STATE OF TEXAS

§

δ

COUNTY OF FORT BEND

8

AGREEMENT FOR PROFESSIONAL ENGINEERING SERVICES

THIS AGREEMENT is made and entered into by and between Fort Bend County, (hereinafter "County"), a body corporate and politic under the laws of the State of Texas, and Landtech, Inc., (hereinafter "Contractor"), a company authorized to conduct business in the State of Texas.

WITNESSETH

WHEREAS, County desires that Contractor provide professional engineering services for the reconstruction of an existing two lane asphalt roadway to a four-lane concrete boulevard with storm sewer from the Rosenberg City Limit to, and including the intersection at, FM 2977 for the Bryan Road Project, Number 17118, under the 2017 Mobility Bond Program (hereinafter "Services") pursuant to SOQ 14-025; and

WHEREAS, County has determined Contractor is the most highly qualified provider of the desired Services on the basis of demonstrated competence and qualifications, and County and Contractor have negotiated to reach a fair and reasonable amount of compensation for the provision of such Services, as required under Chapter 2254 of the Texas Government Code; and

WHEREAS, Contractor represents that it is qualified and desires to perform such services.

NOW, THEREFORE, in consideration of the mutual covenants and conditions set forth below, the parties agree as follows:

AGREEMENT

Section 1. Scope of Services

Contractor shall render the professional engineering services, including the preliminary and final design for the project, and preparation of construction documents as described Contractor's proposal dated April 27, 2018 attached hereto as Exhibit A, and incorporated herein for all purposes.

Section 2. Personnel

2.1 Contractor represents that it presently has, or is able to obtain, adequate qualified personnel in its employment for the timely performance of the Scope of Services required under this Agreement and that Contractor shall furnish and maintain, at its own expense, adequate and sufficient personnel, in the opinion of County, to perform the Scope of Services when and as required and without delays.

2.2 All employees of Contractor shall have such knowledge and experience as will enable them to perform the duties assigned to them. Any employee of Contractor who, in the opinion of County, is incompetent or by his conduct becomes detrimental to the project shall, upon request of County, immediately be removed from association with the project.

Section 3. Compensation and Payment

- 3.1 Contractor's fees shall be calculated at the rates set forth in the attached Exhibit A. The Maximum Compensation for the performance of Services within the Scope of Services described in Exhibit A is four hundred forty-four thousand three hundred eighty-three dollars and 50/100 (\$444,383.50) as set forth in Exhibit A. In no case shall the amount paid by County under this Agreement exceed the Maximum Compensation without a written agreement executed by the parties.
- 3.2 All performance of the Scope of Services by Contractor including any changes in the Scope of Services and revision of work satisfactorily performed will be performed only when approved in advance and authorized by County.
- 3.3 County will pay Contractor based on the following procedures: Upon completion of the tasks identified in the Scope of Services, Contractor shall submit to County staff person designated by the County Engineer, one (1) electronic (pdf) copy of the invoice showing the amounts due for services performed in a form acceptable to County. County shall review such invoices and approve them within 30 calendar days with such modifications as are consistent with this Agreement and forward same to the Auditor for processing. County shall pay each such approved invoice within thirty (30) calendar days. County reserves the right to withhold payment pending verification of satisfactory work performed.

Section 4. Limit of Appropriation

- 4.1 Contractor clearly understands and agrees, such understanding and agreement being of the absolute essence of this Agreement, that County shall have available the total maximum sum of four hundred forty-four thousand three hundred eighty-three dollars and 50/100 (\$444,383.50) specifically allocated to fully discharge any and all liabilities County may incur.
- 4.2 Contractor does further understand and agree, said understanding and agreement also being of the absolute essence of this Agreement, that the total maximum compensation that Contractor may become entitled to and the total maximum sum that County may become liable to pay to Contractor shall not under any conditions, circumstances, or interpretations thereof exceed four hundred forty-four thousand three hundred eighty-three dollars and 50/100 (\$444,383.50).

Section 5. <u>Time of Performance</u>

Time for performance of the Scope of Services under this Agreement shall begin with receipt of the Notice to Proceed and end no later than December 31, 2022. Contractor shall

complete the tasks described in the Scope of Services, within this time or within such additional time as may be extended by the County.

Section 6. Modifications and Waivers

- 6.1 The parties may not amend or waive this Agreement, except by a written agreement executed by both parties.
- 6.2 No failure or delay in exercising any right or remedy or requiring the satisfaction of any condition under this Agreement, and no course of dealing between the parties, operates as a waiver or estoppel of any right, remedy, or condition.
- 6.3 The rights and remedies of the parties set forth in this Agreement are not exclusive of, but are cumulative to, any rights or remedies now or subsequently existing at law, in equity, or by statute.

Section 7. Termination

7.1 Termination for Convenience – County may terminate this Agreement at any time upon forty-eight (48) hours written notice.

7.2 Termination for Default

- 7.2.1 County may terminate the whole or any part of this Agreement for cause in the following circumstances:
- 7.2.1.1 If Contractor fails to perform services within the time specified in the Scope of Services or any extension thereof granted by the County in writing;
- 7.2.1.2 If Contractor materially breaches any of the covenants or terms and conditions set forth in this Agreement or fails to perform any of the other provisions of this Agreement or so fails to make progress as to endanger performance of this Agreement in accordance with its terms, and in any of these circumstances does not cure such breach or failure to County's reasonable satisfaction within a period of ten (10) calendar days after receipt of notice from County specifying such breach or failure.
- 7.2.2 If, after termination, it is determined for any reason whatsoever that Contractor was not in default, or that the default was excusable, the rights and obligations of the parties shall be the same as if the termination had been issued for the convenience of the County in accordance with Section 7.1 above.
- 7.3 Upon termination of this Agreement, County shall compensate Contractor in accordance with Section 3, above, for those services which were provided under this Agreement prior to its termination and which have not been previously invoiced to County. Contractor's final invoice for said services will be presented to and paid by County in the same manner set forth in Section 3 above.

7.4 If County terminates this Agreement as provided in this Section, no fees of any type, other than fees due and payable at the Termination Date, shall thereafter be paid to Contractor.

Section 8. Ownership and Reuse of Documents

All documents, data, reports, research, graphic presentation materials, etc., developed by Contractor as a part of its work under this Agreement, shall become the property of County upon completion of this Agreement, or in the event of termination or cancellation thereof, at the time of payment under Section 3 for work performed. Contractor shall promptly furnish all such data and material to County on request.

Section 9. Inspection of Books and Records

Contractor will permit County, or any duly authorized agent of County, to inspect and examine the books-and records of Contractor for the purpose of verifying the amount of work performed under the Scope of Services. County's right to inspect survives the termination of this Agreement for a period of four years.

Section 10. Insurance

- 10.1 Prior to commencement of the Services, Contractor shall furnish County with properly executed certificates of insurance which shall evidence all insurance required and provide that such insurance shall not be canceled, except on 30 days' prior written notice to County. Contractor shall provide certified copies of insurance endorsements and/or policies if requested by County. Contractor shall maintain such insurance coverage from the time Services commence until Services are completed and provide replacement certificates, policies and/or endorsements for any such insurance expiring prior to completion of Services. Contractor shall obtain such insurance written on an Occurrence form (or a Claims Made form for Professional Liability insurance) from such companies having Best's rating of A/VII or better, licensed or approved to transact business in the State of Texas, and shall obtain such insurance of the following types and minimum limits:
- 10.1.1 Workers' Compensation insurance. Substitutes to genuine Workers' Compensation Insurance will not be allowed. Employers' Liability insurance with limits of not less than \$1,000,000 per injury by accident, \$1,000,000 per injury by disease, and \$1,000,000 per bodily injury by disease.
- 10.1.2 Commercial general liability insurance with a limit of not less than \$1,000,000 each occurrence and \$2,000,000 in the annual aggregate. Policy shall cover liability for bodily injury, personal injury, and property damage and products/completed operations arising out of the business operations of the policyholder.
- 10.1.3 Business Automobile Liability insurance with a combined Bodily Injury/Property Damage limit of not less than \$1,000,000 each accident. The policy shall cover liability arising from the operation of licensed vehicles by policyholder.

- 10.1.4 Professional Liability insurance may be made on a Claims Made form with limits not less than \$1,000,000.
- 10.2 County and the members of Commissioners Court shall be named as additional insured to all required coverage except for Workers' Compensation and Professional Liability. All Liability policies including Workers' Compensation written on behalf of Contractor shall contain a waiver of subrogation in favor of County and members of Commissioners Court.
- 10.3 If required coverage is written on a claims-made basis, Contractor warrants that any retroactive date applicable to coverage under the policy precedes the effective date of the contract; and that continuous coverage will be maintained or an extended discovery period will be exercised for a period of 2 years beginning from the time that work under the Agreement is completed.

Section 11. Indemnity

CONTRACTOR SHALL INDEMNIFY, HOLD HARMLESS, AND DEFEND COUNTY AGAINST ALL LOSSES, LIABILITIES, CLAIMS, CAUSES OF ACTION, AND OTHER EXPENSES, INCLUDING REASONABLE ATTORNEYS FEES, ARISING FROM ACTIVITIES OF CONTRACTOR, ITS AGENTS, SERVANTS OR EMPLOYEES, PERFORMED UNDER THIS AGREEMENT THAT RESULT FROM THE NEGLIGENT ACT, ERROR, OR OMISSION OF CONTRACTOR OR ANY OF CONTRACTOR'S AGENTS, SERVANTS OR EMPLOYEES.

Section 12. Confidential and Proprietary Information

- of performing their responsibilities under this Agreement, be exposed to or acquire information that is confidential to County. Any and all information of any form obtained by Contractor or its employees or agents from County in the performance of this Agreement shall be deemed to be confidential information of County ("Confidential Information"). Any reports or other documents or items (including software) that result from the use of the Confidential Information by Contractor shall be treated with respect to confidentiality in the same manner as the Confidential Information. Confidential Information shall be deemed not to include information that (a) is or becomes (other than by disclosure by Contractor) publicly known or is contained in a publicly available document; (b) is rightfully in Contractor's possession without the obligation of nondisclosure prior to the time of its disclosure under this Agreement; or (c) is independently developed by employees or agents of Contractor who can be shown to have had no access to the Confidential Information.
- 12.2 Contractor agrees to hold Confidential Information in strict confidence, using at least the same degree of care that Contractor uses in maintaining the confidentiality of its own confidential information, and not to copy, reproduce, sell, assign, license, market, transfer or otherwise dispose of, give, or disclose Confidential Information to third parties or use Confidential Information for any purposes whatsoever other than the provision of Services to County hereunder, and to advise each of its employees and agents of their obligations to keep Confidential Information confidential. Contractor shall use its best efforts

to assist County in identifying and preventing any unauthorized use or disclosure of any Confidential Information. Without limitation of the foregoing, Contractor shall advise County immediately in the event Contractor learns or has reason to believe that any person who has had access to Confidential Information has violated or intends to violate the terms of this Agreement and Contractor will at its expense cooperate with County in seeking injunctive or other equitable relief in the name of County or Contractor against any such person. Contractor agrees that, except as directed by County, Contractor will not at any time during or after the term of this Agreement disclose, directly or indirectly, any Confidential Information to any person, and that upon termination of this Agreement or at County's request, Contractor will promptly turn over to County all documents, papers, and other matter in Contractor's possession which embody Confidential Information.

- 12.3 Contractor acknowledges that a breach of this Section, including disclosure of any Confidential Information, or disclosure of other information that, at law or in equity, ought to remain confidential, will give rise to irreparable injury to County that is inadequately compensable in damages. Accordingly, County may seek and obtain injunctive relief against the breach or threatened breach of the foregoing undertakings, in addition to any other legal remedies that may be available. Contractor acknowledges and agrees that the covenants contained herein are necessary for the protection of the legitimate business interest of County and are reasonable in scope and content.
- 12.4 Contractor in providing all services hereunder agrees to abide by the provisions of any applicable Federal or State Data Privacy Act.
- 12.5 Contractor expressly acknowledges that County is subject to the Texas Public Information Act, TEX. GOV'T CODE ANN. §§ 552.001 *et seq.*, as amended, and notwithstanding any provision in the Agreement to the contrary, County will make any information related to the Agreement, or otherwise, available to third parties in accordance with the Texas Public Information Act. Any proprietary or confidential information marked as such provided to County by Consultant shall not be disclosed to any third party, except as directed by the Texas Attorney General in response to a request for such under the Texas Public Information Act, which provides for notice to the owner of such marked information and the opportunity for the owner of such information to notify the Attorney General of the reasons why such information should not be disclosed.

Section 13. <u>Independent Contractor</u>

- 13.1 In the performance of work or services hereunder, Contractor shall be deemed an independent contractor, and any of its agents, employees, officers, or volunteers performing work required hereunder shall be deemed solely as employees of contractor or, where permitted, of its subcontractors.
- 13.2 Contractor and its agents, employees, officers, or volunteers shall not, by performing work pursuant to this Agreement, be deemed to be employees, agents, or servants of County and shall not be entitled to any of the privileges or benefits of County employment.

Section 14. Notices

- 14.1 Each party giving any notice or making any request, demand, or other communication (each, a "Notice") pursuant to this Agreement shall do so in writing and shall use one of the following methods of delivery, each of which, for purposes of this Agreement, is a writing: personal delivery, registered or certified mail (in each case, return receipt requested and postage prepaid), or nationally recognized overnight courier (with all fees prepaid).
- 14.2 Each party giving a Notice shall address the Notice to the receiving party at the address listed below or to another address designated by a party in a Notice pursuant to this Section:

County:

Fort Bend County Engineering Department

Attn: County Engineer 301 Jackson Street Richmond, Texas 77469

With a copy to:

Fort Bend County

Attn: County Judge

401 Jackson Street, 1st Floor Richmond, Texas 77469

Contractor:

Landtech, Inc.

Attn: Glenn Graham, Vice President 2525 North Loop West, Suite 300

Houston, Texas 7708408

- 14.3 A Notice is effective only if the party giving or making the Notice has complied with subsections 14.1 and 14.2 and if the addressee has received the Notice. A Notice is deemed received as follows:
- 14.3.1 If the Notice is delivered in person, or sent by registered or certified mail or a nationally recognized overnight courier, upon receipt as indicated by the date on the signed receipt.
- 14.3.2 If the addressee rejects or otherwise refuses to accept the Notice, or if the Notice cannot be delivered because of a change in address for which no Notice was given, then upon the rejection, refusal, or inability to deliver.

Section 15. Compliance with Laws

Contractor shall comply with all federal, state, and local laws, statutes, ordinances, rules and regulations, and the orders and decrees of any courts or administrative bodies or tribunals in any matter affecting the performance of this Agreement, including, without limitation, Worker's Compensation laws, minimum and maximum salary and wage statutes and regulations, licensing laws and regulations. When required by County, Contractor shall furnish County with

certification of compliance with said laws, statutes, ordinances, rules, regulations, orders, and decrees above specified.

Section 16. Standard of Care

Contractor represents to County that Contractor has the skill and knowledge ordinarily possessed by well-informed members of its trade or profession practicing in the greater Houston metropolitan area and Contractor will apply that skill and knowledge with care and diligence to ensure that the Services provided hereunder will be performed and delivered in accordance with the highest professional standards.

Section 17. Assignment

- 17.1 Neither party may assign any of its rights under this Agreement, except with the prior written consent of the other party. That party shall not unreasonably withhold its consent. All assignments of rights are prohibited under this subsection, whether they are voluntarily or involuntarily, by merger, consolidation, dissolution, operation of law, or any other manner.
 - 17.2 Neither party may delegate any performance under this Agreement.
- 17.3 Any purported assignment of rights or delegation of performance in violation of this Section is void.

Section 18. Applicable Law

The laws of the State of Texas govern all disputes arising out of or relating to this Agreement. The parties hereto acknowledge that venue is proper in Fort Bend County, Texas, for all legal actions or proceedings arising out of or relating to this Agreement and waive the right to sue or be sued elsewhere. Nothing in the Agreement shall be construed to waive the County's sovereign immunity.

Section 19. Successors and Assigns

County and Contractor bind themselves and their successors, executors, administrators and assigns to the other party of this Agreement and to the successors, executors, administrators and assigns of the other party, in respect to all covenants of this Agreement.

Section 20. Third Party Beneficiaries

This Agreement does not confer any enforceable rights or remedies upon any person other than the parties.

Section 21. Severability

If any provision of this Agreement is determined to be invalid, illegal, or unenforceable, the remaining provisions remain in full force, if the essential terms and conditions of this Agreement for each party remain valid, binding, and enforceable.

Section 22. Publicity

Contact with citizens of Fort Bend County, media outlets, or governmental agencies shall be the sole responsibility of County. Under no circumstances whatsoever, shall Contractor release any material or information developed or received in the performance of the Services hereunder without the express written permission of County, except where required to do so by law.

Section 23. Captions

The section captions used in this Agreement are for convenience of reference only and do not affect the interpretation or construction of this Agreement.

Section 24. Conflict

In the event there is a conflict between this Agreement and the attached exhibits, this Agreement controls.

Section 25. Certain State Law Requirements for Contracts

- 25.1 Agreement to Not Boycott Israel Chapter 2270 Texas Government Code: By signature below, Contractor verifies Contractor does not boycott Israel and will not boycott Israel during the term of this Agreement.
- 25.2 Texas Government Code Section 2251.152 Acknowledgment: By signature below, Contractor represents pursuant to Section 2252.152 of the Texas Government Code, that Contractor is not listed on the website of the Comptroller of the State of Texas concerning the listing of companies that are identified under Section 806.051, Section 807.051 or Section 2253.153.

[THE REMAINDER OF THIS PAGE INTENTIONALLY LEFT BLANK.]

IN WITNESS WHEREOF, the parties hereto have signed or have caused their respective names to be signed to multiple counterparts to be effective on the date signed by the last party hereto.

FORT BEND COUNTY	LANDTECH, INC
Robert E. Hebert, County Judge	Glenn Graham, Vice President
	5/8/2018
Date	Date
ATTEST:	
Laura Richard, County Clerk	
APPROVED:	
Nich Ohr Holl.	_
Righard W. Stolleis, P.E., County Engineer	
APPROVED AS TO LEGAL FORM:	
Marcus D. Spencer, First Assistant County	Attorney
AUDI	TOR'S CERTIFICATE
I hereby certify that funds are avai pay the obligation of Fort Bend County ur	***************************************
	Robert Ed Sturdivant, County Auditor
I:\Marcus\Agreements\Engineering\Road Construction\Bryan\17118\Agreement	Pro Eng Svcs.Bryan.Ll.docx.5/2/2018

EXHIBIT A



Landtech, Inc. 2525 North Loop West, Suite 300 Houston, Texas 77008 T: 713-861-7068; F: 713-861-4131 TxBPE Reg. No. F-1364 TxBPLS Reg. No. 10019100

April 27, 2018

Mr. Stacy Slawinski, P.E. Assistant County Engineer - Projects 301 Jackson St, 1st floor Richmond, Texas 77469

Re: Bryan Road Reconstruction

From Rosenberg City Limits to FM 2977

Dear Mr. Slawinski:

Landtech, Inc. is pleased to present this proposal for the supplemental engineering services for the above referenced project.

1.0 PROJECT INFORMATION

We understand the project involves the proposed widening from two lane undivided roadway to four lane boulevard of Bryan Road from City of Rosenberg City Limits to FM 2977 including the intersection of Bryan Road/FM 2977. The total length for Bryan Road is approximately 2,800 feet.

The work to be performed by the Engineer under this contract consists of providing preliminary and final design services for the project, coordination with County, and preparation of construction documents containing plans, specifications and details pertaining to paving, grading, drainage, storm sewers, storm water pollution prevention, pavement markings, sequence of construction and traffic control plans, construction cost estimate and time of construction estimate. Supplementary topographic survey and ROW documents, Drainage analysis and design, and Geotechnical engineering services will be provided by Engineer's sub-consultants.

2.0 SCOPE OF SERVICES

See Attachment A for Scope of Services.

3.0 COMPENSATION

For the scope of services outlined in this letter, we submit a cost not to exceed \$444,383.50. Attachments provide a scope of services, a breakdown of man-hours and budget requirements for individual tasks associated with the project, schedule, and scope and fee proposals for the sub-consultants.

We appreciate the opportunity to submit	this proposa	al for your consideration.
Sincerely,		
Steven Pike, P.E.		4/27/2018 Date
Approved		Bate
FORT BEND COUNTY		
		Date



ATTACHMENT A

SCOPE OF SERVICES TO BE PROVIDED BY THE ENGINEER

Scope of Services to Perform Design and Prepare Plans, Specifications, and Estimate, and Provide Construction Phase Engineering Services

Bryan Road - From City of Rosenberg City Limit to FM 2977 Fort Bend County

General Scope of Project

The work to be performed by the Engineer under this contract consists of providing preliminary and final design services for the project, coordination with County, and preparation of construction documents containing plans, specifications and details pertaining to paving, grading, drainage, storm sewers, storm water pollution prevention, pavement markings, sequence of construction and traffic control plans, construction cost estimate and time of construction estimate. Supplementary topographic survey and ROW documents, and Geotechnical engineering services will be provided by Engineer's sub-consultants.

The project involves the proposed widening from two lane undivided roadway to four lane boulevard of Bryan Road from City of Rosenberg City Limit to FM 2977 including the intersection of Bryan/FM 2977. The total length is approximately 2,800 feet.

Types of Service

The engineering services to be performed by the Engineer are those services which are necessary for the preparation of designs, construction plans, specifications, and other items of work related thereto, all of which are hereinafter referred to as the "Design Phase Services." Engineering services to be performed also include Construction Phase Engineering Services. These services will include, but are not limited to the general type and classifications listed in the following:

I. Project Management

- A. Develop and Maintain
 - 1. Project Schedules
 - 2. Budgets
 - 3. Monthly Progress Reports and Invoices
- B. Meet with the County staff on a regular basis to review project progress.
- C. Coordinate and review the work produced to comply with County policies and procedures, specifically "2017 Mobility Bond Program Summary of Design Process", and to deliver that work on time. Comply with all applicable laws, ordinances and codes of the State and local governments.
- D. Field Reconnaissance. Travel to the project to inspect features along and adjacent to the roadway to assist in making decisions concerning roadway design, drainage design, sequence of construction, and ROW acquisition.
- E. Develop and implement Quality Control and Quality Assurance program.
- F. Coordinate identification of utility conflicts and monitor relocation status. Utilities include but are not limited to AT&T, Comcast, CPE Gas, CPE Power, Petroleum Pipeline Companies and Phonoscope.

G. Prepare utility conflict table for the project.

II. Roadway Design

- A. Prepare existing typical sections.
- B. Prepare proposed typical sections that show lane configuration and pavement structure.
- C. Prepare horizontal alignment data sheets for Bryan Road and intersecting streets, including bench marks (1" = 100' printed on half-size sheets).
- D. Prepare project site map (1" = 200').
- E. Prepare roadway plan and profile sheets (1" = 40' H, 1" = 4' V half-size) showing horizontal and vertical geometric designs, which will be based on the approved schematic. Refine the horizontal and vertical alignments as needed for the detailed PS&E phase design.
- F. Prepare intersection layout and grading sheet for intersection of Bryan Road and FM 2977 to include top of pavement elevations of the following intersecting streets (to go beyond ROW as needed to determine high/low points).
- G. Prepare a table showing the quantities, station, radii, width, and grade for driveway reconstruction. Identify locations and limits for temporary construction easements
- H. Identify and modify as necessary standard roadway detail sheets for conformance with County standard details.
- I. Show existing ROW with bearings and distances on plan and profile sheets for reference to insure all proposed improvements are fully located within ROW.
- J. Prepare Preliminary Engineering Report (PER) as part of submittals for preliminary design. Report should meet requirements listed in the "2017 Mobility Bond Program Summary of Design Process".

III. Drainage Design (sub)

See attachment scope for Drainage Design from sub-consultant (Aguirre & Fields, LP).

IV. Signing and Pavement Marking (Sub)

See attachment scope for Signing and Pavement Marking from sub-consultant (Aguirre & Fields, LP).

V. Signing, Pavement Marking, and Signalization

Prepare signalization design for the intersection of FM 2977 at Bryan Road. Design elements should be in accordance with latest Fort Bend County and TxDOT policies and standards.

VI. Traffic Control

- A. Prepare advanced warning sign layout (1" = 2000').
- B. Prepare sequence of construction with general traffic control plan layout.
- C. Prepare traffic control plan for each stage (1" = 2000' double bank).

- D. Prepare construction sequencing and traffic control plan layouts for each stage (1" = 80').
- E. Prepare detour layout sheet to detour through traffic around construction.
- F. Identify and modify as necessary standard construction and barricade detail sheets.

VII. Miscellaneous Roadway

- A. Prepare Title Sheet for project.
- B. Prepare Index Sheet. Index Sheet will include a listing of the required standards.
- C. Prepare General Notes sheet and include notes applicable for grading, paving, drainage, and utilities.
- D. Prepare storm water pollution prevention plans (SW3P) (1" = 80' double bank) showing temporary control measures during each phase of construction. Prepare NOI and SWMP forms/sheets.
- E. Include demolition plans (if necessary) for SW3P sheets, showing existing structures and pavement to be removed along the project corridor, which will require removal or relocation due to the proposed improvements.
- F. Earthwork Cross-Sections (1" = 80' H, 1" = 20' V) showing existing and proposed roadway sections will be prepared every 100' for the proposed roadway. The cross-sections will be generated from vertical topographic information
- G. Compute and tabulate construction quantities and prepare estimate. Estimates will be prepared and submitted with each review submittal at Preliminary Design, 70%, 95% and Final.
- H. Develop a tree protection plan, if determined to be necessary.
- Provide for the preparation of a geotechnical analysis report of the proposed roadway and bridges.
- J. Prepare and submit required construction documents to Texas Department of Licensing Regulation (TDLR) for review of sidewalk design.
- K. Prepare and submit permit documents to secure permit from Fort Bend County Drainage District.

VIII. Topographic Survey and ROW Mapping (Sub)

See attachment scope for Topographic Survey and ROW Mappings from sub-consultant (Weisser Engineering & Surveying).

IX. Geotechnical Engineering Services (Sub)

See attachment scope for Geotechnical Engineering Services from sub-consultant (Raba Kistner Consultants, Inc.).

IX. Bid Phase

A. Prepare construction bid package to include Notice to Bidders, Instruction and Information to Bidders, Bid Proposal Form, Standard Form of Agreement, Bond Forms, General

Conditions, Special Conditions if any, Technical Specifications and Construction Plans, in accordance with County standards.

- B. Provide 27 compact discs, each with one project manual file and one drawing file.
- C. Attend and coordinate pre-bid meeting.
- D. Answer Contractor questions and prepare any required addenda.
- E. Attend bid opening, tabulate, analyze and review bids for completeness and accuracy.
- F. Provide review on Contractors references.
- G. Provide bid tabulation and recommendation of award letter.

X. Construction Phase

- A. Provide hard copy sets and pdf CDs for construction drawings, project manual, and posted addenda for construction. (County to confirm # of ½ size and full size sets prior to printing).
- B. Attend pre-construction conference if required.
- C. Review and approve shop drawings, answer RFIs, prepare Change Order Requests (including revisions to plan sheets and specifications) as required.
- D. Make periodic visits to the site to observe the progress and quality of the work if required.
- E. Reestablish horizontal and vertical controls as needed at commencement of Construction Phase.
- F. Prepare pay estimates based on quantities reviewed by County inspection staff, for signatures by contractor and engineer. Forward one executed copy to County for payment.
- G. Revise contract drawings to show the work as actually constructed (based on contractor mark ups), and furnish the County with "record drawings" plans, pdf CDs, and GIS format.

ATTACHMENT B Project Fee Proposal

Fort Bend County

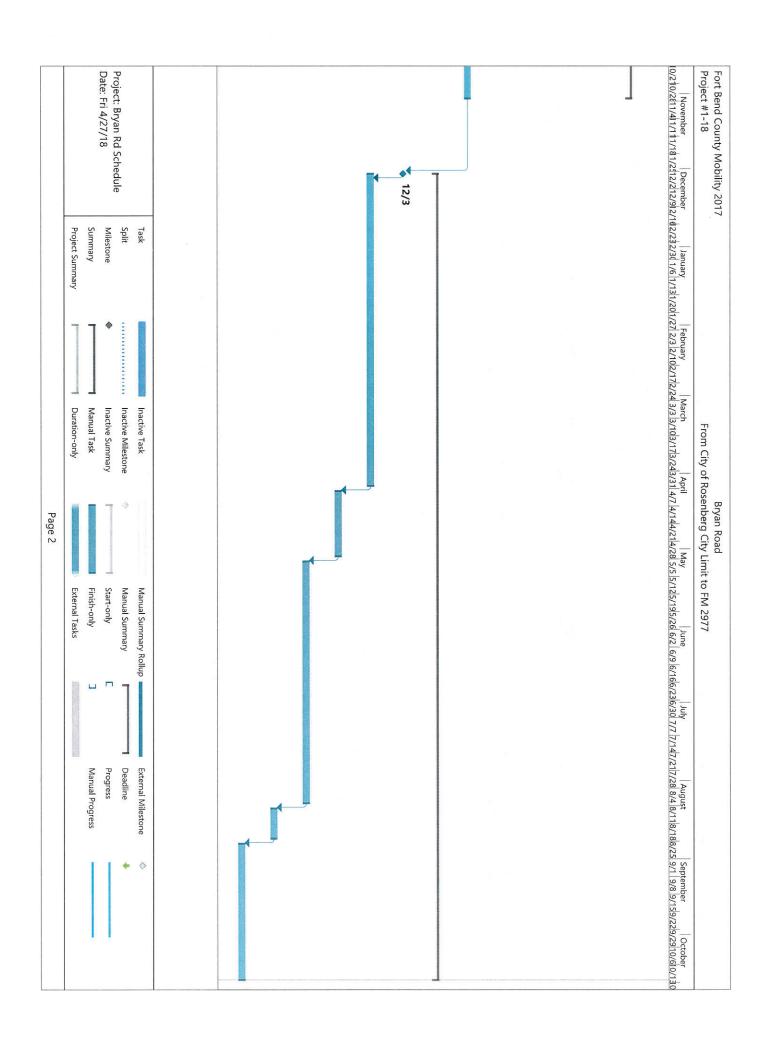
Bryan Road

From City of Rosenberg City Limit to FM 2977

Date: 4/27/2018

1		Sr. Project	Senior	Professional	Project	Engineering	CADD			Total Hour
Task	Principal	Manager	Engineer	Engineer	Engineer	Technician	Technician	Drafter	Clerical	/Cost
Rate	\$286.50	\$260.00	\$230.00	\$181.00	\$140.00	\$110.00	\$93.00	\$66.00	\$66.00	
PRELIMINARY DESIGN										Continue to the second
Project Management (meetings, invoices)	2	6	24			4			12	48
Data Collection/Field Visit		4	12	12	20		12			60
Roadway Horizontal & Vertical Alignment		4	8	24	16		28			80
Typical Sections			8	6		16		8		38
Preliminary Plan & Profiles (6 sheets)			8	4	8	8	16	16		60
Preliminary Quantities & Cost Estimate		1	8	4	8		16	8		45
Preliminary Engineering Report (PER)		1	10	25	16		8	16		76
Coordination with Subs		4	12	16	8	4			6	50
Hours Subtotal	2	20	90	91	76	32	80	48	18	409
Subtotal Labor Costs	\$573.00	\$5,200.00	\$20,700.00	\$16,471.00	\$10,640.00	\$3,520.00	\$7,440.00	\$3,168.00	\$1,188.00	\$68,900.00
Topographic Survey and ROW Mapping										\$51,320.0
Geotechnical Engineering Services										\$28,340.0
Preliminary Drainage analysis										\$40,254.0
Preliminary Design Total						Sign Sign				\$188,814.
INAL DESIGN										
Project Management (meetings, invoices)	2	12	36			4			12	66
Plan & Profiles (6 sheets)		4	20	20	20	36	40	30		170
Signalization (FM2977 intersection)		4	40	28	50	16	8	60		206
Traffic Control Plan		6	24	40	28	16	16	80		210
SWPPP			8	16	16	8	4	32		84
TxDOT Permit		1	8	16			16			41
TDLR Permit		1	8	16			16			41
Utility Coordination		2	8	22			8			40
Quantities & Cost Estimate		2	16	16	16		32	8		90
Project Document QA/QC	1	8	16			4			6	35
Hours Subtotal	3	40	184	174	130	84	140	210	18	983
Subtotal Labor Costs	\$859.50	\$10,400.00	\$42,320.00	\$31,494.00	\$18,200.00	\$9,240.00	\$13,020.00	\$13,860.00	\$1,188.00	\$140,581.5
ROW Mapping (1 parcel)										\$1,500.00
Final Drainage Design & Pvmt Marking										\$59,184.00
Final Design Total										\$201,265.5
Tillai Designi Total										φ201,265.
BID PHASE			Wall was to be a second		tulo 1 tulo					
Project Manual & Forms		4	16	8	8		16	8		60
Bid documents		1	4	4	4			8	2	23
Pre-bid meetings		4	8						4	16
Bid analysis and Award recommendation			4	6	6					16
Hours Subtotal		9	32	18	18		16	16	6	115
Subtotal Labor Costs		\$2,340.00	\$7,360.00	\$3,258.00	\$2,520.00		\$1,488.00	\$1,056.00	\$396.00	\$18,418.0
CONSTRUCTION PHASE										
Pre-Construction Meeting			4	4	4					12
Submittals, RFIs, and Shop drawings		8	40	48				40		136
Field visit and progress reports		1	24	12					6	43
Final Walk-through		1	6	6						13
i irai vvaik-tiilougri										
Hours Subtotal		10	74	70	4			40	6	192







April 27, 2018

Mr. Wade Zhao, P.E. Landtech, Inc. 2525 North Loop West, Suite 300 Houston, Texas 77008

Re: Bryan Road Paving & Drainage Improvements, Rosenberg City Limits to FM 2977

Dear Mr. Zhao:

Aguirre & Fields, LP (AFLP) is pleased to provide engineering services for roadway drainage, signing and pavement marking design for Bryan Road from Rosenberg City Limits to FM2977.

Project Description

The project includes the reconstruction of approximately 2,800 feet of Bryan Road from Rosenberg City Limits to FM 2977 located at Fort Bend County. The existing facility is a two lane, two-way asphalt roadway with roadside ditches. The improvements will include reconstruction of the roadway into a 4-lane concrete boulevard configuration, an intersection improvement at FM 2977, and an enclosed storm sewer system.

AFLP will provide drainage design for this project that will include, drainage area and sub-areas identification, storm sewer configuration, mitigation study, and recommendations. AFLP will also provide signing and pavement marking design service.

Preliminary Design

The following items will be completed by AFLP during preliminary design:

- Complete field investigations and review as built plans for adjacent properties.
- Identify survey needs beyond ROW, as needed to determine high/low points for drainage.
- Prepare overall drainage area map.
- Prepare detailed drainage maps necessary to perform the design of storm sewer system.
- Determine drainage needs.
- Coordinate with Landtech the design of the roadway profile to verify compliance with the design criteria.
- Design Preliminary storm sewer system.
- Prepare a drainage report. Storm water mitigation (detention pond may be required).
 Further discussion with Fort Bend County may be needed to determine onsite/offsite mitigation.
- Provide preliminary drainage quantities and construction cost estimate.

The deliverable will include a drainage report to summarize the findings of the hydraulic design for storm sewer system.

The proposed services will be completed for submittal to the reviewing agencies within 6 to 9 months from notice to proceed and receipt of survey data.

The fee for performing the above Preliminary Design Phase is \$40,254.00 (refer to Exhibit A – LOE). AFLP will invoice monthly during the project. Payment is expected one week after Landtech receive payment from the client.

Final Design

Storm Sewer Design Inlet level drainage area maps will be provided during Final Design Phase for the plan set. The models will be updated at the 95% submittal.

The design will be based on the following design criteria and include, in order of priority, (1) Fort Bend County Drainage Criteria Manual (Fort Bend County Drainage District, November, 1987, revised April 1999), (2) City of Rosenberg municipal design criteria, (3) Guidelines for Engineers Having Contracts with Harris County, Texas (Harris County Public Infrastructure Department, 1987), (4) the Infrastructure Design Manual (City of Houston Department of Public Works and Engineering, current version, used for infrastructure for which design criteria do not exist in the preceding criteria documents), (5) Texas Manual of Uniform Traffic Control Devices (MUTCD) for Streets and Highways (2014), and (6) applicable Texas Department of Transportation design criteria (all County-maintained traffic signals, other items as applicable),

The following items will be completed by AFLP for final design.

- Delineate drainage areas for the storm sewer system.
- Design all storm sewer within the project corridor.
- Provide updated plan reference file to Landtech for use in plan development sheets.
- Provide pipe elevation and hydraulic grade line (HGL) to Landtech for use in profile development sheets.
- Provide QA/QC of plan and profile sheets to verify storm sewer callouts match intended design.
- Design signing and pavement marking.
- Provide summary of small signs.

The 70 percent submittal should include the following:

• Drainage area map with hydraulic calculations. All calculations and drainage area will be in conformance with the approved Hydrology/ Hydraulic Study included as part of the project scope.

AGUIRRE & FIELDS

- Storm sewer plan and profile data, which will include plan and profile information for storm sewers, manholes, inlets, and existing utilities.
- Storm sewer hydraulic data sheets.
- Outfall typical sections and plan and profile sheet.
- Standard drainage detail sheets.
- Detention pond layout and details (if needed).
- Drainage quantities and construction cost estimate.
- Signs and pavement marking plans.
- Summary of small signs, which will include sign number, text, size, post, anchor and mounting information.
- Standard and modified pavement marking detail sheets.

The 95 percent submittal will include all of the 70 percent requirements plus the following:

- Standard construction details
- Responses to 70 percent comments
- Updated quantities and construction cost estimate.

Final design efforts will be considered complete when comments to the 95 percent submittal have been addressed.

The fee for performing the above Final Design Phase is \$59,184.00 (refer to Exhibit A – LOE). AFLP will invoice monthly during the project. Payment is expected 1 week after Landtech receive payment from the client.

Coordination

AFLP will meet with the client throughout the project duration to discuss the changes in the design.

Sincerely,

Guillermo A. Benavides, P.E.

GAB/

Enclosures:

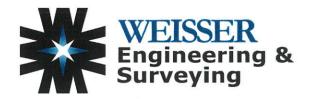
Exhibit A – LOE



"EXHIBIT A" - LEVEL OF EFFORT (LOE)
Project Name: Bryan Road Paving & Drainage Imporovements
Project Limits: Rosenberg City Limits to FM 2977

AGUIRRE & FIELDS, LP April 27, 2018

\$99,438.00	\$300.00	\$17,100.00	\$25,620.00	\$30,240.00	\$20,130.00	\$5,208.00	\$840.00	TOTAL LABOR COSTS
812	4	190	244	224	122	28	4	ESTIMATE TOTAL HOURS
\$59,184.00	\$0.00	\$12,600.00	\$12,600.00	\$17,820.00	\$12,210.00	\$3,534.00	\$420.00	SUBTOTAL LABOR COSTS
485	0	140	120	132	74	19	2	SHEETS & HOURS SUBTOTAL
								DIRECT EXPENSES
27			16	8	2			PREPARATION OF 70% AND 95% SUBMITTALS (quantities)
40		12	16	8	4			SIGNING AND STRIPING STANDARDS
52		16	16	8	8	4		PAVEMENT MARKING - STRIPING - Plan Preparation
52		16	16	8	8	4		SIGNING - Plan Preparation
21		8		8	4	1		STORM SEWER STANDARDS
29		16		8	4	_		DETENTION POND LAYOUT
29		16		8	4	-1		OUTFALL LAYOUT
42			16	16	8	2		QA/QC
36		20		12	4			DEVELOP STORM SEWER PLAN REFERENCE FILE
40		20		12	6	2		STORM SEWER COMPUTATION SHEETS
60			30	20	10			STORM SEWER DESIGN
39		16	10	8	4	1		DRAINAGE AREA MAPS
20				8	8	2	2	COORDINATION W/COUNTY AND DRAINAGE DISTRICT
								FINAL DESIGN
\$40,254.00	\$300.00	\$4,500.00	\$13,020.00	\$12,420.00	\$7,920.00	\$1,674.00	\$420.00	SUBTOTAL LABOR COSTS
327	4	50	124	92	48	9	2	SHEETS & HOURS SUBTOTAL
								DIRECT EXPENSES
34			16	8	8	2		PREPARE QUANTITIES & COST ESTIMATE
74	4	20	20	20	8	2		Report (includes report exhibits)
27			16	8	2			Preliminary Detention Pond sizing
29			16	8	4	ے		Preliminary Storm Sewer sizing
								DRAINAGE REPORT
64			36	20	8			STORM SEWER DESIGN (Pre-design)
73		30	20	16	6	1		DRAINAGE AREA MAPS (Pre-design)
8				4	4			FIELD RECONNAISSANCE
20				8	œ	2	2	COORDINATION W/COUNTY AND DRAINAGE DISTRICT
								PRELIMINARY DESIGN
	\$75.00	\$90.00	\$105.00	\$135.00	\$165.00	\$186.00	\$210.00	LABOR RATE PER HOUR
TOTAL LABOR HRS & COSTS	Admin Clerical	Senior CADD Operator	ЕІТ	Engineer	Project Engineer	Project Manager	Senior Project Manager	TASK DESCRIPTION



PROPOSAL AGREEMENT FOR PROFESSIONAL SERVICES

Effective Date: April 6, 2018

Wade W. Zhao, Ph.D., P.E. LandTech, Inc. 2525 North Loop West, Suite 300 Houston, TX 77008 Office 713.861.7068 Fax 713.861.4131 wzhao@LandTech-Inc.com

Proposal for Professional Services in Connection With: 2017 Fort Bend County Mobility Project No. 1-18, Bryan Road Project from Rosenberg City Limits to FM 2977, Fort Bend County, Texas

Weisser Engineering & Surveying is pleased to submit this proposal and terms of service (together, the "Agreement") to LandTech, Inc. (the "Client").

I. SCOPE OF SERVICES

Surveying and Mapping

The Surveyor shall evaluate the existing ROW envelope and make recommendations for the acquisition of ROW necessary for the Project including but not limited to roadway, corner cuts, sight distance triangles, detention, and outfalls, if necessary. The Surveyor shall establish a project baseline based on the centerline of the right-of-way. The Surveyor shall create an available existing utility list (Excel Format) including the type, owner, location, and contact information for available existing utilities within the project limits to be supplied to the Engineering Consultant to complete the identification of potential utility conflicts. The Surveyor shall sign and seal all survey documents.

The specific survey limits are as follows:

The linear topographic and right-of-way survey along Bryan Road will commence at the intersection of Bryan Road and FM 2977 and proceed northwest for approximately 2,800 feet to the Rosenberg City Limit Line. Limits include 250 feet north and south along FM 2977, 250 feet south along Rose Ranch Blvd., and 250 feet south along an existing drainage channel at the western end of the project limits for an approx. total of **3,800 linear feet**. (As Shown on the Attached Aerial Image)

1. Existing Right of Way Mapping (Cat. 1B; Cond. II)

- a. Perform abstract survey; obtain deeds of records, and plats for Bryan Road right-of-way, streets intersecting Bryan Road and tracts of land adjoining Bryan Road.
- b. Establish the existing right-of-way of Bryan Road, FM 2977, and Rose Ranch Blvd.
- c. Prepare existing Right-of-Way Map of the Project certifying to a Cat. 1B, Cond. II Right-of-Way Survey to be delivered in PDF format.
- d. Prepare Survey Control Sheet(s) for the project to be delivered in PDF format.

COST: \$21,780.00 (non-taxable)

2. Topographic Surveying for Bryan Road and Intersecting Roadways (Cat 6; Cond. II)

The Surveyor will provide the following within the surveying limits described in Task 2:

- a. Establish horizontal and vertical project control. Control shall be relative to the North American Datum of 1983 (NAD 83, 2001 adjustment) and the North American Vertical Datum of 1988 (NAVD 88, 2001 adjustment/FBCGPS Monuments datum).
- b. For the roadway and ditches, obtain cross-sections at 100-foot intervals with grade breaks. Cross-sections shall extend 20 feet beyond the proposed right-of-way lines where accessible. Identify locations and elevations of physical features to include buildings, fences, walls, trees, sidewalks, driveways and driveway curbs, power poles, light poles, water meters, water wells, ponds, sprinklers, off-site drain pipe, etc. Horizontally and vertically locate available existing utilities within, crossing, and adjoining project limits. Utilities will be located and tied based on visual evidence and utilities based on maps, plans, and marked by "One Call" within the project limits, flow line elevations, sizes, material types and directions of pipes will be obtained on storm sewer lines, sanitary sewer lines and culverts. The rim (top) and flow line elevations will be obtained on inlets, manholes, and drainage structures.
- c. The Surveyor will coordinate with pipeline companies, municipal utility districts (MUDs), homeowner's associations (HOA's), Fort Bend County, and private utility agencies to obtain locations of available existing utilities and depths of existing pipelines and provide Level B Subsurface Utility Surveying.
- d. Survey geotechnical bore hole locations as indicated by Client and provide information to Client in an approved digital format.
- e. Prepare existing Topographic Survey Map of the Project certifying to a Cat. 6, Cond. II Topographic Survey to be delivered in PDF format.
- f. The 3D topographical survey base map and digital terrain model (DTM), surface triangular irregular network (TIN) will be created and delivered for the existing roadway using Geopak and Microstation.

COST: \$24,960.00 (non-taxable)

3. Subsurface Utility Engineering (Level B) Utility/Pipeline Investigations

The Survey shall perform such investigations, research, and other activities necessary to identify any potential utility/pipeline conflicts with the Project, including but not limited to:

- a. Locating and identifying available existing utilities/pipelines including casings and vent pipes within the existing and proposed rights-of-way, including obtaining information from utility owners record drawings and site reconnaissance, as well as shooting elevations marked or uncovered by others, and providing Subsurface Utility Engineering Level B effort to locate all available subsurface utilities within the existing and proposed right-of-way.
 - Level B Two dimensional (x,y) information obtained through the application and interpretation of non-destructive surface geophysical methods. Also known as "designating", this quality level provides the horizontal position of subsurface utilities within approximately one foot.

COST: \$4,580.00 (non-taxable)

4. Additional Services

a. Parcel Surveys (Cat. 1A; Cond. II) - Prepare metes and bounds descriptions in accordance with Fort Bend County guidelines for property acquisition and add parcels to the existing right-of-way maps.

COST: \$1,500.00 per parcel (non-taxable)

(Approximately 3 Tracts = \$4,500.00)

II. TERMS AND CONDITIONS

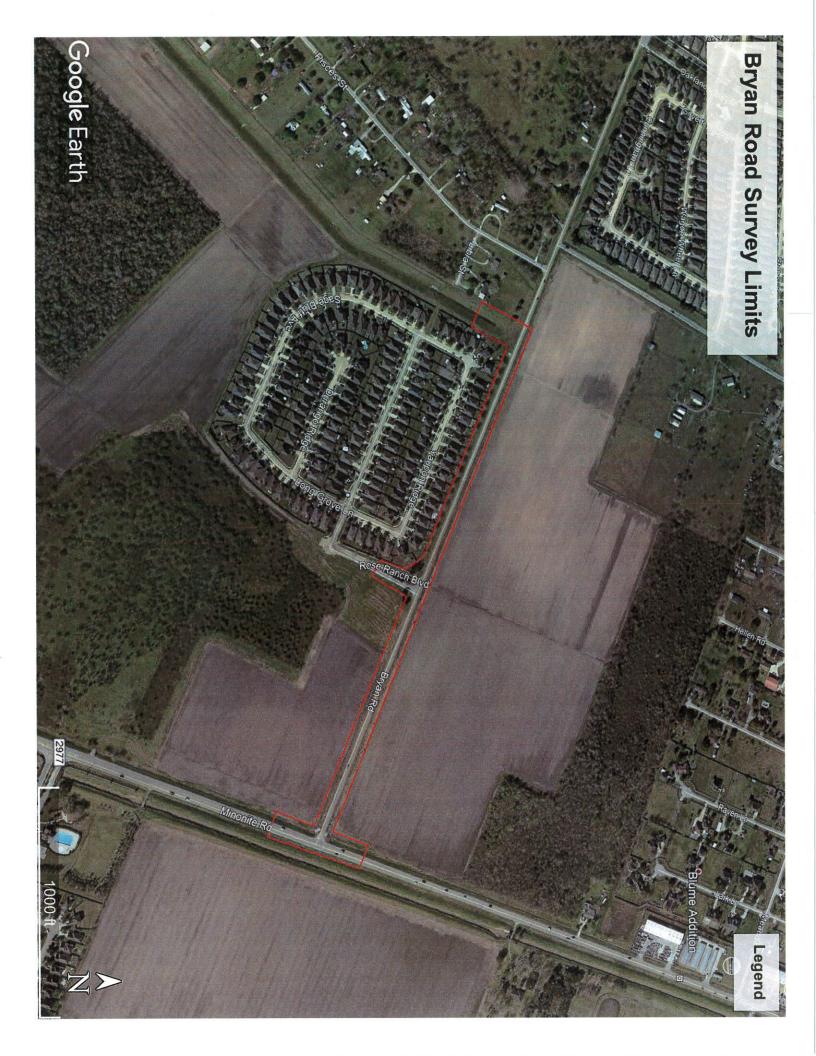
- 1. This Agreement may only be modified by a writing acknowledging agreement of modification by both parties.
- 2. The Responsible Party signing this Agreement agrees to be fully responsible for the timely and complete payment for Services within thirty (30) days of invoicing. Any requests for modification of this provision must be signed by an officer or department director of Weisser Engineering & Surveying.
- 3. Weisser Engineering & Surveying is an independent contractor. Nothing in this Agreement forms a partnership, joint venture, employment, franchise, master-servant, or agency relationship between Client and Weisser Engineering & Surveying.
- 4. WEISSER ENGINEERING & SURVEYING SHALL ONLY BE LIABLE FOR DAMAGE OR LOSS TO ANY PERSON OR PROPERTY TO THE EXTENT SUCH DAMAGE OR LOSS IS CAUSED BY WEISSER ENGINEERING & SURVEYING'S NEGLIGENT ACT OR OMISSION IN CONNECTION WITH THE SERVICES. WEISSER ENGINEERING & SURVEYING'S LIABILITY TO CLIENT OR ANY OTHER PARTY FOR CLAIMS OF ANY KIND, WHETHER BASED ON CONTRACT OR TORT OR OTHERWISE RELATING TO THIS AGREEMENT, SHALL NOT EXCEED THE COMPENSATION PAID OR OWED TO WEISSER ENGINEERING & SURVEYING FOR SERVICES UNDER THIS AGREEMENT.
- 5. Client shall not solicit Weisser Engineering & Surveying employees for purposes of employment during the course of the Agreement or for a period of twelve (12) months thereafter. Client acknowledges and agrees that breach of this provision may result in irreparable and continuing damage to Weisser Engineering & Surveying, for which there would be no adequate remedy at law, and that, in the event of such breach, Weisser Engineering & Surveying may be entitled to equitable or injunctive relief and/or a decree for specific performance, in addition to all such other and further relief as may be available at law, in equity, or otherwise.
- 6. Upon request, Weisser Engineering & Surveying may make electronic files of its CAD drawings available to Client on an "as is" basis for informational purposes only that may not be relied upon for any other purpose. ALL WARRANTIES AND REPRESENTATIONS OF ANY KIND WITH REGARD TO ELECTRONIC FILES ARE DISCLAIMED, INCLUDING BUT NOT LIMITED TO THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR USE. Since revisions or additions to design file drawings may occur at any time, Client agrees to indemnify, defend and hold harmless Weisser Engineering & Surveying, its officers, directors, agents, shareholders, and employees from and against any and all claims, suits, losses, damages or costs, including reasonable attorney's fees, arising from the use of outdated or amended design file drawings by Client or any third party, and such indemnification shall survive acceptance of said file(s) by Client or the termination of this Agreement. Client promises to notify any third party that the third party may not reasonably rely on electronic files, drawings, or documents not directly provided to such third party by Weisser Engineering & Surveying.
- 7. This Agreement shall be deemed entered into in Texas and shall be governed by and construed and interpreted in accordance with the laws of the State of Texas, without reference to any rules of conflict of laws. Venue shall be in Houston, Harris County, Texas.
- 8. In the event that any one or more of the provisions contained in this Agreement shall for any reason be held to be invalid, illegal, or unenforceable in any respect, such invalidity, illegality, or unenforceability shall not affect any other provisions, and the Agreement shall be construed as if such invalid, illegal, or unenforceable provision had never been contained in it.
- 9. This Agreement may be executed by facsimile or scanned and electronically transferred signatures. A copy of this Agreement bearing such a signature or signatures shall have the same force and effect as an original agreement with inked original signatures. Once signed, any reproduction of this Agreement made by reliable means (e.g., photocopy, scan, facsimile) is considered an original.

10. Client's failure to sign and return this Agreement to Weisser Engineering & Surveying within fifteen (15) days of Effective Date renders the Agreement voidable by Weisser Engineering & Surveying.

We appreciate the opportunity to provide this proposal. If you have any questions or comments, please do not hesitate to contact John Harvill (<u>jharvill@weissereng.com</u>).

The Client, by signing below, represents that he or she has the authority to enter into this Agreement, agrees to the terms and conditions in this Agreement, is willing to be the Responsible Party, promises to pay the invoiced amount within thirty (30) days of invoicing, and authorizes Weisser Engineering & Surveying to proceed with the Services as described above.

CLIENT	WEISSER ENGINEERING & SURVEYING
LandTech, Inc. By:	By:
Printed Name:	Printed Name: Walter P. Sass
Title:	Title: Principal
Date of Acceptance:	Date of Acceptance: 4/6/18



			crew.	*Based on 1 field crew.	*	
			al rain days.	*Not including potential rain days.	*Not ii	
			weeks.	*Based on 40 hour weeks	*В	
	eed.	vith Notice to Proceed	/ill commence w	/. Actual dates w	urpose only	*Dates are for visual purpose only. Actual dates will commence with Notice to
	110000000000		Thurs 5/31/18	Tue 5/22/18	8 days	CADD Operator
			Fri 5/18/18	Mon 5/14/18	5 days	Survey Tech
						3. Drafting - Right-of-way and Topographic
			Tues 5/22/18	Mon 5/14/18	7 days	3-person field Crew
						2. SURVEY - Topographic Surveying and SUE
			Fri 5/4/18	Mon 4/30/18	5 days	Research
			Fri 5/11/18	Mon 5/7/18	5 days	3-person field Crew
						1. SURVEY - Right-of-way
3 10 17 24	6 13 20 27	1 8 15 22 29				Task Name
June '18	May '18	April '18	Finish	Start	Duration	
			oject schedule	Bryan Road - example project schedule	Bryan Roa	
			& Surveying	Weisser Engineering & Surveying	Weisser	



Building Better Tomorrows 3602 Westchase Houston, TX 77042 www.rkci.com

P 713.996.8990 F 713.996.8993 Toll Free 866.996.8990 TBPE Firm - F-3257

Proposal No. PHA18-041-00 April 5, 2018

Mr. Wade W. Zhao, Ph.D., P.E. Landtech, Inc. 2525 North Loop West, Suite 300 Houston, Texas 77008

RE: Proposal for Geotechnical Engineering Services

2017 Mobility Bond Program

Fort Bend County Precinct 1

Project 1-18 – Bryan Road

From City of Rosenberg City Limits to Farm-To-Market (FM) Road 2977

Fort Bend County, Texas

Dear Mr. Zhao:

Raba Kistner Consultants, Inc. (RKCI) is thankful for having been selected by Fort Bend County (OWNER) as a member of the project's design team to provide Geotechnical Engineering Services to Landtech, Inc., (CLIENT) for the above-referenced project. As such, RKCI is pleased to submit this proposal to CLIENT for the services described herein. The broad objectives of our study will be to explore subsurface conditions within the limits of the subject project and to provide foundation and pavement recommendations for the design and construction of a new traffic signal, rigid pavement and associated storm drainage. Described in this letter are:

- our understanding of pertinent project characteristics;
- our proposed scope for field and laboratory study;
- our proposed scope for engineering evaluation and reporting;
- our tentative project schedule; and
- our lump sum study fee.

Project Description

The overall project scope includes a study, design, and bid phase engineering services to be provided by CLIENT to develop the project's PS&E package for the reconstruction of an approximately 2,800-foot long, existing 2-lane asphalt roadway into a new, 4-lane concrete pavement boulevard with associated curb & gutter and storm drainage project to be located along Bryan Road, From the City of Rosenberg City Limits to Farm-To-Market (FM) Road 2977. The project will also include intersection improvements at FM 2977.

The purpose of our geotechnical engineering study will be to determine subsurface conditions along the existing road alignment and to develop geotechnical engineering recommendations for the design of new

rigid pavement and storm drainage (anticipated trench depth to be 15 to 20 ft below grade), as well as to provide foundation recommendations for a new T-shaped traffic signal intersection improvements at FM 2977. The following sections of this proposal further describe our proposed geotechnical scope of services. The Equivalent Single Axle Load (ESAL) value will be calculated based on Ft. Bend County's standard pavement design consisting of 8 inches of concrete underlain by 8 inches of lime-treated subgrade.

Field Study

Based on the project's layout provided by CLIENT and considering the inclusion of storm drainage and the improvements at the existing traffic signal, we propose to conduct the following drilling scheme in order to assess subsurface conditions along the proposed road alignment.

Proposed Improvements	Number of Borings	Depth, ft ⁽¹⁾	Total Depth, ft
New Road w/Storm Drainage	7	30	210
Traffic Signal	2	50	100
Total Drilling	Footage	•	310

^{1.} Below the existing ground surface elevation.

The seven (7), 30-ft deep each borings are based on utilizing a spacing interval of approximately 500-ft along the roadway alignment in accordance with "Guidelines for Consultants Performing Geotechnical Investigations for Projects Maintained by Harris County, Texas" as specified by OWNER.

RKCI will perform the necessary One-Call notifications prior to beginning the field drilling activities. The borings will be located in the field using recreational grade GPS and/or by pacing distances from known landmarks or reference points. Our scope of services and cost do not include surveying of the boring locations. However, **RKCI** recommends that the final boring locations be surveyed in the field by the CLIENT or their representative.

Traffic control will likely be required to safely route traffic around the drilling crew during the field work activities of the traffic signal boring. **RKCI** will provide off-duty police officers and/or other certified traffic subcontractor to perform traffic control duties.

The field work for the 7, 30-ft deep borings will be conducted using standard geotechnical drilling and sampling procedures. The soil borings will be sampled continuously to 10 feet and thereafter, they will be sampled at 5-ft intervals. Samples will be taken using conventional split-spoon and/or Shelby tube sampling techniques in general accordance with applicable American Society for Testing and Materials (ASTM) standards. Representative portions of the samples will be sealed, identified, packaged, and transported to our laboratory for subsequent testing and classification.

The field work for the 2, 50-ft deep signal borings will be conducted using Texas Cone Penetration (TCP) techniques in general accordance with the Texas Department of Transportation (TxDOT) Geotechnical Manual, dated March 2018. Typically, drilling will cease if five consecutive TCP results of 100 blows for less than 4 inches of penetration are recorded. In order to collect samples from this boring for laboratory testing purposes, Shelby tube sampling techniques or grab samples from the auger cuttings will be obtained in between each TCP sampling event. Representative portions of the samples will be sealed, identified, packaged, and transported to our laboratory for subsequent testing and classification.

Water level readings will be recorded for the open boreholes during drilling and at drilling completion. If free water is encountered during drilling, the RKCI geologist will temporarily suspend drilling operations and obtain water level measurements in the open borehole at 5 minute intervals over a 15 minute time interval. Water level measurements will also be recorded at completion of drilling prior to backfilling the boreholes with the auger cuttings and spoils generated during the drilling operations. The top 8 inches of the traffic signal boring will be plugged and sealed with bitumen or ready-mix concrete up to the surrounding surface elevation.

Laboratory Testing

Upon completion of the subsurface exploration, a general testing program will be designed to define the moisture condition, classification, strength, and shrink/swell characteristics of the subsurface soil samples. The laboratory testing program is anticipated to include moisture content determinations, Atterberg Limits, percent passing No. 200 sieve, grain size analyses, unit dry weights, unconfined compressive strength tests, and corrosivity tests (to include electrical resistivity, pH, sulfate, and chloride content determinations). However, the actual type and number of laboratory tests will be based on the subsurface conditions encountered in the borings. The laboratory testing will be performed in general accordance with applicable ASTM standards and samples will be kept for 30 days upon submittal of the final report.

In addition to the above-described testing program, representative surficial specimens will be obtained from the pavement borings and will be subjected to a California Bearing Ratio (CBR) test. The CBR testing will provide information regarding inundated strength and swell characteristics of the surficial subgrade soils for direct use in pavement design analyses, which will be conducted in accordance with the 1993 American Association of State Highway and Transportation Officials (AASHTO) pavement design method.

Engineering Analyses and Report

The results of the field and laboratory studies will be reviewed by our staff of engineers and geologists. The results of our review, together with the supporting field and laboratory data, will be presented in a draft geotechnical report which will be finalized after we receive CLIENT comments. The Geotechnical Engineering Report may also include the following information and recommendations:

- A summary of the field and laboratory sampling and testing program;
- Boring logs and laboratory testing results;

- A review of the general site conditions including a description of the site, the subsurface stratigraphy, groundwater conditions, and the presence and condition of fill materials, if encountered.
- Signal foundation design considerations and recommendations, including:
 - expansive, soil-related movements using an empirical method for predicting Potential Vertical Rise (PVR) developed by TxDOT;
 - shallow and/or deep foundation recommendations;
 - available soil-bearing pressures;
 - settlement estimations, where applicable;
 - utility trenching and backfill considerations; and
 - groundwater considerations.
- Foundation construction considerations, including:
 - site drainage;
 - site preparation;
 - select fill materials;
 - shallow and/or deep foundation excavations;
 - potential reuse of on site materials as select fill materials;
 - excavation considerations; and
 - fill placement compaction requirements.
- Seismic region condition evaluations.

Also included in the report will be general guidelines for the construction of pavements for the proposed road alignment. These guidelines will be based on the results of the classification testing and the CBR test and will be based utilizing the 1993 AASHTO pavement design method. As mentioned previously, the ESAL value will be calculated based on Ft. Bend County's standard pavement design consisting of 8 inches of concrete underlain by 8 inches of lime-treated subgrade.

Our scope of work does not include a geologic fault study nor does it include conducting test pits at the site. Since site grading plans can result in changes in the foundation and pavement subgrade conditions, final site grading plans will be helpful information in the preparation of engineering recommendations. In the absence of final site grading information, we will prepare recommendations based on the existing ground surface elevations. Also, specific information concerning anticipated traffic loadings and frequencies to be provided by the CLIENT for the pavement areas will be critical in the computation of the pavement sections.

Electronic copies of the draft geotechnical report and final geotechnical report will be provided.

Tentative Project Schedule

Based on our present workload and weather permitting, it is anticipated that the field exploration phase of this study can begin within five working days of receiving written authorization to proceed, provided that the site is accessible to our truck-mounted drill rigs and the CLIENT has supplied us with all available information regarding existing utilities and below-grade structures along the existing road alignment (if any). The field exploration and laboratory testing phases of the study are expected to take approximately fifteen working days to complete. The engineering report will be submitted within an additional fifteen working days following completion of the laboratory testing. The above schedule does not account for delays due to inclement weather. We will be pleased to provide the design team with verbal design information as the data becomes available.

Lump Sum Cost

The total lump sum cost for the study outlined herein is \$28,340. Should unusual subsurface conditions be encountered in the field that indicates the desirability of significantly broadening the scope of the study, we will contact you to receive written authorization before proceeding with any additional work. Additional services will be billed on a unit basis in accordance with the attached Schedule of Fees for Professional Services.

RKCI has been provided with an illustration of the limits of the subject project. Our scope of services and cost assumes that the boring locations will be accessible to truck-mounted drilling rigs with the vehicles and crew protected by a subcontracted traffic control firm consisting of lane closures and utilizing standard warning signs, cones, and/or off-duty law enforcement personnel to alert the traveling public of work ahead.

Further, **RKCI** will take reasonable efforts to locate underground utilities prior to performing any underground exploration activities by contacting the local "one call" utility locating service for commercial utility companies (such as natural gas, electric, water, etc.) to locate and mark in the field all utilities within the limits of the subsurface exploration activities. **RKCI** will not be responsible for any damage to utilities not properly located by the aforementioned method or to any utility not located by the aforementioned method but encountered and damaged during the subsurface exploration process. If during project execution **RKCI** feels that there exists a possibility of un-located or improperly located utilities, **RKCI** will notify CLIENT and discuss additional utility locating services and processes to reduce the probability of encountering a utility to acceptable levels. The cost of such additional utility locating services will be an additional charge and will not be done until approved by the CLIENT via additional work by supplemental agreement.

Historically, the cost of our field services is about 45 percent of our total fee. These services are predominantly provided by subcontractors. In order to promptly pay our subcontractors and continue to be able to respond to your needs, we will send you an interim invoice for 45 percent as soon as the field exploration phase of our study is complete.

It should be noted that our study scope (and project cost) do not include plan review or earthwork and foundation excavation observations during the construction of the project. However, plan review and construction observation costs should be included in the project budget.

Proposal No. PHA18-041-00 April 5, 2018

It should also be noted that our study scope (and project cost) do include up to 8 hours of professional time for participation in design team meetings. If additional participation time is needed, the additional professional time will be billed at our standard billing rates for professional time plus expenses.

Acceptance

We appreciate the opportunity of submitting this proposal and look forward to working with you in the development of this project, which will be carried out accordance with this letter and the following attachments:

<u>Attachment</u>	Description
<u> </u>	Standard Terms and Conditions
11	Schedule of Fees

Please return one signed original of this contract to provide written authorization for our firm to commence work on the services outlined herein. Our invoices are due and payable upon receipt at P.O. Box 971037, Dallas, Dallas County, Texas 75397-1037.

RKCI considers the data and information contained in this proposal to be proprietary. This statement of qualifications and any information contained herein shall not be disclosed and shall not be duplicated or used in whole or in part of any purpose other than to evaluate this proposal.

Very truly yours,

RABA KISTNER CONSULTANTS, INC.	Accepted By
	(Signature)
Muhanyad	(Typed or Printed Name)
Muhannad Hussein, P.E.	(.,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,
Project Engineer	
11 111	(Title)
MulumM	Date:
Martin Vila, P.E., F. ASCE	

MH/MV/dar

Sr. Vice President

Attachment

Copies Submitted: Above (1-electronic)



STANDARD TERMS AND CONDITIONS

- 1. SERVICES. Raba Kistner, Inc., by and through one of its subsidiaries (Raba Kistner Consultants, Inc., Raba Kistner Environmental, Inc., Raba Kistner Facilities, Inc. or Raba Kistner Infrastructure, Inc.) (the relevant subsidiary, being engaged to provide the services to CLIENT in connection with the delivery of this instrument, is referred to as "RK" herein) is being engaged by the CLIENT to render professional services ("Services") involving only RK's advice, judgment and opinion. RK may subcontract all or a portion of the Services performed hereunder. RK shall apply professional judgment in determining the extent to which RK complies with any given standard identified in RK's instruments of professional services. CLIENT expressly acknowledges that RK makes no warranties or guarantees, expressed or implied, regarding the Services.
- INFORMATION PROVIDED BY CLIENT. CLIENT may provide or direct RK to utilize or rely upon certain information ("CLIENT Information") in the performance of RK's services. RK shall be entitled to rely upon such CLIENT Information. RK will not conduct an independent evaluation of the accuracy or completeness of such CLIENT Information and shall not be responsible for any errors or omissions in such information. RK's report, as well as any recommendations, findings, and conclusions made by RK, are dependent on information received from CLIENT. Changes or modifications to the information provided by CLIENT can affect RK's evaluation, recommendations, findings and conclusions, and CLIENT agrees—as a material term of this Agreement—to notify RK immediately, in writing, if CLIENT becomes aware of any such changes or modifications, including changes to the size, scope, location, or other material characteristics of CLIENT's project. The CLIENT shall be responsible for providing the location of all underground utilities and other structures in the vicinity of RK borings or excavations. RK will not accept responsibility and will not be liable for affecting or damaging any underground utility, underground storage tank, or other subsurface condition not previously identified and located, or improperly located, by the CLIENT, a utility, or a utility locating agency.
- 3. SITE ACCESS AND SITE SAFETY. CLIENT shall provide right-of-entry to the buildings and sites which are the subjects of RK's services. CLIENT represents that it possesses authority for such right-of-entry and that the building/site operator(s) possess the necessary permits and licenses for current activities at the site. RK shall be responsible for supervision and site safety measures of its own employees and subconsultants, but shall not be responsible for the supervision or health and safety precautions of any other parties, including CLIENT, CLIENT'S contractors, subcontractors, or other parties present at the site.
- 4. <u>SUBSURFACE EXPLORATIONS.</u> Subsurface conditions throughout the site may vary from those depicted on logs of discrete borings, test pits, or other exploratory services. CLIENT understands RK's layout of boring and test locations is approximate and that RK may deviate a reasonable distance from those locations. RK will take reasonable precautions to reduce damage to the site when performing services; however, CLIENT accepts that invasive services such as drilling or sampling may damage or alter the site. Site restoration is not provided unless specifically included in the scope of services.
- CHANGED CONDITIONS. If, during the term of this Agreement, circumstances or conditions that were not originally contemplated by or known to RK are uncovered or revealed, to the extent that they affect the scope of services, compensation, schedule,

- allocation of risks or other material terms of this Agreement, RK may call for renegotiation of appropriate portions of this Agreement. RK shall notify the CLIENT of the changed conditions necessitating renegotiation, and RK and the CLIENT shall promptly and in good faith enter into renegotiation of this Agreement to address the changed conditions. If changes cannot be agreed to with respect to changed conditions, the parties shall utilize the Dispute Resolution/Litigation procedures in this Agreement.
- TESTING AND OBSERVATIONS. CLIENT understands that testing and observation are discrete sampling procedures, and that such procedures indicate conditions only at the depths, locations, and times the procedures were performed. RK will provide test results and opinions based on tests and field observations only for the work tested. CLIENT understands that testing and observation are not continuous or exhaustive, and are conducted to reduce not eliminate - project risk. CLIENT agrees to the level or amount of testing performed and the associated risk. CLIENT is responsible (even if delegated to contractor) for notifying and scheduling RK so RK can perform these services. RK shall not be responsible for the quality and completeness of contractor's work or their adherence to the project documents, and RK's performance of testing and observation services shall not relieve contractor in any way from its responsibility for defects discovered in its work, or create a warranty or guarantee. CLIENT acknowledges that RK will not supervise or direct the work performed by contractor or its subcontractors and is not responsible for their means and methods.
- 7. ESTIMATE OF FEES FOR CONSTRUCTION AND MATERIALS TESTING SERVICES. If included as part of RK's proposal, RK will, to the best of its ability, perform the scope of services related to Construction and Materials Testing Services within the proposed fee estimate provided by RK. RK's proposal fees are based upon an estimate of the services required to meet the specifications for the project and following generally accepted engineering practices. The CLIENT recognizes that unforeseen circumstances along with changes in scope and project/contractor's schedules can influence the successful completion of the scope of services within the estimated proposed fees. Because the contractor has sole control over the project and determines the means and methods used to build/construct the project, RK's service fees are estimates and not lump sum or guaranteed maximum fees. The CLIENT is fully responsible for payment of all services provided, including retests of contractor's failed areas.
- 8. <u>REPORTS.</u> RK may provide CLIENT with written reports in connection with the Services performed. Such reports will present such findings and conclusions as RK may reasonably make with the information gathered while performing its services, and provided by CLIENT. The reports may be copied for inclusion in other documents related to the project provided it is reproduced in its entirety; however reports and other instruments of service are prepared for, and made available for, the sole use of the CLIENT, and the contents thereof may not be used or relied upon by others without the express written authorization of RK. Any unauthorized use or distribution shall be at the CLIENT's sole risk and without liability to RK..
- 9. TOXIC AND HAZARDOUS MATERIALS. CLIENT shall provide RK with all information within CLIENT'S possession or knowledge as to the potential or presence of toxic or hazardous materials or pollutants at the site. CLIENT agrees that RK neither created nor contributed to the creation or existence of any toxic or hazardous

materials or pollutants. In no event shall RK be required to sign a hazardous waste manifest or take ownership of any toxic or hazardous materials or pollutants. If unanticipated toxic or hazardous materials or pollutants are encountered while performing RK's services, RK reserves the right to stop field operations and notify the CLIENT and CLIENT assumes responsibility to notify appropriate regulatory agencies. RK and CLIENT must mutually agree to remobilize.

- 10. NO THIRD-PARTY BENEFICIARIES. The services and any report(s) prepared under this Agreement are for the sole benefit and sole use of CLIENT and are not for the use of any other party or person. Only CLIENT may rely upon the services and any report or work product. Nothing in this Agreement, or any subsequent amendments or modifications, or in any report issued under this Agreement, shall create a contractual relationship with or a cause of action in the favor of any third party against either RK or CLIENT. If CLIENT provides a copy of any report prepared by RK to others, it shall advise the recipient that the information contained in the report is provided for information only and is not to be relied upon by third parties.
- 11. <u>LEED PROJECTS.</u> Unless specifically addressed elsewhere in this agreement, RK has no responsibility or liability, including duty to defend or duty to indemnify, any party (including but not limited to CLIENT, owner, owner's agents, architects, engineers, contractors, construction managers, subcontractors) for the LEED certification process including: developing, producing, or retaining any documentation relating to the calculation of LEED points; and attainment of LEED certification points or LEED ratings.
- 12. <u>STANDARD OF CARE.</u> RK shall perform its professional services in accordance with the standard of care and diligence normally practiced by professional firms in performing services of a similar nature, in the same locality, under similar circumstances. CLIENT expressly acknowledges that RK makes no other warranties or guarantees, expressed or implied, regarding its professional services or its work product.
- RISK ALLOCATION. RK will be responsible only for its own work, and that of its sub-consultants, and not for defects in the work designed or built by others.
- 14. LIMITATION OF LIABILITY. CLIENT AND RK HAVE EVALUATED THE RISKS AND REWARDS ASSOCIATED WITH THIS PROJECT, INCLUDING RK'S FEE RELATIVE TO THE RISKS ASSUMED, AND AGREE TO ALLOCATE CERTAIN OF THE RISKS SO, TO THE FULLEST EXTENT PERMITTED BY LAW, THE TOTAL AGGREGATE LIABILITY OF RK (AND ITS RELATED ENTITIES, EMPLOYEES, OWNERS, AGENTS, AND REPRESENTATIVES) TO CLIENT (AND THIRD PARTIES GRANTED RELIANCE ON RK'S WORK PRODUCT, OR OTHERWISE SEEKING RECOVERY UNDER THIS AGREEMENT) IS LIMITED TO THE GREATER OF \$100,000 OR THE FEE PAID RK UNDER THIS AGREEMENT, FOR ANY AND ALL INJURIES, DAMAGES, CLAIMS, LOSSES, OR EXPENSES (INCLUDING ATTORNEY AND EXPERT FEES) ARISING OUT OF RK'S SERVICES OR THIS AGREEMENT REGARDLESS OF CAUSE(S) OR THE THEORY OF LIABILITY.
- 15. CONSEQUENTIAL DAMAGES. Neither CLIENT nor RK will be liable to the other for any special, consequential, indirect, incidental or penal losses or damages of any kind, nor will CLIENT or RK be liable to the other for losses, damages, or claims, regardless of how defined, related to: lost profits; unavailability of property or facilities; shutdowns or service interruptions; loss of use, , revenue, opportunity, or inventory; use charges, carrying costs, cost of substitute facilities, goods, or services; cost of capital, or claims of any other party and/or its customers.
- 16. SUSPENSION OF SERVICES. If the CLIENT fails to make payments when due or otherwise is in breach of this Agreement, RK may suspend performance of services upon seven (7) calendar days' notice to the CLIENT. RK shall have no liability whatsoever to the CLIENT for any costs or damages as a result of such

suspension. Upon payment in full by the CLIENT, RK may resume services under this Agreement, and the time schedule and compensation shall be equitably adjusted to compensate for the period of suspension plus any other reasonable time and expense necessary for RK to resume performance. Payment of invoices shall not be subject to any discounts or set-offs by the CLIENT unless agreed to in writing by RK. Payment to RK for services rendered and expenses incurred will be due and payable regardless of any subsequent suspension or termination of this Agreement by either party.

- WAIVER OF SUBROGATION. To the extent damages are covered by property insurance, or any other available insurance coverage, CLIENT and RK waive all rights against each other and against the contractors, consultants, agents and employees of the other for damages. CLIENT agrees that CLIENT shall procure, or cause to be procured builder's risk insurance or other property insurance for its project. RK and CLIENT waive all rights against each other and any of their consultants, contractors, subcontractors, sub-subcontractors, agents, and employees, for damages caused by fire, flood, or other causes of loss to the extent covered by CLIENT's or CLIENT's Contractor's builder's risk insurance, or other available insurance coverage. The policies shall provide waivers of subrogation by endorsement or otherwise. CLIENT shall require of its contractors, consultants, agents and employees similar waivers in favor of RK and its subconsultants. A waiver of subrogation shall be effective as to a person or entity even though that person or entity would otherwise have a duty of indemnification, contractual or otherwise, did not pay the insurance premium directly or indirectly, and whether or not the person or entity had an insurable interest in the property damaged.
- 18. OWNERSHIP OF DOCUMENTS. R-K's reports, drawings, plans, specifications, and other documents and deliverables are instruments of professional service ("Instruments of Service") developed by RK in contemplation of a wide array of project-specific variables, including how the documents will be used and by whom. RK shall be the author, owner and custodian of the Instruments of Service, and shall retain all common law, statutory, and other reserved rights, including copyright. By execution of this Agreement, RK grants to CLIENT a limited, nonexclusive license to use the Instruments of Service for purposes of constructing, using, and maintaining the project for which the services are performed, provided CLIENT substantially performs its obligations, including prompt payment of all sums when due, under this agreement.

Upon completion of the services, and payment in full of all monies due RK, CLIENT may retain copies of all such documents. THE INSTRUMENTS OF SERVICE ARE NOT INTENDED NOR REPRESENTED TO BE SUITABLE FOR REUSE ON EXTENSIONS, MODIFICATIONS, OR ADAPTATIONS OF THE PROJECT, OR ANY OTHER PROJECT, ANY REUSE OF SUCH DOCUMENTS, WITHOUT WRITTEN VERIFICATION OR ADAPTATION BY RK FOR THE SPECIFIC PURPOSE INTENDED, WILL BE AT CLIENT'S SOLE RISK WITHOUT LIABILITY OR LEGAL EXPOSURE TO RK, AND CLIENT AGREES, TO THE FULLEST EXTENT PERMITTED BY LAW, TO INDEMNIFY, DEFEND, AND HOLD HARMLESS RK, ITS OFFICERS, DIRECTORS, EMPLOYEES, AND CONSULTANTS AGAINST ALL CLAIMS, DAMAGES, LOSSES, AND EXPENSES (INCLUDING REASONABLE ATTORNEYS' FEES, DEFENSE COSTS, AND COURT COSTS) ARISING FROM OR ALLEGEDLY ARISING FROM OR IN ANY WAY CONNECTED WITH THE UNAUTHORIZED REUSE OR MODIFICATION OF THE DOCUMENTS BY CLIENT OR ANY PERSON OR ENTITY THAT ACQUIRES OR OBTAINS THE DOCUMENTS FROM OR THROUGH THE CLIENT WITHOUT THE WRITTEN AUTHORIZATION OF R-K REGARDLESS OF WHETHER SUCH CLAIMS, DEMANDS, OR ACTIONS ARE FOUNDED IN WHOLE OR IN PART UPON ALLEGED NEGLIGENCE OF RK, ITS OFFICERS, DIRECTORS, EMPLOYEES, OR CONSULTANTS.

Parties other than CLIENT and RK may apply to use an instrument, using a form prepared by RK for that purpose. Others' use of an instrument shall be permitted only when CLIENT and RK both so agree; either shall have the right to forbid use by others. In

- addition, R-K shall make its permission contingent upon the satisfaction of certain conditions when, in RK's professional judgment, such a contingency is necessary.
- <u>DISPUTE RESOLUTION/LITIGATION.</u> All claims, disputes, and other controversy between RK and CLIENT arising out of or in any way related to the services provided by RK shall be submitted to mediation, before and as a condition precedent to other remedies provided by law. If a dispute at law arises related to these services and that dispute requires litigation as provided above, the CLIENT assents to personal jurisdiction in the State of Texas; the claim will be brought and tried in Bexar County, the county where RK's principal place of business is located, and CLIENT waives the right to remove or transfer the action to any other county or jurisdiction. The prevailing party will be entitled to recovery of all court costs, attorneys' fees, and other legally recoverable claim-related expenses. As a condition precedent to mediation of any claim arising out of the services provided under this Agreement, CLIENT shall obtain the written opinion from a registered, independent, and reputable professional engineer that RK has violated the standard of care applicable to RK's performance of services, in a form that meets the requirements of Texas Civil Practice & Remedies Code Chapter 150.
- 20. TERMINATION OF CONTRACT. CLIENT and RK may terminate services at any time upon ten (10) calendar days' written notice. In the event of termination, CLIENT agrees to fully compensate RK for services performed including reimbursable expenses through the termination date, as well as reasonable demobilization expenses. RK will terminate services without waiving any claims or incurring any liability.
- 21. STATUTE OF LIMITATIONS. Any applicable statute of limitations will commence to run and any cause of action shall be deemed to have accrued not later than the earlier of the following: (1) the date of the report issued by RK giving rise to the cause of action; (2) the date on which RK issues its last report under this Agreement; or (3) if RK is retained to perform construction observation, the date of substantial completion of the project.
- 22. FORCE MAJEURE. Neither party shall be liable in damages or have the right to terminate this Agreement for any delay or default in performing hereunder if such delay or default is caused by conditions beyond its control ("Force Majeure") including, but not limited to Acts of God, Government restrictions (including the denial or cancellation of any export or other necessary license), wars, insurrections and/or any other cause beyond the reasonable control of the party whose performance is affected. Force Majeure may not be claimed as a cause for delay in payment of money due and payable hereunder.
- NO ASSIGNMENT. Neither RK nor CLIENT shall assign, sublet, or transfer its interest in this Agreement without the express written consent of the other.
- 24. <u>SEVERABILITY.</u> Each provision of this Agreement is intended to be severable. If any terms or provisions of this agreement shall be held to be invalid, illegal, or unenforceable for any reason whatsoever, the validity, legality, and enforceability of the remaining provisions hereof shall remain in full force and effect and shall not in any way be affected or impaired thereby. Moreover, to the maximum extent allowed by law, the Parties hereto stipulate that any offending provisions will be modified or altered, as necessary, so as to give such provision the maximum permissible effect and application intended.
- 25. ENTIRE AGREEMENT. This Agreement, and all of its attachments, constitutes the entire, integrated Agreement between the Parties to it, and this Agreement supersedes all other Agreements, oral or written between the Parties, concerning the subject set forth in this Agreement. This Agreement may not be amended except in writing, with that amendment being signed by both Parties.



SCHEDULE OF FEES FOR PROFESSIONAL SERVICES

PERSONNEL:

Principal\$135	to	\$250/hour
Professional\$70		
Auto Cad Operator\$65		
Technical/Clerical/Administrative\$40		

The specific hourly rate within each classification listed above depends on the experience, special training, and qualifications of the personnel needed for the project. For projects requiring work at any hazardous waste site, there will be a \$10 per hour surcharge added to the normal billing rate for all personnel. Consultants to Raba Kistner (RK) will be charged according to their professional classification.

EXPENSES:

Use of company automobiles will be charged at \$1.00 per mile. Automobiles and light trucks assigned to field sites will be charged at \$70.00 per day, plus \$1.00 per mile over 50 miles per day. Copies will be charged at \$0.25 per page.

Other project specific charges for use of RK equipment or for RK testing will be in accordance with established fee schedules. All other project specific, third-party costs will be charged at cost plus 15 percent.

Invoices will be submitted monthly for work in progress in our standard format. They are due and payable upon receipt and become past due 30 days after the billing date. Past due invoices may be subject to late charges at the rate of 1-1/2 percent per month (18 percent per annum). In the event that the State of Texas legislates a sales tax on Professional Services, the amount of the tax will be PAYMENT added to the appropriate service rate charged. Our invoices are due and payable upon receipt at P.O. Box 971037, Dallas, Texas 75397-1037.

Preparation of non-standard invoice will be charged on a time and materials basis in accordance with the rates in this fee schedule.

CONDITIONS: Services will be performed in accordance with our Standard Terms and Conditions.

The proposal to which this schedule is an attachment is valid for 90 days from the date of the proposal.