CITY COUNCIL CONFERENCE MINUTES

May 12, 2015

The City Council of the City of Norman, Cleveland County, State of Oklahoma, met in a conference at 5:35 p.m. in the Municipal Building Conference Room on the 12th day of May, 2015, and notice and agenda of the meeting were posted at the Municipal Building at 201 West Gray, and the Norman Public Library at 225 North Webster 48 hours prior to the beginning of the meeting.

PRESENT: Councilmembers Allison, Castleberry, Holman,

Jungman, Lang, Miller, and Mayor Rosenthal

TARDY: Councilmember Williams

ABSENT: Councilmember Heiple

Item 1, being:

PROGRESS REPORT PRESENTATION BY OLSSON ASSOCIATES FOR THE COMPLIANCE AND MONITORING PLAN FOR THE LAKE THUNDERBIRD TOTAL MAXIMUM DAILY LOAD (TMDL).

Councilmember Williams arrived at 6:08 p.m.

Mr. Shawn O'Leary, Director of Public Works, said the Department of Environmental Quality (DEQ) mandated a requirement for cities to create a Total Maximum Daily Load (TMDL) Compliance and Monitoring Plan, which is due in November, 2015. He said Olsson and Associates is in the early stages of data collection and is providing an update on that progress. He introduced Alan Sultani and Reza Khakpour of Olsson Associates.

Mr. Sultani said Olsson Associates was founded in 1956 and has currently over 900 employees with offices in eight states. For this project, Olsson Associates partnered with another firm, GBMc & Associates who specialize in water quality issues and watershed assessment and management plans.

Mr. Khakpour said Lake Thunderbird was built in 1965 and has 256 miles of drainage area that includes portions of Norman, Moore, Noble, and Oklahoma City as well as portions of other cities in Oklahoma and Cleveland Counties. Lake Thunderbird is a water supply for Norman, Midwest City, and Del City and Norman is the only jurisdiction that discharges stormwater into Lake Thunderbird and uses that stormwater as drinking water. He said Lake Thunderbird's drainage area is one of the smallest drainage areas for a man-made lake in the State of Oklahoma, which makes it difficult to control water quality.

Mr. Khakpour said Lake Thunderbird has had water quality issues for many years and has been studied by the Oklahoma Conservation Commission (OCC), Central Oklahoma Master Conservancy District (COMCD), the Oklahoma Department of Environmental Quality (ODEQ), and the City of Norman as part of its Strategic Water Master Plan (SWMP).

Mr. Khakpour said in 2010, the Environmental Protection Agency (EPA) placed Lake Thunderbird on their 303(d) list (a list of bodies of water with poor water quality) as a Sensitive Water Supply (SWS). As part of the Clean Water Act, states are required to assign priority for development of TMDL for sensitive water bodies and provide a long-term plan for completing TMDLs within eight (8) to thirteen (13) years from the first listing. The State identified Norman, Oklahoma City, and Moore as the three major contributors of pollutants into Lake Thunderbird. The State found that Lake Thunderbird does not meet essential standards for a warm water aquatic community or as a public and private water supply due to excessive levels of turbidity, low level of dissolved oxygen, and excessive levels of Chlorophyll a. He said these impairments are driven by phosphorous, nitrogen, sediments, and carbonaceous material. The State then assigned a Waste Load Allocation (WLA) for each City, which is the amount of pollutants cities can discharge into the lake.

In 2012, the State submitted their report to the EPA for approval and after public review in the summer of 2013, the final report was published in November 2013. ODEQ is requiring Norman, Oklahoma City, and Moore to meet TMDL requirements in order to obtain their ODEQ stormwater permits. He said in order to meet those requirements, Norman must modify its SWMP within 24 months from the date of EPA approval and develop a compliance and monitoring plan designed to achieve progress toward meeting the reduction goals established in the TMDL. If ODEQ accepts the plan within 60 days, the City will have to begin implementation of that plan.

Mr. Khakpour said Norman's project approach included obtaining the services of Olsson and Associates in September 2014; opening dialogue with stakeholders and State agencies; providing a viable Compliance and Monitoring Plan; beginning implementation with non-structural Best Management Practices (BMPs); studying existing data from studies, reports, ordinances, regulations, and existing TMDL models; verifying loading sources used in a Hydrological Simulation Program – Fortran (HSPF), a model that includes a comprehensive package for simulation of watershed hydrology and water quality for both conventional and toxic organic pollutants; performing a Unified Stream Assessment; rating loading sources based on severity; electing the most effective BMP; assessing structural versus non-structural and individual versus watershed based options; and BMP feasibility.

Mr. Khakpour said Compliance Plan BMPs being considered are as follows:

Passive/Non-Structural BMPs (lowest cost)

- Adjust Ordinances (require forebays and better detention pond design)
- Require water quality ponds
- Public education
- Enforce Construction Stormwater Permits (inspections and corrective measures)
- Develop a Water Quality Protection Zone Ordinance (already in place)

Agriculture/Rural Areas BMPs

- Rotational grazing
- Fencing to protect streams from livestock
- Riparian buffers
- Stream bank stabilization
- Develop Fertilizer Ordinance (already in place)

Structural BMPs (highest cost/most removal)

- Watershed creation
- Regional detention ponds, wet ponds, infiltration practices
- Stream stabilization and bank stabilization (some work already in process)

Mr. Khakpour highlighted Compliance Plan - Order of BMP Implementation as follows:

Begin with Non-Structural BMP's

- Monitor the watershed response
- Allow upstream measures to be constructed
- Restudy watershed if necessary (redo HSPF modeling if needed)
- Begin in 2016 and monitor three to five years and re-evaluate

Implement Agriculture/Rural Areas BMPs

- Work with OCC, Unites States Department of Agriculture (USDA), and counties to promote food agriculture BMP's
- Encourage fencing to keep stream easements untouched
- Require riparian buffers from developers
- Stream bank stabilization
- Begin by 2021

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Compliance Plan BMPs, continued:

Structural BMPs

- Study the City of Moore and City of Oklahoma City plans
- Begin suggested structural BMPs in sub-watersheds not impacted by other municipalities
- Stream stabilization
- Utilize good design and maintenance practices on unpaved roads
- Begin by 2021 show improvement in eight to thirteen years from first listing on 303(d) that puts the deadline to year 2018 to 2023.

Mr. Khakpour highlighted the Monitoring Plan as follows:

Utilize Existing Monitoring Sites

- Revise monitoring network and methodology
- Add monitoring sites and possibly move some of existing sites

Develop Strategic Plan for an Effective Watershed Monitoring

- Comprehensive provide a good view of Norman contributing area and what is coming from upstream
- Flexible able to adjust with BMP adjustments

Develop Quality Assurance Project Plan

• Coordinate with City of Moore and City of Oklahoma City

Mr. Khakpour said Olsson and Associates' plan is to finish the BMP Analysis and write the Compliance and Monitoring report; submit the preliminary Compliance Plan to the City of Norman in June 2015 (including public meetings); submit the preliminary Compliance Plan to ODEQ in July 2015; address ODEQ comments (including public meeting comments); submit final plan to ODEQ in September 2015; work with ODEQ during the entire process to avoid any glitches so the final report will not be rejected; advertise through public access television notification, newspapers, and City's website; hold the first public meeting to engage, inform, and possibly receive input June 25th or June 29th; and hold a second public meeting possibly on August 27th that will include a presentation, maps, and information regarding TMDL and suggested final BMPs.

Mr. O'Leary said, at this time, Staff is asking for Council's direction on the proposed Compliance Plan approaches including coordinating with Moore and Oklahoma City. He said each City is approaching the plan differently, i.e., Oklahoma City is doing their plan with in-house Staff and Moore just hired a consultant last month. He said Norman has included ODEQ throughout the process. He said the public meetings and Council updates are scheduled in the summer which is not an ideal time, but cannot be delayed.

Councilmember Miller asked if the City will have a chance to review Moore and Oklahoma City's plans before Norman turns in its final plan and if those cities will be doing public dialogue. She asked how their reports and public dialogue, if any, will fit with Norman's. Mr. O'Leary said he is unaware if either City is planning to have public dialogue and does not know much about the details of their plans because they are playing it tight to the vest. Oklahoma City is a Phase I City and they were one of the first cities around the country to have a stormwater program in place since 1990 while Norman began its program sometime in 2000. He said Oklahoma City is very advanced in their program including monitoring and has a large Staff dedicated to stormwater. He believes Moore is behind the curve and is just starting the process of hiring a consultant.

Mr. O'Leary said Norman is the only city that drinks its stormwater out of Lake Thunderbird and drinking stormwater sets Norman apart from other cities, even Midwest City and Del City do not discharge stormwater into the lake, but they have a vested interest in the water quality for domestic purposes. He said the burden is on ODEQ because their responsibility is to bring all this together and clean up the lake going forward. He said the cities will not be cleaning up the lake in its current condition, but going forward, theywill be stopping pollution from continuing .

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Councilmember Holman said the map shows almost all of the urban development in the Lake Thunderbird watershed is from Moore with only a small portion of urban development from Norman. He said, in the past, it was thought that Moore would not have to do any type of compliance and Norman just hoped that Moore cared enough about the lake to do something to stop pollutants they were responsible for adding to the lake. He is happy to know they are required to have a compliance plan. Mr. O'Leary said Moore and Norman are Phase II cities meaning they are smaller and ODEQ bases their stormwater permits on the size of the city.

Councilmember Castleberry asked what the penalty would be if Norman does not submit a plan and Mr. O'Leary said he has heard penalties could be a minimum of \$11,000 per day.

Councilmember Castleberry asked if Norman has the technology to know what watershed each property in Norman flows into and Mr. O'Leary said yes.

Councilmember Castleberry asked about the cost of compliance and monitoring and Mr. O'Leary said that is part of what the City is currently working on, but the City is estimating an annual cost of \$300,000 to \$1 million in the FYE 16 Budget. The City will begin small changes and progressively build on that which could exceed \$1 million depending on the outcome of the requirements or the ability to produce results. He said it could be as simple as public education or purchasing more street sweepers. Councilmember Castleberry asked if the \$1 million is a one-time capital cost and would it include additional Staff and Mr. O'Leary said it will be more of a program cost than a capital cost.

Councilmember Castleberry asked how monitoring will work and Mr. Khakpour said there will be monitoring points in areas that have a certain stage of flow where water samples will be delivered directly to the lab versus someone going out and scooping water into a jar for evaluation. Mr. O'Leary said this is the area where Norman should collaborate with the other cities because it seems inefficient to have all cities monitoring the same thing so there could be shared monitoring stations or appropriately placed monitoring stations. Mayor Rosenthal asked if most of the initial costs in FYE 16 Budget will be for the monitoring program and Mr. O'Leary said yes.

Councilmember Lang said based on the biggest return, which would be stream bank stabilization, he would assume the City would prioritize work to make the largest impact first. Mr. O'Leary said while stream bank stabilization will be a huge priority, it is the most expensive approach.

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Mayor

Items submitted for the record

City Clerk

- 1. Progress Report, Compliance Plan and Monitoring Plan for the Lake Thunderbird Total Maximum Daily Load (TMDL), City of Norman, Oklahoma, prepared by Olsson Associates
- 2. PowerPoint presentation "City of Norman, Oklahoma, Compliance Plan and Monitoring Plan for the Lake Thunderbird Total Maximum Daily Load (TMDL)," prepared by Olsson Associates

The meeting adjourned at 6:15 p.m.

ATTEST: