



Consultant Services Authorization

Firm	HDR Engineering Inc.
Master Agreement No.	22-087
CSA No.	22-087-01
Project Name	CR54 (Ronald Reagan Pkwy) at May Fair Blvd Intersection Improvements
Project Description	Design a new mast arm traffic signal system to control the intersection which will include full pedestrian features to accommodate crosswalks
Projects Exhibits and Attachments	Exhibit "A"- Scope of Services Exhibit "B"-Fee Schedule (Master Agreement) Exhibit "C"-Reimbursable Cost Schedule Exhibit "D"-Insurance Documents
Duration (in days)	through completion of construction
Compensation	Total Cost Not to Exceed: \$ 166,978.03
Special Contract Conditions	NONE
Insurance Requirements	Professional Liability
Liquidated Damages	\$ 0 Per Day
Budget Source/Availability	14971.540152101.5666000.5400235

IN WITNESS WHEREOF, the parties hereto have executed this CSA on this ___ day of _____, 20__.

Attest:

STACY M. BUTTERFIELD

POLK COUNTY, a Political subdivision
of the State of Florida

By: _____
Deputy Clerk

By: _____
Chairperson
Board of County Commissioners

Date Approved by Board: _____

Review as to form and legal sufficiency
Sandra B. Howard 5/2/23
County Attorney's Office Date

Attest:

[Signature]
Asst. Corporate Secretary

SEAL

Date: 04/10/2023

HDR Engineering Inc.
CONSULTANT COMPANY NAME
[Signature]
Authorized Corporate Officer
Katie E. Duty, Vice President
[Printed Name and Title]

Date: 04/10/2023

Exhibit "A"
Scope of Services for
CR 54/Ronald Reagan Pkwy. at May Fair Blvd Signalization Improvements - Design & Plans
General Engineering Consulting Services for Transportation Engineering Contract
(Master Agreement #2022-087)
CSA #22-087-01
03/30/2023

I. PURPOSE & BACKGROUND

The purpose of this Exhibit is to define the responsibilities of the **CONSULTANT** and the **COUNTY** in connection with the design and preparation of construction plans and specifications for improvements to the CR 54/Ronald Reagan Pkwy. at Westside Blvd. / Westside Lakes Rd. intersection in Polk County, Florida.

CR 54 is an east-west collector in north-east Polk County that EXTENDS from US 27 to east of US 17. The intersection of CR 54 at May Fair Blvd. is located approximately 1.5 miles west of I-4 and is currently unsignalized with stop-control on the minor south approach (May Fair Blvd.) as indicated in the aerial image below.



Exhibit "A" Scope of Services

CSA #22-087-01

CR 54/Ronald Reagan Pkwy. at May Fair Blvd. Signalization Improvements - Design & Plans

COUNTY has requested **CONSULTANT** to provide final design services, construction plans and specifications development support to incorporate the intersection improvements as defined under PROJECT DESCRIPTION. County Push Button Construction Contracting is anticipated therefore the plans and specifications will be condensed and utilize the pay item information specified in the applicable County Push Button Contract(s) to the extent practical.

All improvements are to be within the existing County right of ways. No right of way or easement acquisition is anticipated to accommodate the proposed improvements. The posted speeds on CR 54 and on Westside Blvd. are 45 MPH and 35 MPH respectively. A design speed of 45 MPH is assumed for any required CR 54 roadway improvements.

The roadway, signing & pavement marking and signal design shall be based on the 2018 Manual of Uniform Minimum Standards for Design, Construction and Maintenance for Streets and Highways (aka "Florida Greenbook"), FY 2022-23 FDOT Design Standards for Construction and Maintenance Operations on the State Highway System, 2009 FHWA Manual on Uniform Traffic Control Devices and the Polk County Technical Standards Manual (revised 10/2009).

II. PROJECT DESCRIPTION

- Design a new traffic signal system with three mast arms, illuminated internally street name signs and noninvasive signal detectors (if space for inductive loop detection (ILD) is not available) to control the intersection
- Improve existing signage and consider providing advance street name signs on the mainline CR 54
- Improve/reconstruct existing sidewalks in the immediate vicinity of the intersection and ADA ramps as required to accommodate crosswalks on the side street (Stem of T) and crossing Ronald Regan Parkway where the connection point is not in conflict with the existing guardrail
- Mill & Resurface those portions of CR 54 and the minor cross streets without impacting existing brick pavers as required to accommodate the new pavement markings for the traffic and pedestrian signal systems
- Perform utility coordination

III. DESIGN PHASE SERVICES

The **CONSULTANT** shall provide complete design services for the project except as specifically excluded in this Scope of Services.

The project will be accomplished under a Professional Services Agreement in phases consisting of 60%, 90%, and 100%/Final submittals for review.

The **COUNTY** will provide all required design and right of way survey information and other available information to the **CONSULTANT** for use in preparing the construction plans.

The **CONSULTANT** shall furnish professional engineering services for the final design and preparation of construction plans and specifications for the subject roadway section.

The **CONSULTANT's** Scope of Services shall include:

- Preparation of construction plans incorporating the proposed roadway, erosion control, maintenance of traffic scheme, signing and pavement marking and signalization improvements

Exhibit "A" Scope of Services

CSA #22-087-01

CR 54/Ronald Reagan Pkwy. at May Fair Blvd. Signalization Improvements - Design & Plans

- Technical specifications support if needed. County Push Button Construction Contracting is anticipated
- Bid item quantities and construction cost estimates
- Post design services

During the design phase, services are to be provided in accordance with the following sections for development of the final construction plans. The **CONSULTANT** shall prepare construction plans for the project limits specified in this Scope of Services.

1) Design and Right-of-Way Survey

COUNTY shall furnish all required design survey data in electronic format as required to complete the project, including but not limited to the following:

- a) Survey baseline alignments
- b) Horizontal and Vertical survey control information
- c) Topographic survey
- d) DTM
- e) Aboveground utilities including locations and elevations of the lowest overhead electric primary distribution and transmission lines at the intersection.
- f) Existing R/W lines and property lines

The **COUNTY** shall furnish the **CONSULTANT** with copies of existing right-of-way maps within the vicinity of the project.

2) Geotechnical Services

The **CONSULTANT** will provide all geotechnical information required for the project. See attached proposal from Tierra, Inc.

If excavation, boring or otherwise disturbing the right-of-way takes place on COUNTY roads, the CONSULTANT or his Subconsultant shall obtain a County Right-of-Way Use Permit for such work. The PROFESSIONAL or his Subconsultant shall also notify all concerned utilities 48 hours in advance of any activity that may disturb their facilities or require a Maintenance of Traffic (MOT) permit. All work zone traffic control will be performed in accordance with the FDOT's Roadway and Traffic Design Standards Indices 600-660 (Topic No. 625-010-003.C).

3) Subsurface Utility Exploration

- a) **CONSULTANT** shall furnish Subsurface Utility Exploration services to include designation of selected utilities in the immediate vicinity of the intersection and up to 24 test holes (VVH) per intersection to clear signal mast arm foundation locations and single post sign locations. See attached proposal from McKim & Creed, Inc.
- b) **If excavation, boring or otherwise disturbing the right-of-way takes place on COUNTY roads, the CONSULTANT or his Subconsultant shall obtain a County Right-of-Way Use Permit for such work.** The PROFESSIONAL or his Subconsultant shall also notify all concerned utilities 48 hours in advance of any activity that may disturb their facilities or require a Maintenance of Traffic (MOT) permit. All work zone traffic control will be performed in accordance with the FDOT's Roadway and Traffic Design Standards Indices 600-660 (Topic No. 625-010-003.C).

Exhibit "A" Scope of Services

CSA #22-087-01

CR 54/Ronald Reagan Pkwy. at May Fair Blvd. Signalization Improvements - Design & Plans

4) Roadway Plans Preparation

- a) **CONSULTANT** shall develop a roadway design and furnish complete and final roadway construction plans for the project to include key sheet, summary of pay items, typical sections, summary of quantities, roadway plan sheets, roadway cross sections at minimum 50-foot increments (to include selected intersecting streets and driveways), traffic control plans, erosion control plans, utility adjustment plans, signing and pavement marking plans, signalization plans and any other incidental details.
- b) **CONSULTANT** shall develop and incorporate the proposed intersection improvements design in coordination with the **COUNTY**.
- c) Construction plans are to be in 11"x17" format. Plan sheets are to be in an acceptable scale (e.g., 1 inch = 40 feet). Key sheets and overall project sheets shall not exceed a scale of 1 inch = 200 feet. See "Submittals and Design Reviews" for specific plans submittal information.

5) Drainage Design

No drainage improvements are required, anticipated or included in this Scope of Services.

6) Utility Coordination

Utility Coordination services for all existing utilities include:

- a) The **CONSULTANT** is responsible for coordinating its design work with the public and private Utility Agency/Owners (UAOs) having existing and/or planned facilities within the limits of the project. Prior to the 60% complete design phase, **CONSULTANT** shall notify by letter and e-mail, all public and private UAOs that may have utilities within the project limits. Notification shall include a description of the project and an outline of the design schedule. Electronic copies of complete design drawings are to accompany the contact letter, with a markup Greenline set to be returned to the **CONSULTANT** with plot of UAO's existing/proposed facilities.
- b) **CONSULTANT** shall provide the UAOs electronic plan sets at the 60%, and 100% complete design phases. At each design phase, the utility agencies and companies will be instructed to return marked-up plans to the **CONSULTANT** showing their utility relocation, adjustment and new facilities design, as well as existing utilities to remain per the County's Utility Coordination Manual. The **CONSULTANT** shall coordinate with the **COUNTY** to hold a utility coordination meeting with required attendance by the UAOs to review and resolve any possible utility conflicts or related concerns. The **CONSULTANT** shall provide the UAOs a minimum of two weeks notice for the coordination meetings.
- c) **CONSULTANT** utility coordination responsibilities shall continue throughout the design process to assist the **COUNTY** with resolving utility conflicts. Any utility design services for new facilities or the proposed relocation and adjustment of existing facilities are not included in this scope of services nor will be the responsibility of the **CONSULTANT**. **CONSULTANT** responsibilities are to incorporate the mark-up information provided by the UAOs on the roadway plans.

Possible relocation/adjustments of the existing Duke Energy distribution lines located on the north side of CR 54 is anticipated to avoid conflict with the new mast arm signal structures.

Exhibit "A" Scope of Services

CSA #22-087-01

CR 54/Ronald Reagan Pkwy. at May Fair Blvd. Signalization Improvements - Design & Plans

7) Permitting Services

No SWFWMD permitting for these intersections improvements is required, anticipated or included in this Scope of Services.

8) Signing & Pavement Marking Plans

CONSULTANT shall develop a signing and marking design and prepare signing and pavement marking (S&PM) plans. Plans shall be prepared in accordance with all documents, standards, and manuals noted within this Scope of Services. **CONSULTANT** shall prepare a complete set of Signing and Pavement Marking Plans that will be integrated with the roadway and signal plans. The S&PM sheets shall include the following: Key Sheet, Tabulation of Quantities, Project Notes/Pay Item Notes, Plan Sheets, and Special Details (if required).

Pavement markings on all roadways shall be thermoplastic. Pedestrian crosswalks shall be provided to cross all legs of the intersection. The S&PM design shall be limited to modifications to existing markings at the intersection and approaches to accommodate the proposed signal operation. S&PM plans shall also include advance street name signs along CR 54/Ronald Reagan Pkwy. approaching the new signal.

9) Signalization Plans

CONSULTANT shall develop a mast arm signalization design and prepare Signalization plans.

CONSULTANT shall prepare signal pole foundation and mast arm designs (3) for the required signalization utilizing applicable FDOT design standards and manuals. Plans shall be prepared in accordance with all documents, standards, and manuals noted within this Scope of Services.

CONSULTANT shall prepare a complete set of Signalization Plans that will be integrated with the roadway and S&PM plans. The signal sheets shall include the following: Tabulation of Quantities, Project Notes/Pay Item Notes, Signal Plan Sheets, Guide Sign Worksheets, Mast Arm Structures Sheets, Special Details (if required) and Soil Core borings.

The **CONSULTANT** shall prepare traffic signalization plans for the intersection subject to the specific design work as identified bellow.

- a) Construct mast arm pole foundations and structures
- b) Provide LED internally illuminated street name signs
- c) Provide LED countdown pedestrian signals on all approaches
- d) New controller cabinet with UPS will be included
- e) Emergency generator cabinet will not be included
- f) Noninvasive vehicle detection systems if space for ILD is not available
- g) Intersection lighting will not be designed
- h) A Synchro analysis will be conducted to obtain appropriate Signal Operating Plan (SOP) and timings. COUNTY to provide appropriate turning movement volumes to be used in the analysis.

The **COUNTY** will provide all required traffic count information and signal warrant analysis to the **CONSULTANT** for use in preparing the signalization plans.

10) Project Specifications

- a) **COUNTY's** Standard Technical Specifications shall be used for the project along with FDOT Standard Specifications for Road and Bridge Construction, Divisions II and III (as applicable).

Exhibit "A" Scope of Services

CSA #22-087-01

CR 54/Ronald Reagan Pkwy. at May Fair Blvd. Signalization Improvements - Design & Plans

FDOT "Big Four" LAP Specifications and/or January 2023-24 FDOT Standard Specifications for Road and Bridge Construction may also be utilized.

County Push Button Construction Contracting is anticipated therefore the specifications provided by **CONSULTANT** will be prepared to supplement the specifications information already included in the County Push Button Contract. The plans and specifications will be condensed and utilize the pay item information specified in the applicable County Push Button Contract(s) to the extent practical.

- b) The **CONSULTANT** will prepare the Technical Specifications as needed.
- c) The **COUNTY** will prepare the overall Project Bid Specifications (if County Push Button Construction Contracting is not utilized).

11) Bid Quantities and Construction Cost Estimate

CONSULTANT shall prepare bid quantities that include all bid items that comprise the project design and utilize the pay item information specified in the applicable County Push Button Contract(s) to the extent practical.

- a) Bid items shall include reference to applicable **COUNTY** and current FDOT Measurement and Payment Items.
- b) Bid proposal sheets included with the Project Bid Specification package shall be prepared by the **COUNTY** based on the **CONSULTANT** provided quantities. County Push Button Construction Contracting is anticipated.
- c) Preliminary bid quantities shall be submitted with the 60% design review submittal. The quantities and associated cost shall be submitted in the Engineer's Construction Cost Estimate, which shall be submitted with the 90% and 100%/Final design submittals. Construction costs are to be based on the most current cost data available to the **CONSULTANT** that applies to the local construction market area.

IV. DESIGN REQUIREMENTS AND PROVISIONS FOR WORK**Design Construction Standards**

CONSULTANT shall prepare the design, plans and specifications in accordance with current editions of the following:

- 2018 Manual of Uniform Minimum Standards for Design, Construction and Maintenance for Streets and Highways (aka "Florida Greenbook")
- FY 2023-24 FDOT Design Standards for Construction and Maintenance Operations on the State Highway System
- January 2023-24 FDOT Standard Specifications for Road and Bridge Construction, Divisions II and III (as applicable)
- 2009 FHWA Manual on Uniform Traffic Control Devices
- Jan 2012 FDOT Traffic Engineering Manual
- Polk County Technical Standards Manual, revised 10/2009

Exhibit "A" Scope of Services

CSA #22-087-01

CR 54/Ronald Reagan Pkwy. at May Fair Blvd. Signalization Improvements - Design & Plans

In case of conflicts between criteria stated in the aforementioned documents, the **CONSULTANT** shall contact **COUNTY** for direction. If it becomes necessary for **CONSULTANT** to deviate from the standard design criteria specified in the documents, the **CONSULTANT** shall formally request authorization from the **COUNTY** by submitting a design variance request that describes the condition and states in writing, the reasons for the deviations. The Request for Design Variance shall be signed and sealed by the Engineer of Record.

Plans Preparation

CONSULTANT shall prepare plans, specifications and other documents that are accurate, legible and complete in detail. Final Submittals shall be made to **COUNTY** in reproducible form and on disk for those items described in this Scope of Services.

Submittals and Design Reviews

CONSULTANT shall prepare plans, specifications and other documents that are accurate, legible and complete in detail. All submittals shall be made to **COUNTY** electronically and in reproducible form unless otherwise requested.

- Plan design review submittals shall occur at the 60%, and 90% and 100%/Final phases.
- **CONSULTANT** shall submit a draft of the specifications with the 90% design review submittal and at the 100%/Final design review submittals.
- Bid quantities and construction cost estimates shall be submitted at the 60% (quantities only), 90% and 100%/Final submittal phases.
- **CONSULTANT** shall submit four (4) sets of (11 x 17) plans and a PDF plan set for each of the following submittals: 60%, 90% and 100%/Final.
- The final design submittal will consist of a digitally signed and sealed (11 x 17) plan set and one copy of digital design files in acceptable AUTOCAD format (Civil 3D 2022).
- **CONSULTANT** shall respond to the **COUNTY**'s design review comments in writing and incorporate revisions into the plans as appropriate. Written responses and plans revisions are to be included with the subsequent phase submittal.
- **CONSULTANT** shall respond to regulatory agencies review comments in the same manner.

Final Design Project Schedule

CONSULTANT's services shall commence upon receipt of written notice to proceed issued by **COUNTY**. **CONSULTANT** shall complete the final design of improvements in accordance with the agreed upon project schedule.

- 12 months for delivery of all services following receipt of survey info and NTP.

Post Design Services

Post Design Services are support services that may be required to address changed conditions and other services not covered under the original contract or subsequent contract modifications in order to facilitate and satisfactorily complete construction.

These services are not intended to address any **CONSULTANT** errors and/or omissions that may occur. The hours required to complete these tasks may be increased or decreased by the **COUNTY** based on actual project requirements.

The following items are representative, but not limited to, services related to Construction Assistance to be provided to the **CONSULTANT**. During the Construction Phase, it is understood that a **COUNTY DESIGNEE** is to administer the construction contract, perform records management, and carry out resident engineering and inspection services.

Exhibit "A" Scope of Services

CSA #22-087-01

CR 54/Ronald Reagan Pkwy. at May Fair Blvd. Signalization Improvements - Design & Plans

The **CONSULTANT** shall furnish the following services:

- Attend the pre-construction conference and assist the **COUNTY DESIGNEE** as needed.
- Construction Meetings: Assist the **COUNTY DESIGNEE** as needed.
- Review and approve shop drawings (anticipated for mast arm structures and selected signal equipment).
- Plan Interpretations and Requests for Additional Information: Provide written interpretations to the **COUNTY DESIGNEE** of the Contract Documents (Plans, Specifications, etc.) and respond to questions concerning unforeseen conditions affecting the projects' design and construction. The **CONSULTANT** shall not direct or infer changes to the construction contract. Changes shall be submitted through the **COUNTY'S** change order procedure.
- Site Visits: Respond to problems encountered during construction and conduct field investigations as requested by the **COUNTY DESIGNEE**. Based on information obtained during visits to the construction site, the **CONSULTANT** shall assist the **COUNTY** in providing potential solutions to the problem encountered including any plan modifications that may be required.
- Field Changes and Plan Revisions: From time to time during construction the **CONSULTANT** may be requested by the **COUNTY DESIGNEE** to review contractor proposed field changes or respond with a recommended solution to remedy specific field situations not covered by the plans and specifications. The **CONSULTANT** shall revise the plans to provide for changes that the **COUNTY** deems necessary after final plan acceptance.
- Meetings and Coordination: During the construction phase, the **CONSULTANT** shall attend weekly meetings held between the **CONTRACTOR** and **COUNTY DESIGNEE** as requested. Attendance and coordination with other County departments, adjacent property owners and utility representatives may also be required.
- Prepare Record Drawings for the roadway and utility improvements that are a compiled representation of the constructed project including changes made during construction and substantially depict the As-Built Survey provided by the **CONTRACTOR** and/or **COUNTY DESIGNEE**. In accordance with **COUNTY'S** Record Drawing Review Checklist, **CONSULTANT** shall submit a draft Record Set and associated CADD files to **COUNTY** for review and approval prior to submitting a digitally signed & sealed Record Set.

V. CSA #22-087-01 EXCLUSIONS

This scope of services does not include:

- Traffic counts & analysis (provided by COUNTY)
- Signal warrant study (provided by COUNTY)
- Utility design or utility relocation design services
- Lighting analysis or design
- Survey services (to be provided by COUNTY)
- Construction Engineering Inspection (CEI) services

VI. CSA #22-087-01 FEES

CONSULTANT'S not-to-exceed fee to perform this scope of services is **\$166,978.03**



January 24, 2023

HDR, Inc.
4830 West Kennedy Blvd., Suite 400
Tampa, Florida 33609

Attn: Mr. Reja E. Rabbi, P.E.

RE: Geotechnical Services Proposal
CR 54/Ronald Reagan Parkway at May Fair Blvd.
Signalization Improvements
Polk County, Florida
Tierra Proposal No.: 65-23-043

Mr. Rabbi:

Tierra, Inc. appreciates the opportunity to submit this proposal to provide geotechnical services for the referenced project.

Project Information

HDR, Inc. is currently working with Polk County to develop the design and construction plans for improvements to the CR 54/Ronald Reagan Parkway at Mayfair Boulevard intersection in Polk County, Florida.

Tierra's involvement will be to provide geotechnical engineering services to support the design of three new mast arm traffic signals and milling & resurfacing of portions of CR 54 and the minor cross street.

Geotechnical Engineering Scope of Services

Based on our understanding of the project, the following scope of services is anticipated:

1. Review soil information from the "Soil Survey of Polk County, Florida" published by the United States Department of Agriculture (USDA) Natural Resources Conservation Service (NRCS). Review topographic information obtained from the appropriate Quadrangle Map published by the United States Geological Survey (USGS). Review potentiometric information obtained from the "Potentiometric Surface of the Upper Floridan Aquifer in Florida" Maps also published by the USGS.
2. Conduct a visual reconnaissance of the project site and complete utility locate requests via Sunshine State One Call.
3. Develop a boring and pavement core location plan.
4. Obtain Polk County Right-of-Way Use Permit to complete the pavement and test borings.

5. Generate and coordinate a Maintenance of Traffic Plan as necessary to complete the geotechnical services
6. Execute a program of subsurface exploration consisting of subsurface sampling and field testing consisting of three (3) Standard Penetration Test (SPT) borings to a depth of approximately 30 feet below the existing ground surface.
7. Perform up to three (3) pavement cores within travel lanes outside of the intersection. Measurements of the pavement and base thickness will be recorded, and the pavement base and subgrade type will be identified. Measurements will be taken of crack depths, rut depths and cross-slopes at the core locations. Photos will be taken of the pavement cores for reporting purposes. The pavement conditions will be based on Tierra's visual observations only and will be described as good (negligible cracks and rutting) to fair (minimal isolated cracks) to poor (significant pronounced cracks), asphalt patchwork and increased frequency of pavement distress/cracks, depressions and/or undulated/corrugated pavement). All asphalt surfaces will be backfilled/patched following completion of the field coring operations.
8. Perform a hand auger boring at each pavement core location to a depth of approximately 5 feet below grade.
9. Visually classify and stratify the soil samples in the laboratory using the Unified Soil Classification System (USCS).
10. Complete laboratory testing on select samples as verification of our visual classification and to estimate engineering properties.
11. Perform corrosion series testing (pH, chlorides, sulfates and resistivity) on soil samples and provide recommendations for the substructure environmental classification.
12. Generate soil parameters for use by the Structural Engineer in evaluation and design of the mast arm signal foundations. Provide soil unit weights, internal angle of soil friction and cohesion values.
13. Identify subsurface materials encountered within the borings that may impact the design or construction.
14. Prepare a geotechnical report that summarizes the course of study pursued, the field and laboratory data generated, subsurface conditions encountered and our geotechnical recommendations.

Exclusions

This proposal does not include the following services:

- Survey
- Utility locating services.
- Pavement Evaluation Report
- Pavement Design
- Foundation Design

Geotechnical Engineering Service Fee

The estimated fee to perform the geotechnical engineering services is **\$16,593.03** as indicated in the attached Fee Schedule. This fee is based on the site being accessible utilizing standard truck or small track mounted drilling equipment with maintenance of traffic where needed and that no hazardous materials or conditions are on site that will impact our proposed geotechnical scope or schedule.

We appreciate the opportunity to offer our services to you and we look forward to working with you on this project. We will provide you with verbal results and immediately notify you should conditions impacting our scope, schedule or cost of services occur. Should you have any questions in regard to this proposal, please do not hesitate to contact our office.

Respectfully Submitted,

TIERRA, INC.



Joseph R. Antinori, P.E.
Geotechnical Engineer



Larry P. Moore, P.E.
Principal Geotechnical Engineer

Attachment:

Geotechnical Engineering Services Unit Rate Fee Schedule



ENGINEERS

SURVEYORS

PLANNERS

March 30, 2023

Reja Rabbi, PE
HDR
4830 W Kennedy Blvd, Suite 400
Tampa, FL 33609

RE: Subsurface Utility Locations at the intersection of CR 54 and May Fair Blvd, Polk County.

Dear Kent:

McKim & Creed is pleased to submit this proposal for subsurface utility location services for the above referenced project.

Scope of Services

The objective of the project is to perform utility designation and test holes in support of the installation of new signals at the intersection.

Our process is as follows.

Designation

- Request utility records from utility agency owners based on the Sunshine 811 design ticket.
- Designate the underground utilities along CR 54, 100 feet east and west of the intersection, from bottom of curb to right of way, and 25 feet east and west of two proposed single post sign locations.
- Create field sketch of designated utilities.
- Survey designated utilities.

Locates

- Stake the location of each mast arm.
- Submit Sunshine 811 dig tickets.
- Perform test holes (VVH) by vacuum excavation, to clear up to three (3) mast arm foundations, assume 5 VVH per mast arm = 15 VVH, and two (2) single post sign locations, assume 2 VVH per sign = 4 VVH, and

551 North Cattleman Road

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www.mckimcreed.com

CR 54 at May Fair Blvd

3/30/2023

Page 2 of 2

- allowance for utilities found in clearing locations, = 5 VVH. Total = 24 VVH.
- Survey completed test holes from existing onsite control provided by Polk County.
- We have included one (1) day of MOT, to be provided by a sub contractor. If not required this service will not be billed.

Deliverables

AutoCAD file and VVH spreadsheet, including completed test holes.

Our Fee

Our fee is \$18,974.00 inclusive of all labor and materials.

We look forward to working with you on this project. If you have any questions or require additional information, please do not hesitate to call us.

Sincerely,

McKIM & CREED, Inc.

Neil Eppig

Neil L. Eppig
SUE Project Manager



EXHIBIT B

RFP No. 22-242: Professional Engineering Services for Roads and

Drainage HDR Engineering, Inc. Exhibit B

Classification	Range of Direct Labor Rates		Range of Hourly Billing Rates	
	From	To	From	To
Project Manager	\$86	\$99	\$272	\$313
Chief Engineer	\$99	\$114	\$313	\$361
Senior Engineer	\$77	\$89	\$244	\$282
Project Engineer	\$61	\$71	\$193	\$225
Engineer	\$44	\$51	\$140	\$162
Chief Designer	\$68	\$79	\$215	\$250
Senior Designer	\$49	\$57	\$155	\$181
CADD Technician	\$33	\$38	\$105	\$121
Engineering Intern	\$36	\$42	\$114	\$133
Chief Planner	\$98	\$113	\$310	\$357
Senior Planner	\$62	\$72	\$196	\$228
Planner	\$38	\$44	\$121	\$140
Chief Scientist	\$62	\$72	\$196	\$228
Environmental Specialist	\$33	\$38	\$105	\$121
GIS Analyst	\$54	\$63	\$171	\$200
Utility Coordinator	\$39	\$45	\$124	\$143
Administrative Assistant	\$32	\$37	\$102	\$117

HDR Labor Multiplier Calculation

Direct Labor	1.0000
Overhead (less FCCM and Direct Expenses)	1.5488
SUBTOTAL	2.5488
Operating Margin (22%)	0.5607
Direct Expenses	0.0496
TOTAL MULTIPLIER	3.1591

EXHIBIT "B"
ESTIMATE OF WORK EFFORT AND COST - PRIME CONSULTANT

Name of Project:
County:
Agreement:

CR 54 @ May Fair Blvd Intersection Improvements (CSA 22-242-01)
Polk
MSA 2022-087 - Professional Engineering Services for Roads and Drainage

Consultant Name: HDR Engineering, Inc.
Date: 3/30/2023
Estimator: RRB/AA

Staff Classification	Total Staff Hours From "SH Summary - Firm"	Project Manager	Senior Engineer	Project Engineer	Engineer	Engineer Intern	Chief Scientist	Senior Designer	CADD Technician	Admin. Assistant	SH By Activity	Salary Cost By Activity	Average Rate Per Task
3. Project General and Project Common Tasks	58	23	12	7	0	0	3	3	0	10	0	\$12,808	\$217.38
4. Roadway Analysis	94	8	23	17	6	5	0	24	0	0	0	\$17,144	\$186.35
5. Roadway Plans	87	7	19	14	8	3	0	26	10	0	0	\$15,784	\$181.43
7. Utilities	58	6	9	0	17	7	0	14	5	0	0	\$9,701	\$167.26
9. Structures - Misc. Tasks, Dwg's, Non-Tech.	17	0	10	7	0	0	0	0	0	0	0	\$3,791	\$223.00
18. Structures - Miscellaneous	60	0	15	12	27	0	0	0	7	0	0	\$10,491	\$171.98
19. Signing & Pavement Marking Analysis	88	7	22	16	7	4	0	18	14	0	0	\$16,056	\$182.45
20. Signing & Pavement Marking Plans	30	2	7	5	3	1	0	7	4	0	0	\$5,256	\$181.24
21. Signalization Analysis	114	9	29	21	8	6	0	23	18	0	0	\$20,836	\$182.77
22. Signalization Plans	42	3	9	7	3	2	0	10	8	0	0	\$7,401	\$176.21
35. Post Design Services	56	14	22	8	0	0	3	6	2	0	0	\$12,448	\$226.33
Total Staff Hours	704	79	177	114	79	28	6	131	76	10	0	\$131,411.00	\$186.66
Total Staff Cost		\$21,488.00	\$43,188.00	\$22,002.00	\$11,060.00	\$3,192.00	\$1,176.00	\$20,305.00	\$7,980.00	\$1,020.00	\$0.00	\$131,411.00	\$186.66

Check = \$131,411.00

SALARY RELATED COSTS:

OVERHEAD: 0%
OPERATING MARGIN: 0%
FCCM (Facilities Capital Cost Money): 0.00%
EXPENSES: 4-man crew days \$ - / day
SUBTOTAL ESTIMATED FEE: \$131,411.00
Subconsultant: Tierra (Geotech) \$16,593.03
Subconsultant: McKim&Creed (SUE) \$18,974.00
SUBTOTAL ESTIMATED FEE: \$166,978.03
SUBTOTAL ESTIMATED FEE: \$166,978.03
Optional Services \$0.00
GRAND TOTAL ESTIMATED FEE: \$166,978.03

Date: 2023.03.30
REJA E. RABBI 15:08:38-04'00'

Fran McAskill
Director
Procurement Division



330 West Church Street
P.O. Box 9005, Drawer AS05
Bartow, Florida 33831-9005
Phone: (863) 534-6757
Fax: (863) 534-6789
www.polk-county.net

EXHIBIT C

Board of County Commissioners

REIMBURSABLE COST SCHEDULE

1. **Reproduction Cost**

	Single Side	Double Sided
A. Regular Copying		
8 ½ x 11 (black & white).....	\$ 0.15/page	\$ 0.25/sheet
8 ½ x 11 (color).....	\$ 0.30/page	\$ 0.40/sheet
8 ½ x 14 (black & white).....	\$ 0.15/page	\$ 0.25/sheet
8 ½ x 14 (color).....	\$ 0.30/page	\$ 0.40/sheet
11 x 17 (black & white).....	\$ 0.25/page	\$ 0.35/sheet
11 x 17 (color).....	\$ 0.40/page	\$ 0.50/sheet
9 ½ x 24 Single Side Only.....	\$ 1.00/page	
17 x 22 Single Side Only.....	\$ 2.00/page	
18 x 24 Single Side Only.....	\$ 2.00/page	
24 x 36 Single Side Only.....	\$ 3.00/page	
30 x 30 Single Side Only.....	\$ 5.00/page	
32 x 34 Single Side Only.....	\$ 5.00/page	
Other sizes-per square inch.....	\$ 0.03/page	
Compact Digital Disk	\$ 6.00/disk	
B. Blueprint Copy		\$10.00/page
2. **Subcontractor Services** Actual Costs
3. **Special Consultants** Actual costs
4. **Computer Services** Non-reimbursable
5. **Travel Expenses** In accordance with Chapter 112.061, F.S.;
and further defined in the Polk County Employee Handbook.
6. **Postage, Fed Express, UPS** Actual Costs
7. **Pre-approved Equipment** Actual Costs
(includes purchase and rental of equipment used in project)



CERTIFICATE OF LIABILITY INSURANCE

DATE (MM/DD/YYYY)
6/1/2023 4/17/2023

THIS CERTIFICATE IS ISSUED AS A MATTER OF INFORMATION ONLY AND CONFERS NO RIGHTS UPON THE CERTIFICATE HOLDER. THIS CERTIFICATE DOES NOT AFFIRMATIVELY OR NEGATIVELY AMEND, EXTEND OR ALTER THE COVERAGE AFFORDED BY THE POLICIES BELOW. THIS CERTIFICATE OF INSURANCE DOES NOT CONSTITUTE A CONTRACT BETWEEN THE ISSUING INSURER(S), AUTHORIZED REPRESENTATIVE OR PRODUCER, AND THE CERTIFICATE HOLDER.

IMPORTANT: If the certificate holder is an ADDITIONAL INSURED, the policy(ies) must have ADDITIONAL INSURED provisions or be endorsed. If SUBROGATION IS WAIVED, subject to the terms and conditions of the policy, certain policies may require an endorsement. A statement on this certificate does not confer rights to the certificate holder in lieu of such endorsement(s).

PRODUCER Lockton Companies 444 W. 47th Street, Suite 900 Kansas City MO 64112-1906 (816) 960-9000 kcasu@lockton.com	CONTACT NAME:	
	PHONE (A/C, No, Ext): FAX (A/C, No):	
INSURED 1016040 HDR ENGINEERING, INC. 1917 SOUTH 67TH STREET OMAHA NE 68106	E-MAIL ADDRESS:	
	INSURER(S) AFFORDING COVERAGE	
	INSURER A: Lloyd's of London	
	INSURER B:	
	INSURER C:	
	INSURER D:	
INSURER E:		
INSURER F:		

COVERAGES * **CERTIFICATE NUMBER:** 19506934 **REVISION NUMBER:** XXXXXXXX

THIS IS TO CERTIFY THAT THE POLICIES OF INSURANCE LISTED BELOW HAVE BEEN ISSUED TO THE INSURED NAMED ABOVE FOR THE POLICY PERIOD INDICATED. NOTWITHSTANDING ANY REQUIREMENT, TERM OR CONDITION OF ANY CONTRACT OR OTHER DOCUMENT WITH RESPECT TO WHICH THIS CERTIFICATE MAY BE ISSUED OR MAY PERTAIN, THE INSURANCE AFFORDED BY THE POLICIES DESCRIBED HEREIN IS SUBJECT TO ALL THE TERMS, EXCLUSIONS AND CONDITIONS OF SUCH POLICIES. LIMITS SHOWN MAY HAVE BEEN REDUCED BY PAID CLAIMS.

INSR LTR	TYPE OF INSURANCE	ADDL SUBR INSD WYD	POLICY NUMBER	POLICY EFF (MM/DD/YYYY)	POLICY EXP (MM/DD/YYYY)	LIMITS
	COMMERCIAL GENERAL LIABILITY <input type="checkbox"/> CLAIMS-MADE <input type="checkbox"/> OCCUR GEN'L AGGREGATE LIMIT APPLIES PER: <input type="checkbox"/> POLICY <input type="checkbox"/> PRO-JECT <input type="checkbox"/> LOC OTHER:		NOT APPLICABLE			EACH OCCURRENCE \$ XXXXXXXX DAMAGE TO RENTED PREMISES (Ea occurrence) \$ XXXXXXXX MED EXP (Any one person) \$ XXXXXXXX PERSONAL & ADV INJURY \$ XXXXXXXX GENERAL AGGREGATE \$ XXXXXXXX PRODUCTS - COMP/OP AGG \$ XXXXXXXX \$
	AUTOMOBILE LIABILITY <input type="checkbox"/> ANY AUTO <input type="checkbox"/> OWNED AUTOS ONLY <input type="checkbox"/> SCHEDULED AUTOS <input type="checkbox"/> HIRED AUTOS ONLY <input type="checkbox"/> NON-OWNED AUTOS ONLY		NOT APPLICABLE			COMBINED SINGLE LIMIT (Ea accident) \$ XXXXXXXX BODILY INJURY (Per person) \$ XXXXXXXX BODILY INJURY (Per accident) \$ XXXXXXXX PROPERTY DAMAGE (Per accident) \$ XXXXXXXX \$
	UMBRELLA LIAB <input type="checkbox"/> OCCUR EXCESS LIAB <input type="checkbox"/> CLAIMS-MADE DED <input type="checkbox"/> RETENTION \$		NOT APPLICABLE			EACH OCCURRENCE \$ XXXXXXXX AGGREGATE \$ XXXXXXXX \$
	WORKERS COMPENSATION AND EMPLOYERS' LIABILITY ANY PROPRIETOR/PARTNER/EXECUTIVE OFFICER/MEMBER EXCLUDED? (Mandatory in NH) If yes, describe under DESCRIPTION OF OPERATIONS below Y/N <input type="checkbox"/> N/A		NOT APPLICABLE			PER STATUTE <input type="checkbox"/> OTH-ER <input type="checkbox"/> E.L. EACH ACCIDENT \$ XXXXXXXX E.L. DISEASE - EA EMPLOYEE \$ XXXXXXXX E.L. DISEASE - POLICY LIMIT \$ XXXXXXXX
A	ARCH & ENG PROFESSIONAL LIABILITY	N N	P001412200	6/1/2022	6/1/2023	PER CLAIM: \$2,000,000 AGGREGATE: \$2,000,000.

DESCRIPTION OF OPERATIONS / LOCATIONS / VEHICLES (ACORD 101, Additional Remarks Schedule, may be attached if more space is required)
RE: POLK COUNTY - CSA #22-087-01 - CR54 (RONALD REAGAN PKWY) AT MAY FAIR BLVD INTERSECTION IMPROVEMENTS

CERTIFICATE HOLDER

CANCELLATION See Attachment

19506934
POLK COUNTY,
A POLITICAL SUBDIVISION OF THE STATE OF FLORIDA
ATTENTION: WILLIAM LORENZO
330 WEST CHURCH STREET
PROCUREMENT DIVISION; ROOM 150
BARTOW FL 33830

SHOULD ANY OF THE ABOVE DESCRIBED POLICIES BE CANCELLED BEFORE THE EXPIRATION DATE THEREOF, NOTICE WILL BE DELIVERED IN ACCORDANCE WITH THE POLICY PROVISIONS.

AUTHORIZED REPRESENTATIVE

Joseph M. Amello

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CERTIFICATE OF LIABILITY INSURANCE

Page 1 of 2

DATE (MM/DD/YYYY)
04/17/2023

THIS CERTIFICATE IS ISSUED AS A MATTER OF INFORMATION ONLY AND CONFERS NO RIGHTS UPON THE CERTIFICATE HOLDER. THIS CERTIFICATE DOES NOT AFFIRMATIVELY OR NEGATIVELY AMEND, EXTEND OR ALTER THE COVERAGE AFFORDED BY THE POLICIES BELOW. THIS CERTIFICATE OF INSURANCE DOES NOT CONSTITUTE A CONTRACT BETWEEN THE ISSUING INSURER(S), AUTHORIZED REPRESENTATIVE OR PRODUCER, AND THE CERTIFICATE HOLDER.

IMPORTANT: If the certificate holder is an ADDITIONAL INSURED, the policy(ies) must have ADDITIONAL INSURED provisions or be endorsed. If SUBROGATION IS WAIVED, subject to the terms and conditions of the policy, certain policies may require an endorsement. A statement on this certificate does not confer rights to the certificate holder in lieu of such endorsement(s).

PRODUCER Willis Towers Watson Midwest, Inc. c/o 26 Century Blvd P.O. Box 305191 Nashville, TN 372305191 USA	CONTACT NAME: Willis Towers Watson Certificate Center PHONE (A/C, No, Ext): 1-877-945-7378 FAX (A/C, No): 1-888-467-2378 E-MAIL ADDRESS: certificates@willis.com														
INSURED HDR Engineering, Inc. 1917 South 67th Street Omaha, NE 68106	<table><tr><th>INSURER(S) AFFORDING COVERAGE</th><th>NAIC #</th></tr><tr><td>INSURER A: Liberty Mutual Fire Insurance Company</td><td>23035</td></tr><tr><td>INSURER B: Ohio Casualty Insurance Company</td><td>24074</td></tr><tr><td>INSURER C: Liberty Insurance Corporation</td><td>42404</td></tr><tr><td>INSURER D:</td><td></td></tr><tr><td>INSURER E:</td><td></td></tr><tr><td>INSURER F:</td><td></td></tr></table>	INSURER(S) AFFORDING COVERAGE	NAIC #	INSURER A: Liberty Mutual Fire Insurance Company	23035	INSURER B: Ohio Casualty Insurance Company	24074	INSURER C: Liberty Insurance Corporation	42404	INSURER D:		INSURER E:		INSURER F:	
INSURER(S) AFFORDING COVERAGE	NAIC #														
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INSURER B: Ohio Casualty Insurance Company	24074														
INSURER C: Liberty Insurance Corporation	42404														
INSURER D:															
INSURER E:															
INSURER F:															

COVERAGES

CERTIFICATE NUMBER: W28704484

REVISION NUMBER:

THIS IS TO CERTIFY THAT THE POLICIES OF INSURANCE LISTED BELOW HAVE BEEN ISSUED TO THE INSURED NAMED ABOVE FOR THE POLICY PERIOD INDICATED. NOTWITHSTANDING ANY REQUIREMENT, TERM OR CONDITION OF ANY CONTRACT OR OTHER DOCUMENT WITH RESPECT TO WHICH THIS CERTIFICATE MAY BE ISSUED OR MAY PERTAIN, THE INSURANCE AFFORDED BY THE POLICIES DESCRIBED HEREIN IS SUBJECT TO ALL THE TERMS, EXCLUSIONS AND CONDITIONS OF SUCH POLICIES. LIMITS SHOWN MAY HAVE BEEN REDUCED BY PAID CLAIMS.

INSR LTR	TYPE OF INSURANCE	ADDL SUBR INSD WVD	POLICY NUMBER	POLICY EFF (MM/DD/YYYY)	POLICY EXP (MM/DD/YYYY)	LIMITS		
A	<input checked="" type="checkbox"/> COMMERCIAL GENERAL LIABILITY <input type="checkbox"/> CLAIMS-MADE <input checked="" type="checkbox"/> OCCUR <input checked="" type="checkbox"/> Contractual Liability GEN'L AGGREGATE LIMIT APPLIES PER: <input type="checkbox"/> POLICY <input checked="" type="checkbox"/> PRO-JECT <input checked="" type="checkbox"/> LOC OTHER:	Y	Y	TB2-641-444950-032	06/01/2022	06/01/2023	EACH OCCURRENCE \$ 2,000,000 DAMAGE TO RENTED PREMISES (Ea occurrence) \$ 1,000,000 MED EXP (Any one person) \$ 10,000 PERSONAL & ADV INJURY \$ 2,000,000 GENERAL AGGREGATE \$ 4,000,000 PRODUCTS - COMP/OP AGG \$ 4,000,000	
A	AUTOMOBILE LIABILITY <input checked="" type="checkbox"/> ANY AUTO <input type="checkbox"/> OWNED AUTOS ONLY <input type="checkbox"/> HIRED AUTOS ONLY <input type="checkbox"/> SCHEDULED AUTOS <input type="checkbox"/> NON-OWNED AUTOS ONLY	Y	Y	AS2-641-444950-042	06/01/2022	06/01/2023	COMBINED SINGLE LIMIT (Ea accident) \$ 2,000,000 BODILY INJURY (Per person) \$ BODILY INJURY (Per accident) \$ PROPERTY DAMAGE (Per accident) \$	
B	UMBRELLA LIAB <input checked="" type="checkbox"/> OCCUR <input checked="" type="checkbox"/> EXCESS LIAB <input type="checkbox"/> CLAIMS-MADE DED <input checked="" type="checkbox"/> RETENTION \$ 0	Y	Y	EUO (23) 57919363	06/01/2022	06/01/2023	EACH OCCURRENCE \$ 1,000,000 AGGREGATE \$ 1,000,000	
C	WORKERS COMPENSATION AND EMPLOYERS' LIABILITY ANY PROPRIETOR/PARTNER/EXECUTIVE OFFICER/MEMBER EXCLUDED? (Mandatory in NH) If yes, describe under DESCRIPTION OF OPERATIONS below	Y/N No	N/A	Y	WA7-64D-444950-012	06/01/2022	06/01/2023	<input checked="" type="checkbox"/> PER STATUTE <input type="checkbox"/> OTH-ER E.L. EACH ACCIDENT \$ 1,000,000 E.L. DISEASE - EA EMPLOYEE \$ 1,000,000 E.L. DISEASE - POLICY LIMIT \$ 1,000,000

DESCRIPTION OF OPERATIONS / LOCATIONS / VEHICLES (ACORD 101, Additional Remarks Schedule, may be attached if more space is required)

Certificate Holder is named as Additional Insured on General Liability, Automobile Liability and Umbrella/Excess Liability on a Primary, Non-contributory basis where required by written contract. Waiver of Subrogation applies on General Liability, Automobile Liability, Umbrella/Excess Liability and Workers Compensation where required by written contract and as permitted by law. Umbrella/Excess policy is follow form over General Liability, Auto Liability and Employers Liability.

CERTIFICATE HOLDER**CANCELLATION**

Polk County, a Political Subdivision of the State of Florida
Procurement Division; Room 150
Attn: William Lorenzo
330 West Church Street
Bartow, FL 33830

SHOULD ANY OF THE ABOVE DESCRIBED POLICIES BE CANCELLED BEFORE THE EXPIRATION DATE THEREOF, NOTICE WILL BE DELIVERED IN ACCORDANCE WITH THE POLICY PROVISIONS.

AUTHORIZED REPRESENTATIVE

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AGENCY CUSTOMER ID: _____

LOC #: _____



ADDITIONAL REMARKS SCHEDULE

Page 2 of 2

AGENCY Willis Towers Watson Midwest, Inc.		NAMED INSURED HDR Engineering, Inc. 1917 South 67th Street Omaha, NE 68106	
POLICY NUMBER See Page 1			
CARRIER See Page 1	NAIC CODE See Page 1	EFFECTIVE DATE: See Page 1	

ADDITIONAL REMARKS

THIS ADDITIONAL REMARKS FORM IS A SCHEDULE TO ACORD FORM,
 FORM NUMBER: 25 FORM TITLE: Certificate of Liability Insurance

RE: Polk County - CSA #22-087-01 - CR54 (Ronald Reagan Pkwy) at May Fair Blvd Intersection Improvements.

Additional Insureds: County and Consultant

Waiver of Subrogation: Polk County

Coverage for XCU is provided under the General Liability policy.

The General Liability policy includes a Cross Liability Clause.