



**CITY OF**

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# **NEWPORT BEACH**

## **City Council Staff Report**

May 14, 2019  
Agenda Item No. 7

**TO:** HONORABLE MAYOR AND MEMBERS OF THE CITY COUNCIL

**FROM:** David A. Webb, Public Works Director - 949-644-3311,  
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**TITLE:** Big Canyon Reservoir Flow Metering Vault and Treatment Improvements – Notice of Completion for Contract No. 6104 (16W13)

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**ABSTRACT:**

On August 8, 2017, City Council awarded Contract No. 6104 for the Big Canyon Reservoir Flow Metering Vault and Treatment Improvements project to Schuler Constructors, Inc. The work is complete and staff requests City Council acceptance and close out of the contract.

**RECOMMENDATION:**

- a) Accept the completed work and authorize the City Clerk to file a Notice of Completion for the project. On August 8, 2017, City Council found this project exempt from the California Environmental Quality Act (CEQA) pursuant to Section 15302 (c);
- b) Authorize the City Clerk to release the Labor and Materials Bond 65 days after the Notice of Completion has been recorded in accordance with applicable portions of the Civil Code; and
- c) Release Faithful Performance Bond one year after acceptance by City Council.

**FUNDING REQUIREMENTS:**

Funds for the construction contract were expensed from the following accounts:

<u>Account Description</u>	<u>Account Number</u>	<u>Amount</u>
Water Enterprise	70101-980000-16W13	\$ 850,500.00
Water Capital NMP	70201932-980000-16W13	\$ 923,052.03
	<b>Total:</b>	<b>\$1,773,552.03</b>

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**DISCUSSION:**

**Overall Contract Cost/Time Summary**

Awarded Contract Amount	Final Cost at Completion	Contingency Allowance	Actual Contract Change	% Due to Directed Change	% Due to Unforeseen Change
\$1,610,500.00	\$1,773,552.03	10% or less	10.1%	5.8%	4.3%
Allowed Contract Time + Approved Extensions (days) =		351	Actual Time Under (-) or Over (+)		-2

The work necessary to complete this contract included the construction of a concrete vault to house a new 30-inch magnetic flow meter, construction of two new potable water mixing systems and replacement of an existing 8-ton crane. Potable water mixing is now achieved with the mixing systems that handle high and low flow conditions. The first mixing device is a 42-inch Ultra Tab static mixer that handles the medium to high flow conditions. The second device is a hydraulic mixing system that uses three jet nozzles to address low flow conditions.

The contracted work has now been completed to the satisfaction of the Public Works Department. A summary of the construction cost is as follows:

Original Bid Amount:	\$1,610,500.00
Actual Cost of Bid Items Constructed:	\$1,610,500.00
Total Change Orders:	<u>\$163,052.03</u>
<b>Final Contract Cost:</b>	<b>\$1,773,552.03</b>

The actual cost of bid items constructed matched the original bid amount. There were a total of four change orders that added \$163,052.03 to the final cost. The first change order replaced a critical 30-inch butterfly valve that was found inoperable due to age and corrosion build up. The second change order was for an unforeseen condition on a new gate valve that required modifications to meet the design requirements. The third change order was for additional paving at the Big Canyon Reservoir site. This paving work is identified as part of a separate capital improvement project and was added into this contract to reduce overhead and logistic costs associated with bringing in a separate contractor to do the planned paving. The last change order covered a directed change to improve the chlorine resistant coating of the static mixer. The total cost of construction, including all change orders, was \$1,773,552.03, which is approximately 10 percent above the original bid amount.

Utilities Department staff tested the new mixing systems and reported success during all flow conditions. The new magnetic flow meter is operating and giving staff improved accuracy monitoring flows in and out of the reservoir. This project has succeeded in

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delivering all the design goals for improving mixing, improving water quality and delivering accurate flow measurement.

The project was substantially complete as of February 21, 2019. A summary of the project schedule is as follows:

Estimated Start of Construction per Annual Baseline Schedule	September 9, 2017
Actual Start of Construction Per Notice To Proceed	September 9, 2017
Contract Completion Date Including Approved Time Extensions	February 25, 2019
Actual Substantial Construction Completion Date	February 21, 2019

The long construction duration for this project was necessary since the reservoir had to be operational during peak water demand, which is from March to September. Therefore, the contractor was not able to work during this time period and was allowed additional time to complete the contract after the peak water demand period.

**ENVIRONMENTAL REVIEW:**

On August 8, 2017, City Council found this project exempt from the California Environmental Quality Act (CEQA) pursuant to Section 15302(c) of the CEQA Guidelines, California Code of Regulations, Title 14, Chapter 3, because it has no potential to have a significant effect on the environment.

**NOTICING:**

The agenda item has been noticed according to the Brown Act (72 hours in advance of the meeting at which the City Council considers the item).

**ATTACHMENT:**

Attachment A – Location Map