ADDENDUM NO. 1

September 1, 2022

CROWN POINT HIGH SCHOOL ATHLETIC FIELDS AND SITE IMPROVEMENTS
Crown Point, IN 46307

TO: ALL BIDDERS OF RECORD

This Addendum forms a part of and modifies the Bidding Requirements, Contract Forms, Contract Conditions, the Specifications, and the Drawings dated August 18, 2021 by Gibraltar Design. Acknowledge receipt of the Addendum in the space provided on the Bid Form. Failure to do so may subject the Bidder to disqualification.

This Addendum consists of Pages ADD 1-1 through ADD 1-4 and attached Addendum No. 1 from Gibraltar Design dated August 31, 2022 and consisting of 4 pages, added Specification Sections 06 61 00 – Fiberglass Dome and 07 21 27 – Cavity Foamed Insulation, revised Specification Sections 11 68 33 – Athletic Field Equipment and 26 56 68 – Exterior Athletic Lighting, and 24 drawings.

A. SPECIFICATION SECTION 00 00 20 – TABLE OF CONTENTS

1. **Add:**

   Specification Section 06 61 00 – Fiberglass Dome
   Specification Section 07 21 27 – Cavity Foamed Insulation

B. SPECIFICATION SECTION 00 31 00 – INDIANA BID FORM

1. **Replace:**

   The Bid Form with the attached revised Bid Form

C. SPECIFICATION SECTION 00 43 50 – SUBCONTRACTORS AND PRODUCTS LIST

Under Division 06 – Wood, Plastics, and Composites

1. **Add:**

   Specification Section 06 61 00 – Fiberglass Dome

Under Division 07 – Thermal and Moisture Protection

1. **Add:**

   Specification Section 07 21 27 – Cavity Foamed Insulation

D. SPECIFICATION SECTION 01 12 00 - MULTIPLE CONTRACT SUMMARY

1. **BID CATEGORY NO. 1 – SITEWORK/GENERAL TRADES**

   1. **Add:**

      Specification Section 06 61 00 – Fiberglass Dome
      Specification Section 07 21 27 – Cavity Foamed Insulation

E. SPECIFICATION SECTION 01 23 00 – BID ALTERNATES

1. **Replace:**

   The Bid Alternates section with the attached revised Bid Alternates section

CONTRACTOR'S BID FOR PUBLIC WORKS FORM NO. 96

Format (Revised 2013)
(Amended for CPCSC)

Crown Point High School - Athletic Fields and Site Improvements

Crown Point Community School Corporation
Crown Point, IN

PART I

(To be completed for all bids. Please type or print)

Date (month, day, year):_____

BIDDER (Firm) _____

Address _____ P.O. Box _____

City/State/Zip _____

Telephone Number: _____ Email Address: _____

Person to contact regarding this Bid_____

Pursuant to notices given, the undersigned offers to furnish labor and/or materials necessary to complete the public works project of:

_____
Insert Category No. (s) and Name(s)

Of public works project, ***Crown Point High School - Athletic Fields and Site Improvements***, in accordance with Plans and Specifications prepared by ***Gibraltar Design, 9102 N. Meridian St., Suite 300, Indianapolis, IN 46260***, as follows:

BASE BID

For the sum of _____
(Sum in words)

_____DOLLARS ($_____)
(Sum in figures)

The undersigned acknowledges receipt of the following Addenda:

Receipt of Addenda No. (s) _____

PROPOSAL TIME

Bidder agrees that this Bid shall remain in force for a period of sixty (60) consecutive calendar days from the due date, and Bids may be accepted or rejected during this period. Bids not accepted within said sixty (60) consecutive calendar days shall be deemed rejected.

Attended pre-bid conference YES _____ NO_____

Has visited the jobsite YES _____ NO_____

The Bidder has reviewed the Guideline Schedule in Section 01 32 00 and the intent Of the schedule can be met.

YES _____ NO_____

Bidder has included their Written Drug Testing Plan that covers all employees of the bidder who will perform work on the public work project and meets or exceeds the requirements set in IC 4-13-18-5 or IC 4-13-18-6.

YES _____ NO_____

The Skillman Corporation's diversity initiative is to create a program to encourage, assist and measure the active participation of Minority- Owned, Women-Owned, Veteran – Owned and Disabled Individual-Owned Businesses. The Program is to ensure that MWVDBEs are provided full and equal opportunity to participate in all Skillman Corporation's Projects.

Bidder has included:

DBE: YES _____% NO _____
MBE: YES _____% NO _____
WBE: YES _____% NO _____
VBE: YES _____% NO _____

The undersigned further agrees to furnish a bond or certified check with this Bid for an amount specified in the Notice to Bidders. If Alternate Bids apply, submit a proposal for each in accordance with the Plans and Specifications.

If additional units of material included in the contract are needed, the cost of units must be the same as that shown in the original contract if accepted by the governmental unit. If the bid is to be awarded on a unit bases, the itemization of the units shall be shown on a separate attachment.

The contractor and his subcontractors, if any, shall not discriminate against or intimidate any employee, or applicant for employment, to be employed in the performance of this contract, with respect to any matter directly or indirectly related to employment because of race, religion, color, sex, national origin, or ancestry. Breach of this covenant may be regarded as a material breach of the contract.

CERTIFICATION OF USE OF UNITED STATES STEEL PRODUCTS

I, the undersigned bidder, or agent as a contractor on a public works project, understand my statutory obligation to use steel products made in the United States (I.C. 5-16-8-2). I hereby certify that I and all subcontractors employed by me for this project will use U.S. steel on this project if awarded. I understand that violations hereunder may result in forfeiture of contractual payments.

ALTERNATE BIDS

A blank entry or an entry of "No Bid", "N/A", or similar entry on any Alternate will cause the bid to be rejected as non-responsive only if that Alternate is selected. If no change in the bid amount is required, indicate "No Change".

****MARK "ADD" OR "DEDUCT" FOR EACH ALTERNATE****

Alternate Bid No. 1 – Tennis Platform

Change the Base Bid the sum of_____
(sum in words)

_____DOLLARS ($_____) ADD DEDUCT
(sum in figures)

Alternate Bid No. 2 – Plexiglass Infill at Tennis Platform Guardrail

Change the Base Bid the sum of_____
(sum in words)

_____DOLLARS ($_____) ADD DEDUCT
(sum in figures)

Alternate Bid No. 3 – Banner Poles at Varsity Baseball and Softball Masonry Walls

Change the Base Bid the sum of_____
(sum in words)

_____DOLLARS ($_____) ADD DEDUCT
(sum in figures)

Alternate Bid No. 4 – Remove Existing Asphalt Walk and Add New Concrete Walk

Change the Base Bid the sum of_____
(sum in words)

_____DOLLARS ($_____) ADD DEDUCT
(sum in figures)

Alternate Bid No. 5 – New Infield, Backstop, Dugouts, Bullpens, Fencing at JV Baseball

Change the Base Bid the sum of_____
(sum in words)

_____DOLLARS ($_____) ADD DEDUCT
(sum in figures)

Alternate Bid No. 6 – Masonry Piers and Ornamental Fence Along Walkway South of Varsity Softball

Change the Base Bid the sum of_____
(sum in words)

_____DOLLARS ($_____) ADD DEDUCT
(sum in figures)

Alternate Bid No. 7 – Parking Lot East of Tennis Courts

Change the Base Bid the sum of_____
(sum in words)

_____DOLLARS ($_____) ADD DEDUCT
(sum in figures)

Alternate Bid No. 8 – Football Field Complete Multi-Purpose Field Lighting System

Change the Base Bid the sum of_____
(sum in words)

_____DOLLARS ($_____) ADD DEDUCT
(sum in figures)

Alternate Bid No. 9 – Foul Pole Netting System

Change the Base Bid the sum of_____
(sum in words)

_____DOLLARS ($_____) ADD DEDUCT
(sum in figures)

Alternate Bid No. 10 – JV Baseball and Softball Scoreboards System

Change the Base Bid the sum of_____
(sum in words)

_____DOLLARS ($_____) ADD DEDUCT
(sum in figures)

Alternate Bid No. 11 – Chair Style Seating at Varsity Baseball and Softball

Change the Base Bid the sum of_____
(sum in words)

_____DOLLARS ($_____) ADD / DEDUCT
(sum in figures)

Alternate Bid No. 12 – Banner Poles Along Walkways to Baseball and Softball Venues

Change the Base Bid the sum of_____
(sum in words)

_____DOLLARS ($_____) ADD / DEDUCT
(sum in figures)

PART II

(For projects of $150,000 or more – IC 36-1-12-4)

These statements to be submitted under oath by each bidder with and as a part of his bid. (Attach additional pages for each section as needed.)

SECTION I EXPERIENCE QUESTIONNAIRE

1. What public works projects has your organization completed for the period of one (1) year prior to the date of the current bid?

Contract Amount	Class of Work	Completion Date	Name and Address of Owner

2. What public works projects are now in process of construction by your organization?

Contract Amount	Class of Work	Completion Date	Name and Address of Owner

3. Have you ever failed to complete any work awarded to you?_____If so, where and why?

_____

_____

_____

4. List references from private firms for which you have performed work.

_____

_____

_____

SECTION II PLAN AND EQUIPMENT QUESTIONNAIRE

1. Explain your plan or layout for performing proposed Work. (Examples could include a narrative of when you could begin, complete the project, number of workers, etc. and any other information which you believe would enable the governmental unit to consider your bid.)

2. Please list the names and addresses of all subcontractors (i.e. persons or firms outside your own firm who have performed part of the work) that you have used on public works projects during the past five (5) years along with a brief description of the work done by each subcontractor.

3. If you intend to sublet any portion of the work, state the name and addresses of each subcontractor, equipment to be used by the subcontractor, and whether you will required a bond. However, if you are unable to currently provide a listing, please understand a listing must be provided prior to contract approval. Until the completion of the proposed project, you are under a continuing obligation to immediately notify the governmental unit in the event that you subsequently determine that you will use a subcontractor on the proposed project.

4. What equipment do you have available to use for the proposed Project? Any equipment used by subcontractors may also be required to be listed by the governmental unit.

_____

_____

_____

_____

5. Have you into contracts or received offers for all materials which substantiate the prices used in preparing your proposal? If not, please explain the rationale used which corroborate the process listed.

_____

_____

_____

_____

SECTION III CONTRACTOR'S FINANCIAL STATEMENT

Attachment of Bidder's financial statement is mandatory. Any Bid submitted without said financial statement as required by statute shall thereby be rendered invalid. The financial statement provided hereunder to the governing body awarding the Contract must be specific enough in detail so that said governing body can make a proper determination of the Bidder's capability for completing the Project if awarded.

SECTION IV CONTRACTOR NON-COLLUSION AFFIDAVIT

The undersigned Bidder or agent, being duly sworn on oath, says that he has not, nor has any other member, representative, or agent of the firm, company, corporation or partnership represented by him, entered into any combination, collusion or agreement with any person relative to the price to be bid by anyone at such letting nor to prevent any person from bidding nor to induce anyone to refrain from bidding, and that this Bid is made without reference to any other bid and without any agreement, understanding or combination with any other person in reference to such bidding.

He further says that no person or persons, firms, or corporations has, have, or will receive directly or indirectly, any rebate, fee, gift, commission, or thing of value on account of such contract.

SECTION V OATH AND AFFIRMATION

I HEREBY AFFIRM UNDER THE PENALTIES OF PERJURY THAT THE FACTS AND INFORMATION CONTAINED IN THE FOREGOING BID FOR PUBLIC WORKS ARE TRUE AND CORRECT

Dated at _____this _____ day of _____, 20

_____
(Name of Organization)

By

_____

_____
(Title of Person Signing)

ACKNOWLEDGEMENT

STATE OF _____)
) SS:
COUNTY OF _____)

Before me, a Notary Public, personally appeared the above-named

_____

Swore that the statements contained in the foregoing document are true and correct.

Subscribed and sworn to before me this _____ day of _____,

_____
(Title)

_____
Notary Public

My Commission Expires: _____

County of Residence: _____

END OF SECTION 00 31 00

SECTION 01 23 00 - ALTERNATES

PART 1 - GENERAL

1.01 RELATED DOCUMENTS

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

1.02 PURPOSE

A. The Bids for the Alternates described herein are required in order for the Owner to obtain information necessary for the proper consideration of the Project in its entirety.

1.03 ALTERNATES

A. Definitions: Alternates are defined as alternate products, materials, equipment, installations, or systems for the Work, which may, at Owner's option and under terms established by Instructions to Bidders, be selected and recorded in the Owner-Contractor Agreement to either supplement or displace corresponding basic requirements of Contract Documents. Alternates may or may not substantially change scope and general character of the Work; and must not be confused with "allowances", "unit prices", "change orders", "substitutions", and other similar provisions.

1.04 SCHEDULE OF ALTERNATES

A. ALTERNATE NO. 1: State the cost to provide a Tennis Platform. **Base Bid:** No Work.

B. ALTERNATE NO. 2: State the cost to provide plexiglass infill at Tennis Platform guardrail. **Base Bid:** Picket Railing System at Tennis Platform guardrail.

C. ALTERNATE NO. 3: State the cost to provide a Banner Poles at Varsity Baseball and Softball masonry walls, including all support system. **Base Bid:** No Work.

D. ALTERNATE NO. 4: State the cost to remove existing asphalt walk and add new concrete walk. **Base Bid:** Grind and resurface asphalt.

E. ALTERNATE NO. 5: State the cost to provide new infield, backstop, dugouts, bullpens, and fencing at JV Baseball. **Base Bid:** No Work.

F. ALTERNATE NO. 6: State the cost to provide masonry piers and ornamental fence along walkway south of Varsity Softball. **Base Bid:** All ornamental fence.

G. ALTERNATE NO. 7: State the cost to grind down 2" and install new 2" topping on Parking Lot east of the Tennis Courts. **Base Bid:** No work.

H. ALTERNATE NO. 8: State the cost to provide Multi-Purpose Field lighting, power feeds, poles, conduits, etc. as a complete system for the Football Stadium. **Base Bid:** No work.

I. ALTERNATE NO. 9: State the cost to provide Foul Pole netting system as specified on existing poles. **Base Bid:** No netting system being installed, leaving existing poles intact.

J. ALTERNATE NO. 10: State the cost to provide JV Baseball and Softball Scoreboards, complete installation, including power, structure, data connections, labor, etc. **Base Bid:** No work.

K. ALTERNATE NO. 11: State the cost to provide chair style seating at both Varsity Baseball and Softball, provide and install the Preferred Seat, Model #490 Dimensions Chair, complete, as manufactured by Preferred Seating, LLC, Indianapolis, Indiana, low riser mounted. **Base Bid:** The Solera Model as manufactured by Irwin Seating.

L. ALTERNATE NO. 12: State the cost to provide new Banner Poles along walkways to the Baseball and Softball venues, including all accessories and concrete base. **Base Bid:** No work.

PART 2 - PRODUCTS, PART 3 - EXECUTION (Not Used)

END OF SECTION 01 23 00

ADDENDUM ONE

Addendum One (AD.01) to the drawings and specifications prepared by Gibraltar Design for **Crown Point High School Athletic Fields and Site Improvements** for Crown Point Community School Corporation, Crown Point, Indiana.

All Contractors bidding on this project shall read all of the items covered below and shall comply with all of the requirements as set forth, including any necessary refinements or additions generated by this Addendum and required by the intent of the original contract documents. All Contractors shall acknowledge on their bid form that they have received this Addendum and include the appropriate content of same within their bid proposal.

SPECIFICATIONS

1. **Specification Section 00 01 10 Table of Contents**
   A. Add new Specification Sections 06 61 00, Fiberglass Dome, to Division 6 and 07 21 27, Cavity Foamed Insulation, to Division 7 on the Table of Contents.
2. **Specification Section 06 61 00 Fiberglass Dome**
   A. Add Specification Section 06 61 00, Fiberglass Dome, included in this Addendum, to the Project Manual.
3. **Specification Section 07 21 27 Cavity Foamed Insulation**
   A. Add Specification Section 07 21 27, Cavity Foamed Insulation, included in this Addendum, to the Project Manual.
4. **Specification Section 11 68 33 Athletic Field Equipment**
   A. Replace Specification Section 11 68 33 in its entirety with Specification Section 11 68 33 included in this Addendum.
5. **Specification Section 26 56 68 Exterior Athletic Lighting**
   A. Replace Specification Section 26 56 68 in its entirety with Specification Section 26 56 68 included in this Addendum.

DRAWINGS

6. **Sheet C-2.0**
   A. Disregard plan notes on this sheet. Refer to enlarged site plans on sheets C-2.1 and C-2.2 for plan notes.
7. **Sheet C-2.1**
   A. Refer to revised, full-size drawing, included in this Addendum, for revised plan notes as indicated on drawing.

8. Sheets C-2.1A and C-2.1B

A. Refer to two (2) attached revised full-size drawings, included in this Addendum, for the following revisions:

1. Add additional dimensions for clarification.

9. Sheet C-2.2

A. Refer to revised, full-size drawing, included in this Addendum, for revised plan notes as indicated on drawing.

10. Sheet C-4.0

A. Refer to revised, full-size drawing, included in this Addendum, for revised details as indicated on drawing.

11. Sheet C-4.1

A. Refer to revised, full-size drawing, included in this Addendum, for added shotput and asphalt pavement details.

12. Sheet C-4.3

A. Refer to revised, full-size drawing, included in this Addendum, for revised Detail 3/C-4.3 as indicated on drawing.

13. Sheet S-100N

A. Refer to revised, full-size drawing, included in this Addendum, for the following revisions:

1. References to scoreboards added for baseball and softball field.
2. Masonry pier detail reference updated for piers at softball field.

14. Sheet S-100S

A. Refer to revised, full-size drawing, included in this Addendum, for the following revisions:

1. References to scoreboards added for baseball and softball field.

15. Sheet S-104

A. Refer to revised, full-size drawing, included in this Addendum, for Detail 7 adjusted to show 2" block on each side of tube lintel.

16. Sheet S-106

A. Refer to revised, full-size drawing, included in this Addendum, for adjusted end bay dimensions.

17. Sheet S-108

A. Refer to revised, full-size drawing, included in this Addendum, for the following revisions:

1. Baseball scoreboard structural plan added, along with associated details.
2. Masonry pier with concrete base detail added.

18. Sheet A-106

A. Refer to revised, full-size drawing, included in this Addendum, for the following revisions:

1. Revise 3/A-106 plan and elevation.
2. Add section 9/A-106 and details 7,8,10,11/A-106.

19. Sheet M-101

A. Refer to revised, full-size drawing, included in this Addendum, for revised location of exhaust grill in Concessions A-101.

20. Sheet P-001

A. Refer to revised, full-size drawing, included in this Addendum, for the following revisions:

1. Revised Plumbing Equipment Schedule to add bottle fillers.

21. Sheet P-002

A. Refer to revised, full-size drawing, included in this Addendum, for the following revisions:

1. Revised Riser Diagram to add bottle filer.
2. Revised location of SC-1.

22. Sheet P-101

A. Refer to revised, full-size drawing, included in this Addendum, for the following revisions:

1. Revised location of SC-1.
2. Added two bottle fillers.

23. Sheet E-001

A. Refer to revised, full-size drawing, included in this Addendum, for the following revisions:

1. Add lighting fixture Type WA.

24. Sheet E-003

A. Refer to revised, full-size drawing, included in this Addendum, for the following revisions:

1. Revised number of conduits for primary service.
2. Revised location of the new utility meter.

25. Sheet E-005

A. Refer to revised, full-size drawing, included in this Addendum, for the following revisions:

1. Revised PP-1 panel schedule to reflect additional hand dryer circuits.

26. Sheet ES101

A. Refer to revised, full-size drawing, included in this Addendum, for the following revisions:

1. Added approximate location of existing junction box.
2. Added 4" conduit run.
3. Added a new sheet note.

27. Sheet ES102

A. Refer to revised, full-size drawing, included in this Addendum, for the following revisions:

1. Added approximate location of new pad mounted utility XFMR.
2. Added 4" conduit run.
3. Added a new sheet note.

28. Sheet EL102

A. Refer to revised, full-size drawing, included in this Addendum, for the following revisions:

1. Revised ticket booth lighting to utilize type WA wall sconces.

29. Sheet EP101

A. Refer to revised, full-size drawing, included in this Addendum, for the following revisions:

1. Revised number of conduits for the utility primary.
2. Added additional hand dryer locations.

Pages 1 through 4, inclusive, Specification Sections 06 61 00, 07 21 27, 11 68 33 and 26 56 68; and Twenty-Four (24) Full-Size Drawings, constitute the total makeup of **Addendum One**.

GIBRALTAR DESIGN

Joseph P. Briggs

Y:\21-120 Crown Point CSC - Crown Point HS Athletic Fields and Site Improvements\Specs\Addendum One\AD01.doc

SECTION 06 61 00
FIBERGLASS DOME

1 General

1.1 Section Includes

A. Architectural Fiberglass Reinforced Polymer (FRP) Decorative Self-Supporting Dome for exterior application.

1.2 Related Sections

A. Section 05 12 00 – Structural Steel: Attachment of dome frame.

B. Section 06 10 00 – Rough Carpentry, miscellaneous framing.

C. Section 07 21 27 – Enclosed Cavity Foamed Insulation: For finish foam inslation installation.

D. Section 07 90 00 – Sealant: Joint Sealants and field applied sealant.

1.3 System Description

A. Architectural fiberglass dome shall be designed as a self-supporting fiberglass structure with integral framing system. No additional skeleton structural framing shall be required to support the fiberglass dome.

B. Installed architectural fiberglass dome and fastening systems shall be designed, engineered, fabricated, and installed to conform to the state codes, local codes, and the Architect's design. **Fiberglass Dome shall be designed under the supervision of, and approved by, a professional engineer registered in the state of Indiana and all submittal drawings shall bear his stamp.**

1.4 Quality Assurance

A. Obtain architectural fiberglass dome from a single source manufacturer that has the ability and resources to comply with the requirements and schedule of the project.

1. Provide a list of dome projects demonstrating the capability of manufacturing domes comparable in size, scope, and complexity as indicated in the documents.

2. Manufacturer: Provide products manufactured by a firm specializing in the manufacture of fiberglass architectural domes, in the United States with a minimum of ten (10) years experience.

B. Manufacturer to comply with Quality Control & Assurance Procedures and fabricate architectural fiberglass based upon provisions published in the "Guidelines and Recommended Practices for Fiberglass Reinforced Plastic Architectural Products".

C. Inspect each molded dome section to ensure that it complies with specified requirements, including nominal dimensions.

1.5 Submittals

A. Submit Shop Drawings: Include plans, elevations, sections, profiles, and details of dome sections. Illustrate dimensions, adjacent construction, materials, thickness, fabrications details, required clearances, field jointing, colors, finishes, methods of support, attachments, anchorage to substrates, integration of components, and list of part numbers that coordinate with labeled architectural fiberglass parts.

B. Submit Manufacturer's current valid certification with the Certified Composites Technician (CCT) program created by the American Composites Manufacturers Association (ACMA).

C. Product Data: Submit Manufacturer's product data and installation instructions.

D. Product Samples: Submit minimum 3-inch x 5-inch samples in specified color, texture and finish when applicable.

1.6 Delivery, Storage, and Handling

A. Handle, store and transport architectural fiberglass dome according to Manufacturer's recommendations and in a manner that prevents damage.

B. Protect architectural fiberglass from damage by retaining any shipping protection and store in a secure place until installation.

C. Except for damage caused by others, the installer is responsible for chipping, cracking, or other damage to fiberglass fabrications, after delivery to the jobsite and until installation is completed and inspected and approved by the Architect or Owner's representative.

1.7 Warranty

A. Warrant architectural fiberglass dome to be free from defect due to materials and workmanship for one year damage.

2 Products

2.1 Accepable Manufacturers

A. Architectural Fiberglass, Inc., Cleveland, Ohio.

B. Or Approved Equal.

2.2 Fabrication Pattern/Molds

A. Custom Pattern/Mockup: Patterns and mockups shall be hand-carved and/or CNC machined by skilled pattern makers with minimum of ten (10) years experience with architectural elements. Patterns and mockups shall be available at manufacturing facility for Architect's inspection and approval before molds are produced.

B. Custom Molds: Molds shall be produced with ample layers of tooling resin, tooling gel-coat, glass fibers and/or flexible rubber by skilled mold makers with minimum of ten (10) years experience with architectural elements. Produced molds shall have rigidity and thickness to prevent distortion and deflection of molded architectural fiberglass.

2.3 Materials Characteristics

A. Molded Exterior Surface: U-V inhibited, NPG-ISO polyester gel coat, 18 to 22 mils thick. Color to match in texture and finish of sample supplied by Architect.
B. Barrier Coat: Specifically formulated backup polyester surface veil 18-20 mils thick to prevent glass print through and ultimate Class A finish.
C. Back Up Laminate:
   1. Resin: Polyester resin shall be fire retardant and meet Class 1 flame spread rating of 25 or less and smoke density under 450 without the use of antimony trioxide as characterized by the ASTM E-84 tunnel test at typical 1/8" glass mat laminate. General purpose resin will not be permitted.
   2. Filler: Functional filler to be added to resin matrix to minimize shrinkage, add stiffness, control opacity, add fire retardance, improve surface finish, minimize crazing, and control dimensional stability from weather extremes.
   3. Fiberglass Reinforcement: Type "E" fiberglass, glass cloth, matt and/or random chopped glass fibers. Glass content approximately 20% to 30%.
   4. Laminate Thickness: Nominal laminate shall be minimum 3/16" thickness. Larger dome sections shall be manufactured with additional core reinforcements and/or sandwich structure added as required for rigidity and structural integrity.

2.4 Fabrication

A. Dome shall be fabricated with integral framing system without the need for additional skeleton framing after assembly.
B. Dome sections shall be formed with assembly bolting flanges with sufficient depth to provide structural integrity and to accommodate gaskets, fasteners, and sealant.
C. Dome sections shall be manufactured for proper panel-to-panel alignment and for weather-tight installation.
D. Dome sections shall be manufactured as a single unit spanning entire profile from base of dome to top of dome.
E. Connection flanges shall be reinforced with polywood or other treated rot-proof material for connection to building substrate.
F. Dome sections shall be factory pre-drilled, labeled, and pre-assembled for field reassembly.

G. Cure and clean all components prior to shipment and remove material which may be toxic to plant or animal life or compatible with adjacent building materials.

2.5 Mechancial Properties and Tolerances

A. Average Properties:

PROPERTY	VALUE	TEST METHOD
Tensile Strength	12,000 PSI	ASTM D638
Flexural Strength	20,000 PSI	ASTM D790
Flexural Modulus	0.9 x 10^6 PSI	ASTM D790
Compressive Strength	17,000 PSI	ASTM D695
Bearing Strength	9,000 PSI	ASTM D638
Thermal Expansion	10 x 10^{-6} (°F)	
Specific Gravity	1.5	

B. Tolerances:re.
1. Part Thickness: + or – 1/8 inch.
2. Gel Coat Thickness: + or – 2.5 mils.
3. Length: + or – 1/8.
4. Variation from Square: 1/8 inch.
5. Hardware Location Variation: + or – 1/4 inch.

2.6 Identification

A. Identify each architectural fiberglass dome section to coordinate with shop drawings.
B. Number dome sections showing sequence of assembly.

2.7 Anchors and Fasteners

A. Contractor is to provide anchors, fasteners, gaskets, and other accessories for proper installation of architectural fiberglass dome as recommended and approved by fiberglass fabrication manufacturer. Dome manufacturer to specify the above accessories.

2.8 Finish

A. Dome shall be finished with Sherwin Williams Polane S Plus Polyurethane Enamel Coating as selected by Architect or Owner's representative. Surface texture / exposed side shall be smooth or textured based upon approved sample.

3 Execution

3.1 Examination

A. Examine substrates under which insulation systems will be installed, for compliance with requirements. Verify field conditions will provide for a successful instalaltion.

B. Proceed with installation only after unsatisfactory conditions have been corrected.

3.2 Installation

A. Install architectural fiberglass dome in accordance with Manufacturer's instructions and approved shop drawings.
B. Apply continuous run of sealant and expandable cellular foam gasket as recommended per Manufacturer's instructions and approved shop drawings to the bolting flanges of all sections for weather-tight installation.
C. Dome to be assembled on level surface and raised into place.
D. Exterior dome shall be field insulated for water tightness and to prevent condensation when installed on unfinished roof or when interior fiberglass dome is required. Field applied spray insulation to be sprayed on interior surface of exterior dome. Insulation shall be sprayed and encapsulate entire surface including attachment flanges, anchor bolts, assembly bolts, and perimeter bolting flange.
E. Flashing shall be installed around the perimeter of the dome structure per Manufacturer's instructions and approved shop drawings.
F. Exterior dome shall receive final sealant application on the exterior joints after installation.
G. Interior dome joints (when applicable) shall be finished with polyester body filler and fiberglass mesh tape. Joints to be filled, sanded, primed and painted for monolithic appearance.

3.3 Tolerances

A. Maximum Offset from True Alignment: 1/8 inch in 10 feet.

B. Maximum Variation from True Position: 1/4 inch in 10 feet.

3.4 Cleaning

A. Clean installed architectural fiberglass dome using cleaning methods and material approved by Manufacturer.

3.5 Protection

A. Comply with Manufacturer's recommendations and instructions for protecting installed dome during construction activities.

END OF SECTION

SECTION 07 21 27
ENCLOSED CAVITY FOAMED INSULATION

1 General

1.1 Summary

A. Section Includes enclosed cavity foamed insulation and air barrier system.

1.2 Submittals

A. Submit shop drawings and product data under provisions of Division 01.

B. Product Data: For each material indicated, including manufacturer's preparation and installation data.

C. Shop Drawings: Wall elevations and details showing extend of cavity foamed insulation, intersections with adjacent surfaces, details at window and other opening perimeters, details of expansion joints, flashing, and other items for a complete insulation and air barrier system.

D. Test Reports: Indicating compliance with specified requirements.

E. Certificates:

1. Installer certificates indicating accreditation by SPFA (Spray Polyurethane Foam Alliance).

1.3 Quality Assurance

A. Installer Qualifications: An experienced firm who is approved by manufacturer to install manufacturer's products and who has successfully completed similar installations.

1. Applicator: Currently accredited by SPFA (Spray Polyurethane Foam Alliance).

2. Provide list of minimum three completed installations within the last three years.

B. Comply with Indiana Energy Conservation code (ASHRAE 90.1 – 2007).

1.4 Delivery, Storage and Handling

A. Deliver, store and handle materials in accordance with Division 01.

B. Deliver and store materials and other products in their original unopened containers or packaging until ready for installation.

C. Store and protect materials in accordance with manufacturer's recommendations.

1.5 Project Conditions

A. Maintain environmental conditions (temperature, humidity, and ventilation) within limits recommended by manufacturer for optimum results. Do not install products when environmental conditions are beyond manufacturer's limits.

B. Weather Limitations: Proceed with installation only when existing and forecasted weather conditions permit cavity foamed insulation/air barrier system to be installed according to manufacturer's written instructions.

2 Products

2.1 Manufacturer and System

A. BASF Polyurethane Foam Enterprises LLC; Walltite.

B. Icynen Polyurethane Spray Foam Insulation; Mississauga, Ontario.

2.2 Materials

A. Foam Insulation Air Barrier System: Two-component, closed-cell, rigid-class polyurethane foam, sprayed-in-place, with the following properties:

1. Density: ASTM D1622, Nominal 2 pounds per cubic foot.
2. Water Vapor Permeance: ASTM E96, 1.4 perms at 1"
3. Compressive Strength: ASTM D1621, 22 PSI.
4. Tensile Strength: ASTM D1623 Type C, 28 PSI.
5. Closed cell content: ASTM D6226, 90 percent minimum.
6. Flame Spread Index: ASTM E84, 25 maximum.
7. Smoke Developed Index: ASTM E84, 350 maximum.

B. Substrate Primer: As required by manufacturer.

2.3 Accessories

A. Transition Strips: Manufacturer's recommended self-adhering strips for indicated conditions.

1. Perimeter openings of windows and other conditions encountered.
2. Substrate material transitions and where indicated.

2.4 Equipment

A. Furnish manufacturer's required equipment for spraying insulation/air barrier system in place.

3 Execution

3.1 Installers

A. Acceptable Installers:

1. Spray-Tec, Inc., Shelbyville, KY.
2. Superior Insulation Company, LLC, Ferdinand, IN.
3. Union Spray Foam, Lowell, IN
4. U.S. Insulation Company, Bloomington, IN.

3.2 Examination

A. Examine substrates under which insulation systems will be installed, for compliance with requirements. Verify flashing and veneer anchors are in place.

B. Proceed with installation only after unsatisfactory conditions have been corrected.

3.3 Preparation

A. Prepare surfaces using methods recommended by manufacturer to achieve best results for substrates under project conditions indicated.

B. Comply with SPFA applicable guidelines.

3.4 Installation

A. Install manufacturer's recommended primer for substrates indicated.

B. Install insulation/air barrier system in accordance with manufacturer's written installation instructions.

C. Install foam insulation/air barrier system in multiple layers with minimum pass thickness of 1/2 inch.

1. Minimum total insulation thickness: 2 inches.
2. Minimum R-Value: R-13.

D. Develop finish skin surface to smooth and unbroken "orange peel" texture. Uneven surfaces, "treebark" or "popcorn" textures are not acceptable.

E. Maximum Tolerance Variation from Indicated Thickness: Minus 1/4 inch, plus 1/2 inch.

3.5 Field Quality Control

A. Site Tests: Conducted by Installer for compliance with requirements. Maintain records for submission at Substantial Completion.

1. Provide daily visual inspection, adhesion/cohesion testing and density measurements.

3.6 Protection

A. Protect insulation/air barrier system from ultraviolet radiation as recommended by manufacturer's written instructions.

END OF SECTION

SECTION 11 68 33
ATHLETIC FIELD EQUIPMENT

1 General

1.1 Section Includes

A. Manufactured athletic field equipment and accessories.

1.2 Related Sections

A. Section 32 12 16 – Hot-Mix Asphalt Paving: Recess for markers.

B. Section 32 13 80 – Exterior Concrete and Site Equipment.

C. Section 32 18 25 - All Weather Latex Track Surface: Recess for markers and material installed in cover recess of some manufactured items.

1.3 Submittals

A. Submit shop drawings, and manufacturers' installation instructions and product data under provisions of Division 1.

B. Submit certificate of gradation (sieve analysis) for sand.

2 Products

2.1 Acceptable Manufacturers

A. Sportsfield Specialties, Inc. Delhi, New York; (888-975-3343).

B. UCS, Inc., Orangeburg, New York; (800-526-4856).

C. American Athletic Equipment - AAE, West Conshohocken, Pennsylvania; (800-523-5471).

D. Gill Athletics, Champaign, Illinois; (800-637-3090).

2.1 Track and Field Equipment

A. Shot Put Ring Form Assembly: Complete with toe board.

1. Basis-of-Design Product: Harry Gill #372 with #361, or UCS; 725-2592 with 716-1630.

B. Discus Circle Form Assembly: Complete with Cage.

1. Basis-of-Design Product: Harry Gill #370 with #803, or UCS; 725-2530 with UCS High School Discus Cage.

2.2 Football Goals

A. Offset Single Support Post Football Goals: As manufactured by AALCO Manufacturing Co., St. Louis, Missouri.

1. Pro-style bent post of 6 inch standard, galvanized steel pipe (6 5/8 inch OD) projects bar and uprights 6 feet out, padded.

   a. Pad Color: Owner to select from manufacturers standard colors.

2. Crossbar of 3 1/2 inch OD galvanized steel pipe.

3. Uprights of 2 1/2 inch OD aluminum pipe. Style OY-6-20.

2.3 Baseball and Softball Batting Cages

A. Batting Cage System: As manufactured by Aluminum Athletic Equipment, Royersford, PA, or approved equal, Models #BT-141455 and #BT-121470, with all accessories for a complete system.

1. Contractor is to provide the Concrete Slab as detailed on the project drawings in conjunction with the concrete in-ground pole bases with sleeves.

   a. Provide and Install stainless steel eye-boltsimbedded in cocncrete slab per the manufacturers requirements.

2. Provide all poles, netting, cables, and all accessories to make a complete system.

3. Provide and install inside each batting cage, artificial batting cage turf, BCT – Batting Cage Turf as supplied by On Deck Sports, Braintree, Massachusetts.

   a. Color: Solid Green.

   b. Face Weight: 18 oz.

   c. Yarn Type: Mono.

   d. Height: 3/8-inch.

   e. Backing: Drainable, Latex.

   f. Size: approximately 15-feet by 55 and 75 feet respectively, covering the concrete of both batting cages.

2.4 Foul Ball Netting

A. Foul Ball Neeting Replacement: Polyethylene & Polypropylene netting, as manufactured by Jones-Sports, or approved equal, 1-inch netting mesh, with break/burst capacity of 85/245 lb or better.

1. Provide all new cabling and attachments to match the existing pole locations.

2. Provide new mesh in width and length to match the existing mesh currently installed at the Varsity Softball location.

2.5 Baseball and Softball Benches

A. Varsity Baseball and Softball Dugouts: As manufactured or supplied by Sportsfield Specialties, Inc., Delhi, NY, or approved equal, Model #PTBTT Two-Tier Polyboard Team Bench, with all accessories for a complete system installation. Provide manufacturers standard 5-year warranty.

1. Length of Bench: 10-foot long.

    a. Provide and Install stainless steel anchors to concrete slab as required by manufacturer.

2. Quantity per Dugout: Four (4).

3. Framing and Bench System.

    a. Framing: 1/8-inch Aluminum framing and 2x2x1/8-inch Aluminum tubing, fully welded.

    b. Polyboard: 2x4 and 2x6 Synthetic Polyboard Seat and Backrest/Upper Shelf. Solid core construction.

4. Color Options:

    a. Provide Powder Coat Finish on all Aluminum frame and tubing from manufacturers standard selections.

    b. Polyboard Seat, Backrest, and Upper Shelf to be selected from manufacturers standard color options.

B. Junior Varsity Baseball and Softball Dugouts: As manufactured or supplied by Sportsfield Specialties, Inc., Delhi, NY, or approved equal, Model #PTBBRSP10 Single-Tier Polyboard Team Bench with Backrest, with all accessories for a complete system installation. Provide manufacturers standard 5-year warranty.

1. Length of Bench: 10-foot long.

    a. Provide and Install stainless steel anchors to concrete slab as required by manufacturer.

2. Quantity per Dugout: Three (3).

3. Framing and Bench System.

    a. Framing: 1/8-inch Aluminum framing and 2x2x1/8-inch Aluminum tubing, fully welded.

    b. Polyboard: 2x4 Synthetic Polyboard Seat and Backrest. Solid core construction.

4. Color Options:

    a. Provide Powder Coat Finish on all Aluminum frame and tubing from manufacturers standard selections.

    b. Polyboard Seat and Backrest to be selected from manufacturers standard color options.

2.6 Junior Varsity Baseball and Softball Dugouts

A. Junior Varsity Baseball and Softball Dugouts: As manufactured or supplied by Sportsfield Specialties, Inc., Delhi, NY, or approved equal, GameShade Dugout, Model #GD8X32 (LG-GS-08X32-130) Framed Dugout with Roof, with all accessories for a complete system installation.

1. Length/Width of Dugout: 32-foot long by 8-foot wide.

    a. Design Criteria: Minimum of Manufacturers Standards, with inclusion of State of Indiana Loading Criteria – refer to Documents.

    b. Provide a stamped and sealed Set of Drawings as part of te Submittal, by a Licensed Professional Engineer of Record in the State of Indiana.

2. Quantity: Four (4).

3. Framing and Roof Deck System.

    a. Structural Column Framing: Fully welded 3-1/2-inch x 3-1/2-inch x 3/16-inch Structural Steel Tube with Factory Pre-Drilled 9-inch x 9-inch x 5/8-inch A36 Steel Base Mounting Plates and 9-inch x 9-inch x 5/8-inch A36 Steel Roof and Column Cap Plates. Maximum Spacing of columns, 15-feet.

    b. Structural Roof Framing: Fully welded 5-inch x 2-inch x 3/16-inch Structural Steel Rectangular Perimeter, Transverse, and Longitudinal Roof Tubes.

    c. Framing Finish: Powder Coated Primer and Finish Coat, from manufacturers standard color selections.

    d. Roofing Material: 29 Gauge, Classic Rib-Style Corrugated Metal with J-Channel Drip Cap Installed on Front and Sides, color as selected from manufacturers standard color selections.

    e. Connection of framing and roofing to be per manufacturers standards.

    f. Provide manufacturers standard Anchoring Hardware with standard epoxy finish to match the frame color.

3 Execution

3.1 Inspection

A. Verify long jump pit excavation is correctly sized and located and ready for curbs and sand fill.

3.2 Installation

A. Shot Put and Discus Circle: Set in concrete pad in accordance with manufacturer's instructions.

3.3 Football Goals

A. Single Support Post Football Goals: Set horizontal support pipe 10 feet above finish grade.

1. Set the vertical support pipe in concrete footing with top of footing 6 inches below finish grade as detailed on Drawings, or as required per manufacturers details and recommendations.

3.4 Batting Cages

A. Install the complete batting cage system at locations indicated on drawings and per the manufacturers recommendations.

3.5 Foul Ball Netting

A. Install complete the new netting on the existing pole system.

3.6 Baseball and Softball Benches

A. Install complete the new benches for each Dugout location.

3.7 Junior Varstiy Baseball and Softball Dugouts

A. Install complete the new covered Dugouts for JV Baseball and Softball, coordinate with Fencing installation.

END OF SECTION

DIVISION 26 - ELECTRICAL
Section 26 56 68 – Exterior Athletic Lighting

1.00 PART 1 - GENERAL

1.01 SUMMARY:

A. Work covered by this section of the specifications shall conform to the contract documents, engineering plans as well as state and local codes.

B. The purpose of these specifications is to define the lighting system performance and design standards for the Crown Point High School new practice field using an LED Lighting source. The manufacturer / contractor shall supply lighting equipment to meet or exceed the standards set forth in these specifications.

C. The sports lighting will be for the following venues.

1. Football/Soccer practice field.

a. Football – 360' x160'

b. Soccer – 350' x 210'

D. The primary goals of this sports lighting project are:

1. Guaranteed Light Levels: Selection of appropriate light levels impact the safety of the players and the enjoyment of spectators. Therefore, light levels are guaranteed to not drop below specified target values for a period of 25 years.

2. Environmental Light Control: It is the primary goal of this project to minimize spill light to adjoining properties and glare to the players, spectators, and neighbors.

3. Cost of Ownership: In order to reduce the operating budget, the preferred lighting system shall be energy efficient and cost effective to operate. All maintenance costs shall be eliminated for the duration of the warranty.

4. Control and Monitoring: To allow for optimized use of labor resources and avoid unneeded operation of the facility, customer requires a remote on/off control system for the lighting system. Fields should be proactively monitored to detect luminaire outages over a 25-year life cycle. All communication and monitoring costs for 25-year period shall be included in the bid.

E. All lighting designs shall comply with Indiana High School Athletic Association standards.

1.02 LIGHTING PERFORMANCE:

A. Illumination Levels and Design Factors: Playing surfaces shall be lit to an average target illumination level and uniformity as specified in the chart below. Lighting calculations shall be developed and field measurements taken on the grid spacing with the minimum number of grid points specified below. Appropriate light loss factors shall be applied and

submitted for the basis of design. Average illumination level shall be measured in accordance with the IESNA LM-5-04 (IESNA Guide for Photometric Measurements of Area and Sports Lighting Installations). Illumination levels shall not to drop below desired target values in accordance with IES RP-6-15, Page 2, Maintained Average Illuminance and shall be guaranteed for the full warranty period.

Area of Lighting	Average Target Illumination Levels	Maximum to Minimum Uniformity Ratio	Grid Points	Grid Spacing
Football	50fc	2:1	72	30' x 30'
Soccer	50fc	2:1	84	30' x 30'

B. Color: The lighting system shall have a minimum color temperature of 5700K and a CRI of 75.

C. Mounting Heights: To ensure proper aiming angles for reduced glare and to provide better playability, minimum mounting heights shall be as described below. Higher mounting heights may be required based on photometric report and ability to ensure the top of the field angle is a minimum of 10 degrees below horizontal.

# Of Poles	Pole Designation	Pole Height
4	F1-4	70'

1.03 ENVIRONMENTAL LIGHT CONTROL:

A. Light Control Luminaires: All luminaires shall utilize spill light and glare control devices including, but not limited to, internal shields, louvers, and external shields. No symmetrical beam patterns are accepted.

B. Spill Light and Glare Control: To minimize impact on adjacent properties, spill light and candela values must not exceed the following levels taken at 3 feet above grade.

Surrounding Spill at 150'	Maximum
Vertical Footcandles	0.4 fc
Candela	6,7500 cd

Sill Along S Main St. / W 129th Ave	Maximum
Vertical Footcandles	0.0 fc
Candela	100 cd

C. Spill Scans: Spill scans must be submitted indicating the amount of horizontal and vertical footcandles along the specified lines. Light levels shall be taken at 30-foot intervals along the boundary line. Readings shall be taken with the meter orientation at both horizontal and aimed towards the most intense bank of lights. Illumination level shall be measured in accordance with the IESNA LM-5-04 after 1 hour warm up.

D. The first page of a photometric report for all luminaire types proposed showing horizontal and vertical axial candle power shall be provided to demonstrate the capability of achieving the specified performance. Reports shall be certified by a qualified testing laboratory with a minimum of five years' experience or by a manufacturer's laboratory with a current accreditation under the National Voluntary Laboratory Accreditation Program for Energy Efficient Lighting Products. A summary of the horizontal and vertical aiming angles for each luminaire shall be included with the photometric report.

1.04 COST OF OWNERSHIP:

A. Manufacturer shall submit a 25-year Cost of Ownership summary that includes energy consumption, anticipated maintenance costs, and control costs. All costs associated with faulty luminaire replacement - equipment rentals, removal and installation labor, and shipping - are to be included in the maintenance costs.

2.00 PART 2 – PRODUCT

2.01 SPORTS LIGHTING SYSTEM CONSTRUCTION:

A. Manufacturing Requirements: All components shall be designed and manufactured as a system. All luminaires, wire harnesses, drivers and other enclosures shall be factory assembled, aimed, wired, and tested.

B. Durability: All exposed components shall be constructed of corrosion resistant material and/or coated to help prevent corrosion. All exposed carbon steel shall be hot dip galvanized per ASTM A123. All exposed aluminum shall be powder coated with high performance polyester or anodized. All exterior reflective inserts shall be anodized, coated, and protected from direct environmental exposure to prevent reflective degradation or corrosion. All exposed hardware and fasteners shall be stainless steel, passivated and coated with aluminum-based thermosetting epoxy resin for protection against corrosion and stress corrosion cracking. Structural fasteners may be carbon steel and galvanized meeting ASTM A153 and ISO/EN 1461 (for hot dipped galvanizing), or ASTM B695 (for mechanical galvanizing). All wiring shall be enclosed within the cross-arms, pole, or electrical components enclosure.

C. System Description: Lighting system shall consist of the following:

1. Galvanized steel poles and cross-arm assembly.

2. Non-approved pole technology:

a. Square static cast concrete poles will not be accepted.

b. Direct bury steel poles which utilize the extended portion of the steel shaft for their foundation will not be accepted due to potential for internal and external corrosive reaction to the soils and long-term performance concerns.

3. Lighting systems shall use concrete foundations. See Section 2.4 for details.

a. For a foundation using a pre-stressed concrete base embedded in concrete backfill the concrete shall be air-entrained and have a minimum compressive design strength at 28 days of 3,000 PSI. 3,000 PSI concrete specified for early

pole erection; actual required minimum allowable concrete strength is 1,000 PSI. All piers and concrete backfill must bear on and against firm undisturbed soil.

b. For anchor bolt foundations or foundations using a pre-stressed concrete base in a suspended pier or re-enforced pier design pole erection may occur after 7 days. Or after a concrete sample from the same batch achieves a certain strength.

4. Manufacturer will supply all drivers and supporting electrical equipment:

   a. Remote drivers and supporting electrical equipment shall be mounted approximately 10 feet above grade in aluminum enclosures. The enclosures shall be touch-safe and include drivers and fusing with indicator lights on fuses to notify when a fuse is to be replaced for each luminaire. Disconnect per circuit for each pole structure will be located in the enclosure. Integral drivers are not allowed.

   b. Per IHSAA Lighting Standards (Page 5, Section 10 Ballast (MH) or Driver (LED) Weight). It is recommended that all ballast and drivers be remotely mounted on pole at step ladder height. Remote ballast/Remote drivers and supporting electrical equipment shall be mounted in aluminum enclosures. The enclosures shall be touch-safe and include drivers and fusing with indicator lights on fuses to notify when a fuse is to be replaced for each luminaire. Disconnect per circuit for each pole structure will be located in the enclosure.

   c. Per IHSAA Lighting Standards (Page 5, Section 10 Ballast (MH) or Driver (LED) Weight); feels that remotely mounting ballast/drivers and supporting electrical equipment at step ladder height creates safer conditions and more economical solution for servicing and maintenance.

   d. Manufacturer shall provide surge protection at the pole equal to or greater than 40 kA for each line to ground (Common Mode) as recommended by IEEE C62.41.2_2002.

5. Wire harness complete with an abrasion protection sleeve, strain relief and plug-in connections for fast, trouble-free installation.

6. All luminaires, visors, and cross-arm assemblies shall withstand 150 mi/h winds and maintain luminaire aiming alignment.

7. Control cabinet to provide remote on-off control and monitoring of the lighting system. See Section 2.3 for further details.

8. Manufacturer shall provide lightning grounding as defined by NFPA 780 and be UL Listed per UL 96 and UL 96A.

   a. Integrated grounding via concrete encased electrode grounding system.

   b. If grounding is not integrated into the structure, the manufacturer shall supply grounding electrodes, copper down conductors, and exothermic weld kits. Electrodes and conductors shall be sized as required by NFPA 780.The grounding electrode shall be minimum size of 5/8 inch diameter and 8 feet long,

with a minimum of 10 feet embedment. Grounding electrode shall be connected to the structure by a grounding electrode conductor with a minimum size of 2 AWG for poles with 75 feet mounting height or less, and 2/0 AWG for poles with more than 75 feet mounting height.

D. Safety: All system components shall be UL listed for the appropriate application.

2.02 ELECTRICAL:

A. Electric Power Requirements for the Sports Lighting Equipment:

1. Electric power: 480 Volt, 3 Phase

2. Maximum total voltage drop: Voltage drop to the disconnect switch located on the poles shall not exceed three (3) percent of the rated voltage.

B. Energy Consumption: The kW consumption for the field lighting system shall be 58.0kW or less.

2.03 CONTROL:

A. Instant On/Off Capabilities: System shall provide for instant on/off of luminaires.

B. Lighting contactor cabinet(s) constructed of NEMA Type 4 aluminum, designed for easy installation with contactors, labeled to match field diagrams and electrical design. Manual off-on-auto selector switches shall be provided.

C. Dimming: System shall provide for 3-stage dimming (high-medium-low). Dimming will be set via scheduling options (Website, app, phone, fax, email).

D. Remote Lighting Control System: System shall allow owner and users with a security code to schedule on/off system operation via a web site, phone, fax or email up to ten years in advance. Manufacturer shall provide and maintain a two-way TCP/IP communication link. Trained staff shall be available 24/7 to provide scheduling support and assist with reporting needs.

The owner may assign various security levels to schedulers by function and/or fields. This function must be flexible to allow a range of privileges such as full scheduling capabilities for all fields to only having permission to execute "early off" commands by phone. Scheduling tool shall be capable of setting curfew limits.

Controller shall accept and store 7-day schedules, be protected against memory loss during power outages, and shall reboot once power is regained and execute any commands that would have occurred during outage.

E. Remote Monitoring System: System shall monitor lighting performance and notify manufacturer if individual luminaire outage is detected so that appropriate maintenance can be scheduled. The controller shall determine switch position (manual or auto) and contactor status (open or closed.

F. Management Tools: Manufacturer shall provide a web-based database and dashboard tool of actual field usage and provide reports by facility and user group. Dashboard shall

also show current status of luminaire outages, control operation and service. Mobile application will be provided suitable for IOS, Android and Blackberry devices.

Hours of Usage: Manufacturer shall provide a means of tracking actual hours of usage for the field lighting system that is readily accessible to the owner.

1. Cumulative hours: shall be tracked to show the total hours used by the facility.

2. Report hours saved by using early off and push buttons by users.

G. Communication Costs: Manufacturer shall include communication costs for operating the control and monitoring system for a period of 25 years.

H. Communication with luminaire drivers: Control system shall interface with drivers in electrical components enclosures by means of powerline communication.

2.04 STRUCTURAL PARAMETERS:

A. Wind Loads: Wind loads shall be based on the 2012 International Building Code. Wind loads to be calculated using ASCE 7-10, an ultimate design wind speed of 115 and exposure category C.

B. Pole Structural Design: The stress analysis and safety factor of the poles shall conform to 2009 AASHTO Standard Specification for Structural Supports for Highway Signs, Luminaires, and Traffic Signals (LTS-5).

C. Foundation Design: The foundation design shall be based on soil parameters as outlined in the geotechnical report from Advanced Engineering Services dated March 15, 2021 (updated March 24, 2021).

D. Foundation Drawings: If project specific foundation drawings are required, they must be stamped by a registered engineer in the state where the project is located. The foundation drawings must list the moment, shear (horizontal) force, and axial (vertical) force at ground level for each pole. These drawings must be submitted at time of bid to allow for accurate pricing.

3.00 PART 3 – EXECUTION

3.01 SOIL QUALITY CONTROL:

A. It shall be the Contractor's responsibility to notify the Owner if soil conditions exist other than those on which the foundation design is based, or if the soil cannot be readily excavated. Contractor may issue a change order request / estimate for the Owner's approval / payment for additional costs associated with.

1. Providing engineered foundation embedment design by a registered engineer in the State of Indiana for soils other than specified soil conditions.

2. Additional materials required to achieve alternate foundation.

3. Excavation and removal of materials other than normal soils, such as rock, caliche, etc.

3.02 DELIVERY TIMING:

A. Delivery Timing Equipment On-Site: The equipment must be on-site 10-12 weeks from receipt of approved submittals and receipt of complete order information. Delivery times in excess of this timeframe shall be indicated at the time of bid.

3.03 FIELD QUALITY CONTROL:

A. Illumination Measurements: Upon substantial completion of the project and in the presence of the Contractor, Project Engineer, Owner's Representative, and Manufacturer's Representative, illumination measurements shall be taken and verified. The illumination measurements shall be conducted in accordance with IESNA LM-5-04.

B. Field Light Level Accountability:

1. Light levels are guaranteed not to fall below the target maintained light levels for the entire warranty period of 25 years. These levels will be specifically stated as "guaranteed" on the illumination summary provided by the manufacturer.

2. The contractor/manufacturer shall be responsible for conducting initial light level testing and an additional inspection of the system, in the presence of the owner, one year from the date of commissioning of the lighting.

3. The contractor/manufacturer will be held responsible for any and all changes needed to bring these fields back to compliance for light levels and uniformities. Contractor/Manufacturer will be held responsible for any damage to the fields during these repairs.

C. Correcting Non-Conformance: If, in the opinion of the Owner or his appointed Representative, the actual performance levels including footcandles and uniformity ratios are not in conformance with the requirements of the performance specifications and submitted information, the Manufacturer shall be required to make adjustments to meet specifications and satisfy Owner.

3.04 WARRANTY AND GUARANTEE:

A. 25-Year Warranty: Each manufacturer shall supply a signed warranty covering the entire system for 25 years from the date of shipment. Warranty shall guarantee specified light levels. Manufacturer shall maintain specifically-funded financial reserves to assure fulfillment of the warranty for the full term. Warranty does not cover weather conditions events such as lightning or hail damage, improper installation, vandalism or abuse, unauthorized repairs or alterations, or product made by other manufacturers.

B. Maintenance: Manufacturer shall monitor the performance of the lighting system, including on/off status, hours of usage and luminaire outage for 25 years from the date of equipment shipment. Parts and labor shall be covered such that individual luminaire outages will be repaired when the usage of any field is materially impacted. Manufacturer is responsible for removal and replacement of failed luminaires, including all parts, labor, shipping, and equipment rental associated with maintenance. Owner agrees to check fuses in the event of a luminaire outage.

4.00 PART 4 – DESIGN APPROVAL

4.01 PRE-BID SUBMITTAL REQUIREMENTS (Non-Musco):

A. Design Approval: The owner / engineer will review pre-bid submittals per section 4.01.B from all the manufacturers to ensure compliance to the specification 5 days prior to bid. If the design meets the design requirements of the specifications, a response will be issued to the manufacturer indicating approval for the specific design submitted.

B. Approved Product: Musco's Light-Structure System™ with TLC for LED™ is the approved product. All substitutions must provide a complete submittal package for approval as outlined in Submittal Information at the end of this section at least 5 days prior to bid. Special manufacturing to meet the standards of this specification may be required.

C. All listed manufacturers not pre-approved shall submit the information at the end of this section at least 5 days prior to bid.

D. Bidders are required to bid only products that have been approved. Bids received that do not utilize an approved system/design, will be rejected.

REQUIRED SUBMITTAL INFORMATION FOR ALL MANUFACTURERS (NOT PRE-APPROVED) 5 DAYS PRIOR TO BID

All items listed below are mandatory, shall comply with the specification and be submitted according to pre-bid submittal requirements. Complete the Yes/No column to indicate compliance (Y) or noncompliance (N) for each item. Submit checklist below with submittal.

Yes/ No	Tab	Item	Description
	A	Letter/ Checklist	Listing of all information being submitted must be included on the table of contents. List the name of the manufacturer's local representative and his/her phone number. Signed submittal checklist to be included.
	B	Equipment Layout	Drawing(s) showing field layouts with pole locations
	C	On Field Lighting Design	Lighting design drawing(s) showing: a. Field Name, date, file number, prepared by b. Outline of field(s) being lighted, as well as pole locations referenced to the center of the field (x & y), Illuminance levels at grid spacing specified c. Pole height, number of fixtures per pole, horizontal and vertical aiming angles, as well as luminaire information including wattage, lumens, and optics d. Height of light test meter above field surface. e. Summary table showing the number and spacing of grid points; average, minimum and maximum illuminance levels in foot candles (fc); uniformity including maximum to minimum ratio, coefficient of variance (CV), coefficient of utilization (CU) uniformity gradient; number of luminaries, total kilowatts, average tilt factor; light loss factor.
	D	Off Field Lighting Design	Lighting design drawing showing initial spill light levels along the boundary line (defined on bid drawings) in footcandles. Lighting design showing glare along the boundary line in candela. Light levels shall be taken at 30-foot intervals along the boundary line. Readings shall be taken with the meter orientation at both horizontal and aimed towards the most intense bank of lights.
	E	Photometric Report	Provide first page of photometric report for all luminaire types being proposed showing candela tabulations as defined by IESNA Publication LM-35-02. Photometric data shall be certified by laboratory with current National Voluntary Laboratory Accreditation Program or an independent testing facility with over 5 years' experience.
	F	Performance Guarantee	Provide performance guarantee including a written commitment to undertake all corrections required to meet the performance requirements noted in these specifications at no expense to the owner. Light levels must be guaranteed to not fall below target levels for warranty period.
	G	Structural Calculations	Pole structural calculations and foundation design showing foundation shape, depth backfill requirements, rebar, and anchor bolts (if required). Pole base reaction forces shall be shown on the foundation drawing along with soil bearing pressures. Design must be stamped by a structural engineer in the state of Indiana. (May be supplied upon award).
	H	Control & Monitoring System	Manufacturer of the control and monitoring system shall provide written definition and schematics for automated control system. They will also provide references of customers currently using proposed system in the state of Indiana.

	I	Electrical Distribution Plans	Manufacturer bidding an alternate product must include a revised electrical distribution plan including changes to service entrance, panels, and wire sizing.
	J	Warranty	Provide written warranty information including all terms and conditions. Provide references of customers currently under specified warranty in the state of Indiana.
	K	Project References	Manufacturer to provide a list of projects where the technology and specific fixture proposed for this project has been installed in the state of Indiana. Reference list will include project name, project city, installation date, and if requested, contact name and contact phone number.
	L	Product Information	Complete bill of material and current brochures/cut sheets for all product being provided.
	M	Delivery	Manufacturer shall supply an expected delivery timeframe from receipt of approved submittals and complete order information.
	N	Non-Compliance	Manufacturer shall list all items that do not comply with the specifications. If in full compliance, tab may be omitted.

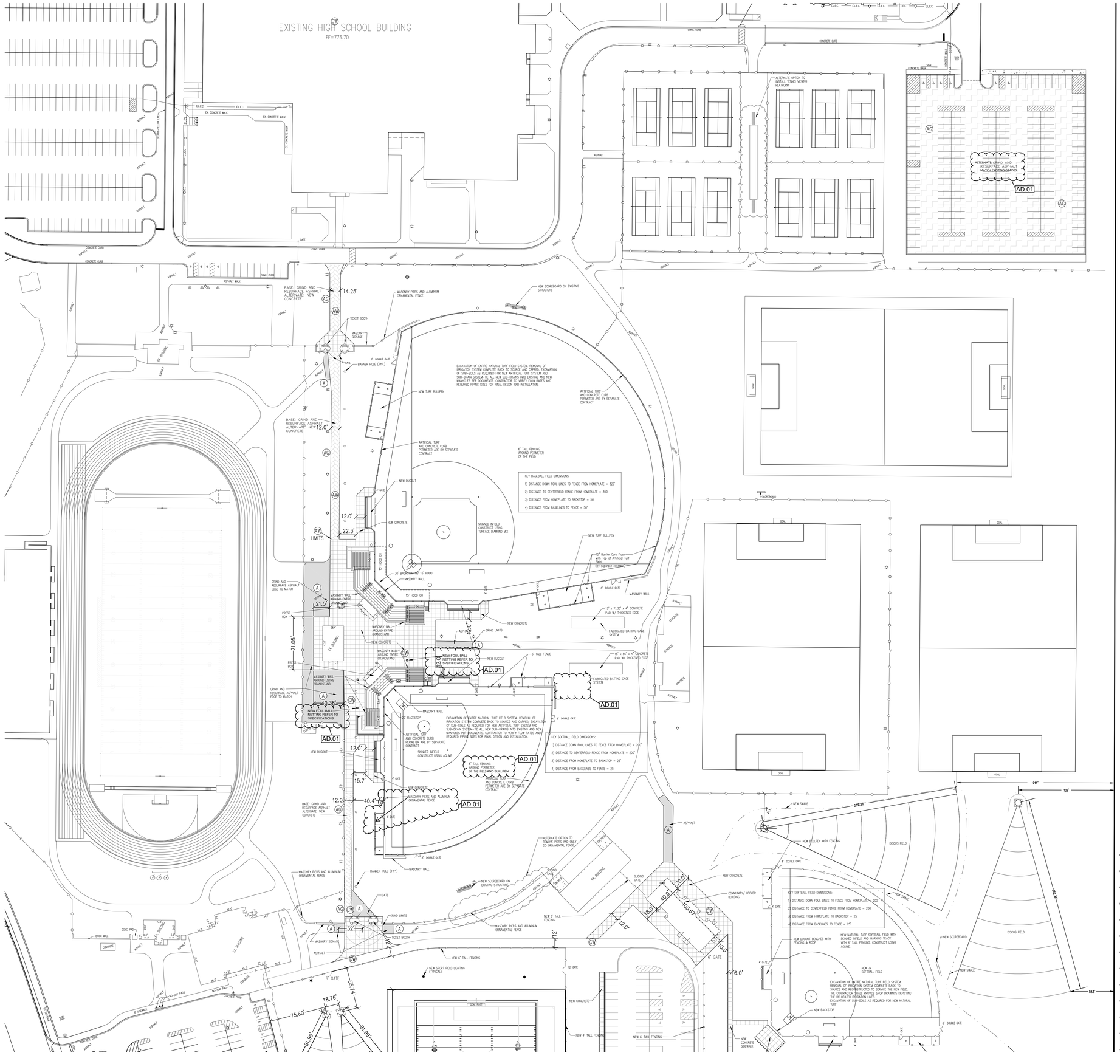
The information supplied herein shall be used for the purpose of complying with the specifications for the Crown Point High School new practice field lighting. By signing below, I agree that all requirements of the specifications have been met and that the manufacturer will be responsible for any future costs incurred to bring their equipment into compliance for all items not meeting specifications and not listed in the Non-Compliance section.

Manufacturer: _____ **Signature:** _____

Contact Name: _____ **Date:** _____/_____/_____

Contractor: _____ **Signature:** _____

END OF SECTION 26 56 68



LEGEND:

PROPOSED

- (AW) BASE: GRIND AND RESURFACE ASPHALT ALTERNATE: NEW CONCRETE WALK
- (CW) CONCRETE WALK
- (HC) HANDICAP ACCESS RAMP
- (A) NEW ASPHALT WALK
- (AG) GRIND ASPHALT & RESURFACE 2" DEPTH - ALTERNATE — AD.01
- (AG) GRIND ASPHALT & RESURFACE 1-1/2" DEPTH OR ALTERNATE NEW CONCRETE

NORTH

GRAPHIC SCALE

50 0 25 50 100 200

(IN FEET)
1 inch = 50 ft.

GIBRALTAR
DESIGN
ARCHITECTURE • ENGINEERING • INTERIOR DESIGN

CROWN POINT HIGH SCHOOL - ATHLETIC FIELDS AND SITE IMPROVEMENTS

FOR:
CROWN POINT COMMUNITY SCHOOL CORPORATION
CROWN POINT, INDIANA

GIBRALTAR DESIGN
9102 N. Meridian St., Ste. 300
Indianapolis, IN 46260
Homepage www.GibraltarDesign.com
Email info@GibraltarDesign.com
Phone 317.580.5777 Fax 317.580.5778

PROJECT 21-120
DATE 08-22-22
COORDINATED BY DCT
DRAWN BY DCT EM
CHECKED BY DCT RAT

DONALD C. TORRENCE — REGISTERED — No. 19868 — STATE OF INDIANA — PROFESSIONAL ENGINEER

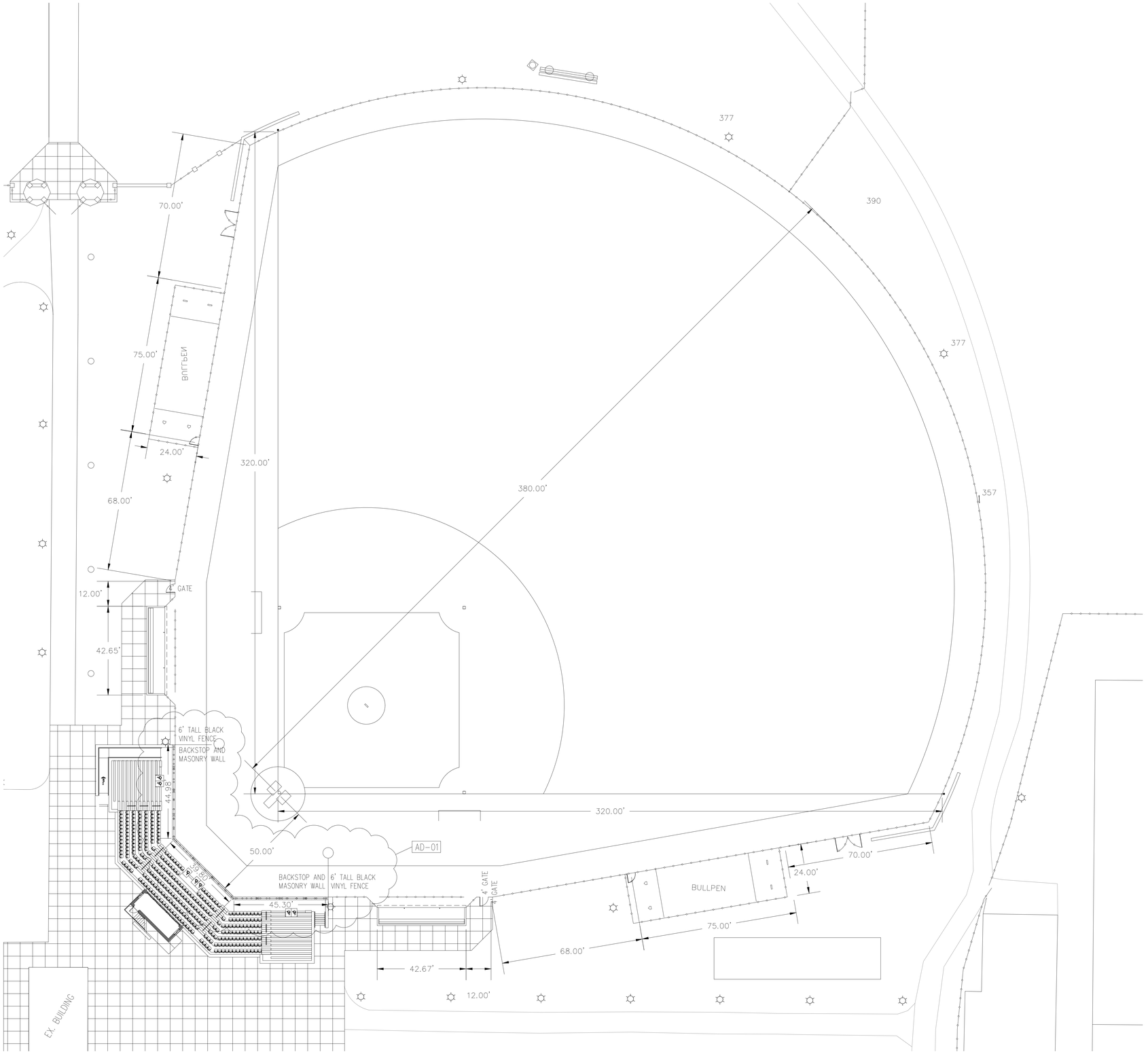
REVISIONS

MARK	DATE	ISSUED FOR
AD.01	08/30/22	ADDENDUM NO. 01

DRAWING
SITE PLAN

PROJECT
CROWN POINT HIGH SCHOOL - ATHLETIC FIELDS AND SITE IMPROVEMENTS

SHEET
C-2.1



CROWN POINT HIGH SCHOOL
BASEBALL LAYOUT PLAN

0 10' 20' 40'

SCALE: 1" = 20'

NORTH

GIBRALTAR
DESIGN
ARCHITECTURE • ENGINEERING • INTERIOR DESIGN

PROJECT
CROWN POINT HIGH SCHOOL - ATHLETIC FIELDS AND SITE IMPROVEMENTS

FOR:
CROWN POINT COMMUNITY SCHOOL CORPORATION
CROWN POINT, INDIANA

GIBRALTAR DESIGN
9102 N. Meridian St., Ste. 300
Indianapolis, IN 46260
Homepage www.GibraltarDesign.com
Email info@GibraltarDesign.com
Phone 317.580.5777 Fax 317.580.5778

PROJECT 21-120
DATE 08/18/22
COORDINATED BY JPB
DRAWN BY DTB
CHECKED BY JPB

JOSEPH P. BRIGGS REGISTERED NO. 11600109 STATE OF INDIANA ARCHITECT

REVISIONS

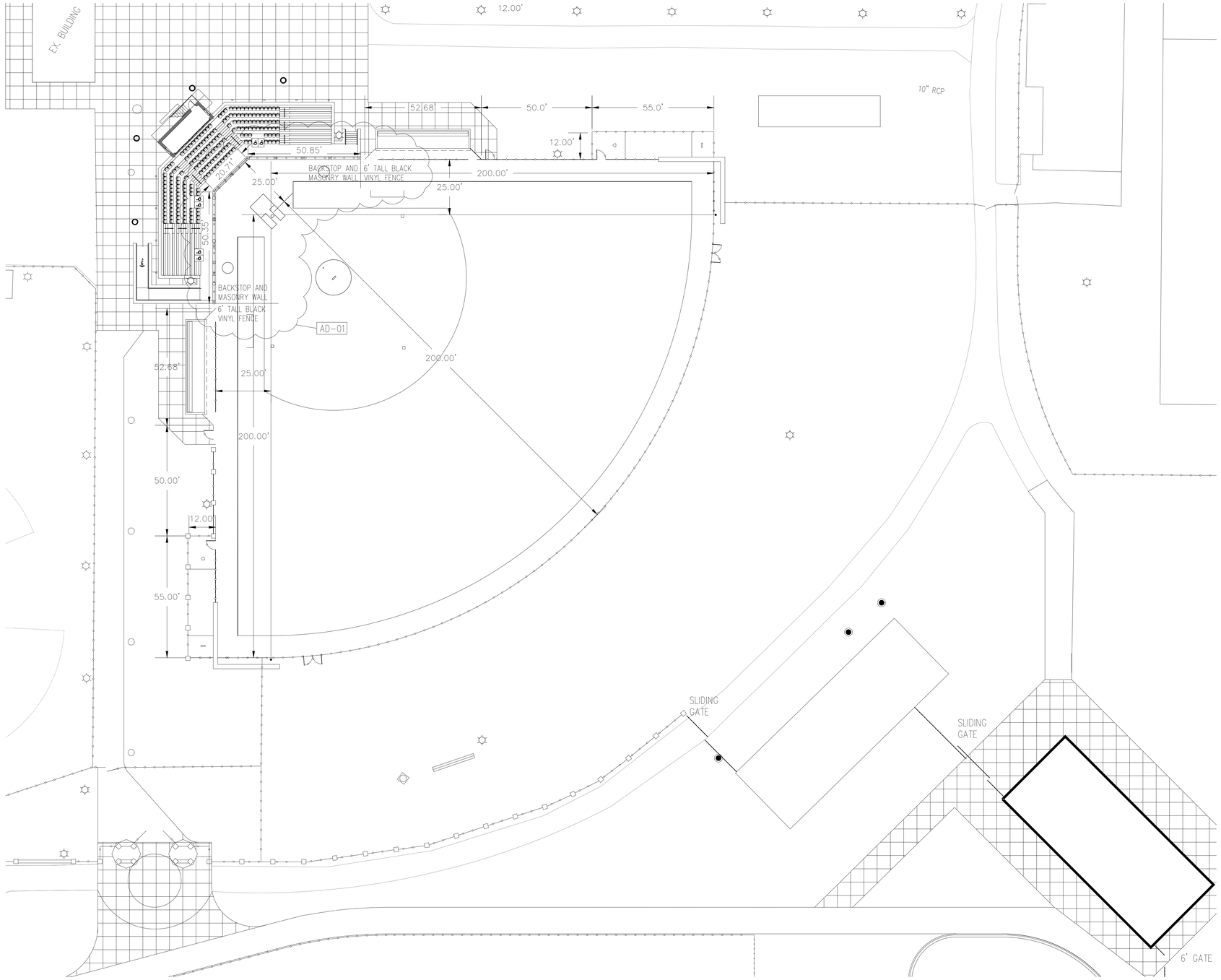
MARK	DATE	ISSUED FOR
AD-1	08/30/22	ADDENDUM NO. 1

DRAWING
BASEBALL LAYOUT PLAN

PROJECT
CROWN POINT HIGH SCHOOL - ATHLETIC FIELDS AND SITE IMPROVEMENTS

SHEET
C-2.1A

Wednesday, 8/31/2022 - 9:25 AM - LAST SAVED BY:DBURNS
Y:\21-120 CROWN POINT CSC - CROWN POINT HS ATHLETIC FIELDS AND SITE IMPROVEMENTS\21-120 DRAWINGS\03 SITE\C-2.1A.DWG



CROWN POINT HIGH SCHOOL SOFTBALL LAYOUT PLAN

0 10' 20' 40'

SCALE: 1" = 20'

NORTH

GIBRALTAR DESIGN
ARCHITECTURE • ENGINEERING • INTERIOR DESIGN

PROJECT
CROWN POINT HIGH SCHOOL - ATHLETIC FIELDS AND SITE IMPROVEMENTS

FOR:
CROWN POINT COMMUNITY SCHOOL CORPORATION
CROWN POINT, INDIANA

GIBRALTAR DESIGN
9102 N. Meridian St., Ste. 300
Indianapolis, IN 46260
Homepage www.GibraltarDesign.com
Email info@GibraltarDesign.com
Phone 317.580.5777 Fax 317.580.5778

PROJECT 21-120
DATE 08/18/22
COORDINATED BY JPB
DRAWN BY DTB
CHECKED BY JPB

JOSEPH P. BRIGGS REGISTERED NO. 11600109 STATE OF INDIANA ARCHITECT

REVISIONS

MARK	DATE	ISSUED FOR
AD-1	08/30/22	ADDENDUM NO. 1

DRAWING
SOFTBALL TURF PLAN

PROJECT
CROWN POINT HIGH SCHOOL - ATHLETIC FIELDS AND SITE IMPROVEMENTS

SHEET
C-2.1B

Wednesday, 8/31/2022 - 9:27 AM - LAST SAVED BY:DBURNS
Y:\21-120 CROWN POINT CSC - CROWN POINT HS ATHLETIC FIELDS AND SITE IMPROVEMENTS\21-120 DRAWINGS\DS SITE\C-2.1B.DWG

KEY BASEBALL FIELD DIMENSIONS:
1) DISTANCE DOWN FOUL LINES TO FENCE FROM HOMEPLATE = 320'
2) DISTANCE TO CENTERFIELD FENCE FROM HOMEPLATE = 390'
3) DISTANCE FROM HOMEPLATE TO BACKSTOP = 50'
4) DISTANCE FROM BASELINES TO FENCE = 50'

KEY SOFTBALL FIELD DIMENSIONS:
1) DISTANCE DOWN FOUL LINES TO FENCE FROM HOMEPLATE = 200'
2) DISTANCE TO CENTERFIELD FENCE FROM HOMEPLATE = 200'
3) DISTANCE FROM HOMEPLATE TO BACKSTOP = 25'
4) DISTANCE FROM BASELINES TO FENCE = 25'

KEY BASEBALL FIELD DIMENSIONS:
1) DISTANCE DOWN FOUL LINES TO FENCE FROM HOMEPLATE = 315'
2) DISTANCE TO CENTERFIELD FENCE FROM HOMEPLATE = 360'
3) DISTANCE FROM HOMEPLATE TO BACKSTOP = 50'
4) DISTANCE FROM BASELINES TO FENCE = 50'

DETENTION BASIN
REQUIRED DETENTION = 3.82 Ac-Ft.
REQUIRED DETENTION + 20% = 4.44 Ac-Ft.
AVAILABLE DETENTION = 4.55 Ac-Ft @ 757.50
NORMAL WATER LEVEL = DRY DETENTION BASIN
HIGH WATER ELEVATION 757.50
SIDE SLOPES 4:1

EXCAVATION OF ENTIRE NATURAL TURF FIELD SYSTEM. REMOVAL OF IRRIGATION SYSTEM COMPLETE BACK TO SOURCE AND RECONSTRUCTED TO SERVICE THE NEW FIELD. THE CONTRACTOR SHALL PROVIDE SHOP DRAWINGS DEPICTING THE RELOCATED IRRIGATION LINES. EXCAVATION OF SUB-SOILS AS REQUIRED FOR NEW NATURAL TURF

CONSTRUCTION OF THE PARKING LOT IS NOT INCLUDED IN THIS PACKAGE

CONSTRUCTION OF THE DETENTION AREA IS NOT INCLUDED IN THIS PACKAGE

CONSTRUCTION OF THE DETENTION AREA IS NOT INCLUDED IN THIS PACKAGE

LEGEND:

PROPOSED

- (AW) BASE: GRIND AND RESURFACE ASPHALT ALTERNATE: NEW CONCRETE WALK
- (CW) CONCRETE WALK
- (HC) HANDICAP ACCESS RAMP
- (A) NEW ASPHALT WALK
- (AG) GRIND ASPHALT & RESURFACE 1-1/2" DEPTH
- (AG) GRIND ASPHALT & RESURFACE 1-1/2" DEPTH OR ALTERNATE NEW CONCRETE

NORTH
GRAPHIC SCALE
50 0 25 50 100 200
(IN FEET)
1 inch = 50 ft.

GIBRALTAR
DESIGN
ARCHITECTURE • ENGINEERING • INTERIOR DESIGN

CROWN POINT HIGH SCHOOL - ATHLETIC FIELDS AND SITE IMPROVEMENTS

FOR:
CROWN POINT COMMUNITY SCHOOL CORPORATION
CROWN POINT, INDIANA

GIBRALTAR DESIGN
9102 N. Meridian St., Ste. 300
Indianapolis, IN 46260
Homepage www.GibraltarDesign.com
Email info@GibraltarDesign.com
Phone 317.580.5777 Fax 317.580.5778

PROJECT 21-120
DATE 08-22-22
COORDINATED BY DCT
DRAWN BY DCT EM
CHECKED BY DCT RAT

DONALD C. TORRENCE REGISTERED No. 19868 STATE OF INDIANA PROFESSIONAL ENGINEER

REVISIONS

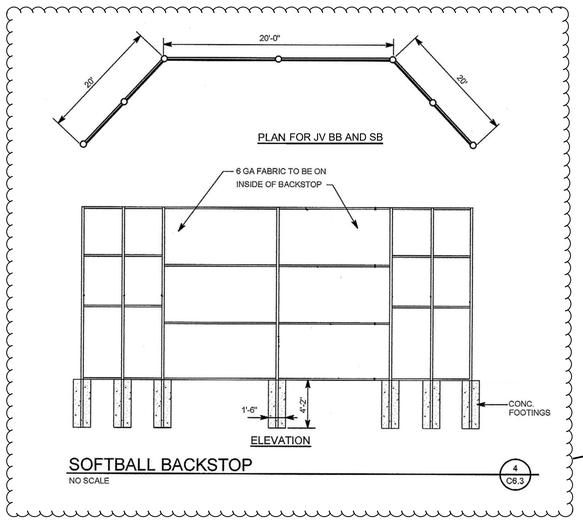
MARK	DATE	ISSUED FOR
AD.01	08/30/22	ADDENDUM NO. 1

DRAWING
SITE PLAN

PROJECT
CROWN POINT HIGH SCHOOL - ATHLETIC FIELDS AND SITE IMPROVEMENTS

SHEET C-2.2

Z:\2022-5038 Crown Point HS & Wheeler - Turf Project\dwg\2022-5038 CP Athletics.dwg 8/21/2022 9:49:27 AM CDT

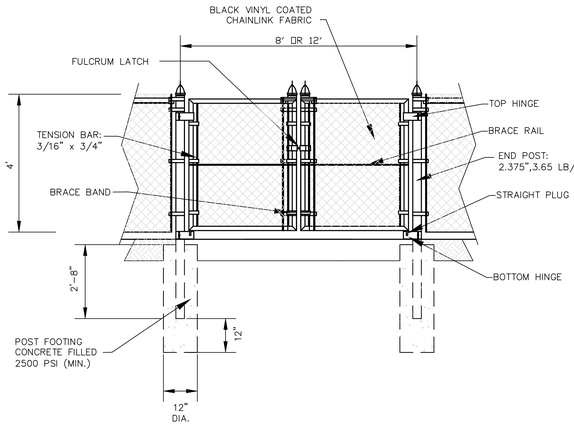


SOFTBALL/BASEBALL BACKSTOP

SCALE: NTS

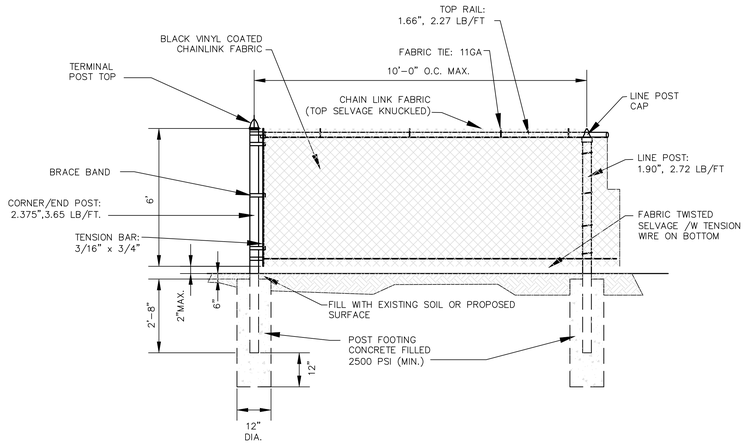
NOTE: BASEBALL BACKSTOP SHALL BE 30 FEET HIGH WITH 15' OVERHANG HOOD.

SOFTBALL BACKSTOP SHALL BE 20 FEET HIGH.



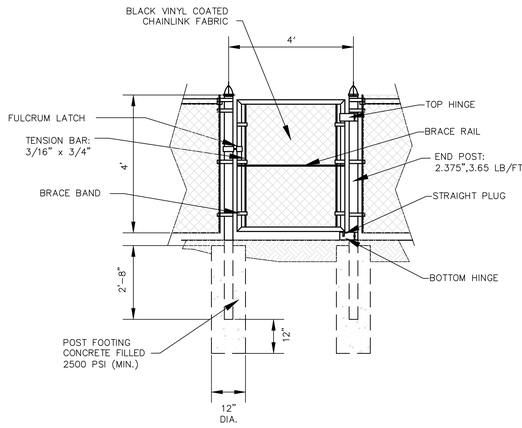
8' OR 12' VINYL FENCE GATE DETAIL

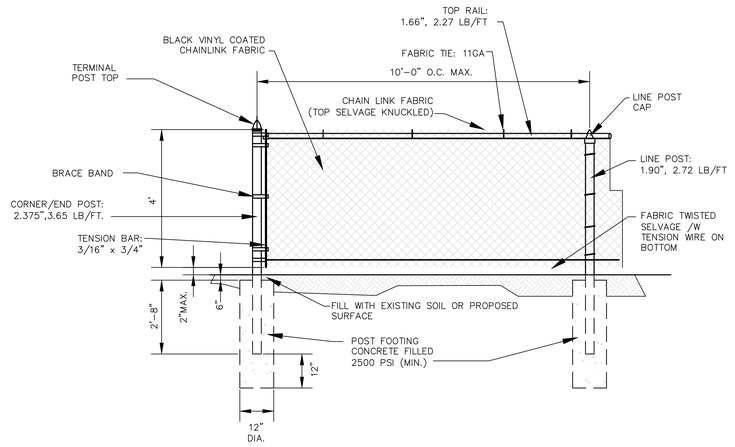
SCALE: NTS



6' VINYL FENCE SECTION DETAIL

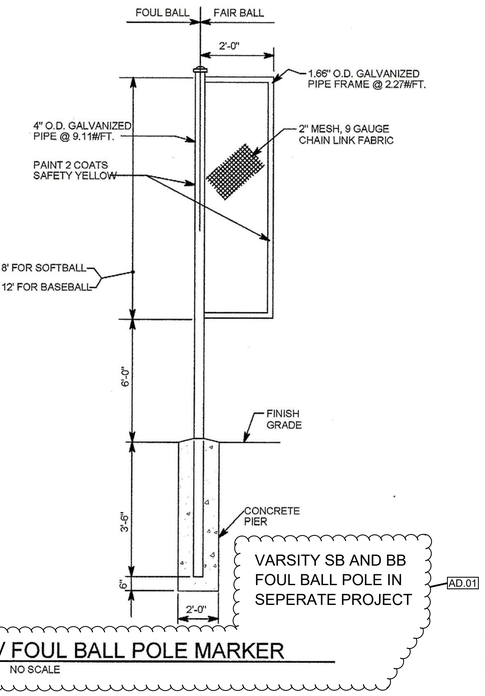
SCALE: NTS

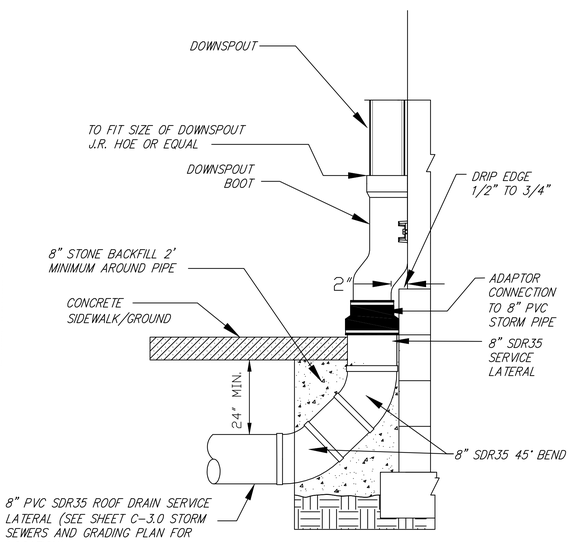




4' VINYL FENCE SECTION/GATE DETAIL

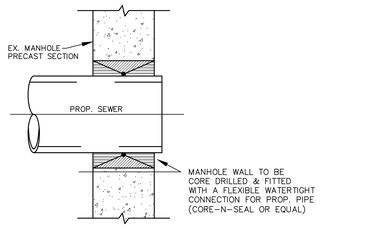
SCALE: NTS





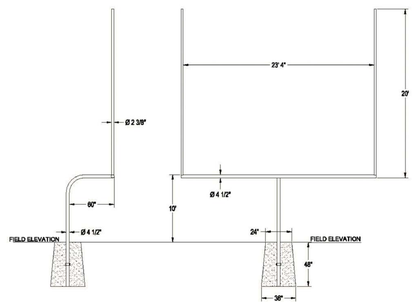
(DOWN SPOUT) ROOF DRAIN PIPE CONNECTION

NOT TO SCALE



PIPE CONNECTION DETAIL TO EXISTING MANHOLE

SCALE: NTS



Goalposts shall meet all National High School Federation rules. Goalposts shall be of the single bent post design and provide a minimum of 60" of setback from the front of the post to the front of the horizontal crossbar. The bent post shall be a minimum of 4" schedule 40 (4 1/2" outside diameter) ASTM A500 grade C structural pipe and provide for no less than 48" bury into the ground. A bend clamp shall be attached to each pole to eliminate rotation in the concrete footing. Horizontal crossbars shall be no less than 4 1/2" OD flow coated steel tubing with a 7 gauge wall thickness and be of a length to allow uprights to extend upward with official high school 23'4" between the upright members. Two vertical uprights shall rise a minimum of 20' above the top of the crossbar. Uprights shall be constructed of 2 3/8" diameter 6063-T6 aluminum with a minimum 0.154" wall thickness. Uprights shall be connected to each end of the crossbar by means of a machined aluminum insert that allows the angle of the uprights to be adjusted at the time of field installation. The insert design shall allow rain to escape through the insert from the top of the uprights. The crossbar shall be attached to the bent post by means of an adjustable "T" adapter that allows field adjustment of the horizontal crossbar for ease and accuracy of installation. Installation to be completed in accordance to manufacturer's instructions. Do not scale drawings. All steel and aluminum members shall have a polyester powder coated finish (white-W7 or safety yellow-SY). All hardware shall be zinc plated grade 5 minimum. Optional features include ground sleeves, safety padding and wind direction flags. Shipping weight approximately 1000#/pair.

FOOTBALL GOAL POST

SCALE: NTS

GIBRALTAR DESIGN
ARCHITECTURE • ENGINEERING • INTERIOR DESIGN

CROWN POINT HIGH SCHOOL - ATHLETIC FIELDS AND SITE IMPROVEMENTS

GIBRALTAR DESIGN
9102 N. Meridian St., Ste. 300
Indianapolis, IN 46260
Homepage www.GibraltarDesign.com
Email info@GibraltarDesign.com
Phone 317.580.5777 Fax 317.580.5778

PROJECT 21-120
DATE 08-22-22
COORDINATED BY DCT
DRAWN BY DCT EM
CHECKED BY DCT RAT

DONALD C. TORRENCE REGISTERED No. 19868 STATE OF INDIANA PROFESSIONAL ENGINEER

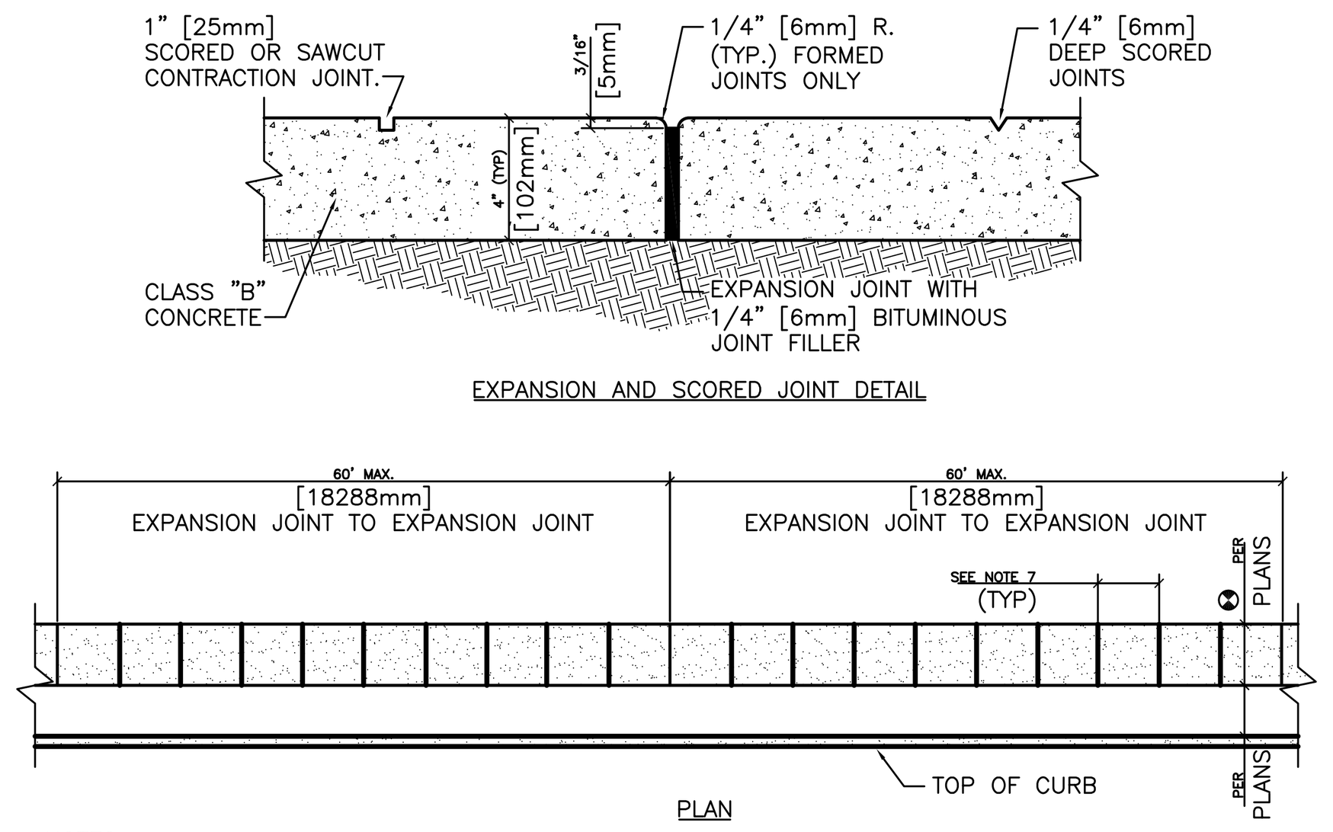
REVISIONS

MARK	DATE	ISSUED FOR
AD.01	08/30/22	ADDENDUM NO. 1

DRAWING
DETAILS & SPECIFICATIONS

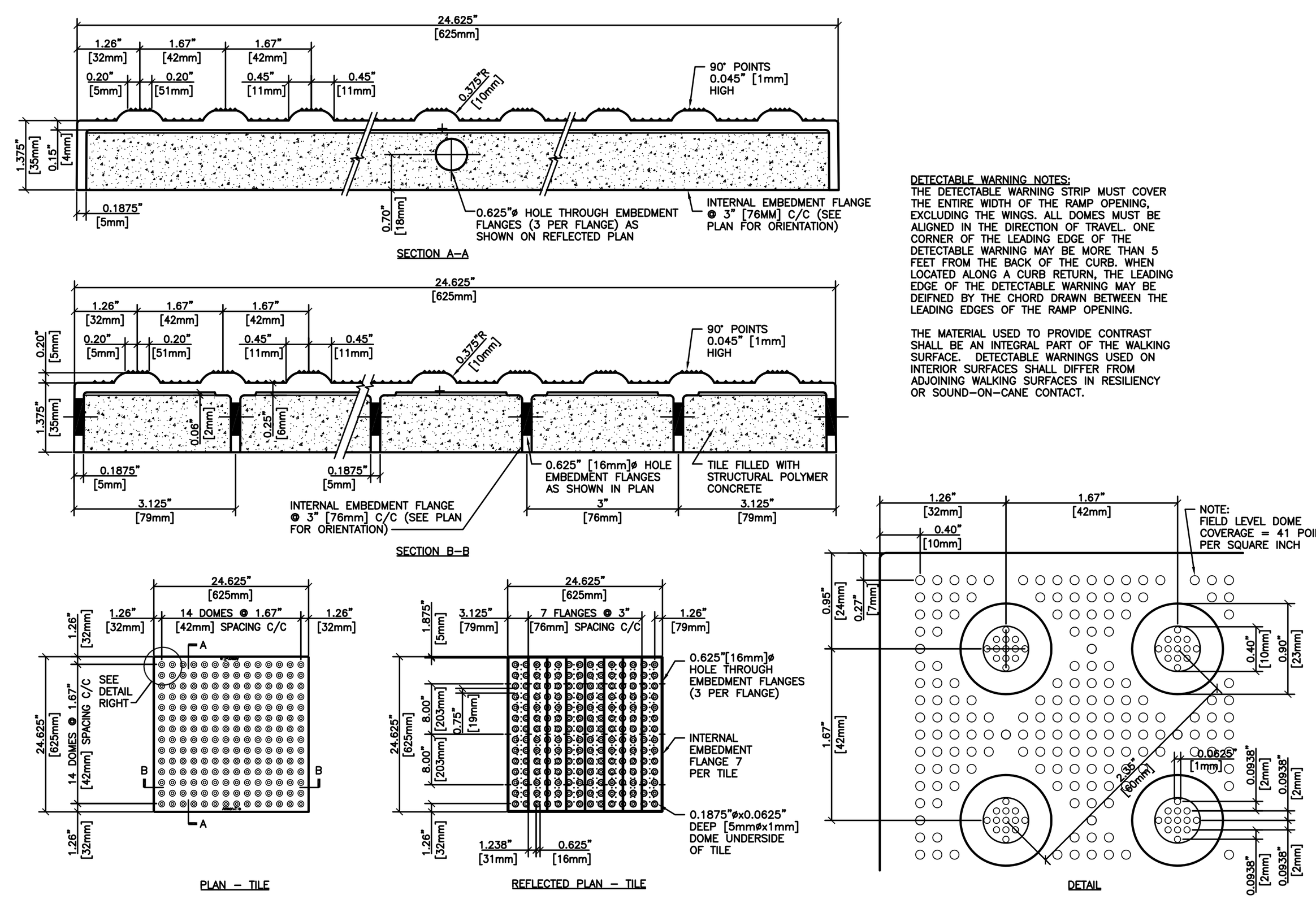
PROJECT
CROWN POINT HIGH SCHOOL - ATHLETIC FIELDS AND SITE IMPROVEMENTS

SHEET
C-4.0



NOTES:
1. EXPANSION JOINTS SHALL BE LOCATED WHERE SIDEWALK ABUTS CONCRETE DRIVEWAYS, CURB OR OTHER ADJACENT STRUCTURES.
2. ONE-HALF INCH BITUMINOUS JOINT FILLER SHALL BE INSTALLED AT EXPANSION JOINT LOCATIONS AND SHALL EXTEND THE FULL DEPTH OF THE CONCRETE.
3. 1" DEEP CONTRACTION JOINTS SHALL BE PLACED AT INTERVALS OF APPROXIMATELY 15' [4572mm] OR AT A SPACING THAT MATCHES THE ADJACENT CURB.
4. FORMED CONTRACTION JOINTS SHALL BE FINISHED WITH A TOOL HAVING A 1/4" [6mm] RADIUS.
5. SCORED JOINTS SHALL BE 1/4" [6mm] DEEP AND PLACED AT THE SPACING INDICATED FOR THE WIDTH OF SIDEWALK OR MATCH SCORED JOINTS OF ADJACENT CURB.
6. CONCRETE SHALL BE FINISHED BY MEANS OF A FLOAT, STEEL TROWELLED AND BROOMED WITH A FINE BRUSH IN A TRANSVERSE DIRECTION.
7. 1/4" DEEP SCORED JOINTS (TYP) SPACED AT 6' [1829mm] OR EQUAL TO SIDEWALK WIDTH.

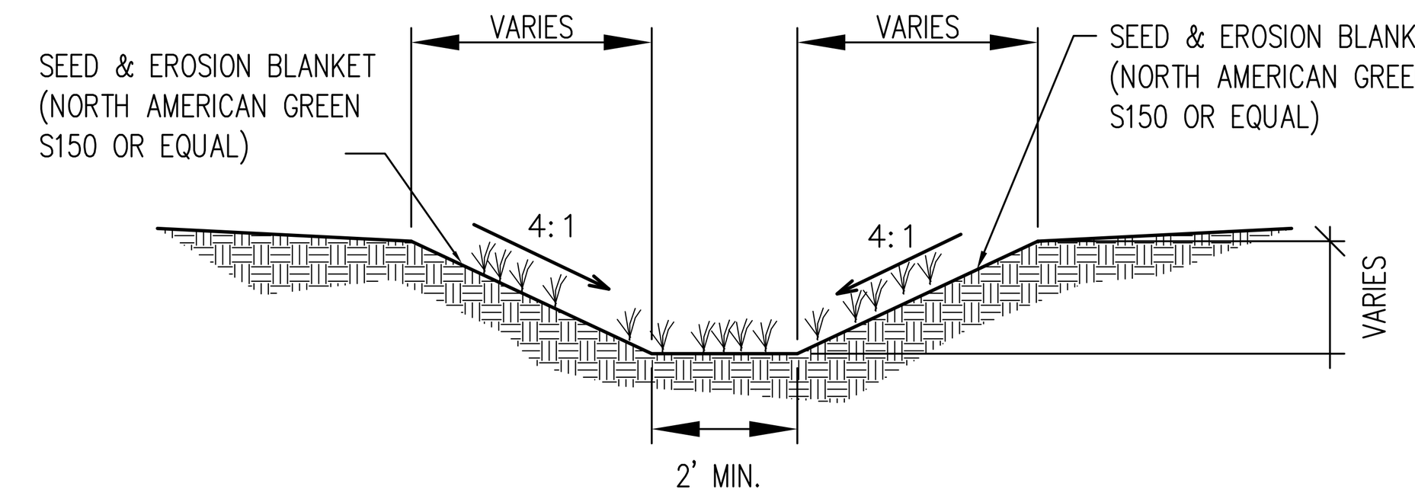
CONCRETE SIDEWALK
NOT TO SCALE



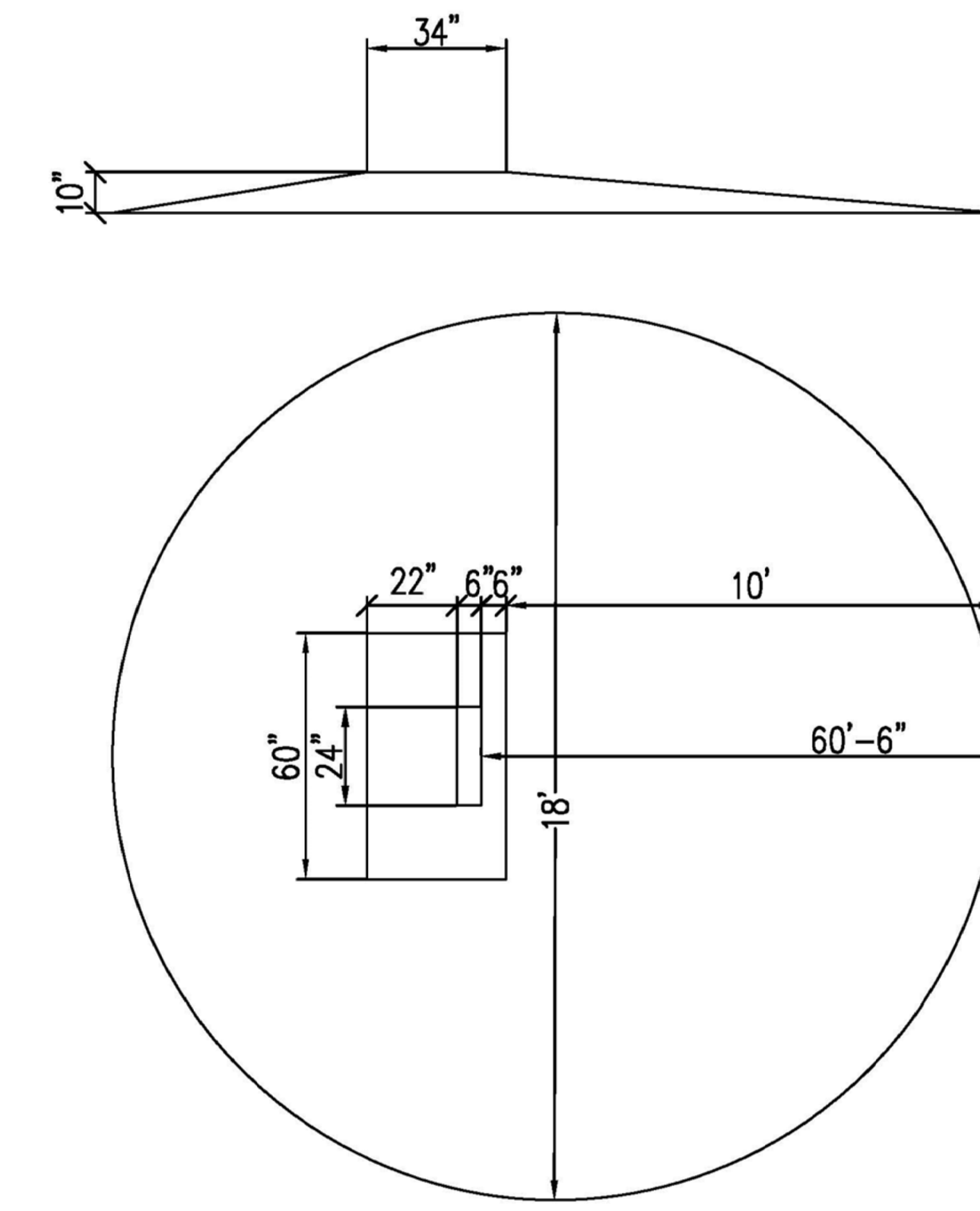
DETECTABLE WARNING NOTES:
THE DETECTABLE WARNING STRIP MUST COVER THE ENTIRE WIDTH OF THE RAMP OPENING, EXCLUDING THE WINGS. ALL DOMES MUST BE ALIGNED IN THE DIRECTION OF TRAVEL. ONE CORNER OF THE LEADING EDGE OF THE DETECTABLE WARNING MAY BE MORE THAN 5 FEET FROM THE BACK OF THE CURB. WHEN LOCATED ALONG A CURB RETURN, THE LEADING EDGE OF THE DETECTABLE WARNING MAY BE DEIFNED BY THE CHORD DRAWN BETWEEN THE LEADING EDGES OF THE RAMP OPENING.

THE MATERIAL USED TO PROVIDE CONTRAST SHALL BE AN INTEGRAL PART OF THE WALKING SURFACE. DETECTABLE WARNINGS USED ON INTERIOR SURFACES SHALL DIFFER FROM ADJOINING WALKING SURFACES IN RESILIENCY OR SOUND-ON-CANE CONTACT.

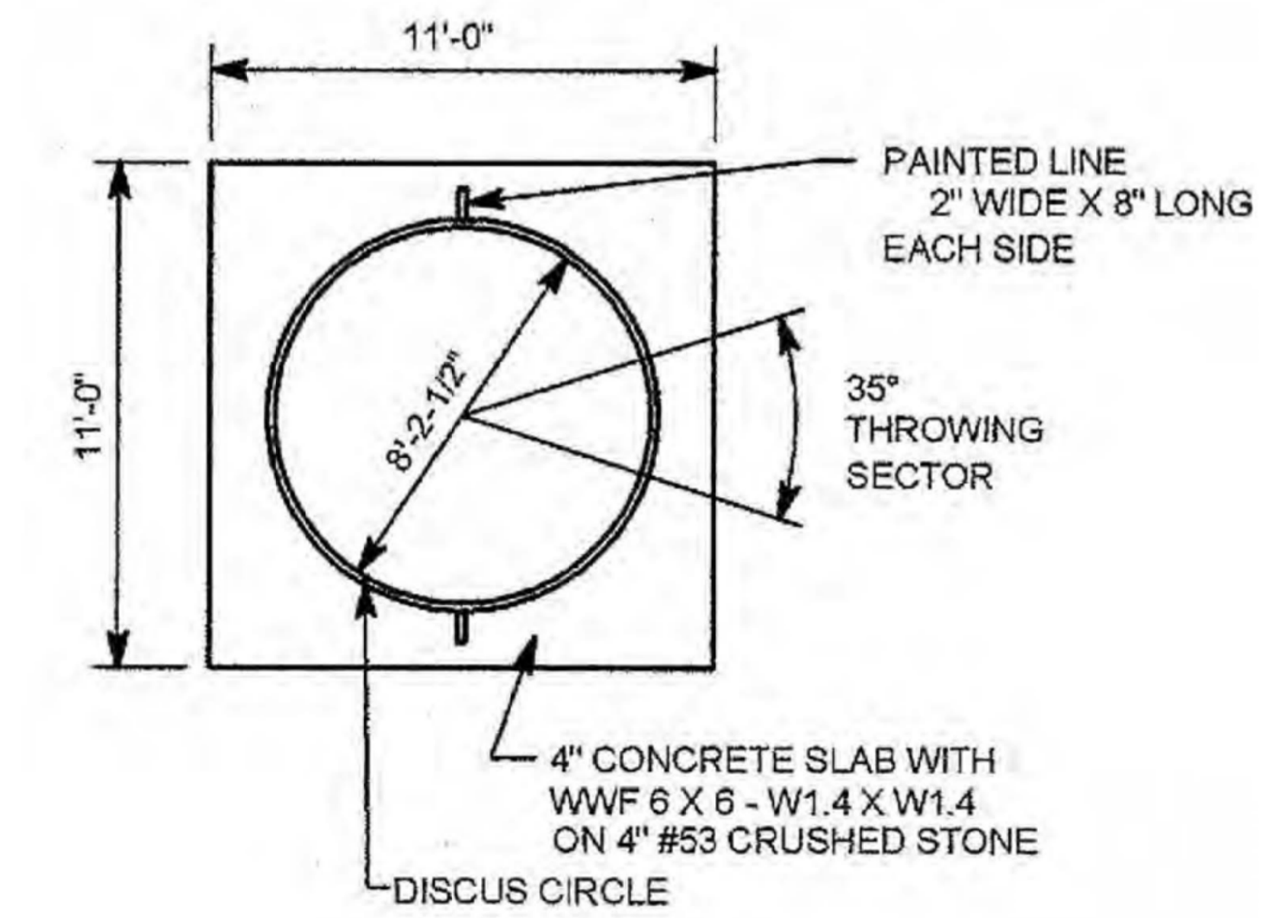
TRUNCATED DOME TACTILE - WARNING STRIP
NOT TO SCALE



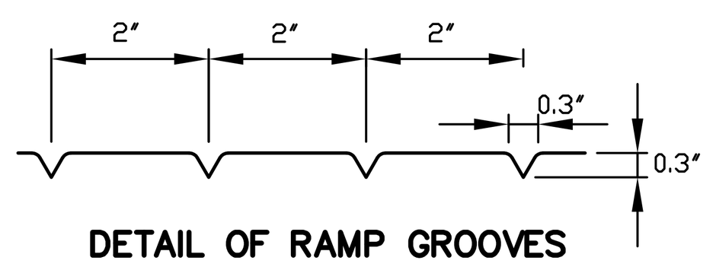
VEGETATED SWALE DETAIL
NOT TO SCALE



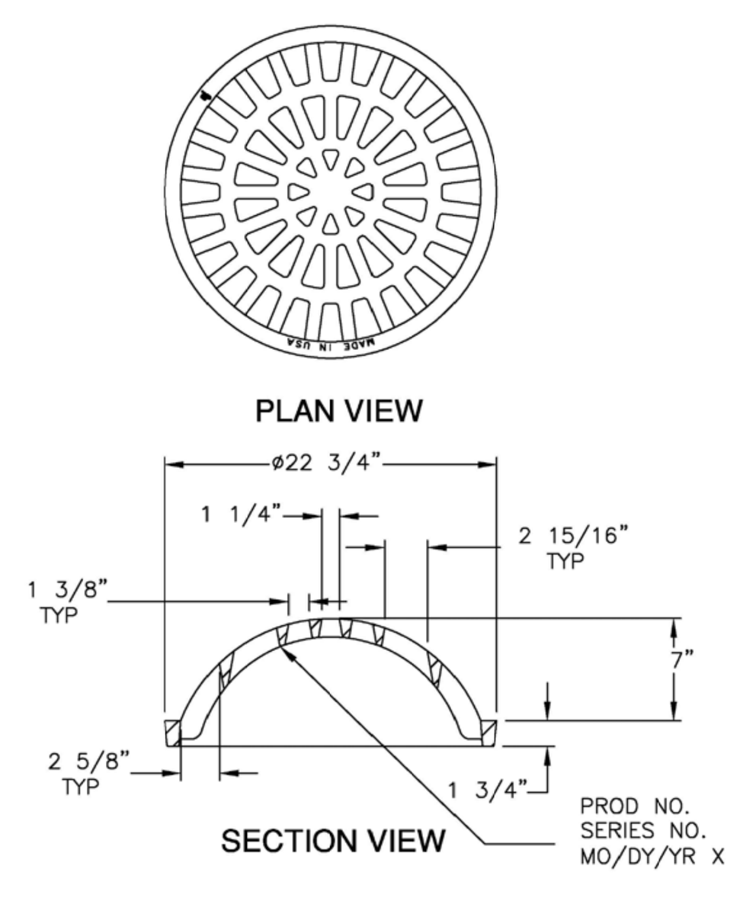
PITCHERS MOUND
NO SCALE



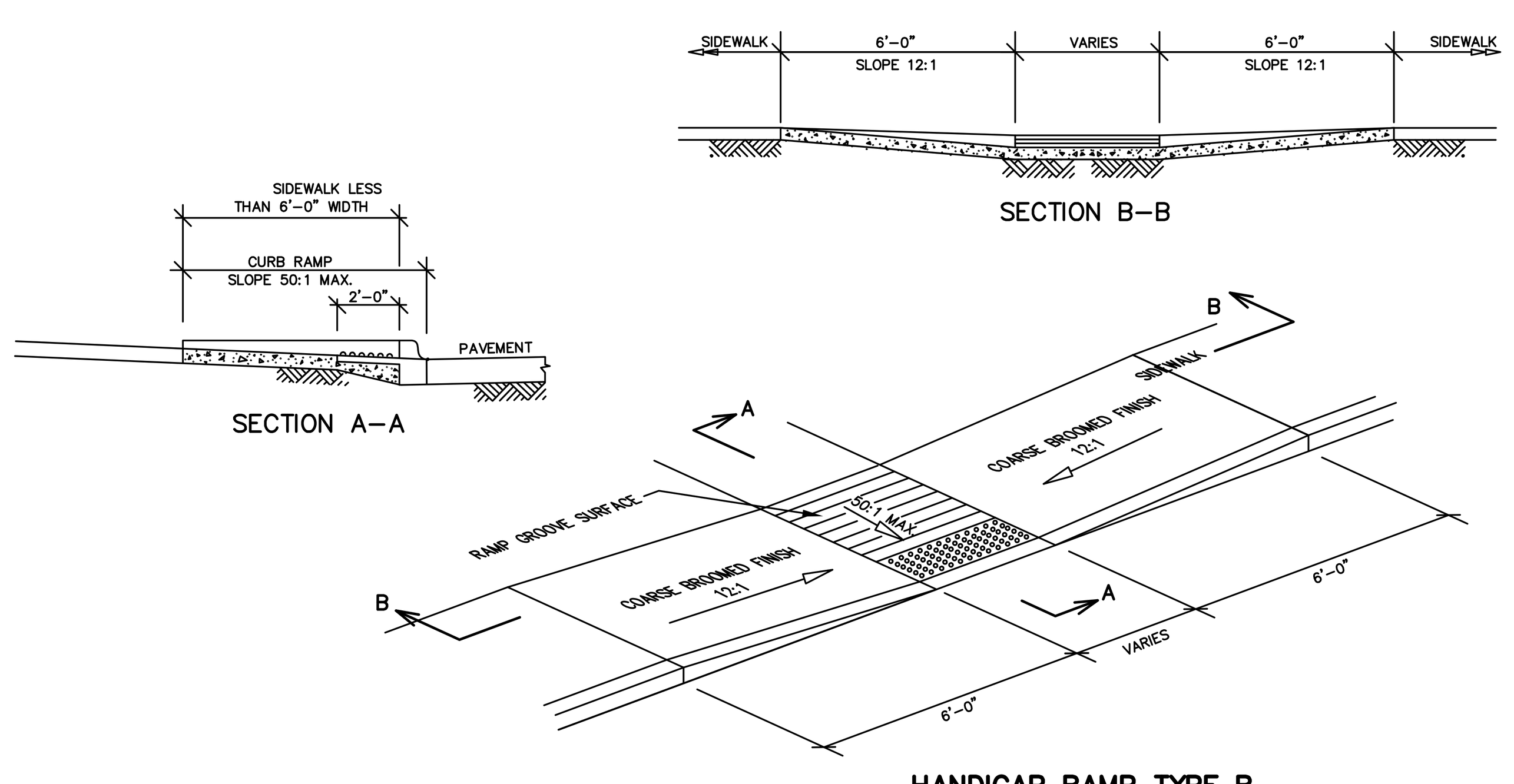
DISCUSS THROW PAD
NOT TO SCALE



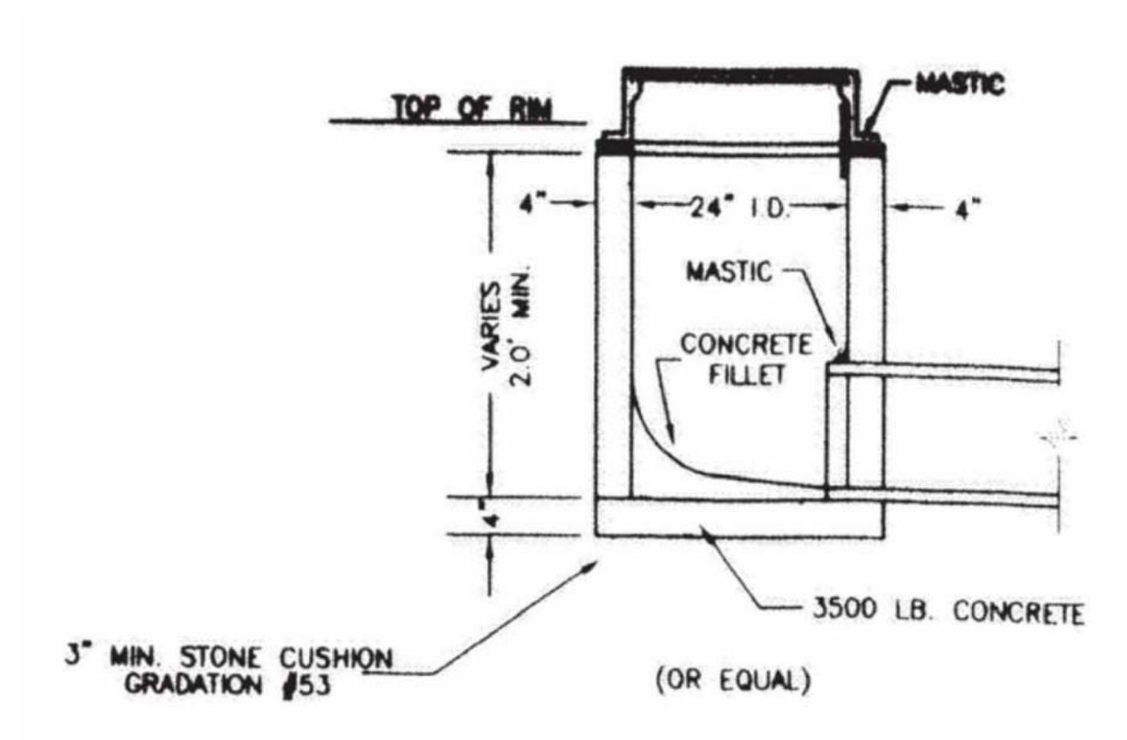
DETAIL OF RAMP GROOVES
NOT TO SCALE



EJIW 1020 7" BEEHIVE
NOT TO SCALE

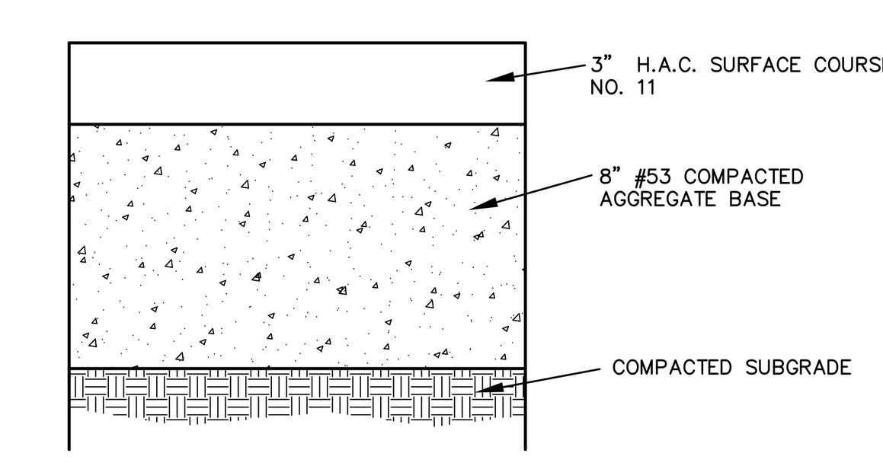


HANDICAP RAMP TYPE B
NOT TO SCALE



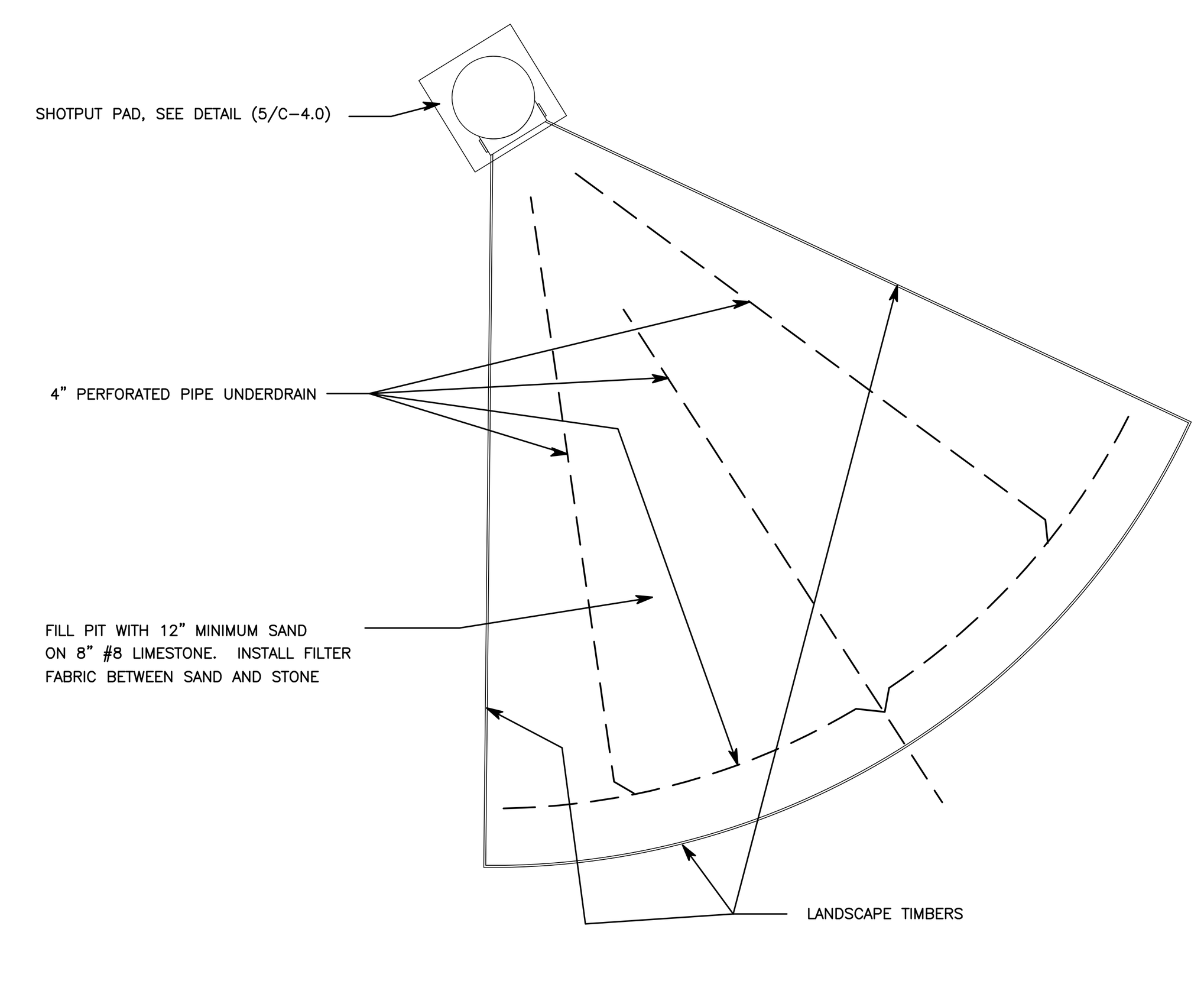
STANDARD INLET
NOT TO SCALE

AD-1

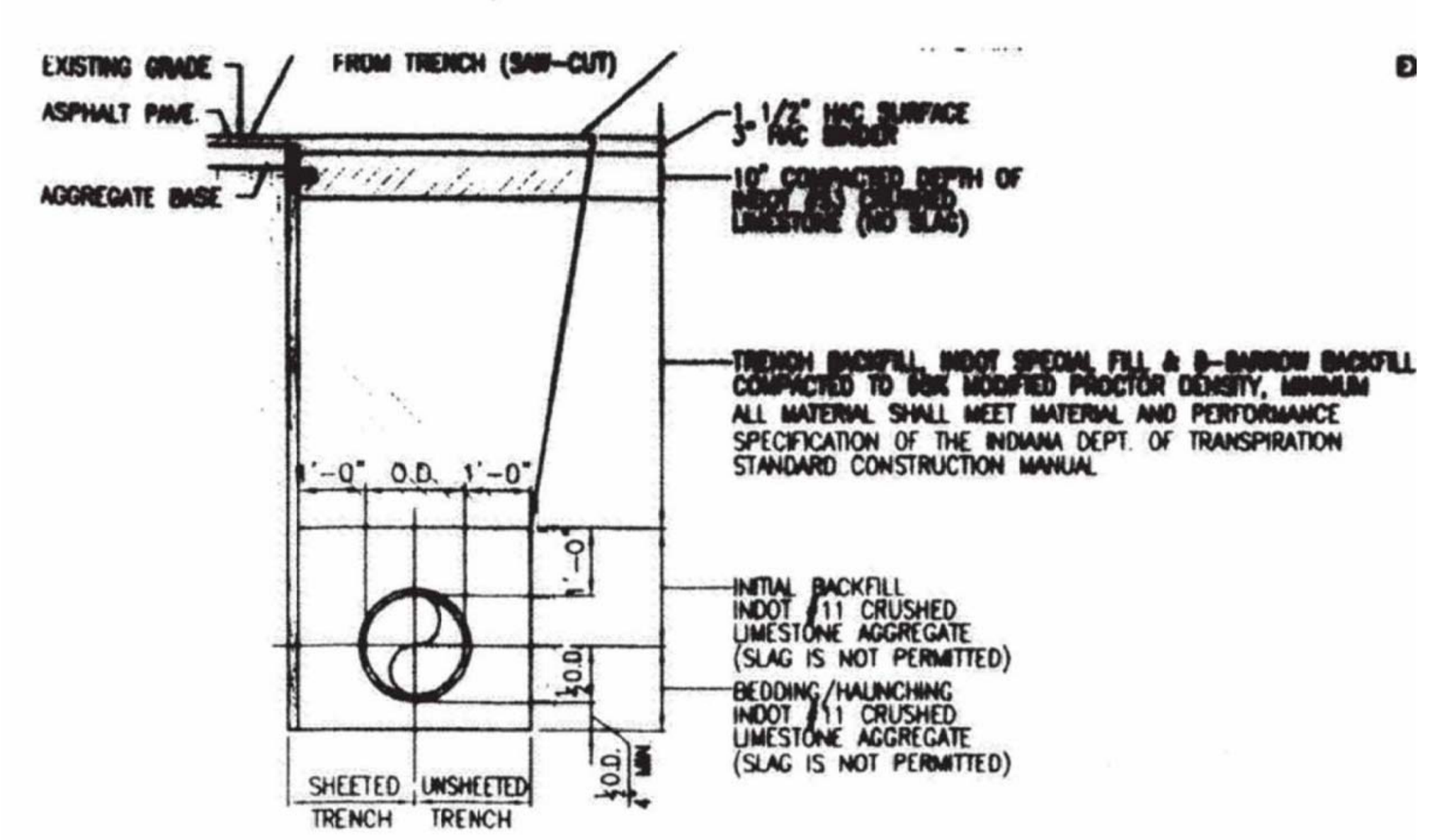


ASPHALT PAVEMENT SECTION
NOT TO SCALE

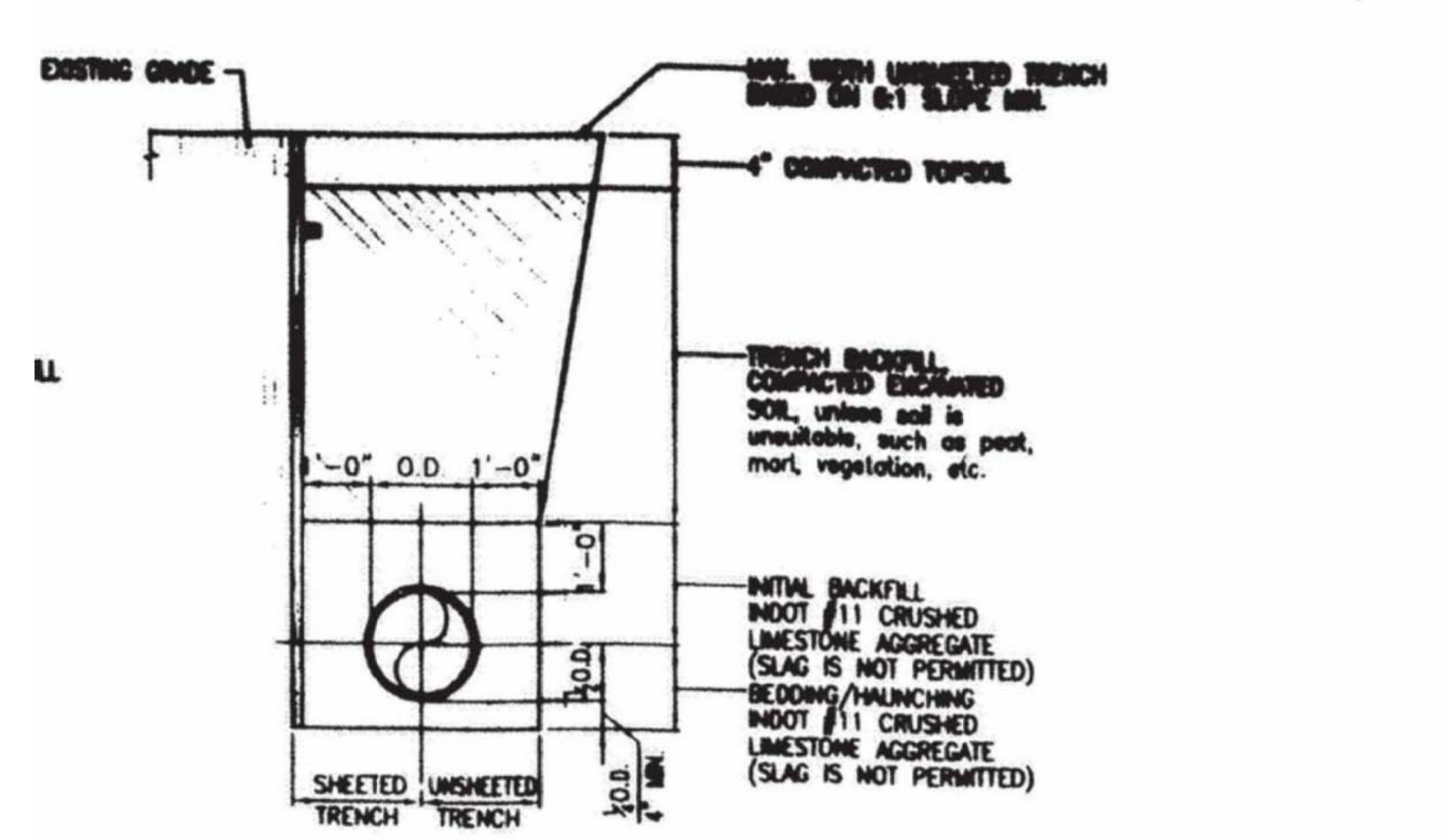
AD-1



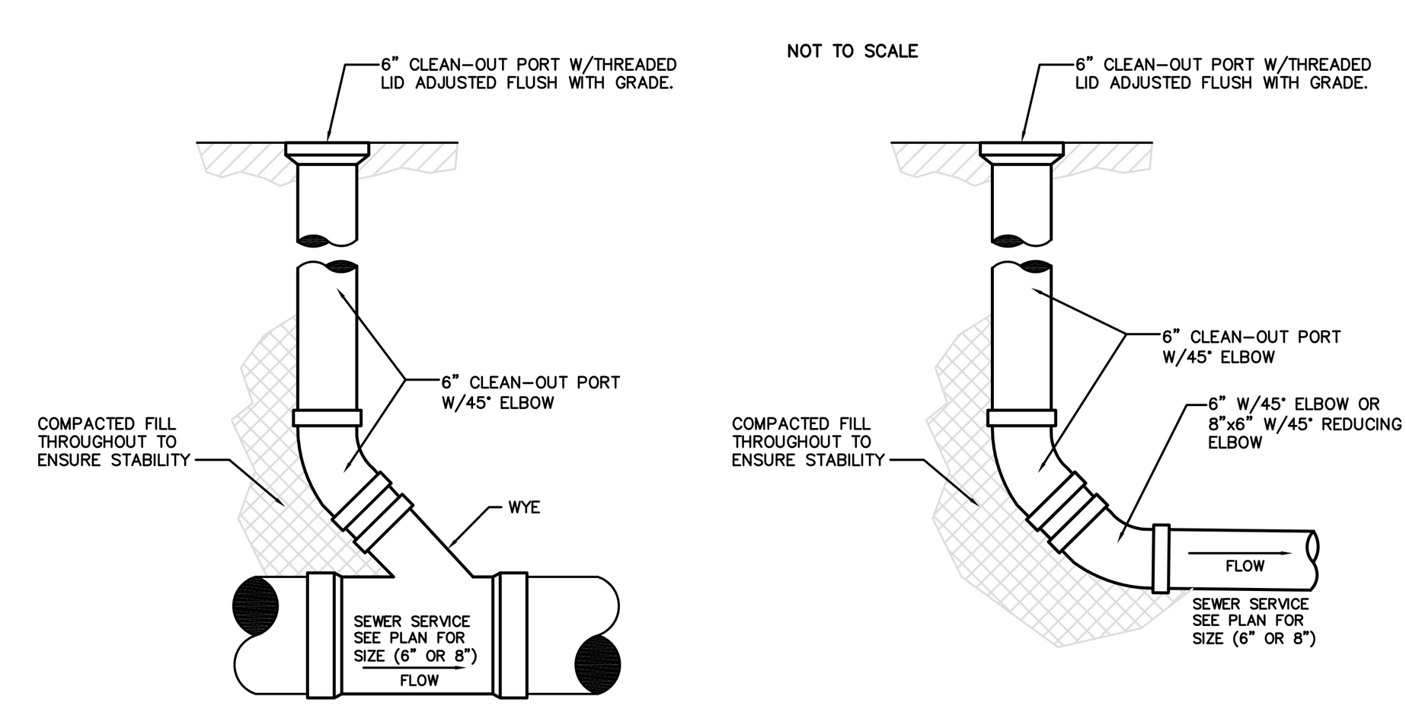
SHOT PUT THROWING PIT
SCALE: NTS



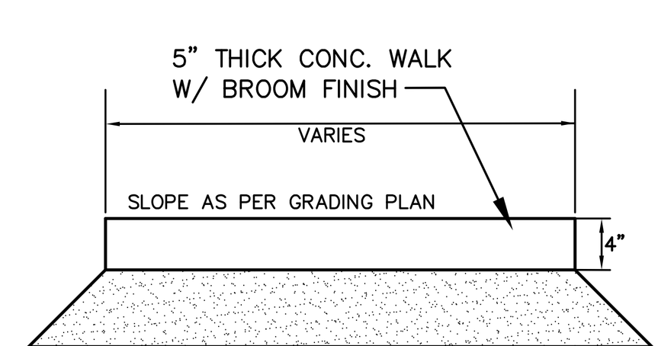
PIPE BEDDING DETAIL FOR TRENCH IN PAVED AREAS
NOT TO SCALE



PIPE BEDDING DETAIL FOR TRENCH IN GRASS AREAS
NOT TO SCALE



CLEAN-OUT
NOT TO SCALE

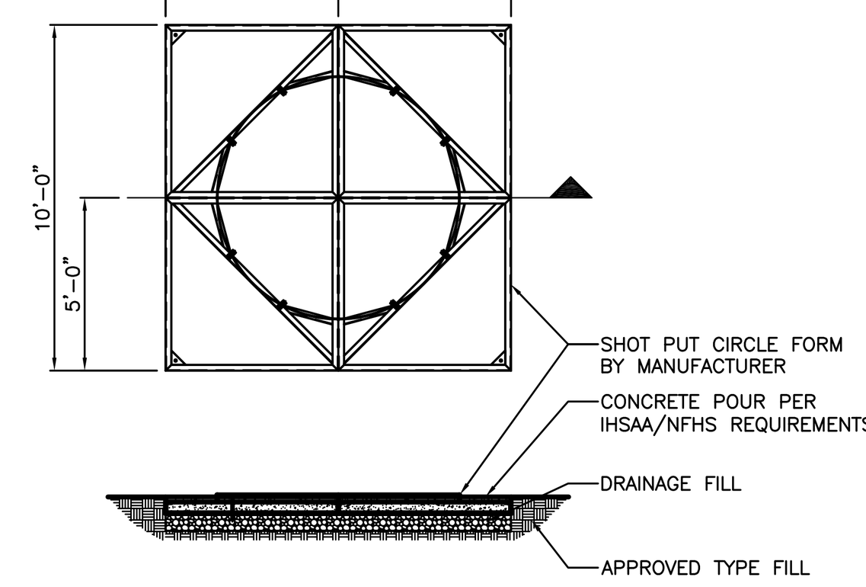


NOTE:
1. ALL JOINTS ARE TO BE SAWCUT, NO SCORED (TOOLED) JOINTS ARE ALLOWED.
2. FOR EXPANSION JOINTS, USE ZIP STRIP AT TOP & SONNEBORN NP-1 SEALANT.
3. CURBS AND SIDEWALKS SHALL RECIEVE SPECCO "CONCRETE EARTH" DRYCRETE MOISTURE STOP. APPLY ONE COAT.
4. REFER TO STURCTURAL DETAILS FOR CONCRETE PAD BENEATH PROPOSED BLEACHERS.

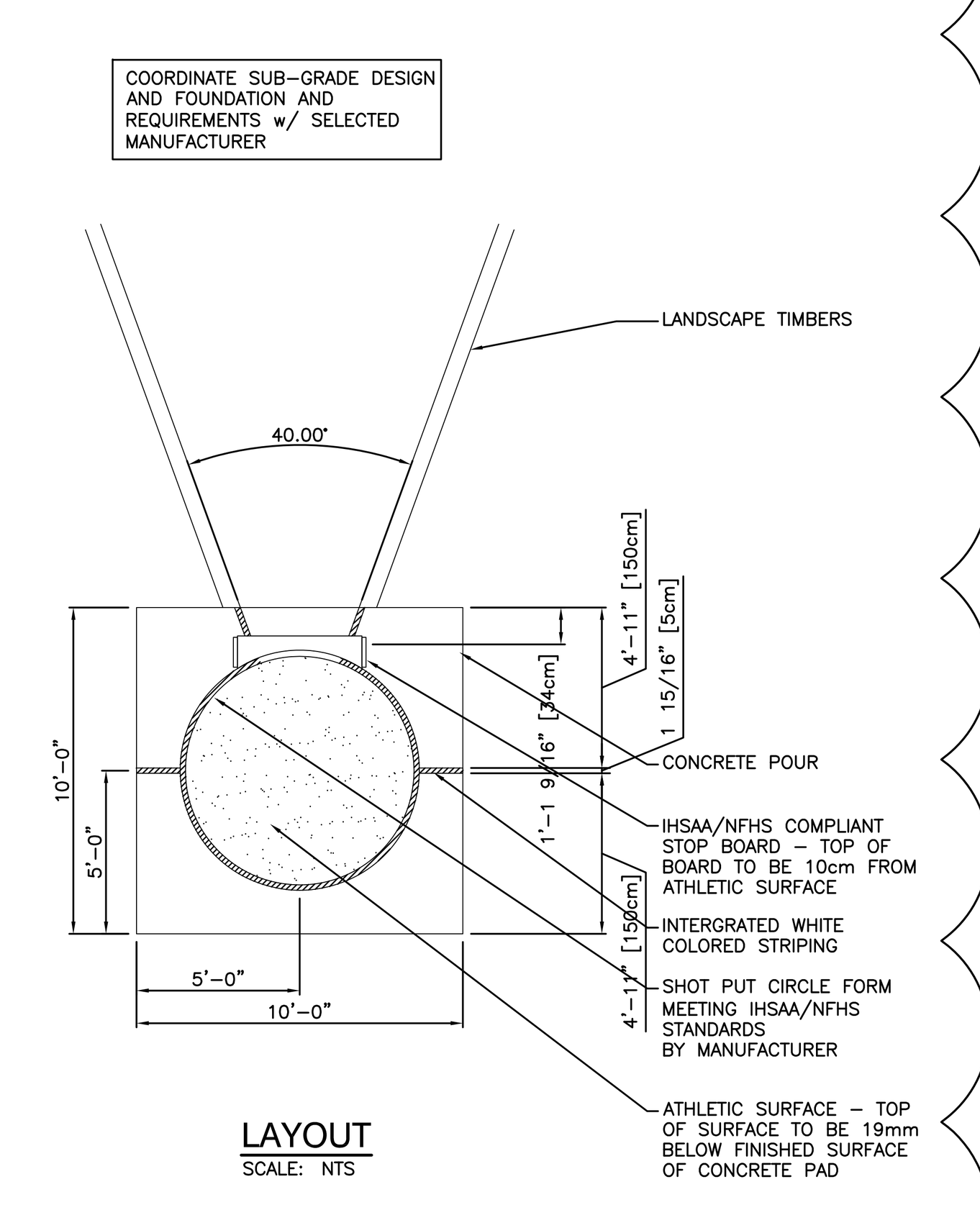
TYPE C

SIDEWALK CROSS-SECTION
NOT TO SCALE

COORDINATE SUB-GRADE DESIGN AND FOUNDATION AND REQUIREMENTS w/ SELECTED MANUFACTURER



SHOT PUT CIRCLE FORM
SCALE: NTS



LAYOUT
SCALE: NTS

SHOT PUT CIRCLE
SCALE: AS NOTED

AD-1

Z:\2022-5038 Crown Point HS & Wheeler - Turf Project\dwg\2022-5038 Details.dwg 8/30/2022 11:39:53 AM CDT

GIBRALTAR
DESIGN
ARCHITECTURE • ENGINEERING • INTERIOR DESIGN

CROWN POINT HIGH SCHOOL - ATHLETIC FIELDS AND SITE IMPROVEMENTS

GIBRALTAR DESIGN
9102 N. Meridian St., Ste. 300
Indianapolis, IN 46260
Homepage www.GibraltarDesign.com
Email info@GibraltarDesign.com
Phone 317.580.5777 Fax 317.580.5778

PROJECT 21-120
DATE 08-22-22
COORDINATED BY DCT
DRAWN BY DCT EM
CHECKED BY DCT RAT

DONALD C. TORRENGA REGISTERED No. 19868 STATE OF INDIANA PROFESSIONAL ENGINEER

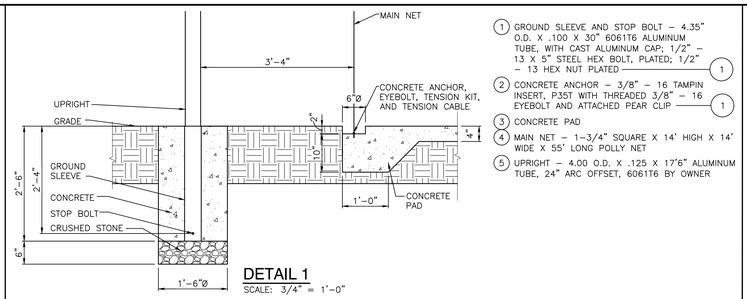
REVISIONS

MARK	DATE	ISSUED FOR
AD-1	08-30-2022	ADDENDUM NUMBER 1

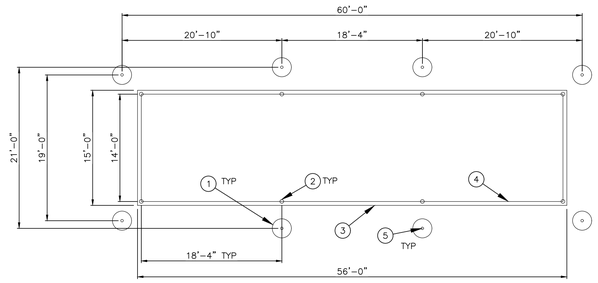
DRAWING
DETAILS & SPECIFICATIONS

PROJECT
CROWN POINT HIGH SCHOOL - ATHLETIC FIELDS AND SITE IMPROVEMENTS

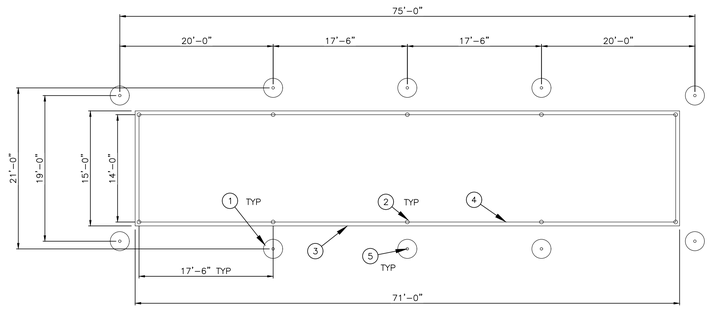
SHEET
C-4.1



DETAIL 1
SCALE: 3/4" = 1'-0"

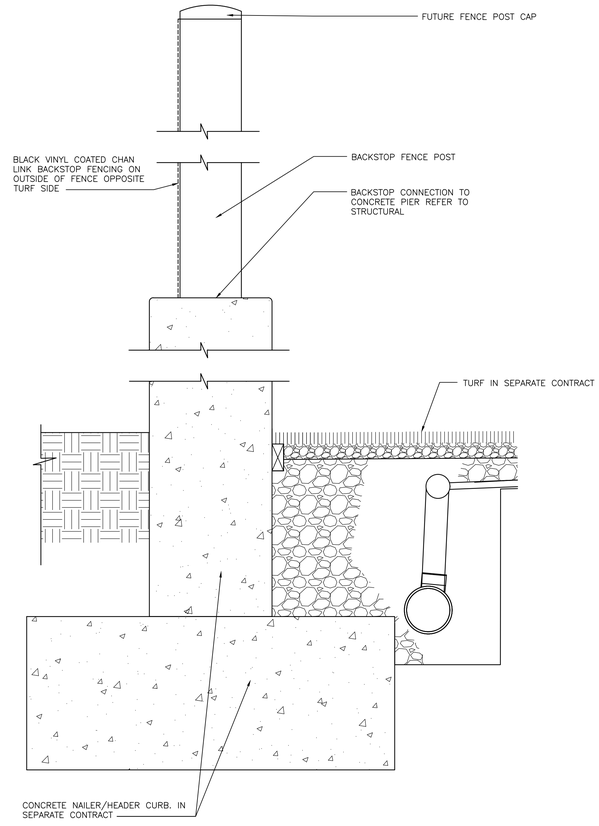


SOFTBALL BATTING CAGE
SCALE: 1/16" = 1'-0"



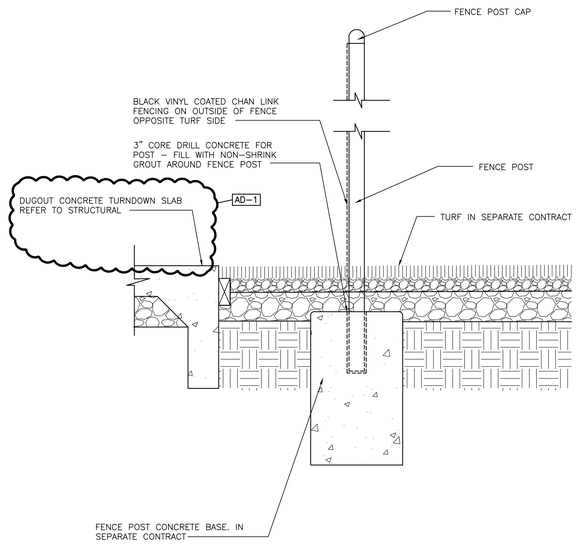
BASEBALL BATTING CAGE
SCALE: 1/16" = 1'-0"

4
C-4.3



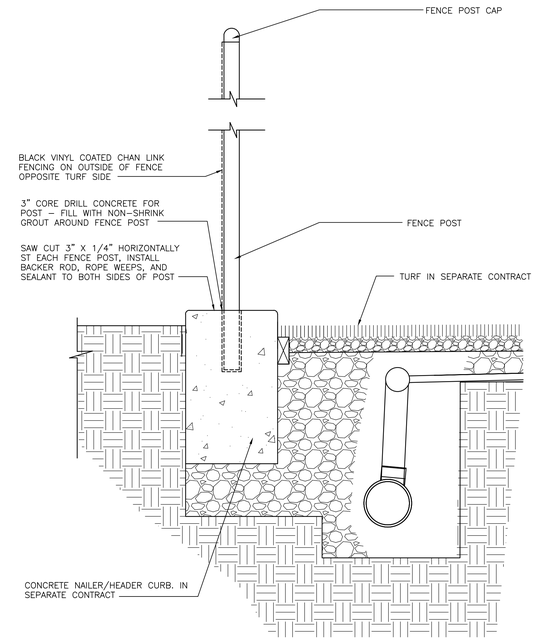
TYPICAL BACKSTOP FENCE POST DETAIL
SCALE: NTS

2
C-4.3



FENCE POST DETAIL AT DUGOUT FENCE
SCALE: NTS

3
C-4.3



TYPICAL FENCE POST DETAIL
SCALE: NTS

1
C-4.3

GIBRALTAR
DESIGN
ARCHITECTURE • ENGINEERING • INTERIOR DESIGN

PROJECT

CROWN POINT HIGH SCHOOL - ATHLETIC FIELDS AND SITE IMPROVEMENTS

FOR:
CROWN POINT COMMUNITY SCHOOL CORPORATION
CROWN POINT, INDIANA

GIBRALTAR DESIGN
9102 N. Meridian St., Ste. 300
Indianapolis, IN 46260
Homepage www.GibraltarDesign.com
Email info@GibraltarDesign.com
Phone 317.580.5777 Fax 317.580.5778

PROJECT 21-120
DATE 08/18/22
COORDINATED BY JPB
DRAWN BY DTB
CHECKED BY JPB

JOSEPH P. BRIGGS REGISTERED NO. 11600109 STATE OF INDIANA ARCHITECT

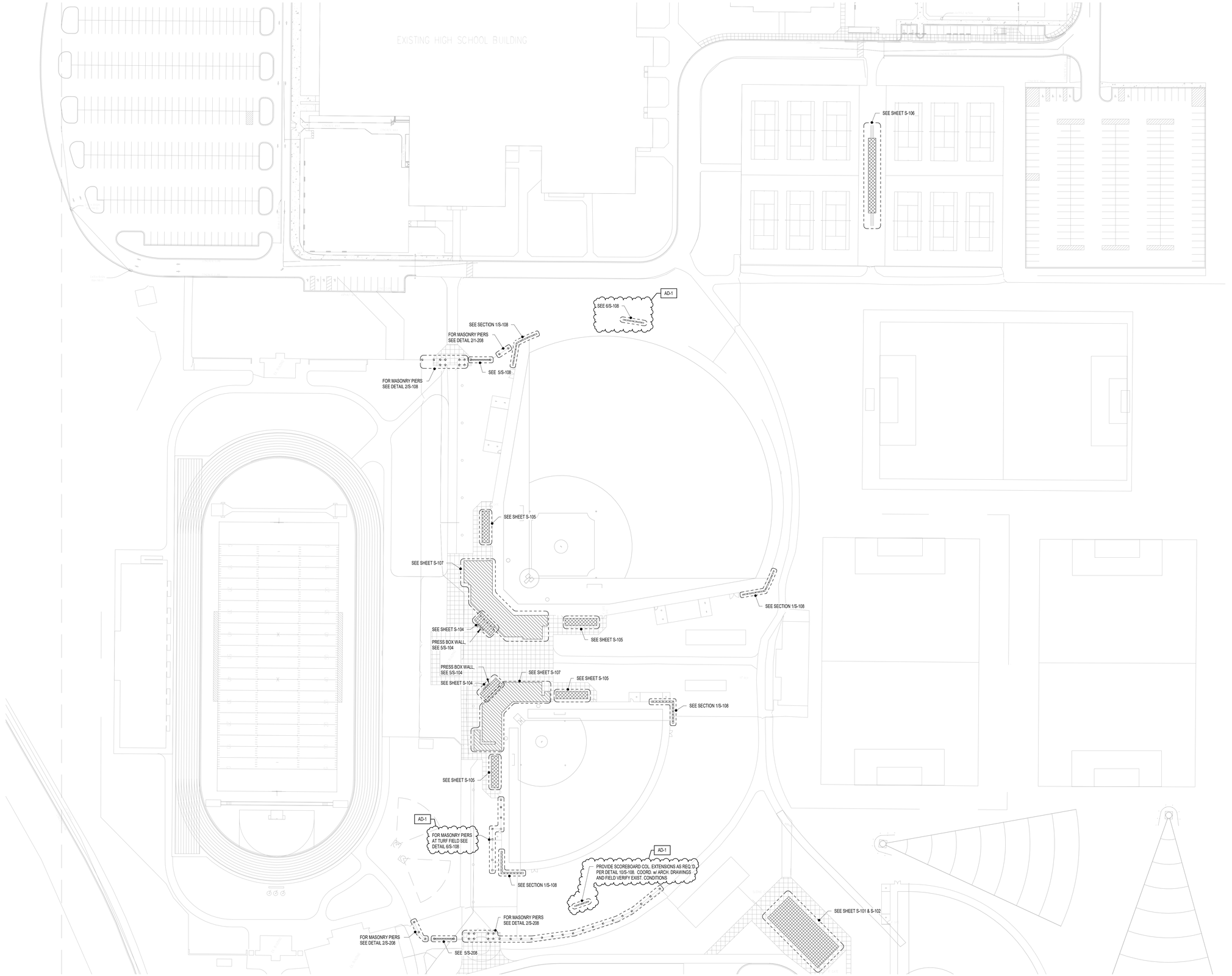
REVISIONS

MARK	DATE	ISSUED FOR
AD-1	08/30/22	ADDENDUM NO. 1

DRAWING
SITE DETAILS

PROJECT
CROWN POINT HIGH SCHOOL - ATHLETIC FIELDS AND SITE IMPROVEMENTS

SHEET
C-4.3



1 SITE PLAN - NORTH
1" = 50'-0"

GIBRALTAR
DESIGN
ARCHITECTURE - ENGINEERING - INTERIOR DESIGN

PROJECT

CROWN POINT HIGH SCHOOL - SPORTS SITE IMPROVEMENTS

FOR:
CROWN POINT COMMUNITY SCHOOL CORPORATION
CEDAR LAKE, INDIANA

GIBRALTAR DESIGN
9102 N. Meridian St., Ste. 300
Indianapolis, IN 46260
Homepage www.GibraltarDesign.com
Email info@GibraltarDesign.com
Phone 317.580.5777 Fax 317.580.5778

PROJECT 21-120
DATE 08/18/2022
COORDINATED BY SAC/NHF
DRAWN BY SAC/NHF
CHECKED BY SAC

SCOTT A. CLONE
PE10606154
STATE OF INDIANA
REGISTERED PROFESSIONAL ENGINEER

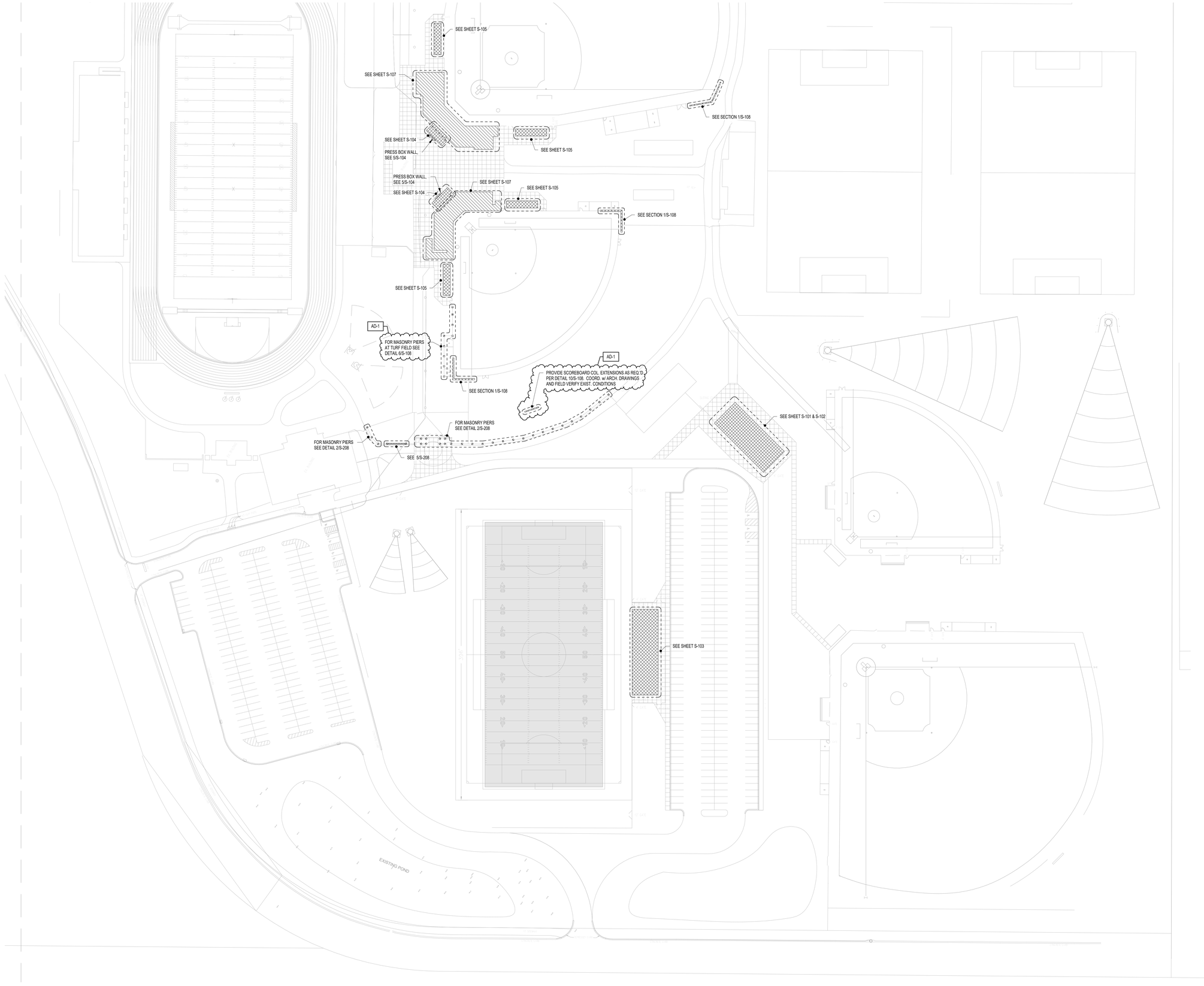
REVISIONS

MARK	DATE	ISSUED FOR
AD-1	08/30/22	ADDENDUM 1

DRAWING
STRUCTURAL SITE KEY PLAN NORTH

PROJECT
CROWN POINT HIGH SCHOOL - SPORTS SITE IMPROVEMENTS

SHEET
S-100N



1 SITE PLAN - SOUTH
1" = 50'-0"

GIBRALTAR
DESIGN
ARCHITECTURE - ENGINEERING - INTERIOR DESIGN

PROJECT

CROWN POINT HIGH SCHOOL - SPORTS SITE IMPROVEMENTS

FOR:
CROWN POINT COMMUNITY SCHOOL CORPORATION
CEDAR LAKE, INDIANA

GIBRALTAR DESIGN
9102 N. Meridian St., Ste. 300
Indianapolis, IN 46260
Homepage www.GibraltarDesign.com
Email info@GibraltarDesign.com
Phone 317.580.5777 Fax 317.580.5778

PROJECT
21-120
DATE
08/18/2022
COORDINATED BY
SAC/NHF
DRAWN BY
SAC/NHF
CHECKED BY
SAC

SCOTT A. CLOKE
PE10606154
STATE OF INDIANA
PROFESSIONAL ENGINEER

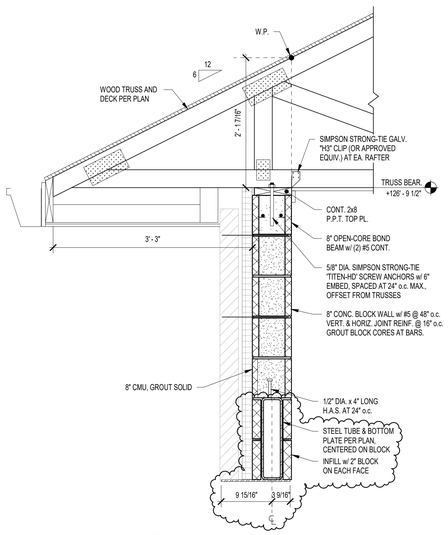
REVISIONS

MARK	DATE	ISSUED FOR
AD-1	08/30/22	ADDENDUM 1

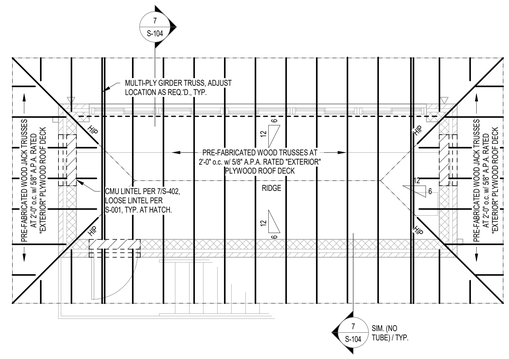
DRAWING
STRUCTURAL SITE KEY PLAN SOUTH

PROJECT
CROWN POINT HIGH SCHOOL - SPORTS SITE IMPROVEMENTS

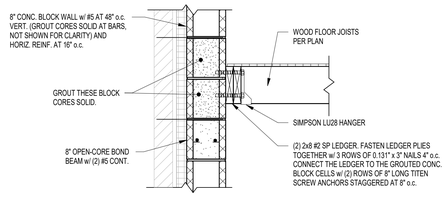
SHEET
S-100S



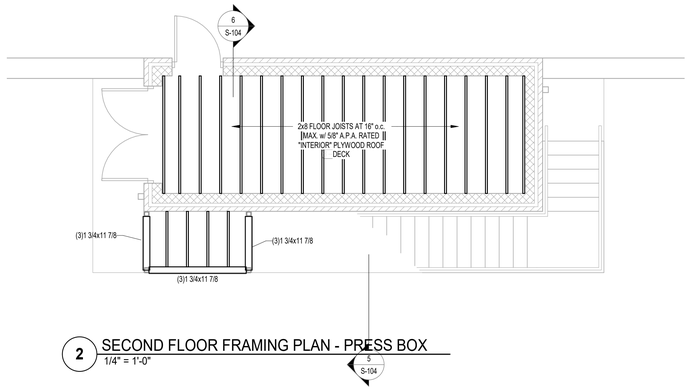
7 FRAMING SECTION
1" = 1'-0"



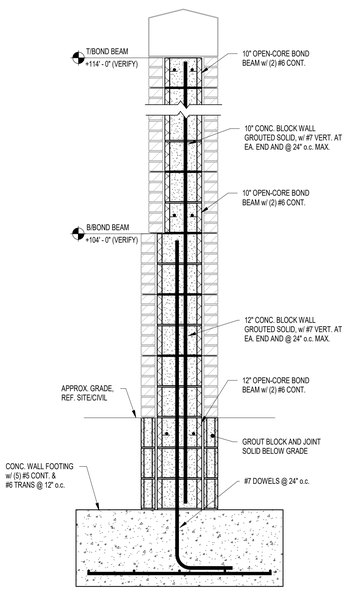
3 ROOF TRUSS BEARING - PRESS BOX
1/4" = 1'-0"



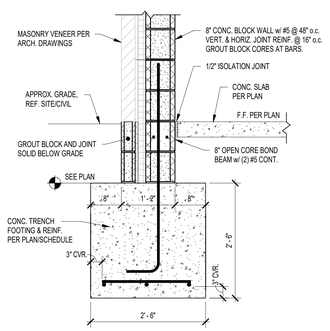
6 FRAMING SECTION - PRESS BOX 2ND FLOOR
1" = 1'-0"



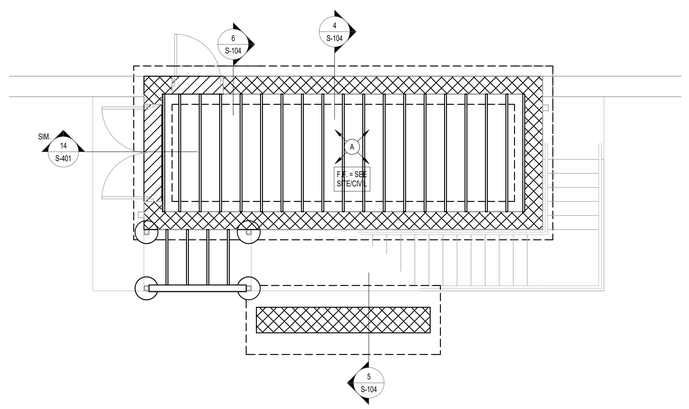
2 SECOND FLOOR FRAMING PLAN - PRESS BOX
1/4" = 1'-0"



5 FOUNDATION SECTION - WALL AT PRESS BOX
3/4" = 1'-0"



4 FOUNDATION SECTION - PRESS BOX PERIMETER
3/4" = 1'-0"



1 FOUNDATION PLAN - PRESS BOX
1/4" = 1'-0"

FRAMING PLAN GENERAL NOTES

1. REF. S-001 SHEETS FOR STRUCTURAL NOTES, DESIGN DATA AND SCHEDULES.
2. REFERENCE THE ARCH. PLANS FOR LAYOUT OF ALL WALLS, OPENINGS, WALL TYPES, ETC. VERIFY ALL DIMENSIONS PRIOR TO SHOP DRAWINGS SUMBITTAL & IMMEDIATELY NOTIFY ARCHITECT/ENGINEER OF ANY DISCREPANCIES.
3. AT BEARING OF ALL GIRDER TRUSSES, TRUSS MANUFACTURER SHALL PROVIDE THE NECESSARY HARDWARE FOR ATTACHMENT TO WALLS (TOP PLATE OR MASONRY) TO RESIST THE LOADS/REACTIONS OF ALL GIRDER TRUSSES.
4. SEE THE ARCHITECTURAL DETAILS FOR ROOF TRUSS PROFILES (HEEL HEIGHTS, PITCHES, ETC.).
5. ALL ROOF PANEL SHEATHING SHALL BE 5/8", APA-RATED SHEATHING. SUITABLE EDGE SUPPORT SHALL BE PROVIDED BY USE OF PANEL CLIPS OR BLOCKING BETWEEN FRAMING UNLESS OTHERWISE NOTED. FASTEN ROOF SHEATHING WITH 8D COMMON (0.131" X 2 1/2") NAILS SPACED 6" O.C. AT SUPPORTED EDGES AND 12" O.C. AT INTERMEDIATE SUPPORTS.
6. THE TRUSS SUPPLIER MUST COORDINATE WITH M.E.P. AND SPRINKLER CONTRACTORS IN REGARD TO THE LOCATION AND WEIGHT OF ALL WATER SUPPLY MAINS AND SPRINKLER MAINS. THE TRUSSES WILL BE DESIGNED TO SUPPORT THE WEIGHT OF THESE POINT LOADS IN ADDITION TO OTHER LOADS AS SPECIFIED ON THESE PLANS. THE SPACING OF SUPPORTS FOR THESE LINES WILL BE AN IMPORTANT CONSIDERATION IN THE DESIGN OF THE TRUSSES FOR THE MAIN SUPPORT.
7. ALL CONTRACTORS ARE REQUIRED TO COORDINATE THEIR WORK WITH ALL DISCIPLINES TO AVOID CONFLICTS. THE MECHANICAL, ELECTRICAL, AND PLUMBING ASPECTS ARE NOT IN THE SCOPE OF THESE DRAWINGS. THEREFORE, ALL REQUIRED MATERIALS AND WORK MAY NOT BE INDICATED.

FOUNDATION PLAN NOTES

1. REF. S-001 FOR STRUCTURAL NOTES, DESIGN DATA & SCHEDULES.
2. ALL CONTRACTORS ARE REQUIRED TO COORDINATE THEIR WORK WITH ALL DISCIPLINES TO AVOID CONFLICTS. THE MECHANICAL, ELECTRICAL, AND PLUMBING ASPECTS ARE NOT IN THE SCOPE OF THESE DRAWINGS. THEREFORE, ALL REQUIRED MATERIALS AND WORK MAY NOT BE INDICATED.
3. COORDINATE EXACT SIZE & LOCATION OF ALL MECHANICAL OPENINGS IN FOUNDATION WALLS WITH THE MECHANICAL, ELECTRICAL & PLUMBING CONTRACTORS.
4. ALL ELEVATIONS ARE REFERENCED FROM THE FIRST FLOOR FINISH FLOOR ELEVATION, WHICH MAY VARY BUT IS INDICATED AS +100'-0" FOR REFERENCE. REFER TO THE CIVIL DRAWINGS FOR EXACT U.S.G.S. ELEVATION AT INDIVIDUAL STRUCTURES.
5. REF. ARCH. DRAWINGS FOR ALL DIMENSIONS NOT SHOWN. CONTRACTOR SHALL VERIFY ALL DIMENSIONS PRIOR TO CONSTRUCTION AND IMMEDIATELY NOTIFY ARCHITECT/ENGINEER OF ANY DISCREPANCIES.
   REF. S-401 FOR TYPICAL FOUNDATION DETAILS.
6. NOTE: PERIMETER WALL AND COLUMN FOOTINGS SHALL BE LOWERED AND/OR SLEEVED TO PASS BELOW PLUMBING LINES (I.E. SANITARY & STORM SEWERS, WATER LINES, ETC.) SHOWN ON THE PLUMBING DRAWINGS. PROVIDE FOOTING STEPS AS REQUIRED PER THE TYPICAL DETAILS ON S-401.
7. COORDINATE REINFORCING DOWELS FOR CMU VERTICAL REINFORCING WITH REINF. NOTED ON PLANS & SECTIONS.
8. GROUT ALL CORES OF CMU BELOW FINISH FLOOR SOLID.
9. COLUMN FOOTINGS, TRENCH FOOTINGS AND WALL FOOTINGS SHALL BEAR ON APPROVED SOILS w/ A MINIMUM BEARING CAPACITY OF 3,000 PSF.
10. PROVIDE THICKENED SLAB UNDER ALL INTERIOR CMU WALLS WITHOUT FOOTINGS. SEE 4/S-401 FOR THICKENED SLAB DETAIL. LAYOUT THICKENED SLABS FROM DIMENSIONS ON THE ARCHITECT FLOOR PLANS.
11. PROVIDE CONTROL/CONTRACTION JOINTS IN SLABS ON GRADE (REF. THE TYPICAL DETAILS ON SHEET S-401). ALL JOINTS IN SLABS TO RECEIVE THIN OR THICK-SET TERRAZZO, CERAMIC OR PORCELAIN TILE, VINYL-COMPOSITION TILE (VCT) OR VINYL SHEET GOODS, EPOXY OR SIMILAR THIN-FILM FINISH FLOORING SHALL BE CAREFULLY COORDINATED WITH THE FLOORING CONTRACTOR. THE CONTRACTOR SHALL SUBMIT SLAB JOINT LAYOUT TO ARCHITECT/ENGINEER FOR REVIEW PRIOR TO PLACING SLABS.
12. FOR ARCHITECTURAL PILASTERS NOT SUPPORTING STEEL COLUMNS, CONSTRUCT AS FULLY-GROUTED MASONRY PIERS OR CAST-IN-PLACE CONCRETE PIERS REINF'D W/ #4 VERTICAL REINFORCING AT EACH CORNER.

PLAN LEGEND:

- F.F. — DENOTES FINISH FLOOR
- T/'X' — DENOTES TOP OF FTG., GRADE BEAM, SLAB, PIER, ETC.
- B/'X' — DENOTES BOTTOM OF FTG., GRADE BEAM, ETC.
- C.J. — DENOTES SLAB ON GRADE CONTROL/CONTRACTION JOINT
- GB32x24 -8'-0" — DENOTES CONCRETE GRADE BEAM SIZE & TOP OF GRADE BEAM ELEVATION (SEE SCHEDULE)
- T/F -2'-6" / T/F -4'-0" / T/F -5'-4" — DENOTES WALL FOOTING WITH STEPS, REF. TYP. DETAIL ON S-401
- F5.0 -1'-4" — DENOTES COLUMN FOOTING MARK & TOP OF FTG. ELEVATION (SEE FTG. SCHED.) — COLUMN FOOTING — MASONRY BLOCK PIER
- DENOTES PIPE PENETRATION THROUGH EXTERIOR WALL. REFER TO PLUMBING DRAWINGS FOR EXACT SIZE, LOCATION, AND INVERT ELEVATION. SEE DETAILS ON SHEET S-401 FOR STEPPED FOOTINGS, SLEEVES, ETC.
- A / F.F. = SEE PLAN — DENOTES 4" CONC. SLAB ON GRADE w/ "FIBERFORCE 300" FIBERS @ 1.5 LB/C.Y. (OR EQUAL) & E5 SYSTEM BY SPECIFICATION PRODUCTS, INC. CONSISTING OF : E5 INTERNAL CURE ADMIXTURE @ 4 OZ/CWT & E5 CATALYST SPRAYED ON BETWEEN 800-1,000 SF/GAL OVER 15 MIL VAPOR BARRIER, ON 6" COMPACTED GRANULAR FILL (INDOT No. 53 OR APPROVED EQUIV.)

GIBRALTAR DESIGN
ARCHITECTURE - ENGINEERING - INTERIOR DESIGN

PROJECT

CROWN POINT HIGH SCHOOL - SPORTS SITE IMPROVEMENTS

FOR:
CROWN POINT COMMUNITY SCHOOL CORPORATION
CEDAR LAKE, INDIANA

GIBRALTAR DESIGN
9102 N. Meridian St., Ste. 300
Indianapolis, IN 46260
Homepage www.GibraltarDesign.com
Email info@GibraltarDesign.com
Phone 317.580.5777 Fax 317.580.5778

PROJECT 21-120
DATE 08/18/2022
COORDINATED BY SAC/NHF
DRAWN BY SAC/NHF
CHECKED BY SAC

SCOTT A. CLORE — REGISTERED — PE10606154 — STATE OF INDIANA — PROFESSIONAL ENGINEER

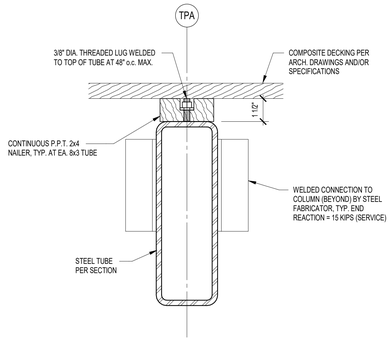
REVISIONS

MARK	DATE	ISSUED FOR
AD-1	08/30/22	ADDENDUM 1

DRAWING
STRUCTURAL PLANS AND DETAILS - PRESS BOX

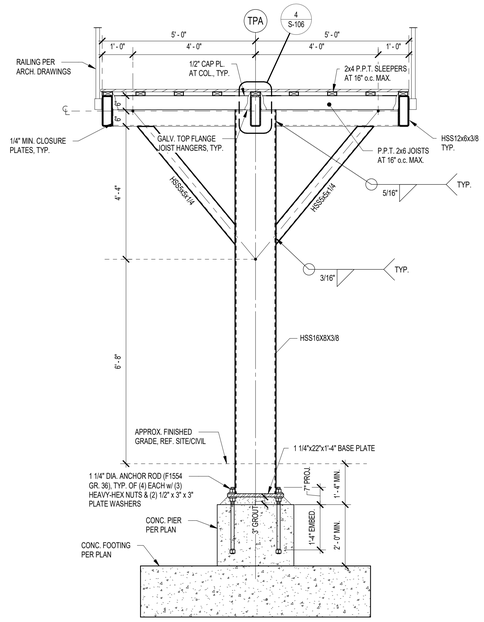
PROJECT
CROWN POINT HIGH SCHOOL - SPORTS SITE IMPROVEMENTS

SHEET
S-104

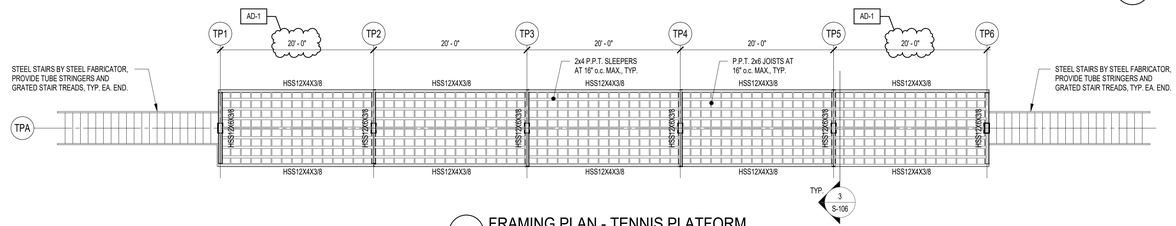


4 FRAMING SECTION
3" = 1'-0"

NOTES:
1. ALL EXPOSED STEEL TO BE CLASSIFIED AS A.E.S.S. CATEGORY 3.
2. PROVIDE A HIGH PERFORMANCE WEATHER-PROOF PRIMER AND FINISHED PAINT SYSTEM ON ALL STEEL SURFACE.
3. PROVIDE 1/4" DIA. WEEP HOLES AT APPROX. 1/3 POINTS OF SPAN ON BOTTOM FACE OF ALL TUBES.
4. PAINT ALL STEEL BELOW GRADE w/ 2-COATS OF BITUMINOUS PAINT, TYP.
5. PROVIDE 1/4" CLOSURE PLATES ON ALL OPEN ENDS OF TUBES.



3 TENNIS PLATFORM SECTION
1/2" = 1'-0"



2 FRAMING PLAN - TENNIS PLATFORM
1/8" = 1'-0"

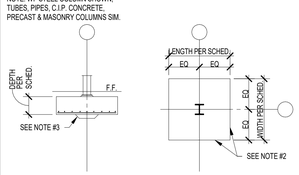
COLUMN FOOTING SCHEDULE

FOOTING MARK	FOOTING SIZE WIDTH x LENGTH x DEPTH			REINFORCING (EACH WAY U.N.O.)
F3.0	3'-0"	3'-0"	1'-4"	(4) #5 x 2'-6"
F5x7.5	5'-0"	7'-6"	1'-8"	BOT.: (5) #6 x 7'-0" w/ HOOKED ENDS (10) #6 x 4'-6" w/ HOOKED ENDS TOP: (5) #6 x 7'-0" (10) #6 x 4'-6"

NOTES:

1. CENTER FOOTINGS BENEATH COLUMNS, U.N.O.
2. ALL FOOTINGS MUST BE BOARD-FORMED, UNLESS APPROVED.
3. INCREASE FOOTING DEPTH WHERE REQ'D TO ENCASE COLUMN ANCHOR RODS

NOTE: WF STEEL COLUMN SHOWN, TUBES, PIPES, C.I.P. CONCRETE, PRECAST & MASONRY COLUMNS SIM.



CONCRETE PIER SCHEDULE

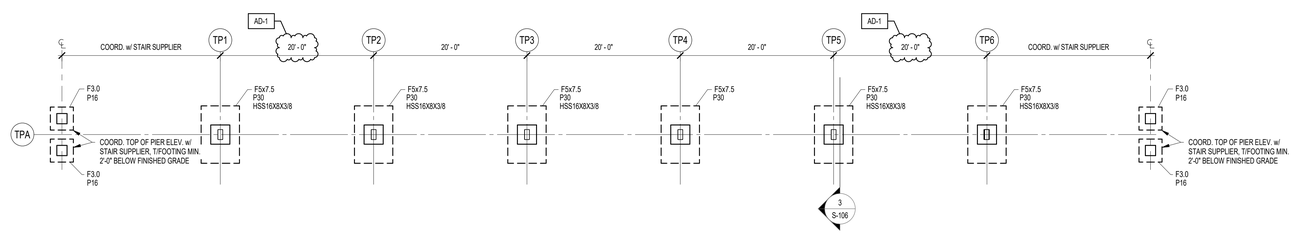
PIER MARK	PIER SIZE		PIER REINFORCING VERTICALS	TIES-SIZE & SPA.	DETAIL
P16	1'-4"	1'-4"	(4) #6	#4 @ 8" o.c.	B
P30	2'-6"	2'-6"	(16) #7	#4 @ 4" o.c.	A

NOTES:

1. PROVIDE MIN. 1 1/2" CLEAR TO PIER TIES.
2. FIRST TIE TO BE LOCATED 1 1/2" DOWN FROM TOP OF PIER.
3. CONTACT THE STRUCTURAL ENGINEER FOR DIRECTION IF COLUMN ANCHOR RODS FOUL WITH PIER TIES OR VERTICALS.

DETAIL "A" (3) SETS

DETAIL "B" (1) SET



1 FOUNDATION PLAN - TENNIS PLATFORM
1/8" = 1'-0"

GIBRALTAR DESIGN
ARCHITECTURE - ENGINEERING - INTERIOR DESIGN

PROJECT

CROWN POINT HIGH SCHOOL - SPORTS SITE IMPROVEMENTS

FOR:
CROWN POINT COMMUNITY SCHOOL CORPORATION
CEDAR LAKE, INDIANA

GIBRALTAR DESIGN
9102 N. Meridian St., Ste. 300
Indianapolis, IN 46260
Homepage www.GibraltarDesign.com
Email info@GibraltarDesign.com
Phone 317.580.5777 Fax 317.580.5778

PROJECT 21-120
DATE 08/18/2022
COORDINATED BY SAC/NHF
DRAWN BY SAC/NHF
CHECKED BY SAC

SCOTT A. CLORE, REGISTERED, PE10606154, STATE OF INDIANA, PROFESSIONAL ENGINEER

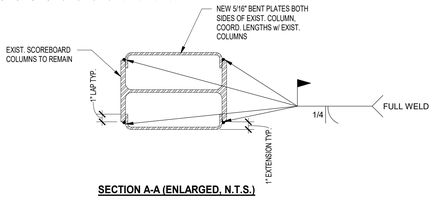
REVISIONS

MARK	DATE	ISSUED FOR
AD-1	08/30/22	ADDENDUM 1

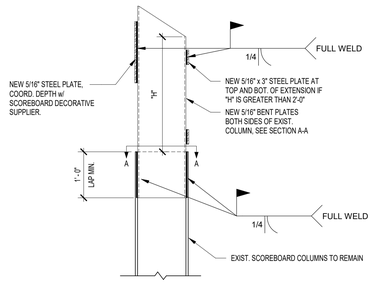
DRAWING
STRUCTURAL PLANS AND DETAILS - TENNIS PLATFORM

PROJECT
CROWN POINT HIGH SCHOOL - SPORTS SITE IMPROVEMENTS

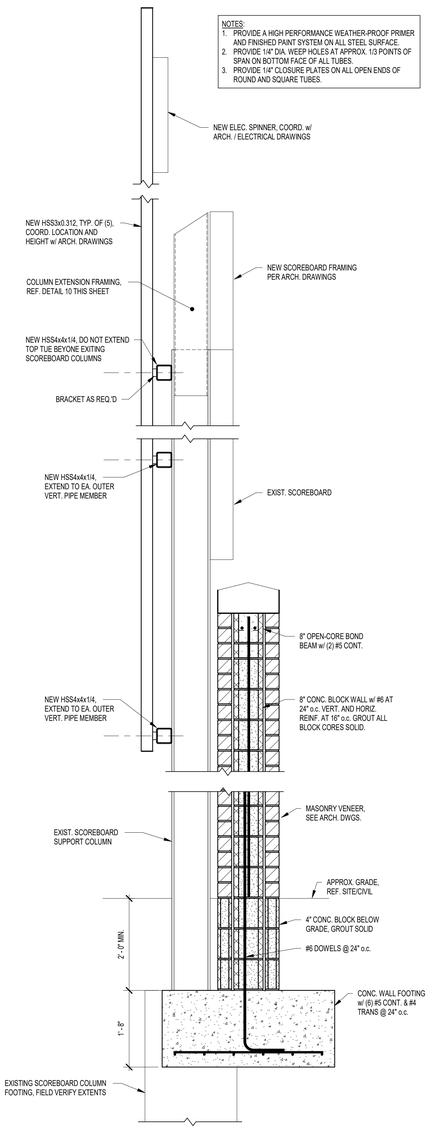
SHEET
S-106



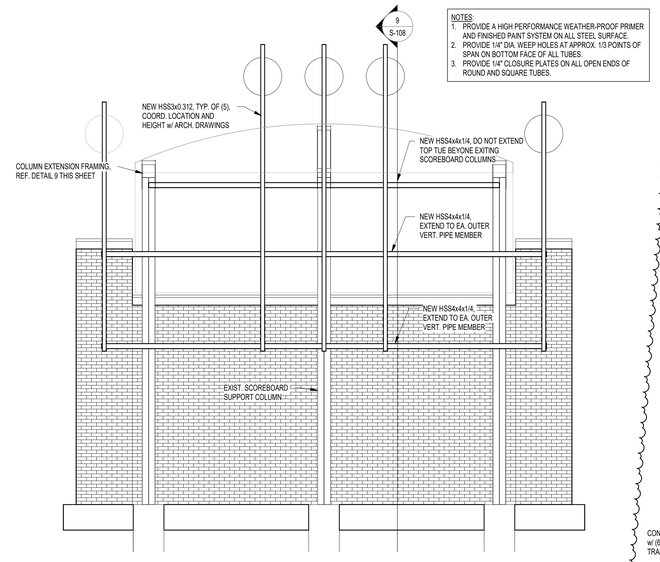
SECTION A-A (ENLARGED, N.T.S.)



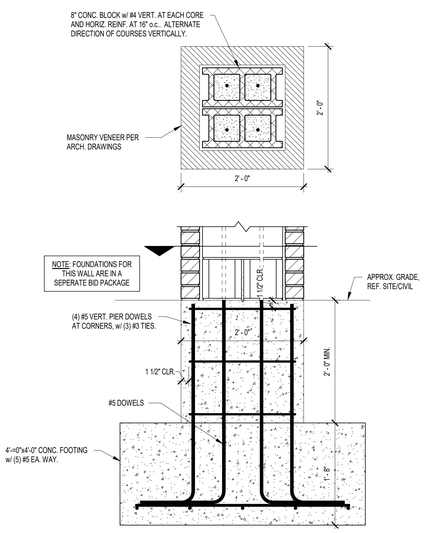
10 SCOREBOARD EXTENSIONS DETAIL
3/4" = 1'-0"



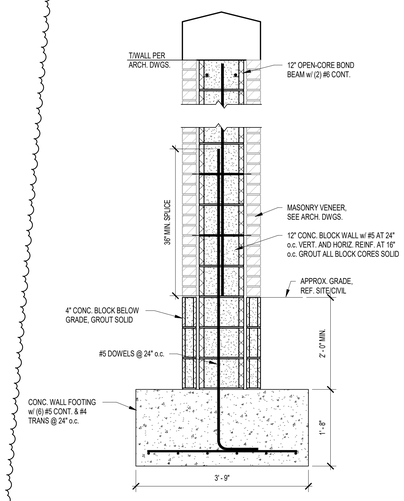
9 FRAMING SECTION
3/4" = 1'-0"



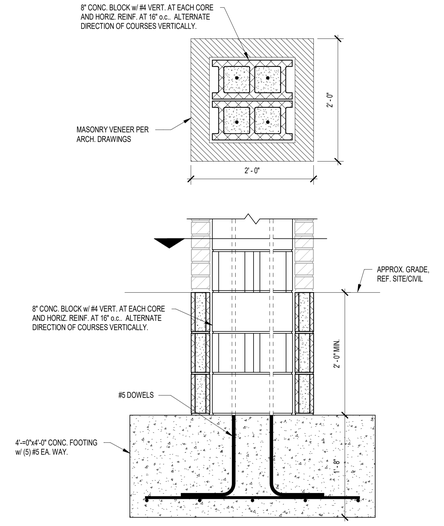
8 FRMG ELEV. - BASEBALL SCOREBOARD
1/4" = 1'-0"



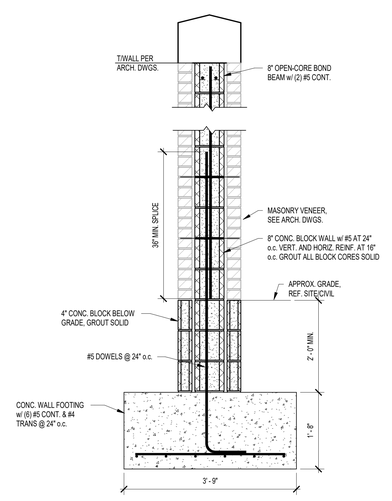
7 FOUNDATION SECTION - C.I.P. MASONRY PIER
1" = 1'-0"



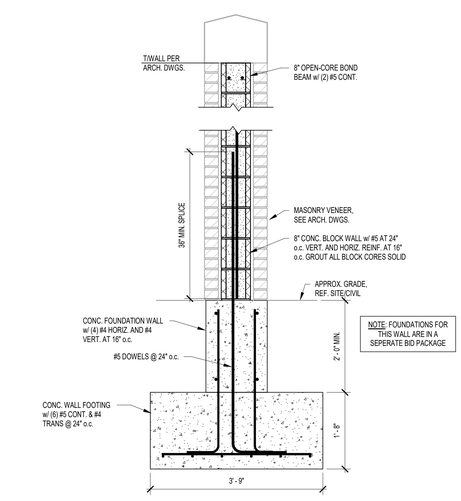
4 FOUNDATION SECTION
3/4" = 1'-0"



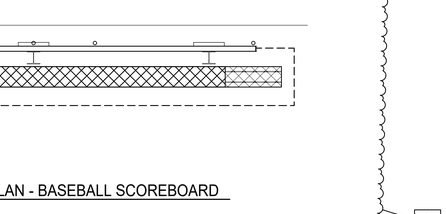
2 FOUNDATION SECTION - TYP. MASONRY PIER
1" = 1'-0"



3 FOUNDATION SECTION
3/4" = 1'-0"

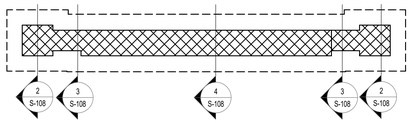


1 FOUNDATION SECTION - OUTFIELD WALL
3/4" = 1'-0"



6 STRUCTURAL PLAN - BASEBALL SCOREBOARD
1/4" = 1'-0"

AD-1



5 FOUNDATION PLAN - ENTRY SIGNAGE
1/4" = 1'-0"

GIBRALTAR DESIGN
ARCHITECTURE - ENGINEERING - INTERIOR DESIGN

PROJECT

CROWN POINT HIGH SCHOOL - SPORTS SITE IMPROVEMENTS

FOR:
CROWN POINT COMMUNITY SCHOOL CORPORATION
CEDAR LAKE, INDIANA

GIBRALTAR DESIGN
9102 N. Meridian St., Ste. 300
Indianapolis, IN 46260
Homepage www.GibraltarDesign.com
Email info@GibraltarDesign.com
Phone 317.580.5777 Fax 317.580.5778

PROJECT 21-120
DATE 08/18/2022
COORDINATED BY SAC/NHF
DRAWN BY SAC/NHF
CHECKED BY SAC

SCOTT A. CLORE — REGISTERED — PE10606154 — STATE OF INDIANA — PROFESSIONAL ENGINEER

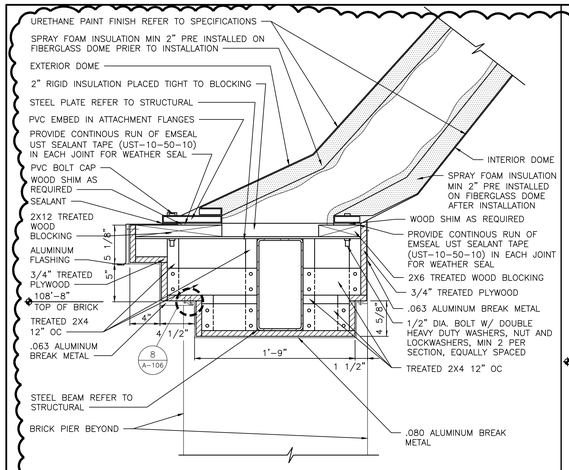
REVISIONS

MARK	DATE	ISSUED FOR
AD-1	08/30/22	ADDENDUM 1

DRAWING
MISCELLANEOUS STRUCTURAL SECTIONS AND DETAILS

PROJECT
CROWN POINT HIGH SCHOOL - SPORTS SITE IMPROVEMENTS

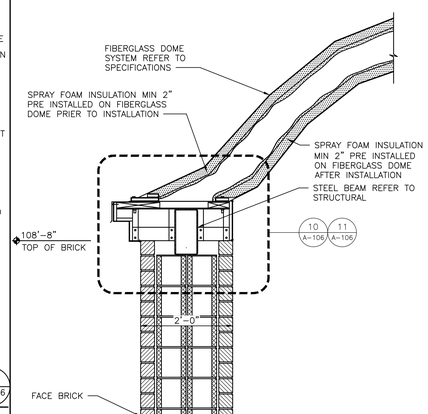
SHEET
S-108



DOME DETAIL AT OPENING

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

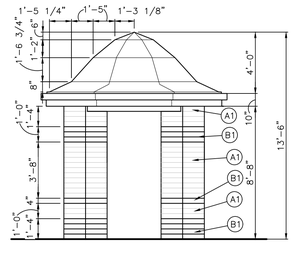
11 A-106



WALL SECTION

SCALE: 3/4" = 1'-0"

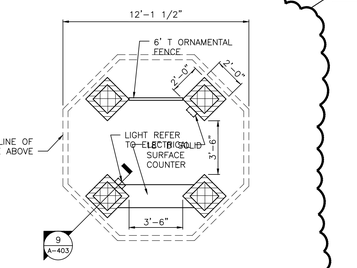
9 A-106



TICKET BOOTH

SCALE: 1/4" = 1'-0"

NOTE: FOUR TOTAL TWO EACH AT NORTH AND SOUTH ENTRANCES TO VARSITY BASEBALL AND SOFTBALL FIELDS



TICKET BOOTH PLAN

SCALE: 1/4" = 1'-0"

GENERAL ELEVATION NOTES:

A. REFER TO STRUCTURAL. DRAWINGS FOR FOUNDATION WALLS AND FOOTINGS.

B. REFER TO FLOOR PLANS FOR EXTERIOR WALL SECTIONS CUTS, UNLESS INDICATED OTHERWISE.

C. FOR LOCATION AND MOUNTING HEIGHTS OF CAMERAS, SPEAKERS, LIGHTS, HORNS, ETC. REFER TO ELECTRICAL AND TECHNOLOGY DRAWINGS.

D. FINISH GRADE INDICATES ON ELEVATIONS ARE FOR DRAWING PURPOSES ONLY. REFER TO CIVIL DRAWINGS FOR ACTUAL GRADES. COORDINATE STEPPED FLASHINGS WITH ACTUAL GRADES AS REQUIRED FOR CELL VENTS TO BE ABOVE GRADE.

E. STEP BRICK LEDGE DOWN AS REQUIRED FOR LEDGE TO BE BELOW GRADE OR CONCRETE WALK. COORDINATE WITH CIVIL DRAWINGS.

F. (CJ) INDICATES CONTROL JOINT.

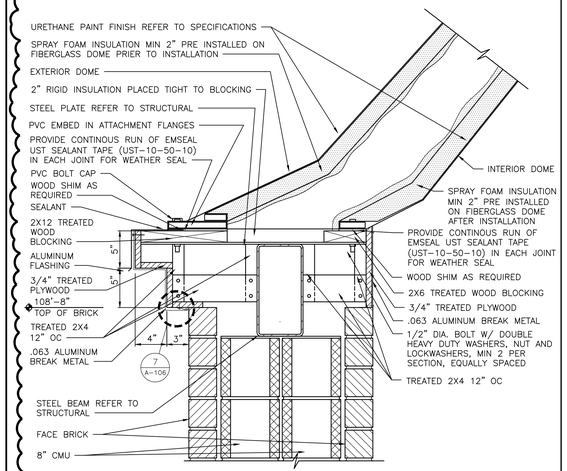
BRICK TYPE NOTES

(A1) FACE BRICK (TYPE A1) COLOR A – 1/3 RUNNING BOND – 4x4x12 UTILITY.

(A2) FACE BRICK (TYPE A2) COLOR A – SOLDIER COURSE – 4x4x12 UTILITY.

(B1) FACE BRICK (TYPE B1) COLOR B – 1/3 RUNNING BOND – 4x4x12 UTILITY.

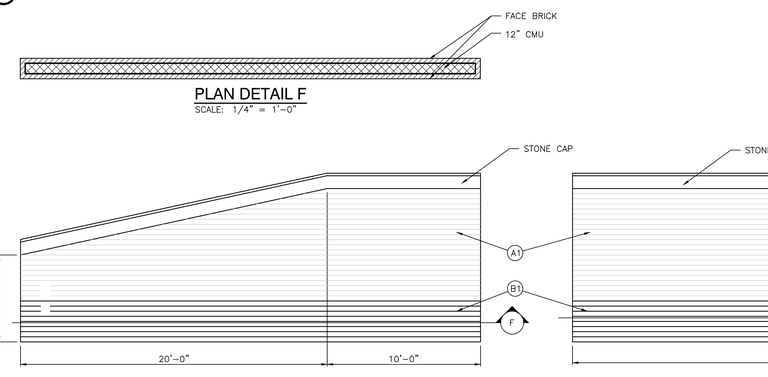
(C1) FACE BRICK (TYPE C1) COLOR C – 1/3 RUNNING BOND – 4x4x12 UTILITY.



DOME DETAIL AT MASONRY PIER

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

10 A-106



PLAN DETAIL F

SCALE: 1/4" = 1'-0"

ALONG FIRST AND THIRD BASELINE

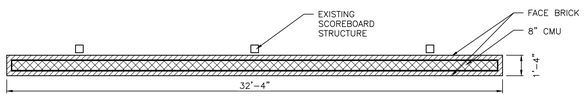
ALONG ALONG OUTFIELD FENCE LINE

MASONRY WALL AT BASEBALL & SOFTBALL OUTFEILD

SCALE: 1/4" = 1'-0"

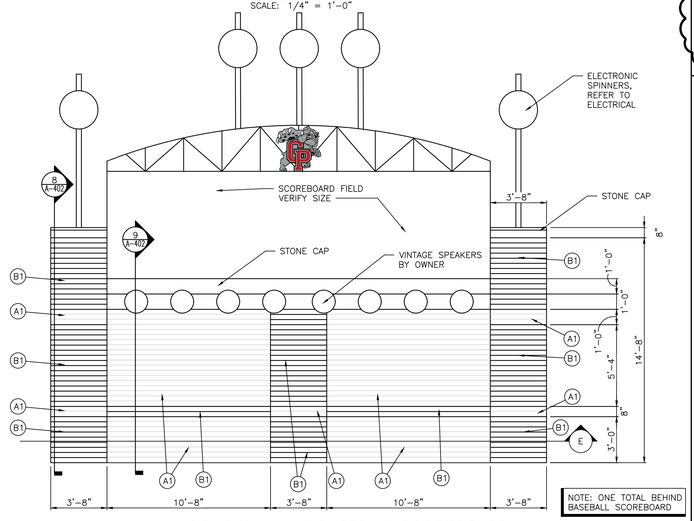
NOTE: FOUR TOTAL TWO EACH AT VARSITY BASEBALL AND SOFTBALL OUTFIELDS

2 A-106



PLAN DETAIL E

SCALE: 1/4" = 1'-0"

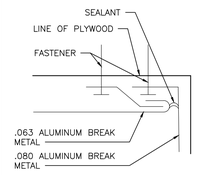


NOTE: ONE TOTAL BEHIND BASEBALL SCOREBOARD

MASONRY WALL AT BASEBALL SCOREBOARD

SCALE: 1/4" = 1'-0"

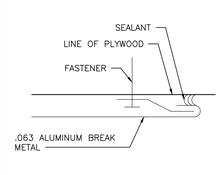
6 A-106



BREAK METAL DETAIL

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

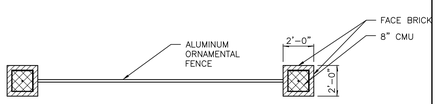
8 A-106



BREAK METAL DETAIL

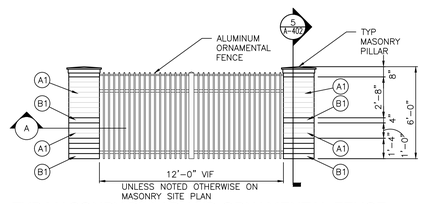
SCALE: 1'-0" = 1'-0"

7 A-106



PLAN DETAIL A

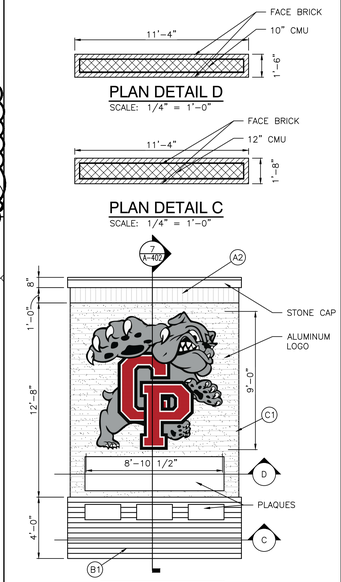
SCALE: 1/4" = 1'-0"



TYP MASONRY PILLAR AND ORNAMENTAL FENCE

SCALE: 1/4" = 1'-0"

5 A-106

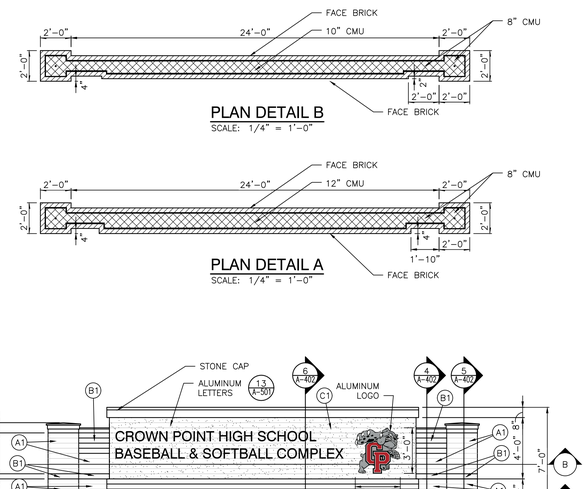


NOTE: TWO TOTAL BEHIND BASEBALL AND SOFTBALL PRESS BOXES

MASONRY WALL BEHIND BASEBALL AND SOFTBALL PRESS BOXES

SCALE: 1/4" = 1'-0"

4 A-106



NOTE: TWO TOTAL SIGNS LOCATED AT NORTH AND SOUTH ENTRANCES TO VARSITY BASEBALL AND SOFTBALL FIELDS

MASONRY SIGNAGE

SCALE: 1/4" = 1'-0"

1 A-106

GIBRALTAR DESIGN

ARCHITECTURE • ENGINEERING • INTERIOR DESIGN

PROJECT

CROWN POINT HIGH SCHOOL - ATHLETIC FIELDS AND SITE IMPROVEMENTS

FOR:
CROWN POINT COMMUNITY SCHOOL CORPORATION
CROWN POINT, INDIANA

GIBRALTAR DESIGN
9102 N. Meridian St., Ste. 300
Indianapolis, IN 46260
Homepage www.GibraltarDesign.com
Email info@GibraltarDesign.com
Phone 317.580.5777 Fax 317.580.5778

PROJECT 21-120
DATE 08/18/22
COORDINATED BY DTB JPB
DRAWN BY DTB
CHECKED BY DTB JPB

JOSEPH P. BRIGGS REGISTERED NO. 11600109 STATE OF INDIANA ARCHITECT

REVISIONS

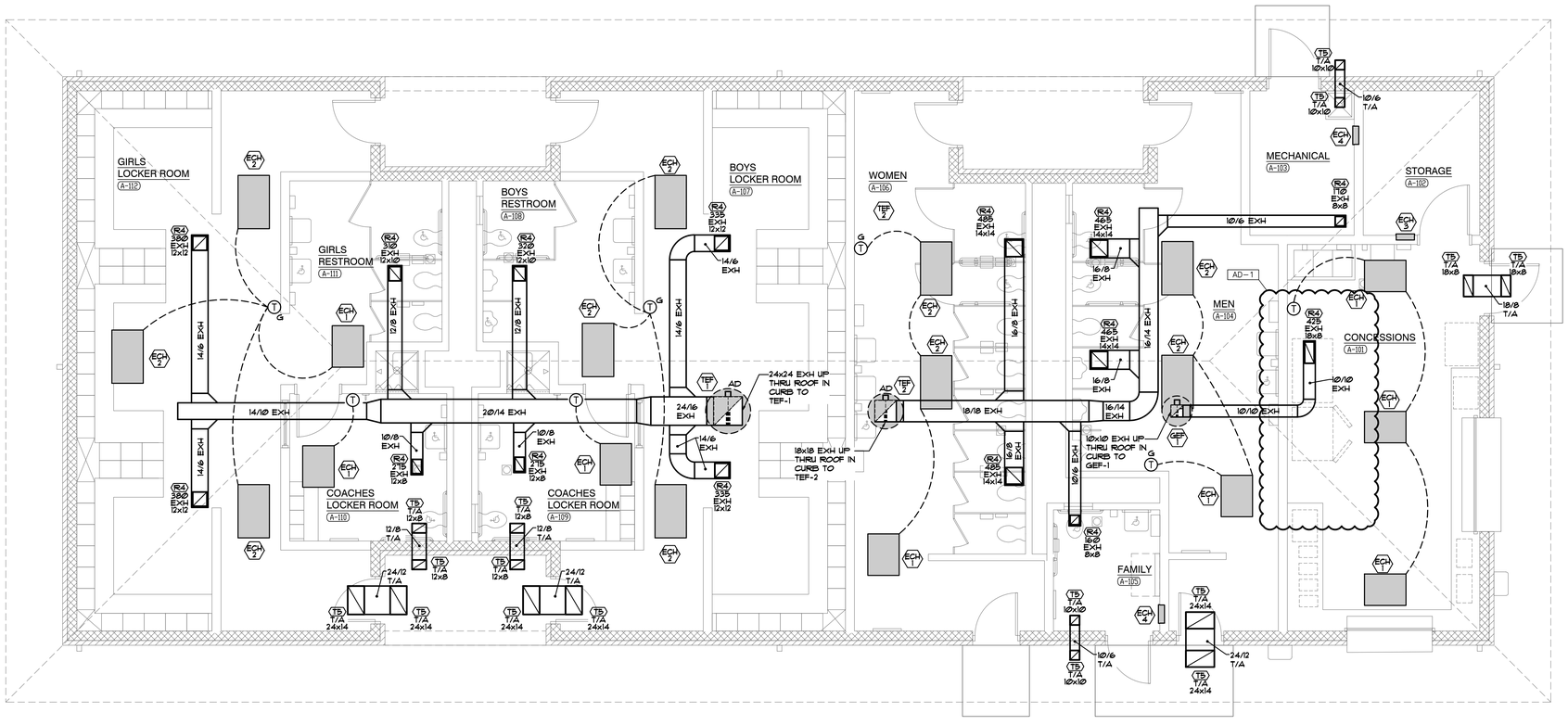
MARK	DATE	ISSUED FOR
AD-1	08/30/22	ADDENDUM NO. 1

DRAWING
MISCELLANEOUS MASONRY WALL PLANS AND ELEVATIONS

PROJECT
CROWN POINT HIGH SCHOOL - ATHLETIC FIELDS AND SITE IMPROVEMENTS

SHEET
A-106

Wednesday, 8/31/2022 - 2:45 PM - LAST SAVED BY:DBURNS
Y:\21-120 CROWN POINT CSC - CROWN POINT HS ATHLETIC FIELDS AND SITE IMPROVEMENTS\21-120 DRAWINGS\(02 ARCH\A-106.DWG



MECHANICAL HVAC PLAN

SCALE: 1/4" = 1'-0"

NORTH

GIBRALTAR
DESIGN
ARCHITECTURE • ENGINEERING • INTERIOR DESIGN

MILLIES
ENGINEERING GROUP
(219) 924-5400
www.milliesengineeringgroup.com

PROJECT

CROWN POINT HIGH SCHOOL - ATHLETIC FIELDS AND SITE IMPROVEMENTS

FOR:
CROWN POINT COMMUNITY SCHOOL CORPORATION
CROWN POINT, INDIANA

GIBRALTAR DESIGN
9102 N. Meridian St., Ste. 300
Indianapolis, IN 46260
Homepage www.GibraltarDesign.com
Email info@GibraltarDesign.com
Phone 317.580.5777 Fax 317.580.5778

PROJECT 21-120
DATE 08/18/22
COORDINATED BY SM
DRAWN BY CC
CHECKED BY DJ

REGISTERED DAVID G. JANNEY NO. 10302590 STATE OF INDIANA PROFESSIONAL ENGINEER

REVISIONS

MARK	DATE	ISSUED FOR
AD-1	08/30/22	ADDENDUM NO. 1

DRAWING
MECHANICAL HVAC PLAN

PROJECT
CROWN POINT HIGH SCHOOL - ATHLETIC FIELDS AND SITE IMPROVEMENTS

SHEET
M-101

PLUMBING FIXTURE SCHEDULE

TAG NO.	FIXTURE/EQUIPMENT TYPE	FIXTURE/EQUIPMENT DESCRIPTION	FIXTURE/EQUIPMENT MANUFACTURER AND MODEL NO.	ACCEPTABLE MANUF.	FIXTURE VALVE/FAUCET TYPE	FIXTURE VALVE/FAUCET TYPE	ACCEPTABLE MANUF.	ACCESSORIES/REMARKS (SEE SPECIFICATIONS FOR ADDITIONAL INFORMATION)
WC-1	WATER CLOSET	VITREOUS CHINA, WALL MOUNTED	AMERICAN STANDARD 2257.101	NOTE 1	BATTERY SENSOR FLUSH VALVE, 1.6 GPF	AMERICAN STANDARD 6065161.002	NOTE 1	AMERICAN STANDARD 5901.100 SEAT
WC-2	WATER CLOSET	VITREOUS CHINA, WALL MOUNTED ADA	AMERICAN STANDARD 2257.101	NOTE 1	BATTERY SENSOR FLUSH VALVE, 1.6 GPF	AMERICAN STANDARD 6065161.002	NOTE 1	AMERICAN STANDARD 5901.100 SEAT
UR-1	URINAL	VITREOUS CHINA, WALL MOUNTED, ADA	AMERICAN STANDARD 6590.001	NOTE 1	BATTERY SENSOR FLUSH VALVE, 0.5 GPF	AMERICAN STANDARD 6063051.002	NOTE 1	-
L-1	LAVATORY	VITREOUS CHINA, WALL MOUNTED, 20"x18" ADA	AMERICAN STANDARD 0355.012	NOTE 1	0.5 GPM-BATTERY SENSOR,4" CENTERS	AMERICAN STANDARD 6053.205.002	NOTE 2	PROVIDED WITH THERMOSTATIC MIXING VALVE. MCGUIRE #FW-2150-WC 1-1/2" FROWRAP, MCGUIRE #4216.7CCLK SUPPLIES
MB-1	MOP BASIN	24x24x10 HIGH DENSITY COMPOSITE MOP BASIN	ZURN Z1996-24	NOTE 3	WALL MOUNTED SERVICE FAUCET	ZURN Z843M4	NOTE 4	W/ 3/4" HOSE THREAD, VACUUM BREAKER, WALL BRACE
S-1	SINK	STAINLESS STEEL, FLOOR MOUNTED, THREE COMPARTMENT	ELKAY E3C16X20-0X	NOTE 5	1.5 GPM, WALL MOUNTED	ELKAY LK945GN08T4T	NOTE 2	ELKAY #35 STRAINER, ELKAY #LK-53 DRAIN ASSEMBLY, MCGUIRE #4216.7CCLK SUPPLIES
S-2	SINK	STAINLESS STEEL, WALL MOUNTED, 22"x19", ADA	ELKAY #ELV2219	NOTE 5	1.5 GMP-TWO LEVER HANDLE, SINGLE HOLE	ELKAY LKD2223C	NOTE 2	MCGUIRE #FW-2150-WC 1-1/2" FROWRAP, MCGUIRE #4216.7CCLK SUPPLIES
SH-1	SHOWER	-	-	-	1-HANDLE PRESSURE/TEMP. BALANCED	POWERS #E710-M-2-6-B-W	NOTE #4	HANDHELD SHOWER HEAD, HOSE, WALL BRACKET, VACUUM BREAKER AND 24" SLIDEBAR
GT-1	GREASE TRAP	25 GPM, 1.3 GAL. SOLIDS, 10 GAL. LIQUID	SCHIER GBI	NOTE 6	-	-	-	-
FD-1	FLOOR DRAIN	CAST IRON BODY, ADJUSTABLE 6"x6" NICKEL BRONZE TOP	WADE 1100-G6-1	NOTE 7	-	-	-	VANDALPROOF SCREWS
FS-1	FLOOR SINK	CAST IRON, 8" DEEP, ACID RESISTING, 12"x12" TOP	WADE 9140	NOTE 7	-	-	-	ALUMINUM DOME STRAINER, SECURED HINGED GRATE, SLOPED RIM. TOP TO BE MOUNTED FLUSH WITH FLOOR
SC-1	SILLCOCK	NON-FREEZE, VACUUM BREAKER, REMOVABLE KEY	ZURN Z1371	NOTE 8	-	-	-	-
BF-1	BOTTLE FILLER	SINGLE ARM BOTTLE FILLING STATION WALL MOUNT	ELKAY #LK4405BF	-	-	-	-	-

AD-1

NOTE 1: AMERICAN STANDARD, KOHLER, ZURN, SLOAN, TOTO
NOTE 2: ZURN, DELTA, SLOAN, CHICAGO FAUCET CO., AMERICAN STANDARD, KOHLER
NOTE 3: ZURN, FIAT, MUSTEE, SWAN, ACORN
NOTE 4: ZURN, DELTA, T45 BRASS, CHICAGO FAUCET CO.
NOTE 5: ELKAY, JUST, KOHLER
NOTE #6: SCHIER, ZURN
NOTE 7: ZURN, JOSAM, J.R. SMITH, MIFAB, WADE
NOTE 8: JOSAM, ZURN, J.R. SMITH, WOODFORD, CHICAGO FAUCETS

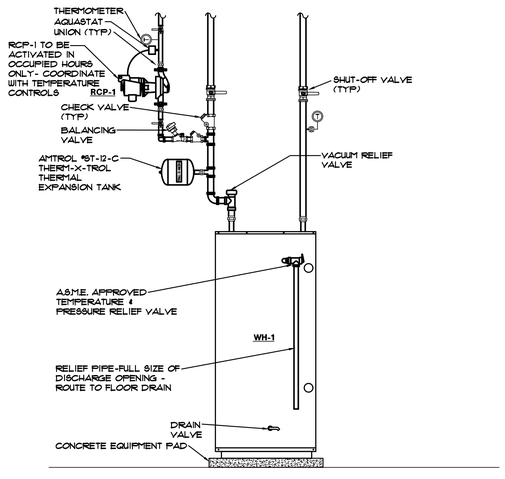
PLUMBING EQUIPMENT SCHEDULE

TAG NO.	FIXTURE/EQUIPMENT TYPE	FIXTURE/EQUIPMENT DESCRIPTION	FIXTURE/EQUIPMENT MANUFACTURER AND MODEL NO.	ACCEPTABLE MANUF.	ACCESSORIES/REMARKS (SEE SPECIFICATIONS FOR ADDITIONAL INFORMATION)	ELECTRICAL DATA							
						HP	KW	FLA	AMPS	MOCP	VOLT	PH	HZ.
WH-1	WATER HEATER	30 KW, 137 GPH @ 90 DEG, 80 GAL. STORAGE	STATE #98E-80A	NOTE 1	TEMP. RELIEF VALVE AND DRAIN VALVE PIPED TO FLOOR DRAIN	-	30	18	-	-	480	3	60
RCP-1	RECIRCULATION PUMP	5.5 GPM @ 10' HEAD, ALL BRONZE CONSTRUCTION	BELL & GOSSETT #LR-15B	NOTE 2	WITH STRAP ON AQUASTAT	1/12	-	-	-	-	120	1	60
WS-1	WATER SOFENTER	CONT. FLOW 55 GPM, PEAK FLOW 72.5 GPM	CULLIGAN CTM-120	-	PROVIDED WITH BRINE TANK- 24" RD. 50" HIGH	-	-	-	-	-	115	1	60

NOTE #1: LOCHINVAR, A.O. SMITH

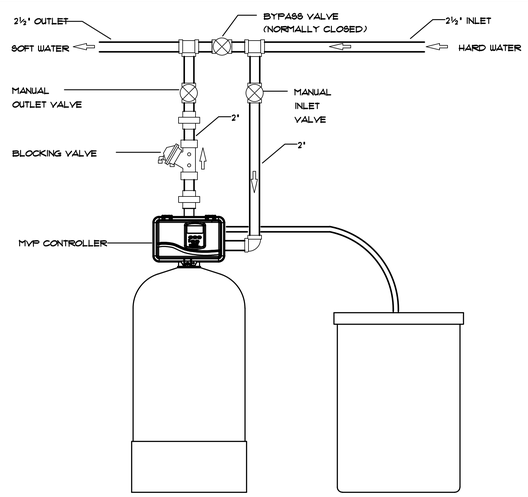
WATER HEATER DIAGRAM

NTS



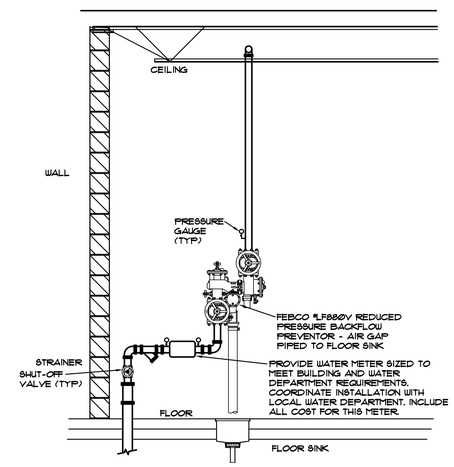
WATER SOFTENER DIAGRAM

NTS



INCOMING DOMESTIC WATER SERVICE DIAGRAM

NTS



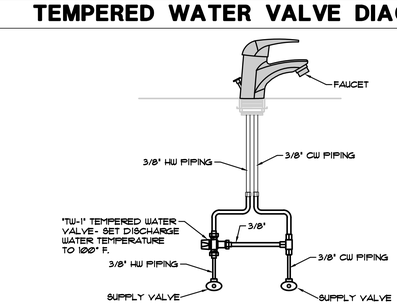
SYMBOLS/ABBREVIATIONS

NEW UNDERGROUND SANITARY SEWER
NEW COLD WATER PIPING
NEW HOT WATER PIPING
NEW HOT WATER RECIRCULATION PIPING
NEW VENT PIPING
PIPE DOWN
PIPE UP
SHUT-OFF VALVE
CHECK VALVE
HOSE BIBB/SILL COCK
BALANCING COCK/MANUAL FLOW CONTROL VALVE
THERMOMETER
PRESSURE GAUGE
SHEET NOTE TAG

CO	CLEANOUT
CW	COLD WATER
DN	DOWN
FCO	FLOOR CLEANOUT
FD	FLOOR DRAIN
FS	FLOOR SINK
GT	GREASE TRAP
HW	HOT WATER
HWR	HOT WATER RECIRCULATION
INV. EL.	INVERT ELEVATION
L	LAVATORY
MB	MOP BASIN
RCP	HOT WATER RECIRCULATION PUMP
S	SINK
TWH	TANKLESS WATER HEATER
UR	URINAL
V	VENT
VTR	VENT THROUGH ROOF
WC	WATER CLOSET
WCO	WALL CLEANOUT
YCO	YARD CLEANOUT

TEMPERED WATER VALVE DIAGRAM

NTS



GIBRALTAR DESIGN
ARCHITECTURE • ENGINEERING • INTERIOR DESIGN

MILLIES ENGINEERING GROUP
(219) 924-5400
www.milliesengineeringgroup.com

PROJECT
CROWN POINT HIGH SCHOOL - ATHLETIC FIELDS AND SITE IMPROVEMENTS

FOR:
CROWN POINT COMMUNITY SCHOOL CORPORATION
CROWN POINT, INDIANA

GIBRALTAR DESIGN
9102 N. Meridian St., Ste. 300
Indianapolis, IN 46260
Homepage www.GibraltarDesign.com
Email info@GibraltarDesign.com
Phone 317.580.5777 Fax 317.580.5778

PROJECT 21-120
DATE 08/18/22
COORDINATED BY SM
DRAWN BY MDG
CHECKED BY DJ

DAVID G. JANNEY REGISTERED NO. 10302590 STATE OF INDIANA PROFESSIONAL ENGINEER

REVISIONS

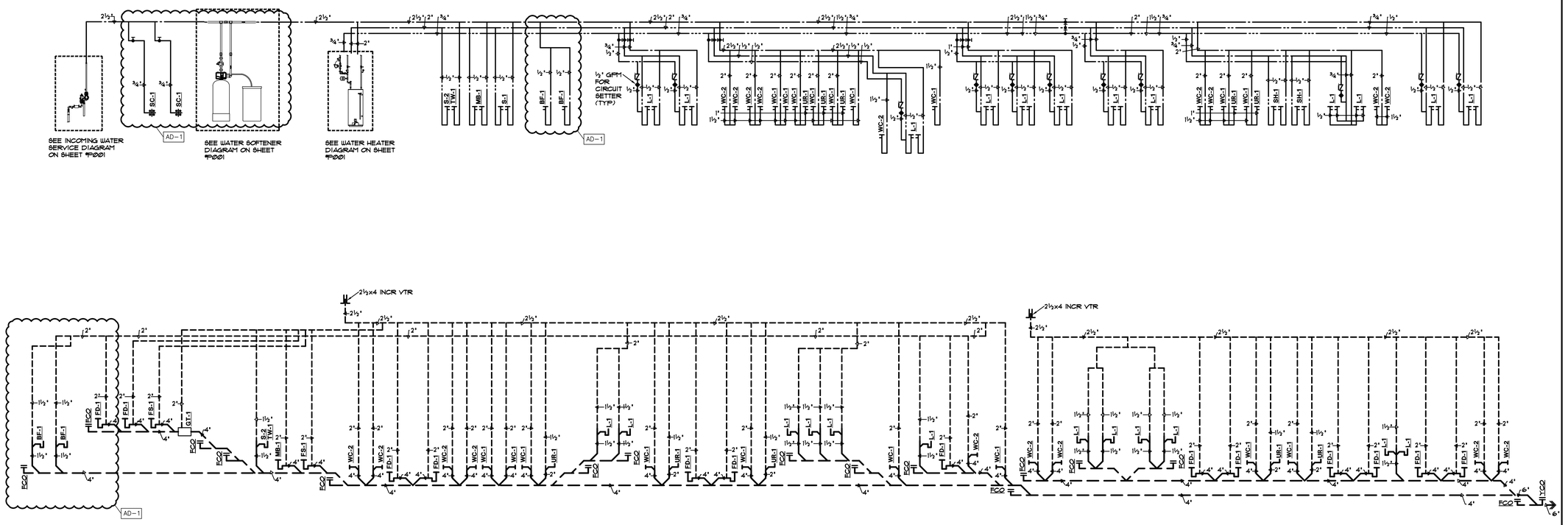
MARK	DATE	ISSUED FOR
AD-1	08/30/22	ADDENDUM NO. 1

DRAWING
PLUMBING SYMBOLS, SCHEDULES, DETAILS & DIAGRAMS

PROJECT
CROWN POINT HIGH SCHOOL - ATHLETIC FIELDS AND SITE IMPROVEMENTS

SHEET
P-001

RISER DIAGRAM



GENERAL NOTES

A. WORK SHALL COMPLY WITH LOCAL, MUNICIPAL, AND STATE PLUMBING CODES.

B. THE SCOPE OF WORK SPECIFIED HEREIN AND IN THE SPECIFICATIONS SHALL BE COORDINATED WITH THE CONSTRUCTION MANAGER - REFER TO THE SCOPE OF WORK FOR EACH TRADE. ANY DISCREPANCIES BETWEEN THE CONSTRUCTION DOCUMENTS AND CONSTRUCTION MANAGERS SCOPE SHALL BE BROUGHT TO THE ATTENTION OF THE ARCHITECT/ENGINEER FOR CLARIFICATION. THE ARCHITECT/ENGINEER'S DECISION SHALL BE FINAL.

C. LAYOUT IS DIAGRAMMATIC. INSTALL PIPING AND EQUIPMENT TO MEET ACTUAL FIELD CONDITIONS. REVIEW PROJECT SPECIFICATIONS BEFORE STARTING ANY WORK. SUBMIT SHOP DRAWINGS OF WORK AS PER SPECIFICATIONS.

D. COORDINATE PHASING OF WORK AND PROVIDE TEMPORARY PIPING AND SERVICES AS REQUIRED FOR THE IMPLEMENTATION OF WORK WHILE MAINTAINING SERVICES TO PORTIONS OF BUILDING TO REMAIN OCCUPIED.

E. LAYOUT WORK TO AVOID CONFLICTS BETWEEN DUCTWORK, LIGHTING, CEILINGS, PIPING AND BUILDING STRUCTURE.

F. SCHEDULE WORK TO AVOID DOWNTIME AND INCONVENIENCE TO OWNER. OWNER'S EXISTING FACILITY SHALL REMAIN IN OPERATION AT TIMES. REQUIRED SHUTDOWN OF EXISTING UTILITIES SHALL BE SCHEDULED WITH OWNER'S OPERATING PERSONNEL. NOTIFY OWNER'S REPRESENTATIVE 48 HOURS IN ADVANCE PRIOR TO ANY SHUTDOWN OF EXISTING PLUMBING SYSTEMS.

G. VERIFY LOCATION AND ELEVATION OF PLUMBING EQUIPMENT, FIXTURES, PIPING, PANELS, ETC. EXPOSED WITHIN OCCUPIED SPACES BEFORE THE START OF ANY ROUGH-IN OR INSTALLATION.

H. COORDINATE EQUIPMENT ELECTRICAL REQUIREMENTS (VOLTAGES, PHASE, LOAD, ETC.) BEFORE ORDERING ANY EQUIPMENT.

I. COORDINATE VENT THROUGH ROOF LOCATIONS WITH OUTDOOR AIR INTAKE LOCATIONS TO MAINTAIN A MINIMUM SEPARATION OF TEN FEET.

J. PROVIDE AND INSTALL PLENUM WRAP, TESTED TO UL 84 AND UL 910, ON ALL EXISTING PVC PIPING IN NEW OR EXISTING RETURN AIR CEILING PLENUMS.

K. PROVIDE A WATERTIGHT SHEET METAL DRIP PAN OVER ELECTRICAL EQUIPMENT INSTALLED UNDER OR NEAR PIPING SYSTEMS. DRIP PAN TO EXTEND MINIMUM 3" OVER FRONT AND SIDES OF ELECTRICAL EQUIPMENT AND BE PITCHED AT A MINIMUM 30° ANGLE. SEAL DRIP PAN WATERTIGHT TO WALL.

L. PROVIDE VENT PIPING FROM GAS PRESSURE REDUCING STATIONS, PIPING TO BE ROUTED TO THE EXTERIOR OF BUILDING AS REQUIRED. MULTIPLE RELIEFS ARE TO BE PIPED INDIVIDUALLY, NOT GROUPED TOGETHER IN A COMMON HEADER. THE PIPING IS TO BE SAME SIZE AS RELIEF CONNECTION TO EQUIPMENT. TERMINATION LOCATION TO MEET CODE REQUIREMENTS AND BE APPROVED BY ARCHITECT.

M. PROVIDE ROUGH-IN AND FINAL CONNECTIONS TO PLUMBING EQUIPMENT AND FIXTURES. SET FIXTURES/EQUIPMENT AND FURNISH AND INSTALL NECESSARY FITTINGS, TRAPS, STOPS, ETC. AS REQUIRED.

N. PROVIDE ALL ROUGH-IN AND FINAL SERVICES AND CONNECT ALL WATER LINES, WASTE LINES, INDIRECT PIPING, ETC. FOR FIXTURES AND KITCHEN EQUIPMENT ITEMS. PROVIDE ALL VALVES, STOPS, TRAPS, AND PRESSURE REGULATORS NECESSARY TO CONNECT LINES. FOR FURTHER INFORMATION AND DESCRIPTION OF KITCHEN EQUIPMENT BEING SUPPLIED REFER TO ARCHITECTURAL DRAWINGS, KITCHEN EQUIPMENT DRAWINGS, AND ENLARGED KITCHEN AREA DRAWINGS.

O. PLUMBING PIPING ROUTING TO BE FIELD COORDINATED WITH NEW AND EXISTING HVAC DUCTWORK, HVAC PIPING, FIRE PROTECTION PIPING, ELECTRICAL AND STRUCTURE TO ENSURE NO CONFLICTS WILL OCCUR DUE TO INTERFERENCE.

P. PIPING, EQUIPMENT, ETC. SHALL NOT BE SUPPORTED FROM THE BOTTOM CHORD OF ENGINEERED JOISTS WITHOUT WRITTEN APPROVAL FROM THE STRUCTURAL ENGINEER.

Q. ISOLATION VALVES SHALL BE INSTALLED OVER ACCESSIBLE CEILINGS. WHEN ISOLATION VALVES ARE INSTALLED OVER INACCESSIBLE CEILING AREAS, IT SHALL BE THE RESPONSIBILITY OF THIS CONTRACTOR TO FURNISH AND INSTALL 12" X 12" (MINIMUM) CEILING ACCESS DOORS, TYPE TO BE VANDALPROOF, TAMPERPROOF ASSEMBLIES. INSTALLATION TO BE COORDINATED WITH GENERAL CONTRACTOR.

R. INVERT ELEVATIONS SHALL BE FIELD COORDINATED WITH FINAL GRADING PLANS TO ENSURE PROPER INSTALLATION.

S. REFER TO ARCHITECTURAL INTERIOR ELEVATIONS FOR FINAL MOUNTING HEIGHTS OF PLUMBING FIXTURES.

T. PROTECT NEW AND EXISTING DRAIN OPENINGS AND SANITARY LINES DURING CONSTRUCTION TO PREVENT BLOCKAGE. ROD-OUT EXISTING SANITARY PIPING. PIPING SHALL BE FREE OF BLOCKAGE.

U. REPAIR AND/OR REPLACE DAMAGED PIPE INSULATION THAT OCCURS AS THE RESULT OF THIS CONSTRUCTION.

V. PIPING PENETRATING AIR PLENUM CEILING AREAS SHALL BE PROPERLY SEALED TO MAKE AIRTIGHT. REFER TO MECHANICAL DUCTWORK DRAWINGS FOR AIR PLENUM LOCATIONS.

W. PRIME AND PAINT EXPOSED PIPING IN FINISHED AREAS IN COLOR AS SELECTED BY OWNERS REPRESENTATIVE.

GIBRALTAR DESIGN
ARCHITECTURE • ENGINEERING • INTERIOR DESIGN
MILLIES ENGINEERING GROUP
(219) 934-8400
www.millesengineeringgroup.com

PROJECT
CROWN POINT HIGH SCHOOL - ATHLETIC FIELDS AND SITE IMPROVEMENTS

FOR:
CROWN POINT COMMUNITY SCHOOL CORPORATION
CROWN POINT, INDIANA

GIBRALTAR DESIGN
9102 N. Meridian St., Ste. 300
Indianapolis, IN 46260
Homepage www.GibraltarDesign.com
Email info@GibraltarDesign.com
Phone 317.580.5777 Fax 317.580.5778

PROJECT 21-120
DATE 08/18/22
COORDINATED BY SM
DRAWN BY MDG
CHECKED BY DJ

DAVID G. JANNEY REGISTERED NO. 10302590 STATE OF INDIANA PROFESSIONAL ENGINEER

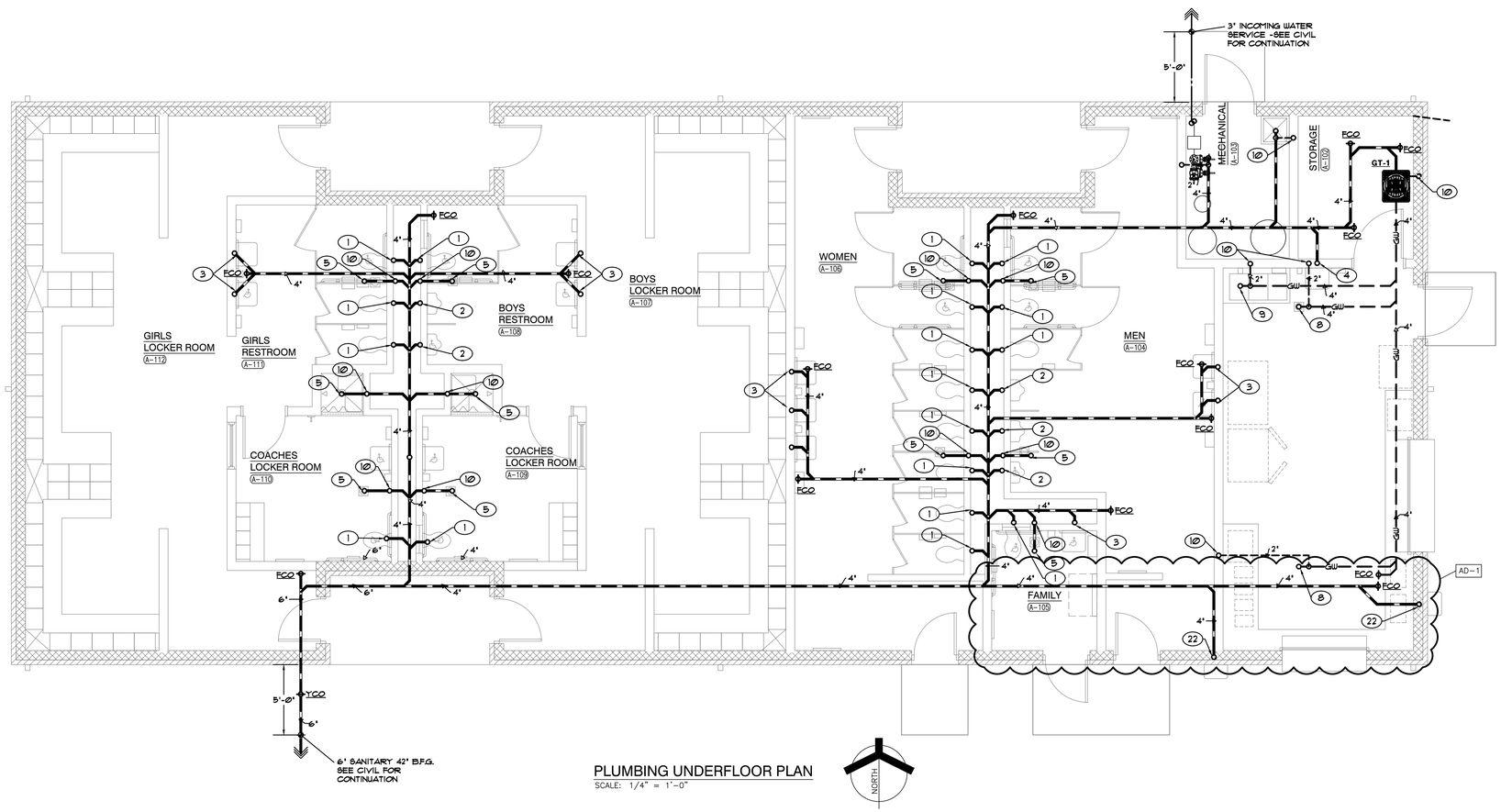
REVISIONS

MARK	DATE	ISSUED FOR
AD-1	08/30/22	ADDENDUM NO. 1

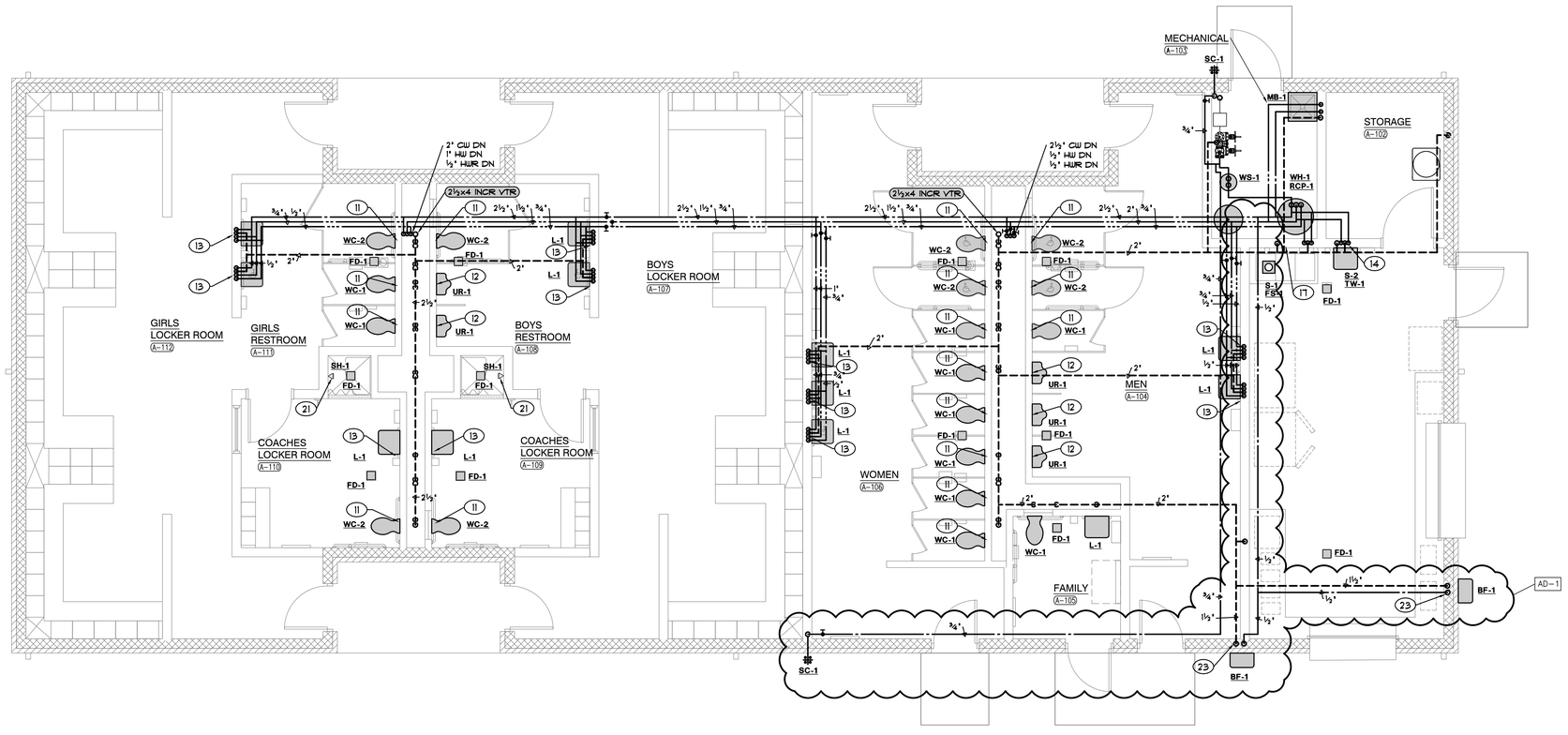
DRAWING
PLUMBING NOTES AND DIAGRAMS

PROJECT
CROWN POINT HIGH SCHOOL - ATHLETIC FIELDS AND SITE IMPROVEMENTS

SHEET
P-002



PLUMBING UNDERFLOOR PLAN
SCALE: 1/4" = 1'-0"



PLUMBING FLOOR PLAN
SCALE: 1/4" = 1'-0"

SHEET NOTES

1. 4" SANITARY UP TO WATER CLOSET.
2. 2" SANITARY UP TO URINAL.
3. 1½" SANITARY UP TO LAVATORY
4. 2" SANITARY UP TO SINK.
5. 4" SANITARY UP TO FLOOR DRAIN.
6. 4" SANITARY UP TO FLOOR SINK.
7. 4" SANITARY UP TO MOP BASIN.
8. 4" GREASY WASTE UP TO FLOOR DRAIN.
9. 4" GREASY WASTE UP TO FLOOR SINK.
10. 2" VENT UP.
11. 1½" COLD WATER, 4" SANITARY, 2" VENT DOWN TO WATER CLOSET.
12. ¾" COLD WATER, 2" SANITARY, 1½" VENT DOWN TO URINAL.
13. ½" COLD WATER, ½" HOT WATER, 1½" SANITARY, AND 1½" VENT DOWN TO LAVATORY.
14. ½" COLD WATER, ½" HOT WATER, 2" SANITARY, AND 1½" VENT DOWN TO SINK.
15. ½" COLD WATER, ½" HOT WATER, 4" SANITARY, AND 2" VENT DOWN TO MOP BASIN.
16. 2" VENT DOWN.
17. ½" COLD WATER AND ½" HOT WATER DOWN TO SINK.
18. N/A
19. 2" COLD WATER, 2" HOT WATER, AND ½" HOT WATER RETURN DOWN TO WATER HEATER.
20. 2½" COLD WATER DOWN IN CHASE
21. ½" COLD WATER AND ½" HOT WATER DOWN TO SHOWER.
22. 1½" SANITARY UP TO BOTTLE FILLER
23. ½" COLD WATER, 1½" SANITARY, AND 1½" VENT DOWN TO BOTTLE FILLER

AD-1

GIBRALTAR
DESIGN
ARCHITECTURE • ENGINEERING • INTERIOR DESIGN

MILLIES ENGINEERING GROUP
(219) 924-8400
www.milliesengineeringgroup.com

PROJECT
CROWN POINT HIGH SCHOOL - ATHLETIC FIELDS AND SITE IMPROVEMENTS

FOR:
CROWN POINT COMMUNITY SCHOOL CORPORATION
CROWN POINT, INDIANA

GIBRALTAR DESIGN
9102 N. Meridian St., Ste. 300
Indianapolis, IN 46260
Homepage www.GibraltarDesign.com
Email info@GibraltarDesign.com
Phone 317.580.5777 Fax 317.580.5778

PROJECT 21-120
DATE 08/18/22
COORDINATED BY SM
DRAWN BY MDG
CHECKED BY DJ

DAVID G. JANNEY REGISTERED NO. 10302590 STATE OF INDIANA PROFESSIONAL ENGINEER

REVISIONS

MARK	DATE	ISSUED FOR
AD-1	08/30/22	ADDENDUM NO. 1

DRAWING
PLUMBING PLANS

PROJECT
CROWN POINT HIGH SCHOOL - ATHLETIC FIELDS AND SITE IMPROVEMENTS

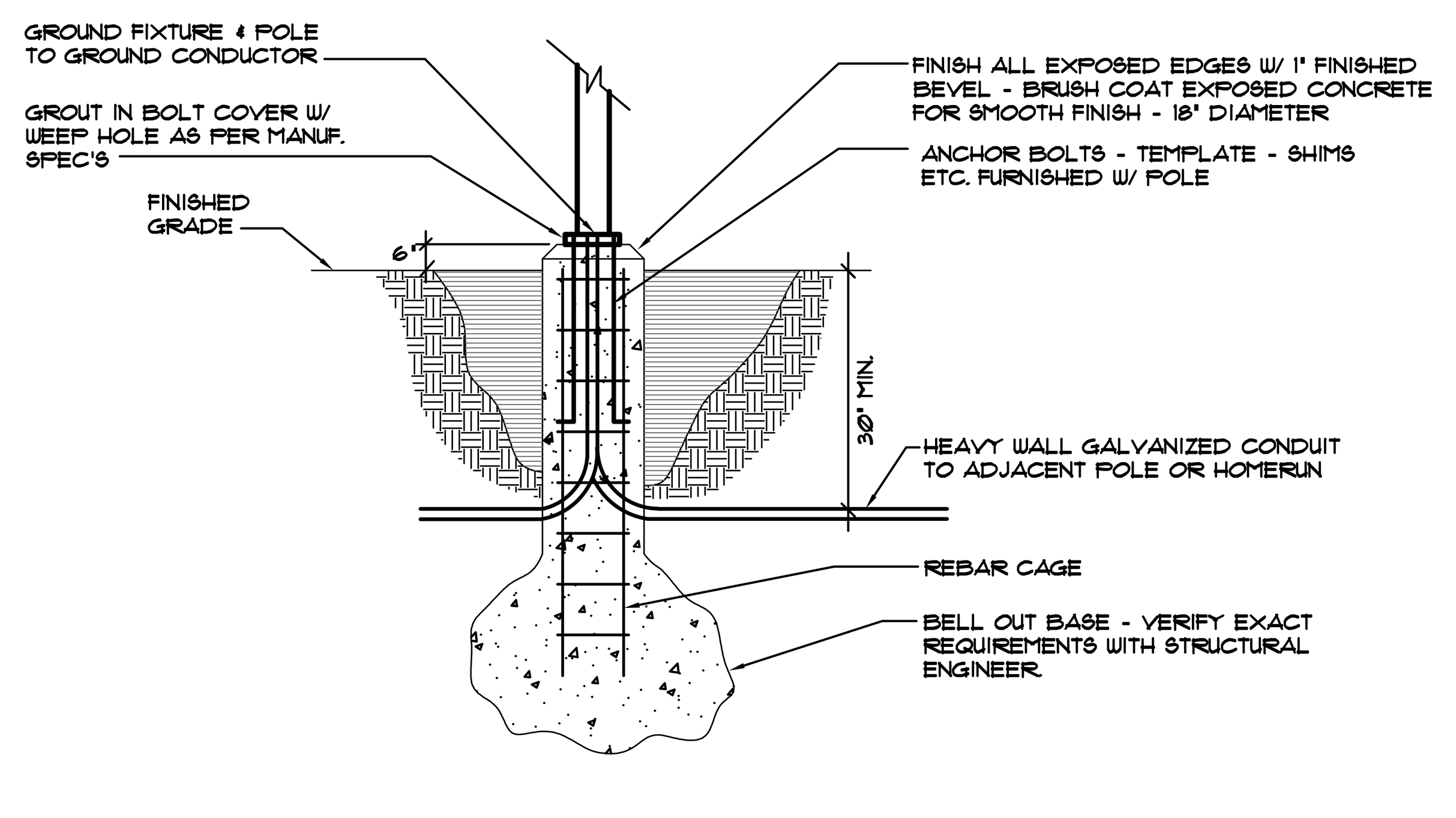
SHEET
P-101

ELECTRICAL ABBREVIATIONS

NOTE:
ABBREVIATIONS USED ON DRAWINGS IN GENERAL ARE LISTED BELOW. REFER TO CSI SECTION 01420 FOR ANY ABBREVIATIONS LISTED ON THE DRAWINGS BUT ARE NOT LISTED BELOW.

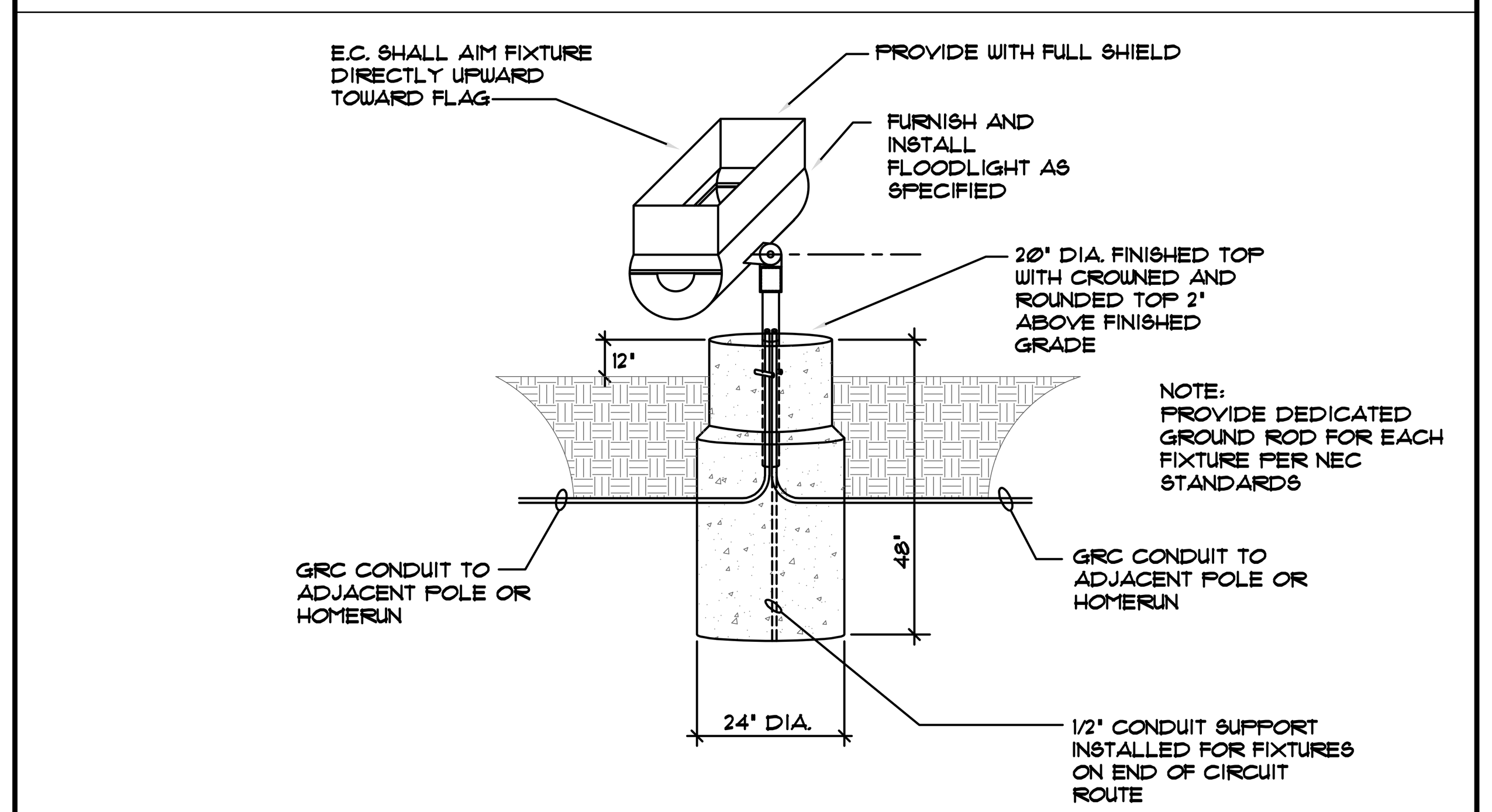
A	AMPS	KVA	KILOVOLT AMPERE
AC	AIR CONDITIONING	KW	KILOWATTS
AFF	ABOVE FINISHED FLOOR	MECH	MECHANICAL
AFG	ABOVE FINISHED GRADE	MTD	MOUNTED
BRKR	BREAKER	NE	NEW LOCATION OF EXISTING RELOCATED DEVICE
C	CONDUIT	NIC	NOT IN CONTRACT
CH	CABINET HEATER	NL	NIGHTLIGHT
CKT	CIRCUIT	NTS	NOT TO SCALE
DISTR	DISTRIBUTION	O/C	ON CENTER
EF	EXHAUST FAN	P	POLE
ELEC	ELECTRICAL	PNL	PANEL
EM	EMERGENCY	PH	PHASE
EMT	ELECTRICAL METALLIC TUBING	RR	REMOVE AND RELOCATE EXISTING DEVICE
ER	EXISTING DEVICE TO BE REMOVED	SW	SWITCH
EX	EXISTING DEVICE TO REMAIN	TYP	TYPICAL
F	FUSE	UON	UNLESS OTHERWISE NOTED
FS	FUSIBLE SWITCH	V	VOLTS
G	GROUND	VIF	VERIFY IN FIELD
GFI	GROUND FAULT INTERRUPTING PROTECTION	W	WATTS
GRC	GALVANIZED RIGID CONDUIT	WP	WEATHERPROOF TYPE DEVICE
HP	HORSEPOWER	WG	WIRE GUARD
J	JUNCTION BOX	F&I	FURNISH AND INSTALL

POLE BASE DETAIL

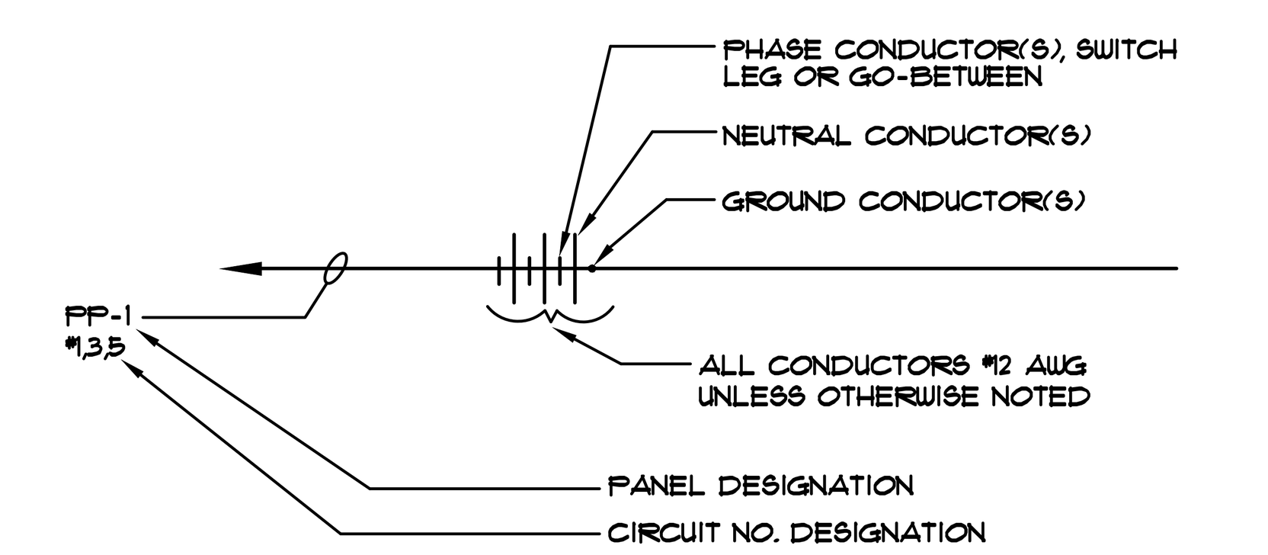


NOTE: VERIFY EXACT CONSTRUCTION OF POLE BASE WITH STRUCTURAL ENGINEER PRIOR TO INSTALLATION.

TYPE 'ED' INSTALLATION DETAIL



KEY TO ELECTRICAL CIRCUIT WIRING



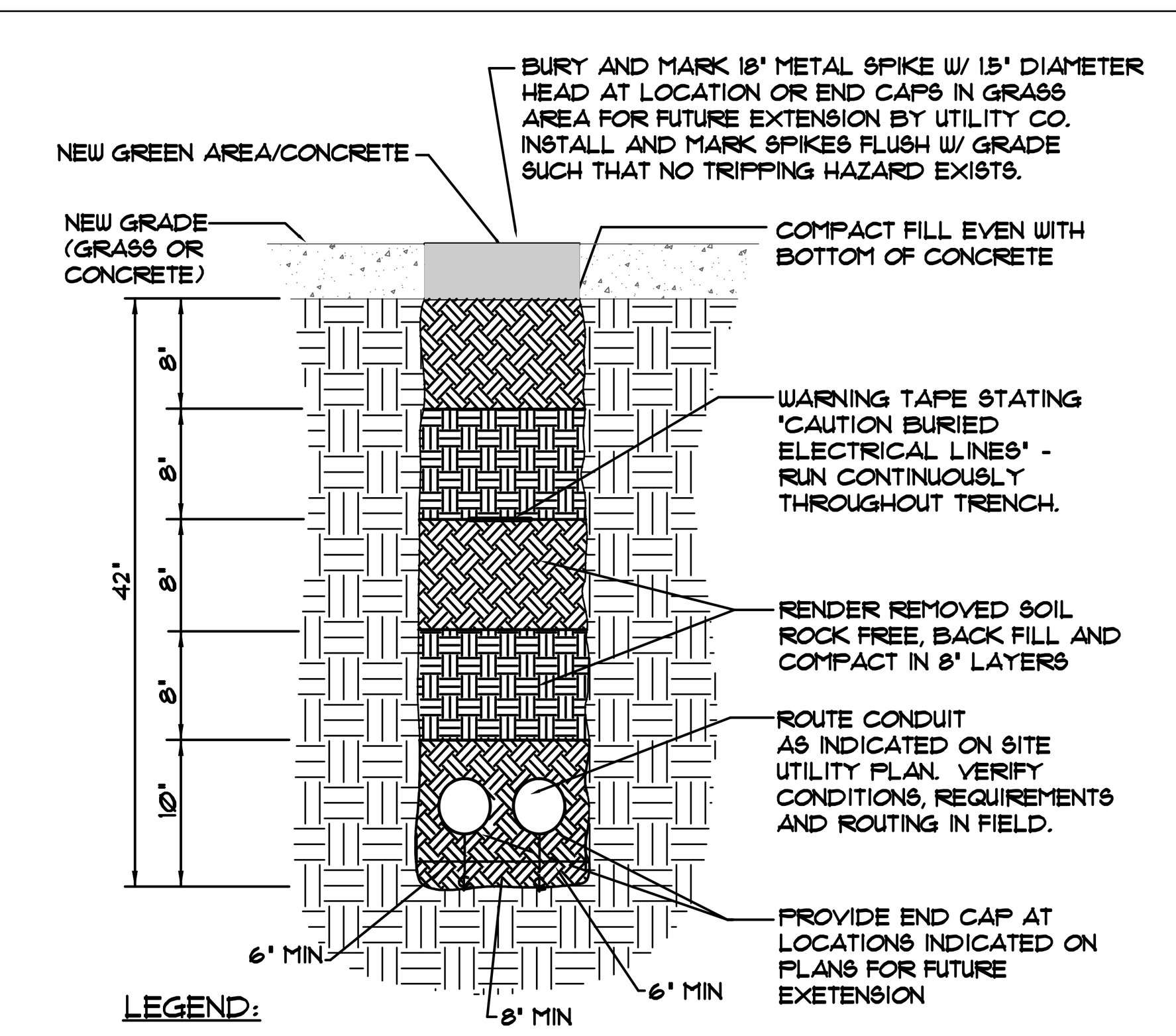
NOTES:
1. ALL WIRING SHALL BE #12 AWG, UNLESS OTHERWISE NOTED.
2. MINIMUM CONDUIT SIZE SHALL BE ¾" EXCEPT FOR THREE (3) WIRES OR LESS, OR CONTROL WIRING WITHIN BUILDINGS, WHICH MAY BE ½" CONDUIT.
3. ½" FLEXSTEEL, GREENFIELD OR SEALITE SHALL BE THE MINIMUM SIZE INSTALLED.

FIXTURE GENERAL NOTES

1. INTERIOR FIXTURES, EXTERIOR FIXTURES AND POLE FINISHES AND COLORS TO BE SELECTED BY ARCHITECT. THE ARCHITECT MAY, AT THEIR DISCRETION, CHOOSE A CUSTOM COLOR AT NO ADDITIONAL CHARGE.
2. PENDANT FIXTURES SPECIFIED ON THIS PROJECT SHALL BE CAREFULLY COORDINATED WITH CONTRACT DOCUMENTS AND FIXTURE MANUFACTURER AS EACH PENDANT FIXTURE IS A CUSTOM MANUFACTURED FIXTURE. PROVIDE PENDANT EMERGENCY SECTIONS AND EMERGENCY CIRCUITS AS SHOWN. COORDINATE WITH FIXTURE MANUFACTURER AND PROVIDE ADDITIONAL ACCESSORIES FOR A COMPLETE AND PROPER INSTALLATION. PROVIDE PROPER FIXTURE LENGTH, FEEDS, SINGLE AND DUAL CIRCUITING AND SUSPENSION LENGTH AS SHOWN ON DRAWINGS. PROVIDE FABRICATION DRAWINGS FOR REVIEW AS PART OF THE SHOP DRAWING SUBMITTAL PROCESS.
3. LED FIXTURES (LESS THAN 10000 LUMENS) SHALL BE PROVIDED WITH FACTORY INSTALLED INTEGRAL EMERGENCY BATTERY UNITS BATTERY UNITS SHALL PROVIDE A MINIMUM OF 1400 LUMENS.
4. FIXTURES THAT CANNOT BE PROVIDED WITH EMERGENCY BALLASTS OR FIXTURES WITH GREATER THAN 10000 LUMENS SHALL BE PROVIDED WITH EMERGENCY INVERTER (MYERS #LV SERIES OR APPROVED EQUAL) WITH SUITABLE CAPACITY TO POWER FIXTURE FOR A MINIMUM OF 90 MINUTES PER CODE. VERIFY SIZING AND REQUIREMENTS WITH CONTRACT DOCUMENTS PRIOR TO ORDERING.
5. SHADED FIXTURES SHALL HAVE AN EMERGENCY SOURCE OF POWER AS SPECIFIED.
6. EXTERIOR LIGHTING POLES SHALL BE PROVIDED WITH STRAIGHT SQUARE STEEL POLES WITH CAST BASE COVERS AND VIBRATION DAMPENERS. THE POLES SHALL BE SIZED PROPERLY TO SUPPORT FIXTURE WEIGHT AT 100 MPH WIND WITH A 1.3 GUST FACTOR. MINIMUM POLE SIZE TO BE 5" SQUARE. PROVIDE ADDITIONAL MOUNTING ACCESSORIES AS REQUIRED FOR A COMPLETE AND PROPER INSTALLATION.
7. FOR EXTERIOR POLE MOUNTED LIGHTING, PROVIDE FACTORY MOUNTED HOUSE SIDE SHIELDS INTEGRAL TO THE FIXTURE AS SPECIFIED. ADDITIONALLY, PROVIDE CUSTOM FABRICATED POLE MOUNTED HOUSE SIDE SHIELDING AS REQUIRED TO CONTROL LIGHT TRESPASS AND COMPLY WITH LOCAL REQUIREMENTS.
8. FIXTURES WITH EMERGENCY BATTERIES SHALL BE PROVIDED WITH CONSTANT HOT SENSING WIRE SO THAT FIXTURE CAN BE SWITCHED ON AND OFF WITHOUT ACTIVATING EMERGENCY BALLAST. UPON LOSS OF POWER, THE FIXTURE SHALL BE ILLUMINATED FOR A MINIMUM OF 90 MINUTES REGARDLESS OF THE LIGHT SWITCH POSITION. PROVIDE TEST SWITCH AND CHARGING INDICATOR FOR EMERGENCY BATTERY AS SPECIFIED.
9. ALL INTEGRAL EMERGENCY BATTERIES USED IN EXTERIOR APPLICATIONS SHALL HAVE A MINIMUM STARTING TEMPERATURE OF -20 DEGREES F UNLESS OTHERWISE SPECIFIED.
10. CAREFULLY COORDINATE MOUNTING REQUIREMENTS FOR FIXTURES WITH CONTRACT DOCUMENTS AND FIXTURE MANUFACTURER. PROVIDE APPROPRIATE MOUNTING FRAMES FOR LAY-IN OR GYPSUM CEILINGS. VERIFY CEILING REQUIREMENTS WITH FINAL ARCHITECTURAL REFLECTED CEILING PLAN.
11. VERIFY FIXTURE MOUNTING HEIGHTS WITH ARCHITECT PRIOR TO ROUGH-IN.
12. PROVIDE CUSTOM ANTI-SWAY BRACING FOR PENDANT TO ELIMINATE PENDANT MOVEMENT DUE TO AIR MOVEMENT OR ENVIRONMENTAL CAUSES.
13. COORDINATE LOCATIONS OF INTERIOR AND EXTERIOR LIGHTING FIXTURES WITH FINAL ARCHITECTURAL DRAWINGS. FIXTURES THAT ARE NOT INSTALLED IN THE CORRECT LOCATION SHALL BE RELOCATED AND REINSTALLED IN THE CORRECT LOCATION AT NO ADDITIONAL CHARGE.
14. FIXTURES SHALL BE CAREFULLY COORDINATED WITH MANUFACTURER TO DELIVER THE SPECIFIED PRODUCT IN SUFFICIENT TIME TO MEET PROJECT DEADLINES. EQUIPMENT DELIVERY LEAD TIME SHALL NOT BE HELD AS A VALID REASON FOR REQUESTING LUMINAIRE SUBSTITUTION UNLESS LUMINAIRE LEAD TIME FROM SPECIFIED MANUFACTURER IS IN EXCESS OF 14 WEEKS. IT SHALL BE THE SOLE RESPONSIBILITY OF THE ELECTRICAL CONTRACTOR TO DETERMINE NECESSARY EQUIPMENT LEAD TIMES, DELIVER SUBMITTALS FOR REVIEW IN A TIMELY FASHION, AND PLACE ORDERS ACCORDINGLY TO ENSURE TIMELY DELIVERY.
15. EVALUATION OF APPROVED EQUALS SHALL BE AT THE SOLE DISCRETION OF THE ARCHITECT AND ENGINEER. IF THE PRODUCT SUBMITTED DURING THE REVIEW PROCESS IS NOT JUDGED AS AN EQUAL BY THE REVIEWING ENGINEER, THE CONTRACTOR SHALL PROVIDE THE PRODUCT SPECIFIED.
16. CAREFULLY COORDINATE VOLTAGES OF FIXTURES PRIOR TO ORDERING FIXTURES.
17. APPROVED EQUALS WILL BE CONSIDERED FROM THE FOLLOWING VENDORS: KSA LIGHTING (630.307.6955), FORCE CHICAGO (312.986.1515) OR PG ENLIGHTEN (847.228.1199).
18. CAREFULLY VERIFY COLOR TEMPERATURE OF FIXTURES WITH ARCHITECT PRIOR TO ORDERING.

TRENCH DETAIL

N.T.S.



LEGEND:

— — — INDICATES CONDUIT ROUTED MINIMUM 36" BELOW GRADE AND LISTED FOR DIRECT BURIAL WITH NYLON PULL WIRE. COORDINATE CONDUIT TYPE WITH SPECIFICATIONS. REGARDLESS OF THE SPECIFIED CONDUIT, ALL CONDUIT BENDS SHALL BE GALVANIZED RIGID STEEL CONDUIT WITH NO LESS THAN 36" BENDING RADIUS.

[PROPERLY TERMINATE, CAP AND SPIKE WITH 18" METAL SPIKE W/ 1.5" DIAMETER FOR FUTURE EXTENSION.

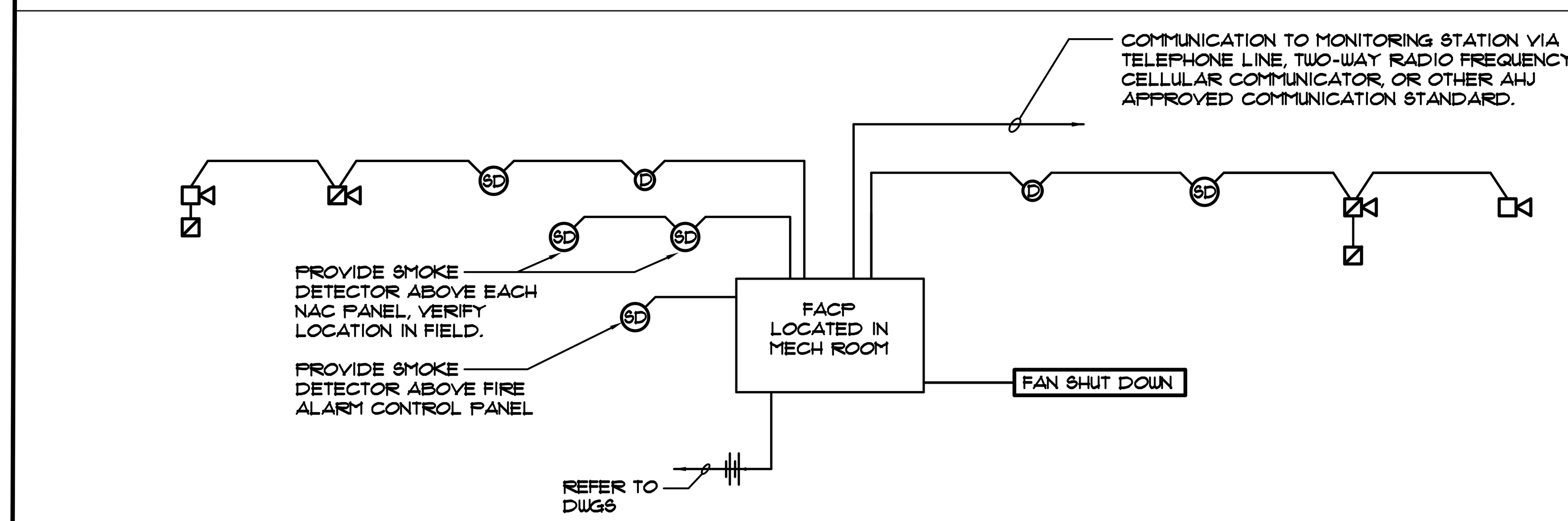
INTERIOR/EXTERIOR LIGHTING LUMINAIRE SCHEDULE

TAG	SYMBOL	DESCRIPTION	MANUFACTURER SERIES OR CATALOG NUMBER	VOLTAGE/ BALLAST	LAMPS/CROSS SECTION	MOUNTING	REMARKS
CA		6" LED DOWNLIGHT	LITHONIA #LDN6-40/15-LO6-AR-LSS-MVOLT-GZ10-X-X-X OR APPROVED EQUAL	MVOLT 0-10V DIM - -	LED 4000K MAX 19W MIN 1500LM	RECESSED LAY-IN/ DRYWALL	-VERIFY TRIM FINISH WITH ARCHITECT
EA		6" LED DOWNLIGHT	LITESTRY #LTR-6RD-H-SL15L-DM1-IC-LTR-6RD-T-SL-50K8-MD-S OR HALO #HC615D010 / HM612840 / 61MDHWF OR SPECTRUM #SGICE6LEDOS SERIES	MVOLT 0-10V DIM - -	LED 5000K MAX 19W MIN 1500LM	RECESSED LAY-IN/ DRYWALL	-VERIFY TRIM FINISH WITH ARCHITECT
EB		EXTERIOR LED WALL PACK WITH COLD TEMP EM BATTERY AND INTEGRAL PHOTOCELL CONTROL	LITHONIA #WST-P2-50K-VF-MVOLT-XX-XX-XX OR HUBBELL #TRP SERIES OR MCGRAW #ISS SERIES	MVOLT - -	LED 5000K MAX 25W MIN 3000LM	WALL MTD -	-INTEGRAL COLD TEMP EMERGENCY OPERATION BATTERY AND PHOTOCELL
EC		LED TYPE 2 PEDESTRIAN SITE POLE	LIHTONIA #DSX0 LED-P5-50K-T2M-MVOLT-XX-XX -XX-X-X-X OR APPROVED EQUAL	120/277 VOLT - - -	LED 5000K - -	TOP OF HEAD @ 16'-0" AFG CUSTOM POLE 6" BASE	-STANDARD COLOR TO BE SELECTED BY ARCHITECT -PROVIDE DECORATIVE SHROUD
EF		FLAGPOLE FLOOD LIGHT WITH FULL SHIELD	LITHONIA #DSXF3 LED-6-P1-40K-NSP-MVOLT -XX-XX-FV-VG-XX OR APPROVED EQUAL BY HUBBELL OR EATON LIGHTING	120 VOLT - - -	LED 4000K - -	STANCHION MTD ON 12" CONCRETE BASE	-STANDARD COLOR TO BE SELECTED BY ARCHITECT -PROVIDE MTG ACCESS AS REQUIRED
FA		4' SURFACE THIN PROFILE FIXTURE WITH LENS TYPE TO BE SELECTED BY ARCHITECT	LITHONIA# STL4-40L-MV-EZ1-LP840 OR APPROVED EQUAL	MVOLT 0-10V DIM - -	LED 4000K MAX 35W MIN 3800LM	SURFACE MOUNTED - -	-VERIFY FINISH AND LENS TYPE WITH ARCHITECT - -
FA1		4' SURFACE THIN PROFILE FIXTURE WITH LENS TYPE TO BE SELECTED BY ARCHITECT	LITHONIA# STL4-60L-MV-EZ1-LP840 OR APPROVED EQUAL	MVOLT 0-10V DIM - -	LED 4000K MAX 53W MIN 6000LM	SURFACE MOUNTED - -	-VERIFY FINISH AND LENS TYPE WITH ARCHITECT - -
FB		CUSTOM CONTINUOUS 8' LED WET LOCATION VANDAL RESISTANT CORNER MOUNT FIXTURES	KENALL #TCD-X-A-45L40K-DCC-DV-1/7-X OR APPROVED EQUAL	MVOLT 0-10V DIM - -	LED 4000K MAX 45W/4FT MIN 9000LM	SURFACE MOUNTED - -	-VERIFY FINISH AND LENS TYPE WITH ARCHITECT -CUSTOM 8' LONG FIXTURE -
FC		4' LED VANDAL RESISTANT FIXTURE	KENALL #TSH5-48-X-45L40K-DCC-DV-X OR APPROVED EQUAL	MVOLT 0-10V DIM - -	LED 4000K MAX 45W MIN 4500LM	SURFACE MOUNTED - -	-VERIFY FINISH WITH ARCHITECT - -
WA		36" LED VANDAL RESISTANT WALL MOUNTED FIXTURE	KENALL #MLAS838-PLR-PP-XX-33L40K-DCC-DV OR APPROVED EQUAL	MVOLT 0-10V DIM - -	LED 4000K MAX 33W MIN 1900LM	SURFACE MOUNTED @ 4'-6" A.F.G. -	-VERIFY FINISH WITH ARCHITECT - -
XA		SINGLE FACE EXIT SIGN WITH 6" GREEN LETTERS, CAST ALUMINUM BODY, 90 MINUTE NI-CAD BATTERY BACK UP	LITHONIA LE-S-X-X-G-ELN-X OR APPROVED EQUAL	MVOLT - -	LED - MAX 5W -	CEILING/ WALL	-FURNISH WITH ARROWS AS REQ'D BY CODE - -
EM		FIXTURE ON EMERGENCY CIRCUIT WITH 90 MINUTE, HIGH OUTPUT (MIN 1400LM) BATTERY UNIT OR INVERTER	FIXTURES LESS THAN 10000 LM: BODINE FACTORY INSTALLED BATTERY OR, AT CONTRACTOR'S DISCRETION, MYERS LV SERIES INVERTER (SIZE AND QUANTITY AS REQUIRED) FIXTURES GREATER THAN 10000LM: MYERS LV SERIES INVERTER (SIZE AND QUANTITY AS REQUIRED)	120/277 VOLT	-	IN FIXTURE/ REMOTE	-PROVIDE TEST SWITCH AND CHARGING INDICATOR -INTEGRAL BATTERIES NOT ALLOWED IN FIXTURES WITH GREATER THAN 10000 LUMENS

AD-1

1. ALL INTERIOR AND EXTERIOR FIXTURE STANDARD FINISHES TO BE SELECTED BY ARCHITECT.

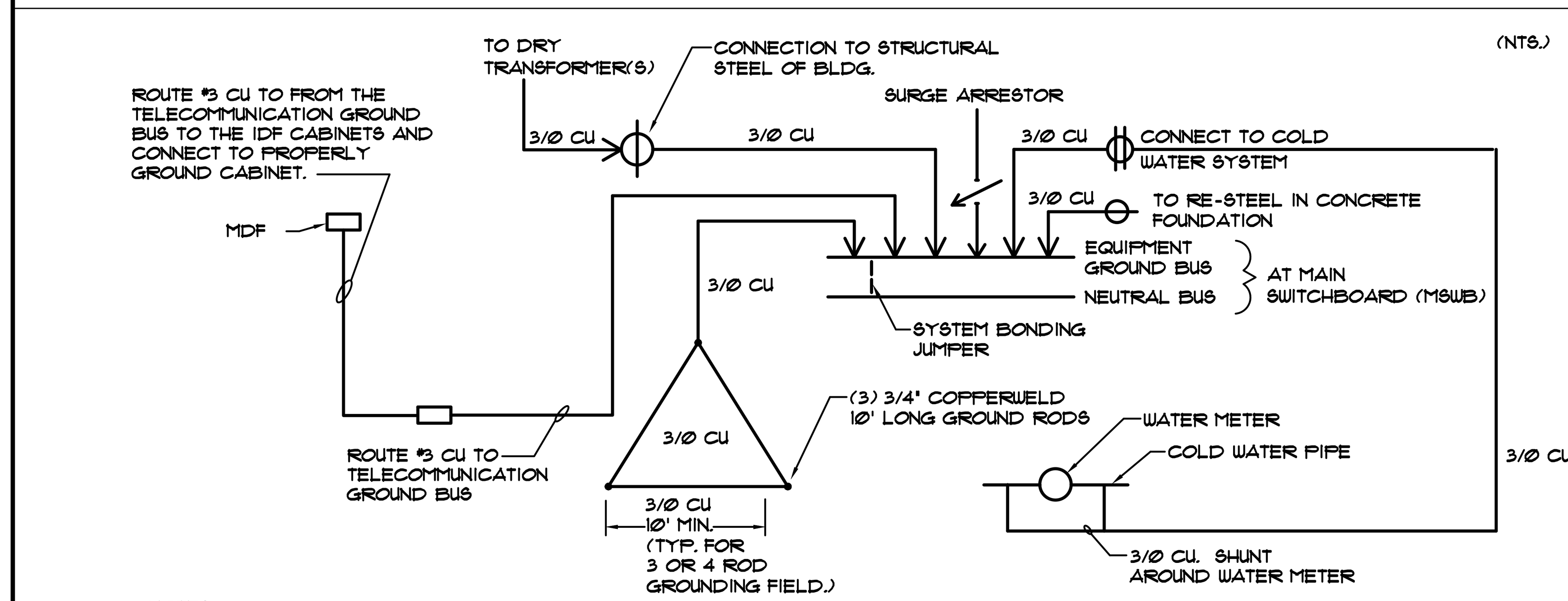
FIRE ALARM SCHEMATIC RISER DIAGRAM



NOTES:
1. THIS DIAGRAM IS SCHEMATIC ONLY AND DOES NOT SHOW ALL FIRE ALARM DEVICES, AIR HANDLING UNITS, ROOF-TOP UNITS OR FIRE PROTECTION DEVICES - REFER TO ALL PLANS AND SPECIFICATIONS FOR QUANTITIES, LOCATION, ACCEPTABLE MANUFACTURERS, ETC.
2. ELECTRICAL CONTRACTOR SHALL FURNISH DUCT SMOKE DETECTORS. MECHANICAL CONTRACTOR SHALL INSTALL DUCT SMOKE DETECTOR AND ELECTRICAL CONTRACTOR SHALL MAKE FINAL WIRING CONNECTIONS AS REQUIRED. REFER TO MECHANICAL DRAWINGS FOR EXACT LOCATIONS AND QUANTITIES OF DUCT SMOKE DETECTORS.
3. ELECTRICAL CONTRACTOR SHALL PROVIDE INTERLOCKING BETWEEN DUCT SMOKE DETECTORS, FIRE ALARM CONTROL PANEL, AIR HANDLING UNITS, ROOF-TOP UNITS, ANSUL SYSTEM AND FAN SHUT DOWN RELAYS SO THAT UPON ACTIVATION OF FIRE ALARM SYSTEM, ALL AIR HANDLING EQUIPMENT AND SMOKE/FIRE DAMPER SHALL SHUT DOWN. ALL AIR HANDLING EQUIPMENT SHALL START AUTOMATICALLY (AND SEQUENTIALLY) UPON RESETTING OF THE FIRE ALARM SYSTEM.
4. ELECTRICAL CONTRACTOR SHALL CONNECT SMOKE/FIRE DAMPERS THROUGHOUT FACILITY TO CLOSE DAMPERS UPON ACTIVATION/ALARM OF SMOKE DUCT DETECTOR MOUNTED IN DUCT AHEAD OF RESPECTIVE DAMPER OR LOCAL SMOKE DETECTORS, COMPLETE AS REQUIRED. VERIFY LOCATION AND QUANTITIES ON MECHANICAL AND ARCHITECTURAL PLANS AND IN FIELD. INTERLOCK SMOKE DUCT DETECTORS AND DAMPERS WITH FIRE ALARM CONTROL PANEL, COMPLETE AS REQUIRED.
5. PROVIDE ADDITIONAL PARTS, ACCESSORIES, CARDS, ETC. AS REQUIRED TO COMPLETE THE WORK. FIRE ALARM DEVICES SHALL BE CONNECTED TO THE FIRE ALARM POWER SUPPLY AND BATTERIES OF THE SYSTEM AND SHALL NOT BE CONNECTED TO NORMAL POWER.

GROUNDING DETAIL

(NTS.)



NOTES:
1. CONTRACTOR SHALL FOLLOW THIS DETAIL FOR PROPER GROUNDING CONNECTIONS, INCLUDING FURNISH AND INSTALL ALL CONDUCTORS AND EQUIPMENT SUCH AS GROUND RODS, SURGE ARRESTOR, GROUND BUS, ETC. TO PROPERLY GROUND/BOND ALL EQUIPMENT.
2. SYSTEM GROUNDING FOR INTERIOR DISTRIBUTION TRANSFORMERS SHALL BE MADE TO A GROUNDING ELECTRODE AS NEAR AS PRACTICAL TO, AND PREFERABLY IN THE SAME AREA AS, THE TRANSFORMER. THE ELECTRODE SHALL BE THE NEAREST OF A METAL WATER PIPE GROUNDING ELECTRODE OR STRUCTURAL METAL GROUNDING ELECTRODE.
3. GROUNDING ELECTRODE RESISTANCE SHALL BE 25 OHMS OR LESS. SHOULD THE MEASURED RESISTANCE BE HIGHER THAN 25 OHMS, ADDITIONAL SUPPLEMENTAL ELECTRODES SHALL BE PROVIDED AS REQUIRED TO REACH A RESISTANCE TO EARTH OF 25 OHMS OR LESS.
4. IN ADDITION TO THE ABOVE DEPICTED CONNECTIONS, CONTRACTOR SHALL PROVIDE ALL GROUND RODS, GROUND GRIDS, AND OTHER GROUNDING ELECTRODES AS REQUIRED BY THE UTILITY COMPANY AND MAKE CONNECTIONS TO UTILITY EQUIPMENT PER UTILITY COMPANY STANDARDS.

GIBRALTAR DESIGN
ARCHITECTURE • ENGINEERING • INTERIOR DESIGN
MILLIES ENGINEERING GROUP

PROJECT
CROWN POINT HIGH SCHOOL - ATHLETIC FIELDS AND SITE IMPROVEMENTS
FOR:
CROWN POINT COMMUNITY SCHOOL CORPORATION
CROWN POINT, INDIANA

GIBRALTAR DESIGN
9102 N. Meridian St., Ste. 300
Indianapolis, IN 46260
Homepage www.GibraltarDesign.com
Email info@GibraltarDesign.com
Phone 317.580.5777 Fax 317.580.5778

PROJECT 21–120
DATE 08/18/22
COORDINATED BY SM
DRAWN BY PF
CHECKED BY DJ

DAVID G. JANNEY REGISTERED NO. 10302590 STATE OF INDIANA PROFESSIONAL ENGINEER

REVISIONS

MARK	DATE	ISSUED FOR
AD–1	08/31/22	ADDENDUM NO. 1

DRAWING
ELECTRICAL SCHEDULES, NOTES & DETAILS

PROJECT
CROWN POINT HIGH SCHOOL - ATHLETIC FIELDS AND SITE IMPROVEMENTS

SHEET
E-001

GENERAL NOTES

A. WORK SHALL COMPLY WITH LOCAL, STATE AND NATIONAL ELECTRIC CODES AND THE AMERICANS WITH DISABILITIES ACT.

B. THE PANEL SCHEDULES ARE PROVIDED FOR ASSISTANCE ONLY IN UNDERSTANDING THE LOADING ON THE VARIOUS CIRCUITS AND THE CIRCUIT DESIGNATIONS DESIRED FOR THE PANEL DIRECTORIES. THE PANEL SCHEDULES MUST BE BALANCED UPON COMPLETION OF THE PROJECT TO COMPLY WITH CODE. IN ADDITION, THE PANEL SCHEDULES DO NOT IDENTIFY THE TYPES OF CIRCUIT BREAKERS TO BE USED (SUCH AS GFCI, HACR, SHUNT TRIP UNITS, ETC.) NOR DO THE SCHEDULES IDENTIFY CIRCUIT BREAKERS REQUIRED, (SUCH AS C/B'S FEEDING SURGE PROTECTION UNITS). REFER TO THE REST OF THE DRAWINGS AND THE SPECIFICATIONS FOR ADDITIONAL REQUIREMENTS AND DETAILED INFORMATION.

C. COORDINATE EQUIPMENT ELECTRICAL REQUIREMENTS (VOLTAGE6, PHASE, LOAD, ETC.) TO AVOID CONFLICTS.

D. REFER TO ARCHITECTURAL PLANS AND ELEVATIONS FOR ADDITIONAL ELECTRICAL INFORMATION AND REQUIREMENTS. IN ALL CASES DEVICE MOUNTING HEIGHTS AND LOCATIONS SHALL CONFORM TO THE LATEST AMERICANS WITH DISABILITIES FEDERAL STANDARDS.

E. EXCAVATION NECESSARY FOR COMPLETION OF WORK SHALL BE PROVIDED. COORDINATE WITH ONE ANOTHER TO SHARE TRENCHES WHEREVER POSSIBLE.

F. REFER TO THE PLANS FOR ADDITIONAL ELECTRICAL WORK AND REQUIREMENTS. FURNISH, INSTALL AND LOCATE DISCONNECT SWITCHES AT EQUIPMENT/MOTOR LOCATION, AS REQUIRED, AND IN ACCORDANCE WITH CODE. IF THE WORK OF OTHER TRADES CAUSES A LOSS OF CONTINUITY OF THE EXISTING ELECTRICAL DISTRIBUTION, GROUNDING SYSTEM OR CIRCUITRY, IT SHALL BE RECONNECTED OR REPAIRED AT NO ADDITIONAL COST.

G. COORDINATE PHASING OF WORK AND PROVIDE TEMPORARY POWER AND SERVICES AS REQUIRED FOR THE IMPLEMENTATION OF WORK WHILE MAINTAINING SERVICES TO PORTIONS OF BUILDING TO REMAIN OCCUPIED.

H. SCHEDULE WORK TO AVOID DOWNTIME AND INCONVENIENCE TO OWNER. OWNER'S EXISTING FACILITY SHALL REMAIN IN OPERATION AT ALL TIMES, INCLUDING F/A AND OTHER SPECIAL SYSTEMS, ELECTRICAL POWER DISTRIBUTION, ETC. REQUIRED SHUTDOWN OF EXISTING FACILITY UTILITIES SHALL BE SCHEDULED WITH OWNER'S OPERATING PERSONNEL.

I. LAYOUT IS DIAGRAMMATIC AND INSTALL DEVICES, CONDUIT AND EQUIPMENT TO MEET ACTUAL FIELD CONDITIONS. REVIEW PROJECT SPECIFICATIONS BEFORE STARTING WORK AND SUBMIT COMPLETE SHOP DRAWINGS AS PER SPECIFICATIONS.

J. HIDDEN CONDITIONS IDENTIFIED THROUGH THE COURSE OF CONSTRUCTION SHALL BE IMMEDIATELY BROUGHT TO ATTENTION IN WRITTEN FORM FOR REVIEW AND DIRECTION. FAILURE TO DO SO SHALL REQUIRE THE CHANGES AND COSTS TO CORRECT SAID HIDDEN CONDITION TO BE COMPLETED AT NO COST. EXISTING EQUIPMENT NOT IDENTIFIED SHALL BE BROUGHT TO ATTENTION FOR REVIEW AS TO WHETHER THE EQUIPMENT SHALL REMAIN AND BE RECONNECTED TO THE NEW SERVICES, BE RELOCATED, BE ABANDONED, ETC.

K. COORDINATE NEW INSTALLATIONS WITH EXISTING SYSTEMS. RELOCATE EXISTING LIGHTING, CONDUIT, EQUIPMENT, ETC., AS NECESSARY FOR NEW INSTALLATIONS.

L. PROVIDE NEW PANEL DIRECTORIES IN EXISTING MODIFIED PANELBOARDS AND NEW PANELBOARDS TO CORRECTLY IDENTIFY EXISTING AND NEW LOADS. FINAL DIRECTORIES SHALL BE TYPE WRITTEN.

M. VERIFY CEILING STYLES/FRAMES AND TYPES BEFORE ORDERING FIXTURES AND CEILING MOUNTED DEVICES. PROVIDE APPROPRIATE STYLES/FRAMES AS REQUIRED TO MATCH CEILING STYLE AND TYPES.

N. COORDINATE LIGHTING LAYOUTS WITH CEILING REGISTERS, GRILLES, DIFFUSERS, SPRINKLER HEADS AND CEILING GRID (SEE ARCHITECTURAL REFLECTED CEILING PLAN.) VERIFY LOCATION WITH OWNER'S REPRESENTATIVE IN FIELD PRIOR TO INSTALLATION.

O. SOME CEILING SPACES ARE RETURN AIR PLENUMS. EXAMINE PLENUM BEFORE CEILING IS INSTALLED (OR REPLACED) AND SEAL ALL OPENINGS AROUND CONDUIT, CABLE, ETC. PROVIDE PLENUM RATED CABLE (UNLESS IN CONDUIT), DEVICES AND EQUIPMENT PER CODE.

P. THE MINIMUM DISTANCE BETWEEN SMOKE OR HEAT DETECTORS AND CEILING MOUNTED SUPPLY DIFFUSERS SHALL BE A MINIMUM OF 4 FEET AND WALL MOUNTED DIFUSERS SHALL BE 10 FEET.

Q. WHERE INDICATED ON THE DRAWINGS IN UNFINISHED SPACES, RUN EXPOSED RACEWAYS PARALLEL WITH OR AT RIGHT ANGLES TO WALL.

R. PROVIDE PULL WIRE IN EACH RACEWAY IN WHICH WIRING IS NOT INSTALLED.

S. COVERS OF JUNCTION OR PULL BOXES SHALL BE ACCESSIBLE AND IDENTIFIED PER SPECIFICATIONS. FIRE ALARM JUNCTION BOXES SHALL BE PAINTED RED. JUNCTION OR PULL BOXES AND THE LIKE SHALL BE INDEPENDENTLY SUPPORTED TO BUILDING STRUCTURE WITH NO WEIGHT BEARING ON RACEWAYS.

T. WIRE COLOR CODING SHALL BE COORDINATED THROUGHOUT THE ENTIRE PROJECT/BUILDING FOR NEW AND EXISTING SYSTEMS.

U. IF MORE THAN THREE (3) PHASE (UNGROUNDED) CONDUCTORS ARE RUN IN THE SAME RACEWAY, CONDUCTOR AMPACITY SHALL BE DERATED IN ACCORDANCE WITH NEC ARTICLE 310.

V. CONDUIT, LIGHTING, EQUIPMENT, ETC. SHALL NOT BE SUPPORTED FROM THE BOTTOM CHORD OF ENGINEERED JOISTS WITHOUT WRITTEN APPROVAL FROM THE STRUCTURAL ENGINEER. CONDUITS, ROUTED THROUGH AREAS WITH NO CEILING, SHALL BE ROUTED WITHIN THE WEBBING OF THE JOISTS AND SHALL NOT BE ROUTED BELOW THE BOTTOM CHORD OF THE JOIST.

W. SMOKE OR HEAT DETECTORS SHALL BE SURFACE MOUNTED TO CEILING, ROOF DECK MATERIALS, ETC. IN LIEU OF MOUNTING TO BOTTOM CHORD OF ENGINEERED JOIST OR ANY OTHER COMPONENTS NOT AN INTEGRAL PART OF THE HORIZONTAL CEILING.

X. ROOF SUPPORTS FOR CONDUITS TO BE EQUIVALENT TO PORTABLE PIPE HANGER, INC. TYPE PPP-10, WITH ROLLER GUIDE SUPPORT FOR SINGLE PIPES AND CHANNEL GUIDE SUPPORT FOR MULTIPLE PIPES. SUPPORTS TO HAVE HIGH DENSITY POLYPROPYLENE PLASTIC BASE WITH THREADED RODS FOR ADJUSTABLE HEIGHT ROLLER. SUPPORTS ARE TO BE INSTALLED AS PER MANUFACTURER'S RECOMMENDATION AND TO BE COMPATIBLE WITH AND MAINTAIN THE INTEGRITY OF THE EXISTING OR NEW ROOF SYSTEM. WHERE CONDUITS AND WIRING ARE RUN IN EXTERIOR LOCATIONS OR EXPOSED TO SUNLIGHT, CONDUCTORS SHALL BE PROPERLY UPSIZED PER NEC 310.

Y. WIRING DEVICES SHOWN BACK-TO-BACK IN WALLS SHALL BE SEPARATED BY 8" MINIMUM.

Z. UNLESS OTHERWISE NOTED, DEVICE ELEVATIONS REFER TO CENTER LINE OF JUNCTION BOX. VERIFY JUNCTION BOX LOCATIONS WITH FINAL EQUIPMENT LAYOUT PRIOR TO ROUGHING IN SAME.

AA. FURNISH AND INSTALL A GREEN GROUND WIRE IN POWER CONDUITS (NOT LIGHTING). ALL DEVICES, EQUIPMENT, FIXTURES AND THE LIKE, MUST BE GROUNDED. MECHANICAL/ELECTRICAL BONDS OF THE METALLIC RACEWAY SYSTEM SHALL BE MAINTAINED.

BB. PROVIDE CONDUIT AND WIRE AND MAKE FINAL POWER CONNECTIONS AS REQUIRED TO EXHAUST FANS AND MISCELLANEOUS EQUIPMENT FURNISHED WITH MOTORIZED BACKDRAFT DAMPERS. DAMPERS SHALL BE CONNECTED TO EQUIPMENT 120 VOLT POWER CIRCUIT SO AS TO INTERLOCK THE MOTORIZED DAMPER WITH THE EXHAUST FAN. FOR THREE PHASE MOTORS, PROVIDE AN ADDITIONAL 120 VOLT CIRCUIT ROUTED THROUGH AN AUXILIARY CONTACT IN THE MOTOR STARTER.

CC. CONDUIT INSTALLED FOR LOW VOLTAGE SYSTEMS SHALL BE COORDINATED WITH THE LOW VOLTAGE INSTALLER IN FIELD, PRIOR TO ROUGH-IN. SUCH CONDUIT SHALL BE ROUTED TO MINIMIZE CABLE LENGTH AND COMPLY WITH LOW VOLTAGE CABLING DISTANCE LIMITATIONS.

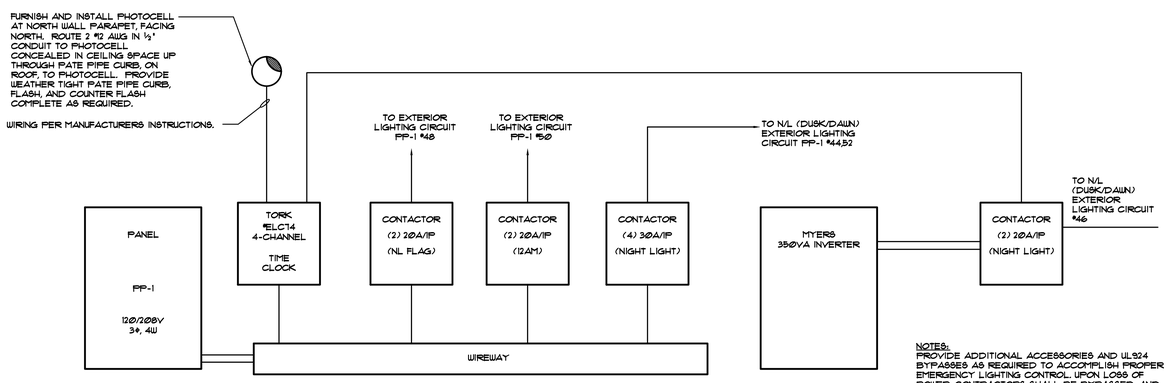
DD. THE FLASH RATES FOR FIRE ALARM STROBES SHALL BE SYNCHRONIZED, COORDINATE ADDITIONAL REQUIREMENTS WITH NFPA 72.

EE. SINGLE POLE CIRCUITS SHALL HAVE SEPARATE INDEPENDENT NEUTRAL CONDUCTORS (NON-NETWORKED), WHICH (PER CODE) ARE CONSIDERED CURRENT CARRYING CONDUCTORS. THEREFORE, IF MORE THAN THREE (3) CURRENT CARRYING CONDUCTORS ARE RUN IN THE SAME RACEWAY, CONDUCTOR AMPACITY SHALL BE DERATED IN ACCORDANCE WITH NEC ARTICLE 310. AS SUCH, MULTIPLE BRANCH CIRCUIT HOME RUNS SHALL, AT A MINIMUM, UTILIZE #10 AWG CONDUCTORS TO COMPLY WITH REQUIREMENTS HEREIN. COORDINATE REQUIREMENTS IN FIELD WITH SPECIFIC HOME RUN CONFIGURATION AND NEC 2008.

FF. CONTRACTOR SHALL OBTAIN AVAILABLE FAULT CURRENT, UTILITY TRANSFORMER SIZE AND IMPEDANCE WITHIN 14 DAYS OF CONTRACT AWARD. ELECTRICAL PANEL AND GEAR SHOP DRAWINGS SHALL BE SUBMITTED ALONG WITH COORDINATION/ARC FLASH STUDY WITH 30 DAYS OF CONTRACT AWARD FOR REVIEW. ALL GEAR SHALL BE RATED TO PROPERLY WITHSTAND AVAILABLE FAULT CURRENT.

GG. CAREFULLY VERIFY COLOR TEMPERATURES OF FIXTURES WITH ARCHITECT PRIOR TO ORDERING.

EXTERIOR LIGHTING CONTROL SEQUENCE DIAGRAM



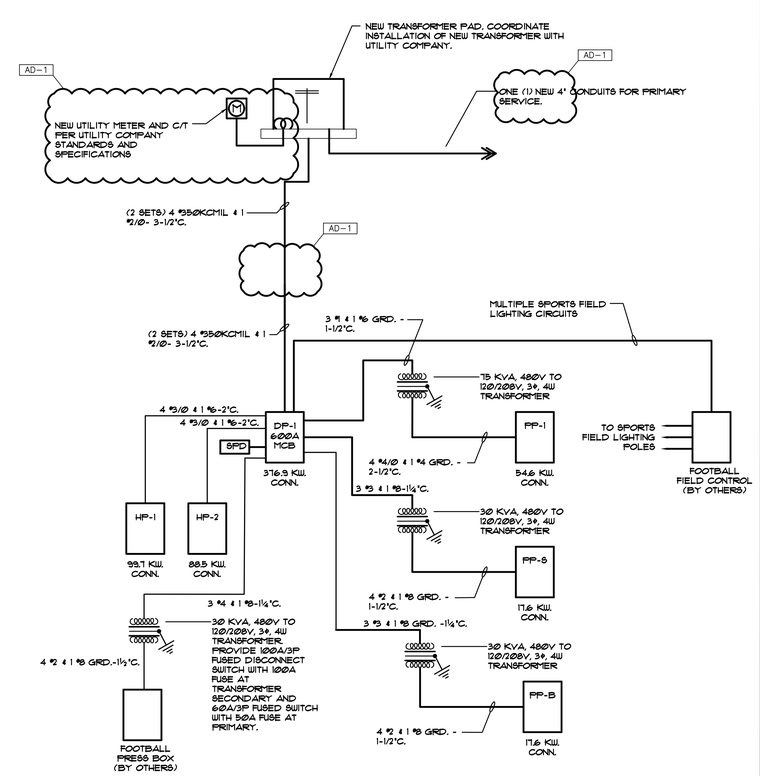
NOTES:
PROVIDE ADDITIONAL ACCESSORIES AND UL924 BYPASSES AS REQUIRED TO ACCOMPLISH PROPER EMERGENCY LIGHTING CONTROL. UPON LOSS OF POWER, CONTRACTORS SHALL BE BYPASSED, AND EMERGENCY POWER FIXTURES SHALL BE FULLY ON REGARDLESS OF LIGHTING CONTROL SYSTEM STATE.

VERIFY ACCEPTABILITY OF TIME CLOCK SETTINGS WITH OWNER'S REPRESENTATIVE.

TIME CLOCK SCHEDULE

TIMECLOCK CHANNEL	CIRCUIT DESCRIPTION	PANEL/CIRCUIT #	CONTACTOR POLES (ASCO #918 SERIES)	TIME ON/OFF
1	SITE/BUILDING/SIGNAGE LIGHTING NL AND EM	FPP-1 #44,46,52	4 - POLES 2 - POLES	PHOTOCELL ON PHOTOCELL OFF
2	SITE/BUILDING LIGHTING 12AM	FPP-1 #50	2 - POLES	PHOTOCELL ON TIMECLOCK OFF
3	FLAGPOLE	FPP-1 #48	2 - POLES	PHOTOCELL ON PHOTOCELL OFF
4	SPARE	-	-	-

ONE-LINE SCHEMATIC RISER DIAGRAM



GIBRALTAR DESIGN
ARCHITECTURE • ENGINEERING • INTERIOR DESIGN
MILLIES ENGINEERING GROUP
(219) 924-5400
www.milliesengineeringgroup.com

PROJECT
CROWN POINT HIGH SCHOOL - ATHLETIC FIELDS AND SITE IMPROVEMENTS

FOR:
CROWN POINT COMMUNITY SCHOOL CORPORATION
CROWN POINT, INDIANA

GIBRALTAR DESIGN
9102 N. Meridian St., Ste. 300
Indianapolis, IN 46260
Homepage www.GibraltarDesign.com
Email info@GibraltarDesign.com
Phone 317.580.5777 Fax 317.580.5778

PROJECT 21-120
DATE 08/18/22
COORDINATED BY SM
DRAWN BY PF
CHECKED BY DJ

REGISTERED DAVID G. JANNEY NO. 10302590 STATE OF INDIANA PROFESSIONAL ENGINEER

REVISIONS

MARK	DATE	ISSUED FOR
AD-1	08/31/22	ADDENDUM NO. 1

DRAWING
ELECTRICAL NOTES & DIAGRAMS

PROJECT
CROWN POINT HIGH SCHOOL - ATHLETIC FIELDS AND SITE IMPROVEMENTS

SHEET
E-003

DP-1

TOTAL KW: 378.1 | ENCLOSURE: NEMA1 | PHASE: 3Φ | VOLTAGE: 277 / 480
MOUNTING: SURFACE | BUSSING: COPPER | FAULT CURRENT RATING: 65K AIC | MCB(AMPS): 600
FEEDER: 2 SETS - 4 #350 MCM & 1 #4 GRD. - 2½"C. | LOCATION: MECH RM

LOAD DESCRIPTION	C/B TRIP	C/B POLE	LOAD A	LOAD B	LOAD C	CCT. NO.	LOAD A	LOAD B	LOAD C	C/B TRIP	C/B POLE	LOAD DESCRIPTION
			33240			1	2	30090				
HP-1	200	3		33240		3	4		30090	200	3	HP-2
					33240	5	6					
			6011			7	8	17640				
POLE F1	30	3		6011		9	10		19616	125	3	FP-1 VIA XFMR
					6011	11	12					
			6011			13	14	7320				
POLE F2	30	3		6011		15	16		6820	50	3	FP-B VIA XFMR
					6011	17	18					
			6011			19	20	7320				
POLE F3	30	3		6011		21	22		6820	50	3	FP-B VIA XFMR
					6011	23	24					
			6011			25	26	8000				
POLE F4	30	3		6011		27	28		8000	50	3	FOOTBALL VIA XFMR
					6011	29	30					
			900			31	32					6PACE
PARKING LTG F1/F2	15	3		900		33	34					6PACE
					900	35	36					6PACE
						37	38					6PACE
6PD	60	3				39	40					6PACE
						41	42					6PACE
			58184	58184	58184			70770	71346	61478		

*PROVIDE WITH 100% RATED ELECTRONIC ADJUSTABLE TRIP MCB
NOTE: REFER TO GENERAL NOTE "B" FOR ADDITIONAL INFORMATION

A= 128,354
B= 129,530
C= 119,662
TOTAL= 378,146

HP-1

TOTAL KW: 99.7 | ENCLOSURE: NEMA1 | PHASE: 3Φ | VOLTAGE: 277 / 480
MOUNTING: SURFACE | BUSSING: COPPER | FAULT CURRENT RATING: 42K AIC | MLO(AMPS): 200
FEEDER: 4 #3/0 & 1 #6 GRD. - 2"C. | LOCATION: STORAGE

LOAD DESCRIPTION	C/B TRIP	C/B POLE	LOAD A	LOAD B	LOAD C	CCT. NO.	LOAD A	LOAD B	LOAD C	C/B TRIP	C/B POLE	LOAD DESCRIPTION
						1	2	3324				
ECH-2	15	3	3324			3	4		3324	15	3	ECH-2
					3324	5	6					
			3324			7	8	3324				
ECH-2	15	3		3324		9	10		3324	15	3	ECH-2
					3324	11	12					
			3324			13	14	3324				
ECH-2	15	3		3324		15	16		3324	15	3	ECH-2
					3324	17	18					
			3324			19	20					6PACE
ECH-2	15	3		3324		21	22					6PACE
					3324	23	24					6PACE
			3324			25	26					6PACE
ECH-2	15	3		3324		27	28					6PACE
					3324	29	30					6PACE
			3324			31	32					6PACE
ECH-2	15	3		3324		33	34					6PACE
					3324	35	36					6PACE
			3324			37	38					6PACE
ECH-2	15	3		3324		39	40					6PACE
					3324	41	42					6PACE
			23268	23268	23268			9972	9972	9972		

NOTE: REFER TO GENERAL NOTE "B" FOR ADDITIONAL INFORMATION

A= 33240
B= 33240
C= 33240
TOTAL= 99,720

HP-2

TOTAL KW: 88.5 | ENCLOSURE: NEMA1 | PHASE: 3Φ | VOLTAGE: 277 / 480
MOUNTING: SURFACE | BUSSING: COPPER | FAULT CURRENT RATING: 42K AIC | MLO(AMPS): 200
FEEDER: 4 #3/0 & 1 #6 GRD. - 2"C. | LOCATION: STORAGE

LOAD DESCRIPTION	C/B TRIP	C/B POLE	LOAD A	LOAD B	LOAD C	CCT. NO.	LOAD A	LOAD B	LOAD C	C/B TRIP	C/B POLE	LOAD DESCRIPTION
			1662			1	2	1662				
ECH-1	15	3		1662		3	4		1662	15	3	ECH-1
					1662	5	6					
ECH-4	25	1	4800			7	8	1662				
ECH-4	25	1		4800		9	10		1662	15	3	ECH-1
ECH-3	15	1			3000	11	12					1662
			5000			13	14	1662				
WH-1	25	3		5000		15	16		1662	15	3	ECH-1
					5000	17	18					1662
			5000			19	20	1662				
WH-1	25	3		5000		21	22		1662	15	3	ECH-1
					5000	23	24					1662
			1934			25	26	1662				
LIFT STATION	15	3		1934		27	28		1662	15	3	ECH-1
					1934	29	30					1662
6PACE						31	32	1662				
6PACE						33	34		1662	15	3	ECH-1
6PACE						35	36					1662
6PACE						37	38	1662				
6PACE						39	40		1662	15	3	ECH-1
6PACE						41	42					1662
			18456	18456	16656			11634	11634	11634		

NOTE: REFER TO GENERAL NOTE "B" FOR ADDITIONAL INFORMATION

A= 30,090
B= 30,090
C= 28,390
TOTAL= 88,470

PP-1

TOTAL KW: 63.8 | ENCLOSURE: NEMA-1 | PHASE: 3Φ | VOLTAGE: 120 / 208
MOUNTING: SURFACE | BUSSING: COPPER | FAULT CURRENT RATING: 22000 AIC | MCB(AMPS): 225
FEEDER: 4 #4/0 & 1 #4 GRD. - 2 1/2"C. | LOCATION: STORAGE

	LOAD DESCRIPTION	C/B TRIP	C/B POLE	LOAD A	LOAD B	LOAD C	CCT. NO.	LOAD A	LOAD B	LOAD C	C/B TRIP	C/B POLE	LOAD DESCRIPTION
	HAND DRYER	20	1	1600			1	2	600			20	1	FACP
	HAND DRYER	20	1		1600		3	4		600		20	1	FACP
	HAND DRYER	20	1			1600	5	6			400	20	1	CONV RECEPT
	HAND DRYER	20	1	1600			7	8	600			20	1	MDF
	HAND DRYER	20	1		1600		9	10		600		20	1	MDF
	HAND DRYER	20	1			1600	11	12			1500	20	1	HOT DOG
	CONV RECEPT	20	1	1000			13	14	1500			20	1	NACHO
	CONV RECEPT	20	1		1000		15	16		1600		20	1	COFFEE
	CONV RECEPT	20	1			600	17	18			1600	20	1	COCOA
	~~EXT RECEPT~~	~~20~~	~~1~~	800			19	20	1600			20	1	MICROWAVE
AD-1	DOA RECEPT	50			4160		21	22		800		20	1	CONV RECEPT
AD-1			2			4160	23	24			800	20	1	CONV RECEPT
AD-1	~~SCOREBRD~~	~~20~~	~~1~~	1500			25	26	800			20	1	CONV RECEPT
			2		1500		27	28		800		20	1	CONV RECEPT
	ROOF RECEPT	20	1			600	29	30			800	20	1	CONV RECEPT
	TEF-1	30	1	1920			31	32	800			20	1	CONV RECEPT
	TEF-2	25	1		1656		33	34		800		20	1	CONV RECEPT
	GEF-1	20	1			628	35	36			800	20	1	LTG
	EXIT SIGNS	20	1	20			37	38	800			20	1	LTG
	SCOREBOARD	20	1		1200		39	40		800		20	1	LTG
	SCOREBOARD	20	1			1200	41	42			800	20	1	LTG
AD-1	~~SCOREBOARD~~	~~20~~	~~1~~	~~1200~~			~~43~~	~~44~~	600			20	1	EXT LTG
AD-1	HAND DRYER	20	1		1600		45	46		200		20	1	EXT LTG EM
AD-1	HAND DRYER	20	1			1600	47	48			320	20	1	EXT LTG NL FLAG
AD-1	HAND DRYER	20	1	1600			49	50	700			20	1	PATH LTG 12AM
AD-1	HAND DRYER	20	1		1600		51	52		700		20	1	PATH LTG NL
AD-1	HAND DRYER	20	1			1600	53	54			1200	20	1	W8-1/RCP-1
	~~SPARE~~	~~20~~					55	56						6PACE
	6PARE	20	1				57	58						6PACE
	6PARE	20	1				59	60						6PACE
				11240	15916	13588			8000	6300	8200			

NOTE: REFER TO GENERAL NOTE "B" FOR ADDITIONAL INFORMATION

A= 19,240
B= 22,816
C= 21,788
TOTAL= 63,844

PP-B

TOTAL KW: 17.6 | ENCLOSURE: NEMA-1 | PHASE: 3Φ | VOLTAGE: 120 / 208
MOUNTING: SURFACE | BUSSING: COPPER | FAULT CURRENT RATING: 21000 AIC | MCB(AMPS): 100
FEEDER: 4 #2 & 1 #8 GRD. - 1 1/2"C. | LOCATION: PRESS BOX BLDG

LOAD DESCRIPTION	C/B TRIP	C/B POLE	LOAD A	LOAD B	LOAD C	CCT. NO.	LOAD A	LOAD B	LOAD C	C/B TRIP	C/B POLE	LOAD DESCRIPTION
PTAC-1	40		3120			1	2	4200			20	1	CONV RECEPT
		2		3120		3	4		400		20	1	CONV RECEPT
SOUND SYSTEM	20	1			1000	5	6			400	20	1	CONV RECEPT
SOUND SYSTEM	20	1	1000			7	8	400			20	1	CONV RECEPT
EXT LTG	20	1		300		9	10		400		20	1	CONV RECEPT
LTG	20	1			500	11	12			400	20	1	EXT RECEPT
			1000			13	14	600			20	1	LV SERVICE
SIGN	20	3		1000		15	16		600		20	1	LV SERVICE
					1000	17	18				20	1	6PARE
TICKET PWR/LTG	20	1	1000			19	20				20	1	6PARE
TICKET PWR/LTG	20	1		1000		21	22				20	1	6PARE
6PACE						23	24				20	1	6PARE
6PACE						25	26				20	1	6PARE
6PACE						27	28				20	1	6PARE
6PACE						29	30				20	1	6PARE
6PACE						31	32				20	1	6PARE
6PACE						33	34				20	1	6PARE
6PACE						35	36				20	1	6PARE
6PACE						37	38				20	1	6PARE
6PACE						39	40				20	1	6PARE
6PACE						41	42				20	1	6PARE
			6120	5420	2500			1400	1400	800			

NOTE: REFER TO GENERAL NOTE "B" FOR ADDITIONAL INFORMATION

A= 7,320
B= 6,820
C= 3,300
TOTAL= 17,640

PP-S

TOTAL KW: 17.6 | ENCLOSURE: NEMA-1 | PHASE: 3Φ | VOLTAGE: 120 / 208
MOUNTING: SURFACE | BUSSING: COPPER | FAULT CURRENT RATING: 22000 AIC | MCB(AMPS): 100
FEEDER: 4 #2 & 1 #8 GRD. - 1 1/2"C. | LOCATION: PRESS BOX BLDG

LOAD DESCRIPTION	C/B TRIP	C/B POLE	LOAD A	LOAD B	LOAD C	CCT. NO.	LOAD A	LOAD B	LOAD C	C/B TRIP	C/B POLE	LOAD DESCRIPTION
PTAC-1	40		3120			1	2	4200			20	1	CONV RECEPT
		2		3120		3	4		400		20	1	CONV RECEPT
SOUND SYSTEM	20	1			1000	5	6			400	20	1	CONV RECEPT
SOUND SYSTEM	20	1	1000			7	8	400			20	1	CONV RECEPT
EXT LTG	20	1		300		9	10		400		20	1	CONV RECEPT
LTG	20	1			500	11	12			400	20	1	EXT RECEPT
			1000			13	14	600			20	1	LV SERVICE
SIGN	20	3		1000		15	16		600		20	1	LV SERVICE
					1000	17	18				20	1	6PARE
TICKET PWR/LTG	20	1	1000			19	20				20	1	6PARE
TICKET PWR/LTG	20	1		1000		21	22				20	1	6PARE
6PACE						23	24				20	1	6PARE
6PACE						25	26				20	1	6PARE
6PACE						27	28				20	1	6PARE
6PACE						29	30				20	1	6PARE
6PACE						31	32				20	1	6PARE
6PACE						33	34				20	1	6PARE
6PACE						35	36				20	1	6PARE
6PACE						37	38				20	1	6PARE
6PACE						39	40				20	1	6PARE
6PACE						41	42				20	1	6PARE
			6120	5420	2500			1400	1400	800			

NOTE: REFER TO GENERAL NOTE "B" FOR ADDITIONAL INFORMATION

A= 7,320
B= 6,820
C= 3,300
TOTAL= 17,640

GIBRALTAR DESIGN
ARCHITECTURE • ENGINEERING • INTERIOR DESIGN

MILLIES ENGINEERING GROUP
(219) 924-5400
www.milliesengineeringgroup.com

PROJECT

CROWN POINT HIGH SCHOOL - ATHLETIC FIELDS AND SITE IMPROVEMENTS

FOR:
CROWN POINT COMMUNITY SCHOOL CORPORATION
CROWN POINT, INDIANA

GIBRALTAR DESIGN
9102 N. Meridian St., Ste. 300
Indianapolis, IN 46260
Homepage www.GibraltarDesign.com
Email info@GibraltarDesign.com
Phone 317.580.5777 Fax 317.580.5778

PROJECT 21-120
DATE 08/18/22
COORDINATED BY SM
DRAWN BY PF
CHECKED BY DJ

DAVID G. JANNEY REGISTERED NO. 10302590 STATE OF INDIANA PROFESSIONAL ENGINEER

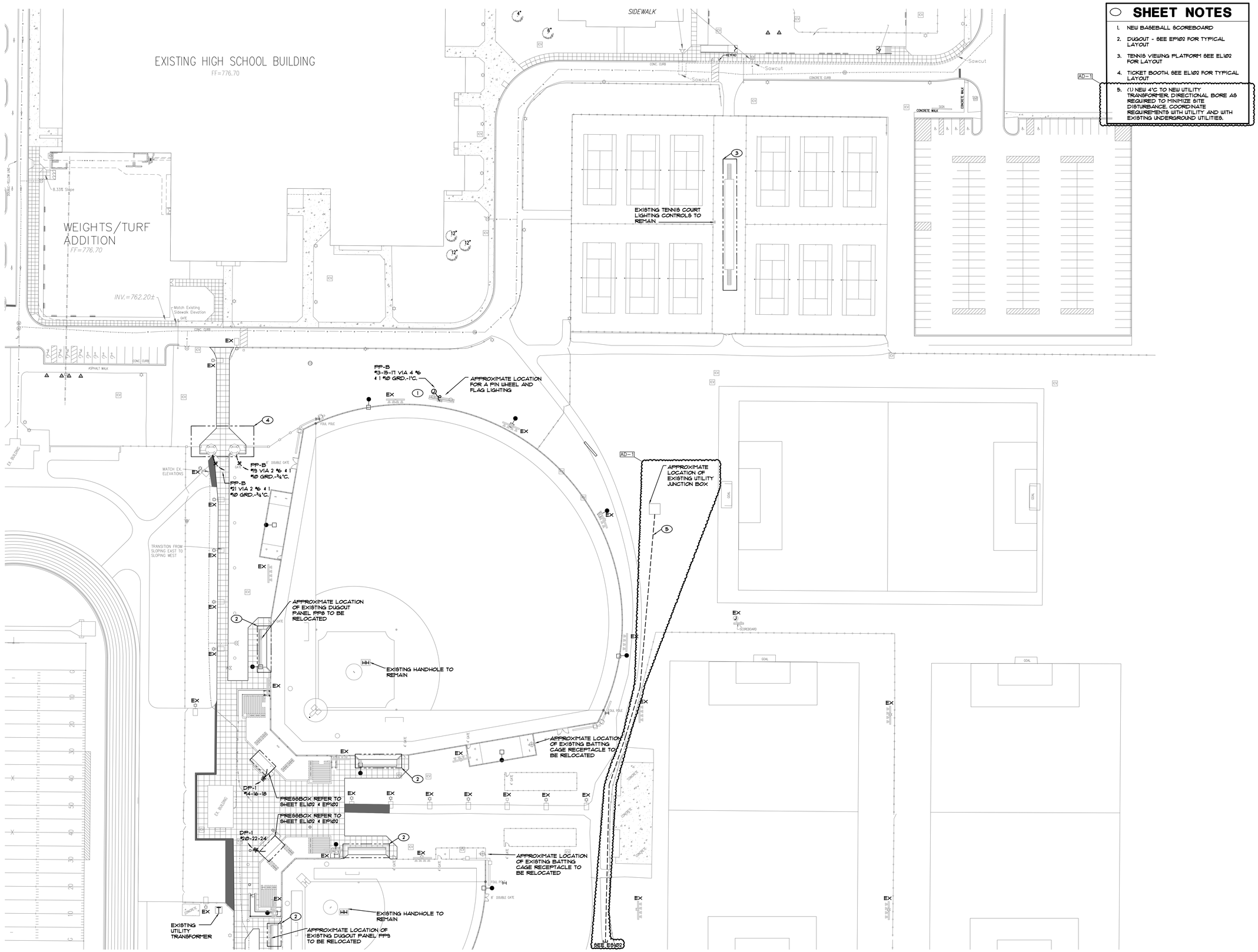
REVISIONS

MARK	DATE	ISSUED FOR
AD-1	08/31/22	ADDENDUM NO. 1

DRAWING
ELECTRICAL SCHEDULES

PROJECT
CROWN POINT HIGH SCHOOL - ATHLETIC FIELDS AND SITE IMPROVEMENTS

SHEET
E-005



SHEET NOTES

1. NEW BASEBALL SCOREBOARD
2. DUGOUT - SEE EP102 FOR TYPICAL LAYOUT
3. TENNIS VIEWING PLATFORM SEE EL102 FOR LAYOUT
4. TICKET BOOTH. SEE EL102 FOR TYPICAL LAYOUT
5. (1) NEW 4"C TO NEW UTILITY TRANSFORMER. DIRECTIONAL BORE AS REQUIRED TO MINIMIZE SITE DISTURBANCE. COORDINATE REQUIREMENTS WITH UTILITY AND WITH EXISTING UNDERGROUND UTILITIES.

PARTIAL ELECTRICAL SITE PLAN

SCALE: 1" = 40'-0"

NORTH

GIBRALTAR DESIGN
ARCHITECTURE • ENGINEERING • INTERIOR DESIGN

MILLIES ENGINEERING GROUP
(219) 924-5400
www.milliesengineeringgroup.com

PROJECT

CROWN POINT HIGH SCHOOL - ATHLETIC FIELDS AND SITE IMPROVEMENTS

FOR:
CROWN POINT COMMUNITY SCHOOL CORPORATION
CROWN POINT, INDIANA

GIBRALTAR DESIGN
9102 N. Meridian St., Ste. 300
Indianapolis, IN 46260
Homepage www.GibraltarDesign.com
Email info@GibraltarDesign.com
Phone 317.580.5777 Fax 317.580.5778

PROJECT 21-120
DATE 08/18/22
COORDINATED BY SM
DRAWN BY PF
CHECKED BY DJ

DAVID G. JANNEY REGISTERED NO. 10302590 STATE OF INDIANA PROFESSIONAL ENGINEER

REVISIONS

MARK	DATE	ISSUED FOR
AD-1	08/31/22	ADDENDUM NO.1

DRAWING
PARTIAL ELECTRICAL SITE PLAN

PROJECT
CROWN POINT HIGH SCHOOL - ATHLETIC FIELDS AND SITE IMPROVEMENTS

SHEET
ES101

SHEET NOTES

1. NEW SOFTBALL FIELD SCOREBOARD
2. DUGOUT - SEE EP1Ø2 FOR TYPICAL LAYOUT
3. TICKET BOOTH - SEE EL1Ø2 FOR TYPICAL LAYOUT.
4. (1) NEW 4'C TO NEW UTILITY TRANSFORMER. DIRECTIONAL BORE AS REQUIRED TO MINIMIZE SITE DISTURBANCE. COORDINATE REQUIREMENTS WITH UTILITY AND WITH EXISTING UNDERGROUND UTILITIES.

FLAG POLE LIGHTING VERIFY LOCATION AND LAYOUT IN FIELD. CONNECT TO FP-1 CIRCUIT #48 VIA 2 #8 & 1 #10 GRD.-¾"C.

SEE E61Ø2

NEW CONCESSIONS BUILDING - REFER TO EP1Ø1 AND EL1Ø1

APPROXIMATE LOCATION OF NEW PAD MOUNTED UTILITY XFMR.

REMOVE EXISTING SHOT PUT

TRANSITION FROM SLOPING EAST TO SLOPING WEST

FP-8 #13-15-17 VIA 4 #6 & 1 #10 GRD.-1"C.

FP-9 #21 VIA 2 #6 & 1 #10 GRD.-¾"C.

FP-8 #13 VIA 2 #6 & 1 #10 GRD.-¾"C.

LIFT STATION

FP-2 #25-21-29

UTILIZE 2 #6 & 1 #10 GRD.-1"C. FOR TYPE EC SITE LIGHTING - TYPICAL

RELOCATE FH TO 3' BEHIND SIDEWALK

FP-1 #39 VIA 2 #6 & 1 #10 GRD.-1"C.

NEW SCOREBOARD

NEW ARTIFICIAL TURF FOOTBALL/SOCCER FIELD

NEW BAND TOWER

BOTH SETS VIA 4 #6 & 1 #10 GRD.-1"C.

DP-1 #31-33-35

DP-1 #1-9-11

F1

DEPRESS THE CURB FOR 8' ACROSS AREA SHOWN

PRE86 BOX POWER (PREFAB) WITH 80A FUSED DISCONNECT AND 30KVA XFMR

DP-1 #26-28-30 VIA 3 #4 & 1 #8 GRD.-1¼"C.

DP-1 #25-27-29 VIA 4 #4 & 1 #8 GRD.-1¼"C.

F4

DP-1 #19-21-23 VIA 4 #4 & 1 #8 GRD.-1¼"C.

F3

F2

DP-1 #31-33-35

DP-1 #13-15-17

BOTH SETS VIA 4 #6 & 1 #10 GRD.-1"C.

FP-1 #43

NEW SCOREBOARD

FP-1 #41 VIA 2 #3 & 1 #8 GRD.-1¼"C.

NEW SCOREBOARD

850' ~ 6" PERFORATED PVC @ 0.10%

EXISTING POND

CLEANOUT

850' ~ 6" PERFORATED PVC @ 0.10%

CLEANOUT

Proposed Split Rail Fence

Proposed Split Rail Fence

WEST 129th AVENUE

PARTIAL ELECTRICAL SITE PLAN
SCALE: 1" = 40'-0"

NORTH

GIBRALTAR DESIGN

ARCHITECTURE • ENGINEERING • INTERIOR DESIGN

MILLIES ENGINEERING GROUP
(219) 924-5400
www.milliesengineeringgroup.com

PROJECT

CROWN POINT HIGH SCHOOL - ATHLETIC FIELDS AND SITE IMPROVEMENTS

FOR:
CROWN POINT COMMUNITY SCHOOL CORPORATION
CROWN POINT, INDIANA

GIBRALTAR DESIGN
9102 N. Meridian St., Ste. 300
Indianapolis, IN 46260
Homepage www.GibraltarDesign.com
Email info@GibraltarDesign.com
Phone 317.580.5777 Fax 317.580.5778

PROJECT 21-120
DATE 08/18/22
COORDINATED BY SM
DRAWN BY PF
CHECKED BY DJ

REGISTERED DAVID G. JANKEY NO. 10302590 STATE OF INDIANA PROFESSIONAL ENGINEER

REVISIONS

MARK	DATE	ISSUED FOR
AD-1	08/31/22	ADDENDUM NO.1

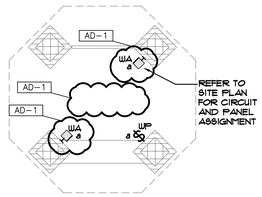
DRAWING
PARTIAL ELECTRICAL SITE PLAN

PROJECT
CROWN POINT HIGH SCHOOL - ATHLETIC FIELDS AND SITE IMPROVEMENTS

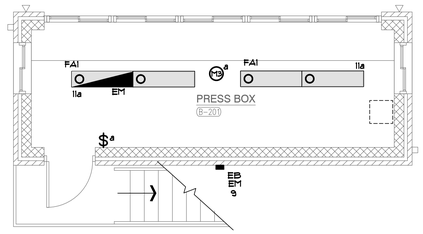
SHEET
ES102

GENERAL NOTES

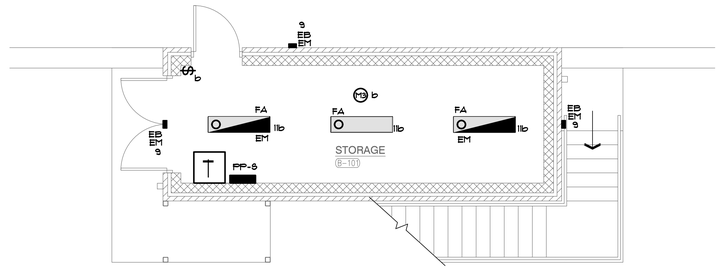
1. INTERIOR AND EXTERIOR LIGHTING IN THE SOFTBALL BUILDING SHALL BE CONNECTED TO THE CIRCUITS INDICATED IN PANEL PP-S. EXTERIOR LIGHTING SHALL BE PROVIDED WITH INTEGRAL COLD TEMPERATURE BATTERIES AND PHOTOCELL CONTROL.
2. INTERIOR AND EXTERIOR LIGHTING IN THE BASEBALL BUILDING SHALL BE CONNECTED TO THE CIRCUITS INDICATED IN PANEL PP-B. EXTERIOR LIGHTING SHALL BE PROVIDED WITH INTEGRAL COLD TEMPERATURE BATTERIES AND PHOTOCELL CONTROL.



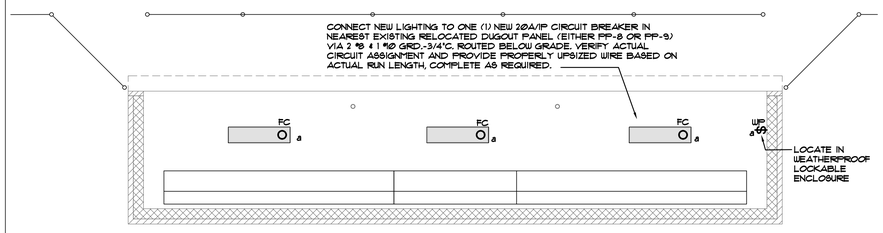
3 ELECTRICAL LIGHTING TICKET BOOTH PLAN
SCALE: 1/4" = 1'-0"



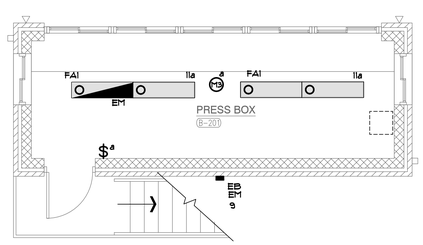
2 ELECTRICAL LIGHTING SOFTBALL PRESS BOX UPPER LEVEL PLAN
SCALE: 1/4" = 1'-0"



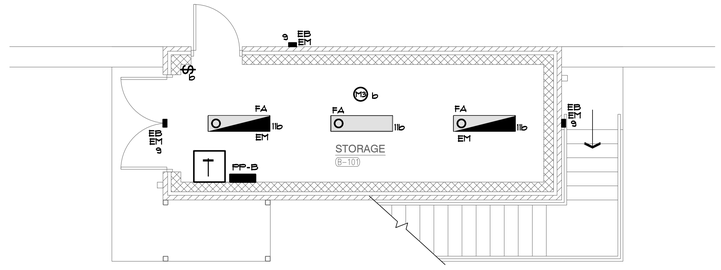
1 ELECTRICAL LIGHTING SOFTBALL PRESS BOX LOWER LEVEL PLAN
SCALE: 1/4" = 1'-0"



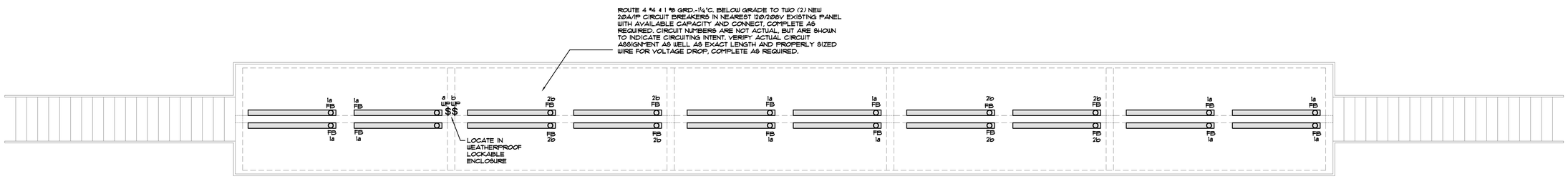
6 ELECTRICAL LIGHTING TYPICAL DUGOUT PLAN
SCALE: 1/4" = 1'-0"



5 ELECTRICAL LIGHTING BASEBALL PRESS BOX UPPER LEVEL PLAN
SCALE: 1/4" = 1'-0"



4 ELECTRICAL LIGHTING BASEBALL PRESS BOX LOWER LEVEL PLAN
SCALE: 1/4" = 1'-0"



7 ELECTRICAL LIGHTING TENNIS PLATFORM PLAN
SCALE: 1/4" = 1'-0"

GIBRALTAR
DESIGN
ARCHITECTURE • ENGINEERING • INTERIOR DESIGN
MILLIES ENGINEERING GROUP
(219) 924-5400
www.milliesengineeringgroup.com

PROJECT
CROWN POINT HIGH SCHOOL - ATHLETIC FIELDS AND SITE IMPROVEMENTS

FOR:
CROWN POINT COMMUNITY SCHOOL CORPORATION
CROWN POINT, INDIANA

GIBRALTAR DESIGN
9102 N. Meridian St., Ste. 300
Indianapolis, IN 46260
Homepage www.GibraltarDesign.com
Email info@GibraltarDesign.com
Phone 317.580.5777 Fax 317.580.5778

PROJECT 21-120
DATE 08/18/22
COORDINATED BY SM
DRAWN BY PF
CHECKED BY DJ

DAVID G. JANNEY REGISTERED NO. 10302590 STATE OF INDIANA PROFESSIONAL ENGINEER

REVISIONS

MARK	DATE	ISSUED FOR
AD-1	08/31/22	ADDENDUM NO. 1

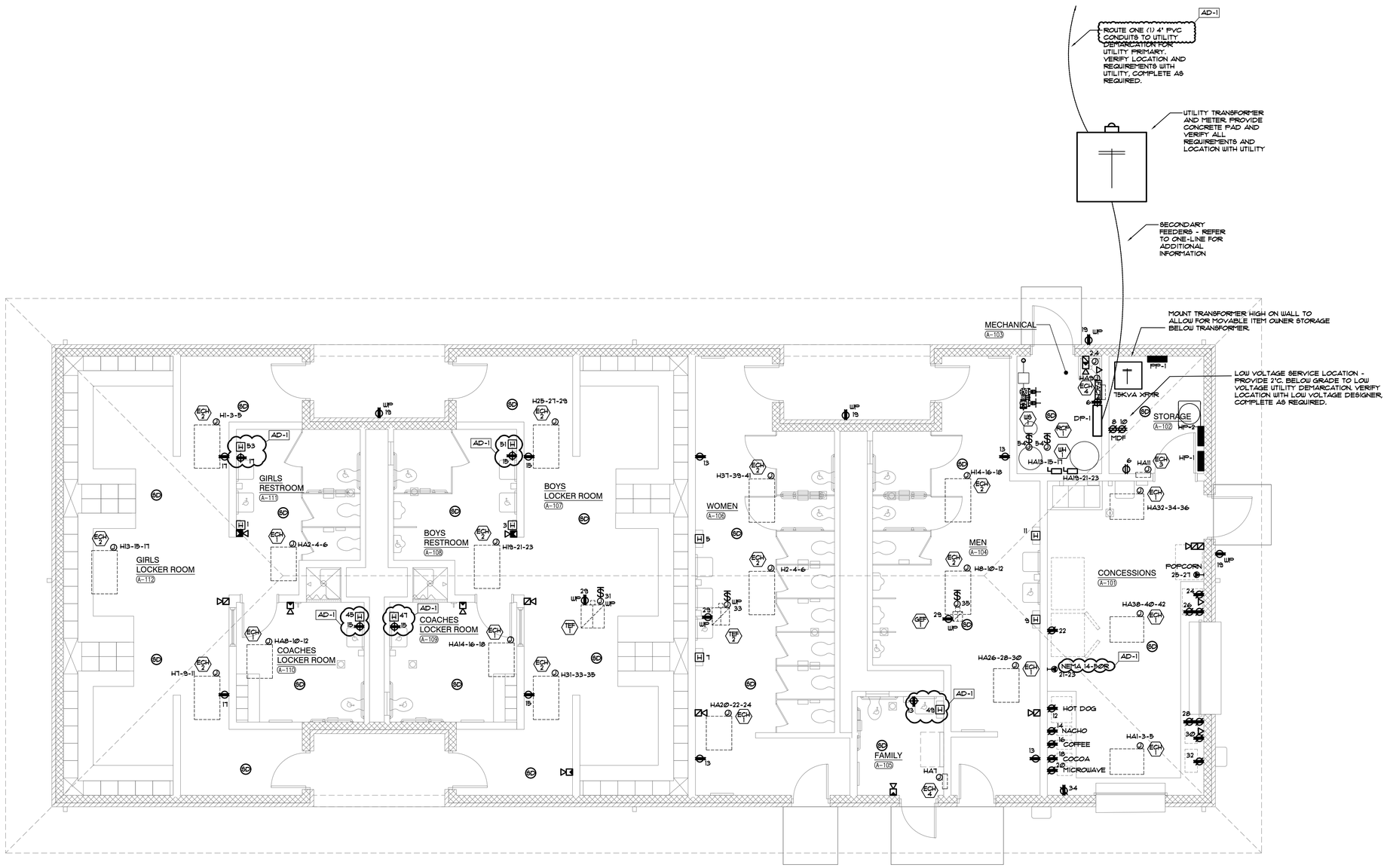
DRAWING
ELECTRICAL LIGHTING PRESS BOX, TICKET BOOTH & TENNIS PLATFORM PLANS

PROJECT
CROWN POINT HIGH SCHOOL - ATHLETIC FIELDS AND SITE IMPROVEMENTS

SHEET
EL102

GENERAL NOTES

1. DEVICES AND EQUIPMENT WITH A CIRCUIT TAG WITH AN 'H' PREFIX SHALL BE CONNECTED TO THE CIRCUITS INDICATED IN PANEL HP-1. DEVICES AND EQUIPMENT WITH A CIRCUIT TAG WITH AN 'HA' PREFIX SHALL BE CONNECTED TO THE CIRCUITS INDICATED IN PANEL HP-2.
2. DEVICES AND EQUIPMENT WITH A STANDARD CIRCUIT TAG SHALL BE CONNECTED TO THE CIRCUITS INDICATED IN PANEL FP-1.
3. VERIFY AND PROVIDE ROUGH-IN FOR ALL LOW VOLTAGE DEVICES AND EQUIPMENT. VERIFY REQUIREMENTS WITH LOW VOLTAGE DESIGNER DRAWINGS, COMPLETE AS REQUIRED.



ELECTRICAL POWER PLAN
SCALE: 1/4" = 1'-0"

NORTH

GIBRALTAR
DESIGN
ARCHITECTURE • ENGINEERING • INTERIOR DESIGN
MILLIES ENGINEERING GROUP
(219) 934-5400
www.milliesengineeringgroup.com

PROJECT

CROWN POINT HIGH SCHOOL - ATHLETIC FIELDS AND SITE IMPROVEMENTS

FOR:
CROWN POINT COMMUNITY SCHOOL CORPORATION
CROWN POINT, INDIANA

GIBRALTAR DESIGN
9102 N. Meridian St., Ste. 300
Indianapolis, IN 46260
Homepage www.GibraltarDesign.com
Email Info@GibraltarDesign.com
Phone 317.580.5777 Fax 317.580.5778

PROJECT 21-120
DATE 08/18/22
COORDINATED BY SM
DRAWN BY PF
CHECKED BY DJ

DAVID G. JANNEY REGISTERED NO. 10302590 STATE OF INDIANA PROFESSIONAL ENGINEER

REVISIONS

MARK	DATE	ISSUED FOR
AD-1	08/31/22	ADDENDUM NO.1

DRAWING
ELECTRICAL POWER PLAN

PROJECT
CROWN POINT HIGH SCHOOL - ATHLETIC FIELDS AND SITE IMPROVEMENTS

SHEET
EP101