City of Mississauga Corporate Report



Date: October 30, 2023

To: Chair and Members of General Committee

From: Geoff Wright, P.Eng, MBA, Commissioner of Transportation and Works Originator's files:

Meeting date: November 15, 2023

Subject

Interim Design for the Downtown Cooksville Segment of the Dundas Bus Rapid Transit (BRT) Mississauga East Project and Transit Project Assessment Process (TPAP) note to file (Ward 7)

Recommendation

- That the interim design for the Downtown Cooksville segment of the Dundas BRT Mississauga East Project be endorsed as outlined in the corporate report titled "Interim Design for the Downtown Cooksville Segment of the Dundas Bus Rapid Transit (BRT) Mississauga East Project and Transit Project Assessment Process (TPAP) note to file (Ward 7)" dated October 30, 2023, from the Commissioner of Transportation and Works.
- 2. That the Commissioner of Transportation and Works or their designate proceed with filing a TPAP note to file.

Executive Summary

- In February 2020, City Council approved a Mississauga Official Plan (OP) amendment to widen the Dundas Street right-of-way from its current width of approximately 35 to 42 metres to achieve the BRT preferred design from the Dundas Connects Master Plan. The existing segment of Dundas Street between Camilla Road/Kirwin Avenue to Confederation Parkway is constrained due to property impacts and required a reassessment within the scope of the Dundas BRT project design.
- To implement the proposed design from the approved TPAP in Downtown Cooksville, a significant number of full property takings would be required, most of which would be subject to land dedication at the time of development in the future.
- Staff are proposing an interim design for this segment that prioritizes moving people on public transit and enhances the public boulevard to make Downtown Cooksville a key transportation, economic and residential hub. This includes dedicated median

bus lanes with transit stops, one general-purpose lane in each direction with turn restrictions, and an enhanced boulevard with cycle tracks and sidewalks. Tree corridors will be provided at locations where space allows.

• If endorsed by Council, this requires a filing of a TPAP note to file ahead of finalizing the Request for Proposal package, which is anticipated to be issued in early 2024.

Background

The Dundas BRT Mississauga East Project is a 7 km segment that runs between the Etobicoke Creek and Downtown Cooksville, and is part of a larger project led by Metrolinx. The entire Dundas BRT is proposed along a 48-kilometre stretch of Dundas Street from Highway 6 in the City of Hamilton through to the Kipling Transit Hub in the City of Toronto.

The implementation of the Dundas BRT Mississauga East Project is being led by the City of Mississauga. The project received a Notice to Proceed from the provincial government in the spring of 2022 following the completion and approval of the TPAP. It was announced in March 2022 the Dundas BRT Mississauga East Project would be funded through the Investment in Canada Infrastructure Program (ICIP) by the Federal and Provincial governments, in partnership with the City of Mississauga, and includes eight stations from Etobicoke Creek to Confederation Parkway. The total ICIP funding amount is \$305.7M.

City Council approved the report titled, "Dundas Bus Rapid Transit (BRT) Mississauga East -Transit Project Assessment Process (Wards 1, 3, 4 and 7)" to General Committee on February 9, 2022 from the Commissioner of Transportation and Works, to support the TPAP process for the Dundas BRT Mississauga East Project with a focus on developing bus priority infrastructure for a 7 km segment of the Dundas Street Corridor. The report indicated that staff would report back with an updated design for the Downtown Cooksville segment between Camilla Road/Kirwin Avenue and Confederation Parkway.

The Dundas BRT design for the Downtown Cooksville segment was established based on the recommendations made in both the Dundas Connects Master Plan (2018) and Vision Cooksville (2016) reports, which set out a series of principles to guide improvements in the Cooksville community. The reports were supported by significant public engagement. This area is anticipated to experience growth in the coming years that is spurred by the adjacent transit projects on Hurontario Street (light rail transit) and Dundas Street (bus rapid transit).

Comments

The endorsement of the Dundas Connects Master Plan established Dundas Street as a corridor to connect key transit spines and to move people by constructing a dedicated median-running BRT infrastructure. Council passed Amendment 106 to the Mississauga OP to widen the Dundas Street right-of-way from approximately 35 to 42 metres. However, the existing right-of-

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way on the segment of Dundas Street between Camilla Road/Kirwin Avenue to Confederation Parkway is much more constrained typically ranging from 20 to 37 metres.

As design advanced from conceptual (Dundas Connects) to 30% as part of the TPAP study, it was determined the OP limits within Downtown Cooksville extended into existing properties to require full property takings. To lessen the impacts to the community and businesses in the area, alternative designs that are viable in the interim needed to be considered. The City would explore acquiring lands to achieve the OP requirements through the development application process, which it has successfully done in the past.

Design Alternatives

Staff has worked with the technical advisor on the Dundas BRT Mississauga East Project to examine a design alternative for Downtown Cooksville. The design alternative has been developed as an interim condition before the 42 metres right-of-way can be obtained through future developments. To minimize property impacts, an interim design solution needed to be considered that can still maximize benefits of the Dundas BRT.

Through discussions with internal City stakeholders, including the local Ward Councillor, and external consultants, and utilizing the guiding principles of Dundas Connects and Vision Cooksville, a preferred design alternative was selected to prioritize moving people on public transit and enhance the public boulevard to make Downtown Cooksville a key transportation, economic and residential hub.

It is proposed that the interim design for this segment include dedicated median bus lanes with transit stops, one general-purpose lane in each direction with turn restrictions, and an enhanced boulevard with cycle tracks and sidewalks. Tree corridors will be provided at locations where space allows. Achieving the ultimate right-of-way in Downtown Cooksville through future developments will take some time. As those developments emerge, staff intend to assess the opportunities of the land dedication and how they can be utilized as part of the public realm.

The team recognizes that it does not provide the design proposed in the TPAP, but this option will prioritize moving people into and through Downtown Cooksville, connect the City's two major rapid transit lines (the Hazel McCallion Line and the Dundas BRT) and enhance the public realm of this historic community. The traditional road widening approach is not only cost prohibitive but also competes with the principles of Vision Cooksville, which promotes a walkable community.

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Figure 1 Cooksville Interim Design - Typical Cross Section



Figure 2 Cooksville Interim Design - Intersection at Hurontario & Dundas

Prioritizing Moving People on Public Transit – The proposed design creates an environment for Downtown Cooksville to be a connection point and a destination. The City needs to be able to move more people as it continues to grow. Future intensification along the Dundas Street corridor will increase both demand on public transit and vehicular traffic. Dundas Street is already one of the busiest transit corridors in the city. It is projected that the public transit demand will nearly double in the next decade. To alleviate pressure on traffic congestion and ensure sufficient the level of public transit services, the interim design includes dedicated median bus lanes to provide reliable and efficient public transit services. Implementing the dedicated bus lanes in Downtown Cooksville also improves connectivity, facilitates a critical link between our two busiest rapid transit lines/corridor for a multi-modal community.

The improved future public transit services is anticipated to encourage people to use more public transit, reducing the need of using personal vehicles. The prioritization of public transit also aligns with a number of key plans:

- City's Vision Zero goals provide a safe and equitable transportation network that
 protects all users
- City of Mississauga's Strategic Plan a city where people can get around without an automobile, and where transit will directly influence and shape the form of the city
- MiWay 5 Transit Service Plan contributes to all 10 key benefits from MiWay service changes
- Metrolinx's 2041 Regional Transportation Plan identified Dundas BRT as a project required to meet the needs of the GTHA in the near term

Enhancement of Public Boulevard – To have a vibrant public realm and walkable streets was the top principle stemming from Vision Cooksville. The recommendations included providing improved pedestrian amenities, ensuring pedestrian-friendly building design, increasing pedestrian safety, and improving cycling infrastructure and pedestrian connections. The interim design supports this principle and recommendations by encompassing streetscaping features and improvements over the current condition to better accommodate the needs of different users. Downtown Cooksville does not currently have any active transportation infrastructure or continuous tree corridors. The majority of the public boulevard in Cooksville includes only a 1.5m concrete sidewalk and some buffer space.

The interim design proposes continuous active transportation infrastructure and where space and existing infrastructure permits, a tree corridor will be incorporated.

Other Benefits – By encouraging sustainable travel through increased access to reliable and convenient public transit, the City can reduce the number of vehicles on the road, leading to decreased congestion and pollution. Furthermore, enhanced transit services along the corridor has the potential to support population and employment growth, provide benefits to local businesses, and aid in the development of mobility hubs.

Impacts on Vehicular Traffic – The interim design will have impacts on vehicular traffic in the area with the change to a single general purpose lane in both directions along with turning restrictions. This section of Dundas Street already experiences congestion on a regular basis. The interim design does not eliminate driving access in the Cooksville area; instead, it aims to modify the roadway and prioritize alternative transportation. The expectation is that people will be more inclined to use public transit due to the efficient services offered by the dedicated BRT lane and the adjacent LRT line. By prioritizing transit and enhancing active transportation and the public realm, a behavioral shift is anticipated, which ultimately improves connectivity and level of service.

To alleviate potential congestion, the interim design implements turn restrictions to smooth the flow of through traffic in Cooksville. Specifically, at the intersection of Hurontario Street and Dundas Street, vehicular traffic will only be permitted to continue straight along Dundas Street. Neither left nor right turns will be allowed in either the east or west direction. Vehicles can execute turning movements using a "ring-road system" around the intersections of Hillcrest Avenue, Kirwin Avenue, Camilla Road, King Street West & East, and Confederation Parkway.

Next Steps

A TPAP note to file is required in order for the proposed work to proceed. Staff are seeking endorsement of the interim design and the authority to submit a TPAP note to file. This will enable the interim design to be implemented as part of the Dundas BRT Mississauga East Project.

After the TPAP note to file process is completed, staff and the technical advisor will work together to finalize the Reference Concept Design (RCD) and Project Specific Output Specification (PSOS). The RCD and PSOS will be incorporated into the RFP package of the Dundas BRT Mississauga East Project, which is anticipated to be issued in early 2024.

Financial Impact

There are no financial impacts resulting from the recommendations in this report.

Conclusion

The interim design of the Dundas BRT through Cooksville will prioritize moving people on public transit along Dundas Street and achieve important connections to the Hazel McCallion Line resulting in improved access for both residents and businesses.

This proposed design will promote greater transit use along with active transportation, enhance the public boulevard and facilitate the continued growth of the area. The interim design will also

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be able to implement key recommendations from Dundas Connects and Vision Cooksville with a viable property acquisition cost.

In order to proceed with the interim design, staff are seeking the authority to file a TPAP note to file that will allow the proposed design to be implemented as part of the Dundas BRT Mississauga East Project.

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Geoff Wright, P.Eng, MBA, Commissioner of Transportation and Works

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