

**MODIFICATION NO. 1 TO AGREEMENT  
DATED 08/23/2018 (RFQ NO. 2018-064)  
FOR PROFESSIONAL ENGINEERING SERVICES  
FOR Sanitary Sewer Modeling, Hydraulic Capacity and Design Services**

**THIS MODIFICATION TO AGREEMENT** made and entered into this \_\_\_\_ day of \_\_\_\_\_, 2019, by and between the City of Lee's Summit, Missouri (hereinafter "City"), and HDR Engineering, Inc. (hereinafter "Engineer").

**WITNESSETH:**

**WHEREAS**, City and Engineer entered into an Agreement dated 08/23/2018 (RFQ No. 2018-064) for professional engineering services for Sanitary Sewer Modeling, Hydraulic Capacity and Design Services (hereinafter "Base Agreement"); and

**WHEREAS**, City and Engineer desire to amend the provisions of the Base Agreement as provided herein; and

**WHEREAS**, Engineer has submitted a proposal for the amended engineering services and an estimate of engineering costs to perform said services; and

**WHEREAS**, the City Manager is authorized and empowered by City to execute contracts providing for professional engineering services.

**NOW THEREFORE**, in consideration of the mutual covenants and considerations herein contained, **IT IS HEREBY AGREED** by the parties hereto to amend the following Articles contained in the Base Agreement as follows:

**ARTICLE I  
SCOPE OF SERVICES TO BE PROVIDED BY THE ENGINEER**

Article I of the Base Agreement, as amended, is hereby amended to add additional tasks to the scope as set out on Exhibit A to the original contact and listed on Exhibit B to this modification, entitled "Final Design Services Scope of Services Downtown Interceptor Sanitary Sewer Project", attached hereto and incorporated herein by reference.

**ARTICLE III  
PAYMENTS TO THE ENGINEER**

Article III of the Base Agreement, as amended, is hereby amended to provide additional compensation to Engineer as follows:

- A. The cost of all Basic Services covered under Article I of this Modification No. 1 shall be billed hourly at the rates set forth in the Scope of Services attached hereto and incorporated herein by reference. Expenses incurred to provide the Basic Services shall be billed as set forth in Exhibit B. The additional compensation to be paid to Engineer for the additional Basic Services described in Article I, of this Modification No. 1, above shall not exceed the total sum of Three Hundred Forty Thousand Eight Hundred Seventy Five Dollars (\$340,875.00). The total fees (hourly fees and expenses) for the Basic Services is hereby amended and shall not exceed the total sum of Four Hundred Ninety Two Thousand Two Hundred Five Dollars (\$492,205.00).

B. The amended total not to exceed amount for both the Basic Services and Optional Services is Four Hundred Ninety Two Thousand Two Hundred Five Dollars (\$492,205.00).

**ARTICLE VII  
ALL OTHER TERMS REMAIN IN EFFECT**

All other terms of the Base Agreement not amended by this Modification to Agreement shall remain in full force and effect.

This Modification No. 1 to Agreement shall be binding on the parties thereto only after it has been duly executed and approved by City and Engineer.

**IN WITNESS WHEREOF**, the parties have caused this Modification to Agreement to be executed on the \_\_\_\_ day of \_\_\_\_\_, 20\_\_.

**CITY OF LEE'S SUMMIT**

\_\_\_\_\_  
Stephen A. Arbo, City Manager

ATTEST:

\_\_\_\_\_  
City Clerk, Trisha Fowler Arcuri

APPROVED AS TO FORM:


\_\_\_\_\_  
Nancy K. Yendes,  
Chief Counsel of Infrastructure and Planning  
Office of City Attorney

**ENGINEER: HDR Engineering, INC.**

  
BY: Joseph E. Drimmel

TITLE: Senior Vice President

ATTEST:

  
Laurie S. ViK  
Assistant Secretary

Modified 05/01/2018

## Exhibit B

# City of Lee's Summit RFQ No. 2018-064 Final Design Services Scope of Services Downtown Interceptor Sanitary Sewer Project

### Project Overview

A preliminary design study called the Phase 1 Sanitary Sewer Study (Phase 1) was completed in April 2019 for various trunk sewers in the Cedar Creek Watershed. This project will cover final design and bidding services for the main trunk sewer from its downstream connection to the Cedar Creek Interceptor (MH 37-001) to the upper reach where it connects to downtown (MH 29-220).

### Task 1 - Project Management/Administrative

HDR will work with the City throughout the project to verify objectives are being met. Specific tasks will include:

1. Conduct Project Kick-off Meeting with Design Team and City Staff. Prepare and distribute agenda and meeting notes to attendees.
2. Perform project phase administrative duties, including monitoring and coordination of the project team, preparation and implementation of the safety plan, review of project costs and billings, preparation of invoices using Engineer's standard form, preparation of status reports, and general administrative activities.
3. Monitor subconsultant scope, schedule, and budget for geotechnical services associated with the final alignment.
4. Conduct Project Approach and Resource Review (PARR), Project Management Review, and Project Quality Control Review of Deliverables
5. Conduct four (4) general project meetings to discuss project status, coordination efforts, drawing reviews, easements, permits, etc. Provide meeting minutes for each meeting held with City Staff.

### Task 2 – Survey

Aerial imagery and LIDAR contour data were obtained during Phase 1. Control and Benchmark points were established to facilitate Phase 1 and future work. However, HDR did not gather topographic survey data at the existing manholes, near anticipated creek crossings, third party utility locates, or property models suitable for easement acquisition. The tasks related to a detailed survey necessary for this design between Highway 50 and the Cedar Creek interceptor will include:

1. Management of field crews
2. Staking soil boring locations for geotechnical subconsultant.
3. Supplement Control and Benchmark survey completed during Phase 1. Conduct Property Boundary/ Right of Way/ Existing Easement Survey.
4. Temporary and Permanent Easement Descriptions and Exhibits, 55 properties max.

5. Topographic/ Utility Survey within project limits was not completed during Phase 1. Survey will be necessary for the proposed alignments to verify surfacing type, creek crossings, utility crossings data, elevation data, and grade-dependent facilities are collected.

Key Understandings:

- One alignment will be considered, however, survey will be of appropriate area to incorporate reasonable modifications to the proposed route.
- It is assumed the Rock Island Rail Corridor was purchased without federal Land and Water Conservation Fund dollars, therefore, no 6f conversion environmental documentation is necessary to obtain an easement under the corridor.
- To facilitate timely acquisition of easements, HDR will deliver all easement descriptions and exhibits to the City within 150 days from NTP.

Information and/or Services by Others:

- Easement acquisition and negotiation. HDR staff will attend an average of one meeting per property to discuss the technical aspects of the project in support of the City's easement negotiations.
- Title work coordination, including purchase of up to 55 Guaranteed Title Reports will be completed by City and provided to HDR.

**Task 3 – Final Design**

To build off the design concepts and planning completed during Phase 1, HDR will prepare final design documents, submit permit applications, and develop construction cost opinions. Progress deliverables will be submitted to the City for review and comment and HDR will assist with permit submittals and other agency reviews as outlined in the specific tasks below:

1. Environmental Permitting

- a. Jurisdictional Waters Assessment/Delineation & T&E Species Habitat Evaluation

A Waters of the U.S. (WOUS) Jurisdictional Assessment and Delineation will be prepared for the entire project area. HDR will conduct a field site visit to delineate the location, size and type of jurisdictional waters on the project site. The delineation will be completed as outlined in the 1987 Corps of Engineers Wetlands Delineation Manual and supporting Midwest Regional supplemental V. 2.0. Drainages, streams, impoundments and other waters of the United States will also be identified if present within the project limits. A preliminary jurisdictional waters assessment (PJA) will be conducted jointly with the delineation describing the presence/absence of jurisdictional resources within the project area in support of Section 404 permitting activities. A combined delineation and PJA report will be developed and may include but is not limited to:

- Appropriate maps (Site vicinity maps, U.S.G.S. map, National Wetland Inventory map, and a Soils Survey map)
- Figures (project area; location of wetlands, streams and other water resources).
- Detailed data sheets, if necessary to document wetlands and streams.
- Photographic documentation.

- A summary of the acreage and types of jurisdictional waters including wetlands, streams and other water bodies found on the property and impacts to those resources.
- Analysis of temporary and permanent impacts to jurisdictional and non-jurisdictional resources using GIS overlaid with project design features. Summary of project impacts.
- Tree clearing appears necessary to construct the project. HDR will generate an online U.S. Fish and Wildlife Service IPaC online Section 7 information consultation review. During delineations field work, a bat summer habitat assessment will be performed for federally listed species, particularly listed bats (Indiana, Gray, and Northern Long-eared). This will be developed as part of the 404 permit request. This will be provided with NWP 12 to the USACE.
- HDR's biologists will mark individual potential habitat trees for removal between November 1st and March 31<sup>st</sup> with a painted X and take a GPS point for future reference as needed for project surveyors.

Deliverables: Jurisdictional assessment, delineation reporting and impacts analysis, USFWS IPaC review, and bat summer habitat assessment.

b. Section 404 Nationwide Permit (NWP 12 – Utilities Lines)

Project impacts to jurisdictional resources will require the preparation of a Section 404 permit Pre-construction Notification (PCN) for review and authorization by the U.S. Army Corps of Engineers (USACE). A Section 404 Nationwide Permit Application package will be prepared that includes the following information:

- Pre-construction Notification (PCN) letter to USACE
  - Appropriate maps and engineering drawings including restoration plans
  - A description of the purpose and need for the project
  - A brief discussion of avoidance and minimization (as needed) of impacts to jurisdictional waters of the United States
  - Coordination by phone with USACE staff (as needed).
  - Preparation of responses to agency comments.
  - A summary of mitigation measures for project impacts (if required).
- c. MDNR SHPO Section 106 Cultural Resource Project Review. Prepare a Section 106 Project Review Form and SHPO response letter.
- d. City Land Disturbance Permit – HDR will prepare the City application. City responsible for its own permit fees assessed (if applicable).
- e. MDNR (state) NPDES Stormwater Construction Discharge Permit. HDR will complete a Missouri DNR e-filed stormwater, construction discharge Notice of Intent, prepare E&S control plans and details, and a Storm Water Pollution Prevention Plan (SWPPP).
- f. Floodplain Development Permit. HDR will complete a Floodplain Development Permit form provided by the City for the project. It is assumed that in this application, HDR will note the floodway would not be adversely affected by the project provided that the selected construction contractor constructs crossings

during low flow periods and when no rain is forecast. Furthermore, it is assumed the selected contractor must relocate excavated material out of the floodway if the construction period will take more than four days.

- g. Conduct permitting for the reconstruction and/or realignment of the sewer in the Rock Island Rail Corridor owned by Jackson County.
2. Public involvement will include meetings with property owners, home owner's associations (HOA's), and other stakeholders to review design requirements and parcel specific easements. 50 meetings are anticipated.
3. Conduct an open house for the public at a location near the project, to present final design elements and discuss easements as necessary.
4. Conduct research of existing features, GIS mapping, as-built plans, and plat maps.
5. Conduct 60% design and hold a workshop to review general drawing sections, plan and profile drawings showing proposed as well as existing utility locations, surface features, and soil boring information. Preparation of these drawings includes walking the alignment to identify and note project constraints related to access, bypass pumping, stockpiling, etc. Review documents will be provided to the City at least one week prior to the review workshop.
6. Conduct 60% Constructability Review with internal HDR reviewers and up to two major contractors with capability and experience to execute this project. Outcomes will identify major changes required to the preliminary project scope elements, gauge availability of bidders to determine bid schedule, and develop installation cost ranges for specialty work.
7. 60% design level Engineer's Opinion of Probable Construction Cost (EOPCC)
8. Incorporate City and other 60% review comments.
9. Prepare Final Design documents for construction.
10. Develop final technical specifications to supplement the City standards and City front ends. City will provide current standard documents in Word format. HDR will fill in project information, (Project name, project number, dates) in the City provided front end documents.
11. Conduct internal QA/QC review with senior HDR staff familiar with project requirements for the City.
12. Submit final design document package to City for review. Final EOPCC will be developed. Following the review, a meeting will be held to review documents and address comments.
13. Conduct soil borings and generate report of soil characteristics related to project requirements (N values, rock location, approximate elevation of groundwater). A maximum of 20 borings are anticipated with depths ranging from 15-25 feet deep or to auger refusal. Rock cores will be requested at critical crossing locations such as areas proposed for trenchless construction, major roadway crossings, and environmentally sensitive areas. The rock cores will be drilled to a minimum of two pipe diameters below the proposed invert (rounded up to even increments of 5-foot). Standard soil borings will be proposed

to supplement rock cores along the alignment and will target an elevation at least two pipe diameters below the proposed invert but will not be drilled past refusal if encountered above the desired depth.

Key Understandings:

- The City will conduct tree clearing during the winter timeframe of Nov. 1 – March 31 in order to obtain a "May Affect, Not Likely to Adversely Affect" determination from the USACE under the new Programmatic Section 7 Informal Consultation Framework for the three listed bat species promulgated by the USACE and USFWS effective April 19, 2019.
- To qualify for NWP 12, the project is assumed to have no more than ½ acre of loss from fill activities. No individual permit and LEDPA analysis is required. No individual 401 water quality certification is required and a conditionally pre-certified 401 will be issued by the USACE.
- Soil borings are anticipated to generally follow 400 foot spacing interval depending on access restrictions. Landowners will be notified but easements do not need to be in place to conduct soil borings.
- The recommended conceptual alignment between Highway 50 and the Cedar Creek interceptor as outlined in the Phase 1 Sanitary Sewer Study will be the basis of design.
- Final Design documents and permitting will not begin until easements have been obtained.

Information and/or Services by Others:

- Geotechnical borings, soils classifications, and report will be developed by a subcontractor to HDR.

**Task 4 – Bidding Administration**

Bidding services provided by HDR include activities such as printing, document distribution, clarifications, addenda development and distribution, attending pre-bid and bid opening, and make a recommendation for award based upon a review of bids for completeness and accuracy as outlined below:

1. Bid document distribution to the QuestCDN electronic bidding site.
2. Attend pre-bid meeting approximately fourteen (14) calendar days prior to the bid opening. Issue an addendum related to questions from this meeting.
3. Address bid phase inquiries up to one (1) calendar day prior to the bid opening and issue addendum as necessary.
4. Attend bid opening, review bids for completeness and accuracy. Submit a formal recommendation for award to the City.

Key Understandings:

- The project will be Bid as one complete project one time. If the project is split into multiple projects requiring a second Bid advertisement for all or a portion of the project, an amendment for additional services may be required.
- The City will conduct the Bid opening electronically and generate the Tabulation of Bids therefrom. HDR will review the Bid Tabulations for irregularities and completeness.

**Task 5 – Construction Administration Phase**

Construction administration services provided by HDR include attending the pre-construction conference, completing contractor submittal reviews, interpreting contract documents when questions arise, attending monthly progress meetings, performing site visits, assisting with project completion activities, and updating contract drawings to reflect construction changes and as-built conditions.

Key Understandings:

- HDR will complete review of contractor submittals for the project. No more than two reviews for each submittal anticipated.
- City will be perform primary construction management, oversight, and on-site observation of the Work. HDR is available on an “as-needed” basis to address construction related issues, unforeseen conditions, or interpretation of drawings.

**Schedule**

HDR will begin our services upon receipt of written notice to proceed. HDR anticipates the following completion period for each task

Task 1: Full Contract duration

Task 2: Target Easement Exhibits to City within 150 days from NTP

Task 3: Final Design documents for review approximately 6 weeks after easements obtained

Task 4: Winter 2020

Task 5: Spring 2021 – Dec 2021

**Estimated Fee**

The estimate of staff labor and fee is attached as Exhibit 2 of this Exhibit B and summarized as follows:

Task 1:	\$15,200.00
Task 2:	\$98,270.00
Task 3:	\$178,620.00
Task 4:	\$10,145.00
Task 5:	<u>\$38,640.00</u>
<b>Total Maximum Fee:</b>	<b>\$340,875.00</b>





# RATE SCHEDULE

# EXHIBIT 2

(Rates shall be in effect for one (1) year beginning on the execution date of the agreement/amendment)

ROLE .....	HOURLY RATE
PROJECT PRINCIPAL/QUALITY CONTROL	\$200.00 - \$250.00
SENIOR PROJECT MANAGER	\$175.00 - \$225.00
SENIOR TECHNICAL SPECIALIST	\$200.00-\$290.00
SENIOR PROJECT ENGINEER	\$155.00 - \$200.00
PROJECT ENGINEER	\$110.00 - \$160.00
ASSISTANT PROJECT ENGINEER	\$80.00 - \$110.00
SENIOR STRUCTURAL ENGINEER	\$150.00 - \$220.00
STRUCTURAL ENGINEER	\$90.00 - \$150.00
SENIOR ELECTRICAL ENGINEER	\$150.00 - \$220.00
ELECTRICAL ENGINEER	\$90.00 - \$150.00
SENIOR MECHANICAL ENGINEER	\$145.00 - \$200.00
MECHANICAL ENGINEER	\$90.00 - \$145.00
SENIOR ENVIRONMENTAL SCIENTIST	\$145.00 - \$200.00
ENVIRONMENTAL SCIENTIST	\$90.00 - \$145.00
SENIOR TECHNICIAN	\$130.00 - \$140.00
TECHNICIAN	\$70.00 - \$125.00
FIELD MANAGER	\$135.00-\$160.00
FIELD SUPERVISOR II	\$110.00-\$135.00
FIELD SUPERVISOR I	\$50.00-\$110.00
FIELD TECHNICIAN II	\$55.00-\$80.00
FIELD TECHNICIAN I	\$45.00-\$65.00
SURVEY MANAGER	\$115.00 - \$160.00
SURVEY CREW	\$120.00 - \$195.00
SENIOR SUPPORT STAFF	\$85.00 - \$110.00
ADMINISTRATION PERSONNEL	\$ 50.00 - \$85.00
<b>REIMBURSABLES:</b>	
PRINTING & REPRODUCTION	COST
TRAVEL	CURRENT IRS RATE
PHONE	COST
MAPPING	COST
SUBCONSULTANTS	COST