

CITY OF CLINTON

MEMO

DATE: November 12, 2010

FROM: Arnold Adams, PW Director

TO: Grayson Bottom

RE: Capital Purchases

I am requesting approval for capital purchases for the Waste Water Treatment Plant.

In the current budget we have \$75,000.00 approved for water and wastewater treatment. To date we have spent \$28,085.00. Severn Trent has taken several quotes for these improvements. The following are the best quotes received:

1.) Cl2 and SO2 Inductor Pump -	\$13,020.00
2.) Waste Meter (Replaced) -	\$10,404.00
3.) Clarifier #1 and #2 Scum Pumps -	\$18,707.00
4.) Automatic Actuator on existing Waste Valve -	<u>\$5,500.00</u>
Total -	\$47,631.00

Sincerely,



Arnold Adams

		Wastewater Treatment Plant									
1	Item # 1	Cl2 and SO2 Inductor pumps	Cost \$ 13,020.00								
	✓	The two existing Chlorine pumps have failed and the SO2 pump is not working well. Quoted for the exact same pumps were received from Haynes equipment at cost of \$ 12,000 each. An alternate manufactory(GTI Sweet package) pump quote was obtained at a cost of \$ 5000.00 each. The alternate pump does the same work and has a good life. The pumps are required to meet compliance for effluent disinfection. Bids received Haynes is \$36,000 and low bid is Worth Hydrochem of Okla is \$13020.00. Installation is by plant staff.									
2	Item #2	Replace Waste Meter	Cost \$10,404.00								
	✓	The existing WAS meter is not function. For proper control of solids wasting the automated valve is needed. Bids were received from Worth Hydrochem of Okla and Haynes Equipment. Low bid was Worth at \$10,404.00 Installed.									
3	Item # 3	Replace Wasting pump and VFD	Cost \$91225.00								
		The one of existing WAS pump is not function and Both are to large for wasting off of the small clarifiers. The installation of a VFD will allow for better solids control by wasting at lower rate and longer duration. The existing pump pumps at rate of 1200 gpm. The wasting rate should be around 200 to 600 GPM. Bid were obtained from Haynes Equipment(\$91,225 Installed) and HRM Enviromental (\$60,197 Material only). After adding in instillation cost Haynes Equipment is low Bid.									
4	Item # 4	Clarifier 1 & 2 Scum pumps	Cost ^{18,707} \$27307.00								
	✓	The one of existing Scum pumps ais not Functioning and the second trips out almost every day. The guide Rails have deteriorated to point they have broken off. The sump pumps are required for operation of Clarifer 1 and 2. Bids were received by Haynes Equipment and HRM enviromental. Haynes bid labor and material and HRM only bid material. Haynes Equipment total cost was \$29,890.00 installed. Using Material cost from HRM Ennvronmental of (\$15,307.00)and adding labor cost (\$12,000)for installation For total cost (\$27307.00) . Low Bid would be use of equipment from HRM Enviromental.									
5	Item # 5	Replace Automatic Acturator on existing valve Waste Valve.	Cost \$5500.00								
	✓	The existing Automatic Valve Acturator is Not function. For proper control of solids wasting the automated valve is needed. Bids were obtained from Worth Hydrochem and Haynes Equipment. Low bid was received from Haynes equipment. Materials only. Plant staff will install acutator.									
6	Item # 6	Roof on Supernatant building	Cost \$6,200.00								
		The exist roof on the supernatant building has detereated to point that wood joist have failed and open holes exist. It is recommended that a pitched roof be installed with mental roofing. The life of this type of roof would be longer and require less continued maintenance. Bid was received from Trey Arney Construction.									
7	Item #7	Fresh Air Vent Raw water	Cost \$4,200.00								
		The existing Fresh air vent for the influent Wet well has deteriorated to the point that it is non functional. The vent removed H2S gas from the wet well thus protecting the other equipment from the corrosive environment. Bid was received from Artic Air of Clinton. Installed by Artic Air.									
8	Item # 8	Filter Valve automatic Actuators and controls	Cost \$70821.00								
		The exist controls and actuators on the filters are non working. A back wash has to be done manually by opening the valves by hand. Bid was received from Haynes Equipment, This is a sole source Item.									
9	Item # 9	Replace Automatic Gate Operator	Cost \$5000 .00								
		The Existing Gate operator is not functioning and not repairable. The gate operator is necessary for security of the plant site. Bid was received from Clinton Overhead Door.									
10	Item # 10	Replacement of damaged diffusers	Cost \$14,939.00			Materials					
		The City purchased enough diffusers to replace two cell of the aeration basin, If the energy audit by Honeywell is not implemented and two the other two cell not retrofitted then the last two cells need the diffuser membrane replaced. The loss of air and poor mixing affect the treatment capacity of the aeration basins. Diffusors material bid was received from Siemens Water Technologies. Installation will be by plant staff.									
11	Item # 11	Air Supply Piping	Cost \$ 19,000 Materials			Cost \$ 20,183.00 Labor					