

2019-0176

**INTRODUCED BY: LARRY COCHRAN, PARISH PRESIDENT
(DEPARTMENT OF PUBLIC WORKS)**

ORDINANCE NO. 19-6-8

An ordinance to approve and authorize the execution of a professional service agreement with Stuart Consulting Group, Inc. for providing all necessary professional engineering services for a preliminary study for the Ormond Center project. (Parish Project Number P190505).

WHEREAS, the Parish owns and maintains certain culverts that discharge through the Ormond Center development and that are downstream from the Cypress Lakes weir; and,

WHEREAS, the Public Works Department desires to assess the condition of these culverts; and,

WHEREAS, the attached Agreement between the Parish and Stuart Consulting Group describes the details of the proposed services for the condition assessment along with compensation.

THE ST. CHARLES PARISH COUNCIL HEREBY ORDAINS:

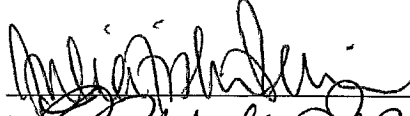
SECTION I. That the Professional Services Agreement between Stuart Consulting Group and St. Charles Parish for services as required by the Department of Public Works is hereby approved and accepted.

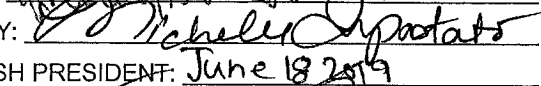
SECTION II. That the Parish President is hereby authorized to execute said Professional Services Agreement on behalf of St. Charles Parish.

The foregoing ordinance having been submitted to a vote, the vote thereon was as follows:

- YEAS: BENEDETTO, WILSON, CLULEE, GIBBS, WOODRUFF, BELLOCK,
 FLETCHER, FISHER-PERRIER
- NAYS: NONE
- ABSENT: HOGAN


And the ordinance was declared adopted this 17th day of June, 2019, to become effective five (5) days after publication in the Official Journal.

CHAIRMAN: 

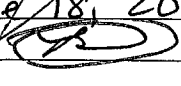
SECRETARY: 

DLVD/PARISH PRESIDENT: June 18, 2019

APPROVED: DISAPPROVED:

PARISH PRESIDENT: 

RETD/SECRETARY: June 18, 2019

AT: 3:30 pm RECD BY: 

AGREEMENT FOR ENGINEERING SERVICES

THIS AGREEMENT made and effective as of the 18th day of June, 2019, by and between ST. CHARLES PARISH acting herein by and through its President, who is duly authorized to act on behalf of said Parish, hereinafter called the Owner, and Stuart Consulting Group, Inc. a corporation hereinafter called Engineer. Whereas the Owner desires to employ a professional consulting engineering firm to perform engineering services for the Ormond Center Preliminary Study project, Project No. P190505 as described in Ordinance No. 19-6-8, which is attached hereto and made a part hereof.

1.0 GENERAL

The Owner agrees to employ the Engineer, and the Engineer agrees to perform professional services required for the project described above. The Engineer will conform to the requirements of the Owner and to the standards of the agencies participating with the Owner in the Project. The Engineer will coordinate all work between the Owner and all participating agencies and regulating agencies, where specified in Engineer's proposal dated May 24, 2019 (Proposal), which is attached hereto and made a part hereof.

Engineer may begin work upon issuance of a Notice to Proceed. The Owner may terminate the Agreement by written notification and without cause per Section 7.0.

2.0 CHARACTER AND EXTENT OF BASIC SERVICES OF THE ENGINEER

- 2.1 Engineer shall provide for Owner professional engineering services in all phases of the Project to which this Agreement applies and as hereinafter provided to properly plan and execute the work on the project(s) assigned to the Engineer. These services will include but will not be limited to serving as Owner's professional engineering representative for the Project, providing professional engineering consultation and advice, and furnishing customary civil engineering.
- 2.2 In general the Project consists of the planning services shown in the Proposal. The project understanding is described in the Proposal.
- 2.3 Services provided by the Engineer shall be performed in accordance with generally accepted professional engineering practice at the time and the place where the services are rendered.
- 2.4 Engineer shall provide minutes of all meetings with St. Charles Parish.

3.0 SERVICES OF THE OWNER

- 3.1 Assist the Engineer by placing at his disposal all existing plans, maps, field notes, statistics, computations and other data in its possession relative to existing facilities.

- 3.2 Guarantee access to and make all provisions for the Engineer and his subconsultants to enter upon public property as required for performing the services.
- 3.3 Clean culverts as described in the Proposal. Construct temporary dam to provide mostly dry culverts downstream of Cypress Lakes weir. **Contractor shall make all OSHA-compliant safety precautions in the event that the temporary dam might fail.**

4.0 COMPENSATION

- 4.1 For performance of Basic Engineering as outlined in Section 2 above, the Owner shall authorize and pay the Engineer a not-to-exceed fee, based on the Standard Hourly Rates in the Proposal, and actual time and costs. The not-to-exceed fee is \$41,260.
- 4.2 If the Agreement, or any portion thereof, is not completed for any reason, the final fee for basic engineering services shall be negotiated between Owner and Engineer as per Section 7.0
- 4.3 The following documentation shall be required for payment to Engineer and shall be attached to the monthly invoice.
 - 4.3.1 A copy of the Owner's written authorization to perform the service.
 - 4.3.2 Timesheets for all hours invoiced.
 - 4.3.3 Invoice copies, logs or other substantiation of non-salary expenses.
- 4.4 For additional engineering and other services described in Section 5, Owner shall pay Engineer for the fee negotiated at the time the work is assigned by the method stipulated in the contract amendment.

5.0 CHARACTER AND EXTENT OF ADDITIONAL ENGINEERING

- 5.1 The Owner reserves the right to request Engineer to provide Additional Engineering and/or Additional Services described in Section 5, Paragraphs 5.1.1 through 5.1.2.6 inclusive. It is mutually understood that the Owner reserves the right to reevaluate any/all interested Engineering Firms concerning Additional Engineering or Additional Services as described in Section 5.0. The Owner shall issue written authorization to the Engineer to provide Additional Engineering and/or Additional Services prior to the performance of any Additional Engineering and/or Additional Services as described in Section 5, Paragraph 5.1 through 5.1.2.6 inclusive.
 - 5.1.1 Additional Engineering. Provide Basic Design and Construction Engineering Services for a negotiated fee. The fee for Basic Engineering Services related to the design and construction for the associated work shall be negotiated at the time the work is assigned

and this Agreement shall be amended to include that work in accordance with Section 4.0 of this Agreement.

- 5.1.2 Additional Services. Furnish or obtain from others Additional Services of the following types. The fee for Additional Services shall be authorized at the time the work is assigned in accordance with Section 4.4 of this Agreement.
 - 5.1.2.1 Furnish survey personnel to lay out and stake out for construction, giving line locations and grade stakes at the required intervals.
 - 5.1.2.2 Prepare to and serve as an expert witness for the Owner in any litigation.
 - 5.1.2.3 Act as the Owner's representative in coordination of and be present during negotiations between Owner and other Governmental Bodies, Utility Companies, Transportation Companies, etc. (Prepare necessary data for such activities and review and make recommendations on data submitted by such agencies.)
 - 5.1.2.4 Services resulting from significant changes in the general scope, extent or character of the Agreement.
 - 5.1.2.5 Providing renderings for Owner's use.
 - 5.1.2.6 Providing any type of property surveys or related engineering services needed for the transfer of interests in real property.

6.0 OWNERSHIP OF DOCUMENTS

- 6.1 Documents including but not limited to plans, specifications, maps, basic survey notes, sketches, charts, computations and all other data prepared or obtained under the terms of this authorization shall become the property of the Owner and shall be made available for Owner's inspection at any time during the Agreement and, shall be delivered to the Owner prior to termination or final completion of the Agreement.
- 6.2 Engineer may retain a set of documents for its files.
- 6.3 Reuse of Documents. Any reuse of documents or materials without written authorization or adaptation by Engineer to the specific purpose intended will be at Owner's sole risk and without liability or legal exposure to Engineer or to Engineer's independent professional associates, subcontractors, and consultants.
- 6.4 No materials, to include but not limited to reports, maps or other documents produced as a result of this Agreement, in whole or in part, shall be available to Engineer for copyright purposes. Any such materials produced as a result of this Agreement that might be subject to copyright shall be the property of the Owner and all such rights shall belong to the Owner, and the Owner shall be sole and exclusive entity who may exercise such rights.

7.0 TERMINATION.

- 7.1 This Agreement may be terminated by either party upon thirty (30) days written notice.
- 7.2 The Engineer, upon receipt of such notice, shall immediately discontinue all services in connection with the performance of this Agreement and shall proceed to cancel promptly all existing orders and contracts insofar as such orders or contracts are chargeable to this Agreement.
- 7.3 The Engineer shall, as soon as practicable after receipt of notice of termination, submit a statement showing in detail the services performed and payments received under this Agreement to the date of termination.
- 7.4 The Owner shall then pay the Engineer promptly that portion of the prescribed fee to which both parties agree.
- 7.5 Failure to meet agreed delivery dates or authorized extensions are considered substantial failures.

8.0 COMPLIANCE WITH LAWS AND ORDINANCE.

- 8.1 The Engineer hereby agrees to comply with all Federal, State and Local Laws and Ordinances applicable to the work or services under this Agreement.

9.0 SUCCESSORS AND ASSIGNS

- 9.1 Owner and Engineer each bind himself, his successors, executors, administrators and assigns to the other party to this Agreement, and to the successors, executors, administrators and assigns of each other party in respect to all covenants of this Agreement.

10.0 INSURANCE

- 10.1 The Engineer shall secure and maintain at his expense such insurance that will protect him and the Owner, from claims under Workmen's Compensation Acts and from claims for bodily injury, death or property damage which may arise from performance of services under this Agreement. Insurance for bodily injury or death shall be in the unencumbered amount of \$500,000.00 for one person and not less than \$1,000,000.00 for all injuries and/or deaths resulting from any one occurrence. The insurance for property damage shall be in the unencumbered amount of \$250,000.00 for each accident and not less than \$1,000,000.00 aggregate.
- 10.2 The Engineer shall also secure and maintain at his expense professional liability insurance in the unencumbered sum of \$500,000.00.
- 10.3 All certificates of insurance shall be furnished to the Owner and shall provide that insurance shall not be cancelled without ten (10) days prior written notice to the Owner. The Owner may examine the policies.
- 10.4 Engineer shall include all subcontractors and/or subconsultants as insured under its policies or shall furnish separate certificates for each. All coverages for subcontractors and/or subconsultants shall be subject to all the requirements stated herein.

- 10.5 St. Charles Parish shall be named as an additional insured on general liability insurance policies.
- 10.6 For all purposes under Louisiana law, the principals of this Agreement shall be recognized as the statutory employer of all contract employees as provided in LSA-R.S. 23:1061.

11.0 GENERAL

- 11.1 The Engineer shall indemnify and save harmless the Owner against any and all claims, demands, suits or judgments for sums of money to any party for loss of life or injury or damages to person or property, growing out of, resulting from or by reason of any negligent act by the Engineer, its agent, servants or employees, while engaged upon or in connection with the services required or performed hereunder.
- 11.2 While in the performance of services or carrying out other obligations under this Agreement, the Engineer shall be acting in the capacity of the independent contractors and not as employees of the Owner. The Owner shall not be obligated to any person, firm or corporation for any obligations of the Engineer arising from the performance of their services under this Agreement. The Engineer shall be authorized to represent the Owner with respect to services being performed, dealing with other agencies and administrations in order to perform the services under this Agreement.
- 11.3 The Engineer warrants that he has not employed or retained any company or person other than a bona-fide employee working solely for the consultant, to solicit or secure this Agreement, and that they have not paid or agreed to pay any company or person other than bona-fide employees working solely for the consultant, any fee, commission, percentage, brokerage fee, gifts or any other consideration, contingent upon or resulting from the award or making of this Agreement. For breach or violation of this warranty, the Owner shall have the right to annul this Agreement without liability.
- 11.4 This Agreement being for the personal services of the Engineer shall not be assigned or subcontracted in whole or in part by the Engineer as to the services to be performed hereunder without the written consent of the Owner.
- 11.5 Should either party to this Agreement have to file suit in order to enforce the provisions of hereof, the losing party hereby agrees to pay the attorney's fees of the prevailing party.
- 11.6 No member of the Governing Body of the Owner and no other officer, employee or agent of the Owner who exercises any functions or responsibilities in connection with the planning and carrying out to the Program, shall have any personal financial interest, direct or indirect, in this Agreement, and the Engineer shall take appropriate steps to assure compliance.
- 11.7 No member of the Governing Body of the locality and no other public official of such locality, who exercises any functions or responsibilities in connection

with the planning and carrying out of the Program, shall have any personal financial interest, direct or indirect, in this Agreement, and the Engineer shall take appropriate steps to assure compliance.

- 11.8 The Engineer covenants that he presently has no interest and shall not acquire interest, direct or indirect, in the project area or any parcels therein or any other interest which would conflict in any manner or degree with the performance of his services hereunder. The Engineer further covenants that in the performance of this Agreement no person having any such interest shall be employed.

12.0 ACCESS TO SITE

- 12.1 Owner shall be fully responsible for obtaining the necessary access authorizations to allow Engineer, its agents, subcontractors and representatives, to have access to all areas of public and private property as required by Engineer in order to perform its services under this Agreement.

13.0 WARRANTY

- 13.1 Engineer warrants that it will perform any design services with the degree of skill and to the standard of care required of the engineering profession to meet all Federal, State and Local requirements
- 13.2 If Engineering Services designed by Engineer does not meet those requirements noted in 13.1 above, then to the extent that this occurs as a direct result of Engineer's failure to meet the standard of care in its design services, Engineer will indemnify the Parish for Engineer's share of the costs incurred to bring Engineering Services for project to the limitations mandated.
- 13.3 The obligations expressed in 13.1 and 13.2 in no way limits the Engineer's obligations expressed elsewhere in this Agreement.

14.0 EXCLUSIVE JURISDICTION AND VENUE

- 14.1 For all claims arising out of or related to this agreement, ENGINEER hereby consents and yields to the exclusive jurisdiction and venue of the Twenty-Ninth Judicial District Court for the Parish of St. Charles and expressly waives any (a) pleas of jurisdiction based upon ENGINEER'S residence and (B) right of removal to Federal Court based upon diversity of citizenship.

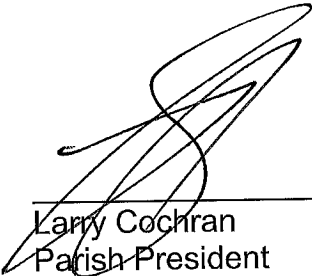
IN WITNESS WHEREOF, the parties to these presents have hereunto caused these presents to be executed the day, month and year first above mentioned.

WITNESSES:

ST. CHARLES PARISH

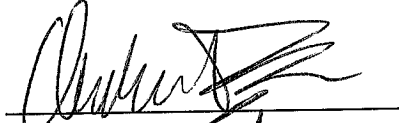
Don S. Delchance

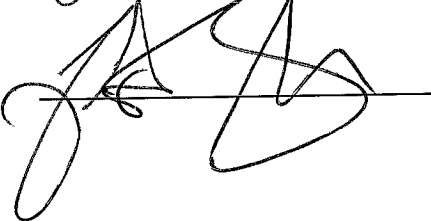
Billy Raymond

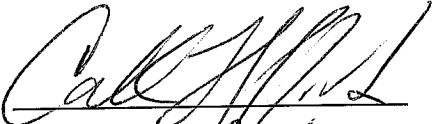

Larry Cochran
Parish President

WITNESSES:

STUART CONSULTING GROUP






CALVIN E. HOPPMAYER
VICE PRESIDENT

St. Charles Parish Drainage Improvements
SCG Project #: 017-18-01

Existing Conditions

The project as understood by Stuart Consulting Group (SCG) consist of 2 individual sites in St. Charles Parish (Owner) discussed below.

Site 1 – Ormond Center. An existing thirty (30) foot drainage servitude that is located under a portion of the Ormond Center’s Parking Lot. Within the drainage servitude is one (1) or two (2) sixty inch (60”) corrugated metal pipe(s) (CMP) or culvert(s) that connect the upstream side of McCutcheon Canal to the downstream side flowing under Highway 61.

Site 2 - Cypress Lakes South Weir. The weir is a water control structure that is used to maintain a specific water lever in the Cypress Lakes at the Ormond Country Club. The weir allows significant rain events rain events to flow over the top into one (1) sixty inch (60”) reinforced concrete pipe (RCP) that then is split into two pipes. Both of these pipes (a twelve inch (12”) RCP and a sixty inch (60”) RCP) flow across Ormond Blvd and then into two (2) sixty inch (60”) reinforced concrete arch pipe (RCP-A) before discharging into the downstream open channel adjacent to the Ormond Place apartment complex.

Scope of Work

The scope of work has been broken into two (2) phases described below for each site listed above.

Phase 1 – CCTV Investigation

A. Site 1 and 2

1. Inspection of culverts that flow out of the Cypress Lake weir and the Ormond Center.
 - a. It is our understanding that Owner will clean the culverts at both site in order to perform the CCTV investigation.
 - b. It is anticipated that a coffer dam and bypass pumping will be required in order to clean the culverts.
 - c. The cost provided is for only a full line inspection. It does not include installation of a coffer dam or bypass pumping operations required to perform the inspection.
 - i. If not provided by Owner, coffer dam can be provided. Estimated unit price for Cofferdam installation for both sites is included in the fee schedule section of this proposal.
 - ii. If not provided by Owner, bypass pumping operations will be provided. Estimated unit price for bypass pumping for both sites is included in the fee schedule section of this proposal.

Phase 2 – Preliminary Design Report

- A. Based on the findings of the existing culverts’ structural conditions, SCG will recommend:
 1. Options for maintenance of the culverts.

2. Options for capital improvements of the culverts.
- B. Preliminary Design Report will include:
 1. Recommended options for maintenance of the culverts, if applicable.
 2. Recommended capital improvements, if applicable.
 3. Any data, reports and/or videos generated by the CCTV investigation
 4. An engineer's estimated of probable cost associated with the recommendations provided within.

Project Schedule

Phase 1 - CCTV Inspection

A. Site 1 and 2

1. Inspection report within thirty (30) days after the receipt of Notice to Proceed for Phase 1.

Phase 2 – Preliminary Design Report

1. SCG shall provide a completed report for Owner's review within thirty (30) days after receipt of final CCTV inspection reports.

Fee Proposal and Hourly Rate Schedule

Phase 1 – CCTV Investigation

A. Estimated Project total for Phase 1 is **\$7,500.00**

B. If required, additional cost for Phase 1 include:

1. Cofferd Dam

a. Unit price per each for Cofferd Dam installation and removal:

1. Site 1: **\$36,120.00**

2. Site 2: **\$19,620.00**

2. Bypass Pumping Operations

a. Estimated unit price per day for bypass pumping operations:

1. Site 1: **\$4,250.00 x 2 days**

a. Unit price for bypass pumping operations includes mobilization, setup, operation, teardown and demobilization of 12" bypass pump, suction hoses and discharge hoses.

2. Site 2: **\$2,000.00 x 2 days**

a. Unit price for bypass pumping operations includes mobilization, setup, operation, teardown and demobilization of 6" bypass pump, suction hoses and discharge hoses.

Phase 2 – Preliminary Design Report

A. Engineer shall be compensated for Basic Services with a lump sum fee of Thirty-Three Thousand Seven Hundred and Sixty Dollars (**\$33,760.00**)

Total Estimated Fee

A. The total estimated fee for Phase 1 and 2, is Forty-One Thousand Two Hundred Sixty Dollars (**\$41,260.00**)

B. If required, total additional cost for Phase 1 is Sixty-Eight Thousand Two Hundred Forty Dollars (**\$68,240.00**)

Attachments

- CCTV Proposal for full line CCTV investigation (CES)
- Figure 1
- Figure 2
- SCG Fee Schedule



May 23, 2019

Gene Robinson, Jr.
Stuart Consulting Group, Inc. (Herein Referred to as the Engineer)
1018 Central Ave., Suite 200
Metairie, LA 70001
T: 504.888.5733
gener@stuartconsultinggroup.com

RE: Proposed Fees for Storm Drain Evaluation Services in St. Charles Parish, LA

Mr. Robinson:

In response to your request, Compliance EnviroSystems, LLC (CES) is pleased to provide you with this proposal for professional services on the project referenced above.

The following sections are provided for your review:

1. Scope of Work
2. Fee Schedule
3. Deliverables
4. CES Standard Special Provisions
5. Notice to Proceed

Please review this document carefully. If you are in agreement, please sign where indicated and return by e-mail to jgraham@ces-sses.com. Upon receipt of your approval, our Operations Manager will schedule your project.

Thank you for the opportunity to submit this proposal. If selected, CES will provide our services at the highest professional level.

If you have any questions, please feel free to contact me by phone **985.502.5667** or e-mail at any time.

SOUND DATA. SOLID CONCLUSIONS.



COMPLIANCE ENVIROSYSTEMS

SCOPE OF WORK

The scope of work for this project involves the CCTV inspection of approximately 750 LF of 60" storm drain pipe that flows out of the Cypress Lake weir and the CCTV inspection of approximately 650 LF of 60" storm drain pipe at Ormond Center in St. Charles Parish, LA (herein referred to as the Owner).

FEE SCHEDULE

Item No.	Description	Quantity	Unit	Unit Price	Extended Price
1	CCTV Inspection Unit with Operator & Helper	2	DAY	\$3,750.00	\$7,500.00
Estimated Project Total: \$7,500.00					

**** The above rate is an hourly port-to-port rate, meaning the clock starts when CES trucks leave the staging yard and the clock stops when CES trucks return to the staging yard. After taking into consideration the information provided by the Engineer, CES estimates the work at 2 days to complete. Please keep in mind, as with all subsurface projects, it is impossible to predict the conditions underground. With that said, the project duration could be substantially less or much longer than the time estimated to complete the project.**

DELIVERABLES

The standard electronic deliverable (all inspection videos, photographs a database including coding information and inspection reports) will be submitted on an external USB hard drive.

ELECTRONIC DELIVERABLE CONTAINS:

- Pipeline Assessment Certification Program (PACP) database with CCTV inspection videos (PACP Coded)
- PACP pipe rating index & PACP coding information
- Inspection reports in .PDF format and organized by line segment

STANDARD SPECIAL PROVISIONS

- The quantities shown in fee schedule are estimates only. Actual quantities collected during field operations will be applied to the fee schedule in order to determine final costs.



COMPLIANCE ENVIROSYSTEMS

- CES assumes that the pipes will be clean prior to arrival of CES CCTV inspection crew. If the CCTV camera is unable to traverse the entire pipe segment due to debris accumulation, a price for cleaning the pipe segment will be negotiated between CES and the Engineer.
- CES assumes that coffer dams and bypass pumping equipment will be installed and maintained by the Owner. If the CCTV camera is unable to traverse the entire pipe segment due to surcharged pipe conditions, a price for installation of coffer dams and bypass pumping will be negotiated between CES and the Engineer.
- All manholes/catch basins within the project area will be located and made accessible, at no cost to CES, by the Owner. The Owner shall facilitate physical, safe and legal access to manholes/catch basins needed for deployment to the pipelines to be cleaned and inspected. The Owner shall open any sealed, vented or other non-standard manholes/catch basins and reinstall and/or reseal them as necessary after the inspection is complete. The Owner shall locate and expose such manholes/catch basins that are not visible, not accessible or are partially or completely covered.
- If through no fault of CES operators, inspection equipment becomes lodged in the collection system, the Owner will provide excavation services to retrieve the equipment at no cost to CES.
- Transmittal of this proposal in no way suggests, indicates or guarantees a timeline for mobilization.
- Payment in full shall be made to CES within 30 calendar days after receipt of invoice. If any portion of the payment is received by CES after the payment due date as set forth above, or if any portion of the payment is received by CES in funds that are not immediately available, then a late payment penalty shall be due to CES. The late payment penalty shall be the portion of the payment not received by the payment due date multiplied by a late factor. The late factor shall be 10% per annum compounded daily for the number of days from the payment due date to and including the date that the Engineer actually makes the payment to CES.
- This proposal remains valid for 30 days.



COMPLIANCE ENVIROSYSTEMS

RE: Proposed Fees for Storm Drain Evaluation Services in St. Charles Parish, LA

Your signature will serve as **Notice to Proceed** on this project.

Name (Printed) _____

Title _____

Signature _____ Date _____

Respectfully Yours,

Josh Graham

Josh Graham

Business Development

Compliance EnviroSystems, LLC





C: (985) 502-5667

jgraham@ces-sses.com

www.ces-sses.com



Figure 1

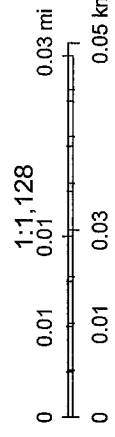
- Legend**
-  CVS Pharmacy
 -  McDonald's
 -  Roto's Pizzeria Destrehan
 -  Sports Pub & Grill Inc

Cypress Lakes South Weir



June 7, 2018

- Streets
- Addresses
- Culvert Inverts
- Manholes
- Parcels
- Culverts
- Catch Basin
- Pump Stations



Source: Esri, DigitalGlobe, GeoEye, Earthstar Geographics, CNES/Airbus DS, USDA, USGS, AeroGRID, IGN, and the GIS User Community

Preliminary Design Report

Phase	Task	Engineer Intern	Engineer	Senior Engineer	Principal	Administrative
CCTV Investigation and Determination of Investigation Method	Site Visits (2)	8	8	8	0	0
	Owner's Meeting and Correspondence	0	4	4	2	2
	CCTV Review Site 1	12	8	6	0	0
	CCTV Review Site 2	12	8	2	0	0
	Subtotal	32	28	20	2	2
	Unit Cost	\$ 116.00	\$ 150.00	\$ 235.00	\$ 260.00	\$ 50.00
	Research Cost	\$ 3,712.00	\$ 4,200.00	\$ 4,700.00	\$ 520.00	\$ 100.00
Report	Owner's Meeting and Correspondence	0	4	4	2	2
	Report Generation	40	32	8	0	12
	Review	0	10	6	4	0
	Revisions	8	4	2	0	10
	Subtotal	48	50	20	6	24
	Unit Cost	\$ 116.00	\$ 150.00	\$ 235.00	\$ 260.00	\$ 50.00
	Research Cost	\$ 5,568.00	\$ 7,500.00	\$ 4,700.00	\$ 1,560.00	\$ 1,200.00
Total Costs Per Employee Type		\$ 9,280.00	\$ 11,700.00	\$ 9,400.00	\$ 2,080.00	\$ 1,300.00
Total						\$33,760.00