Legislation Text

File #: 2021-003, **Version:** 1

Proposed Change Order No. 2

Contract No. GLWA-CS-055

Professional Engineering Services for Yard Piping, Valves and Venturi Meters Replacement at Water Works Park

CIP# 115001 / BCE Score: 69.2

Agenda of:	January 27, 2021	
Item No.:	**2021-003**	
Amount:	Original Contract	$3,738,149.00
	Change Order No. 1	0.00
	Proposed Change Order No. 2	1,860,344.75
	Total Revised Contract	$5,598,493.75

TO: The Honorable
Board of Directors
Great Lakes Water Authority

FROM: Sue F. McCormick
Chief Executive Officer
Great Lakes Water Authority

DATE: January 6, 2021

RE: **Proposed Change Order No. 2**

Contract No. GLWA-CS-055
Professional Engineering Services for Yard Piping, Valves and Venturi Meters Replacement at Water Works Park
Vendor: AECOM Great Lakes, Inc.

MOTION

Upon recommendation of Cheryl Porter, Chief Operating Officer - Water and Field Services, the Board of Directors (Board) of the Great Lakes Water Authority (GLWA), authorizes the Chief Executive Officer (CEO) to **enter into Contract No. GLWA-CS-055 Proposed Change Order No. 2 "Professional Engineering Services for Yard Piping, Valves and Venturi Meters Replacement at Water Works Park" with AECOM Great Lakes, Inc., at an increased cost of $1,860,344.75 for a total cost not to exceed $5,598,493.75 and an increased duration of 58 months for a total**

contract duration of 104 months; and authorizes the CEO to take such other action as may be necessary to accomplish the intent of this vote.

BACKGROUND

Contract No. CS-055 is a consulting engineering services contract involving design, bid, construction administration, resident project representation (RPR), and O&M documentation services related to capital improvements at Water Works Park Water Treatment Plant (Water Works Park). Water Works Park's current treatment plant was placed into service in 2003. The existing yard piping, valves, and venturi meters, however, were installed between 1875 and 1992. This yard piping connects the high lift pumping station to the low-and intermediate-pressure districts which provide water service to the City of Detroit, Hamtramck, and Grosse Pointe Park. Construction to replace the yard piping, valves, and venturi meters is being performed under a separate construction contract - Contract No. 2000610.

The scope of services under Contract CS-055 includes construction administration and RPR services for a two-year period of construction. Contract No. 2000610 was executed for a five-year construction duration. This change in duration occurred during the completion of the design to accommodate a staged sequence of construction that will allow Water Works Park to continually provide water service during the five-year duration. Construction sequencing also includes the installation of line stops on all the 15 water transmission mains leaving Water Works Park in anticipation that the isolation valves will not provide adequate isolation during shutdowns. Additionally, a new security entrance for Water Works Park was added to the scope of work for construction. This proposed change order would increase the Contract Amount and Contract Time so that construction administration and RPR services can be provided by the engineering design consultant, AECOM, through the entire duration of construction. An additional full-time construction manager would also be provided by AECOM for the entire duration of construction.

In summary, the changes associated with this proposed change order will affect the following budget items in the CS-055 contract:

Task 8 - Construction Administration: $414,808.00

Task 9 - Resident Project Representation: $1,601,058.00

Task 10 - System O&M Manual Updating, SOPs and Training: $22,087.00

Task 11B - Stormwater (Credit): ($141,732.25)

Task 11C - Security Entrance (Credit): ($35,876.00)

Total: $1,860,344.75

JUSTIFICATION

Monitoring the progress and quality of construction during its entire duration is essential for construction quality assurance. The existing construction administration and RPR services budget is based on a 2-year construction duration, which is not adequate, to cover to the 5 years that it is expected to complete the work of the construction project.

PROJECT MANAGEMENT STATUS

Original Contract Time	36 months

Change Order No. 1	10 months
Proposed Change Order No. 2	58 months
New Contract Time	104 months

PROJECT ESTIMATE

Original Contract Price	$3,738,149.00
Change Order No. 1	0.00
Proposed Change Order No. 2	1,860,344.75
New Contract Total	$5,598,493.75

FINANCIAL PLAN IMPACT

Summary: Sufficient funds are provided in the financial plan for this project.

Funding Source: Water Construction Fund

Cost Center: Water Engineering

Expense Type: Construction (5519-882111.000-617950-115001)

Estimated Cost by Year and Related Estimating Variance: See table below.

Original Contract Price	$ 3,738,149.00
Change Order No. 1	0.00
Current Contract Total	3,738,149.00
Proposed Change Order No. 2	1,860,344.75
New Contract Total	5,598,493.75
Amended Financial Plan Estimate	5,041,000.00
Negative Estimating Variance	$ (557,493.75)

Amounts above as per the Draft #2 2022-2026 CIP. A budget amendment will be prepared to fund the negative estimating variance from capital reserves associated with this Proposed Change Order No. 2.

COMMITTEE REVIEW

This item was presented to the Operations and Resources Committee at its meeting on January 13, 2021. The Operations and Resources Committee unanimously recommended that the GLWA Board adopt the resolution as presented.

SHARED SERVICES IMPACT

This item does not impact the shared services agreement between GLWA and DWSD.