

TASK ORDER NO. 11147.F

Pursuant to the

MASTER AGREEMENT FOR PROFESSIONAL SERVICES BETWEEN

CITY OF MERIDIAN (OWNER) AND BROWN AND CALDWELL (ENGINEER)

This Task Order is made this 9th day of November 2021 and entered into by and between the City of Meridian, a municipal corporation organized under the laws of the State of Idaho, hereinafter referred to as “City”, and accepted by Brown and Caldwell, hereinafter referred to as “Engineer” pursuant to the mutual promises, covenant and conditions contained in the Master Agreement (category 2a) between the above mentioned parties dated October 1, 2020. The Project Name for this Task Order is as follows:

WRRF DIGESTER 6 – SERVICES DURING CONSTRUCTION

FUNDING

Funding for this project will be split between two fiscal years, 202 (Oct. 2021 – Sept. 2022) \$703,545, and 2023 (Oct. 2022 – Sept. 2023) estimated at \$178,682. The amounts estimated beyond the 2021 fiscal year have not yet been appropriated by the City. Consultant may NOT expend more than the amount specified and approved for a specific fiscal year. Any and all additional expenditures beyond the current fiscal year MUST be approved by the City Council and memorialized by a written amendment or change order to this Agreement.

SCOPE OF WORK

The Project will involve improvements related to the following WRRF processes:

- New Digester 6
- New digester annex building between Digester 6 and future Digester 7
- New waste gas burner flare
- Sludge pumping, piping, electrical, instrumentation and selective demolition upgrades in the existing North Digester Control Building
- Piping, electrical, instrumentation, and selective demolition upgrades in the existing Digester 4/5 annex building.
- New yard piping conveyance, electrical/control conduits, and site improvements throughout the Digester 6 expansion area.

Task 1 – Services During Construction

- During this phase, Consultant will provide office and on-site engineering services in support of the City and General Contractor construction of the Digester 6 improvements.

1.1 Conformed Construction Documents

- Incorporate Addendum changes into the bidding plans and specifications and republish a single updated version of the Contract Documents for construction use. The construction parties (City, Consultant, and General Contractor) will refer to the conformed set for all construction activity for the duration of the project for consistency purposes.

Deliverables

- 10 sets of Conformed Construction Documents (specifications and 24"x36" full size drawings) will be submitted to the City.
- 10 sets of Conformed Construction Documents (drawings only – 11"x17" half size drawings) will be submitted to the City.
- An electronic format (*.pdf) of the complete set of plans and specifications will be submitted to the City.

1.2 Submittal Review

- Submittals will be reviewed for general conformance with the project design concept and general compliance with the information or design requirements given in the Contract Documents. Consultant will perform these services within the duration allotted by the construction contract. Should any submittal be found to be substantially deficient, Consultant may reject the submittal without markups, while giving written examples of major deficiencies as cause for rejection.
- Submittals shall be turned around within the time frame specified in the project specifications. Submittals shall be processed through CONDOC, the City's construction document management tool.
- Submittal Review task is based on the following:
 - Consultant has allocated an average of 8 hours per submittal to review, document comments, and return submittal.
 - Consultant has estimated there could be up to 265 submittal review events (this includes a 1.5 resubmittal rate per submittal).
 - Number of submittals and hours are an estimate and may not reflect the actual number of submittals or time required for submittal review. Submittal metrics will be reviewed monthly and included in the monthly progress report.

Deliverables

- Written responses, in the form of written comments and/or marked-up submittals, will be transmitted to the City via a submittal transmittal/comment form and supplemented by mark-ups of electronic submittal documents where required for clarity.

1.3 RFI/Changes

- RFIs will be reviewed for general conformance with the project design concept and general compliance with the information or design requirements given in the Contract Documents. Consultant will perform these services within the duration allotted by the construction contract. Should any RFIs generate project changes, Consultant will coordinate with the City to develop the appropriate project change documentation for the Contractor.
 - Consultant has allocated an average of 6 hours per RFI for review and response preparation.
 - Consultant has estimated there could be up to 80 RFI response events.
 - Number of RFIs and hours are an estimate and may not reflect the actual number of RFIs or time required for RFI review. RFI metrics will be reviewed monthly and included in the monthly progress report.
- Project Changes are anticipated to include both City directed changes and Contractor proposed changes. Consultant will review changes for general conformance with the project design concept.
 - Consultant has allocated an average of 40 hours per City directed change to include issuance of drawing, detail, and/or specification updates associated with the proposed change. A formal Work Change Directive (for change costs estimated greater than \$10,000) or Field Order (for change costs estimated less than \$10,000) will be issued for all City directed changes.
 - Consultant has estimated an average of 16 hours per Contractor requested change for review and response preparation. Consultant will coordinate responses with the City prior to formally responding to the Contractor on all Contractor requested changes.
 - Consultant has estimated there could be up to 20 Change response events (5 – City directed changes and 15 – Contractor requested changes).
 - Number of Changes and hours are an estimate and may not reflect the actual number of Changes and time required for Change response. Change metrics will be reviewed monthly and included in the monthly progress report.

Deliverables

- Written responses for all City directed changes will be transmitted to the City via a Work Change Directive or Field Order transmittal form and supplemented by drawing, detail, and/or specification updates required for clarity.
- Written responses for all Contractor requested changes will be transmitted to the City via e-mail correspondence.

1.4 Site Coordination/Progress Meetings

- Participate in pre-construction conference and bi-weekly construction progress meetings for the duration of site construction. When necessary, additional Consultant staff participation in bi-weekly construction meetings will be via Microsoft Teams virtual attendance

- Consultant has allocated an average of 4 hours per attendee for participation at the pre-construction conference for up to 5 Consultant staff members (including agenda preparation, project technical details presentation, and meeting minutes preparation).
- Consultant has allocated an average of 8 hours per attendee for participation in bi-weekly construction meetings for up to 2 Consultant staff members (including agenda preparation, pre-meeting status updates with the City, meeting with the City and Contractor, post meeting coordination item follow-up, construction site coordination visits, and meeting minute preparation).
- Consultant has allocated an average of 4 hours for 1 additional Consultant staff member to participate in bi-weekly construction meetings at 1 meeting per month (including pre-meeting status updates with the City, meeting with the City and Contractor, post meeting coordination item follow-up, and construction site coordination visits).
- Consultant has estimated there could be up to 37 Site Coordination/Progress Meeting events.
- Number of Site Coordination/Progress Meetings and hours are an estimate and may not reflect the actual number of Site Coordination/Progress Meetings required. Site Coordination/Progress Meeting metrics will be reviewed monthly and included in the monthly progress report.

Deliverables

- Pre-Construction conference meeting agenda, project technical details presentation, and meeting minutes.
- Bi-weekly construction progress meeting agenda, meeting minutes, and action items list.

1.5 Field Observations

- Review work performed by others, including testing, inspection, survey, and programming services.
- Perform site visits to observe construction work, performance, and witness testing as requested by the City.
- Develop comprehensive punch list in conjunction with the City after Substantial Completion for Contractor close-out activities.
- Structural Observations required per the International Building Code. Structural Observations performed by the Structural Engineer are different from “Special Inspections” (not included in this scope but provided by the City contracted materials testing firm).
 - Consultant has included an average of 12 hours per Structural Observation event (including pre-observation coordination with the Contract, site visit observation, and summary Structural Observation Report).
 - Consultant has estimated there could be up to 6 Structural Observation events, 3 each for the Digester 6 and Digester 6/7 Annex Building

(foundations prior to concrete placement; bearing wall prior to cover-up with non-structural elements; concrete masonry construction prior to grouting; and lateral force resisting element construction). To the extent possible, Structural Observations will be coordinated with bi-weekly construction meetings and concurrent Structural Observations at multiple facilities.

- Architectural/Building Mechanical site visits to review construction progress (e.g., plumbing, insulation, finishes, flashing, siding, roofing, HVAC, punch-list items etc.) at different phases of progress completion. Consultant has estimated there could be up to 8 Architectural/Building Mechanical Field Observations. To the extent possible, Architectural/Building Mechanical Field Observations will be coordinated with bi-weekly construction meetings.
- Electrical site visits to review construction progress (e.g., power supply coordination, transformers, conduit placement, wiring, panels arc-flash study, punch-list items etc.) at different phases of progress completion. Consultant has estimated there could be up to 12 Electrical Field Observations. To the extent possible, Electrical Field Observations will be coordinated with bi-weekly construction meetings.

Deliverables

- Structural Observation Reports
- Field Observation action items will be included in the bi-weekly construction progress meeting action items list
- Arc-Flash study and field equipment labels
- Punch-List

1.6 Record Drawings

- Produce final CAD drawings of project facilities constructed from mark-ups and drawings submitted to the City from the Contractor in conformance with the provisions of Specification 01 78 39.
- Working from Contractor submittals (red-line drawings or potentially pdf files or CAD mark-up drawings) and City supplemented survey data where available, Consultant will interpret drawing inconsistencies or discrepancies. Consultant may perform field investigation where needed to develop a correct representation of work constructed.

Deliverables

- Record Drawings in electronic format (pdf)

1.7 O&M Manual

- Develop an operations and maintenance (O&M) manual for the City in accordance with IDAPA 58.01.16. The manual will only be for the new or updated facilities included in this project.
- Incorporate vendor submittals and operations and maintenance guidance into the new O&M manual using the following steps:

- Meet with City operations and maintenance staff to develop a comprehensive understanding of current O&M practices on existing digester and gas handling systems.
- Conduct a field investigation to verify existing and new facility information including photo documentation of project improvements.
- Collect vendor submittal data and information.
- Submit DRAFT O&M documentation for City Review.
- Incorporate City review comments.
- Submit FINAL O&M documentation to City and IDEQ.

Deliverables

- DRAFT and FINAL versions of the O&M Manual in electronic format (MS Word and pdf)

1.8 Start-Up Support Services

- Assist the City and Contractor with planning and implementation of start-up, testing, and commissioning activities. This Task is divided into two areas: start-up planning and start-up/commissioning.
- Start-Up Planning
 - Lead start-up planning activities by helping develop the start-up strategy document with support by the City and Contractor.
 - Review the Contractor's written start-up plan submitted under Section 01 75 00.
 - Perform technical analyses of treatment plant issues that may be impacted by start-up activities.
 - Coordinate schedule and start-up event timing with the City and Contractor.
 - Consultant has allocated an average of 8 hours per attendee for participation at start-up planning meetings for up to 2 Consultant staff members (including agenda and meeting minutes preparation).
 - Consultant has estimated there could be up to 4 start-up planning meeting events.
- Start-Up/Commissioning
 - The City and Contractor shall conduct all testing and commissioning and shall provide testing and commissioning data to the Consultant in electronic format.
 - Consultant shall review data, meet with City staff or witness testing activities, and provide written feed-back on the completeness of testing and commissioning.
 - Consultant facility leads will be present in the field for set periods of time during testing and commissioning of their respective areas of design as requested by the City.
 - Commissioning will be completed during a nominal 1-month period and require multiple Consultant staff and discipline involvement.

Deliverables

- Agendas and minutes for Start-Up Planning meetings.
- Field notes identifying corrective actions for problems or deficiencies note during testing and commissioning.

1.9 Operator Training

- Develop training content for the new Anaerobic Digester processes collaboratively with City staff to broaden the understanding of process features generally covering the following topics:
 - Flexibility for the new digester improvements in different process configurations modes.
 - Operation of new equipment associated with the project.
 - System configurations to handle various process issues.
- Consultant has estimated developing a training outline for a two-day training workshop up to 4 hours each day in length. Training will be conducted by up to 2 Consultant staff members.

Deliverables

- DRAFT and FINAL version of the training material content in hard copy and electronic formats.

Task 2 – Project Management

- During this phase, Consultant will provide management support to the City common to all Task 1 activities.

2.1 Project Management

- Provide management, direction, coordination, and control of all work associated with Project schedule, budget, subconsultants, technical quality, and monthly progress reports and invoices for the Project.
- This task includes the following activities:
 - Develop a Project Management Plan and Quality Plan for internal use.
 - Develop a Health and Safety plan for internal use.
 - Staff technical activities to align with the Contractor critical-path schedule.
 - Prepare monthly project progress status reports. Monthly progress status reports will identify budget status, progress status, and activities of the previous month.
 - Supervise Consultant project staff and design disciplines.
 - Manage in-house budget and schedule.
 - Procure, supervise, and coordinate the activities of subconsultants providing specialized or supplemental engineering services.

Deliverables

- Monthly progress status reports and invoices

ASSUMPTIONS

While preparing our scope of services and fee schedule, Consultant has made the following assumptions:

- All construction correspondence (RFIs, submittals, etc.) will be processed through the City's electronic construction management service (CONDOC).
- The Construction Manager role is not included in this scope of work but is covered by the City.
- To maximize the use of the City's budget, Consultant may return incomplete or unclear submittals without review or comment.
- The Consultant is responsible solely for Consultant's employees' activities on the project site. Consultant's participation on the project shall not be construed to relieve the City or any construction Contractors from their responsibilities to maintaining a safe jobsite. Neither the professional activities of the Consultant, nor the presence of the Consultant's employees and sub-consultants, shall be construed to imply the Consultant has any responsibility for means and methods of work performance, superintendence, sequencing of construction, or safety in, on, or about the jobsite.
- Contractor record drawing mark-ups are complete and accurate and Consultant's work under this task is only to convert the Contractor-supplied record drawing materials into final record drawings, and not to independently validate or correct record drawings.

CITY RESPONSIBILITIES

City's Responsibilities Include:

- The Construction Manager will be provided by the City for the duration of the construction schedule.
- Oversee and inspect day-to-day construction activities and will provide all administration of the construction contract, including reviewing pay requests.
- Provide all special inspections (under a separate roster contract task order) required by the International Building Code (IBC), as well as all materials testing.
- Provide site surveying, benchmark control, and elevation verification (under a separate roster contract task order).
- Provide programming services (under a separate roster contract task order).
- Attend all project coordination meetings to provide timely input on action items.
- Review and provide comments on all deliverables listed in this Task Order.
- Provide input on content to include in the training workshop.

TIME OF COMPLETION and COMPENSATION SCHEDULE

COMPENSATION AND COMPLETION SCHEDULE			
Task	Description	Estimated Completion Date	Compensation
1	Services During Construction	<ul style="list-style-type: none"> ▪ 18 Months after Notice to Proceed 	\$816,931
2	Project Management	<ul style="list-style-type: none"> ▪ 18 Months after Notice to Proceed 	\$65,296
TASK ORDER TOTAL:			\$882,227.00

The Not-To-Exceed amount to complete all services listed above for this Task Order No. is (eight hundred eighty-two thousand two hundred and twenty-seven dollars) \$882,227.00. No compensation will be paid over the Not-to-Exceed amount without prior written approval by the City in the form of a Change Order. No travel or expenses will be reimbursed through this agreement. All costs must be incorporated in the individual tasks within the Compensation and Completion Schedule above.

CITY OF MERIDIAN

BROWN & CALDWELL

BY: _____
KEITH WATTS, Purchasing Manager

BY:  _____
MARTHA KNOWLTON

Dated: _____

Dated: November 1, 2021

City Project Manager:
Troy Thrall