



City of Norman, OK

Municipal Building
Council Chambers
201 West Gray
Norman, OK 73069

Master

File Number: K-2021-38

File ID: K-2021-38 **Type:** Contract **Status:** Consent Item

Version: 1 **Reference:** Item 35 **In Control:** City Council

Department: Public Works Department **Cost:** **File Created:** 12/17/2020

File Name: Contract with OWRB TMDL Monitoring Yr 6-10 **Final Action:**

Title: CONTRACT K-2021-38: A CONTRACT BY AND BETWEEN THE CITY OF NORMAN, OKLAHOMA, AND THE OKLAHOMA WATER RESOURCES BOARD FOR THE COMPLETION OF THE LAKE THUNDERBIRD TOTAL MAXIMUM DAILY LOAD (TMDL) PLAN MONITORING, YEARS 6-10 PROJECT.

Notes: ACTION NEEDED: Motion to approve or reject Contract K-2021-38 with the Oklahoma Water Resources Board; and, if accepted authorize the execution thereof.

ACTION TAKEN: _____

Agenda Date: 01/12/2021

Agenda Number: 35

Attachments: K-2021-38, Table of Monitoring Stations, Project Location Map

Project Manager: Carrie Evenson, Stormwater Program Manager

Entered by: amy.shepard@normanok.gov

Effective Date:

History of Legislative File

Version:	Acting Body:	Date:	Action:	Sent To:	Due Date:	Return Date:	Result:

Text of Legislative File K-2021-38

body

BACKGROUND: Lake Thunderbird was constructed by the U.S. Bureau of Reclamation (BOR) in 1965 to impound the upper reaches of Little River and several tributaries east of Norman, Oklahoma north of State Highway 9. The watershed drains 256 square miles in Oklahoma and Cleveland Counties including Norman, Oklahoma City and Moore, as well as small parts of unincorporated Oklahoma and Cleveland Counties. The Lake is operated by the Central Oklahoma Master Conservancy District on behalf of the U.S. Bureau of Reclamation. In addition, the U.S. Army Corps of Engineers manages the flood control elements of Lake

Thunderbird. Finally, the Oklahoma Department of Tourism and Recreation manages the parks and recreation services at the Lake.

The Lake provides drinking water for the cities of Norman, Midwest City, and Del City. It also provides a myriad of recreational opportunities for citizens of Norman and of the State of Oklahoma as a warm water aquatic community affording quality fishing for a variety of species and as a primary body contact water body providing recreational boating and water sports activities. In order to continue to provide these recreational opportunities and continue to provide quality drinking water, the Lake must meet certain water quality standards. These Standards are set by the Oklahoma Water Resources Board (OWRB) and Oklahoma Department of Environmental Quality (ODEQ) for the purpose of maintaining the beneficial uses of water bodies in the State including lakes and streams.

Stormwater runoff to Lake Thunderbird has increased in both quantity and velocity as the populations of the nearby cities that deliver the vast majority of the stormwater runoff to the Lake have grown. Unintended consequences of strong growth include pollution in the water that runs off of the streets, buildings and lawns of the growing cities. This water flow carries sediment which clouds the water in the Lake and reduces its capacity and depth while also carrying other pollutants such as nutrients like nitrogen and phosphorus. All three of these pollutants are causing degradation to the water quality in the streams and in turn to the Lake.

In August 2010, the Environmental Protection Agency placed Lake Thunderbird on its 303(d) List of Impaired Waterbodies. This led to the establishment of a Total Maximum Daily Load (TMDL) by ODEQ in November of 2013.

DISCUSSION: The Public Works Department, Stormwater Division prepared a Request for Proposals (RFP) to solicit the services of a qualified firm to provide flow measurement and water quality monitoring services at ten (10) permanent monitoring stations and fourteen (14) stormwater outfalls for the parameters and at the frequencies specified in the City of Norman's Lake Thunderbird TMDL Monitoring Plan.

Four (4) proposals were received for this project. The Selection Committee included three (3) staff members consisting of Michele Loudenback, Stormwater Program Specialist, Public Works Department; Carrie Evenson, Stormwater Program Manager, Public Works Department; and Scott Sturtz, City Engineer, Public Works Department; and two (2) private citizens including Amanda Nairn, Vice Chair of the Environmental Control Advisory Board; and Courtney Dekalb-Myers, Horticulture Educator, Cleveland County OSU Extension Services. The Selection Committee members independently scored each proposal on a point scale as defined in the RFP. The four (4) firms were ranked based on these scores, and the Oklahoma Water Resources Board (OWRB) was selected for this project. OWRB was selected based upon their experience working with other municipalities on similar projects and the proposed methods and procedures for completing the project.

Required services include the following:

1. Collecting water quality samples at ten (10) permanent monitoring sites on a monthly

basis according to the procedures set forth in the Quality Assurance Project Plan.

- a. Four (4) of the monthly samples at the 10 permanent monitoring sites during storm flow conditions. (See Attached Table)
2. Collecting water quality samples quarterly at 50% of the fourteen (14) stormwater outfalls on a rotating basis according to the procedures set forth in the Quality Assurance Project Plan (i.e. 7 of the 14 sites will be monitored four times per year during any given year).
3. Purchasing, operating, maintaining, repairing, replacing, and securing all equipment installed at monitoring sites, including but not limited to level measuring gauges, autosamplers, and rain gauges.
4. Submitting a monthly report and an annual monitoring summary report, including loading calculations, to City of Norman staff for review and archiving. All data will be reported to ODEQ annually with the City's Annual Report for the Municipal Separate Storm Sewer System (MS4) Permit.

Refrigerated autosamplers, rain gauges, and level measuring gauges are installed at each permanent monitoring site. Samples must be analyzed at a State-certified lab using EPA approved methods for Total Phosphorus, Total Kjeldahl Nitrogen (TKN), Nitrate-Nitrite as N (NO₃-NO₂-N), and Total Suspended Solids. Mass loading will be calculated based on the concentration of analyte and the stream flow at the time the sample was taken.

Staff began negotiations with OWRB in September 2020. Budgeted capital funds in the amount of \$156,677.79 are available for this project in the Capital Improvement Projects Fund, Stormwater Drainage, Design (Account 50599968-46201; Project DR0061). The project is scheduled to begin in January 2021.

RECOMMENDATION: Staff recommends approval of Contract K-2021-38 with OWRB for completion of the Lake Thunderbird Watershed TMDL Monitoring, Years 6-10, project.