



TO: INFRASTRUCTURE AND COMMUNITY INVESTMENT

SUBJECT: FUNDING REQUEST FOR BAYVIEW PARK RESERVOIR
DECOMMISSIONING AND REMOVAL

WARD: 2

**PREPARED BY AND
KEY CONTACTS:** W. REID, P.ENG., PMP, MANAGER VERTICAL INFRASTRUCTURE, EXT. 5116
M. VANDERGEEST, SUPERVISOR OF WATER SUPPLY, EXT. 6153

SUBMITTED BY: S. DIEMERT, P. ENG., DIRECTOR OF INFRASTRUCTURE

**GENERAL MANAGER
APPROVAL:** B. ARANIYASUNDARAN, P. ENG., PMP, GENERAL MANAGER OF
INFRASTRUCTURE AND GROWTH MANAGEMENT

**CHIEF ADMINISTRATIVE
OFFICER APPROVAL:** M. PROWSE, CHIEF ADMINISTRATIVE OFFICER

RECOMMENDED MOTION

1. That a new capital project be approved to decommission the Bayview Park Reservoir and complete the removal of its associated Booster Pumping Station at Sam Cancilla Park with a budget of \$2,565,000 to be funded 100% from the Water Capital Reserve, subject to the return of \$2,565,000 from other Water Capital Reserve funded projects in the 2025 Capital Status Report.

PURPOSE & BACKGROUND

Report Overview

2. The purpose of this Staff Report is to seek funding and approval to decommission the underground Bayview Park Reservoir (Reservoir) and completely remove its Booster Pumping Station (Pumping Station) located at Sam Cancilla Park (157 Dunlop Street East).
3. The Reservoir and Pumping Station were removed from operation 20 years ago. . This infrastructure is not required to be connected to the Drinking Water System in the future.
4. Due to the structure's age (built in the 1950's) and physical location beneath a public park, a structural condition assessment of the site was carried out on April 9, 2024. The assessment was to understand associated risks present and focused on identifying structural deficiencies, testing the structural components, and conducting a desktop structural analysis to determine load capacity of the reservoir roof.
5. The Pumping Station is attached on the east side of the Reservoir, with a portion constructed on top of it. Although a condition assessment and structural analyses were not completed on the Pumping Station visual signs of deterioration are present.



ANALYSIS

- 6. To mitigate the City of Barrie’s risks and associated liabilities, the area surrounding the reservoir has been enclosed with construction fencing to prevent unauthorized public access. Currently, residents are not able to enjoy this waterfront park and greenspace.
- 7. Structural analysis of the Reservoir’s existing underground roof revealed that it is overstressed and does not meet the required design load specifications. As a result, the roof’s condition poses a risk to public safety. The analysis further concluded that the roof structure is inadequate to support public assembly.
- 8. To ensure public safety at Sam Cancilla Park and allow for daily park operations to restart, including landscaping maintenance activities, the following is required:
 - a) Partial demolition the Reservoir roof system,
 - b) Filling of the empty Reservoir with granular material,
 - c) Demolition and removal of the Pumping Station and its pipeline connections,
 - d) Decommissioning of the overflow pipe connected from the Pumping Station to Lake Simcoe, and;
 - e) Landscape improvements to the area.

ENVIRONMENTAL AND CLIMATE CHANGE IMPACT MATTERS

- 9. There are no environmental and/or climate change impact matters related to the recommendation.

ALTERNATIVES

- 10. The following alternatives are available for consideration by General Committee:

Alternative #1 General Committee could alter the proposed recommendation by having the complete removal of the Reservoir and Pumping station through a full excavation.

This alternative is not recommended because of the estimated engineering and construction cost of \$5,237,212.

FINANCIAL

- 11. The table below breaks down the total costs associated with the proposed recommendation:

Work Required	Constructor Cost
Project Planning	\$23,000
Design Services	\$370,000
Construction Estimate	\$1,931,000
Construction Administration and Inspection Services (CA/CI)	\$241,000
Total Requested Budget:	\$2,565,000



12. The proposed funding plan for the project is shown in the table below along with the impact of the proposed changes:

Funding Source	Current	Proposed	Change
Water Capital Reserve	\$0	\$2,565,000	\$2,565,000
Total	\$0	\$2,565,000	\$2,565,000

13. As can be seen in the table below, the Water Capital Reserve is anticipated to be overcommitted by \$2.6 million by the end of 2024 increasing to \$24.8 million by 2028:

Water Capital Reserve	2024	2025	2026	2027	2028
Beginning Balance	\$ 7,279,011	\$ (2,573,447)	\$ (12,131,084)	\$ (17,285,618)	\$ (22,612,867)
Draws: Carryforward & Previously Approved	\$ (17,942,478)	\$ (3,404,653)	\$ (1,568,495)	\$ (877,080)	\$ -
Draws: New Request	\$ (1,125,652)	\$ (10,096,907)	\$ (3,134,833)	\$ (1,810,858)	\$ (1,993,110)
Draws: Forecast	\$ -	\$ (6,404,756)	\$ (11,761,336)	\$ (13,710,213)	\$ (11,814,205)
Contributions: 2024 Business Plan	\$ 9,215,673	\$ 10,348,679	\$ 11,310,130	\$ 11,070,901	\$ 11,624,446
Uncommitted / (Overcommitted) Reserve Balance	\$ (2,573,447)	\$ (12,131,084)	\$ (17,285,618)	\$ (22,612,867)	\$ (24,795,736)

14. To ensure the financial sustainability of the Water Capital Reserve, staff will review the 2025 capital plan to look for projects where funds can be returned as part of the 2025 Capital Status Report. These will be projects that are nearing completion and remaining funds are no longer required.

LINKAGE TO 2022-2026 STRATEGIC PLAN

15. The recommendations included in this Staff Report support the following goals identified in the 2022-2026 Strategic Plan:
- Community Safety
 - Infrastructure Investments
 - Responsible Governance