WPCA COMMUNICATIONS AND REPORTS

September 7, 2021

The following is a monthly report from the Superintendent of Pollution Control as an appendix to the Water Pollution Control Authority meeting.

General Information

American Rescue Plan Act

The Town of South Windsor has been allocated \$7,742,660 of ARPA funding, of which the Town Manager has allocated \$2.5 million for sewer capital improvement projects. The funds need to be expended by December 31, 2024. Prior to our knowledge of how much funding was going to be appropriated a priority list consisting of \$6.0 million in sewer projects was prepared. The priority list has been revised to encompass the \$2.5 million budget and will be presented to the WPCA for consideration and approval.

Residential Sewer User Billing List

The residential billing list has been reviewed and Quality Data Services is currently preparing the bills. Residential bills will be mailed out the last week of September with an October 1st due date.

Clark Street Sewer Conflict Repair

During a routine preventative maintenance inspection on Clark Street our team discovered a water service lateral running through a 12" sewer main. MDC was immediately contacted and they relocated the water service.





Tax Sale

The Collector of Revenue held a tax sale August 25th. A total revenue of \$1,442,118 has been collected which includes taxes, interest, sewer fees, and lien fees all payable to the Town since the commencement of the sale. Final revenues from the sale will be reported at the end of September.

Weather Events

A significant amount of time and energy was spent dealing with high flows and strong thunder storms that brought heavy winds in July. On two occasions tree limbs fell across Vibert Road bringing down wires. It took 8-12 hours for Eversource to have the limbs removed. The Public Works Department has been working with Eversource and the land owners to have the trees lining the road removed to prevent any further damage and road closures.







The July storms also brought high flows to the treatment plant. The peak instantaneous flow during the month was 9.3 million gallons; our average daily flow is 2.5 million gallons. August brought heavy rain with Tropical Storm Henri and remnants from other large Atlantic storms causing extremely high flows for the month.

Both the operations and maintenance teams did a great job preparing for the storms. All the available tanks and pumps were put on line at the treatment plant and pump stations. Though we did not meet the water quality discharge numbers that are typical for our facility we were able to contain the solids within the treatment plant producing the best water quality possible with the flows we were experiencing.

Treatment Plant and Collection Systems

Treatment Plant

Process

TREATMENT PLANT	Aug-19	Sep-19	Oct-19	Nov-19	Dec-19	Jan-20	Feb-20	Mar-20	Apr-20	May-20	Jun-20	Jul-20
AVG FLOW (MGD)	2.12	2.03	2.11	2.21	2.93	2.84	2.82	2.74	2.93	2.70	2.19	2.10
BOD REMOVAL	99.0%	99.0%	98.0%	99.0%	98.0%	99.0%	99.0%	99.0%	97.0%	98.0%	99.0%	98.8%
TSS REMOVAL	99.0%	98.0%	98.0%	99.0%	99.0%	99.0%	99.0%	99.0%	98.0%	98.0%	99.0%	98.9%
NITROGEN LBS. (106 LBS. LIMIT)	82.00	88.00	81.00	86.00	103.00	104.00	87.00	96.00	126.00	108.00	82.00	95.00

Maintenance

June

- Successful audit response for Enel X Demand Response program which will result in full payment for the Spring Season.
- Completed cleaning, inspection, and repair of Aeration Basin 1. This included replacing rotting base plates and 2 broken sections of air piping.
- Extended chemical feed piping on top of sludge storage to tank 3 for oxidizing odor control chemical.
- Replaced control switch on Influent Pump 2.
- Completed gear reducer oil changes on primary clarifiers, secondary clarifiers and gravity thickener drives.
- Installed dedicated davit bases on all 3 Primary Clarifiers for permanent fall protection.
- Repaired broken section of inner ring on Secondary Clarifier 3 and repaired broken hinge on cover for Clarifier 1.

July

- Responded to numerous emergency events related to severe thunderstorms with power outages at pump stations and trees down on wires at the Treatment Plant. Our dedicated operators were able to keep both the Plant and Pump Stations operating properly under very difficult conditions.
- We spent a significant amount of time preparing for and responding to Tropical Storm Elsa. This included staging equipment all over town, checking and cleaning problematic sewer lines, and making many operational changes to deal with unprecedented high flows.
- Completed offline Gravity Thickener inspection and repair.
- Installed dedicated davit bases on all 4 Secondary Clarifiers for permanent fall protection.
- Performed Headworks Wash Press Annual Maintenance.

 Continued to work with Tighe and Bond during Site Visit #2 for the Odor Control Study.

August

- Responded to emergency events involving remnants of Tropical Storm Fred and Henri. This required a significant effort at the treatment plant, pump stations, and the collection system.
- Completed inspection and repair of Secondary Clarifier 1.
- Repaired failing pump rail system for the Odor Control Leachate Pump Station.
- Cleaned, inspected, and made repairs on both Aerated Grit Chambers.
- Repaired broken sodium hypochlorite pump and associated piping.
- Repair of Filtrax pumping system and ammonia probe.

Collection System

COLLECTION SYSTEM	Aug-20	Sep-20	Oct-20	Nov-20	Dec-20	Jan-21	Feb-21	Mar-21	Apr-21	May-21	Jun-21	Jul-21
CCTV (FEET)	23,128	58,045	9,992	5,223	14,848	6,544	7,100	8,621	2,977	4,077		0
Contracted CCTV	0	13,744	17,617	20,392	0	3,374	0	21,414	18,569	10,254		0
CLEANING (FEET)	27,458	65,099	28,250	25,000	10,000	3,000	4,500	7,251	22,000	12,300		2,200

June

- Replaced repeater battery at Police Department for SCADA radio communication
- Cleaned and replaced worn parts on Benedict Drive Pump Station check valves.
- Degreased Benedict Drive wet well, serviced air vents and vaccum reliefs.
- CCTV work on Clark Street Sewer Lines.
- Line cleaning on easement in Deming area and side streets in Benedict Drive neighborhood.

July

- Replaced damaged radio antenna at Route 5 Pump Station.
- Cleaned wet well and performed valve maintenance at Route 5 Pump Station.
- Repaired water pump and piping on jet truck.
- Degreased and degritted Rye Street and Clark Street Pump Stations
- Inspected Sewer easements and assessed for storm damage.
- Performed a portable generator exercise at Route 5 and Ellington Rd Pump Stations.

August

- Repaired failing pump rail system at Quarry Brook Pump Station.
- Degreased Benedict Drive Wet Well.
- Inspected easements for damage following Tropical Storm Henri.
- Worked with Mobile Robotics to camera sewer system in Quarry Brook area neighborhoods.

- Plugged storm sewer connection into sanitary manhole on Oakland Road that was leading to excessive flows through the pump stations and at the Treatment Plant.
- Responded to two separate Eversource Demand Response Events to shed Commercial Power onto Generator Power.
- Worked with Cox Communications to replace Treatment Plant security cameras.
- Worked with Aaron Associates to continue to move forward with SCADA system upgrade.

Capital Improvement Projects Update

Clark Street, Benedict Drive, Pleasant Valley Pump Station Upgrades

- Arcadis continues to work on 30% design
- The draft Basis of Design was submitted for review by WPC staff
 - Staff feed back was provided to the engineers
- Arcadis met with Town staff on two separate occasions to discuss the Basis of Design report and the feedback from the operators.

Next Steps:

- Engineer to perform Connecticut Environmental Policy Act (CEPA) Permit Review
- Project design phase
 - Complete 90% design (est. 36 weeks from the January 4, 2021 NTP).
- Submit design to DEEP for review and approval (min. 90 day review)

Phase IV Part 1

• This project has been approved with the FY22 WPCA budget and will include the lining of sewer pipe and rehabilitation of manholes. The line item budget is \$750,000.

Collection of Sewer User Fees and Delinquent Accounts

June

In accordance with the SOP, seventeen commercial sewer liens were placed on the land records. Alias tax warrants have been issued to interested Constables and State Marshal on or before August 15. They have 60 days to collect per state statute.



Commercial Sewer User Collection Rate = 98.27% Residential Sewer User Collection Rate = 99.00%

August

Commercial Sewer User Collection Rate = 98.31% (Last year at this time 97.36%) Residential Sewer User Collection Rate = 99.07% (Last year at this time 97.64%)

Respectfully submitted by: Tony Manfre, Superintendent of Pollution Control