

**POINTERS RUN ELEMENTARY SCHOOL
SYSTEMIC RENOVATION**

ADDENDUM NO. 1

DATE: December 17, 2018

ARCHITECT: Smolen, Emr, Ilkovitch Architects, Inc.
1355 Piccard Drive, Suite 200
Rockville, Maryland 20850
Phone: (301) 770-0177
Fax: (301) 330-3224

OWNER: Howard County Public School System

PROJECT: Pointers Run Elementary School Systemic Renovation
Clarksville, Maryland
Architect Project No. 17015

TO: All Prospective Bidders

The following changes are made a part of the Drawings and Specifications for the subject project, dated October 10, 2018. Receipt of this Addendum is to be acknowledged, in the space provided in the Bid Form. Failure to do so may subject the Bid to be considered as non-responsive.

A. REQUESTS FOR INFORMATION

1. Panel schedules indicate what's in "INBOLD" text is new work. Is this new work due to the demolition and they become spares? OR New breakers are to be installed for new circuits and spares.

RESPONSE: New breakers are to be installed for new circuits and spares.

2. Specification 019113 General Commission Requirements - No specification, please provide.

RESPONSE: Spec section incorporated via Addendum.

3. Specification 010200-5,41, states extended work hours, multiple shifts and weekend in order to meet the schedule. What is the required number of days per week and hours required to meet the schedule? Will this be a required 6-day work week? Please advise to add premium wage rates.

RESPONSE: The intent is to work double shifts Monday-Friday and a single shift on Saturday. Contractors shall plan to man the project accordingly to complete the work within these constraints. In the event additional hours/shifts are needed this will be coordinated with the Owner and Construction Manager.

4. Specification 010200-10,19 and 010200-19, 15 state 16A will be responsible to remove, protect and reinstall computer and other technology equipment. Should this not be in the 1A package as they already will provide a subcontractor who will package and protect furniture for storage? Just seems like too many trades doing the same work and wind up missing owners' property, because a computer or tech equipment got stored by the wrong contract package.

RESPONSE: Computer and other technology equipment move has been incorporated into the scope of the 1A package. See revisions to contract packages specifications for details on changes to moving scope.

5. Specification 011000-2 of 4, 1.1.1.D3 references specification 009000 for further details on job site availability and double shift requirements - Provide specification.

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RESPONSE: Spec language revised via addendum to reference to section 010200.

6. Specification 010200-07 warranties not to begin until project completion. Manufacturers will not provide a full warranty, after owner has been using the equipment/materials for 27 months, after all phases are complete. Manufacturer will only warranty under phase completion (each year) and not substantial completion of the entire project (2-1/4 years + 2 years). Please advise.

RESPONSE: Delete Specification Section 01 02 00.2.A.7 and replace with the following "Contractor shall maintain all material, equipment, etc. installed until Substantial Completion of each phase. Substantial Completion shall be per phase. Warranties for all work will not begin until Substantial Completion of the phase. Liquidated Damages may be applied for phase completion in addition to project completion."

7. All four Systemic Renovations are due January 9, 2019. A lot of preparation goes into one bid proposal and doing all four at the same time / date will result in bidders bidding one or maybe two projects. Can the bids be turned in "one a day" for each project?

RESPONSE: There will be no change to the bid opening dates/times for the Pointers Run Elementary School and Mount View Middle School Systemic Renovations. See addenda for these Burley Manor Middle School and Rockburn Elementary School systemic projects as to changes in their bid dates.

8. All four Systemic Renovations are to be completed during the summer in phases for three years. Double shifts and weekends will be required during the summer per specification to complete each phase of a project. Can the schedule be changed to work second shift in an occupied school and summer to complete the work in "one year". Double shifts and weekends will require a large amount of manpower, especially if awarded multiple projects. After the summer schedule is done, poses a problem for the contractors to place all the men on other projects. The second shift in an occupied school and summer will reduce wage labor cost, as OT will not be necessary.

RESPONSE: The phases are to remain as they are designed. The work is not situated to be a phased occupied renovation and we cannot move students around to accomplish work that during the school year.

9. Will the bid date for either of these projects move? There are now 4 HCPS and 1 MCPS schools bidding on January 9. It will be difficult to get even 2 of these prepared in time.

RESPONSE: See response to RFI 7

10. The second page of the Affidavit to be turned in with our bid includes the wrong date at, "Subscribed and Sworn to before me on this..". Please confirm if we will receive a new affidavit to be signed or if we should use the existing affidavit.

RESPONSE: Revised Affidavit attached at the end of this addendum

11. Please consider waiving the AISC steel requirement for this project.

RESPONSE: The specifications will be revised to add an alternative requirement for non-AISC erectors. An alternative for non-AISC fabricators is already provided in the specifications.

12. Please confirm the 1A General Contractor is to move all furniture, including books, prior to each phase and at the completion of each phase. If so, please also confirm that all items can be stored within the school.

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RESPONSE: Confirmed.

13. Please provide a schedule for the floor finishes.

RESPONSE: No new floor finishes required by new work. Contractor is to protect existing flooring during construction. Specifications on all flooring used within school provided for patching purposes only.

14. Per our discussion , there are 4 Howard County schools bidding on 1-9-19. From a mechanical standpoint , it is difficult enough to bid one project a day as we have multiple subs to deal with and need to name all of our minority contractors for the bid. I believe it would be in the owners best interest to stager each bid by a couple of days in order to get the most competitive and accurate bids. Please advise if this is possible.

RESPONSE: See response to RFI 7

15. The specification section regarding air-cooled refrigerant condensing units (23 63 13) references a minimum of one digital scroll compressor per condensing unit 25-tons and larger. JCI is not able to provide digital scroll compressors as an option. In lieu of digital scroll compressors, JCI would provide APR control on all condensing units. This would achieve the necessary turndown for the VAV systems and allow the units to maintain a consistent discharge air temperature. If APR control is not an acceptable alternative, Johnson Controls will be unable to provide condensing units over 25-tons and therefore will not be able to submit a competitive package bid for any equipment.

RESPONSE: The contract specifications will be modified to allow the use of APR controls for air-cooled condensing units with a nominal capacity of 10 tons or more.

16. Can York/JCI be added as an acceptable manufacturer for ductless split systems per specification 23 81 27?

RESPONSE: York/JCI is not an acceptable manufacturer for ductless split-system units.

17. Can York/JCI be added as an acceptable manufacturer for air coils per specification section 23 82 16?

RESPONSE: The contract specifications will be modified to include York/JCI as an acceptable manufacturer for air coils.

18. Can York/JCI be added as an acceptable manufacturer for air terminal units per specification 23 36 00?

RESPONSE: The contract specifications will be modified to include York/JCI as an acceptable manufacturer for air terminal units.

19. Can York/JCI be added as an acceptable manufacturer for fan coil units per specification 23 82 19?

RESPONSE: The contract specifications will be modified to include York/JCI as an acceptable manufacturer for fan-coil units.

20. Please confirm Siemens Building Technologies, Inc. is an acceptable ATC Manufacturer/Installer for both the MT. View MS and Pointers Run ES Projects.

RESPONSE: Contractors are to utilize one of the three controls vendors listed within the specifications.

21. Who holds the existing roof warranty?

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RESPONSE: Existing roof is not under warranty.

22. Is torch applied membrane acceptable for the roof?

RESPONSE: Torch applied membrane is not acceptable. Contractor to built-up roofing system matching existing conditions for all roof patching.

23. Please clarify if this project includes new doors/frames. A specification has been provided but none appear in the drawings.

RESPONSE: No new doors/frames are included within this project. No wood door or hollow metal specifications are included within the bid documents. Access Doors and Frames are included. These are for access to mechanical/electrical/plumbing items concealed within walls or above ceilings. Locations, counts and sizes are to be determined by the trade contractor installing the concealed equipment.

24. Please issue a demolition plan for the reflected ceiling plan in this project.

RESPONSE: Contractor is to demolish all ceilings except those noted as 'existing to remain' on new work ceiling plans.

B. CHANGES TO SPECIFICATIONS

- 03 00 00 – Form of Proposal
 - **REPLACE** Affidavit with Attached
- 01 02 00 – Contract Packages
 - **REPLACE** paragraph 2.A.7 with the following

2.A.7 **Contractor shall maintain all material, equipment, etc. installed until Substantial Completion of each phase. Substantial Completion shall be per phase. Warranties for all work will not begin until Substantial Completion of the phase. Liquidated Damages may be applied for phase completion in addition to project completion.**
 - **ADD** the following sentence at the end of paragraph 2.A.22

2.A.22 **...Any contractor requiring on site storage shall provide fencing and lock around any trailer or materials.**
 - **REPLACE** paragraph 2.A.41 with the following:

2.A.41 **Work Hours – Work hours will be coordinated with school functions and as agreed to by the Owner and Construction Manager. It is understood that this project will need to work extended hours, multiple shifts and weekend hours in order to meet the schedule at no additional cost to the owner. The intent is to work double shifts Monday-Friday and a single shift on Saturday. Contractors shall plan to man the project accordingly to complete the work within these constraints. In the event additional hours/shifts are needed this will be coordinated with the Owner and Construction Manager. No deviation from the work hour schedule may take place without the prior written approval of the Construction Manager. No deliveries shall be made 30 minutes prior to or after arrival or dismissal of students.**
 - **DELETE** paragraph 3.C.15.
 - **REPLACE** paragraph 3.A.19 with the following:

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3.A.19 **Contractor shall inventory, relocate, store and protect all existing furniture, books, materials, computers, other HCPSS sanctioned technology equipment, etc. located in areas of construction. Contractor shall clean, place and reconnect all stored items in finished areas at the conclusion of each phase. Contractor shall inspect and inventory all materials to be stored, with HCPSS coordination, prior to removal to determine quantity, functionality and existing condition. A written report must be provided to the Construction Manager and/or Owner. If the Contractor does not advise the Owner of the existing condition prior to disconnecting or moving and any stored material is not in a usable or like-new condition upon final placement and reconnection, then it will be presumed that the contractor damaged and shall replace in kind at no cost to the Owner. Any repairs to damages shall be at the expense of Contractor. Storage shall be on site in a secured located coordinated with the Construction Manager and the Owner. Any Contractor responsible for this work associated with the computers or other HCPSS sanctioned technology equipment shall present qualification information prior to performing any work."**

- 01 10 00 – Summary of Work
 - **REVISE** paragraph 1.1.1.D.3 as follows:
 - 3. Reference Specification Section **01 02 00** "Contract Packages" for further details on jobsite availability and double shift requirements
- 01 32 00 – Sequencing and Scheduling of Work
 - **REVISE** paragraph 1.03.A as follows:
 - A. A **construction** schedule which serves as a preliminary progress schedule is included in this section. It shows the major...
 - **REVISE** paragraph 1.07.A as follows:
 - A. **Construction** schedule which serves as a preliminary progress schedule is included in this section.
 - **REPLACE** schedule at end of section with attached:
- 01 91 13 – Commissioning Requirements
 - **ADD** section in its entirety with Attached
- 05 12 00 – Structural Steel Framing
 - **REVISE** paragraph 1.3.C as follows:
 - 1.3.C AISC certification for fabricator and erector **or required additional documentation for non-AISC certified fabricator and erector.**
 - **REVISE** paragraph 1.4.F
 - 1.4.F **1. Erectors who are not an AISC Certified Steel Erector (CSE) shall meet the following additional requirements:**
 - a. **Provide an erection procedure safety document with cover letter, signed and sealed by a professional engineer registered in the State of Maryland, that states the document has been reviewed and is in conformance with erection procedures required by AISC.**

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- 23 08 00 – HVAC Commissioning
 - **ADD** section in its entirety with Attached
- 23 3600 – Air Terminal Units
 - **ADD** 2.01.B.8:
“8. York; Johnson Controls.”
- 23 6313 – Air-Cooled Refrigerant Condensing Units
 - **REVISE** paragraph 2.21.E:
“E. Compressor: Accessible or fully hermetic design, with external or internal spring isolators and reversible oil pump. Compressor shall have mechanical unloading down to the percentage of full capacity, in a minimum number of steps for partial load operation, scheduled on the drawings.
 1. **Provide minimum one digital scroll compressor or compressor with hot gas bypass/APR valve control per condensing unit between 10 tons and larger in capacity.**
 2. **Provide dual independent refrigerant circuits for condensing units 20-tons or larger in capacity.”**
- 23 7200 – Dedicated Outdoor Air System Units
 - **REVISE** paragraph 2.21.A:
2.21.A. General: Units shall be modular double-wall construction of the types, module arrangement, and capacities shown and scheduled on the drawings. **All modular sections shall have tread plate floor for serviceability. Safety grates shall be installed in the supply and return openings.**
- 23 7322 – Air-Handling Units with Coils
 - **REVISE** paragraph 2.30.A:
2.30.A. General: Units shall be modular double-wall construction of the types, module arrangement, and capacities shown and scheduled on the drawings. **All modular sections shall have tread plate floor for serviceability. Safety grates shall be installed in the supply and return openings.**
- 23 8216 – Air Coils
 - **ADD** 2.1.A.9:
“9. York; Johnson Controls.”
- 23 8219 – Fan-Coil Units
 - **ADD** 2.01.A.4:
“4. York; Johnson Controls.”

C. CHANGES TO DRAWINGS

1. ARCHITECTURAL DRAWINGS

- Sheet A2.02 – PROPOSED FLOOR PLAN AREA B

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- **ADD** Wall tags, identifying solid gray hatched walls in commons as type D walls. See addendum drawing AD-A01.
- Sheet A2.03 – PROPOSED FLOOR PLAN AREA C
- **ADD** Wall tags, identifying solid gray hatched walls in commons as type D walls. See addendum drawings AD-A02 & AD-A03.

2. STRUCTURAL DRAWINGS

- None

3. MECHANICAL DRAWINGS

- None

4. PLUMBING DRAWINGS

- None

5. FIRE PROTECTION DRAWINGS

- None

6. ELECTRICAL DRAWINGS

- None

D. ATTACHMENTS

1. ADDENDUM DRAWINGS

- AD-A01
- AD-A02
- AD-A03

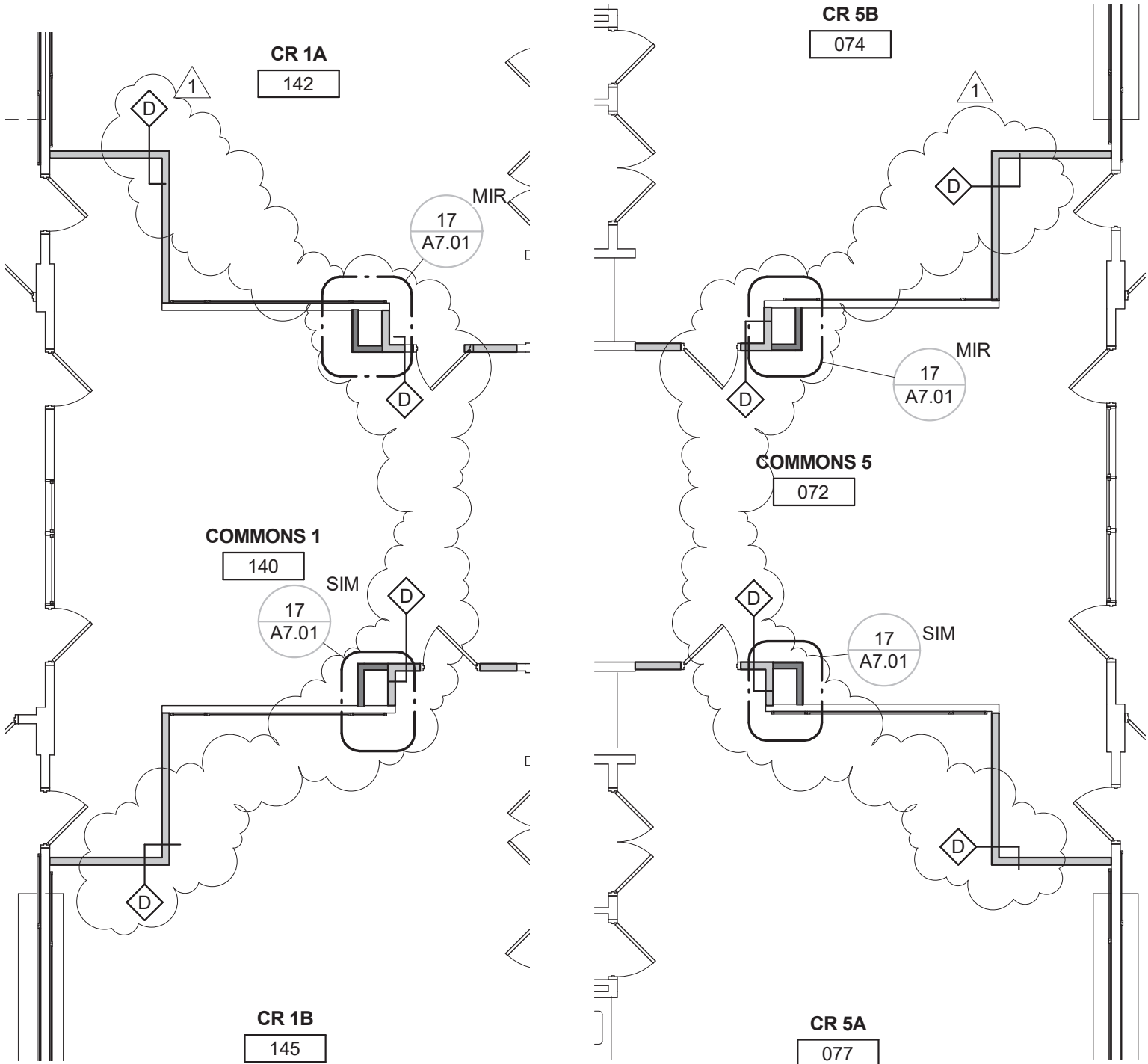
2. ADDENDUM SPECIFICATIONS

- 00 30 00 – Form of Proposal (*Affidavit only*)
- 01 32 00 – Sequencing and Scheduling of Work (*Construction Schedule only*)
- 01 91 13 – Commissioning Requirements
- 23 08 00 – HVAC Commissioning

3. OTHER

- Pre-Bid Meeting Minutes


END OF ADDENDUM NO. 1

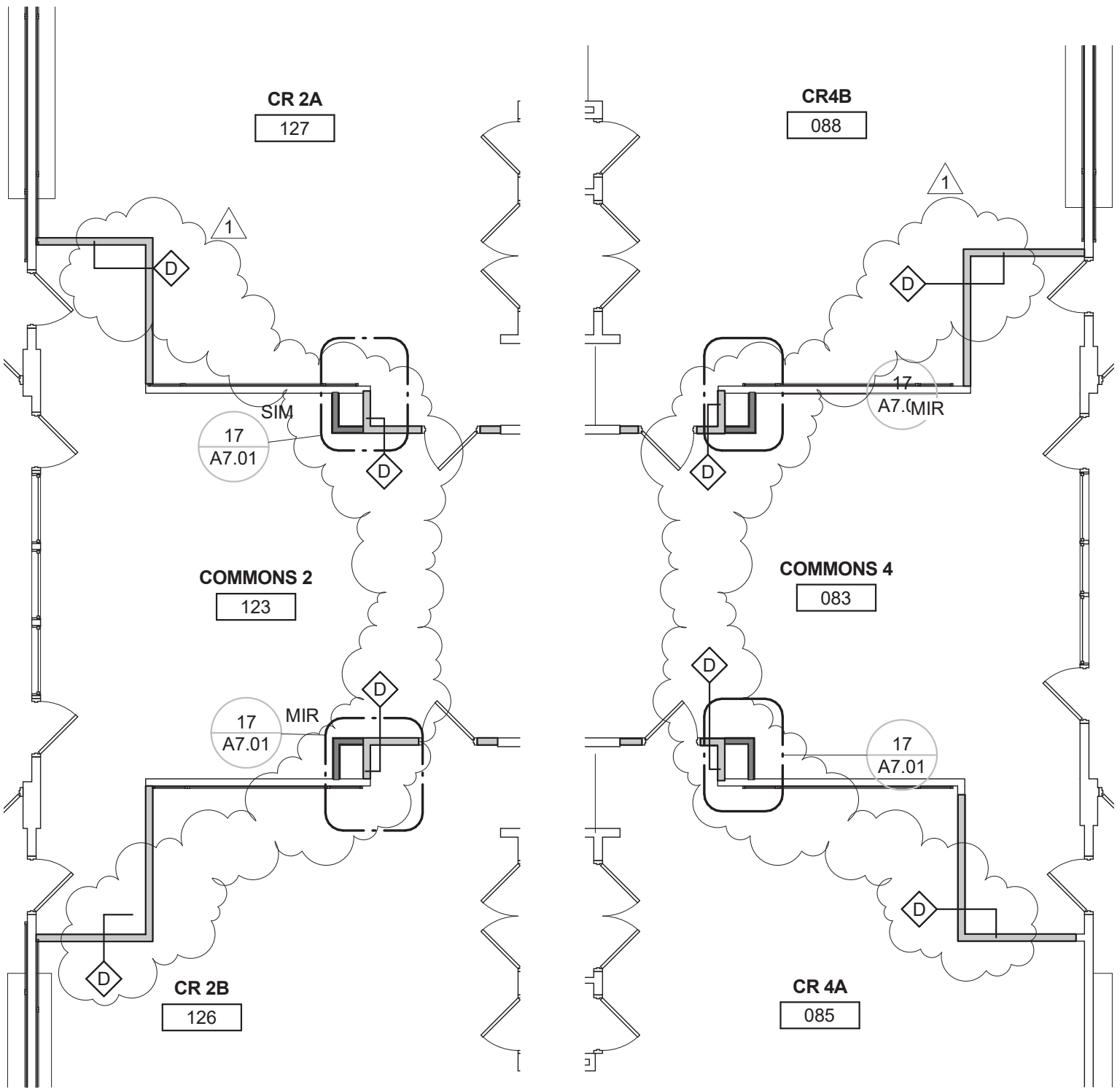


1 PROPOSED FLOOR PLANS - AREA B
 A2.02 SCALE: 1/8" = 1' - 0"

ONLY INFORMATION CLOUDED HAS CHANGED. SOME INFORMATION HAS BEEN OMITTED FOR CLARITY ONLY. THIS DRAWING SHOULD BE USED IN CONJUNCTION WITH THE CONSTRUCTION DOCUMENTS

REF. SHT. NO.: A2.02


 SMOLEN • EMR • ILKOVITCH ARCHITECTS	POINTERS RUN ELEMENTARY SCHOOL SYSTEMIC RENOVATION	SCALE: 1/8" = 1'-0"
		ADDENDUM 1
1355 PICCARD DRIVE SUITE 200 ROCKVILLE, MD 20850 301-770-0177(P) 301-330-3224(F)	COMMONS 1 & 5 WALL TAGS	12/17/2018
		AD-A01

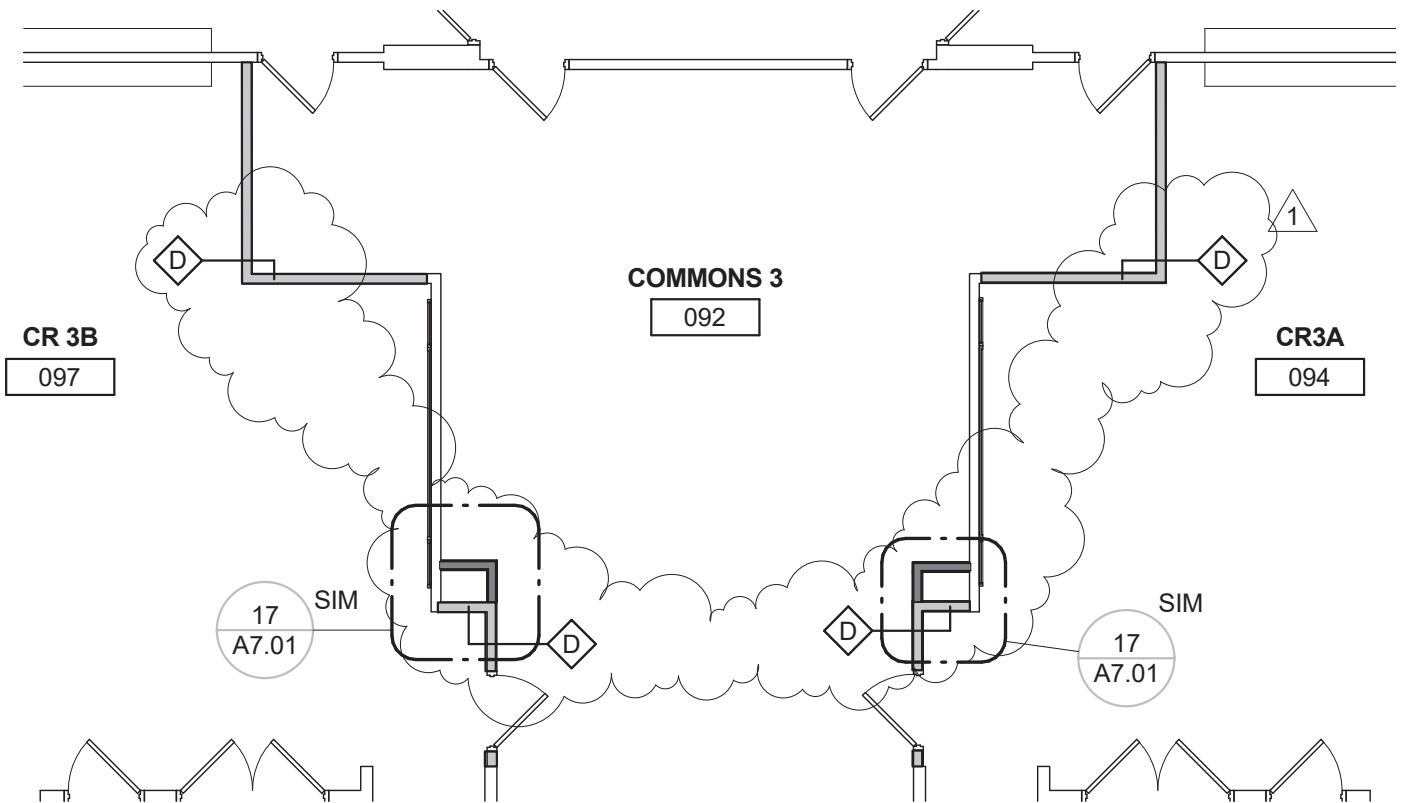


1 PROPOSED FLOOR PLANS - AREA C
 A2.03 SCALE: 1/8" = 1' - 0"

ONLY INFORMATION CLOUDED HAS CHANGED. SOME INFORMATION HAS BEEN OMITTED FOR CLARITY ONLY. THIS DRAWING SHOULD BE USED IN CONJUNCTION WITH THE CONSTRUCTION DOCUMENTS

REF. SHT. NO.: A2.03


 SMOLEN • EMR • ILKOVITCH ARCHITECTS	POINTERS RUN ELEMENTARY SCHOOL SYSTEMIC RENOVATION	SCALE: 1/8" = 1'-0"
		ADDENDUM 1
1355 PICCARD DRIVE SUITE 200 ROCKVILLE, MD 20850 301-770-0177(P) 301-330-3224(F)	COMMONS 2 & 4 WALL TAGS	12/17/2018
		AD-A02



1 PROPOSED FLOOR PLANS - AREA C
 A2.03 SCALE: 1/8" = 1' - 0"

ONLY INFORMATION CLOUDED HAS CHANGED. SOME INFORMATION HAS BEEN OMITTED FOR CLARITY ONLY. THIS DRAWING SHOULD BE USED IN CONJUNCTION WITH THE CONSTRUCTION DOCUMENTS

REF. SHT. NO.: A2.03

 SMOLEN • EMR ILKOVITCH ARCHITECTS	POINTERS RUN ELEMENTARY SCHOOL SYSTEMIC RENOVATION	SCALE: 1/8" = 1'-0"
		ADDENDUM 1
1355 PICCARD DRIVE SUITE 200 ROCKVILLE, MD 20850 301-770-0177(P) 301-330-3224(F)	COMMONS 3 WALL TAGS	12/17/2018
		AD-A03

(REVISED) - AFFIDAVIT

Special Instructions: An authorized representative of the bidder needs to complete the following affidavit and insert an answer to paragraphs 1 and 3.

Statutory Affidavit and Non-Collusion Certification:

I, _____, being duly sworn, depose and state:

1. I am the (officer) and duly authorized representative of the firm of the building construction organization named _____ whose address is _____

_____ and that possess the authority to make this affidavit and certification on behalf of myself and the firm for which I am acting.

2. Except as described in Paragraph 3 below, neither I, nor to the best of my knowledge, the above firm, nor any of its officers, directors, or partners, or any of its employees who are directly involved in obtaining or performing contracts with any public bodies has:

- (a) Been convicted of bribery, attempted bribery, or conspiracy to bribe, under the laws of any state or of the federal government;
- (b) Been convicted under the laws of the state, another state, or the United States of: a criminal offense incident to obtaining, attempting to obtain, or performing a public or private contract; or fraud, embezzlement, theft, forgery, falsification or destruction of records, or receiving stolen property;
- (c) Been convicted of a criminal violation of an antitrust statute of the State of Maryland, another state, or the United States;
- (d) Been convicted of a violation of the Racketeer Influenced and Corrupt Organization Act, or the Mail Fraud Act, for acts in connection with the submission of bids or proposals for a public or private contract;
- (e) Been convicted of any felony offenses connected with obtaining, holding, or maintaining a minority business enterprise certification, as prohibited by Section 14-308 of the State Finance & Procurement Article;
- (f) Been convicted of conspiracy to commit any act or omission that would constitute grounds for conviction under any of the laws or statutes described in Paragraph (a) through (e) above; or
- (g) Been found civilly liable under an antitrust statute of this State, another state, or the United States for acts or omissions in connection with the submission of bids or proposals for a public or private contract.

3. The only conviction, plea, or admission by any officer, director, partner, or employee of this firm to involvement in any of the conduct described in Paragraph 2 above is as follows:

(If none, write "None" below. If involvement, list the date, count, or charge, official or administrative body, the individuals involved, their position with the firm, and the sentence or disposition of the charge.)

(you may attach an explanation necessary)

4. I affirm that this firm will not knowingly enter into a contract with a public body under which a person or business debarred or suspended under Maryland State Finance and Procurement Title 16, subtitle 3, Annotated Code of Maryland, as amended, will provide, directly or indirectly, supplies, services, architectural services, construction-related services, leases of real property, or construction.

5. I affirm that this proposal or bid to the Board of Education of Howard County is genuine and not collusive or a sham; that said bidder has not colluded, conspired, connived and agreed, directly or indirectly, with any bidder or person to put in a sham bid or to refrain from bidding and is not in any manner, directly or indirectly, sought by agreement of collusion or communication or conference, with any person to fix the bid prices of the affidavit or any other bidder, or to fix any overhead, profit or cost element of said bid price, or that if any bidder, or to secure an advantage against the Board of Education of Howard County or any other person interested in the proposed contract; and that all statements in the proposal or bid are true. I acknowledge that, if the representations set forth in this affidavit are not true and correct, the Board of Education of Howard County may terminate any contract awarded and take any other appropriate action.

6. **SEX OFFENDER NOTIFICATION** - Maryland law requires certain sex offenders to register with the local law enforcement agency; See Maryland Annotated Code, Criminal Procurement Article, §11-704. One of the purposes of this law, found in Article 27§ 792, is to inform school systems when a Registered Sex Offender is residing or working in the area. When the sex offender registers, the local police are required to notify the Superintendent of Schools, and the Superintendent, in turn, is required to send a notice to school principals.

As a contractor working for Howard County Public School System (HCPSS), we require that you do not employ Registered Sex Offenders to work on projects for our school system if they, as a result, are required to perform delivery, installation, repair, construction or any other kind of services **on HCPSS property**. Further, Maryland Law that became effective June 22, 2006, requires that any person who enters a contract with a county board of education or a non-public school "may not knowingly employ an individual to work at a school" if the individual is a registered sex offender; See §11-722 Criminal Procurement Article. An

employer who violates this requirement is guilty of a misdemeanor and if convicted may be subject to up to five years imprisonment and/or a \$5,000 fine.

Each contractor shall screen their work-forces to ensure that a Registered Sex Offender does not perform work at a county public school and also ensure that a subcontractor and independent contractor conducts screening of its personnel who may work at a school. The term "work force" is intended to refer to all of the contractor's direct employees and subcontractors and/or independent contractors it uses to perform the work. Violations of this provision may cause HCPSS to take action against the contractor up to and including termination of the contract.

Effective July 1, 2015, amendments to § 6-113 of the Education Article of the Maryland Code further require that a contractor or subcontractor for a local school system may not knowingly assign an employee to work on school property with direct, unsupervised, and uncontrolled access to children, if the employee has been convicted of, or pled guilty or nolo contendere to, a crime involving a sexual offense, child sexual abuse and crimes of violence.

The Contractor shall submit to HCPSS a listing of any employees assigned to perform under this agreement and certify that the necessary criminal history records checks have been conducted and that employee complies with the requirements. See section 000740 for Criminal Background Information and forms.

The statements contained in this affidavit shall be incorporated into the awarded contract as material provisions and shall be effective throughout the life of the contract. The firm has continuing obligation through the life of the contract to submit a revised affidavit should the firm discover information, or events occur, which render the contents of this affidavit erroneous or incomplete or which would result in the firm providing a different response. The firm's failure to submit a revised affidavit within three (3) working days of either its awareness of any error, change of circumstances, incompleteness, etc., or request by the Owner shall constitute breach of contract. Upon submission of a revised affidavit, the Owner has the right to take such actions as may be necessary, in the judgment of the Owner, to maintain and enforce the provisions of the affidavit, including termination of the contract.

I DO SOLEMNLY DECLARE AND AFFIRM under the penalties of penalties that the contents of these affidavits (Statutory and Non-Collusion) are true and correct, that I am executing this Affidavit in compliance with Section 16-311 of the State Finance and Procurement Article, Annotated Code of Maryland, and the Non-Collusion Certification in compliance with requirements of the Board of Education of Howard County Maryland, and that I am executing and submitting this Form of Proposal on behalf of and with full authority by the bidder named below.

(Signature of Bidder)

(Date)

(Print Name of Bidder)

(Title of Bidder)

SUBSCRIBED AND SWORN to before me on this _____ day of _____, 2019.

NOTARY PUBLIC

Name _____

Seal:

My Commission Expires _____

(Legal Name of Company)

(Address)

(City)

(State)

(Zip)

(Telephone)

(Fax)

(E-mail address)

Contractor's License Number # _____

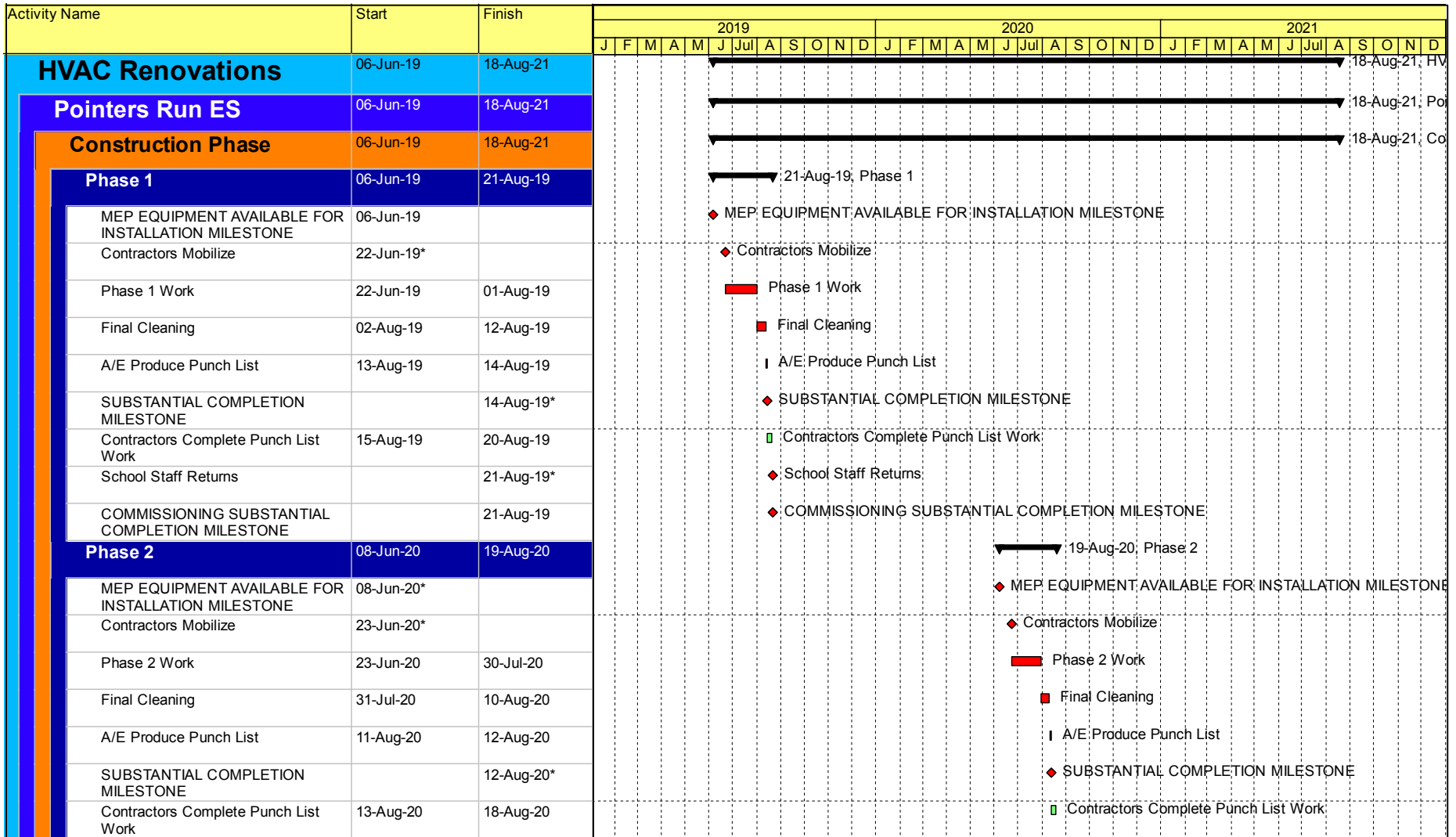
We are/ am licensed to do business in the State of Maryland as a:

() Corporation

() Partnership

() Individual

() Other



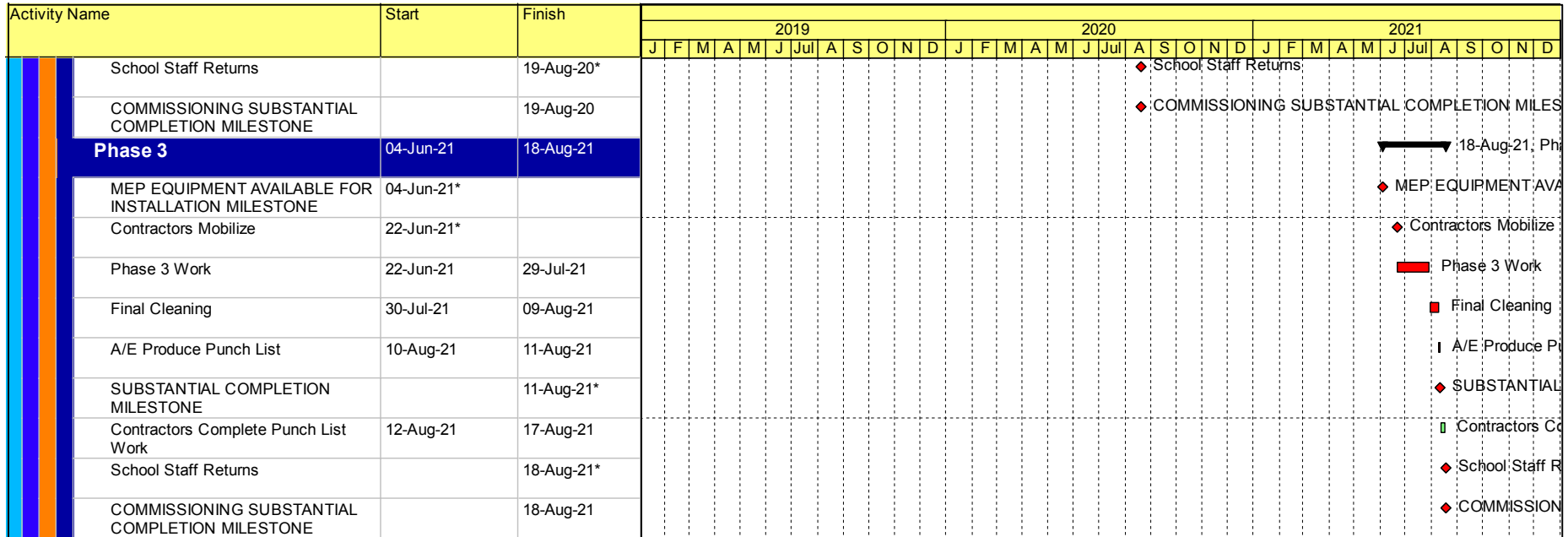
Contractors shall have a contractual obligation to meet dates shown above. This schedule is subject to any modifications of the HCPSS school calendar. A detailed construction schedule will be developed after contract award. It is understood that this project will need to work extended hours, multiple shifts and weekend hours in order to meet the schedule at no additional cost to the owner. The intent is to work double shifts Monday - Friday and a single shift on Saturday. Contractors shall plan to provide adequate manpower accordingly to complete the work within these constraints.

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Print Date 18-Dec-18

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Contractors shall have a contractual obligation to meet dates shown above. This schedule is subject to any modifications of the HCPSS school calendar. A detailed construction schedule will be developed after contract award. It is understood that this project will need to work extended hours, multiple shifts and weekend hours in order to meet the schedule at no additional cost to the owner. The intent is to work double shifts Monday - Friday and a single shift on Saturday. Contractos shall plan to provide adequate manpower accordingly to complete the work within these constraints.

HVAC Renovations - CONSTRUCTION SCHEDULE
 Print Date 18-Dec-18
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PART 1 - GENERAL

1.1 SUMMARY

- A. Section includes general requirements that apply to implementation of commissioning without regard to specific systems, assemblies, or components.
- B. Related Sections:
 - 1. Division 22 Section "COMMISSIONING REQUIREMENTS" for commissioning process activities for plumbing systems, assemblies, equipment, and components.
 - 2. Division 23 Section "HVAC COMMISSIONING" for commissioning process activities for HVAC&R systems, assemblies, equipment, and components.
 - 3. Division 26 Section "ELECTRICAL COMMISSIONING" for commissioning process activities for electrical systems, assemblies, equipment, and components.

1.2 DEFINITIONS

- A. BoD: Basis of Design. A document that records concepts, calculations, decisions, and product selections used to meet the OPR and to satisfy applicable regulatory requirements, standards, and guidelines. The document includes both narrative descriptions and lists of individual items that support the design process.
- B. Commissioning Plan: A document that outlines the organization, schedule, allocation of resources, and documentation requirements of the commissioning process.
- C. CxA: Commissioning Authority.
- D. OPR: Owner's Project Requirements. A document that details the functional requirements of a project and the expectations of how it will be used and operated. These include Project goals, measurable performance criteria, cost considerations, benchmarks, success criteria, and supporting information.
- E. Systems, Subsystems, Equipment, and Components: Where these terms are used together or separately, they shall mean "as-built" systems, subsystems, equipment, and components.

1.3 COMMISSIONING TEAM

- A. Members Appointed by Contractor(s): Individuals, each having the authority to act on behalf of the entity he or she represents, explicitly organized to implement the commissioning process through coordinated action. The commissioning team shall consist of, but not be limited to, representatives of Contractor, including Project superintendent and subcontractors, installers, suppliers, and specialists deemed appropriate by the CxA.
- B. Members Appointed by Owner:
 - 1. CxA: The designated person, company, or entity that plans, schedules, and coordinates the commissioning team to implement the commissioning process. Owner will engage the CxA under a separate contract.
 - 2. Representatives of the facility user and operation and maintenance personnel.
 - 3. Architect and engineering design professionals.

1.4 OWNER'S RESPONSIBILITIES

- A. Provide the OPR documentation to the CxA and Contractor for information and use. CxA will assist owner in the creation of OPR if needed.
- B. Assign operation and maintenance personnel and schedule them to participate in commissioning team activities.
- C. Provide the BoD documentation, prepared by Architect and approved by Owner, to the CxA and Contractor for use in developing the commissioning plan, systems manual, and operation and maintenance training plan.

1.5 CONTRACTOR'S RESPONSIBILITIES

- A. Contractor shall assign representatives with expertise and authority to act on its behalf and shall schedule them to participate in and perform commissioning process activities including, but not limited to, the following:
 - 1. Evaluate performance deficiencies identified in test reports and, in collaboration with entity responsible for system and equipment installation, recommend corrective action.
 - 2. Cooperate with the CxA for resolution of issues recorded in the Issues Log.
 - 3. Attend commissioning team meetings held on a monthly basis until 20% of equipment has been started or is ready to start. Meetings will be bi-weekly from that point on.

4. Integrate and coordinate commissioning process activities with construction schedule.
5. Complete electronic construction checklists as Work is completed and provide to the Commissioning Authority on a weekly basis.
6. Review and accept commissioning process Pre-Functional Performance Test (PFPT) procedures provided by the Commissioning Authority.
7. Complete commissioning process Functional Performance Test (FPT) procedures.

1.6 CxA'S RESPONSIBILITIES

- A. Organize and lead the commissioning team.
- B. Provide commissioning plan.
- C. Convene commissioning team meetings.
- D. Provide Project-specific construction checklists and commissioning process test procedures.
- E. Verify the execution of commissioning process activities using random sampling. The sampling rate may vary from 10 to 100 percent. Verification will include, but is not limited to, equipment submittals, construction checklists, training, operating and maintenance data, trend histories, tests, and test reports to verify compliance with the OPR. When a random sample does not meet the requirement, the CxA will report the failure in the Issues Log.
- F. Prepare and maintain the Deficiency Issues log.
- G. Prepare and maintain completed construction checklist log.
- H. Witness systems, assemblies, equipment, and component startup.
- I. Compile test data, inspection reports, and certificates; include them in the systems manual and commissioning process report.

END OF SECTION

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PART 1 - GENERAL

1.1 RELATED WORK

- A. Division 01 – General Requirements
- B. Division 22 - Plumbing
- C. Division 26 - Electrical

1.2 REFERENCES

- A. Drawings and general provisions of contract, including general and supplementary conditions, general mechanical provisions and Division-1 Specification sections, apply to work of this section.
- B. American Society of Heating and Air-Conditioning Engineers – ASHRAE (The HVAC Commissioning Process, ASHRAE Guideline). Latest version is applicable.
- C. International Energy Conservation Code® (Commissioning Process - Section C408). Latest version is applicable.
- D. ACG Commissioning Guideline - 2015
- E. Illuminating Engineering Society (IES) – The commissioning process applied to lighting and control systems.
- F. International Code Council (ICC) – Application of the Commissioning process.

1.3 DESCRIPTION OF WORK

- A. The purpose of the commissioning process is to provide the owner/operator of the facility with a high level of assurance that the mechanical systems have been installed in the prescribed manner, and operate within the performance guidelines set in the Basis of Design Documents (BOD). The CA shall provide the owner with an unbiased, objective view of the system's installation, operation, and performance. This process is not intended to take away or reduce the responsibility of the design team or installing contractors to provide a finished product. Commissioning is intended to enhance the quality of system start-up and aid in the orderly transfer of systems for beneficial use

by the owner. The CA will be a member of the construction team, administrating and coordinating commissioning activities with the design team, construction manager, subcontractors, manufacturers and equipment suppliers.

- B. The independent commissioning agent (CA) contracted directly with the owner for this project. This specification has been included for reference only to define contractors' responsibilities. Each contractor should review this procedure and include adequate time in their proposal.

PART 2 - PRODUCTS

2.1 Not used.

PART 3 - EXECUTION

3.1 ROLES OF THE COMMISSIONING AGENCY

- A. The primary point of responsibility is to inform the construction manager, the owner and design team on the status, integration, and performance of HVAC systems within the facility.
- B. The CA shall function as a catalyst and initiator to disseminate information and assist the design and construction teams in implementing completion of the construction process. This shall include system verification, functional performance testing, and conformance with the intended design of each system. Services include documenting construction observations, verification and functional performance testing, and documenting proper distribution of performance and operating information to the owner's O&M staff.
- C. Assist the responsible parties to maintain a high quality level of installation by meeting or exceeding prevailing standards and specifications.
- D. The CA shall observe and coordinate testing as required to assure system performance meets the design intent.
- E. The CA shall document the results of the performance testing directly and/or assure that the appropriate technicians document testing. The CA shall approve standard forms to be used by all parties for consistency of approach and type of information to be recorded.
- F. The CA shall provide technical expertise to oversee and verify the correction of deficiencies found during the commissioning process.

- G. The CA is to remain an independent party with specific knowledge of the project. The CA shall investigate the scope and extent of the problem and facilitate communication to determine responsibilities by delineating specifications. The CA shall monitor resolution for conformance with design intent and prevailing industry standards.
- H. The CA shall document the date of acceptance as determined by the construction manager, owner and design team. System Verification Checklists and Functional Performance Test results shall be used in determining the start of the warranty period for HVAC systems, Lighting systems and subsystems.
- I. The CA will review operating and maintenance materials for HVAC systems.
- J. The CA will review phasing plans as provided by the CM relating to temporary use of HVAC equipment, O&M considerations, warranty issues, impact of construction sequencing on occupied areas, and interruption of services from the existing equipment.

3.2 SYSTEMS INCLUDED IN, BUT NOT LIMITED TO THE COMMISSIONING PROCESS

- Water to Water Heat Pump
- Geothermal Heat Pumps
- Roof Top Units
- Air Handling Units
- Dedicated Outdoor Air Units
- Fan Coil Units
- Exhaust Fans
- DDC Control System
- VAV Terminal Units
- Chiller & associated Pumps
- Boiler & associated Pumps
- VRF Systems
- Domestic Hot Water System
- Lighting Controls & Control System
- Occupancy Sensors

3.3 HVAC COMMISSIONING PLAN

A. Commissioning Team

- 1. The Commissioning Team (CT) shall consist of key parties involved in design, construction and testing of this facility. It is necessary for each agency to appoint team members that will have long-term commitments to this project. Switching

team members during the project will reduce the ability of the CT to provide continuity and acceptable results to the building owner. Team members must maintain an ongoing supervisory position on this project. One team member shall be provided by each of the parties listed below:

Project Manager (PrM)
Office of School Construction (OSC)
Office of School Facilities (OSF)
Commissioning Agent (CA)
Design Team (DT)
Construction Manager (CM)
Mechanical Contractor (MC)
Controls Contractor (CC)
Test and Balance Contractor (TABC)
Electrical Contractor (EC)

B. Basis of Design Document

1. The Basis of Design Document (BOD) represents a composite of design drawings, project specifications, submittals, change orders and industry standards that describe the systems of this facility. References to design intent will be taken from these contract documents. The BOD is an evolving manuscript maintained by the design professional to track and incorporate design alterations that occur throughout the construction process. Any industry standards used for this project will be specifically noted when referenced.
2. The CA will review the BOD documents for adequate commissioning provisions, functional performance, optimization of performance, accessibility, TAB provisions, and O&M considerations.

C. Commissioning Meetings

1. Commissioning meetings will be held in conjunction with the projects progress meetings as necessary. The CA will be on site for the CX meetings. Commissioning meetings will be used to provide direction, address issues with work completed per project schedule, address deficiencies and to come up with resolutions to complete in a timely matter, address problems that alter the design intent or affect the commissioning process. These meetings provide an open forum for exchange of ideas between contractors, vendors, designers, users and owners.

D. Deficiency/Resolution Tracking Forms (DRTF)

1. The use of Deficiency/Resolution Tracking Forms is a method employed by the CA to monitor and record problems, their causes, and solutions. The use of these

lists promotes communication between the installing contractors, design team, commissioning agent, and owner, in order to expedite their resolution in a timely manner.

2. The CA will regularly submit DRTF's to the CT in order to document and resolve deficiencies as quickly as possible. The frequency of DRTF submission will be adjusted as project conditions dictate.

E. System Verification Checklists (SVC) / Manufacturers' Checklists

1. The MC will provide SVC's based on manufacturers start-up procedures. These tests should be provided for all systems and subsystems. See SYSTEMS INCLUDED IN, BUT NOT LIMITED TO THE COMMISSIONING PROCESS. Draft copies will be submitted to the CT for review and comment prior to placement on the job site. A master copy of the SVC's will be bound in a three-ring binder and placed in the CM office on the job site for use by the installing contractors. No system will be started until the appropriate SVC's have been completed.
2. The CA will review the SVC for each piece of equipment prior to start-up. Equipment will be released for start-up only after these checklists have been completed by the installing contractor and reviewed by the CA.
3. The equipment manufacturers' checklists must also be reviewed by the CA prior to start-up. These lists must be completed by the installing contractor, and reviewed by the CA before start-up can commence.

F. Start-Up

1. Start-up of major HVAC systems will be witnessed the CA. The appropriate contractors and/or manufacturer's representative will be required on site to perform start-up. No system will be started until the appropriate SVC's have been completed. No system will be started until the Manufacturer's checklists have been completed. Start-up will be performed according to the Manufacturer's recommended procedures. The CA will visit the site to review completeness of installation in conjunction with progress meetings prior to starting HVAC equipment.
2. CT members involved in installation, fabrication, manufacture, control, or design of equipment are required to be present at the time of start-up. A factory-authorized technician will be on site to start equipment when required by the specifications. This will minimize delays in bringing equipment on line and expedite acceptable functional performance in accordance with the BoD.

G. Controls Monitoring

1. Close monitoring of the Control Contractor's progress will promote efficient coordination of the TAB work. The CC will be expected to submit point-to-point checklists verifying that his work has been completed and all systems are ready for

TAB work and Functional Performance Testing. Programming and graphics will be surveyed by the CA for completeness and conformance with the BoD and the owner's scheduling requirements.

H. TAB Monitoring

1. The preliminary TAB report set-up will be reviewed prior to HVAC equipment start-up, in order to assure that the final TAB report format and content is acceptable.
2. TAB work will be monitored so that any problems that prevent or hinder proper air and water balance can be addressed and corrected with minimal delays. By addressing these problems as quickly as possible, we can assure that functional performance testing and owner training will take place on schedule.
3. A pencil copy of the TAB report will be reviewed prior to submission of the final TAB report. A written review will be submitted to the TAB contractor and to the DT for their comments. A TAB report approved by the DT will be required before Functional Performance Testing can be carried out. The CA will visit the site during the TAB process in order to assist TABC and CC in the effective completion of their scope of work.

I. Functional Performance Tests (FPT)

1. The CA will write FPT's based on the respective sequence of operations. These tests will be created for systems and subsystems. See SYSTEMS INCLUDED IN, BUT NOT LIMITED TO THE COMMISSIONING PROCESS above.
2. Each major system will be tested. A random sample of each subsystem will be tested. This will be coordinated and witnessed by the CA and the owner's maintenance staff. Witnessing the FPT's will serve as a compliment to the O&M Training. No FPT's will be performed until the system and related subsystems have been started, the TAB report has been submitted and reviewed, and the completion of the control system has been documented through point-to-point checklists and other documentation.
3. The Functional Performance Tests shall include HVAC and related equipment.
 - a. AHU's will be tested in designed operating modes. Proper operation will be verified at minimum OA, maximum OA, automatic control, and other modes, if necessary, to achieve BOD conformance.

- b. Variable Air Volume terminals with and without reheats will be tested at minimum and maximum temperature set points, and under automatic control. Intermediate settings will be tested as necessary.
- c. Chilled water system will be tested in designed operating modes. Proper operation will be verified at minimum loads, maximum loads, waterside economizing mode, Manual control, automatic control, and other modes.
- d. Hot water system will be tested.
- e. EF's will be tested for conformance to BoD.
- f. Hydronic pumps will be tested under relevant operating conditions.
- g. Heat Exchangers will be tested under relevant operating conditions.
- h. DDC control systems will be tested as necessary.
- i. HVAC systems will be tested to assure that the building as an integrated system operates properly.
- j. Trend verification of systems and subsystems shall be completed prior to start of functional performance testing. CA will provide trend format to CC and discuss trend requirements in CX meetings throughout the construction phase of project.

4. Deferred Testing

- a. If tests cannot be completed because of a deficiency outside the scope of the responsible contractor, the deficiencies shall be documented and reported to the Owner. Deficiencies shall be resolved and corrected by the appropriate parties and test rescheduled.
- b. Off-season mode testing will be implemented as necessary to assure conformance with the BoD. Installing contractors will be expected to participate as required by the project specifications.

5. Rescheduled Functional Performance Test

- a. During Functional Performance Testing period, it is assumed that the contractors will be complete with all checklists when the commissioning agents travel to site. If the work is not ready for commissioning when the commissioning personnel are on site, their time will be billed to the contractor as an additional fee.
- b. If the contractor has deficiencies that cannot be corrected at the time of the test, that part of the sequence will be retested at a later date. If the deficiency does not pass during the retest, the contractor will be billed for the commissioning personnel's return trip.

J. Building Turn-Over / Owner Orientation / User Training

- 1. The CA will oversee contractors prepare, coordinate and review O&M manuals, working closely with each contractor to achieve specificity and completeness.
- 2. The CA will review as-built drawings, working closely with each contractor to achieve specificity and completeness.

3. Owner training will be coordinated with the assistance of the CA. The training will be provided by the installing contractor, or manufacturer's representative, and witnessed by the CA. This training should include both classroom training and hands-on operational training. The owner may choose to videotape this training for future use. The CA will visit the site during the Turn-Over and Training period to assure that any on-going HVAC related problems are being addressed and corrected in a timely and efficient manner.
4. The CA will assist in the coordination of off-season testing, calibrating, and servicing as specified in the contract documents.

3.4 RESPONSIBILITIES OF TEAM MEMBERS

A. Construction Manager (CM)

1. Include commissioning requirements in the mechanical, electrical, and controls contracts, as well as other subcontracts, to assure full cooperation of all parties in the HVAC commissioning process.
2. Assure acceptable representation, with the means and authority to prepare and coordinate execution of the mechanical commissioning program as described in the contract documents.
3. Assure that the CA shall receive a copy of all construction documents, addenda, change orders and appropriate approved submittals and shop drawings for review and use in development of the commissioning plan.
4. Coordinate inclusion of commissioning activities in the construction schedule.
5. Facilitate resolution of deficiencies identified by observation or performance testing.
6. Involve CA in selection of the air balancing contractor.
7. Assist the CA in monitoring the duct leakage testing.

B. Mechanical Contractor (MC)

1. Each contractor in this division shall include in their quote the cost of participating in the commissioning process.
2. Include requirements for submittal data (including partial load data), O&M data, and training in each purchase order or sub-contract.
3. Assure cooperation and participation of specialty sub-contractors such as sheet metal, piping, refrigeration, water treatment, temperature controls, and TAB in commissioning activities.
4. Assure participation of major equipment manufacturers in appropriate startup, training, and testing activities.
5. Attend commissioning meetings scheduled by the CA.
6. Assist the CA in system verification and performance testing.

7. Prepare preliminary schedule for HVAC system inspections, O & M manual submission, training sessions, pipe and duct system testing, flushing and cleaning, equipment start-up, system verification, performance testing, and system completion for use by the CA. Update schedule as appropriate throughout the construction period.
8. Complete System Verification Checklists and manufacturer's pre-start checklists prior to scheduling startup of HVAC equipment.
9. Monitor and respond to Resolution Tracking Forms distributed by the CA in order to expedite corrective actions necessary to achieve design intent.
10. Notify the CA a minimum of two weeks in advance of scheduled system start-up.
11. Update drawings to as-built condition and review with the CA throughout the construction process.
12. Schedule vendor and subcontractor provided training sessions as required by project specifications.
13. Provide written notification that the following work has been completed in accordance with the project specifications, and that the equipment, systems and sub-systems are operating in accordance with design intent.
 - a. HVAC equipment including fans, air handling units, dehumidification units, ductwork, dampers, terminal devices, etc.
 - b. Fire detection and smoke detection devices furnished under other divisions as they affect the operation of the HVAC systems.
 - c. That BAS is functioning in accordance with design intent.
14. Participate in the Functional Performance Tests.
15. Participate in the off-season mode testing.
16. Participate in O&M Training as required by project specifications.
17. Provide a complete set of as-built drawings and O & M manuals for review. The CA shall review the as-built drawings and O&M manuals concurrently with the design team.

C. Test and Balance Contractor (TABC)

1. Include cost for commissioning requirements (participation) in the contract price.
2. Attend commissioning meetings scheduled by the CA.
3. Submit the TAB procedures and preliminary TAB report to the CA for review at least two weeks prior to beginning TAB work.
4. Notify the CA a minimum of two weeks in advance of scheduled TAB work.
5. Provide partial, preliminary TAB Reports by phase, by building section, by system, or as required by the CA.
6. Assist the CA in system verification and performance testing.
7. Monitor and respond to Resolution Tracking Forms distributed by the CA in order to expedite corrective actions necessary to achieve design intent.

8. Participate in verification of the TAB report, which will consist of repeating any selected measurement contained in the TAB report where required by the CA for verification or diagnostic purposes.
9. Participate in the Functional Performance Tests as required to achieve design intent.
10. Provide sound and vibration where required to assist in diagnosis of areas exhibiting unacceptable levels of noise or vibration.
11. Participate in the off-season mode testing as required to achieve design intent.
12. Participate in O&M Training as required by project specifications.

D. Temperature Control Contractor (TCC)

1. Include cost for commissioning requirements in the contract price.
2. Review control sequence and component selection for conformance with design intent.
 - a. Attend a submittal review meeting with the CA and Engineer to ensure clear understanding of scope of work and expectations.
 - b. Verify that specified safeties and interlocks have been selected.
 - c. Verify proper selection of control valves and actuators based on design parameters.
 - d. Verify proper selection of control dampers and actuators based on design parameters.
 - e. Verify that sensor selection conforms to design intent.
3. Attend commissioning meetings scheduled by the CA.
4. Provide the following submittals to the CA:
 - a. Hardware and software submittals.
 - b. Control panel construction shop drawings.
 - c. Narrative description of control sequences for each HVAC system and subsystem.
 - d. Schematics showing all control points, sensor locations, point names, actuators, controllers and where necessary, points of access.
 - e. A list of all control points, including analog inputs, analog outputs, digital inputs and digital outputs. Include the values of all parameters for each system point. Provide a separate list for each stand-alone control unit.
 - f. A complete listing of all software routines employed in operating the control system. Also provide a program narrative that describes the logic flow of the software and the functions of each routine and sub-routine. The narrative should also explain individual math or logic operations that are not clear from reading the software listing.
 - g. Hardware operation and maintenance manuals.
 - h. Application software and project applications code manuals.
 - i. Panel and equipment insert documents.

- j. Assist CA with remote monitoring capabilities. Supply any software and/or hardware needed.
- 5. Verify that specified interfaces provided by others are compatible with BAS hardware and software.
- 6. Coordinate installation and programming of BAS with construction and commissioning schedules.
- 7. Complete System Verification Checklists and manufacturer's pre-start checklists prior to scheduling startup of HVAC equipment.
- 8. Provide control system technician to assist during equipment startup.
- 9. Monitor and respond to Resolution Tracking Forms distributed by the CA in order to expedite corrective actions necessary to achieve design intent.
- 10. Participate in the Functional Performance Tests as required by the project specifications.
- 11. Provide a control system technician to assist during verification and performance testing.
- 12. Provide system modifications to achieve system operation as defined by the design intent.
- 13. Provide support and coordination for TAB contractor. Provide all devices, such as portable operator terminals and all software for the TAB to use in completing TAB procedures.
- 14. Provide written notification that the TCC scope of work has been completed in accordance with the project specifications, and that the equipment, systems and sub-systems are operating in accordance with design intent, and that BAS is functioning in accordance with design intent.
- 15. Participate in the Functional Performance Tests as required to achieve design intent.
- 16. Participate in the off-season mode testing as required to achieve design intent.
- 17. Participate in O&M Training as required by project specifications. Include training on hardware operations and programming

END OF SECTION

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Pointers Run Elementary School & Mount View Middle School Pre-Bid Meeting Minutes

Meeting Type: Pre-Bid Meeting
Meeting Number: Meeting 001
Date: Monday, December 10, 3:00 PM – 4:00 PM
Location: Mount View Middle School
Author: Tom Kraft
Next Meeting: TBD

Attendees

See attendance sheet in Addenda

New Business

001 - General Bid items

- J. Vinton Schafer (JVS) is under contract with the Howard County Public School System (HCPSS) for Construction Management services for the Pointers Run Elementary School and Mount View Middle School HVAC projects. All Prime Contracts will be held by HCPSS.
 - Bid documents and addenda can be downloaded from JVS's website. Contact Tom Kraft for access. All Questions shall be in writing to Tom Kraft at JVS. tomk@jvschafer.com or 410-335-3000.
 - Bids should be delivered to the modular building 177 at the HCPSS Board of Education Building
 - Contractors may visit Pointers Run Elementary School after 3:55 PM on regular school days and Mount View Middle School after 2:25 on regular school days. Anyone wishing to visit the school must check in at the school's admin office and sign in. NO PHOTOS OF STUDENTS IS PERMITTED.
-

002 - Project Overview

- Both projects will be phased and occupied with all work to occur during the summers. Administrative staff and janitorial staff will be at the schools during the summers.
- Each project must be bid on and managed separately.
- The overall project scopes are inclusive of a full mechanical system renovation with electrical work inclusive of lighting and support for the HVAC systems and architectural work for support of the HVAC systems.
- Both projects have prevailing wage/certified payroll requirements
- Both projects have three Prime Contractor packages (1A, 15A, 16A). Bidders must bid on the package as a whole. No qualifications or exclusions will be accepted.
- Alternates were reviewed as applicable per each project.
- The intent is to work double shifts Monday-Friday and a single shift on Saturday. Contractors shall plan to provide manpower for the project accordingly to complete

the work within the schedule constraints. In the event additional hours/shifts are needed this will be coordinated with the Owner and Construction Manager at no cost to the Owner.

- Substantial Completion shall be per phase. Warranties for all work will not begin until Substantial Completion of the phase.
 - HCPSS advised that all HCPSS and State rules and regulations would apply to these projects for working on an occupied school site.
-

003 Procurement Items

- HCPSS reminded all bidders that they are bidding on the complete set of project documents. Bidders are reminded to download the complete set of project documents from JVS' website.
- HCPSS reminded that anything discussed in the meeting would not be binding unless it is in writing in addenda.
- HCPSS reviewed all purchasing/bidding requirements.
- HCPSS reviewed all MBE goals per bid package. All bidders are encouraged to thoroughly review the MBE requirements.
- HCPSS advised that all bid proposals must be on HCPSS' proposal form delivered in a sealed envelope. A separate bid proposal must be provided for each project in a separate sealed envelope.
- Bids will be publicly opened at the Homewood School at approximately 1:30PM on the bid due date.
- HCPSS' Standard Form of Agreement, P&P bonds, Bid Bond, General Conditions and MBE requirements/forms are included in the bid documents.
- HCPSS reviewed the criminal background check document.

The above minutes represent the author's interpretation of the Pointers Run Elementary School & Mount View Middle School Pre-Bid Meeting. All meeting minute items are considered correct and accurate unless the author is notified in writing within three (3) days.

Signature: Tom Kraft

Date: 12/17/2018

Howard County Public Schools

Bid No. 023.19.B4-1 and 023.19.B4-2

Pre-Bid of Mt. View Middle School and Pointers Run Elementary School HVAC Renovation Projects

PRE-BID MEETING ATTENDANCE SHEET

Date/Time: 12/10/18 3:00 PM

Please print clearly and complete all of the requested information. If your Business Card has all of this information you may simply staple it over an empty box. Please do not cover up other vendors cards.

Company Name:	EMINENCE HVAC SERVICE
Contact Name:	ANTONIO AJERY
Mailing Address:	9701 Apollo Dr. #301
City, State Zip Code:	LARGO M.D 20774
Telephone Number:	202-534-8341
Fax Number:	
Email Address	tony@EMBSHVAC.COM

Company Name:	Brewer Builders
Contact Name:	SINA NEGAHBAN
Mailing Address:	11011 McCormick Road STE 300
City, State Zip Code:	Hunt valley MD, 21031
Telephone Number:	410-660-2500
Fax Number:	
Email Address	SDN@11011HQ.COM

Company Name:	Shapiro Mechanical
Contact Name:	John Main
Mailing Address:	14620 Rothgeb Drive
City, State Zip Code:	Rockville MD 20850
Telephone Number:	3013156260
Fax Number:	
Email Address	Jmain@ShapiroandDuncan.com

Company Name:	
Contact Name:	
Mailing Address:	
City, State Zip Code:	
Telephone Number:	
Fax Number:	
Email Address	

DOUGLAS R. MULLICAN
CSI, CCA
Project Manager

J. Vinton Schafer & Sons, Inc.
1309-Q Continental Drive
Abingdon, MD 21009

P 410.335.3000
C 443.534.5299
F 410.335.6529
dmullican@jvschafer.com
quandel.com/schafer



Company Name:	<i>M. D. M. M. S.</i>
Contact Name:	<i>15-485</i>
Mailing Address:	<i>ASIAN AMERICAN</i>
City, State Zip Code:	
Telephone Number:	
Fax Number:	
Email Address:	

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Fax 301-293-3109



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TONY LOPEZ 10248 Rolling Ridge Court
tlopez@smmci.com Myersville, MD 21773

Company Name:	<i>Tom Gill / Fidelity Engineering</i>
Contact Name:	
Mailing Address:	
City, State Zip Code:	
Telephone Number:	
Fax Number:	
Email Address:	<i>Tomg@FidelityEngineering.com</i>

Company Name:	
Contact Name:	
Mailing Address:	
City, State Zip Code:	
Telephone Number:	
Fax Number:	
Email Address:	




AUER ELECTRIC
ELECTRICAL CONSTRUCTION

STEPHEN E. GAUGH
President

Steve@AuerElectric.com
www.auerElectric.com

4238 KLEIN AVE. | NOTTINGHAM, MD 21236 | 410.661.4300
FAX 410.661.4429

Company Name:	
Contact Name:	
Mailing Address:	
City, State Zip Code:	
Telephone Number:	
Fax Number:	
Email Address:	



UEP UNITED ENERGY PRODUCTS INC.
SINCE 1984

1610 Professional Boulevard • Suite K
Crofton, Maryland 21114

(Baltimore) T 410.793.0202
(Washington) T 301.858.0030

Bree Beach
D 443.267.2688
F 410.721.7472


bree@uepsales.com
www.uepsales.com

Company Name:	<i>Denver - Elek, Inc.</i>
Contact Name:	<i>Suzanne Price</i>
Mailing Address:	<i>8460 Kelso Drive, Essex, MD 21201</i>
City, State Zip Code:	
Telephone Number:	<i>410-574-8400</i>
Fax Number:	
Email Address:	<i>Estimating@Denver-Elek.com</i>

Company Name:	FRESH AIR CONCEPTS
Contact Name:	CHRIS WOLFREY
Mailing Address:	5195 RAYNOR AVE
City, State Zip Code:	LINTHICUM, MD. 21090
Telephone Number:	410-789-7800
Fax Number:	
Email Address:	Chris.W@4fac.com

Company Name:	
Contact Name:	
Mailing Address:	
City, State Zip Code:	
Telephone Number:	
Fax Number:	
Email Address:	

Chris Wolfrey
Cell 240-375-7528



**HVAC
Plumbing
Electrical**

5195 Raynor Avenue • Linthicum, MD 21090
410-789-7800 • Fax 410-789-7804

Chris.W@4fac.com www.4FAC.com

Company Name:	
Contact Name:	
Mailing Address:	
City, State Zip Code:	
Telephone Number:	
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Email Address:	

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ProView

Joe Corson
Private Project Consultant
Cell: 410.615.7074
jcorson@mail.thebluebook.com

10500 Little Patuxent Pkwy., Ste. 610, Columbia, MD 21044
Phone: 1.888.303.2243 Fax: 410.964.0430
An Employee-Owned Enterprise www.thebluebook.com

Company Name:	SEA RESEARCH
Contact Name:	DAVID FISCHER
Mailing Address:	
City, State Zip Code:	
Telephone Number:	301 770 0177
Fax Number:	
Email Address:	dfischer@searearch.com

Company Name:	
Contact Name:	
Mailing Address:	
City, State Zip Code:	
Telephone Number:	
Fax Number:	
Email Address:	




STRAYER CONTRACTING
2200 Old Orem's Rd.
Baltimore, MD 21220

MARK R. KREIS
Project Manager
mark.kreis@strayercontracting.com

Phone: (410) 686-4300
Fax: (410) 686-4400
Cell: (443) 852-4320

Company Name:	MYCO M&C
Contact Name:	
Mailing Address:	
City, State Zip Code:	
Telephone Number:	
Fax Number:	
Email Address:	



LARRY SNOOPS
Project Manager

11 North Washington Street
Telford, PA 18969

267.382.0267
267.372.0985
lsnoops@mycomechanical.com

mycomechanical.com

Company Name:	Hot & Cold Corp.
Contact Name:	Ahmed Ghani
Mailing Address:	7331 Old Alexandria Ferry Rd.
City, State Zip Code:	Clinton MD 20735
Telephone Number:	301-868-2600
Fax Number:	301-868-2601
Email Address:	ahmed@hotcoldcorporation.com

Company Name:	
Contact Name:	
Mailing Address:	
City, State Zip Code:	
Telephone Number:	
Fax Number:	
Email Address:	



Sung Bang
President & Founder
(301) 728-5364
1801 Research Blvd. Suite 580
Rockville, MD 20850
sung.bang@yeshvac.com
www.yeshvac.com

Company Name:	RSC electrical & Mechanical Inc
Contact Name:	Sean Tucker
Mailing Address:	Oregon Ave
City, State Zip Code:	Landover, MD
Telephone Number:	202-258-9840 / 202-398-7957
Fax Number:	
Email Address:	Sean-Tucker@rsccompany.com

Company Name:	
Contact Name:	
Mailing Address:	
City, State Zip Code:	
Telephone Number:	
Fax Number:	
Email Address:	



Shapiro & Duncan, Inc.
14620 Rothgeb Drive
Rockville, MD 20850
Tel: 301.315.6260 Ext. 2173
Fax: 301.315.6364
Direct Line: 240.778.2173
Cell: 443.538.8227
jmain@shapiroandduncan.com
www.shapiroandduncan.com

John Main
Director of Estimating

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City, State Zip Code:	
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www.fidelityengineering.com

Company Name:	
Contact Name:	
Mailing Address:	
City, State Zip Code:	
Telephone Number:	
Fax Number:	
Email Address	



Brian J. Romie, PE
Project Manager

3112 Lord Baltimore Drive
Baltimore, MD 21244

tel 410-265-6100
fax 410-298-9820
email bromie@jamesposey.com

jamesposey.com

Company Name:	
Contact Name:	
Mailing Address:	
City, State Zip Code:	
Telephone Number:	
Fax Number:	
Email Address	

Company Name:	
Contact Name:	
Mailing Address:	
City, State Zip Code:	
Telephone Number:	
Fax Number:	
Email Address	

Company Name:	
Contact Name:	
Mailing Address:	
City, State Zip Code:	
Telephone Number:	
Fax Number:	
Email Address	

Howard County Public Schools

Bid No. 023.19.B4-1 and 023.19.B4-2

Pre-Bid of Mt. View Middle School and Pointers Run Elementary School
HVAC Renovation Projects

PRE-BID MEETING ATTENDANCE SHEET

Date/Time: 12/10/18 3:00 PM


Please print clearly and complete all of the requested information. If your Business Card has all of this information you may simply staple it over an empty box. Please do not cover up other vendors cards.

Company Name:	Columbia Engineering Inc.
Contact Name:	MATTHEW McARDLE
Mailing Address:	6210 OLD ROBBIN LANE SUITE 150
City, State Zip Code:	Columbia MD 21045
Telephone Number:	410 992 9970 x104
Fax Number:	
Email Address	mcardle@columbiaing.com

Company Name:	TEMP A/C Co.
Contact Name:	NICK BOBES
Mailing Address:	51 Gwynns Hill Ct.
City, State Zip Code:	Owings Mills, MD 21117
Telephone Number:	410-358-8078
Fax Number:	410 358 8084
Email Address	NBOBES@TEMPACCOMPANY.COM

Company Name:	ATS Unlimited Const
Contact Name:	Butch Sain
Mailing Address:	15004 Marlboro Pike
City, State Zip Code:	Pasadena MD 21222
Telephone Number:	443-623-9572
Fax Number:	240-390-2481
Email Address	butch@asconstructionllc.com

Company Name:	
Contact Name:	
Mailing Address:	
City, State Zip Code:	
Telephone Number:	
Fax Number:	
Email Address	



Bauer Mechanical LLC.
2109 Maisel Street
Baltimore, Md. 21230
443.832.6020 Office
443.987.2336 Mobile
1.888.552.1617 Fax
www.bauermech.com

Ryan A. Bauer
President
rbauer@bauermech.com

Company Name:	FRESIL Air Concepts
Contact Name:	JASON HAZOIDS
Mailing Address:	5195 RAYOR AVE
City, State Zip Code:	LITTLETON CO 81090
Telephone Number:	410-789-7600
Fax Number:	
Email Address:	JASON.HC@FALCON

Company Name:	BRAWNE BUILDERS
Contact Name:	
Mailing Address:	
City, State Zip Code:	
Telephone Number:	
Fax Number:	
Email Address:	

Company Name:	
Contact Name:	
Mailing Address:	
City, State Zip Code:	
Telephone Number:	
Fax Number:	
Email Address:	

Phone: 410-242-0600 Fax: 410-242-8007



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Ed Doyle
Maintenance Estimator / Project Manager
edoyle@coleroofing.com

Mobile: 443-744-0915
3915 Coolidge Avenue
Baltimore, MD 21229

Company Name:	
Contact Name:	
Mailing Address:	
City, State Zip Code:	
Telephone Number:	
Fax Number:	
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FoutCraneSale@yahoo.com

Jesse Keene Cell: 240-566-2394
Office: 301-662-1989

Company Name:	Callas Contractors Inc.
Contact Name:	Andrew Campbell
Mailing Address:	10349 Downsville Pike
City, State Zip Code:	Hagerstown, Md 21740
Telephone Number:	301-671-3156 cell 240-291-8628
Fax Number:	301-739-7065 301-739-7065
Email Address:	acampbell@callascontractors.com

Company Name:	
Contact Name:	
Mailing Address:	
City, State Zip Code:	
Telephone Number:	
Fax Number:	
Email Address:	

Brian Giro
H.V.A.C. Specialist
President

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Baltimore, MD 21237

Email: bgiro@dynastics.com
Tel: 410-247-6750 Fax: 410-247-6794
www.dynastics.com

Company Name:	Howard County Public School System
Contact Name:	Daniel Lubeley
Mailing Address:	9020 Mendonhall Ct. Suite C
City, State Zip Code:	Blumberg, Md. 21045
Telephone Number:	410-313-8203
Fax Number:	
Email Address:	Daniel-Lubeley@hops.org

Company Name:	
Contact Name:	
Mailing Address:	
City, State Zip Code:	
Telephone Number:	
Fax Number:	
Email Address:	

TOM KRAFT, CCA, LEED AP BD+C
Senior Project Manager

J. Vinton Schafer & Sons, Inc.
1309-Q Continental Drive
Abingdon, MD 21009

P 410.335.3000
C 443.829.2350
F 410.335.6529
tkraft@jvschafer.com
www.quandel.com/schafer

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Company Name:	RSC Electrical + Mech
Contact Name:	Selency Bolden
Mailing Address:	1920 Oregon Ave
City, State Zip Code:	Camden Md
Telephone Number:	501 773 0414
Fax Number:	202 388 0329
Email Address:	Selency-Bolden@RSCCompany.com

Company Name:	R3T Pinkney
Contact Name:	RON PINKNEY
Mailing Address:	8523 WALKER MILL RD
City, State Zip Code:	Capitol Heights MD 20743
Telephone Number:	202 565 5290
Fax Number:	
Email Address:	Rpinkney@r3t+pinkney.com

Company Name:	XXXXXXXXXX R&T Pinkney
Contact Name:	JASON PINKNEY
Mailing Address:	8523 WALKER MILL RD
City, State Zip Code:	CAPITOL HEIGHTS MD, 20743
Telephone Number:	
Fax Number:	
Email Address	Jpinkney@randTPinkney.com

Company Name:	
Contact Name:	
Mailing Address:	
City, State Zip Code:	
Telephone Number:	
Fax Number:	
Email Address	

Company Name:	
Contact Name:	
Mailing Address:	
City, State Zip Code:	
Telephone Number:	
Fax Number:	
Email Address	

Company Name:	
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Mailing Address:	
City, State Zip Code:	
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Email Address	

Company Name:	
Contact Name:	
Mailing Address:	
City, State Zip Code:	
Telephone Number:	
Fax Number:	
Email Address	

Company Name:	XXXXXXXXXX R&T Pinkney
Contact Name:	Jason Pinkney
Mailing Address:	8523 WALKER MILL RD
City, State Zip Code:	CAPITOL HEIGHTS MD, 20743
Telephone Number:	
Fax Number:	
Email Address	Jpinkney@randtPinkney.com

Company Name:	
Contact Name:	
Mailing Address:	
City, State Zip Code:	
Telephone Number:	
Fax Number:	
Email Address	

Company Name:	
Contact Name:	
Mailing Address:	
City, State Zip Code:	
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Company Name:	
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