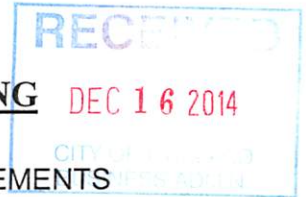


CITY OF VINELAND
DEPARTMENTAL REQUEST FOR PUBLIC BIDDING



1. NATURE OF REQUEST: WELL NO. 4 WATER TREATMENT IMPROVEMENTS

2. ENGINEER'S ESTIMATE: \$ 418,000.00
(If Engineer's Estimate has been prepared by anyone other than the person signing this form, please attach a copy of said Engineer's Estimate.)

3. AMOUNT BUDGETED FOR THIS REQUESTED ITEM: \$ 481,188.70

4. BUDGETED ITEM: YES NO
(If no, is it an ordinance authorized material, service or supply?)

YES NO ORDINANCE NO.: _____

(B) Please identify the page number and line item appropriation sub-account:

Budget Page No. _____ Account No. 003-0-43-80-8013-2-8023012

5. Check here if:

Federal Funds State Funds

UEZ Funds Davis Bacon Requirements

(If any of the above are checked, the project must be monitored by the department for compliance with prevailing wage rate policy and procedures.)

6. Date to be Advertised: 1/13/15

7. Date to be Received: 2/10/15

8. Date to be Awarded: 3/10/15

9. Special Conditions or Instructions: Funded by NJ DEP Site Remediation Program

10. The following must be attached:

Summary of Project

Specifications

Plans (if applicable)

Bidders Mailing List (with emails of the vendor)

11. Specifications Prepared by: GPM Assoc. Inc.
(NAME, TITLE AND EXTENSION NUMBER)

12. Approved by: _____
SIGNATURE (DIRECTOR, DEPARTMENT HEAD, SUPERVISOR)

Send copies to:
Purchasing Department
Business Administration



Well 4-Ethylene Dibromide

contamination project Summary

Background: Well No. 4 and TP004008 are a vital part of the water supply system for the City of Vineland Water Utility (“VWU”) and are necessary to maintain adequate pressures in the existing water distribution system in the central portion of the City. There is an existing 400,000 elevated water storage tank located on the property directly behind the existing treatment plant building. In March 2013, Ethylene Dibromide (“EDB”), also known as 1,2-Dibromoethane, a synthetic organic liquid mainly used in gasoline mixtures, was tested at the point of entry (“POE”) for TP004008 to be 0.0825 micrograms per liter (“µg/L”), or parts per billion (“ppb”), which is above the State and Federal Maximum Contaminant Level (“MCL”) of 0.05 ppb for this contaminant.

On March 25, 2013, following the initial MCL exceedance of EDB at Well No. 4, the State of New Jersey Department of Environmental Protection (“NJDEP”), Bureau of Safe Drinking Water (“BSDW”) required that the VWU conduct quarterly sampling and testing for EDB at Well No. 4, and on August 5, 2013, the BSDW issued a Notice of Non-Compliance once the Running Annual Average (“RAA”) for EDB was determined to have exceeded the MCL at Well No. 4. Immediately following the issuance of the Notice of Non-Compliance, the VWU issued a public notice for the non-compliance. On August 8, 2014, the VWU, utilizing a licensed LSRP, contacted the NJDEP and completed the appropriate Immediate Environmental Concern (“IEC”) forms and Initial Response Forms. Following completion of the IEC forms, Case No. 13-08-06-1042-49 was assigned by the NJDEP for Well No. 4. The City of Vineland proceeded with applying for funding with the NJDEP Bureau of Environmental Measurements and Site Assessment, seeking funding for the remediation of EDB for Well No. 4 (“Project”). On May 16, 2014, Contract ICU-RG2014-01 was executed between the NJDEP and the City of Vineland and on June 2, 2014, a Notice to Proceed was issued.

Proposed Treatment Equipment: The City of Vineland Water Utility (“VWU”) is proposing to treat existing Well No. 4 for removal of EDB by air stripping. G.P.M. Associates Inc. (“GAI”), engineering consultants for the Water Utility for this Project, have consulted with an air

Well 4-Ethylene Dibromide

contamination project Summary

stripping tower manufacturer, Delta Cooling Towers of Roxbury, New Jersey, who has confirmed that their Delta Model No. S9-230DAC air stripping tower (“AST”) system will provide at least 95% remove EDB from at Well No. 4, which will lower the EDB level in Well No. 4 to below the MCL of 0.05 ppb and thereby bring Well No. 4 back into Safe Drinking Water compliance. The AST equipment will be installed to replace the existing redwood slat tray aerator at TP004008, for the removal of EDB from existing Well No. 4. The new AST will, also, provide adequate removal of CO₂ from the pumped water from Well No. 4, and thereby eliminate the need to keep the existing aerator in service. The packed column air stripping tower system will be rated for 1,000 gallons per minute and will have a minimum air-to-water ratio of 187:1 and a maximum liquid loading rate of 15.7 gpm per square foot. The AST will be constructed of NSF 61, 5000 series aluminum and will have an internal cross-sectional area of approximately sixty-three point six (63.6) square feet and an overall height of approximately thirty-three (33) feet. The AST will be filled with a minimum of twenty-three (23) feet of polypropylene packing material. A distributor tray and re-distribution rings will be installed in the tower to provide even distribution of the water flow over the surface of the packing and to uniformly collect the exhaust air. A polypropylene mist eliminator will remove moisture from the air prior to release to the atmosphere.

A thirty (30) horsepower air blower will be provided and installed with the new AST and used to deliver approximately twenty-five thousand (25,000) cubic feet per minute (Acfm@) of air at 5-inches of water column static pressure into the tower. The intake for the air blower will be equipped with a corrosion resistant screen of greater than twenty-four (24) mesh and a set of inlet air filters to prevent insects and dust from being drawn by the blower. Louvers will be provided to protect the filters from the weather. In addition, an intake silencer will be provided and installed for outside noise reduction.

contamination project Summary

The new AST assembly will be installed directly on top of a new reinforced concrete foundation pad and located behind the existing treatment plant building, within the existing perimeter fence limits, between the treatment plant building and the existing elevated water storage tank. The existing Well No. 4 discharge pipe will be modified such that it is permanently disconnected from the existing redwood slat tray aerator and piped into the new 8-inch diameter AST influent line which will discharge into the top of the tower. The new 10-inch diameter AST outlet pipe will be located at the bottom of the AST and will be connected to new below grade ductile iron pipe that will be connected to the existing 8-inch diameter clearwell inlet line, as shown on the Plans, such that the pumped water, after air stripping, will discharge by gravity into the existing clearwell. Hydraulic flooding of the column could only occur if the influent flow rate is greater than what the effluent pipe for the air stripping tower can handle. The maximum influent flow rate into the air stripping tower is 1,000 gpm and the 8-inch diameter influent pipe is sized to accommodate this maximum flow rate. The air stripping tower effluent pipe that will be connected directly to the existing clearwell influent line is 10-inches in diameter and is sized to handle more than the maximum flow rate of 1,000 gpm. Therefore, the new air stripping tower system is designed with means to prevent hydraulic flooding of the column.

CITY OF VINELAND
DEPARTMENTAL REQUEST FOR PUBLIC BIDDING



1. NATURE OF REQUEST: ULTRASONIC WATER METERS

2. ENGINEER'S ESTIMATE: \$ 25,000.00
(If Engineer's Estimate has been prepared by anyone other than the person signing this form, please attach a copy of said Engineer's Estimate.)

3. AMOUNT BUDGETED FOR THIS REQUESTED ITEM: \$ 25,000.00

4. BUDGETED ITEM: YES NO
(If no, is it an ordinance authorized material, service or supply?)

YES NO ORDINANCE NO.: _____

(B) Please identify the page number and line item appropriation sub-account:

Budget Page No. _____ Account No. 003-0-43-80-8006-2-5023006

5. Check here if:

Federal Funds State Funds

UEZ Funds Davis Bacon Requirements

(If any of the above are checked, the project must be monitored by the department for compliance with prevailing wage rate policy and procedures.)

6. Date to be Advertised: 1/13/15

7. Date to be Received: 2/10/15

8. Date to be Awarded: 3/10/15

9. Special Conditions or Instructions: 1 YEAR OPTION TO RENEW

10. The following must be attached:

Summary of Project

Specifications

Plans (if applicable)

Bidders Mailing List (with emails of the vendor)

11. Specifications Prepared by: Michael Lawler
(NAME, TITLE AND EXTENSION NUMBER)

12. Approved by: _____
SIGNATURE (DIRECTOR, DEPARTMENT HEAD, SUPERVISOR)

Send copies to:
Purchasing Department
Business Administration ✓