



PROFESSIONAL SERVICES AGREEMENT

For

**City of Bloomfield, IA
Sanitary Sewer Master Plan**

City of Bloomfield
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1/7/21

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THIS **AGREEMENT** is between City of Bloomfield, IA (hereafter "CLIENT") and HR GREEN, INC. (hereafter "COMPANY").

1.0 Project Understanding

1.1 General Understanding

The City of Bloomfield, IA (CLIENT) desires to complete a Sewer Master Plan. Over the past several years the CLIENT has had sanitary sewer overflow (SSO) events occur during prolonged wet periods and heavy rainfall events. A Complaint & Consent Agreement was issued to the CLIENT by the EPA in September 2016 regarding the CLIENT'S unpermitted SSOs, wastewater reporting errors, and WWTP effluent violations. The Consent Agreement requires the CLIENT to eliminate these SSOs by July 31, 2021 and comply with WWTP effluent limits by July 1, 2021. A wastewater treatment plant improvements project is currently underway that will allow the CLIENT to comply with the portion of the Consent Agreement related to wastewater treatment. However, the unpermitted SSOs will not be eliminated in accordance with the Consent Agreement at this time.

In December 2019, COMPANY completed and submitted to the EPA an Integrated Plan on behalf to the CLIENT. The Integrated Plan detailed the remaining work to be completed to comply with the Consent Agreement. The Integrated Plan demonstrated that it was not financially feasible for the CLIENT to complete all necessary construction work by the deadlines included in the Consent Agreement. The Integrated Plan instead requested an extension of the completion date for the SSO elimination until 2042, after which the wastewater treatment plant improvements State Revolving Loan Fund (SRF) Loan will be paid off. The EPA reviewed the Integrated Plan and verbally agreed to the extension but later changed their response and requested that a Sanitary Sewer Master Plan be submitted before they would give written approval for an extension.

This agreement includes services to be rendered by the COMPANY to complete a Sewer Master Plan for the CLIENT.

The Sewer Master Plan will review and evaluate the condition, capacity, current flows, and future development potential for the CLIENT'S sewer network. A successful Sewer Master Plan will develop a road map for the future and will allow for efficient completion of sanitary sewer improvements required to meet the EPA Consent Agreement.

1.2 Design Criteria/Assumptions

COMPANY will develop a Sewer Master Plan that will provide a clear path toward compliance with the EPA Consent Agreement, while also maintaining a fiscally responsible implementation plan. The key elements of the plan shall include:

- Understanding and recording of CLIENT'S and Stakeholders goals and objectives
- Understanding and recording of CLIENT'S sanitary system infrastructure assets

- Asset condition analysis and determination of the overall state of the infrastructure, this may or may not include limited modeling of sanitary sewer system
- Asset rating methodology
- Operation and maintenance considerations and resources required to maintain the desired level of service and infrastructure rating
- A comprehensive organizational review including personnel and equipment needs for implementation of the plan and maintaining the assets
- Cost benefit analysis
- Life cycle cost analysis
- Identification of Capital Improvements Projects (CIP),
- Integration of CIP projects with CLIENT'S strategic plan
- CIP prioritization mechanism
- Regulatory compliance
- Funding of the CIP's and integrating this data into the rate studies including design construction, O&M costs
- Identification of local, state, and federal funding sources, and
- Implementation schedule/phasing.

The following is an outline of the tasks that will be completed as part of the Sewer Master Plan development. Discussed below is our approach to achieve the above key elements of the plan.

Phase 1 – Project Planning and Development

Task 1 - Project Planning

Task 2 - Public Education and Outreach/Questionnaire

Task 3 - Flow Monitoring and I&I Analysis

Task 4 -Existing and Future Flow Projections

Task 5 - Asset Condition and Rating System

Task 6 - Sanitary System Hydrologic and Hydraulic Modeling

Task 7 - CIP Funding

Phase 2 - Sewer Master Plan

2.0 Scope of Services

The services outlined in this section of the scope of services are recommended to complete a comprehensive Sewer Master Plan. The CLIENT agrees to employ COMPANY to perform the following services:

PHASE 1 – PROJECT PLANNING AND DEVELOPMENT

Task 1 – Project Planning

Objective: To provide ongoing project management, conduct a project kick-off meeting, and provide monthly progress reports and progress meetings with the CLIENT.

Approach: COMPANY will provide on-going project management including budget and schedule management. Upon authorization to proceed, HR Green will prepare a project specific kick off meeting agenda and attend a kick-off meeting to discuss project specific details. The results expected from this meeting will be as follows:

- Introductions, point of contact, roles, and responsibilities
- Develop a shared vision of master plan goals and objectives
- Obtain and review available data from the CLIENT in electronic and paper format. Examples of this may include but not be limited to data on flow monitoring, sewer televising, past smoke or dye test results, previous studies, known flooding issues, pumping data, O&M costs, GIS systems, etc.
- Initiate dialogue on desired level of service, which will impact the prioritization and rating criteria, annual O&M costs, and identification of key CIP projects
- Initiate dialogue on establishing design criteria and level of protection required, which will be utilized in development of the key CIP including nature and extents of the improvements
- Finalize draft of the master plan outline
- Establish communication protocols, and
- Discuss schedule and milestones.

The COMPANY will also conduct monthly progress meetings (4 in Bloomfield, 5 via conference call) and provide monthly status reports to the CLIENT to present a summary of the work completed on each task, estimated completion of tasks, discussion of project issues, and a summary of the work status compared to the project schedule and budget. It is assumed the project will be completed over an 11-month period.

Deliverables: Project kick-off and progress meeting minutes, master plan draft outline, monthly status reports.

Task 2 – Public Education and Outreach/Questionnaire

Objective: To engage citizen in understanding master plan objectives, goals and vision, seek input critical to understanding citizen issues and relay information relative to the master plan in layman terms, educate citizens on best management practices, water quality and NPDES compliance. Develop and set up a GIS web portal with questionnaire for input from the citizens/stakeholders.

Approach: An important component of a successful Sewer Master Plan and its implementation is education of the residents and stakeholders and gathering input from them during the planning process. This occurs when the ideas and concepts are implemented and embraced by the community. The COMPANY will facilitate opportunities for CLIENT leadership, staff, key stakeholders, and residents to be part of the issue identification, evaluation, and development of solutions.

Citizen input and their involvement, including education and training during the planning process, is critical to the long-term success of the master plan. Education programs provide hands-on experience for children and adults, reaching a diverse audience and creating a broader public support for the community programs. The CLIENT will utilize a

web-based portal as well as mailers to seek public input specific to the Sewer Master Plan. The COMPANY will discuss appropriate milestones at which we will recommend public meetings to discuss the progress and status of the master planning process. The COMPANY will also provide relevant information regarding the master plan during the project to be posted by the CLIENT on the City's website and included in its newsletters and/or bill mailers.

Problem areas within the City can be identified and assessed from information gathered from not only CLIENT employees but also through input from its residents and stakeholders. This information is helpful in developing the master plan road map, identifying key CIP projects, and prioritizing future study areas for further analysis.

To complete this task, the COMPANY will develop a questionnaire through a meeting with the CLIENT and will provide sample questionnaires from past experiences to initiate discussions. The questionnaire shall be comprehensive and inclusive of the items relevant to the CLIENT'S sanitary master plans. The questionnaire will be disseminated by CLIENT through paper billings, the city website and at the City Hall. These forms can be submitted to the CLIENT via email or mail. The dissemination of the questionnaire will also serve as an opportunity for the CLIENT to increase public awareness, education, and outreach.

Stakeholders will be able to fill out an accompanying questionnaire asking pertinent project-related questions such as the nature, extent and frequency of flooding/property damage experienced from various sources such as surface water, sewer backups, backflow from channels, erosion, etc. The flooding can then be categorized as basement flooding, yard flooding, street flooding, or simply nuisance flooding.

Assumptions: CLIENT will provide available data in electronic and paper copy format for review. CLIENT will be responsible for mailings, including postage, and updates in CLIENT'S newsletters.

Deliverable: Exhibits, education material, attending up to two public meetings, questionnaire.

Task 3 – Flow Monitoring and I&I Analysis

Objective: To evaluate existing flow metering data throughout different basins within the city to assist in developing current and future sewer and lift station capacity needs.

Approach: The CLIENT conducted flow metering within the sanitary sewer system within the past five (5) years. COMPANY will review and evaluate the flow metering data and incorporate existing flow data into the sanitary sewer model. Summary data from the prior flow monitoring evaluation will be used to develop current and future sewer and lift station capacity requirements as well as input data for the hydraulic modeling.

Deliverable: Memorandum with plan and schedule for obtaining flow metering data and future locations for the flow meters to be deployed.

Task 4 – Existing and Future Flow Projections

Objective: To utilize existing flow metering data and projections from existing development along with projections for future development to estimate flow capacity needs for sanitary sewer and lift stations throughout the City.

Approach: The COMPANY will review the existing and new flow metering data to determine flows from existing development. This data will be used to develop flow projections for existing, similar development areas in the City where flow metering data does not exist. The COMPANY will also have a meeting with the CLIENT to review future development or redevelopment plans throughout the City. Based on the type of development expected in various areas, typical flows will be projected.

Deliverable: Technical Memo outlining flow capacity needs for Sanitary Sewer and Lift Stations based on current flows and estimated future flows.

Task 5 – Asset Collection, Condition and Rating System

Objective: To collect and review the asset condition of existing sanitary sewer and combined sewer pipes, manholes, etc. and complete an asset condition assessment of existing lift stations and to develop a rating methodology and rating analysis.

Approach: The COMPANY will review the existing asset condition and develop a standardized rating system for each asset class. The rating system will be based on a point value system for each of the criteria and will be supplemented with our team experience as well as CLIENT's goals and objectives. The lift stations will need to be assessed and a rating system developed for these structures.

The rating system will be used to calculate a priority score for assets documented in the system, geographically ranking assets based on greatest need for repair or replacement. This analysis model will evaluate and prioritize all assets within the system. COMPANY GIS modelers will consult with the CLIENT when determining the relative weights placed on the various criteria used in the GIS infrastructure prioritization model. A primary benefit of using GIS models in this manner is that the model can be quickly re-run using different ranking criteria or weighting parameters if different factors are later deemed to have greater or lesser influence on the need for asset repair or replacement.

Sanitary Sewer Pipe Assessment and Rating – Sanitary sewer pipe will be assessed and rated based on age, material type, defects, combined or separate, full flow capacity versus projected flow capacity, benefit-cost ratio, etc.

Manhole Assessment and Rating – Manholes will be assessed and rated based on age, material type, visible signs of infiltration/inflow (I/I), public or private, combined or separate, depth, known surcharge conditions, benefit-cost ratio, etc.

Lift Stations Assessment and Rating – Since no two pump stations are the same and contain many different types of equipment and layouts, it is difficult to establish a standardized rating system. Therefore, the COMPANY will meet with CLIENT staff to

determine their concerns prior to conducting site visits at the lift stations. The assessment will include the following:

- Safety – confined space procedures, fall projection, electrical ARC flash issues. Assess structural and mechanical condition of existing pump stations.
- Capacity – current capacity versus future capacity, backup concerns, and future development areas
- Communication – method of communication with the treatment plant, effectiveness of the communication, ability to make changes and adjustments remotely, etc.
- Operation and Maintenance – condition of pumps, valves, flowmeters, controls, redundancy, standby power and other equipment and anticipated design life remaining. Review reliability and make recommendations of whether to rehabilitate existing or provide new.

Following completion of condition assessment and asset rating for each of the asset classes listed above, the COMPANY will develop engineering recommendations for system improvements. The results of the GIS infrastructure prioritization model would serve as the basis for the recommendations. The COMPANY will outline several scenarios for capital improvements within the system, examine each alternative design using GIS CIP Tools, and make map displays for each scenario. The COMPANY will rate the condition of system assets as well as estimate the cost of each improvement. The expected rehabilitation technique of choice for the existing sewer segments will be discussed in the master plan.

Deliverable: Asset assessment guidelines and assessment forms, condition rating criteria and rating point value system.

Task 6 – Sanitary Sewer Hydraulic Modeling

Objective: Build and calibrate a software model of the existing sanitary sewer system for all nodes and pipes greater than 8-inch in diameter for both existing dry weather and wet weather flow. Utilizing the model, the COMPANY will identify hydraulic bottlenecks in the system during the peak wet weather flows and engineering options for resolution of the problem. Develop opinion of probable cost for preferred engineering solution.

Approach: Input available data into a model of the existing sanitary system. The GIS data will include manhole locations, manhole material, manhole center invert, pipe locations, pipe inverts (drop connections), pipe size, pipe material, structure rim elevations, force main and lift station structure data and operational characteristics, flow generation per area and system reaction to rainfall data. Calibration of the trunk system in the model will utilize sanitary flow data provided by the CLIENT, flow metering data, and flow projections developed in Task 4. Data in the existing database that will be used in the model will be reviewed for hydraulic model compliance/connectivity. Wet weather flow through the system will be analyzed and calibrated to the storm events monitored, then expanded to larger storm events (design storm) for evaluating system flow restrictions. The frequency and duration of the design storm employed shall be dictated by the CLIENT or regulatory requirements.

The hydraulic model will be set up using GIS data collected in task 5 and/or manipulation of other existing data.

The COMPANY will then create and run a hydraulic model. The model results will help identify areas where bottlenecking, capacity, or storage issues exist within the sewer and assist in making recommendations for improvements in those areas. Areas where relief sewers or storage are needed will be identified and a conceptual design presented showing the location and size of the proposed facility. If relief sewers or other improvements are not practical, estimates of the peak storm flows will be provided.

Wet weather flow through the system will be analyzed and system restrictions will be identified. The COMPANY will evaluate engineering solutions to each problem and develop an opinion of probable cost for the preferred design solution. The COMPANY will coordinate with the CLIENT during the review of the model and the concept design solution evaluation process to determine the preferred engineering solution for each bottleneck area.

Deliverables:

1. Map layout of sanitary system with problem locations identified.
2. Hydraulic Modeling Technical Memorandum of findings with results interpretation and an electronic copy of the model input and output files. The Technical Memorandum will include a description of all assumptions used in preparing the model, the methodology used to prepare the model, and any anomalies identified during the modeling process.
3. Interpretation of the results will include noting areas of concern in the system, probable causes of the concern and recommendations regarding solutions or further evaluation; and
4. Workshop presentation of the model results that includes snapshots of the extended period simulations showing potential problems identified in the system.

Task 7 – Capital Improvement Plan (CIP) Funding

Objective: To Identify and provide estimates for CIP projects and identify potential funding sources

Approach: The CLIENT will require a self-sustaining funding mechanism that will be utilized for its CIP funding for projects identified as part of the Sewer Master Plan in order to continue to maintain and improve its infrastructure and to maintain the desired level of service in accordance with the rating system developed in Task 5. A Sewer Rate Study (to be contracted separately) will be utilized as a primary funding source for the CIP projects and will incorporate design, construction, O&M costs, resource and equipment costs, regulatory compliance program costs, etc. The COMPANY will work with the CLIENT during the planning process to incorporate the Sewer Master Plan recommendations into the CIP. With the information gathered in previous tasks and the recommendations in the Sewer Master Plan, a CIP will be developed and will address the following items:

- Existing conditions planning and project prioritization
- Gravity Sewer Replacements or Lining

- Lift Station Improvements
- Sewer Extensions
- Rehabilitation and Replacement Program to include I&I abatement
- Coordination of sewer needs with street reconstruction
- Financial Planning and Integration of the sewer rate study.

Deliverable: Provide summary of evaluation in the Sewer Master Plan.

PHASE 2 – Sewer Master Plan

Objective: The Sewer Master Plan will incorporate various components of the sanitary infrastructure study in tasks identified throughout this proposal into a written report that will serve as a long-range plan for the next 20 years. The report shall include an assessment of the overall state of the sanitary infrastructure system, asset inventory, asset condition assessment and rating methodology, positioning for growth areas, CIP projects identification and prioritization methodology, standardized forms for assessment and CIP prioritization, codes and ordinance updates, best management practices and regulatory compliance.

Approach: The COMPANY will develop the Sewer Master Plan report that will serve as a documentation and guidance manual for implementation of the CIP projects, and providing tools and resources to allow the CLIENT to continue to assess, rate, fund and maintain its sanitary infrastructure system.

The following items will be incorporated into the document:

- Forecast area growth and future demands of the wastewater system for a 20-year design period
- Develop a strategy for I&I reduction throughout the sanitary sewer system
- Flow management plan including Lift Station flow monitoring and recording, surcharge monitoring and storage at each lift station
- Develop an Opinion of Probable Cost (OPC) for recommended improvements throughout the City.
- Prioritized Action Plan -COMPANY will use the GIS asset inventory and asset condition analysis to develop a prioritized action plan for the CLIENT.
- Implementation Schedule.

Deliverables: Draft and final report documenting the findings of the master planning tasks, infrastructure asset analysis and recommendations, hydrologic and hydraulic modeling results, flow data, capital improvement projects listing and capital costs, prioritization, funding and implementation options, and path forward for compliance with the Administrative Consent Order. The report will also provide the following:

1. Establish a protocol to provide annual updates to the Sewer Master Plan. This can be done by addendums or attachments to the Sewer Master Plan that provide updated costs and adopted CIP plans. This will allow the CLIENT to track what has been implemented to date versus what was planned for each upcoming year. Both capital and O&M costs will be monitored.

2. Following a workshop presentation of the draft report, finalize the report incorporating the comments of the CLIENT.
3. Required number of copies of both the draft and final report.

3.0 Deliverables and Schedules Included in this Agreement

COMPANY will make its best effort to meet this schedule. COMPANY shall retain the right to not comply due to unforeseen conditions or delays not in the control of the COMPANY.

Phase 1- Project Planning and Development

Task 1 - Project Planning	Ongoing
Task 2 - Public Education and Outreach/Questionnaire	January 2021 – March 2021
Task 3 -Flow Monitoring and I&I Analysis	February 2021 – May 2021
Task 4 -Existing and Future Flow Projections	May 2021 – June 2021
Task 5 - Asset Condition and Rating System	April 2021 – May 2021
Task 6 - Sanitary System Hydrologic and Hydraulic Modeling	May 2021 – June 2021
Task 7 - CIP Funding	June 2021 – July 2021

Phase 2 - Sewer Master Plan

July 2021 – October 2021

This schedule was prepared to include reasonable allowances for review and approval times required by the CLIENT and public authorities having jurisdiction over the project. This schedule shall be equitably adjusted as the project progresses, allowing for changes in the scope of the project requested by the CLIENT or for delays or other causes beyond the control of COMPANY.

4.0 Items not included in Agreement/Supplemental Services

The following items are not included as part of this AGREEMENT:

1. Supplemental engineering work required to meet the requirements of regulatory or funding agencies that become effective after the date of this agreement.
2. Flow meters for monitoring sanitary sewer flow throughout the system are not included in this agreement. Flow monitoring data that was collected by another consultant will be used to calibrate the sanitary sewer model. If additional flow metering is desired by the City or needed for the project, a supplemental agreement will be developed or the CLIENT can procure these services directly with a flow monitoring company.
3. Sewer asset investigation and field data collection of areas not currently documented.
4. Property surveys or related engineering services needed for the transfer of interests in real property or easements, engineering surveys, and providing other special field surveys.
5. Preparation of plats, deeds, easements or other documents, and meetings and negotiations with property owners in securing agreements and executed documents for these property transfers and easements.
6. Legal services necessary to obtain title, easement, or right-of-way for any elements of the Project.

7. Other specialty environmental investigations and reports.
8. Other technical studies that may be required.
9. Assistance in legal and regulatory actions.
10. Preparation of operation and maintenance manual; training of operating personnel; operating assistance.
11. Performs services requested by the CLIENT, but not included in Sections 1 or 2.
12. Meetings and negotiations with property owners in securing agreements and executed documents for property transfers and easements.
13. Any other engineering services in connection with the Project.

Supplemental services not included in the AGREEMENT can be provided by COMPANY under separate agreement, if desired.

5.0 Services by Others

N/A

6.0 Client Responsibilities

1. Designate a person to act as the CLIENT'S representative with respect to the services to be rendered under this agreement. Such person shall have authority to transmit instructions, receive information, interpret, and define CLIENT'S policies and decisions with respect to COMPANY'S services for the Project.
2. Assist COMPANY by placing at COMPANY'S disposal all available information pertinent to the Project including previous reports, plans, specifications, shop drawings, test results, and Operation and Maintenance instructions; also other data relative to design or construction of the Project.
3. Arrange for access to and make all provisions for COMPANY to enter upon public and private property as required for COMPANY to perform services under this agreement.
4. Examine all sketches, drawings, specifications, and other documents presented by COMPANY; obtain advice of an attorney, insurance counselor and other consultants as CLIENT deems appropriate for such examination and render in writing decisions pertaining thereto.
5. Assist in completion and provide information for applications sent to selected funding agencies.
6. The CLIENT will provide historic flow monitoring data in electronic Excel or CSV format.
7. The CLIENT will provide historic rain data from previous flow monitoring studies.
8. The CLIENT will provide copies of all reports, plans, plats, exhibits, and other information of record.
9. The CLIENT will participate in all meetings.
10. The CLIENT will provide legal and accounting services as needed by the project.
11. Provide COMPANY electronic plant influent and effluent flow data or electronic MORs, if available.



7.0 Professional Services Fee

7.1 Fees

The fee for services will be lump sum.

7.2 Invoices

Invoices for COMPANY’s services shall be submitted, on a monthly basis. Invoices shall be due and payable upon receipt. If any invoice is not paid within 15 days, COMPANY may, without waiving any claim or right against the CLIENT, and without liability whatsoever to the CLIENT, suspend or terminate the performance of services. The retainer shall be credited on the final invoice. Accounts unpaid 30 days after the invoice date may be subject to a monthly service charge of 1.5% (or the maximum legal rate) on the unpaid balance. In the event that any portion of an account remains unpaid 60 days after the billing, COMPANY may institute collection action and the CLIENT shall pay all costs of collection, including reasonable attorneys’ fees.

7.3 Extra Services

Any service required but not included as part of this AGREEMENT shall be considered extra services. Extra services will be billed on a Time and Material basis with prior approval of the CLIENT.

7.4 Payment

The CLIENT AGREES to pay COMPANY on the following basis:

Lump sum broken down as follows:

Phase 1 -	Project Planning and Development	\$221,000
Phase 2 -	Sewer Master Plan	<u>\$ 40,200</u>
	Total	\$261,200

8.0 Terms and Conditions

The following Terms and Conditions are incorporated into this AGREEMENT and made a part of it.

8.1 Standard of Care

Services provided by COMPANY under this AGREEMENT will be performed in a manner consistent with that degree of care and skill ordinarily exercised by members of the same profession currently practicing at the same time and in the same or similar locality.

8.2 Entire Agreement

This AGREEMENT and its attachments constitute the entire understanding between CLIENT and COMPANY relating to COMPANY's services. Any prior or contemporaneous agreements, promises, negotiations, or representations not expressly set forth herein are of no effect. Subsequent modifications or amendments to this AGREEMENT shall be in writing and signed by the parties to this AGREEMENT. If the CLIENT, its officers, agents, or employees request COMPANY to perform extra services pursuant to this AGREEMENT, CLIENT will pay for the additional services even though an additional written agreement is not issued or signed.

8.3 Time Limit and Commencement of Services

This AGREEMENT must be executed within ninety (90) days to be accepted under the terms set forth herein. The services will be commenced immediately upon receipt of this signed AGREEMENT.

8.4 Suspension of Services

If the Project or the COMPANY'S services are suspended by the CLIENT for more than thirty (30) calendar days, consecutive or in the aggregate, over the term of this AGREEMENT, the COMPANY shall be compensated for all services performed and reimbursable expenses incurred prior to the receipt of notice of suspension. In addition, upon resumption of services, the CLIENT shall compensate the COMPANY for expenses incurred as a result of the suspension and resumption of its services, and the COMPANY'S schedule and fees for the remainder of the Project shall be equitably adjusted.

If the COMPANY'S services are suspended for more than ninety (90) days, consecutive or in the aggregate, the COMPANY may terminate this AGREEMENT upon giving not less than five (5) calendar days' written notice to the CLIENT.

If the CLIENT is in breach of this AGREEMENT, the COMPANY may suspend performance of services upon five (5) calendar days' notice to the CLIENT. The COMPANY shall have no liability to the CLIENT, and the CLIENT agrees to make no claim for any delay or damage as a result of such suspension caused by any breach of this AGREEMENT by the CLIENT. Upon receipt of payment in full of all outstanding sums due from the CLIENT, or curing of such other breach which caused the COMPANY to suspend services, the COMPANY shall resume services and there shall be an equitable adjustment to the remaining project schedule and fees as a result of the suspension.

8.5 Books and Accounts

COMPANY will maintain books and accounts of payroll costs, travel, subsistence, field, and incidental expenses for a period of five (5) years. Said books and accounts will be available at all reasonable times for examination by CLIENT at the corporate office of COMPANY during that time.

8.6 Insurance

COMPANY will maintain insurance for claims under the Worker's Compensation Laws, and from General Liability and Automobile claims for bodily injury, death, or property damage, and Professional Liability insurance caused by the negligent performance by COMPANY's employees of the functions and services required under this AGREEMENT.

8.7 Termination or Abandonment

Either party has the option to terminate this AGREEMENT. In the event of failure by the other party to perform in accordance with the terms hereof through no fault of the terminating party, then the obligation to provide further services under this AGREEMENT may be terminated upon seven (7) days' written notice. If any portion of the services is terminated or abandoned by CLIENT, the provisions of this Schedule of Fees and Conditions in regard to compensation and payment shall apply insofar as possible to that portion of the services not terminated or abandoned. If said termination occurs prior to completion of any phase of the project, the fee for



services performed during such phase shall be based on COMPANY's reasonable estimate of the portion of such phase completed prior to said termination, plus a reasonable amount to reimburse COMPANY for termination costs.

8.8 Waiver

COMPANY's waiver of any term, condition, or covenant or breach of any term, condition, or covenant, shall not constitute a waiver of any other term, condition, or covenant, or the breach thereof.

8.9 Severability

If any provision of this AGREEMENT is declared invalid, illegal, or incapable of being enforced by any Court of competent jurisdiction, all of the remaining provisions of this AGREEMENT shall nevertheless continue in full force and effect, and no provision shall be deemed dependent upon any other provision unless so expressed herein.

8.10 Successors and Assigns

All of the terms, conditions, and provisions hereof shall inure to the benefit of and are binding upon the parties hereto, and their respective successors and assigns, provided, however, that no assignment of this AGREEMENT shall be made without written consent of the parties to this AGREEMENT.

8.11 Third-Party Beneficiaries

Nothing contained in this AGREEMENT shall create a contractual relationship with or a cause of action in favor of a third party against either the CLIENT or the COMPANY. The COMPANY's services under this AGREEMENT are being performed solely for the CLIENT's benefit, and no other party or entity shall have any claim against the COMPANY because of this AGREEMENT or the performance or nonperformance of services hereunder. The CLIENT and COMPANY agree to require a similar provision in all contracts with contractors, subcontractors, sub-consultants, vendors and other entities involved in this project to carry out the intent of this provision.

8.12 Governing Law and Jurisdiction

The CLIENT and the COMPANY agree that this AGREEMENT and any legal actions concerning its validity, interpretation and performance shall be governed by the laws of the State of Iowa without regard to any conflict of law provisions, which may apply the laws of other jurisdictions.

It is further agreed that any legal action between the CLIENT and the COMPANY arising out of this AGREEMENT or the performance of the services shall be brought in a court of competent jurisdiction in the State of Iowa.

8.13 Dispute Resolution

Mediation. In an effort to resolve any conflicts that arise during the design or construction of the project or following the completion of the project, the CLIENT and COMPANY agree that all disputes between them arising out of or relating to this AGREEMENT shall be submitted to non-binding mediation unless the parties mutually agree otherwise. The CLIENT and COMPANY further agree to include a similar mediation provision in all agreements with independent contractors and consultants retained for the project and to require all independent contractors and consultants also to include a similar mediation provision in all agreements with subcontractors, sub-consultants, suppliers or fabricators so retained, thereby providing for mediation as the primary method for dispute resolution between the parties to those agreements.

8.14 Attorney's Fees

If litigation arises for purposes of collecting fees or expenses due under this AGREEMENT, the Court in such litigation shall award reasonable costs and expenses, including attorney fees, to the party justly entitled thereto. In awarding attorney fees, the Court shall not be bound by any Court fee schedule, but shall, in the interest of justice, award the full amount of costs, expenses, and attorney fees paid or incurred in good faith.

8.15 Ownership of Instruments of Service

All reports, plans, specifications, field data, field notes, laboratory test data, calculations, estimates and other documents including all documents on electronic media prepared by COMPANY as instruments of service shall remain the property of COMPANY. COMPANY shall retain these records for a period of five (5) years following completion/submission of the records, during which period they will be made available to the CLIENT at all reasonable times.



8.16 Reuse of Documents

All project documents including, but not limited to, plans and specifications furnished by COMPANY under this project are intended for use on this project only. Any reuse, without specific written verification or adoption by COMPANY, shall be at the CLIENT's sole risk, and CLIENT shall defend, indemnify and hold harmless COMPANY from all claims, damages and expenses including attorneys' fees arising out of or resulting therefrom.

Under no circumstances shall delivery of electronic files for use by the CLIENT be deemed a sale by the COMPANY, and the COMPANY makes no warranties, either express or implied, of merchantability and fitness for any particular purpose. In no event shall the COMPANY be liable for indirect or consequential damages as a result of the CLIENT's use or reuse of the electronic files.

8.17 Failure to Abide by Design Documents or To Obtain Guidance

The CLIENT agrees that it would be unfair to hold COMPANY liable for problems that might occur should COMPANY'S plans, specifications or design intents not be followed, or for problems resulting from others' failure to obtain and/or follow COMPANY'S guidance with respect to any errors, omissions, inconsistencies, ambiguities or conflicts which are detected or alleged to exist in or as a consequence of implementing COMPANY'S plans, specifications or other instruments of service. Accordingly, the CLIENT waives any claim against COMPANY, and agrees to defend, indemnify and hold COMPANY harmless from any claim for injury or losses that results from failure to follow COMPANY'S plans, specifications or design intent, or for failure to obtain and/or follow COMPANY'S guidance with respect to any alleged errors, omissions, inconsistencies, ambiguities or conflicts contained within or arising as a result of implementing COMPANY'S plans, specifications or other instruments of service. The CLIENT also agrees to compensate COMPANY for any time spent and expenses incurred remedying CLIENT's failures according to COMPANY'S prevailing fee schedule and expense reimbursement policy.

8.18 Opinion of Probable Construction Cost

As part of the Deliverables, COMPANY may submit to the CLIENT an opinion of probable cost required to construct work recommended, designed, or specified by COMPANY, if required by CLIENT. COMPANY is not a construction cost estimator or construction contractor, nor should COMPANY'S rendering an opinion of probable construction costs be considered equivalent to the nature and extent of service a construction cost estimator or construction contractor would provide. This requires COMPANY to make a number of assumptions as to actual conditions that will be encountered on site; the specific decisions of other design professionals engaged; the means and methods of construction the contractor will employ; the cost and extent of labor, equipment and materials the contractor will employ; contractor's techniques in determining prices and market conditions at the time, and other factors over which COMPANY has no control. Given the assumptions which must be made, COMPANY cannot guarantee the accuracy of its opinions of cost, and in recognition of that fact, the CLIENT waives any claim against COMPANY relative to the accuracy of COMPANY'S opinion of probable construction cost.

8.19 Design Information in Electronic Form

Because electronic file information can be easily altered, corrupted, or modified by other parties, either intentionally or inadvertently, without notice or indication, COMPANY reserves the right to remove itself from its ownership and/or involvement in the material from each electronic medium not held in its possession. CLIENT shall retain copies of the work performed by COMPANY in electronic form only for information and use by CLIENT for the specific purpose for which COMPANY was engaged. Said material shall not be used by CLIENT or transferred to any other party, for use in other projects, additions to this project, or any other purpose for which the material was not strictly intended by COMPANY without COMPANY's express written permission. Any unauthorized use or reuse or modifications of this material shall be at CLIENT'S sole risk. Furthermore, the CLIENT agrees to defend, indemnify, and hold COMPANY harmless from all claims, injuries, damages, losses, expenses, and attorneys' fees arising out of the modification or reuse of these materials.

The CLIENT recognizes that designs, plans, and data stored on electronic media including, but not limited to computer disk, magnetic tape, or files transferred via email, may be subject to undetectable alteration and/or uncontrollable deterioration. The CLIENT, therefore, agrees that COMPANY shall not be liable for the completeness or accuracy of any materials provided on electronic media after a 30-day inspection period, during which time COMPANY shall correct any errors detected by the CLIENT to complete the design in accordance with the intent of the contract and specifications. After 40 days, at the request of the CLIENT, COMPANY shall submit a final set of sealed drawings, and any additional services to be performed by COMPANY relative to the

submitted electronic materials shall be subject to separate agreement. The CLIENT is aware that differences may exist between the electronic files delivered and the printed hard-copy construction documents. In the event of a conflict between the signed construction documents prepared by the COMPANY and electronic files, the signed or sealed hard-copy construction documents shall govern.

8.20 Information Provided by Others

The CLIENT shall furnish, at the CLIENT's expense, all information, requirements, reports, data, surveys and instructions required by this AGREEMENT. The COMPANY may use such information, requirements, reports, data, surveys and instructions in performing its services and is entitled to rely upon the accuracy and completeness thereof. The COMPANY shall not be held responsible for any errors or omissions that may arise as a result of erroneous or incomplete information provided by the CLIENT and/or the CLIENT's consultants and contractors.

COMPANY is not responsible for accuracy of any plans, surveys or information of any type including electronic media prepared by any other consultants, etc. provided to COMPANY for use in preparation of plans. The CLIENT agrees, to the fullest extent permitted by law, to indemnify and hold harmless the COMPANY from any damages, liabilities, or costs, including reasonable attorneys' fees and defense costs, arising out of or connected in any way with the services performed by other consultants engaged by the CLIENT.

COMPANY is not responsible for accuracy of topographic surveys provided by others. A field check of a topographic survey provided by others will not be done under this AGREEMENT unless indicated in the Scope of Services.

8.21 Force Majeure

The CLIENT agrees that the COMPANY is not responsible for damages arising directly or indirectly from any delays for causes beyond the COMPANY's control. CLIENT agrees to defend, indemnify, and hold COMPANY, its consultants, agents, and employees harmless from any and all liability, other than that caused by the negligent acts, errors, or omissions of COMPANY, arising out of or resulting from the same. For purposes of this AGREEMENT, such causes include, but are not limited to, strikes or other labor disputes; severe weather disruptions or other natural disasters or acts of God; fires, riots, war or other emergencies; disease epidemic or pandemic; failure of any government agency to act in a timely manner; failure of performance by the CLIENT or the CLIENT'S contractors or consultants; or discovery of any hazardous substances or differing site conditions. Severe weather disruptions include but are not limited to extensive rain, high winds, snow greater than two (2) inches and ice. In addition, if the delays resulting from any such causes increase the cost or time required by the COMPANY to perform its services in an orderly and efficient manner, the COMPANY shall be entitled to a reasonable adjustment in schedule and compensation.

8.22 Job Site Visits and Safety

Neither the professional activities of COMPANY, nor the presence of COMPANY'S employees and sub-consultants at a construction site, shall relieve the general contractor and any other entity of their obligations, duties and responsibilities including, but not limited to, construction means, methods, sequence, techniques or procedures necessary for performing, superintending or coordinating all portions of the work of construction in accordance with the contract documents and any health or safety precautions required by any regulatory agencies. COMPANY and its personnel have no authority to exercise any control over any construction contractor or other entity or their employees in connection with their work or any health or safety precautions. The CLIENT agrees that the general contractor is solely responsible for job site safety, and warrants that this intent shall be made evident in the CLIENT's AGREEMENT with the general contractor. The CLIENT also agrees that the CLIENT, COMPANY and COMPANY'S consultants shall be indemnified and shall be made additional insureds on the general contractor's and all subcontractor's general liability policies on a primary and non-contributory basis.

8.23 Hazardous Materials

CLIENT hereby understands and agrees that COMPANY has not created nor contributed to the creation or existence of any or all types of hazardous or toxic wastes, materials, chemical compounds, or substances, or any other type of environmental hazard or pollution, whether latent or patent, at CLIENT's premises, or in connection with or related to this project with respect to which COMPANY has been retained to provide professional services. The compensation to be paid COMPANY for said professional services is in no way commensurate with, and has not been calculated with reference to, the potential risk of injury or loss which may be caused by the exposure of persons or property to such substances or conditions. Therefore, to the fullest extent permitted by law, CLIENT agrees to defend, indemnify, and hold COMPANY, its officers, directors,

employees, and consultants, harmless from and against any and all claims, damages, and expenses, whether direct, indirect, or consequential, including, but not limited to, attorney fees and Court costs, arising out of, or resulting from the discharge, escape, release, or saturation of smoke, vapors, soot, fumes, acid, alkalis, toxic chemicals, liquids gases, or any other materials, irritants, contaminants, or pollutants in or into the atmosphere, or on, onto, upon, in, or into the surface or subsurface of soil, water, or watercourses, objects, or any tangible or intangible matter, whether sudden or not.

It is acknowledged by both parties that COMPANY'S Scope of Services does not include any services related to asbestos or hazardous or toxic materials. In the event COMPANY or any other party encounters asbestos or hazardous or toxic materials at the job site, or should it become known in any way that such materials may be present at the job site or any adjacent areas that may affect the performance of COMPANY'S services, COMPANY may, at its option and without liability for consequential or any other damages, suspend performance of services on the project until the CLIENT retains appropriate specialist consultant(s) or contractor(s) to identify, abate and/or remove the asbestos or hazardous or toxic materials, and warrants that the job site is in full compliance with applicable laws and regulations.

Nothing contained within this AGREEMENT shall be construed or interpreted as requiring COMPANY to assume the status of a generator, storer, transporter, treater, or disposal facility as those terms appear within the Resource Conservation and Recovery Act, 42 U.S.C.A., §6901 et seq., as amended, or within any State statute governing the generation, treatment, storage, and disposal of waste.

8.24 Certificate of Merit

The CLIENT shall make no claim for professional negligence, either directly or in a third party claim, against COMPANY unless the CLIENT has first provided COMPANY with a written certification executed by an independent design professional currently practicing in the same discipline as COMPANY and licensed in the State in which the claim arises. This certification shall: a) contain the name and license number of the certifier; b) specify each and every act or omission that the certifier contends is a violation of the standard of care expected of a design professional performing professional services under similar circumstances; and c) state in complete detail the basis for the certifier's opinion that each such act or omission constitutes such a violation. This certificate shall be provided to COMPANY not less than thirty (30) calendar days prior to the presentation of any claim or the institution of any judicial proceeding.

8.25 Limitation of Liability

In recognition of the relative risks and benefits of the Project to both the CLIENT and the COMPANY, the risks have been allocated such that the CLIENT agrees, to the fullest extent permitted by law, to limit the liability of the COMPANY and COMPANY'S officers, directors, partners, employees, shareholders, owners and sub-consultants for any and all claims, losses, costs, damages of any nature whatsoever or claims expenses from any cause or causes, including attorneys' fees and costs and expert witness fees and costs, so that the total aggregate liability of the COMPANY and COMPANY'S officers, directors, partners, employees, shareholders, owners and sub-consultants shall not exceed \$50,000.00, or the COMPANY'S total fee for services rendered on this Project, whichever is greater. It is intended that this limitation apply to any and all liability or cause of action however alleged or arising, unless otherwise prohibited by law.

8.31 Soliciting Employment

Neither party to this AGREEMENT will solicit an employee of the other nor hire or make an offer of employment to an employee of the other that is working on this PROJECT, without prior written consent of the other party, during the time this AGREEMENT is in effect.

8.32 DGPS Signal Accuracy

Regional RTN, local RTK, or Omnistar Data Service may be interrupted, or the validity of the data changed, by local conditions such as blockage by trees and buildings or radio interference. Published system accuracies are dependent on the CLIENT'S GPS receiver and CLIENT'S location. The Regional RTN, local RTK, or Omnistar Data Services coverage is approximate and when CLIENT intends to operate on the extremes of the published coverage area, CLIENT is advised to verify the anticipated Data Services performance with vendor prior to use.

8.33 Intellectual Property Ownership of Tendered Materials

COMPANY retains title and full intellectual property ownership of all tendered documents and materials, including without limitation, analysis methods and equations, calculations, print layouts, layer operational definitions, drawings, models, plans, set of tools, etc. All such documents and materials are considered

confidential and CLIENT shall not copy such documentation or materials or disclose them to third parties without COMPANY'S prior written consent. CLIENT shall sign COMPANY'S GEOSPATIAL NONDISCLOSURE AGREEMENT and take reasonable precautions to prevent unauthorized access and use of the software and documentation by third parties. To the extent permitted by the COMPANY Geospatial Nondisclosure Agreement and relevant law, CLIENT shall not, nor allow any third party to copy, decompile, disassemble or otherwise reverse engineer the COMPANY'S analysis, reports, maps, or other products, or attempt to do so.

8.34 Data Access

COMPANY makes no warranties or guarantees concerning internet connections or access to data. COMPANY will make efforts to notify internet service provider if made aware of CLIENT connectivity issues. CLIENT GIS data consumed through COMPANY-developed web mapping applications will be inaccessible at times due to planned hardware and software maintenance and, on occasion, due to unexpected technical issues. COMPANY does NOT guarantee CLIENT access to GIS data at all times. COMPANY will endeavor to minimize periods of data inaccessibility while also providing regular database maintenance and updates to CLIENT web mapping applications during contract period. If CLIENT deems the functionality or availability of the COMPANY-developed web mapping applications and associated GIS data is unacceptable, the CLIENT's sole remedy will be to discontinue using the service provided by COMPANY, at which point COMPANY will provide CLIENT with a copy of the data.

8.35 Data Backup and Recovery

COMPANY will create scheduled data backups for the purpose of recovering CLIENT data in the event of data corruption or loss. These measures are taken to safeguard the present state of the GIS data with no intention on the part of the COMPANY to maintain archival versions of the CLIENT GIS data for the purpose of preserving a historical record of CLIENT's GIS data. The backup schedule for the CLIENT GIS data will be concurrent with COMPANY's internal data backups. COMPANY administers the backup schedule in reference to industry practices and recommendations as well as COMPANY's internal operations, and as such, schedules may be adjusted and updated without notice. No point-in-time data recovery is available. CLIENT may not request adjustment to the COMPANY data backup schedule, and COMPANY shall not grant any such request. If CLIENT deems the backup schedule or availability to the database is unacceptable, the CLIENT's sole remedy will be to discontinue using the service provided by COMPANY, at which point COMPANY will provide CLIENT with a copy of their data. If in the event that the CLIENT data needs to be recovered from a backup, COMPANY reserves the right to charge then-current time and materials charges to CLIENT for both the recovery and any rework to get the data back to a current, workable state. If in the event that none of the backups are able to restore CLIENT's database, CLIENT's sole remedy will be to discontinue using the service provided by the COMPANY or pay then-current time and materials charges to COMPANY to re-collect the necessary information and re-load the database.

8.36 Annual Maintenance Renewal Agreement:

CLIENT must purchase a AGOL subscription in order for COMPANY to maintain the CLIENT GIS database and any associated web-mapping applications. Under this AGREEMENT, COMPANY will maintain the CLIENT GIS database and serve as the account administrator for CLIENT's AGOL site for a duration of 365 days, starting upon date of purchase of CLIENT's AGOL subscription. COMPANY will offer CLIENT continued access to the CLIENT GIS database and AGOL web mapping applications after this initial 365-day period through an annual maintenance renewal agreement. The fee associated with this annual maintenance renewal agreement and subsequent annual maintenance renewal agreements will account for labor costs associated with keeping CLIENT GIS applications functional and stable through necessary server-end (i.e. COMPANY-end) hardware and software updates. Separate from this annual maintenance renewal agreement with COMPANY, CLIENT must also renew its ArcGIS Online organizational subscription with ESRI on an annual basis in order to retain access to its web GIS solution.

8.37 Municipal Advisor

The COMPANY is not a Municipal Advisor registered with the Security and Exchange Commission (SEC) as defined in the Dodd-Frank Wall Street Reform and Consumer Protection Act. When the CLIENT is a municipal entity as defined by said Act, and the CLIENT requires project financing information for the services performed under this AGREEMENT, the CLIENT will provide the COMPANY with a letter detailing who their independent registered municipal advisor is and that the CLIENT will rely on the advice of such advisor. A sample letter can be provided to the CLIENT upon request.



This AGREEMENT is approved and accepted by the CLIENT and COMPANY upon both parties signing and dating the AGREEMENT. Services will not begin until COMPANY receives a signed agreement. COMPANY's services shall be limited to those expressly set forth in this AGREEMENT and COMPANY shall have no other obligations or responsibilities for the Project except as agreed to in writing. The effective date of the AGREEMENT shall be the last date entered below.

Sincerely,

HR GREEN, INC.

Matthew J. Wildman,
PE

Approved by: _____

Printed/Typed Name: _____

Title: _____ Date: _____

CITY OF BLOOMFIELD, IA

Accepted by: _____

Printed/Typed Name: _____

Title: _____ Date: _____