**Subject:** Considerations of City of Niagara Falls Withdrawing from Regional Waste Management Services

**Report to:** Public Works Committee

**Report date:** Tuesday, March 10, 2020

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**Recommendations**

1. That Council DECLINE the Niagara Falls request to provide waste management services within the City of Niagara Falls and DIRECT Niagara Region’s Clerk to advise Niagara Falls of the decision of Council;

2. That staff PROCEED with the implementation of the contract as approved by Regional Council on October 17, 2019; and

3. That Report PW 14-2020 and Council’s resolutions BE CIRCULATED to the Local Area Municipalities (LAMs) for their information.

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**Key Facts**

- The purpose of this report is to provide Regional Council with relevant background information on the Negotiated Request for Proposal (NRFP) process leading up to the commencement of the new waste collection contracts, and to identify the key considerations of Niagara Falls opting out of Regional waste management services, as well as address information that has been published recently in the media.

- A formal request for assumption of waste management services from the City of Niagara Falls was received by Niagara Region on Thursday, January 30, 2020 (Appendix 1).

- If the City of Niagara Falls were to withdraw from Regional waste management services there would be operational, legal, financial and customer service impacts. The legal implications are the subject of a separate closed session report (Confidential PW 15-2020).

- If the City of Niagara Falls were to withdraw from all Regional waste management services, staff recommends that as a pre-condition of such approval, Niagara Falls be allocated a portion of the costs associated with those programs that they participate in, as well as closed landfill and a subset of open landfill operating costs. Under this scenario and based on the current funding methodology for allocation of
waste management costs, the remaining 11 LAMs receiving waste management services from the Region would experience an estimated budget increase of 25% for 2021 compared to the projected increase of 18.5% as a result of increased collection contract costs. If Niagara Falls is not required to pay their estimated share of closed landfill related costs in addition to monitoring and leachate processing costs associated with open landfills which have received Niagara Falls tonnage, the 11 LAMs would have to absorb those costs, resulting in a further increase to the 2021 budget to an estimated total of 27%.

- Notwithstanding the above, a review and potential amendment to the waste management system financing methodology, which was approved in 2011, may be required to ensure fair allocation of costs to the remaining 11 LAMs.
- There would be a duplication of staff to administer, manage and support the development and implementation of waste management services.
- The proposed withdrawal would be detrimental to the ability of the Region to achieve its goals of maximizing waste diversion.
- The procurement process undertaken by the Region for the waste collection contracts embraced and encouraged innovation in a number of respects; and specifically regarding single stream and cart-based recycling, staff noted a number of operational and financial challenges to such systems including the risk presented by the transition of the province’s Blue Box Program to producer responsibility in which municipalities that undertake program changes at this time are at risk of assuming cost and service level implications.

Background

Niagara Region will commence new waste collection contracts on October 19, 2020 with Green for Life (GFL) Environmental Inc. servicing Collection Area One (1) and Miller Waste Systems Inc. servicing Collection Area Two (2).

- **Collection Area One** (the Town of Grimsby, the Town of Lincoln, the Town of Pelham, the City of Thorold, the Township of Wainfleet and the Township of West Lincoln); and
- **Collection Area Two** (the Town of Fort Erie, the City of Niagara Falls, the Town of Niagara-on-the-Lake, the City of Port Colborne, the City of St. Catharines, and the City of Welland).
Preparation for these new waste collection contracts began in April 2018 when Council approved the proposed service levels to be included in stakeholder consultation. Consultation with LAMs, business groups and residents started in May 2018 and continued into February 2019. In March 2019, Council approved the collection service options to be included in the Negotiated Request for Proposal (NRFP), including every-other-week (EOW) garbage collection. The NRFP for waste collection services was released on August 1, 2019 and closed on September 17, 2019. Council approved EOW garbage collection on October 17, 2019 as the chosen collection scenario. A detailed timeline of events in the RFP process can be found in Table 1.

Table 1 Key Dates in the RFP Process

<table>
<thead>
<tr>
<th>Date</th>
<th>Action</th>
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<tbody>
<tr>
<td>April 12, 2018</td>
<td>Regional Council approved the proposed levels for stakeholder consultation</td>
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<tr>
<td>May 2018 to February 2019</td>
<td>Consultation with Local Area Municipalities, business organizations, residents</td>
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<tr>
<td>January 9, 2019</td>
<td>Staff recommended service level options to Public Works Committee (PWC) for inclusion in the NRFP, including EOW garbage collection</td>
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<tr>
<td>March 19, 2019</td>
<td>Regional Council approved collection service options to be included in the NRFP, including EOW garbage collection</td>
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<td>Regional Council approved the inclusion of a living wage clause in the NRFP and to not proceed with a managed competition bid process (in-house bid)</td>
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<tr>
<td>August 1, 2019</td>
<td>NRFP released</td>
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<tr>
<td>September 17, 2019</td>
<td>NRFP closed</td>
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<tr>
<td>September 18 to 30, 2019</td>
<td>Technical evaluation of NRFP</td>
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<tr>
<td>October 17, 2019</td>
<td>Regional Council approved EOW garbage collection as the preferred collection scenario</td>
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<tr>
<td>October 25, 2019</td>
<td>Best and Final Offer (BAFO) pricing submitted by short-listed proponents</td>
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<td>October 31 to November 6, 2019</td>
<td>Negotiation period</td>
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<tr>
<td>November 14, 2019</td>
<td>Regional Council approved optional services</td>
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<tr>
<td>December 12, 2019</td>
<td>Regional Council approved the 2020 budget on the basis of the approved collection options</td>
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It is Niagara Region’s understanding that, due to the perception of a reduced level of service in regards to EOW garbage collection, increased contract costs, and concerns over a perceived lack of innovation, the City of Niagara Falls would like to opt out of Niagara Region’s waste management services, and assume these services for the City of Niagara Falls. A formal request for assumption of waste management services from the City of Niagara Falls was received by Niagara Region on Thursday January 30, 2020, and can be found in Appendix 1.

Financial Considerations

Base collection services, as determined by Regional Council, are provided to all municipalities and the costs for these services, along with all processing, disposal and planning and administrative net costs, are apportioned to the municipalities through the waste management requisition based on the number of residential units as per the prior year’s MPAC data. For the enhanced services, each municipality determines the services they wish to provide to their residents and the costs associated with those particular services are added to their specific municipal requisition. The cost that is requisitioned for enhanced services includes both the collection cost charged by the contracted service provider and an estimate of the portion of disposal costs that are related to the enhanced services based on sample weights that are taken twice per year as representative of the tonnage that is typically collected.

The City of Niagara Falls’ resolution includes a request to opt out of any or all of the waste management services provided by Niagara Region and assume those services, with the exception of property matters such as the open or closed landfills. If approved, it is recommended that Niagara Falls as a pre-condition of such approval, be allocated a portion of the costs associated with those programs that they participate in, as well as landfill operating and monitoring costs. An allocation of landfill costs has been included in staff’s analysis because Niagara Falls has contributed to the tonnage that has gone into the landfills, which leads to the on-going environmental monitoring and leachate processing costs. The remaining net waste management costs will be apportioned to
the remaining 11 LAMs. If Niagara Falls is not required to pay their estimated share of landfill costs, the 11 LAMs would have to absorb those costs as well.

Based on multi-year estimates, the overall net waste management budget increase for 2021 is anticipated to be 18.5%, without any reserve mitigation. This increase is mainly due to the increased collection contract costs. With the new collection contract anticipated to start October 2020, the approved 2020 budget included an estimate of anticipated collection costs under the new contract for the last three (3) months of the year only. The full impact of the new collection contract is included in the 2021 multi-year budget estimate. For the 2020 operating budget, Niagara Falls was apportioned approximately 19.1% of the base waste management net program costs of $37.1 million.

The Region’s 2020 waste management operating budget was approved by Council in December 2019. If a change were to be required in 2020 due to Niagara Falls opting out, the following processes would be affected:

- An in-year budget amendment (including a revised by-law) would be required to adjust the Council-approved 2020 budget.
- The municipal requisitions for all municipalities would be impacted and require amendment.
- Waste Management tax rates would have to be amended prior to final 2020 tax billing to residents which generally occurs at the beginning of June for the June 30 due date.
- This would necessitate the above processes being complete by the end of May at the latest to facilitate the LAM tax billing process.
- Due to these time constraints, approximately 11 weeks, it may not be possible for the City of Niagara Falls to opt out without leaving the Region responsible for a portion of the costs attributable to Niagara Falls waste management services.

It is estimated that if Niagara Falls is allowed to opt out of all Regional waste management services, with the exception of the landfills, the remaining 11 LAMs receiving services from the Region would see an estimated 2021 budget increase over 2020 of 25%, or approximately $40 per household. The original multi-year budget estimate for 2021, without any reserve mitigation, projected an increase of 18.5%, or approximately $29 per household, which includes service for the City of Niagara Falls. This additional increase of 6.5%, or $11 per household, is attributable to the sharing of Niagara Falls’ portion of costs in the amount of approximately $2.1 million for the Region’s waste management programs and services, including diversion programs and
administrative program delivery costs amongst the 11 LAMs. If Niagara Falls is not required to share in all closed landfill related costs in addition to monitoring and leachate processing costs associated with open landfills which have received Niagara Fall’s tonnage, the remaining 11 LAMs would also have to absorb these costs of an estimated $800,000, bringing the estimated budget increase for 2021 to 27%, or $44 per household. The analysis and assumptions made with respect to the budget impacts are based on the current allocation methodology in place to allocate waste management costs amongst the municipalities.

The anticipated budget and requisition changes are based on the following assumptions and estimates:

- Estimates of collection contract cost reductions related to Niagara Falls have been based on the current cost per household based on the current collection contract cost including all 12 municipalities. This assumption is dependant on renegotiation of contracts to exclude one municipality and actual results may vary.
- Budget reductions associated with the removal of Niagara Falls from all waste management services, including the cost to process organic material and disposal costs for processing of waste at Walker’s landfill.
- Reduced revenue from the sale of recyclable material and a reduction of garbage bag tag revenue.
- A review of resources required to operate the Region’s waste management programs and services with the elimination of Niagara Falls would occur; however, savings have not been factored in, as it is not anticipated that there would be significant opportunities for reductions and related savings, as the resources will still be needed to support the programs for the remaining LAMs.
- A review and potential amendment to the waste management system financing methodology, which was approved in 2011, may be required to ensure fair allocation of costs to the remaining 11 LAMs and may affect the anticipated municipal requisitions.

Through the 2020 operating budget process in CSD 70-2019, staff recommended a mitigation plan to assist in phasing in the increased costs of the new collection contract, which includes significant use of Waste Management Stabilization reserve funding over a 2020, 2021 and 2022. The intent of the reserve funding was to limit the annual increase to 9.8% over the next three years, adjusted to 9.9% for 2020 and 10.2% for 2021 with the inclusion of weekly diaper and medical waste collection service. This recommendation would be subject to the availability of future year reserves and approval of Council for each of 2021 and 2022.
However, the balance of the Stabilization reserve is insufficient to mitigate the full increase for the 11 LAMs, and the increase to the LAMs would be greater than the 10.2% previously recommended for 2021 and 2022. Also, if direction is given to use the Stabilization reserve funds to offset any impact to the 11 LAMs of Niagara Falls opting out of the Region’s services in 2020, this would further impact the ability to mitigate increases in future years.

Analysis

EOW Garbage Collection

One of the key decisions made during the NRFP process was Council’s approval of EOW garbage collection. Although it has been perceived by some as a decrease in service, residents can still set out the same volume of material. For example, residents who currently have a limit of one (1) container (bag/can) per week will be allowed to set out two (2) containers (bags/cans) EOW, with organics and recycling collected weekly. Only the frequency of garbage collection changes, not the limit. Experience in comparator municipalities shows that EOW garbage collection is a more important driver of diversion than very restrictive garbage limits. Niagara Region’s one (1) bag/container per week residential garbage container limit is already one of the more stringent among comparator municipalities. However, Niagara Region’s diversion rate is stagnant.

Currently, a typical low-density residential (LDR) garbage bag in Niagara region contains nearly 50% organic waste and 14% recyclable material. Additionally, only 48% of Niagara region’s LDR households are using the Green Bin program. Reducing the frequency of garbage collection will motivate residents to recycle and use the Green Bin, as unlimited, weekly Blue/Grey Box and Green Bin collection will continue. By utilizing all diversion programs, residents will reduce the amount of garbage placed at the curb, and increase waste diversion.

Placing organics in the Green Bin for weekly collection also ensures that material that can attract pests and rodents is secured in a solid container with a locking lid. Experience from other municipalities has shown that switching to EOW garbage collection did not result in any increases in rodents, provided residents use their Green Bin and store waste properly. Peel Region reported a decrease in rodent complaints after switching to EOW garbage collection.
Niagara Region has received limited direct public response to Council's resolution to approve EOW garbage collection. Overall, staff have received only 23 calls since October 2019 related to EOW collection. Four (4) calls were from residents that expressed support of the decision and nineteen (19) calls were from residents expressing concern.

**Benefits of EOW Garbage Collection**

The following environmental and financial benefits are expected with an increase in waste diversion resulting from EOW garbage collection:

- Conservation of non-renewable resources;
- Reductions in energy consumption and pollution (both water and air). The extraction, processing and manufacturing of raw materials requires more energy and consumption of fossil fuels than recycled materials;
- Net reduction in Greenhouse Gas (GHG) emissions through increased composting and recycling, and from fewer collection vehicles on the road;
- A reduction in the amount of organics being landfilled will result in less methane emissions and improved leachate quality, which lessens the potential for environmental impact;
- Long-term cost reduction in the care and control of landfill sites, due to improved leachate quality;
- Increased net processing revenue from the sale of more recyclables due to increased volumes; and
- Extended site life for open Regional landfills, resulting in deferred capital costs for new disposal infrastructure.

Additionally, EOW garbage collection will help Niagara Region align with impending Provincial legislation and regulations. On April 30, 2018, the Ministry of the Environment, Conservation and Parks (MECP) released their Food and Organic Waste Framework, which is comprised of two (2) complementary components: Part A: Food and Organic Waste Action Plan; and Part B: Food and Organic Waste Policy Statement. The Action Plan outlines strategic commitments to be taken by the province to address food and organic waste. Municipalities are responsible for several actions within the framework, including Action 9: Province to ban food and organic waste from ending up in disposal sites (phased-in beginning 2022).
Increased Pricing

Niagara Region has seen an overall increase in the cost of the collection contract compared to the current contract. It should be noted that the pricing from the current collection provider was approximately $4 million less annually than the next lowest bidder. There have also been significant price increases over the last decade that have affected contract costs. Municipalities across Ontario have experienced increases in collection contracts ranging from 20% to 114%. Key areas where rising costs have affected contract pricing include:

- Labour;
- Insurance;
- Fuel; and
- Vehicle/technology costs.

Although overall contract costs have increased as a result of these factors, moving to EOW garbage collection has provided opportunities for cost-avoidance. Based on the bids from proponents in the NRFP process, the selection of EOW collection provides an estimated annual contract cost avoidance in the range of $1.1 million, based on comparing the average prices of weekly and EOW to the final prices for EOW, submitted as part of the BAFO. This is in addition to the cost-avoidance associated with increases in diversion.

As previously noted, the extended site life for open Regional landfills resulting from increased diversion defers capital costs for new disposal infrastructure. As a point of reference, the Humberstone Landfill site vertical expansion will have a total cost of approximately $11.2 million. The total cost to construct the Durham-York Energy from Waste facility was $295 million and in 2018, the facility received 140,780 tonnes of waste at a net operating cost of approximately $9.2 million.

Increased diversion also reduces long-term costs for the care and control of landfill sites, due to improved leachate quality. Based on the Region’s Landfill Liability Model, the contamination life and monitoring would be reduced by approximately five (5) years, and thus produce an estimated cost avoidance for the two (2) Regional landfill sites of $1.3 million.

There is also a potential cost avoidance/cost reduction in the landfill contract with Walker Environmental due to an increase in the diversion of waste from disposal. This
may be offset by increased tonnages of food and organic waste collected at the curb and increased processing contract costs, unless the tonnages are reduced through food waste avoidance and other reduction initiatives.

**Innovation**

**NRFP Clauses**
The City of Niagara Falls has expressed concern that the Region did not include innovation as part of the NRFP. Overall, the NRFP provided flexibility to proponents to put forward innovation by not being prescriptive (i.e. defining vehicle type and specifications). In addition, during the evaluation process, points were awarded for innovation. Clauses existed in the NRFP for a green fleet, the Region’s willingness to participate in technology/service trials (i.e. trials of new collection equipment, or methods for collection and haulage that would improve service or reduce costs), and encouraging the use of alternative technologies and fuel sources to reduce GHG emissions. The clauses above relate to technological innovation, and Niagara Region also included additional innovative requests such as paying all workers (permanent and temporary) providing work on the contracts, not less than a living wage, as set by the Ontario Living Wage Network.

**Best Practices**
EOW garbage collection is a method of service delivery used to maximize existing landfill capacity, and is considered best practice in encouraging participation in the Blue/Grey Box and Green Bin programs. Of Niagara Region’s municipal comparators, 70 per cent (70%) provide EOW garbage collection. Weekly garbage collection provides little incentive for residents to utilize all three (3) waste streams, knowing all waste is collected weekly.

**Procurement Process**
The procurement process for the new waste collection contracts was innovative and a first for Niagara Region. Releasing a NRFP allowed Niagara Region to secure the best price for the services to be provided. As per resolutions previously approved by Council through Confidential Report PW 43-2019, Niagara Region used a multi-stage process to conduct the evaluation, selection and negotiation process for the NRFP. In the first stage, proposals were evaluated based on rated criteria, including proponent experience, performance history, capability to perform work, implementation plan, staffing plan and work plan, vehicles/equipment, and use of alternative technologies and fuels. Proposals were evaluated and scored separately for each collection area and collection scenario. Pricing for each collection area and collection scenario was scored...
separately. The rated criteria was worth 70% of the total score, and pricing was worth 30% of the total score. In the next stage, with direction from Council on the chosen collection scenario, EOW garbage collection, staff invited all short-listed proponents to submit their best and final offer (BAFO) at less than or equal to their original submitted pricing for Council’s chosen scenario. Pursuant to the BAFO process, BAFO submissions were evaluated solely on price, but the Total Final Score for the final ranking of proponents was based on the proponent’s BAFO pricing score and proponent’s original scores for Part A Criteria and Part B Criteria for the chosen Collection Scenario. Pricing was worth 60% and non-price criteria was worth 40%. The highest-ranking proponent for each Collection Area was invited to enter a final round of negotiations with Niagara Region as per the steps in the procurement process presented in the confidential report PW 62-2019.

**Single Stream and Cart-Based Collection**

The City of Niagara Falls has cited single stream, cart-based recycling as an innovation not considered by Niagara Region. Dual and single stream cart-based collection was considered as per reports WMPSC-C 11-2019 and PW 3-2019; however, due to the high cost of capital equipment required, this type of service was not recommended. Single stream recycling can be implemented without moving to a cart-based program, however collection efficiencies can only be achieved with automated vehicles. Appendix 2 provides details on single stream and cart-based collection systems based on research and experience in other municipalities.

**Cart-Based Collection**

Key concerns with cart-based service delivery include:

- Significant initial costs for purchase and distribution;
- On-going annual maintenance and replacement costs associated with carts;
- Reliance on residents to place containers properly at the curb for collection (grab bar facing road, properly spaced);
- Storage space requirements for multiple carts;
- Challenges with wheeling carts down long driveways or in snowy/icy conditions;
- Cart-based collection may not be efficient or feasible in certain areas;
- Increased costs for automated collection vehicles and maintenance requirements; and
- Additional staffing and resident education requirements to support the transition to a cart-based system.
Single Stream Recycling Collection
Key concerns with single stream recycling collection include:

- Increased contamination in carts resulting in a decrease in the Region’s revenues and difficulty with marketing recyclables;
- Costs associated with retrofitting Niagara Region’s Material Recovery Facility (MRF) from the current two-stream operation to a single-stream operation; and
- Increased processing costs for recyclable materials.

With recent declines in commodity prices and stricter end market standards, moving to a single stream recycling system could further decrease revenue, as single stream contamination rates have shown to be higher. The CIF reports that the 2019 Ontario average residual rate for single stream recycling is 30.3 per cent and the multi-stream residual rate is 9.5 per cent.

Blue Box Program Transition to Producer Responsibility

Under the Province’s Made in Ontario Environmental Plan, waste diversion programs, including the Blue Box Program, are expected to shift to the producer responsibility model. Under this model, Niagara Region would no longer be responsible for providing collection and processing of Blue Box materials. This would be the responsibility of the producers. Therefore, staff have not considered it advisable to invest in and implement major program changes.

A Special Advisor’s report on Recycling and Plastic Waste was released on August 6, 2019, providing recommendations for the province about timelines for transition, materials, targets, and collection requirements. The report stated that producers should provide curbside collection in municipalities in which the service exists, as of a specified date. The producers will be required to assume responsibility for collection services of Blue Box materials for every residence that received municipal Blue Box services prior to transition. The Resource Productivity and Recovery Authority’s (RPRA) Datacall, which is the source of data for determining the net Blue Box system cost and for allocating funding under the Blue Box Program Plan, will be locked down at some point (date unknown) to form the basis for the system in transition. On November 27, 2019, the Ministry of Environment and Climate Protection (MECP) hosted a webinar informing stakeholders about the Province’s next steps, confirming that municipalities will transition between 2023 and 2025. As discussions related to development of regulations
are currently underway with stakeholders, municipalities that undertake program changes at this time are at risk of assuming cost and service level implications.

**Operational Considerations of Niagara Falls Assuming Waste Management Services**

As a result of the City of Niagara Falls assuming the City’s waste management services there will be a duplication of staff to administer, manage and support the development and implementation of waste management programs and initiatives which already exist at the Regional level.

There are significant operational considerations for the City of Niagara Falls assuming the City’s waste management services, including, but not limited to:

- The procurement of a collection contractor;
- The procurement of contracts for the disposal of garbage, and processing of recycling, organics and Household Hazardous Waste (HHW);
- Building and operating a HHW depot will require approvals from MECP.
  - If the Blue Box program shifts to single stream, the closest single stream processing MRFs are in Burlington and the United States.
- The development of promotional and educational material and management of customer service calls, online inquiries, etc.;
- The sale and distribution of collection containers and garbage tags;
- The development and enforcement of a waste management by-law; and
- Mandatory reporting (i.e. RPRA Datacall).

Potential impacts for residents and businesses include:

- Decrease in customer convenience and accessibility for Niagara Falls residents and other users, who will not longer be able to use Regional facilities and services including the HHW program, Reusable Goods Drop-Offs, landfills and Drop-Off Depots;
- If changes to Niagara Falls’ diversion programs (i.e. single stream recycling) or other service level changes occur, inconsistent service across the region may cause confusion among service users in Niagara Falls and neighbouring municipalities. Also, improper sorting of materials related to inconsistent services may lead to increased contamination rates in the Blue Box and organics programs.
- Challenges arising from resident and other service user confusion regarding whom to contact for program information and to report service problems.
A backgrounder has been provided in Appendix 3 that includes an inventory of Waste Management programs and services provided by Niagara Region and the operational considerations of the City of Niagara Falls assuming these services.

Legal Considerations

The potential legal considerations associated with a decision by the City of Niagara Falls to withdraw from Regional Waste Management Services are provided in Confidential Report PW 15-2020.

Alternatives Reviewed

If Council does not support the staff recommendation, further information on the legal considerations can be found in Confidential Report PW 15-2020.

Relationship to Council Strategic Priorities

The considerations of the City of Niagara Falls withdrawing from Regional Waste Management Services relates Council’s Objective 3.2: Environmental Sustainability and Stewardship.

Other Pertinent Reports

- PW 3-2019 Proposed Base Services for Next Collection Contract
- WMPSC-C 5-2019 Stakeholder Engagement Results on Proposed Collection Service Changes
- PW 20-2019 Base and Enhanced Services for Next Collection Contract
- PW 43-2019 Confidential A Matter of Advice that is Subject to Solicitor-Client Privilege under s. 239(2) of the Municipal Act, 2001 – 2019 Waste Collection RFP – Next Steps
- PW 61-2019 Base Level Service for Waste Management Collection Contract
This report was prepared in consultation with Sara Mota, Program Financial Specialist, Brad Whitelaw, Program Manager, Policy and Planning, and reviewed by Lydia Torbicki, Manager, Waste Policy and Planning and Catherine Habermebl, Director, Waste Management Services.

Appendices

Appendix 1  City of Niagara Falls Request for Assumption of Waste Management Services
Appendix 2  Single Stream and Cart-Based Collection
Appendix 3  Overview of Niagara Region’s Waste Management System and Associated Considerations for the City of Niagara Falls