



City of Appleton

100 North Appleton Street
Appleton, WI 54911-4799
www.appleton.org

Meeting Agenda - Final Utilities Committee

Tuesday, April 23, 2024

4:30 PM

Council Chambers, 6th Floor

1. Call meeting to order

2. Pledge of Allegiance

3. Roll call of membership

4. Approval of minutes from previous meeting

[24-0460](#) Approval of the March 26, 2024 Utilities Committee Meeting minutes.

Attachments: [March 26, 2024 Utilities Committee Meeting Minutes.pdf](#)

5. **Public Hearing/Appearances**

6. **Action Items**

[24-0461](#) Elect a Vice-Chair for the Utilities Committee

[24-0462](#) Set Meeting Date and Time for the Utilities Committee to meet.

[24-0463](#) Designate a Contact Person who can answer specific questions about agenda items for the Utilities Committee.

[24-0464](#) Approval of Sole Source Engineering Services Contract to McMahon as part of 2024 Primary Clarifiers #1 through #4 Rehabilitation Project in the amount of \$59,700 with a 15% contingency of \$8,685 for a Project Total not to exceed \$66,585.

Attachments: [240411_UCMemo_Sole SourceContract_McMahon_PrimClarifer1-4.pdf](#)

7. **Information Items**

[24-0465](#)

Approval of Sole Source Engineering Services Contract to McMahon as part of Summer Street Lift Station Evaluation in the amount of \$11,900 with a 15% contingency of \$1,785 for a Project Total not to exceed \$13,685.

Attachments: [240412 UCMemo Sole Source Contract McMahon SummerStLS.pdf](#)

[24-0466](#)

Monthly Report for March 2024
- Water Distribution and Meter Team Monthly Report - March

Attachments: [March 2024 Water Main Breaks.pdf](#)

8. Adjournment

Notice is hereby given that a quorum of the Common Council may be present during this meeting, although no Council action will be taken.

Reasonable Accommodations for Persons with Disabilities will be made upon Request and if Feasible.

For questions on the agenda, contact Chris Stempa at 920-832-5945 or Danielle Block at 920-832-6474.



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Meeting Minutes - Final Utilities Committee

Tuesday, March 26, 2024

4:30 PM

Council Chambers, 6th Floor

1. Call meeting to order

Chairperson Meltzer called the Utilities Committee Meeting to order at 4:30 p.m.

2. Pledge of Allegiance

3. Roll call of membership

Present: 4 - Meltzer, Doran, Firkus and Siebers

Excused: 1 - Del Toro

4. Approval of minutes from previous meeting

[24-0324](#)

Approval of the March 12, 2024 Utilities Committee Meeting Minutes.

Attachments: [March 12, 2024 Utilities Committee Meeting Minutes.pdf](#)

Firkus moved, seconded by Siebers, that the March 12, 2024 Utilities Committee Meeting Minutes be approved. Roll Call. Motion carried by the following vote:

Aye: 4 - Meltzer, Doran, Firkus and Siebers

Excused: 1 - Del Toro

5. Public Hearing/Appearances

6. Action Items

[24-0325](#)

Award of Turbidity Instrument Purchase to Hach Company in the amount of \$36,469.08 with a 15% contingency of \$5,470.36 for a total not to exceed \$41,939.44.

Attachments: [240315 UC Memo HachTurbidimeterPurchase.pdf](#)

Firkus moved, seconded by Siebers, that the award of Turbidity Instrument Purchase to Hach Company in the amount of \$36,469.08 with a 15% contingency of \$5,470.36 for a total not to exceed amount of \$41,939.44 be recommended for approval. Roll Call. Motion carried by the following vote:

Aye: 4 - Meltzer, Doran, Firkus and Siebers

Excused: 1 - Del Toro

[24-0358](#)

Sole Source Purchase Award of Wash Press #3 Auger Assembly Replacement Equipment from Vulcan Industries in the amount of \$25,666 with a 10% contingency of \$2,566 for a project total not to exceed \$28,232.

Attachments: [240322 UCMemo Sole Source Purchase VulcanWashPressParts.pdf](#)

Firkus moved, seconded by Siebers, that the Sole Source Purchase Award of Wash Press #3 Auger Assembly Replacement Equipment from Vulcan Industries in the amount of \$25,666 with a 10% contingency of \$2,566 for a project total not to exceed \$28,232 be recommended for approval. Roll Call. Motion carried by the following vote:

Aye: 4 - Meltzer, Doran, Firkus and Siebers

Excused: 1 - Del Toro

7. Information Items

8. Adjournment

Firkus moved, seconded by Siebers, that the Utilities Committee Meeting be adjourned at 4:39 p.m.. Roll Call. Motion carried by the following vote:

Aye: 4 - Meltzer, Doran, Firkus and Siebers

Excused: 1 - Del Toro



DEPARTMENT OF
UTILITIES

Department of Utilities
Wastewater Treatment Plant
2006 East Newberry Street
Appleton, WI 54915
p: 920-832-5945
f: 920-832-5949

www.appleton.org/government/utilities

MEMORANDUM

Date: April 11, 2024
To: Chairperson Vered Meltzer
CC: Ryan Rice, Utilities Deputy Director
From: Chris Stempa, Utilities Director
Subject: **Utilities Committee Action: Sole Source Engineering Services Contract to McMahon as part of 2024 Primary Clarifiers #1 through #4 Rehabilitation Project in the amount of \$59,700 with a 15% contingency of \$8,685 for a Project Total not to exceed \$66,585**

BACKGROUND:

There are six primary clarifiers at the Appleton Wastewater Treatment Plant (AWWTP). Primary Clarifiers #1 and #2 were originally constructed in 1936 with Primary Clarifiers #3 and #4 later constructed as part of a 1961 expansion project. Primary Clarifiers #5 and #6 were constructed in 1992 during the last significant upgrade project at the AWWTP. The primary treatment system is designed to split wastewater flow between all six online clarifiers or any combination of clarifiers depending on treatment and maintenance needs. Each primary clarifier is 70 feet in diameter with a side water depth of 10 feet. The total volume is 1,728,000 gal and the detention times are 2.68 and 0.75 hours at 15.5 million gallons per day (mgd) and 55 mgd, respectively. Approximately 60% or more of the total suspended solids entering the AWWTP are removed by the primary clarifiers. The last major maintenance or CIP project completed on Primary Clarifiers #1 through #4 was in 2001. As part of that project, all four primary clarifiers were modified to raise the bridge elevations and install new drive mechanisms.

In April of 2019, McMahon was awarded the engineering services contract for AWWTP Improvements Project. That project was comprised of five individual projects which involved the rehabilitation, replacement, or improvements to address immediate needs and long-term reliability. One of the five project elements included concrete recoating and repairs of Primary Clarifiers #1 through #4. There were other critical operation and maintenance (O&M) needs identified in the later stages of the preliminary engineering phase that were included in the final public bidding documents of 2019 AWWTP Improvements Project scope. Alternate bid items were identified to provide flexibility with the contract award in anticipation that the base bids might exceed the available project budget caused by the change in scope. This contingency planning was further necessitated by the bidding climate which was already being impacted at that time as a result of the COVID epidemic. Unfortunately, the total bid amount with all alternatives exceeded the available budget. This required staff to prioritize the bid alternatives which resulted in deferring the rehabilitation of the Primary Clarifiers #1 through #4 until a later year.

Inspections completed by an independent contractor during the summer of 2023 provided support to address structural steel components impacted by corrosion along with restoring the original concrete grout layer which has deteriorated over the 60 plus years of continuous use. AWWTP staff reestablished the 2019 Primary Clarifier #1 through #4 scope of work along with the 2023 inspection findings as part of a 2024 rehabilitation project.

PROPOSAL

McMahon was asked to provide a proposal for design, bidding and construction management services as part of the Primary Clarifiers #1 through #4 Rehabilitation Project. The 2024 budget identified \$1,000,000 in total for engineering and construction costs. The McMahon proposal detailed each aspect of the rehabilitation project and the associated services required to provide the necessary deliverables. The Scope of Services described within their proposal includes the following compensation on a Time and Expense basis.

Service Description	Fee
Design/Bidding Documents	\$15,900
Bidding Services	\$3,500
Construction Administrative Services	\$19,000
Construction On-Site Services	\$16,000
Pump Control Panel As-Needed Assistance	\$3,500
TOTAL	\$57,900

JUSTIFICATION

Engineering fees integrated as a function of total construction can be 15% or more depending on the complexity of the scope of work involved. Even when applying a safety factor for contingency, the overall contract amount represents 7% of the budget. McMahon has already produced much of the preliminary design work that will be utilized as part of this project. They have provided quality engineering services on several projects at the AWWTP. That presence has given them a foundational understanding of the treatment plant operations and needs. That experience has translated into highly responsive and cost-effective services. Their proposal reflects the value the city would be receiving. For the reasons previously described, I recommend that McMahon be considered for a sole source engineering contract as part of the 2024 Primary Clarifiers #1 through #4 Rehabilitation Project.

RECOMMENDATION:

I am recommending the approval of a sole source engineering contract to McMahon as part of the 2024 Primary Clarifiers #1 through #4 Rehabilitation Project in the amount of \$59,700 with a 15% contingency of \$8,685 for a project total not to exceed \$66,585.

If you have any questions regarding this project, please contact Chris Stempa at 920-832-5945.

Encl: Finance Department Sole Source Request Form



SOLE SOURCE REQUEST

The undersigned certifies that the commodity/service shown below qualifies as a sole source request and meets one or more of the following requirements. The department has demonstrated, and the Purchasing Manager concurs that only one source exists, the price is equitable, and/or noncompetitive negotiation is in the best interests of the City.

- Unique, proprietary, or one-of-a-kind:** Specific commodity/service is required and available from only one source, giving the City a superior and necessary benefit that cannot be obtained from other sources.
- Inadequate competition:** Purchasing solicitation (bid, proposal, or quote) did not result in any qualified vendor responses and competition is determined to be inadequate.
- Health or Safety Concern:** When a health or safety concern exists that is *not* an immediate threat but needs to be addressed in a period that does not allow for formal competitive procurement procedures.
- Continuity of design:** Consistency with current commodity or service.
- Emergency procurement:** A risk of human suffering or substantial damage to real or personal property exists requiring immediate attention.
- Cooperative purchase:** Purchase from another governmental unit contract or state approved purchasing association.
- Other:** Description provided below

Much of the preliminary design work necessary for the rehabilitation of Primary Clarifiers #1 through #4 has been completed by McMahon. They have provided quality engineering services on several projects at the AWWTP. Their understanding and familiarity with the AWWTP provide the city with cost-effective services.

PROPOSED DETAILS
Requesting dept: Utilities
Product/service: Engineering services contract; Primary Clarifier Rehabilitation Project #1-4
Vendor name: McMahon
Total cost: \$59,700 with 15% contingency of \$8,685 - project total not to exceed \$66,585

Justification and price quotation provided by the department, for the items to be considered and approved as a sole source purchase attached for review.

Jenifer Huss
Purchasing Manager

04/11/2024
Date



DEPARTMENT OF
UTILITIES

Department of Utilities
Wastewater Treatment Plant
2006 East Newberry Street
Appleton, WI 54915
p: 920-832-5945
f: 920-832-5949

www.appleton.org/government/utilities

MEMORANDUM

Date: April 12, 2024
To: Chairperson Vered Meltzer
CC: Ryan Rice, Utilities Deputy Director
From: Chris Stempa, Utilities Director
Subject: **Utilities Committee Informational Item: Sole Source Engineering Services Contract to McMahon as part of Summer Street Lift Station Evaluation in the amount of \$11,900 with a 15% contingency of \$1,785 for a Project Total not to exceed \$13,685**

BACKGROUND:

There are approximately 335 miles of collection sewer and 14 lift stations within the City of Appleton sewer service area that convey sewage to the Appleton Wastewater Treatment Plant (AWWTP). Failures of lift stations pose the immediate risk of sanitary sewer back-ups into residential basements, businesses, and industries served in these areas. The lift stations currently serving customers within the City of Appleton are a critical component of the sewerage system, and it is vital that their operational integrity be always maintained to prevent sanitary sewer overflows or backups.

The 2024 Capital Improvements Program (CIP) plan identified the Marshall Heights and Water Street lift stations as candidates for upgrades after over 20 years of continuous service. However, staff have recently reprioritized the CIP plan to focus on the Summer Street lift station after an escalating trend of sewage pump blockages, pump failures, and observations of drywell structural deterioration.

The Summer Street lift station is located on the northeast side of the intersection at North Badger Avenue and West Summer Street in Appleton. It was originally constructed in 1939 as an integral wetwell/drywell equipment lift station within the north lane of West Summer Street. Integral design meaning that the pump motor equipment was installed on an intermediate floor above but within the sewage wetwell (i.e. concrete tank). In 1963 this station was upgraded to the a below ground 'can' design located within the terrace on the north side West Summer Street. That upgrade project removed the former pumping equipment from the wetwell in exchange for an independent 25-foot deep drywell enclosure that contained shaft driven centrifugal pumps and controls. The intermediate floor remains within the wetwell today which creates a confined space entry hazard for maintenance or emergency response activities. The drywell equipment structure was replaced in 1993 to the present day below ground drywell structure which requires staff to enter a manway at ground level and climb down a ship ladder approximately 18 feet to the lower elevation to access the self-priming pumps and the associated pump controls. Staff are required to adhere to non-permit confined space entry procedures whenever accessing the drywell space.

AWWTP staff intend to systematically address operational, reliability, and safety concerns with a new submersible pump system design like the 2018 North Briarcliff Drive Lift Station Upgrades Project.

PROPOSAL

McMahon was asked to provide a proposal to complete a collection area capacity evaluation, an equipment conditions assessment, and project alternatives analysis. Bidding and construction management service costs were not provided because McMahon felt it was appropriate to first critically evaluate viable alternatives knowing the challenges presented by space limitations and numerous existing utilities within the right-of-way. The 2024 budget identified \$1,600,000 in total for engineering and construction costs for the Water Street and Marshall Heights lift station. The Summer Street lift station had been identified as a 2026 CIP project but as stated previously, has since been reprioritized for upgrades in 2024. The McMahon proposal detailed each element of the preliminary engineering services required to provide a deliverable with the following core elements.

- Project Alternatives Evaluation
 - Evaluate options for converting the lift station to a submersible lift station. Options to evaluate include:
 - Reconstruct the top of wet well and convert it to a submersible lift station. Provide a premanufactured above ground valve vault within the right-of-way of the road.
 - Construct a new wet well and submersible lift station within the vicinity of the Summer Street lift station. Work with City on feasible locations for the new lift station.
- Evaluate the feasibility of providing a permanent back-up generator at the lift station.
- Preliminary layouts will be provided for each feasible option.
- Opinions of Probable Capital Costs will be prepared for each feasible option.

The Scope of Services described within their proposal was presented as a lump sum totaling \$11,900.

JUSTIFICATION

Since 2010, McMahon has provided engineering and/or construction management related services six of the last eight lift station projects. They are familiar with the sewer service area and have developed an effective approach to delivering successful project outcomes. The proposed cost of \$11,900 is consistent with similar scopes of work they have undertaken for the city in the past. McMahon's local presence and experienced team coupled with past City of Appleton collection system project experience has translated into highly responsive and cost-effective services which is reflected in their proposal. For the reasons previously described, I recommend that McMahon be considered for a sole source engineering contract to McMahon #1 through #4 Rehabilitation Project.

AWARD:

Per city policy Section IV.G.(1), sole source purchases over \$7,500 but less than \$25,000, required written justification to be provided to the city Purchasing Manager. That justification was provided, and concurrence received on April 11, 2024. As such, a professional services contract is being awarded to McMahon as part of Summer Street Lift Station Evaluation in the amount of \$11,900 with a 15% contingency of \$1,785 for a project total not to exceed \$13,685.

If you have any questions regarding this project, please contact Chris Stempa at 920-832-5945.

WATER MAIN BREAK/ JOINT LEAK REPORT - MARCH 2024

YEARLY WATER MAIN BREAK COMPARISON

MONTH 24	MONTH 23	YTD 24	YTD 23
3	1	17	21

LOCATION	BREAK DATE	WORK ORDER	TYPE OF PIPE	SIZE	YEAR	BREAK	ESTIMATED DURATION	ESTIMATED WATER LOSS IN GALLONS	DOLLAR VALUE OF WATER REVENUE LOSS**	TOTAL DOLLAR VALUE FOR BREAK* (Water Costs + Repair Costs)
E. Calumet St. & S. Jackson St.	3/2/2024	309269	CIP	8"	1948	3" Hole and 1/2" Crack	5 Hours	1,165,144	\$7,084.08	\$16,084.08
NOTES: The break was found due to a call in by the APD. The duration was calculated by the time of the call and the amount of water and washout under the road.										
1631 S. Hillcrest Dr.	3/15/2024	309269	CIP	6"	1957	4" Hole	6 Hours	648,305	\$3,941.69	\$12,941.69
NOTES: The break was found due to water bubbling up in the street. The duration was calculated by the soil saturation.										
152' South of S. Mason St. on W. Cedar St.	3/19/2024	309269	CIP	6"	1937	12" Split	79 Days	7,147,474	\$43,456.64	\$52,456.64
NOTES: The break was found due to water bubbling up in the street. The duration was calculated by the soil saturation.										
									Total Cost =	\$81,482.41

*In addition to the dollar value of water revenue lost, there is an average cost of \$9,000 to repair each water main break (including final restoration) and an average cost of \$630 to produce the lost water for each main break.

**Water Loss is calculated at the residential rate of \$6.08 per 1000 gallons.