



# CITY OF SAN MATEO

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## Agenda Report

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Agenda Number: {{item.number}}	Section Name: {{section.name}}	File ID: {{item.tracking_number}}
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**TO:** City Council  
**FROM:** Drew Corbett, City Manager  
**PREPARED BY:** Public Works Department  
**MEETING DATE:** July 20, 2020

**SUBJECT:**  
Wastewater Treatment Plant Nutrient Removal and Wet Weather Management Upgrade and Expansion Project Design Services – Amendment

**RECOMMENDATION:**  
Approve Amendment No. 3 to the agreement with Trussell Technologies Inc. for additional professional services for the Wastewater Treatment Plant Upgrade and Expansion Project in an amount not to exceed \$192,850; approve a contingency amount of \$10,000; and authorize the Public Works Director to execute the amendment in substantially the form presented and issue amendments within the contingency amount.

**BACKGROUND:**  
The City of San Mateo (City) is currently under a Regional Water Quality Control Board Cease and Desist Order requiring improvements to its collection system and Wastewater Treatment Plant (WWTP) to eliminate sanitary sewer overflows and unauthorized discharges of untreated or partially treated wastewater to San Francisco Bay. The Clean Water Program (CWP) includes several capital improvement projects that are currently under design and construction to comply with the Cease and Desist Order. Specifically, the WWTP Upgrade and Expansion Project (Project) consists of new facilities, including a headworks, primary clarifiers, secondary treatment basins, membrane filtration, and a dedicated wet weather treatment train.

The Project is intended to produce Title 22 recycled water for non-potable reuse in order to incorporate the sustainability and water reclamation goals of both the City of Foster City and San Mateo City Councils. Because the existing chlorine contact basins have insufficient detention time to produce disinfected tertiary recycled water, HDR Engineering, Inc. (HDR) completed a business case evaluation to assess disinfection alternatives to achieve Title 22 quality water in 2017. The two alternatives investigated required additional chlorine contact basin volume or a change to ultraviolet (UV) disinfection, with UV disinfection recommended as the preferred alternative. The cost for the additional infrastructure required to meet the Title 22 criteria ranged between \$5 and \$10 million, depending on the flow treated.

In lieu of building additional chlorine contact basins or adding UV facilities, the City investigated an alternative disinfection approach. This option reduces the chlorine contact volume required and optimizes use of the existing disinfection infrastructure to minimize additional costs. Trussell Technologies Inc. was selected to evaluate the potential of applying this alternative disinfection approach to the Upgrade and Expansion Project facilities using free chlorine to achieve Title 22 recycled water for non-potable reuse and confirmed the feasibility.

Amendment No. 3 to Trussell Technologies Inc.'s agreement adds additional scope to develop the schematic design report for this alternative disinfection approach; review the detailed design of the improvements that will be developed by HDR Engineering, Inc., as the design professional for the Upgrade and Expansion Project to assure compliance with Title-22 non-potable reuse regulations; and develop the engineering report for the production of disinfected tertiary recycled water

using this alternative approach. CWP staff has reviewed the submitted and proposed costs for the scope of work and believes them to be reasonable for the scope and expertise required. Staff recommends award of Amendment No. 3 to Trussell Technologies to complete the design of the project.

**BUDGET IMPACT:**

Sufficient funds are available in Project No. 46T003 for Amendment No. 3.

**ENVIRONMENTAL DETERMINATION:**

The City prepared a Final Programmatic Environmental Impact Report (Final PEIR) in accordance with the California Environmental Quality Act (CEQA) (SCH No. 2015032006). The PEIR was certified by City Council on June 6, 2016. In accordance with CEQA, the Final PEIR serves as the primary environmental compliance document for implementation of the CWP. The City prepared an Addendum to the Final PEIR that were approved on July 16, 2018 (Addendum 1) and April 15, 2019 (Addendum 2). This work is within the scope of the project evaluated in the PEIR and Addenda.

**NOTICE PROVIDED**

All meeting noticing requirements were met.

**ATTACHMENTS**

Att 1 – Amendment

**STAFF CONTACT**

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