

VILLAGE OF BUFFALO GROVE  
PROFESSIONAL SERVICES AGREEMENT  
LAKE COOK ROAD WEST PHASE I & II ENGINEERING

**THIS AGREEMENT** is dated as of the 20th day of June 2022 ("**Agreement**") and is by and between the **VILLAGE OF BUFFALO GROVE**, an Illinois home rule municipal corporation ("**Village**") and the Consultant identified in Subsection 1A below.

**IN CONSIDERATION OF** the recitals and the mutual covenants and agreements set forth in this Agreement, and pursuant to the Village's statutory and home rule powers, the parties agree as follows:

**SECTION 1. CONSULTANT.**

**A. Engagement of Consultant.** The Village desires to engage the Consultant identified below to provide all necessary professional consulting services and to perform the work in connection with the project identified below:

Civiltech Engineering, Inc. ("Consultant")  
Two Pierce Place, Suite 1400  
Itasca, IL 60143  
Telephone: (630) 773-3900  
Email: JVana@civiltechinc.com

**B. Project Description.** The Consultant shall provide Engineering Services for Lake Cook Road West Phase I & II.

**C. Representations of Consultant.** The Consultant has submitted to the Village a description of the services to be provided by the Consultant, a copy of which is attached as Exhibit B to this Agreement ("Services"). The Consultant represents that it is financially solvent, has the necessary financial resources, and is sufficiently experienced and competent to perform and complete the professional consulting services set forth in Exhibit B in a manner consistent with the standards of professional practice by recognized consulting firms providing services of a similar nature.

**SECTION 2. SCOPE OF SERVICES.**

- A. **Retention of the Consultant.** The Village retains the Consultant to perform, and the Consultant agrees to perform, the Services.
- B. **Services.** The Consultant shall provide the Services pursuant to the terms and conditions of this Agreement.
- C. **Commencement.** Time of Performance. The Consultant shall commence the Services immediately upon receipt of written notice from the Village that this Agreement has been fully executed by the Parties (the "Commencement Date"). The Consultant shall diligently and continuously prosecute the Services until the completion of the Work.,
- D. **Reporting.** The Consultant shall regularly report to the Public Works Director ("Director"), or his/her designee, regarding the progress of the Services during the term of this Agreement.

### **SECTION 3. COMPENSATION AND METHOD OF PAYMENT.**

- A. **Agreement Amount.** The total amount billed for the Services during the term of this Agreement shall not exceed the amount identified in the Schedule of Prices section in Exhibit A, unless amended pursuant to Subsection 8A of this Agreement.
- B. **Invoices and Payment.** The Firm shall submit invoices to the Village for all Services and subcontractor services monthly. The Invoices shall be in a Village approved and itemized format for those portions of the Services performed and completed by the Firm. The amount billed in any such invoice shall be based on the method of payment set forth in Exhibit B. The Village shall pay to the Firm the amount billed pursuant to the Illinois Local Government Prompt Payment Act (50 ILCS 505/1 et seq.)
- C. **Records.** The Consultant shall maintain records showing actual time devoted and costs incurred and shall permit the authorized representative of the Village to inspect and audit all data and records of the Consultant for work done under the Agreement. The records shall be made available to the Village at reasonable times during the Agreement period, and for three years after the termination of the Agreement.
- D. **Claim in Addition to Agreement Amount.** if the Consultant wishes to make a claim for additional compensation as a result of action taken by the Village, the Consultant shall provide written notice to the Village of such claim within 7 calendar days after occurrence of such action as provided by Subsection 8.D. of this Agreement, and no claim for additional compensation shall be valid unless made in accordance with this Subsection. Any changes in this Agreement Amount shall be valid only upon written amendment pursuant to Subsection 8.A. of this Agreement. Regardless of the decision of the Village relative to a claim submitted by the Consultant, the Consultant shall proceed with all of the Services required to complete the project under this Agreement as determined by the Village without interruption.

### **SECTION 3. COMPENSATION AND METHOD OF PAYMENT (cont.)**

- E. **Taxes, Benefits and Royalties.** The Agreement Amount includes all applicable federal, state, and local taxes of every kind and nature applicable to the Services as well as all taxes, contributions, and premiums for unemployment insurance, old age or retirement benefits, pensions, annuities, or similar benefits and all costs, royalties and fees arising from the use on, or the incorporation into, the Services, of patented or copyrighted equipment, materials, supplies, tools, appliances, devices, processes, or inventions. All claim or right to claim additional compensation by reason of the payment of any such tax, contribution, premium, costs, royalties, or fees is hereby waived and released by Consultant.
  
- F. **Final Acceptance.** The Services, or, if the Services are to be performed in separate phases, each phase of the Services, shall be considered complete on the date of final written acceptance by the Village of the Services or each phase of the Services, as the case may be, which acceptance shall not be unreasonably withheld or delayed.

### **SECTION 4. PERSONNEL SUBCONTRACTORS.**

- A. **Key Project Personnel.** The Key Project Personnel identified in Exhibit B shall be primarily responsible for carrying out the Services on behalf of the Consultant. The Key Project Personnel shall not be changed without the Village's prior written approval.
  
- B. **Availability of Personnel.** The Consultant shall provide all personnel necessary to complete the Services including, without limitation, any Key Project Personnel identified in this Agreement. The Consultant shall notify the Village as soon as practicable prior to terminating the employment of, reassigning, or receiving notice of the resignation of, any Key Project Personnel. The Consultant shall have no claim for damages and shall not bill the Village for additional time and materials charges as the result of any portion of the Services which must be duplicated or redone due to such termination or for any delay or extension of the Time of Performance as a result of any such termination, reassigning, or resignation.

#### **SECTION 4. PERSONNEL SUBCONTRACTORS (cont.)**

- C. **Approval and Use of Subcontractors.** The Consultant shall perform the Services with its own personnel and under the management, supervision, and control of its own organization unless otherwise approved by the Village in writing. All subcontractors and subcontracts used by the Consultant shall be acceptable to, and approved in advance by, the Village. The Village's approval of any subcontractor or subcontract shall not relieve the Consultant of full responsibility and liability for the provision, performance, and completion of the Services as required by the Agreement. All Services performed under any subcontract shall be subject to all of the provisions of this Agreement in the same manner as if performed by employees of the Consultant. For purposes of this Agreement, the term "Consultant" shall be deemed also to refer to all subcontractors of the Consultant, and every subcontract shall include a provision binding the subcontractor to all provisions of this Agreement.
- D. **Removal of Personnel and Subcontractors.** If any personnel or subcontractor fails to perform the Services in a manner satisfactory to the Village, the Consultant shall immediately upon notice from the Village remove and replace such personnel or subcontractor. The Consultant shall have no claim for damages, for compensation in excess of the amount contained in this Agreement or for a delay or extension of the Time of Performance as a result of any such removal or replacement. The Firm shall employ competent staff and shall discharge, at the request of the Village Manager, any incompetent, unfaithful, abusive or disorderly staff or subcontractor in its employ.

#### **SECTION 5. CONFIDENTIAL INFORMATION.**

- A. **Confidential Information.** The term "Confidential Information" shall mean information in the possession or under the control of the Village relating to the technical, business or corporate affairs of the Village; Village property; user information, including, without limitation, any information pertaining to usage of the Village's computer system, including and without limitation, any information obtained from server logs or other records of electronic or machine readable form; and the existence of, and terms and conditions of, this Agreement. Village Confidential Information shall not include information that can be demonstrated: (i) to have been rightfully in the possession of the Consultant from a source other than the Village prior to the time of disclosure of said information to the Consultant under this Agreement ("Time of Disclosure"); (ii) to have been in the public domain prior to the Time of Disclosure; (iii) to have become part of the public domain after the Time of Disclosure by a publication or by any other means except an unauthorized act or omission or breach of this Agreement on the part of the Consultant or the Village; or (iv) to have been supplied to the Consultant after the Time of Disclosure without restriction by a third party who is under no obligation to the Village to maintain such information in confidence.
- B. **No Disclosure of Confidential Information by the Consultant.** The Consultant acknowledges that it shall, in performing the Services for the Village under this Agreement, have access to or be directly or indirectly exposed to Confidential Information. The Consultant shall hold confidential all Confidential Information and shall not disclose or use such Confidential Information without express prior written consent of the Village. The Consultant shall use reasonable measures at least as strict as those the Consultant uses to protect its own confidential information. Such measures shall include, without limitation, requiring employees and subcontractors of the Consultant to execute a non-disclosure agreement before obtaining access to Confidential Information.

## **SECTION 6. WARRANTY; INDEMNIFICATION; INSURANCE**

- A. **Warranty of Services.** The Consultant warrants that the Services shall be performed in accordance with the highest standards of professional practice, care, and diligence practiced by recognized consulting firms in performing services of a similar nature in existence at the Time of Performance, The warranty expressed shall be in addition to any other warranties expressed in this Agreement, or expressed or implied by law, which are hereby reserved unto the Village.
- B. **Indemnification.** The Consultant shall, without regard to the availability or unavailability of any insurance, either of the Village or the Consultant, indemnify, save harmless, and defend the Village, and its officials, employees, agents, and attorneys against any and all lawsuits, claims, demands, damages, liabilities, losses, and expenses, including attorneys' fees and administrative expenses, that arise, or may be alleged to have arisen, out of or in connection with, the Consultant's performance of, or failure to perform, the Services or any part thereof, whether or not due or claimed to be due in whole or in part to the active, passive, or concurrent negligence or fault of the Consultant, except to the extent caused by the sole negligence of the Village.
- C. **Insurance.** Contemporaneous with the Consultant's execution of this Agreement, the Consultant shall provide certificates and policies of insurance, all with coverages and limits acceptable to the Village, and evidencing at least the minimum insurance coverages and limits as set forth in Exhibit B to this Agreement. For good cause shown, the Public Works Director ("Director") may extend the time for submission of the required policies of insurance upon such terms, and with such assurances of complete and prompt performance, as the Director may impose in the exercise of his sole discretion. Such certificates and policies shall be in a form acceptable to the Village and from companies with a general rating of A minus, and a financial size category of Class X or better, in Best's Insurance Guide. Such insurance policies shall provide that no change, modification in, or cancellation of, any insurance shall become effective until the expiration of 30 calendar days after written notice thereof shall have been given by the insurance company to the Village. The Consultant shall, at all times during the term of this Agreement, maintain and keep in force, at the Consultant's expense, the insurance coverages provided above, including, without limitation, at all times while correcting any failure to meet the warranty requirements of Subsection 6.A., Warranty of Services, of this Agreement.
- D. **No Personal Liability.** No elected or appointed official, agent, or employee of the Village shall be personally liable, in law or in contract, to the Consultant as the result of the execution of this Agreement.
- E. **Kotecki Waiver.** In addition to the requirements set forth above, the Firm (and any subcontractor into whose subcontract this clause is incorporated) agrees to assume the entire liability for all personal injury claims suffered by its own employees and waives any limitation of liability defense based upon the Worker's Compensation Act and cases decided there under. Firm agrees to indemnify and defend the Village from and against all such loss, expense, damage or injury, including reasonable attorneys' fees, which the Village may sustain as a result of personal injury claims by Firm's employees, except to the extent those claims arise as a result of the Village's own negligence

## **SECTION 7. CONSULTANT AGREEMENT GENERAL PROVISIONS.**

- A. **Relationship of the Parties.** The Consultant shall act as an independent contractor in providing and performing the Services. Nothing in, nor done pursuant to, this Agreement shall be construed (i) to create the relationship of principal and agent, employer and employee, partners, or joint ventures between the Village and Consultant; or (ii) to create any relationship between the Village and any subcontractor of the Consultant.
- B. **Conflict of Interest.** The Consultant represents and certifies that, to the best of its knowledge, (1) no Village employee or agent is interested in the business of the Consultant or this Agreement; (2) as of the date of this Agreement neither the Consultant nor any person employed or associated with the Consultant has any interest that would conflict in any manner or degree with the performance of the obligations under this Agreement; and (3) neither the Consultant nor any person employed by or associated with the Consultant shall at any time during the term of this Agreement obtain or acquire any interest that would conflict in any manner or degree with the performance of the obligations under this Agreement.
- C. **No Collusion.** The Consultant represents and certifies that the Consultant is not barred from contracting with a unit of state or local government as a result of (i) a delinquency in the payment of any tax administered by the Illinois Department of Revenue unless the Consultant is contesting, in accordance with the procedures established by the appropriate revenue act, its liability for the tax or the amount of the tax, as set forth in Section 11-42.1-1 et seq. of the Illinois Municipal Code, 65 ILCS 5/11-42.1-1 et seq.; or (ii) a violation of either Section 33E-3 or Section 33E-4 of Article 33E of the Criminal Code of 1961, 720 ILCS 5/33E-1 et seq. The Consultant represents that the only persons, firms, or corporations interested in this Agreement as principals are those disclosed to the Village prior to the execution of this Agreement, and that this Agreement is made without collusion with any other person, firm, or corporation. If at any time it shall be found that the Consultant has, in procuring this Agreement, colluded with any other person, firm, or corporation, then the Consultant shall be liable to the Village for all loss or damage that the Village may suffer, and this Agreement shall, at the Village's option, be null and void.
- D. **Sexual Harassment Policy.** The Consultant certifies that it has a written sexual harassment policy in full compliance with Section 2-105(A)(4) of the Illinois Human Rights Act, 775 ILCS 512-105(A)(4).
- E. **Termination.** Notwithstanding any other provision hereof, the Village may terminate this Agreement, without cause, at any time upon 15 calendar days prior written notice to the Consultant. In the event that this Agreement is so terminated, the Consultant shall be paid for Services actually performed and reimbursable expenses actually incurred, if any, prior to termination, not exceeding the value of the Services completed as determined as provided in Exhibit B.
- F. **Term.** The term of this agreement shall be dictated by the requirements of the individual project.

## **SECTION 7. CONSULTANT AGREEMENT GENERAL PROVISIONS (cont.)**

- G. **Compliance with Laws and Grants.** Consultant shall give all notices, pay all fees, and take all other action that may be necessary to ensure that the Services are provided, performed, and completed in accordance with all required governmental permits, licenses, or other approvals and authorizations that may be required in connection with providing, performing, and completing the Services, and with all applicable statutes, ordinances, rules, and regulations, including without limitation the Fair Labor Standards Act; any statutes regarding qualification to do business; any statutes prohibiting discrimination because of, or requiring affirmative action based on, race, creed, color, national origin, age, sex, or other prohibited classification, including, without limitation, the Americans with Disabilities Act of 1990, 42 U.S.C. §§ 12101 et seq., and the Illinois Human Rights Act, 775 ILCS 5/1-101 et seq. Consultant shall also comply with all conditions of any federal, state, or local grant received by Owner or Consultant with respect to this Agreement or the Services.

Consultant shall be solely liable for any fines or civil penalties that are imposed by any governmental or quasi-governmental agency or body that may arise, or be alleged to have arisen, out of or in connection with Consultant's, or its subcontractors', performance of, or failure to perform, the Services or any part thereof.

Every provision of law required by law to be inserted into this Agreement shall be deemed to be inserted herein.

- H. **Default.** if it should appear at any time that the Consultant has failed or refused to prosecute, or has delayed in the prosecution of, the Services with diligence at a rate that assures completion of the Services in full compliance with the requirements of this Agreement, or has otherwise failed, refused, or delayed to perform or satisfy the Services or any other requirement of this Agreement ("Event of Default"), and fails to cure any such Event of Default within fourteen (14) calendar days after the Consultant's receipt of written notice of such Event of Default from the Village, then the Village shall have the right, without prejudice to any other remedies provided by law or equity, to pursue any one or more of the following remedies:
1. **Cure by Consultant.** The Village may require the Consultant, within a reasonable time, to complete or correct all or any part of the Services that are the subject of the Event of Default; and to take any or all other action necessary to bring the Consultant and the Services into compliance with this Agreement.
  2. **Termination of Agreement by Village.** The Village may terminate this Agreement without liability for further payment of amounts due or to become due under this Agreement.
  3. **Withholding of Payment by Village.** The Village may withhold from any payment, whether or not previously approved, or may recover from the Consultant, any and all costs, including attorneys' fees and administrative expenses, incurred by the Village as the result of any Event of Default by the Consultant or as a result of actions taken by the Village in response to any Event of Default by the Consultant.

## **SECTION 7. CONSULTANT AGREEMENT GENERAL PROVISIONS (cont.)**

- I. **No Additional Obligation.** The Parties acknowledge and agree that the Village is under no obligation under this Agreement or otherwise to negotiate or enter into any other or additional contracts or agreements with the Consultant or with any vendor solicited or recommended by the Consultant.
- J. **Village Board Authority.** Notwithstanding any provision of this Agreement, any negotiations, or agreements with, or representations by the Consultant to vendors shall be subject to the approval of the Village Board of Trustees. The Village shall not be liable to any vendor or other third party for any agreements made by the Consultant, purportedly on behalf of the Village, without the knowledge and approval of the Village Board of Trustees.
- K. **Mutual Cooperation.** The Village agrees to cooperate with the Consultant in the performance of the Services, including meeting with the Consultant and providing the Consultant with such confidential and non-confidential information that the Village may have that may be relevant and helpful to the Consultant's performance of the Services. The Consultant agrees to cooperate with the Village in the performance of the Services to complete the Work and with any other consultants engaged by the Village.
- L. **News Releases.** The Consultant shall not issue any news releases or other public statements regarding the Services without prior approval from the Director. Nothing Herein shall limit the Firm's right to identify the Village as a client of the Firm or from disclosing matters arising from the relationship between the Village and the Firm that are subject to disclosure under the Illinois Freedom of Information Act, (5 ILCS 140, et seq)
- M. **Ownership.** Designs, drawings, plans, specifications, photos, reports, information, observations, records, opinions, communications, digital files, calculations, notes, and any other documents, data, or information, in any form, prepared, collected, or received by the Consultant in connection with any or all of the Services to be performed under this Agreement ("Documents") shall be and remain the exclusive property of the Village. At the Village's request, or upon termination of this Agreement, the Consultant shall cause the Documents to be promptly delivered to the Village, in original format or a suitable facsimile acceptable to the Village
- N. **Favorable Terms.** Consultant represents that all of the benefits and terms granted by Firm herein are at least as favorable as the benefits and terms granted by Firm to Illinois Home Rule Municipalities

Should consultant enter into any subsequent agreement with any Illinois Home Rule Municipalities, during the term of this Agreement, which provides for benefits or terms more favorable than those contained in this Agreement, including all exhibits to this Agreement, then this Agreement shall be deemed to be modified to provide the Village with those more favorable benefits and terms.

Consultant shall notify the Village, in writing, promptly of the existence of such more favorable benefits and terms and the Village shall have the right to receive the more favorable benefits and terms immediately. If requested in writing by the Village, consultant shall amend this Agreement to contain the more favorable terms and conditions.



## **SECTION 7. CONSULTANT AGREEMENT GENERAL PROVISIONS (cont.)**

- M. **Joint Purchasing/Purchasing Extension.** The purchase of goods and services pursuant to the terms of this Agreement shall also be offered for purchases to be made by other Village, as authorized by the Governmental Joint Purchasing Act, 30 ILCS 525/0.01, et seq. (the "Act"). All purchases and payments made under the Act shall be made directly by and between each municipality and the Consultant. The Consultant agrees that the Village shall not be responsible in any way for purchase orders or payments made by the other Village. The Consultant further agrees that all terms and conditions of this Agreement shall continue in full force and effect as to other Village during the extended term of this Agreement.

The Consultant and the other Village may negotiate such other and further terms and conditions to this Agreement ("Other Terms") as individual projects may require. In order to be effective, Other Terms shall be reduced to writing and signed by a duly authorized representative of both the Consultant and the other municipality.

The Consultant shall provide other Village with all documentation as required in the Request for Qualifications, and as otherwise required by the Village including, but not limited to:

- Certificate of insurance naming each additional municipality as an additional insured

## **SECTION 8. GENERAL PROVISIONS.**

- A. **Amendment.** No amendment or modification to this Agreement shall be effective unless and until such amendment or modification is in writing, properly approved in accordance with applicable procedures, and executed.
- B. **Assignment.** This Agreement may not be assigned by the Village or by the Consultant without the prior written consent of the other party.
- C. **Binding Effect.** The terms of this Agreement shall bind and inure to the benefit of the Parties hereto and their agents, successors, and assigns

**SECTION 8. GENERAL PROVISIONS (cont)**

- D. **Notice.** Any notice or communication required or permitted to be given under this Agreement shall be in writing and shall be delivered (i) personally, (ii) by a reputable overnight courier, (iii) by certified mail and deposited in the U.S. Mail, postage prepaid, (iv) by facsimile, or (v) by electronic Internet mail ("e-mail"). Facsimile notices shall be deemed valid only to the extent that they are (a) actually received by the individual to whom addressed and (b) followed by delivery of actual notice in the manner described in either (i), (ii), or (iii) above within three business days thereafter at the appropriate address set forth below. E-mail notices shall be deemed valid and received by the addressee thereof when delivered by e-mail and (a) opened by the recipient on a business day at the address set forth below, and (b) followed by delivery of actual notice in the manner described in either (i), (ii) or (iii) above within three business days thereafter at the appropriate address set forth below. Unless otherwise expressly provided in this Agreement, notices shall be deemed received upon the earlier of (a) actual receipt; (b) one business day after deposit with an overnight courier as evidenced by a receipt of deposit; or (c) three business days following deposit in the U.S. mail. By notice complying with the requirements of this Subsection, each Party shall have the right to change the address or the addressee, or both, for all future notices and communications to such party, but no notice of a change of addressee or address shall be effective until actually received. The provisions of this Section 8 D shall not control with respect to the manner of communications utilized by the consultant in rendering the Services.

Notices and communications to the Village shall be addressed to, and delivered at, the following address:

Village of Buffalo Grove ("Village")  
50 Raupp Blvd.  
Buffalo Grove, IL 60089  
Attn: Dane Bragg  
Email: dbragg@vbg.org  
cc:

With a copy to

Law Firm.  
Street  
City, State, Zip  
Attention:  
Email:

Notices and communications to the Consultant shall be addressed to, and delivered at, the following address:

Company. ("Consultant")	Civiltech Engineering, Inc.
Street	2 Pierce Place, Suite 1400
City, State, Zip	Itasca, IL 60143
Attention:	Attn: Jonathan Vana
Email:	Email: jvana@civiltechinc.com

## **SECTION 8. GENERAL PROVISIONS (cont)**

- E. **Third Party Beneficiary.** No claim as a third-party beneficiary under this Agreement by any person, firm, or corporation other than the Consultant shall be made or be valid against the Village.
- F. **Provisions Severable.** If any term, covenant, condition, or provision of this Agreement is held by a court of competent jurisdiction to be invalid, void, or unenforceable, the remainder of the provisions shall remain in full force and effect and shall in no way be affected, impaired or invalidated.
- G. **Time.** Time is of the essence in the performance of this Agreement.
- H. **Governing Laws.** This Agreement shall be interpreted according to the internal laws, but not the conflict of laws rules, of the State of Illinois. Venue shall be in Cook County, Illinois
- I. **Entire Agreement.** This Agreement constitutes the entire agreement between the parties and supersedes any and all previous or contemporaneous oral or written agreements and negotiations between the Village and the Consultant with respect to the Request for Proposal.
- J. **Waiver.** No waiver of any provision of this Agreement shall be deemed to or constitute a waiver of any other provision of this Agreement (whether or not similar) nor shall any such waiver be deemed to or constitute a continuing waiver unless otherwise expressly provided in this Agreement.
- K. **Exhibit.** Exhibit, A and Exhibit B are attached hereto, and by this reference incorporated in and made a part of this Agreement. In the event of a conflict between the Exhibit and the text of this Agreement, the text of this Agreement shall control.
- L. **Rights Cumulative.** Unless expressly provided to the contrary in this Agreement, each and every one of the rights, remedies, and benefits provided by this Agreement shall be cumulative and shall not be exclusive of any other such rights, remedies, and benefits allowed by law
- M. **Counterpart Execution.** This Agreement may be executed in several counterparts, each of which, when executed, shall be deemed to be an original, but all of which together shall constitute one and the same instrument.
- N. **Calendar Days and Time.** Unless otherwise provided in this Contract, any reference in this Contract to “day” or “days” shall mean calendar days and not business days. If the date for giving of any notice required to be given, or the performance of any obligation, under this Contract falls on a Saturday, Sunday or federal holiday, then the notice or obligation may be given or performed on the next business day after that Saturday, Sunday or federal holiday.
- O. **No Waiver of Tort Immunity.** Nothing contained in this Agreement shall constitute a waiver by the Village of any right, privilege or defense available to the Village under statutory or common law, including, but not limited to, the Illinois Governmental and Governmental Employees Tort Immunity Act, 745 ILCS 10/1-101 et seq., as amended.

**SECTION 8. GENERAL PROVISIONS (cont)**

- P. **Freedom of Information.** The Firm agrees to furnish all documentation related to the Contract, the Work and any documentation related to the Village required under an Illinois Freedom of Information Act (ILCS 140/1 et. seq.) ("FOIA") request within five (5) calendar days after the Village issues Notice of such request to the Firm. The Firm agrees to defend, indemnify and hold harmless the Village, and agrees to pay all reasonable costs connected therewith (including, but not limited to attorney's and witness fees, filing fees and any other expenses) for the Village to defend any and all causes, actions, causes of action, disputes, prosecutions, or conflicts arising from Firm's actual or alleged violation of FOIA or the Firm's failure to furnish all documentation related to a FOIA request within five (5) calendar days after Notice from the Village for the same. Furthermore, should the Firm request that the Village utilize a lawful exemption under FOIA in relation to any FOIA request thereby denying that request, Firm agrees to pay all costs connected therewith (such as attorneys' and witness fees, filing fees and any other expenses) to defend the denial of the request. This defense shall include, but not be limited to, any challenged or appealed denials of FOIA requests to either the Illinois Attorney General or a court of competent jurisdiction.
  
- Q. **Counterpart Execution.** This Agreement may be executed in several counterparts, each of which, when executed, shall be deemed to be an original, but all of which together shall constitute one and the same instrument.

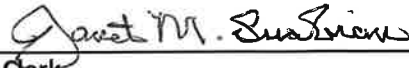
**Acknowledgement.**


The undersigned hereby represent and acknowledge that they have read the foregoing Agreement, that they know its contents, and that in executing this Agreement they have received legal advice regarding the legal rights of the party on whose behalf they are executing this Agreement, and that they are executing this Agreement as a free and voluntary act and on behalf of the named parties.

IN WITNESS WHEREOF, the Parties have executed this Agreement as of the dates set forth below.

ATTEST:

VILLAGE OF BUFFALO GROVE

By:   
Village Clerk

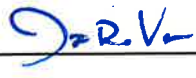
By:  VILLAGE MANAGER  
Name, Title

Date: 6-20-2022

ATTEST:

Company

By:   
Title: VICE PRESIDENT

By:   
Title: PRESIDENT

Date: 7-11-2022

**Exhibit A.**  
**Agreed Upon Pricing Structure**

Lake Cook Road West Phase I Study  
Arlington Heights Road to Raupp Boulevard  
Village of Buffalo Grove

## **SCOPE OF SERVICES**

### **I. PROJECT APPROACH**

The Lake Cook Road West Phase I Study extends between Arlington Heights Road and Raupp Boulevard through the Village of Buffalo Grove (Village). Through the majority of the project limits, Lake Cook Road follows the dividing boundary between Cook County to the south and Lake County to the north. The limits of the Village of Arlington Heights begin south of Lake Cook Road, west of Arlington Heights Road. Lake Cook Road is under the jurisdiction of the Cook County Department of Transportation and Highways (CCDTH). Arlington Heights Road is under the jurisdiction of the Lake County Division of Transportation (LCDOT) north of Lake Cook Road. CCDTH has jurisdiction of Arlington Heights Road south of Lake Cook Road.

In 2022, the construction of Lake Cook Road between Raupp Boulevard and Hastings Lane to the east was completed. This project widened Lake Cook Road to three lanes in each direction and provided intersection improvements and bicycle and pedestrian facilities to improve overall operations and safety through the Lake Cook Road corridor. The Lake Cook Road West project seeks to continue these improvements westward with similar objectives for improving operations and safety, while minimizing impacts to environmental resources and adjacent properties. In 2021, the Lake Cook Road West project received Invest in Cook funds for preliminary engineering services to initiate the Federal-aid Highway process.

The Phase I Engineering Study for this project will include environmental and location-design studies needed to develop and refine feasible alternatives for the improvement, evaluate costs and impacts, and undertake coordination with jurisdictional agencies and the public. The Phase I Engineering Study will be completed to fulfill all of the requirements for processing and funding of this project by the Village of Buffalo Grove, CCDTH, LCDOT, the Illinois Department of Transportation (IDOT) and the Federal Highway Administration (FHWA).

This scope of services uses a tiered approach, with a planning level analysis of potential alternatives (Feasibility Study) occurring prior to the detailed analyses of the preferred alternative. Public involvement will occur throughout the project, but a substantial amount of local agency coordination will occur during the Feasibility Study to assist in confirming environmental processing of the Preferred Alternative. After a preferred improvement plan has been identified, geotechnical studies, environmental studies, and detailed geometric studies will commence.

All of the reports and documents that are prepared for this study will follow IDOT criteria and format. The Scope of Services assumes that a Federally Approved Categorical Exclusion (CE) and Project Development Report (PDR) will be prepared and coordinated through IDOT's Bureau of Local Roads and Streets (BLRS). It is assumed that all report submittals will be delivered electronically.

The IDOT Planning and Environmental Linkage (PEL) process documents the planning components of a project to be forward compatible with the National Environmental Policy Act (NEPA) documentation requirements. Utilizing the PEL process will be advantageous to the overall project scope and timeline should it be determined that an Environmental Assessment (EA) is needed for NEPA documentation. It is proposed that the Feasibility Study portion of the project follow the PEL process requirements and produce a formal PEL Report.

## **SCOPE OF SERVICES**

### **II. SCOPE OF SERVICES**

The following is the proposed scope of services for the Lake Cook Road West Phase I Study:

#### **FEASIBILITY STUDY**

##### **1. Early Coordination and Data Collection**

This work item will include collecting available existing information as follows:

- a. Collect and review previous studies, databases, Geographic Information System (GIS) resources, and existing roadway plans.
- b. Collect Land Use, Zoning, School District, Park District, etc. maps and plans.
- c. Obtain public and private utility atlases.
- d. Perform project area reconnaissance and prepare a photolog.
- e. Prepare Project Program Information (PPI) Form as per IDOT requirements
- f. Prepare and process Environmental Survey Request forms. This will include ground level photos of all structures/buildings of 40 years or older. A review of the Historic & Architectural Resources Geographic Information System (HARGIS) does not indicate any eligible or listed historic resources in the project area; therefore, it is assumed the cultural review of 40 year old structures/buildings will not report significant historic resources present.
- g. Prepare Initial Coordination Meeting Data Form (BLR 22410) as per IDOT requirements.

Depending on the duration of the study and ultimate preferred alternative, an Addendum Environmental Survey Request (AESR) may be required. If needed, the preparation of one AESR submittal, including forms and exhibits, will be included under this work item.

##### **2. Field Survey and Preparation of Base Maps**

*Field survey will be performed by a subconsultant, Gewalt Hamilton Associates, and a copy of their detailed proposal is contained in Attachment B.*

In order to develop accurate construction costs and limits of right-of-way acquisition, a complete design topographic survey will be conducted. This survey will include topographic information, cross sections and a drainage and utility survey. Cross sections will also be taken at all intersecting side streets and driveways to aid in the final design. An attempt will be made to recover as many property and/or other survey monuments as can be located.

Weidner Park is located within the existing right-of-way limits south of Lake Cook Road at Weidner Road. An investigation of the ownership and jurisdiction of this property will be completed.

A survey of the existing of the Lake Cook Rd Bridge (SN 016-3203) and adjacent pedestrian bridge over Buffalo Creek will be required. Elements to be surveyed will include:

- Fascia beam seats
- Bottom of fascia beams at the abutments

## SCOPE OF SERVICES

- Wingwalls
- Curb lines
- Bridge Joints
- Channel along bridge fascias

The preparation of the base sheets would include identification and "plotting" of all existing utilities within the project limits. Existing cross section information would be generated from the survey data to aid in the review of the existing roadway profile and completion of the drainage analysis.

### 3. Crash Analyses

*Crash analyses will be performed by a subconsultant, Peralte-Clark, LLC. A copy of their scope of services is included in Attachment C.*

This items also includes coordination and review of the crash analyses.

### 4. Traffic Analyses

An analysis of the existing traffic volumes and patterns within the study area will be an important task in the development and analysis of the alternatives for this project. Extensive congestion has been observed along southbound Arlington Heights Road and eastbound Lake Cook Road approaching the signalized intersection of the two roadways during peak periods. This congestion results in long delays for traffic turning left from westbound Lake Cook Road onto northbound Arlington Heights Road, as well as traffic turning right from southbound Arlington Heights Road onto westbound Lake Cook Road. Because of this congestion, it is believed that motorists are using Schaeffer Road and Checker Road to bypass the Lake Cook Road/Arlington Heights Road intersection. The presence and magnitude of the Schaeffer-Checker bypass traffic should be verified and documented to understand the implications of any improvements at the Lake Cook/Arlington Heights intersection.

Once the existing traffic volumes and patterns are determined, anticipated changes in traffic volumes and patterns under proposed alternatives can be analyzed to determine their impact on network performance.

*Traffic analyses will be supported by a subconsultant, Peralte-Clark LLC, who will provide peer review services for this task. A copy of their scope of services is included in Attachment C.*

This work item includes the following tasks:

- a. Existing Traffic Data Collection
  - Obtain a weekday 24-hour turning movement traffic count using video counting units at the following intersections:
    - Lake Cook Road/Arlington Heights Road
    - Lake Cook Road/Weidner Road
    - Lake Cook Road/Raupp Boulevard
    - Arlington Heights Road at Checker Road
    - Checker Road at Schaeffer Road



## SCOPE OF SERVICES

- Lake Cook Road at Schaeffer Road
  - Process and tabulate traffic count data and prepare traffic volume exhibits.
  - Obtain and review existing signal timing data from LCDOT and/or CCDTH.
- b. Checker Road-Schaeffer Road Analysis
  - Perform A.M. and P.M. peak hour license plate studies for the following intersection approaches:
    - Arlington Heights Road at Checker Road – West Approach
    - Lake Cook Road at Schaeffer Road – North Approach
  - Using the 2022 peak hour traffic count data and license plate data collected, determine the volume and percentage of vehicles using Checker Road and Schaeffer Road as a bypass of the Lake Cook-Arlington Heights Road intersection.
  - Summarize results for inclusion in the project study documentation.
- c. Future Traffic Projections
  - Obtain 2050 traffic projections from CMAP for No-Action and up to five Build alternatives for study area roadways.
  - Develop weekday A.M. and P.M. design hourly traffic volumes (DHV's) at specified intersections for 2050 No-Action as well as each Build alternative.
  - Depending on alternative performance, reassign additional traffic from the Checker Road-Schaeffer Road diversions to the Lake Cook-Arlington Heights Road intersection.
- d. Traffic Analysis
  - Develop weekday A.M. and P.M. peak hour Synchro models for the existing roadway network and signal timings.
  - Due to the effects of existing congestion between intersections, analyze weekday A.M. and P.M. peak hour existing intersection queues using SimTraffic microsimulation software. A minimum of 10 simulation runs will be performed for each peak hour.
  - Develop weekday A.M. and P.M. peak hour Synchro models for the 2050 No-Build and up to five concept alternatives. Analyze intersection queuing impacts using SimTraffic microsimulation software. A minimum of 10 simulation runs will be performed for each peak hour for each alternative.
  - Summarize and tabulate peak hour traffic operations performance for existing conditions, 2050 No-Build, and the five concept alternatives.

### 5. Alternate Geometric Studies

In order to accommodate future traffic volumes and provide satisfactory traffic operations, it is anticipated that Lake Cook Road will be widened to include three lanes in each direction. This widening will require modifications at the three signalized intersections through the project limits: Arlington Heights Road, Weidner Road, and Raupp Boulevard. Based upon the outcomes of the traffic alternatives analysis, intersection concept designs will also be developed. Given the constrained nature of the corridor and existing developments at intersections, alternatives will be developed to minimize impacts to the maximum extent possible. The preliminary geometrics will be designed to quantify and compare associated impacts and costs of the alternatives.

## SCOPE OF SERVICES

This item will include an evaluation of three preliminary improvement alternatives along the Lake Cook Road corridor as well as up to three preliminary alternatives for the Lake Cook Road/Arlington Heights Road intersection. These alternatives will be developed to a concept level plan for purposes of comparing impacts and assisting in selecting a Preferred Alternative; detailed geometrics, including proposed profiles and cross sections, will be completed for the Preferred Alternative only. Within the corridor roadway alternatives, evaluations and supporting documentation of bicycle accommodations will be completed.

*Alternate geometric studies will be supported by a subconsultant, Peralte-Clark LLC, who will provide peer review services for this task. A copy of their scope of services is included in Attachment C.*

For each preliminary improvement alternative, this work task will include the following:

Preliminary Alternative Concepts:

- a. Develop preliminary typical section alternatives.
- b. Develop preliminary horizontal geometrics for up to three alternatives.
- c. Analyze pedestrian/bicycle accommodation alternates.
- d. Prepare horizontal plan exhibits.
- e. Submit preliminary geometric concepts to the Village of Buffalo Grove, LCDOT and CCDTH for review.
- f. Revise geometric concepts up to two times.

### **6. Drainage Study**

An overall investigation of the existing drainage, development of preliminary drainage design criteria (based on roadway jurisdictions), as well as an analysis of alternatives for proposed drainage alternates will be evaluated as part of this item. A detailed, IDOT style, Location Drainage Study will not be completed. The following items will be performed as part of this task:

- a. Existing Drainage
  - Prepare General Location Drainage Map.
  - Develop an Existing Drainage Plan (EDP) for the project limits. The EDP will be a plan view exhibit that displays all available drainage system information, as well as drainage patterns, drainage areas, and floodplains.
  - Identify outlets and determine interpreted divides on a macroscopic level.
  - Identify floodplains within the project area.
- b. Drainage Design Criteria
  - Develop Drainage design criteria for the proposed improvements. The design criteria will be a function of the roadway jurisdiction as well as the corresponding local stormwater ordinance (Lake County Watershed Development Ordinance or MWRD Watershed Management Ordinance).
- c. Analysis of Proposed Drainage Alternatives
  - Develop alternatives for stormwater detention.
  - Develop alternatives for Floodplain compensatory storage.
  - Develop alternatives for the Proposed Drainage Design.

## SCOPE OF SERVICES

- d. Preliminary Drainage Technical Memorandum (reviewed by CCDTH, 2 iterations)
  - Summary of existing drainage, drainage design criteria as well as a summary of the proposed drainage alternatives that were evaluated for inclusion in the project Feasibility Study.

### 7. Structural Studies

The existing bridge carrying Lake Cook Road over Buffalo Creek (SN 016-3203) is located within the project limits. It is anticipated that the existing single span steel beam bridge will be widened to accommodate the proposed widening of Lake Cook Road. The existing bridge is about 62.5-ft long and 80.0-ft wide and carries 2 lanes of traffic in each direction, 2 raised sidewalks and 1 raised median. It is also anticipated that the gabion walls along the eastern bank of the channel (between the Lake Cook Road Bridge and the pedestrian bridge located to the north) will be modified to accommodate the widening of the roadway bridge. Modification details for the gabion wall will be included with the bridge modification details since the structures abut each other. It is assumed the existing pedestrian bridge north of Lake Cook Road will not be affected by the proposed project.

A Bridge Condition Report (BCR) will be prepared for approval per IDOT requirements for federally funded projects. The following are the structural scope items included in the Feasibility Study:

1. A detailed structural inspection of the existing roadway bridge carrying Lake Cook Road over Buffalo Creek (SN 016-3203) including the adjacent gabion wall. *A deck delamination survey will be performed by a subconsultant, GS Infrastructure. See Attachment D for their proposal.*
2. A BCR for the existing Lake Cook Rd Bridge (SN 016-3203) will be prepared in accordance with IDOT requirements. The BCR will describe the existing condition of the bridge and adjacent gabion wall, as well as propose a scope of work with associated estimated construction costs.

The BCR will be prepared in accordance the IDOT BCR Procedures and Practices Manual.

### 8. Preliminary Highway Traffic Noise Analysis

There is the potential for additional through lanes of travel to be constructed as part of this project. Therefore, it is necessary to determine if highway noise impacts will be created by the proposed improvement and if so, to determine if it is feasible and reasonable to mitigate those impacts. The noise study limits are assumed to be along Lake Cook Road from 1,600 feet west of Arlington Heights Road, to Raupp Boulevard, a distance of 6,700 feet. In order to make those determinations, the noise analysis portion of this feasibility study will be comprised of the following tasks:

- a. Conduct field measurements to quantify the level of existing highway traffic noise at sensitive receptors and to validate the noise model. Field monitoring will be completed concurrently with the traffic data collection outlined in Item 4. *A review of the study area preliminarily identified 18 Common Noise Environments (CNE).*

## SCOPE OF SERVICES

*Generally, a CNE is a grouping of similar receptors by land use type. Noise measurements must be conducted for at least 25% of the sensitive receptors to validate the computer noise model. Assume five noise measurement locations.*

- b. Using the FHWA Traffic Noise Model (TNM 2.5), build an existing conditions model to compare modeled noise levels to field-measured noise levels in order to validate the model.
- c. Through modeling using TNM 2.5, determine existing highway traffic noise levels at sensitive receptors in 18 CNEs. *Assume 18 sensitive receptor locations (CNEs).*
- d. Using TNM, predict the 2050 No-Build Alternative traffic noise levels at 18 CNEs.
- e. Using TNM, predict the 2050 traffic noise levels at 18 CNEs for up to three improvement alternatives, and summarize in a table. The results will be compared to those from the 2050 No-Build model for use in the preliminary environmental analysis and the public involvement process.

A full traffic noise analysis for the preferred improvement including identification of traffic noise impacts, evaluation of the feasibility and reasonableness of noise attenuation, meetings with affected residents, and a technical memorandum will be completed during the Preferred Alternative analysis portion of this study.

### **9. Development of Project Purpose & Need**

As part of the PEL process, this item will include the development and documentation of the project Purpose and Need. The Purpose and Need will be forward compatible with the NEPA process in accordance with IDOT policy. The draft Purpose and Need will be provided for the Village, CCDTH, and LCDOT review. Following revisions, the Purpose and Need will be provided to IDOT for review. This includes up to two revisions for the document; assuming one revision following Village/CCDTH/LCDOT review and one revision following IDOT review. Preparation of exhibits and charts that accompany the Purpose and Need are included.

### **10. Alternatives to be Carried Forward**

As part of the Feasibility Study, a range of alternatives will be considered and evaluated to determine if they meet the objectives of the Purpose and Need. This includes the development of evaluation criteria and comparison of the alternatives' impacts, such as operational performance, safety benefits, environmental impacts, and preliminary costs. See Item 11 below for Preliminary Cost Estimate details. Measures to avoid, minimize, or mitigate these impacts will be evaluated. Up to three corridor alternatives and three intersection alternatives are included.

Following this evaluation, a recommendation on the Alternatives to be Carried Forward will be made. The Alternatives to be Carried Forward will be part of the overall PEL documentation and will be compatible with the NEPA process in accordance with IDOT policy. The draft Alternatives to be Carried Forward will be provided for the Village, CCDTH, and LCDOT review. Following revisions, the Alternatives to be Carried Forward will be provided to IDOT for review. This task includes the documentation of the alternatives evaluation and recommendations, including up to two revisions for the document; assuming one revision following Village/CCDTH/LCDOT review and one revision following IDOT review. Preparation of exhibits and charts (alternatives, performance, etc.) are included.

## **SCOPE OF SERVICES**

### **11. Preliminary Cost Estimates**

Construction costs are often a consideration in the development of alternatives and balancing of impacts. This items includes the quantification of order of magnitude costs for up to three corridor alternatives and three intersection alternatives. Preliminary cost estimates may also be utilized in applying for federal funding applications. One revision of the preliminary cost estimates is included.

### **12. Public Involvement**

The purpose of public involvement process is to promote a proactive and responsive approach that seeks the input of all concerned stakeholders early and often, and that provides for appropriate input at key points in the project decision making process. Given the potential scope of improvements, it is proposed that this project follow the principles of IDOT's Context Sensitive Solutions (CSS). This includes forming a Stakeholder Involvement Group (SIG) to include one or more individuals from key stakeholder groups that would meet periodically throughout the study process. A Stakeholder Involvement Plan (SIP) will also be developed. It is anticipated that a standalone project website will be created to communicate information about the project and project updates.

As a result of the pandemic, accommodating both in person and virtual opportunities for public involvement has become a common practice for many projects. This "hybrid" approach can capture the benefits of both formats and is assumed to be applied to Public Information Meetings for the Feasibility Study. SIG meetings are assumed to occur in person only.

As part of the Feasibility Study, two public meetings are proposed. The first public meeting will present existing conditions, the needs for improvement, and a draft Purpose and Need statement. The second public meeting will be present the preliminary improvement concepts and associated impacts. Two meetings with the SIG are anticipated, one in advance of each public meeting during the Feasibility Study. Public Involvement activities would continue beyond the Feasibility Study portion of this project, and are further detailed under the Preferred Improvement Plan below.

The following items are anticipated as part of the Feasibility Study public involvement tasks:

- a. Stakeholder Involvement Group (SIG) Meetings (Assume two meetings)
  - Selection of and coordination with meeting venue.
  - Preparation of meeting exhibits and binder preparation.
  - Preparation of SIG meeting PowerPoint presentations.
  - Attendance at SIG meetings.
  - Preparation of meeting minutes and disposition of comments. It is assumed comments will be responded to via a Frequently Asked Questions (FAQs) summary format.
- b. Public Information Meetings (Assume two meetings)
  - Selection of and coordination with venue for in person meeting.
  - Preparation of public meeting newspaper display advertisement.

## SCOPE OF SERVICES

- Preparation of public meeting brochure.
  - Preparation and distribution of public meeting notification letters to area residents and businesses.
  - Preparation of public meeting exhibits.
    - 2-D Exhibits
    - 3-D Modeling and Renderings, including existing conditions and 3-D renderings of the proposed conditions at three locations.
  - Preparation of PowerPoint presentation.
  - Preparation for and attendance at public meeting dry run with agency staff. (Assume 1 meeting per public information meeting)
  - Attendance at in-person public information meeting.
  - Attendance at virtual public information meeting.
  - Preparation of meeting minutes and disposition of comments. It is assumed comments will be responded to via a Frequently Asked Questions (FAQs) summary format.
- c. Stakeholder Involvement Plan (SIP)
- Development of a SIP consistent with CSS principles.
  - Provide the SIP to IDOT for review. This includes up to one revision.
  - One update of the SIP throughout the Feasibility Study.
- d. Project Branding for public involvement and website materials.
- e. Project Website – A project-specific, standalone website is assumed to be produced and maintained. This item includes:
- Initial setup and preparation of the website.
  - Updates to the website, including posting meeting materials, following each SIG and Public Information Meeting.
  - Quarterly announcements and/or updates, as needed.
  - Preparation of responses to public inquiries received outside of meeting comment periods.
- f. Drone Photography – Collection of drone photography for public involvement and rendering purposes. This items includes:
- One site visit for collection of views for rendering purposes.
  - One site visit for collection to update aerial photography images.
- g. Documentation – A summary of public engagement and activities will be included in the PEL process documentation.

### 13. **Draft PEL Report**

A draft PEL report will document existing conditions, the Purpose and Need, alternatives considered, evaluation of alternatives, the alternatives identified to be carried forward, and public involvement activities associated with these items. This includes the completion of a PEL Questionnaire and all associated appendices. The PEL report will be compiled in a manner compatible with future incorporation into a formal NEPA process. This item includes up to one revision of the Draft PEL Report following Village/CCDTH/LCDOT review prior to submittal to IDOT/FHWA. All reviews are assumed to occur electronically.

## **SCOPE OF SERVICES**

### **14. Final PEL Report**

This item includes finalization of the PEL report to address any comments received from IDOT/FHWA and providing a disposition of comments received. A final PEL report will be provided to the Village/CCDTH/LCDOT for approval prior to final submission to IDOT/FHWA.

### **15. Funding Application**

Invest in Cook Funds were obtained for preliminary engineering of the Lake Cook Road West project in 2021. The Village intends to apply for additional funds in 2023. This item includes updating the 2021 application and supporting materials for the 2023 Invest in Cook funding application cycle. The revised application will be reviewed with the Village and will be revised up to one time.

### **16. Agency Coordination**

The efficiency and timeliness of executing a project can hinge on the level and frequency of coordination with agency officials. While the Phase I Study is being led by the Village, Lake Cook Road is under the jurisdiction of CCDTH. Arlington Heights Road is under the jurisdiction of CCDTH south of Lake Cook Road; LCDOT has jurisdiction north of Lake Cook Road. Regular coordination between these agencies will assist in the overall project delivery and timeliness of the Phase I Study. In addition to a project kick-off meeting, we propose regular bi-weekly meetings to occur between the Village/CCDTH/LCDOT throughout the Feasibility Study portion of this project. Bi-weekly meetings are assumed to be conducted virtually.

In order to avoid delays and costly multiple design revisions, we believe it will be helpful to also have regular coordination meetings with IDOT to review design issues, environmental impact findings and the project's overall progress. These meetings will be held at regular IDOT/FHWA coordination meetings.

As part of the PEL process, the Purpose and Need and Alternatives to be Carried Forward "coordination points" will be formally presented at IDOT/FHWA coordination meetings. This item also includes additional coordination required of the PEL process, including:

- The development of a Timeframes Agreement. This item includes the initial development of a Timeframes Agreement and up to one revision.
- Letters to Tribes at each coordination point. This includes one revision at each coordination point after consulting with IDOT – Cultural Unit.

In addition to a kick-off meeting with IDOT, we propose to schedule up to 5 meetings with IDOT/FHWA. This item includes preparation of agendas and materials, attendance, and preparation of meeting minutes for each meeting.

Attendance and preparation for two Village Board meetings is included in this item.

## **SCOPE OF SERVICES**

### **17. Supervision, Administration and Project Coordination**

This item includes project setup, monthly invoicing and preparation of status reports, quarterly client coordination meetings as needed and in-house coordination meetings throughout the course of the Feasibility Study. This item also includes implementation of Civiltech's Quality Assurance/Quality Control in-house review process.

## **PREFERRED IMPROVEMENT PLAN**

### **1. Traffic Analyses**

*Traffic Analyses will be performed by a subconsultant, Peralte-Clark LLC. A copy of their scope of services is included in Attachment C.*

This items also includes coordination and review of the Intersection Design Studies (IDSs) and traffic analyses.

### **2. Alternate Geometric Studies**

*Alternate Geometric Studies will be supported by a subconsultant, Peralte-Clark LLC. A copy of their scope of services is included in Attachment C and specified items for support services are noted below.*

After a preferred improvement plan has been selected, the preliminary geometric design will be refined based upon detailed survey, wetlands, and geotechnical studies. This item includes the following:

- a. Prepare detailed horizontal geometrics on topographic base sheets.
- b. Define vertical roadway geometrics including detailed analysis of proposed roadway cross sections.
- c. Determine right-of-way acquisition and grading easement limits.
- d. Quantify environmental impacts.
- e. Design vehicle turning-template analyses will also be completed using AutoTURN software.
- f. Prepare plan and profile exhibits.
- g. Field visit verify proposed plan considerations (two site visits included).
- h. Submit detailed geometrics, traffic and crash data and environmental impacts to the County and Villages. It is assumed that these geometrics will be revised up to three times prior to presentation at the Public Hearing.
- i. Develop a constructability analysis to evaluate the ability to maintain traffic during construction within the proposed right-of-way limits. This task will include the preparation of preliminary maintenance of traffic plan exhibits and typical cross section exhibits. *This item will be completed by Peralte-Clark, LLC.*
- j. Provide detailed ADA grading sheets at each of the signalized intersections. *This item will be completed by Peralte-Clark, LLC.*



## **SCOPE OF SERVICES**

### **3. Subsurface Soils and Pavement Investigation**

*Pavement coring, a highway soils survey, and structure borings will be performed by a subconsultant, Midland Standard Engineering & Testing, Inc. A copy of their scope of services is included in Attachment E.*

In order to provide recommendations for proposed pavement structure and account for any necessary soil remediation, pavement cores and a soil survey will be collected; data and analyses will be documented in a Roadway Geotechnical Report (RGR).

A geotechnical investigation including structure borings for the Lake Cook Road Bridge (SN 016-3203) will also be conducted. A Structure Geotechnical Report (SGR) will be required for the bridge.

This item will also include two meetings with the Village and Counties. The first meeting will be held to discuss locations of the proposed pavement cores and borings and the second meeting will be to discuss the findings and recommendations of the geotechnical studies. This work item also includes the preparation of two pavement designs and the presentation of those designs in a pavement type analysis memorandum. This memorandum will include preliminary costs for each type of pavement structure as well as analysis of the life-cycle cost for each pavement design.

### **4. Preliminary Environmental Site Assessment**

*The Preliminary Environmental Site Assessment will be performed by a subconsultant, True North Consultants. A copy of their scope of services is included in Attachment F.*

As part of the environmental studies required for a Federal-aid project, it is necessary to perform a Special Waste Screening Analysis to determine if there are any sites located along the project area that may result in the need for further environmental investigation. It is anticipated that the initial screening will result in the need for a Preliminary Environmental Site Assessment (PESA) to be completed to determine the extent of any special remediation that may need to occur.

This item includes coordination and review of the PESA report.

### **5. Wetland Study**

*The Wetland Study will be performed by a subconsultant, Huff & Huff, Inc. A copy of their scope of services is included in Attachment G.*

Regulated wetlands are likely located on or adjacent to the project corridor. A wetland delineation will be conducted for all areas within the project corridor in accordance with the February 25, 2022 edition of the U.S. Army Corps of Engineers (USACE) Chicago District Nationwide Permit Program (NWP), the USACE Regional Supplement to the Corps of Engineers Wetland Delineation Manual: Midwest Region (Version 2.0), (Supplemental Wetland Manual), the October 13, 2020 edition of the Lake County Watershed Development Ordinance (WDO), and the May 7, 2020 edit of the Metropolitan Water Reclamation District (MWRD) of Greater Chicago Watershed Management Ordinance (WMO).

## SCOPE OF SERVICES

This item will include off-site record/documentation review, on-site investigation (field inventory), preparation of a wetland report, a preliminary Jurisdictional Determination/Boundary Verification submittal, a USACE Jurisdictional Determination request, and preparation and submittal of the Wetland Impact Evaluation form.

This items also includes coordination of wetland surveys and review of the wetland report.

### 6. Drainage Study

An overall investigation of the existing drainage as well as the drainage design criteria and requirements for the proposed drainage system, including stormwater detention, floodplain compensatory storage, and water quality treatments for the preferred alternative will be evaluated as part of this item. The following items will be performed as part of this task:

- a. Existing Drainage
  - Update General Location Drainage Map.
  - Update the previously prepared Existing Drainage Plan (EDP) for the project limits.
- b. Proposed Drainage
  - Determine stormwater detention requirements for preferred alternative.
  - Determine Floodplain compensatory storage requirements for preferred alternative.
  - ROW analysis for recommended proposed drainage plan.
  - Prepare a Proposed Drainage Plan (PDP) for the selected proposed condition alternative. The PDP will be a plan and profile sheet showing the proposed drainage concept.
  - A hydraulic analysis will be completed for the existing and proposed structure crossing at Buffalo Creek. The exiting FEMA regulatory model will be used as the base model and the existing and proposed conditions will be incorporated into the regulatory hydraulic model. Hydraulic data and exhibits required for BLR form 10210 will also be developed.
- c. Drainage Technical Memorandum (Reviewed by CCDTH, 2 iterations)
  - The existing and proposed drainage within the project corridor will be summarized in a technical memorandum with the EDP, PDP, and associated drainage calculations as attachments.

### 7. Structural Studies

A Preliminary Bridge Design & Hydraulic Report (BLR Form 10210) with a Type Size & Location (TSL) plan and Structure Geotechnical Report (SGR) as attachments will be prepared for approval per IDOT requirements for the proposed Lake Cook Road over Buffalo Creek (SN 016-3203) bridge. The following are the structural scope items included in the Preferred Improvement Plan:

1. Complete form BLR 10210 with a Type, Size and Location (TSL) plan and Structure Geotech Report for the Lake Cook Road Bridge and adjacent gabion wall. *Geotechnical*

## SCOPE OF SERVICES

*investigations will be completed by a subconsultant, Midland Standard Engineering & Testing, Inc. per Item 3 of the Preferred Improvement Plan scope of services.* The TSL will describe the proposed structural work to accommodate the proposed widening of Lake Cook Road. Estimated construction costs from the BCR will also be updated as needed.

2. Attend up to 4 review meetings. This item includes preparation of meeting materials and meeting minutes.

The structural design will be in accordance with the AASHTO Standard Specifications for Highway Bridges and the IDOT Bridge Manual.

Additionally, this items includes the estimation of construction cost of various retaining walls within the project limits with retained heights less than 10-ft and not requiring TSL submittals. A total of up to 4 walls with a total combined length is assumed.

### 8. Final Highway Traffic Noise Analysis

A preliminary noise analysis on the initial range of alternatives is part of the Feasibility Study portion of this project. The noise analysis portion of the Preferred Improvement Plan study will be comprised of the following tasks:

- a. Using TNM, based on a refined preferred improvement plan, predict the 2050 traffic noise levels to identify if highway traffic noise impacts will result at any of the estimated eighteen sensitive receptor locations. *For this scope, it is assumed that there will be a noise impact at five of the eighteen locations. Therefore, items b. and c. below must be completed.*
- b. Consider various highway traffic noise abatement measures, and evaluate the feasibility of noise barriers at five locations. *It is assumed that a noise barrier will be physically and acoustically feasible at all five locations.*
- c. Evaluate the noise reduction design goal and cost reasonableness of the noise barrier(s) at the five locations. *It is assumed that a noise barrier will be reasonable based on the noise reduction design goal and cost criteria, at four of the five locations assumed to have a noise impact. Therefore, item d. below must be completed for each of the four locations to evaluate the third of three reasonableness criteria: residents' desire for the noise barrier(s).*
- d. Prior to meetings with residents, prepare a Draft Highway Traffic Noise Analysis Technical Memorandum including exhibits and tables for the preferred alternative. Submit for review and comment to the 1) Village, 2) CCDTH/LCDOT, and 3) IDOT. The submittals will be all electronic. Includes time for modeling revisions based on comments. Revise Draft Memorandum one time per each of the three submittals. Resubmit to IDOT for approval to go to meetings with residents.
- e. Meetings with residents predicted to be benefited by feasible and reasonable noise barriers. Assume the four locations with impacts can be covered in two meetings.
  - Prepare and mail invitation letters and ballots.
  - Prepare exhibits, handouts, and a PowerPoint presentation for two separate meetings.

## SCOPE OF SERVICES

- Attend two separate meetings.
- Compile and summarize results from two meetings.
- f. Prepare a Pre-Final Highway Traffic Noise Analysis Technical Memorandum that includes the results of the meetings with residents. Submit for review and comment to the 1) Village, 2) CCDTH/LCDOT, and 3) IDOT/FHWA. The submittals will be all electronic.
- g. Revise Technical Memorandum one time per each of the three submittals and prepare a Final Technical Memorandum. Submit Final Technical Memorandum to IDOT/FHWA for a “no further comments” finding.
- h. Transmit noise analysis report to local planning officials.

It is noted that there are no undeveloped properties along the corridor, therefore the typical analyses for undeveloped properties will not be necessary and is not included in this scope.

### 9. Air Quality Analysis

This work item will include preparation of input data for IDOT to run a COSIM pre-screening analysis to quantify the likelihood of air quality impacts. This work item will include:

- a. Prepare COSIM Pre-Screen input data sheet and submit to IDOT for analysis.  
(Assume 3 intersections)
- b. If the location fails the Pre-Screening, prepare full COSIM 4.0 input data worksheets and submit for analysis.
- c. Document MSAT and PM 2.5/PM 10 Requirements
- d. Write air quality analysis text.

### 10. Tree Survey

*The Tree Survey will be performed by a subconsultant, Huff & Huff, Inc. A copy of their scope of services is included in Attachment G.*

A Tree Survey will be conducted to identify tree species, health, structure and origin within the Buffalo Creek Forest Preserve and areas immediately adjacent to the preserve, within the project limits. The tree survey will note whether any trees are of exceptional size and condition and determine which trees are worth avoidance, if any. The tree survey will follow the Lake County Forest Preserve District (LCPFPD) License and Easement Ordinance requirements.

This survey also includes an assessment of the northern long-eared bat (NLEB) habitat within the proposed right-of-way, including the potential for individual trees and forest resources to provide suitable habitat for NLEB. This will be documented in a tree survey report.

This item includes coordination of tree surveys and review of the tree survey report.

### 11. Section 4(f) Evaluation and Documentation

The proposed improvement may require permanent land acquisition of one or more publicly owned recreational properties, including the Buffalo Creek Forest Preserve, Weidner Park, the

## SCOPE OF SERVICES

Buffalo Grove Golf Club, Buffalo Grove Park District facilities, and/or Emmerich Park East. The Buffalo Creek Forest Preserve is under the jurisdiction of the Lake County Forest Preserve District (LCFPD). The Buffalo Grove Golf Club is under the jurisdiction of the Village. Weidner Park appears to fall entirely within the Lake Cook Road right-of-way; coordination with FHWA will occur to confirm whether this site qualifies for protection under Section 4(f). The remaining properties listed are under the jurisdiction of the Buffalo Grove Park District.

Due to the close proximity of these properties to the roadway corridor, it is possible that each property may experience temporary or permanent impacts. This item includes attendance at an IDOT/FHWA coordination meeting to determine the level of documentation required, including preparing meeting materials and meeting minutes. For scoping purposes, it is assumed a separate evaluation for each property will be required and each will result in a *de minimis* finding. This item includes the following work tasks:

- a. Describe the property, facilities, and functions.
- b. Document efforts to avoid impacts to the property.
- c. If avoidance is not prudent or feasible, document measures to minimize impacts.
- d. Describe all permanent or temporary impacts to the property and whether they may cause adverse effects.
- e. Prepare report exhibits.
- f. Revise report based upon review comments and prepare final documentation.
- g. Attend meetings with property owner. Assume two meetings for each owner.

### 12. Section 6(f) Documentation

The Buffalo Creek Forest Preserve is a public open space that offers wildlife viewing, fishing, and trails for hiking and biking. The property has received special funding from the Land and Water Conservation Fund (LWCF) and therefore is protected under Section 6(f) of the LWCF Act. LWCF are administered through the Illinois Department of Natural Resources (IDNR) and the National Park Service (NPS).

It is anticipated that there may be impacts to the Buffalo Creek Forest Preserve resulting from proposed improvements, which may require a Section 6(f) analysis. For purposes of scoping, it is assumed the proposed improvements would result in a permanent conversion of Section 6(f) lands, which would require the identification of replacement property. The following items are included as part of this task:

- a. Document of efforts to avoid impacts to the property.
- b. If avoidance is not prudent or feasible, document measures to minimize impacts.
- c. Describe all permanent or temporary impacts to the property.
- d. Identify replacement property, if applicable.
- e. Prepare appropriate documentation form(s) and supporting exhibits.
- f. Coordinate with LCFPD, IDNR and NPS. Assume two meetings.
- g. Revise documentation (up to two times) for approval.

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### **13. Detailed Cost Estimate**

A detailed construction cost estimate will be completed for the Preferred Alternative. This estimate will quantify costs associated with the project, such as proposed removals, improvements to the roadway, traffic signal improvements, drainage and stormwater management systems, and environmental mitigation costs. Temporary and/or permanent property acquisition costs are also included. It is assumed that the cost estimate will be completed once for the entire project with up to two revisions are included based upon design refinements.

### **14. Project Development Report (Draft)**

It is anticipated that the results of the environmental process will be a determination that the proposed improvement will cause no significant environmental impacts and thus, would meet the requirements of a Federal Approved Categorical Exclusion. Therefore, this work task will involve integration of project data and engineering studies into a Draft Project Development Report that meets IDOT requirements as contained in BLR Form 22110. Specifically this work item will include the following:

- a. Write, proofread and edit the Draft PDR.
- b. Prepare report exhibits and appendices.
- c. Provide Draft PDR for Village/CCDTH/LCDOT review.
- d. Provide a disposition of comments and revise Draft PDR up to one time.
- e. Attend review meeting/phone conference with the Village and IDOT, if required.

### **15. Public Involvement and Public Hearing**

It is anticipated that one additional meeting with the SIG would occur as part of the Preferred Improvement Plan portion of the project. The meeting would discuss the alternatives evaluation and preliminary preferred alternative selection. The following items are anticipated as part of the Preferred Alternative public involvement tasks:

- a. Stakeholder Involvement Group (SIG) Meetings (Assume one meeting)
  - Selection of and coordination with meeting venue.
  - Preparation of meeting exhibits.
  - Preparation of SIG meeting PowerPoint presentation.
  - Preparation and attendance at dry run with Village and County staff.
  - Attendance at SIG meeting.
  - Preparation of meeting minutes and disposition of comments. It is assumed comments will be responded to via a Frequently Asked Questions (FAQs) summary format.

An additional meeting with the public will be held to discuss the preferred alternative. For scoping purposes, it is anticipated this will be a formal Public Hearing. A Public Hearing is assumed to be conducted in person only. This work item will include:

## **SCOPE OF SERVICES**

- b. Public Hearing
  - Selection of and coordination with meeting venue.
  - Preparation of public hearing newspaper display advertisement.
  - Preparation of public hearing brochure.
  - Preparation and distribution of public hearing notification letters to area residents and businesses.
  - Preparation of public hearing exhibits.
    - 2-D Exhibits
    - 3-D Modeling and Renderings, including existing conditions and proposed conditions at two locations.
  - Preparation of public hearing PowerPoint presentation.
  - Preparation for and attendance at public hearing dry run with agency staff. (Assume 1 meeting.)
  - Attendance at public hearing.
  - Preparation of public hearing transcript (By court reporter).
  - Disposition of public hearing comments. It is assumed comments will be responded to via a Frequently Asked Questions (FAQs) summary format.
- c. Stakeholder Involvement Plan (SIP)
  - This includes one update of the SIP during the Preferred Alternative portion of the project.
- d. Project Website
  - Updates to the website, including posting meeting materials, following the SIG and Public Hearing.
  - Quarterly announcements and/or updates, as needed.

### **16. Project Development Report (Final)**

Based on the outcome of the draft report review, the public involvement activities and comments, and input from the Village/CCDTH/LCDOT and IDOT, the final Project Development Report will be prepared. Design Approval would be requested from IDOT. This work item will include the following tasks:

- a. Prepare a disposition of IDOT comments on the draft PDR.
- b. Revise, proofread and edit the draft PDR report.
- c. Revise draft PDR exhibits and appendices.
- d. Provide Pre-Final PDR for Village/CCDTH/LCDOT approval.
- e. Provide a disposition of comments and revise Pre-Final PDR up to one time.

### **17. Funding Applications**

The intention of the Village is to pursue Federal funding for detailed engineering and/or the construction of the Lake Cook Road West project. It is assumed these applications will be submitted once the Preferred Alternative has been determined. The following items are included as part of this task:

- a. STP-Shared Fund/CMAQ Application
  - Prepare funding application text.

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- Prepare supporting exhibits.
  - Review application with Village staff.
  - Revise application materials (up to one time).
  - Submit final application materials.
  - Complete Quarterly Progress Forms (if funds are awarded).
- b. RAISE Application
- Prepare funding application text.
  - Prepare Cost-Benefit Analysis and supporting exhibits.
  - Review application with Village staff.
  - Revise application materials (up to one time).
  - Submit final application materials.

**18. Agency Coordination**

For the preferred alternative, this item will include continuation of bi-weekly meetings with Village/CCDTH/LCDOT staff. This item also includes two meetings with IDOT/FHWA. Attendance and preparation for two Village Board meetings is included in this item.

**19. Supervision, Administration and Project Coordination**

This item includes project setup, monthly invoicing and preparation of status reports, quarterly client coordination meetings as needed and in-house coordination meetings throughout the course of the Preferred Alternative Study. This item also includes implementation of Civiltech's Quality Assurance/Quality Control in-house review process.



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**COST ESTIMATE OF CONSULTANT SERVICES  
PHASE I ENGINEERING**

Task	Personnel & Hours													Total Hours	% of Hours (Feas./Pre f.)	% of Hours (Overall)	Labor Cost
	Senior Project Manager	Project Manager	Project Engineer	Design Engineer	Sr. Drainage Engineer	Drainage Engineer	Sr. Structural Engineer	Structural Engineer	Design Technician	Landscape Architect	Digital Rendering Artist	Graphic Designer	Admin. Asst.				
	\$70.00	\$60.00	\$46.00	\$37.00	\$70.00	\$40.00	\$70.00	\$41.00	\$40.00	\$57.00	\$39.00	\$40.00	\$20.00				
<b>FEASIBILITY STUDY</b>																	
<b>1 Early Coordination and Data Collection</b>	0	20	48	70	0	0	0	0	48	0	0	0	0	186	3.8%	1.8%	\$ 7,918
<b>2 Field Survey and Preparation of Base Maps</b>	0	18	12	14	0	0	0	0	20	0	0	0	0	64	1.3%	0.6%	\$ 2,950
<b>3 Crash Analyses</b>	4	16	8	0	0	0	0	0	0	0	0	0	0	28	0.6%	0.3%	\$ 1,608
<b>4 Traffic Analyses</b>	0	30	198	32	0	0	0	0	20	0	0	0	0	280	5.7%	2.8%	\$ 12,892
<b>5 Alternate Geometric Studies</b>	16	52	124	244	0	0	0	0	24	0	0	0	0	460	9.4%	4.5%	\$ 19,932
<b>6 Drainage Study</b>	0	8	0	0	35	236	0	0	0	0	0	0	0	279	5.7%	2.8%	\$ 12,370
<b>7 Structural Studies</b>	0	0	0	0	0	0	61	127	0	0	0	0	0	188	3.8%	1.9%	\$ 9,477
<b>8 Preliminary Highway Traffic Noise Analysis</b>	2	38	60	200	0	0	0	0	0	0	0	0	0	300	6.1%	3.0%	\$ 12,580
<b>9 Development of Project Purpose &amp; Need</b>	16	30	60	16	0	0	0	0	52	0	0	0	0	174	3.6%	1.7%	\$ 8,352
<b>10 Alternatives to be Carried Forward</b>	26	66	118	144	0	0	0	0	60	0	0	0	0	414	8.5%	4.1%	\$ 18,936
<b>11 Preliminary Cost Estimates</b>	6	10	32	56	0	0	0	0	0	0	0	0	0	104	2.1%	1.0%	\$ 4,564
<b>12 Public Involvement</b>	96	170	272	204	0	0	0	0	498	24	160	92	40	1556	31.8%	15.4%	\$ 68,988
<b>13 Draft PEL Report</b>	8	44	80	92	0	0	0	0	76	0	0	0	0	300	6.1%	3.0%	\$ 13,324
<b>14 Final PEL Report</b>	6	10	24	36	0	0	0	0	20	0	0	0	0	96	2.0%	0.9%	\$ 4,256
<b>15 Funding Application</b>	4	8	8	0	0	0	0	0	20	0	0	0	0	40	0.8%	0.4%	\$ 1,928
<b>16 Agency Coordination</b>	96	90	28	0	0	0	0	0	0	0	0	0	0	214	4.4%	2.1%	\$ 13,408
<b>17 Supervision, Administration, and Project Coordination</b>	84	84	12	12	12	0	12	0	0	0	0	0	0	216	4.4%	2.1%	\$ 13,596
<b>Sub-Total Feasibility Study</b>	<b>364</b>	<b>694</b>	<b>1,084</b>	<b>1,120</b>	<b>47</b>	<b>236</b>	<b>73</b>	<b>127</b>	<b>838</b>	<b>24</b>	<b>160</b>	<b>92</b>	<b>40</b>	<b>4,899</b>			<b>\$ 227,079</b>
<b>% of Hours</b>	7.4%	14.2%	22.1%	22.9%	1.0%	4.8%	1.5%	2.6%	17.1%	0.5%	3.3%	1.9%	0.8%		100.0%		

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**COST ESTIMATE OF CONSULTANT SERVICES  
PHASE I ENGINEERING**

Task	Personnel & Hours													Total Hours	% of Hours (Feas./Pre f.)	% of Hours (Overall)	Labor Cost
	Senior Project Manager	Project Manager	Project Engineer	Design Engineer	Sr. Drainage Engineer	Drainage Engineer	Sr. Structural Engineer	Structural Engineer	Design Technician	Landscape Architect	Digital Rendering Artist	Graphic Designer	Admin. Asst.				
	\$70.00	\$60.00	\$46.00	\$37.00	\$70.00	\$40.00	\$70.00	\$41.00	\$40.00	\$57.00	\$39.00	\$40.00	\$20.00				
<b>PREFERRED IMPROVEMENT</b>																	
<b>1 Traffic Analyses</b>	0	4	32	0	0	0	0	0	0	0	0	0	0	36	0.7%	0.4%	\$ 1,712
<b>2 Alternate Geometric Studies</b>	20	66	174	276	0	0	0	0	84	0	0	0	0	620	11.9%	6.1%	\$ 26,936
<b>3 Subsurface Soils and Pavement Investigation</b>	4	14	30	36	0	0	0	0	0	0	0	0	0	84	1.6%	0.8%	\$ 3,832
<b>4 Preliminary Environmental Site Assessment</b>	0	6	2	0	0	0	0	0	0	0	0	0	0	8	0.2%	0.1%	\$ 452
<b>5 Wetland Study</b>	0	10	2	0	0	0	0	0	0	0	0	0	0	12	0.2%	0.1%	\$ 692
<b>6 Drainage Study</b>	0	8	0	0	66	421	0	0	0	0	0	0	0	495	9.5%	4.9%	\$ 21,940
<b>7 Structural Studies</b>	0	0	0	0	0	0	75	141	2	0	0	0	0	218	4.2%	2.2%	\$ 11,111
<b>8 Highway Traffic Noise Analysis</b>	12	70	88	162	0	0	0	0	68	0	0	0	0	400	7.7%	4.0%	\$ 17,802
<b>9 Air Quality Analysis</b>	0	8	24	32	0	0	0	0	0	0	0	0	0	64	1.2%	0.6%	\$ 2,768
<b>10 Tree Survey</b>	0	10	2	0	0	0	0	0	0	0	0	0	0	12	0.2%	0.1%	\$ 692
<b>11 Section 4(f) Evaluation and Documentation</b>	38	77	98	115	0	0	0	0	88	0	0	0	0	416	8.0%	4.1%	\$ 19,563
<b>12 Section 6(f) Documentation</b>	44	68	88	80	0	0	0	0	60	0	0	0	0	340	6.5%	3.4%	\$ 16,568
<b>13 Detailed Cost Estimate</b>	34	34	60	68	14	28	0	0	0	0	0	0	0	238	4.6%	2.4%	\$ 11,796
<b>14 Project Development Report (Draft)</b>	22	56	100	100	2	4	2	4	100	0	0	0	0	390	7.5%	3.9%	\$ 17,804
<b>15 Public Involvement and Public Hearing</b>	45	81	126	80	0	0	0	0	242	18	120	28	20	760	14.6%	7.5%	\$ 33,672
<b>16 Project Development Report (Final)</b>	6	36	68	60	0	2	0	2	60	0	0	0	0	234	4.5%	2.3%	\$ 10,490

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**COST ESTIMATE OF CONSULTANT SERVICES  
PHASE I ENGINEERING**

Task	Personnel & Hours													Total Hours	% of Hours (Feas./Pre f.)	% of Hours (Overall)	Labor Cost
	Senior Project Manager	Project Manager	Project Engineer	Design Engineer	Sr. Drainage Engineer	Drainage Engineer	Sr. Structural Engineer	Structural Engineer	Design Technician	Landscape Architect	Digital Rendering Artist	Graphic Designer	Admin. Asst.				
	\$70.00	\$60.00	\$46.00	\$37.00	\$70.00	\$40.00	\$70.00	\$41.00	\$40.00	\$57.00	\$39.00	\$40.00	\$20.00				
<b>17 Funding Applications</b>																	
	13	19	79	130	0	0	0	36	0	0	0	18	20	315	6.0%	3.1%	\$ 13,054
<b>18 Agency Coordination</b>																	
	84	76	0	0	0	0	0	0	0	0	0	0	0	160	3.1%	1.6%	\$ 10,440
<b>19 Supervision, Administration, and Project Coordination</b>																	
	158	158	24	24	24	0	24	0	0	0	0	0	0	412	7.9%	4.1%	\$ 25,892
<b>Sub-Total Preferred Improvement</b>	<b>480</b>	<b>801</b>	<b>997</b>	<b>1,163</b>	<b>106</b>	<b>455</b>	<b>101</b>	<b>147</b>	<b>740</b>	<b>18</b>	<b>120</b>	<b>46</b>	<b>40</b>	<b>5,214</b>			\$ 247,216
<b>% of Hours</b>	9.2%	15.4%	19.1%	22.3%	2.0%	8.7%	1.9%	2.8%	14.2%	0.3%	2.3%	0.9%	0.8%	100.0%			
<b>Total Costs</b>	<b>844</b>	<b>1,495</b>	<b>2,081</b>	<b>2,283</b>	<b>153</b>	<b>691</b>	<b>174</b>	<b>274</b>	<b>1,578</b>	<b>42</b>	<b>280</b>	<b>138</b>	<b>80</b>	<b>10,113</b>		100.0%	\$ 474,295
<b>% of Hours</b>	8.3%	14.8%	20.6%	22.6%	1.5%	6.8%	1.7%	2.7%	15.6%	0.4%	2.8%	1.4%	0.8%				
Direct Costs (See Exhibit A-4)																	\$10,392
OH Rate	1.0960																\$519,827
Fixed Fee																	\$145,655
Subconsultants (See Exhibit A-4)																	\$459,875
<b>Total Engineering Cost:</b>																	<b>\$1,610,045</b>

R = Complexity Factor = 0  
DL = Direct Labor  
OH = Overhead = 109.60%  
FF = Fixed Fee = 30.39%  
where FF = 14.5%[DL + R(DL)+OH(DL)+IHDC]

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**WORKHOUR ESTIMATE  
FEASIBILITY STUDY**

Item No.	Task	Senior Project Manager	Project Manager	Project Engineer	Design Engineer	Sr. Drainage Engineer	Drainage Engineer	Sr. Structural Engineer	Structural Engineer	Design Technician	Landscape Architect	Digital Rendering Artist	Graphic Designer	Admin. Asst.	Total Hours	% of Hours
<b>1</b>	<b>Early Coordination and Data Collection</b>															
A.	Collect and review previous studies and existing roadway plans.			4											4	2.2%
B.	Collect Land Use, Zoning, School District, Park District maps and plans.				2										2	1.1%
C.	Obtain public and private utility atlases.			2	4										6	3.2%
D.	Perform project area reconnaissance and prepare photolog.				8					8					16	8.6%
E.	Obtain and review existing signal timings and plans.		2	4											6	3.2%
F.	Prepare Project Program Information (PPI) Form.		2	4											6	3.2%
G.	Prepare and process Environmental Survey Request Forms. Include ground level photos of buildings 40 years or older.		8	20	32					20					80	43.0%
H.	Prepare Initial Coordination Meeting Data Form (BLR 22410)			2	4										6	3.2%
I.	Prepare Addendum Environmental Survey Request forms and exhibits.		8	12	20					20					60	32.3%
	<b>Sub-total Item 1</b>	<b>0</b>	<b>20</b>	<b>48</b>	<b>70</b>	<b>0</b>	<b>0</b>	<b>0</b>	<b>0</b>	<b>48</b>	<b>0</b>	<b>0</b>	<b>0</b>	<b>0</b>	<b>186</b>	<b>100.0%</b>
<b>2</b>	<b>Field Survey and Preparation of Base Maps</b>															
A.	Development of project base sheets.		2	4	6					20					32	200.0%
B.	Weidner Park ownership investigation		4	4											8	50.0%
C.	Coordination with subconsultant.		8												8	50.0%
D.	Field survey QA/QC review including field visit investigation.		4	4	8										16	100.0%
	<b>Sub-total Item 2</b>	<b>0</b>	<b>18</b>	<b>12</b>	<b>14</b>	<b>0</b>	<b>0</b>	<b>0</b>	<b>0</b>	<b>20</b>	<b>0</b>	<b>0</b>	<b>0</b>	<b>0</b>	<b>64</b>	<b>400.0%</b>
<b>3</b>	<b>Crash Analyses</b>															
	<i>Crash analyses will be conducted by a subconsultant - Peralte-Clark LLC</i>															
A.	Coordination with subconsultant.		8												8	28.6%
B.	Crash analysis QA/QC.	4	8	8											20	71.4%
	<b>Sub-total Item 3</b>	<b>4</b>	<b>16</b>	<b>8</b>	<b>0</b>	<b>0</b>	<b>0</b>	<b>0</b>	<b>0</b>	<b>0</b>	<b>0</b>	<b>0</b>	<b>0</b>	<b>0</b>	<b>28</b>	<b>100.00%</b>
<b>4</b>	<b>Traffic Analyses</b>															
<b>A. Existing Traffic Data Collection</b>																
1	24-Hour turning movement traffic counts (6 intersections)				12					12					24	8.6%
3	Reduce and tabulate traffic count data and prepare exhibits.			2						8					10	3.6%
4	Obtain and review existing signal timing data from LCDOT and/or CCDTH.			4											4	1.4%
	<b>Subtotal Task 4-A</b>	<b>0</b>	<b>0</b>	<b>6</b>	<b>12</b>	<b>0</b>	<b>0</b>	<b>0</b>	<b>0</b>	<b>20</b>	<b>0</b>	<b>0</b>	<b>0</b>	<b>0</b>	<b>38</b>	<b>13.6%</b>
<b>B. Checker Road-Schaeffer Road Analysis</b>																
1	Perform license plate study during the A.M. and P.M. peak hours at Checker Road/Arlington Heights Road and Schaeffer Road/Lake Cook Road to confirm presence and magnitude of traffic avoiding the Lake Cook Road/Arlington Heights Road intersection.			4	20										24	8.6%
2	Tabulate number of vehicles during the A.M. and P.M. peak hours that use Checker Road and Schaeffer Road to avoid the Lake Cook Road/Arlington Heights Road intersection and summarize findings.		2	8											10	3.6%
	<b>Subtotal Task 4-B</b>	<b>0</b>	<b>2</b>	<b>12</b>	<b>20</b>	<b>0</b>	<b>0</b>	<b>0</b>	<b>0</b>	<b>0</b>	<b>0</b>	<b>0</b>	<b>0</b>	<b>0</b>	<b>34</b>	<b>12.1%</b>

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**WORKHOUR ESTIMATE  
FEASIBILITY STUDY**

Item No.	Task	Senior Project Manager	Project Manager	Project Engineer	Design Engineer	Sr. Drainage Engineer	Drainage Engineer	Sr. Structural Engineer	Structural Engineer	Design Technician	Landscape Architect	Digital Rendering Artist	Graphic Designer	Admin. Asst.	Total Hours	% of Hours
<b>C. Future Traffic Projections</b>																
1	Obtain and review 2050 traffic projections from CMAP for No-Action and up to five Build alternatives.		2	8											10	3.6%
2	Develop 2050 A.M. and P.M. Design Hourly Volumes (DHVs) for the No-Build alternative as well as each of the five Build alternatives.		4	48											52	18.6%
3	Adjust 2050 Build traffic volumes for each alternative as needed to account for traffic that may return to the Lake Cook/Arlington Heights intersection instead of using Checker Road and Schaeffer Road.		2	8											10	3.6%
<b>Subtotal Task 4-C</b>		<b>0</b>	<b>8</b>	<b>64</b>	<b>0</b>	<b>0</b>	<b>0</b>	<b>0</b>	<b>0</b>	<b>0</b>	<b>0</b>	<b>0</b>	<b>0</b>	<b>0</b>	<b>72</b>	<b>25.7%</b>
<b>D. Traffic Analysis</b>																
1	Develop A.M. and P.M. peak hour Synchro models for the existing roadway network and signal timings.		2	24											26	9.3%
2	Analyze A.M. and P.M. peak hour intersection queues under existing conditions using SimTraffic.		2	4											6	2.1%
3	Develop A.M. and P.M. peak hour Synchro models for 2050 No-Action and five concept alternatives and analyze queues in SimTraffic.		12	72											84	30.0%
4	Summarize and tabulate the results of the Synchro and SimTraffic analyses.		4	16											20	7.1%
<b>Subtotal Task 4-D</b>		<b>0</b>	<b>20</b>	<b>116</b>	<b>0</b>	<b>0</b>	<b>0</b>	<b>0</b>	<b>0</b>	<b>0</b>	<b>0</b>	<b>0</b>	<b>0</b>	<b>0</b>	<b>136</b>	<b>48.6%</b>
<b>Sub-total Item 4</b>		<b>0</b>	<b>30</b>	<b>198</b>	<b>32</b>	<b>0</b>	<b>0</b>	<b>0</b>	<b>0</b>	<b>20</b>	<b>0</b>	<b>0</b>	<b>0</b>	<b>0</b>	<b>280</b>	<b>100.0%</b>
<b>5 Alternate Geometric Studies</b>																
<b>Preliminary Alternative Concepts</b>																
A.	Develop Conceptual typical cross section alternatives.	2	2	8	12					4					28	6.1%
B.	Develop preliminary horizontal geometrics for up to three alternatives.	6	30	80	160										276	60.0%
D.	Analyze pedestrian/bicycle accommodation alternates.	2	8	16	24										50	10.9%
E.	Prepare horizontal plan exhibits.	2	2	4	16					16					40	8.7%
F.	Submit preliminary geometric concepts to Buffalo Grove, CCDTH, and LCDOT for review.	2	2												4	0.9%
G.	Revise concepts based upon review comments.	2	8	16	32					4					62	13.5%
<b>Sub-total Item 5</b>		<b>16</b>	<b>52</b>	<b>124</b>	<b>244</b>	<b>0</b>	<b>0</b>	<b>0</b>	<b>0</b>	<b>24</b>	<b>0</b>	<b>0</b>	<b>0</b>	<b>0</b>	<b>460</b>	<b>100.0%</b>
<b>6 Drainage Study</b>																
<b>Existing Drainage</b>																
A.	Prepare General Location Drainage Map.					1	8								9	3.2%
B.	Prepare Existing Drainage Plan Exhibits		4			10	80								94	33.7%
<b>Proposed Drainage</b>																
A.	Develop Alternatives for Stormwater Detention					2	24								26	9.3%
B.	Develop Alternatives for Floodplain Compensatory Storage					2	12								14	5.0%
C.	Develop Alternatives for Proposed Drainage Design		2			10	32								44	15.8%
<b>Drainage Technical Memorandum</b>																
A.	Prepare Preliminary Drainage Technical Memorandum		2			10	80								92	33.0%
<b>Sub-total Item 6</b>		<b>0</b>	<b>8</b>	<b>0</b>	<b>0</b>	<b>35</b>	<b>236</b>	<b>0</b>	<b>0</b>	<b>0</b>	<b>0</b>	<b>0</b>	<b>0</b>	<b>0</b>	<b>279</b>	<b>100.0%</b>

Lake Cook Road West Phase I Study  
Arlington Heights Road to Raupp Boulevard  
Village of Buffalo Grove

**WORKHOUR ESTIMATE  
FEASIBILITY STUDY**

Item No.	Task	Senior Project Manager	Project Manager	Project Engineer	Design Engineer	Sr. Drainage Engineer	Drainage Engineer	Sr. Structural Engineer	Structural Engineer	Design Technician	Landscape Architect	Digital Rendering Artist	Graphic Designer	Admin. Asst.	Total Hours	% of Hours
<b>7</b>	<b>Structural Studies</b>															
A.	Detailed inspection of the existing bridge carrying Lake Cook Road over Buffalo Creek (SN 016-3203)							24	24						48	25.5%
B.	Prepare BCR for the Lake Cook Road Bridge over Buffalo Creek							32	88						120	63.8%
C.	Respond to BCR review comments							4	12						16	8.5%
D.	Coordination with subconsultant.							1	3						4	2.1%
	<b>Sub-total Item 7</b>	<b>0</b>	<b>0</b>	<b>0</b>	<b>0</b>	<b>0</b>	<b>0</b>	<b>61</b>	<b>127</b>	<b>0</b>	<b>0</b>	<b>0</b>	<b>0</b>	<b>0</b>	<b>188</b>	<b>100.0%</b>
<b>8</b>	<b>Preliminary Highway Traffic Noise Analysis</b>															
A.	Conduct field measurements to quantify the level of existing highway noise at five receptor locations.		6	6	12										24	8.0%
B.	Validate the FHWA Traffic Noise Model based on field measurements.		4	16	60										80	26.7%
C.	Predict existing highway noise levels at 18 sensitive receptors using the FHWA Traffic Noise Model.		12	12	30										54	18.0%
D.	Perform highway noise analysis for 2050 No-Action Alternative.		4	6	20										30	10.0%
E.	Perform preliminary highway noise analysis for 2050 for three alts.	2	12	20	78										112	37.3%
	<b>Sub-total Item 8</b>	<b>2</b>	<b>38</b>	<b>60</b>	<b>200</b>	<b>0</b>	<b>0</b>	<b>0</b>	<b>0</b>	<b>0</b>	<b>0</b>	<b>0</b>	<b>0</b>	<b>0</b>	<b>300</b>	<b>100.0%</b>
<b>9</b>	<b>Development of Project Purpose &amp; Need</b>															
A.	Develop Purpose and Need Statement report text	8	20	32											60	34.5%
B.	Prepare exhibits to support the Purpose and Need		2	12	16					32					62	35.6%
C.	Document revisions (up to two revisions)	8	8	16						20					52	29.9%
	<b>Sub-total Item 9</b>	<b>16</b>	<b>30</b>	<b>60</b>	<b>16</b>	<b>0</b>	<b>0</b>	<b>0</b>	<b>0</b>	<b>52</b>	<b>0</b>	<b>0</b>	<b>0</b>	<b>0</b>	<b>174</b>	<b>100.0%</b>
<b>10</b>	<b>Alternatives to be Carried Forward</b>															
A.	Determine alternative evaluation criteria.		2	4	4										10	2.4%
B.	Evaluate and quantify alternative impacts for three corridor and three intersection alternatives.	4	16	24	40										84	20.3%
C.	Evaluate measures to avoid, minimize, or mitigate impacts for three corridor and three intersection alternatives.	4	8	20	20										52	12.6%
D.	Develop Alternatives to be Carried Forward report text	8	20	40	40										108	26.1%
E.	Prepare exhibits to support the Alternatives to be Carried Forward			10	20					40					70	16.9%
F.	Document revisions (up to two revisions)	10	20	20	20					20					90	21.7%
	<b>Sub-total Item 10</b>	<b>26</b>	<b>66</b>	<b>118</b>	<b>144</b>	<b>0</b>	<b>0</b>	<b>0</b>	<b>0</b>	<b>60</b>	<b>0</b>	<b>0</b>	<b>0</b>	<b>0</b>	<b>414</b>	<b>100.0%</b>
<b>11</b>	<b>Preliminary Cost Estimates</b>															
A.	Prepare order of magnitude costs for up to three corridor alternatives and three intersection alternatives.	4	8	24	40										76	73.1%
B.	Revise cost estimates (up to one revision).	2	2	8	16										28	26.9%
	<b>Sub-total Item 11</b>	<b>6</b>	<b>10</b>	<b>32</b>	<b>56</b>	<b>0</b>	<b>0</b>	<b>0</b>	<b>0</b>	<b>0</b>	<b>0</b>	<b>0</b>	<b>0</b>	<b>0</b>	<b>104</b>	<b>100.0%</b>

Lake Cook Road West Phase I Study  
Arlington Heights Road to Raupp Boulevard  
Village of Buffalo Grove

**WORKHOUR ESTIMATE  
FEASIBILITY STUDY**

Item No.	Task	Senior Project Manager	Project Manager	Project Engineer	Design Engineer	Sr. Drainage Engineer	Drainage Engineer	Sr. Structural Engineer	Structural Engineer	Design Technician	Landscape Architect	Digital Rendering Artist	Graphic Designer	Admin. Asst.	Total Hours	% of Hours
<b>12</b>	<b>Public Involvement</b>															
	<b>Stakeholder Involvement Group Meetings (Assume Two Meetings)</b>															
A.	Selection of and coordination with meeting venue.		4												4	0.3%
B.	Preparation of meeting exhibits.	4	8	16	16				160				16		220	14.1%
C.	Preparation of SIG meeting presentation.	8	16	32	32										88	5.7%
D.	Preparation for and attendance at dry run with Village and County staff.	16	16	16						16					64	4.1%
E.	Attendance at meeting.	8	8	8											24	1.5%
F.	Preparation of meeting minutes.		8	16											24	1.5%
	<b>Public Information Meetings (Assume Two Meetings)</b>															
A.	Selection of and coordination with meeting venue for in person meeting.		4												4	0.3%
B.	Preparation of public meeting newspaper display advertisement.		4	4											8	0.5%
C.	Preparation of public meeting brochure.	6	4	8					4				8	8	38	2.4%
D.	Preparation and distribution of public meeting notification letters.		2	8	8									32	50	3.2%
E.	Preparation of public meeting exhibits (includes 3D model and rendering).	16	16	24	16					300	24	160	16		572	36.8%
F.	Preparation of PowerPoint presentation	4	8	32	48										92	5.9%
G.	Preparation for and attendance at dry run with Village and County staff.	8	8	16						4					36	2.3%
H.	Attendance at in person public meeting.	8	8	8											24	1.5%
I.	Attendance at virtual public meeting.	8	8	8	8										32	2.1%
J.	Preparation of meeting minutes and disposition of public meeting comments.	4	20	40											64	4.1%
	<b>Project Branding</b>															
A.	Development of project branding for public materials and website.	2	2										20		24	1.5%
	<b>Stakeholder Involvement Plan (SIP)</b>															
A.	Development of SIP.	4	8	8	16										36	2.3%
B.	Revision of SIP (up to one revision).		4	4											8	0.5%
B.	Update of SIP (up to one update).		4	4											8	0.5%
	<b>Project Website</b>															
A.	Initial setup and preparation of project website.		2	8	32								24		66	4.2%
B.	Website updates.		2	4	16								8		30	1.9%
C.	Respond to website inquiries.		4	4	8										16	1.0%
	<b>Drone Photography</b>															
A.	Collection of drone photography (one site visit).								4						4	0.3%
B.	Aerial mapping updates.								10						10	0.6%
	<b>PEL Documentation</b>															
A.	Provide summary documentation of public engagement activities.		2	4	4										10	0.6%
	<b>Sub-total Item 12</b>	<b>96</b>	<b>170</b>	<b>272</b>	<b>204</b>	<b>0</b>	<b>0</b>	<b>0</b>	<b>0</b>	<b>498</b>	<b>24</b>	<b>160</b>	<b>92</b>	<b>40</b>	<b>1556</b>	<b>100.0%</b>
<b>13</b>	<b>Draft PEL Report</b>															
A.	Documentation of existing conditions.	2	4	16	20				20						62	20.7%
B.	Incorporation of Purpose and Need, Alternatives Carried Forward, and public engagement activities.			8	16										24	8.0%
C.	Completion of PEL Questionnaire.	2	8	8	16										34	11.3%
D.	Report exhibits and appendices.		8	16	20				40						84	28.0%
E.	Documentation of agency coordination.	2	8	16	20										46	15.3%
F.	One revision of Draft PEL Report.	2	16	16					16						50	16.7%
	<b>Sub-total Item 13</b>	<b>8</b>	<b>44</b>	<b>80</b>	<b>92</b>	<b>0</b>	<b>0</b>	<b>0</b>	<b>0</b>	<b>76</b>	<b>0</b>	<b>0</b>	<b>0</b>	<b>0</b>	<b>300</b>	<b>100.0%</b>

Lake Cook Road West Phase I Study  
Arlington Heights Road to Raupp Boulevard  
Village of Buffalo Grove

**WORKHOUR ESTIMATE  
FEASIBILITY STUDY**

Item No.	Task	Senior Project Manager	Project Manager	Project Engineer	Design Engineer	Sr. Drainage Engineer	Drainage Engineer	Sr. Structural Engineer	Structural Engineer	Design Technician	Landscape Architect	Digital Rendering Artist	Graphic Designer	Admin. Asst.	Total Hours	% of Hours
<b>14</b>	<b>Final PEL Report</b>															
A.	Disposition of comments.	2	4	8	16										30	31.3%
B.	Revision of report and appendices.	4	6	16	20				20						66	68.8%
	<b>Sub-total Item 14</b>	<b>6</b>	<b>10</b>	<b>24</b>	<b>36</b>	<b>0</b>	<b>0</b>	<b>0</b>	<b>0</b>	<b>20</b>	<b>0</b>	<b>0</b>	<b>0</b>	<b>0</b>	<b>96</b>	<b>100.0%</b>
<b>15</b>	<b>Funding Application</b>															
A.	Update 2021 Invest in Cook Application and supporting materials.	2	4	8					16						30	75.0%
B.	Review application with the Village and revise up to one time.	2	4						4						10	25.0%
	<b>Sub-total Item 15</b>	<b>4</b>	<b>8</b>	<b>8</b>	<b>0</b>	<b>0</b>	<b>0</b>	<b>0</b>	<b>0</b>	<b>20</b>	<b>0</b>	<b>0</b>	<b>0</b>	<b>0</b>	<b>40</b>	<b>100.0%</b>
<b>16</b>	<b>Agency Coordination</b>															
A.	Bi-weekly meetings with Village/CCDTH/LCDOT staff. Assume 26 meetings through Feasibility Study.	26	26												52	24.3%
B.	Preparation for and attendance at IDOT Kickoff meeting.	2	4	4											10	4.7%
B.	Preparation for and attendance at 5 meetings with IDOT/FHWA.	40	20												60	28.0%
C.	Development of Timeframes Agreement.	8	16	16											40	18.7%
D.	Preparation of letters to Tribes at Purpose and Need and Alternatives Carried Forward coordination points. Includes up to one revision at each point.	4	8	8											20	9.3%
E.	Preparation for and attendance at 2 Village board meetings.	16	16												32	15.0%
	<b>Sub-total Item 16</b>	<b>96</b>	<b>90</b>	<b>28</b>	<b>0</b>	<b>0</b>	<b>0</b>	<b>0</b>	<b>0</b>	<b>0</b>	<b>0</b>	<b>0</b>	<b>0</b>	<b>0</b>	<b>214</b>	<b>100.0%</b>
<b>17</b>	<b>Supervision, Administration, and Project Coordination</b>															
A.	Project setup, monthly invoicing, status reports & schedule monitoring.	12	12												24	11.1%
B.	Client Coordination.	40	40												80	37.0%
C.	In-House coordination meetings.	12	12	12	12	12		12							72	33.3%
D.	Quality Assurance/Quality Control In-House Reviews	20	20												40	18.5%
	<b>Sub-total Item 17</b>	<b>84</b>	<b>84</b>	<b>12</b>	<b>12</b>	<b>12</b>	<b>0</b>	<b>12</b>	<b>0</b>	<b>0</b>	<b>0</b>	<b>0</b>	<b>0</b>	<b>0</b>	<b>216</b>	<b>100.0%</b>
	<b>Total Hours:</b>	<b>364</b>	<b>694</b>	<b>1084</b>	<b>1120</b>	<b>47</b>	<b>236</b>	<b>73</b>	<b>127</b>	<b>838</b>	<b>24</b>	<b>160</b>	<b>92</b>	<b>40</b>	<b>4899</b>	
	<b>% of Hours:</b>	<b>7.4%</b>	<b>14.2%</b>	<b>22.1%</b>	<b>22.9%</b>	<b>1.0%</b>	<b>4.8%</b>	<b>1.5%</b>	<b>2.6%</b>	<b>17.1%</b>	<b>0.5%</b>	<b>3.3%</b>	<b>1.9%</b>	<b>0.8%</b>	<b>100.0%</b>	



Lake Cook Road West Phase I Study  
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**WORKHOUR ESTIMATE  
PREFERRED IMPROVEMENT PLAN**

Item No.	Task	Senior Project Manager	Project Manager	Project Engineer	Design Engineer	Sr. Drainage Engineer	Drainage Engineer	Sr. Structural Engineer	Structural Engineer	Design Technician	Landscape Architect	Digital Rendering Artist	Graphic Designer	Admin. Asst.	Total Hours	% of Hours
<b>1</b>	<b>Traffic Analyses</b>															
A.	QA/QC for Intersection Design Studies		4	32											36	100.0%
	<b>Sub-total Item 1</b>	<b>0</b>	<b>4</b>	<b>32</b>	<b>0</b>	<b>0</b>	<b>0</b>	<b>0</b>	<b>0</b>	<b>0</b>	<b>0</b>	<b>0</b>	<b>0</b>	<b>0</b>	<b>36</b>	<b>100.0%</b>
<b>2</b>	<b>Alternate Geometric Studies</b>															
A.	Prepare detailed horizontal geometrics on topographic base sheets.	6	24	40	80										150	24.2%
B.	Define vertical roadway geometrics including detailed analysis of proposed roadway cross sections.	6	24	82	100										212	34.2%
C.	Determine right-of-way acquisition and grading easement limits.	2	2	8	16										28	4.5%
D.	Quantify environmental impacts.	2	4	12	16										34	5.5%
E.	Design vehicle turning-template analyses using AutoTURN software.		2	4	12										18	2.9%
F.	Prepare plan and profile exhibits.	2	8	16	40					80					146	23.5%
G.	Field visit verify proposed improvement plan considerations. (Two visits)			8	8										16	2.6%
H.	Prepare and submit detailed geometrics, traffic and crash data, and environmental impacts to the County and Villages.	2	2	4	4					4					16	2.6%
	<b>Sub-total Item 2</b>	<b>20</b>	<b>66</b>	<b>174</b>	<b>276</b>	<b>0</b>	<b>0</b>	<b>0</b>	<b>0</b>	<b>84</b>	<b>0</b>	<b>0</b>	<b>0</b>	<b>0</b>	<b>620</b>	<b>100.0%</b>
<b>3</b>	<b>Subsurface Soils and Pavement Investigation</b>															
	<i>The geotechnical investigations will be conducted by a subconsultant - Midland Standard Engineering and Testing, Inc.</i>															
A.	Review Soils Report.		2	2											4	4.8%
B.	Meetings with Village/Counties.	4	4	4											12	14.3%
C.	Pavement Type Analysis Memorandum.		4	8	16										28	33.3%
D.	Pavement design.		4	16	20										40	47.6%
	<b>Sub-total Item 3</b>	<b>4</b>	<b>14</b>	<b>30</b>	<b>36</b>	<b>0</b>	<b>0</b>	<b>0</b>	<b>0</b>	<b>0</b>	<b>0</b>	<b>0</b>	<b>0</b>	<b>0</b>	<b>84</b>	<b>100.0%</b>
<b>4</b>	<b>Preliminary Environmental Site Assessment</b>															
	<i>The PESA will be conducted by a subconsultant - True North Consultants</i>															
A.	Subconsultant coordination.		4												4	50.0%
B.	Review PESA report.		2	2											4	50.0%
	<b>Sub-total Item 4</b>	<b>0</b>	<b>6</b>	<b>2</b>	<b>0</b>	<b>0</b>	<b>0</b>	<b>0</b>	<b>0</b>	<b>0</b>	<b>0</b>	<b>0</b>	<b>0</b>	<b>0</b>	<b>8</b>	<b>100.0%</b>
<b>5</b>	<b>Wetland Study</b>															
	<i>The Wetland Study will be conducted by a subconsultant - Huff &amp; Huff, Inc.</i>															
A.	Subconsultant coordination.		8												8	66.7%
B.	Review Wetland Report.		2	2											4	33.3%
	<b>Sub-total Item 5</b>	<b>0</b>	<b>10</b>	<b>2</b>	<b>0</b>	<b>0</b>	<b>0</b>	<b>0</b>	<b>0</b>	<b>0</b>	<b>0</b>	<b>0</b>	<b>0</b>	<b>0</b>	<b>12</b>	<b>100.0%</b>

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PREFERRED IMPROVEMENT PLAN**

Item No.	Task	Senior Project Manager	Project Manager	Project Engineer	Design Engineer	Sr. Drainage Engineer	Drainage Engineer	Sr. Structural Engineer	Structural Engineer	Design Technician	Landscape Architect	Digital Rendering Artist	Graphic Designer	Admin. Asst.	Total Hours	% of Hours
<b>6</b>	<b>Drainage Study</b>															
	<b>Existing Drainage</b>															
	A. Update General Location Drainage Map.					1	1								2	0.4%
	B. Update Existing Drainage Plan Exhibits					1	8								9	1.8%
	<b>Proposed Drainage</b>															
	A. Stormwater Detention Analysis					4	24								28	5.7%
	B. Floodplain Compensatory Storage Analysis					2	12								14	2.8%
	C. ROW Analysis					2	16								18	3.6%
	D. Prepare Proposed Drainage Plan Exhibits		4			20	120								144	29.1%
	E. Buffalo Creek Bridge Hydraulic Analysis					16	120								136	27.5%
	<b>Drainage Technical Memorandum</b>															
	A. Prepare Drainage Technical Memorandum (Exhibits and Calculations)		4			20	120								144	29.1%
	<b>Sub-total Item 6</b>	<b>0</b>	<b>8</b>	<b>0</b>	<b>0</b>	<b>66</b>	<b>421</b>	<b>0</b>	<b>0</b>	<b>0</b>	<b>0</b>	<b>0</b>	<b>0</b>	<b>0</b>	<b>495</b>	<b>100.0%</b>
<b>7</b>	<b>Structural Studies</b>															
	A. Prepare TSL for Lake Cook Rd Bridge over Buffalo Creek							40	100	2					142	65.1%
	B. Assist with preparation on BLR 10210 form							2	6						8	3.7%
	C. Prepare Construction Cost Estimates							4	4						8	3.7%
	D. Respond to TSL review comments							4	12						16	7.3%
	E. Estimate Construction Cost for Miscellaneous Retaining Walls							8	16						24	11.0%
	F. Attend project review meeting (4 meetings)							16							16	7.3%
	G. Coordination with subconsultant.							1	3						4	1.8%
	<b>Sub-total Item 7</b>	<b>0</b>	<b>0</b>	<b>0</b>	<b>0</b>	<b>0</b>	<b>0</b>	<b>75</b>	<b>141</b>	<b>2</b>	<b>0</b>	<b>0</b>	<b>0</b>	<b>0</b>	<b>218</b>	<b>100.0%</b>
<b>8</b>	<b>Highway Traffic Noise Analysis</b>															
	A. Perform highway noise analysis for 2050 preferred improvement plan and identify impacts.		6	8	28										42	10.5%
	B. Evaluate the feasibility of noise barriers at five locations.		6	6	18										30	7.5%
	C. Evaluate the noise reduction design goal and cost reasonableness of barriers at five locations. Assume walls are feasible and reasonable at four locations.		2	4	8										14	3.5%
	D. Prepare Draft Highway Noise Analysis Technical Memorandum for the preferred alternative and submit to Village, Counties, and IDOT for review and comment. Includes some time for modeling revisions based on comments.		12	16	52					40					120	30.0%
	E. Prepare for and conduct two meetings with the benefited receptors at the four locations. (Two locations per meeting).	8	24	24	24										80	20.0%
	F. Prepare Pre-Final Highway Noise Analysis Technical Memorandum for the preferred alternative and submit to Village, Counties, and IDOT/FHWA for review and comment.	2	6	12	12					16					48	12.0%
	G. Revise Tech Memo and exhibits. Submit Final Tech Memo for "no further comments" finding from IDOT/FHWA.	2	12	18	18					12					62	15.5%
	H. Transmit noise analysis report to local planning officials.		2		2										4	1.0%
	<b>Sub-total Item 8</b>	<b>12</b>	<b>70</b>	<b>88</b>	<b>162</b>	<b>0</b>	<b>0</b>	<b>0</b>	<b>0</b>	<b>68</b>	<b>0</b>	<b>0</b>	<b>0</b>	<b>0</b>	<b>400</b>	<b>100.0%</b>

Lake Cook Road West Phase I Study  
Arlington Heights Road to Raupp Boulevard  
Village of Buffalo Grove

**WORKHOUR ESTIMATE  
PREFERRED IMPROVEMENT PLAN**

Item No.	Task	Senior Project Manager	Project Manager	Project Engineer	Design Engineer	Sr. Drainage Engineer	Drainage Engineer	Sr. Structural Engineer	Structural Engineer	Design Technician	Landscape Architect	Digital Rendering Artist	Graphic Designer	Admin. Asst.	Total Hours	% of Hours
<b>9</b>	<b>Air Quality Analysis</b>															
A.	Prepare/Submit COSIM Pre-Screen input data sheet to IDOT for analysis. (3 intersections)		2	8	16										26	40.6%
B.	If the location fails the Pre-Screening, prepare full COSIM 4.0 input data worksheets and submit for analysis.		2	4	16										22	34.4%
C.	Document MSAT and PM 2.5/PM 10 Requirements.		2	4											6	9.4%
D.	Write air quality analysis text.		2	8											10	15.6%
	<b>Sub-total Item 9</b>	<b>0</b>	<b>8</b>	<b>24</b>	<b>32</b>	<b>0</b>	<b>0</b>	<b>0</b>	<b>0</b>	<b>0</b>	<b>0</b>	<b>0</b>	<b>0</b>	<b>0</b>	<b>64</b>	<b>100.0%</b>
<b>10</b>	<b>Tree Survey</b>															
	<i>The Tree Survey will be conducted by a subconsultant - Huff &amp; Huff, Inc.</i>															
A.	Subconsultant coordination.		8												8	66.7%
B.	Review Tree Survey Report.		2	2											4	33.3%
	<b>Sub-total Item 10</b>	<b>0</b>	<b>10</b>	<b>2</b>	<b>0</b>	<b>0</b>	<b>0</b>	<b>0</b>	<b>0</b>	<b>0</b>	<b>0</b>	<b>0</b>	<b>0</b>	<b>0</b>	<b>12</b>	<b>100.0%</b>
<b>11</b>	<b>Section 4(f) Evaluation and Documentation</b>															
A.	Prepare for and attend IDOT/FHWA coordination meeting to determine level of documentation. <i>Assume separate evaluations of five properties, including the following:</i>	4	4	8						8					24	5.8%
B.	Describe the property, facilities, and functions.	5	10	20	20										55	13.2%
C.	Document efforts to avoid impacts to the property.	5	5	10	10										30	7.2%
D.	If avoidance is not prudent or feasible, document measures to minimize impacts.	5	5	5	5										20	4.8%
E.	Describe all permanent or temporary impacts to the property and whether they may cause adverse effects.	5	20	20	40										85	20.4%
F.	Prepare report exhibits.		5	15	40					40					100	24.0%
G.	Revise report based upon review comments and prepare final documentation.	4	8							20					32	7.7%
H.	Attend meetings with property owner. Assume two meetings for each owner.	10	20	20						20					70	16.8%
	<b>Sub-total Item 11</b>	<b>38</b>	<b>77</b>	<b>98</b>	<b>115</b>	<b>0</b>	<b>0</b>	<b>0</b>	<b>0</b>	<b>88</b>	<b>0</b>	<b>0</b>	<b>0</b>	<b>0</b>	<b>416</b>	<b>100.0%</b>
<b>12</b>	<b>Section 6(f) Documentation</b>															
A.	Document efforts to avoid impacts to the property.	2	4	4	8										18	5.3%
B.	If avoidance is not prudent or feasible, document measures to minimize impacts.	2	4	4	8										18	5.3%
C.	Describe all permanent or temporary impacts to the property.	2	8	16	16										42	12.4%
D.	Identify replacement property, if applicable.	16	16	16											48	14.1%
E.	Prepare appropriate documentation form(s) and supporting exhibits.	2	20	40	40					40					142	41.8%
F.	Coordinate with LCFPD, IDNR and NPS. Assume two meetings.	16	8												24	7.1%
G.	Revise documentation (two times) for approval.	4	8	8	8					20					48	14.1%
	<b>Sub-total Item 12</b>	<b>44</b>	<b>68</b>	<b>88</b>	<b>80</b>	<b>0</b>	<b>0</b>	<b>0</b>	<b>0</b>	<b>60</b>	<b>0</b>	<b>0</b>	<b>0</b>	<b>0</b>	<b>340</b>	<b>100.0%</b>
<b>13</b>	<b>Detailed Cost Estimate</b>															
A.	Detailed estimate of construction costs.	10	10	40	40	10	20								130	54.6%
B.	Temporary and/or permanent acquisition cost estimates.	16	16		8										40	16.8%
C.	Revise cost estimates (up to two revisions).	8	8	20	20	4	8								68	28.6%
	<b>Sub-total Item 13</b>	<b>34</b>	<b>34</b>	<b>60</b>	<b>68</b>	<b>14</b>	<b>28</b>	<b>0</b>	<b>0</b>	<b>0</b>	<b>0</b>	<b>0</b>	<b>0</b>	<b>0</b>	<b>238</b>	<b>100.0%</b>

Lake Cook Road West Phase I Study  
Arlington Heights Road to Raupp Boulevard  
Village of Buffalo Grove

**WORKHOUR ESTIMATE  
PREFERRED IMPROVEMENT PLAN**

Item No.	Task	Senior Project Manager	Project Manager	Project Engineer	Design Engineer	Sr. Drainage Engineer	Drainage Engineer	Sr. Structural Engineer	Structural Engineer	Design Technician	Landscape Architect	Digital Rendering Artist	Graphic Designer	Admin. Asst.	Total Hours	% of Hours
<b>14</b>	<b>Project Development Report (Draft)</b>															
A.	Write, proofread and edit the Draft PDR.	8	20	40	40	2	4	2	4						120	30.8%
B.	Prepare report exhibits and appendices.	8	20	40	40					80					188	48.2%
C.	Provide Draft PDR for Village/CCDTH/LCDOT review.		4												4	1.0%
D.	Provide a disposition of comments and revise Draft PDR up to one time.	2	8	20	20					20					70	17.9%
E.	Attend review meeting/phone conference with the Village and IDOT, if required.	4	4												8	2.1%
	<b>Sub-total Item 14</b>	<b>22</b>	<b>56</b>	<b>100</b>	<b>100</b>	<b>2</b>	<b>4</b>	<b>2</b>	<b>4</b>	<b>100</b>	<b>0</b>	<b>0</b>	<b>0</b>	<b>0</b>	<b>390</b>	<b>100.0%</b>
<b>15</b>	<b>Public Involvement and Public Hearing</b>															
	<b>Stakeholder Involvement Group Meeting</b>															
A.	Selection of and coordination with meeting venue.		2												2	0.3%
B.	Preparation of meeting exhibits.	2	4	8	8					80			8		110	14.5%
C.	Preparation of SIG meeting presentation.	4	8	16	16										44	5.8%
D.	Preparation for and attendance at dry run with Village and County staff.	8	8	8						8					32	4.2%
E.	Attendance at meeting.	4	4	4											12	1.6%
F.	Preparation of meeting minutes.		4	8											12	1.6%
	<b>Public Hearing</b>															
A.	Selection of and coordination with meeting venue.		2												2	0.3%
B.	Preparation of public hearing newspaper display ad.		2	2											4	0.5%
C.	Preparation of public hearing brochure.	3	2	4						2			4	4	19	2.5%
D.	Distribution of public meeting notification letters.		1	4	4									16	25	3.3%
E.	Preparation of public hearing exhibits (includes 3D model and rendering)	8	12	12	8					150	18	120	8		336	44.2%
F.	Preparation of public hearing PowerPoint presentation.	2	4	16	24										46	6.1%
G.	Preparation for and attendance at public hearing dry run with Village/County staff.	4	4	8						2					18	2.4%
H.	Attendance at public hearing.	4	4	4											12	1.6%
I.	Preparation of public hearing transcript (by court reporter).	4	4	4	4										16	2.1%
J.	Disposition of public hearing comments.	2	10	20											32	4.2%
	<b>Stakeholder Involvement Plan (SIP)</b>															
A.	Update/revision of SIP (up to one update).		4	4											8	1.1%
	<b>Project Website</b>															
A.	Website updates.		2	4	16								8		30	3.9%
	<b>Sub-total Item 15</b>	<b>45</b>	<b>81</b>	<b>126</b>	<b>80</b>	<b>0</b>	<b>0</b>	<b>0</b>	<b>0</b>	<b>242</b>	<b>18</b>	<b>120</b>	<b>28</b>	<b>20</b>	<b>760</b>	<b>95.0%</b>
<b>16</b>	<b>Project Development Report (Final)</b>															
A.	Prepare a disposition of IDOT comments on draft PDR.	2	8	8											18	7.7%
B.	Revise, proofread, and edit the draft PDR report.	2	8	20	20		2		2	20					74	31.6%
C.	Revise draft PDR exhibits and appendices.		8	20	20					20					68	29.1%
D.	Provide Pre-Final PDR for Village/CCDTH/LCDOT review.		4												4	1.7%
E.	Provide a disposition of comments and revise Pre-Final PDR up to one time.	2	8	20	20					20					70	29.9%
	<b>Sub-total Item 16</b>	<b>6</b>	<b>36</b>	<b>68</b>	<b>60</b>	<b>0</b>	<b>2</b>	<b>0</b>	<b>2</b>	<b>60</b>	<b>0</b>	<b>0</b>	<b>0</b>	<b>0</b>	<b>234</b>	<b>100.0%</b>

Lake Cook Road West Phase I Study  
Arlington Heights Road to Raupp Boulevard  
Village of Buffalo Grove

**WORKHOUR ESTIMATE  
PREFERRED IMPROVEMENT PLAN**

Item No.	Task	Senior Project Manager	Project Manager	Project Engineer	Design Engineer	Sr. Drainage Engineer	Drainage Engineer	Sr. Structural Engineer	Structural Engineer	Design Technician	Landscape Architect	Digital Rendering Artist	Graphic Designer	Admin. Asst.	Total Hours	% of Hours
<b>17</b>	<b>Funding Applications</b>															
	<b>STP-Shared Fund/CMAQ Application</b>															
	A. Prepare Funding Application text.		1	8	10					2			2	2	25	7.9%
	B. Prepare Application Exhibits.	1	1	4	8					2					16	5.1%
	C. Review Funding Application with the Village.	1	1	2	2										6	1.9%
	D. Revise Funding Applications based on Village Review (up to one revision).		1	2	2										5	1.6%
	E. Submit Funding Application	1	1	1	0									1	4	1.3%
	F. Complete Quarterly Progress Forms (if funds are awarded).	4	4												8	2.5%
	<b>RAISE Grant Application</b>															
	A. Prepare Funding Application text.		2	32	60					16			16	16	142	45.1%
	B. Prepare Cost-Benefit Analysis and Application Exhibits.	2	2	20	40					16					80	25.4%
	C. Review Funding Application with the Village.	2	2	4	4										12	3.8%
	D. Revise Funding Applications based on Village Review (up to one revision).		2	4	4										10	3.2%
	E. Submit Funding Application	2	2	2										1	7	2.2%
	<b>Sub-total Item 17</b>	<b>13</b>	<b>19</b>	<b>79</b>	<b>130</b>	<b>0</b>	<b>0</b>	<b>0</b>	<b>0</b>	<b>36</b>	<b>0</b>	<b>0</b>	<b>18</b>	<b>20</b>	<b>315</b>	<b>100.0%</b>
<b>18</b>	<b>Agency Coordination</b>															
	A. Bi-weekly meetings with Village/CCDTH/LCDOT staff. Assume 52 meetings through Preferred Alternative study.	52	52												104	65.0%
	B. Preparation for and attendance at 2 meetings with IDOT/FHWA.	16	8												24	15.0%
	D. Preparation for and attendance at 2 Village board meetings.	16	16												32	20.0%
	<b>Sub-total Item 18</b>	<b>84</b>	<b>76</b>	<b>0</b>	<b>0</b>	<b>0</b>	<b>0</b>	<b>0</b>	<b>0</b>	<b>0</b>	<b>0</b>	<b>0</b>	<b>0</b>	<b>0</b>	<b>160</b>	<b>100.0%</b>
<b>19</b>	<b>Supervision, Administration, and Project Coordination</b>															
	A. Project setup, monthly invoicing, status reports & schedule monitoring.	24	24												48	11.7%
	B. Client Coordination.	80	80												160	38.8%
	C. In-House coordination meetings.	24	24	24	24	24		24							144	35.0%
	D. Quality Assurance/Quality Control In-House Reviews	30	30												60	14.6%
	<b>Sub-total Item 19</b>	<b>158</b>	<b>158</b>	<b>24</b>	<b>24</b>	<b>24</b>	<b>0</b>	<b>24</b>	<b>0</b>	<b>0</b>	<b>0</b>	<b>0</b>	<b>0</b>	<b>0</b>	<b>412</b>	<b>100.0%</b>
	<b>Total Hours:</b>	<b>480</b>	<b>801</b>	<b>997</b>	<b>1163</b>	<b>106</b>	<b>455</b>	<b>101</b>	<b>147</b>	<b>740</b>	<b>18</b>	<b>120</b>	<b>46</b>	<b>40</b>	<b>5214</b>	
	<b>% of Hours:</b>	<b>9.2%</b>	<b>15.4%</b>	<b>19.1%</b>	<b>22.3%</b>	<b>2.0%</b>	<b>8.7%</b>	<b>1.9%</b>	<b>2.8%</b>	<b>14.2%</b>	<b>0.3%</b>	<b>2.3%</b>	<b>0.9%</b>	<b>0.8%</b>	<b>100.0%</b>	

**Lake Cook Road West Phase I Study  
Arlington Heights Road to Raupp Boulevard  
Village of Buffalo Grove**

**PHASE I ENGINEERING  
DIRECT COSTS AND SUBCONSULTANT SERVICES**

				Direct Cost	Subconsultant Expense
<b>FEASIBILITY STUDY</b>					
<b>Item 1 Early Coordination and Data Collection</b>					
<b>Mileage</b>					
2 trips @	40 miles @	\$0.585		\$46.80	
Subconsultant Expense - Peralte-Clark LLC					
Field Visits					\$2,186.00
See Attachment C					
<b>Item 2 Field Survey and Preparation of Base Maps</b>					
<b>Mileage</b>					
1 trip @	40 miles @	\$0.585		\$23.40	
Subconsultant Expense - Gewalt Hamilton Associates					
Topographic Survey				\$	89,941.00
See Attachment B					
<b>Item 3 Crash Analyses</b>					
Subconsultant Expense - Peralte-Clark LLC					
Crash Analyses					\$28,500.00
See Attachment C					
<b>Item 4 Traffic Analyses</b>					
Video Count Data Reduction	6 locations at \$400 each			\$2,400.00	
<b>Mileage</b>					
12 trips @	40 miles @	\$0.585		\$280.80	
Subconsultant Expense - Peralte-Clark LLC					
Alternate Geometric Studies					\$7,222.00
See Attachment C					
<b>Item 5 Alternate Geometric Studies</b>					
Subconsultant Expense - Peralte-Clark LLC					
Alternate Geometric Studies					\$21,226.00
See Attachment C					

**Lake Cook Road West Phase I Study  
Arlington Heights Road to Raupp Boulevard  
Village of Buffalo Grove**

**PHASE I ENGINEERING  
DIRECT COSTS AND SUBCONSULTANT SERVICES**

			Direct Cost	Subconsultant Expense
<b>Item 7 Drainage Study</b>				
<b>Mileage</b>				
	2 trips @	40 miles @	\$0.585	\$46.80
Subconsultant Expense - Gewalt Hamilton Associates Drainage & Utility Survey See Attachment C				\$9,606.00
<b>Item 7 Structural Studies</b>				
<b>Mileage</b>				
	3 trips @	40 miles @	\$0.585	\$70.20
Subconsultant Expense - GS Infrastructure Deck Delamination GPR Survey See Attachment D				\$16,209.38
<b>Item 8 Preliminary Highway Traffic Noise Analysis</b>				
<b>Mileage</b>				
	4 trips @	40 miles @	\$0.585	\$93.60
<b>Item 12 Public Involvement</b>				
Display Ad	2 each @		\$250.00	\$500.00
Location Rental Fee	4 each @		\$500.00	\$2,000.00
Printing	1,200 sheets @		\$0.50	\$600.00
SIG Meeting Supplies (binders, refreshments)				\$150.00
<b>Postage</b>				
4 meetings @ 200 letters				
800 letters	\$0.60			\$480.00
<b>Mileage</b>				
	8 trips @	40 miles @	\$0.585	\$187.20
	2 trips @	40 miles @	\$0.585	\$46.80
<b>Project Website</b>				
Host Subscription	2 years @		\$100.00	\$200.00
Subconsultant Expense - Peralte-Clark LLC Public Involvement See Attachment C				\$22,347.00

**Lake Cook Road West Phase I Study  
Arlington Heights Road to Raupp Boulevard  
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**PHASE I ENGINEERING  
DIRECT COSTS AND SUBCONSULTANT SERVICES**

				Direct Cost	Subconsultant Expense
<b>Item 13 Agency Coordination</b>					
<b>Mileage</b>					
10 trips @	40 miles @	\$0.585		\$234.00	
Subconsultant Expense - Peralte-Clark LLC					
Agency Coordination					\$15,373.00
See Attachment C					
<b>PREFERRED ALTERNATIVE</b>					
<b>Item 1 Traffic Analyses</b>					
Subconsultant Expense - Peralte-Clark LLC					
Traffic Analyses					\$46,761.00
See Attachment C					
<b>Item 2 Alternate Geometric Studies</b>					
<b>Mileage</b>					
2 trips @	40 miles @	\$0.585		\$46.80	
Subconsultant Expense - Peralte-Clark LLC					
Alternate Geometric Studies					\$54,563.00
See Attachment C					
<b>Item 3 Subsurface Soils and Pavement Investigation</b>					
Subconsultant Expense - Midland Standard Engineering & Testing, Inc.					
Geotechnical Investigations					\$59,235.00
See Attachment E					
<b>Item 4 Preliminary Environmental Site Assessment</b>					
Subconsultant Expense - True North Consultants					
Preliminary Environmental Site Assessment					\$5,400.00
See Attachment F					
<b>Item 5 Wetland Study</b>					
Subconsultant Expense - Huff & Huff, Inc.					
Wetland Study					\$8,902.00
See Attachment G					



**Lake Cook Road West Phase I Study  
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Village of Buffalo Grove**

**PHASE I ENGINEERING  
DIRECT COSTS AND SUBCONSULTANT SERVICES**

				Direct Cost	Subconsultant Expense
<b>Item 7 Drainage Study</b>					
<b>Mileage</b>					
	2 trips @	40 miles @	\$0.585	\$46.80	
Subconsultant Expense - Gewalt Hamilton Associates Drainage & Utility Survey See Attachment B					\$9,606.00
<b>Item 7 Structural Studies</b>					
<b>Mileage</b>					
	4 trips @	20 miles @	\$0.585	\$46.80	
<b>Item 8 Highway Traffic Noise Analysis</b>					
<b>Mileage</b>					
	16 trips @	20 miles @	\$0.585	\$187.20	
<b>Postage</b>					
	80 letters @	\$7.50		\$600.00	
	80 letters @	\$0.60		\$48.00	
<b>Item 10 Tree Survey</b>					
Subconsultant Expense - Huff & Huff, Inc. Tree Survey See Attachment G					\$6,431.00
<b>Item 15 Public Involvement and Public Hearing</b>					
Display Ad		1 each @	\$250.00	\$250.00	
Location Rental Fee		1 each @	\$500.00	\$500.00	
Court Reporter		1 each @	\$500.00	\$500.00	
Printing	400	sheets @	\$0.50	\$200.00	
<b>Postage</b>					
	1 meeting @ 200 letters				
	200 letters	\$0.60		\$120.00	
<b>Mileage</b>					
	8 trips @	20 miles @	\$0.585	\$93.60	
<b>Project Website</b>					
Host Subscription		3 years @	\$100.00	\$300.00	
Subconsultant Expense - Peralte-Clark LLC Public Involvement See Attachment C					\$11,173.00

**Lake Cook Road West Phase I Study  
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**PHASE I ENGINEERING  
DIRECT COSTS AND SUBCONSULTANT SERVICES**

				Direct Cost	Subconsultant Expense
<b>Item 18 Agency Coordination</b>					
<b>Mileage</b>					
4 trips @	40 miles @	\$0.585		\$93.60	
Subconsultant Expense - Peralte-Clark LLC					
Agency Coordination					\$13,752.00
See Attachment C					
<b>Item 19 Supervision, Administration, and Project Coordination</b>					
Subconsultant Expense - Peralte-Clark LLC					
QA/QC, Project Administration					\$28,528.00
See Attachment C					
Subconsultant Expense - Huff & Huff, Inc.					
QA/QC, Project Administration					\$2,914.00
See Attachment G					
<b>TOTAL:</b>				<b>\$10,392</b>	<b>\$459,875</b>

**Attachment B**

**Topographic Survey Proposal**

**Gewalt Hamilton Associates, Inc.**

May 9, 2022

**Joel Christell, P.E.**  
**Director of Environmental & Design Studies**  
**Civiltech Engineering, Inc.**  
Two Pierce Place, Suite 1400  
Itasca, IL 60143

Re: **Proposal for Professional Surveying Services**  
**Lake Cook Road**  
Buffalo Grove, Illinois  
GHA Proposal No. 2022.CS058

Dear Mr. Christell:

Thank you for requesting a proposal from Gewalt Hamilton Associates, Inc. to provide Professional Land Surveying Services for Lake Cook Road in Buffalo Grove, IL. We understand that the approximate limits of the survey of Lake Cook Road will extend east from 500' west of Ridge Avenue to 1000' east of Raupp Boulevard, and of Arlington Heights Road south from 500' north of Weidner Road to 50' south of Whitehall Drive. See Exhibit 'A' for more detail.

If you have any questions or would like to consider revisions to this proposal, please do not hesitate to contact our office.

Civiltech Engineering, Inc., Two Pierce Place, Suite 1400, Itasca, IL 60143, Gewalt Hamilton Associates, Inc. (GHA), 625 Forest Edge Drive, Vernon Hills, IL 60061, agree and contract as follows:

**I. Scope of Services - Existing Conditions; Topographic Survey**

- A. The survey will meet or exceed the Minimum Standards of Practice as set forth by Illinois Administrative Code for a Topographic Survey. The limit of the topography is shown on the attached exhibit. Accordingly, we will provide the following services:
1. Obtain benchmark information (NAVD88) from the Village of Barrington Vertical Control Network or Trimble VRS Now Network.
  2. Horizontal coordinates shall be referenced to the State Plane Coordinate System, Illinois East Zone, NAD83 adjustment. Vertical elevations shall be referenced to the North American Vertical Datum of 1988 (NAVD88). All units shall be U.S. Survey feet and decimal parts thereof.
  3. Establish four (4) permanent site benchmark(s) (i.e. crosses or boxes cut on concrete, flange bolts on fire hydrants, etc.) on site.
  4. Contours will be provided at 1'-0" intervals, with an error not to exceed one-half the contour interval.

5. Elevations will be taken at 50-foot cross sections across the right-of-way width along the limits of survey, including spot grades at high points, low points, and grade changes. Points required are located at the right-of-way line, sidewalk, driveways and aprons, back of curb, flow line, centerline/concrete median, etc. The topography will extend approximately 10 feet beyond the existing right-of-way (ROW). The survey limits will also extend 50 feet into the intersecting public side streets along the project limits.
6. The survey will show the location of the visible ground features, physical improvements with the project limits including location and elevation of light poles, utility poles, traffic lights, sidewalks, driveways, fences, guard rails, signage, striping, overhead wires, etc.
7. The location of underground utilities, both observed and from record information such as Village utility atlases, will be provided and will including location and size of water mains, fire hydrants and valves. The survey will show as measured from the grade surface, depth, size, and direction of flow for all sanitary, storm drains, and culverts serving the property. The location of all manholes, catch basins and all pipe inverts that are accessible from grade surface will be depicted.
8. Location of "dry" utilities such as telephone, electric, gas and cable T.V. lines, etc. will be depicted based on visual surface evidence and any provided utility atlas information from the Village or respective utility companies. The cost for marking of private utilities is not included in this proposal, but GHA will include this information if the Client or Village arranges to have private utilities marked in the field prior to our field visit.
9. Locate existing tree and brush lines within the limits of the survey. Individual free-standing trees of 6" caliper or greater at breast height (DBH) will be individually located (tagging and identification are not included); and will be shown as deciduous or coniferous. Groupings of trees or landscaped areas will be shown in mass.
10. Stream Survey:
  - a. One stream cross section at the upstream and downstream face of the structure.
  - b. One stream cross section the width of the floodplain approximately 100 feet downstream of the bridge.
  - c. Two stream cross sections the width of the floodplain approximately 100 feet upstream of the bridge. One of the cross sections will be on Buffalo Creek and one will be on Farmington Ditch.
11. Survey of the existing Lake Cook Road Bridge over Buffalo Creek (SN 016-3203) and adjacent pedestrian bridge:
  - a. Fascia beam seats
  - b. Bottom of fascia beams at the abutments
  - c. Wingwalls
  - d. Curb lines
  - e. Bridge joints
  - f. Channel along bridge fascia

## II. Right-of-Way Survey

- A. Obtain all necessary documentation and complete a survey of the ROW within project limits for the purposes of establishing the ROW and preparing a plat of dedication or plat of easement.
  - 1. Research available plats and property records.
  - 2. Locate and survey the existing property monumentation in the project area and establish the position of the ROW lines within the project limits.
  - 3. Side lot property line monuments will not be located or surveyed along the ROW within the project limits. If it is determined that the side lot property lines need to be surveyed due to acquisition of ROW or easements, GHA will request additional fee for the time to research, field locate, and survey of any side lot property lines.

## III. Conduct Drainage Study QC/QA

- A. GHA will conduct the QC/QA of the drainage component of the Lake Cook Phase I Study. We will conduct up to two (2) reviews at the direction of Civiltech. It is anticipated that the reviews will include: 1) Review of the feasibility study, Drainage Study and Preliminary Drainage Technical Memorandum, that we anticipate will summarize the overall investigation of the existing drainage as well as an analysis of alternatives for proposed drainage alternates. 2) Review of the preferred improvement plan, Drainage Study and Drainage Technical Memorandum, that we anticipate will summarize an overall investigation of the existing drainage as well as the requirements for the proposed drainage system, including stormwater detention, floodplain compensatory storage, and water quality treatments. Additionally, we will perform a review of the hydraulic analysis for the existing and the proposed structure crossing at Buffalo Creek.

For each review, GHA will provide a report summarizing our findings. We have incorporated hours for a meeting after each review if necessary.

## IV. Services Not Included

Any service not enumerated in *Section I. Scope of Services*, including, but not limited to the following, is not included in this proposal/agreement. These services may be provided at the request of the Client as an additional service. GHA will provide the Client with an estimate of the additional work scope and request authorization to proceed prior to commencing additional services.

- A. Easement Plats, Plats of Highway, As-built surveys, or other surveying services not specified in *Section I. Scope of Services*;
- B. Tree survey or inventory;
- C. Preparation of Elevation Certificate, engineering plans or construction documents;
- D. Wetland determination, delineation, environmental testing, geotechnical investigation, or environmental engineering services; and
- E. Attendance at or preparation for meetings not identified in the scope of services.
- F. No obtaining of Title Commitments.

**V. Compensation for Services**

See attached BLR 05514 Form.

Additional services requested and authorized by the Client, beyond those outlined in *Section I: Scope of Services*, will be billed on a time-and-materials (T&M) basis.

Invoices will be submitted on a monthly basis and will detail charges made against the project and services performed. This allows the Client to review the status of the work in progress and the charges made.

**VI. General Conditions**

The delineated services provided by Gewalt Hamilton Associates, Inc., (GHA) under this Agreement will be performed as reasonably required in accordance with the generally accepted standards for civil engineering and surveying services as reflected in the contract for this project at the time when and the place where the services are performed.

Nothing contained in this Agreement shall create a contractual relationship with or a cause of action in favor of a third party against either the Client or GHA. GHA's services under this Agreement are being performed solely for the Client's benefit, and no other party or entity shall have any claim against GHA because of this Agreement or the performance or nonperformance of services hereunder. In no event shall GHA be liable for any loss of profit or any consequential damages.

The Client and GHA agree that all disputes between them arising out of or relating to this Agreement, or the Project shall be submitted to nonbinding mediation in Chicago, Illinois unless the parties mutually agree otherwise.

This Agreement, including all subparts and *Attachment A*, which is attached hereto and incorporated herein as the General Provisions of this Agreement, constitute the entire integrated agreement between the parties which may not be modified without all parties consenting thereto in writing.

By signing below, you indicate your acceptance of this Agreement in its entirety.

Gewalt Hamilton Associates, Inc.

Civiltech Engineering, Inc.

  
\_\_\_\_\_  
Jonathan F. Past, P.L.S.  
Survey Services Manager

\_\_\_\_\_  
Joel Christell, P.E.  
Director of Environmental & Design Studies

Date: May 12, 2022

Date: \_\_\_\_\_

Enc.: Attachment A  
BLR 05514 Cost Plus Fixed Fee Worksheet  
Exhibit 'A'

**ATTACHMENT A TO GEWALT HAMILTON ASSOCIATES, INC.  
PROFESSIONAL SERVICES AGREEMENT**

**1. Standard of Care.** The services provided by Gewalt Hamilton Associates, Inc., (GHA) under this Agreement will be reasonably performed consistent with the generally accepted standard of care for the Scope of Basic Services called for herein at the time when and the place where the services are provided. GHA will use reasonable care to comply with applicable codes and laws in effect at the time its services are provided.

**2. Duration of Proposal.** The terms of this Agreement are subject to renegotiation if not accepted within 60 calendar days of the date indicated on this Agreement. Requests for extension beyond 60 calendar days shall be made in writing prior to the expiration date. The fees and terms of this Agreement shall remain in full force and effect for one year from the date of acceptance of this Agreement, and shall be subject to revision at that time, or any time thereafter if GHA gives written notice to the other party at least 60 calendar days prior to the requested date of revision. In the event that the parties fail to agree on the new rates or other revisions, either party may terminate this Agreement as provided for herein.

**3. Client Information.** Client shall provide GHA will all project criteria and full information for its Scope of Basic Services. GHA may rely, without liability, on the accuracy and completeness of the information Client provides, including that of its other consultants, contractors and subcontractors, without independently verifying that information.

**4. Payment.** Payments are due within 30 calendar days after a statement is rendered. Statements not paid within 60 calendar days of the end of the calendar month when the statement is rendered will bear interest at the rate of one percent (1.0%) per month until paid. The provision for the payment of interest shall not be construed as authorization to pay late. Failure of the Client to make payments when due shall, in GHA's sole discretion, be cause for suspension of services without breach or termination of this agreement. Upon notification by GHA of suspension of services, Client shall pay in full all outstanding invoices within 7 calendar days. Client's failure to make such payment to GHA shall constitute a material breach of the Agreement and shall be cause for termination by GHA. GHA shall be entitled to reimbursement of all costs actually incurred by GHA in collecting overdue accounts under this Agreement, including, without limitations, attorney's fees and costs. GHA shall have no liability for any claims or damages arising from either suspension or termination of this Agreement due to Client's breach. The Client's obligation to pay for GHA's services is in no way dependent upon the Client's ability to obtain financing, rezoning, payment from a third party, approval of governmental or regulatory agencies or the Client's completion of the project.

**5. Instruments of Service.** The Client acknowledges GHA's plans and specifications, including field data, notes, calculations, and all documents or electronic data, are instruments of service. GHA shall retain ownership rights over all original documents and instruments of service. All instruments of service provided by GHA shall be reviewed by Client within 10 calendar days of receipt. Any deficiencies, errors, or omissions the Client discovers during this period will be reported to GHA and will be corrected as part of GHA's Basic Services. Failure to provide such notice shall constitute a waiver. The Client shall not reuse or make, or permit to be made, any modifications to the instruments of service without the prior written authorization of GHA. The Client waives all claims against GHA arising from any reuse or modification of the instruments of service not authorized by GHA. The Client agrees, to the fullest extent permitted by law, to defend and indemnify and hold GHA harmless from any liability, damage, or cost, including attorneys' fees, arising from the unauthorized reuse or modification of the instruments of service by any person or entity. The parties agree that if elements of the Scope of Basic Services identified in this Agreement are reduced and/or eliminated by Client, then Client waives, releases and holds GHA harmless from all claims and damages arising from those reduced and/or eliminated services. If GHA's Scope of Basic Services does not include construction administration phase services, Client assumes responsibility for interpretation of the instruments of service and construction observation, and waives all claims against GHA for any act, omission or event connected thereto. Unless included in GHA's Scope of Basic Services, GHA shall not be liable for coordination with of the services of Client's other design professionals.

**6. Electronic Files.** The Client acknowledges that differences may exist between the electronic files delivered and the printed instruments of service. In the event of a conflict between the signed / sealed printed instruments of service prepared by GHA and the electronic files, the signed / sealed instruments of service shall control. GHA's electronic files shall be prepared in the current software GHA uses and will follow GHA's standard formatting unless the Scope of Basic Services requires otherwise. Client accepts that GHA makes no warranty that its software will be compatible with other systems or software.

**7. Applicable Codes.** The Client acknowledges that applicable laws, codes and regulations may be subject to various, and possibly contradictory, interpretations. Client accepts that GHA does not warrant or guarantee that the Client's project will comply with interpretations of applicable laws, codes, and regulations as they may be interpreted to the project. Client agrees that GHA shall not be responsible for added project costs, delay damages, or schedule changes arising from unreasonable or unexpected interpretations of the laws, codes, or regulations applied to the project, nor for changes required by the permitting authorities due to changes in the law that became effective after completion of GHA's instruments of service. Client shall compensate GHA for additional fees required to revise the instruments of service to comply with such interpretations. Client shall also compensate GHA for additional fees required to revise the instruments of service if Client changes the project scope after GHA's completes its instruments of service.

**8. Utilities and Soils.** When the instruments of service include information pertaining to the location of underground utility facilities or soils, such information represents only the opinion of the engineer as to the possible locations. This information may be obtained from visible surface evidence, utility company records or soil borings performed by others, and is not represented to be the exact location or nature of these utilities or soils in the field. Client agrees that GHA may reasonably rely on the accuracy and completeness of information furnished by third parties respecting utilities, underground conditions and soils without performing any independent verification. Contractor is solely responsible for utility locations, their markings in the field and their placement on the plans based on information they provided. Client agrees GHA is not liable for damages resulting from utility conflicts, mistaken utility locates, unfavorable soils, and concealed or unforeseen conditions, including but not limited to added construction costs and/or project delays. If the Client wishes to obtain the services of a contractor to provide test holes and exact utility locations, GHA may incorporate that information into the design and reasonably rely upon it. If not included in the Scope of Basic Services, such work will be compensated as additional services.



**9. Opinion of Probable Construction Costs.** GHA's Scope of Basic Services may include the preparation of an opinion of probable construction costs. Client acknowledges that GHA has no control over the costs of labor, materials, or equipment, or over the contractor's methods of determining prices, or over competitive bidding or market conditions. Opinions of probable costs, shall be made on the basis of experience and qualifications applied to the project scope contemplated by this Agreement as well as information provided by Client (the accuracy and completeness of which GHA may rely upon), and represent GHA's reasonable judgment. Client accepts that GHA does not guarantee or warrant that proposals, bids, or the actual construction costs will not vary from opinions of probable cost prepared for the Client. GHA shall not be liable for cost differentials between the bid and/or actual costs and GHA's opinion of probable construction costs. Client agrees it shall employ an independent cost estimator if, based on its sole determination, it wants more certainty respecting construction costs.

**10. Contractor's Work.** Client agrees that GHA does not have control or charge of and is not responsible for construction means, methods, techniques, sequences or procedures, or for site or worker safety measures and programs including enforcement of Federal, State and local safety requirements, in connection with construction work performed by the Client or the Client's construction contractors. GHA is not responsible for the supervision and coordination of Client's construction contractors, subcontractors, materialmen, fabricators, erectors, operators, suppliers, or any of their employees, agents and representatives of such workers, or responsible for any machinery, construction equipment, or tools used and employed by contractors and subcontractors. GHA has no authority or right to stop the work. GHA may not direct or instruct the construction work in any regard. In no event shall GHA be liable for the acts or omissions of Client's construction contractors, subcontractors, materialmen, fabricators, erectors, operators or suppliers, or any persons or entities performing any of the work, or for failure of any of them to carry out their work as called for by the Construction Documents. The Client agrees that the Contractor is solely responsible for jobsite and worker safety and warrants that this intent shall be included in the Client's agreement with all prime contractors. The Client agrees that GHA and GHA's personnel and consultants (if any) shall be defended/indemnified by the Contractor for all claims asserted against GHA which arise out of the Contractor's or its subcontractors' negligence, errors or omissions in the performance of their work, and shall also be named as an additional insured on the Contractor's and subcontractors' general liability insurance policy. Client warrants that this intent shall be included in the Client's agreement with all prime contractors. If the responsible prime contractor's agreement fails to comply with the Client's intent, then the Client agrees to assume the duty to defend and indemnify GHA for claims arising out of the Contractor's or subcontractors' negligence, errors or omissions in the performance of their work.

**11. Contractor Submittals.** Shop drawing and submittal reviews by GHA shall apply only to the items in the submissions that concern GHA's scope of Basic Services and only for the purpose of assessing if, upon successful incorporation in the project, they are generally consistent with the GHA's Instruments of Service. Client agrees that the Contractor is solely responsible for the submissions and for compliance with the Instruments of Service. Owner agrees that GHA's review and action in relation to the submissions does not constitute the provision of means, methods, techniques, sequencing or procedures of construction or extend to jobsite or worker safety. GHA's consideration of a component does not constitute acceptance of an assembled item.

**12. Hazardous Materials.** Client agrees that GHA has no responsibility or liability for any hazardous or toxic materials, contaminants or pollutants.

**13. Record Drawings.** If required by the Scope of Basic Services, record drawings will be prepared which may include unverified information compiled and furnished by others, the accuracy and completeness of which GHA may reasonably rely upon. Client accepts that GHA shall not verify the information provided to it and agrees GHA will not be responsible for any errors or omissions in the record drawings due to incorrect or incomplete information furnished by others to GHA.

**14. Disputes.** Client agrees to limit GHA's total aggregate liability to the Client for GHA's alleged acts, errors or omissions to \$50,000 or the amount of GHA's paid fees for its services on the project, whichever is greater. GHA's liability to Client shall be limited to twelve months from the last invoice submitted to Client by GHA, regardless of payment by Client. GHA makes no guarantees or warranties, either expressed or implied, including any warranty of habitability or fitness for a particular purpose. The parties agree to waive all claims against the other for any and all consequential damages, including attorneys' fees. The parties agree to waive against each other all rights and claims otherwise covered by property insurance, by builder's risk insurance or by all risk insurance, including but not limited to subrogation rights regardless of whether the claims arise during or post-construction and regardless of final payment to GHA.

All disputes arising out of or relating to this Agreement shall first be negotiated between the parties. If unresolved, the dispute shall be submitted to mediation as a condition precedent to litigation. Mediation shall take place in Chicago, Illinois unless the Client and GHA mutually agree otherwise. The fees and costs of the mediator shall be apportioned equally between the parties. If mediation is unsuccessful, litigation shall be the form of dispute resolution and shall be filed in the jurisdiction where the project was pending. The controlling law shall be the law of the jurisdiction where the project was located. Client agrees that all causes of action under this Agreement shall be deemed to have accrued and all statutory limitations periods shall commence no later than the date of GHA's services being substantially completed. Client agrees that any claim against GHA arising out of this Agreement shall be asserted only against the entity and not against GHA's owners, officers, directors, shareholders, or employees, none of whom shall bear any liability and may not be subject to any claim.

**15. Miscellaneous.** Either Client or GHA may terminate this Agreement without penalty at any time with or without cause by giving the other party ten (10) calendar days prior written notice. The Client shall, within thirty (30) calendar days of termination pay GHA for all services rendered and all costs incurred up to the date of termination in accordance with compensation provisions of this Agreement. Client shall not assign this Agreement without GHA's prior written consent. There are no third-party beneficiaries to this Agreement.



<b>Local Public Agency</b> Village of Buffalo Grove	<b>County</b> Cook	<b>Section Number</b> 
<b>Consultant (Firm) Name</b> Gewalt Hamilton Associates, Inc.	<b>Prepared By</b> Lucas Deferville	<b>Date</b> 5/9/2022

### PAYROLL ESCALATION TABLE

CONTRACT TERM	12	MONTHS	OVERHEAD RATE	152.48%
START DATE	6/1/2022		COMPLEXITY FACTOR	
RAISE DATE	5/15/2022		% OF RAISE	2.00%
END DATE	5/31/2023			

### ESCALATION PER YEAR

Year	First Date	Last Date	Months	% of Contract
0	6/1/2022	5/15/2022	-1	-8.33%
1	5/16/2022	5/15/2023	12	102.00%
2	5/16/2023	6/15/2023	1	8.67%

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**The total escalation = 2.34%**

**Local Public Agency**

**County**

**Section Number**

Village of Buffalo Grove

Cook

**MAXIMUM PAYROLL RATE 78.00**

**ESCALATION FACTOR 2.34%**

**PAYROLL RATES**

Exhibit E Cost Estimate of Consultant Services Worksheet Fixed Raise

<b>CLASSIFICATION</b>	<b>IDOT PAYROLL RATES ON FILE</b>	<b>CALCULATED RATE</b>
Principal	\$78.21	\$78.00
CE VI	\$75.00	\$76.75
CE V	\$70.25	\$71.89
CE IV	\$57.50	\$58.84
CE III	\$44.00	\$45.03
CE II	\$39.79	\$40.72
CE I	\$33.21	\$33.99
LS IV	\$52.88	\$54.12
LS III	\$43.81	\$44.83
LS I	\$23.50	\$24.05
GISP III	\$61.00	\$62.43
ET V	\$63.25	\$64.73
ET IV	\$40.21	\$41.15
ET III	\$33.83	\$34.62
ET II	\$31.50	\$32.24
ET I	\$24.50	\$25.07
AD I	\$25.96	\$26.57
Environmental Consultant I	\$31.00	\$31.72

**Local Public Agency**

Village of Buffalo Grove

**County**

Cook

**Section Number**

**COST ESTIMATE WORKSHEET**

Exhibit E Cost Estimate of Consultant Services Worksheet Fixed Raise

**OVERHEAD RATE** 152.48%

**COMPLEXITY FACTOR** 0

TASK	STAFF HOURS	PAYROLL	OVERHEAD & FRINGE BENEFITS	DIRECT COSTS	FIXED FEE	SERVICES BY OTHERS	TOTAL	% OF GRAND TOTAL
Setting Control	36	1,240	1,891		409		3,540	3.24%
Survey Existing Condition Topography	238	10,670	16,270	1,625	3,521		32,086	29.40%
Field Investigation	36	1,240	1,891	325	409		3,865	3.54%
Reduction of Field Survey	262	9,458	14,422		3,121		27,001	24.74%
QA/QC	8	359	547		118		1,024	0.94%
Project Management	16	866	1,320		286		2,472	2.26%
Boundary Research	9	404	615		133		1,152	1.06%
Boundary Field Reconissance and Location	45	2,018	3,076	130	666		5,890	5.40%
Boundary Analysis	90	4,035	6,153		1,332		11,520	10.55%
Boundary QA/QC	9	487	743		161		1,391	1.27%
Feasibility Study Drainage Study	60	3,365	5,131		1,110		9,606	8.80%
Preferred Improvement Plan Drainage Study	60	3,365	5,131		1,110		9,606	8.80%
		-	-		-		-	
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		-	-		-		-	
<b>Subconsultant DL</b>					0			
<b>TOTALS</b>	869	37,507	57,190	2,080	12,376	-	109,153	100.00%

94,697

**Local Public Agency**

Village of Buffalo Grove

**County**

Cook

**Section Number**

**AVERAGE HOURLY PROJECT RATES**

Exhibit E Cost Estimate of Consultants Services Worksheet Fixed Raise

SHEET 1 OF 3

PAYROLL CLASSIFICATION	AVG HOURLY RATES	TOTAL PROJ. RATES			Setting Control			Survey Existing Condition Topography			Field Investigation			Reduction of Field Survey			QA/QC		
		Hours	% Part.	Wgtd Avg	Hours	% Part.	Wgtd Avg	Hours	% Part.	Wgtd Avg	Hours	% Part.	Wgtd Avg	Hours	% Part.	Wgtd Avg	Hours	% Part.	Wgtd Avg
Principal	78.00	16.0	1.84%	1.44															
CE VI	76.75	0.0																	
CE V	71.89	40.0	4.60%	3.31															
CE IV	58.84	16.0	1.84%	1.08									16	6.11%	3.59				
CE III	45.03	0.0																	
CE II	40.72	64.0	7.36%	3.00															
CE I	33.99	0.0																	
LS IV	54.12	25.0	2.88%	1.56															
LS III	44.83	426.0	49.02%	21.98	18	50.00%	22.42	238	100.00%	44.83	18	50.00%	22.42				8	100.00%	44.83
LS I	24.05	36.0	4.14%	1.00	18	50.00%	12.02				18	50.00%	12.02						
GISP III	62.43	0.0																	
ET V	64.73	0.0																	
ET IV	41.15	0.0																	
ET III	34.62	246.0	28.31%	9.80									246	93.89%	32.51				
ET II	32.24	0.0																	
ET I	25.07	0.0																	
AD I	26.57	0.0																	
Environmental Consultant	31.72	0.0																	
		0.0																	
		0.0																	
		0.0																	
		0.0																	
		0.0																	
		0.0																	
		0.0																	
		0.0																	
		0.0																	
<b>TOTALS</b>		869.0	100%	\$43.16	36.0	100.00%	\$34.44	238.0	100%	\$44.83	36.0	100%	\$34.44	262.0	100%	\$36.10	8.0	100%	\$44.83

**Local Public Agency**

Village of Buffalo Grove

**County**

Cook

**Section Number**

**AVERAGE HOURLY PROJECT RATES**

Exhibit E Cost Estimate of Consultant Services Worksheet Fixed Raise

SHEET 2 OF 3

PAYROLL CLASSIFICATION	AVG HOURLY RATES	Project Management			Boundary Research			Boundary Field Reconnaissance and Location			Boundary Analysis			Boundary QA/QC			Feasibility Study Drainage Study		
		Hours	% Part.	Wgtd Avg	Hours	% Part.	Wgtd Avg	Hours	% Part.	Wgtd Avg	Hours	% Part.	Wgtd Avg	Hours	% Part.	Wgtd Avg	Hours	% Part.	Wgtd Avg
Principal	78.00																8	13.33%	10.40
CE VI	76.75																		
CE V	71.89																20	33.33%	23.96
CE IV	58.84																		
CE III	45.03																		
CE II	40.72																32	53.33%	21.72
CE I	33.99																		
LS IV	54.12	16	100.00%	54.12										9	100.00%	54.12			
LS III	44.83				9	100.00%	44.83	45	100.00%	44.83	90	100.00%	44.83						
LS I	24.05																		
GISP III	62.43																		
ET V	64.73																		
ET IV	41.15																		
ET III	34.62																		
ET II	32.24																		
ET I	25.07																		
AD I	26.57																		
Environmental Consultant I	31.72																		
<b>TOTALS</b>		16.0	100%	\$54.12	9.0	100%	\$44.83	45.0	100%	\$44.83	90.0	100%	\$44.83	9.0	100%	\$54.12	60.0	100%	\$56.08

**Local Public Agency**

**County**

**Section Number**

Village of Buffalo Grove

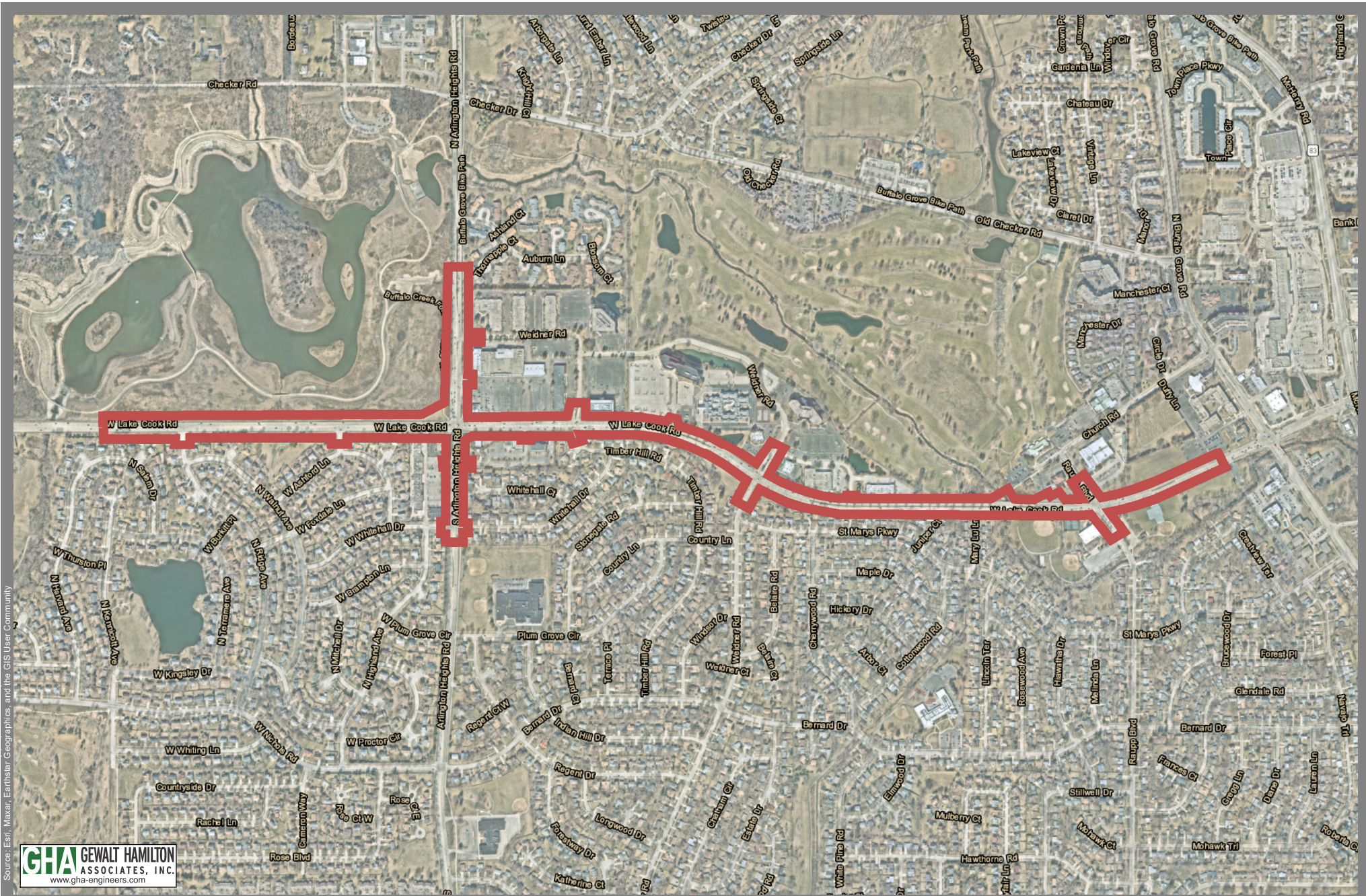
Cook

**AVERAGE HOURLY PROJECT RATES**

Exhibit E Cost Estimate of Consultant Services Worksheet Fixed Raise

SHEET  3  OF  3

PAYROLL CLASSIFICATION	AVG HOURLY RATES	Preferred Improvement Plan Drainage Study														
		Hours	% Part.	Wgt'd Avg	Hours	% Part.	Wgt'd Avg	Hours	% Part.	Wgt'd Avg	Hours	% Part.	Wgt'd Avg	Hours	% Part.	Wgt'd Avg
Principal	78.00	8	13.33%	10.40												
CE VI	76.75															
CE V	71.89	20	33.33%	23.96												
CE IV	58.84															
CE III	45.03															
CE II	40.72	32	53.33%	21.72												
CE I	33.99															
LS IV	54.12															
LS III	44.83															
LS I	24.05															
GISP III	62.43															
ET V	64.73															
ET IV	41.15															
ET III	34.62															
ET II	32.24															
ET I	25.07															
AD I	26.57															
Environmental Consultant I	31.72															
<b>TOTALS</b>		60.0	100%	\$56.08	0.0	0%	\$0.00	0.0	0%	\$0.00	0.0	0%	\$0.00	0.0	0%	\$0.00



Sources: Esri, Maxar, Earthstar, Geographics, and the GIS User Community



1 in = 1,000 ft

## EXHIBIT 'A'

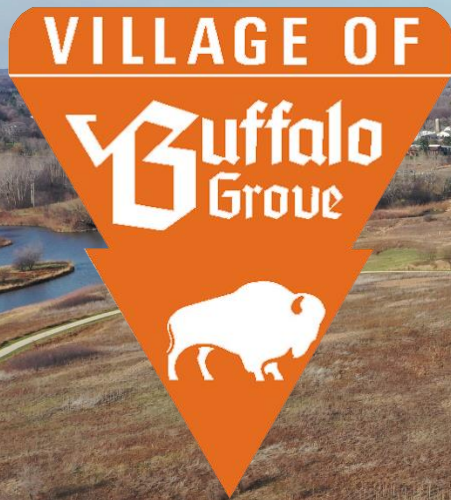
Gewalt Hamilton Associates, Inc.

This exhibit is for informational purposes and may not have been prepared for, or be suitable for legal, engineering, or surveying purposes.

Date: 5/9/2022



**Attachment C**  
**Subconsultant Services Proposal**  
**Peralte-Clark, LLC.**



**Village of Buffalo Grove  
Lake Cook Road West Phase I Study  
Arlington Heights Road to Raupp Boulevard**

**May 25th, 2022**



44 S. Vail Avenue, Suite 201  
Arlington Heights, Illinois 60005  
Phone: 847-485-8069

[www.peralte-clark.com](http://www.peralte-clark.com)

## Project Understanding

The Village of Buffalo Grove, Illinois is conducting a Phase I study of Lake Cook Road from Arlington Heights Road to Raupp Boulevard, in Cook and Lake County, Illinois. Lake Cook Road is a strategic regional arterial, under the jurisdiction of CCDOTH, serving east-west commuter and residential traffic to north-south interstate routes, including interchanges with Illinois Route 53 and the Tri-state Tollway (I-294)/Edens Expressway (I-94). It consists of three lanes in each direction between Hastings Lane and the I-294/I-94 interchange.

To accommodate traffic needs and reduce congestion, widening efforts and intersection improvements along Lake Cook Road are currently under construction from east of Raupp Boulevard to Hastings Lane. This preliminary engineering study of Lake Cook Road between Arlington Heights Road and Raupp Boulevard (including both intersections) will evaluate additional improvements to the corridor and intersecting roadways. Current configuration for this portion of Lake Cook Road includes two travel lanes in each direction with a center turn lane/median areas.

The Phase I Engineering Study for this project will include environmental and location-design studies needed to develop and refine feasible alternatives for the improvement, evaluate costs and impacts, and undertake coordination with jurisdictional agencies and the public. The primary objective of the Phase I Engineering Study is to develop a conceptual improvement plan which provides the desired level of traffic safety and operation, minimizes impacts to adjacent properties and which fulfills all of the requirements for processing and funding of this project by the Village of Buffalo Grove, the Lake County Division of Transportation (LCDOT), the Cook County Department of Transportation and Highways (CCDTH), the Illinois Department of Transportation (IDOT) and the Federal Highway Administration (FHWA).

This scope of services uses a tiered approach, with a planning level analysis of potential alternatives (Feasibility Study) occurring prior to the detailed analyses of the preferred alternative. The planning level analyses will use as much existing information as possible from GIS websites, other agency websites, and existing plans and maps to develop and analyze the range of alternatives for the study. Public involvement will occur throughout the project, but a substantial amount of local agency coordination will occur during the Feasibility Study. After a preferred improvement plan has been identified, topographic survey, geotechnical studies, environmental studies, and detailed geometric studies will commence.

All of the reports and documents that are prepared for this study will follow IDOT criteria and format. The Scope of Services assumes that a Federally Approved Categorical Exclusion (CE) and Project Development Report (PDR) will be prepared and coordinated through IDOT's Bureau of Local Roads and Streets (BLRS).

The IDOT Planning and Environmental Linkage (PEL) process documents the planning components of a project to be forward compatible with the National Environmental Policy Act (NEPA) documentation requirements. Utilizing the PEL process will be advantageous to the overall project scope and timeline should it be determined that an Environmental Assessment (EA) is needed for NEPA documentation. It is proposed that the Feasibility Study portion of the project will follow the PEL process requirements and produce a formal PEL Report.

For the purposes of this proposal, Civiltech Engineering will serve as the Prime Consultant to the Village of Buffalo Grove and will be leading this project on behalf of the consultant team. Peralte-Clark will be assisting in the development of Phase I study materials and participating in public involvement activities.

## Scope of Services

The following is a general list of tasks to be performed as part of Peralte-Clark's scope of work on this project:

- Feasibility Study (PEL)
  - Crash Analysis Report
  - Traffic Analysis
  - Alternate Geometrics
  - Public Involvement
  - Agency Coordination
  
- Preferred Improvement Plan (CE)
  - Intersection Design Studies (IDS)
  - Alternative Geometrics
  - Public Involvement
  - Agency Coordination

The detailed scope to be performed for each task noted above is summarized below.

### Feasibility Study (PEL)

#### 1. Early Coordination and Data Collection

A total of two site visits for two Peralte-Clark staff members are anticipated during the Phase I study.

#### 2. Field Survey, Preparation of Base Maps, and Plats & Legals

This scope task will be performed by others.

#### 3. Crash Analyses

As part of IDOT's 2018 safety tier analysis, the intersection of Lake Cook Road and Arlington Heights Road was identified as a critical intersection, indicating it has the highest potential for safety improvements. Improving safety at this intersection and throughout the corridor will be an important aspect of the project and proposed alternatives.

As part of a pavement analysis study performed by Civiltech for CCDTH, a crash analysis was completed for the years 2013 – 2017. Peralte-Clark also performed a crash analysis at the intersection of Arlington Heights Road and Lake Cook Road for the years 2014 – 2018 as part of the Arlington Heights Road reconstruction project from Lake Cook Road to north of IL Route 83 for LCDOT. This work item will include a GIS analysis of the latest five years of crash data available to confirm crash trends and statistics from previous studies. Due to the typical duration of the Phase I study, it is assumed that these analyses will need to be updated twice as new statistics are released. Therefore, this work item will include:

- A. Collect GIS crash data from IDOT and/or Counties.
- B. Tabulate data.
- C. Evaluate safety improvement needs, identify countermeasures and write crash analysis text.

Note: It has been assumed that the report can be prepared without having to plot collision diagrams.

The Highway Safety Manual (HSM) provides tools to quantify safety benefits of proposed countermeasures. To compare the proposed alternatives, this item also includes an HSM analysis for up to three alternatives at the Lake Cook Road/Arlington Heights Road intersection and three alternatives through the remainder of the project limits. Peralte-Clark will provide HSM analysis with assistance and guidance from Civiltech Engineering.

#### **4. Traffic Analysis**

A higher-level corridor-wide analysis will be performed during the PEL stage to evaluate traffic performance through the corridor. This scope task will be led by Civiltech Engineering. Peralte-Clark will provide peer review of the anticipated traffic analysis work outlined in Civiltech Engineering's scope of work. Peralte-Clark will also attend up to two brainstorming meetings with Civiltech Engineering to discuss the traffic analysis work.

#### **5. Alternate Geometric Studies**

This scope task will be led by Civiltech Engineering. Peralte-Clark will provide peer review for the evaluation of three preliminary improvement alternatives along the Lake Cook Road corridor and three preliminary intersection alternatives at the intersection of Arlington Heights Road at Lake Cook Road. Peralte-Clark will also attend up to two brainstorming meetings with Civiltech Engineering to discuss the range of alternatives, select alternatives to be carried forward and identify the preferred alternative for the intersection and the Lake Cook Road corridor.

#### **6. Drainage Study**

This scope task will be performed by others.

#### **7. Structural Studies**

This scope task will be performed by others.

#### **8. Preliminary Highway Traffic Noise Analysis**

This scope task will be performed by others.

#### **9. Development of Project Purpose & Need**

This scope task will be performed by others.

#### **10. Alternatives to be Carried Forward**

This scope task will be performed by others.

#### **11. Preliminary Cost Estimates**

This scope task will be performed by others.

## 12. Public Involvement

As part of the Feasibility Study, two public meetings are proposed. The first public meeting will present existing conditions, the needs for improvement, and a draft Purpose and Need statement. The second public meeting will be present the preliminary improvement concepts and associated impacts. Two meetings with the SIG are anticipated, one in advance of each public meeting during the Feasibility Study. Public Involvement activities would continue beyond the Feasibility Study portion of this project and are further detailed under the Preferred Improvement Plan below.

Peralte-Clark will assist Civiltech Engineering in the following Feasibility Study public involvement tasks:

### Public Information Meetings (Assume two meetings)

- Preparation for and attendance at public meeting dry run with agency staff. (Assume 1 meeting per public information meeting)
- Attendance at in-person public information meeting.
- Attendance at virtual public information meeting.
- Meeting preparation Public Involvement support.

### Stakeholder Involvement Group (SIG) Meetings (Assume two meetings)

- Attendance at SIG meetings.
- Meeting preparation Public Involvement support.

## 13. Draft PEL Report

This scope task will be performed by others.

## 14. Final PEL Report

This scope task will be performed by others.

## 15. Agency Coordination

The efficiency and timeliness of executing a project can hinge on the level and frequency of coordination with agency officials. While the Phase I Study is being led by the Village, Lake Cook Road is under the jurisdiction of CCDTH, and Arlington Heights is under the jurisdiction of LCDOT and the Village of Arlington Heights. Regular coordination between these agencies will assist in the overall project delivery and timeliness of the Phase I Study. In addition to a project kick-off meeting, one Peralte-Clark staff member will attend regular bi-weekly meetings to occur between the Village/CCDTH/LCDOT/Arlington Heights throughout the Feasibility Study portion of this project.

In order to avoid delays and costly multiple design revisions, we believe it will be helpful to also have regular coordination meetings with IDOT to review design issues, environmental impact findings and the project's overall progress. These meetings will be held at regular IDOT/FHWA coordination meetings.

In addition to a kick-off meeting with IDOT, one Peralte-Clark staff member will prepare for and attend up to 5 meetings with IDOT/FHWA. This item includes assistance in the preparation of agendas and materials and attendance at each meeting.

Attendance and preparation for two Village Board meetings by one Peralte-Clark staff member is included in this item.

**16. Supervision, Administration and Project Coordination**

This scope task will be performed by others.

**Preferred Improvement Plan**

**1. Field Survey, Preparation of Base Maps, and Plats & Legals**

This scope task will be performed by others.

**2. Traffic Analysis**

Corridor-wide traffic analysis will occur during the Feasibility Study stage of the project. During the PIP stage, P-C will perform micro-analysis at three intersections to prepare Intersection Design Studies (IDSs). IDSs will be prepared for the following intersections:

- Lake Cook Road at Raupp Blvd.
- Lake Cook at Weidner Road
- Lake Cook at Arlington Heights Road

Highway Capacity Software (HCS) will be used to perform this detailed analysis. It is anticipated that two submittals will be required to complete this task. The scope under this task is detailed below:

- a. Perform peak hour analysis using HCS for existing and projected turning movements.
- b. Compute required storage lengths using IDOT's red-time methodology.
- c. Prepare IDS packages

**3. Alternate Geometric Studies**

After a preferred improvement plan has been selected, the preliminary geometric design will be refined based upon detailed survey, wetlands, and geotechnical studies. This item includes the following:

- a. **Traffic Maintenance Analysis and Concept Plans** - Develop concept maintenance of traffic plans to evaluate the ability to maintain traffic during construction within the proposed right-of-way limits. This task will include the preparation of preliminary maintenance of traffic plan exhibits per stage and typical cross section exhibits. The development of a feasible construction staging plan will be critical to identifying anticipated lane closures, delays, detour routes and anticipated construction duration. Proposed staging concepts, lane configurations and widths, a brief narrative summarizing the staging requirements will be prepared and will consider both roadway and utility construction work.
- b. **ADA Ramp Plans** - Provide detailed ADA grading sheets at each of the signalized intersections.

**4. Subsurface Soils and Pavement Investigation**

This scope task will be performed by others.

**5. Preliminary Environmental Site Assessment**

This scope task will be performed by others.

**6. Wetland Study**

This scope task will be performed by others.

**7. Drainage Study**

This scope task will be performed by others.

**8. Structural Studies**

This scope task will be performed by others.

**9. Final Highway Traffic Noise Analysis**

This scope task will be performed by others.

**10. Air Quality Analysis**

This scope task will be performed by others.

**11. Tree Survey**

This scope task will be performed by others.

**12. Section 4(f) Evaluation and Documentation**

This scope task will be performed by others.

**13. Section 6(f) Documentation (if necessary)**

This scope task will be performed by others.

**14. Detailed Cost Estimate**

This scope task will be performed by others.

**15. Combined Design Report (Draft)**

This scope task will be performed by others.

**16. Public Involvement and Public Hearing**

It is anticipated that one additional meeting with the SIG would occur as part of the Preferred Improvement Plan portion of the project. The meeting would discuss the alternatives evaluation and preliminary preferred alternative selection. The following scope is included:

Peralte-Clark will assist Civiltech Engineering in the following Preferred Improvement Plan public involvement tasks:

Stakeholder Involvement Group (SIG) Meetings (Assume one meeting)

- Attendance at SIG meeting.
- Meeting preparation Public Involvement support.

An additional meeting with the public will be held to discuss the preferred alternative. For scoping purposes, it is anticipated this will be a formal Public Hearing. A Public Hearing is assumed to be conducted in person only. This work item will include:

Public Hearing (Assume one meeting)

- Preparation for and attendance at public meeting dry run with agency staff. (Assume 1 meeting per public information meeting)



- Attendance at in-person public hearing.
- Meeting preparation Public Involvement support.

**17. Combined Design Report (Final)**

This scope task will be performed by others.

**18. Funding Applications**

This scope task will be performed by others.

**19. Agency Coordination**

As the project advanced to detailed design of the Preferred Alternative, one Peralte-Clark staff member will attend regular bi-weekly meetings between the Village/CCDTH/LCDOT/Arlington Heights.

One Peralte-Clark staff member will prepare for and attend up to 2 meetings with IDOT/FHWA. This item includes assistance in the preparation of agendas and materials, attendance each meeting.

Attendance and preparation for one Village Board meeting is included in this item.

**Quality Assurance / Quality Control**

**1. QA/QC of Deliverables**

The Consultant will follow and document QA/QC procedures of the project deliverables in accordance with the approved Peralte-Clark QA/QC Plan. In-progress reviews during the design development are included in the specific task outlined in the scope items above. The Consultant will conduct separate QA/QC reviews in advance of each milestone submittal.

Peralte-Clark hours for QA/QC are calculated as 3.0% of the total proposed hours for Peralte-Clark.

**Project Administration and Management**

**1. Coordination and Invoicing**

The Peralte-Clark Project Manager will coordinate staffing assignments, maintain budget oversight, and coordinate monthly progress reviews to ensure project milestones are being met to the extent possible. Project Administration includes the preparation of project invoices and monitoring of the project budget and progress.

Peralte-Clark hours for Project Administration & Management are calculated as 5.0% of the total proposed hours for Peralte-Clark.

**Phase II and Construction Support Services**

Phase II design and construction support services are not included in this scope of work. It is anticipated that these services will be scoped separately after the completion and approval of the Phase I study.

### Direct Cost Assumptions

The following assumptions were made for development of the Direct Costs Check Sheet (BDE 436) for Peralte-Clark, LLC, included as part of this proposal:

- Mileage: Approximate distance to project site from our office in Arlington Heights is 5.5 miles one-way. A two-way trip plus an assumed 1 mile of driving distance total along the site in one trip equals 12 miles per day trip. Two single day trips are assumed for field visits (24 miles) plus an additional 250 miles of driving distance to and from various meetings.
- Vehicle Rental: Assumed at \$55 per day. Vehicle and mileage will not be used for the same trip.
- Reproduction: Actual Cost for reproduction of any plan sets, specifications and reports required for milestone submittals on this project.

	Peralte-Clark Hours					
	PM	SE	PE	DE	ET	Total
<b>Feasibility Study (PEL)</b>						
<b>1. Early Coordination and Data Collection</b>						
<b>A. Field Visits</b>	0	0	8	0	8	16
<b>3. Crash Analysis</b>						
<b>A. Collect GIS crash data from IDOT and/or Counties.</b>	8	0	24	0	24	56
<b>B. Tabulate data</b>	8	0	24	0	32	64
<b>C. Evaluate safety improvement needs, identify countermeasures and write crash analysis text.</b>	6	22	32	0	0	60
<b>4. Traffic Analysis</b>						
<b>A. Traffic Analysis Peer Review</b>	16	0	0	0	8	24
<b>B. Brainstorming Meetings (2)</b>	6	0	6	0	6	18
<b>5. Alternate Geometric Studies</b>						
<b>A. Lake Cook Road Corridor Concepts (3)</b>						
<b>a. Peer Review of Corridor Concepts</b>	24	0	24	0	0	48
<b>b. Brainstorming Meeting</b>	3	0	3	0	3	9
<b>B. Lake Cook Road at Arlington Heights Road Concepts (3)</b>						
<b>a. Peer Review of Intersection Concepts</b>	24	0	24	0	0	48
<b>b. Brainstorming Meeting</b>	3	0	3	0	3	9
<b>12. Public Involvement</b>						
<b>A. Public Meetings (2 Mtgs. &amp; 2 Dry Runs)</b>						
Attend Public Meetings (4 Mtgs. / 4 hrs. each / 1 person)	16	0	0	0	0	16
Meeting Preparation PI Support	40	0	0	0	0	40
<b>B. Stakeholder (SIG) Meetings (2 Mtgs.)</b>						
Attend SIG Meetings (2 Mtgs. / 4 hrs. each / 1 person)	8	0	0	0	0	8
Meeting Preparation PI Support	40	0	0	0	0	40
<b>15. Agency Coordination</b>						
<b>A. Kick-off Meeting (1 mtg./2 hr. each/1 person - live)</b>	2	0	2	0	0	4
<b>B. Bi-Weekly Meetings (52 mtgs./1 hr. each/1 person - virtual)</b>	26	0	26	0	0	52
<b>C. IDOT/FHWA Meetings (5 mtgs./3 hr. ea./1 person - live)</b>	10	0	5	0	0	15
<b>D. Village Board Meetings (2 mtgs./4 hr. ea. Incl. prep./1 person - live)</b>	8	0	0	0	0	8
<b>Preferred Improvement Plan</b>						
<b>2. Traffic Analysis</b>						
<b>A. Lake Cook Road at Raupp Blvd.</b>						
<b>a. Prepare HCS analysis for AM and PM hours</b>	2	0	4	40	0	46
<b>b. Compute queues using IDOT red-time methodology</b>	0	0	0	8	0	8
<b>c. Prepare IDS sheets</b>	2	0	8	20	40	70
<b>B. Lake Cook at Weidner Road</b>						
<b>a. Prepare HCS analysis for AM and PM hours</b>	2	0	4	40	0	46
<b>b. Compute queues using IDOT red-time methodology</b>	0	0	0	8	0	8
<b>c. Prepare IDS sheets</b>	2	0	8	20	40	70
<b>C. Lake Cook at Arlington Heights Road</b>						
<b>a. Prepare HCS analysis for AM and PM hours</b>	2	0	4	40	0	46

	Peralte-Clark Hours					
	PM	SE	PE	DE	ET	Total
<i>b. Compute queues using IDOT red-time methodology</i>	0	0	0	8	0	8
<i>c. Prepare IDS sheets</i>	2	0	8	20	40	70
<b>3. Alternate Geometric Studies</b>						
<b>A. Traffic Maintenance Analysis</b>						
<i>a. Determine stage construction methodology</i>	2	0	10	0	8	20
<i>b. Determine traffic maintenance requirements</i>	1	0	4	0	4	9
<i>c. Determine temporary construction easement needs</i>	1	0	4	0	4	9
<i>d. Prepare Traffic Maintenance Memo with exhibits</i>	1	0	9	0	6	16
<i>e. Typical Sections - 5 typical x 3 stages</i>	2	0	8	0	20	30
<i>f. Develop and Draft Staging Plan - Base Plan - 3 stages of construction</i>	16	16	48	38	48	166
<b>B. Preliminary ADA ramp designs</b>						
<i>a. Preliminary ramp designs for 25 ramps (21 existing, 4 additional)</i>	8	0	22	0	120	150
<b>12. Public Involvement</b>						
<b>A. Stakeholder (SIG) Meetings (1 Meeting)</b>						
<i>Attend SIG Meetings (1 Mtg. / 4 hrs. each / 1 person)</i>	4	0	0	0	0	4
<i>Meeting Preparation PI Support</i>	20	0	0	0	0	20
<b>B. Public Hearing (1 Meeting &amp; 1 Dry Run)</b>						
<i>Attend Public Meetings (1 Meeting &amp; 1 Dry Run)</i>	8	0	0	0	0	8
<i>Meeting Preparation PI Support</i>	20	0	0	0	0	20
<b>19. Agency Coordination</b>						
<b>A. Bi-Weekly Meetings (52)</b>	26	0	26	0	0	52
<b>B. IDOT/FHWA Meetings (2)</b>	10	0	5	0	0	15
<b>C. Village Board Meetings (1 mtg./4 hr. ea. Incl. prep./1 person - live)</b>	4	0	0	0	0	4
<b>QA/QC</b>	47	0	0	0	0	47
<b>Project Management</b>	79	0	0	0	0	79
<b>Totals</b>	<b>509</b>	<b>38</b>	<b>353</b>	<b>242</b>	<b>414</b>	<b>1556</b>



EXHIBIT E  
 COST ESTIMATE OF CONSULTANT SERVICES WORKSHEET  
 FIXED RAISE

<b>Local Public Agency</b> Village of Buffalo Grove	<b>County</b> Cook and Lake Counties	<b>Section Number</b> Lake Cook Rd.
<b>Consultant (Firm) Name</b> Peralte-Clark, LLC	<b>Prepared By</b> John A. Clark, P.E., ENV SP	<b>Date</b> 5/25/2022

**PAYROLL ESCALATION TABLE**

CONTRACT TERM	24	MONTHS	OVERHEAD RATE	155.54%
START DATE	7/1/2022		COMPLEXITY FACTOR	0
RAISE DATE	1/1/2023		% OF RAISE	2.00%
END DATE	6/30/2024			

**ESCALATION PER YEAR**

Year	First Date	Last Date	Months	% of Contract
0	7/1/2022	1/1/2023	6	25.00%
1	1/2/2023	1/1/2024	12	51.00%
2	1/2/2024	7/1/2024	6	26.01%

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**The total escalation = 2.01%**





Local Public Agency

Village of Buffalo Grove

County

Cook and Lake Counties

Section Number

Lake Cook Rd.

COST ESTIMATE WORKSHEET

Exhibit E Cost Estimate of Consultant Services Worksheet Fixed Raise

OVERHEAD RATE **155.54%**

COMPLEXITY FACTOR **0**

TASK	STAFF HOURS	PAYROLL	OVERHEAD & FRINGE BENEFITS	DIRECT COSTS	FIXED FEE	SERVICES BY OTHERS	TOTAL	% OF GRAND TOTAL
Feasibility Study (PEL)		-	-		-		-	0.00%
1. Early Coordination and Data Collection	16	758	1,178		250		2,186	0.87%
3. Crash Analysis	180	9,877	15,363		3,260		28,500	11.33%
4. Traffic Analysis	42	2,503	3,893		826		7,222	2.87%
5. Alternate Geometric Studies	114	7,356	11,442		2,428		21,226	8.44%
12. Public Involvement	104	7,745	12,046		2,556		22,347	8.88%
15. Agency Coordination	79	5,328	8,287		1,758		15,373	6.11%
Preferred Improvement Plan		-	-		-		-	0.00%
2. Traffic Analysis	372	16,206	25,207		5,348		46,761	18.58%
3. Alternate Geometric Studies	400	18,910	29,413		6,240		54,563	21.68%
12. Public Involvement	52	3,872	6,023		1,278		11,173	4.44%
19. Agency Coordination	71	4,766	7,413		1,573		13,752	5.47%
QA/QC	47	3,500	5,444		1,155		10,099	4.01%
Administration	79	5,883	9,150	1,455	1,941		18,429	7.32%
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<b>Subconsultant DL</b>						<b>0</b>		
<b>TOTALS</b>	<b>1556</b>	<b>86,704</b>	<b>134,859</b>	<b>1,455</b>	<b>28,613</b>	<b>-</b>	<b>251,631</b>	<b>100.00%</b>

221,563



**Local Public Agency**

**County**

**Section Number**

Village of Buffalo Grove

Cook and Lake Counties

Lake Cook Rd.

**AVERAGE HOURLY PROJECT RATES**

Exhibit E Cost Estimate of Consultants Services Worksheet Fixed Raise

SHEET 1 OF 3

PAYROLL CLASSIFICATION	AVG HOURLY RATES	TOTAL PROJ. RATES			Feasibility Study (PEL)			1. Early Coordination and Data Collection			3. Crash Analysis			4. Traffic Anaysis			5. Alternate Geometric Studies		
		Hours	% Part.	Wgtd Avg	Hours	% Part.	Wgtd Avg	Hours	% Part.	Wgtd Avg	Hours	% Part.	Wgtd Avg	Hours	% Part.	Wgtd Avg	Hours	% Part.	Wgtd Avg
Principal	78.00	0.0						0			0			0			0		
Project Manager	74.47	509.0	32.71%	24.36				0			22	12.22%	9.10	22	52.38%	39.01	54	47.37%	35.27
Senior Engineer	70.55	38.0	2.44%	1.72				0			22	12.22%	8.62	0			0		
Project Engineer	57.65	353.0	22.69%	13.08				8	50.00%	28.82	80	44.44%	25.62	6	14.29%	8.24	54	47.37%	27.31
Design Engineer	43.09	242.0	15.55%	6.70				0			0			0			0		
Engineering Technician	37.06	414.0	26.61%	9.86				8	50.00%	18.53	56	31.11%	11.53	14	33.33%	12.35	6	5.26%	1.95
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<b>TOTALS</b>		1556.0	100%	\$55.72	0.0	0.00%	\$0.00	16.0	100%	\$47.35	180.0	100%	\$54.87	42.0	100%	\$59.60	114.0	100%	\$64.53

**Local Public Agency**

**County**

**Section Number**

Village of Buffalo Grove

Cook and Lake Counties

Lake Cook Rd.

**AVERAGE HOURLY PROJECT RATES**

Exhibit E Cost Estimate of Consultant Services Worksheet Fixed Raise

SHEET 2 OF 3

PAYROLL CLASSIFICATION	AVG HOURLY RATES	12. Public Involvement			15. Agency Coordination			Preferred Improvement Plan			2. Traffic Analysis			3. Alternate Geometric Studies			12. Public Involvement		
		Hours	% Part.	Wgt'd Avg	Hours	% Part.	Wgt'd Avg	Hours	% Part.	Wgt'd Avg	Hours	% Part.	Wgt'd Avg	Hours	% Part.	Wgt'd Avg	Hours	% Part.	Wgt'd Avg
Principal	78.00	0			0						0			0					
Project Manager	74.47	104	100.00%	74.47	46	58.23%	43.36				12	3.23%	2.40	31	7.75%	5.77	52	100.00%	74.47
Senior Engineer	70.55	0			0						0			16	4.00%	2.82			
Project Engineer	57.65	0			33	41.77%	24.08				36	9.68%	5.58	105	26.25%	15.13			
Design Engineer	43.09	0			0						204	54.84%	23.63	38	9.50%	4.09			
Engineering Technician	37.06	0			0						120	32.26%	11.95	210	52.50%	19.46			
<b>TOTALS</b>		104.0	100%	\$74.47	79.0	100%	\$67.44	0.0	0%	\$0.00	372.0	100%	\$43.57	400.0	100%	\$47.28	52.0	100%	\$74.47

**Local Public Agency**

Village of Buffalo Grove

**County**

Cook and Lake Counties

**Section Number**

Lake Cook Rd.

**AVERAGE HOURLY PROJECT RATES**

Exhibit E Cost Estimate of Consultant Services Worksheet Fixed Raise

SHEET  3  OF  3

PAYROLL CLASSIFICATION	AVG HOURLY RATES	19. Agency Coordination			QA/QC			Adminstration											
		Hours	% Part.	Wgtd Avg	Hours	% Part.	Wgtd Avg	Hours	% Part.	Wgtd Avg	Hours	% Part.	Wgtd Avg	Hours	% Part.	Wgtd Avg			
Principal	78.00																		
Project Manager	74.47	40	56.34%	41.95	47	100.00%	74.47	79	100.00%	74.47									
Senior Engineer	70.55																		
Project Engineer	57.65	31	43.66%	25.17															
Design Engineer	43.09																		
Engineering Technician	37.06																		
<b>TOTALS</b>		71.0	100%	\$67.12	47.0	100%	\$74.47	79.0	100%	\$74.47	0.0	0%	\$0.00	0.0	0%	\$0.00	0.0	0%	\$0.00

**COMPANY NAME: Peralte-Clark, LLC**

PTB NUMBER: **Lake Cook Road from Raupp to Arlington Heights Road**

TODAY'S DATE: **5/25/2022**

ITEM	ALLOWABLE	UTILIZE W.O. ONLY	QUANTITY J.S. ONLY	CONTRACT RATE	TOTAL
Per Diem (per GOVERNOR'S TRAVEL CONTROL BOARD)	Up to state rate maximum			\$0.00	\$0.00
Lodging (per GOVERNOR'S TRAVEL CONTROL BOARD)	Actual cost (Up to state rate maximum)			\$0.00	\$0.00
Lodging Taxes and Fees (per GOVERNOR'S TRAVEL CONTROL BOARD)	Actual cost			\$0.00	\$0.00
Air Fare	Coach rate, actual cost, requires minimum two weeks' notice, with prior IDOT approval			\$0.00	\$0.00
Vehicle Mileage (per GOVERNOR'S TRAVEL CONTROL BOARD)	Up to state rate maximum		200	\$0.575	\$115.00
Vehicle Owned or Leased	\$32.50/half day (4 hours or less) or \$65/full day			\$0.00	\$0.00
Vehicle Rental	Actual cost (Up to \$55/day)		2	\$55.00	\$110.00
Tolls	Actual cost		20	\$1.50	\$30.00
Parking	Actual cost			\$25.00	\$0.00
Overtime	Premium portion (Submit supporting documentation)			\$0.00	\$0.00
Shift Differential	Actual cost (Based on firm's policy)			\$0.00	\$0.00
Overnight Delivery/Postage/Courier Service	Actual cost (Submit supporting documentation)		1	\$200.00	\$200.00
Copies of Deliverables/Mylars (In-house)	Actual cost (Submit supporting documentation)			\$0.00	\$0.00
Copies of Deliverables/Mylars (Outside)	Actual cost (Submit supporting documentation)		1	\$1,000.00	\$1,000.00
Project Specific Insurance	Actual cost			\$0.00	\$0.00
Monuments (Permanent)	Actual cost			\$0.00	\$0.00
Photo Processing	Actual cost			\$0.00	\$0.00
2-Way Radio (Survey or Phase III Only)	Actual cost			\$0.00	\$0.00
Telephone Usage (Traffic System Monitoring Only)	Actual cost			\$0.00	\$0.00
CADD	Actual cost (Max \$15/hour)			\$0.00	\$0.00
Web Site	Actual cost (Submit supporting documentation)			\$0.00	\$0.00
Advertisements	Actual cost (Submit supporting documentation)			\$0.00	\$0.00
Public Meeting Facility Rental	Actual cost (Submit supporting documentation)			\$0.00	\$0.00
Public Meeting Exhibits/Renderings & Equipment	Actual cost (Submit supporting documentation)			\$0.00	\$0.00
Recording Fees	Actual cost			\$0.00	\$0.00
Transcriptions (specific to project)	Actual cost			\$0.00	\$0.00
Courthouse Fees	Actual cost			\$0.00	\$0.00
Storm Sewer Cleaning and Televising	Actual cost (Requires 2-3 quotes with IDOT approval)			\$0.00	\$0.00
Traffic Control and Protection	Actual cost (Requires 2-3 quotes with IDOT approval)			\$0.00	\$0.00
Aerial Photography and Mapping	Actual cost (Requires 2-3 quotes with IDOT approval)			\$0.00	\$0.00
Utility Exploratory Trenching	Actual cost (Requires 2-3 quotes with IDOT approval)			\$0.00	\$0.00
Testing of Soil Samples*	Actual cost			\$0.00	\$0.00
Lab Services*	Actual cost (Provide breakdown of each cost)			\$0.00	\$0.00
Equipment and/or Specialized Equipment Rental*	Actual cost (Requires 2-3 quotes with IDOT approval)			\$0.00	\$0.00
				\$0.00	\$0.00
				\$0.00	\$0.00
				\$0.00	\$0.00
				\$0.00	\$0.00
				\$0.00	\$0.00
				\$0.00	\$0.00
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				\$0.00	\$0.00
				\$0.00	\$0.00
				\$0.00	\$0.00
				\$0.00	\$0.00
				\$0.00	\$0.00
				\$0.00	\$0.00
<b>TOTAL DIRECT COST</b>					<b>\$1,455.00</b>

*\*If other allowable costs are needed and not listed, please add in the above spaces provided.*

**LEGEND**  
 W.O. = Work Order  
 J.S. = Job Specific

**Attachment D**  
**Bridge Deck Delamination GPR Survey**  
**GS Infrastructure, Inc.**



**Proposal #: 10123**

**Proposal For: Civiltech Engineering, Inc.**

**Lake-Cook Road over Buffalo Creek**

**GPR Inspection**

REV	DATE	DESCRIPTION	AUTHOR
0	05/11/2022	FFP Cost Proposal	B. Granger

PREPARED BY / TECHNICAL POC:

APPROVED BY / CONTRACTING POC:

  
PROJECT MANAGER  
Brian Granger  
[brian.granger@gsinfrastructure.com](mailto:brian.granger@gsinfrastructure.com)  
307.751.9404

ACCEPTED BY:

\_\_\_\_\_

Print Name/Company

\_\_\_\_\_

Sign Name

GS Infrastructure, Inc.  
47500 US HWY 41  
Houghton, MI 49931

CAGE Code: 7FD16  
DUNS Number: 079859672

[www.gsinfrastructure.com](http://www.gsinfrastructure.com)  
tel: 906.373.8106 x 1001

## Statement of Qualifications - Who We Are.

GS Infrastructure strives to be a leading service provider of Non-Destructive Testing (NDT). Collection is performed at highway speeds for bridge decks and pavements utilizing a vehicle mounted system to capture images. Collection for substructure and superstructures is by land and marine vessel. Images are captured using Ground Penetrating Radar (GPR), Infrared Thermography (IRT) and HD Visual scoping. These innovative methods ultimately save clients cost, time, and reduce risk. Our service applications utilize NDT tools for bridge decks, substructures and superstructures, airport runways and taxiways, tunnels and roads.

### PRINCIPAL

Glen Simula, President  
glen.simula@gsinfrastructure.com  
906-231-5103



### PROJECT MANAGER

Brian Granger  
[brian.granger@gsinfrastructure.com](mailto:brian.granger@gsinfrastructure.com)  
307.751.9404

At GS Infrastructure, we leverage previous bridge and substructure scoping experiences with project presence across the United States. In addition, we take pride in our historical professional experience of the team to successfully carry out each project. GS Infrastructure utilizes expertise in engineering to continually improve our processes for faster results, higher quality, and more pertinent information.

Our 3D GPR collection and analysis produces a real-time, sliced visual of elements to depths up to 10+ feet. Our patented IRT process captures the thermal, electromagnetic, and visible indicators of deteriorations, voids, patches, surface cracking and spalls. Information received is compiled through our proprietary analysis program, with output produced in native CAD formats. When combined with our state of the art HD visual cameras, we offer a complete package of scoping services from real-time problem identification to detailed advanced data analysis for management systems.

GS Infrastructure specializes in underground utility and infrastructure locates. Our GPR technology allows experts to detect locations and depths of underground utilities. Our utility detection is far above industry standards. The 3D image provides a greater resolution than the standard 2D GPR device.

The GS Infrastructure team is comprised of engineers and ASNT-TC-1A Level 1 certified technicians. GS Infrastructure assures that the users of NDT equipment have an understanding of the science involved with imaging and NDT expertly discussing the outputs. Additionally, our services exceed ASTM Standard D4788-03.

## **Success Stories**

- **Illinois State Toll Highway Authority/IDOT**

Bridge deck scan of 36 bridges, estimated 1.3 million SF, along I-90 from Ohio Street Interchange to the Edens Expressway, I-94. Utilized a vehicle mounted, air-coupled GPR antenna and HD video. Analyzed data, created native CAD drawings, and produced a deliverable report. Collection performed at highway speeds with no lane closures.

- **Illinois State Toll Highway Authority**

Bridge deck scan of 13 bridges, est. 162,000 SF, over I-88 between Aurora and DeKalb IL, with an aggressive timeline for collection, analysis and reporting. Utilized a vehicle mounted, air-coupled GPR antenna and HD video. Analyzed data, created native CAD drawings, and produced a deliverable report. Collection performed at highway speeds with no lane closures.

- **Wisconsin DOT**

GPR and IRT scan of 3 concrete bridge decks along I-90, est. 16,600 SF, with an aggressive timeline for collection, analysis and reporting. Utilized a vehicle mounted air-coupled GPR Sensor, IRT/Visual HD camera and HD video, collection performed traveling at highway speeds, eliminating lane closures. Analyzed data, created native CAD drawings, and produced a deliverable report.

- **Hardy Earthen Dam**

GPR scan of Earthen Dam, est. 59,400 SF, to a depth of 10' to 15', GPR scan of concrete Emergency Spillway, est. 90,500 SF, with an aggressive timeline for collection, analysis and reporting. Utilized a vehicle mounted, air-coupled GPR antenna and an HD video. Analyzed data, created native CAD drawings, and produced a deliverable report.

- **I-75 Rouge River Bridge, MDOT**

Substructure scoping of the super-bridge in Detroit, MI. A total of 71 columns and 19 column caps were analyzed utilizing a hand-held HD Infrared Imaging Sensor and HD visual camera. Analyzed data, created native CAD drawings, and produced a deliverable report. Performed scoping with traffic obstruction.

- **Houghton County Airport CMX**

Runway 13/31 and Taxiway Charlie scan, approximately 1.7 million SF asphalt. Utilized a vehicle mounted, air-coupled GPR antenna and HD video. Analyzed data, created native CAD drawings, and produced a deliverable report. Collection performed without air traffic disruption or airport delays.



## Non-Destructive Testing - What We Do.



### Ground Penetrating Radar

3 D Ground Penetrating Radar collection and analysis produces a real-time sliced visual of elements to depths up to 15 feet. Our patented IRT process captures the thermal, electromagnetic and visible indicators of deteriorations, voids, overlay thickness, patches, cracks and spalls. Information received is compiled through our proprietary analysis program, with output produced in native CAD formats.



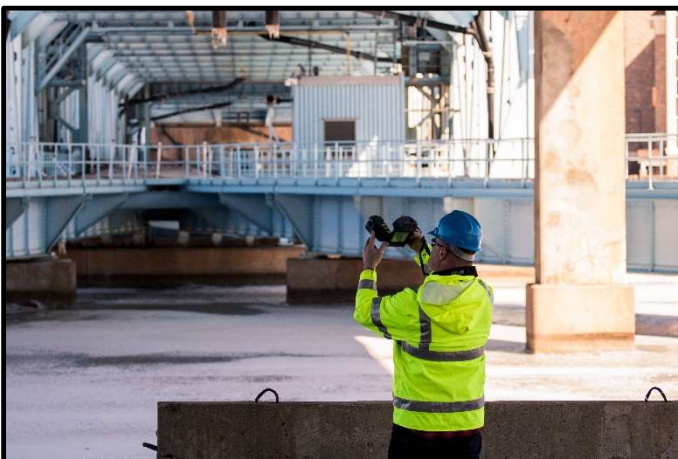
### Infrared Thermography

Infrared Thermography imaging utilizing natural diurnal cycle for detection defects by temperature differential through materials.

Scoping of concrete surfaces and pavement overlays, at highway speeds/no lane closures.

Underdeck and substructure scanning from ground or maritime platform to 100'.

ASNT TC-1A Level I Technicians



### High Definition Visual

High speed HD image collection for condition assessments by locating and quantifying patches, spalls and cracks.

Automated deliverables for Pavement Condition Index (PCI) for roads, parking lots and airports.

## 1. Value Statement

### 1.1 NDT Scanning using GPR

GS Infrastructure's NDT uses GPR to scan non-visible locations. Traditional methods use manual sounding and collection techniques. These methods can be time consuming and lead to cost overruns from inaccuracies due to human interpretation and discrepancies from background noise. In addition, traditional methods most often require lane closures. With GPR collection methods, data is retrieved via an automated software program, from inside a vehicle traveling at highway speeds. Collection occurs in significantly less time, and without the need for lane closures.

### 1.2 NDT Scanning using IRT

With IRT, GS Infrastructure's certified technicians retrieve Infrared and HD visual images, this data is collected with an automated software program. IRT is based on the concept that surface and subsurface defects influence the heat flow in a material. As temperature conduction occurs in a bridge deck, any discontinuities in a concrete slab will interrupt the heat transfer and show a temperature change in a confined area. Collection occurs from inside a vehicle traveling at highway speeds and without the need for lane closures.

### 1.3 GS Infrastructure Value

- **Experience:** Quality assured by Certified ASNT-TC-1A Level 1 technicians with over 20 years' experience in IRT technologies and over 4,000 hours in substructure scoping.
- **Versatility:** GS Infrastructure has the technology and ability to combine various NDT methods for optimizing NDT scoping data.
- **R&D:** GS Infrastructure employs software, civil, mechanical and electrical engineers, and ASNT technicians for interdisciplinary research and development. The team designs, tests and operates proprietary software programs with a patented collection approach and data verification processes to assure a high quality NDT service.

## 2. Statement of Work

The overall goal of this effort is to provide cost effective and safe **GPR collection** and indepth inspection and evaluation of the driving surface, median and sidewalks for Lake-Cook Road over Buffalo Creek in Buffalo Grove, Illinois, bridge SN 016-3203.

:

### GPR Collection/Analysis/Report

1. **GPR** on 1 bridge deck to include the sidewalks and median:
  - SN 016-3202. Total square feet: 5,000.  
Sidewalks Approx Total Square feet: 750.  
Median Approx Total Square feet: 1,125
2. Map areas of delamination, patches, spalls, cracks, and other deterioration within the concrete deck to full deck thickness.

3. Provide report exhibits and quantities for all deck deteriorations, patching, spalling, surficial/interior/bottom deck cracking, and/or other impairments for full the bridge deck.
4. Provide CAD drawings of damage exhibits, provided in .dwg format.

This section includes a detailed summary of the tasks required to achieve the goals of this project

## **2.1 Understanding of Service**

Bridge deck evaluations and deficiency data gathering will be performed using NDT procedures. GS Infrastructure will utilize a vehicle mounted 21 array, multi-channel, air coupled GPR collection antenna. The work shall be in accordance with ASTM D6087-08.

The methods utilize a distance measuring instrument (DMI) system, augmented by a Global Positioning System (GPS), to accurately locate defects.

The collection of data on the bridge deck driving surface will not impede the flow of traffic to ultimately provide sufficient data to determine the condition of the bridge deck. Discussion will need to be had for the median and the sidewalks, this may interrupt flow of traffic while entering/exiting the area to scan. GS Infrastructure will ensure that each structure is evaluated efficiently, safely and economically. The scoping reports for each structure will be comprehensive and complete, created from best available existing bridge drawings provided by the CLIENT and marked with the indications of defects found by GS Infrastructure. Additionally, a summary of the work performed and defects located will be provided in MS Word and Excel formats.

## **2.2 Work Plan**

### **1. Collection:**

- Field scoping will begin once notice to proceed and all necessary permits to work are approved.
- Field scoping will be carried out on the bridge deck using a vehicle mounted multi-channel, air coupled GPR collection antenna, without the need for traffic control or lane closures (unless required, pricing in quotation does not include traffic control or lane closures).
- GS Infrastructure will ensure that each structure is evaluated efficiently, safely and economically. The scoping reports for each structure will be comprehensive, created from best available existing bridge drawings provided by the CLIENT and marked with the indications of defects found by GS Infrastructure. Additionally, a summary of the work performed and defects located will be provided in Adobe PDF and Excel formats.

**2. Analysis:** During the analysis phase, indications of delaminations, patches, spalls, deterioration and significant cracking will be identified by GPR, quantified and compiled in percentages based on total square foot area for defects and by linear footage for cracking. The results will be comprehensive and assembled in a manner that can be easily incorporated into bridge inspection reports, work recommendations, and/or detailed scoping documents.

**3. Defect Results:** The results of analyzed defects are interpreted as specified:

- **Indications of deteriorations** - the separation of concrete and presence of voids within the deck. Using GPR, the technician will identify the elements that display indications of deteriorations. All of the defects are identified and measured as a rectangular or square form in the report. The actual shapes of the deteriorations typically are irregular in shape when detected by the NDT methods, and are identified and measured as rectangular or square shapes in the report. The area of each deterioration is calculated after quantified in the analysis program.
- **Patches**- interpreted as a concrete area that has been previously replaced and filled in with a new material as a sealant. The technician views the collection data to interpret these patches. The patches that show indications of delaminations underneath the patch will be indicated as both a delamination and overlaying patch.
- **Spalls** - interpreted with GPR is concrete that has broken up, flaked, or become pitted.
- **Delaminations** - areas of deterioration at or near the surface of the deck.
- **Cracking** - GPR: surficial/interior/bottom deck cracking are located.

### 2.3 Reports/Deliverables:

- The final phase of the project is to communicate the NDT findings and results in the form of a comprehensive report. GS Infrastructure will compile and present the data in a manner useful to aid in future programming and asset management decisions by the client. The analysis, report development, and QC measures will take place at GS Infrastructure facilities.
- One overall GPR report shall be provided recording the entirety of the project. Each bridge shall have an individual appendix, presenting specifics to each, respectively. For the deck, the report shall cover the area and depth of deck delamination, voids, patches, spalls and linear footage of cracks. Results will precisely output to CAD formats. Report will also indicate the bridge deck thickness within the bridge limits.
- The report and deliverable will be submitted in CAD native files based on client specified format with PDF and Excel spreadsheets including a summary of detailed locations, percentage of element area delaminated, and square footage of defects.
- Reports will be subject to stringent QA/QC reviews performed by GS Infrastructure prior to being submitted to the client.
- Report will be completed and submitted within 60 days of data collection with flexibility of interim reporting.

### 2.4 Project Timing / Milestones Schedule

Project scheduling to be completed 5 days after receipt of confirmed award and start of

project. A schedule can be provided upon request.

## 2.5 CLIENT Responsibilities

The CLIENT will be responsible for providing:

1. Notice to proceed and all necessary permits to work. If traffic control or lane closures are required by the state or municipality, pricing/timing does not include, and will need to be updated.
2. Specification/requirements, additional project documents as needed for GS Infrastructure scope of work.
3. Provide best available native CAD (.dgn/.dwg) files and previous maintenance reports of bridges and substructures upon Notice to Proceed (NTP).
4. QA/QC during any post-evaluation contractor rehabilitation work.

## 2.6 Expected Pricing

The Firm fixed pricing (FFP) includes: survey of 1 bridge at location described above in section 2, labor for 2 field technicians, travel and mobilization, collection equipment usage and fees, data analysis, reporting and project management in support of all tasks.

**The FFP for the estimated scope of work to scan 1 bridge at location described in Section 2 above is estimated at:**

10123	<b>CivilTech_Lake-Cook Road over Buffalo Creek_GPR</b>	
	Mobilization and Collection	\$ 8,521.88
	Analysis	\$ 3,000.00
	Reporting	\$ 4,687.50
	<b>Job Total</b>	<b>\$16,209.38</b>

## 3. Confidential Information

Except as required by law, neither party shall communicate to any third party or use (except for purposes connected with the performance of its obligations hereunder) any information of the other reasonably knowing to be confidential. Information provided shall be presumed confidential, unless the party disclosing the information can show that the information (i) has become part of the public domain other than by breach of this document; (ii) has been furnished to the party by third parties without restriction on disclosure or use; or (iii) which was in the party's possession at the time it entered into the agreement. Supplier shall restrict the knowledge of all such information to as few as possible of its employees.

#### **4. Terms and Conditions**

The invoice will be based upon the actual work performed and at the quoted rates. Additional work completed outside the scope of this quotation will be billed at \$250/hour for collection, \$130/man-hour for professional services/project management, and \$80/man-hour for analysis. Unless otherwise stated, invoices are due 30 days from the invoice date. An administrative fee of 1.5% per month will be added to all delinquent accounts. It is agreed that the client is liable for all costs and expenses of collection, including reasonable attorney's fees, whether or not legal proceedings are instituted. Disputes of invoiced amounts must be submitted in writing within 30 days of invoice date.

#### **5. Miscellaneous**

GS Infrastructure supports affirmative action and equal employment opportunity (EEO). GS Infrastructure's employment practices, including hiring, firing, promotion and all other job-related actions are based on job qualifications alone. GS Infrastructure is committed to equal and fair treatment for all present and prospective employees without regard to race, color, religion, national origin, age, sex, disability, weight, height, marital status, veteran status, disabled veteran or any other classification protected by applicable law.

GS Infrastructure, Inc. is a certified HubZone Small Business.

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**Attachment E**

**Geotechnical Studies Proposal**

**Midland Standard Engineering and Testing, Inc.**





WWW.MSETINC.COM

**MIDLAND STANDARD ENGINEERING & TESTING, INC.**

140 Nolen Drive South Elgin, Illinois, 60177  
(847) 844-1895 f(847) 844-3875

May 11, 2022

Mr. Joel E. Christell, P.E.  
**Civiltech Engineering, Inc.**  
Two Pierce Place, Suite 1400  
Itasca, Illinois 60143

Re: Proposal for Roadway Geotechnical Report and Bridge Structure Geotechnical Report  
**Lake Cook Road Reconstruction**  
Lake & Cook County, Illinois

Dear Mr. Christell:

We are pleased to have the opportunity to submit the following proposal for performance of a geotechnical investigation for the road and bridge improvements for the referenced project.

Project Description and Scope of Work

Phase 1 design improvements include 8800 lineal feet of road reconstruction and widening and one bridge widening. For this work, a total of sixty-four (64) roadway soil profile borings, thirty-four (34) pavement cores, and two (2) bridge structure borings are planned.

Method of Performance - Field Work

The typical subgrade soil survey exploration will be accomplished by performing soil profile borings spaced at approximately 300-foot intervals, for both pavements.

- a) Soil survey and structure borings will be extended to depths of ten (10) feet with split spoon sampling at 30-inch intervals or more frequently if required to sample all soil strata.
- b) The subsurface soil exploration for the proposed improvements will be accomplished by performing two (2) structure soil borings for the bridge abutment extension on the north side. The soil borings will involve drilling test holes that incorporate standard penetration tests and split-spoon sampling at 2-1/2 to 5-foot intervals. The borings will be drilled to achieve a 500-kip capacity for a 14" metal shell pile or to bedrock, whichever is encountered first.
- c) Pavement cores will be made with an electric drill/core barrel setup along the existing alignment to determine the existing pavement section.

- d) Laboratory testing will include moisture content determinations, consistency (penetrometer value), determination on cohesive soil samples and classification tests as required to identify major subgrade soil types, and an Illinois Bearing Ratio test will be performed on the dominant subgrade soil.

The soil survey borings will be performed in compliance with the current State of Illinois, Geotechnical Manual' December 2020, and the Design Memorandum for Structure Geotechnical Reports.

We propose to mobilize a drill rig to the site after notice to proceed, layout, and utility clearance. In our proposal, we have included provisions for rough layout of the borings and have assumed that the final locations and elevations will be determined by the Design Engineer or will be referenced to centerline stationing provided by the Engineer.

#### Method of Performance - Analysis and Report

The boring information will be used to develop soils profile drawings and boring logs as required which will be prepared showing the soil types and test data in accordance with applicable specifications. Pavement core information will be presented on core logs. We understand that reproducible copies of the plan and profile showing existing and proposed grade will be provided by Civiltech for our plotting of the soil profile.

The results of this field exploration and laboratory testing would be used in an analysis and formulation of our recommendations. Major subject areas for our analysis, recommendations and report would include:

1. Identification of subgrade soil treatment areas.
2. General earthwork recommendations.
3. Description of the existing pavement section encountered in the cores.
4. Subgrade soil strength criteria for input to the pavement design being done by the Design Engineer.
5. Determine foundation parameters for the bridge abutment extensions.

A written report summarizing and presenting the data and recommendations will be prepared by a Professional Engineer, licensed in the State of Illinois.

#### Schedule and Timing

We will begin on work after notice to proceed, and utility clearance. We plan on mobilizing and doing all the borings concurrently. Final reports and profiles will be coordinated with Civiltech as the base plan and profile drawings and other designs are completed.

#### Fee

We propose to provide this work at the unit rates quoted on the attached Schedule of Services and Fees, Attachments 1. These estimated quantities and unit rates are based on information as outlined in this proposal and experience on past projects. On the basis of the above information, we estimate that these services can be provided for a fee of: **\$ 59,235.00.**

Closure

Our staff is acquainted with the local subsurface conditions and has participated in the planning, development and execution of numerous highway soil explorations in this area. We appreciate the opportunity to provide our services and look forward to working with you on this project. If you have any questions concerning our proposed scope of work or fees, please contact us.

Very truly yours,  
MIDLAND STANDARD ENGINEERING & TESTING, INC.



William J. Wyzgala, P.E.  
Vice President

WJW

Enclosure: Attachment 1

**ATTACHMENT 1  
SCHEDULE OF SERVICES AND FEES**

Lake Cook Road, from 585' W of N. Ridge Road to 460' W of Buffalo Grove Road  
Lake/Cook County, Illinois

<u>Item</u>	<u>Estimated Quantity</u>	<u>Unit Cost</u>	<u>Extension</u>
<u>Field Services</u>			
Mobilization of Drill Rig, equipment, crew, per day	9	\$200.00	\$1,800.00
Roadway profile borings with Split Spoon Sampling at 2.5 foot intervals, per lf	640	\$21.00	\$13,440.00
Pavement Core, Concrete pavement, each	34	\$215.00	\$7,310.00
Bridge Structure Borings			
Through earth and other materials except rock, encountered below ground surface, split spoon sampling at thirty (30) to sixty (60) inch intervals, penetration record, unconfined compression tests (in cohesive soils) on samples retained,			
0 to 30 foot depth, per foot	60	\$23.00	\$1,380.00
30 to 60 foot depth, per foot	60	\$26.00	\$1,560.00
60 foot plus depth, per foot	20	\$29.00	\$580.00
Traffic Control, arrow board, signs, barricades, Flagmen, etc., per day	11	\$900.00	\$9,900.00
		<b>Field Services Total:</b>	<b>\$35,970.00</b>
<u>Laboratory Services</u>			
Moisture Content Determinations, ea	330	\$6.00	\$1,980.00
Soil Classification, Atterberg Limit & Hydrometer, ea.	11	\$180.00	\$1,980.00
Organic Content Tests, ea.	5	\$65.00	\$325.00
Illinois Bearing Ratio Test including Standard proctor Test, ea.	2	\$330.00	\$660.00
		<b>Laboratory Services Total:</b>	<b>\$4,945.00</b>
<u>Engineering Services for RGR &amp; SGR Report Including:</u>			
Layout Coordination w/Design Engineer			
Utility Clearance and Permits			
Engineering Supervision of Soil Borings			
Preparation of Soil Profile Drawings			
Summary of Existing Pavement Materials			
Analysis and Recommendations for Subgrade			
Preparation, RGR Report, Consultation			
Analysis and Recommendations for Structure Foundations			
Pile/Caisson Length Estimates, Lateral Earth Pressures, SGR Report, Consultation			
	<u>Est. Quantity</u>	<u>Rate/Hour</u>	<u>Extension</u>
Principal Engineer, per hr.	5	\$160.00	\$800.00
Geotechnical Engineer, per hr.	32	\$150.00	\$4,800.00
Staff Engineer, per hr.	32	\$110.00	\$3,520.00
Field Engineer, per hr.	80	\$105.00	\$8,400.00
Engineering Technician, per hr.	8	\$100.00	\$800.00
		<b>Engineering Services Total:</b>	<b>\$18,320.00</b>
		<b>TOTAL:</b>	<b>\$59,235.00</b>

**Attachment F**  
**Preliminary Environmental Site Assessment Proposal**  
**True North Consultants**

May 9, 2022

Joel Christell, P.E.  
Civiltech Engineering, Inc.  
Two Pierce Place, Suite 1400  
Itasca, Illinois 60143

**RE: Proposal - Preliminary Environmental Site Assessment  
Lake Cook Road Phase I Study  
Lake Cook Road between Raupp Boulevard and Ridge Avenue  
Buffalo Grove, Illinois  
TNC Proposal #P122-504**

Dear Mr. Christell,

True North Consultants, Inc. (True North) is pleased to provide this proposal to perform a Preliminary Environmental Site Assessment (PESA) for the proposed Phase I Study of Lake Cook Road approximately between Raupp Boulevard and Ridge Avenue located in Buffalo Grove, Illinois (the Site).

The following sections of this proposal present background information, scope of services, estimated costs, schedule, and limitations.

## **BACKGROUND**

On May 5, 2022, Civiltech Engineering, Inc. (Client) requested that True North provide a proposal to complete a PESA for the above referenced project as part of the Phase I Study of Lake Cook Road. The adjoining properties are primarily residential and commercial uses along Lake Cook Road. As part of the assessment, portions of Raupp Boulevard, Weidner Road, Arlington Heights Road, and Ridge Avenue shall be assessed. This assessment would be performed to provide a screening of public information to determine the environmental status of the project area.

## **SCOPE OF SERVICES**

True North will perform this PESA in conformance with the requirements outlined by *Illinois Department of Transportation (IDOT) in Bureau of Design and Environment (BDE) 95-12, BDE 96-8, the Manual for Conducting Preliminary Environmental Site Assessments for Illinois Department of Transportation Highway Projects (Erdmann et al., 2014), and Section 20-12.03(b) - Preliminary Environmental Site Assessment of the IDOT Bureau of Local Roads Manual (Second Edition OFS 2012-1)*. The IDOT protocols are generally consistent with *The American Society for Testing and Materials (ASTM) Standard Practice for Environmental Site Assessments: Phase I Environmental Site Assessment Process (E 1527-13)*.

1. Historical Records Review: Available historical records associated with the Site and surrounding properties will be reviewed. These records include city directories, Sanborn Fire Insurance Maps, and aerial photographs. Commonly known or reasonably ascertainable information will also be pursued to the extent necessary to document information about the Site.



2. Environmental Regulatory Records Review: A computer search of Federal, State, Tribal, and local government agency records will be performed to determine if the Site or adjacent properties are included within the selected regulatory databases. Based on the results of this query, the Site and its surrounding properties shall be evaluated for recognized environmental concerns. Queries shall be performed, but not be limited to, the following regulatory databases:
  - National Priority List (NPL) of Hazardous Waste Sites;
  - Hazardous Waste Treatment, Storage, Disposal Facilities (TSDF);
  - Underground Storage Tank or Leaking Underground Storage Tank Locations (UST/LUST);
  - Sanitary Landfill and Solid Waste Sites (SL/SWS);
  - State Hazardous Waste Sites (SHWS);
  - CERCLIS sites; and
  - Small and Large Quantity Hazardous Waste Generators (RCRIS-SQG/LGG).
  
3. Site Reconnaissance: True North shall provide an Environmental Professional, as defined in 40 CFR 312, to perform a Site visit to make observations of on-site conditions and immediately adjacent properties from the project area right-of-way.
  
4. Report Preparation: A summary report shall be prepared to summarize the activities and results of the assessment. The report shall include pertinent documentation to support the screening results of this assessment. The report shall also include a conclusions section that shall summarize the evaluated conditions based on the information collected. An electronic copy (PDF) of the report will be provided to the Client.

Please note that the scope of services for the PESA does not include a review of or survey for asbestos, radon, lead-based paint, lead in drinking water, industrial hygiene, health & safety, ecological field studies, indoor air quality, biological pollutants, or high voltage power lines. In addition, surveys for potential jurisdictional wetlands, oil/gas well records, mineral rights records, or mining areas are also considered beyond the scope of this assessment. No wetland delineation or sampling of soil, water, air, or building materials for laboratory analyses shall be performed during the assessment.

## PROJECT COSTS

True North proposes to conduct the above scope of services in accordance with the following lump sum cost:

Service	Quantity	Units	Rate	Total
<i>Preliminary Environmental Site Assessment</i>	1	LS	\$5,400	\$5,400
<b>Total Cost of Services</b>				<b>\$5,400</b>

Should the Client request a change in the scope-of-work, or should circumstances render the current estimate invalid, a new estimate will be prepared and mutually agreed to in writing before further work proceeds. Our Schedule of Terms and Conditions shall apply to the proposed work and is attached for your review. Written authorization to proceed will form a binding contract and indicates your acceptance of our Terms and Conditions. Any changes to our Terms and Conditions must be agreed to in writing by both parties prior to your authorization to proceed.



## SCHEDULE

True North can proceed with the above scope of work immediately upon receipt of authorization to proceed. True North can provide the summary report within four weeks of authorization to proceed assuming governmental agency responses and associated documentation is provided in a timely manner.

## LIMITATIONS & QUALIFICATIONS

- It is assumed for purposes of this estimate that access to the Site is available during normal working hours and that records relating to the properties are reasonably ascertainable. In addition, there are no encumbrances on the property that may limit observations.
- The results reported and any opinions reached by True North are for the benefit of the Client and unless agreed to by True North in writing, are not to be disclosed to or relied upon by any other party. The results and opinions set forth by True North shall be valid from the date of the final report for a timeframe limited to that specified in the standard.
- This assessment is only meant to be a screening of environmental documents readily available for the project area. True North may recommend further assessment activities based on the findings of this screening.
- This proposal is valid for a period of 45 days from the date of this proposal. In the event that authorization is received after 45 days from the date of this proposal, True North reserves the right to resubmit a new cost estimate for approval to reflect any additional costs associated with the proposed scope of work, if necessary.

## TERMS OF AGREEMENT

If this proposal meets with your approval, please sign the attached service agreement and return it to our office via mail, fax or e-mail. This agreement for professional services represents a contract between True North Consultants, Inc. and the Client. Our Terms and Conditions are hereby incorporated as part of this agreement.

True North appreciates the opportunity to offer this proposal for environmental assessment consulting services. If you have any questions, please contact me at 630.717.2880.

Regards,

**TRUE NORTH CONSULTANTS**

Ryan LaDieu, P.E.  
President

Attachment: General Terms & Conditions






## Professional Services Agreement

Proposal for Environmental Consulting Services  
Lake Cook Road Phase I Study  
Lake Cook Road between Raupp Boulevard and Ridge Avenue, Buffalo Grove, Illinois  
TNC Proposal #P122-504

The Client accepts the attached proposal in the amount of **five thousand four hundred (\$5,400.00)** dollars and hereby authorizes True North to proceed with proposed services in accordance with the noted scope of work, project costs, schedule, limitations and qualifications, and the attached Terms and Conditions.

Client Authorization	True North Consultants
Signature:	Signature: 
Name:	Name: Ryan LaDieu
Title:	Title: President
Date:	Date: May 9, 2022



## GENERAL TERMS & CONDITIONS OF SERVICES

### 1.0 PROPOSAL ACCEPTANCE

The following terms and conditions ("Terms") shall apply to and are the only terms that govern the attached Master Service Agreement, Proposal or Quotation (collectively, "Agreement") between True North Consultants, Inc. ("True North") and the Client named in the Agreement ("Client"). Client's acceptance of the Agreement includes acceptance of these Terms and any terms and conditions proposed by the Client will be deemed to materially alter the Terms and are hereby objected to and rejected by True North. Acceptance of the Agreement, including acceptance of the Terms, shall occur upon the notification of True North by Client, in writing, electronically or orally, to commence performance in accordance with the requested Consulting Services (as defined in the Agreement) and the Terms. In the event of a conflict between these Terms and the Agreement, the terms of the Agreement will prevail unless otherwise agreed to by the parties in writing.

### 2.0 LIMITED WARRANTY

- 2.1 Professional Standard of Care: True North warrants that it will perform the Consulting Services consistent with the level of care and skill ordinarily exercised by other professional consultants in the same locale and under similar circumstances at the same time the Consulting Services are performed.
- 2.2 Exclusive Remedy: True North's sole and exclusive liability and Client's sole and exclusive remedy for breach of this warranty shall be as follows:
  - 2.2.1 True North will use reasonable commercial efforts to promptly cure any breach; provided, that if True North cannot cure such breach within a reasonable time (but no more than thirty (30) days) after Client's notice of such breach, Client may, at its option, terminate the Agreement by service of written notice of termination.
  - 2.2.2 In the event the Agreement is terminated pursuant to Section 2.2.1 above, True North will within thirty (30) days after the effective date of termination refund to Client any fees paid by Client as of the date of termination for the Consulting Services, less a deduction equal to the fees for receipt or use of such Consulting Services up to and including the date of termination on a pro-rated basis.
  - 2.2.3 The foregoing remedy shall not be available unless Client provides written notice of such breach within thirty (30) days after acceptance of such Consulting Services to True North.
- 2.3 Disclaimer of Implied Warranties: EXCEPT FOR THE LIMITED WARRANTY SET FORTH IN THIS SECTION 2, TRUE NORTH MAKES NO WARRANTY WHATSOEVER WITH RESPECT TO THE CONSULTING SERVICES UNDER THE AGREEMENT, INCLUDING ANY (A) WARRANTY OF MERCHANTABILITY; OR (B) WARRANTY OF FITNESS FOR A PARTICULAR PURPOSE; OR (C) WARRANTY OF TITLE; WHETHER EXPRESS OR IMPLIED BY LAW, COURSE OF DEALING, COURSE OF PERFORMANCE, USAGE OR TRADE OR OTHERWISE.

### 3.0 SUBCONTRACTED AND OTHER SERVICES

- 3.1 True North will select reputable subcontractors for test borings and/or other explorations or services based on oral or written competitive prices. The subcontractors' invoices shall be billed in accordance with the Agreement. Nothing in this Section 3 shall require that services or equipment be obtained through competitive bidding or be available from multiple sources. True North shall not be responsible for the means and methods utilized by its subcontractors.
- 3.2 On occasion, True North engages the specialized services of individual consultants or other companies to participate in a project. When considered necessary, the cost of such services will be billed in addition to True North's fee schedules set forth in the Agreement.

### 4.0 SITE ACCESS AND SITE CONDITIONS

- 4.1 Client shall grant or obtain free access to the site for all equipment and personnel for True North to perform the Consulting Services for the Project (as defined in the Agreement) set forth in the Agreement. Client shall notify any and all possessors of the Project site that Client has granted True North free access to the site. True North will take reasonable precautions to limit damage to the site, but it is understood by Client that, in the normal course of work, some damage may occur and the correction of such damage is not part of the Agreement unless so specified in True North's proposal. Client is responsible for the accuracy of locations for all subterranean structures and utilities. True North will take reasonable precautions to avoid known subterranean structures, and Client waives any claim against True North, and agrees to defend, indemnify, and hold True North harmless from any claim or liability for injury or loss, including costs of defense, arising from damage done to subterranean structures and utilities not identified or accurately located. In addition, Client agrees to compensate True North for any time spent or expenses incurred by True North in defense of any such claim with compensation to be based upon True North's prevailing fee schedule/expense reimbursement policy set forth in the Agreement.
- 4.2 Client recognizes that subsurface conditions may vary from those observed at locations where borings, surveys or explorations are made, and that site conditions may change with time. Data, interpretation, and recommendations by True North will be based solely on information available to True North. True North is responsible for its data,



interpretations, and recommendations, but will not be responsible for other parties' interpretations or use of the information developed by True North or any other party. To the extent True North must rely upon data provided by another party, True North will not be liable for any claim of injury or loss arising from such data. Client acknowledges that whenever a project involves hazardous or toxic materials and/or investigations of chemicals in the environment, there are inherent uncertainties involved (such as limitations on laboratory analytical methods, variations in subsurface conditions and the like) that may adversely affect the results of the Project, even though the Consulting Services are performed with skill and care.

## **5.0 BILLING AND PAYMENT**

Invoices shall generally be submitted every four (4) weeks for Consulting Services performed during the previous four (4) weeks. Payment shall be due within thirty (30) days of invoice date. If Client objects to all or any portion of any invoice, Client shall so notify True North in writing within fourteen (14) calendar days of invoice receipt, identify the cause of disagreement, and pay within thirty (30) days that portion of the invoice, if any, not in dispute. The parties will immediately make every effort to settle the disputed portion of the invoice. In the absence of written notification described above, Client shall pay the balance as stated on the invoice. Invoices are delinquent if payment has not been received within thirty (30) days from date of invoice. Client will pay an additional charge of one and one-half percent (1.5%) per month (or the maximum percentage allowed by law, whichever is lower) on any delinquent amount, excepting any portion of the invoiced amount in dispute and resolved in favor of Client. Payment thereafter will first be applied to accrued interest and then to the principal unpaid amount. All time spent and expenses incurred (including any attorneys' fees) in connection with collection of any delinquent amount shall be paid by Client to True North per True North's current fee schedules. In the event Client fails to pay True North within thirty (30) days after invoices are rendered, Client agrees that True North has the right to suspend Consulting Services under the Agreement, without incurring liability to Client, after giving seven (7) days' written notice to Client. Client acknowledges that True North's fee schedules are subject to change on an annual basis without prior notice.

## **6.0 DOCUMENTS AND ELECTRONIC FILES**

- 6.1 Written Documents: Any letters, reports, or documents prepared by True North for Client are the instruments of True North's Consulting Services. The Consulting Services provided by True North are solely for Client's use for the Project and site described in the Agreement. Any documents prepared by True North for the client shall not, in whole or in part, be disseminated or conveyed to another party, nor used by another party in whole or in part, without prior written consent from True North. Client shall, to the fullest extent permitted by law, waive any claim against True North, and indemnify, defend, and hold True North harmless for any claim or liability for injury or loss allegedly arising from any third-party reliance on True North's instruments of Consulting Services without True North's specific authorization to do so.
- 6.2 Electronic Files: Client hereby grants permission for True North to use information and data provided by Client, including electronic records produced or provided by Client in the completion of the Project. Client also grants permission to True North to release True North documents electronically to consultants, contractors, and vendors as required in the execution of the Project.
- 6.3 Retention Period: True North shall not be obligated to maintain written documents and electronic files relating to its Consulting Services performed for Client under the Agreement for more than five (5) years following completion of the relevant Consulting Services.

## **7.0 INSURANCE**

True North maintains Workmen's Compensation Insurance as required by applicable law and General Liability Insurance for bodily injury and property damage with an aggregate limit of \$1,000,000 per occurrence. True North will furnish certificates of such insurance upon request. In the event Client desires additional insurance coverage of this type, True North will, upon the Client's written request made prior to the performance of Consulting Services, obtain additional insurance (if possible) at Client's expense.

## **8.0 ALLOCATION OF RISK**

- 8.1 Limitation of Liability: IN NO EVENT SHALL TRUE NORTH BE LIABLE TO CLIENT OR TO ANY THIRD PARTY FOR ANY LOSS OF USE, REVENUE, OR PROFIT, OR FOR ANY CONSEQUENTIAL, INCIDENTAL, INDIRECT, EXEMPLARY, SPECIAL OR PUNITIVE DAMAGES WHETHER ARISING OUT OF BREACH OF CONTRACT, TORT (INCLUDING NEGLIGENCE), STRICT LIABILITY OR OTHERWISE, REGARDLESS OF WHETHER SUCH DAMAGE WAS FORESEEABLE AND WHETHER OR NOT TRUE NORTH HAS BEEN ADVISED OF THE POSSIBILITY OF SUCH DAMAGES, AND NOTWITHSTANDING THE FAILURE OF ANY AGREED OR OTHER REMEDY OF ITS ESSENTIAL PURPOSE. IN NO EVENT SHALL TRUE NORTH'S AGGREGATE LIABILITY ARISING OUT OF OR RELATED TO THE AGREEMENT, WHETHER ARISING OUT OF OR RELATED TO BREACH OF CONTRACT, TORT (INCLUDING NEGLIGENCE), STRICT LIABILITY OR OTHERWISE, EXCEED THE AGGREGATE AMOUNTS PAID OR PAYABLE TO TRUE NORTH PURSUANT TO THE AGREEMENT. If Client prefers not to limit True North's professional liability to this sum, True North will waive this limitation upon Client's written request, provided that Client agrees to pay for this waiver at a negotiated fee. Client's request for this option must be made at the time Client enters into the Agreement. In the event Client makes a claim against True North for any act arising out of the performance of True North's Consulting Services, and



fails to prove such claim, then Client agrees to pay all attorneys' fees and other costs incurred by True North in defense of such claim.

- 8.2 Indemnification: Client shall indemnify, defend and hold harmless True North and its officers, directors, agents, employees, affiliates, successors and permitted assigns against any and all suits, actions, legal or administrative proceedings, claims, debts, demands, damages, liabilities, interest, attorney's fees, costs and expenses arising from or related to the performance of Consulting Services under the Agreement and attributable to either a breach by Client of its obligations hereunder or the act or omission or willful misconduct of Client or anyone acting under Client's direction or control.

## **9.0 CHANGES**

- 9.1 Unforeseen Site Conditions: True North reserves the right to make reasonable changes in the Consulting Services to be performed after acceptance of the Agreement. Client understands that unforeseen site conditions may require changes in the scope of Consulting Services to be performed.
- 9.2 Unauthorized Changes: If changes are made to True North's work products for Consulting Services by Client or persons other than True North, and these changes affect True North's Consulting Services, any and all liability against True North arising out of such changes is waived and Client shall assume full responsibility for such changes unless Client has given True North prior notice and has received from True North written consent for such changes.
- 9.3 Client-Requested Changes: Upon receipt of a change requested by Client, True North will obtain price quotations from its subcontractors and will provide Client with a quotation of the cost of having the change performed, and any increase in contract time caused by the change. True North shall authorize the requested change by amending the contract price and contract time in the Agreement.

## **10.0 NOTIFICATION OF HAZARDS**

Client shall notify True North of any information Client has with respect to the existence or suspected existence of biological pollutants, hazardous materials, oil, or asbestos in the environment, including, but not limited to the air, soil, and water at the site. Client shall advise True North immediately of any information which Client receives regarding the existence of any such hazardous materials or conditions at the site which might present a threat to human health and safety or the environment or impact True North's work products.

## **11.0 BIOLOGICAL POLLUTANTS**

True North's scope of Consulting Services, unless specifically outlined in its written scope of Consulting Services, does not include the investigation or detection of the presence of any biological pollutants in or around any structure. Client agrees that True North will have no liability for any claim regarding bodily injury or property damage alleged to arise from or be caused by the presence of or exposure to any biological pollutants, in or around any structure. In addition, Client shall defend, indemnify, and hold harmless True North from any third-party claim for damages alleged to arise from or be caused by the presence of or exposure to biological pollutants in or around any structure.

## **12.0 SITE CONTROL, CONFIDENTIALITY AND DISCLOSURE**

True North shall not assume, by virtue of performing Consulting Services on or near the site, the responsibility or liability for any aspect or condition of the site that may now or later exist to be discovered. In particular, True North shall not assume the responsibility to report to any governmental or regulatory agency the existence of any conditions of the site that may present a threat to human health, safety or the environment. True North will not intentionally divulge information regarding any Agreement, True North's Consulting Services or any report, and which is not in the public domain, except to Client or those whom Client designates. Notwithstanding the foregoing, Client understands that True North will comply with judicial orders and applicable laws and regulations regarding the reporting to the appropriate public agencies of potential dangers to the public health, safety or the environment.

## **13.0 RCRA COMPLIANCE**

Nothing contained in these Terms or the Agreement shall be construed or interpreted as requiring True North to assume the status of a generator, storer, treater, transporter, or disposal facility within the meaning of the Resource Conservation and Recovery Act of 1976, as amended, or within the meaning of any similar Federal, State, or local regulation or law.

## **14.0 DELAYS**

Delays not the fault of True North or its subcontractors shall result in an extension of the schedule equivalent to the length of delay. If such delays result in additional costs to True North, the total Project cost shall be equitably adjusted by the amount of such additional costs.

## **15.0 DISPUTE RESOLUTION; CHOICE OF FORUM**

Any claims or disputes between Client and True North arising out of or related to the Consulting Services provided by True North or out of or related to the Agreement shall be submitted to non-binding mediation as a condition precedent to the institution of legal or equitable proceedings by either party. Any claims arising out of or relating to the sale of Consulting Services provided by



True North and/or the relationship between True North and Client shall be asserted only in the state or federal courts located in Cook County or DuPage County, Illinois. Client hereby unconditionally consents to the jurisdiction and venue of said courts.

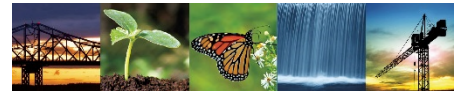
#### **16.0 MISCELLANEOUS**

- 16.1 **Governing Law:** These Terms and all matters arising out of, or related to, the sale of Consulting Services by True North to Client and/or the relationship between True North and Client shall be deemed to have been made and governed by the substantive laws of the State of Illinois, without regard to its choice-of-law or conflict-of-laws provisions.
- 16.2 **Severability:** If any term or provision of these Terms is found to be invalid or unenforceable, the remaining portion of these Terms shall remain in effect, provided that if such invalid or unenforceable portion is an essential part of these Terms, the parties will immediately begin negotiations for a replacement provision consistent with the intent and purpose of these Terms.
- 16.3 **Entire Agreement:** The terms contained in the Agreement and these Terms comprise the entire agreement between True North and Client concerning the subject matter hereof, and supersede all prior and contemporaneous understandings, agreements, representations and warranties, both written and oral, regarding such subject matter. No modification, amendment, rescission, waiver or other change of these Terms or the Agreement or any part thereof shall be binding on True North unless agreed in writing by an authorized officer of True North.
- 16.4 **All Rights Reserved:** All rights and remedies of True North provided in these Terms are cumulative and not exclusive, and the exercise by True North of any right or remedy does not preclude the exercise of any other rights or remedies that may now or subsequently be available at law, in equity, by statute, or in any other agreement between the parties.
- 16.5 **No Assignment:** The rights and responsibilities of Client hereunder may not be assigned to any third-party without the written consent of True North.
- 16.6 **Waste Manifests:** If during remedial construction activities waste manifests are required, Client shall provide an authorized person to sign manifests or agrees to provide True North with a written limited power of attorney to sign manifests.

#### **END OF TERMS AND CONDITIONS**

REVISED: June 27, 2019

**Attachment G**  
**Environmental Studies Proposal**  
**Huff & Huff, Inc.**



A Subsidiary of GZA

GEOTECHNICAL  
ENVIRONMENTAL  
ECOLOGICAL  
WATER  
CONSTRUCTION  
MANAGEMENT

915 Harger Road  
Suite 330  
Oak Brook, IL 60523  
T: 630.684.9100  
F: 630.928.0709  
www.huffnhuff.com  
www.gza.com

May 15, 2022

Mr. Joel E. Christell, P.E.  
Director of Environmental and Design Studies  
Civiltech Engineering, Inc.  
Two Pierce Place, Suite 1400  
Itasca, IL 60143

Via Email: [jchristell@civiltechinc.com](mailto:jchristell@civiltechinc.com)

**Re: Village of Buffalo Grove  
Lake Cook Road Phase I Study – Wetlands and Trees  
Lake Cook Road between North Ridge Avenue and Raupp Boulevard  
Arlington Heights, Buffalo Grove, Unincorporated Lake and Cook Counties, Illinois  
Proposal No. 81.P013045.23**

Dear Mr. Christell:

Huff & Huff, Inc., a subsidiary of GZA GeoEnvironmental, Inc. (H&H/GZA), is pleased to submit this proposal to Civiltech Engineering, Inc. (Client) to provide environmental services for the Village of Buffalo Grove proposed Lake Cook Road Phase I Study, located within the Villages of Arlington Heights and Buffalo Grove, Cook County, and Buffalo Grove and Arlington Heights and unincorporated Lake County, Illinois.

The H&H/GZA proposed scope of work includes tasks for completing a wetland and waterway delineation and associated coordination as well as a tree survey. This proposal presents our: Project Understanding; Scope of Services; Level of Effort, Cost, and Schedule; and Proposal Acceptance. Terms and Conditions are included as an attachment.

### **1. PROJECT UNDERSTANDING**

The Village of Buffalo Grove is proposing improvements to Lake Cook Road and Arlington Heights Road and has requested Phase I environmental surveys. H&H/GZA understands that while this scope of work will be contracted by Village of Buffalo Grove, Cook County owns Lake Cook Road within the project limits, and a portion of the Phase I study is being funded by an Invest in Cook Grant. The project limits include the existing roadway right-of-way (ROW) of Lake Cook Road, Arlington Heights Road, and various cross streets along the project corridor.

In preparing this proposal, H&H/GZA has made the following assumptions.

- As this project will be processed through Illinois Department of Transportation (IDOT) Local Roads, biological and cultural clearances will be made available through the IDOT Environmental Survey Request (ESR) process. The submittal of an Environmental Survey Request through IDOT is not included in this scope of services.
- The project limits are those provided to H&H/GZA by Client on May 10, 2022.
- H&H/GZA will complete field delineations of wetlands and surface waters within the project limits, plus 100 feet beyond the project limits within Lake County per the Lake County Watershed Development Ordinance (WDO).
- Access to all areas within the project limits, as well as 100 feet beyond the project limits, to conduct field investigations will be provided by Client.



- The fees associated with obtaining a Preliminary Jurisdictional Determination (PJD) and Boundary Verification (BV) through the Lake County Stormwater Management Commission (LCSMC) are not included in this scope of services and are the responsibility of the Client.
- Wetland permitting is not included in this scope of services and is typically conducted in Phase II.

## 2. SCOPE OF SERVICES

### Task 1: Wetland and Waterway Delineation

H&H/GZA understands that regulated wetlands are potentially located within or adjacent to the project limits. H&H/GZA proposes to conduct a wetland and surface water delineation in accordance with:

- The February 25, 2022, edition of the United States Army Corps of Engineers (USACE) Chicago District Nationwide Permit (NWP) Program;
- The USACE Regional Supplement to the Corps of Engineers Wetland Delineation Manual: Midwest Region (Version 2.0), (Supplemental Wetland Manual);
- The October 13, 2020, edition of the Lake County WDO; and
- The May 7, 2020, edition of the Metropolitan Water Reclamation District (MWRD) of Greater Chicago Watershed Management Ordinance (WMO).

#### A. Off-site Record/Document Review

The following records/documents will be reviewed prior to conducting the field investigation. Soils information will be reviewed to determine the soil types encountered during the delineation procedures. The sources to be reviewed and used include:

- Current and historic aerial photographs;
- U.S. Geological Survey (USGS), Topographic Map;
- U.S. Fish and Wildlife Service (USFWS), National Wetlands Inventory (NWI) Maps;
- Lake County Wetland Inventory Maps;
- Lake County Advanced Identification of Wetlands (ADID) Maps;
- Natural Resources Conservation Service (NRCS), Soil Survey of Cook and Lake Counties;
- Hydric Soils of the United States;
- Federal Emergency Management Agency (FEMA), Flood Insurance Rate Maps (FIRM); and
- USGS, Hydrologic Atlas.

#### B. On-Site Investigation (Field Inventory)

H&H/GZA proposes to conduct on-site investigations of all potential wetlands and waterways within the project limits as well as confirm the absence of wetlands if none is present. Proposed services include the identification and delineation of wetlands. Wetland delineation field investigation activities include on-site testing for the presence of hydric soils, hydrophytic vegetation, and sufficient hydrology. A floristic quality assessment (FOA) will be conducted for each identified wetland. Functions of wetlands based on field observations will also be evaluated during the on-site investigation. H&H/GZA will flag boundaries of wetlands located within the Lake County portion of the project limits in accordance with the WDO and within Cook County portion of the project limits in accordance with the WMO if appropriate. H&H/GZA will provide global positioning system (GPS) data for wetland and waterway boundaries.





The limits of the survey work and field investigations are as follows:

- Lake Cook Road, approximately 2,600 feet west of Arlington Heights Road to 400 feet west of Buffalo Grove Road; and
- Arlington Heights Road, approximately 870 feet south and 1,190 feet north of Lake Cook Road.

### **Task 2: Wetland Report**

Upon completion of Task 1, a Wetland Delineation Report will be prepared summarizing the findings of the off-site record/document review and the on-site investigation. This report will be submitted to the Client as a PDF only. H&H/GZA will provide shapefiles and a MicroStation file of the wetland and waterway boundaries. Specific items to be included in the report are as follows:

- Map showing the wetland and waterway boundaries within the project limits;
- Aerial photography depicting the appropriate limits of the delineated wetlands and waterways;
- USACE data sheets with FQAs, as required;
- Color photos of the wetlands and data points; and
- Written description of wetland functional classification.

The NRCS no longer conducts farmed wetland determinations for areas of agricultural conversion. As agricultural land is not present within the project limits, conducting a Farmed Wetland Determination (FWD) is not included in the scope.

Any impacts to wetlands or waterways will require permits. H&H/GZA understands that wetland permitting will take place during Phase II; therefore, permitting is not included within this scope of services.

### **Task 3: Preliminary Jurisdictional Determination/Boundary Verification**

This task includes preparing the PJD/BV submittal and formally requesting a PJD/BV through the LCSMC for identified wetlands and waterways/surface waters within the Lake County portion of the project limits. Time under this task includes one field meeting with the LCSMC for completion of the PJD/BV as well as time to flag all delineated wetlands and waterways/surface waters for the BV. Time under this task also includes revising the wetland report, if boundaries are modified during the field PJD/BV meeting based on input received from the LCSMC.

As the number of wetlands and waterways/surface waters are not known at this time, fees associated with this PJD/BV are not included in this scope and are the responsibility of the Client.

### **Task 4: USACE Jurisdictional Determination Request**

The LCSMC PJD/BV process only assesses the jurisdictional status of wetlands located within Lake County. Therefore, H&H/GZA will request a formal Jurisdictional Determination (JD) from the USACE Chicago District for wetlands and waterways within the Cook County portion of the project limits. The results of the JD can be used for permitting. A JD will determine whether the on-site wetlands and waterways/surface waters are under USACE or MWRD jurisdiction. Isolated wetlands and surface waters that are not under USACE jurisdiction are regulated by the MWRD WMO. This task includes one on-site meeting with the USACE to complete the JD, if warranted.

### **Task 5: Wetland Impact Evaluation**

This task includes completing and uploading IDOT's Wetland Impact Evaluation (WIE) form, which is required for a complete ESR submittal. H&H/GZA will complete the WIE form using wetland impacts as calculated by the Client. Time under this task does not include preparing the WIE Exhibit, which H&H/GZA assumes will be prepared and provided by Client.



### **Task 6: Tree Survey**

H&H/GZA will complete a tree survey within Lake County Forest Preserve District (LCFPD) Buffalo Creek Forest Preserve, and areas immediately adjacent to this preserve, within the project limits. H&H/GZA understands that the tree survey is only needed for the project limits at the following locations:

- The west side of Arlington Heights Road, north of Lake Cook Road; and
- The north side of Lake Cook Road, west of Arlington Heights Road.

H&H/GZA will conduct the tree survey at the above outlined limits, which will also include trees whose critical root zone is present within the project limits at these locations. H&H/GZA will identify the trees to species level and determine health, structure, and origin. H&H/GZA will note whether any trees are of exceptional size and condition. H&H/GZA will also determine which trees are worth avoidance, if any. The tree survey will follow the LCFPD *Licenses and Easement Ordinance* (Ordinance) tree survey requirements.

The LCFPD Ordinance specifies all trees with a diameter at breast height (DBH) of three (3) inches or greater as well as trees with a DBH of less than three inches when such have been intentionally planted for landscaping, environmental mitigation, or habitat preservation/enhancement purposes be identified. Shrubs greater than three (3) inches DBH will also be assessed on LCFPD property. The Ordinance allows stands of low-quality shrubs to be surveyed and documented by estimating the number of individuals in the colony. The tree survey will be supervised by an International Society of Arboriculture (ISA) Certified Arborist.

This proposal assumes that all surveyed trees and shrubs will be tagged with aluminum tree tags by H&H/GZA. Once tagged, the trees will be surveyed by the Client or Client-hired subconsultant.

This proposal includes an assessment of northern long-eared bat (NLEB; *Myotis septentrionalis*) habitat within the proposed ROW. The NLEB assessment only entails an assessment of the potential for individual trees and forest resources to provide suitable habitat for NLEB and does not include a survey for specific bat surveys via mist netting or echolocation surveys within the project or adjacent areas.

### **Task 7: Tree Survey Report**

After trees are evaluated by H&H/GZA within the project limits, a tabulation of trees will be compiled to summarize tree resources and potential impacts. The report will include details on tree species, size, health, structure, origin (volunteer or landscaped tree), and any identified specimen and exceptional trees and will be provided to the Client in electronic PDF format only. This task does not include coordination with the LCFPD or any other agency for tree mitigation.

### **Task 8: Quality Assurance/Quality Control (QA/QC)**

Time under this task includes QA/QC time for the reports and submittals materials as described above.

### **Task 9: Project Administration/Project Management**

Time under this task includes project administration and management activities that include cost and schedule tracking, coordination with Client on authorized activities, report production, and other in-house management activities. This task includes preparing a Health and Safety Plan as appropriate for the project and tasks therein.

## **3. LEVEL OF EFFORT, COST, AND SCHEDULE**

Estimated hours and costs to complete the proposed scope of services is attached. The wetland delineation will be completed as soon as possible during the growing season in Lake County, which is approximately between May 15<sup>th</sup> and October 1<sup>st</sup>, with an anticipated completion of the Wetland Delineation Report within four weeks of field work. Completion of the PJD/BV and tree survey are dependent on Client need and schedules. If an expedited schedule is necessary, H&H/GZA will coordinate with Client to establish a schedule that is appropriate for the project needs. The cost



estimate for this scope of work is presented in the attached Cost Estimate of Consultant Services (CECS). Costs will be invoiced as a cost-plus fixed fee.

4. PROPOSAL ACCEPTANCE

Conditions of Engagement

The conditions of engagement are described in the attached Terms and Conditions for Professional Services. H&H/GZA’s report will be prepared on behalf of and for the exclusive use of Client. Client acknowledges and agrees that the report and the findings in the report shall not, in whole or in part, be disseminated or conveyed to any other party, or used or relied upon by any other party, in whole or in part, except for the specific purpose and to the specific parties alluded to above, without the written consent of H&H/GZA. H&H/GZA would be pleased to discuss the conditions associated with any additional dissemination, use, or reliance by other parties.

*H&H/GZA is submitting this proposal with the belief that we will be able to fulfill the scope requirements during this COVID-19 Pandemic crisis. If performance is rendered impossible because of the impacts of COVID-19, H&H/GZA will notify Client of that Force Majeure event.*

Acceptance

This agreement may be accepted by signing in the appropriate space below and returning one complete copy to H&H/GZA. This proposal is valid for a period of 60 days from the date of issue.

We appreciate the opportunity to submit this proposal. Please feel free to contact the undersigned at (630) 684-4425 with any questions.

Very truly yours,  
**Huff & Huff, Inc./GZA, Inc.**

Baron Stuedemann, P.E., P.W.S.  
Associate Principal

Attachments: Terms and Conditions

This Proposal for Services, Schedule of Fees and Terms and Conditions for Professional Services are hereby accepted and executed by a duly authorized signatory, who by execution hereof, warrants that he/she has full authority to act for, in the name, and on behalf of \_\_\_\_\_.

By: \_\_\_\_\_ Title: \_\_\_\_\_

Printed/Typed Name: \_\_\_\_\_ Date: \_\_\_\_\_

The Proposal for Services, Schedule of Fees and Terms and Conditions for Professional Services may be executed in two or more counterparts, each of which together shall be deemed an original, but all of which together shall constitute one and the same instrument. In the event that any signature is delivered by facsimile transmission or by an e-mail delivery of a document in “.pdf” format, each such signature shall create a valid and binding obligation of the party executing the document, or on whose behalf each document is executed, with the same force and effect as if each such facsimile or “.pdf” signature were an original thereof.



## TERMS AND CONDITIONS FOR PROFESSIONAL SERVICES Including Site Investigation, Remediation, Geotechnical, Construction, And Testing

© 2022 by GZA GeoEnvironmental, Inc.

These Terms and Conditions, together with H&H/GZA's Proposal, make up the Agreement between GZA and you, Client, named in the attached proposal.

**BEFORE SIGNING THE PROPOSAL, BE SURE YOU READ AND UNDERSTAND THE PARAGRAPHS ENTITLED "INDEMNIFICATION" AND "LIMITATION OF REMEDIES" WHICH DEAL WITH THE ALLOCATION OF RISK BETWEEN YOU AND GZA.**

1. **Services.** GZA will perform the services set forth in its Proposal and any amendments or change orders authorized by you. Any request or direction from you that would require extra work or additional time for performance or would result in an increase in GZA's costs will be the subject of a negotiated amendment or change order.
2. **Standard of Care; Warranties.**
  - a. GZA will perform the services with the degree of skill and care ordinarily exercised by qualified professionals performing the same type of services at the same time under similar conditions in the same or similar locality.
  - b. GZA warrants that its construction services will be of good quality, free of faults and defects and in conformance with the Proposal.
  - c. **EXCEPT AS SET FORTH IN SUBSECTIONS 2a AND 2b, ABOVE, NO WARRANTY, EXPRESS OR IMPLIED, INCLUDING WARRANTY OF MARKETABILITY OR FITNESS FOR A PARTICULAR PURPOSE, IS MADE OR INTENDED BY GZA'S PROPOSAL OR BY ANY OF GZA'S ORAL OR WRITTEN REPORTS.**
  - d. GZA assigns to you any manufacturers' warranties of equipment or materials purchased from others to the extent they are assignable, and your sole recourse will be against the manufacturer. Full risk of loss of materials and equipment will pass to you upon delivery to the Site, and you will be responsible for insuring and otherwise protecting them against theft and damage.
3. **Payment.**
  - a. Except as otherwise stated in the Proposal, you will compensate GZA for the services at the rates set forth in the applicable Proposal, amendment or change order; reimburse its expenses, which will include a communication fee calculated as a percentage of labor invoiced; and pay any sales or similar taxes thereon.
  - b. Any retainer specified in GZA's Proposal shall be due prior to the start of services and will be applied to the final invoice for services.
  - c. GZA will submit invoices monthly, and Client will forward to Prime within 30 days of invoice date. Client payment to GZA is due within 20 days of receipt of payment from Prime. Overdue payments will bear interest at 1½ percent per month or, if lower, the maximum lawful rate. GZA may terminate its services upon 10 days' written notice anytime your payment is overdue on this or any other project and you will pay for all services through termination, plus termination costs. You will reimburse GZA's costs of collecting overdue invoices, including reasonable attorneys' fees
4. **Your Responsibilities.**
  - a. Except as otherwise agreed, you will secure the approvals, permits, licenses, and consents necessary for performance of the services. If you are the owner or operator of the Site, you will provide GZA with all documents, plans, information concerning underground structures (including but not limited to utilities, conduits, pipes, and tanks), information related to hazardous materials or other environmental or geotechnical conditions at the Site and other information that may be pertinent to the services or, if you are not the owner or operator of the Site, you agree to make reasonable efforts to obtain these same documents and provide them to GZA. Unless otherwise indicated in writing, GZA will be entitled to rely on documents and information you provide.
  - b. If you use the services of a construction manager at the Site, you agree to use best and reasonable efforts to include in your agreement(s) with the construction contractor provisions obligating the latter:
    - (i) to indemnify and hold harmless, to the fullest extent permitted by law, you and GZA, its officers, employees and principals, for or on account of any claims, liabilities, costs and expenses, including attorneys' fees, arising out of or relating to the design or implementation of construction means, methods, procedures, techniques, and sequences of construction, including safety precautions or programs, of the contractor, or any of its subcontractors or any engineer engaged by it;



- (ii) to name you and GZA as additional insureds under general liability and builder's risk insurance coverages maintained by the contractor, or any of its subcontractors; and
    - (iii) to require that all of its subcontractors agree and be bound to the obligations set forth in (i) and (ii) above.
  - c. In the event that you are unable to secure such provisions in the agreement(s) with the construction contractor, you shall promptly notify GZA and GZA shall have the opportunity to negotiate with you reasonable substitute risk allocation and insurance indemnities and protections.
5. **Right of Entry; Site Restoration.** You grant GZA and its subcontractor(s) permission to enter the Site to perform the services. If you do not own the Site, you represent and warrant that the owner has granted permission for GZA to enter the Site and perform the services; you will provide reasonable verification on request; and you will indemnify GZA for any claims by the Site owner related to alleged trespass by GZA or its subcontractors. GZA will exercise reasonable care to limit damage to landscaping, paving, systems, and structures at the Site that may occur and you agree to compensate GZA for any restoration it is asked to perform, unless otherwise indicated in the Proposal.
6. **Underground Facilities.** GZA's only responsibility under this Section will be to provide proper notification to the applicable state utility "Call-Before-You-Dig" program. You further agree to assume responsibility for and to defend, indemnify and hold harmless GZA with respect to personal injury and property damages due to GZA's interference with subterranean structures including but not limited to utilities, conduits, pipes, and tanks:
- (i) that are not correctly shown on any plans and information you or governmental authorities provide to GZA; or
  - (ii) that are not correctly marked by the appropriate utility.
7. **Reliance.** The services, information, and other data furnished by you shall be at your expense, and GZA may rely upon all information and data that you furnish, including the accuracy and completeness thereof. You acknowledge that the quality of the services provided by GZA is directly related to the accuracy and completeness of the information and data that you furnish to GZA. **GZA's REPORTS ARE PREPARED FOR AND MADE AVAILABLE FOR YOUR SOLE USE. YOU ACKNOWLEDGE AND AGREE THAT USE OF OR RELIANCE UPON THE REPORT OR THE FINDINGS IN THE REPORT BY ANY OTHER PARTY, OR FOR ANY OTHER PROJECT OR PURPOSE, SHALL BE AT YOUR OR SUCH OTHER PARTY'S SOLE RISK AND WITHOUT ANY LIABILITY TO GZA.**
8. **Lab Tests and Samples.** GZA is entitled to rely on the results of laboratory tests using generally accepted methodologies. GZA may dispose of samples in accordance with applicable laws 30 days after submitting test results to you unless you request in writing for them to be returned to you or to be held longer, in which case you will compensate GZA for storage and/or shipping beyond 30 days.
9. **GZA Professionals.** GZA employees or consultants may act as licensed, certified, or registered professionals (including but not limited to Professional Engineers, Licensed Site or Environmental Professionals, or Certified Industrial Hygienists collectively referred to in this section as "GZA Professionals") whose duties may include the rendering of independent professional opinions. You acknowledge that a federal, state, or local agency or other third party may audit the services of GZA or other contractor/consultant(s), which audit may require additional services, even though GZA and such GZA Professionals have each performed such services in accordance with the standard of care set forth herein. You agree to compensate GZA for all services performed in response to such an audit, or to meet additional requirements resulting from such an audit, at the rates set forth in the applicable Proposal, amendment or change order.
10. **Hazardous Materials; GZA "Not a Generator."** Before any hazardous or contaminated materials are removed from the Site, you will sign manifests naming you as the generator of the waste (or, if you are not the generator, you will arrange for the generator to sign). You will select the treatment or disposal facility to which any waste is taken. GZA will not be the generator or owner of, nor will it possess, take title to, or assume legal liability for any hazardous or contaminated materials at or removed from the Site. GZA will not have responsibility for or control of the Site or of operations or activities at the Site other than its own. GZA will not undertake, arrange for, or control the handling, treatment, storage, removal, shipment, transportation, or disposal of any hazardous or contaminated materials at or removed from the Site, other than any laboratory samples it collects or tests. You agree to defend, indemnify, and hold GZA harmless for any costs or liability incurred by GZA in defense of or in payment for any legal actions in which it is alleged that GZA is the owner, generator, treater, storer or disposer of hazardous waste.
11. **Limits on GZA's Responsibility.** GZA will not be responsible for the acts or omissions of contractors or others at the Site, except for its own subcontractors and employees. GZA will not supervise, direct or assume control over or the authority to stop any contractor's work, nor shall GZA's professional activities nor the presence of GZA or its employees and subcontractors be construed to imply that GZA has authority over or responsibility for the means, methods, techniques, sequences or procedures of construction, for work site health or safety precautions or programs, or for any failure of contractors to comply with contracts, plans, specifications or laws. Any opinions by GZA of probable costs of labor, materials, equipment, or services to be furnished by others are strictly estimates and are not a guarantee that actual costs will be consistent with the estimates.



**12. Changed Conditions.**

- a. You recognize the uncertainties related to environmental and geotechnical services, which often require a phased or exploratory approach, with the need for additional services becoming apparent during the initial services. You also recognize that actual conditions encountered may vary significantly from those anticipated, that laws and regulations are subject to change, and that the requirements of regulatory authorities are often unpredictable.
- b. If changed or unanticipated conditions or delays make additional services necessary or result in additional costs or time for performance, GZA will notify you and the parties will negotiate appropriate changes to the scope of services, compensation, and schedule.
- c. If no agreement can be reached, GZA will be entitled to terminate its services and to be equitably compensated for the services already performed. GZA will not be responsible for delays or failures to perform due to weather, labor disputes, intervention by or inability to get approvals from public authorities, acts or omissions on your part, or any other causes beyond GZA's reasonable control, and you will compensate GZA for any resulting increase in its costs.

**13. Documents and Information.** All documents, data, calculations, and work papers prepared or furnished by GZA are instruments of service and will remain GZA's property. Designs, reports, data, and other work product delivered to you are for your use only, for the limited purposes disclosed to GZA. Any delayed use, use at another site, use on another project, or use by a third party will be at the user's sole risk, and without any liability to GZA. Any technology, methodology or technical information learned or developed by GZA will remain its property. Provided GZA is not in default under this Agreement, GZA's designs will not be used to complete this project by others, except by written agreement relating to use, liability, and compensation.

**14. Electronic Media.** In accepting and utilizing any drawings, reports, and data on any form of electronic media generated by GZA, you covenant and agree that all such electronic files are instruments of service of GZA, who shall be deemed the author and shall retain all common law, statutory law, and other rights, including copyrights. In the event of a conflict between the signed documents prepared by GZA and electronic files, the signed documents shall govern. You agree not to reuse these electronic files, in whole or in part, for any purpose or project other than the project that is the subject of this Agreement. Any transfer of these electronic files to others or reuse or modifications to such files by you without the prior written consent of GZA will be at the user's sole risk and without any liability to GZA.

**15. Confidentiality; Subpoenas.** Information about this Agreement and GZA's services and information you provide to GZA regarding your business and the Site, other than information available to the public and information acquired from third parties, will be maintained in confidence and will not be disclosed to others without your consent, except as GZA reasonably believes is necessary: (a) to perform its services; (b) to comply with professional standards to protect public health, safety and the environment; and (c) to comply with laws and court orders. GZA will make reasonable efforts to give you prior notice of any disclosure under (b) or (c) above. Information available to the public and information acquired from third parties will not be considered confidential. You will reimburse GZA for responding to any subpoena or governmental inquiry or audit related to the services, at the rates set forth in the applicable Proposal, amendment or change order.

**16. Insurance.** During performance of the services, GZA will maintain workers compensation, commercial general liability, automobile liability, and professional liability/contractor's pollution liability insurance. GZA will furnish you certificates of such insurance on request.

**17. Indemnification.** You agree to hold harmless, indemnify, and defend GZA and its affiliates and subcontractors and their employees, officers, directors and agents (collectively referred to in this paragraph as "GZA") against all claims, suits, fines and penalties, including mandated cleanup costs and attorneys' fees and other costs of settlement and defense, which claims, suits, fines, penalties or costs arise out of or are related to this Agreement or the services, except to the extent they are caused by GZA's negligence or willful misconduct.

**18. Limitation of Remedies.**

- a. To the fullest extent permitted by law and notwithstanding anything else in this Agreement to the contrary, the aggregate liability of GZA and its affiliates and subcontractors and their employees, officers, directors and agents (collectively referred to in this paragraph as "GZA") for all claims arising out of this Agreement or the services is limited to \$50,000 or, if greater, 10% of the compensation received by GZA under this Agreement.
- b. You may elect to increase the limit of liability by paying an additional fee, such fee to be negotiated prior to the execution of this Agreement.
- c. Any claim will be deemed waived unless received by GZA within one year of substantial completion of the services.
- d. GZA will not be liable for lost profits, loss of use of property, delays, or other special, indirect, incidental, consequential, punitive, exemplary, or multiple damages.



- e. GZA will not be liable to you or the Site owner for injuries or deaths suffered by GZA's or its subcontractors' employees.
- f. You will look solely to GZA for your remedy for any claim arising out of or relating to this Agreement, including any claim arising out of or relating to alleged negligence or errors or omissions of any GZA principal, officer, employee, or agent.

**19. Disputes.**

- a. All disputes between you and GZA shall be subject to non-binding mediation.
- b. Either party may demand mediation by serving a written notice stating the essential nature of the dispute, the amount of time or money claimed, and requiring that the matter be mediated within forty-five (45) days of service of notice.
- c. The mediation shall be administered by the American Arbitration Association in accordance with its most recent Construction Mediation Rules, or by such other person or organization as the parties may agree upon.
- d. No action or suit may be commenced unless mediation has occurred but did not resolve the dispute, or unless a statute of limitation period would expire if suit were not filed prior to such forty-five (45) days after service of notice.

**20. Miscellaneous.**

- a. Illinois law shall govern this Agreement.
- b. The above terms and conditions regarding Limitation of Remedies and Indemnification shall survive the completion of the services under this Agreement and the termination of the contract for any cause.
- c. Any amendment to these Terms and Conditions must be in writing and signed by both parties.
- d. Having received these Terms and Conditions, your oral authorization to commence services, your actions, or your use of the Report or Work Product constitutes your acceptance of them.
- e. This Agreement supersedes any contract terms, purchase orders or other documents issued by you.
- f. Neither party may assign or transfer this Agreement or any rights or duties hereunder without the written consent of the other party.
- g. Your failure or the failure of your successors or assigns to receive payment or reimbursement from any other party for any reason whatsoever shall not absolve you, your successors or assigns of any obligation to pay any sum to GZA under this agreement.
- h. These Terms and Conditions shall govern over any inconsistent terms in GZA's Proposal.
- i. The provisions of this Agreement are severable; if any provision is unenforceable it shall be appropriately limited and given effect to the extent it is enforceable.
- j. The covenants and agreements contained in this Agreement shall apply to, inure to the benefit of and be binding upon the parties hereto and upon their respective successors and assigns.



<b>Local Public Agency</b> Buffalo Grove	<b>County</b> Cook and Lake	<b>Section Number</b> 
<b>Consultant (Firm) Name</b> Huff & Huff, Inc. / GZA, Inc.	<b>Prepared By</b> MM/LRR	<b>Date</b> 5/13/2022

### PAYROLL ESCALATION TABLE

<b>CONTRACT TERM</b>	12	<b>MONTHS</b>	<b>OVERHEAD RATE</b>	182.42%
<b>START DATE</b>	5/21/2022		<b>COMPLEXITY FACTOR</b>	0
<b>RAISE DATE</b>	3/1/2023		<b>% OF RAISE</b>	2.00%
<b>END DATE</b>	5/20/2023			

### ESCALATION PER YEAR

Year	First Date	Last Date	Months	% of Contract
0	5/21/2022	3/1/2023	9	75.00%
1	3/2/2023	6/1/2023	3	25.50%

The total escalation = 0.50%



**Local Public Agency****County****Section Number**

Buffalo Grove	Cook and Lake	
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<b>MAXIMUM PAYROLL RATE</b>	<b>78.00</b>
<b>ESCALATION FACTOR</b>	<b>0.50%</b>

**PAYROLL RATES**

## Exhibit E Cost Estimate of Consultant Services Worksheet Fixed Raise

<b>CLASSIFICATION</b>	<b>IDOT PAYROLL RATES ON FILE</b>	<b>CALCULATED RATE</b>
Associate Principal II	\$69.75	\$70.10
Associate Principal I	\$66.04	\$66.37
Senior Consultant	\$74.06	\$74.43
Senior Project Manager III	\$63.64	\$63.96
Senior Project Manager II	\$53.81	\$54.08
Senior Project Manager I	\$48.20	\$48.44
Senior Landscape Architect	\$57.23	\$57.52
Senior Planning PM	\$53.97	\$54.24
Senior Geologist PM	\$57.26	\$57.55
Senior Technical Specialist I	\$50.79	\$51.04
Senior Scientist PM II	\$53.71	\$53.98
Senior Technical Scientist	\$51.13	\$51.39
Scientist PM II	\$48.38	\$48.62
Scientist PM I	\$42.00	\$42.21
Assistant PM Scientist	\$35.63	\$35.81
Environmental Engineer PM I	\$44.35	\$44.57
Geotechnical Engineer PM I	\$43.14	\$43.36
Architect PM	\$48.56	\$48.80
Assistant PM Engineer I	\$42.02	\$42.23
Engineer I	\$31.55	\$31.71
Scientist E1	\$31.41	\$31.57
Technical Graphics Technician	\$25.15	\$25.28
Administrative Managers	\$46.64	\$46.87
Senior Administrative Assistant	\$32.81	\$32.97
Lead Word Processor	\$40.46	\$40.66

**Local Public Agency**

**County**

**Section Number**

Buffalo Grove

Cook and Lake

**COST ESTIMATE WORKSHEET**

Exhibit E Cost Estimate of Consultant Services Worksheet Fixed Raise

**OVERHEAD RATE** 182.42%

**COMPLEXITY FACTOR** 0

TASK	STAFF HOURS	PAYROLL	OVERHEAD & FRINGE BENEFITS	DIRECT COSTS	FIXED FEE	SERVICES BY OTHERS	TOTAL	% OF GRAND TOTAL
Task 1: Wetland Delineation	16	569	1,038	35	188	0	1,830	10.03%
Task 2: Wetland Report	40	1,378	2,514	0	455	0	4,347	23.82%
Task 3: Preliminary Jurisdictional Determination/Boundary Verific	8	289	527	35	95	0	946	5.18%
Task 4: USACE Jurisdictional Determination	8	289	527	35	95	0	946	5.18%
Task 5: Wetland Impact Evaluation	6	264	482	0	87	0	833	4.57%
Task 6: Tree Survey	26	919	1,677	91	303	0	2,990	16.39%
Task 7: Tree Survey Report	30	1,091	1,990	0	360	0	3,441	18.86%
Task 8: QAQC	10	606	1,105	0	200	0	1,911	10.47%
Task 9: Project Administration	8	318	580	0	105	0	1,003	5.50%
		-	-		-		-	
<b>Subconsultant DL</b>					0		-	
<b>TOTALS</b>	152	5,723	10,440	196	1,888	-	18,247	100.00%

16,163

Local Public Agency

County

Section Number

Buffalo Gorge

Cook and Lake

**AVERAGE HOURLY PROJECT RATES**

Exhibit E Cost Estimate of Consultants Services Worksheet Fixed Raise

SHEET 1 OF 2

PAYROLL  CLASSIFICATION	AVG HOURLY RATES	TOTAL PROJ. RATES			Task 1: Wetland Delineation			Task 2: Wetland Report			Task 3: Preliminary Jurisdictional Determination/Boundary Verification			Task 4: USACE Jurisdictional Determination			Task 5: Wetland Impact Evaluation		
		Hours	% Part.	Wgtd Avg	Hours	% Part.	Wgtd Avg	Hours	% Part.	Wgtd Avg	Hours	% Part.	Wgtd Avg	Hours	% Part.	Wgtd Avg	Hours	% Part.	Wgtd Avg
Associate Principal II	70.10	7.0	4.61%	3.23													1	16.67%	11.68
Associate Principal I	66.37	0.0																	
Senior Consultant	74.43	0.0																	
Senior Project Manager III	63.96	0.0																	
Senior Project Manager II	54.08	0.0																	
Senior Project Manager I	48.44	0.0																	
Senior Landscape Architect	57.52	0.0																	
Senior Planning PM	54.24	0.0																	
Senior Geologist PM	57.55	0.0																	
Senior Technical Specialist I	51.04	18.0	11.84%	6.04	1	6.25%	3.19	3	7.50%	3.83	1	12.50%	6.38	1	12.50%	6.38	1	16.67%	8.51
Senior Scientist PM II	53.98	0.0																	
Senior Technical Scientist	51.39	0.0																	
Scientist PM II	48.62	0.0																	
Scientist PM I	42.21	0.0																	
Assistant PM Scientist	35.81	86.0	56.58%	20.26	12	75.00%	26.86	22	55.00%	19.69	4	50.00%	17.90	4	50.00%	17.90	4	66.67%	23.87
Environmental Engineer PM I	44.57	0.0																	
Geotechnical Engineer PM I	43.36	0.0																	
Architect PM	48.80	0.0																	
Assistant PM Engineer I	42.23	0.0																	
Engineer I	31.71	0.0																	
Scientist E1	31.57	29.0	19.08%	6.02	2	12.50%	3.95	8	20.00%	6.31	3	37.50%	11.84	3	37.50%	11.84			
Technical Graphics Technician	25.28	10.0	6.58%	1.66	1	6.25%	1.58	6	15.00%	3.79									
Administrative Managers	46.87	0.0																	
Senior Administrative Assistant	32.97	2.0	1.32%	0.43				1	2.50%	0.82									
Lead Word Processor	40.66	0.0																	
		0.0																	
		0.0																	
<b>TOTALS</b>		152.0	100%	\$37.65	16.0	100.00%	\$35.57	40.0	100%	\$34.45	8.0	100%	\$36.12	8.0	100%	\$36.12	6.0	100%	\$44.06

**Local Public Agency**

**County**

**Section Number**

Buffalo Grove

Cook and Lake

**AVERAGE HOURLY PROJECT RATES**

Exhibit E Cost Estimate of Consultant Services Worksheet Fixed Raise

SHEET 2 OF 2

PAYROLL CLASSIFICATION	AVG HOURLY RATES	Task 6: Tree Survey			Task 7: Tree Survey Report			Task 8: QAQC			Task 9: Project Administration								
		Hours	% Part.	Wgtd Avg	Hours	% Part.	Wgtd Avg	Hours	% Part.	Wgtd Avg	Hours	% Part.	Wgtd Avg	Hours	% Part.	Wgtd Avg	Hours	% Part.	Wgtd Avg
Associate Principal II	70.10							5	50.00%	35.05	1	12.50%	8.76						
Associate Principal I	66.37																		
Senior Consultant	74.43																		
Senior Project Manager III	63.96																		
Senior Project Manager II	54.08																		
Senior Project Manager I	48.44																		
Senior Landscape Architect	57.52																		
Senior Planning PM	54.24																		
Senior Geologist PM	57.55																		
Senior Technical Specialist I	51.04	2	7.69%	3.93	4	13.33%	6.81	5	50.00%	25.52									
Senior Scientist PM II	53.98																		
Senior Technical Scientist	51.39																		
Scientist PM II	48.62																		
Scientist PM I	42.21																		
Assistant PM Scientist	35.81	14	53.85%	19.28	20	66.67%	23.87				6	75.00%	26.86						
Environmental Engineer PM I	44.57																		
Geotechnical Engineer PM I	43.36																		
Architect PM	48.80																		
Assistant PM Engineer I	42.23																		
Engineer I	31.71																		
Scientist E1	31.57	10	38.46%	12.14	3	10.00%	3.16												
Technical Graphics Technician	25.28				3	10.00%	2.53												
Administrative Managers	46.87																		
Senior Administrative Assistant	32.97										1	12.50%	4.12						
Lead Word Processor	40.66																		
<b>TOTALS</b>		26.0	100%	\$35.35	30.0	100%	\$36.36	10.0	100%	\$60.57	8.0	100%	\$39.74	0.0	0%	\$0.00	0.0	0%	\$0.00

**HUFF & HUFF, INC.**  
**SUMMARY OF DIRECT COSTS**  
 Project: Lake Cook Road Phase I Study

					<u>DIRECT</u>
<b>Task 1 - Wetland Delineation</b>					
Trips	30 miles	x	2 x	\$ 0.585 = \$	35.10
<hr/>			0 x	\$ 350.00 = \$	-
			<b>Task Total</b>		<b>\$ 35.10</b>
 <b>Task 2 - Wetland Report</b>					
<hr/>			x	0 x \$ - = \$	-
			<b>Task Total</b>		<b>\$ -</b>
 <b>Task 3 - PJD/BV</b>					
Trips	30 miles	x	2 x	\$ 0.585 = \$	35.10
<hr/>			0 x	\$ - = \$	-
			<b>Task Total</b>		<b>\$ 35.10</b>
 <b>Task 4 - USACE JD</b>					
Trips	30 miles	x	2 x	\$ 0.585 = \$	35.10
<hr/>			x	0 x \$ - = \$	-
			<b>Task Total</b>		<b>\$ 35.10</b>
 <b>Task 5 - WIE Submittal</b>					
<hr/>			x	0 x \$ - = \$	-
			<b>Task Total</b>		<b>\$ -</b>
 <b>Task 6 - Tree Survey</b>					
Trips	30 miles	x	2 x	\$ 0.585 = \$	35.10
Tree Tags	50 tags	x	4 x	\$ 9.99 = \$	39.96
Nails	50 nails		4 x	\$ 3.99 = \$	15.96
<hr/>			<b>Task Total</b>		<b>\$ 91.02</b>
 <b>Task 7 - Tree Report</b>					
<hr/>			x	0 x \$ - = \$	-
			<b>Task Total</b>		<b>\$ -</b>
 <b>Task 8 - QAQC</b>					
<hr/>			x	0 x \$ - = \$	-
			<b>Task Total</b>		<b>\$ -</b>
 <b>Task 9 - Project Administration</b>					
<hr/>			x	0 x \$ - = \$	-
			<b>Task Total</b>		<b>\$ -</b>
<b>GRAND TOTAL</b>					<b>\$ 196.32</b>