

Date: 2023-11-30

Subject: **Light Rail Transit (LRT) Extension Study – Advance to TPAP Stage (RM 35/2023)**

Contact: Doug Rieger, Director, Transit Development

Report Number: Brampton Transit-2024-029

Recommendations:

1. That the report from Doug Rieger, Director, Transit Development to the Committee of Council Meeting of January 17, 2024, re: **Light Rail Transit (LRT) Extension Study – Advance to TPAP Stage (RM 35/2023)**, be received;
2. That staff be directed to advance the preferred tunnel alignment through the Transit Project Assessment Process (TPAP); and
3. That staff be directed to continue to engage with federal and provincial officials to help explore and discuss potential funding options for the LRT Extension; and
4. That staff monitor the status of various federal and provincial infrastructure programs and when appropriate, submit applications to help fund the extension of the Hazel McCallion LRT from Steeles Avenue to Downtown Brampton; and
5. That a copy of this report be forwarded to Metrolinx, the Province (Ministry of Transportation, Ministry of Infrastructure) and the Federal government (Ministry of Transport, Ministry of Infrastructure); and to the Brampton area MPs and MPPs, along with related correspondence.

Overview:

- **In May 2019, Brampton Council approved the study that would update the 2014 approved Transit Project Assessment Process (TPAP) alignment and bring the LRT along Main Street and into Downtown Brampton. Over the past 4-years, the project team has advanced this project to a point where a single surface and tunnel option had emerged. Both have found to be technically feasible, and each comes with its own distinct benefits and costs.**

- In July 2021, Council directed staff to take both the preferred surface and preferred tunnel options to the 30% Design and Draft Environmental Project Report (EPR) phase. Council also unanimously supported the tunnel option as the preferred alignment to advance funding advocacy with the current provincial and federal governments.
- Council was informed of the outcome of the 30% Design and Draft EPR Phase in a Council Workshop held in February 2023, which was followed by a report to Council in May 2023. During this meeting Council's direction to staff included the following:
 - have further dialogue with Metrolinx and provincial officials to help inform the tunnel option, which is the alignment unanimously supported by Brampton City Council to advance funding advocacy.
 - engage with federal and provincial officials to help explore and discuss potential funding options for the LRT Extension
- Metrolinx staff have not identified any design issues and have not expressed a preference with either of the two LRT Extension alignments. Metrolinx also confirmed that the LRT Extension was grouped in to the "High" prioritization category, during their annual review of their Frequent Rapid Transit Network (FRTN) Prioritization Framework.
- Provincial and Federal advocacy for the project has been extensive over the past two years. Advocacy over the past six months has included both the FCM and AMO conferences, as well as separate meetings with the Federal Minister of Housing, Infrastructure and Communities, high level Ministry of Transportation staff, staff from the Prime Minister's Office and the Prime Minister.
- The federal and provincial governments have both acknowledge the importance of this project and also highlighted the need for funding programs to be in place to help deliver this project. Staff expect that details on the federal Permanent Transit Funding program will be released in early 2024. The Ontario government also recently announced that it will be creating a new Ontario Infrastructure Bank to help fund large scale infrastructure projects, including transit.
- Given the imminent launch of these two new programs, the time is right to advance one of the alignments through the TPAP process to ensure that the project will be ready as these new infrastructure funding mechanisms come online. And with the increased housing intensification now being planned for Downtown Brampton, the delivery of this project is more necessary than ever before.

- **The 30% Preliminary Design and Draft EPR's identified that both the surface and the tunnel options are technically feasible, and each comes with their own distinct benefits and costs. The underground option is more costly (\$2,804M) compared to the surface option (\$933M). However, the underground option also provides real travel time savings for transit riders, pedestrians, cyclists, and motorists and allows the City to achieve its vision for Main Street and Downtown Brampton while limiting risks for implementation and operation, compared to the surface option.**
- **Based on the overall benefits of the tunnel alignment compared to the surface alignment, the funding ask for higher order transit in Brampton is comparable to what other GTHA municipalities have received, and that Brampton City Council has already unanimously supported the tunnel alignment to advance funding advocacy, staff are recommending to advance the tunnel alignment through the TPAP process.**

Background:

In September 2014, the Transit Project Assessment Process (TPAP) for Hurontario-Main LRT was approved and in April 2015, the Province announced funding for the Hurontario-Main LRT. Subsequently, in October 2015, Brampton Council endorsed construction of the LRT to Steeles Avenue only and in February 2017 directed staff to study alternative LRT routes into Downtown Brampton. The alternative routes included LRT Steeles Avenue West to McLaughlin Road and north on McLaughlin Road to Downtown Brampton and along Steeles Avenue East to Kennedy Road and North on Kennedy Road to Downtown Brampton.

At its May 22, 2019 meeting (Committee of Council May 15, 2019), Council approved funding and provided direction to staff to update the 2014 Hurontario-Main Light Rail Transit Environmental Assessment Study (2014 HMLRT EA) with consideration for a Main-George one-way loop, tunneling options, the original 2014 HMLRT EA approved surface route, and incorporation of the elements of enhanced streetscaping for Downtown Reimagined, where possible.

The purpose of this study remained the same, which is to ultimately recommend a preferred alignment for the LRT Extension from the Brampton Gateway Terminal to Brampton GO station following the Main Street corridor. This study is being carried out under the Transit Project Assessment Process (TPAP, O.Reg. 231/08), and the Metrolinx Business Case Process.

A long list of potential options was identified and shared for public and stakeholder agencies input at a virtual Open House in June 2020. This long list of options was evaluated and then short listed. The short-listed options were further evaluated in a Preliminary Design Business Case (PDBC). Council was updated on the results of the

PDBC in March 2021 and the information shared with public and agency stakeholders for input at a virtual Open House in May 2021.

The results of the PDBC identified two emerging options (one surface and one tunnel option) that should be taken forward for further study. In July 2021, Council endorsed staff's recommendation to advance both the surface and tunnel options through the 30 % Preliminary Design Stage to help further differentiate the benefits of each option. Council also unanimously supported the tunnel option as the preferred alignment to advance funding advocacy with the current provincial and federal governments.

The project team has completed the development of the draft 30% preliminary design for both the surface and tunnel alignment options with the corresponding draft Environmental Project Report (EPR) for each option. The findings were presented at a Council Workshop held on February 27, 2023, which was followed up with a report to the May 10, 2023 Committee of Council. During this meeting Council directed staff as follows:

- Staff have further dialogue with Metrolinx and provincial officials to help inform the tunnel option, which is the alignment unanimously supported by Brampton City Council to advance funding advocacy, which could then be taken through the Transit Project Assessment Process (TPAP), and report back in approximately six months on outcome of these discussions.
- Staff be directed to engage with federal and provincial officials to help explore and discuss potential funding options for the LRT Extension.

Current Situation:

The City of Brampton has been involved in various funding advocacy efforts over the past six months and staff have also engaged with Metrolinx on the LRT Extension project. The following is a summary of these discussions along with an update on other factors that influence the advancement of this project.

Engagement with Metrolinx

Metrolinx staff have been involved in the LRT Extension Study since the beginning and they have provided comments on the 30% design and draft EPR's for both LRT Extension alignments. Metrolinx has not identified any issues with either of the two designs and have not expressed a preference with either of the two LRT Extension alignments.

In recent discussions, Metrolinx did confirm that the Hurontario LRT North Extension was evaluated in the 2023 annual review of Metrolinx's Frequent Rapid Transit Network (FRTN) Prioritization Framework. Brampton staff have been engaged throughout the annual review through Metrolinx's Municipal Technical Advisory Committee, and the results were shared at a meeting that was held in the spring of 2023. The LRT

Extension was grouped in to the “High” prioritization category along with 15 other projects. Metrolinx did note that the prioritization was based on a surface alignment and that the increase cost for the tunnel alignment may negatively impact the preliminary benefit cost ratio. However, Metrolinx did not indicate if it would affect its prioritization. To date, the project remains in the “High” category.

Engagement with the Government of Canada and Province of Ontario

Since Brampton City Council endorsed the tunnel option as the preferred alignment to advance funding advocacy, with the current provincial and federal governments in mid 2021, the City of Brampton has advocated extensively with both levels of government. This has included virtual and in-person advocacy days, individual meetings with various ministers, staff, and opposition party members, several pre-budget submissions and multiple AMO and FMC conferences. Following one of the federal advocacy efforts, the Federal Minister of Transport at the time, publicly stated that the federal government is willing to invest in the LRT tunnel through downtown Brampton.

There continued to be several advocacy efforts over the past six months, which included both the FCM and AMO conferences, as well as separate meetings with the Federal Minister of Housing, Infrastructure and Communities, high level Ministry of Transportation staff, staff from the Prime Minister’s Office and the Prime Minister. Appendix A attached lists all of the advocacy since the fall of 2021.

With all of this advocacy, provincial and federal officials are very much aware of Brampton’s transit priorities and specifically with the tunnel alignment for the LRT Extension. They have all recognized both the need for the Hazell McCallion LRT to be extended into downtown Brampton along with the significant costs and benefits of this critical piece of transportation infrastructure.

One of the key messages coming back to Brampton staff during this advocacy has been that there needs to be funding programs in place to help deliver this project. Both the federal and provincial official have stated that without infrastructure programs, they are unable to deliver a project like this.

Infrastructure Funding

In June, the federal government announced that details on the “next generation” of federal infrastructure funding programs would be released this fall. We now understand that these details will now be released early in 2024. Federal infrastructure staff have informed Brampton that the part of the Permanent Transit Funding program will include the following:

- baseline capital funding that supports routine base capital investments;

- metro-region agreements that are allocated based on demonstrated need and supports all transit investments, including new or extended subway, LRT or BRT lines; and
- direct delivery involving direct funding applications with a competitive intake process.

The Ontario government also recently announced that it will be creating a new Ontario Infrastructure Bank to help fund large scale infrastructure projects, including transit. This will be a new tool that would attract investors to help finance and build this essential infrastructure.

Given the imminent launch of these two new programs, the time is right to advance one of the alignments through the TPAP process to ensure that the project will be ready as these new infrastructure funding mechanisms come online.

Housing

Another important consideration for today's environment, compared to even just a few years ago, is the increase in housing intensification that is now being planned for Downtown Brampton. We expect the population forecasts will increase considerably given the new policy direction and increased amount of development activity in the downtown and the uptown urban centre.

The preliminary design business case took into consideration the previously planned development along the corridor from Steeles Avenue (uptown urban centre) into Downtown Brampton. We can safely assume that ridership demand will also increase considerably given this new policy direction. It will be even more important to have the LRT Extension completed to help move these people, especially between two these two prominent urban centres in Brampton.

Recommended Alignment to take through TPAP

As mentioned in previous reports, the 30% Preliminary Design and Draft EPR's identified that both the surface and the tunnel options are technically feasible, and each comes with its own distinct benefits and costs.

While the surface alignment is less costly (\$933M), the project identified a number of risks and issues which included:

- Transportations Impacts – including significant travel time delays for both transit and other vehicles, as well as the lack of a dedicated cycling facilities through a segment of the line.

- Impacts to Downtown Brampton – including the lowering of Main St and the installation of ramps, railings at intersections, and a more constrained pedestrian environment.
- Potential for Future Extension to the North – with the updated LRT Terminus for the surface alignment, the options to extend the LRT in the future to the north becomes more complicated and challenging.
- Operation and Maintenance Risks – with the LRT in mixed traffic, service disruptions can be anticipated due to mode conflicts, emergency vehicles (fire, EMS) and maintenance activities for utilities including street lighting. Some of these service disruptions could be significant depending on the circumstances.

While the underground option is more costly (\$2,804M) compared to the surface option, it also provides real travel time savings for transit riders, pedestrians, cyclists, and motorists and allows the City of Brampton to achieve its vision for Main Street and Downtown Brampton while limiting risks for implementation and operation, compared to the surface option.

The tunnel alignment also has distinct benefits for a vibrant downtown:

- Time savings. The tunnel alignment will travel from Steeles Avenue to Downtown Brampton in about 7 minutes. This is:
 - almost 40% faster than current Züm BRT service (11 mins)
 - almost 25% faster than proposed surface alignment of the LRT (9 mins)
 - and almost 3.5x faster for auto trips travelling the same corridor with the surface LRT (24 mins)
- It is easier to extend the line further north along Main Street as intensification builds north of Downtown Brampton.
- It will be more reliable compared to a surface alignment as all of the supporting infrastructure is underground.
- It will allow for active transportation infrastructure to be placed directly on Main Street (with no diversions) delivering an active transportation corridor from Port Credit to Downtown Brampton.
- Peak ridership will increase by at least 5% over the surface alignment. In all likelihood, this ridership will be considerably more given the increased housing now being planned for Downtown Brampton

The main consideration for the tunnel alignment is its cost. Projects of this nature that are constructed in the GTHA receive all or the vast majority of their funding from higher levels of government. As previously referenced in the last report, staff have identified that the funding required from the federal and provincial governments to deliver higher

order transit in Brampton is comparable to what other cities in the GTHA have received. An updated **Table 1** below compares recent higher order transit projects that the federal and provincial governments have funded in the GTHA and highlights the change in transit demand both before and after the pandemic.

GTHA Rapid Transit Projects	Municipal Population (2021 Census)	Total Cost of Project(s)	Provincial Funding	Federal Funding	Provincial & Federal Funding per Capita	Change in Transit demand between 2009 and 2019	Covid Ridership Recovery (Aug. 2023)
City of Toronto* Scarborough Subway Extension Ontario Line Finch West LRT Eglinton Crosstown	2,794,356	\$39.8B	\$31.32B	\$8.48B	\$14,240	12%	↓22%
City of Hamilton Hamilton LRT	569,353	\$3.4B	\$1.7B	\$1.7B	\$5,970	3%	↓4%
City of Brampton Brampton LRT Extension (Tunnel) Queen St - Highway 7 BRT	656,480	\$3.3B	\$1.65B	\$1.65B	\$5,030	160%	↑30%

Notes: *City of Toronto projects does not include Yonge Subway Extension as it is primarily a York Region Project

Table 1 – Comparative Higher Order Transit Funding, GTA Projects

Brampton continues to lead the GTHA in ridership growth and Covid-19 recovery. This table clearly demonstrates that the funding that the City of Brampton needs to advance higher order transit is in line with what other municipalities have received. In addition, Brampton can also clearly state that even more funding is needed and justified given the high demand for transit in our community.

Corporate Implications:

N/A

Strategic Focus Area:

The LRT Extension from Steeles Avenue to Downtown Brampton fills a notable gap in the regional rapid transit network by connecting the Hazel McCallion Line directly to the Kitchener GO Rail line (Brampton Innovation District GO), existing Brampton Transit and Züm service, and future higher order transit service on Queen Street. It will help support the growth and intensification of Downtown Brampton and the uptown urban centre. The LRT Extension corresponds directly to the following Strategic Focus Areas.

- **Transit & Connectivity:** Focusing on transportation and a connected infrastructure that is safe, convenient, efficient, and sustainable.
- **Growing Urban Centres & Neighbourhoods:** Focusing on an economy that thrives with communities that are strong and connected.

Conclusion:

The 30% Preliminary Design and Draft EPR’s identified that both the surface and the tunnel options are technically feasible, and each comes with its own distinct benefits and costs. The underground option is more costly (\$2,804M) compared to the surface option (\$933M). However, the underground option also provides real travel time savings for transit riders, pedestrians, cyclists, and motorists and allows the City of Brampton to achieve its vision for Main Street and Downtown Brampton while limiting risks for implementation and operation, compared to the surface option.

Based on the overall benefits of the tunnel alignment compared to the surface alignment, the funding ask for higher order transit in Brampton is comparable to what other GTHA municipalities have received, and that Brampton City Council has already unanimously supported the tunnel alignment to advance funding advocacy, staff are recommending advancing the tunnel alignment through the TPAP process.

Once the TPAP is completed and approved by the Ministry of the Environment, Conservation and Parks (MECP), the project documents will be forwarded to Metrolinx, so the LRT Extension can move forward with the detailed design, construction and implementation phases once funding is received.

As the TPAP progresses, staff are also recommending that the City of Brampton continue with its funding advocacy efforts with federal and provincial officials and that staff monitor the status of various federal and provincial infrastructure programs and if/when appropriate, submit applications to fund the extension of the Hazell McCallion LRT from Steeles to Downtown Brampton.

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Attachments:

- **Appendix 1 – City of Brampton Advocacy Efforts Since 2021**