



Our vision of Coeur d'Alene is of a beautiful safe city
that promotes a high quality of life and sound economy
through excellence in government

GENERAL SERVICES/PUBLIC WORKS COMMITTEE

with

Council Members McEvers, Miller & Gookin

June 27, 2022, 12:00 p.m.

Library Community Room

702 Front Avenue

AGENDA

*****ITEMS LISTED BELOW ARE CONSIDERED TO BE ACTION ITEMS**

- Item 1 Request Approval of Setting a Public Hearing on July 19, 2022, regarding V-22-05 - Vacation of a Ten-foot Strip of Right-of-Way (316 S. 18th Street) – Engineering Project Manager Dennis Grant, Streets & Engineering Department

- Item 2 Request Approval of Amendment No. 2 to the Professional Services Agreement with HDR Engineering, Inc., in the Amount of \$50,763.57, for the Solids Handling Improvements Contract – Capital Program Manager Mike Becker, Wastewater Department

- Item 3 Request Approval of a Professional Services Agreement with HDR Engineering, Inc., in the Amount of \$97,180.00, for the Wastewater Outfall Evaluation – Capital Program Manager Mike Becker, Wastewater Department

The City of Coeur d'Alene will make reasonable accommodations for anyone attending this meeting who requires special assistance for hearing, physical or other impairments. Please contact Juanita Knight, Senior Legal Assistant, at (208) 769-2348 at least 24 hours in advance of the meeting date and time.

**General Services/Public Works
STAFF REPORT**

DATE: June 27, 2022

FROM: Dennis J. Grant, Engineering Project Manager

SUBJECT: V-22-05, Vacation of a ten-foot (10') strip of right-of-way adjoining the westerly boundary line of Lot 5 and Lot 6, Block 4 of the Kaesmeyer Addition plat

DECISION POINT:

The applicant, John Hutchins, Unio West LLC, is requesting the vacation of a ten-foot (10') strip of right-of-way adjoining the westerly boundary line of Lot 5 and Lot 6, Block 4 of the Kaesmeyer Addition plat (316 S. 18th Street).

HISTORY:

The requested right-of-way was originally dedicated to the Public in 1907.

FINANCIAL ANALYSIS:

The vacation of the requested right-of-way would not have any financial impact on the City and would add approximately 800 square feet to the County tax roll. Although a minor amount, it would be a benefit to the municipality as tax revenue and to the land owner whose lot adjoins the strip of usable property.

PERFORMANCE ANALYSIS:

This portion of 18th Street has an eighty-foot (80') right-of-way. By vacating the requested ten-foot (10') strip of right-of-way, it would be more consistent with the typical sixty-foot (60') right-of-way of a street south of Sherman Avenue. The right-of-way can be incorporated into the development of the adjoining property. All utilities are existing and in place, and there is no foreseeable use for this right-of-way. The Development Review Team was informed about this vacation.

RECOMMENDATION:

Staff recommends that Council proceed with the vacation process as outlined in Idaho Code Section 50-1306 and recommends setting July 19, 2022, as the date for a public hearing on the item.



LEGEND

- FOUND 5/8" REBAR WITH P.L.S. 6374 CAP
- CALCULATED POSITION, NOTHING FOUND OR SET



H-Scale 1" = 30'

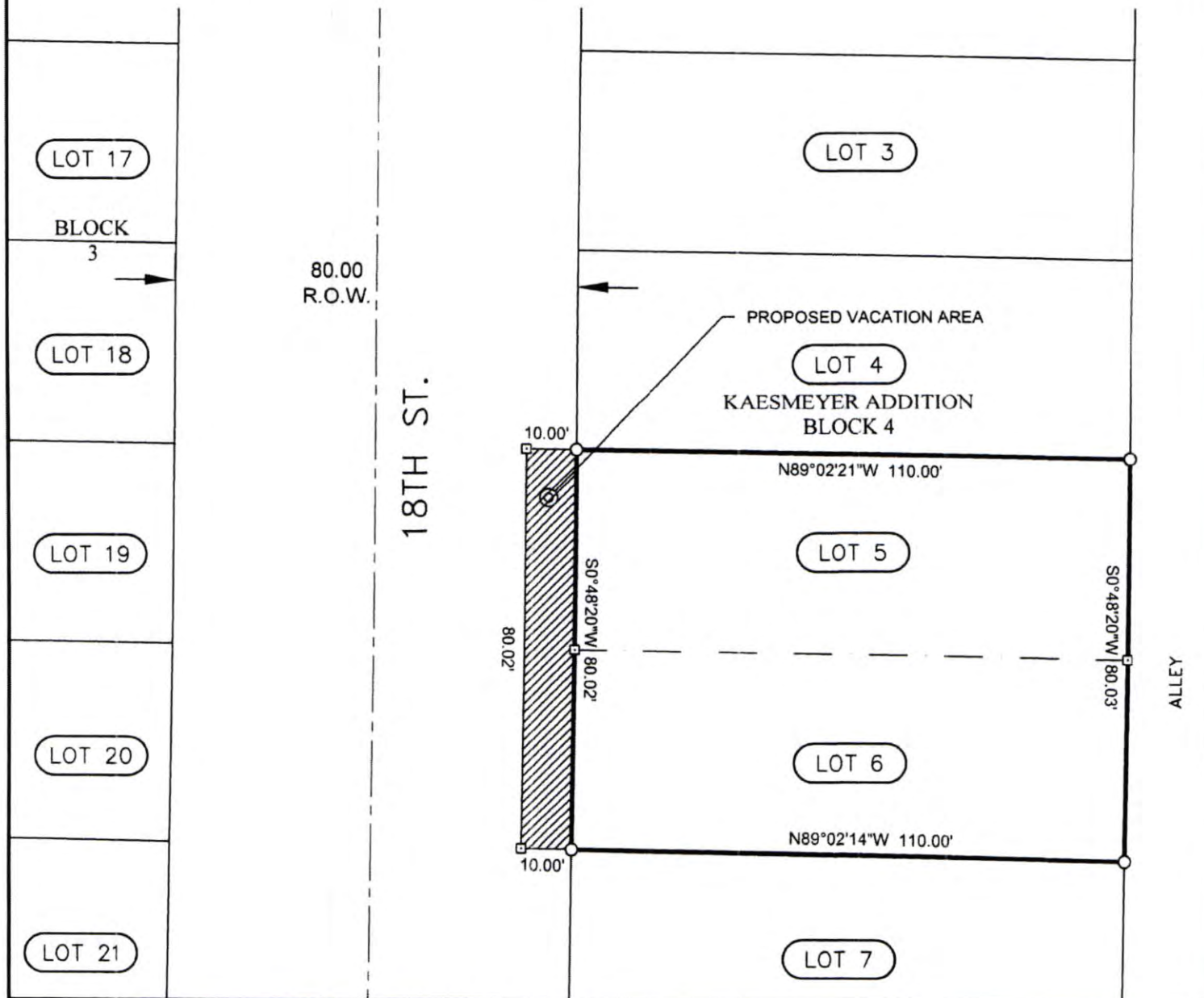


EXHIBIT B

SECTION 19, TOWNSHIP 50 NORTH, RANGE 3 WEST,
BOISE MERIDIAN, KOOTENAI COUNTY, IDAHO

Johnson
Surveying

DATE SURVEYED: N/A

DRAFTED BY: ERH

PLOT DATE: 06/10/2022

SHEET

FILE NAME: 22-173

CHECKED BY: CJJ

PROJECT No.: 22-173

1/1

P.O. Box 2544 Post Falls, ID 83877
208-660-2351
johnsonsurveyingnw.com



Mullan Avenue

S 19th St

S 18th St

Alley

S 19th St

Proposed Vacation

10'

GENERAL SERVICES/PUBLIC WORKS STAFF REPORT

DATE: June 27, 2022
FROM: Mike Becker, Capital Programs Manager, WW Department
SUBJECT: Amendment No. 2 to Solids Handling Improvements
Contract with HDR Engineering, Inc.

DECISION POINT:

Should City Council approve Amendment No. 2 to the City's existing Professional Services Agreement (PSA) with HDR Engineering, Inc., for additional Professional Services associated with the Wastewater Department's (WW) Solids Handling Improvements Project?

HISTORY:

On August 18, 2020, the city executed a PSA with HDR Engineering, Inc., for the preliminary design improvements to the existing Solids Handling Building and to replace the belt filter press at the City's Wastewater Treatment Facility (Res 20-045). In compliance with Idaho Code § 67-2805 Category B Bidding process and the City's Procurement Policies, a GEA Centrifuge was ordered.

On December 13, 2021, and with the centrifuge dewatering equipment pre-purchased, City Council approved PSA Amendment No. 1 (Res 21-074) for HDR to finalize the design plans and specifications based on GEA's proprietary centrifuge operational and dimensional requirements.

On April 29, 2022, and nearly 7 months ahead of schedule, WW took delivery of the new centrifuge. Delivery of the centrifuge's electronic and control panels are still pending. The purchase of the centrifuge equipment is the primary reason for the Solids Handling Improvement Project. The following summarizes this new Amendment's scope:

Since the initial preliminary design, this project has progressed to include additional provisions to mitigate the odors within this area as well as along the Centennial Trail and Spokane River. A cover for the Centrate Storage Tank will help contain the odors. Currently, it is a converted old digester opened at the top. Since the Facility Plan has master planned this area for a future Digester #6 (20+ years), a temporary floating tank cover, in place of a permanent tank cover, is proposed and at a fraction of the cost.

Presently, the biosolids load out area is undersized and exposed (no walls). An enclosed expanded biosolids load out area to the existing Solids Building will also help reduce odors in the area. Due to limited available space for future upgrades in this area, this is an excellent time to consider a less restrictive second floor within the expansion to house future equipment for facility upgrades or alternative technologies in dewatering solids.

Pre-qualifying a general contractor will help ensure this project is completed in a timely manner with a quality final product. This should discourage contractors with poor performance track records from bidding carelessly on City projects.

As part of this process, HDR will need to perform additional Professional Engineering and Architectural Services. For this reason, Task 500 was reserved within the original PSA's scope. It was used in HDR's Addendum No. 1 and is now brought forth and presented to City Council. This is also a start on amending Task 700 as outlined below.

FINANCIAL ANALYSIS:

A summary of the original PSA tasks and costs are presented in Grey in the below table. Costs for Addendum No. 1 Task 500.A1 – Management Reserve is shown below in **Blue**. Costs for Addendum No. 2 Task 500.A2 – Management Reserve and 700.A2 are presented in **Brown**.

TASK	DESCRIPTION	COSTS
100	Project Management	\$21,908
200	Regulatory Liaison, Permits, and Approvals	\$1,472
300	Concepts Development and Evaluation	\$36,580
400	Core & Preliminary Design	\$155,296
500.A1	Additional Project Elements & Final Design Development (Management Reserve)	\$117,093
500.A2	Onsite Lidar Scanning (Survey)	\$6,004.21
500.A2	Solids Building Expansion	\$42,356.93
600	Final Contract Documents	\$14,323
700	Solids Building Improvements and Centrifuge Installation Bidding Administration	\$3,206
700.A2	Contractor Prequalification Evaluation	\$2,402.43
800	Construction Phase Services	Future
900	Construction Phase Field Services	Future
1000	Post Construction and Close-out Services	Future

Total Excluding Tasks 500, 800-1000:	\$232,785.00
Total Task 500.1:	\$117,093.00
Total Tasks 500.A2 & 700.A2:	\$50,763.57
Total PSA with Amendments #1 and #2:	\$400,641.57

The Solids Handling Improvement Project will be a multi-year project and extend into FY 2022/2023. Funding for this project, including the additional engineering and architectural services outlined as Amendment No. 2, will be covered under next fiscal year's budget under account #031-022-4354-7998. A copy of HDR's amended scope, modified Project Schedule and Compensation is attached for your review.

It is worth noting that once a general contractor has been prequalified and awarded the bid for construction, a third amendment for the remaining Tasks 800-1000 (in **Green**) will be negotiated and presented to the City Council. This is the typical process for WW's large scale multi-year treatment facility projects.

PERFORMANCE ANALYSIS:

This amendment is a continuation of the ongoing Solids Handling Improvements Project PSA. HDR was selected for this project. Subsequent amendments are in accordance with Idaho Code § 67-2320(4) that allows for the City to negotiate a new professional services contract for an associated or a phased project. This amendment has been reviewed by the Legal Department.

DECISION POINT/RECOMMENDATION:

City Council should approve Amendment No. 2 to the Professional Services Agreement (PSA) with HDR Engineering, Inc., for additional Professional Engineering and Architectural Services associated with the Solids Handling Improvement Project Task 500.A2 – Management Reserve and 700.A2 Bidding Administration at an additional cost of \$50,763.57.

AMENDMENT NO. 2
to
PROFESSIONAL SERVICES AGREEMENT
Between
CITY OF COEUR D’ALENE and HDR ENGINEERING, INC.
For
SOLID HANDLING IMPROVEMENTS PROJECT

This Amendment to the Professional Services Agreement is made and entered into the ____ day of June, 2022, between the City of Coeur d’Alene, Kootenai County, Idaho, a municipal corporation organized and existing under the laws of the state of Idaho, hereinafter referred to as the “City,” and HDR Engineering, Inc., a Nebraska corporation, with its principal place of business at 412 E. Parkcenter Blvd., Suite 100, Boise, Idaho 83706, hereinafter referred to as the “Consultant,” pursuant to the terms and conditions as set forth herein.

W I T N E S S E T H:

WHEREAS, the Consultant is available and is willing to provide personnel and services to prepare the final design elements, cost estimates, construction sequencing, plans and specifications, additional shop drawings, and technical submittals for the Solids Handling Improvements Project as described herein within Amendment No. 2, and

WHEREAS, Section 10 of the Professional Services Agreement allows for modifications to the scope of services to be provided by the Consultant for additional reasonable compensation.

NOW, THEREFORE, in consideration of the terms, conditions and covenants of performance contained or incorporated herein, the City and the Consultant agree that the Professional Services Agreement entered into on the 18th day of August, 2020, and Amendment No. 1 – November 15, 2021, shall be amended as follows:

Section 1. Scope of Services

The scope of services is amended to include the scope of services, schedule, and compensation as described in Exhibit “A” hereto, entitled: Solids Handling Improvements Project at the Coeur d’Alene Advanced Wastewater Treatment Facility (AWTF) for the City of Coeur d’Alene, Idaho, Scope of Services, Schedule, and Compensation, Modified for Amendment No. 02 – June 3, 2022.

Section 2. Compensation

For services described in this Amendment, the Consultant’s total compensation for professional services, including labor and overhead costs and expenses, sub-consultant compensation, and sub-consultant mark-up, shall be Fifty Thousand Seven Hundred Sixty-three and 57/100 Dollars (\$50,763.57). This brings the total compensation under the Professional Services Agreement, Amendment No. 1 and Amendment No. 2 to Four Hundred Thousand Six

Hundred Forty-one and 57/100 Dollars (\$400,641.57) for the Solids Handling Improvements Project.

Section 3. Schedule

The Project Schedule for the services performed pursuant to this Amendment shall be as set out in Exhibit "A." Except as specifically provided herein, all terms and conditions of the original Professional Services Agreement and Amendment No.1 remain in full force and effect.

CITY OF COEUR D'ALENE

HDR ENGINEERING, INC.

James Hammond, Mayor

Kate Eldridge, Vice President

ATTEST:

ATTEST:

Renata McLeod, City Clerk

Zelma Z. Miller, Department Accountant

EXHIBIT A

SOLIDS HANDLING IMPROVEMENTS PROJECT AT THE COEUR D'ALENE ADVANCED WASTEWATER TREATMENT FACILITY (AWTF)

FOR THE

CITY OF COEUR D'ALENE, IDAHO

SCOPE OF SERVICES, SCHEDULE, AND COMPENSATION

MODIFIED FOR AMENDMENT 01 – NOVEMBER 15, 2021

MODIFIED FOR AMENDMENT 02 – JUNE 3, 2022

Introduction - Scope of Services

The Scope of Services is for HDR Engineering, Inc. ("HDR") to provide preliminary engineering design, detailed design and bidding services to the City of Coeur d'Alene, Idaho ("CITY") related to improvements to the solids handling system at the Coeur d'Alene Advanced Wastewater Treatment Facility (AWTF). Currently, the City operates a single centrifuge with a belt filter press as a standby dewatering unit. The improvements will include the replacement of the existing belt filter press with a new dewatering centrifuge, manufacturer control panel and associated polymer and odor control equipment, as well as planning for other Solids Handling Building improvements that may, or may not, be implemented in conjunction with provision of the new dewatering equipment depending upon decision making in the course of project development.

The scope of services identified below is based on the 2019 partial condition assessment of the wastewater treatment plant that was completed as an initial step of the 2018 Wastewater Treatment Facility Plan Update, the 2018 Wastewater Treatment Facility Plan Update, the January 2018 Evaluation of Solids Handling Facilities conducted at the partial condition assessment, and discussions with the City Management and Operations Staff.

The project is further defined as facilities to replace the existing belt press and associated system components with a new high solids dewatering centrifuge system including new emulsion polymer feed from the City's new emulsion polymer feed system. It is anticipated that these facilities will generally include the following:

- Core Project Item - Demolition of the existing belt press, solids feed, and polymer feed in the existing belt press area of the Dewatering Room on the upper level of the Solids Handling Building.
- Core Project Item - Installation of one (1) new City pre-qualified and pre-purchased centrifuge.

- Core Project Item - Installation of new electrical and control equipment in a new conditioned area of the electrical room, or if additional space is needed an extension of the electrical room or use of the existing dry polymer (aging tank) storage room.
- Core Project Item - Connection of exhaust air from the centrifuge and liquid/solids discharges to the existing odor control and ventilation system.
- Core Project Item - Connection of the new dewatering equipment to the existing emulsion polymer feed system.
- Core Project Item – Evaluation of the electrical and structural requirements for the condition when both centrifuges are running simultaneously in parallel.
- Management Reserve Item - Evaluation of additional building space to allow for a larger electrical room on the upper level of the Solids Handling Building and addition of emulsion polymer storage. The building addition and storage facilities will be an additive item to the centrifuge purchase and installation project
- Management Reserve Item – Design of additional odor control collection and treatment to support the Solids Handling Building addition and solids loadout facilities.
- Management Reserve Item - Additional assistance with the procurement of the centrifuge, including coordination with the City and centrifuge manufacturers on equipment testing requirements. Review, scoring, and responding to qualification statements, bench scale testing reports, and bid proposals from centrifuge manufacturers. Held discussions and provided recommendation information for selection of centrifuge equipment.
- Management Reserve Item - Additional services associated with the centrifuge pre-construction services including review City pre-purchased centrifuge mechanical and electrical shop drawings for compliance with the requirements of the procurement documents. Up to 2 resubmittals for each submittal is assumed, distribute reviewed submittals to the City and centrifuge manufacturer, evaluate and respond to up to three (3) RFIs from the centrifuge manufacturer.
- Management Reserve Item - Evaluation of modifications to the existing solids loadout room to include a full enclosure of the loadout facility to enable odor control for this area.
- Management Reserve Item - Evaluation of odor control alternatives for the centrate storage tank and selection of the preferred alternative for potential addition of odor control for the facility.
- Management Reserve Item - Evaluation of the Solids Handling Building odor control facilities alternatives, including the solids loadout and centrate storage, for adding odor control to the new and existing systems at the Solids Handling Building as an additive item to the centrifuge purchase and installation project.

- Management Reserve Item – Onsite Lidar Scanning of Centrate Storage Tank and Solids Handling Building and post-processing of data as further described below.
- Management Reserve Item – Additional Design for Solids Building Expansion to house future dewatering equipment as further described below.
- Contractor Pre-Qualification Evaluation as further described below.

Assumptions

The Scope of Services for design and bidding services is based on the following assumptions:

- The design and bidding services are based on the preparation of one (1) construction pre-qualification package, one (1) centrifuge pre-qualification package, one (1) pre-purchase package for procurement of a single centrifuge via pre-procurement and one (1) construction installation package for removal of the existing belt filter press in the Solids Handling Building upper level and installation of the City-supplied centrifuge system in the same location as the demolished belt filter press.
- The results from the Concepts Development and Evaluation Task Series 300 may result in changes to the scope and fee necessary if the Project scope changes.
- HDR standard AutoDesk CADD format and 6-digit specifications standards will be used for drawings and technical specifications.
- The City's standard Agreement and HDR developed pre-qualification and bidding documents will be utilized for this project. HDR will assist in the development of these documents.
- HDR's Master Specification system will be used for all technical specification sections.
- The centrifuge pre-purchase will be expedited on a fast-track basis immediately following the completion of the Concepts Development and Evaluation Task.
- A preliminary structural analysis of the Solids Handling Building will be completed to determine whether the new centrifuge will require additional structural modifications. A more thorough analysis will be completed as part of the detailed design scope. This scope assumes the detailed analysis will confirm no significant issues will be associated with the installation of the centrifuge.
- A preliminary electrical evaluation will be conducted to determine whether the new centrifuge equipment can be connected to the existing electrical service equipment at the Solids Handling Building. A new Centrifuge switchboard and Control Panel will be added on the upper level either in a new electrical room addition or existing electrical room.

- The new centrifuge equipment will be provided with a vendor-furnished PLC. A new City PLC will not be required. The City's existing SCADA system will communicate to the vendor-furnished PLC via a network connection.

A summary list of the tasks and task descriptions are presented below.

- Task Series 100 – Project Management
- Task Series 200 – Regulatory Liaison, Permits, and Approvals
- Task Series 300 – Concepts Development and Evaluation
- Task Series 400 – Core Project Preliminary and Final Design
- Task Series 500 – Additional Project Elements Preliminary and Final Design (Management Reserve)
- Task Series 600 – Final Contract Documents
- Task Series 700 – Solids Building Improvements and Centrifuge Installation Bidding Administration
- Task Series 800 – Construction Phase Services (Future Task)
- Task Series 900 – Construction Phase Field Services (Future Task)
- Task 1000 – Post Construction and Close-out Services (Future Task)

Task 100 - Project Management

Objective:

Provide project management activities over project duration, including planning, organizing and monitoring project team activities, preparing and monitoring bidding document production standards, attending meetings, budget management, and liaison with City.

ACTIVITY 101.1 TEAM MANAGEMENT AND PROJECT CONTROL

- Budget and invoice management.
- Schedule monitoring and update for project development.
- Resource management and allocation based on project schedules and activities.
- Production coordination.
- Monthly progress report submitted to City with each payment request.

ACTIVITY 101.2 PRODUCTION GUIDE STANDARDS

- Develop Design Memorandum (Project Guide) for HDR personnel to define activities, constraints, guidelines, budgets and procedures.
- Review Project Guide with designated City representatives for comments.
- Maintain Project Guide, distribute and update as activities dictate.

ACTIVITY 101.3 WORKSHOPS

- Workshop 1 will be conducted to:
 - Initiate Project
 - Review scope, summarize project objectives, and define project schedule.
 - Collect data including existing drawings and documents.

- Review draft Dewatering Technology Confirmation TM (Task 301.2).
- Review City requirements for redundancy, operational flexibility and construction sequencing.
- Workshop 2 will be conducted to:
 - Facilitate review of design features (Task 301.2).
 - Facilitate monetary and non-monetary discussion for the available manufacturers and centrifuge size (Tasks 301.2 and 301.3).
 - Discuss screening of manufacturers, equipment specifics, performance requirements and procurement options (Task 301.3).
 - Review preliminary structural and electrical requirements (Tasks 301.5 and 301.6).
 - Review preliminary facility layouts and impacts on existing facilities (Task 301.7).

ACTIVITY 101.4 QUALITY CONTROL

- Conduct team meetings on a regular basis during study and design phases to facilitate communication flow and study/design development.
- Provide independent quality control reviews for each technical memorandum and at 30, and 90 percent completion of design documents.
- Schedule internal audits of the project to confirm compliance with scope and the project quality assurance plans.

City Activities:

City will:

- Provide timely review and processing of monthly progress report and invoices.
- Provide timely review and comment on Project deliverables.
- Coordinate City staff participation and actively participate in Meetings and Workshops.
- Identify and provide relevant prior studies, reports, and drawings prepared by others.
- Provide and make arrangements for facilities to conduct Meetings and Workshops.

HDR Deliverables:

The following deliverable shall be provided:

- Monthly Project status reports and invoices
- Meeting and Workshop agenda and minutes
- Project Guide (Design Procedures Memorandum)

Key Understanding and Assumptions:

The following is understood or assumed:

- Specific deliverable review meetings are included under subsequent task.

Task 200 - Regulatory Liaison, Permits, and Approvals

Objective:

Provide support and assistance to the City in obtaining project permits and approvals.

HDR Activities:

ACTIVITY 201.1 PERMITS AND AGENCY REVIEWS:

- Support the City in obtaining required permits.
- Provide technical information, drawings, and design data necessary for permits.
- Respond to comments and questions from review agencies and incorporate as appropriate.
- Possible permits include:
 - IDEQ Construction.
 - Coeur d'Alene Building Department.

ACTIVITY 201.2 REGULATORY REVIEW OF FINAL DESIGNS.

Following the City's review and acceptance, perform the following:

- Deliver final design basis, drawings, and specifications to regulatory agencies.
- Respond to regulatory agency comments and questions and incorporate comments as appropriate in final designs.

City's Activities:

City will:

- Support HDR staff in communicating with the Idaho Department of Environmental Quality (IDEQ).
- Review, sign and submit Permit Applications, and pay all associated fees.
- Identify, prepare, submit, and pay associated fees in connection with required building permits.

HDR Deliverables:

The following deliverables shall be provided:

- Application for Permit to Construct.

Key Understandings and Assumptions:

The following is understood or assumed:

- HDR's effort is associated only with assistance on the permits specifically identified above.
- Additional permits required by the Contract Documents shall be obtained by the Construction Contractor in accordance with the Contract Documents.

Task 300 - Concepts Development and Evaluation

Objective:

Identify, evaluate and provide recommendations required to establish a firm design approach for the development of contract documents required to meet the goals of the project.

HDR Activities:

ACTIVITY 301.1 SOLIDS BUILDING FUNCTIONAL REVIEW

- Review all Solids Building functional requirements, including the near-term need to replace the aging belt filter press. Consideration will be given to solids dewatering enhancements, as well as planning for the more inclusive aspects of the following:
 - Belt Filter Press Replacement
 - Controls Additions For A New Centrifuge and Other Associated Equipment
 - Polymer System Modifications and Polymer Storage
 - Truck Enclosure Improvements
 - Solids Building Structural and Architectural requirements, including odor control and visual aesthetics
 - Odor Control Revisions Including Possible New Odor Treatment For The Solids Handling Building
 - Centrate Screening Addition
 - Centrate Tank Cover Installation

ACTIVITY 301.2 CONFIRMATION OF DEWATERING CENTRIFUGE DESIGN FEATURES

- Review updated solids projections, updated costs and application of non-monetary criteria to confirm centrifuge design.
- Develop Dewatering Centrifuge Design Features memorandum including recommendations on materials of construction, equipment size, electrical and controls, and required workable space for operation and maintenance. Submit to the City for their review and comment before finalization.

ACTIVITY 301.3 CONFIRMATION OF SIZING OF CENTRIFUGE

- Develop flow projections and solids balance information that considers the projected 10-year solids loadings and flows.
- Develop capital and operations costs for a centrifuge matching the City's existing centrifuge, and also evaluate the installation of a larger unit that will also address the City's growth projection. Provide a brief summary memorandum for discussion and consideration by the City.

ACTIVITY 301.4 PROCUREMENT OF CENTRIFUGE

- Evaluate and compare centrifuge equipment to identify and screen manufacturers, select desired components, features and performance requirements and analyze monetary and non-monetary criteria.

- Provide DRAFT Procurement documents including general conditions and technical specifications for City review and comment before finalization.

ACTIVITY 301.5 PRELIMINARY STRUCTURAL EVALUATION

- Review centrifuge layouts and sizing and consider structural requirements for the existing Solids Handling Building structure. Consider structural configurations that would allow flexibility and performance desired by the City.
- Provide a brief Preliminary Structural Evaluation summary memorandum for City review and comment before finalization.

ACTIVITY 301.6 PRELIMINARY ELECTRICAL EVALUATION

- Review centrifuge electrical requirements and consider the existing Solids Handling Building electrical capacity and determine modifications necessary for support of an additional centrifuge.
- Identify needed requirements for the existing Solids Handling Building electrical system. Consider electrical configurations that would allow flexibility and performance desired by the City and that will minimize dewatering down time for construction.
- Provide a brief Preliminary Electrical Evaluation summary memorandum for City review and comment before finalization.

ACTIVITY 301.7 FACILITY LAYOUTS AND IMPACTS

- Work with City to develop an economical and operator “friendly” layout considering impacts to existing facilities and operations, and one that allows sequenced installation to maintain required dewatering operations during construction.
- Develop a preliminary Sequence of Construction that establishes the constraints and milestones for the Installation Contractor, coordinates with equipment delivery, and accounts for allowable outages planned with Operations Staff.
- Provide hand drawn preliminary layout sketches for City review and comments before finalization.

ACTIVITY 301.8 PREDESIGN REPORT

- Consolidate all technical memoranda into one preliminary design report.
- Meet with City to review recommendations of all technical memoranda.

City’s Activities:

City will:

- Provide timely, organized review comments on deliverables issued for City review
- Coordinate City staff participation.

HDR Deliverables:

The following deliverables shall be provided:

- DRAFT and Final Preliminary Design Report, including the following:
 - Centrifuge Design Features memorandum
 - Centrifuge Selection memorandum
 - Preliminary structural evaluation memorandum
 - Preliminary electrical evaluation memorandum
 - Preliminary equipment layout sketches
- DRAFT Centrifuge procurement documents

Key Understandings and Assumptions:

The following is understood or assumed:

- The City has elected to use centrifuge dewatering technology.
- The City would like to evaluate the installation of a similar sized machine to their existing centrifuge against installation of a larger unit that will meet the City's full solids loading and solids flow conditions on its own.
- Unless otherwise defined elsewhere, one (1) electronic (.pdf) copy of all deliverables will be submitted to the City.
- TM review meetings with the City to review and finalize comments on each of the deliverables will occur as defined above in Task 101.3 – Workshops.
- The City would like to evaluate Solids Handling Building layouts that also incorporate polymer storage and centrate screening. Evaluation of polymer storage and centrate screening will be completed as part of the preliminary design.
- The City would like to evaluate enclosure options for the solids loadout area and odor control for the solids handling building. Evaluation of odor control will be completed as part of the preliminary design.

Task 400 - Core Project Preliminary and Final Design**Objective:**

Production of 30 percent and 90 percent documents for centrifuge installation including modifications to existing facilities where necessary for the centrifuge installation. Installation of added building area to house polymer storage, centrate screening and mechanical, electrical

and odor control additions are not included in this task. Advancement of design documents to ninety percent will be completed in conjunction with Task 500 as determined by the City.

HDR Activities:

ACTIVITY 401.1 DEVELOPMENT OF SOLIDS HANDLING BUILDING PRELIMINARY DESIGN

- Based upon the results of the Task Series 300, prepare a preliminary design that incorporates a recommended design for the Solids Handling Building that includes design of the preliminary recommendations for:
 - Belt Filter Press Replacement
 - Controls Additions For A New Centrifuge and Other Associated Equipment
- Based on results from Task Series 300, prepare a preliminary Process and Instrumentation Diagram (PID) including piping size and configuration and location of key instrumentation elements for the centrifuge system and complete a SCADA summary of operator I/O and alarms for the new centrifuge unit, with provision for a future replacement centrifuge in the future.
 - City review and document finalization.
 - Submit PID to City for review and comment.
 - Conduct in-person review meeting at the City of Coeur d'Alene WWTF Administration Building Conference Room.

ACTIVITY 401.2 DEVELOPMENT OF PRELIMINARY DRAWINGS OF DEWATERING FACILITIES

- Based on results from Task Series 300, prepare preliminary design criteria, preliminary dewatering room layout plans and sections derived from modeled layouts, and P&ID and process design criteria drawings to 30 percent.

ACTIVITY 401.3 DEVELOPMENT OF PRELIMINARY SPECIFICATIONS

- A preliminary list of technical specifications will be developed.

ACTIVITY 401.4 DEVELOPMENT OF A PRELIMINARY SEQUENCE OF CONSTRUCTION

- Based upon the results from the Task Series 300 and Task Series 401.1 and 401.2 results, develop a preliminary Sequence of Construction that identifies the Centrifuge Replacement project and other necessary Solids Handling Building Improvements and establishes the constraints and milestones for the Installation Contractor.

ACTIVITY 401.5 DEVELOPMENT OF OPINION OF PROBABLE CONSTRUCTION COST

- Develop Opinion of Probable Construction Cost (Class 4 per AACE Recommended Practice No. 17R-97) based on the preliminary contract drawing and specifications.

ACTIVITY 401.6 – REVIEW OF THIRTY PERCENT DOCUMENTS

- Perform internal QC review of design deliverables.

- HDR will transmit thirty percent documents and its Opinion of Probable Construction Costs to City for review and comment.
- HDR will conduct a telephone conference call with City to discuss and resolve review comments.
- HDR will provide a team of HDR review professionals not associated with the project to review the thirty percent documents. Those review comments will be evaluated with City's comments and incorporated into the design documents as required.

ACTIVITY 401.7 DEVELOPMENT OF NINETY PERCENT DRAWINGS

- Develop drawings to approximately 90 percent complete.

ACTIVITY 401.8 DEVELOPMENT OF NINETY PERCENT CONTRACT TECHNICAL SPECIFICATIONS AND COST ESTIMATE

- Develop preliminary technical specifications of materials, equipment systems, standards and workmanship for the project work as well as certain applicable administrative details to ninety percent complete.
- Develop a 90 percent opinion of probable construction cost estimate update, based upon the initial cost estimate developed in Task 401.5. Incorporate a Contingency Line Item in the ninety percent cost estimate, estimated up to two (2), project Change Orders that include unexpected costs. Set the project contingency at 5 percent of the total estimated probable construction cost.

ACTIVITY 401.9 DOCUMENT REVIEWS

- Perform internal QC reviews by engineering disciplines and address QC comments prior to City submittal.
- Perform operability and constructability review.
- Submit ninety percent documents to City for review and comment.
- Meet with City via telephone conference call to discuss and resolve comments.
- Incorporate City comments into documents.

ACTIVITY 401.10 ADDITIONAL CENTRIFUGE PROCUREMENT SERVICES

- Coordination with the City and centrifuge manufacturers on equipment testing requirements.
- Review, scoring, and responding to qualification statements, bench scale testing reports, and bid proposals from centrifuge manufacturers.
- Held discussions and provided recommendation information for selection of centrifuge equipment.

This work amounted to approximately \$10,000 and has already been paid by the City.

City's Activities:

City will:

- Provide timely, organized review comments on deliverables issued for City review.

HDR Deliverables:

The following deliverables shall be provided:

- Preliminary PID.
- Preliminary 30 percent drawings, including process design criteria, floor plans and pertinent sections derived from the process model.
- Preliminary specifications list.
- Opinion of Probable Construction Cost based on the 30 percent design documents.
- Design Development Drawings to 90 percent complete.one (1) full size drawing set in .pdf format.
- Preliminary Technical Specifications for Centrifuge Installation, in .pdf format.

Key Understandings and Assumptions:

The following is understood or assumed:

- Unless otherwise defined elsewhere, one (1) computerized file of all deliverables will be submitted to the City.
- Preliminary design drawings will generally consist of the following:
 - Structural discipline: Preliminary major structural elements and structural details.
 - Mechanical discipline: Preliminary routing of ductwork revisions (assuming existing HVAC equipment is sufficient with no modifications anticipated other than for any new spaces.)
 - Process discipline: Preliminary area layouts including equipment orientation and routing of major solids conveyance and piping.
 - Electrical discipline: Preliminary one-line diagram and equipment layouts for the proposed modifications.
 - Instrumentation discipline: Location of major field instrumentation components impacting piping layout, preliminary I/O listing and preliminary communication diagram.
- One 1-hour Project Coordination telephone conference meeting with the City and HDR design personnel per week is scoped for the design team to communicate status and expedite design.

- Opinion of Probable Construction Cost will be developed using Excel software with the format of estimate being broken down by discipline in the 6-digit specification format.
- It is assumed a maximum two-week review period will be required by City to complete its review and comment period for the Preliminary Design. After that period, the HDR design team will meet with the City staff in a single telephone conference meeting to discuss and resolve City comments.

Task 500 - Additional Project Elements Preliminary and Final Design (Management Reserve)

Objective:

Production of 30 percent and 90 percent documents for additional Solids Handling Building modifications identified during Task 300. Installation of added building area to house polymer storage, and mechanical, electrical and odor control additions are included in this task as determined by the evaluation completed in Task Series 300. Advancement of design documents to ninety percent will be completed in conjunction with Task 400 as determined by the City. The scope and fee for these improvements is undefined at this time since the specific improvements resulting from the Task 300 remain to be developed. As a result, the Task 500 scope and fee for services will be updated following Task 300 completion.

HDR Activities:

ACTIVITY 501.1 DEVELOPMENT OF SOLIDS HANDLING BUILDING PRELIMINARY DESIGN ADDITIONS

- Based upon the results of the Task Series 300, include in the preliminary design completed as part of Task 401 the recommended design additions for the Solids Handling Building. The following additions may be included in the design:
 - Polymer System Modifications and Polymer Storage
 - Truck Enclosure Improvements
 - Solids Handling Building architectural features to improve appearance of these facilities from the Centennial Trail.
 - Odor Control Revisions Including Possible New Odor Treatment for The Solids Handling Building and Centrate Storage Tank.
 - New Centrate Storage Pumping
 - Centrate Tank Cover and Mixer Installation
- Based on results from Task Series 300, modify the preliminary Process and Instrumentation Diagrams (PIDs) including piping size and configuration and location of key instrumentation elements for the added items selected by the City.
 - City review and document finalization.

- Submit PID modifications to City for review and comment.
 - Conduct telephone conference with City to discuss and resolve comments.
- Perform Lidar scan of the Centrate Storage Tank to obtain detailed information on existing dimensions, structural and mechanical components in the tank as detailed as-built drawings for the structure are not available. Information collected onsite will be incorporated into the design of the new floating cover for the tank.
 - HDR personnel also scanned areas of the Solids Handling Building for betterment of other aspects of the project design.
 - 20 hours for EIT and 12 hours for Project Engineer required for this effort. \$1,705.00 for scanning equipment rental and direct travel expenses are also included.
 - Additional structural, architectural, and electrical design associated with designing the upper level of the Solids Building expansion to accommodate future potential installation of solids dewatering equipment. A dewatering screw press with solids and hydraulic loading comparable to the second centrifuge currently being installed is assumed.
 - Structural engineering work includes preparation and checking of structural calculations, drawing development, standard details, specification development, contributions to an Opinion of Probable Construction Cost (OPCC) estimate, QC review, and review and response to City and regulatory comments on Contract Documents.
 - Architectural work includes revising the layout and aesthetics for the taller building.
 - Electrical engineering work includes lighting for new upper level, provisions for electrical power, and emergency lighting for upper level and stairwell.
 - 12 hours for QA/QC, 60 hours for Structural/Project Engineer, 60 hours for Structural EIT, 20 hours for Architect, 8 hours for Electrical Engineer, and 100 hours of CADD Technician time is estimated.

ACTIVITY 501.2 DEVELOPMENT OF PRELIMINARY DRAWINGS OF DEWATERING FACILITIES

- Based on results from Task Series 300, prepare preliminary design criteria and layout plans and sections for the additions identified.

ACTIVITY 501.3 DEVELOPMENT OF PRELIMINARY SPECIFICATIONS

- The preliminary list of technical specifications will be modified to include the additions selected by the City.

ACTIVITY 501.4 DEVELOPMENT OF A PRELIMINARY SEQUENCE OF CONSTRUCTION

- Based upon the results from the Task Series 300 and Task Series 401.1 and 401.2 results, modify the preliminary Sequence of Construction to also include other selected Solids Handling Building Improvements and establish the constraints and milestones associated with the selected additions for the Installation Contractor.

ACTIVITY 501.5 DEVELOPMENT OF OPINION OF PROBABLE CONSTRUCTION COST

- Modify the Opinion of Probable Construction Cost (Class 4 per AACE Recommended Practice No. 17R-97) to include the selected additions to the contract drawing and specifications.

ACTIVITY 501.6 – REVIEW OF THIRTY PERCENT DOCUMENTS

- Perform internal QC review (using a team of HDR review professionals not associated with the project) to review the thirty percent documents of the additional design deliverables.
- HDR will incorporate internal QC review comments into the 30 percent design documents and the associated Opinion of Probable Construction Costs, and will submit to the City for review and comment.
- HDR will conduct a telephone conference call with City to discuss and resolve review comments. City review comments will be incorporated into the design documents as required.

ACTIVITY 501.7 DEVELOPMENT OF NINETY PERCENT DRAWINGS

- Develop drawings of the selected additional design features to approximately ninety percent complete.

ACTIVITY 501.8 DEVELOPMENT OF NINETY PERCENT CONTRACT TECHNICAL SPECIFICATIONS AND COST ESTIMATE

- Modify the preliminary technical specifications of materials, equipment systems, standards and workmanship for the added project work, as well as associated and applicable administrative details, to 90 percent complete.
- Modify the 90 percent opinion of probable construction cost estimate update that includes the selected additions.

ACTIVITY 501.9 REVIEW OF NINETY-PERCENT DOCUMENTS

- Perform internal QC review (using a team of HDR review professionals not associated with the project) to review the 90 percent documents of the additional design deliverables.
- HDR will incorporate internal QC review comments into the ninety percent design documents and the associated Opinion of Probable Construction Costs, and will submit to the City for review and comment.
- HDR will conduct a telephone conference call with City to discuss and resolve review comments. City review comments will be incorporated into the design documents as required.

ACTIVITY 501.10 CENTRIFUGE PRE-CONSTRUCTION SERVICES

- Review City pre-purchased centrifuge mechanical and electrical shop drawings for compliance with the requirements of the procurement documents. Up to 2 resubmittals for each submittal is assumed.

- Distribute reviewed submittals to the City and centrifuge manufacturer.

**Evaluate and respond to up to three (3) RFIs from the centrifuge manufacturer.
Incorporate City comments into documents City's Activities:**

City will:

- Provide timely, organized review comments on deliverables issued for City review.

HDR Deliverables:

The following deliverables shall be provided:

- Preliminary 30 percent drawings of all additional facilities identified, including modified process design criteria, floor plans and pertinent sections derived from the process model.
- Specifications list for additional items identified.
- Opinion of Probable Construction Cost based on the 30 percent design documents for additional items identified.
- Design Development Drawings, to 90 percent complete, of additional items identified.

Key Understandings and Assumptions:

The following is understood or assumed:

- One 1-hour Project Coordination telephone conference meeting with the City and HDR design personnel per week is scoped for the design team to communicate status and expedite design.
- Opinion of Probable Construction Cost will be developed using Excel software with the format of estimate being broken down by discipline in the 6-digit specification format.
- It is assumed a maximum two-week review period will be required by City to complete its review and comment period for the Preliminary Design. After that period, the HDR design team will meet with the City staff in a single telephone conference meeting to discuss and resolve City comments.
- Redesigns associated with modifications of previously approved technical memorandums and other preliminary design documents are not included in this Scope of Services.
- One Project Coordination meeting is scoped for the design team per week to communicate status and expedite design.
- Unless otherwise defined elsewhere, one electronic (.pdf) file of all deliverables will be submitted to the City.

Task 600 - Final Contract Documents

Objective:

Finalize documents developed in Task Series 400 to final Bidding Documents. This Task includes only those items required for removal of the existing belt filter press and installation of a new dewatering centrifuge and necessary mechanical, electrical and building modifications.

HDR Activities:

ACTIVITY 601.1 DEVELOPMENT OF CONTRACT DRAWINGS

- Develop final drawings to graphically show the scope, extent and character of the work to be performed by the successful bidder.

ACTIVITY 601.2 DEVELOPMENT OF CONTRACT TECHNICAL SPECIFICATIONS

- Develop final technical specifications from ninety percent specifications.

ACTIVITY 601.3 DEVELOPMENT OF FRONT-END DOCUMENTS

- Assist the City in the development of special provisions and modifications to the City's standard bidding and contract documents as appropriate for this project.

ACTIVITY 601.4 DEVELOPMENT OF OPINION OF PROBABLE CONSTRUCTION COST

- Develop final Opinion of Probable Construction Cost (Class 2 per AACE Recommended Practice No. 17R-97) to reflect contract document content, based upon the estimate update in Task 401.8.

ACTIVITY 601.5 DOCUMENT REVIEWS

- Submit bid documents to City for review and comment.
- Meet with City by telephone conference call to discuss and resolve comments.
- Finalize bid documents and issue to regulatory agency per Task Series 200.
- Conduct internal QC of bid documents.
- Incorporate City, regulatory agency and internal HDR QC comments into final bid document packages.

City's Activities:

City will:

- Provide timely, organized review comments on deliverables issued for City review.

HDR Deliverables:

The following deliverables shall be provided:

- Final Contract Drawings, Front-End Documents and Technical Specifications 90 percent complete), one (1) full size drawing set, drawings .pdf file and specifications .pdf file.

- Final Bid Documents, one (1) full size drawing set, drawings .pdf file and specifications .pdf file.
- Final Opinion of Probable Construction Cost.

Key Understandings and Assumptions:

The following is understood or assumed:

- It is assumed a maximum two-week review period will be required by City to complete its review and comment period. After that period, the HDR design team will meet with the City staff in a single telephone conference call meeting to discuss and resolve City comments.
- HDR's internal review will be conducted by a team of HDR's professional engineers and architects not directly associated with the Project.
- Redesigns associated with modifications of previously approved technical memorandums and other preliminary design documents are not included in this Scope of Services.
- One Project Coordination meeting is scoped for the design team per week to communicate status and expedite design.
- City's legal staff and purchasing will be involved with review and finalization of front-end documents.
- The City's contract documents will be used as a basis for development for the front-end documents with development of supplemental and/or special conditions by HDR with City input.
- Unless otherwise defined elsewhere, one (1) hard copy and one (1) computerized file of all deliverables will be submitted to the City.

Task 700 - Solids Handling Building Improvements and Centrifuge Installation Bidding Administration

Objective:

Provide technical assistance to City in pre-qualification of general contractors, obtaining and evaluating bids, and awarding the contract for the Final Contract Documents defined in Task Series 600.

HDR Activities:

ACTIVITY 701.1 INSTALLATION CONTRACTOR PRE-QUALIFICATION

- Develop contractor pre-qualification specifications using the City's standard pre-qualification specifications.

- Assist the City in the City's advertisement for contractor pre-qualification.
- Provide interpretations and answer questions City concerning the pre-qualification documents as requested by the City.
- Perform evaluation of the pre-qualification submittals, including contacting Owners and Engineers referenced therein, calculate scoring for each submittal, and draft notification letters to each Contractor. 16 hours for EIT and 4 hours for Project Engineer required for this effort.

ACTIVITY 701.2 INTERPRETATIONS AND PRE-BID CONFERENCE

- Provide interpretations and answer bidders' questions concerning the bidding documents as requested by the City.
- Develop addenda as appropriate to interpret, clarify or expand the bidding documents in response to bidders' questions.
- Prepare Pre-Bid Meeting Agenda, conduct meeting, address technical issues, record notes and prepare and submit minutes to the City.

ACTIVITY 701.3 BID EVALUATION AND RECOMMENDATION OF AWARD

- Assist the City with the review and evaluation of submitted Bid Forms and associated documentation in relation to requirements of bidding documents.
- Provide written recommendation of award based on review.

City's Activities:

City will:

- Provide timely, organized review comments on deliverables issued for City review.
- Receive pre-qualification proposals through the City's bidding system.
- Receive bid proposals through the City's bidding system.
- Provide final selection of accepted proposal.
- Obtain additional information required for bid evaluation that is not included at time of bid form submission.
- Secure executed contracts and required bonds and insurance certificates from selected bidder.

HDR Deliverables:

The following deliverables shall be provided:

- Contractor pre-qualification proposal review comments
- Pre-Bid Meeting agenda and notes
- Addenda, for distribution by the City

- Written evaluation and recommendation for award of bid.

Key Understandings and Assumptions:

The following is understood or assumed:

- HDR's Project Manager will attend the Pre-bid Conference.
- HDR's bid evaluation will be limited to information presented by the bidders at the time of the bid opening.

Task 800 - Construction Phase Office Services (Future Task)

ACTIVITY 801.1 SUBMITTALS REVIEW AND PROCESSING – CENTRIFUGE

- Review City Pre-purchase centrifuge shop drawings and operation and maintenance manuals for compliance with the requirements of the contract documents. Up to 20 separate shop drawings are estimated to be reviewed, at an estimated 4 hours for each shop drawing including technical review and processing.
- Log, mark and distribute transmittals to City and manufacturer.
- Distribute approved submittals to the Contractor.
- Maintain log of submitted transmittals to monitor the progress and status of approvals.

ACTIVITY 801.2 CENTRIFUGE MANUFACTURERS PROGRESS ESTIMATE

- Review and process applications by the centrifuge manufacturer for progress payments, prior to assignment to contractor after award of construction contract, submitted based upon manufacturer contract terms. Make recommendations to the City for acceptance.

ACTIVITY 801.3 PRECONSTRUCTION MEETING

- Prepare agenda and conduct pre-construction conference to discuss and establish project procedures. Prepare meeting minutes and distribute to attendees.

ACTIVITY 801.4 SUBMITTALS REVIEW AND PROCESSING - CONTRACTOR

- Review shop drawings for compliance with the requirements of the contract documents.
- Log, mark and distribute transmittals to City and contractor.
- Maintain log of submitted transmittals to monitor the progress and status of submittals.
- Review the following miscellaneous submittals required by the contract documents and provide comments to City.
 - Initial construction schedule.
 - Concrete and other test reports.
 - Schedule of values.

ACTIVITY 801.5 CONTRACTOR'S PROGRESS ESTIMATE

- Review and process applications by the contractor for progress payments submitted on a monthly basis consistent with the City's procedures. Three (3) originals are required each attached to an AIA pay request form or other approved format.

- Ensure certified payroll reports are submitted by Contractor to HDR (If required) and forwarded to City with Contractor pay applications.
- Make recommendations to the City for acceptance and transmit to the City for processing.

ACTIVITY 801.6 PROJECT MEETINGS

- Project Manager to conduct up to six (6) two-hour progress (monthly / bimonthly as necessary) meetings at the project site or City's office during construction. Review project progress, resolve any current problems and identify future issues for resolution.
- Prepare agenda and meeting minutes and distribute to attendees.

ACTIVITY 801.7 CONSULTATION AND SITE VISITS (DESIGNERS)

- Consult on design and design modifications and contract non-performance issues.
- Provide interpretations and clarifications of the construction documents during construction.
- Conduct up three (3) periodic visits by designers, with up to three design technical leads for a maximum of 4 hours and the design team site representative for a maximum of 4 hours.

ACTIVITY 801.8 ADMINISTER REQUESTS FOR INFORMATION (RFIS)

- Receive, log and distribute RFIs to appropriate design team members.
- Evaluate and respond to RFIs. It is assumed for this scope of services, up to 20 RFIs will be reviewed, at approximately 1 hour for each RFI response.
- Log design team responses and distribute responses to Contractor and City.

ACTIVITY 801.9 ADMINISTER CHANGED WORK

- Initiate or receive, log, distribute and track changes.
- Technical processing of Requests for Substitution:
 - Review substitution requests and assist in negotiating cost or time changes associated with substitutions.
- Technical Processing of Field Orders (FOs):
 - Evaluate Project to determine when FOs are required. Prepare FOs where appropriate.
- Technical Processing of Change Proposal Requests (CPRs):
 - Evaluate Project to determine when CPRs are required. Prepare CPR where appropriate.
 - Evaluate CPR pricing and time when CPRs are returned from contractor.
 - Assist in negotiations with contractor as required and make final recommendations to City.
- Processing Change Orders (COs):
 - Prepare change orders and forward to the City.
- Maintain log of submitted transmittals to monitor the progress and status of approvals.

ACTIVITY 801.10 PROJECT MANAGEMENT

- Project Management activities listed to be provided during completion of Task Series 800 and 900.
- Provide project monitoring and reporting.
- Provide resource management and allocation based on project schedules and activities.
- Provide budget and invoice management.
- Provide coordination with City.

Key Understandings and Assumptions:

The following is understood or assumed:

- Construction contract activities will begin in early 2021 and construction will be finally complete by July 31, 2021. HDR will utilize its Project Tracker software to log and track Contractor submittals.
- It is assumed that the cost of reviewing Contractor's initial shop drawing submittals and one resubmittal are included in this scope. The review costs associated with any subsequent resubmittals will be paid for by the Contractor.
- City staff will determine compliance with prevailing wage requirements, check pay rates against schedules, conduct contractor employee interviews and maintain compliance reports.
- The City will provide the necessary contract coordination for assignment of the centrifuge manufacturer's contract to the Contractor. HDR will assist the City with the assignment process.
- HDR will provide the services of a sub-consultant to provide the Special Inspection Services as required by the Contract Documents.

Task 900 - Construction Phase Field Services (Future Task)

ACTIVITY 901.1 RESIDENT SERVICES

- Relay written and/or verbal communications between the Engineer and the contractor.
- Inform the Engineer and City of construction activities and issues on a timely basis.
- Report to the Engineer whenever work appears to be unsatisfactory, faulty or defective, has been damaged or does not conform to the contract documents.
- Maintain orderly files of project meetings, shop drawings, contract documents, addenda, work directives, change order and progress estimates.
- Review and reconcile progress estimates with contractor in the field and coordinate with Engineer to determine payment amount.
- Assist Engineer in preparing punch list when project reaches substantial completion.
- Coordinate materials testing and review results to determine contractor compliance with the requirements of the contract documents.
- Provide weekly construction report to the City.
- Provide observation of Pre-Demonstration and Demonstration periods.

Key Understandings and Assumptions:

The following is understood or assumed:

- HDR will provide one project representative (RPR) to provide approximately half- time (up to 500 hours) observation during an approximate 5-month period from Notice to Proceed, assuming March 15, 2021, to Final Completion, assuming July 31, 2021.

Task 1000 - Post Construction and Close-Out Services (Future Task)

ACTIVITY 1001.1 SUBSTANTIAL COMPLETION AND FINAL INSPECTION

- Conduct substantial completion inspection and prepare a report (punchlist) covering observed discrepancies, deficiencies and omissions in the work performed by the contractor.
- Prepare certification of substantial completion when contractor has completed work in substantial compliance with the contract documents.
- Make recommendation regarding retainage to the City.
- Conduct a final inspection of the project upon correction of deficiencies.
- Assist in preparation of close-out documents and make recommendation for final payment.

ACTIVITY 1001.2 SOLIDS HANDLING IMPROVEMENTS O&M MANUAL – HARD COPY

- Provide one (1) electronic copy of the Electronic Operations Manual for the systems modified and/or constructed as part of the Solids Handling Improvements project. This manual insert will be added to the City's existing electronic Operations and Maintenance Manual and will address the overall operation for the new facilities to supplement the individual equipment O&M manuals furnished by manufacturers and suppliers.
- The Operations Manual will include the following, as a minimum:
 - General description, flow schematic and design parameters for the new and modified facilities, including the centrifuge and polymer systems and associated electrical and control systems.
 - Detailed descriptions and design parameters for the new and modified facilities.
 - Descriptions of control and normal and alternate operations of the new and modified facilities.

ACTIVITY 1001.3 START-UP ASSISTANCE

- Assist in process decisions associated with start-up of new and modified solids handling facility equipment, processes and systems.
- Review and assist the Contractor in coordinating and executing City staff training on Project systems as required by the contract documents.
- Assist the contractor in startup of new facilities by providing technical input from which he can make decisions for system startup, testing and demonstration.

- Monitor assembly and delivery of Operation and Maintenance Manuals required by the contract documents.
- Provide up to 16 hours of on-site start-up and training assistance near the completion of the construction project, including the demonstration of successful centrifuge cake production for at least 3 consecutive hours. This service will be in addition to manufacturer's start-up and training which will be required in construction contract documents.
- Provide an 11 month site walk-through with the City and one representative of HDR to evaluate the equipment installation's compliance with the one-year warranty period. Complete a brief consultant and City reflection on the project, and develop a bullet list of lessons learned for the project. Submit the lessons learned summary to the City.

ACTIVITY 1001.4 AS-RECORDED DRAWINGS

- Prepare record drawings showing changes made during the construction process. Drawings are based on mark-ups, drawings and other data furnished by the contractor.
- Provide the City one (1) set of record drawings and an electronic file in AutoCAD format.

ACTIVITY 1001.5 PROJECT MANAGEMENT

Project Management activities listed to be provided during completion of Task Series 400.

- Provide project monitoring and reporting.
- Provide resource management and allocation based on project schedules and activities.
- Provide budget and invoice management.
- Provide coordination with City.

Key Understandings and Assumptions:

Activities covered by this Task Series will be completed in approximately two (2) months after contractor notice of Substantial Completion.

- Substantial and final inspections will include the HDR Project Manager and up to one person from each design discipline, but not more than three (3) people total. Only one of each inspection is anticipated. Additional inspections will be at the expense of the Contractor.
- Contractor will furnish final equipment O&M manuals, provide associated equipment training to City's staff, and successfully complete performance and demonstration testing.

PROJECT SCHEDULE

The proposed project schedule is summarized in the Table below.

Project Task	Estimated Schedule
Consultant Notice to Proceed (Upon Contract Approval)	8/31/20
Concepts Development and Evaluation	8/31/20 – 9/16/20
Design Development (30% & 90%)	4/15/22 – 7/29/22
Final Contract Documents (100%)	7/29/22 – 8/15/22
Bidding	8/16/22 – 9/20/22
Executed Construction Contracts	9/23/22, estimated
Installation Construction	10/10/22 – 3/8/23, estimated

COMPENSATION

Project Task/Activity	Description	Fee
Task 500	Additional Project Elements Preliminary and Final Design (Management Reserve)	
Activity 501.A2	Onsite Lidar Scanning	\$6,004.21
Activity 501.A2	Additional Design for Solids Building Expansion	\$42,356.93
Task 700	Solids Handling Building Improvements and Centrifuge Installation Bidding Administration	
Activity 701.A2	Contractor Pre-Qualification Evaluation	\$2,402.43
Amendment Total		\$50,763.57



CITY OF COEUR D'ALENE WASTEWATER DEPARTMENT

CONTRACT AMENDMENT NO. 2

to the

SOLIDS HANDLING IMPROVEMENTS PROJECT

with

HDR ENGINEERING, INC.



SOLIDS HANDLING BLDG. VIEW FROM TRAIL



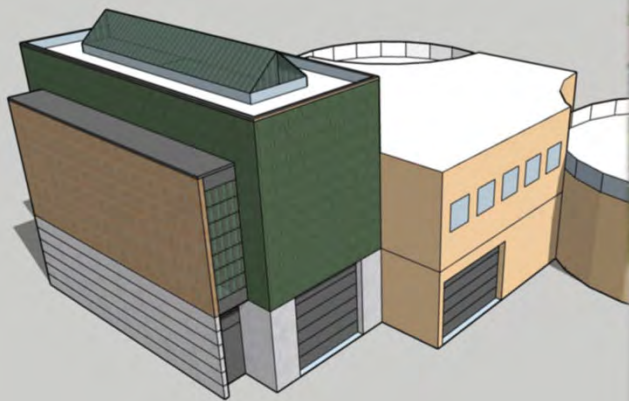
FUTURE



TODAY



SOLIDS HANDLING BLDG. VIEW FROM N.I.C.



FUTURE



TODAY



STAFF'S RECOMMENDATION:

City Council should approve Amendment No. 2 to the Professional Services Agreement (PSA) with HDR Engineering, Inc., for additional Professional Engineering and Architectural Services associated with the Solids Handling Improvement Project at an additional cost of \$50,763.57.



QUESTIONS?



GENERAL SERVICES/PUBLIC WORKS STAFF REPORT

DATE: June 27, 2022
FROM: Mike Becker, Capital Programs Manager, WW Department
SUBJECT: Professional Services Agreement - Wastewater Outfall Evaluation

DECISION POINT:

Should City Council authorize the Wastewater Department (WW) to execute a Professional Services Agreement (PSA) with HDR Engineering, Inc., for an engineering evaluation related to the repairs/replacement, improvements and upgrades to the City's existing Wastewater Outfall to the Spokane River?

HISTORY:

Under normal conditions, the City's Advanced Wastewater Treatment Facility (AWTF) discharges treated effluent by gravity through a buried 30-inch diameter outfall pipe extending 200 feet into the Spokane River. Originally constructed in 1984, the treated effluent is diffused through a series ten 10-inch risers that narrow down to 6-inch diameter nozzles above the river bottom. During periods of high river flow, the higher water-surface elevations within the river prevents the effluent from discharging via gravity. Under these circumstances, effluent is pumped to the outfall using vertical turbine pumps located at the effluent pump station.

The WW Facility Plan identified the following known effluent pump station and outfall condition and operational issues:

- The effluent vertical pumps were replaced in 2004 with minor pump station control modifications. Pumping controls are erratic and subject to river water surface level variations. Issues occur during low and high flow conditions. It is recommended that the pumping controls be scheduled for replacement.
- Damage to outfall diffusers is known to have occurred based on a 2002 assessment. Repair of the damaged diffuser sections is needed.
- Capacity of the outfall is limited, particularly if gravity flow of some of the treated effluent is desired from disinfection. Evaluation of an extension of the outfall is recommended with additional diffuser ports to increase hydraulic capacity.

Last winter, while Spokane River flows were slightly above 6,000 cfs, the outfall was video inspected by divers to provide an updated conditional assessment. The video showed that one (1) of the diffusers was completely buried under river sediment and nonoperational. Four (4) other diffusers were buried but appear to

still be operational. Depending on the river's sedimentation loading, these four diffusers are on the verge of being buried. The remaining five (5) diffusers were exposed or partially exposed. In all observations, the retainer flanges were severely corroded with 100% of the flange coating lost. If anodes were originally installed on these retainers, they were completely corroded. With the end of the outfall buried, video footage inside the outfall could not be completed.

Based on this information, the WW is seeking an evaluation of the outfall and effluent pump station with a Preliminary Engineering Report (PER) identifying the repairs, replacement, capacity improvements and/or upgrades.

FINANCIAL ANALYSIS:

A copy of this evaluation's proposed PSA and HDR's Scope of Services, Schedule and Compensation (Exhibit A) accompanies this staff report. As shown, the PSA amount for this portion of the project is \$97,180.00 and will be completed this fiscal year (2021/2022). Presently, the WW has the budget authority under account #031-022-4354-7925.

PERFORMANCE ANALYSIS:

This evaluation is a continuation of the City's 2018 Facility Plan Update which has identified numerous AWTF Capital Improvement Projects (CIP). HDR was selected for this project in accordance with Idaho Code § 67-2320(4) that allows for the City to negotiate a new professional services contract for an associated or a phased project. This PSA has been reviewed by the Legal Department.

DECISION POINT/RECOMMENDATION:

City Council should authorize the Wastewater Department (WW) to execute a Professional Services Agreement (PSA) with HDR Engineering, Inc., for \$97,180.00 for an engineering evaluation related to the repairs, replacement, capacity improvements and upgrades to the City's existing wastewater outfall and effluent pump station.

PROFESSIONAL SERVICES AGREEMENT

between

CITY OF COEUR D'ALENE

and

HDR ENGINEERING, INC.

for

WASTEWATER OUTFALL IMPROVEMENTS EVALUATION

THIS Agreement is made and entered into this ____ day of _____, 2022, between the CITY OF COEUR D'ALENE, Kootenai County, Idaho, a municipal corporation organized and existing under the laws of the state of Idaho, hereinafter referred to as the "City," and HDR ENGINEERING, INC., a corporation duly organized and existing in the state of Idaho, with its principal place of business at 412 E. Parkcenter Blvd., Boise, Idaho 83706, hereinafter referred to as the "Consultant."

W I T N E S S E T H:

WHEREAS, the National Pollutant Discharge Elimination System (NPDES) Permit No. ID0022853 presently authorizes the City's Advanced Wastewater Treatment Facility's (AWTF) to discharge treated wastewater pollutants meeting the permit's effluent limits and conditions into the Spokane River through a single outfall pipeline; and

WHEREAS, said single outfall pipeline has experienced damage to the diffuser outlets and is undersized for handling projected future peak hour flows; and

WHEREAS, the City has scheduled the Consultant to prepare a preliminary engineering report (PER) based on an evaluation of the existing diffuser outlets, outfall pipeline's condition and hydraulic capacity from information generated from the recently conducted diver inspection report; and

WHEREAS, the PER will identify the improvement options for repair/replacement of the known damage to the existing outfall diffuser elements; and

WHEREAS, the PER will provide options for increasing the hydraulic capacity of the existing outfall to meet the projected peak flow conditions; and

Section 1. Definitions.

In this agreement:

A. The term “City” means the city of Coeur d’Alene, 710 Mullan Avenue, Coeur d’Alene, Idaho 83814.

B. The term “Consultant” means HDR Engineering, Inc., 412 E. Parkcenter Blvd., Boise, Idaho 83706.

C. The term “Mayor” means the mayor of the city of Coeur d’Alene or his authorized representative.

D. The term “Agent” means the Wastewater Director with budget authority on behalf of the City of Coeur d’Alene or his authorized representative.

Section 2. Employment of Consultant. The City hereby agrees to engage the Consultant and the Consultant hereby agrees to perform the services hereinafter set forth.

Section 3. Scope of Services.

A. The Consultant shall perform the services described in the Scope of Services attached hereto and incorporated herein by reference as Exhibit “A”.

B. Area Covered: The Consultant shall perform all the necessary services provided under this Agreement respecting the tasks set forth in the Scope of Services.

Section 4. Personnel.

A. The Consultant represents that it has or will secure at its own expense all personnel required to perform its services under this Agreement. Such personnel shall not be employees of or have any contractual relationship with the City.

B. All of the services required hereunder will be performed by the Consultant or under his direct supervision, and all personnel engaged in the work shall be fully qualified and shall be authorized under state and local law to perform such services.

C. The Consultant agrees to maintain Worker’s Compensation coverage on all employees, including employees of subcontractors, during the term of this Agreement as required by Idaho Code Sections 72-101 through 72-806. Should the Consultant fail to maintain such insurance during the entire term hereof, the Consultant shall indemnify the City against any loss resulting to the City from such failure, either by way of compensation or additional premium liability. The Consultant shall furnish to the City, prior to

commencement of the work, such evidence as the City may require guaranteeing contributions which will come due under the Employment Security Law including, at the option of the City, a surety bond in an amount sufficient to make such payments.

Section 5. Time of Performance.

The services of the Consultant shall commence upon execution of this Agreement by the City and shall be completed on or before September 30, 2022. The period of performance may be extended for additional periods only by the mutual written agreement of the parties.

Section 6. Compensation.

A. Subject to the provisions of this Agreement, the City shall pay the Consultant a sum not to exceed Ninety-seven thousand One Hundred eighty and no/100 dollars (\$97,180.00), unless authorized in writing by the City.

B. Except as otherwise provided in this Agreement, the City shall not provide any additional compensation, payment, use of facilities, service or other thing of value to the Consultant in connection with performance of agreement duties. The parties understand and agree that, except as otherwise provided in this Section, administrative overhead and other indirect or direct costs the Consultant may incur in the performance of its obligations under this Agreement have already been included in computation of the Consultant's fee and may not be charged to the City.

Section 7. Method and Time of Payment.

Monthly progress payments must be submitted by the 10th of the month for work done in the previous calendar month. Partial payment shall be made by the end of each calendar month for the work completed in the previous calendar month. Final payment shall be made thirty (30) days after completion of all work and acceptance by the City Council.

Section 8. Termination of Agreement for Cause.

If, through any cause within Consultant's reasonable control, the Consultant shall fail to fulfill in a timely and proper manner its obligations under this Agreement, or if the Consultant shall violate any of the covenants, agreements, or stipulations of this Agreement, the City shall, after providing Consultant reasonable time to remedy the deficiency, thereupon have the right to terminate this Agreement by giving written notice to the Consultant of such termination and specifying the effective date thereof, at least five (5) days before the effective date of such termination. In that event, all finished or unfinished hard copy documents, data, studies, surveys, and reports or other material prepared by the Consultant under this agreement shall at the option of the City become its property, and the Consultant shall be entitled to receive just and equitable compensation for any satisfactory work completed on such documents and materials. Equitable

compensation shall not exceed the amount reasonably billed for work actually done and expenses reasonably incurred.

Section 9. Termination for Convenience of City.

The City may terminate this Agreement at any time by giving thirty (30) days written notice to the Consultant of such termination and specifying the effective date of such termination. In that event, all finished or unfinished documents and other materials as described in Section 8 above shall, at the option of the City, become its property. The Consultant shall be entitled to receive compensation not to exceed the amount reasonably billed for work actually done and expenses reasonably incurred as of the effective date of the termination.

Section 10. Modifications.

The City may, from time to time, require modifications in the general scope of services of the Consultant to be performed under this Agreement. The type and extent of such services cannot be determined at this time; however, the Consultant agrees to do such work as ordered in writing by the City, and the City agrees to compensate the Consultant for such work accomplished by written amendment to this Agreement.

Section 11. Equal Employment Opportunity.

A. The Consultant will not discriminate against any employee or applicant for employment because of race, color, religion, sex, or national origin, sexual orientation and/or gender identity/expression. The Consultant shall take affirmative action to ensure that applicants are employed and that employees are treated during employment without regard to their race, color, religion, sex, or national origin, sexual orientation and/or gender identity/expression. Such actions shall include, but not be limited to the following: employment, upgrading, demotions, or transfers; recruitment or recruitment advertising; layoffs or terminations; rates of pay or other forms of compensation; selection for training, including apprenticeship; and participation in recreational and educational activities. The Consultant agrees to post in conspicuous places available for employees and applicants for employment, notices to be provided setting forth the provisions of this nondiscrimination clause. The Consultant will, in all solicitations or advertisements for employees placed by or on behalf of the Consultant, state that all qualified applicants will receive consideration for employment without regard to race, color, religion, sex, or national origin, sexual orientation and/or gender identity/expression. The Consultant will cause the foregoing provisions to be inserted in all subcontracts for any work covered by this agreement so that such provisions will be binding upon each sub-consultant, provided that the foregoing provisions shall not apply to contracts or subcontracts for standard commercial supplies or raw materials.

B. To the extent permitted by applicable law, the Consultant shall keep such records and submit such reports concerning the racial and ethnic origin of applicants for employment and employees as the City may require.

Section 12. Interest of Members of City and Others.

No officer, member, or employee of the City and no member of its governing body, and no other public official of the governing body shall participate in any decision relating to this Agreement which affects his personal interest or the interest of any corporation, partnership, or association in which he is, directly or indirectly, interested or has any personal or pecuniary interest, direct or indirect, in this Agreement or the proceeds thereof.

Section 13. Assignability.

A. The Consultant shall not assign any interest in this Agreement and shall not transfer any interest in the same (whether by assignment or novation) without the prior written consent of the City thereto. Provided, however, that claims for money due or to become due to the Consultant from the City under this Agreement may be assigned to a bank, trust company, or other financial institution without such approval. Notice of any such assignment or transfer shall be furnished promptly to the City.

B. The Consultant shall not delegate duties or otherwise subcontract work or services under this Agreement without the prior written approval of the City.

Section 14. Interest of Consultant.

The Consultant covenants that neither it nor its owners or officers presently have an interest and shall not acquire any interest, direct or indirect, which would conflict in any manner or degree with the performance of services required to be performed under this Agreement. The Consultant further covenants that, in the performance of this Agreement, no person having any such interest shall be employed.

Section 15. Findings Confidential.

Any reports, information, data, etc., given to or prepared or assembled by the Consultant under this Agreement which the City requests to be kept confidential shall not be made available to any individual or organization by the Consultant without the prior written approval of the City.

Section 16. Publication, Reproduction and Use of Materials.

No material produced, in whole or in part, under this Agreement shall be subject to copyright in the United States or in any other country. The City shall have unrestricted authority to publish, disclose, distribute and otherwise use, in whole or in part, any reports, data or other materials prepared under this Agreement. Consultant shall provide copies of such work products

to the City upon request. City may make and retain copies of Documents for information and reference in connection with use on the Project by the City. Such Documents are not intended or represented to be suitable for reuse by City or others on extensions of the Project or on any other project. Any such reuse or modification without written verification or adaptation by the Consultant, as appropriate for the specific purpose intended, will be at the City's sole risk and without liability or legal exposure to the Consultant and Consultant's sub-consultants. To the extent allowed by law, the City shall indemnify and hold harmless the Consultant and Consultant's sub-consultants from all claims, damages, losses, and expenses, including attorney's fees arising out of or resulting therefrom.

Section 17. Audits and Inspection.

Consultant shall provide access for the City and any duly authorized representatives to any books, documents, papers, and records of the consultant that are directly pertinent to specific agreement for the purpose of making audit, examination, excerpts, and transcriptions. Consultant shall retain all records pertinent to the project for three years after final payment and all other pending matters are closed.

Section 18. Jurisdiction; Choice of Law.

Any civil action arising from this Agreement shall be brought in the District Court for the First Judicial District of the State of Idaho at Coeur d'Alene, Kootenai County, Idaho. The law of the state of Idaho shall govern the rights and obligations of the parties.

Section 19. Non-Waiver.

The failure of the City at any time to enforce a provision of this Agreement shall in no way constitute a waiver of the provisions, nor in any way affect the validity of this Agreement or any part thereof, or the right of the City thereafter to enforce each and every protection hereof.

Section 20. Permits, Laws and Taxes.

The Consultant shall acquire and maintain in good standing all permits, licenses and other documents necessary to its performance under this Agreement. All actions taken by the Consultant under this Agreement shall comply with all applicable statutes, ordinances, rules, and regulations. The Consultant shall pay all taxes pertaining to its performance under this Agreement.

Section 21. Relationship of the Parties.

The Consultant shall perform its obligations hereunder as an independent contractor of the City. The City may administer this Agreement and monitor the Consultant's compliance with this Agreement but shall not supervise or otherwise direct the Consultant except to provide recommendations and to provide approvals pursuant to this Agreement.

Section 22. Integration.

This instrument and all appendices and amendments hereto embody the entire agreement of the parties. There are no promises, terms, conditions, or obligations other than those contained herein; and this Agreement shall supersede all previous communications, representations or agreements, either oral or written, between the parties.

Section 23. City Held Harmless.

A. The Consultant shall save, hold harmless, indemnify, and defend the City, its officers, agents and employees from and against any and all damages or liability arising out of the acts, errors, omissions, or negligence, including costs and expenses, for or on account of any and all legal actions or claims of any character resulting from injuries or damages sustained by any person or persons or property arising from Consultant's performance of this Agreement and not arising from Consultant's professional services. To this end, Consultant shall maintain general liability insurance in at least the amount set forth in Section 25A.

B. The Consultant shall save, hold harmless, and indemnify the City, its officers, agents, and employees from and against damages or liability arising out of the Consultant's negligent acts, errors, or omissions, including costs and expenses for or on account of any and all legal actions or claims of any character resulting from injuries or damages sustained by persons or property to the extent arising from Consultant's negligent performance of this Agreement, including but not limited to Consultant's professional services. To this end, Consultant shall maintain Errors and Omissions insurance in at least the amounts set forth in Section 25B.

Section 24. Notification.

Any notice under this Agreement may be served upon the Consultant or the City by mail at the address provided in Section 1 hereof.

Section 25. Standard of Performance and Insurance.

A. Consultant shall maintain general liability insurance naming the City, its entities, and its representatives as additional insureds in the amount of at least \$500,000.00 for property damage or personal injury, death or loss as a result of any one occurrence or accident regardless of the number of persons injured or the number of claimants, it being the intention that the minimum limits shall be those provided for by Idaho Code 6-924.

B. In performance of professional services, the Consultant will use that degree of care and skill ordinarily exercised under similar circumstances by members of the Consultant's profession. Should the Consultant or any of the Consultants' employees be found to have been negligent in the performance of professional services from which the

City sustains damage, the Consultant has obtained Errors and Omission Insurance in at least the amount of five hundred thousand dollars (\$500,000.00) per claim and in the aggregate. The Consultant shall maintain, and furnish proof thereof, coverage for a period of two years following the completion of the project.

C. The Consultant shall obtain and maintain auto liability insurance in the amount of \$500,000.00 for the duration of the project.

D. Prior to work under this Agreement, the Consultant shall furnish to the City certificates of the insurance coverages required herein, which certificates must be approved by the City Attorney. Certificates shall provide cancellation notice information that assures at least thirty (30) days' notice prior to cancellation of the policy for any reason in which case the Consultant shall promptly notify the City.

Section 26. Non – Discrimination.

During the performance of this contract, the Consultant, for itself, its assignees and successors in interest (hereinafter referred to as the "Consultant") agrees as follows:

A. The Consultant shall comply with the Regulations relative to non-discrimination in federally assisted programs of United States Department of Transportation (USDOT), Title 49, Code of Federal Regulations, part 21, as they may be amended from time to time, (hereinafter referred to as the Regulations), which are herein incorporated by reference and made a part of this contract. In addition, the Consultant shall comply with the requirements of Title 9, Chapter 9.56, Coeur d'Alene City Code.

B. The Consultant, with regard to the work performed by it during the contract, shall not discriminate on the grounds of race, color, national origin, sexual orientation, and/or gender identity/expression, in the selection and retention of sub-consultants, including procurement of materials and leases of equipment. The Consultant shall not participate either directly or indirectly in the discrimination prohibited by Section 21.5 of the Regulations, including employment practices when the contract covers a program set forth in Appendix B of the Regulations or discrimination prohibited by Title 9, Chapter 9.56, Coeur d'Alene City Code.

C. In all solicitations either by competitive bidding or negotiations made by the Consultant for work to be performed under a subcontract, including procurement of materials or leases of equipment, each potential sub-consultant or supplier shall be notified by the Consultant of the Consultant's obligations under this contract and the Regulations and City Code relative to non-discrimination on the grounds of race, color, sexual orientation and/or gender identity/expression, national origin, sexual orientation, and/or gender identity/expression.

D. The Consultant shall provide all information and reports required by the

Regulations or directives issued pursuant thereto, and shall permit access to its books, records, accounts, other sources of information and its facilities as may be determined by the contracting agency or the appropriate federal agency to be pertinent to ascertain compliance with such Regulations, orders and instructions. Where any information required of a Consultant is in the exclusive possession of another who fails or refuses to furnish this information, the Consultant shall so certify to ITD or the USDOT as appropriate, and shall set forth what efforts it has made to obtain the information.

E. In the event of the Consultant's non-compliance with the non-discrimination provisions of this contract, the contracting agency shall impose such contract sanctions as it or the USDOT may determine to be appropriate, including, but not limited to:

- Withholding of payments to the Consultant under the contract until the Consultant complies, and/or;
- Cancellation, termination, or suspension of the contract, in whole or in part.

The Consultant shall include the provisions of paragraphs (A) through (E) in every subcontract, including procurement of materials and leases of equipment, unless exempt by the Regulations, or directives issued pursuant thereto. The Consultant shall take such action with respect to any sub-consultant or procurement as the contracting agency or USDOT may direct as a means of enforcing such provisions including sanctions for non-compliance. Provided, however, that in the event a Consultant becomes involved in, or is threatened with, litigation with a sub-consultant or supplier as a result of such direction, the Consultant may request ITD enter into such litigation to protect the interests of the state and, in addition, the Consultant may request the USDOT enter into such litigation to protect the interests of the United States.

IN WITNESS WHEREOF, this agreement executed the day and year first written above.

CITY OF COEUR D'ALENE

HDR ENGINEERING, INC.

Mike Anderson, Wastewater Director

_____, President

ATTEST:

ATTEST:

Mike Becker, Capital Programs Manager

_____, Secretary

EXHIBIT A

OUTFALL IMPROVEMENTS EVALUATION AT THE COEUR D'ALENE ADVANCED WASTEWATER TREATMENT FACILITY (AWTF)

FOR THE

CITY OF COEUR D'ALENE, IDAHO

SCOPE OF SERVICES, SCHEDULE, AND COMPENSATION

Introduction - Scope of Services

The Scope of Services is for HDR Engineering, Inc. ("HDR") to provide preliminary engineering evaluation, permitting requirements summary, and preliminary design services to the City of Coeur d'Alene, Idaho ("CITY") related to improvements to the existing outfall at the Coeur d'Alene Advanced Wastewater Treatment Facility (AWTF). Currently, the City operates a single outfall that has experienced damage to the outfall diffuser outlet elements, and is undersized for handling projected future peak hour flows. The project will evaluate options for repair/replacement of the existing diffuser elements and options for capacity expansion of the outfall to enable the City to meet future projected flow conditions. The outfall evaluation will result in a Preliminary Engineering Report (PER) that will summarize the current outfall condition, recommended improvements to the existing outfall diffuser elements and recommended improvements necessary for expansion of the outfall hydraulic capacity. The PER will also include a summary of the permit requirements necessary for final design and construction of the recommended improvements. Final design will be completed in a separate Task, following completion of the PER.

The project is further defined as evaluation of the existing outfall condition and hydraulic capacity, and identification of necessary improvements to repair known damage to the existing outfall diffuser elements and expansion of the capacity of the outfall to meet projected peak hour flows. It is anticipated that the outfall evaluation and Preliminary Engineering Report will generally include the following:

- Core Project Item – Summary of existing outfall condition, including information generated from the City's recently conducted diver inspection.
- Core Project Item – Summary of existing outfall hydraulic capacity and summary of projected hydraulic flows
- Core Project Item – Evaluation of improvement options for repair/replacement of the existing outfall diffuser elements that are known to be damaged.
- Core Project Item – Evaluation of options for increasing the hydraulic capacity of the existing outfall to meet future projected flow conditions.

- Core Project Item – Evaluation of the permitting and funding agency requirements that are necessary for completion of improvements design and construction.
- Core Project Item – Completion of a Preliminary Engineering Report (PER) that includes a summary of recommended improvements, proposed final engineering scope and cost, opinion of probable construction costs and recommended project design scope and schedule.
- Management Reserve Item – Complete a detailed evaluation of effluent pumping controls and provide recommendations for improvements to the existing controls to provide for better low flow and high flow conditions and to stabilize erratic operation occurring in the existing system.
- Management Reserve Item – Evaluation of additional effluent elements at the facility as directed by the City.

Assumptions

The Scope of Services for evaluation and PER services is based on the following assumptions:

- The design and bidding services will be as a separate future task included following completion of the PER.
- The results from the PER may result in changes to the scope and fee necessary if the Project scope changes.
- A preliminary survey of the existing outfall may be required to complete the final design. The survey, which will require the use of an under-water survey sub-consultant, will be determined during the PER and will be added to the final design scope as needed.
- Environmental permitting for the recommended improvements will be identified in the PER. Permitting for the final design will be included in a future permitting task as part of the final design.

A summary list of the tasks and task descriptions are presented below.

- Task Series 100 – Project Management
- Task Series 200 – Outfall Condition Summary and Capacity Analysis
- Task Series 300 – Existing Outfall Diffuser Elements Evaluation and Recommendations
- Task Series 400 – Outfall Capacity Improvements Evaluation and Recommendations
- Task Series 500 – Outfall Environmental Permitting and Funding Agency Requirements Summary
- Task Series 600 – Outfall Preliminary Engineering Report (PER)
- Task Series 700 – Management Reserve
- Task Series 800 – Final Design Phase Services (Future Task)
- Task Series 900 – Construction Phase Field Services (Future Task)
- Task Series 1000 – Post Construction and Close-out Services (Future Task)

Task 100 - Project Management

Objective:

Provide project management activities over project duration, including planning, organizing and monitoring project team activities, preparing and monitoring document production, attending meetings, budget management, and liaison with City.

ACTIVITY 100.1 TEAM MANAGEMENT AND PROJECT CONTROL

- Budget and invoice management.
- Schedule monitoring and update for project development.
- Resource management and allocation based on project schedules and activities.
- Production coordination.
- Monthly progress report submitted to City with each payment request.

ACTIVITY 100.2 PRODUCTION GUIDE STANDARDS

- Develop Project Guide for HDR personnel to define activities, constraints, guidelines, budgets and procedures.
- Review Project Guide with designated City representatives for comments.
- Maintain Project Guide, distribute and update as activities dictate.

ACTIVITY 100.3 WORKSHOPS

- Workshop 1 will be conducted to:
 - Initiate Project
 - Review scope, summarize project objectives, and define project schedule.
 - Collect data, including existing drawings and documents.
 - Review City operational requirements.
- Workshop 2 will be conducted to:
 - Review preliminary condition and capacity findings
 - Facilitate monetary and non-monetary discussion for the outfall improvements
 - Discuss preliminary recommendations, permitting requirements, and funding agency coordination.

ACTIVITY 100.4 QUALITY CONTROL

- Conduct team meetings on a regular basis during the project to facilitate communication flow and study/design development.
- Provide independent quality control review of the Preliminary Engineering Report.
- Schedule internal audits of the project to confirm compliance with scope and the project quality assurance plans.

City Activities:

City will:

- Provide timely review and processing of monthly progress report and invoices.
- Provide timely review and comment on Project deliverables.

- Coordinate City staff participation and actively participate in Meetings and Workshops.
- Identify and provide relevant prior studies, reports, and drawings prepared by others.
- Provide and make arrangements for facilities to conduct Meetings and Workshops.

HDR Deliverables:

The following deliverable shall be provided:

- Monthly Project status reports and invoices
- Meeting and Workshop agenda and minutes
- Project Guide

Key Understanding and Assumptions:

The following is understood or assumed:

- Specific deliverable review meetings are included under subsequent task.

Task 200 - Outfall Condition Summary and Capacity Analysis

Objective:

Assess the existing outfall condition, including information generated from the City's recent diver inspection, and provide a summary. Also provide a summary of existing outfall hydraulic capacity and projected hydraulic flows.

HDR Activities:

ACTIVITY 200.1 OUTFALL CONDITION SUMMARY

- Review existing materials (videos, photographs, drawings, reports, etc.) to determine the existing condition of the outfall piping and diffusers within the Spokane River.
- Visually assess the effluent pipeline and diffusers for corrosion, defects, damage, and general exterior condition.
- Summarize observations in technical memorandum.

ACTIVITY 200.2 CAPACITY ANALYSIS

- Assess recent population growth in the service area and estimate future population growth and projected influent flows.
- Evaluate the hydraulics of the existing facility to understand the future peak hour hydraulic capacity of the existing outfall and diffusers.
- Summarize findings in a technical memorandum.

City's Activities:

City will:

- Support HDR staff by identifying and providing relevant prior inspections, studies, reports, and drawings prepared by others.

- Provide timely, organized review comments on deliverables issued for City review.
- Coordinate City staff participation

HDR Deliverables:

The following deliverables shall be provided:

- Existing outfall condition and capacity technical memorandum.

Key Understandings and Assumptions:

The following is understood or assumed:

- The desktop condition assessment is limited to available information.
- Unless otherwise defined elsewhere, one (1) electronic (.pdf) copy of all deliverables will be submitted to the City.

Task 300 - Existing Outfall Diffuser Elements Evaluation and Recommendation

Objective:

Identify, evaluate and provide recommendations for correction of damage required to establish the recommended design approach for repair and/or replacement of the existing outfall diffuser elements.

HDR Activities:

ACTIVITY 300.1 OUTFALL DIFFUSERS EVALUATION

- Review the condition summary as presented in Task 200 and summarize recommendations for removal, repair or replacement including:
 - Replacement of the existing filter elements with new in-kind elements on the 6-inch nozzles.
 - Removal of the existing diffuser elements and installation of larger (10-inch) nozzle ports without diffuser elements.
 - Removal of the existing diffuser elements and installation of larger (10-inch) diffuser ports with diffuser elements.

ACTIVITY 300.2 SELECTION OF EXISTING DIFFUSER DESIGN FEATURES

- Review condition and capacity summaries and develop options for diffuser improvements.
- Develop preliminary costs for diffuser upgrades and provide preliminary cost estimates for the options identified.
- Develop recommended existing diffuser design features and summarize findings in a technical memorandum.

City's Activities:

City will:

- Provide timely, organized review comments on deliverables issued for City review
- Coordinate City staff participation.

HDR Deliverables:

The following deliverable shall be provided:

- Existing diffuser evaluation and recommendation technical memorandum.

Key Understandings and Assumptions:

The following is understood or assumed:

- The City has replacement diffuser elements that are stored on-site, but the filter elements are aged and not in satisfactory condition. It is assumed the elements currently on-site will not be used due to their age and condition.
- Prevention of intrusion of river sediments into the outfall diffuser header will be considered when identifying the recommended improvements.

Task 400 - Outfall Capacity Improvements Evaluation and Recommendations

Objective:

Development of capacity improvements options that will add capacity to the outfall as identified in Activity 200.2. Evaluate the capacity options and provide final recommendation for capacity improvements to the outfall to meet future projected flow conditions.

HDR Activities:**ACTIVITY 400.1 DEVELOPMENT OF OUTFALL CAPACITY IMPROVEMENT OPTIONS**

- Based upon the results of Activity 200, develop up to three (3) capacity improvement alternatives that will achieve the required hydraulic capacity to meet projected flow conditions.

ACTIVITY 400.2 DEVELOPMENT OF PRELIMINARY DRAWINGS OF OUTFALL CAPACITY IMPROVEMENTS

- Complete preliminary improvement narratives, sketches and preliminary opinion of capital construction costs for each alternative identified.

ACTIVITY 400.3 EVALUATION OF OUTFALL CAPACITY IMPROVEMENT ALTERNATIVES

- With input from the City, develop non-economic and economic evaluation criteria for evaluation of the alternatives identified, and conduct an evaluation workshop (network meeting format) to complete evaluation of the alternatives and selection of a recommended alternative.

ACTIVITY 400.4 DEVELOPMENT OF OPINION OF PROBABLE CONSTRUCTION COST

- Develop Opinion of Probable Construction Cost (Class 4 per AACE Recommended Practice No. 17R-97) based on the preliminary contract drawing and specifications.

ACTIVITY 400.5 Outfall Capacity Improvements Memorandum

- Develop a capacity improvements memorandum, including preliminary sketch(es) and opinion of probable construction cost (OPCC).
- Identify required additional survey (if required) for final design of the capacity improvements.

City's Activities:

City will:

- Provide timely, organized review comments on deliverables issued for City review.

HDR Deliverables:

The following deliverables shall be provided:

- Outfall capacity alternatives technical memorandum.
- Opinion of probable construction cost.
- Summary of needed survey of the existing outfall.

Key Understandings and Assumptions:

The following is understood or assumed:

- Unless otherwise defined elsewhere, one (1) computerized file of all deliverables will be submitted to the City.
- Preliminary design sketches will generally consist of the following:
 - Existing outfall pipeline and existing pipeline features.
 - Recommended improvement elements in plan view and section to reflect preliminary design intent.
 - Additional sketches showing added design improvement features to communicate design intent.
- Opinion of Probable Construction Cost will be developed using Excel software with the format of estimate being broken down by discipline in the 6-digit specification format.

Task 500 - Outfall Environmental Permitting and Funding Agency Requirements Summary

Objective:

Identify permitting and funding agency requirements that will be necessary for completion of the outfall improvements design and construction.

HDR Activities:

ACTIVITY 500.1 OUTFALL ENVIRONMENTAL PERMITTING

- The project may require permit applications from the agencies/entities listed below depending on the specific project improvements recommended. This activity will identify permitting requirements based on the preliminary engineering results.
 - United States Army Corps of Engineers (USACE)
 - Idaho Department of Water Resources (IDWR)
 - Idaho Department of Environmental Quality (IDEQ)
 - The City of Coeur d'Alene
- Regulatory agency coordination will be required throughout the project to identify and meet agency requirements. Agencies that will potentially be involved in this project include: USACE, IDWR, City of Coeur d'Alene, Idaho Department of Fish and Game (IDFG), United States Fish and Wildlife Service (USFWS), United States Environmental Protection Agency (USEPA), Idaho State Historic Preservation Office (SHPO), IDEQ, and Idaho Department of Lands (IDL)

ACTIVITY 500.2 FUNDING AGENCY COORDINATION

- The City has submitted a Clean Water Loan Letter of Interest to IDEQ which included the outfall and diffuser improvements project. If successful in securing either SRF or ARPA funds for this project, then coordination with the funding agency will be required. This activity will support the City in discussions with the funding agency and will identify funding agency requirements.

City's Activities:

City will:

- Support HDR staff in communicating with regulatory and funding agencies.

HDR Deliverables:

The following deliverables shall be provided:

- Meeting minutes
- Preliminary list of permits required for project implementation.

Key Understandings and Assumptions:

The following is understood or assumed:

- HDR's efforts under this task are associated with only identifying permitting and funding agency requirements. Support for permit application submittals, meeting permit requirements, etc. will be under a future task or contract amendment as needed.

Task 600 - Outfall Preliminary Engineering Report (PER) Documents

Objective:

Finalize documents developed in Task Series 200 through 500 into a Preliminary Engineering Report document. This Task includes only those items associated with improvements to the existing outfall diffuser elements and construction of recommended capacity improvements.

HDR Activities:

ACTIVITY 600.1 DEVELOPMENT OF PRELIMINARY ENGINEERING REPORT EXECUTIVE SUMMARY

- Develop summary of the findings from Tasks 200, 300, 400 and 500, and present recommended improvements for replacement/repair of the existing outfall diffuser elements and for increasing the hydraulic capacity of the existing outfall diffuser.

ACTIVITY 600.2 PRELIMINARY ENGINEERING REPORT SECTIONS

- Develop the final PER using the Technical Memoranda completed in Tasks 200, 400, 400 and 500 to serve as the separate Sections (body) of the report.

ACTIVITY 600.3 DOCUMENT REVIEWS

- Submit DRAFT PER to the City for review.
- Meet with City by telephone conference call to discuss and resolve City comments.
- Finalize PER and issue to regulatory agency(ies) per Task Series 500.
- Conduct internal QC of PER.
- Incorporate City, regulatory agency and internal HDR QC comments into final PER document package.

City's Activities:

City will:

- Provide timely, organized review comments on deliverables issued for City review.

HDR Deliverables:

The following deliverables shall be provided:

- DRAFT PER.
- Final PER including recommended improvements.
- Final Opinion of Probable Construction Cost (OPCC).

Key Understandings and Assumptions:

The following is understood or assumed:

- Unless otherwise defined elsewhere, one (1) hard copy and one (1) computerized file of all deliverables will be submitted to the City.

- The preliminary engineering report (PER) is assumed to be completed in sufficient detail to meet IDEQ minimum requirements for a design report and in sufficient detail to meet the minimum requirements of the Idaho State Revolving Fund Loan program.

Task 700 - Management Reserve

Objective:

Provide additional engineering services on an as-needed basis and at the sole discretion of the City.

HDR Activities:

ACTIVITY 700.1 MANAGEMENT RESERVE ACTIVITIES

- Complete a detailed evaluation of effluent pumping controls and provide recommendations for improvements to the existing controls to provide for better low flow and high flow conditions and to stabilize erratic operation occurring in the existing system.
- Evaluation of additional effluent elements at the facility as directed by the City.

City's Activities:

City will:

- Provide timely, organized review comments on deliverables issued for City review.

HDR Deliverables:

The following deliverables shall be provided:

- Technical memoranda as required

Key Understandings and Assumptions:

The following is understood or assumed:

- Work activities under this Task will only begin after receiving explicit direction from the City.

Task 800 - Final Design Phase Services (Future Task)

Task 900 - Construction Phase Field Services (Future Task)

Task 1000 - Post Construction and Close-Out Services (Future Task)

PROJECT SCHEDULE

The proposed project schedule is summarized in the Table below.

Project Task	Estimated Schedule
Consultant Notice to Proceed (Upon Contract Approval)	5/16/22
Existing Outfall Condition & Capacity TM	5/16/22 - 7/15/22
Existing Diffuser Evaluation & Recommendations TM and OPCC	5/16/22 - 7/15/22
Outfall Capacity Alternatives TM and OPCC	5/16/22 - 7/15/22
Environmental Permitting & Funding Agency Coordination	7/15/22 - 9/1/22
Draft Outfall Preliminary Engineering Report (PER)	7/15/22 - 9/30/22
Management Reserve	TBD



CITY OF COEUR D'ALENE WASTEWATER DEPARTMENT

PROFESSIONAL SERVICES AGREEMENT for OUTFALL IMPROVEMENTS EVALUATION



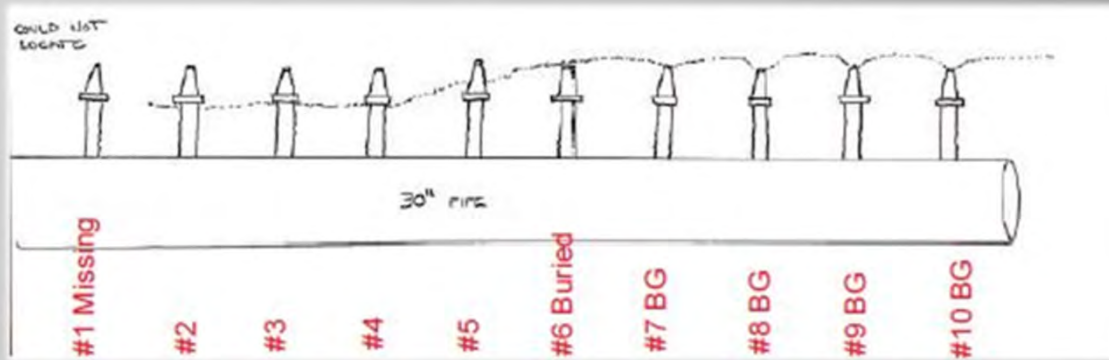
CITY WASTEWATER EFFLUENT OUTFALL



2022 VIDEO INSPECTION



2021 INSPECTION SUMMARY



2021 DIVER INSPECTION



DIFFUSER #2



**DIFFUSER #2
CLOSE-UP**



2021 DIVER INSPECTION



DIFFUSER #8



DIFFUSER #6

NON-OPERATIONAL



STAFF'S RECOMMENDATION:

City Council should authorize the Wastewater Department (WW) to execute a Professional Services Agreement (PSA) with HDR Engineering, Inc., for \$97,180.00 for an engineering evaluation related to the repairs, replacement, capacity improvements and upgrades to the City's existing wastewater outfall and effluent pump station.



QUESTIONS?

