOR SERVICE FOR WHICH IT IS BEING USED. FIRE / SMOKE DAMPERS SHALL BE PROVIDED & INSTALLED BY THE MECHANICAL CONTRACTOR, COMPLETE W/ DUCT ACCESS DOORS DIRECTLY ADJACENT TO THE DAMPER. DAMPER ACTUATOR & RELATED WIRING SHALL BE PROVIDED & INSTALLED BY THE ELECTRICAL CONTRACTOR. COORDINATE DAMPER INSTALLATIONS W/ E.C. TO VERIFY PROPER CLEARANCES TO ASSURE PROPER DAMPER OPERATION.
4. MECHANICAL CONTRACTOR SHALL PROVIDE A FULL SET OF AS-BUILT DRAWINGS, SHOWING EACH DAMPER LOCATION, TYPE OF DAMPER, ACCESS DOOR LOCATIONS, ETC.
5. CONTRACTOR SHALL REFER TO SPECIFICATION SECTION 15511 FOR FURTHER DETAILS REGARDING FIRESTOPPING MATERIALS & METHODS.
6. CONTRACTOR SHALL SUBMIT SHOP DRAWINGS OF PRODUCTS TO BE USED. FIRESTOP MATERIALS OTHER THAN THE PRODUCTS SPECIFIED SHALL INCLUDE FULL TECHNICAL DATA WITH SHOP DRAWINGS TO DEMONSTRATE EQUALITY WITH THE SPECIFIED FIRESTOPPING MATERIALS.

GENERAL INSTRUMENTATION NOTES

1. AT A MINIMUM, PROVIDE THERMOMETERS / WELLS AT THE FOLLOWING LOCATIONS:
   - AT INLETS & OUTLET OF EACH THREE WAY VALVE (UNIT VENTILATORS / CABINET UNIT HEATER INSTALLATIONS EXCEPTED).
   - AT INLET & OUTLET OF EACH HYDRONIC BOILER, CHILLER OR COOLING TOWER.
   - AT INLET & OUTLET OF EACH HYDRONIC COIL IN AIR HANDLING UNITS & BUILT-UP CENTRAL SYSTEMS.
2. AT A MINIMUM, PROVIDE LIQUID FILLED PRESSURE GAUGES / WELLS AT THE FOLLOWING LOCATIONS:
   - AT SUCTION & DISCHARGE OF EACH PUMP.
   - FOR EACH MAKEUP WATER LINE.
   - BEFORE & AFTER ALL PRESSURE REDUCING VALVES.
   - AT ACCESSIBLE HIGH POINT OF ALL HYDRONIC PIPING SYSTEMS.
   - AT ALL EXPANSION / COMPRESSION TANKS.

PIPING SYSTEMS AND EQUIPMENT VENTING NOTES

1. MECHANICAL CONTRACTOR WILL BE RESPONSIBLE FOR THE PROPER VENTING OF ALL NEWLY INSTALLED HYDRONIC PIPING SYSTEMS. AUTOMATIC AIR VENTS SHALL BE INSTALLED AT EVERY HIGH POINT IN THE PIPING SYSTEM WHERE AIR CAN COLLECT. PROVIDE COCK IN RISER PRIOR TO AUTOMATIC AIR VENT. NEW AIR VENTS SHALL BE "TACO" #HY-VENT OR EQUIVALENT.
2. MECHANICAL CONTRACTOR SHALL PROVIDE & INSTALL NEW AUTOMATIC AIR VENT FOR EACH AIR HANDLING UNIT COIL OR DUCT MOUNTED COIL. INSTALL SHUT-OFF COCK PRIOR TO VENT TIE-IN.
3. MECHANICAL CONTRACTOR SHALL PROVIDE NEW MANUAL AIR VENTS FOR ALL UNIT VENTILATOR COILS, CONVECTORS, FAN COIL UNITS, FIN TUBE RADIATORS, ETC. MANUAL VENTS SHALL BE "TACO" #417 COIN VENT OR EQUIVALENT. PROVIDE SHUT-OFF COCK PRIOR TO VENT. AIM COIN VENT DISCHARGE IN AN APPROPRIATE MANNER AS TO FACILITATE THE CAPTURE OF BLEED WATER WHILE PERFORMING SYSTEM BLEEDING OPERATIONS.

ELECTRICAL WORK UNDER MECHANICAL CONTRACT

1. MECHANICAL CONTRACTOR SHALL PROVIDE ALL STARTERS & DISCONNECT SWITCHES REQUIRED FOR ALL NEW MECHANICAL EQUIPMENT. STARTER / DISCONNECT SWITCH INSTALLATION TO BE PERFORMED UNDER THE ELECTRICAL CONTRACT. COORDINATE WORK W/ ELECTRICAL CONTRACTOR PRIOR TO START OF WORK.
2. POWER WIRING REQUIRED FOR CONTROLS SHALL BE PERFORMED UNDER THE MECHANICAL CONTRACT UNLESS SPECIFICALLY NOTED OTHERWISE ON THE ELECTRICAL DRAWINGS. MECHANICAL CONTRACTOR SHALL OBTAIN THE SERVICES OF A LICENSED ELECTRICIAN (PER NEC REQUIREMENTS) TO PERFORM ALL ELECTRICAL WORK.

DUCTWORK NOTES

1. PROVIDE ALL NEW DUCTWORK AS SHOWN AND SPECIFIED UNDER SPECIFICATION SECTION 015891, AND IN CONFORMANCE WITH 'SMACNA' SPECIFICATIONS.
2. IF A DUCT ELBOW IS SHOWN TO BE RADIUSED, THEN RADIUSED ELBOWS SHALL BE INSTALLED. SQUARE ELBOWS MAY NOT BE SUBSTITUTED WHERE RADIUSED ELBOWS ARE SHOWN. WHERE SQUARE ELBOWS ARE SHOWN, TURNING VANES SHALL BE INSTALLED UPON APPROVAL BY THE ENGINEER.
3. PROVIDE DUCT LINING IN ALL DUCTWORK THAT IS CONVEYING BELOW AMBIENT TEMPERATURE AIR & IS NOT INSULATED. PROVIDE LINING IN SUPPLY & RETURN AIR DUCTWORK FROM AIR HANDLING EQUIPMENT TO 20 FEET AWAY FROM THE UNIT(S). IN ADDITION, INCLUDE LINING IN ANY OTHER DUCT SPECIFICALLY SHOWN OR SPECIFIED TO BE EQUIPPED WITH LINING. REFER TO SPECIFICATION SECTION 15891 & 15290 FOR FURTHER INFORMATION.
4. WHERE FLEXIBLE DUCTWORK IS USED, LENGTHS MAY NOT EXCEED 4 FEET TOTAL IN ANY ONE RUN OF FLEXIBLE DUCTWORK. FLEXIBLE DUCTWORK SHALL BE RATED IN ACCORDANCE WITH UL 181, CLASS 1. REFER TO SPECIFICATION SECTION 15891 FOR FURTHER INFORMATION.
5. MECHANICAL CONTRACTOR SHALL PROVIDE A BUTTERFLY TYPE VOLUME DAMPER WITH LOCKING QUADRANT HANDLE PRIOR TO EACH AIR OUTLET SHOWN. INSTALL DAMPER AT LEAST 5 FEET AWAY FROM AIR OUTLET WHEREVER POSSIBLE.
6. MECHANICAL CONTRACTOR SHALL PROVIDE FLEXIBLE DUCT CONNECTIONS WHERE DUCT SYSTEMS CONNECT TO EQUIPMENT. REFER TO SPECIFICATION SECTION 15891 FOR FURTHER INFORMATION.

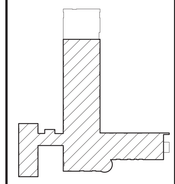
TESTING and BALANCING NOTES

1. MECHANICAL CONTRACTOR WILL BE REQUIRED TO PERFORM ALL EQUIPMENT & SYSTEM TESTING / BALANCING REQUIRED UNDER THIS CONTRACT. PROVIDE A FULL REPORT DETAILING ALL DESIGN & ACTUAL CONDITIONS FOR ALL AIR & HYDRONIC SYSTEMS SHOWN ON THE DRAWINGS. REFER TO SPECIFICATION SECTIONS 15990 & 15997 FOR FURTHER DETAILS.
2. UPON NOTICE OF COMPLETION OF WORK BY THE CONTRACTOR, OWNER WILL OBTAIN THE SERVICES OF AN INDEPENDENT TESTING & BALANCING CONTRACTOR TO VERIFY THE RESULTS OF THE TESTING & BALANCING REPORT SUBMISSION. INDEPENDENT TESTING AGENCY SHALL SELECT A RANDOM NUMBER OF MEASUREMENTS TO BE CHECKED. MEASUREMENTS WILL BE CHECKED IN THE SAME MANNER AS ORIGINALLY MEASURED. NUMBER OF VERIFICATION MEASUREMENTS SHALL BE APPROXIMATELY 25% OF THE TOTAL MEASUREMENTS FOR THE PROJECT.
3. IF MORE THAN 10% OF THE VERIFICATION TESTING SHOWS DEVIATIONS OF 10% OR MORE / SOUND LEVEL OF 2dB DIFFERENT THAN THAT ORIGINALLY MEASURED, THE ORIGINAL REPORT WILL BE REJECTED. ALL SYSTEMS WILL THEN BE REQUIRED TO BE COMPLETELY RE-TESTED, WITH A SECOND REPORT SUBMITTED. IN THE EVENT THAT THE ORIGINAL REPORT IS REJECTED, ALL SYSTEMS SHALL BE READJUSTED & TESTED, NEW CERTIFIED REPORTS SUBMITTED, AND NEW VERIFICATION TESTS MADE, AT NO ADDITIONAL COST TO THE OWNER. THE CONTRACTOR WILL BE RESPONSIBLE FOR ALL COSTS INVOLVED WITH THE VERIFICATION TESTS.

REV.	DATE	ITEM

NOTICE

THESE DRAWINGS ARE BASED ON CONSTRUCTION DRAWINGS NOT PREPARED BY BBS ARCHITECTS, LANDSCAPE, ARCHITECTS AND ENGINEERS, PC. AND, THEREFORE, MAY NOT REPRESENT THE CONDITIONS AS CONSTRUCTED AT THE TIME. ALL EXISTING CONDITIONS SHOWN ARE REPRESENTED AS SUGGESTIVE INFORMATION AS THEY MAY NOT HAVE BEEN BUILT AND DETAILED PER THE ORIGINAL DOCUMENTS OR PER THE OWNER'S INFORMATION.



KEY PLAN

NOT TO SCALE

PROJECT: GREENBURGH CENTRAL SCHOOL DISTRICT
PHASE I - DISTRICT WIDE CAPITAL IMPROVEMENTS
EARLY CHILDHOOD PROGRAM
HARTSDALE, NEW YORK - WESTCHESTER COUNTY

DWG TITLE: MECHANICAL GENERAL NOTES, SYMBOLS AND LEGEND

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SED No. 66-04-07-06-0-011-008
DISTRICT: GREENBURGH CSD
PROJECT: PH. I - DW CAP. IMPROVEMENTS EARLY CHILDHOOD PROGRAM
DWG TITLE: MECHANICAL GENERAL NOTES, SYMBOLS AND LEGEND

SCALE: AS NOTED
DATE: MAY 2022
BID PICK-UP: MAY 27, 2022
FILE No: 21-292

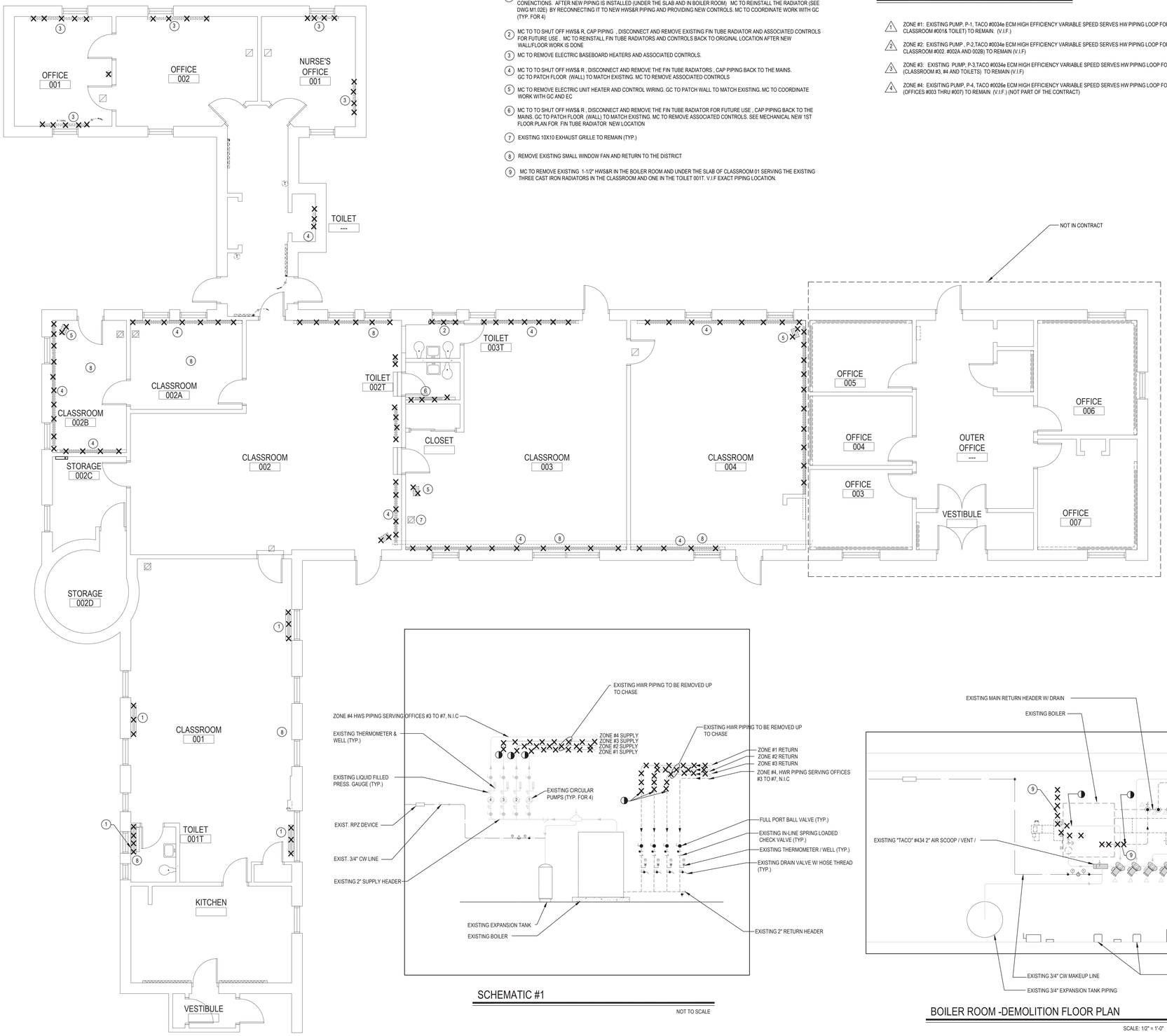
M0.01E OF - - -

NOTES:

1. MC TO TO SHUT OFF EXIST. HWS & R , DISCONNECT AND REMOVE CAST IRON RADIATOR. REMOVE CONTROL VALVE AND PIPING CONENCTIONS. AFTER NEW PIPING IS INSTALLED (UNDER THE SLAB AND IN BOILER ROOM) MC TO REINSTALL THE RADIATOR (SEE DWG M1.02E) BY RECONNECTING IT TO NEW HWS&R PIPING AND PROVIDING NEW CONTROLS. MC TO COORDINATE WORK WITH GC (TYP. FOR 4)
2. MC TO TO SHUT OFF HWS& R, CAP PIPING , DISCONNECT AND REMOVE EXISTING FIN TUBE RADIATOR AND ASSOCIATED CONTROLS FOR FUTURE USE . MC TO REINSTALL FIN TUBE RADIATORS AND CONTROLS BACK TO ORIGINAL LOCATION AFTER NEW WALL/FLOOR WORK IS DONE
3. MC TO REMOVE ELECTRIC BASEBOARD HEATERS AND ASSOCIATED CONTROLS.
4. MC TO TO SHUT OFF HWS& R , DISCONNECT AND REMOVE THE FIN TUBE RADIATORS , CAP PIPING BACK TO THE MAINS. GC TO PATCH FLOOR (WALL) TO MATCH EXISTING. MC TO REMOVE ASSOCIATED CONTROLS
5. MC TO REMOVE ELECTRIC UNIT HEATER AND CONTROL WIRING. GC TO PATCH WALL TO MATCH EXISTING. MC TO COORDINATE WORK WITH GC AND EC
6. MC TO TO SHUT OFF HWS& R , DISCONNECT AND REMOVE THE FIN TUBE RADIATOR FOR FUTURE USE , CAP PIPING BACK TO THE MAINS. GC TO PATCH FLOOR (WALL) TO MATCH EXISTING. MC TO REMOVE ASSOCIATED CONTROLS. SEE MECHANICAL NEW 1ST FLOOR PLAN FOR FIN TUBE RADIATOR NEW LOCATION
7. EXISTING 10X10 EXHAUST GRILLE TO REMAIN (TYP.)
8. REMOVE EXISTING SMALL WINDOW FAN AND RETURN TO THE DISTRICT
9. MC TO REMOVE EXISTING 1-1/2" HWS&R IN THE BOILER ROOM AND UNDER THE SLAB OF CLASSROOM 01 SERVING THE EXISTING THREE CAST IRON RADIATORS IN THE CLASSROOM AND ONE IN THE TOILET 001T. V.I.F EXACT PIPING LOCATION.

EXISTING ZONES

1. ZONE #1: EXISTING PUMP, P-1, TACO #0034e ECM HIGH EFFICIENCY VARIABLE SPEED SERVES HW PIPING LOOP FOR ZONE#1(CLASSROOM #001& TOILET) TO REMAIN. (V.I.F.)
2. ZONE #2: EXISTING PUMP , P-2,TACO #0034e ECM HIGH EFFICIENCY VARIABLE SPEED SERVES HW PIPING LOOP FOR ZONE #2 (CLASSROOM #002. #002A AND 002B) TO REMAIN (V.I.F)
3. ZONE #3: EXISTING PUMP, P-3,TACO #0034e ECM HIGH EFFICIENCY VARIABLE SPEED SERVES HW PIPING LOOP FOR ZONE #3 (CLASSROOM #3, #4 AND TOILETS) TO REMAIN (V.I.F)
4. ZONE #4: EXISITING PUMP, P-4, TACO #0026e ECM HIGH EFFICIENCY VARIABLE SPEED SERVES HW PIPING LOOP FOR ZONE #4 (OFFICES #003 THRU #007) TO REMAIN (V.I.F.) (NOT PART OF THE CONTRACT)



SCHEMATIC #1

NOT TO SCALE

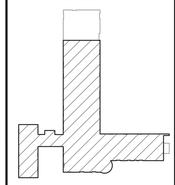
BOILER ROOM -DEMOLITION FLOOR PLAN

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

MECHANICAL DEMOLITION 1ST FLOOR PLAN

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

REV.	DATE	ITEM



KEY PLAN

NOT TO SCALE

PROJECT

GREENBURGH CENTRAL SCHOOL DISTRICT
PHASE I - DISTRICT WIDE CAPITAL IMPROVEMENTS
EARLY CHILDHOOD PROGRAM
HARTSDALE, NEW YORK - WESTCHESTER COUNTY

DWG TITLE

MECHANICAL DEMOLITION 1ST FLOOR PLAN

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SED No.	66-04-07-06-0-011-008
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DWG TITLE	MECHANICAL DEMOLITION 1ST FLOOR PLAN
SCALE:	AS NOTED
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BID PICK-UP:	MAY 27, 2022
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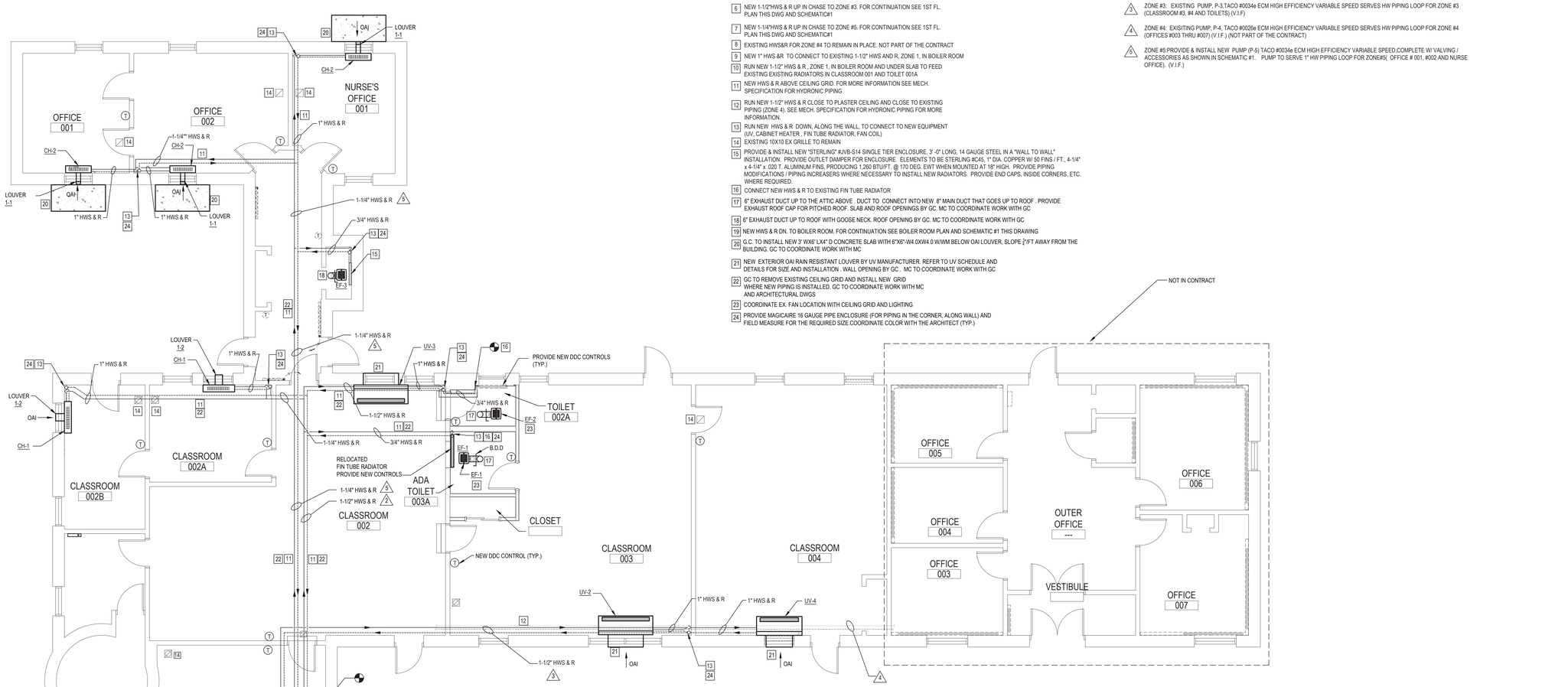
M1.01E OF - - -

NOTES:

1. M.C. SHALL EXTEND EXISTING 2" HWS HEADER PIPING (V.I.F. SIZE) AS SHOWN TO ACCOMMODATE ADDITIONAL1-1/4" SUPPLY LINE
2. M.C. SHALL EXTEND EXISTING HWR HEADER PIPING (V.I.F. SIZE) AS SHOWN TO ACCOMMODATE ADDITIONAL 1-1/4" RETURN LINE
3. EXISTING HW SUPPLY HEADER PIPING (V.I.F. SIZE)
4. NEW 1"HWS & R UP IN CHASE TO 1ST FL.TO CONNECT TO NEW UV-1. FOR CONTINUATION SEE 1ST FL. PLAN THIS DWG. AND SCHEMATIC #1/ZONE#1
5. NEW 1-1/2"HWS & R UP IN CHASE TO ZONE #2. FOR CONTINUATION SEE 1ST FL. PLAN THIS DWG AND SCHEMATIC#1
6. NEW 1-1/2"HWS & R UP IN CHASE TO ZONE #3. FOR CONTINUATION SEE 1ST FL. PLAN THIS DWG AND SCHEMATIC#1
7. NEW 1-1/4"HWS & R UP IN CHASE TO ZONE #5. FOR CONTINUATION SEE 1ST FL. PLAN THIS DWG AND SCHEMATIC#1
8. EXISTING HWS&R FOR ZONE #4 TO REMAIN IN PLACE. NOT PART OF THE CONTRACT
9. NEW 1" HWS &R TO CONNECT TO EXISTING 1-1/2" HWS AND R, ZONE 1, IN BOILER ROOM
10. RUN NEW 1-1/2" HWS & R , ZONE 1, IN BOILER ROOM AND UNDER SLAB TO FEED EXISTING EXISTING RADIATORS IN CLASSROOM 001 AND TOILET 001A
11. NEW HWS & R ABOVE CEILING GRID. FOR MORE INFORMATION SEE MECH. SPECIFICATION FOR HYDRONIC PIPING
12. RUN NEW 1-1/2" HWS & R CLOSE TO PLASTER CEILING AND CLOSE TO EXISTING PIPING (ZONE 4). SEE MECH. SPECIFICATION FOR HYDRONIC PIPING FOR MORE INFORMATION.
13. RUN NEW HWS & R DOWN, ALONG THE WALL, TO CONNECT TO NEW EQUIPMENT (UV, CABINET HEATER , FIN TUBE RADIATOR, FAN COIL)
14. EXISTING 10X10 EX GRILLE TO REMAIN
15. PROVIDE & INSTALL NEW "STERLING" #JVB-S14 SINGLE TIER ENCLOSURE, 3' -0" LONG, 14 GAUGE STEEL IN A "WALL TO WALL" INSTALLATION. PROVIDE OUTLET DAMPER FOR ENCLOSURE. ELEMENTS TO BE STERLING #C45, 1" DIA. COPPER W/ 50 FINS / FT., 4-1/4" x 4-1/4" x .020 T. ALUMINUM FINS, PRODUCING 1,260 BTU/FT. @ 170 DEG. EWT WHEN MOUNTED AT 18" HIGH. PROVIDE PIPING MODIFICATIONS / PIPING INCREASERS WHERE NECESSARY TO INSTALL NEW RADIATORS. PROVIDE END CAPS, INSIDE CORNERS, ETC. WHERE REQUIRED.
16. CONNECT NEW HWS & R TO EXISTING FIN TUBE RADIATOR
17. 6" EXHAUST DUCT UP TO THE ATTIC ABOVE . DUCT TO CONNECT INTO NEW 8" MAIN DUCT THAT GOES UP TO ROOF . PROVIDE EXHAUST ROOF CAP FOR PITCHED ROOF. SLAB AND ROOF OPENINGS BY GC. MC TO COORDINATE WORK WITH GC
18. 6" EXHAUST DUCT UP TO ROOF WITH GOOSE NECK. ROOF OPENING BY GC. MC TO COORDINATE WORK WITH GC
19. NEW HWS & R DN. TO BOILER ROOM. FOR CONTINUATION SEE BOILER ROOM PLAN AND SCHEMATIC #1 THIS DRAWING
20. G.C. TO INSTALL NEW 3' WXF L3/4" D CONCRETE SLAB WITH 6"X6"-W4.0XW4.0 W/WM BELOW OAI LOUVER, SLOPE 2"/FT AWAY FROM THE BUILDING. GC TO COORDINATE WORK WITH MC
21. NEW EXTERIOR OAI RAIN RESISTANT LOUVER BY UV MANUFACTURER. REFER TO UV SCHEDULE AND DETAILS FOR SIZE AND INSTALLATION . WALL OPENING BY GC . MC TO COORDINATE WORK WITH GC
22. GC TO REMOVE EXISTING CEILING GRID AND INSTALL NEW GRID WHERE NEW PIPING IS INSTALLED. GC TO COORDINATE WORK WITH MC AND ARCHITECTURAL DWGS
23. COORDINATE EX. FAN LOCATION WITH CEILING GRID AND LIGHTING
24. PROVIDE MAGICAIRE 16 GAUGE PIPE ENCLOSURE (FOR PIPING IN THE CORNER, ALONG WALL) AND FIELD MEASURE FOR THE REQUIRED SIZE.COORDINATE COLOR WITH THE ARCHITECT (TYP.)

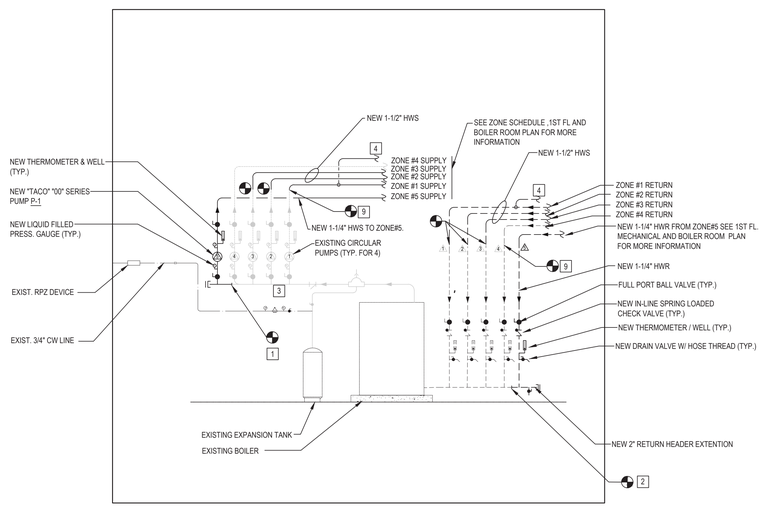
ZONES AND NEW PUMP P-5 SCHEDULE

1. ZONE #1: EXISTING PUMP, P-1, TACO #0034e ECM HIGH EFFICIENCY VARIABLE SPEED SERVES HW PIPING LOOP FOR ZONE#1(CLASSROOM #001& TOILET). (V.I.F.)
2. ZONE #2: EXISTING PUMP , P-2,TACO #0034e ECM HIGH EFFICIENCY VARIABLE SPEED SERVES HW PIPING LOOP FOR ZONE #2 (CLASSROOM #002. #002A AND 002B) (V.I.F)
3. ZONE #3: EXISTING PUMP, P-3,TACO #0034e ECM HIGH EFFICIENCY VARIABLE SPEED SERVES HW PIPING LOOP FOR ZONE #3 (CLASSROOM #3, #4 AND TOILETS) (V.I.F)
4. ZONE #4: EXISTING PUMP, P-4, TACO #0026e ECM HIGH EFFICIENCY VARIABLE SPEED SERVES HW PIPING LOOP FOR ZONE #4 (OFFICES #003 THRU #007) (V.I.F.) (NOT PART OF THE CONTRACT)
5. ZONE #5:PROVIDE & INSTALL NEW PUMP (P-5) TACO #0034e ECM HIGH EFFICIENCY VARIABLE SPEED,COMPLETE W/ VALVING / ACCESSORIES AS SHOWN IN SCHEMATIC #1. PUMP TO SERVE 1" HW PIPING LOOP FOR ZONE#5(OFFICE # 001, #002 AND NURSE OFFICE). (V.I.F.)



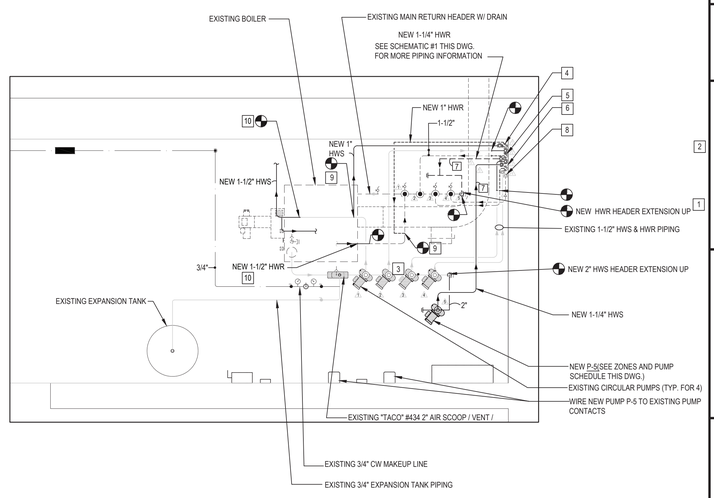
MECHANICAL 1ST FLOOR PLAN

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



SCHEMATIC #1

NOT TO SCALE



BOILER ROOM NEW PLAN

NOTE:

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

REV.	DATE	ITEM

NOTICE

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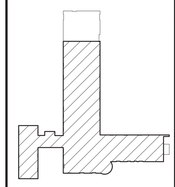

KEY PLAN

NOT TO SCALE

PROJECT

GREENBURGH CENTRAL SCHOOL DISTRICT
PHASE I - DISTRICT WIDE CAPITAL IMPROVEMENTS
EARLY CHILDHOOD PROGRAM
HARTSDALE, NEW YORK - WESTCHESTER COUNTY

DWG TITLE

MECHANICAL 1ST FLOOR AND BOILER ROOM NEW PLAN

DRAWING BY: DS

CHECK BY: DS

BBS
ARCHITECTS
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SED No. 66-04-07-06-0-011-008

DISTRICT GREENBURGH CSD

PROJECT PH. I - DW CAP. IMPROVEMENTS EARLY CHILDHOOD PROGRAM

DWG TITLE MECHANICAL 1ST FLOOR AND BOILER ROOM PLAN

SCALE: AS NOTED

DATE: MAY 2022

BID PICK-UP: MAY 27, 2022

FILE No: 21-292

M1.02E OF

UNIT VENTILATOR SCHEDULE
(MAGIC AIR AS STANDARD)

Manufactuer	MagicAire	MagicAire
Performance Details	MAUVF3	MAUVF2
Arrangement	Vertical Floor Mounted	Vertical Floor Mounted
Base Unit Size	MAUV-3	MAUV-2
Tag	UV-1, UV-2 & UV-3	UV-4
Quantity	3	1
Altitude	0	0
Configuration	4 Pipe	4 Pipe
Nominal Airflow (CFM)	1000	750
OA (CFM)	UV-3 = 280, UV-1 & 2 = 315	UV-4=250
External Static Pressure ESP (IWG)	0.1	0.1
Heating Coil	2 Row Hot Water Coil - Left Hand	2 Row Hot Water Coil - Left Hand
Rows	2	2
EAT Dry Bulb (F)	47	47
LAT Dry Bulb (F)	100.93	101.16
Total Capacity (BTU/hr)	60659	46227
EWT (F)	180	180
LWT (F)	148.86	152.88
GPM	4	3.5
WPD (ft w.g.)	1.516	0.963
Heating Fluid	Water	Water
Electrical Data	ECM	ECM
Voltage 1 (V1)	120	120
Phase	1	1
Frequency	60	60
Motor HP	1/3	1/3
Motor FLA (at V1)	4	3.7
Unit MCA (at V1)	5	4.6
Unit MOPD (at V1)	15	15
LOUVER SIZE	48"x10"	34"x10"

NOTES:
1. All temperature controls to be field supplied and installed by ATC contractor.
2. Architect to select unit color from vendor color chart.
3. MC to coordinate pipe hand connections with vendor.
4. Provide MERV 13 filters

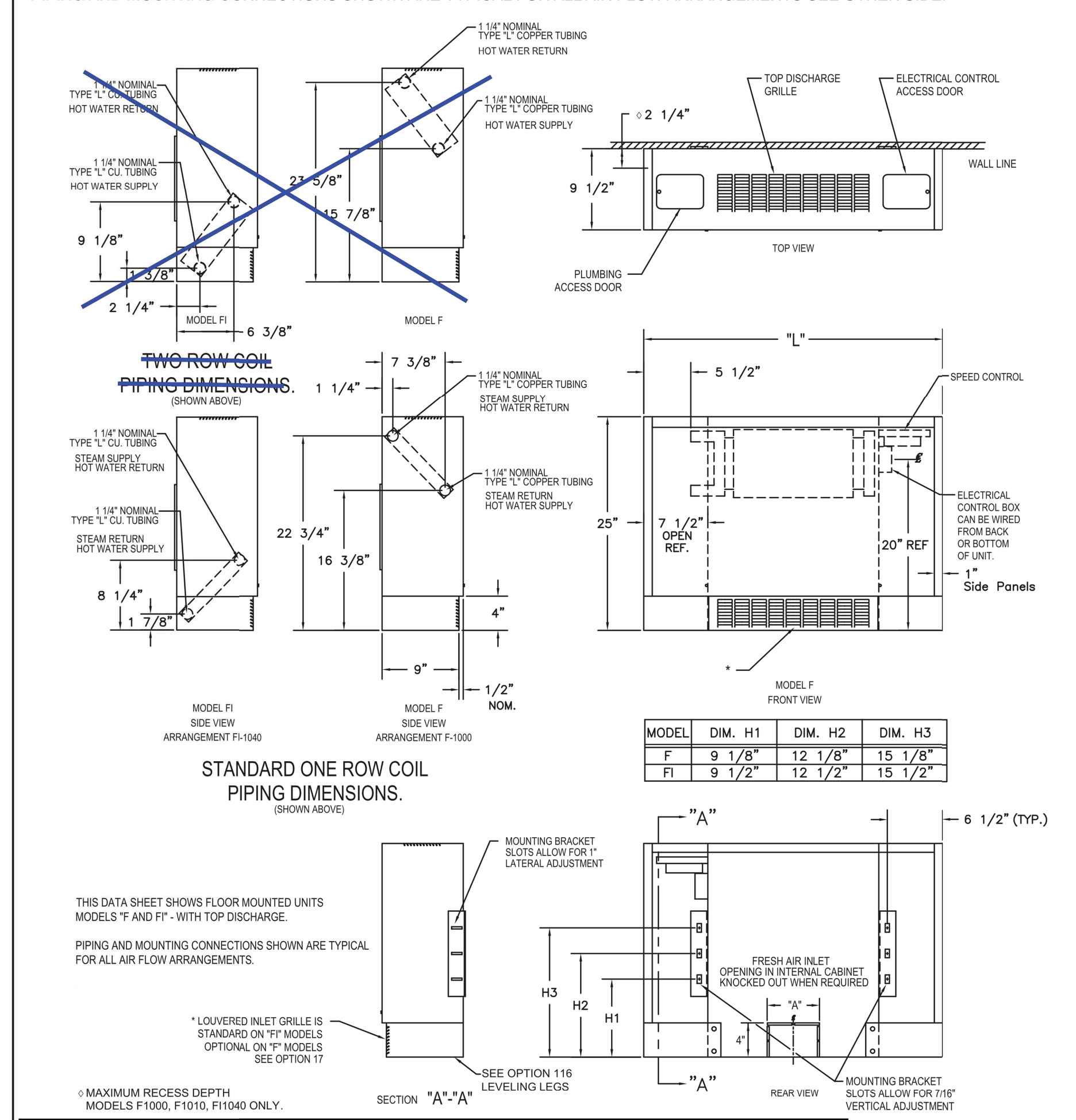
5. REFER TO ATC SPECIFICATION SECTION 15903 FOR FURTHER DETAILS REGARDING UNIT TEMPERATURE CONTROLS. REFER TO DWGS. #M6.02 FOR PIPING / INSTALLATION DETAILS. PROVIDE NEW CLEAR ANODIZED LOUVER.
6. CONTROLS UBCONTRACTOR , UNDER CONTRACT TO MECHANICAL CONTRACTOR
7. PROVIDE NEW CLEAR ANODIZED OAI LOUVER.

CABINET UNIT HEATER SCHEDULE
(STERLING AS STANDARD)

CABINET UNIT HEATER SUBMITTAL DATA
CBS-F-15

Floor Mounted Units - Models F and FI - With Top Discharge

PIPING AND MOUNTING CONNECTIONS SHOWN ARE TYPICAL FOR ALL AIR FLOW ARRANGEMENTS SEE OTHER SIDE.



MODEL	DIM. H1	DIM. H2	DIM. H3
F	9 1/8"	12 1/8"	15 1/8"
FI	9 1/2"	12 1/2"	15 1/2"

CAT00200A

TAG:
CH-1, Classroom 2A, 2B (Size 03)
CH-2, Space 1, 2 & Nurse (Size 02)

MADE IN THE USA

STERLING® COMMERCIAL HYDRONIC PRODUCTS
260 NORTH ELM STREET / WESTFIELD, MA 01085
TEL: (413) 568-9571 FAX: (413) 562-8437
www.sterlingheat.com
A MESTEK COMPANY

CABINET UNIT HEATERS RATINGS AND SPECIFICATIONS

TABLE 1

ENTERING WATER - 200°F
ENTERING AIR - 60°F

UNIT SIZE		02	03	04	06	08	10	12	14
Heating Cap. - Hot Water 20 WTD	MBH	16.4	22.8	29.8	48.0	54.5	62.0	75.6	78.5
	GPM	1.64	2.28	2.98	4.80	5.46	6.20	7.56	7.85
~~High Cap. - Coil 2 Row Heating Cap. Hot Water 20 WTD~~	~~MBH~~	~~23.0~~	~~35.4~~	~~46.3~~	~~69.0~~	~~87.6~~	~~101.8~~	~~119.8~~	~~128.6~~
	~~GPM~~	~~2.30~~	~~3.54~~	~~4.63~~	~~6.90~~	~~8.76~~	~~10.18~~	~~11.98~~	~~12.86~~
Heating Cap. - Steam 2 PSIG Standard Coil	MBH	22.6	31.4	41.0	66.1	75.1	85.4	104.1	108.2
	EDR	94	131	171	276	313	356	434	451
	Cond. LB/HR	23.4	32.5	42.4	68.4	77.7	88.4	107.7	112
Coil:	Number Fins Per Inch	12	12	12	12	12	12	12	12
	Face Area-Ft.^{2}	.97	1.5	1.8	2.6	2.8	3.1	3.6	4.4
	Coil Connections	1-1/4CU	1-1/4CU	1-1/4CU	1-1/4CU	1-1/4CU	1-1/4CU	1-1/4CU	1-1/4CU
Blowers:	Number	1	1	2	2	3	3	4	4
	Diameter/Width (In)	5-3/4 x 7	5-3/4 x 7	5-3/4 x 7	5-3/4 x 7	5-3/4 x 7	5-3/4 x 7	5-3/4 x 7	5-3/4 x 7
Standard PSC Motor:	HP	1/15	1/15	1/10	1/10	1 @ 1/10 1 @ 1/15	1 @ 1/10 1 @ 1/15	1/10	1/10
	RPM: High	1050	1050	1050	1050	1050	1050	1050	1050
	Low	875	875	875	875	875	875	875	875
	Number	1	1	1	1	2	2	2	2
	Volts/Phase/Hertz	115/1/60	115/1/60	115/1/60	115/1/60	115/1/60	115/1/60	115/1/60	115/1/60
	Amperes	0.8	0.8	1.4	1.4	2.2	2.2	2.8	2.8
Fan Speed Control	Standard Mtr	VAR.	VAR.	VAR.	VAR.	VAR.	VAR.	VAR.	VAR.
	CFM: High	230	335	430	630	860	1060	1230	1410
	Low	185	270	345	505	685	845	985	1130
Optional ECM Motor:	HP	1/15	1/15	1/15	1/15	1/10	1/10	1/4	1/4
	Number	1	1	1	1	2	2	2	2
	Volts/Phase/Hertz	120/1/60	120/1/60	120/1/60	120/1/60	120/1/60	120/1/60	120/1/60	120/1/60
	Amperes	0.45	0.45	0.65	0.85	1.5	1.95	2.8	2.8
Fan Speed Control	ECM Mtr	3 - SPEED	3 - SPEED	3 - SPEED	3 - SPEED	3 - SPEED	3 - SPEED	3 - SPEED	3 - SPEED
	CFM: High	230	335	430	630	860	1060	1230	1410
	Med	160	240	375	440	590	740	850	980
	Low	120	150	280	320	450	560	640	730
Filter:	No.	1	1	1	1	1	1	1	1
	Type	PERM.	PERM.	PERM.	PERM.	PERM.	PERM.	PERM.	PERM.
	Length (In)	19-3/4	27-3/4	31-3/4	43-3/4	45-3/4	50-3/4	57-3/4	69-3/4
	Width (In)	8-11/16	8-11/16	8-11/16	8-11/16	8-11/16	8-11/16	8-11/16	8-11/16
	Thickness (In)	1/2	1/2	1/2	1/2	1/2	1/2	1/2	1/2
dB. Level 18" From Unit		50	52	53	54	55	55	56	56
	Length (In)	35	43	47	59	61	66	73	85
	Height (In)	25	25	25	25	25	25	25	25
	Depth (In)	9-1/2	9-1/2	9-1/2	9-1/2	9-1/2	9-1/2	9-1/2	9-1/2

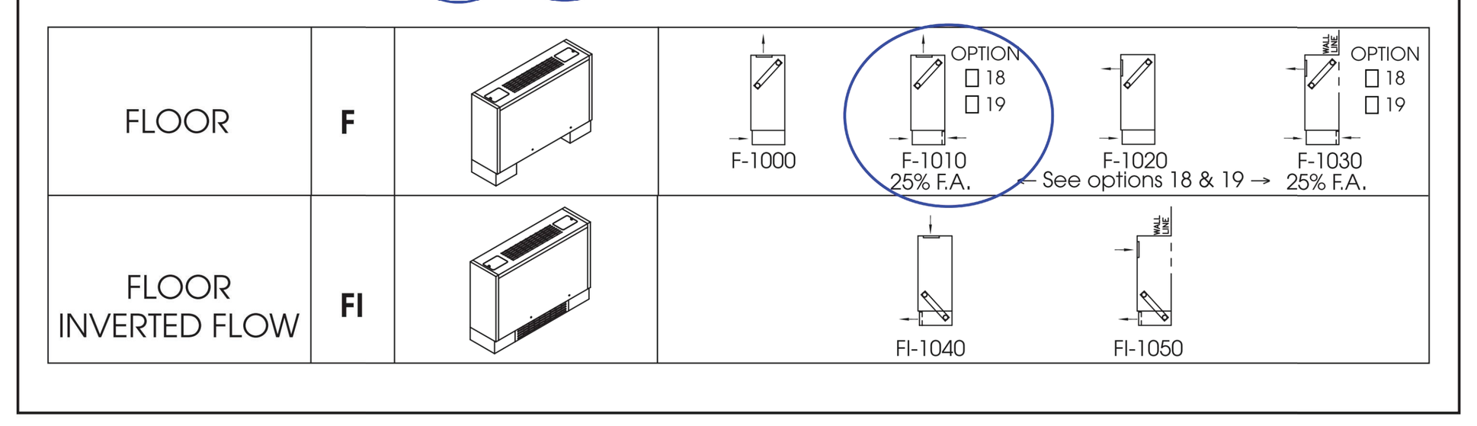
FILTER IDENTIFICATION AND DATA

SIZE	PART NO.	FILTER SIZE
02	PC1297-2	15/32" x 8 11/16" x 19 3/4"
03	PC1297-3	15/32" x 8 11/16" x 27 3/4"
04	PC1297-4	15/32" x 8 11/16" x 31 3/4"
06	PC1297-6	15/32" x 8 11/16" x 43 3/4"
08	PC1297-8	15/32" x 8 11/16" x 45 3/4"
10	PC1297-10	15/32" x 8 11/16" x 50 3/4"
12	PC1297-12	15/32" x 8 11/16" x 57 3/4"
14	PC1297-14	15/32" x 8 11/16" x 69 3/4"

SIZE	DIM "A"	DIM "L"
02	6 1/8"	35"
03	6 1/8"	43"
04	6 1/8"	47"
06	10 5/8"	59"
08	10 5/8"	61"
10	10 5/8"	66"
12	16 5/8"	73"
14	16 5/8"	85"

CABINET UNIT HEATERS
SHIPPING WEIGHT
(LBS)

STYLE	SIZE 02	03	04	06	08	10	12	14
F-FI	92	109	122	148	166	176	196	221



CABINET UNIT HEATERS HEATING CAPACITIES

TABLE II — STANDARD COIL

ENTERING WATER - 200°F
ENTERING AIR - 60°F

UNIT SIZE	GPM	WATER PD/FT	HIGH FAN SPEED CFM	MBH	WTD	FAT	LOW FAN SPEED CFM	MBH	WTD	FAT
02	.84	.06	230	14.3	34.0	117	185	12.9	30.6	124
	1.0	.06		15.1	30.2	120		13.8	27.6	129
	1.5	.15		16.2	21.6	125		15.0	20.0	135
	2.0	.24		17.4	17.4	130		16.1	16.1	140
	2.5	.36		18.8	15.0	135		17.3	13.8	146
03	1.0	.07	335	21.3	42.6	118	270	19.1	38.2	125
	1.5	.16		22.0	26.6	120		19.8	26.4	128
	2.0	.26		22.7	22.7	122		20.1	20.1	129
	2.5	.39		23.5	18.8	125		20.7	16.6	131
	3.0	.55		23.8	15.8	126		21.1	14.1	132
	1.0	.07		21.8	43.6	106		19.0	38.0	111

LOUVER SCHEDULE
(GREENHECK AS STANDARD)

LOUVERS 1-1 AND 1-2

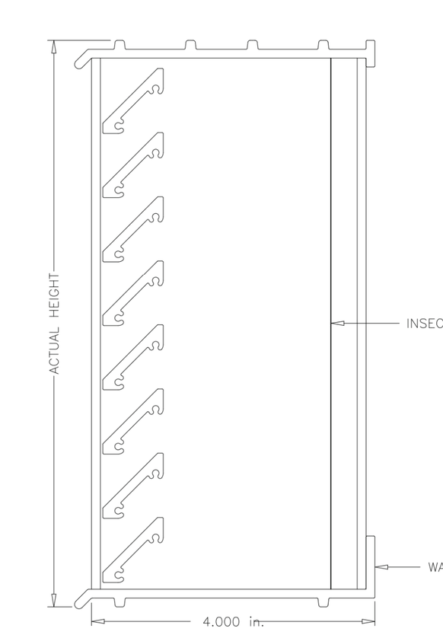
Model: BVE

BVE 4 in. Extruded Aluminum

APPLICATION & DESIGN
BVE is 4 in. deep with 0.125 in (3.175 mm) mortar ribs top and bottom and is used primarily for new construction. 45 degree blades overlap for optimum visual screening. Maximum free area is 39 percent. Brick vents provide a permanent means of ventilation for crawl spaces, hung ceilings, incinerator rooms, chimney flues, foundations, pipe spaces and corridors. Extruded construction provides a quality finished appearance. A high water stop at the rear and deep overlapping blades with storm stops provide maximum resistance to rain and weather.

PRODUCT DETAILS
Frame: 4 in. x 0.125 in. Frame Thickness
Blades: 0.125 in. Fixed Blade Thickness

OPTIONS & ACCESSORIES
Finish: Anodize
Color: Clear 204 R1
Insect Screen: Yes
Damper: None
Duct Required: No
Warranty: 1 year Standard Product Warranty
1 year Standard Finish Warranty



SUMMARY

ID #	TAG	QTY.	W (in.)	H (in.)
1-1	30CFM	1	8.125	4.75
1-2	75CFM	1	12	7.75

Width is actual. Actual height is 0.25 in. (6.35 mm) higher than entered height due to mortar ribs.

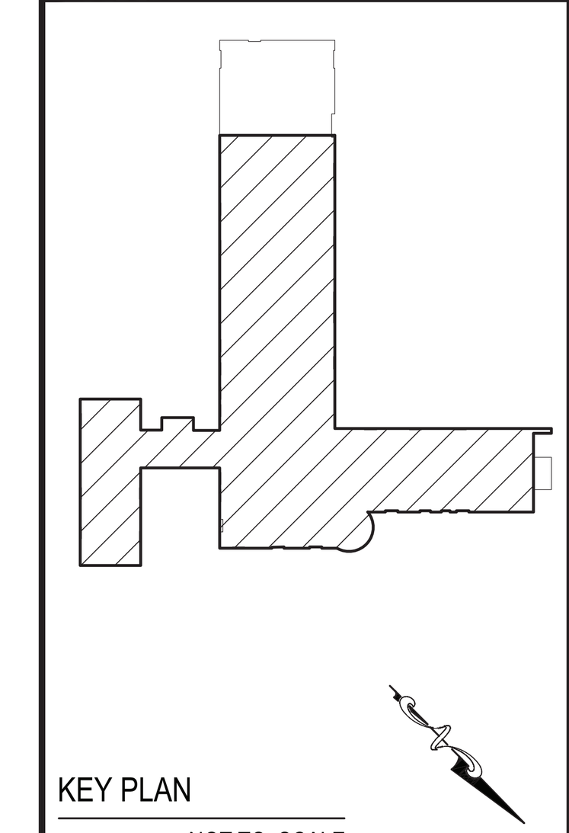
Larger openings may require field assembly of multiple louver panels to make up the overall opening size. Individual louver panels are designed to withstand a 25 PSF wind-load (please consult Greenheck if the louvers must withstand higher wind-loads). Design, materials and installation of structural reinforcement required to adequately support large sections or multiple section assemblies within a large opening are not provided by Greenheck. Unless specifically indicated, the following are NOT included in the quote provided: structural steel, installation hardware (anchors, angle clips, continuous angles, shims, fasteners, inserts, backer rod and sealant), field measuring and/or installation, miscellaneous flashing, trim or enclosures, blank off panels, mullion covers or mullion hardware, hinged frames or removable subframes, custom bird/insect screen, 3-coat, metallic and/or exotic paint finishes, bituminous paints for unlike metals, any applicable taxes, stamped and sealed structural calculations or seismic calculations.

EXHAUST FAN SCHEDULE
GREENHECK AS STD.

TAG	SERVICE	MODEL	CFM	ESP	FAN RPM	INPUT (W)	SONES	VOLT/PH	WEIGHT (LBS)	OPTIONS AND ACCESSORIES	NOTES
EF-1	ADA TOILET 003A	SP-B110	70	0.75	888	80.0	3.0	115/1	12.0	1,2,3,4,5	
EF-2	TOILET 002A	SP-B110	70	0.75	888	80.0	3.0	115/1	12.0	1,2,3,4,5	
EF-3	TOILET CORRIDOR	SP-B110	70	0.5	777	80.0	2.0	115/1	12.0	1,2,3,4,5	
EF-4	TOILET 001A	SP-B110	70	0.5	777	80.0	2.0	115/1	12.0	1,2,3,4,5	

OPTIONS / ACCESSORIES:
1. SOLID STATE SPEED CONTROL
2. UL-507 LISTING
3. ISOLATION KIT
4. FRANKLIN CONTROLS MODEL BAS-1P STARTER WITH HOA
5. MOTOR WITH THERMAL OVERLOAD

REV.	DATE	ITEM



KEY PLAN
NOT TO SCALE

PROJECT: GREENBURGH CENTRAL SCHOOL DISTRICT
PHASE I - DISTRICT WIDE CAPITAL IMPROVEMENTS
EARLY CHILDHOOD PROGRAM
HARTSDALE, NEW YORK - WESTCHESTER COUNTY

DWG TITLE: MECHANICAL SCHEDULES

DRAWING BY: DS
CHECK BY: DS

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ARCHITECTS
LANDSCAPE ARCHITECTS
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SED No. 66-04-07-06-0-011-008
DISTRICT: GREENBURGH CSD
PROJECT: PH. I - DW CAP. IMPROVEMENTS EARLY CHILDHOOD PROGRAM
DWG TITLE: MECHANICAL SCHEDULES
SCALE: AS NOTED
DATE: MAY 2022
BID PICK-UP: MAY 27, 2022
FILE No: 21-292

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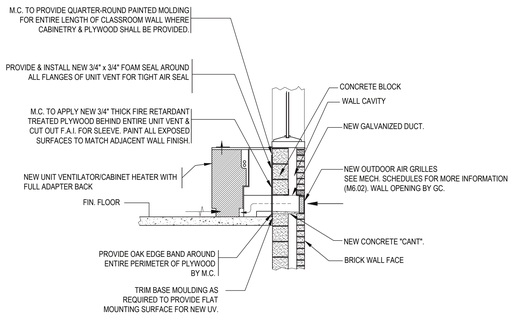
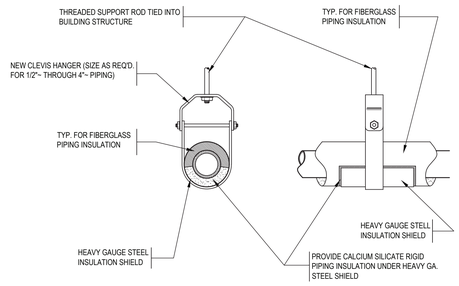


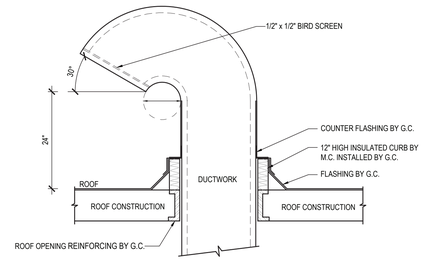
UNIT VENTILATOR/CABINET HEATER FRESH AIR INTAKE- MASONRY WALL INSTALLATION DETAIL

SCALE: NOT TO SCALE



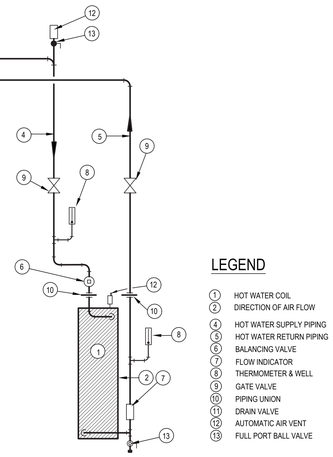
CLEVIS HANGER PIPING SUPPORTS DETAIL

SCALE: NOT TO SCALE



FRESH AIR INTAKE GOOSENECK DETAIL

SCALE: NOT TO SCALE



LEGEND

1. HOT WATER COIL
2. DIRECTION OF AIR FLOW
4. HOT WATER SUPPLY PIPING
5. HOT WATER RETURN PIPING
6. BALANCING VALVE
7. FLOW INDICATOR
8. THERMOMETER & WELL
9. GATE VALVE
10. PIPING UNION
11. DRAIN VALVE
12. AUTOMATIC AIR VENT
13. FULL PORT BALL VALVE

FACE & BYPASS UNIT VENTILATOR HOT WATER COIL PIPING DETAIL

SCALE: NOT TO SCALE

REV.	DATE	ITEM

NOTICE

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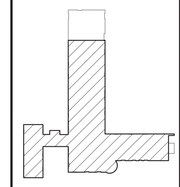

KEY PLAN

NOT TO SCALE

PROJECT

GREENBURGH CENTRAL SCHOOL DISTRICT
PHASE I - DISTRICT WIDE CAPITAL IMPROVEMENTS
EARLY CHILDHOOD PROGRAM
HARTSDALE, NEW YORK - WESTCHESTER COUNTY

DWG TITLE

MECHANICAL DETAILS

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DISTRICT GREENBURGH CSD

PROJECT PH. I - DW CAP. IMPROVEMENTS EARLY CHILDHOOD PROGRAM

DWG TITLE MECHANICAL DETAILS

SCALE: AS NOTED

DATE: MAY 2022

BID PICK-UP: MAY 27, 2022

FILE No: 21-292

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