PORT COLBORNE

City of Port Colborne
Special Meeting of Committee of the Whole 08-19
(2019 Water/Wastewater Budget and Operating Budget)
Monday, March 4, 2019 – 5:30 p.m.
Council Chambers, 3rd Floor, 66 Charlotte Street

Agenda

1. **Call to Order:** Mayor William C. Steele
2. **Introduction of Addendum and Delegation Items:**
3. **Confirmation of Agenda:**
4. **Disclosures of Interest:**
5. **Delegations:**
6. **Item(s) for Consideration:**

Notes	Item	Description / Recommendation	Page
WCS MB EB RB GB FD AD DK HW	1.	**Corporate Services Department, Finance Division, Report 2019-29, Subject: Proposed 2019 Water and Wastewater Rates** That the 2019 Water and Wastewater Rates be approved as follows: Water Usage Rate $ 1.311 per m^3 Water Service Fixed Charge $384.65 annual fixed rate Wastewater Usage Rate $1.336 per m^3 Wastewater Service Fixed Charge $504.86 annual fixed rate That the 2019 Water and Wastewater budgets as presented in Corporate Services Department, Finance Division Report 2019-29, be approved; and That the Water and Wastewater Rates by-laws be approved. **Notes:** Presentation provided by Peter Senese, Director of Corporate Services.	3

WCS MB EB RB GB FD AD DK HW	2.	**Memorandum from Chris Lee, Director of Engineering and Operations and Darlene Suddard, Environmental Compliance Supervisor Re: Summary of 2018 Distribution System Unbilled Water** That the memorandum from Chris Lee, Director of Engineering and Operations and Darlene Suddard, Environmental Compliance Supervisor Re: Summary of 2018 Distribution System Unbilled Water, be received for information.	**21**
WCS MB EB RB GB FD AD DK HW	3.	**Engineering and Operations Department, Engineering Division, Report 2019-30 Subject: Memo on the Proposed Roadside Ditching Program and Associated Funding Methods** That a pilot project be initiated in 2019 to establish the validity of our estimated costs; and That the necessary equipment be rented as required; and That the funds to cover the Roadside Ditching program costs by Municipal Staff, (rental equipment, materials and Staffing costs) be covered by the existing budgeted funds for 2019, they being: 0-500-73430 -- Roadside Ditching - $236,000.00 0-500-73320 -- Culvert Repairs - $ 34,810 Total 2019 budget request - $270,810.	**27**

7. Presentation:

(a) Continuation of 2019 Draft Budget Deliberations
Peter Senese, Director of Corporate Services

8. Adjournment:

Note: The 2019 budget package is available on the City's website for public information.

PORT COLBORNE

CORPORATE SERVICES DEPARTMENT
FINANCE DIVISION

Report Number: 2019-29 **Date: March 4, 2019**

SUBJECT: PROPOSED 2019 WATER AND WASTEWATER RATES

1) PURPOSE:

This report is prepared to present to City Council the proposed 2019 Water and Wastewater Rates for the municipality.

2) HISTORY, BACKGROUND, COUNCIL POLICY, PRACTICES

The water and wastewater rate structures are fairly complex calculations which incorporate all of the components of the total expenditure and revenues, including historical flows, maintenance items, capital components, Regional rates for purchase of water, Regional costs for wastewater treatment, unbilled water and wastewater calculations, increases to salaries and operating costs, administrative charges and takes into consideration the Water Financial Plan approved by Council on June 28, 2010. As in the past, typical low, average and high consumption households are compared to indicate the impact of any rate increases.

3) STAFF COMMENTS AND DISCUSSIONS

In preparation of the 2019 budget, a review of the 2018 year-end was required to determine where changes were needed to continue to meet a financially stable water and wastewater budget in 2019 and future years. This will also pave the way for staff to prepare the next Water Financial Plan for the next 10 years which, under the requirements of the Safe Drinking Water Act, 2002, must be updated, approved by Council and submitted to the Ministry of Municipal Affairs and Housing by April 23, 2019, the City's deadline to renew the City's Municipal Drinking Water Licence and Drinking Water Works Permit.

Over the past years, the amount of cubic metres being used by customers, and thus the revenues from the sale of water, have declined. Actual sales revenues have not met the budgeted revenue and are not covering all expenses. Therefore, higher rate increases are being phased in and budgeted consumption of water sales is being reduced.

In 2017, the City's actual water revenue was $542,000 under budget compared to 2018 when the actual water revenue was $275,000 under budget. It is anticipated that 2019 will continue to reduce this number and be more in line with budgeted revenues. To avoid any deficit, some budgeted capital funds were not allocated to the capital reserves.

The shortfall in water revenue is partly attributed to the difference between the predicted annual water sales to customers and the actual annual water sales. Projected annual water sales have been reduced from 2.1 million cubic meters to 1.97 million cubic meters, while the actual water sales over the past few years have declined to 1.7 million cubic meters. This equals about $250,000 in revenue, and therefore the rates in 2017 and 2018 were not high enough to generate the predicted revenues.

Additionally, while the average amount of water purchased from the Region annually has levelled out at approximately 3 million cubic meters, the water sales to customers has averaged out to 1.7 or 1.8 million cubic meters, resulting is what is believed to be a higher amount of unbilled water than expected and budgeted. The City pays the Region for the unbilled water flows but does not recoup any sales.

Wastewater flows, as Council is aware, are very unpredictable, with weather having the greatest impact on annual fluctuations (Table 1). The wastewater costs charged by the Region are based on a 3-year rolling average of flows to the treatment facility and must be reconciled each year based on actual flows. Additionally, the Region determines the percentage share each local municipality contributes to the Region's total annual costs to treat wastewater and issues either an additional charge or a credit each year upon reconciliation. Therefore, depending upon the wastewater flows in a given year, and the percentage share assigned by the Region, customer sales revenue may not cover all expenses. It is very challenging to budget correctly and ensure the wastewater rates are enough to cover costs.

Weather has the greatest impact on flows due to extraneous flow, or inflow and infiltration, into the City's sanitary collection system. Extraneous flow is otherwise clean storm water or groundwater getting into the sanitary system. Extraneous flows enter the sanitary sewer by a number of pathways, some intentional, some not:

- infiltration of groundwater through cracks, unsealed pipe joints and other defects in the underground pipe network, including the sewer mains, manholes and sewer laterals
- inflow of water from inadvertent cross-connections with the storm sewer system or from surface drainage in through manhole lids
- inflow and infiltration of water from private-side sources including rooftop drainage (downspouts) and foundation drainage (connected weeping tile or sump pumps)

Table 1: Comparison of Total Annual Wastewater Volumes vs. Total Annual Precipitation – 2010-2018

Year	Total Wastewater Volume (m^3)	Year over Year % Increase (Decrease)	Three Year Rolling Average (m3)	Total Annual Precipitation (mm)	Year over Year % Increase (Decrease)
2010	3,784,855			902	
2011	4,953,455	31		1115	24
2012	3,870,263	(22)	4,313,000	628	(44)
2013	5,062,028	31	4,202,858	1191	90
2014	4,462,442	(12)	4,628,582	908	(24)
2015	4,401,125	(1.5)	4,464,911	862	(5)
2016	3,330,377	(24)	4,641,865	721	(16)
2017	4,388,882	32	4,064,648	1072	49
2018	4,547,023	3.6	4,040,128	1405	31

Table 1, above, illustrates the relationship between precipitation and wastewater flows, which can be directly attributed to extraneous flows. Note that there is not always a direct

correlation between the percent change in precipitation and the percent change in wastewater volume. The amount of extraneous flow that enters the wastewater collection system may depend upon whether the precipitation occurred in the form of snow, freezing rain or rain and whether or not the ground was frozen. However, although the percentages may not directly match, in general, years with more precipitation experience higher wastewater volumes, while years with less precipitation experience lower wastewater volumes.

The challenge the City, and most other municipalities in the Province, face is the fact that the storm sewer system is not as extensive or robust as it should be to enable sources of extraneous flows (downspouts, sump pumps) to be disconnected from the sanitary sewer system. For instance, in the urban area of Port Colborne, less than 40% of the City is serviced by storm sewer infrastructure, therefore, many homes and businesses discharge their downspouts, sump pumps etc. into the sanitary sewer system, and during years with high amounts of precipitation, the flows the City sends to the Region's wastewater treatment facility increase, and the City pays more. Properties cannot simply be forced to disconnect their downspouts etc. from the sanitary system, as there is not sufficient capacity in the existing ditches, soak away drains etc. to efficiently remove the excess stormwater – and flooding would likely occur.

A dedicated storm sewer fund is required to build the much needed infrastructure so that extraneous flows, and the associated wastewater treatment costs, can be reduced. Engineering staff have been leveraging funding whenever practical and available, in order to either disconnect sources of extraneous flow from the sanitary sewer system, or build storm sewer infrastructure. The Nickel Storm project, which is currently in the final stages, in addition to the Arena project that was completed in 2011-2012, are two recent examples of projects that have been undertaken to reduce extraneous flows. Staff will be coming forward in 2019 with a report to council detailing the need for a storm sewer fund, and providing options for different funding models. Investments in storm sewers will have direct benefits in reducing extraneous flows.

Extraneous flows are essential "lost revenue" as the City cannot meter wastewater flows (with the exception of some large industrial customers who have separate flow meters) and can only bill customers for wastewater based on their metered water usage.

In 2017, the City's actual wastewater revenue was $1,280,000 under the budget compared to 2018 where the actual wastewater revenue was $673,000 under budget. It is anticipated that 2019 will continue to reduce this number and be more in line with budgeted revenues. To avoid any deficit, some budgeted capital funds were not allocated to the capital reserves.

Wastewater usage revenues, based on metered water volumes, and on separately metered industrial customers, have in the past been predicted to be approximately 2.8 million cubic metres whereas revenue have now declined from 2.4 million to 1.8 million cubic metres in 2016, 1.4 million in 2017 and to 1.2 million in 2018. The decline in actual revenue is due in part from industrial facilities reducing and/or eliminating wastewater flows into the system which helped subsidize the unaccounted for flows. The industrial sector that once contributed approximately 50% of wastewater flows is now down to 6% and has an impact on the rates to generate enough revenue to cover the cost of unaccounted for wastewater.

In 2017, a major industrial customer came off the wastewater system by building their own treatment plant, which accounted for approximately 500,000 cubic metres and $600,000 in less revenue. This contributed to the 2017 and 2018 deficits. This will continue to have an impact on the wastewater budget for 2019 as the rates get adjusted over a period of time to not have a large impact on the residential homeowner as was required in 2018 as Staff do not see costs being reduced.

Staff plan to manage the increases required to generate sufficient revenue for both water and wastewater budgets, to be sustainable in the future and in anticipation of a new 10-year Water Financial Plan in 2019. Staff are phasing in the actual unbilled/unaccounted for water and wastewater percentages, especially with not knowing the full effect of the industrial facilities coming off the system and phasing in the known sales revenue reductions. The 2018 staff addition is completed in phasing in over two years, limiting operating expenditure increases for both water and wastewater budgets, no increase to any capital contributions and applying the wastewater rate stabilization reserve of $200,000 to the 2019 wastewater capital budget.

The Regional increases to both water and wastewater have been incorporated into the costs of purchasing water and the treatment of wastewater. The Regional increase was 2.77% for water and 6.65% for wastewater.

Water and Wastewater Rate Structure

As discussed above, there are many issues to consider for the 2019 budget and future budgets to ensure a sustainable financial model. The following issues are being addressed in this budget as recommended by staff:

- There was no increase in the 2019 capital allocation of funds to limit expense increases, although capital increases are required in future budgets for capital asset management purposes to reduce the infrastructure deficit of what the City currently funds for capital to what is required under the City's Asset Management Plan for future capital replacements.
- Completed the phase in for 9 months for one Certified Water/Wastewater Operator as discussed in the 2018 budget to increase Operators by one staff. The budgets include the cost of a new Operator for 9 months as 3 months were budgeted for the last quarter of 2018
- Region increase in water purchase rate of 2.47% and wastewater purchase rate of 4.01% based on the 3-year rolling average and percentage allocated to the City of the total Regional flows is incorporated into the budget

Staff recommends rate increases in 2019 for an annual budget increase of 4.49% or $69 annually which includes the addition of one Certified Water/Wastewater Operator for the balance of 9 months. In 2015, Council approved the rate stabilization funding into reserves to be added to the fixed charge to remain on the rates and be allocated in future years to either increase the rate stabilization reserve, the wastewater reconciliation reserve and/or future capital. The 2019 budget requires the allocation of $200,000 from the wastewater rate stabilization reserve to the wastewater capital budget. Staff have phased in the actual unbilled water and wastewater percentages, phased in the known sales revenue

reductions, phased in the staff addition and accounted for the Regional increases for water purchases and wastewater treatment.

The proposed operating budget rates for 2019 have an overall annual increase of $69.42 or 4.49% for the average user of 0.75 cubic metres per day. This incorporates an increase to the water usage rate from $1.274 to $1.311 or $10.09 annually, an increase to the annual water fixed charge from $369.33 to $384.65 ($15.33), the wastewater usage rate from $1.295 to $1.336 or $11.13 annually and the annual wastewater fixed charge from $471.98 to $504.86 ($32.88).

Water System

Usage Rates

The proposed usage rates for the water system were generated by incorporating the 2019 Regional water rate, which is increased by 2.47% from $0.566/m^3 to $0.580/m^3. The fact that the 3-year average water flow forecast has decreased slightly from 3,085,923 m^3 to 3,080,817 m^3 (5,106 m^3) and the Regional water rate to the municipalities increased, there is a slight increase in the cost of water purchased from the Region amounting to $58,583.

The proposed usage rates include the City's 2019 budget expenditures in general operations and administration with a net operating budget increase of $108,170 (2018-decrease of $21,662). The actual budget increase in operations is the result of a 2.5% cost of living increase and the cost (9 months) for one new Certified Water/Wastewater Operator in operating expenditures.

The City's non billable and unaccounted for water loss has fluctuated between 27% and 40% over the last few years and therefore the 2019 rate structure is compiled based on a 36% (2018-36%) unbilled water flow projections. The annual water purchase volumes have stabilized around 3 million m^3. Although, 2016 water flows were down to approximately 2.8 million m^3 and 3.2 million m^3 in 2017 and 2018, the 3-year average is still calculated at 3 million m^3.

In establishing the 2019 estimated water purchases, staff used the 3-year average of water volumes at 3,080,817 (2018 - 3,085,923m^3) to establish the usage rate.

Comparison to Water Financial Plan

Based on the Regional and City expenditures, and the required changes discussed previously in this report, the water usage rate has increased to $1.311 from $1.274, an increase of $0.037 (2018 - $0.101) or 2.89% ($10.09) above 2018 rates. This rate is considerably lower than the Water Financial Plan proposed for 2019 at $1.348 per cubic meter. Although, with the increase it does bring the rate closer to the plan. This is due to actual water purchases being considerably higher than anticipated in the Plan and the fact that the water purchases have stabilized at a higher water volume than what was anticipated. In addition, as discussed previously, the actual sales have been considerably lower than the predicted and budgeted sales. See Schedule B and C attached.

The fixed cost charge in the proposed budget has an increase from $369.33 to $384.65 or $15.33 (2018 - $18.21) or 4.19% which is higher than the Financial Plan of 1.05%. The

Water Financial Plan proposed a 0.81% increase to the overall cost to the average consumer, including the fixed cost, which being the 10th year of the financial water plan, did not reflect appropriately of the cost increases and sales reductions over the years.

Overall, the proposed budget estimates that an average user will have an annual cost of approximately $743.54 (2018-$718.09) in comparison to the Water Financial Plan for 2019 with an annual cost of $714.03 (2018-$708.26). Therefore, the proposed rate structure and budget is actually more in line with the anticipated annual cost to the average user from the Water Financial Plan approved by Council in 2010. See Schedule C attached.

Fixed Charge

The water service fixed charge for capital projects/programs that includes vehicle replacements, debentures, unbilled/unaccounted for water flows, capital projects, fixed administration and Regional fixed water purchases will increase from $369.33 to $384.65. This is an annual increase of $15.33 or $1.28 a month.

The fixed charge annual increases are based on the 2010 Water Financial Plan, which allocates an increase of net costs to the fixed charge over the next 10 years to 50% of costs. This budget increases the net fixed costs to 48.8% from 48.5% of total budget costs in 2019 (Schedule B). This is related to the Region moving towards water purchases being a fixed cost to the municipality, which was 51.7% in 2018 and 51.9% in 2019 of the Regional cost of water purchases being allocated to the fixed charge. The $384.65 proposed fixed charge rate is higher than the Council approved Water Financial Plan proposed rate at $345.01 (Schedule C). This proposal of fixed charges better aligns with meeting the Asset Management Plan, the current Infrastructure Needs Study and PSAB capital allocations for replacement of infrastructure in the future. It also takes into account the additional debenture cost for the completion of the meter replacement program.

In 2009, the Region of Niagara introduced a new water rate setting and cost recovery method to be charged to the lower tier municipalities. In previous years the Region billed the City for actual flow usage based on a unit rate. In 2009, the Region established a cost recovery based on 25% fixed cost recovery plus the remaining 75% costs, recovered from a unit rate based on actual water volume usage.

The Region would like to move to a larger fixed component for billing of water stating, "that the majority of the Region's system costs are fixed, in the event that actual volumes are less than the forecast, the Region will incur a requisition deficit because billings to area municipalities will be inadequate to fund the Region's system operating and capital costs". The Region continued to use the above method for 2010 to 2018 and has approved the same methodology in 2019. The Region revisited the methodology for the 2019 budget with Area Treasurers with the result being to keep the status quo in methodology.

The Regional fixed cost component attributed to the City of Port Colborne should not have a great impact on the consumer water rate as the City's proposed rate structure currently recovers approximately 48.8% (48.5% in 2018) of the total cost on the fixed charge of $384.65 per customer. The remaining 51.2% is recovered from the water usage rates passed on to the consumer. As it is anticipated that the Region may progress toward at least a 50% fixed cost to municipalities from the current 25%, staff have prepared the budget, phasing in the fixed cost over a number of years as approved in Council's Water Financial Plan.

Average User Annual Cost

The water rate has a blended increase for capital and usage rates of 3.54% (2018-6.80%) for the average residential user, which is based on a usage rate increase of 2.89% or $10.09 and the fixed cost charge increase of $15.33 or 4.15%. The total increase amounts to a $25.42 annual increase or $2.12 a month.

Schedules

In addition to Schedule C, the Water Financial Plan, attached to this report are Schedules B, D and E. The Analysis of Water Systems Costs (Schedule B) provided some comparisons year over year which shows that the overall budget increase in net costs is 3.41% (2018 – 2.35%) compared to the increase proposed in the Water Financial Plan of 0.77%. The Water System Budget Review (Schedule D) compares 2013 to 2018 actual results and a comparison between the 2018 and 2019 budgets. The Water Rate Calculations 2019 (Schedule E) provides a simple display of the 2019 water budget with costs allocated for consumption (usage rate) and fixed costs (fixed charge rate) to calculate both the usage and fixed charge rates.

Wastewater System

Usage Rates

The proposed rates for the wastewater system were generated by incorporating the 2019 Regional wastewater budgeted costs. The overall fixed cost to the City for wastewater treatment increased $167,079 from $3,909,663 to $4,076,742 (4.27%).

As mentioned previously, and illustrated in Table 1, the wastewater flows are based on a 3-year rolling average and are affected by weather condition fluctuations from year to year, which affects the extraneous flows being directed to the wastewater system.

The 3-year average decreased from approximately 4,628,582 m^3 in 2014 to 4,464,911 m^3 in 2015 and increased to 4,641,865 in 2016, reduced again in 2017 to 4,064,648 m^3 and decreased to 4,040,128 m^3. The 3-year average based on 2016, 2017 and 2018 flows has increased to 4,088,761 m^3. The lower average is due to low flows in 2016 of 3.3 million cubic meters and being a drier year. As per the above, wastewater flows continue to fluctuate year to year making it difficult to predict. The Region is billing the City in 2019 based on 3,944,000 m^3, increased from 3,934,000 m^3 in 2018 and is included in the 2019 budget.

The proposed rates include the City 2019 budget (Schedule F) increase to general operations with a net operating budget increase of $17,789. The actual budget increase in operations is the result of a 2.1% cost of living increase, net of expense reductions and the cost (9 months) for one new Certified Water/Wastewater Operator in operating expenditures. With the Regional and City operating costs increased, the matters previously discussed regarding the meeting of budgeted revenues, customer sales revenue which are not covering all expenses, other sources of unaccounted for wastewater flows and the decline in actual revenue due in part from industrial facilities

reducing and/or eliminating wastewater flows into the system, continue to be a concern for future budgets.
The wastewater usage rate has increased to $1.336 from $1.295 per cubic metre, an increase of $0.041 (2018 - $0.045) above 2018 rates. This is reflected in the usage rate increase of 3.14% or $11.13 (2018 - $12.18) to the average user in 2019.

Fixed Charge

The wastewater service fixed charge for capital projects, rate stabilization, equipment, extraneous flows, CSO Programs and debentures increased 6.97% or $32.88 from $471.98 to $504.86. This increase is mainly due to a shift in Regional costs for extraneous flows from the usage rate to the fixed rate in the amount of $108,767 and the reduction of $100,000 from the 2018 allocation of $300,000 from the rate stabilization reserve to $200,000. This accounts for the inconsistency of the 3-year averages for the treatment of wastewater, unaccounted for wastewater and the reduction in industrial wastewater revenue.

The Regional cost recovery model for wastewater bases the charges to the City on a 100% fixed cost. As previously mentioned, it is based on previous 3-year average wastewater volumes (October 2015 through September 2018). The increase in the 2018 wastewater flows caused a decrease to the City's share of Regional costs with a slightly higher 3-year average being 3,944,000 m^3 (2018 – 3,934,000 m^3) for 2019. As mentioned previously, the 3-year average includes 2016 flows, which were extremely low due to a dry year at 3,330,000 m3 whereas the flows for the last 2 years average 4.4 million m3, and drives up actual costs.

The City's unaccounted for and unbilled wastewater flows have fluctuated between 45% and 68% over the years and therefore the 2019 rate structure is compiled based on a 56% (2018-56%) unbilled wastewater flow projections.

Average User Annual Cost

The wastewater rate has a blended increase for capital and usage rates of 5.33% (2018 - 9.75%) for the average residential user which is based on a usage rate increase of 3.14% or $11.13 and the fixed cost charge in the proposed budget increase of $32.88 or 6.97%. The total increase amounts to a $44.01 annual increase or $3.67 a month.

2019 Rates

The rates proposed in this report for the average user consuming 0.75 m^3 per day, will have an approximate increase of $69.42 (2018 - $119.12) for the year or $5.78 (2018 - $9.93) per month or 4.49% (2018 – 8.36%) increase. Schedule A provides the impact on the cubic meter usage for various users for the proposed changes for 2019 compared to 2018.

4) OPTIONS AND FINANCIAL CONSIDERATIONS:

a) Do nothing.

The water and wastewater rates would remain at the 2018 levels resulting in a shortage of revenues and a deficit to the water and wastewater operating systems.
(Not recommended)

b) Other Options

1. Council can approve alternate rates for water and wastewater. This is not recommended as each system is required to be self-sufficient and currently the revenues are not being attained.

2. Staff is presenting for Council's consideration a reasonable budget and rate structure which takes into consideration the phasing generation of sufficient revenue for both water and wastewater budgets to be sustainable in the future and in anticipation of the new 10-year Water Financial Plan to be prepared by staff and presented to Council for approval in 2019. Phasing in the actual unbilled/unaccounted for water and wastewater percentages, especially with not knowing the full effect of the industrial facilities coming off the system, phasing in the known sales revenue reductions, phasing in the staff addition requested, did not increase any capital contributions and applying the wastewater rate stabilization reserve to the 2019 wastewater capital budget. The water rates were adjusted in accordance with the Water Financial Plan approved by Council.

5) COMPLIANCE WITH STRATEGIC PLAN INITIATIVES

To comply with the June 21, 2010 Water Financial Plan as approved by Council.

6) ATTACHMENTS

- Schedule A - Proposed Water & Wastewater Rates (typical consumptions)
- Schedule B - Analysis of Water System Costs
- Schedule C - Anticipated Future Water Rates (Water Financial Plan-2010)
- Schedule D - Water System Budget Review
- Schedule E - Water Rate Calculations 2019
- Schedule F - Wastewater System Budget Review
- Schedule G - Water and Wastewater Reserves at December 31, 2018

7) *RECOMMENDATION*

That the 2019 Water and Wastewater Rates be approved as follows:

Water Usage Rate	***$ 1.311***	***per m^3***
Water Service Fixed Charge	***$ 384.65***	***annual fixed rate***
Wastewater Usage Rate	***$ 1.336***	***per m^3***
Wastewater Service Fixed Charge	***$ 504.86***	***annual fixed rate; and***

That the 2019 Water and Wastewater budgets as presented in Corporate Services Department, Finance Division Report 2019-29, be approved; and

That the Water and Wastewater Rates by-laws be approved.

8) SIGNATURES

Prepared on February 25, 2019 by:

Peter Senese
Director of Corporate Services

Reviewed by:

Chris Lee
Director of Engineering & Operations

Reviewed and Respectfully Submitted:

C. Scott Luey
Chief Administrative Officer

2019 Proposed
Water and Wastewater Rates

SCHEDULE A

total fixed water costs at 48.8% includes Regional costs fixed at 51.9%

2018 Annual Cost	2018 Rate		2019 Rate	2019 Annual cost	Annual Increase	Total %
					budget with 9 mths new operator,adjustments & expense reductions	
Average User .75 Cubic Meter Per Day						
$1,544.55				$1,613.97	$69.42	4.49%
$348.74	$1.274	WATER USAGE RATE	$1.311	$358.82	$10.09	2.89%
$369.33	$369.33	WATER SERVICE FIXED CHARGE	$384.65	$384.65	$15.33	4.15%
$354.50	$1.295	SEWER USAGE RATE	$1.336	$365.64	$11.13	3.14%
$471.98	$471.98	SEWER SERVICE FIXED CHARGE	$504.86	$504.86	$32.88	6.97%
High Usage 1.2 Cubic Meter Per Day						
$1,966.49				$2,048.64	$82.15	4.18%
$557.98	$1.274	WATER USAGE RATE	$1.311	$574.12	$16.14	
$369.33	$369.33	WATER SERVICE FIXED CHARGE	$384.65	$384.65	$15.33	
$567.21	$1.295	SEWER USAGE RATE	$1.336	$585.02	$17.81	
$471.98	$471.98	SEWER SERVICE FIXED CHARGE	$504.86	$504.86	$32.88	
Low Usage 0.58 Cubic Meter Per day						
$1,385.15				$1,449.76	$64.61	4.66%
$269.69	$1.274	WATER USAGE RATE	$1.311	$277.49	$7.80	
$369.33	$369.33	WATER SERVICE FIXED CHARGE	$384.65	$384.65	$15.33	
$274.15	$1.295	SEWER USAGE RATE	$1.336	$282.76	$8.61	
$471.98	$471.98	SEWER SERVICE FIXED CHARGE	$504.86	$504.86	$32.88	
Single User .25 Cubic Meter Per day						
$1,075.72				$1,131.00	$55.28	5.14%
$116.25	$1.274	WATER USAGE RATE	$1.311	$119.61	$3.36	
$369.33	$369.33	WATER SERVICE FIXED CHARGE	$384.65	$384.65	$15.33	
$118.17	$1.295	SEWER USAGE RATE	$1.336	$121.88	$3.71	
$471.98	$471.98	SEWER SERVICE FIXED CHARGE	$504.86	$504.86	$32.88	
	One Cubic Meter Per day					
$1,778.96				$1,855.46	$76.49	4.30%
$464.98	$1.274	WATER USAGE RATE	$1.311	$478.43	$13.45	
$369.33	$369.33	WATER SERVICE FIXED CHARGE	$384.65	$384.65	$15.33	
$472.67	$1.295	SEWER USAGE RATE	$1.336	$487.51	$14.84	
$471.98	$471.98	SEWER SERVICE FIXED CHARGE	$504.86	$504.86	$32.88	

SCHEDULE B

City of Port Colborne
Analysis of Water System Costs

	Budgeted 2017		Budgeted 2018		Budgeted 2019		Financial Plan Approved By Council in 2010 2016		2017		2018		2019	
Budgeted Expenditures														
City Operating costs	1,422,963	29.1%	1,394,626	28.3%	1,504,796	29.5%	1,272,061	28.1%	1,310,221	28.2%	1,349,530	28.3%	1,390,015	28.9%
Regional Water Purchases	2,265,352	46.4%	2,316,757	47.0%	2,375,340	46.6%	2,505,485	55.4%	2,580,649	55.5%	2,658,069	55.8%	2,737,811	57.0%
Capital Contribution-deficit	285,226	5.8%	285,930	5.8%	285,930	5.6%								
Capital Contribution	821,380	16.8%	497,320	10.1%	497,320	9.8%		0.0%	210,209	4.5%	214,414	4.5%	218,702	4.6%
Amortization		0.0%		0.0%		0.0%	374,800	8.3%	379,465	8.2%	377,295	7.9%	377,758	7.9%
Water Study	-	0.0%	-	0.0%	-	0.0%	206,000	4.6%		0.0%		0.0%		0.0%
Debt Reserve					70,000	1%								
Long Term Debt Payments	88,963	1.8%	434,480	8.8%	364,380	7.1%	166,255	3.7%	166,635	3.6%	165,788	3.5%	77,672	1.6%
Total Costs	4,883,884	100%	4,929,113	100%	5,097,766	100%	4,524,601	100%	4,647,179	100%	4,765,096	100%	4,801,958	100%
Other Revenue	-114,275		-47,600		-49,600		-72,183		-72,905		-73,634		-74,371	
Net Costs	4,769,609		4,881,513		5,048,166		4,452,418		4,574,274		4,691,462		4,727,587	
Percentage Increase in Net Costs	1.96%		2.35%		3.41%		2.57%		2.74%		2.56%		0.77%	
Net Costs allocated to Fixed Rate	47.20%		48.50%		48.80%		45.67%		46.13%		46.45%		46.57%	
Net Costs allocated to Usage Rate	52.80%		51.50%		51.20%		54.33%		53.87%		53.55%		53.43%	
Fixed Regional Water Purchases	49.60%		51.70%		51.90%		51.34%		52.45%		53.48%		55.80%	
Water Consumptions														
Estimated Water Purchases m3	3,068,803		3,085,923		3,080,817		2,640,000		2,640,000		2,640,000		2,640,000	
Unbilled UFW m3	920,641	30%	1,110,932	36%	1,109,094	36%	765,600	29%	765,600	29%	765,600	29%	765,600	
Estimated Water Sold m3	2,148,162		1,974,991		1,971,723		1,874,400		1,874,400		1,874,400		1,874,400	
	-0.79%		-8.06%		-0.17%		0.00%		0.00%		0.00%		0.00%	

SCHEDULE C

City of Port Colborne
Anticipated Future Water Rates

	Actual 2013	Actual 2014	Actual 2015	Actual 2016	Actual 2017	Actual 2018	Proposed 2019	Financial Plan Approved By Council in 2010 2011	2012	2013	2014	2015	2016	2017	2018	2019
Cost per cu.m	**$1.071**	**$1.093**	**$1.123**	**$1.147**	**$1.173**	**$1.274**	**$1.311**	**$1.148**	**$1.181**	**$1.216**	**$1.242**	**$1.268**	**$1.291**	**$1.315**	**$1.340**	**$1.348**
		2.05%	2.74%	2.14%	2.27%	8.61%	2.90%		2.87%	2.96%	2.14%	2.09%	1.81%	1.86%	1.90%	0.60%
		2.44%	18.15%	2.53%	2.49%	5.19%	4.15%		6.74%	7.65%	4.23%	3.88%	3.51%	3.76%	3.27%	1.05%
Annual fixed cost	**$276.09**	**$282.82**	**$334.14**	**$342.58**	**$351.12**	**$369.33**	**$384.65**	**$247.42**	**$264.10**	**$284.31**	**$296.33**	**$307.82**	**$318.62**	**$330.61**	**$341.43**	**$345.01**
Annual Cost .75 m3 per day	$293.19	$299.21	$307.42	$313.99	$321.11	$348.76	$358.89	$314.27	$323.30	$332.88	$340.00	$347.12	$353.41	$359.98	$366.83	$369.02
Total Annual cost	$569.28	$582.03	$641.56	$656.57	$672.23	$718.09	$743.54	$561.69	$587.40	$617.19	$636.33	$654.94	$672.03	$690.59	$708.26	$714.03
Percentage Increase		2.24%	10.23%	2.34%	2.38%	6.82%	3.54%		4.58%	5.07%	3.10%	2.92%	2.61%	2.76%	2.56%	0.81%

City of Port Colborne

SCHEDULE D

Water System Budget Review

	2013 Actual	2014 Actual	2015 Actual	2016 Actual	2017 Actual	2018 Actual	3 year ave flows 48.5% fixed 2018 Budget	3 year ave flows 48.8% fixed 2019 Budget
water usage rate	$1.071	$1.093	$1.123	$1.147	$1.173	$1.274	$1.274	$1.311
water service fixed charge (Annual)	$276.09	$282.82	$334.14	$342.58	$351.12	$369.33	$369.33	$384.65
Water Purchase Volumes (m3)	2,899,770	3,131,010	3,248,500	2,826,900	3,182,370	3,233,180	3,085,923	3,080,817
Fees	$775	$800	$475	$555	$550	$600	$600	$600
Other	$3,789	$1,386	$19,468	$6,659	$12,163	$2,792	$6,000	$6,000
Capital Reserve	$145,864	$135,717	$33,203	$14,530	$29,123	$0		
Operating Reserve		$149,620	$0	$0	$0	$0		
Grants		$72,900	$0	$0	$0	$0		
Water Revenue - RATE	$2,093,338	$1,930,018	$2,016,172	$2,005,155	$1,978,271	$2,199,721	$2,515,978	$2,584,470
Water Revenue - FIXED	$1,771,660	$1,822,626	$2,159,927	$2,347,970	$2,282,776	$2,407,161	$2,365,535	$2,463,696
Water Revenue - OTHER	$50,089	$53,628	$52,529	$53,550	$35,055	$46,782	$41,000	$43,000
TOTAL REVENUE	$4,065,515	$4,166,695	$4,281,774	$4,428,419	$4,337,938	$4,657,056	$4,929,113	$5,097,766
Purchase Water - Region	$1,557,176	$1,681,352	$1,744,445	$1,566,103	$1,763,033	$1,829,980	$1,746,633	$1,786,874
Fixed Water Purchases - Region	$517,719	$520,087	$538,656	$565,427	$565,235	$570,124	$570,124	$588,466
Vehicle operation	$58,856	$66,544	$55,546	$54,325	$72,259	$86,959	$59,634	$62,517
Mains Maintenance	$180,125	$150,101	$142,285	$154,296	$131,768	$174,552	$213,843	$178,917
Fire Hydrants	$42,486	$58,651	$71,297	$57,634	$51,129	$85,100	$76,535	$76,565
Meters	$120,575	$138,214	$100,230	$81,863	$106,383	$108,502	$92,271	$93,045
Services (including thaws)	$74,646	$203,178	$481,330	$123,648	$82,014	$165,571	$129,189	$131,673
Leak	$50,838	$34,570	$20,487	$28,996	$21,997	$20,270	$46,537	$46,705
Leak Repairs	$118,495	$96,947	$98,320	$73,827	$41,953	$72,531	$96,276	$96,674
Billing and Collection	$136,995	$142,729	$153,498	$199,303	$149,523	$157,122	$153,807	$156,827
Locates	$41,955	$50,325	$54,146	$51,177	$51,489	$65,936	$7,702	$10,368
Admin	$367,256	$358,417	$472,373	$400,317	$446,052	$372,882	$497,297	$629,765
Capital study	$35,161	$22,098	$0	$0	$0	$0	$0	$0
Capital Debentures (debt reserve)	$87,734	$89,146	$88,986	$86,907	$88,964	$88,116	$88,116	$70,000
Capital - tsf to Reserve (deficit)	$20,000		$279,633	$279,633	$0	$4,248	$285,930	$285,930
Capital Projects/Programs	$101,847	$186,519	$93,203	$71,000	$0	$72,368	$72,368	$72,368
Capital Construction/Debentures	$542,000	$542,000	$542,000	$671,324	$755,641	$703,215	$703,215	$721,231
Capital Vehicle Replacement	$51,000	$51,000	$51,000	$52,000	$0	$53,000	$53,101	$53,101
Capital Water Meter Replacement Prog		$40,000	$40,000	$15,000	$0	$15,000	$15,000	$15,000
Water recoverable	$7,830	$6,819	$8,828	$4,951	$2,254	$4,873	$6,673	$6,765
Elm Street	$3,405	$3,166	$2,965	$4,459	$2,626	$2,209	$7,531	$7,571
Elizabeth St	$14,391	$4,465	$5,003	$5,309	$5,618	$4,498	$7,331	$7,404
TOTAL EXPENDITURE	$4,130,490	$4,446,328	$5,044,231	$4,547,499	$4,337,938	$4,657,056	$4,929,113	$5,097,766
Surplus (Deficit)	(64,975)	(279,633)	(762,457)	(119,080)	-	-	$0	$0
City Operations	$1,163,200	$1,148,692	$1,593,836	$1,179,341	$1,088,174	$1,270,831	$1,347,026	$1,455,196
City Capital	$691,878	$682,146	$1,061,619	$1,161,334	$844,605	$935,947	$1,217,730	$1,217,630
Regional costs	$2,074,895	$2,201,439	$2,283,101	$2,131,530	$2,328,268	$2,400,104	$2,316,757	$2,375,340
Total costs net of other revenue	$3,929,973	$4,032,277	$4,938,556	$4,472,205	$4,261,047	$4,606,882	$4,881,513	$5,048,166
Region Share of costs	52.80%	54.60%	46.23%	47.66%	54.64%	52.10%	47.46%	47.05%
City Share of costs	47.20%	45.40%	53.77%	52.34%	45.36%	47.90%	52.54%	52.95%

SCHEDULE E

City of Port Colborne
Water Rate Calculations
2019

	Total Costs	Consumption Costs	Fixed Costs
Amortization/Capital	497,320		497,320
Rate Stabilization/Capital	285,930		285,930
Contract Services	153,729	153,729	
Salaries and benefits	785,775	785,775	
Regional Water Purchases	2,375,340	1,143,600	1,231,740
Interdepartmental			
Administration	264,060	180,942	83,118
Fleet Charges	61,701	61,701	
Debt Reserve	70,000		70,000
Long term debt	364,380	68,791	295,589
General Admin	43,459	43,459	
Materials and supplies			
Utilities and telephone	8,721	8,721	
Repairs and Maintenance	109,738	109,738	
Materials, parts and supplies	49,513	49,513	
Other	10,000	10,000	
Small Tools/Equipment	18,100	18,100	
	5,097,766	2,634,069	2,463,697
Other Revenues	- 49,600	- 49,600	-
	5,048,166	2,584,469	2,463,697
Estimated Annual Water Sold - m3		1,971,723	
Total Customers			6,405
Water Usage Rate		**1.311**	
Annual Water Service Fixed Charge			**384.65**

SCHEDULE F

City of Port Colborne Wastewater System Budget Review	2013 Actual	2014 Actual	2015 Actual	2016 Actual	2017 Actual	2018 Actual	2018 Budget	2019 Budget
Fees	$4,628	$10,373	$2,735	$534	$1,335	$6,510	$2,500	$4,000
Sewer Revenue - RATE	$2,635,210	$2,660,198	$2,645,041	$2,323,346	$1,727,933	$1,571,404	$2,210,299	$2,286,400
Sewer Revenue - FIXED	$2,002,305	$2,049,590	$2,380,452	$2,605,353	$2,612,682	$2,962,497	$2,997,089	$3,205,856
Rate Stabilization Reserve						$308,248	$300,000	$200,000
Operating reserve		$67,151	$0	$0	$0	$0		
Reconciliation Reserve	$384,000							
Leachate Credits						$94,045		
Sewer Revenue - OTHER	$9,511	$10,440	$7,450	$5,774	$10,045	$17,179	$8,000	$10,000
TOTAL REVENUE	$5,035,654	$4,797,752	$5,035,678	$4,935,007	$4,351,995	$4,959,883	$5,517,888	$5,706,256
Wastwater treated - Region	$3,870,558	$3,584,169	$3,771,549	$3,959,718	$3,929,621	$3,909,663	$3,909,663	$4,076,742
Reconciliation cost - Region	$199,000	$214,000	$456,000	-$544,000	-$181,000	$160,000		
Johnson Pumping station	$21,744	$33,573	$17,603	$16,697	$24,148	$19,549	$37,837	$32,958
Sugarloaf Pumping station	$7,823	$18,884	$1,894	$3,681	$10,527	$5,221	$10,704	$10,842
Scholfield Pumping station		$17,943	$27,562	$14,941	$21,441	$31,374	$36,300	$37,125
Vehicle operations	$13,979	$12,716	$6,696	$19,707	$18,628	$11,999	$20,490	$20,231
sewer mains	$33,500	$21,057	$11,252	$16,664	$5,940	$31,902	$27,118	$27,186
laterals	$84,563	$72,665	$58,434	$56,500	$56,023	$115,802	$100,175	$101,673
manholes	$33,707	$31,081	$34,999	$83,999	$9,161	$7,316	$74,251	$75,484
Locates	$28,059	$38,692	$37,555	$39,326	$37,018	$46,666	$68,646	$39,193
general operation	$251,277	$282,525	$303,702	$287,832	$251,093	$221,190	$348,018	$398,859
recoverable works	$2,130	$3,474	$1,532	$1,578	$1,595	$1,627	$3,129	$3,170
extraneous flows	$154,451	$159,661	$113,095	$123,369	$107,992	$72,421	$129,627	$130,863
Capital - tsf to Reserve (deficit)			$202,189	$202,189	$59,808	$0	$206,357	$206,357
Capital Main Construction	$270,000	$270,000	$270,000	$283,000	$0	$288,433	$288,433	$288,433
Capital Projects-equip	$34,500	$34,500	$34,500	$36,000	$0	$36,720	$36,720	$36,720
Capital Projects	$205,000	$205,000	$205,000	$215,000	$0	$0	$220,420	$220,420
Capital Debentures	$0	$0	$0	$0	$0	$0	$0	$0
TOTAL EXPENDITURE	$5,210,291	$4,999,940	$5,553,562	$4,816,201	$4,351,995	$4,959,883	$5,517,888	$5,706,256
Surplus (Deficit)	-$174,637	-202,188	-517,884	118,806	0	0	$0	$0
City Operations	$617,094	$671,458	$604,139	$657,986	$532,186	$541,378	$845,795	$863,584
City Capital	$509,500	$509,500	$711,689	$736,189	$59,808	$325,153	$751,930	$751,930
Regional costs	$4,069,558	$3,798,169	$4,227,549	$3,415,718	$3,748,621	$4,069,663	$3,909,663	$4,076,742
Total costs net of other revenue	$5,196,152	$4,979,127	$5,543,377	$4,809,893	$4,340,615	$4,936,194	$5,507,388	$5,692,256
Region Share of costs	78.32%	76.28%	76.26%	71.01%	86.36%	82.45%	70.99%	71.62%
City Share of costs	21.68%	23.72%	23.74%	28.99%	13.64%	17.55%	29.01%	28.38%

CITY OF PORT COLBORNE
RESERVES AND RESERVE FUNDS
December 31, 2018

SCHEDULE G

WATER		
Development charges	-	
SCADA Water Study	39,935	
Water Rate Stabilization	4,248	
Water Equipment Replacement	70,109	
Drainage Water Quality	80,420	
Bulk Water Station Replacement	269,692	
Water Meter Replacements	67,515	
Meter Pits	174,361	
Water Capital Projects	214,442	
		920,722
WASTEWATER		
Development charges	6,581	
Sewer Rate Stabilization	72,554	
Sewer Operations-TV Inspections	160,290	
Sewer Equipment Replacement	49,743	
CSO Sewer Program	344,997	
Sewer Capital Projects	284,210	
		918,375

This page intentionally left blank.

PORT COLBORNE

MEMORANDUM

ENGINEERING AND OPERATIONS DEPARTMENT **905-835-2900 Ext. 256**
OPERATIONS DIVISION

TO: **Mayor and Council**

FROM: **Chris Lee, Director of Engineering and Operations**
Darlene Suddard, Environmental Compliance Supervisor

DATE: **February 27, 2019**

RE: **Summary of 2018 Distribution System Unbilled Water**

At the June 11, 2018 Meeting of Council, Report 2018-74 was presented. This report detailed how unbilled water in 2017 was used in different activities to maintain the quality of the drinking water, and how leakages affect the unbilled water volume. The numbers used in the 2017 calculations were, for the most part, numbers calculated based on the best available data. Throughout 2018, staff were, and continue to be, more cognizant of tracking the water used in the system, and these amounts are presented here and compared to the calculated 2017 volumes. Please refer to Report 2018-74 for more detailed information regarding the activities that are summarized here.

1. Authorized, Unbilled Consumption

Activities that the City undertakes to ensure the safety of the drinking water (i.e. flushing to collect samples, flushing to improve water quality etc.), are considered authorized uses of the water, but the City is unable to recoup revenue for these uses. Table 1 below summarizes the activities that make up authorized, unbilled consumption.

Comparing 2017 estimated volumes to 2018 actual volumes of authorized, unbilled consumption, it is readily apparent that the Utilities Department efforts to be prudent in the hydrant flushing program – both annual and daily flushing efforts - had a significant impact on the total volume of authorized, unbilled water in 2018. In total the prudent approach to flushing resulted in a decrease of over 76% of authorized, unbilled consumption. The reduction in flushing activities did not negatively affect the water quality nor the discoloured water complaints, as there was no observed increase in adverse drinking water quality incidents (AWQIs) nor an increase in complaints.

In 2019 Utilities Department staff will continue with the prudent approach to hydrant flushing and expect to continue to see low volumes of authorized, unbilled consumption associated with these activities.

Table 1: Summary of Authorized, Unbilled Consumption (Recorded and Calculated Values)

Activity	2017 Estimated Annual volumes (m^3)	2018 Actual Annual volumes (m3)
Annual hydrant flushing program (to maintain water quality) – as calculated	300,000	57,000
Daily flushing activities (to address complaints, adverse drinking water tests etc.) – as calculated	25,000	5,600
New construction (residential and commercial) – as calculated	16,000	4,000
Bulk water station unbilled consumption (Other City activities) – recorded	12,000	2,464
Watermain break post-repair flushing – as calculated	11,000	15,000
Weekly sampling (regulated requirement to monitor water quality) – as calculated	1,500	560
Fire use (training and suppression activities) – recorded	1,000	2,652
Total Annual Authorized, Unbilled Consumption	**366,500**	**87,276**

2. Apparent Losses

Table 2 on the following page summarized the volumes of apparent losses for 2017 and 2018. Apparent losses consist of unauthorized consumption, which includes intentional and unintentional use of water that is not metered (i.e. use of unmetered fire service lines for non-firefighting purposes, unmetered service lines, illegal connections before water meters etc.) and inaccuracies associated with metering and billing.

In an effort to reduce unauthorized consumption volumes, the City is continuing with installing fire service meters on unmetered fire services, and requiring all future properties with private fire hydrants to install a fire service meter at the property line. It is anticipated that these efforts will reduce the unauthorized consumption.

As per the AWWA Water Audit worksheet, all billing systems have some degree of inaccuracy, due to estimated bills, data handling errors etc. Therefore, while Treasury is confident that the data issues discussed in Report 2018-74 have been addressed, it is prudent to still account for some inaccuracies. Therefore, the AWWA Water Audit default value of 0.25% for billing inaccuracies has been used to calculate the volume for 2018. Metering inaccuracies have been increased slightly to account for the fact that the water meters are now a year older.

Table 2: Summary of Apparent Loss volumes (Calculated Values)

Activity	2017 Annual volume (m^3)	2018 Annual volume (m^3)
Unauthorized consumption (theft)	100,000	100,000
Metering inaccuracies (manufacturer and older meters remaining in system)	17,000	17,742
Billing inaccuracies (as detailed in report)	17,000	4,385
Total Apparent Losses	**134,000**	**122,128**

3. Real losses

There are three components to real losses: leakage on transmission and/or distribution mains, leakage and overflows at storage tanks (i.e. water tower and reservoir) and leakage on service connections.

As discussed in Report 2018-74, the City routinely does leak detection on the distribution watermains, while the Region does not perform proactive leak detection on their trunk watermains, and it is unknown if the reservoir or tower, or the feeds running to and from these storage facilities, are monitored for leakage.

Table 3 contains the calculated real losses for 2017, while Table 4 contains the calculated real losses for 2018.

Table 3: Calculation of Real Losses - 2017

Item	Volume (m^3)	
Total water purchased from Region	3,182,370	
Total billed consumption		1,621,984
Total authorized, unbilled consumption		366,500
Total apparent losses		134,000
Consumption/loss subtotal		2,122,484
Total Real Losses		**1,059,886**

Table 4: Calculation of Real Losses - 2018

Item	Volume (m^3)	
Total water purchased from Region	3,233,180	
Total billed consumption		1,754,042
Total authorized, unbilled consumption		87,276
Total apparent losses		122,128
Consumption/loss subtotal		1,963,446
Total Real Losses		**1,269,734**

The real losses calculated for 2018 are higher than those calculated for 2017. The main reason for the increase is the reduced volume of authorized, unbilled consumption in 2018. However, although the real losses increased in 2018, more detailed watermain break reporting implemented in 2018 has accounted for the majority of the real losses.

In 2018, the City experienced 12 watermain breaks. While this number of breaks is not a high number (some years the City experiences 20-30 watermain breaks), the amount of water loss is dependent upon the type of break, the size of break, the size of the watermain, the system pressure and the length of time between the break occurring and the repair being completed. Starting in 2018, staff used these parameters in an effort to more closely track the amount of water loss from watermain breaks, and have determined that this water loss totalled nearly 1,000,000 m^3 of water – or 79% of the real losses in 2018.

In some instances, a watermain break is detected almost directly after it occurs, due to discoloured water complaints, system pressure drop, damage to the road etc. However, due to the rock substrate here in Port Colborne, in many instances watermain breaks are undetected, as the lost water will simply disappear into crevices in the rock.

An example that illustrates this phenomenon occurred in 2018. Utilities Staff installed a water meter pit at the property line of a residence in July 2018 (meter pits are installed where there is no suitable location for a water meter inside the property – i.e. an inaccessible crawlspace). The first water bill the owner received after the meter was installed in the pit was very high. Upon further investigation, the datalogger on the water meter was downloaded and showed that there was a leak, of 1.5 m^3, or 1,500 litres, every hour, and as there was nothing leaking inside the home, it was determined it was the ½" water service that was leaking. The homeowner had no change in the water pressure or volume inside their home, and there was no surface evidence of a leak anywhere on their property, or on adjoining properties. Therefore, staff surmised that the service had been leaking for many years, and the calculated annual loss, on this service alone, was 13,140 m^3, much higher than the estimate of 1,120 m^3 annually that was calculated in 2018 (Table 5). Once the resident replaced their service, their consumption immediately dropped to normal household consumption, proving that the water service was the cause of the high consumption.

Table 5: Calculation of Residential Service Connection Leakage

# of Residential service connections	5,800
# of service connections > 40 years old (pre 1978 installation)	+/- 3,500
Assumed # that are currently leaking	500
Annual volume of leakage per service	1,120 m^3
Total estimated annual residential service connection leakage	**560,000 m^3**

While the 2018 actual calculations do not entirely support the annual residential service connection leakage that was estimated in report 2018-74, there still remains an estimated 269,734 m^3 (after the estimated watermain break loss - see Table 4) of unbilled water that can only be occurring from either residential water services, or the Region's trunk watermains and/or storage facilities. This water loss accounted for only 8.3% of the City's water purchases in 2018.

Analysis of January 2019 consumption is provided in Table 6 on the following page.

Table 6: Calculation of Real Losses – January 2019

Item	Volume (m^3)	
Total water purchased from Region	245,010	
Total billed consumption		138,288
Total authorized, unbilled consumption		121
Total apparent losses		10,176
Consumption/loss subtotal		148,585
Total Real Losses		**96,425**

There was one watermain break that occurred in January. Based on the type of break and the length of time between detection and repair, the estimated water loss from the break totalled 2,231m^3. The percentage of real losses in January was 39%, equal to the percentage experienced for 2018.

In 2019, staff will continue to closely track all sources of unbilled water, and will continue to refine how these volumes are calculated, using industry accepted best practices, and will continue to share that information with Council.

With many new staff members in the Utilities Department bringing with them their previous experience and fresh perspectives on how to track unbilled water, staff are aggressively pursuing the City's unbilled water by ensuring all maintenance water uses (authorized, unbilled water) are conducted in a prudent manner and are tracked as accurately as possible, and that we remain proactive in our leak detection to identify watermain breaks and other sources of real losses in a timely fashion, to reduce the amount of real losses. In 2019, staff will be reaching out to industry experts for innovative approaches to managing and tracking unbilled water and will also reach out to other municipalities that have had success in reducing their unbilled water so that we can bring recommendations regarding the most innovative, cost effective options forward to Council.

Figure 1: Monthly regional water purchases vs. monthly metered consumption - June 2017 to January 2019

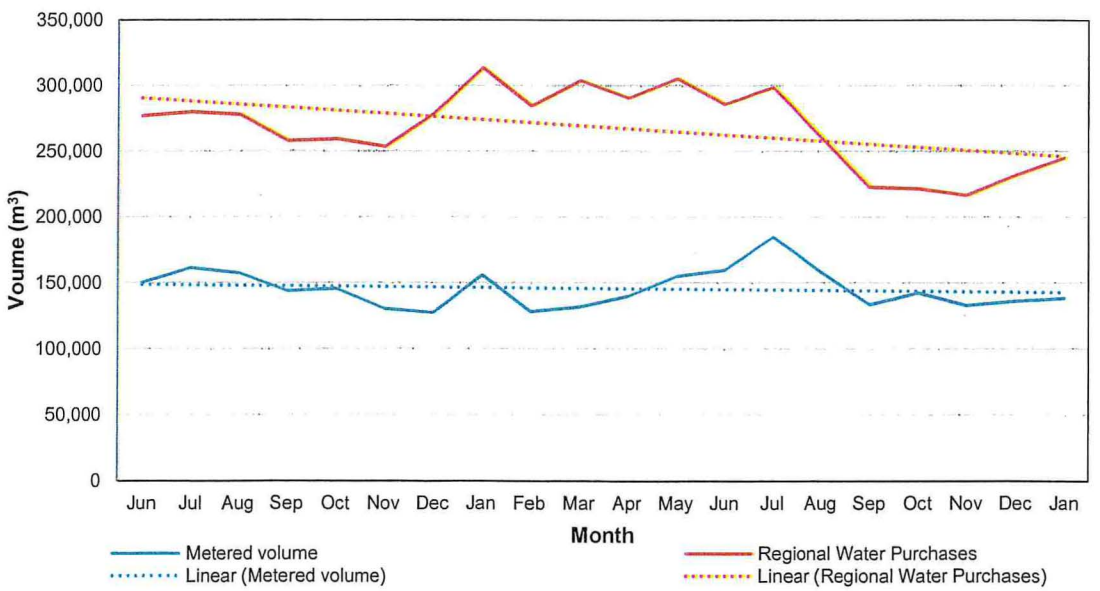

Figure 1, above, illustrates that since the City gained the capability in June 2017 to read all the water meters in the City each month, and analyze that consumption data and directly compare it

to the monthly volume purchased from the Region, that the efforts of staff in addressing unbilled water have been paying off. In Figure 1, it is clear that the monthly volume of water purchased from the Region each month has been declining steadily since June 2017, while the volume of metered water has remained relatively stable. This indicates that, overall, the condition of the water distribution system is improving, and that efforts to reduce the amount of unbilled water are having an impact.

Staff look forward to bringing new ideas and more positive news to Council in the coming months.

Sincerely,

Chris Lee
Director of Engineering and Operations

Darlene Suddard
Environmental Compliance Supervisor

PORT COLBORNE

Engineering & Operations Department
Engineering Division

Report Number: 2019-30 **Date: March 4, 2019**

SUBJECT: Memo on the Proposed Roadside Ditching Program and Associated Funding Methods:

1) PURPOSE:

This memo has been prepared by Chris Lee, Director of Engineering and Operations. The purpose of this memo is to bring forward for discussion at the Budgeting process, some options on a "Roadside Ditching Program" that Staff has a desire to implement. We also wish to detail the scope of the proposed program going forward, to illustrate the intent/goals/reasons for establishing such a program and to investigate / present funding options for this and future years.

2) HISTORY, BACKGROUND, COUNCIL POLICY, PRACTICES:

FUNDING OPTIONS:

It should be noted that the Municipality presently funds the annual Roadside Ditching program from the levy, with the proposed Budget for 2019 set at $209,100. This value represents approximately 1.2 % on the levy for 2019.

There are some options available to Council in funding this annual program:

a) continue to fund the program out of the levy, to which all property owners within the municipality pay into the fund.
b) Alternatively, fund Roadside Ditching out of a "surtax" of sorts, or a specific "Roadside Ditching" charge, to each individual property within the municipality that has current or future ditching needs and will at no time in the near or distant future be the beneficiary of construction of new storm sewer infrastructure or maintenance on existing storm sewer systems in their immediate neighbourhood.

This method or system of funding is currently being entertained by Council for Storm Sewers, which would enable the Municipality to establish a new Storm Sewer "Reserve". As detailed previously in numerous Reports to Council, this would enable current and future Councils to fund present and future Storm Sewer initiatives.

This methodology could also be applied in the future by Council, to the Roadside Ditching program. It is Staffs' intent to provide further details and options on this possible funding alternative for "Roadside Ditching", in future reports to Council, following further research by Staff, and after a public consultation process being undertaken through 2019.

CURRENT and FUTURE ACCOMPLISMENTS:

Staff wish to detail the activities and historic costs associated with the Roadside Ditching program of the past and bring forward some alternatives for the future.

In past years, the Municipality has met its Roadside Ditching needs through the use of contracted services. Historically the pricing for this work has been very consistent, with the average cost of ditching, over the last (4) four years being $24 /m.

The real issue that the City has with the use of contracted services is not necessarily the pricing, but the availability of current Contractors, and their ability to complete the assigned work for the year. Over the last (4) four-year period, Contractors have been able to complete on average 7100 metres of Roadside Ditching per year. This quantity falls far short of the required level of service, as illustrated by the fact that the 2018 Roadside ditching program was underspent by nearly $60,000, primarily due to weather and the unavailability of the contractor to complete the works before year end.

Staff wishes to increase the quantity of Roadside Ditching annually going forward. This especially becomes necessary due to the future increase in Municipal Drain maintenance planned over the next 5 years. The planned increase in Municipal Drain maintenance is directly related to residents/landowners requesting improved drainage in their individual neighbourhoods or watersheds.

The City has awarded contracts and is conducting maintenance works on (2) two Municipal Drains, awarded in 2018, along with an additional (4) four more, yet to be tendered, with all to occur in 2019. Staff are also currently working on finalizing work or commissioning new work on (8) eight separate Municipal Drains and their respective watersheds. In addition to all of the aforementioned projects that are in progress or will soon be the subject of new reports in 2019 – 2020, there are (6) six other existing Municipal Drains that require new reports and subsequent maintenance works.

As is evident by the above, a great deal of work is either occurring presently, will be undertaken within the next year or will be planned in the very near future. All of these works will consequently drive the Roadside Ditching program for the next (5) five years or more.

3) STAFF COMMENTS AND DISCUSSIONS:

The City currently has an inventory of some 238 km of Roadside Ditching. At the current contracted rate of completion, it would take over 30 years to complete a Roadside Ditching program for the entire City. A solution would be to let multiple tenders annually, in an attempt to increase the quantity of ditching completed in a timely fashion and to attempt to stay in stride with the Municipal Drain program detailed earlier within this report.

A second solution which Staff has investigated involves putting the Roadside Ditching program under Municipal Staff's direct workload, hire additional necessary Staff and rent

the appropriate equipment as may be required to complete the task.

Staff's initial calculation of a comparison of these two options is detailed below:

Project by Contractors:

Average unit rate for ditching - $24.00 /metre
Current annual quantity of ditching being completed – 7100 m.
Associated annual costs - $170,000
Estimated costs to complete 238,000 m of ditching - $5,520,000

Project by Municipal Staff:

Estimated annual quantity of ditching to be completed – 30,000 m (over a 4-month period)
Estimated associated costs - $220,000
Estimated costs to complete 238,000 m. of ditching - $1,750,000

It should be noted that Staff have estimated that a program conducted by Municipal Staff will complete more ditching annually, but at a slightly higher overall annual cost. This is attributed to the fact that Municipal Staff can undertake this work in ideal weather conditions, being able to adjust workload and tasks almost on an hourly basis along with being able to mobilize at will, since the City is directly controlling when and to where Staff are dispatched. In estimating these numbers, Staff have based the work costs on a four-month Roadside Ditching program, inclusive of wages, equipment rentals and materials.

Additionally, this same crew can work through the balance of the year undertaking Municipal Drain maintenance. The balance of the year's costs would be charged to the Municipal Drain maintenance programs, as may be required, for each individual drain.

The Roadside Ditching would happen during summer months when Staff are not able to work on the Municipal Drains due to permit/habitat restrictions.

It should be noted that the current levels of funding under the levy for Roadside Ditching can remain at or near current levels, with an apparent increase in work being completed. Also, the balance of funding for the year for labour and equipment costs would be carried by the Municipal Drain maintenance works planned which do not affect the levy.

4) OPTIONS AND FINANCIAL CONSIDERATIONS:

Do nothing.

If no action is taken at this time, Staff will proceed with the program in the same manner as in the past.

5) RECOMMENDATION

That a pilot project be initiated in 2019 to establish the validity of our estimated costs; and

That the necessary equipment be rented as required; and

That the funds to cover the Roadside Ditching program costs by Municipal Staff, (rental equipment, materials and Staffing costs) be covered by the existing budgeted funds for 2019, they being:

0-500-73430 -- Roadside Ditching - $236,000.00

0-500-73320 -- Culvert Repairs - $ 34,810

Total 2019 budget request - $270,810.

Respectfully Submitted:

Chris Lee
Director of Engineering and Operational Services

C. Scott Luey
Chief Administrative Officer

PORT COLBORNE

City of Port Colborne
Special Meeting of Council 05-19
Following the Special Committee of the Whole Meeting at 5:30 p.m.
Monday, March 4, 2019
Council Chambers, 3rd Floor, 66 Charlotte Street

Agenda

1. **Call to Order:** Mayor William C. Steele
2. **Introduction of Addendum Items:**
3. **Confirmation of Agenda:**
4. **Disclosures of Interest:**
5. **Item(s) for Consideration:**

Notes	Item	Description / Recommendation
WCS MB EB RB GB FD AD DK HW	1.	**Corporate Services Department, Finance Division, Report 2019-29, Subject: Proposed 2019 Water and Wastewater Rates** That the 2019 Water and Wastewater Rates be approved as follows: Water Usage Rate $ 1.311 per m^3 Water Service Fixed Charge $384.65 annual fixed rate Wastewater Usage Rate $1.336 per m^3 Wastewater Service Fixed Charge $504.86 annual fixed rate That the 2019 Water and Wastewater budgets as presented in Corporate Services Department, Finance Division Report 2019-29, be approved; and That the Water and Wastewater Rates by-laws be approved.

WCS MB EB RB GB FD AD DK HW	2.	**Memorandum from Chris Lee, Director of Engineering and Operations and Darlene Suddard, Environmental Compliance Supervisor Re: Summary of 2018 Distribution System Unbilled Water** That the memorandum from Chris Lee, Director of Engineering and Operations and Darlene Suddard, Environmental Compliance Supervisor Re: Summary of 2018 Distribution System Unbilled Water, be received for information.
WCS MB EB RB GB FD AD DK HW	3.	**Engineering and Operations Department, Engineering Division, Report 2019-30 Subject: Memo on the Proposed Roadside Ditching Program and Associated Funding Methods** That a pilot project be initiated in 2019 to establish the validity of our estimated costs; and That the necessary equipment be rented as required; and That the funds to cover the Roadside Ditching program costs by Municipal Staff, (rental equipment, materials and Staffing costs) be covered by the existing budgeted funds for 2019, they being: 0-500-73430 -- Roadside Ditching - $236,000.00 0-500-73320 -- Culvert Repairs - $ 34,810 Total 2019 budget request - $270,810.

6. Consideration of By-laws:

By-law No.	Title
6648/12/19	Being a By-law to Amend By-law No. 3151/22/95, As Amended, A By-law to Regulate the Supply of Water and to Provide for the Maintenance and Management of the Water Works and for the Imposition and Collection of Water Rates
6649/13/19	Being a By-law to Amend By-law No. 3424/6/97, As Amended, Being a By-law for the Imposition and Collection of Sewage Service Rates and Sewer Rates
6650/14/19	Being a By-law to Adopt, Ratify and Confirm the Proceedings of the Council of The Corporation of the City of Port Colborne at its Special Meeting of March 4, 2019

7. Adjournment:

The Corporation of the City of Port Colborne

By-Law No. 6648/12/19

Being a By-law to Amend By-law No. 3151/22/95, As Amended, A By-law to Regulate the Supply of Water and to Provide for the Maintenance and Management of the Water Works and for the Imposition and Collection of Water Rates

Whereas at its special meeting of March 4, 2019, the Council of The Corporation of the City of Port Colborne (Council) approved the recommendation of Corporate Services Department, Finance Division Report 2019-29, Subject: Proposed 2019 Water and Wastewater Rates, and resolved as follows:

- that the rate for water usage for 2019 be set at $1.311 per cubic meter
- that the fixed rate for 2019 be set at $384.65 per year.

And Whereas Council is desirous of amending By-law No. 3151/22/95, as amended, Being a By-law for the Imposition and Collection of Water Rates.

Now therefore the Council of The Corporation of the City of Port Colborne enacts as follows:

1. That By-law No. 3151/22/95, as amended, Being a By-law to Regulate the Supply of Water and to Provide for the Maintenance and Management of the Water Works and for the Imposition and Collection of Water Rates, be further amended by replacing Schedule "A" thereto with Schedule "A" hereto.

2. The fixed rates established by this By-law shall be effective January 1, 2019 for large users and March 1, 2019 for bulk water haulers and shall be effective for residential and Institutional/Commercial/Industrial (ICI) quarterly billings commencing with the first quarter of 2019 and subsequent billings (subject to further amendments of the By-law).

3. The usage rate established by this By-law shall be effective March 1, 2019 for large users, March 1, 2019 for bulk water haulers and for residential and ICI quarterly billings commencing with the second billing of 2019 and subsequent billings (subject to further amendments of the By-law).

Enacted and passed this 4th day of March, 2019.

William C. Steele
MAYOR

Amber LaPointe
CITY CLERK

Schedule "A" to By-law No. 6648/12/19
and By-law No. 3151/22/95, As Amended

Water Rates

1. Metered Consumption Rates

Residential, Institutional/Commercial/Industrial (ICI) consumption is subject to a metered rate of $1.311/cubic meter per billing period. No minimum charge per billing period.

2. Bulk Water Sales Rates

The metered rate for bulk water sales is $1.311/cubic meter per billing period.

The service charge is based on a 75 mm (3") meter regardless of the actual meter used and is $4,231.20 per annum or $352.60 per month.

3. Fixed Rate (Service Charge)

All users are subject to a fixed rate based on meter size. The residential service charge is $384.65 per annum or $32.05 per month for a 15mm (5/8") and 19 mm (3/4") meter. The ICI fixed rate is $384.65 per annum or $32.05 per month for a 15 mm (5/8") and 19 mm (3/4") meter.

For other size meters, the fixed rate will be based on the following meter factors:

Meter Size	Service Charge Meter Factor
25 mm (1")	1.4
38 mm (1 1/2")	1.8
50 mm (2")	2.9
75 mm (3")	11.0
100 mm (4")	14.0
150 mm (6")	21.0
200 mm (8")	29.0
250 mm (10")	40.0

All vacant land directly abutting the water/sewer distribution system will be charged the annual fixed rate as per the rate set out in the Sewer Rate By-law, as amended.

4. Flat Rate (Residential)

Rate of $397.00 per billing period (average user) where an accurate meter reading cannot be recorded for the following:

- where service connection has been turned on at the property line but where no meter has been installed (water meter refusal);
- refusing to provide a meter reading and/or providing access to read a water meter or reading device;
- refusing to remove any obstructions to reading a meter or reading device;
- refusing to provide for meter or reading device repairs for accurate meter readings;

- the tampering with or alteration of the water meter or reading device and meter readings cannot be obtained.

Flat Rate (Commercial)

Rate to be calculated based on the following, where an accurate meter reading cannot be recorded for the same reasons as above for Residential:

2x the current fixed rate per Section 3, PLUS 2x the monthly average of the previous 12 months' consumption history (monthly billings)

OR

2x the current fixed rate per Section 3, PLUS 2x the quarterly average of the previous 3 years of the same billing cycle consumption history (quarterly billings)

5. **Water for Construction Rates**

Flat Rate:

Residential	$198.00
Commercial	$332.00
Industrial	$332.00
Institutional	$332.00

Upon final inspection, rates to be charged at the current consumption rates.

6. **Administration Charge**

- issuing of water shut off tags shall be charged to the property owner at a fee of $45.00;
- water account inquiries will be provided at a fee of $7.00;
- Reading of analog meter due to refusal to upgrade to RF meters will be provided at a fee of $45.00 per scheduled reading dates;
- Customer request to change out from an RF meter to an analog meter will be at the customer's expense to cover the actual cost of the new analog meter plus removal and installation costs.

7. **Late Payment Fee**

A two and one half (2 ½%) percent late payment fee is charged on the first day of default to all users. This is a one-time charge on the amount billed and outstanding past the due date. Water payments must be received at the Municipal Office City Hall on or before the due date.

8. **On and Off Charges**

A single charge for turn off/on will be levied if performed on the same calendar day during regular hours.

A single charge at the after-hours/weekend rate will be levied if the turn off/on is performed within a 4 hour (maximum) period.

9. Meter Testing

All meter testing will require a minimum deposit of $50.00 and will be billed at actual cost. The minimum deposit will be applied to the bill. If the meter is found to be inaccurate, creating an over billing, the deposit will be refunded.

10. New Water Meter and Remote Reader

5/8" X 3/4" meter complete	actual cost
3/4" meter complete	actual cost
1" meter complete	actual cost
1 1/2" meter complete	actual cost
2" meter complete and larger	actual cost

11. Permits

A fee for new water service installation will be charged based on the current annual Public Works Services Schedule of Rates and Fees, to be collected on the building permit.

12. Billing Cycle

All users with meters greater than 50 mm (2") to be billed monthly. This includes bulk water and large users. All other users to be billed quarterly, meters being read and billed between three defined areas designated by the Corporation.

The Corporation of the City of Port Colborne

By-Law No. 6649/13/19

Being a By-law to Amend By-law No. 3424/6/97, As Amended,
Being a By-law for the Imposition and Collection
of Sewage Service Rates and Sewer Rates

Whereas at its special meeting of March 4, 2019, the Council of The Corporation of the City of Port Colborne (Council) approved the recommendation of Corporate Services Department, Finance Division Report 2019-29, Subject: Proposed 2019 Water and Wastewater Rates, and resolved as follows:

- that the rate for sewer usage for 2019 be set at $1.336 per cubic meter.
- that the fixed rate for 2019 be set at $504.86 per year.

And Whereas Council is desirous of amending By-law No. 3424/6/97, as amended, Being a By-law for the Imposition and Collection of Sewage Service Rates and Sewer Rates;

Now therefore the Council of The Corporation of the City of Port Colborne enacts as follows:

1. That By-law No. 3424/6/97, as amended, Being a By-law for the Imposition and Collection of Sewage Service Rates and Sewer Rates, be further amended by replacing Schedule "A" thereto with Schedule "A" hereto.

2. The fixed rates established by this By-law shall be effective January 1, 2019 for large users and shall be effective for residential and Institutional/Commercial/Industrial (ICI) quarterly billings commencing with the first quarter of 2019 and subsequent billings (subject to further amendments of the By-law).

3. The usage rate established by this By-law shall be effective March 1, 2019 for large users and shall be effective for residential and ICI quarterly billings commencing with the second billing of 2019 and subsequent billings (subject to further amendments of the By-law).

Enacted and passed this 4th day of March, 2019.

William C. Steele
MAYOR

Amber LaPointe
CITY CLERK

Schedule "A" to By-law No. 6649/13/19
and By-law No. 3424/6/97, As Amended

Rates for Wastewater (Sanitary Sewer) System

(1) **Metered Rates**

(a) The Wastewater (Sewage Service) Usage Rate is subject to a metered rate of $1.336 per cubic meter per billing period. No minimum usage charge per billing period. All sectors shall be billed at 100% of water consumed unless otherwise detailed within the by-law.

(b) Negotiated industrial customers are subject to a metered rate of $1.336 per cubic meter per billing period.

(2) **Wastewater Fixed Rates (Service Charge)**

(a) All users are subject to a fixed rate based on meter size. The fixed rate is $504.86 per annum for a 15 mm (5/8") and 19 mm (3/4") meter.

(b) For all other meter sizes, the fixed rate will be multiplied by the following factors:

Meter Size	Meter Factor
25 mm (1")	1.4
38 mm (1 1/2")	1.8
50 mm (2")	2.9
75 mm (3")	11.0
100 mm (4")	14.0
150 mm (6")	21.0
200 mm (8")	29.0
250 mm (10")	40.0

All vacant land directly abutting the sanitary sewer system will be charged the annual fixed rate of $504.86, to be billed through the property tax billing.

(3) **Flat Rate (Residential)**

Rate of $397.00 per billing period (Average User) where water service is active and connected to the system but the following circumstances do not permit a water meter reading:

- where no meter has been installed (water meter refusal);
- refusing to provide a meter reading and/or providing access to read a water meter or reading device;
- refusing to remove any obstructions to reading a meter or reading device;

- refusing to provide for meter or reading device repairs for accurate meter readings;

- the tampering with or alteration of the water meter or reading device and meter readings cannot be obtained.

Flat Rate (Commercial)

Rate to be calculated based on the following, where an accurate meter reading cannot be recorded for the same reasons as above for Residential:

2x the current fixed rate per Section 3, PLUS 2x the monthly average of the previous 12 months' consumption history (monthly billings);

OR

2x the current fixed rate per Section 3, PLUS 2x the quarterly average of the previous three (3) years of the same billing cycle consumption history (quarterly billings).

(4) **Late Payment Fee**

A two and one half (2 ½%) late payment fee is charged on the first day of default to all users. This is a one-time charge on the amount billed and outstanding past the due date. Sewer payments must be received at the Municipal Office on or before the due date.

(5) **Billing Cycle**

(a) All large users with water meters greater than 50 mm (2") are to be billed monthly.

(b) All other users are to be billed quarterly, meters being read and billed between three (3) defined areas designated by the Corporation.

(c) Vacant land properties will be billed annually. Seasonal properties will be billed annually.

(6) **Exemptions from Billing for Sanitary Sewer Costs**

(a) Bulk water haulers accessing City bulk water facilities.

(b) Port Colborne Poultry Limited.

(c) Any property that does not directly abut any part of the sanitary sewer system.

(d) Any other property that is covered by a separate by-law enacted by Council.

This page intentionally left blank.

The Corporation of the City of Port Colborne

By-Law no. 6650/14/19

Being a by-law to adopt, ratify and confirm the proceedings of the Council of The Corporation of the City of Port Colborne at its Special Meeting of March 4, 2019

Whereas Section 5(1) of the *Municipal Act, 2001,* provides that the powers of a municipality shall be exercised by its council; and

Whereas Section 5(3) of the *Municipal Act, 2001,* provides that a municipal power, including a municipality's capacity rights, powers and privileges under section 9, shall be exercised by by-law unless the municipality is specifically authorized to do otherwise; and

Whereas it is deemed expedient that the proceedings of the Council of The Corporation of the City of Port Colborne be confirmed and adopted by by-law;

Now therefore the Council of The Corporation of the City of Port Colborne enacts as follows:

1. Every action of the Council of The Corporation of the City of Port Colborne taken at its Special Meeting of March 4, 2019 upon which a vote was taken and passed whether a resolution, recommendations, adoption by reference, or other means, is hereby enacted as a by-law of the City to take effect upon the passing hereof; and further

2. That the Mayor and Clerk are authorized to execute any documents required on behalf of the City and affix the corporate seal of the City and the Mayor and Clerk, and such other persons as the action directs, are authorized and directed to take the necessary steps to implement the action.

Enacted and passed this 4th day of March, 2019.

_____
William C. Steele
Mayor

_____
Amber LaPointe
City Clerk

This page intentionally left blank.