



# Agenda Item

## City Council

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Item #: 3.3.

1/28/2025

File #: 25-0014

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**TO:** Honorable Mayor and Members of the City Council

**THRU:** Tom Kisela, City Manager

**FROM:** Christopher Cash, Public Works Director

### 1. SUBJECT

First Amendment to Agreement with Tetra Tech BAS, Inc. for conducting ground surveying, geotechnical monitoring at Reservoir 2A site, and providing structural evaluation of the reservoir.

### 2. SUMMARY

This amendment authorizes Tetra Tech BAS, Inc. to provide professional geotechnical services to evaluate ground condition, collect and analyze inclinometer and piezometer instrumentation readings, monitor and map perimeter wall cracks, and provide structural evaluation of the reservoir.

### 3. RECOMMENDED ACTION

Approve the First Amendment to agreement with Tetra Tech BAS, Inc. in the amount of \$95,605 for conducting ground surveying, geotechnical monitoring at Reservoir 2A site, and providing structural evaluation of the reservoir; and authorize the Mayor and City Clerk to execute on behalf of the City.

### 4. FISCAL IMPACT

The expense for this amendment is \$95,605 and will be funded through Water Fund (600):  
600.8011.51620.00000 Engineering Services

### 5. STRATEGIC PLAN GOALS

Goal 5: Improve Infrastructure, Mobility, and Technology  
Objective 5.1: Update Facility Condition Assessment

### 6. DISCUSSION AND BACKGROUND

Constructed in 1987, Reservoir 2A has since been an integral part of the City's water distribution system. The tank was built on a slope in the northeast area of the City. Since the mid-1990s, ground movement and distress on the tank pad and adjacent slopes were detected, and different geotechnical firms were retained to study and investigate these issues. Ground monitoring performed by these consultants along with annual optical survey measurements around the tank footing and site retaining walls confirmed the existence and continuity of these movements.

In March 2021, the City retained Tetra Tech BAS, Inc. to complete an extensive study of the site geotechnical records including reservoir as-built plans, slope repair records, annual inclinometer readings, optical survey data, and the 2017 Tank Corrosion, Seismic and Evaluation Report. The report provided by Tetra Tech BAS, Inc. concluded that fill settlement, lateral fill extension, and

bedrock rebound were the most likely contributors to the observed and measured movement at the site.

In January 2022, the City entered an agreement with Tetra Tech BAS, Inc. (Agreement No. 7322) to conduct annual optical surveys, inclinometer and piezometer readings and crack monitoring, and develop a Lidar Survey program over a 2-year period ending in October 2024. This First Amendment will authorize Tetra Tech BAS, Inc. to extend these annual services to October 2026. In addition to extending the efforts currently undertaking at the site, this amendment will also include a structural analysis of the tank to evaluate the potential stress conditions within the tank shell and to provide preliminary engineering estimates of at least three recommended repair options.

Tetra Tech BAS, Inc. is a reputable and experienced geotechnical firm who has worked with the City on previous projects. The project manager was familiar with the site condition and salient background as he was the key personnel working with Geologic Inc. on conducting annual geotechnical monitoring and repairing of the slope at this site. Staff is recommending award of the contract to Tetra Tech BAS, Inc. in the amount not to exceed \$95,605.

## **7. ATTACHMENTS**

- First Amendment to Agreement with Tetra Tech BAS, Inc.