

City of Columbia, Missouri

Meeting Minutes

City Council

Monday, February 19, 2018 5:00 PM

Work Session

Conference Room 1A/1B Columbia City Hall 701 E. Broadway

I. CALL TO ORDER

The meeting was called to order at approximately 5:04 pm.

Present: 7 - Ruffin, Trapp, Thomas, Peters, Treece, Skala, and Pltzer

This item is open to the public: Solid Waste Master Plan

Attachments: City of Columbia Landfill Master Plan Presentation

Landfill Site Master Plan

Steve Hunt, Solid Waste Utility Manager introduced some of his staff in attendance and the Burns and McDonnell consulting team in attendance. Mr. Hunt noted that we have a cherished asset in the landfill. Many other landfills in Missouri have closed and only about 20 remain, many of which are privately owned. Tonight's presentation is focused solely on the landfill. Other plans are coming down the road as part of the Climate Action Plan which will include recycling and waste minimization goals.

Brian Weis, Civil Engineer and Project Manager with Burns and McDonnell provided an overview of the items they will cover tonight and introduced Chris Snider. Mr. Snider provided a brief history of the site noting that it has been an industrial site for a long time. In the mid-80's it was permitted for landfill use by MDNR. He noted that the city is currently building Cell 6 which is the last cell permitted to enable disposal. Mr. Weis added that the first six cells total 107 acres. The existing site spans 720 acres with 160 acres west of Hinkson Creek and 560 acres east of Hinkson Creek. He reviewed some of the site features including the cell locations, bio-reactor cells, landfill gas to energy plant, composting facility, soil borrow area, Solid Waste Administration building and Material Recovery Facility. To the south of the admin facility is the planned expansion area totaling 145 acres. Remaining capacity is 2.9 million cubic yards which they expect to fill around 2026-2031. Cell 5 will likely fill before the year ends and then they would move to filling Cell 6. Over time, the waste will compact leaving additional airspace in the cells that can be filled.

Mr. Weis reviewed the expansion alternative which is to shut down the facility and transfer the waste to an alternative facility. Some disadvantages to that option include costs, a greater environmental footprint and an uncertain future on capacity at nearby landfills. Mr. Weis reviewed the benefits to expanding onsite which include feasibility of site knowledge and existing permits, supporting the existing infrastructure, and protecting citizen interests through cost control, proximity, and job protection. He added that they did look to permit another site in the city, but an expansion at the existing landfill is the best option to consider to location and cost. Mr. Weis explained that they also did an ecological assessment of the area which found numerous land types in the southern area, protected species that may potentially be affected, and some possible on-site

mitigation needs.

Scott Martin stated that the landfill gas collection system was installed in the mid-90's. Five additional landfill gas expansions have been created. In 2007 the City moved forward with a landfill gas to electricity facility built in 2008. He reviewed the current renewable power generation of the landfill gas to energy plant noting that it generated 1.2% of the City's power in 2016. With a fourth engine, this is capable of producing 2.8% of the City's energy. He provided a snapshot of the 2016 renewable energy portfolio noting that 51% are wind, 2% are solar and 47% landfill gas. He reminded that the ordinance states a goal of 30% by 2029.

Mr. Weis reviewed the south landfill concept stating that this would be a 145 acre footprint with a 20 million cubic yard capacity totaling 14 cells with an estimated life of 40 to 80 years. There are flood plain constraints and roadways, so there are buffer areas as needed including a large area to the west for wetlands development. Council Member Thomas asked what percent of outside waste comes to our landfill. Mr. Hunt stated that 50% is from our trucks and 50% from private haulers. The rates are determined by the Cost of Service study and were raised last year. The capital costs are rolled into the landfill costs. The first two cells are in the CIP 2-3 years from now, at which time rate changes could be reconsidered. The rates will need to be considered as we start construction of the cells. Mayor Treece understood the landfill pays for itself, and that the landfill expansion will pay for itself over the life of its usefulness. Mr. Hunt said yes and stated that the landfill is one budget of 16 in solid waste and is self-sufficient.

Mr. Weis reviewed the storm water and leachate management plan including a wetlands buffer that will help promote polishing of water before reaching the Hinkson Creek. Mayor Treece asked if there are other uses for sites like this. Mr. Weis stated that these sites can also be used for solar fields or ball fields. Mr. Matthes added that it could also be used to create biomass. Mr. Weis continued to explain that leachate is pumped out and treated on site before discharging to the sanitary sewer system where it is treated at the Wastewater Treatment Plant before reaching its out point. Mr. Weis reviewed the ecological preservation and restoration plan which would be phased and planned to manage the ecology, storm water and soil balance.

Mr. Martin reviewed the renewable power potential noting that the expansion would provide 12% toward the City's renewable goal and would provide 3.5% of City's power. Compared to solar or wind, this is a more affordable option. Mr. Weis reviewed the landfill site master plan which include the long range transportation plan which includes future Waco Bridge Road connecting through the site beyond Rogers Road.

Mr. Snider reviewed the timeline for the south landfill noting that the complete process takes 7-8 years. The public outreach process could begin in 2018 followed by a site investigation, design and solid waste permitting, air permitting, final design and procurement of Cell 7 and finally construction planned for 2025. The required permits would likely be received in 2023 before final design begins.

Mr. Thomas asked for details on the cost. Mr. Hunt explained that the total permitting process costs would be about \$1.2 million funded over three years which would come from surplus and the CIP. Cell 6 was about \$6.5 million and he estimated Cell 7 at about \$8 million since it includes additional infrastructure features. The permitting process will allow for fine tuning that number. Mr. Hunt stated that there are also costs to consider to close cells that have reached capacity including post-closure costs. Funds would be set aside for future closure costs of this new cell. The group discussed private hauler fees and Mr. Martin noted that it is common for municipalities to charge the same rate for

private haulers as customers are charged.

Mayor Treece asked if the ccr's out of More's Lake are compactible. Mr. Hunt stated that they used 12,000 tons of that material as part of a road access project. The rest is going into the landfill with no operational issues. There are state rules on how it can be used, and cannot qualify as daily cover and must be considered trash.

Council Member Trapp asked for an update on the compost facility. Mr. Hunt stated that they have a contract with a group out of St. Louis that does grinding. They also do food waste route runs twice weekly. Compost produced is pretty consistent at about 8-9,000 tons per year. He stated that they could gain momentum in this area by adding more food waste routes especially in downtown.

Mr. Thomas asked if there is a time profile after a cell is closed at which the gas is collected. Mr. Martin stated that the city puts in infrastructure as the waste is laid in layers, so it starts collecting after about only 10 feet. Over 20 years or so, there really isn't much gas still being produced.

Council Member Skala asked if biomass would be used internally. Mr. Matthes stated that there is not a detailed analysis on that, but they have had some conversations with others such as MFA Oil on this potential use which would be a post closure decision.

This item is open to the public: Motion for the City Council of the City of Columbia, Missouri, to meet on Monday, February 19th, 2018 pursuant to the City Council Work Session agenda, in Conference Room 1A and 1B of City Hall, 701 East Broadway, Columbia, Missouri, for a Closed Meeting to discuss the leasing, purchase or sale of real estate by a public governmental body where public knowledge of the transaction might adversely affect the legal consideration therefor, as authorized by Section 610.021(2) RSMo; and to discuss sealed bids and related documents, until the bids are opened; and sealed proposals and related documents or any documents related to a negotiated contract until a contract is executed, or all proposals are rejected, as authorized by Section 610.021(12) RSMo.

At approximately 6:11 p.m., Mayor Treece made a motion for the City Council of the City of Columbia, Missouri, to immediately go into a closed meeting in Conference Room 1A/1B of City Hall, 701 E. Broadway, Columbia, Missouri, to discuss the leasing, purchase or sale of real estate by a public governmental body where public knowledge of the transaction might adversely affect the legal consideration therefor, as authorized by Section 610.021(2) Revised Statutes of Missouri, and to discuss sealed bids and related documents, until the bids are opened; and sealed proposals and related documents or any documents related to a negotiated contract until a contract is executed, or all proposals are rejected, as authorized by Section 610.021(12) Revised Statutes of Missouri. The motion was seconded by Mr. Skala.

Yes: 7 - Ruffin, Trapp, Thomas, Peters, Treece, Skala, and Pltzer

This item is closed to the public: See Notice of Closed Meeting.

Attachments: Notice of Closed Meeting

At approximately 6:13 p.m., the City Council went into closed session pursuant to RSMo Sections 610.021(2) and (12).

II. ADJOURNMENT

The meeting adjourned at approximately 6:37 p.m.