Environment Committee

Meeting date: September 11, 2018

For the Metropolitan Council meeting of September 26, 2018

Subject: Hopkins L27 Lift Station Construction Contract Additional Change Order Authority

District(s), Member(s): District 5, Steve Elkins Policy/Legal Reference: 3-3, Expenditures

Staff Prepared/Presented: Jeannine Clancy, 651-602-1210

Division/Department: MCES c/o Leisa Thompson, 651-602-8101

Proposed Action

That the Metropolitan Council authorizes an increase in the General Manager's delegated construction contract change order authority for the Hopkins L27 Lift Station project from \$1,216,740 to \$2,149,740, MCES Project 804126, Contract 16P001.

Background

In May 2016, a construction contract in the amount of \$12,167,400.00 was awarded to Rice Lake Contracting Group (RLCG) to construct the new L27 lift station located in Hopkins. The scope of work is to construct a 6.3 million gallons per day (mgd) lift station by sinking a 61-foot diameter caisson over 63 feet deep, constructing a 2,430 square foot lift station building, install all pumping equipment and piping, constructing new sewer connections to the existing City system, constructing new force main, restoring the new site, and demolishing the existing L27 lift station.

Due to the proximity of bedrock and the indications of potential obstructions from the geotechnical investigation during design, four large diameter (48-inch) pilot borings were constructed in August 2016 by the contractor to better quantify the possible obstructions by boulders and cobbles. Conditions were found to contain numerous boulders and cobbles throughout the drill depth. The engineering staff selected to use an option within the contract bid to pre-drill the entire circumference of the caisson in an effort to clear out obstructions.

Pre-drill work commenced in September 2016. The pre-drill work consisted of 46 6-foot diameter steel cased auger borings driven to full caisson depth and backfilled with sand. RLCG experienced many difficulties in attempting to advance the auger borings including advancement refusal, broken equipment, and extended time to complete the effort. The work was completed in February 2017. The delay impacted the start time for RLCG to initiate construction of the caisson.

During design, areas nearby the site were found to contain peat and soft soils. The contract documents conservatively approached ground water pumping at the site to limit the potential settlement of surrounding properties. The strategy was to clam-out the wet material from the caisson to limit dewatering. As the caisson construction proceeded in depth, the ability to perform this work was compromised by the same hard ground conditions experienced during the pre-drilling work. The strategy was revised in September to allow groundwater dewatering with daily groundwater checks and settlement monitoring. RLCG completed the sinking of the caisson in May 2018.

Both of these situations have resulted in proposed change orders that are due to differing site conditions. The costs associated with the proposed change orders are \$933,000 for the additional items:



- Additional time required to pre-drill the site
- Delays in starting caisson construction
- constructing additional dewatering systems
- and delays due to removal of hard ground within the caisson

The proposed changes are significant in costs and scope as to exceed the typical expectation for use of the General Manager's delegated change order authority. This request is to add these two items to the General Manager's change order authority while retaining the existing change order authority amount to cover the usual construction contract changes.

Rationale

Policy 3-3 requires Council authorization prior to exceeding the General Manager's delegated change order authority.

Thrive Lens Analysis

This request sets back the Thrive Outcome for stewardship due to the impact to financial resources; however, improves the Thrive Outcome for sustainability in meeting the City's need for improving storm water infrastructure and providing successful construction of Council's wastewater facilities.

Funding

Approximately \$4.2 million remain unencumbered on a budget of \$31 million for the Hopkins System Improvements.

Known Support / Opposition

There is no known opposition.