

EXHIBIT

"A"

STATE OF TEXAS

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§

COUNTY OF WILLIAMSON

§

**SUPPLEMENTAL CONTRACT NO. 1
TO CONTRACT FOR ENGINEERING SERVICES**

FIRM: WALKER PARTNERS, LLC ("Engineer")
ADDRESS: 804 Las Cimas Parkway, Suite 150, Austin, TX 78746
PROJECT: Lake Georgetown Zebra Mussel Control Evaluation

This Supplemental Contract No. 1 to Contract for Engineering Services is made by and between the City of Round Rock, Texas, hereinafter called the "City" and Walker Partners, LLC, hereinafter called the "Engineer".

WHEREAS, the City and Engineer executed a Contract for Engineering Services, hereinafter called the "Contract", on the 26th day of October, 2018 for the Lake Georgetown Zebra Mussel Control Evaluation Project in the amount of \$24,095.00; and

WHEREAS, it has become necessary to amend the Contract to modify the provisions for the scope of services and to increase the compensation by \$266,958.00 to a total of \$291,053.00;

NOW THEREFORE, premises considered, the City and the Engineer agree that said Contract is amended as follows:

I.

Article 2, Engineering Services and Exhibit B, Engineering Services shall be amended as set forth in the attached Addendum to Exhibit B. Exhibit C, Work Schedule shall be amended as set forth in the attached Addendum to Exhibit C.

II.

Article 4, Compensation and Exhibit D, Fee Schedule shall be amended by increasing by \$266,958.00 the maximum amount payable under the Contract for a total of \$291,053.00, as shown by the attached Addendum to Exhibit D.

IN WITNESS WHEREOF, the City and the Engineer have executed this Supplemental Contract in duplicate.

[signature pages follow]

WALKER PARTNERS, LLC

By: _____

Date

CITY OF ROUND ROCK

APPROVED AS TO FORM:

By: _____
Craig Morgan, Mayor

Stephan L. Sheets, City Attorney

Date

ADDENDUM TO EXHIBIT B

Engineering Services

Engineering Services to be provided:

Services of Engineer

Walker Partners, LLC. (Walker Partners) will provide professional engineering services to design treatment facilities to control the proliferation of the invasive zebra mussel on its raw water intake screens, pumps, raw water transmission pipeline and water treatment plant. The design will be based upon the recommendations of Walker Partners' engineering evaluation technical memorandum, "Lake Georgetown Zebra Mussel Control Evaluation Project", dated February 15, 2019.

Purpose

A recent development related to water treatment in Central Texas lakes is the discovery of zebra mussels, including Lake Georgetown and Stillhouse Lake. These invasive mussels have a long history of attaching in massive quantities to raw water intakes and pipelines and creating major damage to the infrastructure. The purpose of this work is to design water treatment facilities that will minimize the impacts of the zebra mussels on the City of Round Rock's water facilities. The facilities are anticipated to include a chemical storage and feed structure adjacent to the existing electrical buildings off Cedar Breaks Road, chemical feed line(s) from the new chemical structure to the existing raw water intake, chemical injectors in each pump can, and new zebra mussel resistant screens. The bulk chemical storage will be placed in a concrete containment area under a canopy. The chemical feed pumps and carrier water pumps will be in a concrete containment area within a building.

The intent of the scope below is to outline the engineering services that will be provided for controlling zebra mussels and improving water quality and reliability.

Scope of Work

WORK APPROACH

The project design work will be carried out using a phased design delivery approach to assure a logical and progressive completion of the design work. The phases, as described below, will be carried out sequentially. Each phase of design will include a specific list of work products and deliverables, which are identified in the individual sections. Design review workshops will be conducted with the Owner's personnel, key individuals from the Walker Partners project team and others as needed; the design review workshops will be conducted at critical design milestones as identified in the following sections.

Task 1.0 - Project Management

1.1 Project Workplan

Develop a project workplan to define project organization, communication, project cost

control procedures, document control, health and safety considerations, change management, and other project management requirements.

1.2 Monthly status reports and Invoicing

Summary of monthly activity compared to scope of work, summary of fee request, and identification of any outstanding issues. Monthly invoice will be based upon percent complete of scope of work.

1.3 Once a month Progress Conference Calls

Coordinate once per month conference calls with core team members to review team's progress, discuss review comments, identify information or data needs, review schedule and action items.

1.4 Quality Control/Quality Assurance

All deliverables will be reviewed by experienced Walker Partners staff. All comments by City staff and internal staff will be tracked and responded to in a timely manner.

1.5 Document Controls and Project Close-Out

Organize project information, manage access to information, post notices as needed, and archive information as required by the Owner.

1.6 Project Kickoff Meeting

Plan, coordinate, and conduct a project kickoff meeting with the City of Round Rock staff, Brushy Creek Municipal Utility District (MUD) staff, United States Army Corps of Engineers (USACE) Lake Georgetown Manager, and the Walker Partners team. Meeting will include discussions of:

- Project Objectives
- Project Communications
- City staff preferences for equipment and materials
- Regulatory Coordination – Texas Commission on Environmental Quality (TCEQ) plan review approval, USACE easement modifications and approvals
- Design Flows
- Controls and Data Communications

Task 2.0 - 30% Design Completion - Schematic Design Phase

2.1 Subtask 2.1: Civil and Site Development

Schematic design work will include the following activities:

- Confirm adequacy of existing boundary mapping. Evaluate legal, ownership, permitting and zoning constraints.
- Develop two alternative plant site layouts. This will include activities such as: (1) determine structure size, location, and orientation; (2) layout roadways/truck access corridors and define maneuvering requirements (design vehicle); (3) determine emergency vehicle access requirements. (4) evaluate flood plain impacts and constraints; (5) locate storm water management facilities. (6) locate utility and piping corridors (horizontal and vertical).
- Coordinate with surveyors; coordinate with geotechnical engineer on boring locations; record boring locations on site drawings.

- Develop preliminary erosion control plan for the construction of the project.
- Set preliminary finished floor levels for new structures. Establish preliminary finished grades; overall major surfaces, road profiles, etc. Iterate preliminary surfaces and structures to optimize earthwork if necessary.
- Complete initial opinion of probable construction cost (OPCCC) for site and civil construction.

2.2 Subtask 2.2: Architectural

Schematic design work for architectural will include the following activities:

- Establish architectural theme for exterior of building. Select interior and exterior construction materials for each building. Select roof type, slope, and roof support system for each building.
- Assign code classification for the building.
- Prepare preliminary building layouts (exhibit sketches including plans, sections, and elevations).
- Complete initial opinion of probable construction cost (OPCCC) for architectural construction.

2.3 Subtask 2.3: Structural

Schematic design for structural will include the following activities:

- Coordinate with architectural discipline on the selection of building concepts. Consult with lead process engineer on building/structure layouts.
- Develop building foundation and structure concepts based on schematic building layouts.
- Complete initial opinion of probable construction cost (OPCCC) for structural construction.

2.4 Subtask 2.4: Geotechnical

Schematic design for geotechnical will include the following:

- Complete three (3) 15 feet deep borings and associated laboratory sampling and analysis (see Holt Engineering proposal attached).
- Determine site specific geotechnical conditions for each facility and structure. Develop specific foundation requirements.
- Verify constructability (shoring and bracing requirements, dewatering issues).

2.5 Subtask 2.5: Process Mechanical

Schematic design for process will include the following:

- Determine size/capacity of all unit treatment processes and ancillary systems.
- Prepare process flow diagrams (PFDs).
- Develop process narratives.
- Select and size all major process equipment including pumps. Prepare sizing calculations and obtain review. Establish level of redundancy required for all process equipment.
- Prepare equipment list with sizing for major equipment. Coordinate with the owner on preferences of equipment manufacturer and processes.

- Prepare preliminary exhibits for equipment arrangements.
- Complete initial opinion of probable construction cost (OPCCC) for process mechanical construction.

2.6 Subtask 2.6: HVAC/Plumbing

Schematic design for HVAC and plumbing will include the following:

- Select type of ventilation system to be used in process buildings (inlet air tempered with both inlet and outlet fans, simple exhaust fan system).
- Determine need for space heating.
- Coordinate with the architectural discipline to establish design R-values for all exterior walls.
- Determine options for safety systems.
- Complete initial opinion of probable construction cost (OPCCC) for heating, ventilation, and plumbing construction.

2.7 Subtask 2.7: Instrumentation and Control Systems (I&CS)

Schematic design work for the instrumentation and control will include the following activities:

- Coordinate with the process engineer(s) to prepare a process flow and instrumentation drawing (P&ID) for each treatment process. Information to be included on each P&ID includes at a minimum: Process configuration, flow streams, valve and gate locations (manual and powered), chemical additions points/types, process equipment location/type including packaged control panels and adjustable-speed drives, flow meters and other process control devices.
- Develop equipment/instrument tag numbering, naming, and abbreviation conventions.
- Work with Process Engineer to prepare written operational description of each major process.
- Develop overall control philosophy including local control approach, control system, level of automation, supervisory control.
- Complete initial opinion of probable construction cost (OPCCC) for I&C construction.

2.8 Subtask 2.8: Electrical

Schematic design work for electrical will include the following.

- Prepare preliminary overall one-line diagram for proposed facilities.
- Prepare preliminary load calculations.
- Size electrical panels.
- Determine number of electrical feeds to be provided to facility.
- Determine redundancy requirements for power supplies and power distribution.
- Establish preferred voltages for power distribution and utilization equipment.
- Coordinate with other disciplines (architectural, mechanical) to resolve code compliance issues specific to these disciplines. Develop preliminary schedule of hazardous and corrosive locations.

- Complete initial opinion of probable construction cost (OPCCC) for electrical construction.

2.9 Subtask 2.9: Schematic Design Workshop

Walker Partners will conduct half-day workshop with the Owner's personnel to review the work products from subtasks 2.1 through 2.8 as defined above. The workshop will be held at the Owner's office. Final minutes from the workshop and the work products as defined above will be assembled and submitted to the Owner.

2.10 Deliverables for Task 2

- Submittal of 30% complete drawing set and a table of contents of the specifications prior to the review workshop.
- 30% Design OPCC. Estimate will be a Class 3 estimate as defined by the Association for the Advancement of Cost Engineering (AACE) (AACE International Recommended Practice No. 18R-97 COST ESTIMATE CLASSIFICATION SYSTEM – AS APPLIED IN ENGINEERING, PROCUREMENT, AND CONSTRUCTION FOR THE PROCESS INDUSTRIES). This is a budget level estimate (typically -15% to +30%).
- Meeting minutes from the review workshop.
- Recording of and response to comments on comment review "tracking" form.

Task 3.0 - 60% Percent Design Completion - Design Development Phase

3.1 Subtask 3.1: Civil and Site Development

- Freeze civil design concept. Structures, road, and major site element horizontal locations are finalized. Structure floor/control levels, and finished grades are finalized.
- Define demolition requirements and limits. Define contractor staging, storage, access, and off-site access corridors.
- Prepare preliminary site grading drawings.
- Download survey data to create site-drawing files for final design.
- Set final building and structure elevations.
- Identify corridors for piping and other utilities.
- Show storm water control concepts (swales, curb, and gutter) on the design development drawings.
- Prepare first draft of technical specifications.
- Complete 60% design OPCC for site and civil construction.

3.2 Subtask 3.2: Architectural

- Develop building floor plans and elevations for all buildings.
- Coordinate with I&C and electrical disciplines to size and locate electrical and control equipment.
- Coordinate with the mechanical discipline to select the type of HVAC equipment.
- Coordinate with structural engineer to define the structural design concepts for the facilities.

- Establish applicable codes for all buildings/structures with local code officials and fire marshal. Complete building and fire code analysis. Meet with local code official to review floor plans if required.
- Prepare first draft of technical specifications.
- Complete 60% design OPCC for architectural construction.

3.3 Subtask 3.3: Structural

- Coordinate with geotechnical engineer to establish foundation design criteria for proposed facilities. Review geotechnical report and discuss foundation design approach with geotechnical engineer and senior structural reviewer
- Document structural design concept for each building (room by room) and structure. Finalize materials of construction (cast-in-place versus precast concrete, roof structures, etc).
- Preliminary framing plan for buildings and other structures.
- Prepare preliminary floor plan for all major structures.
- Prepare first draft of technical specifications.
- Complete 60% design OPCC for structural construction.

3.4 Subtask 3.4: Process Mechanical

- Final major equipment sizing calculations.
- Coordinate with I&CS on completion of P&IDs.
- Coordinate with I&CS on development of process control narratives.
- Assemble catalog cuts for all major process equipment. Complete equipment data sheets or equipment list on all major equipment items.
- Coordinate with I&CS in the finalization of P&IDs
- Final ancillary equipment sizing and line sizing calculations.
- Final equipment selection (type, size, weight, arrangement).
- Select piping materials.
- Prepare first draft of technical specifications.
- Complete 60% design OPCC for process mechanical construction.

3.5 Subtask 3.5: HVAC/Plumbing

- Prepare sizing calculations for HVAC equipment based on energy code requirements and selected building construction materials. Prepare HVAC equipment data sheets and cut sheets.
- Create ventilation concept drawing (louver locations, fan locations, type of equipment, air flows).
- Prepare HVAC system block diagrams. Define HVAC system control philosophy.
- Prepare first draft of technical specifications including performance specifications for HVAC and plumbing design by the contractor.
- Complete 60% design OPCC for HVAC/Plumbing construction.

3.6 Subtask 3.6: Instrumentation and Control

- Finalize hand annotated internal reference P&IDs for internal coordination use.

- Prepare preliminary I/O count. Size and locate I/O locations for distributed control systems (DCS). Coordinate I/O rack room sizing with electrical and architectural disciplines.
- Summarize I&C system design philosophy for each major process in a process control narrative. Include a description of the field elements to be used for each application and preliminary set points for major I&C elements. Update/finalize control system block diagram. Finalize typical control diagrams/loop diagrams for each type of control scheme to be used.
- Coordinate with HVAC engineer regarding control system requirements.
- Define control interfaces for all package systems with local controls, including adjustable frequency drives.
- Prepare first draft of technical specifications.
- Complete 60% design OPCC for I&C construction.

3.7 Subtask 3.7: Electrical

- Determine equipment to be powered out of each MCC. Prepare preliminary one-line diagrams for proposed facilities. Coordinate with lead process engineers to size equipment motors.
- Prepare detailed electrical load calculations.
- Size electrical panels and prepare a preliminary layout of the major electrical equipment located at the chemical feed facility. Determine equipment requiring uninterruptable power supplies (UPS) and locations of UPS equipment. Coordinate with I&C discipline to determine space requirements and locations for control equipment. Locate major I/O termination panels, TJB's, and control panels.
- Define/document requirements and concepts for control system.
- Submit load calculations and one-lines. Identify rights-of-way and routing methods for electrical conduit and tray. Lay out duct bank system (major runs/manholes). Locate incoming power service. Coordinate with civil yard piping. Locate manholes and hand holes.
- Prepare preliminary site lighting layout.
- Define hazardous locations (NFPA 820) and document. Define corrosive locations and document.
- Prepare first draft of technical specifications including performance specifications for interior lighting design by the contractor.
- Complete 60% design OPCC for electrical construction.

3.8 Subtask 3.8: Design Development Workshop

Walker Partners will conduct a half-day design workshop to review the work products with the Owner's personnel and other key project staff. The workshop will be held in the Owner's office. Final workshop minutes, documenting the key decisions, and the work products produced through subtasks above will be submitted to the Owner.

3.9 Deliverables for Task 3

- Submittal of 60% complete drawing set and a first draft of the specifications prior to the review workshop.
- 60% Design OPCC. Estimate will be a Class 2 estimate as defined by the Association for the Advancement of Cost Engineering (AACE) (AACE International Recommended Practice No. 18R-97 COST ESTIMATE CLASSIFICATION SYSTEM – AS APPLIED IN ENGINEERING, PROCUREMENT, AND CONSTRUCTION FOR THE PROCESS INDUSTRIES). This is a definitive estimate (typically -5% to +15%).
- Meeting minutes from the review workshop.
- Recording of and response to comments on comment review “tracking” form.

Task 4.0 - 90% and 100% Design Completion - Contract Document Preparation

4.1 Subtask 4.1: Contract Document Completion

- Finalize specification front-end documents, including General Conditions, General Requirements, bidding documents, bonds, and Instruction to Bidders. Owner input is required at this point to determine construction contract requirements and insurance requirements.
- Coordinate with Owner on advertising and bidding process.
- Prepare final construction drawings.
- Prepare final technical specifications.
- Prepare final calculations.
- Each design discipline to complete 90% complete OPCC.
- Complete final checking and coordination review.

4.2 Subtask 4.2 Regulatory Review

- Submit 90% complete drawings and specifications to TCEQ and USACE for review and approval.
- Record and respond to regulatory comments.

4.3 Subtask 4.3: Final Review Workshop

Walker Partner's will conduct a two-hour workshop to conduct a final review of the work products with the Owner's personnel and other key project staff. Final workshop minutes, documenting the key decisions and responses to the Owner's comments will be submitted to the Owner.

4.4 Subtask 4.4.: Incorporation of Final Review Comments

Walker Partners will modify the contract documents to reflect all agreed upon final review comments from the Owner, applicable regulatory agencies and Walker Partners quality control review team. The final documents will then be submitted to the Owner.

4.5 Deliverables for Task 4

- Submittal of 90% complete drawing set and specifications prior to the review workshop.
- 90% Design OPCC. Estimate will be a Class 2 estimate as defined by the Association for the Advancement of Cost Engineering (AACE) (AACE International Recommended Practice No. 18R-97 COST ESTIMATE CLASSIFICATION SYSTEM – AS APPLIED IN ENGINEERING, PROCUREMENT, AND CONSTRUCTION FOR THE PROCESS INDUSTRIES). This is a definitive estimate (typically -5% to + 15%).
- Meeting minutes from the review workshop.
- Recording of and response to comments on comment review “tracking” form.
- Submit final drawings and specifications ready for bidding and for regulatory agency files.
- Submit final OPCC. Estimate will be a Class 1 estimate as defined by the Association for the Advancement of Cost Engineering (AACE) (AACE International Recommended Practice No. 18R-97 COST ESTIMATE CLASSIFICATION SYSTEM – AS APPLIED IN ENGINEERING, PROCUREMENT, AND CONSTRUCTION FOR THE PROCESS INDUSTRIES). This is a definitive estimate (typically -5% to + 15%).

Task 5.0 - 90% and 100% Design Completion - Contract Document Preparation

- 5.1 Walker Partners will assist the Owner in arranging and conducting one pre-bid conference. Walker Partners will assist the Owner in developing the agenda and content of the pre-bid conference. Walker Partners will take minutes or make other provision for documenting the results of the pre-bid conference. Walker Partners will also record all questions and requests for additional information and shall coordinate with the Owner for issuing responses and additional information.
- 5.2 Walker Partners will develop and implement procedures for receiving and answering bidders' questions and requests for additional information. The procedures shall include a log of all significant bidders' questions and requests and the response thereto. Walker Partners will provide technical interpretation of the contract bid documents and will prepare proposed responses to all bidders' questions and requests, which may be in the form of addenda.
- 5.3 Walker Partners shall assist the Owner in issuing all Addenda to the Bid Documents and shall distribute Addenda to the bidders. All Addenda shall be approved by the Owner. The Owner shall pay for the expenses of all Addenda.
- 5.4 Walker Partners shall assist the Owner in opening of bids. Walker Partners shall review all bids and evaluate them for responsiveness and bid amount. Walker Partners will also verify through reasonable investigation the financial and performance history documentation submitted by the low bidder and second low bidder. Walker Partners shall prepare a report of its review and evaluation and include recommendations for award of the contract for construction, or other action as may be appropriate. The Owner shall make the final decision on the award of the contract for construction and the acceptance or rejection of all bids. Walker Partners will provide technical (but not legal) advice in bid protest situations.

5.1 Deliverables for Task 5

- Minutes from Pre-Bid Meeting.
- Completed Addenda to Bid Documents.
- Technical Memorandum of bid evaluation - includes bid tabulation and recommendation of award.
- Conformed document sets.

Assumptions

BASIS OF DESIGN SCOPE AND FEE DEVELOPMENT

The following key assumptions were made in the compilation of this scope of work and the estimation of the level of effort:

1. The design work on this project will be completed in calendar year 2019.
2. The design will be based on the federal, state, and local codes and standards in effect on the effective date of the authorization to proceed. Any changes in these codes may necessitate a change in scope.

3. The design documents will be prepared for a single construction contract.
4. Construction Specifications Institute (CSI)'s MasterFormat, 50 Division specifications will be used as the basis for all technical specifications.
5. No equipment pre-purchase or pre-negotiation will be required.
6. In developing the level of effort, it is anticipated that the design will require 40 to 50 drawings.
The following lists the anticipated design drawings:

GENERAL

- | | | |
|---|-----|---|
| 1 | G-1 | SHEET INDEX |
| 2 | G-2 | KEY PLAN |
| 3 | G-3 | ABBREVIATIONS |
| 4 | G-4 | GENERAL/CIVIL LEGEND AND SYMBOLOGY |
| 5 | G-5 | PROCESS INSTRUMENTAL AND CONTROL LEGEND |
| 6 | G-6 | CONSTRUCTION NOTES |

CIVIL

- | | | |
|----|------|--------------------------------------|
| 7 | C-1 | GENERAL NOTES |
| 8 | C-2 | OVERALL SITE PLAN |
| 9 | C-3 | YARD PIPING AND PARTIAL PLAN |
| 10 | C-4 | CIVIL DETAILS |
| 11 | CM-1 | EROSION & SEDIMENTATION CONTROL PLAN |
| 12 | CZ-1 | STANDARD CIVIL DETAILS |

ARCHITECTURAL

- | | | |
|----|-----|---------------------|
| 13 | A-1 | FLOOR PLAN |
| 14 | A-2 | ROOF PLAN |
| 15 | A-3 | EXTERIOR ELEVATIONS |
| 16 | A-4 | BUILDING SECTIONS |
| 17 | A-5 | WALL SECTIONS |
| 18 | A-6 | DETAILS |

STRUCTURAL

- | | | |
|----|------|-----------------------------|
| 19 | SC-1 | STRUCTURAL GENERAL NOTES |
| 20 | SC-2 | STRUCTURAL PLAN AND SECTION |
| 21 | SC-3 | STRUCTURAL DETAILS I |
| 22 | SC-4 | STRUCTURAL DETAILS II |

HVAC/PLUMBING

- | | | |
|----|-----|--------------------------------------|
| 23 | H-1 | CHEMICAL FEED HVAC/PLUMBING PLAN |
| 24 | H-2 | CHEMICAL FEED HVAC/PLUMBING SECTIONS |
| 25 | H-3 | HVAC/PLUMBING DETAILS |

PROCESS MECHANICAL

- | | | |
|----|-----|-----------------------------|
| 26 | M-1 | SODIUM PERMANGANATE P&ID I |
| 27 | M-2 | SODIUM PERMANGANATE P&ID II |
| 28 | M-3 | SCHEMATIC PROFILE |

29	MA-1	RAW WATER INTAKE PLAN
30	MA-2	RAW WATER INTAKE SECTION & DETAILS
31	MA-3	RAW WATER SCREENS
32	MA-4	RAW WATER SCREEN DETAILS
33	MC-1	CHEMICAL FEED MECHANICAL PLAN
34	MC-2	CHEMICAL FEED MECHANICAL SECTIONS
35	MC-3	CHEMICAL FEED MECHANICAL DETAILS
36	MZ-1	STANDARD MECHANICAL DETAILS I
37	MZ-2	STANDARD MECHANICAL DETAILS II
38	MZ-3	STANDARD MECHANICAL DETAILS III
ELECTRICAL/INSTRUMENTATION AND CONTROL		
39	E-1	LEGEND I
40	E-2	LEGEND II
41	EA-1	RAW WATER INTAKE PLAN
42	EB-1	ONE-LINE DIAGRAM AND EQUIPMENT ELEVATION
43	EP-1	OVERALL SITE PLAN
44	EP-2	CHEMICAL FEED AREA PLAN
45	EY-1	DIAGRAMS I
46	EY-2	DIAGRAMS II
47	EY-3	SCHEDULES
48	EY-4	CONTROL SCHEMATICS I
49	EZ-1	DETAILS
50	EZ-2	DETAILS II

7. The drawings will follow Walker Partners CAE/CAD standards. AutoCad version 2019 will be used to develop the drawings.
8. The OWNER will provide copies of all existing plant construction drawings. The siting, location and design of all new underground utilities will be based on the existing underground utility drawings and related location information provided by the Owner.
9. Any investigation and remediation of possible hazardous waste, asbestos, lead paint or other types of contamination will be conducted as a separate contract.

The following assumptions are technical in nature, and may need to be customized for each project:

Civil/Geotechnical

1. A topographic survey of the existing facilities and site will be required.
2. Legal, easement or plat surveys of the existing site will not be required.
3. Civil sitework plans will be provided only for areas of the site involving significant disturbance to existing grading.
4. Site drawings will only be prepared for those sectors in the plant where new facilities are to be constructed.
5. Due to area of facilities, no site permit is required.

6. Landscaping will be limited to seeding or sodding.
7. The only new roadway work required is in immediate area of new facilities.
8. The geotechnical investigation, including borings, tests, analyses, and recommendations, will be done by others under contract to Walker Partners. Walker Partners role is to review the recommendations and use them in preparing the design.

Structural/Architectural/Geotechnical

1. Conventional spread foundations will be required for all new facilities. Over excavation, preload, piles, or underdrain systems are not required.
2. Uplift due to high groundwater levels, if any, will be addressed with thickened base slabs or pressure relief valves in slabs. No underdrain systems or tension systems will be required.
3. Building sprinkler systems are not required for the new buildings.
4. The building is not required to meet ADA requirements.

Process/ Mechanical

HVAC and Plumbing

1. A potable water fire sprinkler system will not be required for the building.

Electrical and Instrumentation & Controls Systems

1. The new instrumentation and control system will be based on the use of programmable logic controllers. Monitoring of the plant status will be by a commercially available PC based software package and will include plant influent and effluent characteristics and performance trends.
2. Walker Partners will not perform the work of developing process control system software for both the PLC and the PC interface.
3. No backup electrical power source is required in the project.
4. The existing secondary or emergency electrical power supply system is adequate to handle any new loads. No additional secondary or emergency power source will be provided.
5. Performance specifications will be used for interior lighting requiring detailed design by the contractor and vendor.

Supplemental Services

1. Topographic Survey

Walker Partners will perform a topographic survey of an approximate 100' x 400' area north of the existing electrical buildings at the raw water intake site. The survey will be based on the Texas State Plane Coordinate System, Central Zone, North American datum of 1983 and North American Vertical datum of 1988. Two control points will be placed on site for construction. Survey data points will be collected on a 50' x 50' grid and at grade breaks. The topographic survey drawing will include one-foot interval contours, and all visible improvements and utilities.

2. Tree Survey

A tree survey will be performed within the approximate 100' x 400' area. This survey will include all trees 6 inches in diameter and larger. A numbered tag will be placed on each tree with corresponding location, number, diameter and species shown on the topographic survey drawing.

3. Geotechnical Borings and Recommendations

See Attached Proposal from Holt Engineering.

Additional Services

The following Additional Services are not included in the Scope of Services and will not be performed unless specifically authorized by the Owner:

1. Underwater diving and inspection services.
2. In-pipe surveys including CCTV inspection.
3. Performing bench-scale or outside laboratory water quality studies.
4. Preparation of applications and supporting documents for private or governmental grants, loans, or advances in connection with the Project; preparation or review of environmental assessments and impact statements; review and evaluation of the effects on the design requirements for the Project of any such statements and documents prepared by others; and assistance in obtaining approvals of authorities having jurisdiction over the anticipated environmental impact of the Project.
5. Services to make measured drawings of or to investigate existing conditions or facilities, or to verify the accuracy of drawings or other information furnished by Owner or others.
6. Services required due to delays or other causes beyond Engineer's control.
7. Undertaking investigations and studies including, but not limited to, detailed consideration of operations, maintenance, and overhead expenses; the preparation of feasibility studies, cash flow and economic evaluations, rate schedules, and appraisals; assistance in obtaining financing for the Project; evaluating processes available for licensing, and assisting Owner in obtaining process licensing; detailed quantity surveys of materials, equipment, and labor; and audits or inventories required in connection with construction performed by Owner.
8. Other services performed or furnished by Engineer not otherwise provided for in this Agreement.

Attachments

Subconsultant Proposals

Casa Bella Architects
Encotech Engineering Consultants
Holt Engineering
JRSA Engineering

ADDENDUM TO EXHIBIT C
Work Schedule

		Duration (weeks)
Design Phase	Preliminary Design (30%)	8
	Detailed Design (90%)	12
	Final Design/Contract Documents	6
Bid Phase	Bid Advertisement	3
	Bid/Proposal Opening and Evaluation	1
	Project Award and Notice to Proceed	2

ADDENDUM TO EXHIBIT D
Fee Schedule

Attached Behind This Page

Exhibit D

Fee Schedule

City of Round Rock Zebra Mussel Control Facility Design		Project Fee Summary	
Lake Georgetown Raw Water Intake and Raw Water Transmission Pipeline 3/28/2019	includes sub markup of 5%	Basic Effort	\$ 247,588
Detailed Overall Consultant Cost Breakdown	includes sub markup of 5%	Supplemental	\$ 19,371
		Total Effort	\$ 266,958

		Total Labor Effort	Total Expense Effort	Casa Bella	Encotech	JRSA	Holt	Total Sub Effort	Total Effort	Assumptions
Basic Services										
Task 1 - Project Management		\$ 13,020	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ 13,020	
Task 2 - 30 Percent Design Completion - Schematic Design Phase		\$ 33,985	\$ -	\$ 6,218	\$ 8,000	\$ 8,000	\$ -	\$ 22,218	\$ 56,203	
Task 3 - 60% Deign Completon - Design Development Phase		\$ 32,700	\$ -	\$ 7,218	\$ 13,500	\$ 10,000	\$ -	\$ 30,718	\$ 63,418	
Task 4 - 90% and 100% Design Completion - Contract Document Preparation		\$ 43,425	\$ -	\$ 19,295	\$ 19,000	\$ 13,000	\$ -	\$ 51,295	\$ 94,720	
Task 5 - Bid-Award- Execution of Contract Services		\$ 7,560	\$ -	\$ -	\$ 2,500	\$ 4,600	\$ -	\$ 7,100	\$ 14,660	
Supplemental Services										
Supplemental Services		\$ 15,050	\$ -	\$ -	\$ -	\$ -	\$ 4,115	\$ 4,115	\$ 19,165	
Topographic Survey		\$ 9,050		\$ -	\$ -	\$ -	\$ -	\$ -	\$ 9,050	
Tree Survey		\$ 6,000		\$ -	\$ -	\$ -	\$ -	\$ -	\$ 6,000	
Geotechnical Borings							\$ 4,115	\$ 4,115	\$ 4,115	
			\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	
Totals		\$ 145,740	\$ -	\$ 32,731	\$ 43,000	\$ 35,600	\$ 4,115	\$ 115,446	\$ 261,186	

5% markup \$ 1,637 \$ 2,150 \$ 1,780 \$ 206 \$ 5,772

Grand Total \$ 266,958

City of Round Rock Zebra Mussel Control Facility Design																				
Lake Georgetown Raw Water Intake and Raw Water Transmission Pipeline																				
3/29/2019																				
Detailed Overall Consultant Cost Breakdown																				
Task	Employee																			
	Project Role	Principal	Project Manager	Senior Project Engineer	Senior Design Engineer	Project Engineer Position	Support Staff II	Technician V	Total Hours	Total Labor Effort	Total Expense Effort	Casa Bella	Encotech	JRSA	Holt		Total Sub Effort	Total Effort	Assumptions	
Basic Services																				
	Task 1 - Project Management	0	18	6	36	8	4	0	72	\$ 13,020	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ 13,020		
1.1	Project Workplan				4	4			8	\$ 1,040	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ 1,040		
1.2	Monthly Status Report and Invoicing		6		8		2		16	\$ 3,100	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ 3,100		
1.3	Monthly Progress Conference Calls		6		10				16	\$ 3,240	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ 3,240		
1.4	Quality Control/Quality Assurance		2	6	4				12	\$ 2,380	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ 2,380		
1.5	Document Controls and Project Close-out		2		4		2		8	\$ 1,340	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ 1,340		
1.6	Project Kickoff Meeting		2		6	4			12	\$ 1,920	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ 1,920		
									0	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -		
	Task 2 - 30 Percent Design Completion - Schematic Design Phase	1	20	16	52	64	10	82	245	\$ 33,985	\$ -	\$ 6,218	\$ 8,000	\$ 8,000	\$ -	\$ -	\$ 22,218	\$ 56,203		
2.1 - 2.8	30% Design 2.1 to 2.8		16	16	40	60	8	80	220	\$ 29,880	\$ -	\$ 6,218	\$ 8,000	\$ 8,000	\$ -	\$ -	\$ 22,218	\$ 52,098		
2.9	30% Design Review Workshop	1	4		12	4	2	2	25	\$ 4,105	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ 4,105		
									0	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -		
	Task 3 - 60% Deign Completon - Design Development Phase	0	18	10	44	60	16	100	248	\$ 32,700	\$ -	\$ 7,218	\$ 13,500	\$ 10,000	\$ -	\$ -	\$ 30,718	\$ 63,418		
3.1 - 3.7	60% Design 3.1 to 3.7		16	8	40	60	16	100	240	\$ 31,120	\$ -	\$ 7,218	\$ 13,500	\$ 10,000	\$ -	\$ -	\$ 30,718	\$ 61,838		
3.8	60 % Design Workshop		2	2	4				8	\$ 1,580	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ 1,580		
									0	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -		
	Task 4 - 90% and 100% Design Completion - Contract Document Preparation	1	16	24	46	80	32	140	339	43,425	0	19,295	19,000	13,000	0	0	51,295	94,720		
4.1	Contract Documents Completion		8	16	20	40	16	100	200	\$ 25,200	\$ -	\$ 19,295	\$ 13,000	\$ 10,000	\$ -	\$ -	\$ 42,295	\$ 67,495		
4.2	Regulatory Reviews		4	4	8				16	\$ 3,160	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ 3,160		
4.3	Final Review Workshop	1	2	4	8				15	\$ 2,905	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ 2,905		
4.4	Completion of Bid-Ready Documents		2		10	40	16	40	108	\$ 12,160	\$ -	\$ -	\$ 6,000	\$ 3,000	\$ -	\$ -	\$ 9,000	\$ 21,160		
	Task 5 - Bid-Award- Execution of Contract Services	0	6	0	22	16	4	4	52	\$ 7,560	\$ -	\$ -	\$ 2,500	\$ 4,600	\$ -	\$ -	\$ 7,100	\$ 14,660		
5.1	Pre-bid Assistance		2		8	2	4		16	\$ 2,320	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ 2,320		
5.2	Bidder's Questions and Clarifications				4	8			12	\$ 1,480	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ 1,480		
5.3	Addenda		2		8	4		4	18	\$ 2,660	\$ -	\$ -	\$ 2,500	\$ 4,600	\$ -	\$ -	\$ 7,100	\$ 9,760		
5.4	Opening and Evaluating Bids		2		2	2			6	\$ 1,100	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ 1,100		
									0	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -		
									0	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -		
									0	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -		
									0	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -		
									0	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -		
									0	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -		
Supplemental Services																				
	Supplemental Services	0	0	0	0	0	0	0	0	\$ 15,050	\$ -	\$ -	\$ -	\$ -	\$ 4,115	\$ -	\$ 4,115	\$ 19,165		
1	Topographic Survey								0	\$ 9,050		\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ 9,050		
2	Tree Survey								0	\$ 6,000		\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ 6,000		
3	Geotechnical Borings														\$ 4,115		\$ 4,115	\$ 4,115		
4									0	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -		
	Grand Total									\$ 145,740	\$ -	\$ 32,731	\$ 43,000	\$ 35,600	\$ 4,115	\$ -	\$ 115,446	\$ 261,186		
	Ttoal Hours per category	2	78	56	200	228	66	326												
									956		5% markup	\$ 1,637	\$ 2,150	\$ 1,780	\$ 206			\$ 5,772		
																	Grand Total	\$ 266,958		

March 28, 2019

Mr. Joe Jenkins, P.E.
Walker Partners
804 Las Cimas Pkwy. Suite 150
Austin, Texas 78746



**RE: Lake Georgetown Zebra Mussel Control Chemical Feed System Project
Professional Design Services Proposal – Revision #02**

Dear Mr. Jenkins,

We appreciate the opportunity to submit this proposal to provide professional design services for the above referenced project.

SCOPE OF WORK

CasaBella Architects will work, in coordination with Walker Partners, to provide architectural design services for construction of a new Chemical Feed Building, approximately 3000sf, at the existing Lake Georgetown Water Treatment Plant. It is our understanding that CasaBella Architects will provide the following services:

- Task 2.0 - Schematic Design (SD) documents at 30%
- Task 3.0 - Design Development (DD) documents at 60%
- Task 4.0 - Construction Documents (CD) at 90% and 100%
- Opinion of Probable Cost at each of the above phases

EXCLUSIONS

The following services are excluded from our fee:

- Construction Administration (CA) Services
- Project Closeout and Warranty phase services
- Detailed Cost Estimates
- Acoustical Design
- Automatic Fire Suppression System Design
- Permitting Fees (ie: City, TDLR)
- Artist's Rendering of Building

FEE

Our office will provide the above services for a lump-sum fee amount of \$32,731.00. The fee amount is broken down in separate phases as follows:

Phase	Fee
30% - SD documents	\$6,218.00
60% - DD documents	\$7,218.00
90%- 100% - CD documents	\$19,295.00
Bidding	n/a
CA services	n/a
Warranty	<u>n/a</u>
TOTAL FEE	\$32,731.00

Our fee will be invoiced monthly, based on percentage of completion of work. The above fee does not include reproduction of construction drawings and costs for permitting, TDLR plan review and inspection fees. All reimbursable expenses will be invoiced at cost plus a 10% handling fee.

SCHEDULE OF HOURLY RATES

Authorized additional services will be billed at the following hourly rates:

Project Principal	\$275.00/hour
Project Architect	\$190.00/hour
Intern	\$125.00/hour

Please do not hesitate to give us a call if you have any questions or need additional information. Thank you very much for considering our proposal and look forward to working with you on this project.

With warmest regards,

A handwritten signature in black ink, consisting of a large, stylized 'J' followed by a series of loops and a final flourish.

Jaime F. Palomo, AIA
Vice-President

cc. file

March 27, 2019

Joe Jenkins, PE
Senior Client Manager, Walker Partners
804 Las Cimas Pkwy., Suite 150
Austin, TX 78747

P: (512) 382-0021
E: jjenkins@walkerpartners.com

Re: CORR Lake Georgetown Zebra Mussel Control—Round Rock, TX
Structural, Mechanical, and Plumbing Engineering and Design Services-**revised (2)**
Chemical Storage Building

Dear Joe,

Encotech Engineering Consultants, the “Engineer,” is pleased to submit this proposal for services on the above referenced project to Walker Partners, the “Client.”

SCOPE

CORR Lake Georgetown Zebra Mussel Control, the “Project,” consists of a new 3,150 sf chemical storage facility located at Lake Georgetown in Round Rock, TX. The construction of the Project is estimated to cost \$1,200,000. The estimated Project schedule includes six (6) months for design and bidding.

Building Information:

New Chemical Storage Building

- Building square-footage – approximately 3,150 sf.
- New enclosed single-story structural steel and reinforced masonry structure.
- Shallow perimeter containment concrete curbs and two (2) sump pits without pumps.
- Eye wash station (self-contained type).
- Mechanical exhaust for chemical storage room, and rooftop air conditioning unit for make-up air.
- Slab is assumed to be a concrete slab placed on a prepared building pad with principal column loads likely supported by widened grade beams or footings.

BASIC SERVICES

Basic Services include engineering and design services to prepare design documents. **Basic Services** shall include:

1. Coordination with the Client to determine project requirements.
2. Review of the Client's drawings and advise the Client on any engineering-related issues and requirements.
3. Perform engineering calculations and design.
4. Perform OPC (Opinion of Probable Cost of Construction) for the structural, mechanical and plumbing scope of work.
5. Attend Project Kickoff Meeting and three (3) Design Review Workshops (1 in each design phase).
6. Mechanical Design shall include:
 - a. Code-minimum Exhaust load analysis for a chemical storage room, sizing and scheduling of HVAC equipment (maximum two (2) roof-mounted exhaust fans to serve a single zone; one (1) single-zone roof-mounted air conditioning unit with electric heat for the purposes of conditioned make-up air; and maximum six (6) electric unit heaters).
 - b. Coordination with Electrical Design (by others).
 - c. Design of exposed interior ductwork. Exterior ductwork is not anticipated.
 - d. Design and location of air registers, grills and temperature sensors.
 - e. HVAC details as necessary.
7. Structural Design shall include:

- a. Perform a review of the geotechnical report to coordinate the proper building pad and foundation design.
 - b. Design and prepare foundation plans and associated details.
 - c. Design and prepare framing plans and associated details.
 - d. Design and prepare lateral resisting system drawings and associated details.
8. Make plan revisions as required by the local jurisdiction during the TCEQ and USACE building plan review.
 9. Provide the following deliverables:
 - a. For the Schematic Design Phase, a narrative describing basic structural and MEP systems will be prepared as a basis of design and for generating an Opinion of Probable Cost at that phase.
 - b. Drawings in PDF format for the phases described below.
 - c. Structural Specifications for inclusion in a Project Manual in Word or PDF format. Mechanical and Plumbing Specifications as notes on drawings.

PHASE	DRAWINGS	SPECIFICATIONS	PERMITTED USE
Schematic Design	Narrative	Narrative	Coordination & Pricing
Design Development	100%	Outline	Coordination & Pricing
Construction Drawings and Specifications	90%	Short-form	Coordination & Pricing
	100%	Short-form	Bidding & Construction
Bidding and Negotiations	Addenda	Addenda	Bidding & Construction

ASSUMPTIONS AND CONDITIONS

The scope of work services presented herein and associated fee amounts are based upon the Engineer's understanding of the proposed development. Changes in the project that affect the underlying contract assumptions may impact the required professional service fee.

Accordingly, the Engineer wishes to inform the Client and/or Owner that this proposal is based on the following documents, assumptions and conditions:

1. Email and associated attachments from Joe Jenkins (Walker Partners) to Scott Francis (Encotech) dated 2/19/19.
2. Compensation shall be adjusted upwards if the building floor area increases.
3. We understand that the project will not be a LEED project and will have no design considerations towards achieving
4. Compensation is based on a soil-supported shallow foundation system and a masonry with structural steel super-structure framing system. The fee shall be adjusted upwards if the Geotechnical Engineer determines that soil conditions require a different foundation system such as a suspended foundation with piers.
5. Structural model and deliverables will be prepared in Revit to AIA Level of Development 300.
6. MEP drawings will be prepared in AutoCAD or Revit.
7. Mechanical Exhaust shall not require any specialty filtration (Carbon, Hepa, etc) or scrubbers.
8. There will be no occupied spaces or restrooms, and the entire facility will be defined as a chemical storage room.
9. Floor drains will not be incorporated for the facility given the nature of the chemicals being stored.
10. Rainwater shall be discharged via Architectural downspouts to grade level only. Roof drains and/or below-grade tie-in for rainwater shall not be required.
11. Since Plumbing is not required for the site, the eye wash station is assumed to be self-contained type as to not trigger the need for Plumbing Design documents for a single fixture.

COMPENSATION

The lump sum fee to provide Basic and Limited Construction Services shall be:

PHASE DESCRIPTION	MEP	STRUCTURAL
Schematic Design	\$1,500.00	\$6,500.00
Design Development	\$2,500.00	\$11,000.00
90% Construction Drawings and Specifications	\$2,500.00	\$10,500.00
100% Construction Drawings and Specifications	\$1,000.00	\$5,000.00
Bidding and Negotiations	\$500.00	\$2,000.00
TOTAL	\$8,000.00	\$35,000.00

Compensation is based on awarding the Engineer both Structural and MEP services and will be adjusted if only one discipline is awarded to the Engineer.

REIMBURSABLE

Reimbursable expenses shall be invoiced at direct cost. These include, but are not limited to:

1. Reproduction of documents
2. Expedited shipping, mailing, courier expenses

ADDITIONAL SERVICES

It is recognized that certain elements within the scope of engineering work cannot be accurately predetermined or controlled entirely by the Engineer. Therefore, such engineering work will be performed as Additional Services. Refer to Attachment B for Hourly Rates related to Additional Services effort.

The Engineer will perform Additional Services only with written approval and agreement by the Client. Such work may include but not limited to:

1. Major revisions to work product once initially approved by the Client/Owner.
2. Redesign and drawing revisions due to change of scope after the issuance of Construction Drawings and Specifications.
3. Changes or increases in Project Scope or Scope of Engineering Services resulting from project Assumptions and Conditions as defined in the proposal which prove to be incorrect.
4. Any additional work not specifically included in this Scope of Services.
5. Work required by the enactment or revisions of codes, laws or regulations after the preparation of documents.
6. Value Engineering Services.
7. Building Commissioning.
8. Design for LEED or other sustainability certification.
9. Energy Modeling.
10. Consultation, review and design associated with non-structural elements and their attachments or redesigning previously engineered elements.
11. Consultation, review or design associated with landscape or site structures not integral with the building.
12. Consultation and review of structure members designed by others.
13. Work associated with special purpose structural systems such as: swimming pools, rain water collection systems, cisterns and storage tanks.
14. Natural Gas piping load analysis, sizing, layout and riser diagrams as a source of heating, if applicable.

EXCLUSIONS

Services that are not provided for in this Agreement specifically include, but are not limited to:

1. Means and Methods of Construction.
2. Other services or expenses which may become necessary for the completion of this project which are not reasonably anticipatable at this time.
3. Civil Engineer shall design all site utilities. The Engineer's plumbing scope shall be limited to the building interior only and five feet beyond.
4. Fire Sprinkler and Fire Alarm System Design are outside the scope of this proposal. Electrical Design shall be by others and is not included.
5. Plumbing scope is not required based on the assumptions listed above in "Assumptions and Conditions".
6. Pre-design site visits are not anticipated for Mechanical.
7. Design of Sand Traps, Septic Systems, and Lift Stations.
8. The engineering design and construction documents associated with exterior site work such as retaining walls, paving, drainage structures, walks, utility structures, flagpoles and light pole foundations, etc., outside the building lines is outside of Encotech's scope of structural services. These items are considered to be additional services to be negotiated.
9. The engineering design and construction documents associated with miscellaneous metals normally specified by the Architect in Division 5 of the specifications is outside of Encotech's scope of structural services.
10. The engineering design and construction documents associated with hangers or other items specified in the mechanical and electrical sections is outside of Encotech's scope of structural services.
11. Detailing specific to waterproofing, dampproofing, and drainage of the concrete foundation beams/walls is outside of Encotech's scope of structural services. Encotech will graphically indicate these items as appropriate and designate these items as work that is specified elsewhere in the construction documents.
12. Detailed quantity takes-offs or estimates of construction cost are outside of Encotech's scope of services.

CLIENT PROVIDED SERVICES

1. The Client/Owner shall furnish the Engineer with full information as to the Client/Owner project requirements including special considerations or special services needed, and also to make available all project pertinent data.
2. Electronic backgrounds shall be provided to the Engineer in AutoCAD (DWG or DXF) format or Revit (RVT) format. Backgrounds should be drawn in actual size and should not be scaled up or down. Backgrounds should include the Client's Title Block and its required fonts and logos. Architectural backgrounds should include building plans, building sections, roof plan, RCP including patios/courtyards, wall sections, and awning/overhead structure details if applicable.
3. Client shall provide building and specialty equipment cut sheets with utility requirements (voltage, amperage, phase, watts, GPM, gas connection, water connection, waste connection, BTUs, heat generation, etc.) prior to commencing design.
4. Client shall provide reflected ceiling plan layout in AutoCAD (DWG or DXF) format or Revit (RVT) format.
5. Client shall provide Engineer with a full set of progress drawings in PDF format at the completion of each design phase.
6. A site-specific geotechnical report with investigation and recommendations suitable for the construction of buildings.
7. The Client shall be responsible for final printing and distribution of Construction Drawings and Specifications.

RESPONSIBILITY OF OTHERS

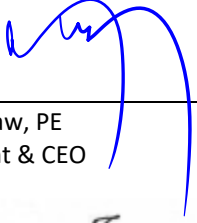
In accordance with accepted professional practice it is the responsibility of the Owner to provide the design team with complete and accurate information concerning known existing physical and legal conditions of the site/building that are beyond the scope of the professional engineering services described in this document. Certain unusual or unforeseeable conditions may materially alter the scope of the project in a manner not provided for in this contract.

If the project is cancelled prior to completion of project design, then the Engineer shall be paid for percentage of work completed up to the date of cancellation.

Please call us if you have any questions. Thank you for the opportunity to work with you.


Sincerely,

Agreed and Accepted by Authorized Corporate Officer of:




Ali Khataw, PE
President & CEO

Legal Entity Name



Scott Francis, PE
Vice President Structural Engineering

Signature



Patrick Morrissey, PE
Associate Principal

Print Name

Title

Date

TERMS & CONDITIONS

The Engineer shall perform the services outlined in the proposal / agreement for the stated fee arrangement. The terms and conditions shall be as follows:

Dispute Resolution

Any claims or disputes made during design, construction, or post-construction between the Client and the Engineer shall be submitted to non-binding mediation. The Client and the Engineer agree to include a similar mediation agreement with all contractors, sub-contractors, suppliers, and fabricators, thereby providing for mediation as the primary method for dispute resolution between all parties.

Billings/Payments

Invoices for the Engineer's services shall be submitted, at the Engineer's option, either upon completion of such services, or on a monthly basis. Invoices are due upon receipt. Invoices shall be payable within 30 days after the invoice date. If the invoice is not paid within 30 days, the Engineer may, without waiving any claim or right against the Client, and without liability whatsoever to the Client, terminate the performance of services. Payment to the Engineer shall be made within two weeks after receiving payment from the Owner.

Late Payments

Accounts unpaid 60 days after the invoice date may be subject to a monthly service charge of 1.5% (or the legal rate) on the then unpaid balance. In the event any portion or all of an account remains unpaid 90 days after billing, the Client shall pay all costs of collection, including reasonable attorney's fees.

Indemnification

The Client shall, to the fullest extent permitted by law, indemnify and hold harmless the Engineer, his or her officers, directors, employees, agents and sub-consultants from and against all damage, liability and cost, including reasonable attorney's fees and defense costs, arising out of or in any way connected to existing conditions of the project or with the performance by any of the parties named of the services under this agreement, excepting only those damages, liabilities or costs attributable to the sole negligence or willful misconduct of the Engineer.

Certifications, Guarantees, and Warranties

The Engineer shall not be required to execute any document that would result in their certifying, guaranteeing or warranting the existence of conditions whose existence the Engineer cannot ascertain.

Limitation of Liability

In recognition of the relative risks, rewards and benefits of the project to both the Client and the Engineer, the risks have been allocated such that the Client agrees that, to the fullest extent permitted by law, the Engineer's total liability to the Client for any and all injuries, claims, losses, expenses, damages or claim expenses immediately arising out of this agreement from any cause or causes, shall not exceed the amount of our design fees. Such Causes include, but are not limited to, the Engineer's negligence, errors, omissions, strict liability, breach of contract or breach of warranty.

Betterment

If, due to the Engineer's negligence, a required item or component of the Project is omitted from the Engineer's construction document, the Engineer shall not be responsible for paying the cost required to add such item or component to the extent that such item or component would have been required and included in the original construction documents. In no event will the Engineer be responsible for any cost or expense that provides betterment or upgrades or enhances the value of the Project.

Termination of Services

This agreement may be terminated by the Client or the Engineer should the other fail to perform its obligations there under. In the event of termination, the Client shall pay the Engineer for all the services rendered to the date of termination, all reimbursable expenses and reimbursable termination expenses.

HOURLY RATES

All Additional Services shall be conducted on an hourly rate basis as outlined below. Rates are valid for twelve months from the date of the proposal.

EMPLOYEE CLASSIFICATION	HOURLY RATE
Principal	\$300.00
Project Engineer VI	\$280.00
Project Engineer V	\$240.00
Project Engineer IV	\$220.00
Project Engineer III	\$195.00
Project Engineer II	\$170.00
Project Engineer I	\$160.00
Project Manager II	\$160.00
Project Manager I	\$135.00
Graduate Engineer V	\$125.00
Graduate Engineer IV	\$115.00
Graduate Engineer III	\$110.00
Graduate Engineer II	\$105.00
Graduate Engineer I	\$100.00
CAD Designer III	\$120.00
CAD Designer II	\$100.00
CAD Designer I	\$80.00
Administrative I	\$70.00

JRSA ENGINEERING
CONSULTING ELECTRICAL ENGINEERS
6101 West Courtyard Dr., Bldg. 1, Suite 200 ■ Austin, Texas 78730
512.452.8789

March 28, 2019

Joseph Jenkins, P.E.
Walker Partners
804 Las Cimas Pkwy. Suite 150
Austin, TX 78746

Re: Proposal for Engineering Services
City of Round Rock: Lake Georgetown Zebra Mussel Control

Dear Mr. Jenkins:

JRSA proposes to furnish the engineering services necessary for the electrical, instrumentation, and controls design of the referenced project, for a lump sum of \$31,000.00. In addition to providing the engineering and design necessary to bid the project, our fee will include the following:

- One pdf set of the electrical, instrumentation & controls, and SCADA plans (approximately 20 sheets).
- One pdf set of the electrical, instrumentation & controls, and SCADA specifications.
- Designing controls for the chemical injection system, including provisions for solenoid valves installed at the RWI pumps, a leak detection system for the injection pipe, controls for the chemical pumps, transfer pump, and storage tanks, connection to the existing SCADA system at the RWI pump station.
- Designing communication from the injection site at the RWI pumps to the SCADA system.
- Designing power to the chemical pump building.
- Coordinating with Walker Partners to design process & instrumentation diagrams (P&IDs) for the system.
- Providing power, lighting, and grounding design for the chemical building.
- Assisting in the bid process, if required.

We can have the drawings and specifications ready for bid in no more than six weeks after receipt of the necessary information, including AutoCAD site plans.

Design phase services will be billed in a lump sum amount, upon submission of the bid drawings and specifications.

In addition Design & Bid Phase services, we can also provide Construction Phase services; including, reviewing submittals and O&M manuals, visiting the site to monitor construction progress, performing a final inspection, and preparing an as-built drawing set. Our fee for this portion of the project will be a lump sum amount of \$4,600.00.

Invoices for our Construction Phase services will be sent out on a monthly basis. Payment for all invoices is due within 90 days.

JRSA ENGINEERING

CONSULTING ELECTRICAL ENGINEERS

6101 West Courtyard Dr., Bldg. 1, Suite 200 ■ Austin, Texas 78730
512.452.8789

Please note that changes in the scope of the project from what is stated here in this proposal may result in an increase in our fee.

Notification of all submittal deadlines must be given two weeks in advance, at minimum.

We appreciate this opportunity to work with you and hope to hear from you soon. If you are in agreement with the terms of this proposal please sign in the allotted space and return a copy to us.

Sincerely,

JRSA Engineering



Elizabeth Segner-Zarate, P.E.
President

Accepted By: _____

For: Walker Partners

6 March 2019

Walker Partners
Attn: Mr. Bryce Canady, P.E.
804 Las Cimas Parkway, Suite 150
Austin, Texas 78746

Re: Round Rock Raw Water Intake (RWI)
Cedar Breaks Park Road
Round Rock, Texas

Dear Mr. Canady:

As per your request we are providing a cost estimate for a Geotechnical Investigation for the above referenced project. The purpose of the investigation is to determine subsurface soil conditions at the site and obtain samples for laboratory testing in order to provide foundation recommendations for the proposed raw water intake site. It is our understanding two new chemical containment buildings are planned for the existing raw water intake site.

We plan to investigate the site by drilling, logging and sampling 3 soil borings to a depth of 15 feet each. The number and depth of the borings will be dependent on actual soil conditions encountered. If unusual or varying soil conditions are encountered then the borings may need to be deeper or additional borings may need to be drilled. Laboratory testing will be performed on selected samples and data obtained will be used to determine the engineering characteristics of the soil. Our engineering report will include boring logs, a boring location plan, laboratory test results, description of soil conditions and foundation recommendations for the proposed chemical containment buildings.

The cost for the above work will be on the order of \$4,115.00. An itemized cost estimate is attached. This cost is based on the site being accessible for our drill rig. If these costs are satisfactory, please sign and return a copy to us for our files.

It should be noted the Texas ONE-CALL system for locating underground utilities will not typically mark utilities on private property. Holt will make a reasonable effort to locate underground utilities; however, if a utility should be breached it is the property owner's responsibility for repairs.

We appreciate the opportunity to offer our services. If we can answer any questions concerning the above, please do not hesitate to call.

Sincerely,



Travis H. Bryant, P.E.
Project Engineer
Holt Engineering, Inc.
TBPE Firm Registration No. F-430

**GEOTECHNICAL INVESTIGATION
FOR
ROUND ROCK RAW WATER INTAKE
CEDAR BREAKS PARK ROAD
ROUND ROCK, TEXAS**

COST ESTIMATE

1.	Drilling Coordinator Time to Layout Holes/ONE-CALL/Check Locates: \$	450.00
2.	Rig Mobilization:	550.00
3.	Drilling, Logging, and Sampling: 3 Soil Borings @ 15 Ft/Ea.; 45 L.F. @ \$17.00/Ft.....	765.00
4.	Laboratory Testing (Atterberg Limits, Unconfined Compression Tests, Minus #200 Sieve Tests, Moisture Contents, etc.)	550.00
5.	Engineering Report with Foundation Recommendations	1,800.00
TOTAL ESTIMATED COST		\$ 4,115.00

CLIENT INFORMATION: (Responsible Billing Party)

This information must be filled out before the geotechnical investigation can be scheduled. The undersigned agrees to the above scope of work and following conditions and is responsible for payment.

Company Name (if applicable): _____ Date: _____
 Printed Name/Title: _____ Signature: _____
 Mailing Address: _____
 _____ Email: _____
 Phone: _____ Fax: _____

Please let us know if you would like an electronic copy (pdf file) of the report sent to the Architect, Structural Engineer, Contractor, etc. Thank you.

(1) _____
 (2) _____
 (3) _____
 Name _____ Email Address (if known) _____

THE ATTACHED COST ESTIMATE IS BASED ON THE FOLLOWING CONDITIONS:

- Holt will make a reasonable effort to avoid underground utilities; however, if a utility should be breached it is the property owner's responsibility for repairs.

2. Our estimate is based on the site being accessible for our truck mounted drill rig and right-of-entry to be obtained by others.
3. The attached cost estimate will change based on changes or alterations to the scope of services. Additional costs may be incurred for engineering consultation with the Architect, Structural Engineer, and/or Contractor.
4. The cost estimates included herein are guaranteed for 90 days from the date of this proposal.
5. Payment is due within 30 days Net from date of invoice. Clients with outstanding balances past 30 days are subject to a late fee. It is the client's responsibility to report billing errors immediately upon receipt. Holt Engineering, Inc. is not responsible for billing errors not reported within 30 days of billing.
6. This is an agreement between the parties, whose names appear above, and no one else. Further, this agreement is not intended for any other person's benefit. The parties agree that there are no express or implied warranties applicable to the professional services provided under this agreement; instead, performance under this agreement will be measured by the standards of care applicable to licensed professional engineers in Texas.

We appreciate the opportunity to submit this proposal and look forward to working with you on this project. Please call us if we can be of any additional assistance.