
MUSCATINE/SCOTT COLLABORATION UPDATE

MUSCATINE CITY COUNCIL MEETING April 13, 2017



BARKER LEMAR
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OUTLINE



- Collaboration Overview
- Life-Cycle Cost Model Overview
- Scenario 6 Discussion as an Example
- General Model Indications
- Collaboration Next Steps
- Other Project Updates

COLLABORATION OVERVIEW



- The Muscatine County Solid Waste Management Agency (MCSWMA) and the Waste Commission of Scott County (WCSC) are in the same planning area but have separate service areas, each with their own landfill.
- The two landfills are located approximately 11 miles apart.
- The Agency/City of Muscatine and the Commission already have an established working relationship (e.g. e-waste and HHM)
- A life-cycle cost model of the current Muscatine landfill/transfer station was developed that projects revenues and expenses for various solid waste management options.

LIFE-CYCLE COST MODEL OVERVIEW



- Model period from 2016/17 through 2033/34.
- Allows evaluation of changes in tonnage received, tipping fees, transportation costs, landfill cell life, capital and operations expense projection changes, transfer truck load weights, options for funding closure and post closure, inflation, etc.
- For presentation purposes, changes in input parameter variables were referred to as variations (e.g. Variation C – lower tipping fee at Scott Area Landfill by \$1.55 per ton)
- Different variations were combined to create different scenarios.
- In each scenario, three Muscatine County Landfill conditions were compared: Open, Inactive, Closed.

SCENARIO 6 EXAMPLE



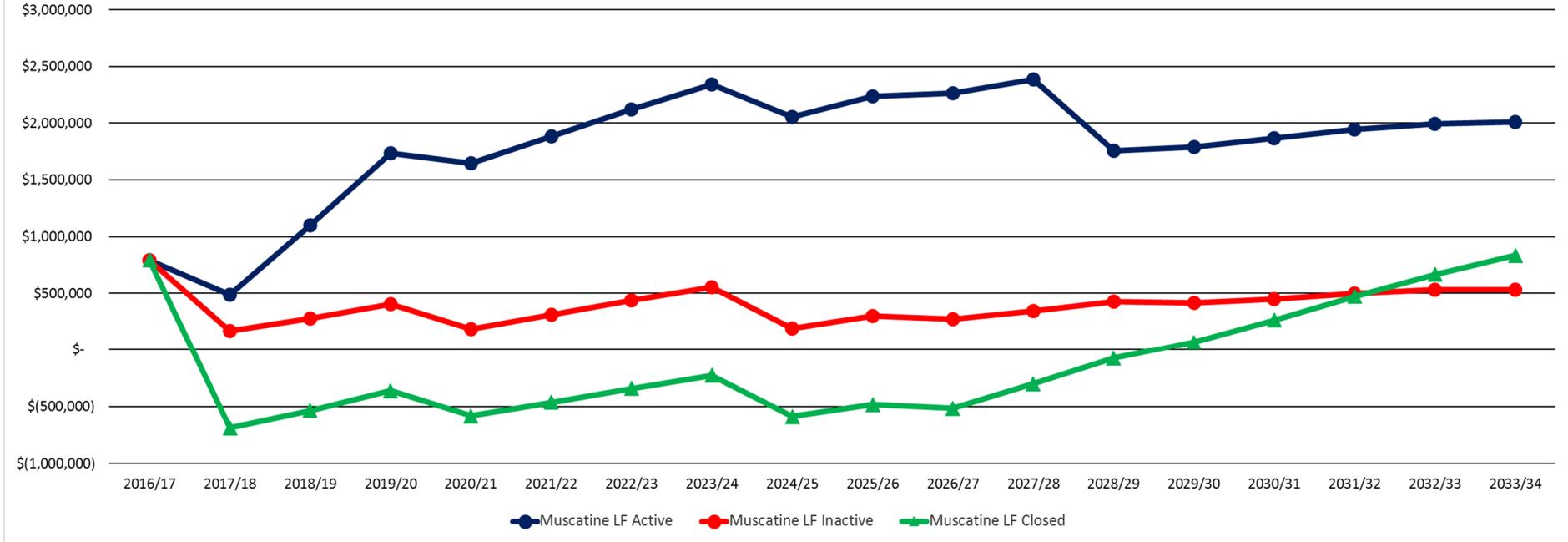
Scenario 6 Included the Following:

- Tipping Fees Held Constant Throughout Model Period.
- Loss of Industrial Contract Waste in 2020 (Variation B).
- Reduction in Scott Area Landfill Tipping Fee of \$1.55/ton (Variation C).
- Funding Closure and Post Closure for the Inactive Condition of the Muscatine County Landfill (Variation D).
- A Per Trip Haul Charge of \$125/load, 5 year contracts, rates inflated (Variation F).

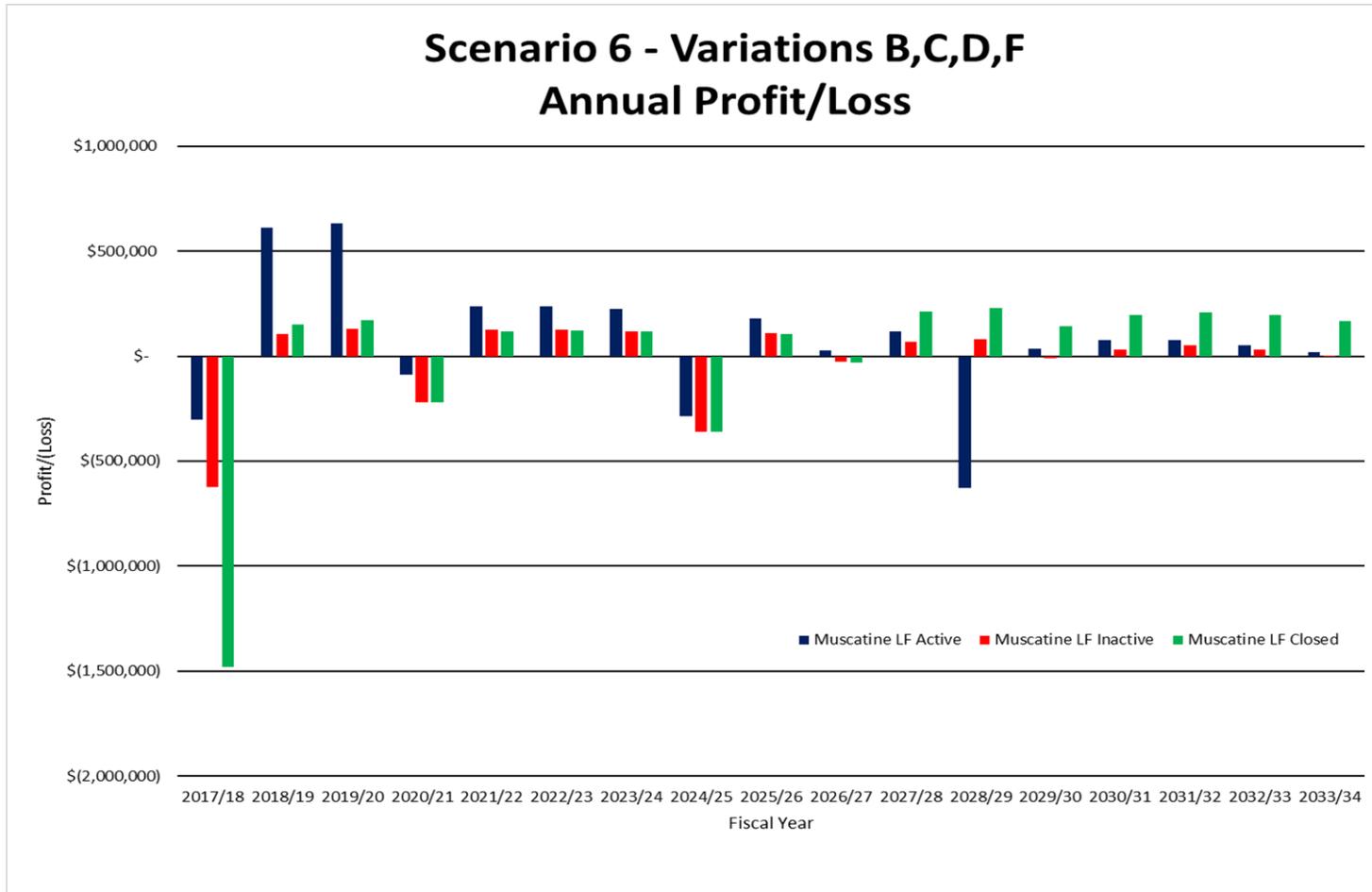
SCENARIO 6 – OVERALL FUND BALANCE



Scenario 6 - Variations B,C,D,F
Overall Fund Balance



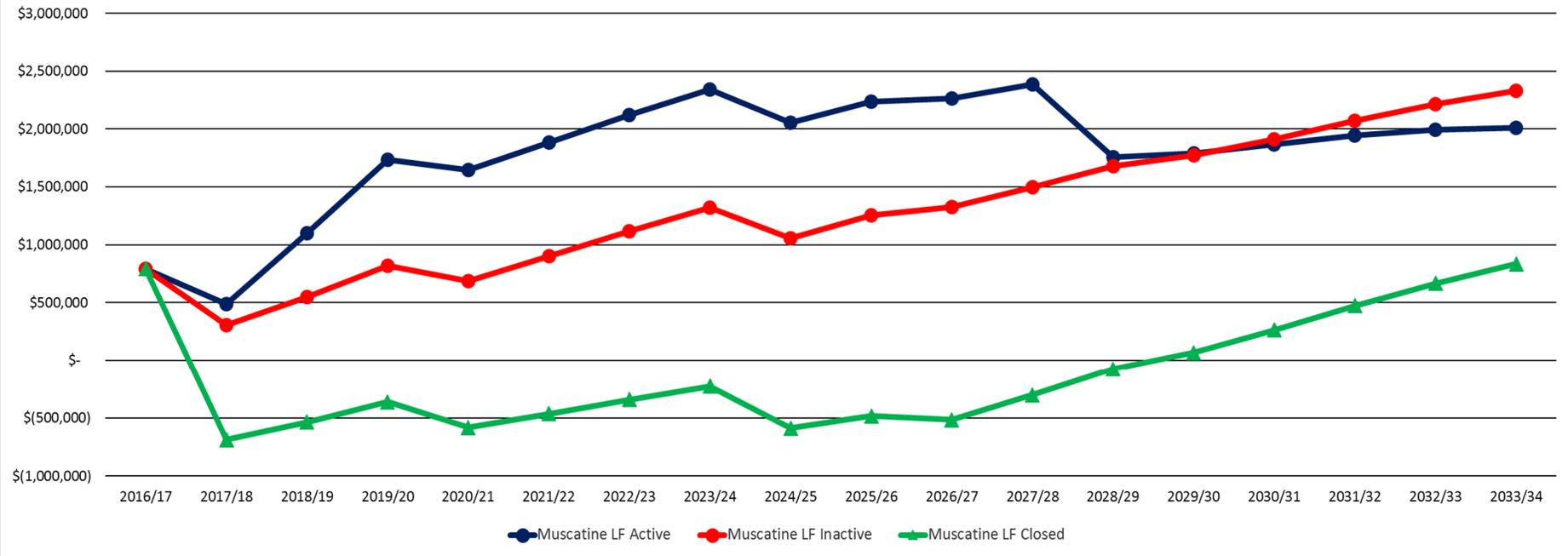
SCENARIO 6 – ANNUAL PROFIT/LOSS



SCENARIO 6a – OVERALL FUND BALANCE



Scenario 6a - Variations B,C,F
Overall Fund Balance



GENERAL MODEL INDICATIONS



Based on the scenarios run thus far:

- Keeping the Muscatine County Landfill open performs better than the inactive or closed conditions in the first approximately half of the model period. A large factor in this is the current condition of the landfill closure and post closure funds still requiring deposits currently estimated to total approximately \$2,700,000.
- Transferring waste to the Scott Area Landfill performs better than the active or inactive conditions in the approximately second half of the model period. A large factor in this is the landfill operating on reduced tonnage and post closure being now fully funded for the closed condition.

COLLABORATION NEXT STEPS



- Time is of the essence with the limited space left in Cell 4, therefore, moving into at least the bidding phase for the construction of Cell 5 is necessary.
- Collaboration discussions with the Waste Commission of Scott County will continue now and into the future.
- Using the model, the financial impact of additional ways the two entities can collaborate can be financially evaluated, which could indicate if or when a change in direction may be beneficial.
- Input of landfill cell construction and transfer hauling bids into the model along with additional ideas for collaboration could impact the final decision regarding Cell 5.

COLLABORATION NEXT STEPS – CONTINUED



- Possible ideas for additional collaboration include the following:
 - E-waste disposal fees.
 - Household Hazardous Materials (HHM) fees.
 - Recycling deliveries and revenue sharing.
 - Shared cost for site closure or moving waste.
 - Shared operator for occasional landfill operation.
 - Others?

OTHER ITEMS



- The public notice period for the Cells 5 and 6 Master Plan will end on May 2, 2017, after which the Master Plan should be permitted.
- The time extension request for completion of the Assessment of Corrective Measures report has been approved. The due date is now December 31, 2019.
- Additional background and bracketing groundwater monitoring well installations will likely occur this calendar year.
- Our annual services contract expires June 30, 2017. A new proposal for services is being prepared.

QUESTIONS



MUSCATINE CITY COUNCIL MEETING

APRIL 13, 2017



THANK YOU

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