

Landfill Infrastructure Replacement and Recovery Park Site Design Options - Additional Information on the Cost of Inaction

ISSUE

At its meeting on December 2, 2019, the Standing Policy Committee on Environment, Utilities and Corporate Services requested additional details on the cost of not proceeding with any of the options for Recovery Park Site Design as laid out in the report.

BACKGROUND

The scope of the Recovery Park project has changed since its original inception to integrate with landfill operations and accommodating residents to a population of 500,000. The three main scope changes are:

- enhanced storm water retention pond requirements;
- inclusion of access to Dundonald Avenue, and
- increased queuing capacity.

The change in requirements for the storm water retention pond came from the Ministry of Environment requiring that the Recovery Park site be treated as part of the landfill site, and that all site storm water must be treated through the sanitary system to meet this regulatory requirement. Valley Road also has no regular storm system for drainage, instead relying on overland drainage. Due to this overland drainage in the region around the Recovery Park site, additional infrastructure is required to prevent offsite overland drainage from mixing with onsite storm water.

The original site concepts did not include access to Dundonald Avenue, however, as part of the closure of the Avenue H and Spadina Crescent intersection, access to Dundonald Avenue had to be maintained so SaskPower could access the Queen Elizabeth Power Station.

With the development of the Civic Operations Centre, the enhancements to Valley Road and the Circle Drive South expansion, a constraint was developed for the Recovery Park site that did not allow queuing of vehicles on Valley Road at a Saskatoon population of 500,000. This constraint was not in the original concept designs.

The three primary scope changes impact Recovery Park both as a location for diverting material, and as a transfer station for solid waste. It would be difficult to separate the impact of landfill vs. diversion components, as combined, they are more cost effective for both. For example: If the sites were designed and built separately, each would need a storm pond with a lift station that pumps to sanitary sewer, this would likely cost more than double the current cost for storm water management.

IMPLICATIONS

Financial

Option Three, for the Recovery Park site design, is the current recommended option. This option has an estimated \$1.64M in annual debt payment for capital (\$779,000 above business

as usual), and an operating impact of \$1.45M (high estimate) for a total of \$3.09M annually (\$2.23 above business as usual). This number excludes recycling contracts' fees and lost tipping fee revenue as City Council has not decided if there will be a fee or not for divertible materials.

The Recovery Park site construction is required to complete the east expansion of the current landfill. This expansion will expand the current volume available at the landfill by 3.4M cubic meters. Without this expansion that airspace would be lost, shortening the landfill life and changing the current airspace value. With the reduced landfill life the airspace value would increase by approximately \$20 per tonne, based on current city growth, diversion rates and the ability to get 80% or more of the available air space on the existing site.

In order to maintain the same services, all fees at the landfill would need to increase at least \$20 per tonne. This would increase the pro-rata waste charge to be the highest in the region, which may result in revenue impacts and would also result in needing to re-calculate the phase-in mill rate funding for the Curbside Organics Program. Provided that tonnages brought to the landfill remain the same, this results in an increased cost of \$2M annually starting in 2020.

As outlined in the report, the increased operating costs of Recovery Park is \$2.23M annually (excluding recycling contracts and possible revenue from diverted materials). However, this cost will not be realized until 2023 with phase-in for capital payments of \$779,000 in 2022.

The total costs of Option Three over the next five and ten years are estimated at \$5.24M and \$16.39M respectively. The total cost of doing nothing over the next five and ten years are estimated at \$10M and \$20M respectively. It is difficult to compare these scenarios beyond ten years as the landfill end of life would be closer, and the accuracy of the remaining life has a significant impact on the airspace value.

Environmental

The capture of all surface water from the landfill is a requirement in the landfill's permit to operate, issued under the provincial Municipal Refuse Management Regulations. No surface/storm water is allowed to leave the site without meeting criteria set out in the Saskatchewan Environmental Quality Guidelines. Currently, the Saskatoon Regional Waste Management Facility is not in compliance with these regulations. The Ministry of Environment has accepted the City of Saskatoon's (City) integrated landfill management plan which includes the storm water retention pond for Recovery Park and timelines for compliance. Without the Landfill Infrastructure Replacement and Recovery Park project meeting the time lines in the integrated landfill management plan, the City may face an order to remedy, requiring the construction of the storm pond regardless of the decision to proceed.