



**Webutuck Central School District
Auditorium Emergency Project
SED Control No.: 13-11-01-04-0-002-021
BCA Project No. 2022-012**

**Addendum No. 1
April 20, 2022**

To: All Bidders

This addendum is hereby made part of the Contract Documents as though it were originally included therein. It modifies the following documents:

Original Drawings and Project Manual dated 03/22/2022

All Bidders must acknowledge receipt of this Addendum in the space provided on the Form of Proposal.

NEW PROJECT MANUAL SECTIONS:

Bid Forms – Contract No. 2 – Mechanical Construction
26 5100 Interior Lighting

REVISED 24" x 36" DRAWINGS:

BID AD1 E600 – ELECTRICAL SCHEDULES

REVISIONS TO THE PROJECT MANUAL:

A. Refer to the TABLE OF CONTENTS:

1. Paragraph ALL CONTRACTORS, **ADD** the following:

“Form of Proposal – Contract No. 2 Mechanical Construction”

2. Paragraph DIVISION 26 – ELECTRICAL, **ADD** the following:

“26 5100 – Interior Lighting”

B. Refer to NOTICE TO BIDDERS

1. **AMEND** Paragraph 3 to read as follows:

“This work is to be bid under a MULTIPLE CONTRACT system covering the work of all trades under separate contracts as follows:

Contract No. 1 – General Construction
Contract No. 2 – Mechanical Construction
Contract No. 4 – Electrical Construction”

2. **AMEND** Paragraph 4 to read as follows:

“Sealed Bid Proposals will be received until **1:00 p.m.** prevailing time, on **Tuesday, May 17, 2022**, at the”

C. **ADD** new bid form for Contract No. 2 – Mechanical Construction, included as part of this Addendum.



D. Refer to Project Manual SECTION 01 1000 – PROJECT SUMMARY

1. **AMEND** Paragraph 1.09 to read as follows:
“1.09 CONTRACT NO. 2 – MECHANICAL (MC)”

2. **AMEND** Paragraph 1.09, 3., a. to read as follows:
“a.

All Sections of Division 23 EXCEPT 23 0923 – DIRECT-DIGITAL CONTROL SYSTEM FOR HVAC”, which will be purchased directly by the Owner.

E. **ADD** Project Manual SECTION 26 5100 – INTERIOR LIGHTING as included as part of this Addendum.

REVISIONS TO THE CONTRACT DRAWINGS:

A. Refer to Drawing ER100 – *Reference Plans*

1. At plan Detail 1 – First Floor Reference Plan, Electrical Room E180; **AMEND** equipment identification tag to read as “MDSB” in lieu of MDP.
2. At plan Detail 1 – First Floor Reference Plan, Electrical Room E180, adjacent to MDSP, **ADD** plan note to read:
“REWORK MDPS AS REQUIRED FOR INSTALLATION OF NEW 250A3P BREAKER IN AVAILABLE SPACE. PROVIDE 250A BREAKER FRAME AND BREAKER. BREAKER TO BE UL LISTED FOR USE IN EXISTING SWITCH GEAR. MATCH EXISTING POWER CHARACTERISTICS OF EXISTING SIEMENS #SBS2020 GEAR, VIF. SEE EQUIPMENT CONNECTION SCHEDULE FOR INFORMATION.”
3. At plan Detail 1 – First Floor Reference Plan, Power Room E153; **AMEND** equipment identification tag to read as “MDP” in lieu of SDP.

B. Refer to Drawing HS E600 – SCHEDULES

1. **DELETE** drawing HS E600 – Electrical Schedules in its entirety. **REPLACE** with new drawing E600 – Electrical Schedules issued as part of this addendum.

END OF ADDENDUM

Please do not hesitate to contact me with any questions on this addendum, thank you.

Respectfully Submitted,
BCA ARCHITECTS & ENGINEERS

Scott J. Duell, RA, LEED AP
Principal

FORM OF PROPOSAL
Webutuck Central School District
Auditorium Emergency Project

BID DESCRIPTION

CONTRACT NO. 2 – MECHANICAL CONSTRUCTION

Work under this Contract may generally be described to include, but not be limited to the following:

Procurement and general requirements; and all other work and related materials as indicated on the Contract Drawings, as specified herein, and as required for the complete and proper execution of the Work.

This outline is a general indication of the requirements of this Contract and is not intended to be all inclusive. The complete Contract Documents in their entirety, to include any and all addenda, form the basis of the responsibility of this Contract.

Each contractor is advised that the specification sections in Division 01 - General Requirements apply distinctly to each Prime Contractor and the balance of the technical specifications apply to each Contractor (as appropriate) for the accomplishment of his work.

All work of this contract shall be coordinated with other Prime Contractors involved in the project. All work shall additionally be coordinated with all other activities, construction, or others at each site throughout the progress of the work of this project.

The Contractor shall use all means possible and shall be responsible for coordinating the installation of all materials of this Contract with work of all other trades involved with this project. All work shall be done in strict accordance with the Contract Documents and in compliance with all applicable Local, State and Federal Codes.

Prior to the Bid Date of this project, the Contractor shall be completely responsible for visiting the project site to become completely familiar with the scope of this project.

Each bidder agrees to waive any claim it has or may have against the Owner, the Architect/Engineer, and the respective employees, arising out of or in connection with the administration, evaluation or recommendation of any bid.

It shall be completely understood that the use of asbestos containing materials in this project is strictly forbidden and all materials are provided in accordance with the Federal Asbestos Hazard Emergency Response Act (AHERA), and the New York State Asbestos Safety Act (SASA).

In addition to those items in the Base Bid, the Contractor shall further sub-divide his bid proposal as described in the following bid items, alternates, and/or unit prices. The Contractor shall include in the Base Bid all of the work of this Contract not specifically described in a Bid Item or Alternative. The Owner reserves the right to accept any and/or all of the Bid Items and/or Alternates or any combination thereof and to waive any informalities or defects in the bid proposals either before or after opening.

Bid Items:

Allowances – As described in Specification Section 01 2100 – Allowances

Bid Item No. 1 – Field Directive Allowance

Alternates – None

Unit Prices – None

**FORM OF PROPOSAL
Webutuck Central School District
Auditorium Emergency Project**

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FORM OF PROPOSAL
Webutuck Central School District
Auditorium Emergency Project

The Undersigned _____
Contractor

Address

Zip Code

hereby certifies that he/she has examined and fully comprehends the requirements and intent of the drawings and specifications as prepared by BCA Architects & Engineers, for **CONTRACT NO. 2 – MECHANICAL CONSTRUCTION** to furnish all labor, materials, supplies, plant and equipment and other facilities to properly perform the work for the total:

BASE BID SUM of

_____ DOLLARS (\$ _____)

Bid Item No. 1 – Field Directive Allowance

_____ Thirty Six Thousand DOLLARS (\$36,000.00 _____)

TOTAL BASE BID (Base Bid and Bid Item No. 1)

_____ DOLLARS (\$ _____)

Receipt of the following Addenda is hereby acknowledged:

No. _____ dated _____

No. _____ dated _____

No. _____ dated _____

No. _____ dated _____

No. _____ dated _____

No. _____ dated _____

No. _____ dated _____

No. _____ dated _____

(Name of Bidder)

Signed _____

Title _____

Street _____

City/State _____

Zip Code _____

Telephone _____

Fax _____

Cell Phone _____

Email _____

Date _____, 20__

NON-COLLUSIVE BIDDING CERTIFICATE

By submission of this bid, each bidder and each person signing on behalf of any bidder certifies, and in the case of a joint bid, each party thereto certifies as to its own organization, under penalty of perjury, that to the best of his knowledge and belief:

- (1) the prices in this bid have been arrived at independently without collusion, consultation, communication, or agreement, for the purpose of restricting competition, as to any matter relating to such prices with any other bidder or with any competitor;
- (2) unless otherwise required by law, the prices which have been quoted in this bid have not been knowingly disclosed by the bidder and will not knowingly be disclosed by the bidder prior to opening, directly or indirectly to any other bidder or to any competitor; and
- (3) no attempt has been made or will be made by the bidder to induce any other person, partnership or corporation to submit or not to submit a bid for the purpose of restricting competition.

(Signed) _____

 Title

RESOLUTION - for corporate bidders only

RESOLVED that _____ be authorized to sign and submit the bid or proposal
(individual)
of this corporation for the following project

(describe project)

and to include in such bid or proposal the certificate as to non-collusion required by Section 103-d of the General Municipal Law as the act and deed of such corporation, and for any inaccuracies or misstatements in such certificate this corporate bidder shall be liable under the penalties of perjury.

The foregoing is a true and correct copy of the resolution adopted by _____
corporation at a meeting of its Board of Directors held on the _____ day of _____, 20__.

SEAL OF CORPORATION)

Secretary

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**Statement Concerning Authority to do Business
in the State of New York for non-New York State Companies**

Please complete all requested information in both sections below.

A certificate of authority is required of out of state companies if the company has property, employees or agents used in conducting its business activities within the state of New York. Generally, business activities are defined as having an office in the state, making sales or promotional calls within the state, delivering products or merchandise and/or making service calls within the state.

Companies conducting mail order activities with New York customers are not considered doing business within New York State if the company **has no property, employees, agents and/or representatives in or, traveling into the state.** _____ is such a mail order company, and as such, is not
(Fill in company name)
required to hold a Certificate of Authority.

Performance under the attached bid will not result in any action that would result in a requirement to obtain a Certificate as all commerce will be conducted by mail. It is the opinion of the legal counsel for this firm:

Name _____
Address _____ (Complete the information)
Address _____
Telephone _____

that this firm is not required to file an Authority to do Business in New York State as required by Section 1301 of the NYS Business Corporate Law.

=====
Complete one of the following two acknowledgements in addition to above information.

Individual Acknowledgment for Sole Proprietors or Partnerships

Signature

State of _____
County of _____ ss.

On this ____ day of _____ two thousand and _____ before me, the subscriber, personally appeared _____ to me personally known and known to me to be the same person described in and who executed the within Instrument, and he/she acknowledged to me that he/she executed the same.

Notary Public

Corporate Acknowledgment for corporations or LLC's

Signature

State of _____
County of _____ ss.

On this ____ day of _____ two thousand and _____ before me personally known, who, being by me duly sworn did depose and say that he/she resides in _____ that he/she is the _____ of _____ the corporation described in, and which executed, the above Instrument; that he/she knows the seal of said corporation; that the seal affixed to said Instrument is such corporate seal; that it was so affixed by order of the Board of Directors of said corporation; and that he/she signed his/her name thereto by like order.

Notary Public

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FEDERAL LAW CERTIFICATION

I, _____ [insert name], the _____ [insert title] of
_____ [name of company], _____ [Nine Digit DUNS
Number] hereby swear or affirm that the following is true:

1. The company, its principles or entities related to the company named above, is not now, nor ever has been, debarred from contracting with the United States Government or any State government.
2. The company is not now under investigation by any agency of the Federal Government or the government of any State for any actions by the company, its principles or any related entity, for any alleged malfeasance or misfeasance of any kind or nature which could lead to a debarment from governmental contracting or criminal prosecution, as well as render any contracts signed in reliance on this certification voidable by the party relying on this certification. This includes any violations related to the Davis-Bacon Act, the federal prevailing wage statute, the Copeland Act and the Contract Hours and Safety Standards Act which covers hours of work and safety standards in federal public contracting.
3. I have full legal authority under my company's organizational documents or bylaws to make this certification on the company's behalf.
4. I understand that submission of a false statement on this document will subject me to criminal prosecution.

(Date)

(Signature)

THIS FORM MUST BE COMPLETED AND SUBMITTED WITH THE BID

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STATEMENT OF SURETY'S INTENT

To:

(Owner)

We have reviewed the Bid of _____

(Contractor)

of _____

(Address)

for _____

(Project)

Bids for which will be received on _____

(Bid Opening Date)

and wish to advise that should this Bid of the Contractor be accepted, and the Contract awarded to him, it is our present intention to become surety on the performance bond and labor and material bond required by the Contract.

Any arrangement for the bonds required by the Contract is a matter between the Contractor and ourselves and we assume no liability to you or third parties if, for any reason, we do not execute the requisite bonds.

We are duly authorized to do business in the State of New York.

Attest:

(Surety's Authorized Signature)

Attach Power of Attorney

**(Corporate Seal, if any.
If no seal, write "No Seal"
across this place and sign.)**

THIS FORM MUST BE COMPLETED AND SUBMITTED WITH THE BID

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CERTIFICATION OF COMPLIANCE WITH THE IRAN DIVESTMENT ACT

As a result of the Iran Divestment Act of 2012 (the "Act"), Chapter 1 of the 2012 Laws of New York, a new provision has been added to State Finance Law (SFL) § 165-a and New York General Municipal Law § 103-g, both effective Aprils 12, 2012. Under the Act, the Commissioner of the Office of General Services (OGS) will be developing a list of "persons" who are engaged in "investment activities in Iran" (both are defined terms in the law) (the "Prohibited Entities List"). Pursuant to SFL § 165-a(3)(b), the initial list is expected to be issued no later than 120 days after the Act's effective date at which time it will be posted on the OGS website.

By submitting a bid in response to this solicitation or by assuming the responsibility of a Contract awarded hereunder, each Bidder/Contractor, any person signing on behalf of any Bidder/Contractor and any assignee or subcontractor and, in the case of a joint bid, each party thereto, certifies, under penalty of perjury, that once the Prohibited Entities List is posted on the OGS website, that to the best of its knowledge and belief, that each Bidder/Contractor and any subcontractor or assignee is not identified on the Prohibited Entities List created pursuant to SFL § 165-a(3)(b).

Additionally, Bidder/Contractor is advised that once the Prohibited Entities List is posted on the OGS Website, any Bidder/Contractor seeking to renew or extend a Contract or assume the responsibility of a Contract awarded in response to this solicitation must certify at the time the Contract is renewed, extended or assigned that it is not included on the Prohibited Entities List.

During the term of the Contract, should the School District receive information that a Bidder/Contractor is in violation of the above-referenced certification, the School District will offer the person or entity an opportunity to respond. If the person or entity fails to demonstrate that he/she/it has ceased engagement in the investment which is in violation of the Act within 90 days after the determination of such violation, then the School District shall take such action as may be appropriate including, but not limited to, imposing sanctions, seeking compliance, recovering damages or declaring the Bidder/Contractor in default. The School District reserves the right to reject any bid or request for assignment for a Bidder/Contractor that appears on the Prohibited Entities List prior to the award of a contract and to pursue a responsibility review with respect to any Bidder/Contractor that is awarded a contract and subsequently appears on the Prohibited Entities List.

I, _____, being duly sworn, deposes and says that he/she is the _____ of the _____ Corporation and that neither the Bidder/ Contractor nor any proposed subcontractor is identified on the Prohibited Entities List.

SIGNED

SWORN to before me this

_____ day of _____

20____

Notary Public: _____

EITHER THIS FORM OR THE "DECLARATION OF BIDDER'S INABILITY TO PROVIDE CERTIFICATION OF COMPLIANCE WITH THE IRAN DIVESTMENT ACT" FORM ON THE FOLLOWING PAGE MUST BE COMPLETED AND SUBMITTED WITH THE BID

**DECLARATION OF BIDDER'S INABILITY TO PROVIDE CERTIFICATION OF COMPLIANCE
WITH THE IRAN DIVESTMENT ACT**

Bidders shall complete this form if they cannot certify that the bidder /contractor or any proposed subcontractor is not identified on the Prohibited Entities List. The District reserves the right to undertake any investigation into the information provided herein or to request additional information from the bidder.

Name of the Bidder: _____

Address of Bidder: _____

Has bidder been involved in investment activities in Iran? _____

Describe the type of activities including but not limited to the amounts and the nature of the investments (e.g. banking, energy, real estate) _____

If so, when did the first investment activity occur? _____

Have the investment activities ended? _____

If so, what was the date of the last investment activity? _____

If not, have the investment activities increased or expanded since April 12, 2012? _____

Has the bidder adopted, publicized, or implemented a formal plan to cease the investment activities in Iran and to refrain from engaging in any new investments in Iran? _____

If so, provide the date of the adoption of the plan by the bidder and proof of the adopted resolution, if any and a copy of the formal plan. _____

In detail, state the reasons why the bidder cannot provide the Certification of Compliance with the Iran Divestment Act below (additional pages may be attached):

I, _____ being duly sworn, deposes and says that he/she is the _____ of

the _____ Corporation and the foregoing is true and accurate.

SIGNED

SWORN to before me this

_____ day of _____, 20__

Notary Public: _____

**SECTION 26 5100
INTERIOR LIGHTING**

PART 1 GENERAL

1.01 SECTION INCLUDES

- A. Interior luminaires.
- B. Emergency lighting units.
- C. Exit signs.
- D. LED drivers.
- E. Fluorescent emergency power supply units.
- F. Luminaire accessories.

1.02 REFERENCE STANDARDS

- A. 47 CFR 15 - Radio Frequency Devices current edition.
- B. ANSI C82.11 - American National Standard for Lamp Ballasts - High Frequency Fluorescent Lamp Ballasts 2017.
- C. IEEE C62.41.2 - IEEE Recommended Practice on Characterization of Surges in Low-Voltage (1000 V and less) AC Power Circuits 2002 (Corrigendum 2012).
- D. IESNA LM-63 - ANSI Approved Standard File Format for Electronic Transfer of Photometric Data and Related Information 2002 (Reaffirmed 2008).
- E. IES LM-79 - Approved Method: Electrical and Photometric Measurements of Solid-State Lighting Products; Illuminating Engineering Society; 2008.
- F. IES LM-80 - Approved Method: Measuring Maintenance of Light Output Characteristics of Solid-State Light Sources 2021.
- G. NECA 1 - Standard for Good Workmanship in Electrical Construction 2015.
- H. NECA/IESNA 500 - Standard for Installing Indoor Lighting Systems 2006.
- I. NECA/IESNA 502 - Standard for Installing Industrial Lighting Systems 2006.
- J. NEMA LE 4 - Recessed Luminaires, Ceiling Compatibility 2012 (Reaffirmed 2018).
- K. NFPA 70 - National Electrical Code Most Recent Edition Adopted by Authority Having Jurisdiction, Including All Applicable Amendments and Supplements.
- L. NFPA 101 - Life Safety Code Most Recent Edition Adopted by Authority Having Jurisdiction, Including All Applicable Amendments and Supplements.
- M. UL 924 - Emergency Lighting and Power Equipment Current Edition, Including All Revisions.
- N. UL 1598 - Luminaires Current Edition, Including All Revisions.
- O. UL 8750 - Light Emitting Diode (LED) Equipment for Use in Lighting Products Current Edition, Including All Revisions.

1.03 ADMINISTRATIVE REQUIREMENTS

- A. Coordination:
 - 1. Coordinate the installation of luminaires with mounting surfaces installed under other sections or by others. Coordinate the work with placement of supports, anchors, etc. required for mounting. Coordinate compatibility of luminaires and associated trims with mounting surfaces at installed locations.
 - 2. Coordinate the placement of luminaires with structural members, ductwork, piping, equipment, diffusers, fire suppression system components, and other potential conflicts installed under other sections or by others.
 - 3. Coordinate the placement of exit signs with furniture, equipment, signage or other potential obstructions to visibility installed under other sections or by others.

4. Notify Architect of any conflicts or deviations from the contract documents to obtain direction prior to proceeding with work.

1.04 SUBMITTALS

- A. See Section 01 3300 - Submittal Procedures, for submittal process.
- B. Product Data: Provide manufacturer's standard catalog pages and data sheets including detailed information on luminaire construction, dimensions, ratings, finishes, mounting requirements, listings, service conditions, photometric performance, installed accessories, and ceiling compatibility; include model number nomenclature clearly marked with all proposed features.
 1. LED Luminaires:
 - a. Include estimated useful life, calculated based on IES LM-80 test data.
 - b. Include IES LM-79 test report upon request.
 2. Provide electronic files of photometric data certified by a National Voluntary Laboratory Accreditation Program (NVLAP) lab or independent testing agency in IESNA LM-63 standard format upon request.
- C. Manufacturer's Installation Instructions: Indicate application conditions and limitations of use stipulated by product testing agency. Include instructions for storage, handling, protection, examination, preparation, and installation of product.
- D. Maintenance Materials: Furnish the following for Owner's use in maintenance of project.
 1. See Section 01 6000 - Product Requirements, for additional provisions.
 2. Extra Lenses and Louvers: Two percent of total quantity installed for each type, but not less than one of each type.
 3. Extra LED Drivers: Two percent of total quantity installed for each type, but not less than one of each type.
- E. Project Record Documents: Record actual connections and locations of luminaires and any associated remote components.

1.05 QUALITY ASSURANCE

- A. Conform to requirements of NFPA 70.
- B. Maintain at the project site a copy of each referenced document that prescribes execution requirements.
- C. Manufacturer Qualifications: Company specializing in manufacturing the products specified in this section with minimum three years documented experience.

1.06 DELIVERY, STORAGE, AND PROTECTION

- A. Receive, handle, and store products according to NECA/IESNA 500 (commercial lighting), NECA/IESNA 502 (industrial lighting), and manufacturer's written instructions.
- B. Keep products in original manufacturer's packaging and protect from damage until ready for installation.

1.07 FIELD CONDITIONS

- A. Maintain field conditions within manufacturer's required service conditions during and after installation.

1.08 WARRANTY

- A. See Section 01 7800 - Closeout Submittals, for additional warranty requirements.
- B. Provide five year manufacturer warranty for all LED luminaires, including drivers. Warranty shall warrant performance, lifetime and color consistency of the luminaire.
- C. Provide five year pro-rata warranty for batteries for emergency lighting units.
- D. Provide ten year pro-rata warranty for batteries for self-powered exit signs.

PART 2 PRODUCTS

2.01 MANUFACTURERS - LUMINAIRES

- A. Acuity Brands, Inc: www.acuitybrands.com.
- B. Cooper Lighting, a division of Cooper Industries: www.cooperindustries.com.
- C. Hubbell Lighting, Inc: www.hubbellighting.com.
- D. Substitutions: See Section 01 6000 - Product Requirements except where individual luminaire types are designated with substitutions not permitted.

2.02 LUMINAIRE TYPES

- A. Furnish products along with components as indicated in luminaire schedule included on the drawings.
- B. Substitutions: See Section 01 6000 - Product Requirements except where individual luminaire types are designated with substitutions not permitted.

2.03 LUMINAIRES

- A. Manufacturers:
 - 1. Acuity Brands, Inc: www.acuitybrands.com.
 - 2. Cooper Lighting, a division of Cooper Industries: www.cooperindustries.com.
 - 3. Hubbell Lighting, Inc: www.hubbellighting.com.
 - 4. Philips Lighting North America Corporation; www.lightingproducts.philips.com/#sle.
 - 5. Substitutions: See Section 01 6000 - Product Requirements.
- B. Provide products that comply with requirements of NFPA 70.
- C. Provide products that are listed and labeled as complying with UL 1598, where applicable.
- D. Provide products listed, classified, and labeled as suitable for the purpose intended.
- E. Unless otherwise indicated, provide complete luminaires including lamp(s) and all sockets, ballasts, reflectors, lenses, housings and other components required to position, energize and protect the lamp and distribute the light.
- F. Unless specifically indicated to be excluded, provide all required conduit, boxes, wiring, connectors, hardware, supports, trims, accessories, etc. as necessary for a complete operating system.
- G. Provide products suitable to withstand normal handling, installation, and service without any damage, distortion, corrosion, fading, discoloring, etc.
- H. Recessed Luminaires:
 - 1. Ceiling Compatibility: Comply with NEMA LE 4.
 - 2. Luminaires Recessed in Insulated Ceilings: Listed and labeled as IC-rated, suitable for direct contact with insulation and combustible materials.
 - 3. Luminaires Recessed in Sloped Ceilings: Provide suitable sloped ceiling adapters.
- I. LED Luminaires:
 - 1. Components: UL 8750 recognized or listed as applicable.
 - 2. Tested in accordance with IES LM-79 and IES LM-80.
 - 3. Light source should be tested at a minimum case temperature of 70 degrees C.
 - 4. LED Estimated Useful Life: Minimum of 50,000 hours at 70 percent lumen maintenance, calculated based on IES LM-80 test data. The module shall not exceed a temperature specified by OEM manufacturer in order to maintain 50,000 hours of life.
 - 5. Modules shall conform to the lamp standard, IEC62471 'Photobiological Safety of Lamps and Lamp Systems'.
 - 6. Provide "future-proof" modules (module dimensions remain constant) with fixed dimension formats and fixed optical interfaces.
 - 7. Fixture shall have a negative temperature coefficient (NTC) which regulates the light output down if certain critical temperature points have been exceeded.

8. Provide fixtures with Fortimo LED systems portfolio utilizing LED Module and Driver.
9. Module must adhere to Zhaga compliant certified light engine, where applicable.
10. Minimum CRI shall be 80.
11. Correlated Color Temperature shall be within +/-245K of stated value. A range of commonly used CCT's (2,700K, 3,000K, 3,500K, 4,000K) shall be available to ensure that a wide variety of lighting needs can be met.
12. Provide 100% of units within 4 standard deviation color matching (SDCM).
13. Units shall be dimmable and feature 100% light run control interface that allows the same light source to be used on a 0-10V, phase cut, step dim, DALI, DMX/RDM network.
14. The module shall have a Tc point to measure application temperature.

2.04 EXIT SIGNS

- A. Manufacturers - Powered and Self-Luminous Signs:
 1. Acuity Brands, Inc: www.acuitybrands.com.
 2. Cooper Lighting, a division of Cooper Industries: www.cooperindustries.com.
 3. Hubbell Lighting, Inc: www.hubbellighting.com.
 4. Philips Lighting North America Corporation; www.lightingproducts.philips.com/#sle.
 5. Substitutions: See Section 01 6000 - Product Requirements.
- B. Description: Internally illuminated exit signs with LEDs unless otherwise indicated; complying with NFPA 101 and all applicable state and local codes, and listed and labeled as complying with UL 924.
 1. Number of Faces: Single or double as indicated or as required for the installed location.
 2. Directional Arrows: As indicated or as required for the installed location.
- C. Self-Powered Exit Signs:
 1. Operation: Upon interruption of normal power source or brownout condition exceeding 20 percent voltage drop from nominal, solid-state control automatically switches connected lamps to integral battery power for minimum of 90 minutes of rated emergency illumination, and automatically recharges battery upon restoration of normal power source.
 2. Battery: Sealed maintenance-free nickel cadmium unless otherwise indicated.
 3. Diagnostics: Provide power status indicator light and accessible integral test switch to manually activate emergency operation.
 4. Provide low-voltage disconnect to prevent battery damage from deep discharge.
 5. Self-Diagnostics: Provide units that self-monitor functionality and automatically perform testing required by NFPA 101 where indicated; provide indicator light(s) to report test and diagnostic status.
- D. Accessories:
 1. Provide compatible accessory high impact polycarbonate vandal shields where indicated.
 2. Provide compatible accessory wire guards where indicated.

2.05 DRIVERS

- A. Manufacturers:
 1. Philips Lighting Electronics/Advance: www.advance.philips.com.
 2. Lutron Electronics Company, Inc; www.lutron.com/#sle.
 3. Osram Sylvania: www.sylvania.com/#sle.
 4. Philips Lighting Electronics/Advance: www.advance.philips.com.
 5. Substitutions: See Section 01 6000 - Product Requirements.
 6. Manufacturer Limitations: Where possible, for each type of luminaire provide ballasts produced by a single manufacturer.
 7. Ballast shall be manufactured in a factory certified to ISO 9002 Quality System Standards.
 8. Manufacturer shall have a 20 year history of producing electronic ballasts for the North American market.
- B. Dimmable LED Drivers:
 1. Regulatory Requirements:

- a. Driver shall not contain any Polychlorinated Biphenyl (PCB).
- b. Underwriters Laboratories (UL) recognized for Dry and Damp location and Canadian Standards Association (CSA) certified where applicable.
- c. Compliant to UL 1310, First Edition, revised dated November 1, 2011.
- d. Comply with ANSI C62.41 Category A for transient protection.
- e. Comply with ANSI C82.11 where applicable.
- f. Comply with the requirements of the Federal Communications Commission (FCC) rules and regulations, Title 47 CFR part 18, Non-Consumer (Class A) EMI/RFI (conducted and radiated) and Class B for residential use.
- g. Driver shall comply with NEMA 410 for in-rush current limits.
- h. Driver shall meet the RoHS Directive 2002/95EC on the restriction of hazardous substances such as lead, cadmium, mercury, hexavalent chromium, PBB's and PBDE's.

2.06 FLUORESCENT EMERGENCY POWER SUPPLY UNITS

- A. Manufacturers:
 - 1. Iota Engineering, LLC: www.iotaengineering.com/#sle.
 - 2. Lithonia Lighting: www.lithonia.com/#sle.
 - 3. Philips Emergency Lighting/Bodine: www.bodine.com/#sle.
 - 4. Substitutions: See Section 01 6000 - Product Requirements.
- B. Description: Self-contained fluorescent emergency power supply units suitable for use with indicated luminaires, complying with NFPA 101 and all applicable state and local codes, and listed and labeled as complying with UL 924.
- C. Compatibility:
- D. Operation: Upon interruption of normal power source, solid-state control automatically switches connected lamp(s) to the fluorescent emergency power supply for minimum of 90 minutes of rated emergency illumination, and automatically recharges battery upon restoration of normal power source.
- E. Diagnostics: Provide accessible and visible multi-chromatic combination test switch/indicator light to display charge, test, and diagnostic status and to manually activate emergency operation.

2.07 ACCESSORIES

- A. Stems for Suspended Luminaires: Steel tubing, minimum 1/2" size, factory finished to match luminaire or field-painted as directed.
- B. Threaded Rods for Suspended Luminaires: Zinc-plated steel, minimum 1/4" size, field-painted as directed.
- C. Provide accessory plaster frames for luminaires recessed in plaster ceilings.

PART 3 EXECUTION

3.01 EXAMINATION

- A. Verify that field measurements are as shown on the drawings.
- B. Verify that outlet boxes are installed in proper locations and at proper mounting heights and are properly sized to accommodate conductors in accordance with NFPA 70.
- C. Verify that suitable support frames are installed where required.
- D. Verify that branch circuit wiring installation is completed, tested, and ready for connection to luminaires.
- E. Verify that conditions are satisfactory for installation prior to starting work.

3.02 PREPARATION

- A. Provide extension rings to bring outlet boxes flush with finished surface.
- B. Clean dirt, debris, plaster, and other foreign materials from outlet boxes.

3.03 INSTALLATION

- A. Install products according to manufacturer's instructions.
- B. Install luminaires securely, in a neat and workmanlike manner, as specified in NECA 1 (general workmanship), NECA 1 (general workmanship), and NECA 1 (general workmanship).
- C. Install luminaires plumb and square and aligned with building lines and with adjacent luminaires.
- D. Suspended Ceiling Mounted Luminaires:
 - 1. Do not use ceiling tiles to bear weight of luminaires.
 - 2. Do not use ceiling support system to bear weight of luminaires unless ceiling support system is certified as suitable to do so.
 - 3. Secure surface-mounted and recessed luminaires to ceiling support channels or framing members.
 - 4. Secure pendant-mounted luminaires to building structure with redundant air-craft safety cable.
 - 5. Secure lay-in luminaires to ceiling support channels using listed safety clips at four corners.
 - 6. In addition to ceiling support wires, provide two galvanized steel safety wire(s), minimum 12 gage, connected from opposing corners of each recessed luminaire to building structure.
- E. Recessed Luminaires:
 - 1. Install trims tight to mounting surface with no visible light leakage.
 - 2. Non-IC Rated Luminaires: Maintain required separation from insulation and combustible materials according to listing.
 - 3. Luminaires Recessed in Fire-Rated Ceilings: Install using accessories and firestopping materials to meet regulatory requirements for fire rating.
- F. Suspended Luminaires:
 - 1. Install using the suspension method indicated, with support lengths and accessories as required for specified mounting height.
 - 2. Install canopies tight to mounting surface.
 - 3. Unless otherwise indicated, support pendants from swivel hangers.
- G. Install accessories furnished with each luminaire.
- H. Bond products and metal accessories to branch circuit equipment grounding conductor.
- I. Emergency Lighting Units:
 - 1. Unless otherwise indicated, connect unit to unswitched power from same circuit feeding normal lighting in same room or area. Bypass local switches, contactors, or other lighting controls.
- J. Exit Signs:
 - 1. Unless otherwise indicated, connect unit to unswitched power from same circuit feeding normal lighting in same room or area. Bypass local switches, contactors, or other lighting controls.
- K. Emergency Power Supply Units:
 - 1. For field-installed units, install inside luminaire unless otherwise indicated. Where installation inside luminaire is not possible, install on top of luminaire.
 - 2. Unless otherwise indicated, connect unit to unswitched power from same circuit feeding normal ballast(s) in luminaire. Bypass local switches, contactors, or other lighting controls.
 - 3. Install lock-on device on branch circuit breaker serving units.
- L. Remote Ballasts: Install in accessible location as indicated or as required to complete installation, using conductors per manufacturer's recommendations not exceeding manufacturer's recommended maximum conductor length to luminaire.
- M. Identify luminaires connected to emergency power system in accordance with Section 26 0553.

3.04 FIELD QUALITY CONTROL

- A. See Section 01 4000 - Quality Requirements, for additional requirements.
- B. Inspect each product for damage and defects.
- C. Operate each luminaire after installation and connection to verify proper operation.
- D. Test to verify proper operation upon loss of normal power supply.
- E. Correct wiring deficiencies and repair or replace damaged or defective products. Repair or replace excessively noisy ballasts as determined by Architect.

3.05 ADJUSTING

- A. Aim and position adjustable luminaires to achieve desired illumination as indicated or as directed by Architect. Secure locking fittings in place.
- B. Aim and position adjustable emergency lighting unit lamps to achieve optimum illumination of egress path as required or as directed by Architect or authority having jurisdiction.
- C. Exit Signs with Field-Selectable Directional Arrows: Set as indicated or as required to properly designate egress path as directed by Architect or authority having jurisdiction.

3.06 CLEANING

- A. Clean surfaces according to NECA 500 (commercial lighting), NECA 502 (industrial lighting), and manufacturer's instructions to remove dirt, fingerprints, paint, or other foreign material and restore finishes to match original factory finish.

3.07 CLOSEOUT ACTIVITIES

- A. See Section 01 7800 - Closeout Submittals, for closeout submittals.
- B. Demonstration: Demonstrate proper operation of luminaires to Architect, and correct deficiencies or make adjustments as directed.
- C. Just prior to Substantial Completion, replace all lamps that have failed .

3.08 PROTECTION

- A. Protect installed luminaires from subsequent construction operations.

END OF SECTION

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EQUIPMENT CONNECTION SCHEDULE																							
ID	LOCATION		EQUIPMENT INFORMATION				CIRCUIT INFORMATION				MOTOR STARTER				DISCONNECT				FIRE ALARM FAN SHUT-DOWN	DUCT MOUNTED SMOKE DETECTOR(S)	SCHEDULE NOTES	ID	
	NAME	DESCRIPTION	MOTOR POWER	FLA	MCA	BREAKER SIZE	VOLT	PH	PANEL	WIRE & CONDUIT SIZE	DESCRIPTION	NEMA ENCLOSURE	FURNISH	INSTALL	LOCATION	DESCRIPTION	NEMA ENCLOSURE	FURNISH					LOCATION
ERU-1	AUDITORIUM ROOF		15.00hp	46.2 A	57.8 A	90 A	208 V	3	PPS	3#2 #65, 2" C	MANUF - SINGLE POINT POWER	3R	MANUF	MANUF	UNIT	MANUF - CIRCUIT BREAKER	3R	MANUF	UNIT	Y	Y		ERU-1
P-1	BOILER ROOM		0.19hp	2.4 A	3.0 A	15.0 A	208 V	3	BPA	2#12 #125, 1/2" C	DIV 23 - ELECTRICALLY COMMUTATED MOTOR	1	DIV 23	DIV 23	UNIT	DIV 26 - NON-FUSED SWITCH	1	DIV 26	UNIT	-	-		P-1
P-2	BOILER ROOM		0.19hp	2.4 A	3.0 A	15.0 A	208 V	3	BPA	2#12 #125, 1/2" C	DIV 23 - ELECTRICALLY COMMUTATED MOTOR	1	DIV 23	DIV 23	UNIT	DIV 26 - NON-FUSED SWITCH	1	DIV 26	UNIT	-	-		P-2
GML-1	BOILER ROOM		0.10hp	2.5 A	3.1 A	15.0 A	120 V	1	BPA	2#12 #125, 1/2" C	DIV 23 - ELECTRICALLY COMMUTATED MOTOR	1	DIV 23	DIV 23	UNIT	DIV 26 - NON-FUSED SWITCH	1	DIV 26	UNIT	-	-		GML-1

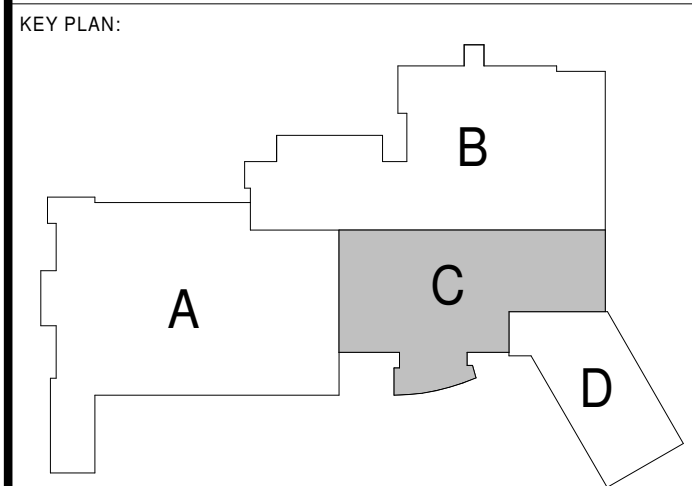
GENERAL NOTES:
 A. CONTRACTOR SHALL REFER TO SPECIFICATIONS REGARDING PROVIDING ADDITIONAL SPARE LAMPS, LENSES, AND GLOBES.
 B. INPUT WATTS FOR FIXTURES WITH LESS THAN 20 LUMENS/WATT ARE AN INCANDESCENT LAMP. PROVIDE AN LED EQUIVALENT LAMP RATED FOR MORE THAN 60 LUMENS/WATT IN ANY LIGHT FIXTURE NOT MANUFACTURED AS LED.
SCHEDULE NOTES:
 1. NO SUBSTITUTIONS PERMITTED.

INTERIOR LUMINAIRE SCHEDULE											SPECIFICATION 26 5100	
TYPE	DESCRIPTION	MFR. & CATALOG No.	LAMP	SIZE	VOLTAGE	MOUNTING	MOUNTING HEIGHT	UP/DOWN	REMARKS	FINISH	TYPE	
A1	4" LED DOWNLIGHT, DMX COMPATABLE, RGB	METEROR REN4-50-308C-120-DMX-45-BLK	LED	4" DIA	120	RECESSED	CEILING	50	2016		A1	
A1EM	4" LED DOWNLIGHT, DMX COMPATABLE, REMOTE BATTERY PACK, RGB	METEROR REN4-50-308C-120-DMX-45-BLK-EMP	LED	4" DIA	120	RECESSED	CEILING	50	2016	COORDINATE INSTALLATION OF TEST SWITCH WITH CONTRACTOR RESPONSIBLE FOR CEILING.	A1EM	
B1	HIGH CEILING LED DOWNLIGHT, DMX COMPATABLE, REMOTE BATTERY PACK, W+RGB	METEROR TSC-200-308-UNV-DMX-40-BLK-BRK-GSB-W+RGB	LED	6"wx17"	120	RECESSED	CEILING	20.9	15330		B1	
B1EM	HIGH CEILING LED DOWNLIGHT, DMX COMPATABLE, REMOTE BATTERY PACK, W+RGB, REMOTE BATTERY	METEROR TSC-200-308-UNV-DMX-40-BLK-BRK-GSB-EMP-W+RGB	LED	6"wx17"	120	RECESSED	CEILING	20.9	15330	COORDINATE INSTALLATION OF TEST SWITCH WITH CONTRACTOR RESPONSIBLE FOR CEILING.	B1EM	
EX1	THIN PROFILE DIE CAST LED EXIT LIGHT - SINGLE FACE WALL MOUNT	SIGNTEX RPR-BB-1-R-BA-TW-PF1	LED	3.25"x1"	UNV	UNIVERSAL	SEE ES000	2	-		EX1	
EX2	THIN PROFILE DIE CAST LED EXIT LIGHT - DOUBLE FACED CEILING MOUNT	SIGNTEX RPR-BB-2-R-BA-TW-TDF-PF2	LED	3.25"x1"	UNV	UNIVERSAL	SEE ES000	4	-		EX2	

BRANCH CONDUCTOR AND CONDUIT SCHEDULE			
OVER-CURRENT PROTECTION	PHASE CONDUCTORS AND/OR NEUTRAL CONDUCTORS	GROUND CONDUCTOR	CONDUIT
3-POLE CIRCUITS			
50A/3P	#6	#10	1" C
40A/3P	#8	#10	1" C
30A/3P	#10	#10	3/4" C
20A/3P	#12	#12	1/2" C
15A/3P	#12	#12	1/2" C
2-POLE CIRCUITS			
50A/2P	#6	#10	1" C
40A/2P	#8	#10	3/4" C
30A/2P	#10	#10	1/2" C
20A/2P	#12	#12	1/2" C
15A/2P	#12	#12	1/2" C
1-POLE CIRCUITS			
40A/1P	#8	#10	3/4" C
30A/1P	#10	#10	1/2" C
20A/1P	#12	#12	1/2" C
15A/1P	#12	#12	1/2" C

SCHEDULE NOTES:
 1. USE THIS SCHEDULE AS FOLLOWS:
 - FOR ALL RECEPTACLE AND LIGHTING CIRCUITS.
 - WHERE SPECIFIC CONDUCTOR/CONDUIT SIZING IS NOT INDICATED ELSEWHERE ON PLANS.
 - FOR ANY BRANCH CIRCUITS THAT ARE REQUIRED TO BE RELOCATED/EXTENDED, ETC.
 2. DO NOT USE THIS SCHEDULE AS FOLLOWS:
 - FOR LARGE MECHANICAL LOADS (REFER TO EQUIPMENT CONNECTION SCHEDULES).
 - FOR SERVICE ENTRANCE CONDUCTORS.
 - WHERE SPECIFIC CONDUCTOR/CIRCUIT IS INDICATED ON DRAWINGS.
 3. WHERE CIRCUIT LENGTH EXCEEDS 200LF, CONTRACTOR SHALL ADJUST PHASE/NEUTRAL CONDUCTOR SIZE TO COMPENSATE FOR VOLTAGE DROP. ALLOW FOR NO MORE THAN 3% VOLTAGE DROP ALONG LENGTH OF CONDUCTOR.

GENERAL NOTES:
 1. SEE DRAWING ES000 FOR APPLICABLE GENERAL NOTES, ABBREVIATIONS, SYMBOLS AND LEGENDS



SED CONTROL NO. 13-11-01-04-0-002-021
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BCA Architects & Engineers
 Ithaca | Saratoga Springs | Watertown
 WWW.THEBCAGROUP.COM



WEBUTUCK CENTRAL SCHOOL DISTRICT
 JR. SR. HIGH SCHOOL
 194 HAIGHT RD. AMENIA, NY 12501
 DUTCHESS COUNTY, NEW YORK

REV	DATE	DESCRIPTION
1	04.20.2022	Addendum No. 1

DRAWN BY JLE	PROJECT NUMBER 2022-012
CHECKED BY SGV	DATE 03/22/2022

ELECTRICAL SCHEDULES

SHEET NUMBER
E600