

City of Oelwein Request for Qualifications for Flood Mitigation for Dry Run Creek

July 2024

The City of Oelwein successfully completed a flood mitigation study under the Building Resilient Infrastructure Communities Program in 2024. This study showed Oelwein that flood mitigation is possible, and the next step would require the city to apply for additional funding. The city of Oelwein is seeking a firm that will:

- Provide assistance in applying for a Flood Mitigation Assistance Grant or Building Resilient Infrastructure and Communities
- Post award engineering
- Post award contractor procurement
- Post award project management

Flood Mitigation Scoping Study for Dry Run Creek

https://library.municode.com/ia/oelwein/munidocs/munidocs?nodeld=6dd802b0a13f9

Upon selection of the qualified firm(s), contract negotiation with the City will take place to develop a contract with the firm for engineering services at a fair and reasonable price to complete all work necessary for the phase and shall include not-to-exceed amounts for broad categories of work within the phase.

After the firm is selected by the City, the City will host a public meeting solicit input on the project.

The scope of work for such engineering and other services include:

The scope of work includes pre-application work as it relates to helping the city develop and prepare an application for submittal to lowa HSEMD for state or FEMA funding opportunities. The city anticipates that this work will include preparation of preliminary concept drawings, preliminary design, cost estimates, and other engineering and design work pre-requisite to development of a cost benefit analysis (BCA). The BCA determines the difference between likely pre- and post-mitigation flood damages to the City's infrastructure and/or residents and businesses, and compares that difference (aka losses avoided, or "the benefit") to the cost of the project. The scope of work includes:

- Selection and procurement of an engineering firm
- Meetings with engineering firm, City Council, and stakeholders
- Engagement of engineering firm to complete analysis tasks 1-4 below and provide a report that documents the analysis

Engineering Analysis Tasks

- 1. Design a flood retention storage basin that would reduce the flood impact to as many properties as possible within Oelwein
- Create a flood retention area that becomes an asset to the community whole brining area back into their natural habitat
- 3. Provide additional designs of areas that would help reduce flood issues in Dry Run Creek:



4. [Either a or b]:

- a. Calculate the new recurrence intervals, after construction of proposed storage basins and other structures, at which floodwaters will reach that same elevations determined in task 1 that flood buildings with one foot or more of water over the finished floor elevation.
- b. For the same recurrence intervals at which flooding occurs in the pre-mitigation scenario (as determined in task 2), calculate the new flood elevations after construction of proposed storage basins and other structures. For each recurrence interval, document how much lower (in feet) flood inundation will be for each building that floods in the pre-mitigation situation.

5. Deliverables:

- a. Engineering Analysis Report
- b. The selected firm must provide a report that documents the analysis to make the above determinations and calculations, as well as proposes one or more projects to mitigate flooding and identifies for such project(s):
- c. A scope of work for potential flood mitigation project(s);
- d. All parties and agreements necessary to complete the project;
- e. The applicable model codes/edition and engineering standards used that are required and how a proposed project will satisfy these accepted engineering practices.
- f. Any deviation from standard procedures, methods, techniques, technical provisions of the applicable codes or best practices.
- g. A proposed activity completion timeframe, and description of all anticipated phases of a project schedule, with explanation of how all timeframes are reasonable and consistent with the scope of work.
- h. Summary and enumeration of past damages and risk(s) to people, structures or infrastructure that the planned mitigation activity is designed to avoid in the future.
- i. Ways that the risks of damage or harm will be reduced or eliminated and explanation of the residual risk
- j. Benefit Cost Analysis completed on FEMA's BCA Toolkit 6.0

6. Other Deliverables:

- a. Included as part of this work is any related work to ensure adequate engineering and design, which may include, but are not limited to: development of biological evaluation, property or cultural resource assessments, Phase 1 and 2 Environmental Site Assessment for hazardous materials presence or contamination, soil borings, Archeological Phase 1 services, permit acquisition as needed, and other testing, monitoring, modeling, or subconsultant type work.
- b. The approved company will follow all state and federal guidelines and requirements



Project Budget: Line-Item Budget Breakdown

	Estimated Hours	Estimated \$/Hr	Total Estimate
Engineering for Engineering Analysis			
Report:			
Benefit Cost Analysis:			
Environmental and other assessments			

Procurement Process:

The city sends out request for proposals July 10.

Proposals from firms are due July 31.

A group of city employees review and score the proposals and interview the top two firms.

A recommendation is provided to City Council August 12.

The selected firm is notified by the city and is required to start with 30 days of notification.

The goal for the selected firm is to have an application ready for Iowa HSEMD for state or FEMA before December 20, 2024



Scoring Criteria

The city will use the following scoring criteria to determine the top two firms to interview for the project.

Experience on FEMA projects specifically Flood Mitigation	40	
Experience with flood plain management	20	
Experience working on FEMA funded projects	20	
Experience working with the City of Oelwein	10	
Experience with flood mitigation efforts	10	
Total	100	