

TO: MAYOR & COUNCILLORS

FROM: GENERAL MANAGER ENGINEERING

SUBJECT: BURNABY LAKE SOUTHEAST GREENWAY

PURPOSE: To update Council on the existing Burnaby Lake Southeast Greenway and seek approval for recommendations on moving forward.

RECOMMENDATION

THAT staff be directed to follow the recommendations, as outlined in Section 3.6 of the report titled 'Burnaby Lake Southeast Greenway' dated December 16, 2024.

1.0 POLICY SECTION

This initiative aligns with the City's Official Community Plan (1998), Corporate Strategic Plan (2022), Social Sustainability Strategy (2011), and Climate Action Framework (2019).

2.0 BACKGROUND

The Burnaby Lake Southeast Greenway (BLSG) is an existing trail that extends from Sperling Avenue at Lougheed Highway and goes south along Burnaby Lake towards Nursery Street to Avalon Avenue and Cariboo Road. Metro Vancouver has currently identified it as a connector for pedestrians and cyclists between Central Valley Greenway and Brunette-Fraser Regional Greenway (see **Attachment 1**).

In 2020, FortisBC approached the City with their Pattulo Gas Line Replacement project. The alignment of this gas line was decided by Council to follow the BLSG along Sperling Avenue, towards Glencarin Drive and Lakefield Drive (see **Attachment 2**). At the time, it was expressed by the City and Metro Vancouver Parks for FortisBC to pave the BLSG, from Sperling to Cariboo Drive, as part of their project.

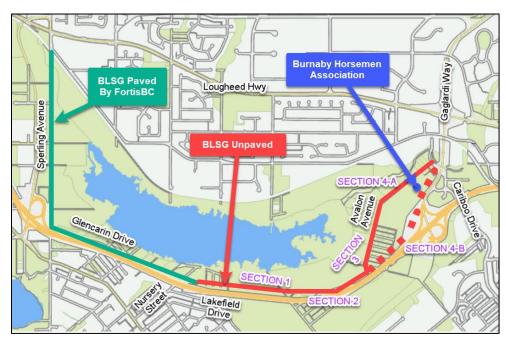
Subsequently, FortisBC completed their project in 2022 which included paving only the western portion while leaving the remaining greenway as is. This was partly due to complexities with the City's public engagement and requirements from various land ownerships and interested parties about the intent and use of the greenway.

Since then, discussions with Metro Vancouver Parks continue as they desire to transfer operation & maintenance responsibilities of their portion of the trail to the City of Burnaby and are prepared for a cost contribution towards the construction cost. As a next step, staff retained a consultant to complete a feasibility study in which various challenges were revealed that would necessitate alternative approaches, and designs

for this section are highly dependent on the overall intention of use and end goal of the greenway. The following is a brief description of the different sections of the trail and the challenges associated with each.

3.0 GENERAL INFORMATION

As mentioned, the section from Sperling to approximately 500 m east past the parking lot at the end of Glencarin Drive is already paved by FortisBC. The remaining trail (approx. 3200 m), which extends to 9145 Avalon, is a fine gravel running surface that is maintained by Metro Vancouver. The remaining 150 m from 9145 Avalon to Cariboo Road is paved but in poor condition. The image below illustrates the overall current state of BLSG. **Attachment 3** provides images of each section that will be further described.



3.1 Section 1

Section 1 of the trail for paving is approximately 1350 m of well-maintained BC Hydro access gravel road that runs under their aerial power lines. Staff have engaged a consultant to develop a detailed design for paving this section. Initial feedback is that this asphalt pavement will hold since the existing road base is designed to withstand usage by heavy service trucks. It will require minimal drainage grading, and no excavation, thus, there should be no archeological or environmental concerns and should require approval from BC Hydro only. The design is expected to be completed in Q1 2025 and will then require BC Hydro permit approval, which also has added delays due to BC Hydro's preference of surface treatments within their Statutory Right of Way.

3.2 Section 2

Section 2 of the trail is approximately 350 m of gravel trail, which would require some drainage and culvert upgrades (triggering a hydraulic flood analysis) along with excavation, and thus archaeological and environmental permits will be required. This section is under the jurisdiction of the Ministry of Transportation and still follows the BC Hydro line. Negotiations with both entities are required to get approval to proceed with any work on section 2.

3.3 Section 3

Section 3 of the trail is approximately 250 m of gravel trail, which would require drainage and culvert upgrades (triggering a hydraulic flood analysis) along with excavation, and thus archaeological and environmental permits will be required. This section is under Crown Federal jurisdiction, so negotiations are required with this entity to get approval to proceed with any work on section 3.

3.4 Section 4 – Option A

Section 4 is the section in which Metro Vancouver Parks currently maintains. If the desire is to improve the existing trail, then option A (identified as 4-A) of the trail is approximately 1250 m long with the existing pavement at the end at Cariboo Road in need of resurfacing. The remaining 1100 m of gravel trail is much more involved and runs through an environmentally sensitive area with wetland type conditions. The existing trail requires a high level of maintenance since it is built of very wet unstable base and would require extensive drainage work, deep base excavation with replacement of engineered fill and multiple culvert upgrades; all requiring extensive archaeological and environmental work to proceed, as well as being very weather/seasonally dependent work. Conventional construction of a suitable base for a paved trail would be ineffective and is not recommended.

Metro Vancouver has communicated a desire to transfer operations and maintenance to the City of Burnaby with a one-time funding contribution, however, currently it is not possible to compare the contribution to the overall construction cost since there has not been a detailed design completed yet. City staff have been willing to initiate this work, however in parallel there have been other interest groups in the area that have voiced concern over paving in general (not just within this section but the entire greenway) and would prefer to have it left in its current state.

Alternate forms of surface treatment could be explored for this section to improve the running surface of the trail, however preliminary comments from suppliers of these treatments are that they are unlikely to achieve substantial longevity if applied to the current unstable base conditions, especially with the damp conditions being present year-round in this area.

3.5 Section 4 – Option B

An alternate route to section 4 is option B (identified as 4-B), which may be worth further investigation. If the City decided to move forward, negotiations with the Ministry of Transportation for section 2 may also include discussing a new trail

alignment along the shoulder of Highway 1. The ground conditions of this alignment are anticipated to be in better condition (since soils used the construction of the highway were pre-loaded engineered fill) and there would be less environmental, archeological and groundwater considerations adjacent to the highway.

Theoretically, this could be a suitable option for an alternate route to Cariboo Road, however, it is under the condition of the Ministry of Transportation being amenable to the concept. 4-B requires significantly more investigation from staff before formally moving forward.

3.6 Recommendations

Staff are preparing to start paving section 1 in 2025 pending a BC Hydro work permit is approved. However, beyond this work with the challenges and complexities presented along the remaining sections, as well as the varying feedback on the overall use and intent of the greenway, it is recommended that a comprehensive master plan be completed to establish the ultimate goals and objectives of use and service for this area from a social, environmental, economic, and amenity perspective. Staff may then align their efforts to ensure any improvements to the greenway support the vision of the master plan appropriately.

4.0 COMMUNICATION AND COMMUNITY ENGAGEMENT

Upon Council direction, staff will continue to provide status updates and consult with the various parties involved.

5.0 FINANCIAL CONSIDERATIONS

Capital funding is identified in the Engineering capital program for this project and staff are currently working on the design for section 1. A future report will be submitted to Council prior to any construction commencing.

Respectfully submitted,

May Phang, P.Eng., General Manager Engineering

ATTACHMENTS

Attachment 1 – Metro Vancouver Map Burnaby Lake Southeast Greenway Attachment 2 – FortisBC Pattulo Gasline Replacement Project Route Alignment Attachment 3 – Burnaby Lake Southeast Greenway Current Condition

REPORT CONTRIBUTORS

This report was prepared by Christopher Stacey, Director Engineering Projects, and reviewed by May Phang, General Manager Engineering.