Town of Murphy

Wastewater Treatment Plant Annual Report

July 2019- June 30, 2020

Prepared: July 17, 2020

Town of Murphy
P.O. Box 130
Murphy NC 28906

Mayor- Rick Ramsey – 828-837-2510 ext. 3

Town Manager- Chad Simons – 828-837-2510 ext. 4

WWTP ORC- Tyler White – 828-557-1267

WWTP Permit # NC 0020940

1) Description of system of Treatment Process

The Town of Murphy Wastewater Treatment Plant (WWTP) utilizes a 1.4 MGD biological treatment process that includes two 730,000-gallon sequencing batch reactors (SBR), a 175,000-gallon post equalization basin, a chlorine contact basin which uses sodium hypochlorite for disinfection and a dechlorination basin which uses sodium bisulfite for dechlorination. The headworks consist of one mechanical bar screen and one manual bar screen bypass channel used as needed. There are two digestors that are combined 300,000-gallons which feed into a ¾ meter Phoenix belt press for dewatering. There is one Grundfos pump that is used to transfer the sludge to the belt press. The backup power system is for the treatment plant is a 300KW Spectrum Detroit Diesel generator with an automatic transfer switch. The influent pumps used to feed the treatment plant are two 100HP submersible pumps with dual high level alarms and SCADA system.

2) System Performance

The following summary of performance for the year July 2019 through June 30th 2020. The system was in continuous operation for the time period reported. The was no major breakdown of equipment.

Violations of permit conditions and parameters

July 2019- No Violations

August 2019- No Violations

September 2019- No Violations

October 2019- Fecal Coliform Monthly Limit Exceeded Due to >250,000 Gallons of Septic Waste hitting both SBR's

November 2019- No Violations

December 2019- No Violations

January 2020- Fecal Coliform Monthly Limit Exceeded Due To Heavy Rain Fall

February 2020- No Violations

March 2020- No Violations

April 2020- No Violations

May 2020- No Violations

June 2020- Chronic Toxicity Test Failed Due To SBR's Dying

There were no bypass or spill violations.

3.) Notification

The Town of Murphy will notify if there are any.

4.) Certification

I certify under penalty of law that this report is complete and accurate to the best of my knowledge. I further certify that this report has been made available to the users or customers of the named system and that those users have been notified of its availability.

Tyler White, WWTP ORC

Date