



September 19, 2022

Hopkins County Schools  
Ms. Amy Smith, Superintendent  
320 South Seminary Street  
Madisonville, KY 42431

RE: Proposal for Geotechnical Investigations & Quality Assurance Testing  
Madisonville North Hopkins High School & Hopkins County Central High School  
New Auxiliary Gymnasium Additions  
Madisonville, Kentucky

Ms. Smith,

AEI is providing this proposal to Hopkins County Schools for a geotechnical exploration and quality assurance testing for the proposed Madisonville North Hopkins High School & Hopkins County Central High School new auxiliary gymnasium additions project in Madisonville, KY.

### **Geotechnical Scope**

Five (5) soil test borings and five (5) soundings are proposed for both sites. Three (3) borings and three (3) soundings will be performed at the Madisonville North Hopkins High School site and will extend to twenty (20) feet or auger refusal, whichever occurs first. The remaining two (2) borings and two (2) soundings will be performed at the Hopkins County Central High School site and will extend to twenty (20) feet or auger refusal, whichever occurs first. The soil test borings and soundings will be drilled within the proposed additions. Standard penetration tests will be performed in the soil test boring at 2 ½-foot intervals in the upper ten feet and five-foot intervals thereafter. Undisturbed samples will be obtained at selected depth intervals representative of the predominant soil horizons. The borings will be backfilled with auger cuttings upon completion of drilling and pavement locations will be patched with asphalt patch.

In our laboratory, moisture content tests and visual soil classification tests will be performed on all recovered samples. Samples representative of the predominant soil types will be subjected to grain size analysis, Atterberg limits, standard Proctor, California Bearing Ratio (CBR) and soil unconfined compressive strength.

A geotechnical report will be prepared upon completion of drilling activities. The final report will provide site and project descriptions, site geology, results of the exploration and laboratory testing and recommendations relative to design and construction of the structures including lateral earth pressure coefficients for use by the Structural Engineer for design of shoring systems. Allowable soil and rock bearing capacity will be provided as appropriate based on the proposed foundation grades. Typed boring logs and boring layouts will be provided in the Appendices to the report.

The field investigation should be completed within **six (6) to eight (8) weeks** of your notice to proceed (provided weather is not a factor), with the lab testing and submission of the final report within 21 days after completion of field work.



### **Quality Assurance / Quality Control Scope (SI&T)**

AEI will provide a civil engineering technician for part-time special testing and inspection services as requested for the Madisonville North Hopkins High School and Hopkins County Central High School new auxiliary gymnasium additions project in Madisonville, Kentucky. The inspector will observe and test earthwork, concrete placement activities, review reinforcing steel, masonry construction and structural steel framing. Molding of compressive strength cylinders, air content testing and slump testing will also be performed in accordance with the current edition of the Kentucky Building Code. Structural steel framing will be reviewed in relative accordance with the Statement of Special Inspections and the Kentucky Building Code. For estimation purposes, it has been assumed that fabrication shops utilized for the project are certified or accredited as applicable and will not require separate inspections.

Discrepancies identified during special inspections and/or testing will be immediately reported to the Contractor. The Structural Engineer and/ or Architect will then be contacted for further direction with regard to found discrepancies. Discrepancies will be documented in daily field reports in addition to corrective actions taken by the Contractor to remediate deficient work or materials per direction of the Structural Engineer.

In our in-house laboratory concrete cylinders and masonry specimens will be broken. Other lab tests will be performed as required by the project plans and specifications in our lab.

Daily field reports will be prepared prior to leaving the site and will be reviewed by our lab manager and distributed on a weekly basis. A final letter of Special Inspections will be provided upon completion of construction items requiring special inspections.

Please refer to the attached completed form for each of the proposed fees for the geotechnical exploration and construction testing tasks. Please let me know if you have questions or need more information.

Respectfully,  
AMERICAN ENGINEERS, INC.

A handwritten signature in blue ink that reads "Dusty Barrett".

Dusty Barrett, PE, PMP  
Director of Geotechnical Services



**Madisonville North Hopkins High School & Hopkins County Central High School  
New Auxiliary Gymnasium Additions  
Madisonville, Kentucky**

1. Mobilization	\$3,200
2. Lodging and Per Diem 2 men X 4 days @ \$200/man/day	\$1,600
3. Soil Test Borings 100 feet @ \$25/foot	\$2,500
4. Rockline Soundings 100 feet @ \$20/foot	\$2,000
5. Undisturbed Tube Samples 5 tubes @ \$75/tube	\$375
6. Bulk Samples 2 samples @ \$60/sample	\$120
7. Natural Moisture and Visual Soil Classification 30 tests @ \$10/test	\$300
8. Atterberg Limits 5 tests @ \$75/test	\$375
9. Grain Size 5 tests @ \$130/test	\$650
10. Standard Proctor Test 2 tests @ \$200/test	\$400
11. California Bearing Ratio (CBR) 2 tests @ \$275/test	\$550
12. Soil Unconfined Compressive Strength 5 tests @ \$65/test	\$325
13. Report Preparation/ Field Supervision/ Project Management	
a. Professional Engineer: 6 hours @ \$210/hour	\$1,260
b. Engineer-In-Training: 32 hours @ \$135/hour	\$4,320
14. CADD Technician (Typed Logs and Boring Layout) 3 hours @ \$65/hour	\$195
<b>Total</b>	<b>\$18,170</b>

**\*Additional Mobilization fee of \$2,800 will be charged if both sites aren't accessible within the same mobilization.**

## REQUEST FOR PROPOSAL

### PROPOSAL FORM

#### Percentage Based Fee

Proposals will be evaluated based on a not to exceed percentage of construction value fee. Separate fees are requested for Geotechnical Investigation and Report, and for Special Inspections, Quality Assurance and Quality Control. Fees shall include all work defined in the scope of work as outlined in this request for proposal including work required by the Kentucky Building Code that may not be specifically listed herein. Special project conditions requiring work beyond scope defined above shall be clearly identified by the testing agency and included in proposal.

Provide fees and percentages on this proposal form. Include this proposal form with only the not to exceed fee and the percentage, which is the basis of the fee. Proposals which list fee in any other format may be rejected. This request for proposal must be included for a proposal to be considered.

Provide unit prices for all aspects of geotechnical investigation, special inspections and quality control testing.

Proposals shall be submitted to Sherman Carter Barnhart by 5:00 p.m. 7 days after date of this request. The selected firm will be notified within one month after the due date.

~~Geotechnical Investigation and Report are due 21 days from receipt of notice to proceed.~~ -DB  
Please see page 1 for estimated Geotechnical Investigation and Report schedule.

#### Fees and Fee Percentages

Geotechnical Investigation and Report -

Proposed Fee: \$18,170.00      Percent of Construction Budget: 0.18 %

Special inspections, Quality Assurance and Quality Control Testing Services –

Proposed Fee: \$50,000.00      Percent of Construction Budget: 0.5 %

The payment for the services listed above shall not exceed the percentage-based fee listed on this fee form. Change orders for work, which do not affect Special Inspections or Quality Control will not be applicable to the percentage-based fee. Payment for the Geotechnical Report shall be made upon completion and acceptance during the Design Development phase. No payments for Special Inspections are anticipated during the Construction Document phase of design. Remaining payments shall be made as submitted on a monthly basis during construction.

Please provide signatures and dates below to approve and accept this proposal.

Geotechnical Engineer: Dusty Barnett      Date: 09/19/2022

Proposal Accepted By: \_\_\_\_\_ Date: \_\_\_\_\_

Hopkins County Schools  
New Auxiliary Gymnasiums  
North and Central High Schools  
SCB Project No. 2221