

August 30, 2024

South Haven Area Water-Sewer Authority Wastewater Treatment Plant Improvements, CWSRF #5804-01 Project Update

Project Background

The South Haven Area Water-Sewer Authority (SHAWSA) is currently working with F&V Construction on improvements to the Wastewater Treatment Plant (WWTP). The project is being completed to replace critical assets identified as part of the WWTP's Asset Management Program (AMP) to maintain reliable operation and reduce operating costs.

The project scope includes the following major work items:

- Aeration system improvements including:
 - High efficiency turbo blower
 - New aeration piping
 - Control system to improve treatment and reduce energy costs.
- New clarifier flow split structure
- New Ultraviolet (UV) disinfection system
 - Reduce operating costs and chemical usage
- Demolition of the existing chlorine contact tank and chemical feed building
- Replacement of the digester boiler

The project is being financed by the Clean Water State Revolving Fund (CWSRF) and received a \$3.64 million grant. Construction is scheduled to be complete in Summer 2025.

Progress to Date

Aeration System:

- Demolition of existing blower
- Temporary blower manifold installed and connected to remaining blowers

Clarifier Flow Split Structure:

- Excavation and shoring for the structure is complete
- Auger cast piles have been installed
- Base slab has been formed and completed
- Structure wall have been formed

UV Structure:

- Excavation for structure has been completed
- Auger cast piles are currently in progress and will be completed in Early September.

Boiler:

- Digester boiler has been removed
- Two replacement boilers have been installed along with new pipe connections and valves



UV Structure Auger Cast Piles



Digester Boilers

Upcoming Work

Aeration System:

- Turbo blower and valves scheduled to arrive in September
- Install turbo blower
- Replace existing aeration system piping and valves
- Control panel and instruments installation and startup
- Replace doors and lights on the existing building
- Replace building exhaust fans

Clarifier Flow Split Structure:

- Place walls
- Install weir gates
- Install FRP Grating
- Install site piping and timber support piles
- Backfill and grade around the structure

UV Structure:

- Complete concrete work for the structure
- Complete site piping and installation of timber support piles
- Install UV equipment and controls
- Install UV Structure Canopy
- Demolish existing chlorine contact tank and chemical feed building

Digester Boiler:

- Complete startup and put the system online
- Painting



Flow Split Structure Construction



Chlorine Contact Tank to be Demolished



Chemical Feed Building to be Demolished