# Report to Rapport au:

Environment and Climate Protection Committee

Comité de l'environnement et de la protection climatique

17 October 2017 / 17 octobre 2017

and Council
et au Conseil
25 October 2017 / 25 octobre 2017

Submitted on October 10, 2017 Soumis le 10 octobre 2017

Submitted by Soumis par:

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Ward: CITY WIDE / À L'ÉCHELLE File Number: ACS2017-PWE-GEN-

DE LA VILLE 0036

**SUBJECT:** Sump Pump Back-up Power Rebate Program

OBJET: Programme de remise applicable à l'installation d'une pompe

de puisard avec système d'alimentation de secours

#### REPORT RECOMMENDATION

That the Environment and Climate Protection Committee recommend that Council receive this report for information.

#### RECOMMANDATION DU RAPPORT

Que le Comité de l'environnement et de la protection climatique recommande au Conseil de prendre connaissance du présent rapport.

## **EXECUTIVE SUMMARY**

In September 2016, the City submitted a funding application under the National Disaster Mitigation Program. The proposed program, Sump Pump Back-up Power Rebate Program, is a 2-year pilot which provides rebates to City of Ottawa residential property owners for the installation of a secondary sump pump with battery back-up power. The installation of a secondary sump pump with battery backup power would help to ensure the function of a sump during a power outage and reduce the risk of basement flooding.

The pilot program would adopt many of the program features of the City's Residential Protective Plumbing Program, creating efficiencies in review and rebate processing. Additionally, the proposed program would help increase knowledge/understanding of maintenance requirements, and improve knowledge of the risks/hazards associated with sewer flooding events.

Funding for the Sump Pump Back-up Power Rebate Program would be provided as a 50/50 split - Federal and municipal. Based on the proposed rebate (\$400), 50 residential properties per year could receive a rebate; a total of 100 rebates during the 2-year pilot. At the end of the pilot, an evaluation of the program will be completed to determine whether or not to adopt the program as an enhancement to the City's current Residential Protective Plumbing Program.

# **Financial Implications**

In 2017-2018 and 2018-2019, the City's funding commitment is \$15,250 along

with \$2,200 in-kind funding; total of \$34,900. The Federal government has agreed to match the proposed funding, excluding the in-kind funding, for a total of \$30,500.

The City's funding commitment has been identified as part of the City of Ottawa's Air Quality and Climate Change Management Plan (AQCCMP 2014). The AQCCMP objectives align with the project, specifically, 9. "Ensuring effective emergency management will require...50% of residents with sump pumps have back-up energy supplies by 2024".

# **Public Consultation/Input**

Public consultation did not form part of this program.

#### BACKGROUND

From the Public Safety Canada webpage, "In recognition of increasing disaster risks and costs, Budget 2014 earmarked \$200 million over five years to establish the National Disaster Mitigation Program (NDMP) as part of the Government's commitment to build safer and more resilient communities. The NDMP will address rising flood risks and costs, and build the foundation for informed mitigation investments that could reduce, or even negate, the effects of flood events."

In September 2016, the City submitted an application under the National Disaster Mitigation Program. The proposed program, Sump Pump Back-up Power Rebate Program, is a 2-year pilot which will provide rebates to property owners for the installation of a secondary sump pump with battery back-up power. The secondary sump pump with battery back-up power would ensure the function of the sump during a power outage and reduce the risk of basement flooding. Reducing basement flooding would mean less property damage, cleanup costs, insurance claims and claims against the municipality.

Providing rebates for the installation of secondary sump pumps with battery back-up power would support the objective from the Wet Weather Infrastructure Management (WWIMP) Capability section, specifically "The objective of the

WWIMP is to recommend a set of initiatives or programs to cost–effectively provide: Flood Protection – Reduce threats to human health and property damage from flooding; Capacity for Growth and intensification in areas with infrastructure capacity restriction; and Pollution Control – Minimized adverse impacts on water quality from combined and sanitary sewer overflows (CSOs and SSOs)."

The pilot program also aligns with the objectives of the City of Ottawa's *Air* Quality and Climate Change Management Plan (2014), specifically,

- 7. "Increasing infrastructure resiliency will require...building infrastructure redundancy and back-up systems where needed;
- 8. "Reducing risks to structures will...increased public awareness of the limits of municipal infrastructure and the behaviours and actions needed to mitigate impacts to private property"; and
- 9. "Ensuring effective emergency management will require...50% of residents with sump pumps have back-up energy supplies by 2024".

Additionally, the Sump Pump Back-up Power Rebate Program would complement the City's Residential Protective Plumbing Program (RPPP). The RPPP provides financial assistance to qualified City of Ottawa residential property owners for the installation of protective plumbing devices to prevent water and sewage from entering homes as a result of increased water levels (surcharging) in the City's sewer system. The current RPPP provides rebates for the installation of protective plumbing devices such as sump pumps and backwater valves. However, the program applies only to residential properties connected to City services; providing protection from sewer surcharges. Additionally, the program does not provide funding for the installation of secondary sump pumps with battery back-up power for existing sump installations. The Sump Pump Back-up Power Rebate program would provide funding towards the installation of secondary sump pumps with back up power to handle groundwater and will be offered to all residential property owners, regardless of connection to City sewer services.

#### DISCUSSION

The proposed program may improve the resiliency of residential properties with sump (continued operation during a power outage); reduce the potential of basement flooding; and reduce health and safety risk of flooding events (flood water, molds, property damage).

It is recommended that the program:

#### 1. Be made available to urban and rural residents.

The pilot program would be available to all homeowners with sumps without an existing form of back-up power. As part of the application process, the City or its representative will attend the property to document the existing sump and its associated equipment. The pilot would provide the opportunity for all interested residents to participate regardless of connection to the wastewater collection system (direct or indirect); simplify the application process for both residents and staff; and improve the resiliency of the wastewater collection system.

## 2. Provide a standardized rebate amount.

The pilot program would provide a standardized rebate amount; providing a clear understanding of available funding and the specific type of work to be completed. The pilot would also adopt a simplified application process similar to the City's former Toilet Replacement Program creating efficiencies in the review and rebating processes. If successful, the pilot will form part of the existing Residential Protective Plumbing Program.

Proposed rebate for the installation of secondary sump pumps with battery back-up power - \$400.

Based on the available funding, a total of 100 rebates could be processed during the 2-year pilot. Additionally, \$20,000 for consulting services, and approximately \$10,000 for staff time would be available to process applications and promote the program. Document 1 includes a detailed pilot budget.

# 3. Include a Communications plan to improve residents' awareness and understanding.

The proposed program would help improve communications with residents; increase program participation, increase knowledge/understanding of maintenance requirements, and improve knowledge of the risks/hazards associated with sewer flooding events. The communication plan would include updates to the City's website and 311 knowledge-base. The program funding includes an annual \$500 budget for promotional materials.

# 4. Analyze and report on the pilot program findings.

Following the completion of the pilot program, staff will analyze the program data and report on the findings. This report will also include a recommendation regarding the suitability of adopting the pilot program as part of the Residential Protective Plumbing Program.

#### **RURAL IMPLICATIONS**

The Sump Pump Back-up Power Rebate Program applies to all City of Ottawa homeowners with current property taxes and currently without a form of back-up power for their existing sump system.

#### **CONSULTATION**

Public consultation did not form part of this program.

# COMMENTS BY THE WARD COUNCILLOR(S)

Not applicable as it is a city-wide issue.

# ADVISORY COMMITTEE(S) COMMENTS

There were no consultations undertaken in association with this report recommendation.

## **LEGAL IMPLICATIONS**

There are no legal impediments associated with Committee and Council's receipt of this Report for information.

## **RISK MANAGEMENT IMPLICATIONS**

The Sump Pump Back-up Power Rebate Program offers financial support to homeowners to reduce the risk of flooding on their property.

# **ASSET MANAGEMENT IMPLICATIONS**

There are no asset management implications associated with this program.

#### FINANCIAL IMPLICATIONS

This report has no budget implications. Funding is available in capital internal order 906381 AQCCMP Implementation for this pilot program. The City will fund the initial amount of the rebates, and it is anticipated that the Federal share will be reimbursed semi-annually to the City following progress reporting to the Federal government.

# **ACCESSIBILITY IMPACTS**

By updating the Communication Plan, the City will ensure the current requirements related to Accessibility for Ontarians with Disabilities Act (AODA) are met.

## **ENVIRONMENTAL IMPLICATIONS**

The proposed pilot program supports the City's Wet Weather Infrastructure Management (WWIMP), specifically the Capability section; and the *Air Quality and Climate Change Plan*, specifically the performance measure that "50% of residents with sump pumps have back-up energy supplies by 2024".

#### **TECHNOLOGY IMPLICATIONS**

There are no technology implications associated with this report.

#### **TERM OF COUNCIL PRIORITIES**

The proposed program supports the following 2017-2018 Term of Council Priorities:

Collective Priority: Our Service – *Continuous Improvement* –Establishing a standardized rebate amount will provide clearer understanding and may reduce processing delays. In addition, a communications plan could increase knowledge and understanding of the risks/hazards associated with sewer flooding events and sump maintenance.

Collective Priority: Our City – *Financial Sustainability* - Provides a cost effective method of improving the resiliency of the wastewater collection system.

#### SUPPORTING DOCUMENTATION

Document 1 – National Disaster Mitigation Program – Project Proposal

## DISPOSITION

Public Works and Environmental Services, in conjunction with any other relevant Departments, will implement Council directions emanating from this report, as appropriate.