

# **SONOMA COUNTY**

575 ADMINISTRATION DRIVE, ROOM 102A SANTA ROSA, CA 95403

# **Legislation Text**

File #: 2021-1034, Version: 1

To: Board of Directors, Russian River County Sanitation District

**Department or Agency Name(s):** Sonoma Water, Russian River County Sanitation District

Staff Name and Phone Number: George Lincoln 707-521-1808

Vote Requirement: Majority Supervisorial District(s): Fifth

# Title:

Engineering Services for Headworks, Lift Stations, and Force Main Project

#### **Recommended Action:**

Authorize Sonoma County Water Agency's General Manager acting on behalf of Russian River County Sanitation District to execute an agreement with West Yost Associates, in a form approved by County Counsel, for condition assessment, engineering analysis, and engineering and design services for Russian River County Sanitation District Headworks, Lift Stations, and Force Main Project through June 30, 2028, in the not-to-exceed amount of \$2,169,335. (Fifth District)

# **Executive Summary:**

Russian River County Sanitation District's (District) service area covers approximately 2,700 acres and includes the unincorporated areas of Rio Nido, Guerneville, Guernewood Park, and Vacation Beach. District provides service to approximately 3,300 parcels using a gravity collection system and treats wastewater from approximately 3,200 equivalent single-family dwellings. Many of District's facilities are approaching the end of their useful life with most being over 35 years old. The purpose of the Russian River County Sanitation District Headworks, Lift Stations, and Force Main Project (Project) is to perform condition assessments and design of headworks and lift stations improvements, and design of the selected force main rehabilitation or replacement option to meet regulatory requirements.

### Discussion:

# HISTORY OF ITEM/BACKGROUND

District began operations in 1983. The service area covers approximately 2,700 acres and includes the unincorporated areas of Rio Nido, Guerneville, Guernewood Park, and Vacation Beach. District provides service to approximately 3,300 parcels using a gravity collection system and treats wastewater from approximately 3,200 equivalent single-family dwellings. The collection system includes approximately 35 miles of gravity sewer pipeline and 11 lift stations that convey wastewater to the Russian River treatment facility. District's wastewater treatment plant is located on Neeley Road in Guerneville. The plant is permitted to provide tertiary treatment for an average dry-weather flow of up to 0.71 million gallons per day (mgd) and 3.5 mgd during peak wet weather.

Currently, inflow to the plant averages approximately 0.3 mgd annually and reaches several million gallons per day during peak wet-weather flow. Wastewater treatment is accomplished by coarse screening and aerated grit removal, two aerated biological nutrient removal activated sludge basins, three secondary clarifiers, two

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tertiary filters, ultra violet (UV) disinfection, and two holding ponds with a total storage capacity of 4.5 million gallons. This plant was upgraded in 2002 (tertiary units and clarifier), 2011 (UV disinfection), and 2014 (biological nutrient removal).

District is permitted by the North Coast Regional Water Quality Control Board (Regional Board) and is allowed to discharge advanced treated wastewater up to one percent of the flow of the Russian River between October 1 and May 15. During the remainder of the year, treated wastewater is used to irrigate land adjacent to the treatment plant and recycled water is used at the Northwood Golf Course. Many of District's facilities are approaching the end of their useful life with most being over 35 years old. A failure of the District's force main near Vacation Beach in 2014 initiated enforcement by the Regional Board and District's subsequent analysis suggested that it would be more feasible to either replace or rehabilitate the force main rather than condition assess the force main.

District's annual budget finances the operation, maintenance, and administration of the collection system, lift stations, treatment plant and disposal facilities that serve the Russian River area, as well as bond and loan repayment and infrastructure replacement. However, replacing facilities is very expensive and with many approaching end of useful life and with District existing in a disadvantaged community, District applied for and received a planning grant (\$810,085 with principal forgiveness) from the State Water Resources Control Board's Clean Water State Revolving Fund program. These funds will pay for Phase 1 of the Project. Additionally, District will apply for grant funding totaling almost \$7.2 million (principal forgiveness of 75%) to finish final design and help pay for Project construction (Phase 2). Even with historical and continued rate increase, District's rate base simply cannot afford to pay for the amount of infrastructure improvements needed and funding opportunities are aggressively sought. Sonoma County Water Agency operates District under contract with District and has been doing so since 1995 when the Board of Supervisors transitioned the operation and maintenance of District from Transportation and Public Works to Sonoma County Water Agency.

### SELECTION PROCESS

On November 20, 2019, Sonoma County Water Agency on behalf of District issued a Request for Proposals to the following 14 firms:

- 1. Abide International, Inc., Sonoma, CA
- 2. Ansari Structural Engineers, Inc., San Francisco, CA
- Brelje & Race Consulting Engineers, Santa Rosa, CA
- 4. GHD Inc., Santa Rosa, CA
- 5. HDR Engineering, Inc., Folsom, CA
- 6. Innovative Project Solutions Inc., San Francisco, CA
- 7. Kennedy/Jenks Consultants, Santa Rosa, CA
- 8. Kleinfelder, Santa Rosa, CA
- 9. OLMM Consulting Engineers, San Francisco, CA
- 10. Sage Consulting Engineers, Inc., San Francisco, CA
- 11. Stantec, Petaluma, CA
- 12. Water Resources Engineering, Inc., San Francisco, CA
- 13. West Yost Associates, Davis, CA
- 14. Woodard & Curran, Walnut Creek, CA

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The Request for Proposals was also posted on Sonoma County Water Agency and County of Sonoma Purchasing Department websites as well as the Small Business Administration and Minority Business Development Agency websites.

The four firms listed below submitted proposals:

- 1. GHD Inc., Santa Rosa, CA
- 2. Water Systems Consultants, Inc., Folsom, CA
- 3. HDR Engineering, Inc., Folsom, CA
- 4. West Yost Associates, Davis, CA

The following criteria, listed in order of importance, were used to evaluate each firm:

- 1) Professional qualifications and demonstrated ability to perform the work
- 2) Responsiveness to the work requirements
- 3) Exceptions to standard terms in the sample agreement
- 4) Thoroughness of proposal

West Yost Associates (Consultant) was selected to perform the work because Consultant has provided similar services for several other public agencies, Specific projects include: Union Sanitary District's "Twin Force Main Relocation," East Bay Municipal Utility District's "Pump Station M Rehabilitation and Forcemain Improvements," and Eastern Municipal Water District's "Cawston Lift Station Condition Assessment and Alternatives Analysis. These projects provided evidence of the types of work needed for the Project. Additionally, Consultant's approach, staffing plan, knowledge, and previous exposure to the Guerneville area provide the needed experience sought for leading up the Project. Finally, Consultant's local presence will provide quick response and a regional understanding of the importance of the Project.

District may seek to amend or enter into subsequent agreement(s) with Board approval if required, relying upon this competitive selection process, after the preliminary or initial work is completed for the Project.

# SERVICES TO BE PERFORMED

Under the proposed agreement, Consultant will perform condition assessments and design of headworks and lift stations improvements and design of the selected force main rehabilitation or replacement option to meet Regional Board requirements. This may include, but is not limited to, the following:

- 1) Collect, organize, and analyze existing condition information.
- Complete a force main hydraulics engineering analysis to identify recommended approaches to improve influent flow conditions and to help determine rehabilitation or replacement options; a condition assessment of the force main is not to be conducted.
- 3) Perform condition assessment of the headworks including equipment, structure, and site conditions.
- 4) Perform condition assessments of the 11 lift stations and appurtenances.
- 5) Develop improvement recommendations to address observed deficiencies at the headworks and lift stations, which may include new hydraulic strategies to optimize treatment plant operations.
- 6) Develop planning-level estimates of probable costs to implement recommended improvements to maintain facility service through planned service life.

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- 7) Conduct alternatives analysis to determine cost-effective and prioritized recommendations.
- 8) Develop designs for selected Project components.

The goals of the initial work (Phase 1) are to assess the physical condition and potential improvements to keep the headworks, lift stations, and force main operating through their remaining service life; prioritize any necessary rehabilitation/replacement; and develop preliminary designs and associated costs for each activity. Phase 2 of the Project will complete the design and construction of improvements identified in Phase 1 based upon available funding.

The cost of services will not exceed \$2,169,335; the term end date is June 30, 2028.

District reserves the right to amend the existing agreement or enter into subsequent agreement(s) with the consultant selected, relying upon this competitive selection process, after the preliminary or initial work is completed for the Project. This may include but is not limited to preliminary or initial design, feasibility study, final design, and engineering construction support services.

The agreement includes two options for District to extend this agreement for a period of one year each by providing written notice to Consultant thirty days in advance of the expiration date of the agreement and of the first extension option.

#### **Prior Board Actions:**

09/17/19: Approved resolution 19-0376 authorizing the General Manager to apply to the Clean Water State Revolving Fund on behalf of the Russian River County Sanitation District for this project's planning and construction applications at the District's facilities, execute financial assistance agreements, and carry out District's responsibilities under the agreements. Also approved resolution 19-0377 to authorize adjustments to the Board adopted budget for FY 19-20 for the planning project.

11/07/17: Approved resolution 17-0442 authorizing the General Manager to apply to the Clean Water State Revolving Fund on behalf of the Russian River County Sanitation District.

#### **FISCAL SUMMARY**

Expenditures	FY 21-22	FY22-23	FY 23-24
	Adopted	Projected	Projected
Budgeted Expenses		461,405	452,000
Additional Appropriation Requested	400,000		
Total Expenditures	\$400,000	\$461,405	\$452,000
Funding Sources			
General Fund/WA GF			
State/Federal	400,000	410,085	
Fees/Other		51,320	452,000
Use of Fund Balance			
Contingencies			
Total Sources	\$400,000	\$461,405	\$452,000

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# **Narrative Explanation of Fiscal Impacts:**

For Phase 1, year 1 of the recommended agreement, unused appropriations for the planning phase of this Project budgeted in FY 2020/2021 for the Russian River County Sanitation District Operations Fund in the amount of \$400,000 have been included in Sonoma Water's Q1 11/16/21 Consolidated Budget Adjustments. Offsetting grant revenue for the full amount of this agreement will be reimbursed by the State Water Resources Control Board under its Clean Water State Revolving Fund program.

FY 2022/2023 appropriations for Phase 1, year 2 will be budgeted in that fiscal year. While, phase 2 appropriations of \$1,307,930 for the agreement with West Yost to complete design and construct the Project will be budgeted in the fiscal year funding is available (estimated FY 2023/2024 through FY 2027/2028). FY 2023/2024 appropriations of \$452,000 for Phase 2, year 1 will be budgeted in that fiscal year. Total estimated Phase 2 project costs for final design, environmental review, and construction are estimated at \$9.6 million with \$7.2 million in offsetting state revenue (estimated FY 2023/2024 through FY 2027/2028).

Staffing Impacts:			
Position Title (Payroll Classification)	Monthly Salary Range (A-I Step)	Additions (Number)	Deletions (Number)

N/A

Attachments:

None

Related Items "On File" with the Clerk of the Board:

None