# Water Treatment Improvements



# **Funding Request:**

**\$1,150,000** for predesign and design work necessary for the construction of a new water treatment facility to provide clean drinking water to residents and address water quality issues, including high levels of manganese.

### **Background:**

On February 9, 2022, a health risk advisory was received from Minnesota Department of Health for having a high level of manganese in our drinking water system. While our drinking water complies with the Safe Drinking Water Act standards, recent testing indicates that the City's water has high levels of manganese greater than the MDH recommended Health Based Value (HBV). Children and adults who drink water with high levels of manganese for a long time may have problems with memory, attention, and motor skills. Infants may develop learning and behavior problems if they drink water with too much manganese in it. We engaged Bolton and Menk in the fall of 2020 to complete a water system study to investigate water quality issues related to ongoing color and odor complaints received from residents, but were not aware at that time of the more urgent need to treat our water in order to address high levels of manganese.

#### **Need for Improvements:**

We cannot treat manganese with our current system, which consists of two active wells, one elevated storage tank, and a distribution system. A new water treatment facility is needed which would consist of the construction of a new well and well house, a treatment facility with aeration and detention for iron oxidation, the use of potassium permanganate for manganese oxidation, filtration for iron and manganese removal, chlorine for disinfection, as well as the addition of fluoride and a corrosion inhibitor. A request for placement on the Drinking Water Revolving Loan Fund 2022 Intended Use Plan for



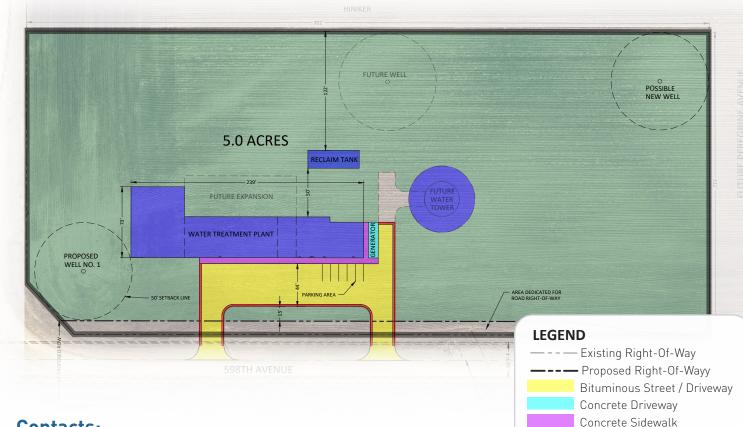
water treatment improvements was submitted to the Department of Health DWRF Program and MN Public Facilities Authority in April of 2021.

## **Overall Project Cost:**

Eagle Lake is looking at an overall total project cost of \$12,500,000 to construct a new water treatment facility. An option to purchase land needed for the water treatment facility has been secured and a concept plan completed for the site.

## **Project Schedule:**

Planning and Design - June 2023 through March 2024, with the goal to begin construction in the summer of 2024 and the facility online by the spring of 2026.



#### **Contacts:**

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Concrete Curb & Gutter

Water Structure

Greenspace

Eagle Lake is in Blue Earth County, Minnesota Current Population: 3,278 Legislative Districts: MN House – 18B, MN Senate - 18