City of Columbia Council Work Session

McBaine Water Treatment Plant Improvements Update

Monday, June 1, 2018



Current Status

- Proposals for Design Services Received on April 24, 2020
- Consultant Interviews conducted on May 29, 2020
- Interview committee will select a consultant then negotiate fee and scope
- After an agreement is reached it will be presented to Council for approval

Water Treatment Plant Upgrade-Phase 1

Plant rehabilitation\improvements

- Restoration of plant capacity including elimination of hydraulic bottlenecks
- Replacement of Primary Basin Equipment
- Chemical feed improvements
- Addition of recarbonation
- Filter and high service pump modifications to establish constant rate filtration
- Complete electrical upgrades including a new service entrance
- SCADA upgrades including automation of the City's water system
- Replacement of instrumentation
- Replacement of HVAC
- Roof Replacement

Water Treatment Plant Upgrade-Phase 1

- Further alternative treatment analysis
 - The intent of this task is to address advanced treatment options or additions to the City's existing treatment processes. The Alternative Treatment Analysis shall further evaluate options identified in previous studies and reports. This analysis shall serve as a planning component for future phases of improvement at the City's McBaine Water Treatment Plant.

Water Treatment Plant Upgrade-Anticipated Timeline

Fall 2021-Design Completion

- Winter 2021-Permiting complete and project ready for construction bidding
- Fall 2024-Construction Complete

Water Treatment Plant – Aerator Replacement

- Bids are currently due June 5, 2020 (Bid date was extended due to Covid-19)
- Staff recommends incorporating this work with the Water Treatment
 Plant Upgrade Project.
- The primary issue with the existing aerators is the supply piping which can be repaired

