# **Bethel Oaks Subdivision Wastewater System**

COMPONENT	QTY	AVERAGE LIFE	REPLACEMENT COST PER UNIT
<u>DUPLEX LIFT STATION</u>			
Hydromatic S 4HX Centrifugal Nonclog Solids Handling Pumps or equal	2	7 - 10 Yrs	7,000.00
Control Panel *	1	30 Yrs	16,000.00
TREATMENT SYSTEM			
25K Fiberglass Primary Settling Tank	1	30 Yrs	32,000.00
8K Fiberglass Equalization Tank	1	30 Yrs	9,700.00
EQ Pump #SE411 or equal	2	5 - 7 Yrs	466.00
Bioclere Model 36/30 Trickling Filter Treatment Plant	1	30 Yrs	58,000.00
Bioclere Control Panel	1	30 Yrs	5,000.00
Recirulation Pump Goulds 1DW51E1EA or equal	1	5 - 7 Yrs	630.00
Dosing Pumps Goulds 1DW51E1EA or equal	2	5 - 7 Yrs	630.00
Junction Box	1	7 - 10 Yrs	236.00
Fan Grainger 4C720 or equal	1	5 - 7 Yrs	
Post Secondary Lift Station Pumps # SE-411	2	5 - 7 Yrs	466.00
Lift Station Control Panel *	1	30 Yrs	1,500.00
8K Fiberglass Final Settling Dosing Tank	1	30 Yrs	15,175.00
Effluent Pump #5032-0007 or equal	4	7 - 10 Yrs	420.00
Geoflow Dripline #WF-PC 16-2-24 or equal	66,000 LF	15 - 20 Yrs	0.32
Replacement Screen AP SCR 1.5/2F-100M	2	3 - 5 Yrs	94.77
Headworks Box #WHW ULTRA 2F-A	2	15 - 20 Yrs	2,045.00
Flow Meter #M70	2	5 - 7 Yrs	150.00
Drip System Control Panel *	1	30 Yrs	3,365.00
EZ3 6" Color HMI Touch Screen	1	7 - 10 Yrs	500.00

<sup>\*</sup> Control Panels have an extensive list of parts used in the design of the panel and can be replaced on an as needed basis to keep the panel fully operational. The price listed above is for a complete new panel

## Nonmunicipal Domestic Sewage Treatment Works Trust Fund Requirement Form

Permittee (Legal) Name: Bethel Oaks Property Owners Association, Inc.

Facility Name: Bethel Oaks Subdivision

Permit No. <u>4875-WR-3</u>

# Section A - Information Requiring Engineering Certification

## Part I – Operating and Maintenance Expenses

	Units/Year	Unit Cost	<b>Annual Cost</b>	5-Year Cost <sup>1</sup>
Operating Expenses				
Operating Labor <sup>2</sup>	12	350.00	4200.00	22260.00
Electricity <sup>3</sup>	12	188.00	2256.00	11956.00
Supplies & Chemicals	6	100.00	600.00	3180.00
Analytical Testing	12	185.00	2220.00	11766.00
Generator Fuel	Not Applica rented			
Other	None			0
Maintenance Expenses				
Maintenance Labor <sup>2</sup>				1000.00 Sludge removal
Parts & Supplies				1000.00 Replacement Parts
Other	None			0
Administrative Expenses				
Administrative Labor <sup>2</sup>	Include			
Customer Fee Collection	0			0
Insurance & Bonding			360.00	1908.00
Consulting and Legal Fees	0 *NWA Uti of the	0		
Interest Expenses	0			0
Property Taxes	0 *See attached Washington County Report			0
Permit Fees *To be updated once the trust fund contribution fee has been finalized		-	500.00	2650.00
Other Miscellaneous Expenses Mowing Dripfield	7	450.00	3150.00	16,695.00
TOTAL				72,415.00

Assuming no inflation data are available, assume an inflation rate of 3% in years two through five and multiply the annual cost by 5.3 to estimate the five-year cost.

Labor costs must include fringe benefits and payroll taxes.

For existing facilities, include historical data if they are representative of future operations. For new facilities, show the electricity consumption calculations in kilowatt hours (kWh).

From: McWilliams, Katherine
To: Deardoff, Amy

**Subject:** FW: 4875-WR-3 and 4890-WR-2

Date: Wednesday, November 29, 2017 8:11:51 AM

Attachments: Bethel Oaks Equipment Breakdown for ADEQ Permit Renewal.pdf

NDSTW Trust Fund Requirement Form Bethel Oaks.pdf

Importance: High

#### 4875-WR-3 Communication RE deficiencies

From: Kathy Bartlett [mailto:kathy@aquatechsys.com]

Sent: Monday, November 27, 2017 3:40 PM

To: McWilliams, Katherine

Subject: RE: 4875-WR-3 and 4890-WR-2

Importance: High

#### Hi Katherine

Before the engineer and I finalize this submittal for the deficiencies, would you please look at it and let me know if this will suffice.

#### Thanks

Kathryn Bartlett
Internal Operations Manager
NWA Utility Services, Inc
www.nwautilityservices.com

Direct: 479-530-5926

From: McWilliams, Katherine [mailto:MCWILLIAMSK@adeg.state.ar.us]

Sent: Monday, November 20, 2017 9:00 AM

To: Kathy Bartlett

**Cc:** Byrne, Timothy; Solaimanian, Jamal **Subject:** RE: 4875-WR-3 and 4890-WR-2

### Kathy,

The form requires that the wastewater treatment plant must be examined by a Professional Engineer registered in the State of Arkansas to determine all necessary capital expenditures, system upgrades, or significant repairs which may be needed within the following five (5) years. A list of all of these items must be attached to this document.

The information previously submitted does not provide a list or address the items that **may be needed within the following five (5) years**. The submitted information only provides that the system is currently functioning as designed and that no planned upgrades or necessary capital expenditures. The requested information will provide a list of all necessary capital expenditures, system upgrades, or significant repairs which **may be needed within the following five (5) years.** 

Regarding 4890-WR-2, the projected build of the subdivision is information that should be available to you as the designer of the wastewater treatment system. In the case that this information is not available, provide estimated rooms per connection based on your already designed system on a worst case basis.

Thanks, Katherine McWilliams Engineer ADEQ, Office of Water Quality 501-682-0651

From: Kathy Bartlett [mailto:kathy@aquatechsys.com]

Sent: Thursday, November 16, 2017 1:48 PM

To: <a href="mailto:byrnet@adeq.state.sr.us">byrnet@adeq.state.sr.us</a>
Cc: McWilliams, Katherine

Subject: FW: 4875-WR-3 and 4890-WR-2

Katherine and Tim

I would just like some clarification from you both on the renewal and transfers please

In regards to the deficiencies both letters state that the NDSTW Form is incomplete. However the language I read in the NDSTW form I was given to use is as follows:

- The wastewater treatment plant (WWTP) must be examined by a Professional Engineer registered in the State of Arkansas to determine all necessary capital expenditures, system upgrades, or significant repairs which may be needed within the following five (5) years. A list of all of these items must be attached to this document.
- A milestone schedule for completion of the capital expenditures, system upgrades, or significant repairs *must be attached to this document*.

Am I missing something here? I do not see any wording relative to the deficiencies explanation under Part II Capital Expenditures. Is there a revised form that I do not have? I could not find anything under the forms on the ADEQ website

Regarding 4890 WR-2, the deficiencies for Part III Financial Plan, I can get the number of bedrooms for the existing homes on the system. I included the projected build out in the table provided. Are you also looking to have the number of bedrooms for the new homes in the future? That would be unrealistic to ask for in my opinion.

Thank you for your input and comments, I appreciate it very much

Regards

Kathryn Bartlett Internal Operations Manager NWA Utility Services, Inc

## www.nwautilityservices.com

Direct: 479-530-5926

**From:** Deardoff, Amy [mailto:DEARDOFF@adeq.state.ar.us]

Sent: Thursday, November 16, 2017 8:35 AM

To: kathy@aguatechsys.com

Cc: Byrne, Timothy; McWilliams, Katherine Subject: 4875-WR-3 and 4890-WR-2

## Ms. Bartlett:

Please see the attached letters. Barring technical glitches, these letters should appear on the website tomorrow, 11/17/17.

If you have any questions, the contact information is below:

4875-WR-3: Katherine McWilliams / 501-682-0651 / mcwilliamsk@adeq.state.ar.us

4890-WR-2: Timothy Byrne / 682-0648 / byrnet@adeq.state.ar.us

Thank you,

Amy Deardoff P: 501-682-0650 F: 501-682-0880