

# Poughkeepsies' Water Treatment Facility

## MEMORANDUM

June 3, 2018

**To:** Joint Water Board  
**From:** Randy J. Alstadt, P.E.  
Water Plant Administrator  
**Subject:** May 2019 Status Report

### Water Quality/Production Issues

The May average daily raw water flow was 10.47 MGD compared to 10.43 MGD in April 2019 and 11.03 MGD in May 2018. Water quality averaged 0.04 NTU which is 0.01 NTU less than April 2019. The drinking water maximum contaminant level is 0.30 NTU.

### Plant Update

Plant operated well. The solids thickener had 6.5 feet of solids at the end of April compared to 2.5 feet at the end of March 2019. Centrifuge average operating rate was 10.9 gpm compared to 13.0 gpm in March 2019.

#### Treatment Process Comparison April 2019 vs. May 2019

Parameter	April-19			May-19		
	Average	Maximum	Minimum	Average	Maximum	Minimum
Raw Flow, MGD	10.43	12.01	8.69	10.47	11.27	8.52
Raw Turbidity, NTU	49	359	11	51	185	12
Effluent Turbidity, NTU	0.05	0.07	0.03	0.04	0.07	0.03

#### Sludge Process Comparison April 2019 vs. May 2019

Parameter	Apr-19	May-19	Change	
			Quantity	Percent
Residual Solids, gallons	774,536	962,270	187,734	24%
Backwash, gallons	1,298,000	1,523,000	225,000	17%
Thickener, gallons	340,258	322,631	(17,627)	-5%
Plate Settler, gallons	21,607	23,945	2,338	11%
Centrifuge #1 gallons	253,581	250,679	(2,902)	-1%
Centrifuge #2 gallons	131,252	322,884	191,632	146%
Centrifuge Total	384,833	573,563	188,730	49%
Centrifuge #1 gpm	12.1	13.0	0.9	7%
Centrifuge #2 gpm	9.6	13.4	3.8	40%
Solids Hauled, tons	274.54	401.84	127.3	46%
Feed Solids Concentration	6.2	6.2	(0.0)	0%
Centrifuge #1 Cake percent	32.5	32.5	0.0	0%
Centrifuge #2 Cake percent	34.5	32.8	(1.8)	-5%

Our ozone system ran well. Basin #2 remains out of service to reduce liquid oxygen consumption.

Filters ran well. Average filter runs have returned to prior upgrade. Filter runs in May were 19,978 gal/ft<sup>2</sup> compared to April 2019 which was 21,488 gallons/ft<sup>2</sup>. This is a reduction of 7 percent. We will continue to monitor this trend.

Maintenance is changing out the sodium hypochlorite pumps.

Low Lift Pump #4 failed and has been shipped to repair shop.

River Intakes were inspected. Screens were found in good shape. Plastic shopping bags, small amount of zebra mussels and soft growth were removed.

**Upgrade**

Trailer manufacturing is continuing. We expect first trailer to be delivered in August 2019.

PLCs are now being constructed by Smith Controls. Projected completion date is August 2019. Installation documents are complete and need to be bid. Project is expected to be completed in early 2020.

**UV Replacement**

City and Town are establishing funding for project.

**Staffing**

Kevin Etts was hired to fill the position of Maintenance Mechanic on May 28<sup>th</sup> .