

Engineering Committee Meeting Minutes
San Juan Water District
July 19, 2023
4:00 p.m.

Committee Members: Dan Rich, Chair
Ken Miller, Member

District Staff: Paul Helliker, General Manager
Tony Barela, Operations Manager
Andrew Pierson, Engineering Services Manager
Adam Larsen, Field Services Manager
Greg Turner, Water Treatment Manager
Mark Hargrove, Senior Engineer
Teri Grant, Board Secretary/Administrative Assistant

Members of the Public: Mike

Topics: Vehicle #35 Replacement (R)
Vehicle #3 and #25 Replacement (W)
Air Release Valve Replacement Program (R)
Baldwin Channel Improvements Project (W)
Wholesale Master Plan Project (W)
Other Engineering Matters
Public Comment

1. Vehicle #35 Replacement (R)

Mr. Larsen provided a written staff report which will be attached to the meeting minutes. He explained that the replacement is being requested early due to the CARB requirements. In addition, he informed the committee that the funding available in the FY 2023-24 budget is less than the amount being requested; however, the difference will be offset by using District staff for a capital project, rather than a contractor.

The Engineering Committee recommends consideration of a motion by the Board to authorize the purchase of a replacement vehicle for vehicle #35 with a Ford F450, with Scelzi utility bed, and Auto Crane from Downtown Ford, in the amount of \$149,010.06

2. Vehicle #3 and #25 Replacement (W)

Mr. Turner provided a written staff report which will be attached to the meeting minutes. He explained that the two vehicles are past their useful lives. In addition, he explained that by replacing them this year, the District will postpone the need for electrical upgrades associated with switching to all-electric equivalents and their necessary support infrastructure, as required when the CARB requirements go into effect January 2024.

The Engineering Committee recommends consideration of a motion by the Board to authorize the purchase of replacement for vehicles/dumps #3 and #25 with Ford F650 dump trucks with Scelzi Dump Body from Future Ford, in the amount of \$216,909.57

3. Air Release Valve Replacement Program (R)

Mr. Hargrove provided a written staff report which will be attached to the meeting minutes. He explained that this is a continuation of the current contract with Bennett Engineering Services for design services for construction in Spring 2024.

The Engineering Committee recommends consideration of a motion by the Board to authorize and approve Amendment No. 1 for professional engineering services to Bennett Engineering Services Inc. for the Air Release Valve Replacement Program

4. Baldwin Channel Improvements Project (W)

Mr. Hargrove provided a written staff report which will be attached to the meeting minutes. He explained that the work to be done is lining the channel between the Hinkle overflow and the culvert at Auburn Folsom Road. He explained the need for lining the channel and how this portion of the work was delayed until the right-of-way agreement with the United States was completed. In addition, he explained that the project bid came in higher than the budgeted amount; therefore, he worked with the contractor to obtain some cost savings which is not reflected in the staff report since that was negotiated yesterday. He explained that even with this cost savings, the work will be over the current budget, so staff is looking at pushing some other projects to a future budget year.

The Engineering Committee recommends consideration of a motion by the Board to authorize and approve the award of a construction contract for the construction of the Baldwin Channel Improvements Project

5. Wholesale Master Plan Project (W)

Mr. Pierson provided a written staff report which will be attached to the meeting minutes. He explained that this is for additional work needed to address the comments that were received from several of the Wholesale Customer Agencies specifically on the subject of water supply reliability, which initiated additional discussions and meetings with the District, and a complete revision to the water supply reliability chapter of the Wholesale Master Plan. He explained that the amount being requested should be enough to address any future comments as well.

The Engineering Committee recommends consideration of a motion by the Board to authorize and approve Amendment No. 2 for professional engineering services to Water Systems Consulting, Inc. for the Wholesale Master Plan Project

6. Other Engineering Matters

GM Helliker informed the committee that a presentation on the Hinkle Reservoir Replacement Project will be conducted by Mr. Greg Turner, WTP Manager, at the July Board meeting.

7. Public Comment

There were no public comments.

The meeting was adjourned at 4:23 p.m.

STAFF REPORT

To: Board of Directors
From: Adam Larsen
Date: July 26, 2023
Subject: Authorization of purchase for Vehicle # 35 replacement

RECOMMENDED ACTION

Staff is requesting the Committee make a recommendation to the Board for purchase approval of a Ford F450 from Future Ford, in the amount of \$149,010.06 plus a 10% contingency, for a total authorized amount of \$163,911.07. The staff recommendation was reviewed by the Engineering Committee, which recommends approval by the Board of Directors.

BACKGROUND

The District's existing Vehicle # 35 is a 2017 Ford F450, with a CTEC utility bed and Ventura Crane. The vehicle has approximately 72,000 miles. The vehicle is currently scheduled to be replaced in FY 26/27, however we are seeking to replace this vehicle early due to the new California Air Resources Board (CARB) Clean Fleet Regulation requiring new purchases to be electric starting January 1, 2024. By purchasing this vehicle early, it will allow the District more time to prepare and implement the upcoming Clean Fleet Regulations.

The District will utilize the State of California vehicle contract 1-18-23-20A-I CLIN 30. Staff selected the diesel replacement; based upon vehicle life, mileage, maintenance costs, and towing capability. In addition, staff assessed two acceptable utility beds that offered different crane options; CTEC with the Liftmoore Crane, and Scelzi with the Auto Crane. We currently use the Scelzi Auto Cranes on two vehicles and find them reliable. The Scelzi utility body/ Auto Crane package was 17% lower in overall cost than the CTEC package.

FINANCIAL CONSIDERATIONS

This vehicle replacement was budgeted at \$98,000. The quote came in at \$149,010.06. We will be able offset the extra cost with savings that we identified on a different project. Staff is requesting the 10% contingency to cover any extra costs like logos, safety lights, etc. After vehicle # 35 is replaced, it will go to public auction and then the amount that it is sold for will go back into the District's General CIP Fund.

STAFF REPORT

To: Board of Directors
From: Greg Turner, Water Treatment Plant Manager
Date: July 26, 2023
Subject: Authorization of Purchase for Vehicles #3 and #25 Replacement

RECOMMENDED ACTION

Staff is requesting the committee make a recommendation to the Board for purchase approval of two Ford 650's, with dump bodies from Future Ford, in the amount of \$108,457.41/ea. plus a 10% contingency, for a total authorized amount of \$238,606.02. The staff recommendation was reviewed by the Engineering Committee, which recommends approval by the Board of Directors.

BACKGROUND

For water treatment residuals management, the District utilizes dump trucks to collect and transfer solids to the drying area to further increase the solids percentages prior to final disposal to landfill. Two dump trucks are used for this process: V#3, a 1991 F800 and V#25, a 2008 F650. V#3 has well exceeded its useful life as it is no longer street legal and has a severely rusted out dump body. V#25 is 15 years old and it, too, has exceeded its replacement life cycle. In addition to their ages, the District is recommending to replace the vehicles as a method to comply with CARB (California Air Resources Board) zero emissions regulations. By replacing in FY 23-24, the District will postpone the need for electrical upgrades associated with switching to all-electric equivalents and their necessary support infrastructure.

The District will utilize the State of California vehicle contract 1-18-23-20A-I CLIN 30. Staff selected the diesel replacements, based upon vehicle mileage, maintenance costs, and towing capability.

FINANCIAL CONSIDERATIONS

The vehicle replacements were budgeted for \$125,000 ea. totaling \$250,000. The quote came in at \$108,457.41 for each vehicle. Staff is requesting a 10% contingency to cover any extra costs like logos, safety lights, etc. After vehicles #3 and #25 are replaced, they will go to public auction where the amount that is recovered will go back into the District's General CIP Fund.

STAFF REPORT

To: Board of Directors
From: Mark Hargrove, Senior Engineer
Date: July 26, 2023
Subject: Air Release Valve Replacement Program Planning and Design Services for FY23/24

RECOMMENDED ACTION

Staff requests a recommendation from the Committee for a Board motion to approve Amendment No. 1 to Bennett Engineering Services, Inc. (BEN) to provide planning and design services for the Air Release Valve Replacement Program (Project) for FY 23/24 in the amount of \$189,249 bringing their total contract amount to \$336,461, with a total authorized budget of \$370,107 which includes a 10% contingency. The staff recommendation was reviewed by the Engineering Committee, which recommends approval by the Board of Directors.

BACKGROUND

District staff has developed an Air Release Valve Replacement Program (Program) to replace/upgrade all of the existing air release valves (ARVs) that are currently deficient (i.e. broken, not found, cannot be repaired) and/or located within below grade valve boxes to above grade installations, to be in compliance with California Code of Regulations, Title 22. The District currently has approximately 880 ARVs in the Retail distribution system with an estimated 750 of these valves venting below grade. Since the implementation of the District's recurring 5-year ARV maintenance program in 2017 (160 ARV per year), 124 ARVs have been identified as being deficient. The Program will consist of replacing 45 ARVs per year over a 17-year period.

On June 2, 2022, the District issued an RFP requesting proposals for professional engineering services for the planning and design for the first 3 years of the Program. Firms were asked to submit cost proposals for only FY 22/23 with the remaining years to be re-negotiated each year. In July 2022, the District executed a contact with BEN to evaluate and design the ARVs for the first year. These 45 ARVs locations are currently under construction.

In May 2023 District staff met with BEN to discuss lessons learned from the previous fiscal year and the scope of work for next fiscal year's ARV Replacement Program. The scope of work and budget amount included in this amendment reflect this discussion.

FINANCIAL CONSIDERATIONS

The Project is included in FY 23/24 Retail Budget.

STAFF REPORT

To: Board of Directors
From: Mark Hargrove, Senior Engineer
Date: July 26, 2023
Subject: Baldwin Channel Improvements Project – BWD Construction Inc.

RECOMMENDED ACTION

Staff requests a recommendation from the Committee for a Board motion to award a construction contract to BWD Construction, Inc. (BWD) for \$547,000 with a construction contingency of \$54,700 (10%) for an authorized total construction budget of \$601,700. The staff recommendation was reviewed by the Engineering Committee, which recommends approval by the Board of Directors.

BACKGROUND

The Baldwin Channel is the main conveyance for Hinkle Reservoir and water treatment plant (WTP) emergency overflows to Baldwin Reservoir. The invert of the channel located on our main site will be concrete lined to eliminate weed control maintenance, capacity impediments from bulging cattail root balls, and sedimentation erosion during releases to the channel. In conjunction with the lining of the channel, there will be a small concrete structure constructed to direct overflow from the 48-in bypass pipeline to the channel.

The Baldwin Channel lining work was originally part of the construction contract awarded in May 2022. However, the work was removed from the 2022 construction work due to insufficient time after transfer of property ownership to the District from the United States.

STATUS

The Project was advertised for bidding on June 12, 2023. Five prospective contractors attended the pre-bid conference on June 22nd. However, only one bid for the project was received on July 12, 2023 as follows:

Bidder	Bid Amount
BWD Construction, Inc.	\$547,000

BWD was the lowest responsive, responsible bidder. BWD’s bid documents were reviewed and found to be complete and in order, including license, insurance and bonds.

BUDGET IMPACT

The project is included the FY 2023/2024 with a total project budget of \$270,000. District staff is working with BWD to reduce the costs of construction, including but not limited to the removal of items from their scope.

STAFF REPORT

To: Board of Directors
From: Andrew Pierson, Director of Engineering Services
Date: July 26, 2023
Subject: Wholesale Master Plan Project

RECOMMENDED ACTION

Staff requests a recommendation from the Committee for a Board motion to approve Amendment No. 2 to Water Systems Consulting, Inc. for professional engineering services related to the Wholesale Master Plan Project in the amount of \$46,070, bringing their total contract to \$374,070. The staff recommendation was reviewed by the Engineering Committee, which recommends approval by the Board of Directors.

BACKGROUND

This project includes the preparation of the District's Wholesale Master Plan (WMP), which was last completed in 2001, and a supplement titled "Phase II" was completed in 2007. In June of 2021, the District contracted with Water Systems Consulting, Inc. (WSC) to prepare the update to the WMP, which generally included evaluating current and future water supply and demand conditions, assessing the existing facilities for meeting current and future needs, reviewing and determining alternatives for water supply deliveries, and developing a ten-year capital improvement program.

The original contract with WSC was for the amount of \$298,180, and in October 2022, Amendment No. 1 was executed which increased the contract to \$328,000. The additional costs associated with Amendment No. 1 were attributed to the data provided for the infrastructure evaluation not being readily available which caused considerably more effort to make the GIS data usable for this task, as well as the District requesting additional items be evaluated in the Water Treatment Plant Assessment that were not included in the original scope.

STATUS

The final draft of the WMP was distributed to the Wholesale Customer Agencies (WCAs) for review in February of 2023. Substantial comments were received from several of the WCAs specifically on the subject of water supply reliability, which initiated additional discussions and meetings with the District, and a complete revision to the water supply reliability chapter of the WMP. WSC's original proposal and scope of work assumed only minor revisions would be required based on the WCAs' comments. In addition, the District requested an alternative water storage tank site be analyzed and included in the evaluation and report. These modifications and additional scope extended the project schedule, and created additional project management, administration, and coordination costs.

This amendment includes all costs associated with the additional scope of work not included in the original contract through the successful completion of the WMP.

BUDGET IMPACT

The Project was originally included in the District's approved Wholesale CIP budget for Fiscal Year 2020-2021, but the budget was increased and rolled over to Fiscal Year 2021-2022. The additional expense was anticipated in the mid-year budget review.