

To: City Council
From: Rodney Middlebrooks
Department: Water, Sewer, Gas & Electric Department
Date: 06/10/2025
Subject: Approval for Jacks Creek Wastewater Treatment Engineering



Budget Account/Project Name: Jacks Creek Wastewater Treatment Expansion

Funding Source:

Budget Allocation: \$0.00

Budget Available: \$0.00

Requested Expense: \$1,619,665.00 **Company of Record:** Wiedeman and Singleton, Inc.

Description:

Staff recommends approval to proceed with engineering services encompassing design, permitting, and bidding for the proposed expansion of the Jacks Creek Wastewater Treatment Plant to a capacity of 6.8 MGD.

Background: The Jacks Creek Wastewater Treatment Plant is currently permitted for a Maximum Monthly Flow (MMF) of 3.4 million gallons per day (MGD). In 2022, the City was granted a Waste Load Allocation (WLA) by the Georgia Environmental Protection Division (EPD) for planning purposes, authorizing treated effluent discharge into Jacks Creek from the facility. The City has submitted its Environmental Information Document (EID) and its Design Development Report (DDR). As such, the next major step in securing additional treatment system capacity is to begin detailed design and permitting, which includes preparation of engineering drawings and technical specifications for the subsequent solicitation of bids from general contractors.

Attachment(s):

Wiedeman & Singleton Proposal

WIEDEMAN AND SINGLETON, INC.

CIVIL AND ENVIRONMENTAL ENGINEERS

TROY BEGAN
PETER JOHNS3091 GOVERNORS LAKE DRIVE
SUITE 410
NORCROSS, GEORGIA 30071PETER SNYDER
HAROLD WIEDEMAN131 EAST MAIN STREET
SUITE 303
ROCK HILL, SOUTH CAROLINA 29730

WWW.WIEDEMAN.COM

May 30, 2025

Sent Via EmailMr. Rodney Middlebrooks
Water, Sewer, Gas & Electric Director
City of Monroe
215 N. Broad Street
Monroe, Georgia 30655Re: Proposal for Professional
Engineering Services –
Jacks Creek WPCP Expansion
to 6.8 MGD

Dear Mr. Middlebrooks:

We appreciate the opportunity to submit the attached proposal for professional engineering services to assist the City of Monroe (City) with the required design, permitting, and bid services associated with the proposed Jacks Creek Water Pollution Control Plant (WPCP) Expansion to 6.8 MGD. As the next major step in securing additional treatment system capacity, we are prepared to begin work on this project immediately and look forward to working on this important project for the City.

If you have any questions or need any additional information, please let me know.

Sincerely,

WIEDEMAN AND SINGLETON, INC.

Peter J. Johns, P.E.
Chairman

Enclosures

Cc: Logan Propes – Monroe City Administrator

I: SCOPE OF SERVICES

Project Understanding

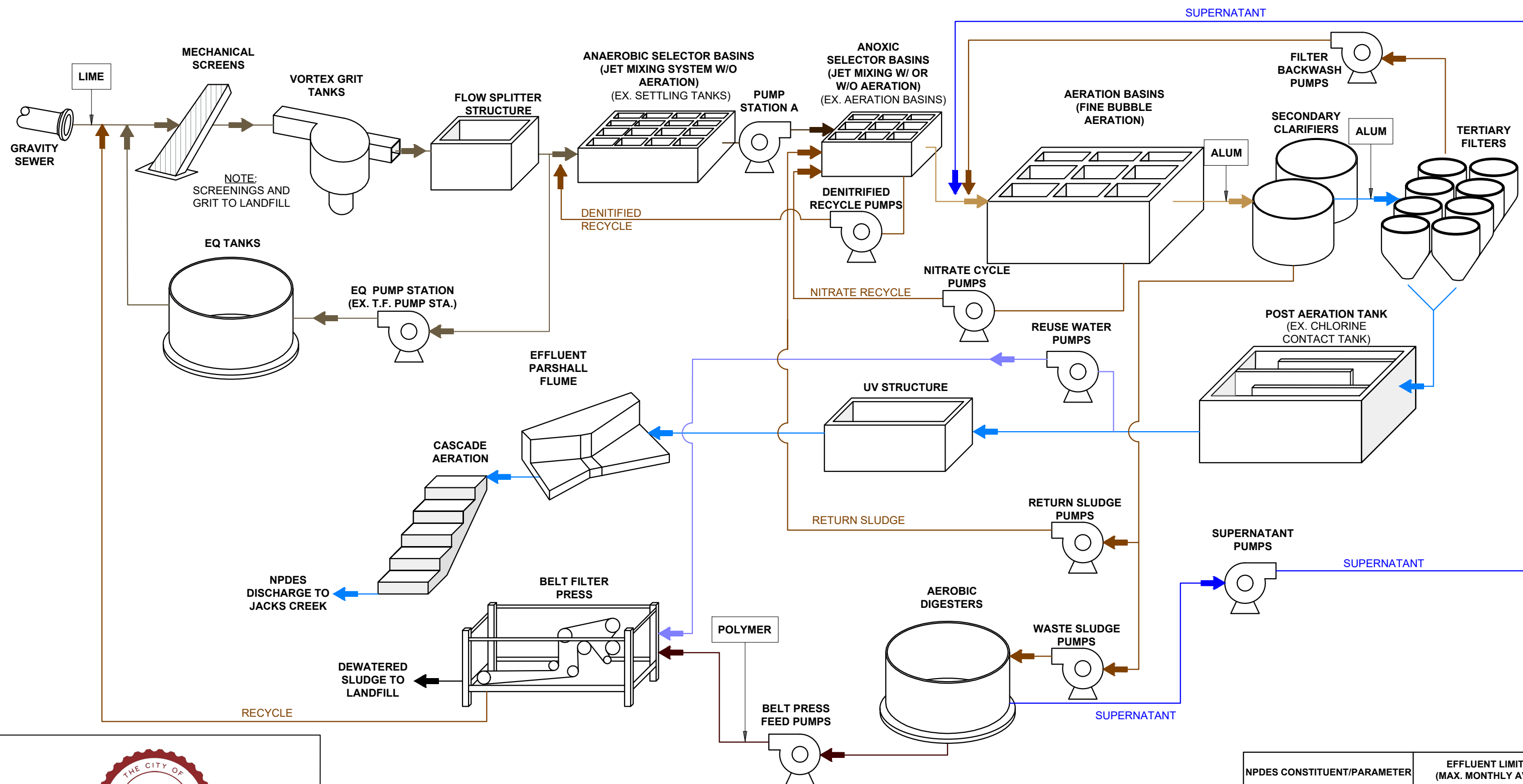
Municipal wastewater treatment in Monroe, Georgia is provided by the City of Monroe (City). The City owns and operates the Jacks Creek Water Pollution Control Plant (WPCP), which is located at 2200 Highway 83 South, Monroe, Georgia. The facility is currently permitted for a total maximum monthly flow (MMF) of 3.4 million gallons per day (MGD-MMF) of wastewater treatment. The City received a wasteload allocation (WLA) for planning purposes from the Georgia Environmental Protection Division (EPD) in 2022 for a stream discharge into Jacks Creeks from the Jacks Creek WPCP. Subsequently, the City developed and submitted the following engineering reports associated with upgrades and expansion at the Jacks Creek WPCP to Georgia EPD:

- ***Environmental Information Document (EID) for Jacks Creek Water Pollution Control Plant Upgrade and Expansion to 6.8 MGD***, (Wiedeman and Singleton, Inc., Dated April 17, 2025)
- ***Design Development Report (DDR) for Jacks Creek WPCP Expansion to 6.8 MGD***, (Wiedeman and Singleton, Inc., Dated November 14, 2024)

The required EID public meeting was conducted on April 15, 2025, and EPD formally approved the EID on May 22, 2025. EPD's approval of the DDR was received on May 29, 2025. As such, the next major step in securing additional treatment system capacity is to begin detailed design and permitting, which includes preparation of engineering drawings and technical specifications for the subsequent solicitation of bids from general contractors.

The EID and DDR were based on upgrade and expansion of the Jacks Creek WPCP in two phases over the next 20 years or more as shown on the attached Process Flow Diagram and Preliminary Site Plan graphics. It is our understanding, however, that the City would like to proceed with combining both phases into one. As such, our proposal presented herein is for providing the engineering services needed during the detailed design and bid phases of the project to expand the Jacks Creek WPCP in one construction contract to 6.8 MGD as follows:

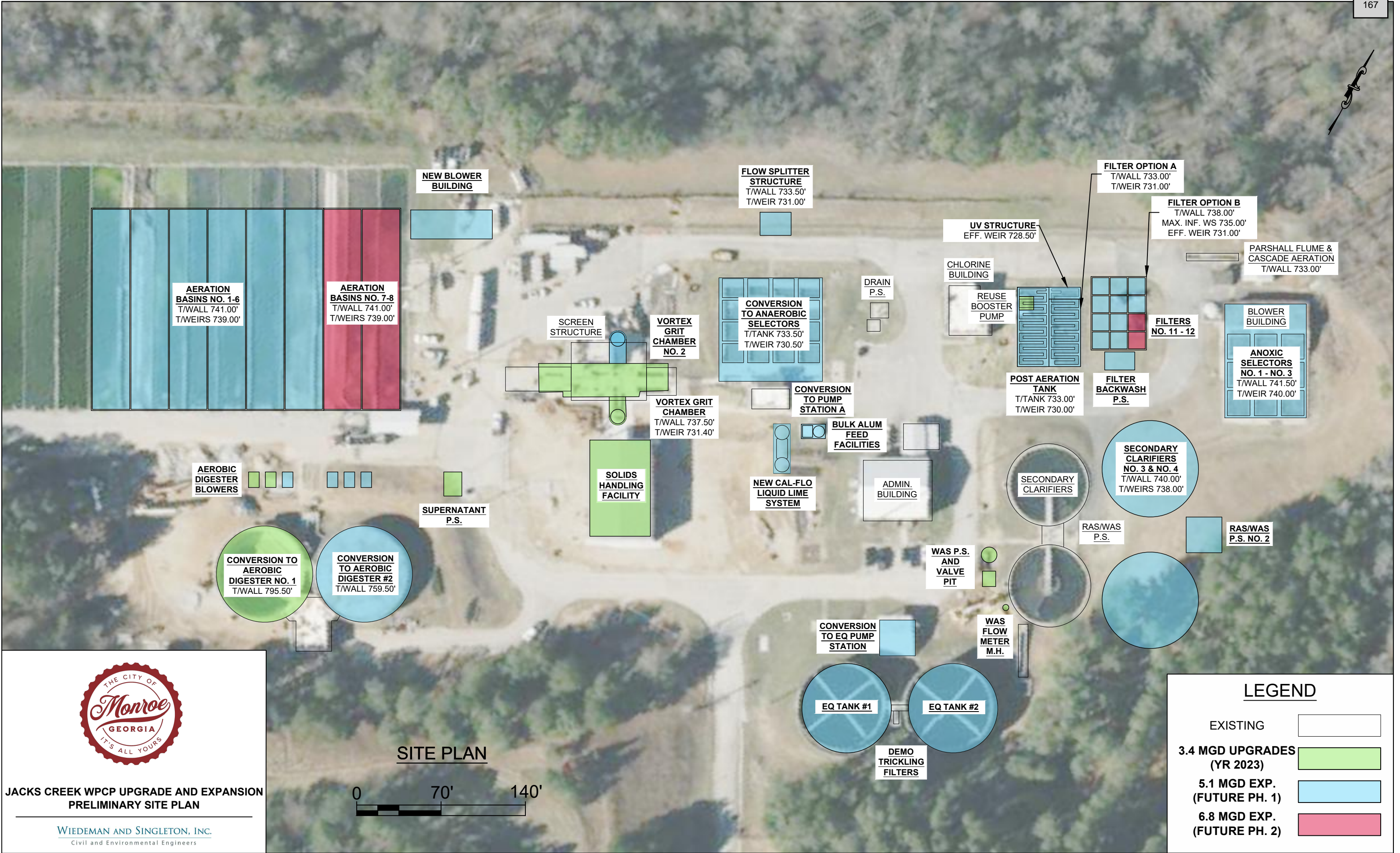
- Installation of Second Vortex Grit Chamber: One (1) additional vortex grit tank will be installed to remove grit at peak flows of at least 18 MGD.
- New Flow Equalization Tanks: Two new Flow Equalization (EQ) Tanks will be constructed at the site of the existing Trickling Filters; the existing Trickling Filters will be taken out of service to better control the required organic loading of the proposed activated sludge process for nutrient removal. These EQ Tanks will provide the required storage capacity to "buffer" peak flows and to prevent having to oversize downstream treatment components.
- Conversion of Existing Trickling Filter Pump Station to EQ Pump Station: While the existing Trickling Filters are taken out of service, the Trickling Filter Pump Station will be converted



JACKS CREEK WPCP UPGRADE AND EXPANSION PROPOSED PROCESS FLOW DIAGRAM

WIEDEMAN AND SINGLETON, INC.
Civil and Environmental Engineers

NPDES CONSTITUENT/PARAMETER	EFFLUENT LIMITS (MAX. MONTHLY AVG.)	
EFFLUENT FLOW RATE (MGD)	5.1	6.8
5-DAY BIOCHEM. OXYGEN DEMAND (mg/L)	10.0	8.0
TOTAL SUSPENDED SOLIDS (mg/L)	13.3	10
AMMONIA, AS N (mg/L)	1.3	0.95
TOTAL PHOSPHORUS, AS P (MG/L)	0.3	0.25
DISSOLVED OXYGEN, MIN. (mg/L)	6.0	6.0
E. coli (counts/100 mL)	126	126
pH, MIN. -MAX. (STD. UNITS)	6.0 -8.5	6.0 -8.5



into the EQ Pump Station to allow for excess flows to be pumped to the new EQ Basins at a rate of 10 MGD.

- Conversion of Existing Primary Settling Tanks to Anaerobic Selectors: The existing Primary Settling Tanks will be converted into Anaerobic Selectors to enhance biological nutrient removal, particularly phosphorus removal.
- Conversion of Existing Sludge Pump House to Pump Station A: The existing Sludge Pump House at the Primary Settling Tanks will be modified to house the pumps for the new Pump Station A, which will pump flow from the Anaerobic Selectors to the Anoxic Selectors.
- Conversion of Existing Aeration Basins to Anoxic Selectors: The existing Aeration Basins will be converted into Anoxic Selector Basins, which will enhance biological nutrient removal and enhance the settling of biological solids. Denitrified recycle MLSS from the Anoxic Selectors will be returned to the Anaerobic Selectors at a rate approximately equal to the influent plant flow rate.
- New Aeration Basins: Eight (8) new Aeration Basins will be constructed to provide adequate activated sludge treatment using fine bubble aeration. These basins will provide volume for year-round nitrification. Air will be supplied by centrifugal blowers, using fine bubble diffusers installed on the bottom floors of the Aeration Basins.
- New Blower Building: A New Blower Building will be constructed to house the blowers for the new Aeration Basins.
- Additional Secondary Clarifiers #3 and #4: Two (2) new Secondary Clarifiers will be constructed to bring the total number of Secondary Clarifiers to four (4). The new clarifiers will be sized larger than the existing clarifiers to lower the hydraulic surface overflow rate for all the Clarifiers to acceptable levels.
- New Tertiary Filters: To comply with the new NPDES limits for total suspended solids and total phosphorus, effluent from the Secondary Clarifiers must be filtered. The new Tertiary Filters will either be Disc Filters or Deep Bed Granular Media Continuous Backwash Filters. Both types are commonly used for municipal wastewater treatment, and the final type of Filters to be installed will be determined during detailed design. Filter backwash pumps will be installed to pump the backwash water from the filters to the new aeration basins.
- Conversion of Existing Chlorine Contact Tank to Post Aeration Tank: One (1) existing Chlorine Contact Tank will be converted for use as a Post Aeration Tank to ensure NPDES compliance with dissolved oxygen requirements.
- UV Disinfection: A new UV System will be installed immediately downstream of the Tertiary Filters to disinfect the effluent wastewater prior to discharge to Jacks Creek. This will replace the existing disinfection process using chlorine and the need for sulfur dioxide gas for dechlorination.
- New RAS/WAS Pump Station #2: One (1) new RAS/WAS pump station will be installed to provide sufficient RAS and WAS pumping capacities at the expanded flows. The new

RAW/WAS Pump Station #2 will operate in parallel with the existing RAW/WAS Pump Stations.

- Capacity Upgrades to Existing Aerobic Digester #1 and Conversion of Existing Anaerobic Digester to Aerobic Digester #2: The existing Anaerobic Digester currently in service will be converted into an Aerobic Digester, to give the WPCP additional solids stabilization and handling capability. Due to the increased solids loading to the digesters, (i.e., as a result of more advanced treatment), upgrades will also be made to existing equipment for Aerobic Digester #1.
- New Bulk Liquid Lime System: A new, larger capacity Liquid Lime System will be installed for pH and alkalinity adjustment, which will help optimize the proposed biological nutrient removal process. The larger system will allow for dilution of the lime slurry at delivery and will provide at least 30 days of chemical storage.
- New Bulk Alum Feed System: A new, larger Bulk Alum Feed System will be installed to enhance the WPCP's capability to remove phosphorus, allowing them to meet their effluent Total Phosphorus limit. The bulk liquid storage tank will provide at least 30 days of chemical storage.

Scope of Services

We have divided our proposed scope of services for the referenced project into the following work tasks:

- Design Phase Services (Work Task 001); and,
- Bid Phase Services (Work Task 002).

A detailed breakdown of our proposed services for each of these work tasks is presented herein. It is our understanding that professional engineering services required during construction, if any, will be negotiated after bid and award of the project to a general contractor.

DESIGN PHASE SERVICES (WORK TASK 001)

SUBTASK 1.01 – CONDUCT PROJECT KICK-OFF MEETING

After being issued a Notice to Proceed, Wiedeman and Singleton (W&S) will conduct

a project kick-off meeting with the City's project team/staff at the Jacks Creek WPCP to review the proposed project objectives, schedule, and special conditions. The meeting agenda will be prepared by W&S.

SUBTASK 1.02 – PERFORM REQUIRED FIELD SURVEYING SERVICES

A field survey of the existing Jacks Creek WPCP will be conducted by Robbie Henderson Surveying & Planning. The survey will include adequate detail to produce the civil site and erosion and sedimentation control plans with maximum 2-foot contour intervals. Also, all existing above ground features such as structures, driveways, roads, curbing, catch basins, etc. at the site will be surveyed and shown on the proposed construction drawings. See Robbie Henderson's proposal provided herein for additional information regarding the proposed field surveying scope of services.

Additionally, W&S will hire a specialty sub-consultant to complete a 3D laser scan of the existing as-built conditions of some of the WPCP structures and appurtenances (e.g., Existing Trickling Filter Pump Station, Existing Sludge Pump House, etc.). W&S will use these scans to produce the required engineering drawings needed during construction.

SUBTASK 1.03 – PERFORM GEOTECHNICAL INVESTIGATION

A geotechnical investigation will be conducted by Southern Geotechnical Consultants (SGC), LLC at the Jacks Creek WPCP. The purpose of the geotechnical investigation will be to establish engineering criteria for foundation design; recommended methods of excavation during construction; and, to identify groundwater levels. SGC will present their recommendations in a written report following their field and office investigations. See SGC's proposal provided herein for additional information regarding the proposed geotechnical (a.k.a., subsurface) investigative scope of services.

Geotechnical services (e.g. soil testing, sub-grade inspection, etc.) which may be required during construction are outside of these proposed scopes of service. These services will be specified in the contract documents to be furnished and paid for by the general contractor(s) constructing the work.

SUBTASK 1.04 – PREPARE WASTEWATER TREATMENT EQUIPMENT RFPs

Early in the design effort, W&S will prepare Equipment Request for Proposals (Equipment RFPs) for the major items of wastewater treatment equipment that the City would like to pre-select prior to solicitation of bids from general contractors (i.e., in a “base bid”

arrangement during the solicitation of bids). These Equipment RFPs will typically include submittal instructions, general equipment specifications and design criteria, a required scope of supply and services, and existing and preliminary layout drawings associated with the proposed equipment.

Our services during the Equipment RFP process will include the following:

1. Draft request for proposals (RFP);
2. Evaluate potential vendors prior to issuance of RFPs;
3. Review draft RFPs and proposed list of invited vendors with City staff;
4. Issue RFPs to vendors and answer questions; and
5. Evaluate RFPs, participate in site visits with City to observe proposed equipment, and prepare recommendation letter to City.

For purposes of preparing our proposal, we have assumed a maximum of approximately 4-6 Equipment RFPs will be required.

SUBTASK 1.05 – PREPARE DETAILED DESIGN DRAWINGS AND SPECIFICATIONS

The project design drawings will progress with preparation of a 45% Preliminary Review set; a 95% Final Review set with a cost estimate; and finally, a 100% Bid Ready set. Formal reviews will be conducted with the City staff using the 45% and 95% drawing sets (see Subtask 1.06).

W&S will prepare the proposed construction drawings using Autodesk's AutoCAD and Revit 3D software. These drawings, and the project specifications, will be prepared in accordance with standards developed by the City of Monroe, requirements of Georgia

EPD, Ten State Standards, and accepted engineering practice.

Construction plans will include sedimentation and erosion control drawings suitable for acquiring a Land Disturbance Permit (LDP).

Specifications will be prepared in accordance with the Construction Standards Institute (CSI) format.

SUBTASK 1.06 – CONDUCT FORMAL DESIGN REVIEW MEETINGS WITH CITY STAFF AT THE 45 AND 95 PERCENT COMPLETION LEVELS

W&S will present design drawings to the City staff at the 45 and 95 percent completion levels of detailed design and meet to discuss concerns and to receive any review comments. Project deliverables will be forwarded to City staff at least one week prior to these meetings for their internal review.

SUBTASK 1.07 – ASSIST CITY WITH PERMITTING AND AGENCY REVIEWS

W&S will assist the City with all required permitting and regulatory approvals, including local review(s) and approval by Georgia EPD. This will also include such activities as, preparing permit applications and drawings; attending meetings; and revising contract documents following agency reviews.

SUBTASK 1.08 – QA/QC REVIEW

All deliverables will be reviewed and approved internally by senior level staff of W&S prior to their submittal to the City.

Work Task 001 Deliverables

W&S will furnish the City with the following deliverables on this phase of the project:

- ❑ Meeting Agendas
- ❑ Equipment RFPs
- ❑ Subsurface Investigation Report

- ❑ Contract Plans and Specifications (45%, 95%, and 100% – Bid Ready)
- ❑ Permit Applications and Submittals, including Georgia EPD and local jurisdictions
- ❑ Updated Construction Cost Estimate at 95% design completion

BID PHASE SERVICES (WORK TASK 002)

SUBTASK 2.01 – ASSIST WITH PRE-QUALIFICATION OF CONTRACTORS AND SOLICITATION OF BIDS

W&S will assist the City with the pre-qualification of bidders, solicitation of bids, and distribution of construction documents (PDF format) to pre-qualified bidders.

SUBTASK 2.02 – RESPOND TO QUESTIONS FROM CONTRACTORS AND SUPPLIERS DURING THE BID PHASE OF THE PROJECT

W&S will receive, log, and respond to questions from prospective bidders and suppliers during the bidding period. If a clarification of the plans and specifications is needed, all plan holders will be notified by addendum.

SUBTASK 2.03 – ISSUE ADDENDA AS REQUIRED

W&S will prepare and issue any necessary addenda. Addenda will be submitted to the City staff for approval prior to general distribution to plan holders.

SUBTASK 2.04 – ATTEND AND PARTICIPATE IN A PRE-BID CONFERENCE

W&S staff will attend and participate in the pre-bid conference to be conducted at the Jacks Creek WPCP prior to the bid opening.

SUBTASK 2.05 – ASSIST WITH THE BID OPENING MEETING AND PROVIDE A TABULATION OF BIDS AND RECOMMENDATION OF AWARD

W&S will assist the City with the bid opening. All bids will be checked for accuracy and tabulated. The low bidder will be identified and a written recommendation for contract award will be provided to the City. Prior to recommending award of the contract, W&S will check the contractor's bonding company financial rating and capacity and make sure they are properly registered in Georgia.

- ❑ Construction Ready Plans and Specifications
-

SUBTASK 2.06 – PREPARE CONSTRUCTION READY DOCUMENTS

After authorization from the City, W&S will prepare "Construction Ready" documents (plans and specifications) for execution by the general contractor selected for award. These updated documents will include changes issued by addenda and information submitted by the general contractor at bid time. Once executed by the general contractor, validity of bonds will be checked by W&S and the documents will be forwarded to the City for final execution.

Work Task 002 Deliverables

W&S will furnish the City with the following deliverables for this phase of the project:

- ❑ Contractor Pre-qualification Documents
- ❑ Recommendation Letter for Pre-qualification of Contractors
- ❑ Prepare and issue Addenda (if necessary)
- ❑ Pre-Bid Meeting Materials
- ❑ Bid Tabulation
- ❑ Recommendation Letter to the City to award or reject bids



May 29, 2025

Peter Johns, P.E.
Wiedeman and Singleton, Inc.
3091 Governors Lake Drive
Suite 430
Norcross, GA 30071

RE: Monroe Jacks Creek WPCP Expansion to 6.8 MGD - Site Surveying

Mr. Johns,

We are pleased to present a proposal for surveying services for the above referenced project. Our fees will be as follows:

1. Perform a detailed field survey to include all above ground and underground utility lines that can be properly identified and marked in the field by others, structures, driveways, roads, curbing, water mains, sewers (location and invert), catch basins (location and invert), walls, and landscaping.
2. The survey database to be provided in GA State Plane Coordinates.
3. Set a minimum of four (4) permanent GPS monuments around site that can be used during construction.
4. Drone aerial images tied to GA State Plane Coordinates for drawing backgrounds.
5. Deliverable to be a Civil 3D drawing to include 3D surface.
6. Two (2) return trips for 8 hours each trip for supplemental surveying requests.

Fees & Schedule

Our fee for the Scope of Work for Item A will be \$8,300.00. Robbie Henderson Surveying will complete the Scope of Work in item A within 15 business days of notice to proceed.

Sincerely,

A handwritten signature in black ink that reads "Robbie Henderson".

Robbie Henderson, RLS

Accepted by: _____ Date _____



May 21, 2025

City of Monroe
c/o Wiedeman & Singleton, Inc.
3091 Governors Lake Drive
Suite 430
Norcross, Georgia 30071

Attention: Mr. Peter Johns, P.E.

Subject: Geotechnical Subsurface Exploration
Proposed Monroe Jack Creek WPCP Expansion Project
2200 Highway 83
Monroe, Georgia
SGC Proposal No. GP-2936

Gentlemen:

Southern Geotechnical Consultants (SGC), LLC appreciates the opportunity to provide this proposal for performing a Geotechnical Subsurface Exploration of the planned expansion to the Monroe Jack Creek WPCP Facility. Included herein is a summary of our understanding of the information needed about our proposed work scope and our fee.

PROJECT INFORMATION

We understand that plans are underway to begin the development process to upgrade processing capacity at the Monroe Jack Creek WPCP in Monroe. At this time, the site layout provided shows the layout of the campus with highlighted items that are to be added and/or reconfigured as part of the improvements.

While final structural loading has not been provided, we estimate that maximum column loadings will be 150 kips or less, and tank/building wall loading will be 2 to 4 kips per linear foot. Furthermore, we estimate contact pressures for the tanks may exceed 750 psf but some of the load from the structures will be partially offset due to below grade excavation requirements in the design. Presently, the site is largely clear and we do not expect that clearing will be needed in the area of the planned exploration.

GEOTECHNICAL EXPLORATION SCOPE

To explore the near surface soils across the site we propose that we drill fourteen borings. Plate 1 provides our proposed boring locations. Using the guidelines provided in your email and our past experience, we have budgeted for the borings to extend to depths ranging from 15 to 50 feet or shallower refusal to help provide qualitative data about the on site soils and excavation difficulty. As requested, we will core a shallow refusal of a boring if refusal is encountered within the planned structure exaction depth. Also, due to the likely closeness of the groundwater to the surface in the plant area, we have budgeted for the placement of one to two temporary piezometers as part of the work scope so that stabilized groundwater readings can be made. In addition, we have included as part of an option a site-specific settlement analysis if it appears that the soils beneath individual planned building/structures are settlement sensitive and need further assessment to allow for support on shallow foundations.

The International Building Code (IBC), 2021 addition requires that the seismic site classification be based upon standard penetration resistance profiles of the soil veneer of the building site. Using the site classification derived from the standard penetration resistance values, we will derive the code mandated values requested. If it is determined that significant savings in construction costs would result from a reduction of the soil site classification, we have included a contingency for a site-specific analysis. Also, in conjunction with the site-specific seismic analysis, we can perform a probabilistic seismic hazard assessment (PSHA). The PSHA allows for a reduction on the building design coefficients required by the International Building Code.

All exploratory borings will be made with an auger rig mounted on a high mobility rubber-tired vehicle. Depths to groundwater or power auger refusal will be observed in the boreholes if encountered. The field-testing will be performed in accordance with ASTM procedures. Upon completion of the subsurface drilling and stabilized groundwater measurements, the borings will be backfilled with native soils in accordance with State of Georgia regulations. As noted, we do not expect that clearing will be needed for our drill rig for several of the planned borings. We request that the client provide for right-of-entry for our equipment and personnel in order for the exploration to be performed. Last, we note that that in the normal course of clearing access and performing the exploration, pushing over of small trees and underbrush and some ground disturbance will occur. Presently, we have not budgeted for the correction or stabilization/mulching of any areas disturbed. If additional measures are needed, then an amendment to the work scope will be required.

Our subsurface report will address the items listed below:

- Site conditions and area geology (including the possible existence of rock and its impact on construction).
- Recommendations for foundation types, allowable bearing capacities or foundation capacities for the planned structures.
- Earthwork recommendations including suitability of soils for reuse as fill, and fill compaction criteria.
- Groundwater control, as applicable for the planned structures and parking areas.
- Floor/tank slab recommendations.
- Recommendations for general soil parameters based upon empirical relationships and past experience.
- Recommendations for other soil-related construction conditions, such as site preparation and excavation slopes; and
- Assessment of Seismic Site Class.

COMPENSATION

Our fee for the proposed subsurface exploration is provided below.

Subsurface Exploration.....\$19,850.00



Subsurface Exploration Contingency Options

Rock Coring 5 feet, per setup	\$ 875.00
Site Specific Settlement Analysis	\$ 3,950.00
Site Specific Seismic Analysis	\$ 3,500.00

Our field crew will remain in close contact with the project engineer during the exploration so that the subsurface and/or environmental data can be evaluated as they are obtained. If any erratic or unfavorable conditions are encountered during exploration drilling, or if environmental conditions are identified that potentially impact the project, we will notify you so that any modifications to the work scope program can be mutually agreed upon prior to our proceeding with any work outside that discussed above. Furthermore, no work as part of "Subsurface Exploration Contingency" will be initiated without prior approval.

SCHEDULE

We expect to mobilize a drill rig within five to seven working days after notice to proceed. The field work for the subsurface exploration should take about four to five working days to complete. We expect that our final reports will then be available approximately seven to ten working days from the completion of all of the field and laboratory work. However, preliminary findings and recommendations can be provided as needed.

AUTHORIZATION

We will schedule the work based upon your authorization. To confirm your authorization, provide invoicing instructions, and receive your reports, please execute the attached Proposal Acceptance Sheet, and return it to us.

We will contact the Utility Protection Center so that utilities can be located and marked prior to our mobilization to the site. Southern Geotechnical Consultants cannot be responsible for damage or loss of service to any utilities which are not located for us, or which have been mislocated by others. Also, we request that the client provides for right-of-entry for our equipment and personnel in order for the exploration to be performed, and that in the normal course of work some damage to the property may occur, the correction of which is not part of this contract.

Our field drilling foreman or field engineer will contact the project manager periodically during the field exploration so that data can be evaluated as they are obtained. If extremely erratic or unfavorable conditions are encountered in the course of the field exploration, we will contact you so that modifications to the subsurface exploration scope can be mutually agreed upon prior to our proceeding with any work which could cause our quoted fee to be exceeded.



ACKNOWLEDGMENT

Thank you again for the opportunity to submit this proposal. Please call us with any questions.

Respectfully submitted,

Southern Geotechnical Consultants, LLC



A. Glenn Motes III, P.G./P.E.
Senior Project Manager

AGM/ads

Enclosures





SITE LOCATION PLAN
MONROE JACK CREEK WPCP EXPANSION PROJECT SITE
2200 HIGHWAY 83
MONROE, GEORGIA

DATE: 5/21/2025

DRAWN BY: AGM

HORIZ. SCALE: NTS

PROPOSAL NO. GP-2936

PLATE NO. 1



EXHIBIT A

PROPOSAL ACCEPTANCE

Description of Services Geotechnical Subsurface Exploration
 Project Name Proposed Monroe Jack Creek WPCP Expansion Project
 Project Location 2200 Highway 83 Monroe, Georgia
 Proposal Date May 21, 2025 / GP-2936 Consultant SGC, LLC

FOR PAYMENT OF CHARGES:

Charge Invoice to the Account of:

Firm _____
 Address _____ City _____
 State _____ Zip Code _____ Phone Number _____
 Attention: _____ Title _____
 Email: _____

FOR APPROVAL OF CHARGES:

If the invoice is to be mailed for approval to someone other than the account charges, please indicate where to mail the invoice in the space below.

Firm _____
 Address _____ City _____
 State _____ Zip Code _____ Phone Number _____
 Attention: _____ Title _____
 Email: _____

PROPERTY OWNER IDENTIFICATION (If Other Than Above):

Firm _____
 Address _____ City _____
 State _____ Zip Code _____ Phone Number _____
 Attention: _____ Title _____
 Email: _____

PROPOSAL ACCEPTANCE:

The Terms and Conditions of this Proposal, including the Terms on this page and the proposal contents are:

Accepted this _____ day of _____, 20_____

 Print or type individual, firm or corporate name

 Signature of authorized representative



EXHIBIT B

STANDARD TERMS AND CONDITIONS OF CONTRACT FOR PROFESSIONAL SERVICES:

The Client and Southern Geotechnical Consultants, LLC (hereinafter referred to as Southern Geotechnical Consultants) (collectively, the Client and Southern Geotechnical Consultants shall be referred to as the "parties") agree that services covered by this Agreement shall be performed in accordance with the following Standard Terms and Conditions:

1. **Standard of Care.** Southern Geotechnical Consultants will perform the services with the degree of skill and care ordinarily exercised by qualified professionals performing the same type of services at the same time under similar conditions in the same or similar locality. Southern Geotechnical Consultants makes no warranty, express or implied, as to its professional services rendered under this Agreement and specifically excludes any implied warranty that the services contracted for in this Agreement are suitable for the Client's project. Client shall promptly notify Southern Geotechnical Consultants with reasonable specificity of any deficiencies or suspected deficiencies in the services of which Client becomes aware, so that Southern Geotechnical Consultants may take measures to minimize the consequences of such a deficiency. Failure to notify Southern Geotechnical Consultants shall relieve Southern Geotechnical Consultants of the cost of remedying the deficiencies above the sum such remedy would have cost had prompt notification been given. Client acknowledges that the services entail risk of personal injury and property damage (including cross-contamination) that cannot be avoided, even with the exercise of due care. Client also acknowledges that environmental and geotechnical conditions can vary from those encountered at the times and locations of explorations and data collection, and that the limitation on available data may result in some level of uncertainty with respect to the interpretation of these conditions, despite due professional care. Southern Geotechnical Consultants therefore cannot guaranty specific results such as the identification of all contamination or other geotechnical or environmental conditions or problems nor their resolution.

2. **Payment.** The Client agrees to pay Southern Geotechnical Consultants for work completed. Southern Geotechnical Consultants will invoice the Client periodically. Payments to Southern Geotechnical Consultants are due upon receipt of the invoice. Interest will accrue at the rate of 1.5 % per month from the date of the invoice on all payments not made within 30 days of the date of the invoice. If you dispute any portion of an invoice, you will notify Southern Geotechnical Consultants in writing with specificity within 10 days and pay the undisputed portion of the Invoice. Non payment of any invoice within 10 days of the date of the invoice authorizes Southern Geotechnical Consultants to immediately stop work on the Client's project and to withhold all documentation on the project from the Client, without incurring any liability for damages to Client or others. If any unpaid amounts have to be collected by or through litigation or the services of an attorney, the Client shall be liable for the reasonable attorney's fees and expenses of litigation incurred by Southern Geotechnical Consultants. If Client disputes any part of an invoice, Client will notify Southern Geotechnical Consultants in writing within 10 days of receipt of the invoice and shall pay the undisputed portion at the same time. Payments to Southern Geotechnical Consultants can be in the form of cash, check or credit/debit card. Credit card payments are \$2.95 per transaction under \$107 – all other transactions are 2.75% of the total transaction (Visa, MasterCard, American Express, Discover and JCB). Debit card payments are a flat fee of \$3.95 (Visa Debit and MasterCard Debit).

3. **Additional Charges.** Only those services specifically listed within this proposal are included. Any future phases or additional services will require additional fees.

Southern Geotechnical Consultants services and compensation under this Agreement have been agreed to in anticipation of the orderly and continuous progress of the project through completion. Delays caused by acts or conditions outside the control of Southern

Geotechnical Consultants may cause an increase in the project cost. An unanticipated number of meetings between Client and Southern Geotechnical Consultants may cause an increase in Southern Geotechnical Consultants' costs and will be billed to the Client at the hourly rate charged by Southern Geotechnical Consultants.

Unforeseen, adverse field conditions may require an increase in the project schedule and fees charged to Client. Adverse field conditions include, but are not limited to, items such as limited access, extremely dense vegetation, subsurface conditions, storm damaged property, swampy conditions, existing utilities, irate property owners, restricted hours of operation or other field conditions beyond Southern Geotechnical Consultants' control. Southern Geotechnical Consultants will immediately inform the Client in writing when such conditions are encountered. Client and Southern Geotechnical Consultants will agree in writing to any changes in scope and fee before proceeding with the project.

The Client shall be responsible for all governmental fees associated with the work performed under this contract and any other fees not specifically covered by the terms of this contract. The Client shall reimburse Southern Geotechnical Consultants for responding to any subpoena or governmental inquiry or audit related to this Agreement at Southern Geotechnical Consultants' standard rates then in effect.

4. **Confidentiality.** Client agrees that the technical methods, design details, techniques and pricing data contained in any material submitted by Southern Geotechnical Consultants pertaining to Client's project or this Agreement shall be considered confidential and proprietary, and shall not be released or otherwise made available to any third party without the express written consent of Southern Geotechnical Consultants.

5. **Independent Contractor.** Southern Geotechnical Consultants is an independent contractor and not an agent for or employee of Client and Southern Geotechnical Consultants is not empowered under the Agreement to make any binding commitments or contracts on Client's behalf nor to supervise any part of Client's project or other contractor's work for any purpose whatsoever.

6. **Disputes.** Any legal action between Client and Southern Geotechnical Consultants arising out of this Agreement or the performance of the services shall be brought in a court of competent jurisdiction in Hall County, Georgia, regardless of who initiates the legal action. The parties agree that any legal action filed by either party shall be sent to mediation. If Southern Geotechnical Consultants is the prevailing party in any lawsuit decided by a judge or jury, Southern Geotechnical Consultants shall also be entitled to judgment for its reasonable expenses of litigation, including attorney's fees. Client agrees to indemnify, hold harmless and defend Southern Geotechnical Consultants from any third party action arising out of or related to this Agreement and to services provided by Southern Geotechnical Consultants.

7. **Limitation of Liability.** In recognition of the relative risks and benefits of the project to both the Client and Southern Geotechnical Consultants, the Client agrees that the liability of Southern Geotechnical Consultants under this Agreement shall be limited to fifty thousand dollars or the total fee for services rendered on this project, whichever is less. It is intended that this limitation apply to any and all liability or cause of action however alleged or arising, unless otherwise prohibited by law. Southern Geotechnical Consultants shall not be liable for errors or omissions which are not disclosed to Southern Geotechnical Consultants, in writing, within one (1) year of the date of this Agreement. Southern Geotechnical Consultants assumes no liability for damage to others who are not a party to this Agreement and Client agrees to indemnify, hold harmless and defend Southern Geotechnical Consultants from any third party action related to this Agreement and services provided by Southern Geotechnical Consultants.



Southern Geotechnical Consultants shall not be liable for damages resulting from the actions or inactions of governmental agencies. Southern Geotechnical Consultants shall act as an advisor only in all governmental relations.

The Client shall be responsible for disclosing any information and providing any necessary documents related to the property or project necessary to Southern Geotechnical Consultants' performance under this Agreement. Any delays, errors or damages caused by Client's failure to timely provide documents and accurate information is the sole responsibility of Client.

Notwithstanding any other provision of this Agreement, Southern Geotechnical Consultants, its officers, directors, partners, employees, contractors or consultants shall not be liable for any incidental, indirect or consequential damages arising out of or connected in any way to the project or to this Agreement. This waiver of consequential damages shall include, but is not limited to, loss of use, loss of profit, loss of business, loss of income, loss of reputation or any other consequential damages that Client may have incurred from any cause of action including negligence, strict liability, breach of contract and breach of strict or implied warranty. Client shall require similar waivers of consequential damages protecting all the entities or persons named herein in all contracts and subcontracts with others involved in this project.

8. Client's Responsibilities. Client will designate to Southern Geotechnical Consultants in writing a person to act as Client's representative who is authorized to receive notices, transmit information and make decisions regarding the project. Except as otherwise agreed, Client will secure the approvals, permits, licenses and consents necessary for performance of the services. Client will provide Southern Geotechnical Consultants with all documents and other information that are pertinent to the services and are reasonably available to Client, including information related to hazardous materials or other environmental or geotechnical conditions at the site. Before Southern Geotechnical Consultants performs any subsurface activities, Client will provide it with all plans and other information available to Client concerning underground services, conduits, pipes, tanks and other facilities and obstructions at the site. Unless otherwise indicated in writing, Southern Geotechnical Consultants will be entitled to rely upon the accuracy and completeness of the documents and information provided by the Client.

9. Termination. Either party may terminate this Agreement at any time by giving written notice to the other. Termination shall be effective when received by the party being terminated. Southern Geotechnical Consultants may terminate this Agreement at anytime without prior notice due to nonpayment by Client. If this Agreement is terminated, Southern Geotechnical Consultants shall be compensated for work actually performed and expenses incurred up to the date of termination. Southern Geotechnical Consultants shall not be liable for any consequential damages, including but not limited to, loss of use and loss of profit, incurred by the Client because of the termination of this Agreement or any subsequent resumption of the project.

10. Reuse of Documents. All documents (including electronic and computer formats) prepared by or furnished by Southern Geotechnical Consultants pursuant to this Agreement are the copyrighted property of Southern Geotechnical Consultants. Designs, reports, data and other work product delivered to Client are for Client's use only, for the limited purposes disclosed to Southern Geotechnical Consultants. They are not intended or represented to be suitable for reuse by Client or others for any purpose other than that specifically agreed to in this Agreement. Any reuse of documents prepared by Southern Geotechnical Consultants without the specific written consent of Southern Geotechnical Consultants is prohibited. If consent to reuse the documents is granted by Southern Geotechnical Consultants, such reuse shall be at user's sole risk and without liability or legal exposure to Southern Geotechnical Consultants and Client agrees to indemnify and defend Southern Geotechnical Consultants against any liabilities resulting therefrom. Any improper use shall entitle Southern Geotechnical Consultants to further compensation at rates then charged by Southern

Geotechnical Consultants. The parties agree that any breach of this paragraph by the Client or others may result in irreparable harm to Southern Geotechnical Consultants and that it is impossible to measure in money the damages that will accrue to Southern Geotechnical Consultants as the result of such a breach. Therefore, the terms and provisions of this paragraph may be specifically enforced by Southern Geotechnical Consultants in equity, and the Client hereby waives the claim or defense that a remedy at law is adequate for a breach of any of the terms and provisions of this paragraph. Any technology, methodology or technical information learned or developed by Southern Geotechnical Consultants shall remain its property.

11. Record Retention. Southern Geotechnical Consultants will retain records for a maximum of three (3) years from completion of project or termination of Southern Geotechnical Consultants duties.

12. Waiver. If one party waives enforcement of any term or provision of this agreement at any time, that waiver will be effective only for the specific instance and specific purpose for which the waiver was given. If either party fails to exercise or delays exercising any of its rights or remedies under this Agreement, that party retains the right to enforce that term or provision at a later time, without further notice to the other party.

13. Assignments. The provisions of this Agreement are binding upon and will inure to the benefit of the heirs, personal representatives, successors, and assigns of the parties. Neither Southern Geotechnical Consultants nor the Client shall assign or transfer its interest in this Agreement without written consent of the other.

14. Modification to Agreement. This Agreement represents the entire agreement between the Client and Southern Geotechnical Consultants and supersedes all prior negotiations, representations or agreements, either written or oral, for this project. No supplement, modification, or amendment of this Agreement will be binding unless executed in writing by all parties. These Standard Terms and Conditions shall govern over any inconsistent terms in the Agreement. Unless specifically excluded, all terms and conditions of the original contract shall apply to any modification or addendum. All additional work shall be charged to the Client at the standard hourly rates charged by Southern Geotechnical Consultants, unless priced differently in the modification.

15. Severability. If any provision of this Agreement shall be determined to be invalid or unenforceable in whole or part, the remaining provisions hereof shall remain in full force and effect, and be binding upon the parties hereto. The parties agree to reform and modify this Agreement to replace any such invalid or unenforceable provision with a valid and enforceable provision that comes as close as possible to the intention of the stricken provision. These terms and conditions of this Agreement shall survive the completion of the services under this Agreement or and the termination of this Agreement for any cause.

16. Governing Law. This Agreement shall be governed in all respects by the laws of the State of Georgia.

17. Notices. All notices must be in writing. A notice may be delivered to a party at the address that follows a party's signature or to a new address that a party designates in writing. A notice may be delivered: (A) In person, (B) By certified mail, (C) By overnight courier, (D) By fax.

18. Counterparts. The parties may sign several identical counterparts of this Agreement. Any fully signed counterpart shall be treated as an original.

19. All limitations of liability, indemnifications, warranties and representations contained in this Agreement shall survive the completion or termination of this Agreement.



II: FEE PROPOSAL

To complete the proposed scope of services outlined herein, our estimate of total man-hours and costs are summarized in the table below.

Summary of Proposed Man-hours and Fees

Phase	Total Man-hours	Labor Costs	Direct Expenses¹	Total Costs
Design Phase Services (Work Task 001)	10,030	\$1,327,570.00	\$244,275.00	\$1,571,845.00
Bid Phase Services (Work Task 002)	308	\$44,060.00	\$3,760.00	\$47,820.00
Totals	10,338	\$1,371,630.00	\$248,035.00	\$1,619,665.00

Notes: ¹ Includes costs of subconsultants.

A more detailed task-discipline matrix for each of these phases of service (referred to herein as work tasks) is attached. Please note that administrative and clerical services are not billed separately on our projects and are included in our overhead rate. As such, man-hours for these tasks are not included in our total estimate of man-hours for the project.

Mileage for trips required from our home office in Atlanta will be billed at current IRS mileage rates. Other expenses, including subconsultants, will be billed at our direct cost without a markup. The 2025 hourly rates listed in the man-hour planning sheets will be held constant without adjustment for the proposed design and bid services.

For purposes of preparing our fees, we have assumed that engineering services required by our firm during construction, if any, will be negotiated with the City after the solicitation of bids from general contractors and prior to the start of construction.

Our total proposed fee, including subconsultants and reimbursable expenses, for design and bid phase engineering services equates to 3.95% of the most recent estimated construction costs included in the design development report (DDR) of \$41.0M.

Man-hour Planning Sheet

Client/Facility: CITY OF MONROE, GEORGIA
Project Title: CITY OF MONROE JACKS CREEK WPCP EXPANSION TO 6.8 MGD
Prepared by: WIEDEMAN AND SINGLETON, INC.



WIEDEMAN AND SINGLETON, INC.
Civil and Environmental Engineers

Work Task Name	DESIGN PHASE SERVICES								Civil and Environmental Engineers
Work Task Number	001	Name of Team or Classification							
Notes:	Sub-tasks	PRIN/PM	SR PE	PE	EIT			Total	
1. SEE DESIGN DEVELOPMENT REPORT (DDR) FOR BASIS OF DESIGN. 2. SCOPE AND FEES BASED ON PHASE I & II PLANT EXPANSION FROM 3.4 MGD TO 6.8 MGD. 3. ESTIMATED CONSTRUCTION COSTS = \$41M.	1.01 CONDUCT PROJECT KICK-OFF MEETING	4	8		4			16	
	1.02 PERFORM REQUIRED FIELD SURVEYING SERVICES (W&S COORD. TIME)	2	8					10	
	1.03 PERFORM GEOTECHNICAL INVESTIGATION (W&S COORD. TIME)	4	12					16	
	1.04 PREPARE WASTEWATER TREATMENT EQUIPMENT RFPS	40	80	120				240	
	1.05 PREPARE DETAILED DESIGN DRAWINGS AND SPECIFICATIONS	620	1900	2400	4700			9620	
	1.06 CONDUCT FORMAL DESIGN REVIEWS AT 45% AND 95% COMPLETION	12	12	16				40	
	1.09 ASSIST CITY WITH PERMITTING AND AGENCY REVIEWS	8		40				48	
	1.08 QA/QC REVIEWS	40						40	
Deliverables									
1. MEETING AGENDAS & NOTES 2. SUBSURFACE INVESTIGATION REPORT 3. CONSTRUCTION PLANS AND SPECS 4. PERMIT APPLICATIONS 5. UPDATED CONSTRUCTION COST ESTIMATES									
	Total Hours Per Team Member	726	2012	2576	4700				
		10030							
	Total Hourly Rate Per Team Member	\$225.00	\$185.00	\$125.00	\$100.00				
	Total Cost Per Team Member	\$163,350.00	\$372,220.00	\$322,000.00	\$470,000.00				
	Direct Expenses	\$244,275.00	Total Package Cost					\$1,571,845	
	Mileage, Copying, etc.	\$1,000.00							
	Field Surveying (Subconsultant)	\$8,300.00	Robbie Henderson Surveying & Planning						
	3D Laser Scanning of Existing Structures (Subconsultant)	\$10,000.00	TBD						
	Electrical & Instrumentation Design (Subconsultant)	\$196,800.00	ESAD						
	Geotechnical Subsurface Investigation (Subconsultant)	\$28,175.00	Southern Geotechnical Consultants (SGC)						

Man-hour Planning Sheet

Client/Facility: CITY OF MONROE, GEORGIA
Project Title: CITY OF MONROE JACKS CREEK WPCP EXPANSION TO 6.8 MGD
Prepared by: WIEDEMAN AND SINGLETON, INC.



Work Task Name		BID PHASE SERVICES							Civil and Environmental Engineers	
Work Task Number		002		Name of Team or Classification						
Notes:		Sub-tasks		PRIN/PM	SR PE	PE	EIT	Total		
	2.01 ASSIST W/ PRE-QUALIFICATION OF CONTRACTORS		8		16				24	
	& SOLICITATION OF BIDS									
	2.20 RESPOND TO QUESTIONS FROM CONTRACTORS & SUPPLIERS		12	40	60			112		
	2.03 ISSUE ADDENDA AS REQUIRED		4	8	24	24		60		
	2.04 ATTEND AND PARTICIPATE IN A PRE-BID CONFERENCE		6		6			12		
	2.05 ASSIST WITH THE BID OPENING MEETING AND PROVIDE A TABULATION OF		8		8	16		32		
	BIDS AND RECOMMENDATION OF AWARD									
	2.06 PREPARE CONSTRUCTION DOCUMENTS		4	8	16	40		68		
Deliverables										
1. CONTRACTOR PRE-QUALIFICATION DOCS										
2. RECOMMENDATION LETTER FOR										
PRE-QUALIFICATION OF CONTRACTORS		Total Hours Per Team Member								
3. ADDENDA (IF NECESSARY)		42	56	130	80			308		
4. BID TABULATION		Total Hourly Rate Per Team Member								
5. BID RECOMMENDATION LETTER		\$225.00	\$185.00	\$125.00	\$100.00					
6. CONSTRUCTION CONTRACT & CONSTRUCTION		Total Cost Per Team Member								
READY DOCUMENTS (PLANS & SPECS)		\$9,450.00	\$10,360.00	\$16,250.00	\$8,000.00					
		Direct Expenses		\$3,760.00	Total Package Cost				\$47,820	
Mileage, Construction Ready Documents, etc.				\$1,000.00						
Electrical, Instrumentation and HVAC Engineering Services				\$2,760.00	(Subconsultant - ESAD)					

III: SCHEDULE

It is our understanding that the City would like to start detailed design as soon as possible. As such, we envision the Jacks Creek WPCP upgrades and expansion being designed and permitted and bids solicited and received in general accordance with the overall schedule shown below. This schedule is based on our experience with other similar municipal projects utilizing a traditional design-bid-build approach.

Proposed Project Implementation Schedule

Activity	Target Start	Late Completion
Detailed Engineering Design & Permitting	ASAP	June 30, 2026
Bid Period	July 1, 2026	August 31, 2026

For planning purposes, following receipt of bids from general contractors, the construction period is estimated to be 18-24 months.