



Santa Clara Valley Water District

File No.: 20-1187

Agenda Date: 1/5/2021

Item No.: 2.6.

BOARD AGENDA MEMORANDUM

SUBJECT:

Approve Amendment No. 8 to Agreement No. A3676A, with URS Corporation, for Design Services for the Anderson Dam Seismic Retrofit Project, Project No. 91864005, for a Not-to Exceed Fee of \$16,715,863, Increasing the Total Not-to-Exceed Fee to \$48,069,366, and extending the Agreement Term (Morgan Hill) (District 1) (Continued from December 8, 2020).

RECOMMENDATION:

Approve Amendment No. 8 to Agreement No. A3676A with URS Corporation for Design Services for the Anderson Dam Seismic Retrofit Project, Project No. 91864005, for a Not-to Exceed Fee of \$16,715,863, Increasing the Total Not-to-Exceed Fee to \$48,069,366, and extending the Agreement Term.

SUMMARY:

Valley Water is undertaking the Anderson Dam Seismic Retrofit Project (Project) to address seismic stability deficiencies, rehabilitate aging appurtenant facilities, and to comply with current dam safety standards. The full reservoir capacity will be restored upon completion of the Project.

Agreement A3676A with URS Corporation (Consultant) includes a scope of services to complete design documentation and prepare the construction plans, specifications, and cost estimates for the Project.

Amendment No. 8 to this Agreement will increase the not-to-exceed fee by \$16,715,863 for the Consultant to perform additional design services for ADSRP efforts as well as providing engineering support design services during the construction of the ADTP. Valley Water follows best practices project management by amending a project design agreement prior to start of construction, after the design is complete; the details and complexity of construction have been defined; and the extent of design engineering support for construction has been assessed. With the ADTP design documents completed (external regulatory review is in progress) and the current schedule to advertise for bids in the next couple of months, it is timely to add the engineer-of-record design services during construction to the Agreement scope of services now.

Project Background and Previous Board Actions.

The Anderson Dam Seismic Retrofit Project (ADSRP) will correct dam seismic deficiencies and otherwise meet all current Federal Energy Regulatory Commission (FERC) and California Department of Water Resources, Division of Safety of Dams (DSOD) dam safety design standards.

Throughout 2019 to early 2020, Project staff and consultants had been progressing with preparation of 90% design plans and specifications and supporting environmental and permitting documents. On February 20, 2020, the Santa Clara Valley Water District (Valley Water) received a letter order from FERC to immediately implement ADSRP-related interim risk reduction measures, which included the construction of the Anderson Dam Tunnel Project (ADTP).

The ADTP includes construction of a diversion system to augment the existing outlet, which will consist of a diversion tunnel and outlet structure, a micro-tunnel lake tap, and modifications to Coyote Creek downstream of the project. The Project also includes reservoir bank and rim stability improvements and existing intake structure modification.

In order to comply with the FERC Order in a timely manner, staff is recommending the Board approve Amendment No. 8 to Agreement A3676A with URS Corporation for a not-to-exceed amount of \$16,715,863.

Previously on April 6, 2020, the Board approved authorizing the Chief Executive Officer to negotiate and execute Amendment No. 7 to Agreement A3676A with URS Corporation up to an additional \$8M. That Amendment was fully executed on June 6, 2020.

Consultant Work Performed to Date

The design services Agreement with URS for the Anderson Dam Seismic Retrofit includes the following tasks:

- Task 1 - Project Management Services
- Task 2 - Data Collection and Investigations
- Task 2A - Phase 3, 4, 5, and 6 Geotechnical
- Task 3A - Basis of Design (Approved for Design)
- Task 3B - Basis of Design (Prior Approval Required)
- Task 4 - 30 Percent Design Document Preparation
- Task 5 - 60 Percent Design Document Preparation
- Task 6 - 90 Percent Design Document Preparation
- Task 7 - Final Design Document Preparation
- Task 8 - Bid and Award Services
- Task 9 - Supplemental Services during Design

Tasks 4 and 5 are complete. Most of the Task 2 scope is complete. Work has also been completed on the scope of Task 6 and Task 7 for ADTP.

The budget for Task 9, Supplemental Services, is being expended to fund additional necessary site investigations, preparing technical memoranda; and developing design modifications as mandated by

DSOD, FERC, and BOC requirements. The need to accelerate the ADTP ahead of the ADSRP pursuant to the FERC order of February 2020 has also resulted in additional work which has been funded by the Supplemental Services budget. The use of Supplemental Services has been carefully scoped by staff and formalized in individual task orders. Expenditures for these task orders have been closely monitored and deliverables have been reviewed for timeliness and completeness.

Staff Management of Consultant Agreements

Staff has been monitoring and managing the Consultant's performance to meet the goals and terms of the Agreement. Bi-weekly progress meetings and monthly design meetings are held with the Consultant to assess progress of the Project. As generally required in all Valley Water consultant agreements, consultants are required to submit detailed monthly progress/status reports with their invoices. These reports are scrutinized by Valley Water staff before approval of any payment to the consultants.

Another requirement in the Valley Water's consultant agreement is the preparation and implementation of an internal Quality Assurance and Quality Control (QA/QC) Plan by the Consultant for all deliverables transmitted to Valley Water. As part of the deliverable acceptance process, Valley Water also performs QA/QC review of all deliverables received from the Consultant for compliance with project scope, budget, and schedule.

For this Agreement, key Consultant deliverables are subject to additional technical review by FERC, DSOD staff, and independent experts.

Agreement A3676A Amendment History

The original Agreement with the Consultant for design services for the Anderson Dam Seismic Retrofit Project was approved by the Board on August 27, 2013 for a not-to-exceed fee of \$11,384,761. Amendments Nos. 1, 2, 3, and 4 were administrative in nature (extending the Agreement term and updating the Agreement's standard terms and conditions) and were executed on December 28, 2015; August 11, 2016; February 21, 2017; and May 17, 2017, respectively.

Amendment No. 5 was approved by the Board on July 25, 2017 for a not-to-exceed fee of \$6,001,165, resulting in a total not-to-exceed fee of \$17,385,926. Amendment No. 5 expanded the scope of work to reflect the more extensive dam retrofit as determined from three years of geotechnical and geologic investigations and extended the Agreement term.

Amendment No 6 was approved by the Board on October 23, 2018 for a not-to-exceed fees of \$6,001,293, resulting in a total not-to-exceed fees of \$23,387,219, extended the term of the Agreement, and modified the scope of services to reflect the additional work requested by the BOC, FERC, and DSOD.

Amendment No. 7 was approved by the CEO on June 2, 2020, after the Board authorized the CEO to negotiate and approve the Amendment. The Amendment authorized additional design services necessary after the FERC order of February 2020. The Amendment increased the not-to-exceed fees

by \$7,966,284 resulting in a total not-to-exceed fees of \$31,353,503 and extended the Agreement term.

Amendment No. 8 Additional Scope of Services and Time Extension

To progress the design phase to the 100% documents and provide engineering support to the construction phase of the ADTP Amendment No. 8 will allocate additional funds to Tasks 1, 3A, 3B, 6, 7, 8 and 9. Amendment No. 8 also adds new tasks 10 and 11 with corresponding not-to-exceed fees, for design engineering support during construction of ADTP as the Consultant will serve as the engineer-of-record.

The total not-to-exceed fee for Amendment No. 8 is \$16,715,863. The tasks and not-to-exceed additional fees are summarized below:

1. Additional project management for extended design term Agreement. (Task 1: \$199,658)
2. Additional effort for creating two Geotechnical Baseline Reports (GBRs), one each for ADTP and ADSRP. (Task 3A: \$107,690)
3. Additional effort for implementing an Asbestos and Metals Air Monitoring Program. The extent of asbestos and metals air monitoring program is now defined, following the finalization of investigations, analysis, and design. The monitoring plan described in the Amendment applies to both ADTP and the larger ADSRP. Baseline monitoring (one-year duration each for ADTP and ADSRP) will be performed and this Amendment also includes a three-year regular air monitoring for ADTP. The regular monitoring for ADSRP for a period of 6 to 7 years will be included in a future amendment. (Task 3B: \$5,621,480)
4. Additional 90 percent design documentation for earthquake fault mitigation design for diversion outlet structure, design due to required changes to large size cone valve, design of temporary bulkhead in downstream leg of low level outlet tunnel, additional coordination due to splitting of design between ADTP and ADSRP, preparation of ADTP and ADSRP temporary construction surveillance monitoring plans, preparation of ADSRP Quality Control Inspection Program, preparation of ADSRP temporary construction surveillance monitoring plan, preparation of Excavation Material Management Plan, SCADA designs, Coyote Road design revisions, preparing additional specifications, and updating spillway designs for ogee crest, terminal structure, and termination wing wall elements. (Task 6: \$1,109,094)
5. Additional Final design documentation for fault mitigation design for diversion outlet structure, design due to required changes to large size cone valve, design of temporary bulkhead in downstream leg of low level outlet tunnel, additional coordination due to splitting of design between ADTP and ADSRP, SCADA designs, Coyote Road design revisions, preparing additional specifications, and updating spillway designs for ogee crest, terminal structure, and termination wing wall elements. (Task 7: \$481,180)
6. Additional effort for ADTP bid and award services. (Task 8: \$61,488)

7. Supplemental Services to provide funds for unanticipated costs associated with site specific land surveys, constructability review and risk workshops, additional engineering surveys and geotechnical investigations, additional design efforts, management of Coyote Ceanothus, analysis and design of the unlined spillway, north and south channel weir design to accommodate regulatory agencies requests, additional visual inspections of reservoir rim landslides, additional budget for restoration designs for upper parking and boat ramp, additional monthly inspection reports, design of landslide mitigations, final designs for strengthening of existing sloping intake structure, and additional PFMA and BOC meetings. (Task 9: \$3,465,000)
8. Engineering design services during the construction of the ADTP (from February 2020 to December 2023). The District follows best practices project management by amending a project design agreement prior to start of construction, after the design is complete; the details and complexity of construction have been defined; and the extent of design engineering support for construction has been assessed. With design documents complete for the ADTP (external regulatory review is in progress), it is timely to add the engineer-of-record design services during construction to the Agreement scope of services now. (Task 10: \$5,031,304)
9. Engineering support during ADTP construction for reservoir rim landslide mitigation strengthening of existing sloping intake structure. (Task 11: \$638,969)

A summary of the tasks and fees for the proposed Amendment No. 8 is presented in Table 1.

TABLE 1

Task	Description	Total Fixed Not-to-Exceed (NTE) Fees					
		Original Agreement	Amendment No. 5	Amendment No. 6	Amendment No. 7	Amendment No. 8	Revised NTE FEES Total
1	Project Management Services	\$877,668	\$591,973	\$199,873	\$1,458,975	\$199,658	\$3,328,157
2 and 2A	Data Collection and Investigations	\$2,555,092	\$747,012	\$1,485,127	\$389,235	\$0	\$5,176,466
3A	Basis of Design (Approved for Design)	\$1,571,579	\$405,123	\$170,253	\$208,897	\$107,690	\$2,463,542
3B	Basis of Design (Prior Approval Required)	\$428,816	\$1,552,146	\$290,465	\$867,720	\$5,621,480	\$8,760,627
4	30% Design Document Preparation	\$1,361,525	N/A	N/A	N/A	\$0	\$1,361,525
5	60% Design Document Preparation	\$1,408,868	\$1,084,022	N/A	N/A	\$0	\$2,492,890
6	90% Design Document Preparation	\$787,007	\$403,640	\$1,881,747	\$1,484,075	\$1,109,094	\$5,665,559

7	Final Design Document Preparation	\$336,182	\$185,436	\$335,871	\$784,264	\$481,180	\$2,122,933
8	Bid and Award Services	\$160,564	\$31,813	\$108,129	\$10,738	\$61,488	\$372,732
9	Supplemental Services During Design and Construction	\$1,897,460	\$1,000,000	\$1,529,828	\$2,762,386	\$3,465,000	\$10,654,664
10	Engineering Support During ADTP Construction					\$5,031,304	\$5,031,304
11	Engineering Support During ADTP Construction (Prior Approval Required)					\$638,969	\$638,969
Total Agreement Not-to-Exceed Amount		\$11,384,761	\$6,001,165	\$6,001,293	\$7,966,284	\$16,715,864	\$48,069,360

FINANCIAL IMPACT:

There are adequate funds in the Board-adopted FY2021 budget to encumber the anticipated Consultant effort (\$2 million) through the end of FY2021. Funds to cover the remaining Consultant services in FY2022 will be recommended by staff through the FY2022 budget process. The impact of this Consultant Agreement would be an increase to the total Project costs reflected in the Board adopted FY 2021-2025 Capital Improvement Program (CIP), which will be incorporated into the draft FY 2022-2026 Five-Year CIP.

CEQA:

The recommended action does not constitute a project under CEQA because it does not have a potential for resulting in direct or reasonably foreseeable indirect physical change in the environment.

ATTACHMENTS:

Attachment 1: Amendment No. 8

UNCLASSIFIED MANAGER:

Christopher Hakes, 408-630-3796