

The Exchange Extension
Schedule B Municipal Class Environmental Assessment

PROJECT FILE (FINAL)

August 2020

Prepared for: City of Mississauga

Prepared by: WSP

THE PUBLIC RECORD

This Municipal Class Environmental Assessment Project File is available for a 45 calendar day public review period from **August 6, 2020 to September 21, 2020** at:

<http://www.mississauga.ca/portal/residents/rwek-ea-studies>

This Project File has been placed on the public record during the COVID-19 outbreak. At this time, exceptional measures are being employed by the various levels of government to curb the pandemic. The City of Mississauga is making the necessary accommodations, based on the latest guidance from public health agencies, governments and other public bodies, to preserve the health and safety of its employees, residents, business owners and the general public. Due to emergency measures, including the closure of public institutions to visitors (i.e. City Hall, City of Mississauga Libraries etc.), the Project File is not being provided in 'hard copy' for public viewing at centralized locations. Interested members of the public may view the document on the City's website. Should a member of the public request a hard copy of the Project File, the City will assess how this might be prepared and delivered in a manner that is consistent with current public health agency and government direction regarding public protection.

In consideration of these unprecedented circumstances, the Project File is being made available for a period of 45 calendar days. Should unforeseen circumstances arise, modifications to the public record process may be made during this period.

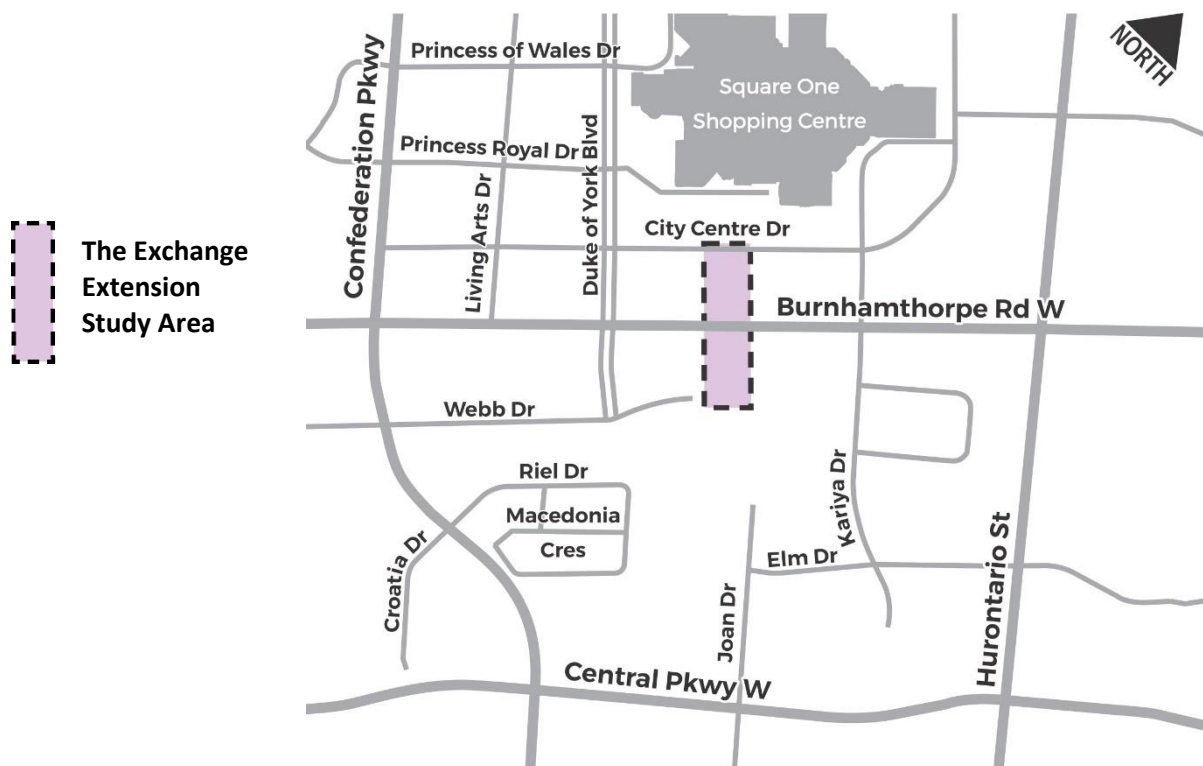
Executive Summary

Introduction

The City of Mississauga has completed a Municipal Class Environmental Assessment (Class EA) Study to evaluate the need to extend The Exchange from City Centre Drive to Webb Drive. The Study was carried out as a Schedule B project in accordance with the Municipal Class EA document (2000, as amended in 2015), as approved under the Ontario Environmental Assessment Act.

The Exchange Class EA study area is generally situated between Webb Drive to the south and City Centre Drive to the north (**Exhibit ES-1**). The study area to the south of Burnhamthorpe Road is currently vacant and used as an informal pedestrian path between Webb Drive and Burnhamthorpe Road West; the study area to the north of Burnhamthorpe Road West consists of a parking lot and an adjacent office building.

Exhibit ES-1: The Exchange Extension Study Area



Planning Context

The planning and policy framework applicable to The Exchange Class EA Study was reviewed. The planning and policy framework guides infrastructure planning, land use planning, and strategic investment decisions to support Provincial, Regional and Local objectives in growth and transportation. Plans and policies reviewed and documented included:

- A Place to Grow - Growth Plan for the Greater Golden Horseshoe (2019)
- Provincial Policy Statement (2020)
- Region of Peel Official Plan (2018)
- City of Mississauga Strategic Plan
- City of Mississauga Official Plan (2016)
- Downtown21 Master Plan (2010)
- Downtown Core Local Area Plan (2015)
- Mississauga Transportation Master Plan (2019)
- City of Mississauga Cycling Master Plan (2018)

One of the key guiding plan/policy documents is the Downtown Core Local Area Plan (Mississauga Official Plan Amendment 8 - "MOPA 8"), which builds on the Official Plan and contains more detailed policies and schedules specific to the Downtown Core. The Downtown Core Local Area Plan (DCLAP) policies are intended to promote a high quality of urban design and urban built form. The proposed The Exchange extension is being planned to directly support DCLAP policies.

The DCLAP goals and objectives are directly relevant to The Exchange Class EA Study:

- ▶ Create a vibrant Downtown by strengthening the transportation system, improving linkages/access, and enhancing the pedestrian experience;
- ▶ Create a fine-grained, well-connected road network that supports multiple modes of transportation; and
- ▶ Develop an urban environment that includes high-quality public spaces.

The proposed extension of The Exchange is consistent with the following policies of the DCLAP:

- ▶ Development Objectives outlined in Section 2.1 of DCLAP provide policies intended to plan for the location of streets, provide for a high standard of urban and streetscape design, and develop/enhance of a comprehensible public/private system of pathways and open space.
- ▶ Urban Design Objectives outlined in Section 3.1 provide policies intended to, for example:
 - Encourage a built form which has a high level of physical continuity, cohesion and linkage between building;
 - promotes urban scale land blocks, streets and built form appropriate to transit supportive and pedestrian oriented core;
 - achieve elements of linkage to the abutting communities while ensuring compatible integration and context sensitivity; and
 - achieve a balance of vehicular traffic and transit and active transportation needs to achieve pedestrian comfort, convenience, safety and accessibility.
- ▶ Urban Design policies for the public realm outlined in Section 3.2.1 of the DCLAP speak to the design of streets, edge boulevards and public open spaces. Again, these policies emphasize the desire to promote a high level of design tailored to the pedestrian and cyclist, and on-street experience.

Existing Conditions

Land Use

The proposed extension of The Exchange will be situated on and adjacent to lands designated for future condominium communities and mixed-use development. Existing land use in the broader surrounding area contains a mix of high-density condominium residential communities with some street-level commercial use, as well as office uses and parking. An informal pedestrian path has formed along the future route for the Exchange, which connects Burnhamthorpe Road to the informal pedestrian path between Webb Drive.

Cultural Heritage

A Cultural Heritage Assessment was conducted in support of The Exchange Class EA. Based on this work, there are no built heritage resources or cultural heritage landscapes within or adjacent to The Exchange study area.

A Stage 1 Archeological Assessment was conducted in support of The Exchange Class EA Study (**Appendix B**). The assessment was carried by Archaeological Research Associates Ltd (ARA) in accordance with the *Ministry of Tourism, Culture and Sport (MTCS) Standards and Guidelines for Consultant Archaeologists* (2011). The findings indicate that The Exchange Class EA study area may have archaeological potential and should be subject to a Stage 2 Archeological Assessment. No ground alterations or development of any kind may occur within the study area until the Stage 2 assessment is complete.

Natural Environment

The natural environmental assessment included background review and field studies to characterize existing natural heritage features and functions. For any natural areas present, the assessment included: delineating existing vegetation communities, a botanical survey, general wildlife habitat survey, identification of potential Species at Risk (SAR) habitat, documentation of all incidental wildlife observations including bird calls, and confirmation of no surface drainage features in the four project areas. Field surveys were carried out in July 2019.

Key findings are summarized as follows:

- ▶ The study area is a mix of paved parking lot and vacant lands slated for future development with early successional vegetation growth;
- ▶ No portion of the area is within CVC's regulated area;
- ▶ No components of the City's Natural System as mapped on Official Plan Schedule 3 are present;
- ▶ No Core Areas of the Greenlands System are present;
- ▶ No fish habitat is present;
- ▶ No confirmed Significant Wildlife Habitat is present; and

- ▶ Implications of the MBCA have potential to occur during the construction phase of the project when clearing and grubbing of vegetation could potentially disturb nests of migratory birds.

Based on this review, it is concluded that the proposed road extension can be undertaken without impacting sensitive natural features and functions. Existing natural features within the Study Areas are limited and highly impacted due to the urban nature of the site, providing limited habitat functions for plant and wildlife species. With the proper implementation of mitigation measures, residual impacts to the identified natural heritage features are anticipated to be minor and manageable. Potential impacts and measures will be further revisited and confirmed at detailed design when grading and construction requirements are further refined.

Drainage and Stormwater

The study area falls within the Cooksville Creek watershed and is under the jurisdiction of the Credit Valley Conservation Authority.

There are no surface water features or areas regulated under Credit Valley Conservation Authority Regulation 160/06. Currently, surface water runoff from the existing The Exchange and developed and developed areas flows into the existing storm sewer system. Undeveloped parcels drain as overland flow to the surrounding street network where it enters the storm sewer system.

The City will develop a Stormwater Management Plan for the extension of The Exchange during the design phase. Storm runoff from the new section of The Exchange will likely be conveyed via catch basin to the existing sewer system. The stormwater management design for The Exchange extension will appropriately manage water quality and quantity per applicable City of Mississauga and Credit Valley Conservation design criteria. LID measures may be considered during detailed design however, opportunities may be limited by the constrained right-of-way.

Municipal Services and Utilities

The Region of Peel is making watermain and sanitary sewer improvements on numerous streets in the Mississauga City Centre. The Region has planned this work to improve water supply through water infrastructure upgrades, in support of approved growth in the Mississauga City Centre. Specific work underway in the vicinity of The Exchange Class EA study area includes: A new 1500 mm watermain along Burnhamthorpe Road, between Grand Park Drive and Cawthra Road; a new 400 mm

watermain on Duke of York Boulevard from Burnhamthorpe Road to Centre View Drive and Centre View Drive, for local distribution; and a mm new watermain on Webb Drive from Grand Park Drive to Duke of York Boulevard, for local distribution. Sanitary improvements are also identified in these areas. Construction is ongoing through 2020. Other local municipal services and utilities will be installed as part of proposed future developments.

Transportation

Existing Transportation Network

The Exchange currently exists as a 2-lane north-south roadway with pedestrian sidewalks on both sides within the parking lot of Square One Shopping Centre, from Burnhamthorpe Road West (to the south) to the main entrance of the shopping centre (to the north).

Other key north-south transportation links in the immediate area include: Kariya Gate and Duke of York Boulevard, both City collector roads. Key east-west transportation links in the area include Burnhamthorpe Road West, Webb Drive and City Centre Drive, and other City collector roads.

Traffic and Transportation Assessment

An assessment of existing (2018) traffic conditions was undertaken to assess the overall transportation network performance which incorporated the study areas of the four downtown EA studies (Redmond Road, Webb Drive, The Exchange and Kariya Drive). A detailed description of existing and future traffic conditions and associated methodology is included in the Transportation and Traffic Analysis Report, available upon request from City of Mississauga staff.

The micro-simulation assessment included an analysis of existing conditions and operational performance for the area bounded by Elora Drive, Webb Drive/Central Parkway West, Hurontario Street, as well as Burnhamthorpe Road West/City Centre Drive.

Based on the findings of this assessment, minor approaches of signalized intersections along Burnhamthorpe Road (northbound and southbound) and Hurontario Street (eastbound and westbound) experience high delays due to traffic signal coordination on major approaches and long cycle time (160 seconds). Existing traffic conditions at all

intersections in all four Class EA study areas are generally operating at an overall acceptable level of service (i.e. Level of Service “D” or better).

Results from the future (2031) traffic analysis indicated that without the extension of The Exchange between City Centre Drive and Burnhamthorpe Road, adjacent corridors are expected to operate with heavy delays where many turning movements are expected to operate with high delays. The extension of The Exchange corridor could provide an essential multi-modal connection between the community to the south of Burnhamthorpe Road and transit/shopping/community amenities to the north of Burnhamthorpe Road.

Problems and Opportunities

Based on a review of the planning context and policy framework and the existing traffic conditions, safety issues and multi-modal transportation deficiencies, the following problems and opportunities have been identified:

- ▶ Downtown Mississauga is transitioning to an urban, high-density, mixed use community that is oriented toward pedestrian mobility and access to public transit;
- ▶ A key objective of the City’s Downtown Core Local Area Plan is to create complete communities that have a compact urban form, are walkable and provide convenient access to a variety of land uses and public transit;
- ▶ A new north-south collector road will improve access and connectivity with Mississauga’s Downtown Core, connecting the existing and planned community south of Burnhamthorpe Road to the commercial uses to the north, including Square One Shopping Centre, a City of Mississauga landmark;
- ▶ A new roadway will provide additional routing in the downtown and make for more pedestrian-friendly environment; and
- ▶ There is an opportunity to contribute to a vibrant urban core through the creation of high-quality public realm/pedestrian environmental.

Problem and Opportunity Statement:

The Exchange is already being planned as the heart of the transitioning downtown. The extension of The Exchange will build on its presence as a main street within the Downtown, linking residents and visitors to residential, commercial, employment,

recreational and civic uses. The Exchange will provide an important link between the heart of the downtown, Square One, and neighbourhoods to the south. In addition to being an important community link, The Exchange is intended as a venue and a destination for community events and open air markets. The success of The Exchange relies on providing pedestrian-oriented, smaller scale retail and entertainment opportunities; maximizing access and walkability; creating an aesthetically pleasing streetscape supported by transit, public spaces, residences and commerce.

Alternative Solutions





Phase 1 of the Municipal Class EA process involves the identification of the transportation problems and opportunities to be addressed by the study and Phase 2 involves the identification and evaluation of a range of possible solutions or 'planning alternatives'. The following Alternative Solutions are being considered to address the Problems and Opportunities:

1. Do Nothing: Maintain existing transportation system within the study area i.e. new development would require an internal road network to connect with other collector or arterial roads.
2. Manage Transportation Demand: Improve access within the downtown by: discouraging single-occupant vehicles and encouraging carpooling; shifting travel demand to off-peak hours; and encouraging walking, cycling and transit use.
3. Improve Other North-South Routes: Upgrade parallel north-south roads (e.g. Joan Drive or Hurontario Street) to support transportation needs.
4. Extend The Exchange: Complete The Exchange as a 2-lane road from City Centre Drive to the proposed extension of Webb Drive.

The alternative planning solutions were assessed in their ability to reasonably address the problems and opportunities. Criteria were developed to guide the assessment process so that transportation planning, technical and environmental (socio-economic, community and cultural / heritage) conditions were all factored into the recommendation.

The assessment of alternatives employed a reasoned argument approach which assesses the potential impacts of each alternative and then compares the relative significance of the impacts among the alternatives to select the recommended solution. A summary is provided in **Exhibit ES-2**.

Exhibit ES-2: Summary of the Evaluation of Alternative Planning Solutions

	Alternative 1	Alternative 2	Alternative 3	Alternative 4
Category	Do Nothing	Manage Transportation Demand	Upgrade Parallel Roads	Extend The Exchange
 Transportation and Technical	<ul style="list-style-type: none"> - Does not address Problems and Opportunities. - Not consistent with City planning policies to create a finer-grained street network. - Does not improve network connectivity. - Does not contribute to downtown main street environment. 	<ul style="list-style-type: none"> - May result in some shift in travel demand to improve road operations. - Does not address the primary transportation problem of the need for a finer grid collector road network and City's vision for downtown main street 	<ul style="list-style-type: none"> - Does not address the Problems and Opportunities - Not consistent with City planning policies to create a finer-grained street network in the Downtown Core. - Does not address local transportation needs or improve network connectivity. 	<ul style="list-style-type: none"> - Consistent with City planning policies to create a finer-grained street network. - Improves network connectivity for drivers and pedestrians. - Improves road operations and safety. - Enhances access to transit and downtown walkability - Provides an important link between the downtown and neighbourhoods to the south
 Socio-Economic Environment	<ul style="list-style-type: none"> - No property required. - Does support existing and future community. - No opportunity to contribute to "heart of downtown" and community vibrancy, public space uses. 	<ul style="list-style-type: none"> - No property required - Although supportive of transit, cycling and pedestrian activities, this does not provide the specific infrastructure needed within the study area to support or enhance walkability. 	<ul style="list-style-type: none"> - Potentially significant property impacts along other corridors - Does not address problems and opportunities within the study area - Does not meet the multi-modal mobility needs of the community - Does not support economic development within the study area 	<ul style="list-style-type: none"> - Contributes to vibrant and community-oriented main street. - Prioritizes a high-quality pedestrian environment. - Provides for on-street parking. - Will provide a flexible space that supports mixed-uses and becomes a destination in the downtown.
 Natural Environment	<ul style="list-style-type: none"> - No impacts. 	<ul style="list-style-type: none"> - No impacts. 	<ul style="list-style-type: none"> - Some potential for impact, depending on improvements. 	<ul style="list-style-type: none"> - Removes a very small portion of successional cultural woodland vegetation and low-quality habitat. - Provides for sustainable transportation choices to reduce vehicle use.
 Cultural Environment	<ul style="list-style-type: none"> - No potential archaeological impacts. - No cultural heritage features identified. 	<ul style="list-style-type: none"> - No potential archaeological impacts. - No cultural heritage features identified. 	<ul style="list-style-type: none"> - Other corridors would require assessment. 	<ul style="list-style-type: none"> - Some areas will be subject to Stage 2 Archeological Assessment. - No cultural heritage features identified.
Evaluation Result	Not Preferred	Already Being Implemented Through City Policies	Not Preferred	Preferred

Preferred Planning Solution

Based on the results of the evaluation, Alternative 4, Extend The Exchange, is preferred because it fully addresses the Problems and Opportunities by:

- ▶ Supporting the creation of an urban environment that meets planning objectives, network connectivity and access;
- ▶ Fully addressing the City's transportation objectives by creating a fine-grained downtown street network;
- ▶ Providing a new north-south road for anticipated future high-rise, mixed-use development;
- ▶ Providing redundancy in the road network for all vehicles;
- ▶ Creating smaller, more walkable blocks that enhance pedestrian access to transit; and
- ▶ Supporting a mixed-use community by offering high-quality pedestrian environment and street-parking for street-level commerce.

Alternative 1 does not address any of the Problems and Opportunities. Alternatives 2 and 3 only partially address the Problems and Opportunities and do not contribute to a fine-grained street network that supports community growth, improved pedestrian options and access to transit.

Future Transportation Conditions

In general, future traffic conditions are not likely to change significantly and operations will not improve with the extension of The Exchange, given the expected growth in the downtown core. Traffic modeling indicates that the proposed The Exchange extension would provide north-south access and connectivity within the local road network.

It is important to note that the City's objectives of the Downtown Core Local Area Plan are to prioritize the development of a complete community with a compact urban form that is walkable and convenient to public transit and the cycling network.

MiWay Transit currently operates on the road network around Webb Drive, including on existing Webb Drive, Burnhamthorpe Road, Confederation Parkway, and Kariya Drive. MiWay has confirmed that there are no plans to extend local transit onto the proposed new segment of The Exchange.

The City of Mississauga Cycling Master Plan (2018) does not include plans for dedicated cycling facilities on The Exchange. However, there will be access to the surrounding cycling network which includes: a multi-use path on Burnhamthorpe Road and existing and future cycling facilities on Webb Drive.

Road Design Concept

A design concept was developed for the Preferred Planning Solution to extend The Exchange from City Centre Drive to Webb Drive. The design concept was developed for illustrative purposes only and is subject to refinement during future design phases. It is noted that subsequent to the Public Information Centre in June 2019, City staff continued to meet with property owners/developers north and south of Burnhamthorpe Road. As a result of this consultation, minor adjustments were made to the road right-of-way width, through some narrowing of the boulevard.

Exhibit ES-3 depicts the proposed typical road cross-sections, which are based on the City's Standard City Centre Cross-Section. **Exhibit ES-4** depicts the road alignment concept.

The following design aspects will be of particular interest in future design phases:

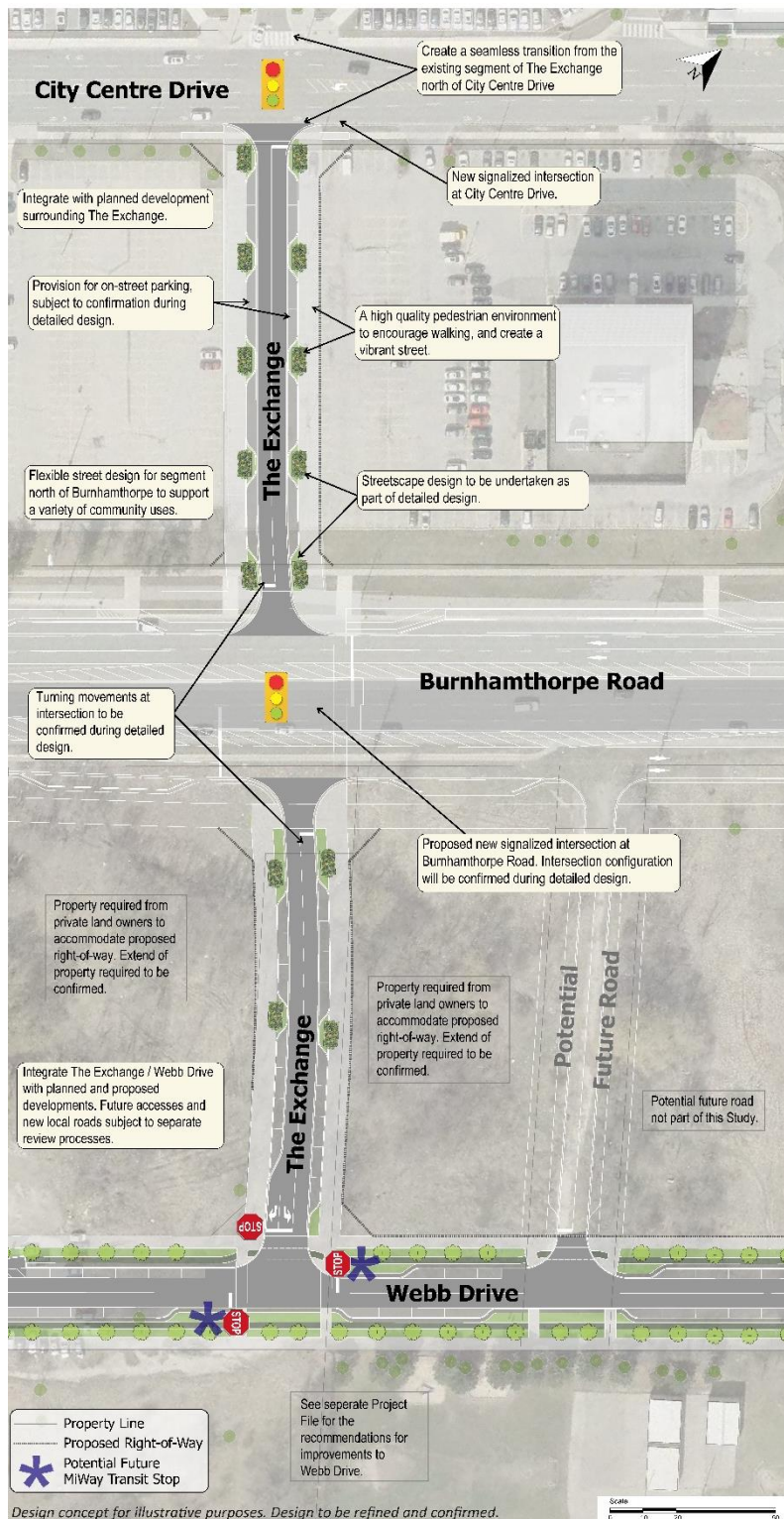
- ▶ The use of the City of Mississauga Standard City Centre Road Cross-Section will ensure appropriate space is available for underground utilities, street trees and sidewalk. However, some details of the road cross-section may be subject to minor adjustments during the design phase.
- ▶ Traffic operations including new intersections at City Centre Drive, Burnhamthorpe Road West, and Webb Drive.
- ▶ Design of wide sidewalks to create a high-quality pedestrian environment to encourage walking and create a vibrant street.
- ▶ Design of on-street parking, while maintaining appropriate clearance at intersections.

Streetscape depiction on **Exhibit ES-4** is conceptual only. Green areas are identified for future streetscape design and do not imply the presence of sod. Location of streetscape is subject to further design and integration with the future developments' utilities and municipal services.

Exhibit ES-3: The Exchange Typical Cross-Sections



Exhibit ES-4: The Exchange Design Concept



Note: Streetscape depiction is conceptual only. Green areas are identified for future streetscape design and do not imply the presence of sod. Location of streetscape is subject to further design and integration with building location, utilities and on-street parking considerations.

Design concept for illustrative purposes. Design to be refined and confirmed.

Potential Property Requirements

Based on the concept design, four properties are likely to be directly impacted: 223 Webb Drive, 180 Burnhamthorpe Road West, 151 City Centre Drive, and 201 City Centre Drive (note: municipal address may vary depending on property ownership registration). Since the start of the study, one of the potentially impacted parcels changed ownership; in early 2020 Camrost Felcorp Inc. took over ownership of 180 Burnhamthorpe Road West.

A total of approximately 2,590 m² will be required to accommodate The Exchange right-of-way. The area of each parcel that may be impacted is noted in **Exhibit ES-5**.

Exhibit ES-5: Area of Property Potentially Impacted

Roll Number	Municipal Property Address	Property Owner	Approximate Area of Property Potentially Impacted
05-04-154-06200-0000	223 Webb Drive	Baif Developments Limited	220 m ²
05-04-0-154-06300-0000	180 Burnhamthorpe Road West	2713589 Ontario Inc.(Camrost FelcorpInc.)	180m ²
05-04-0-154-00440-0000	151 City Centre Drive	Camcentre Holdings Inc.	2,150 m ²
05-04-0-154-00449-0000	201 City Centre Drive	Morguard MCC Ltd.	40 m ²

The potentially impacted properties on Webb Drive and Burnhamthorpe Road West are currently vacant land, designated for future mixed-use development. The existing uses of the properties on City Centre Drive are commercial mixed-use; these lands are designated for future mixed-use development.

Consultation

Key Points of Contact

External agencies, utilities, emergency service providers, and residents and business owners were contacted directly at key points during the study and requested to provide input to the study and feedback on the decision-making process. The key points of contact are listed in **Exhibit ES-6**.

A direct mailing list of residents and businesses, within the defined catchment area, agencies and utilities was developed at the outset of the study. The catchment area for property owners was defined as approximately 300 m on either side of The Exchange within the study area.

Project notices for all four downtown Mississauga road extension Class EA studies (i.e. Redmond Road, Kariya Drive, Webb Drive and The Exchange) were coordinated and sent concurrently. As such the catchment areas overlapped and the mailing list consolidated, as appropriate. The mailing list continued to be updated based on feedback received through the study.

Members of the general public were made aware of the study through notifications in the local newspapers and invited to contact the project team to join the project mailing list. Members of the public requesting to be on the mailing list received direct notification of subsequent study milestones at the key points of contact.

A dedicated website and email address were established through the City of Mississauga's website at the outset of the study:

<http://www.mississauga.ca/portal/residents/rwek-ea-studies>

Various Public Information Centre (PIC) materials were made available on the website (e.g. Notices, display material and comment sheets). All notices and study materials contained the dedicated project team email address to facilitate direct contact from interested members of the public.

The potential need for formal Indigenous Community engagement was explored with the Ministry of Environment, Conservation and Parks (MECP). In correspondence dated January 18, 2019, MECP confirmed that, given the urban downtown setting, the absence of natural features and watercourses, Indigenous Communities were unlikely to have an interest in the study and direct outreach was not required.

Exhibit ES-6: Key Points of Contact

Date	Notification	Purpose
<p>Notice of Study Commencement December 4, 2018</p>	<ul style="list-style-type: none"> - Notice sent to property owners / mailing list – December 4, 2018 - City project website – December 4, 2018 - The Mississauga News – December 6 and December 13, 2018 - Letters and Response Forms sent to agencies and utilities – December 10, 2018 - Letter and Streamlined EA Project Information Form sent to MECP – December 12, 2018 	<p>To introduce and invite participation in the study and to request any preliminary comments or pertinent information.</p>
<p>Public Information Centre June 12, 2019</p>	<ul style="list-style-type: none"> - Postcard notices sent to property owners / mailing list – May 27, 2019 - City project website – May 31, 2019 - City website – June 3, 2019 - The Mississauga News – June 6, 2019 - PIC Display materials posted on City website on June 13, 2019 	<p>To notify and invite interested parties to attend the first Public Information Centre on June 12, 2019 to review information and provide input regarding: the problem and opportunities being addressed, the collection of background information, the evaluation of planning alternatives and early design concepts.</p>
<p>Notice of Study Completion August 6, 2020</p>	<ul style="list-style-type: none"> - Notices sent to property owners / mailing list – August 6, 2020 - Notices sent to agencies and utilities – August 6, 2020 - City project website – August 6, 2020 - The Mississauga News – August 6, 2020 	<p>To announce the completion of the Class EA Study and notify interested parties of the 45-calendar day review period for the Environmental Study Report.</p>

Agency Consultation

The list of technical agencies was assembled based on previous City of Mississauga Class Environmental Assessment studies and Ministry of the Environment, Conservation and Parks (MECP) Government Review Team (GRT) list. External ‘agencies’ (including regulatory/review agencies, utilities and emergency service

providers) were first notified of this Class EA Study through written correspondence on December 10, 2018 which included a copy of the Notice of Study Commencement and a Response Form. A summary of agency comments received throughout the study and course of action taken by the Project Team, as appropriate, is provided in **Exhibit ES-7**.

Exhibit ES-7: Agency Comments

Agency Comment	Course of Action
<p>Ministry of Natural Resources and Forestry Email dated: January 2, 2019 I have received your letter regarding four proposed road extensions in Mississauga. There was no attached notice with a key plan. Please provide.</p>	<p>Notice of Commencement was provided via email.</p>
<p>Ministry of Natural Resources and Forestry Email dated: January 3, 2019 Natural areas to be affected will need to be searched for Butternut trees of all sizes, including seedlings, within 25 metres from proposed works. The woodland areas to be affected will need to be outlined and, if they are at least 0.5 ha averaging at least 30 metres in width with some native oak or maple species, assessed for potential as habitat for endangered bat species (Little Brown Myotis, Northern Myotis, Tri-coloured bat).</p>	<p>An assessment of the natural environment was completed as part of this study.</p>
<p>Ministry of the Environment, Conservation and Parks Letter dated: January 18, 2019 Response to Notice of Commencement providing guidance on consultation with Indigenous Communities.</p>	<p>Given the nature of this project and the existing land uses in the area, separate notification for Indigenous Communities was not required.</p>
<p>Ministry of Natural Resources and Forestry Emailed dated: June 6, 2019 We have received the Notice of Public Information Centre for this project. If you have any questions regarding natural features/systems or impacts on them, please let us know.</p>	<p>No action required.</p>
<p>Region of Peel Public Health Email dated: June 12, 2019 Thank you for sharing the notice of PIC for the environmental assessment process for Redmond Road, Webb Drive, The Exchange and Kariya Drive. We would like to request digital copies of information being shared at tonight's PIC, including the presentation, so that we may review and provide comments.</p>	<p>PIC materials were provided via email on June 17, 2019.</p>

Public Information Centre

A Public Information Centre (PIC) was held on June 12, 2019 from 5:30 pm to 7:30 pm in the Great Hall at the Mississauga Civic Centre, located at 300 City Centre Drive in Mississauga.

The purpose of the PIC was to provide stakeholders and interested members of the public with an opportunity to view study information including project background, the Municipal Class EA process, planning and policy context, assessment and evaluation of alternative planning solutions and the selection of a preliminary preferred solution. A design concept was presented of the preliminary preferred solution, for illustrative purposes.

Twelve people signed in at the PIC. Attendees included local residents / property owners, stakeholders, and staff from the Peel District School Board and City of Mississauga. The PIC materials were made available on the City's website the day after the PIC. Comments were received from three potentially affected landowners, as noted under Stakeholder Consultation. The comments received are on file with the City.

No public comments were received via hard copy at the PIC. No additional public comments were received during the comment period, ending July 5, 2019.

Stakeholder Consultation

The proposed extension of The Exchange will be situated on and adjacent to land that is designated and being planned for future mixed-use development. During the Class EA Study, undeveloped land parcels within the study area have been owned by Baif Developments Limits (Baif), Wydanco Development (Wydanco), and Camrost Felcorp Inc. (Camrost). Consultation during the Class EA Study was undertaken with owners and their representatives.

In 2020, the property owned by Wyandco were sold. The parcel is currently owned by 2713589 Ontario Inc. (180 Burnhamthorpe Road West).

Meetings with Bair and Wydanco representatives were held on May 30, 2019. A meeting with Camrost was held on June 12, 2019. Minutes of the meetings are on file with City staff. A summary of the correspondence with each stakeholder is provided below:

Baif Developments Limited

- ▶ A meeting was held with Baif's representatives on May 30, 2019, at the City of Mississauga, 201 City Centre Drive.
- ▶ The purpose of the meeting was to introduce the study, review early design concepts, discuss stakeholder questions and concerns, and review next steps.
- ▶ During the meeting Baif provided an overview of future plans for their properties on Webb Drive. It was noted that the City passed By-law 0156-2016 to amend Zoning By-law 0225-2007 on the south side of Webb Drive, south of The Exchange. The purpose of the By-law is to permit a 25 storey apartment building and a 3 storey horizontal multiple building. This Class EA Study is not anticipated to preclude or adversely impact zoning by-law approval or future site planning processes.
- ▶ During the meeting Baif expressed concerns about the proposed right-of-way for The Exchange and potential property requirements.
- ▶ Following the meeting, Baif provided a copy of the Traffic Impact Study and corresponding Addendum for a proposed residential development and future mixed-use development in the area.
- ▶ Following the Public Information Centre held on June 12, 2019, Baif provided comments related to the status of development in the area, existing planning approvals and outstanding appeals. Correspondence on file with the City. No further comments about the study process or design concept were received.
- ▶ Prior to finalizing the Project File, the Project Team Offered to meet with Baif representatives in the later stages of the Class EA Study to review the final recommended plan. Baif indicated that a meeting at this time was not necessary.

Wydanco Development

- ▶ A meeting was held with Wydanco's representatives on May 30, 2019, at the City of Mississauga, 201 City Centre Drive.
- ▶ The purpose of the meeting was to introduce the study, review early design concepts, discuss stakeholder questions and concerns, and review next steps.
- ▶ During the meeting Wydanco expressed concern about the loss of developable land required to accommodate the proposed right-of-way.

- ▶ Following the meeting, a draft property plan quantifying the area directly impacted by the proposed right-of-way was provided to Wydanco.
- ▶ Following the Public Information Centre held on June 12, 2019, Wydanco provided general comments related to the proposed right-of-way and the general loss of developable area. Correspondence is on file with the City.
- ▶ No further comments about the study process or design concept were received.

Camrost Felcorp Inc.

- ▶ A meeting was held with Camrost Felcorp Inc. (Camrost) representatives on June 12, 2019, at the City of Mississauga, 201 City Centre Drive.
- ▶ The purpose of the meeting was to introduce the study, review early design concepts, discuss stakeholder questions and concerns, and review next steps.
- ▶ During the meeting Camrost provided an overview of future plans for their property located north of Burnhamthorpe Road. The Class EA Study is not anticipated to preclude their plans.
- ▶ Following the Public Information Centre held on June 12, 2019, Camrost provided comments related to the proposed right-in/right-out configuration of the intersection at Burnhamthorpe Road, proposed underground parking beneath The Exchange right-of-way, and the width of the proposed right-of-way. City staff continue to work with Camrost regarding their development plans along The Exchange. Correspondence is on file with the City.
- ▶ Prior to finalizing the Project File, a meeting was held with Camrost representatives on July 14, 2020 via teleconference.
- ▶ The purpose of the meeting was to review the recommendations of the EA study and the functional plan for the proposed extension of The Exchange.
- ▶ Following the meeting, the design concept and a draft property plan quantifying the area directly impacted by the proposed right-of-way was provided to Camrost.
- ▶ Camrost did not express concern with the proposed timeframes to wrap up the Class EA Study. It is understood that discussion/consultation will continue amongst City staff and Camrost representatives following the completion of the Class EA Study and moving forward.

Mitigation and Commitments to Further Work

Property

Confirming the potential property impacts and continued engagement of the property owners of 233 Webb Drive, 180 Burnhamthorpe Road West, 151 City Centre Drive, and 201 City Centre Drive will be a priority during preliminary and detailed design phases.

Integration with Future Development

Timing of construction for The Exchange extension is not known, subject City Council annual review of capital project priorities and funding. At this time, it is assumed that roadway construction will be coordinated with surrounding development. The City will continue to coordinate with area land owners/developers to ensure that the roadway design and construction do not preclude planned future development.

Drainage and Stormwater Management

The stormwater management design will appropriately manage water quality and quantity per applicable City of Mississauga and Credit Valley Conservation design criteria. A Ministry of Environment, Conservation and Parks Environmental Clearance Approval (ECA) permit may be required for the new storm sewer system.

Soils Management

If soil removed during construction is determined to be contaminated, the disposal of contaminated soil must be consistent with Part XV.1 of the Environmental Protection Act and Ontario Regulation 153/04, Records of Site Condition.

Utilities

The City and any future developments on the proposed extension of The Exchange will engage with Alectra Utilities, Peel Region and private utility companies to determine needs and coordinate design and installation.

Noise and Vibration

The potential for Noise Sensitive Areas (NSAs) in close proximity to the proposed The Exchange extension was reviewed. There are no NSAs immediately adjacent to the planned roadway since the setting is within vacant land and adjacent to existing parking lots with adjacent office buildings. Any potential NSAs located adjacent to the study area, including nearby existing condominium towers on the existing portion of Webb Drive will have rear yard noise levels dominated by Burnhamthorpe Road, rather than

from The Exchange. Based on this review, a noise assessment for The Exchange was deemed to be not warranted. Based on this review, a noise assessment for The Exchange was deemed to be not warranted.

The potential for construction noise issues will be further reviewed during detailed design when construction methodology and schedule is fully developed. Construction activities will conform to the City of Mississauga Noise Control By-Laws.

There is no existing land uses which are considered to be highly sensitive to vibration impact (e.g. sensitive equipment such as electron microscopes, or laboratory with sensitive scientific equipment, etc.).

Once constructed, the main source of vibration from The Exchange would be from truck traffic. However, vehicles with pneumatic tires generally do not create significant levels of vibration except at very short distances. This road will function as a minor collector road serving only the local community and truck traffic volumes will be low, as such, vibration levels to the community are not expected to be perceptible or significant.

Some construction activities associated with the road building may at times create vibration levels that are perceptible at nearby land uses. However, the vibration levels produced by the anticipated construction activities will not be large enough to cause structural damage. The potential vibration generated by the building of the road and the surrounding community should be reviewed in detailed design, once construction methodologies and scheduling are developed.

Air Quality

During construction of the roadway, emissions sources will include construction equipment engines and air borne dust from construction vehicles travelling over exposed soils / unpaved surfaces. These impacts will be temporary, during construction. Due to the temporary nature of construction activities, there are no air quality criteria specific to construction activities. Construction emissions can be mitigated by appropriate maintenance of equipment and proper phasing that minimizes activity on unpaved surfaced.

The Environment Canada “Best Practices for the Reduction of Air Emissions from Construction and Demolition Activities” document provides several mitigation measures for reducing emissions during construction activities. Mitigation techniques discussed in the document include material wetting or use of chemical suppressants to reduce dust,

use of wind barriers, and limiting exposed areas which may be a source of dust and equipment washing.

Ministry of Environment, Conservation and Parks (MECP) recommends that non-chloride dust suppressants be applied. MECP also recommends referring to the following publication in developing dust control measures: Cheminfo Services Inc. Best Practices for the Reduction of Air Emissions from Construction and Demolition Activities. Report prepared for Environment Canada, March 2005.

Sustainability

The Downtown Core is located within a major designated growth area and identified as an Anchor Hub in the Regional Transportation Plan. The City's objective is to create a high quality, pedestrian friendly, human scaled environment that attracts lasting public and private investment in the Downtown to support existing and planned infrastructure, particularly higher order transit.

The Exchange extension is part of this integrated plan to transform the downtown into a sustainable, compact mixed-use area with multi-modal transportation options that seek to reduce single occupant vehicle use by creating a live-work-play community, linked to a multi-tier public transit system. The new road will result in smaller scaled blocks; the scale of the street is to be narrower with special attention paid to the public realm.

The existing road pattern is made up of super blocks. An expanded road network is proposed that will create an urban pattern of development blocks that are walkable in scale and well connected. The new road network will result in urban scaled blocks, providing routing options for vehicular, servicing and goods movement, pedestrian movement within the Core. The scale of the streets is to be narrower with special attention paid to the public realm.

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1 INTRODUCTION

The City of Mississauga has completed a Municipal Class Environmental Assessment (Class EA) Study to evaluate the need to extend The Exchange from City Centre Drive to Webb Drive. The Study was carried out as a Schedule B project in accordance with the Municipal Class EA document (2000, as amended in 2015), as approved under the Ontario Environmental Assessment Act.

The Exchange Class EA Study is one of four Class EA studies being undertaken by the City of Mississauga for transportation network improvements in the City Center. The study areas of the four projects are shown on **Figure 1-1**:

- ▶ Project 1 - Redmond Road from Webb Drive to Burnhamthorpe Road West
- ▶ Project 2 - Webb Drive from Duke of York Boulevard to Kariya Drive
- ▶ Project 3 - The Exchange from City Centre Drive to Webb Drive
- ▶ Project 4 - Kariya Drive from South of Elm Drive to Central Parkway West

Figure 1-1: City of Mississauga Downtown Municipal Class Environmental Assessment Study Locations



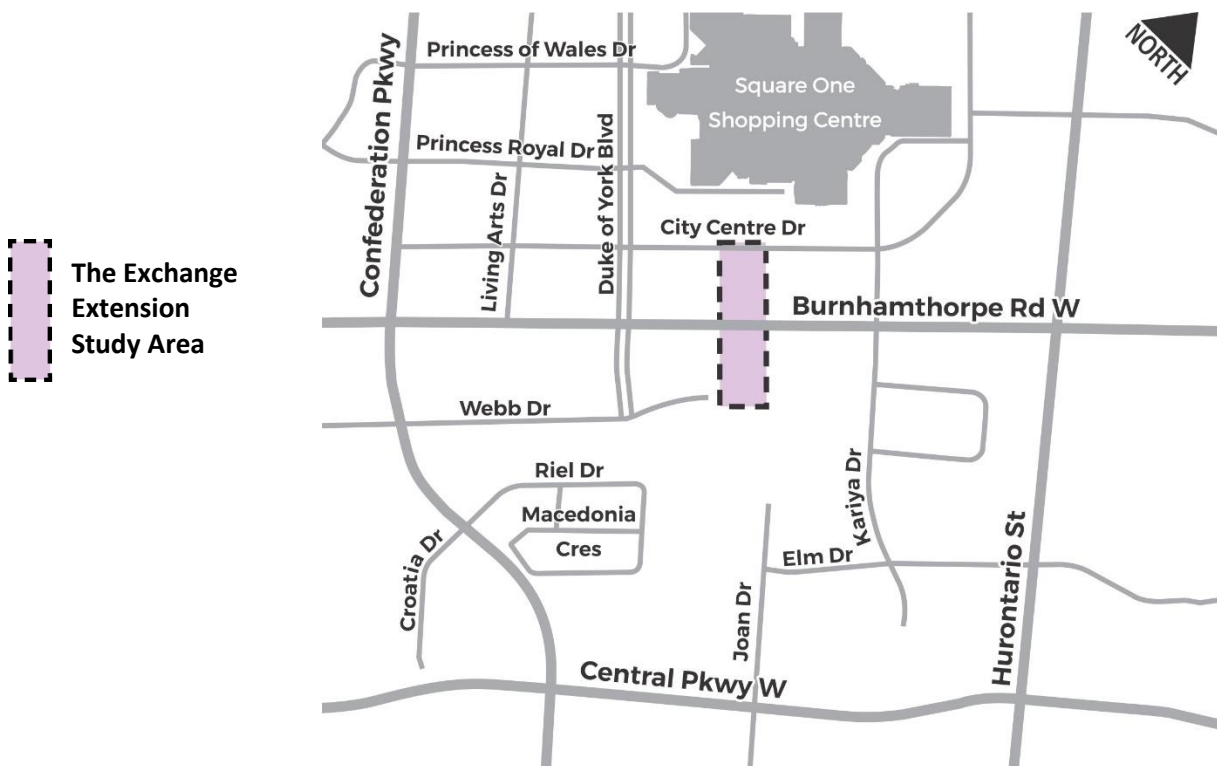
These Class EA studies are being undertaken to support the creation of a pedestrian-scale, fine-grained street grid in downtown Mississauga, and support multi-modal mobility by improving pedestrian connections, and in some cases, expanding the cycling and opportunities for the transit networks.

Each of the four Class EA studies are documented separately. **This Project File documents the planning process used to identify the problem and opportunities, consider of alternative planning solutions and the preferred solution for The Exchange between City Centre Drive and Webb Drive.**

1.1 Study Area

The Exchange Class EA study area is generally situated between Webb Drive to the south and City Centre Drive to the north (**Figure 1-2**), within the City of Mississauga Downtown.

Figure 1-2: The Exchange Study Area



1.2 Environmental Assessment Process

Municipal infrastructure projects are subject to the Ontario Environmental Assessment Act (EA Act). The Municipal Class EA (Municipal Engineers Association October 2000, as amended in 2015) is an approved self-assessment process under the EA Act that applies to municipal infrastructure projects including roads, water and wastewater.

The Municipal Class EA outlines a planning process to consider the environmental and technical advantages and disadvantages of alternatives in order to determine a preferred solution for addressing problems and opportunities.

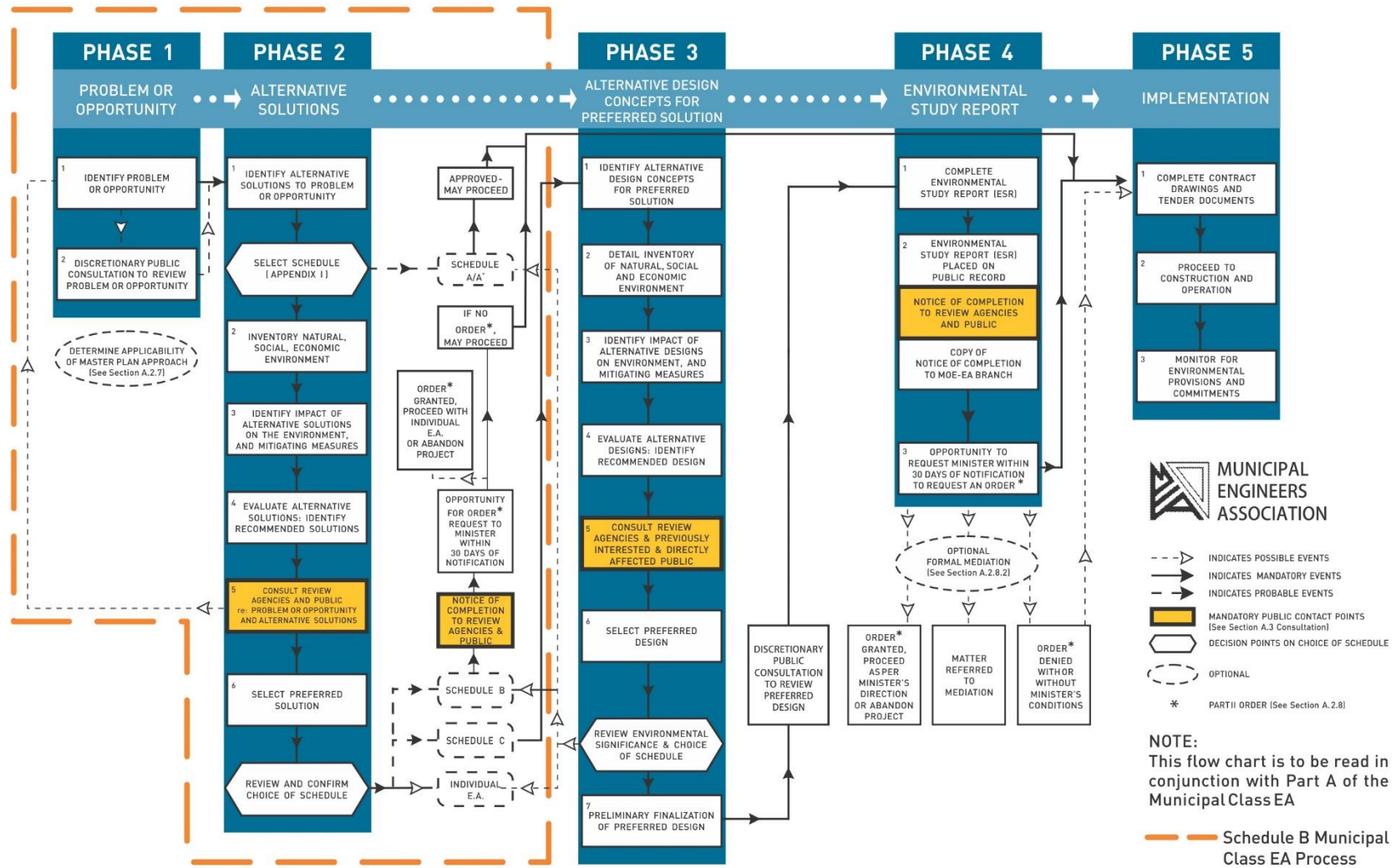
The four types of projects/activities to which the Municipal Class EA applies are:

- Schedule A: Includes normal or emergency operational and maintenance activities, which are limited in scale and have minimal adverse environmental effects and therefore pre-approved.
- Schedule A+: These projects are also pre-approved; however, the public is to be advised prior to the implementation of the project.
- Schedule B: Includes projects that have the potential for adverse environmental effects. This includes improvements and minor expansions of existing facilities. These projects are approved subject to a screening process which includes consulting with stakeholders who may be directly affected and relevant review agencies.
- Schedule C: Includes the construction of new facilities and major expansions to existing facilities. These undertakings have the potential for significant environmental effects.

The anticipated environmental impacts of an extension of The Exchange are minor, considering the study area setting and development context (discussed further in **Chapter 2**). Therefore, this Study meets the criteria for a Schedule 'B' process.

As illustrated in **Figure 1-3**, the Municipal Class EA document outlines the planning and design process. Schedule B projects are required to follow Phases 1 and 2 of this process.

Figure 1-3: Municipal Class EA Process



1.2.1.1 Project File

Phases 1 and 2 of the Schedule 'B' process are documented in a Project File (i.e. this report) which includes:

- ▶ Study background and related studies, including planning policies and documents;
- ▶ Description of the existing environment (socio-economic environment, cultural environment, and natural environment);
- ▶ Study area problems and opportunities;
- ▶ Alternative solutions to the undertaking;
- ▶ Evaluation of alternative solutions and identification of the preferred alternative solution;
- ▶ Anticipated impacts and proposed mitigation measures;
- ▶ Public and agency consultation; and
- ▶ Supporting technical reports.

The Project File for this study is available for a 45 calendar-day public review period commencing on August 6, 2020 and ending on September 21, 2020.

A Notice of Study Completion is published to announce the review period.

This Project File has been placed on the public record during the COVID-19 outbreak. At this time, exceptional measures are being employed by the various levels of government to curb the pandemic. The City of Mississauga is making the necessary accommodations, based on the latest guidance from public health agencies, governments and other public bodies, to preserve the health and safety of its employees, residents, business owners and the general public. Due to emergency measures, including the closure of public institutions to visitors (i.e. City Hall, City of Mississauga Libraries etc.), the Project File is not being provided in 'hard copy' for public viewing at centralized locations. Interested members of the public may view the document on the City's website. Should a member of the public request a hard copy of the Project File, the City will assess how this might be prepared and delivered in a manner that is consistent with current public health agency and government direction regarding public protection.

In consideration of these unprecedented circumstances, the Project File is being made available for a period of 45 calendar days. Should unforeseen circumstances arise, modifications to the public record process may be made during this period.

1.2.1.2 Part II Order Request

The Municipal Class EA process includes an appeal provision to change the status of a project from being subject to the Municipal Class EA process to being subject to an Individual Environmental Assessment, per Part II of the Ontario Environmental Assessment Act.

If concerns are raised during the public review period that cannot be resolved through discussions with the City, then stakeholders, agencies, Aboriginal Communities or members of the public may request the Minister of the Environment, Conservation and Parks to issue a Part II Order for the project, thereby requiring an elevated scope of study.

A Part II Order request requires submission of a formal request prior to the end of the 45 calendar-day review period, outlining the unresolved issue and requesting the Minister to review the matter.

Please refer to the following website for further information and specific instruction regarding Part II Order requests:

<https://www.ontario.ca/page/class-environmental-assessments-part-ii-order>

If no Part II Order requests are outstanding by the end of the 45-calendar day review period, the project is considered to have met the requirements of the Class EA, and the City of Mississauga may proceed to detailed design and construction.

2 PLANNING CONTEXT

This section reviews the planning and policy framework applicable to The Exchange Class EA Study. The planning and policy framework guides infrastructure planning, land use planning, and strategic investment decisions to support Provincial, Regional and Local objectives in growth and transportation.

The identification of the study area problems and opportunities was in consideration of the policy framework, to ensure that the final recommendations are consistent with Provincial, Regional and Local policies and objectives.

2.1 A Place to Grow - Growth Plan for the Greater Golden Horseshoe (2019)

A Place to Grow: Growth Plan for the Greater Golden Horseshoe (“Growth Plan”), 2019, was prepared and approved under the Places to Grow Act (2005) as a legal framework to implement the Province’s vision for managing growth within the Greater Golden Horseshoe (GGH).

The GGH is a dynamic and diverse area, and one of the fastest growing regions in North America. By 2041, this area is forecast to grow to 13.5 million people and 6.3 million jobs. The magnitude and pace of this growth necessitates a plan for building healthy and balanced communities and maintaining and improving our quality of life while adapting to the demographic shift underway.

To better co-ordinate planning for growth across the region, this Plan provides population and employment forecasts for all upper- and single-tier municipalities in the GGH. This Plan is about accommodating forecasted growth in complete communities by providing guidance on transportation, infrastructure planning, land-use planning, urban form, housing, natural heritage and resource protection. Complete communities support quality of life and human health by encouraging the use of active transportation and providing high quality public open space, adequate parkland, opportunities for recreation, and access to local and healthy food.

The Exchange is located within Downtown Mississauga, a designated Urban Growth Centre in the Growth Plan. Urban Growth Centres are focal points for population and employment growth and are to be planned as vibrant, mixed-use, transit-supportive communities. The Growth Plan directs Downtown Mississauga to achieve 200 residents and jobs per hectare by 2041. The City of Mississauga is required to

conform to the Growth Plan through its Official Plan which brings Provincial growth policies down to local level.

Policy 3.2.2 of the Growth Plan provides direction on General Transportation Planning. The following excerpted policies are applicable to this Class EA Study:

2. *The transportation system within the GGH will be planned and managed to:*
 - a. *provide connectivity among transportation modes for moving people and, for moving goods;*
 - b. *offer a balance of transportation choices that reduces reliance upon the automobile and promotes transit and active transportation;*
 - c. *be sustainable and reduce greenhouse gas emissions by encouraging the most financially and environmentally appropriate mode for trip-making and supporting the use of zero- and low-emission vehicles;*
 - d. *offer multimodal access to jobs, housing, schools, cultural, and recreational opportunities, and goods and services;*
 - f. *provide for the safety of system users.*
3. *In the design, refurbishment, or reconstruction of the existing and planned street network, a complete streets approach will be adopted that ensures the needs and safety of all road users are considered and appropriately accommodated.*

Policy 3.2.3 of the Growth Plan provides direction on Moving People. The following excerpted policies are applicable to this Class EA Study:

4. *Municipalities will ensure that active transportation networks are comprehensive and integrated into transportation planning to provide:*
 - a. *safe, comfortable travel for pedestrians, bicyclists, and other users of active transportation; and*
 - b. *continuous linkages between strategic growth areas, adjacent neighbourhoods, major trip generators, and transit stations, including dedicated lane space for bicyclists on the major street network, or other safe and convenient alternatives.*

Planning for the extension of The Exchange is consistent with the policy direction of the Growth Plan by contributing to the development of a compact, mixed-use urban community that prioritizes active transportation (i.e. walkability) through complete streets and creates linkages within the community, into the downtown core and to local, Regional and Provincial public transit.

2.2 Provincial Policy Statement (2020)

The Provincial Policy Statement (PPS), 2020 provides overall policy directions on matters of provincial interest related to land use and development in Ontario. The PPS was prepared under the authority of the Planning Act but may be considered in the planning and policy context of infrastructure planning completed under the Ontario Environmental Assessment Act (OEAA). The PPS is based on three fundamental planning themes: “Building Strong Healthy Communities”, “Wise Use and Management of Resources”, and “Protecting Public Health and Safety”. The PPS guidance for Transportation Planning systems within the GGH, as highlighted in the following excerpted policies, are applicable to this Class EA Study:

- ▶ *Section 1.6.7.1 Transportation systems should be provided which are safe, energy efficient, facilitate the movement of people and goods, and are appropriate to address projected needs.*
- ▶ *Section 1.6.7.3 As part of a multimodal transportation system, connectivity within and among transportation systems and modes should be maintained and, where possible, improved including connections which cross jurisdictional boundaries.*

Planning for the extension of The Exchange is consistent with the policy direction of the PPS since the extension was first identified as part of the Downtown Core Local Area Plan, the integrated land use plan/policy document developed under the Planning Act (and therefore conforming to PPS policies).

The Exchange extension will contribute to the development of a compact, mixed-use urban community that prioritizes walkability and creates linkages within the community, into the downtown core and to local, Regional and Provincial public transit.

2.3 Region of Peel Official Plan (consolidated 2018)

The Region of Peel Official Plan (OP) provides a long-term regional policy framework to guide the lower-tier municipalities, such as the City of Mississauga, in the preparation of their own Official Plans. The Region's OP is based on the key principle of sustainability and recognition of the need to consider and balance social, economic, cultural and natural environmental aspects to create/maintain a healthy community. In the context of the Region's OP, and related City of Mississauga OP and Downtown Core Local Area Plan (both discussed below), The Exchange project contributes to the objectives of the Region's OP by supporting the development of a compact and complete community that is built to support walking and access to public transit.

2.4 City of Mississauga Strategic Plan

The City of Mississauga Strategic Plan ("Strategic Plan") directs strategic decision-making based on the five "Strategic Pillars for Change: Move, Belong, Connect, Prosper, and Green." The Webb Drive Class EA Study supports the following strategic strategies as excerpted from the Strategic Plan:

- ▶ Develop Environmental Responsibility – to contribute to environmental responsibility by reducing private automobile use and developing compact mixed-use development.
- ▶ Increase Transportation Capacity – to add capacity to the transportation system through strategic investments in transit, additional links in the street network and active mobility choices.
- ▶ Develop Walkable, Connected, compact, mixed-use Neighbourhoods that will give residents the ability to engage safely in all aspects of their everyday lives, within walking distance and easy access through evaluating development and infrastructure projects against a test of "pedestrian-first".
- ▶ Build Vibrant Communities – to link urban areas and neighbourhoods that offer commercial, social, artistic, cultural, civic and recreational experiences accessible to all.
- ▶ Provide Mobility Choices – to provide all with the choice to walk, cycle and use transit or active modes of transportation in all seasons, because it is convenient, connected, desirable and healthy.

- ▶ Create a Vibrant Downtown – to develop a vibrant downtown that will be the civic and cultural soul of the city, as well as a strong economic centre.

2.5 City of Mississauga Official Plan (2016)

The current City of Mississauga OP guides the City's growth and development to 2031. The policies are designed to manage and direct growth with a focus on redevelopment and intensification. **Figure 2-1** depicts the OP land use designations around The Exchange study area and the study areas for the three other downtown road extensions being contemplated by the City.

Downtown Mississauga is designated as an Intensification Area (**Figure 2-2**), and per Chapter 5 of the City's OP, most of the City's future growth will be directed to Intensification Areas. In addition, designated corridors are to be planned as multi-modal with an attractive public realm and complementing land uses.

Transportation policies in Chapter 8 of the OP support the City's intent to balance the needs of transit, cyclists, pedestrians, goods movement and motorists and recognize that the creation of new roads will be required to support more compact development.

The extension of The Exchange is designated as a "Future Minor Collector" road in the City's long-term road network (Schedule 5 of the OP), designed to accommodate low levels of traffic and access to private property. **Figure 2-3** depicts the proposed The Exchange extension and the three other road extensions being contemplated by the City, in the context of the Schedule 5 of the OP.

The proposed The Exchange extension will provide access to the other parts of the collector road network as well as the Regional arterial road network. Specific transportation policies pertinent to this Study include the following:

- ▶ Mississauga will strive to create a fine-grained system of roads that seeks to increase the number of road intersections and overall connectivity throughout the City.
- ▶ Sidewalks or multi-use trails will be provided on all new roads. Mississauga will provide pedestrian connections to Intensification Areas. The Downtown will be developed to support and encourage active transportation as a mode of transportation.

- ▶ Mississauga will create a multi-modal road network through providing mobility and accessibility to all users, and through creating pedestrian and cycling access routes. The multi-modal network includes road, transit, cycling and pedestrian facilities. In some locations, transportation modes may, to ensure the efficiency and safety of the transportation network and its users, use separate facilities.
- ▶ Through the creation of a multi-modal transportation system, Mississauga will provide transportation choices that encourage a shift in lifestyle toward more sustainable transportation modes, such as transit and active transportation.
- ▶ The City of Mississauga will ensure that the transportation system will provide connectivity among transportation modes for the efficient movement of people and goods.
- ▶ Street designs will consider opportunities to maximize on-street parking, where appropriate, and will planned to be balanced with the needs of other modes of transportation sharing the right-of-way.
- ▶ Transit will be a priority for transportation infrastructure planning and major transportation initiatives.
- ▶ The City will design its roads in a manner that:
 - a. has regard for the safe movement of all road users, including transit, cyclists, pedestrians and motorists;
 - b. is context sensitive having regard for existing and planned land uses, urban design, community needs and funding availability;
 - c. minimizes the disruption to the Natural Heritage System and preserves, where appropriate, existing tree canopies;
 - d. is sensitive to local cultural heritage resources.
- ▶ Within Intensification Areas and Neighbourhoods, the design of roads and streetscapes will create a safe, comfortable and attractive environment for pedestrians, cyclists and motorists by:
 - a. reducing lane width, where appropriate;
 - b. providing streetscaping to reduce the apparent width of the rights-of-way;

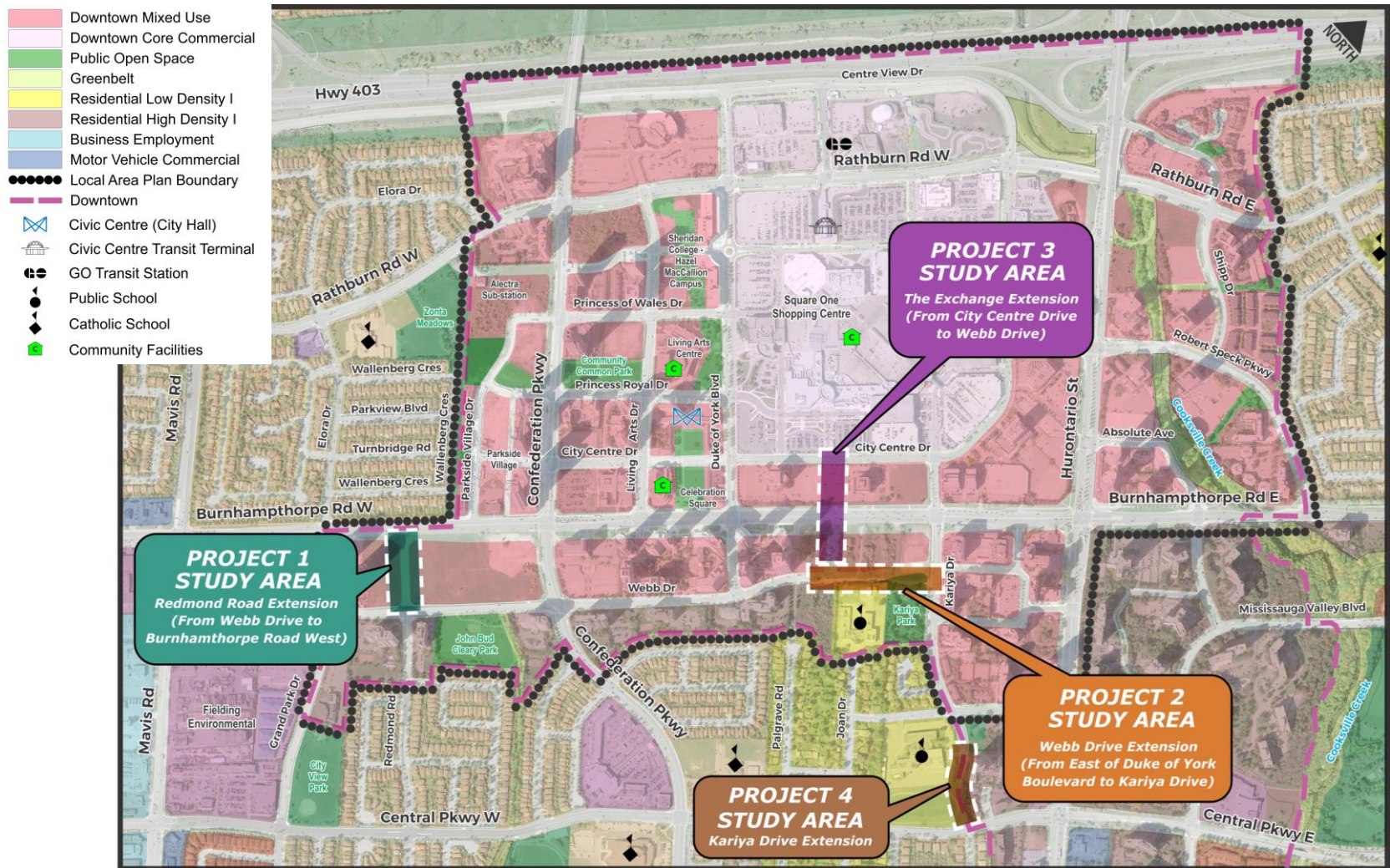
- c. locating sidewalks and cycling facilities where conflicts with motorized traffic are minimized; and
- d. creating safe road crossings for pedestrians and cyclists.

Where appropriate, the City's multi-modal transportation network will be maintained and developed to support the policies of the OP by requiring the conveyance of lands of abutting properties for widening as a condition of subdivision, severance, minor variance, condominium or site plan approvals, for nominal consideration.

Chapter 9 of the OP directs desirable urban form and growth and directs existing large blocks to be reconfigured to incorporate a fine-grained block structure with public roads and on-street parking to support at grade uses.

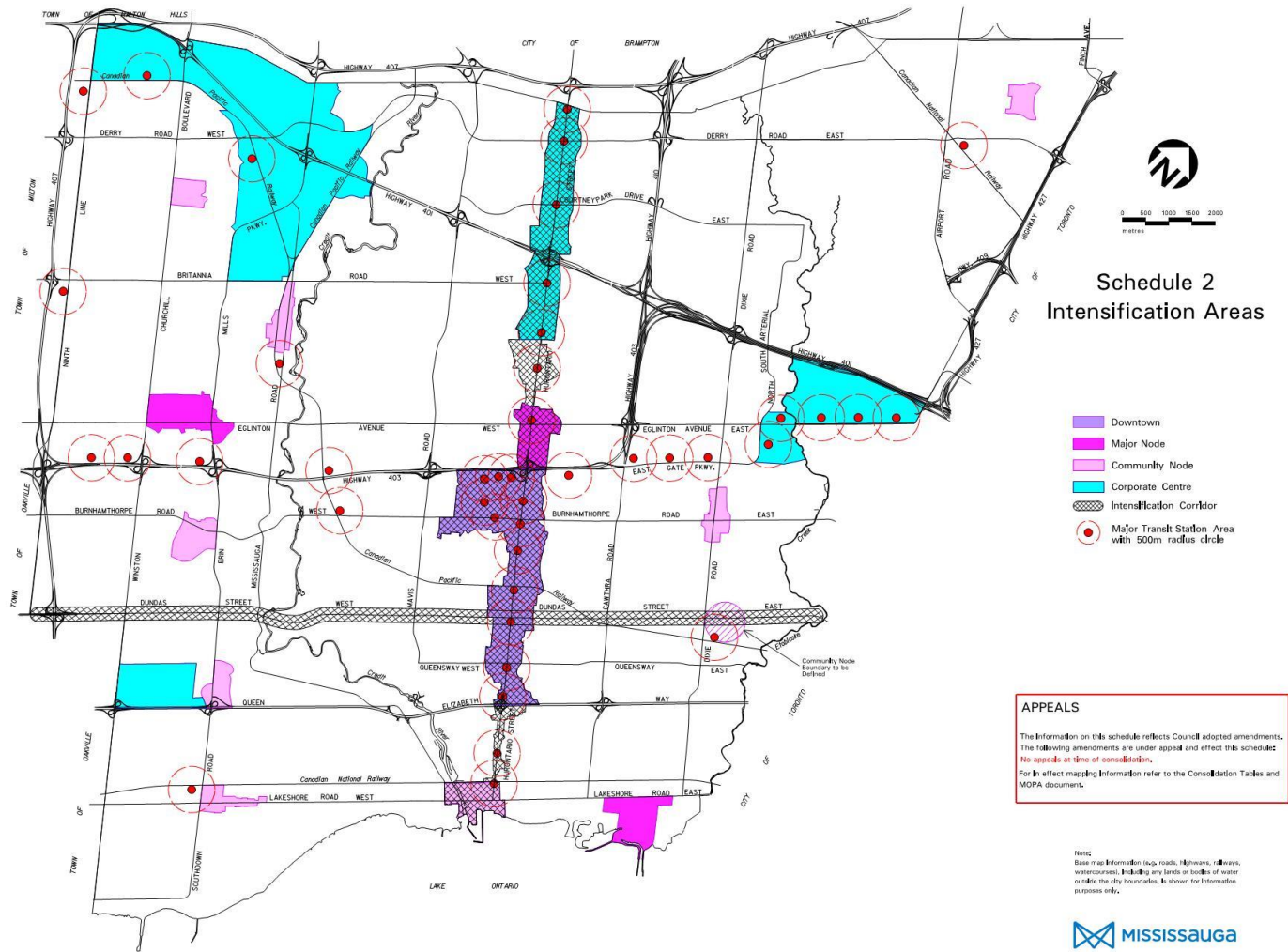
The proposed The Exchange extension is being planned to directly support the OP policies highlighted in the above discussion. The planned road extension will create a finer-grained transportation system to the Downtown area, improving the connectivity among transportation modes to efficiently move people.

Figure 2-1: Official Plan Land Use Designations



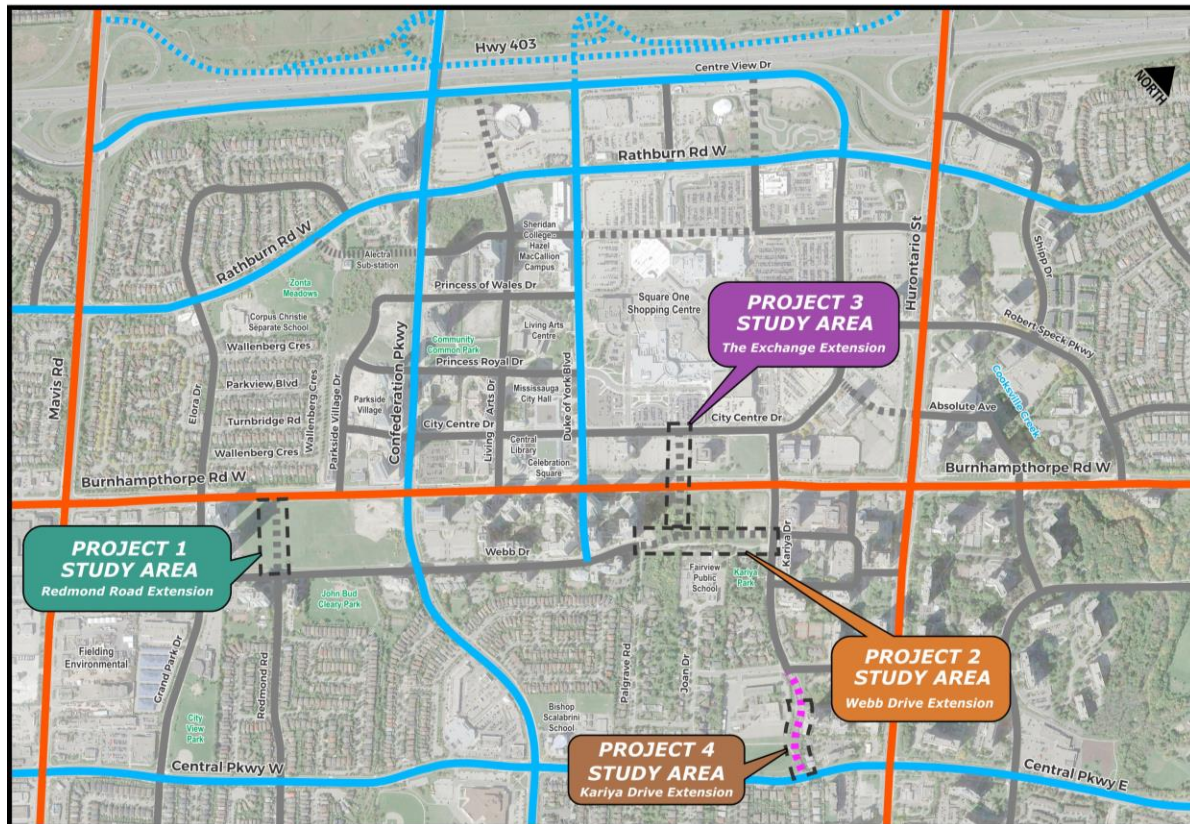
Sources: Schedule 10 – Land Use, Mississauga Official Plan (2019); Downtown Core Local Area Plan (2015)

Figure 2-2: City of Mississauga Official Plan Schedule 2, Intensification Areas



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Figure 2-3: Long-Term Downtown Mississauga Road Network



Source: Schedule 5 – Long Term Road Network, Mississauga Official Plan (2019)

2.6 Downtown21 Master Plan (2010)

The City’s Downtown21 Master Plan set the visions and early guidance for the intensification of the downtown and the transformation from suburban form to a compact and complete community form. The Downtown21 Master Plan first expressed the objectives for the new downtown form, including:

- ▶ Creating a fine grain structure of streets resulting in a transportation network that provides multiple routing options for vehicles, distributing traffic over many streets and intersections.

- ▶ Encouraging development of a multi-modal transportation system to create a livable, compact and accessible downtown for Mississauga;
- ▶ Prioritize active transportation when designing new streets;
- ▶ Providing connections to nearby higher-order transit;
- ▶ Ensuring jobs, homes and services are within walking distance of each other; and
- ▶ Using smaller block sizes for new developments.

Creating smaller blocks benefits the live-work-play experience in the downtown by offering:

- ▶ Multiple routing and turning options for vehicles, increasing capacity at intersections;
- ▶ Intersections functioning as traffic calming measures through even and frequent spacing of intersection and encouraging vehicle travel at slower speeds;
- ▶ Street network redundancy and associated routing options for emergency vehicles;
- ▶ Direct and comfortable routing options for pedestrians and cyclists;
- ▶ An active and vibrant pedestrian environment; and
- ▶ Maximum accessibility to transit stations and flexibility in transit routing and bus routing.

The Downtown21 Master Plan was implemented through the Downtown Core Local Area Plan (Mississauga Official Plan Amendment 8 - "MOPA 8"), discussed in the next section.

2.7 Downtown Core Local Area Plan (2015, under Appeal)

The Downtown Core Local Area Plan (Mississauga Official Plan Amendment 8 - "MOPA 8") builds on the Official Plan and contains more detailed policies and schedules specific to the Downtown Core. At the time of this study, parts of the LAP remain under appeal. The Downtown Core Local Area Plan (DCLAP) policies are intended to promote a high quality of urban design and urban built form. The DCLAP goals and objectives are directly relevant to The Exchange Class EA Study:

- ▶ Create a vibrant Downtown by strengthening the transportation system, improving linkages/access, and enhancing the pedestrian experience;

- ▶ Create a fine-grained, well-connected road network that supports multiple modes of transportation; and
- ▶ Develop an urban environment that includes high-quality public spaces.

The proposed The Exchange extension is consistent with the following policies of the DCLAP:

- ▶ Development Objectives outlined in Section 2.1 of DCLAP provide policies intended to plan for the location of streets, provide for a high standard of urban and streetscape design, and develop/enhance of a comprehensible public/private system of pathways and open space.
- ▶ Urban Design Objectives outlined in Section 3.1 provide policies intended to, for example:
 - Encourage a built form which has a high level of physical continuity, cohesion and linkage between building;
 - promotes urban scale land blocks, streets and built form appropriate to transit supportive and pedestrian oriented core;
 - achieve elements of linkage to the abutting communities while ensuring compatible integration and context sensitivity; and
 - achieve a balance of vehicular traffic and transit and active transportation needs to achieve pedestrian comfort, convenience, safety and accessibility.
- ▶ Urban Design policies for the public realm outlined in Section 3.2.1 of the DCLAP speak to the design of streets, edge boulevards and public open spaces. Again, these policies emphasize the desire to promote a high level of design tailored to the pedestrian and cyclist, and on-street experience.

The proposed The Exchange extension is being planned to directly support the DCLAP policies highlighted in the above discussion.

2.8 Mississauga Transportation Master Plan (2019)

The Mississauga Transportation Master Plan (TMP) directs Mississauga's transportation system to provide people with the freedom to move safely, easily and efficiently to anywhere at any time.

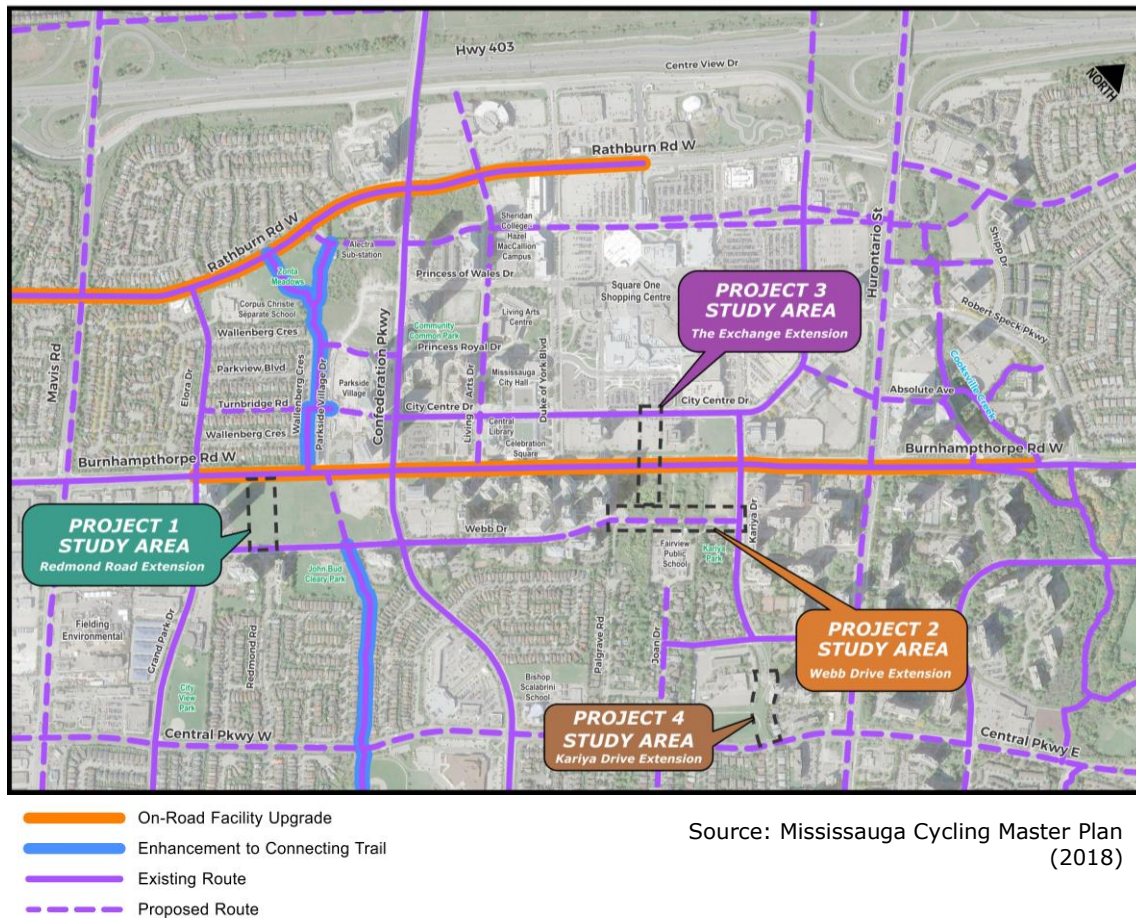
Chapter 2 of the TMP considers the modal split within the City of Mississauga. Currently, the surface parking available in the Downtown Core implies that driving is still a popular choice for travelling to the Downtown Core. The TMP sets a vision for Mississauga's downtown core in 2041; the downtown is envisioned to have a population of 70,000, and to act as a regional centre for employment and businesses. Further, the downtown is envisioned to have streets designed for the safety of pedestrians in both old and new neighbourhoods, and new connections will be made to improved and shorter trips for pedestrians.

2.9 City of Mississauga Cycling Master Plan (2018)

The City of Mississauga Cycling Master Plan ("Cycling Master Plan") guides the vision of cycling within the City of Mississauga through the four following goals: Improve safety for cycling; Build a connected, convenient and comfortable bicycle network; Increase the number of cycling trips in Mississauga; and Foster a culture of cycling. The Cycling Master Plan envisions the City as a place where people choose to cycle for recreation, fitness and daily transportation needs. Cycling is envisioned to become a way of life that supports vibrant, safe and connected communities and enhances the overall health and quality of life of residents and visitors. When implemented, the plan will provide an integrated multi-modal approach to transportation throughout the City.

The City's Cycling Master Plan recommended cycling network was reviewed during The Exchange Class EA Study. The local existing and proposed network is depicted in **Figure 2-4**. Consistent with the Cycling Master Plan, The Exchange itself is not identified for dedicated cycling facilities. However, access to the existing cycling network is close by at Burnhamthorpe Road, Webb Drive and City Centre Drive.

Figure 2-4: Existing and Proposed Cycling Network



2.10 Natural Heritage Policy Documents

City of Mississauga Natural Heritage and Urban Forest Strategy, 2014 & City of Mississauga Urban Forest Management Plan, 2014

The City of Mississauga Natural Heritage and Urban Forestry Strategy (NHUFS), 2014, guides the management of Mississauga’s Natural Heritage System and Urban Forest within a 20-year framework up to the year 2033. The NHUFS directs natural heritage systems and urban forests within the City of Mississauga to be protected, enhanced, restored and expanded for future generations. The Plan includes the following applicable objectives for municipal operations and capital projects:

- ▶ Increase effectiveness of tree preservation and establishment practices;

- ▶ Creation of improved 'plant-able' areas;
- ▶ Avoid last minute retrofitting of designs to try and accommodate trees; and
- ▶ Trees and natural areas in urban settings must, by their very nature, be considered from various perspectives if they are to be successfully integrated into an urban setting.

The Exchange Class EA Study has considered the strategies as outlined in the UFMP. Streetscape design and planting will be detailed during future design phases and will consider urban forestry principles and design criteria.

City of Mississauga Natural Area Survey, 2014

The Natural Areas Survey (NAS) identifies the natural areas system, which includes 144 sites representing the best remaining natural features in the City. The intent of the NAS is to provide the current status of natural areas and updated information on flora, fauna, impacts, boundary changes and management needs.

The study area of The Exchange Class EA Study is not within or adjacent to any identified Natural Area survey.

2.11 Future Development

A development block approved under City of Mississauga Zoning By-law 0156-2016 (2016) (an amendment of Zoning By-law -225-2007) is located on the south side of Webb Drive, east of the Unopened Palgrave Road Allowance and south of The Exchange. The purpose of the By-law is to permit a 25-storey apartment building and a 3-storey horizontal multiple building. Based on previous engagement with City, the land owner/develop understands that site access would be provided via a private driveway that forms a fourth 'leg' to the proposed intersection at Webb Drive and The Exchange in consultation during this Class EA study City staff noted that, notwithstanding the approved zoning by-law, the driveway location would be subject to review and approval through a separate site plan process. The Project Team confirmed that the current Class EA study does not preclude BAIF's future access, and that the EA will not plan or seek approval for the access.

At the time of filing this Class EA Project File, no approved site plans or draft plans of subdivision are in place for lands surrounding The Exchange.

3 EXISTING CONDITIONS

3.1 Land Use

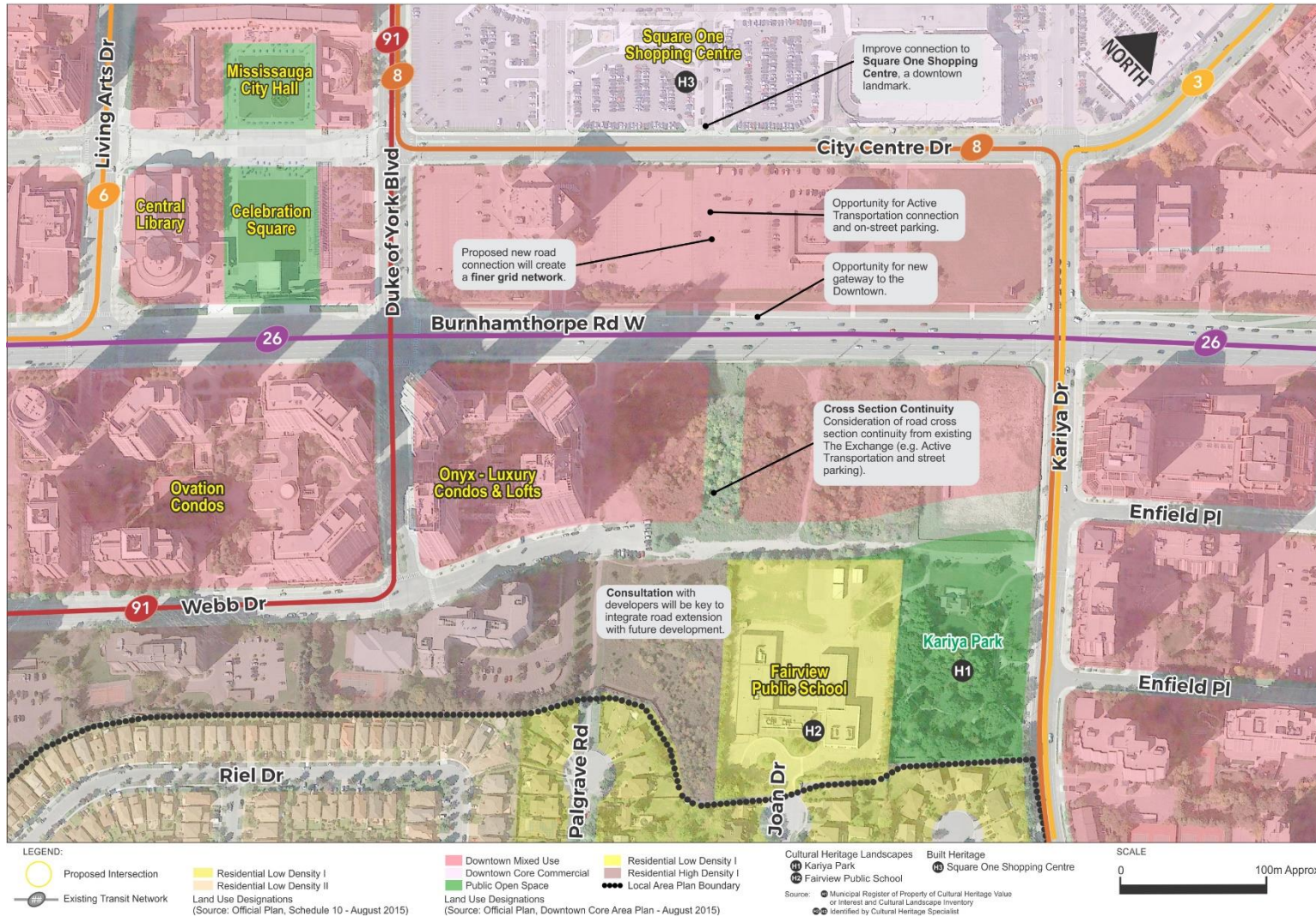
The proposed extension of The Exchange will be situated on lands and adjacent to lands designated and/or approved for future condominium communities and mixed-use development.

Existing land use in the broader surrounding area contains a mix of high-density condominium residential communities with some street-level commercial use, as well as office uses and parking. An informal pedestrian path has formed along the future route for the Exchange, which connects Burnhamthorpe Road to the informal pedestrian path between Webb Drive. **Figure 3-1** is a Google Earth image depicting the study area. **Figure 3-2** depicts existing and proposed land use.

Figure 3-1: The Exchange Study Area Existing Conditions



Figure 3-2: The Exchange Study Area Existing Conditions and Proposed Land Use



3.2 Cultural Heritage Resources

3.2.1 Built Cultural Heritage

A Cultural Heritage Assessment was conducted as part of the four road Class EA studies that the City has undertaken concurrently in the City Centre (Redmond Road, Webb Drive, The Exchange and Kariya Drive), and is on file with the City. The assessment, undertaken by Unterman McPhail and Associates, identified potential built heritage and cultural heritage landscapes within or adjacent to the each of the four study areas.

Based on this work, there is no cultural heritage resources within or adjacent to the study area. However, it is noted that Square One Shopping Centre, located at 100 City Centre Drive, may be assessed for cultural heritage value in the future as per the City's Cultural Landscape Inventory (2005).

3.2.2 Archaeology

A Stage 1 Archeological Assessment was conducted as part of the four road Class EA studies that the City has undertaken concurrently in the City Centre (Redmond Road, Webb Drive, The Exchange and Kariya Drive), and is on file with the City. The assessment was carried out by Archaeological Research Associates Ltd (ARA) in accordance with the Ministry of Tourism, Culture and Sport (MTCS) Standards and Guidelines for Consultant Archaeologists (2011) to:

- ▶ Provide information concerning the geography, history and current land condition of the study area;
- ▶ Determine the presence of known archaeological sites in the study area;
- ▶ Present strategies to mitigate project impacts to such sites, if they are located;
- ▶ Evaluate in detail the archaeological potential of the study area; and
- ▶ Recommend appropriate strategies for Stage 2 archaeological assessment, if some or all of the study area has archaeological potential.

The findings indicate that a portion of The Exchange Class EA study area has been previously assessed and/or disturbed. However, a portion of the study area was found to have archeological potential; as such, a Stage 2 Archaeological Assessment is

required. No ground alterations or development of any kind may occur within the study area until the Stage 2 assessment is complete.

A copy of the Stage 1 Archeological Assessment Report was submitted in October 2019 to MTCS, for registration into the Ontario Public Register of Archaeological Reports.

Notice was received from Ministry of Heritage, Sport, Tourism, Culture Industries (MHSTCI formerly MTCS) Archaeology Program Unit on April 24, 2020 of entry into the *Ontario Public Register of Archaeological Reports: Archaeological Assessment Report Entitled, "Stage 1 Archaeological Assessment, Extensions of Redmond Road, Webb Drive, The Exchange and Kariya Drive, Municipal Class Environmental Assessment, City of Mississauga, Regional Municipality of Peel, Part of Lots 16, 17 and 19, Concessions 1 and 2 North of Dundas Street, Geographic Township of Toronto, Peel County, Ontario", Dated Oct 17, 2019, Filed with MTCS Toronto Office on Oct 29, 2019, MTCS Project Information Form Number P007-0987-2019, MTCS File Number 0010428.*

A copy of the Stage 1 Archaeological Assessment report is provided in **Appendix B**.

3.3 Natural Environment

A Natural Heritage assessment was conducted as part of the four road Class EA studies that the City has undertaken concurrently in the City Centre (Redmond Road, Webb Drive, The Exchange and Kariya Drive). The Natural Environment Report is provided in **Appendix C**.

The natural environmental assessment included background review and field studies to characterize existing natural heritage features and functions. For any natural areas present, the assessment included: delineating existing vegetation communities, a botanical survey, general wildlife habitat survey, identification of potential Species at Risk (SAR) habitat, documentation of all incidental wildlife observations including bird calls, and confirmation of no surface drainage features in the four project areas. Field surveys were carried out in July 2019.

Key findings are summarized as follows:

- ▶ The study area is a mix of paved parking lot and vacant lands slated for future development with early successional vegetation growth;
- ▶ No portion of the area is within CVC's regulated area;

- ▶ No components of the City's Natural System as mapped on Official Plan Schedule 3 are present;
- ▶ No Core Areas of the Greenlands System are present;
- ▶ No fish habitat is present;
- ▶ No confirmed Significant Wildlife Habitat is present;
- ▶ Implications of the MBCA have potential to occur during the construction phase of the project when clearing and grubbing of vegetation could potentially disturb nests of migratory birds.

The southern portion of the study area, comprised of an informal dirt trail connecting Burnhamthorpe Road to another dirt trail from Webb Drive to Kariya Drive, contains a young naturalized/early successional area of cultural woodland.

The area is comprised of an early successional Mineral Cultural Woodland (CUW1) vegetation community. MNR natural heritage mapping, and historic (1954) aerial imagery suggests that a tributary of Cooksville Creek may once have been a surface water feature at this location. Field surveys verified it is no longer present as a surface feature, however municipal sewer grates were present. In addition, the presence of sparse large diameter Willow in the canopy (one of which had a trunk over 1 m in diameter) suggests that a surface water feature may once have been present. The tributary may have been piped under the urban area.

Cultural Woodland (CUW1)

One area of Cultural Woodland is present. The canopy has sparse Canada Poplar (*Populus x canadensis*) and large diameter White Willow (*Salix alba*). The subcanopy has a moderate abundance of Manitoba Maple (*Acer negundo*), Siberian Elm (*Ulmus pumila*), European Buckthorn (*Rhamnus cathartica*), and Black Locust (*Robinia pseudoacacia*). The dense understory is dominated by Eastern Tall Goldenrod (*Solidago altissima* var. *altissima*), Bell's Honeysuckle (*Lonicera x bella*), Common Burdock (*Arctium minus*), and White Sweet-clover. The moderately-dense ground layer is dominated by Kentucky Blue-grass, Garden Bird's-foot Trefoil, Foxtail Barley (*Hordeum jubatum* ssp. *jubatum*) and Field Peppergrass (*Lepidium campestre*). The community is impacted by exotic species, litter, and urban noise. The area was previously an agricultural field based on historic (1954) aerial imagery.

The following eight species at risk were identified as having a moderate to high likelihood of being present:

- ▶ Chimney Swift (Threatened, COSEWIC and COSSARO): Potentially suitable breeding habitat is present outside of the Study Area (nearby chimneys associated with both residential and commercial buildings), potential to forage over meadow and woodland areas; no observations.
- ▶ Peregrine Falcon (Special Concern, COSEWIC and COSSARO): Known to breed on a nearby office building (Mississauga Executive Centre), potential to forage over the Study Area; no observations.
- ▶ Red-headed Woodpecker (Endangered, COSEWIC, Special Concern, COSSARO): Potential suitable breeding and feeding habitat present including dead Ash snags in the woodland area; no observations.
- ▶ Monarch (Endangered COSEWIC, Special Concern COSSARO): Likely to pass through and / or forage within Study Areas, potential breeding habitat wherever Milkweed (Milkweed was present, but sparse in the woodland) or other wildflowers are present; no observations.
- ▶ Little Brown Myotis (Endangered, COSEWIC and COSSARO): Potential to roost in nearby buildings outside of the Study Area or in trees within the woodland area, may forage over open habitats within Study Areas; no observations (however, no acoustic or visual exit surveys completed).
- ▶ Northern Myotis (Endangered, COSEWIC and COSSARO): Potential to roost in nearby buildings outside of the Study Area or in trees within the woodland area, may forage over open habitats within Study Areas; no observations (however, no acoustic or visual exit surveys completed).
- ▶ Tri-coloured Bat (Endangered, COSEWIC and COSSARO): Potential to roost in nearby buildings outside of the Study Areas or in trees within the woodland area, may forage over open habitats within Study Area; no observations (however, no acoustic or visual exit surveys completed).
- ▶ Climbing Prairie Rose (Special Concern, COSEWIC and COSSARO): Potential habitat in the woodland; no observations.

For each SAR confirmed or potentially using habitats within and immediately adjacent to the Study Area, the likelihood and magnitude of impacts was identified as 'low' or 'none'. The habitat within the proposed development envelope has no unique SAR

habitat attributes that are not widely distributed and abundant in the local landscape, such that any SAR using the habitat within the study areas are unlikely to be impacted by future development. Impacts from future development can be minimized with the implementation of appropriate mitigation measures.

The northern portion of the study area (i.e. the study area north of Burnhamthorpe Road) is adjacent to a high-rise office building, an associated parking lot and manicured grounds; as such, there are no vegetation communities present.

3.4 Tree Inventory and Assessment

An Arborist Report was completed as part of the four road Class EA studies that the City has undertaken concurrently in the City Centre (Redmond Road, Webb Drive, The Exchange and Kariya Drive), and is provided in **Appendix D**. The purpose of the assessment was to identify individual trees that may be impacted and document:

- ▶ Tree information recorded included species, DBH, dripline radius and general health condition;
- ▶ Tree location identified using a combination of aerial photography, topographic survey and a hand-held GPS unit (Garmin Etrex 20x). GPS points converted using GIS for use in AutoCAD;
- ▶ Trees were identified in accordance with the City of Mississauga private tree protection by-law:
 - On public property individual trees greater than 15cm DBH were labelled numerically.
 - On the adjacent private properties' trees greater than 15cm DBH with a dripline that overhangs the public ROW's were labelled numerically. These trees were visually assessed from the property line.

Please refer to the report for results.

3.5 Source Water Protection

Ministry of Environment, Conservation and Parks' Source Protection Information Atlas was queried to identify any potential sensitivities of The Exchange study area with respect source water protection and potential for drinking water threats. The results are summarized in **Table 3-1**. It is noted that the water supply for the area is from Lake

Ontario and that study area sensitivities and risks are low/none. Therefore, specific Source Water Protection policies are not elaborated upon here.

Table 3-1: Source Water Protection Areas

Vulnerable Areas	Definition	Within Study Area?	Notes
Wellhead Protection Area	Land area around a well where contaminants from land activities can reach and pollute the well water supply.	No	-
Wellhead Protection Area E (GUDI)	The area around a well where water quality could be impacted by surface water.	No	-
Intake Protection Zone	The area around an intake pipe in a lake or river that draws in the surface water used to supply the municipal drinking water system. Three zones, from the closest to the farthest from the intake, rate the vulnerability threat.	No	-
Issue Contributing Area	An area where land-based activities contribute to the presence of an unwanted substance in the water source. Activities producing the substance may be prohibited or need to be managed more effectively.	No	-
Significant Groundwater Recharge Area	The areas where precipitation recharges the groundwater source or aquifer.	No	-
Highly Vulnerable Aquifer	An underground water supply, or aquifer, that can easily be contaminated because overlying soil layers are thin or permeable.	Yes	HVA, Score = 2 (low). Runoff from the proposed The Exchange will be conveyed via the storm sewer system to an appropriate outlet and therefore will not permeate to aquifer.

Vulnerable Areas	Definition	Within Study Area?	Notes
Event Based Area	An area within a watershed where a spill could pollute the drinking water supply because of sanitary sewers, sewage treatment plants or pipelines that are close to rivers, streams or other water bodies.	No	-
Wellhead Protection Area Q1	The WHPA-Q1 was delineated as the combined area that is the cone of influence of a well and the whole of the cones of influence of all other wells that intersect that area	No	-
Wellhead Protection Area Q2	The WHPA-Q2 is defined by the Technical Rules as the WHPA-Q1 area plus any area where a future reduction in recharge may have a measurable effect on the wells inside the WHPA-Q1.	No	-
Intake Protection Zone Q	Corresponds to the drainage area that contributes surface water to an intake, and the area that provides recharge to an aquifer that contributes groundwater discharge to the drainage area. Part VI.7 of the Technical Rules specifies the rules with respect to the delineation of IPZ-Q (Matrix, 2016).	No	-

3.6 Drainage and Stormwater

The study area falls within the Cooksville Creek watershed and is under the jurisdiction of the Credit Valley Conservation Authority.

There are no surface water features or areas regulated under Credit Valley Conservation Authority Regulation 160/06, in the Webb Drive study area. Currently, surface water runoff from the developed areas of the study area flows into the existing storm sewer system. Undeveloped parcels drain as overland flow to the surrounding street network where it enters the storm sewer system.

The City will develop a Stormwater Management Plan for the extension of The Exchange during the design phase. Storm runoff from the new section of The Exchange will likely be conveyed via catch basin to the existing sewer system. The stormwater management design for The Exchange extension will appropriately manage

water quality and quantity per applicable City of Mississauga and Credit Valley Conservation design criteria. LID measures may be considered during detailed design however, opportunities may be limited by the constrained right-of-way.

3.7 Municipal Services and Utilities

The Region of Peel is making watermain and sanitary sewer improvements on numerous streets in the Mississauga City Centre. The Region has planned this work to improve water supply through water infrastructure upgrades, in support of approved growth in the Mississauga City Centre.

Specific work underway in the vicinity of The Exchange Class EA study area includes: A new 1500 mm watermain along Burnhamthorpe Road, between Grand Park Drive and Cawthra Road; a new mm watermain on Duke of York Boulevard from Burnhamthorpe Road to Centre View Drive and Centre View Drive, for local distribution; and a new 400 mm watermain on Webb Drive from Grand Park Drive to Duke of York Boulevard, for local distribution. Sanitary improvements are also identified in these areas. Construction is ongoing through 2020. More information about the work being undertaken by the Region is available here:

<http://www.peelregion.ca/pw/construction/miss/bwp.htm>

<https://www.peelregion.ca/pw/construction/miss/pdf/13-15/131125-area-map-2018.pdf>

3.8 Transportation

3.8.1 Existing Transportation Network

The proposed road extensions currently being contemplated by the City, including The Exchange, are depicted within the context of the existing and planned downtown core transportation network in **Figure 3-3**.

The Exchange currently exists as a 2-lane north-south roadway with pedestrian sidewalks on both sides within the parking lot of Square One Shopping Centre, from Burnhamthorpe Road West (to the south) to the main entrance of the shopping centre (to the north).

Other key north-south transportation links in the immediate area include: Kariya Gate and Duke of York Boulevard, both City collector roads. Key east-west transportation

links in the area include Webb Drive and City Centre Drive, City collector roads, and Burnhamthorpe Road West, a Region of Peel arterial road.

3.8.2 Traffic and Transportation Assessment

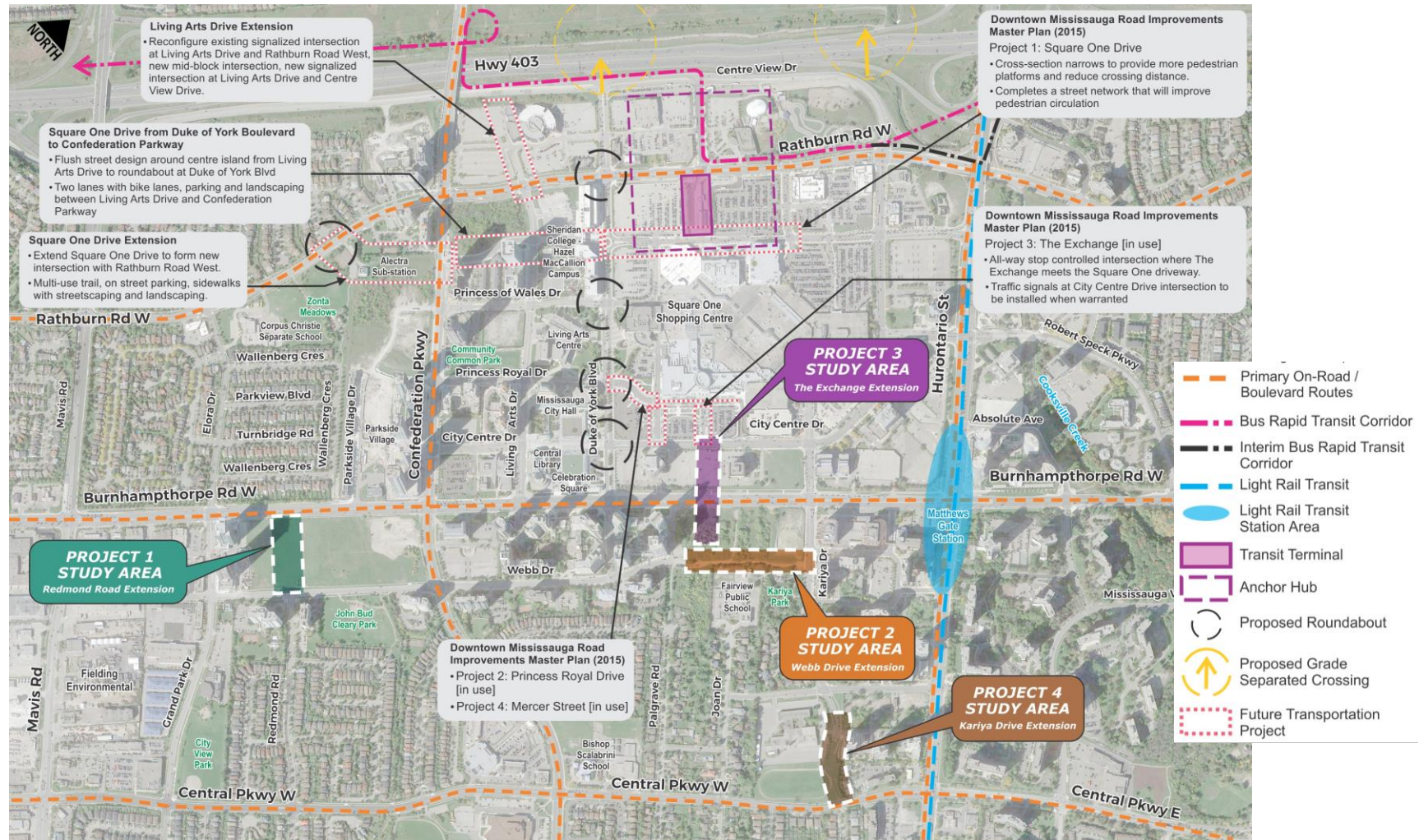
An assessment of existing (2018) traffic conditions was undertaken to assess the overall transportation network performance which incorporated the study areas of the four downtown EA studies (Redmond Road, Webb Drive, The Exchange and Kariya Drive). A detailed description of existing and future traffic conditions and associated methodology is included in the Transportation and Traffic Analysis Report, available upon request from City of Mississauga staff.

The micro-simulation assessment included an analysis of existing conditions and operational performance for the area bounded by Elora Drive, Webb Drive/Central Parkway West, Hurontario Street, as well as Burnhamthorpe Road West/City Centre Drive.

Based on the findings of this assessment, minor approaches of signalized intersections along Burnhamthorpe Road (northbound and southbound) and Hurontario Street (eastbound and westbound) experience high delays due to traffic signal coordination on major approaches and long cycle time (160 seconds). Existing traffic conditions at all intersections in all four Class EA study areas are generally operating at an overall acceptable level of service (i.e. Level of Service “D” or better).

Results from the future (2031) traffic analysis indicated that without the extension of The Exchange between City Centre Drive and Burnhamthorpe Road, adjacent corridors are expected to operate with heavy delays where many turning movements are expected to operate with high delays. The extension of The Exchange corridor could provide an essential multi-modal connection between the community to the south of Burnhamthorpe Road and transit/shopping/community amenities to the north of Burnhamthorpe Road.

Figure 3-3: Transportation Network



Sources: Schedule 6 – Long Term Transit Network, Schedule 7 – Long Term Cycling Routes, Mississauga Official Plan (2019)

3.9 Problem and Opportunities

Based on a review of the planning context and policy framework and the existing traffic conditions, safety issues and multi-modal transportation deficiencies, the following problems and opportunities have been identified:

- ▶ Downtown Mississauga is transitioning to an urban, high-density, mixed use community that is oriented toward pedestrian mobility and access to public transit;
- ▶ A key objective of the City's Downtown Core Local Area Plan is to create complete communities that have a compact urban form, are walkable and provide convenient access to a variety of land uses and public transit;
- ▶ A new north-south collector road will improve access and connectivity with Mississauga's Downtown Core, connecting the existing and planned community south of Burnhamthorpe Road to the commercial uses to the north, including Square One Shopping Centre, a City of Mississauga landmark;
- ▶ A new roadway will provide additional routing in the downtown and make for more pedestrian-friendly environment; and
- ▶ There is an opportunity to contribute to a vibrant urban core through the creation of high-quality public realm/pedestrian environmental.

Problem and Opportunity Statement

The Exchange is already being planned as the heart of the transitioning downtown. The extension of The Exchange will build on its presence as a main street within the Downtown, linking residents and visitors to residential, commercial, employment, recreational and civic uses. The Exchange will provide an important link between the heart of the downtown, Square One, and neighbourhoods to the south. In addition to being an important community link, The Exchange is intended as a venue and a destination for community events and open air markets. The success of The Exchange relies on providing pedestrian-oriented, smaller scale retail and entertainment opportunities; maximizing access and walkability; creating an aesthetically pleasing streetscape supported by transit, public spaces, residences and commerce.

4 PLANNING ALTERNATIVES

Phase 1 of the Municipal Class EA process involves the identification of the transportation problems and opportunities to be addressed by the study and Phase 2 involves the identification and evaluation of a range of possible solutions or 'planning alternatives'.

4.1 Alternative Planning Solutions

The following Alternative Solutions are being considered to address the Problems and Opportunities:

1. Do Nothing: Maintain existing transportation system within the study area i.e. new development would require an internal road network to connect with other collector or arterial roads.
2. Manage Transportation Demand: Improve access within the downtown by: discouraging single-occupant vehicles and encouraging carpooling; shifting travel demand to off-peak hours; and encouraging walking, cycling and transit use.
3. Improve Other North-South Routes: Upgrade parallel north-south roads (e.g. Joan Drive or Hurontario Street) to support transportation needs.
4. Extend The Exchange: Complete The Exchange as a 2-lane road from City Centre Drive to the proposed extension of Webb Drive.

4.2 Evaluation of Planning Solutions

The alternative planning solutions were assessed in their ability to reasonably address the problems and opportunities. Criteria were developed to guide the assessment process so that transportation planning, technical and environmental (socio-economic, community and cultural / heritage) conditions were all factored into the recommendation.

The assessment of alternatives employed a reasoned argument approach which assesses the potential impacts of each alternative and then compares the relative significance of the impacts among the alternatives to select the recommended solution. A detailed assessment of alternatives is provided in **Table 4-1**. A summary is provided in **Table 4-2**.

Table 4-1: Assessment of Alternative Planning Solutions





Evaluation Criteria	Alternative 1 Do Nothing	Alternative 2 Manage Transportation Demand	Alternative 3 Upgrade Parallel Roads	Alternative 4 Extend The Exchange
Planning and Transportation				
Provincial and Municipal Planning Objectives <ul style="list-style-type: none"> - Consistent with Growth Plan for the Greater Golden Horseshoe - Satisfies the goals and objectives of the City's Official Plan - Supports planned / approved development 	<ul style="list-style-type: none"> - Does not reflect Provincial policies to develop compact and multi-modal communities - Does not reflect City Downtown Core Local Area Plan policies for a fine-grained multi-modal transportation network in the downtown - Does not support planned development within the City's downtown 	<ul style="list-style-type: none"> - Consistent with Provincial policies to promote active transportation and transit but does not support compact community development - Currently being implemented through City policies - Does not address problems and opportunities within the study area - Does not support planned development within the City's downtown 	<ul style="list-style-type: none"> - Would provide additional north-south traffic capacity in other corridors - Does not reflect City Downtown Core Local Area Plan policies for a fine-grained multi-modal transportation network in the downtown - Does not support planned development within the City's downtown - Widening other roads may not be consistent with City collector road policies 	<ul style="list-style-type: none"> - Directly supports development of compact, multi-modal communities - Creates smaller urban blocks that encourage walking to access local transit network - Fully addresses City' objectives for the study area. Including creating a main street environment - Directly supports planned communities and development
Pedestrian and Cycling Accommodation <ul style="list-style-type: none"> - Provides safe and comfortable pedestrian access to area amenities - Supports active transportation (walking and cycling) 	<ul style="list-style-type: none"> - Does not provide an opportunity to enhance the pedestrian environment within the study area - Does not support development of multi-modal transportation system for future land uses 	<ul style="list-style-type: none"> - Does not provide an opportunity to enhance pedestrian environment within the study area - Somewhat supports development of multi-modal transportation system for future land uses 	<ul style="list-style-type: none"> - Does not provide an opportunity to enhance pedestrian environment within the study area - Supports development of multi-modal transportation system for future land uses, but not within the study area 	<ul style="list-style-type: none"> - Provides opportunity to enhance the pedestrian environment within the study area - Provides safe and comfortable pedestrian environment within planned mixed-use community - Creates new pedestrian connections
Transit <ul style="list-style-type: none"> - Facilitates improved integration of transit services into the existing and planned system 	<ul style="list-style-type: none"> - Does not enhance access to transit services in the downtown 	<ul style="list-style-type: none"> - Facilitates overall improved integration of transit services 	<ul style="list-style-type: none"> - Potential for limited improvements to the integration of transit serviced in the overall transportation system 	<ul style="list-style-type: none"> - Improves pedestrian access to transit network from future planned communities - No transit service planned on The Exchange extension directly
Network Connectivity <ul style="list-style-type: none"> - Facilitates improved access to, from and within downtown Mississauga 	<ul style="list-style-type: none"> - Does not provide improved multi-modal access in the downtown 	<ul style="list-style-type: none"> - May result in some shift in travel demand to improve road operations. - Does not address the primary transportation problem of the need for a finer grid collector road network - Does not provide alternative multi-modal routing and access in the downtown 	<ul style="list-style-type: none"> - May provide modest improvement in network capacity in short-term - Does not address the primary transportation problem of the need for a finer grid collector road network within the study area - Does not provide alternative multi-modal routing and access in the downtown 	<ul style="list-style-type: none"> - Provides alternative multi-modal routing and access in the downtown - Offers redundancy in the road network to improve access for pedestrians and vehicles

Evaluation Criteria	Alternative 1 Do Nothing	Alternative 2 Manage Transportation Demand	Alternative 3 Upgrade Parallel Roads	Alternative 4 Extend The Exchange
Emergency Response <ul style="list-style-type: none"> - Provides opportunity to improve response time and/or emergency service vehicle access 	<ul style="list-style-type: none"> - Does not provide opportunity to improve emergency vehicle access and / or response time 	<ul style="list-style-type: none"> - If TDM achieves a slight reduction in auto use, there may be some improvements to network operations and associated emergency vehicle response time in the short-term - No change to existing vehicle access – no opportunity to improve access 	<ul style="list-style-type: none"> - No change to existing vehicle access – no opportunity to improve access in the study area 	<ul style="list-style-type: none"> - Offers improved access and routing for emergency response vehicles
Socio-Economic Environment				
Public Realm <ul style="list-style-type: none"> - Provides streetscape enhancement opportunities - Creates smaller urban blocks - Supports a more dynamic urban core 	<ul style="list-style-type: none"> - No opportunity to create new public space 	<ul style="list-style-type: none"> - Improvements to transit ridership and other modes of transportation assist in supporting a dynamic Downtown Core; however, does not address needs and opportunities within the study area 	<ul style="list-style-type: none"> - Does not provide opportunity to enhance the existing public realm, create smaller urban blocks and/or support a dynamic urban environment within the study area 	<ul style="list-style-type: none"> - Consistent with City Downtown planning policies to create a finer-grained street network - Addresses anticipated transportation needs - Improves network connectivity for drivers and pedestrians - Improves road operations and safety - Enhances access to transit and the downtown’s walkability
Residential/Business Property/Operations <ul style="list-style-type: none"> - Requires acquisition of private property - Changes in access - Supports local commerce 	<ul style="list-style-type: none"> - No property required. - Does not support local commerce, does not provide opportunity to improve local access/businesses 	<ul style="list-style-type: none"> - No property required. - Limited opportunity to support local commerce, does not provide opportunity to improve local access/businesses 	<ul style="list-style-type: none"> - Potentially significant property impacts along other corridors - Does not address problems and opportunities within the study area - Does not meet the multi-modal mobility needs of planned high-rise, mixed-use communities - Does not support economic development within the study area 	<ul style="list-style-type: none"> - Requires property from adjacent developable lands, no existing residences or businesses impacted - Provides for on-street parking and high-quality pedestrian environment to support mixed-use development and street-level commercial uses
Accessibility <ul style="list-style-type: none"> - Provides opportunity to improve accessibility and reduce barriers in the built environment - Facilitates implementation of AODA/City accessibility design guidelines 	<ul style="list-style-type: none"> - No opportunity to improve accessibility and accommodate AODA/ City Guidelines 	<ul style="list-style-type: none"> - Limited opportunity to improve accessibility: measures are policy based rather than actual implementation within the study area 	<ul style="list-style-type: none"> - Does not provide opportunities for improvements within the study area. Does not address study area accessibility needs 	<ul style="list-style-type: none"> - Improves accessibility within the community and in the downtown - All facilities will be developed to meet AODA/City Guidelines

Evaluation Criteria	Alternative 1 Do Nothing	Alternative 2 Manage Transportation Demand	Alternative 3 Upgrade Parallel Roads	Alternative 4 Extend The Exchange
Cultural Heritage				
Archaeology - Impacts areas identified as having archaeological potential	- No potential archaeological impacts	- No potential archaeological impacts	- Potential heritage impacts, depending on road and features present	- Areas of archaeological potential identified. A Stage 2 assessment will be required in some previously undisturbed areas.
Built Cultural Heritage and Cultural Heritage Landscapes - Impacts to designated/listed heritage resources - Impacts to cultural heritage landscapes	- No Built Heritage features impacted - No Cultural Heritage Landscapes impacted	- No Built Heritage features impacted - No Cultural Heritage Landscapes impacted	- Other corridors will require assessments	- No Built Heritage features impacted
Natural Environment				
Climate Change/Sustainability - Ability to increase resilience to climate change within study area - Supportive of sustainable transportation modes	- No change	- Supports sustainable growth through policies that encourage behavioural shifts in reducing single occupant vehicle use	- Does not address opportunities within the study area - No opportunity to provide sustainable modes of transportation in the study area.	- Opportunity to improve resilience of the study area through appropriate stormwater management measures - Supportive of more compact/infill and mixed-use development in the downtown - Pedestrian facilities to encourage walking for access nearby transit - Cycling facilities that link to broader cycling network, providing for sustainable transportation choices
Vegetation/Trees - Potential impact to vegetation communities - Potential impacts to individual trees	- None	- No natural environmental features are impacted	- Low potential for impacts, depending on road and features present	- The Study Area is comprised of an informal dirt trail connecting Burnhamthorpe Road to another informal dirt trail from the end of Webb Drive to Kariya Drive; the study area consists of a young naturalized/early successional area of cultural woodland. This area was previously agricultural field. - Road extension will result in the partial removal of cultural woodland vegetation.
Wildlife - Potential impact to wildlife and habitat.	- None	- No wildlife habitat impacted	- Low potential for impacts, depending on road and features present	- No Significant Wildlife Habitat present and no Species at Risk were observed during field investigations or background information. Potential habitat for SAR (bats), candidate SWH, and habitat for locally rare species (Grey Catbird) is present (see Section 4 of

Evaluation Criteria	Alternative 1 Do Nothing	Alternative 2 Manage Transportation Demand	Alternative 3 Upgrade Parallel Roads	Alternative 4 Extend The Exchange
				<p>Appendix C) and will require edge removals of these habitats along approximately 130 m of the road construction.</p> <ul style="list-style-type: none"> - Given the overall low quality of the habitat and small area of removals, these impacts are not anticipated to have a significant impact on the primarily opportunistic species that use these features.
Technical				
<p>Construction</p> <ul style="list-style-type: none"> - Disruption to existing traffic and property access - Potential to coordinate with other initiatives 	- No disruption	- No disruption	- Likely temporary disruption to traffic, private property and businesses during construction	<ul style="list-style-type: none"> - Minimal impacts since the road will be constructed on currently vacant lands - Some potential for temporary nuisance impacts (noise) to adjacent Fairview Public School and existing offices, condominium communities
<p>Utilities</p> <ul style="list-style-type: none"> - Potential impacts to utilities 	- No impacts to existing utilities	- No impacts to existing utilities	- Anticipated impacts to utilities on other corridors, if they are widened	- No impacts to current Peel Region watermain and sanitary upgrades
<p>Costs</p> <ul style="list-style-type: none"> - Relative costs for comparison purposes 	No direct cost	\$	\$\$\$	\$\$
Addresses Project Problem and Opportunity Statement	No	No	No	Yes
Evaluation Result	Not Carried Forward	Already Being Implemented Through City Policies	Not Carried Forward	Carried Forward

Table 4-2: Summary of the Evaluation of Alternative Planning Solutions

	Alternative 1	Alternative 2	Alternative 3	Alternative 4
Category	Do Nothing	Manage Transportation Demand	Upgrade Parallel Roads	Extend The Exchange
 Transportation and Technical	<ul style="list-style-type: none"> - Does not address Problems and Opportunities. - Not consistent with City planning policies to create a finer-grained street network. - Does not improve network connectivity. - Does not contribute to downtown main street environment. 	<ul style="list-style-type: none"> - May result in some shift in travel demand to improve road operations. - Does not address the primary transportation problem of the need for a finer grid collector road network and City's vision for downtown main street 	<ul style="list-style-type: none"> - Does not address the Problems and Opportunities - Not consistent with City planning policies to create a finer-grained street network in the Downtown Core. - Does not address local transportation needs or improve network connectivity. 	<ul style="list-style-type: none"> - Consistent with City planning policies to create a finer-grained street network. - Improves network connectivity for drivers and pedestrians. - Improves road operations and safety. - Enhances access to transit and downtown walkability - Provides an important link between the downtown and neighbourhoods to the south
 Socio-Economic Environment	<ul style="list-style-type: none"> - No property required. - Does support existing and future community. - No opportunity to contribute to "heart of downtown" and community vibrancy, public space uses. 	<ul style="list-style-type: none"> - No property required - Although supportive of transit, cycling and pedestrian activities, this does not provide the specific infrastructure needed within the study area to support or enhance walkability. 	<ul style="list-style-type: none"> - Potentially significant property impacts along other corridors - Does not address problems and opportunities within the study area - Does not meet the multi-modal mobility needs of the community - Does not support economic development within the study area 	<ul style="list-style-type: none"> - Contributes to vibrant and community-oriented main street. - Prioritizes a high-quality pedestrian environment. - Provides for on-street parking. - Will provide a flexible space that supports mixed-uses and becomes a destination in the downtown.
 Natural Environment	<ul style="list-style-type: none"> - No impacts. 	<ul style="list-style-type: none"> - No impacts. 	<ul style="list-style-type: none"> - Some potential for impact, depending on improvements. 	<ul style="list-style-type: none"> - Removes a very small portion of successional cultural woodland vegetation and low-quality habitat. - Provides for sustainable transportation choices to reduce vehicle use.
 Cultural Environment	<ul style="list-style-type: none"> - No potential archaeological impacts. - No cultural heritage features identified. 	<ul style="list-style-type: none"> - No potential archaeological impacts. - No cultural heritage features identified. 	<ul style="list-style-type: none"> - Other corridors would require assessment. 	<ul style="list-style-type: none"> - Some areas will be subject to Stage 2 Archeological Assessment. - No cultural heritage features identified.
Evaluation Result	Not Preferred	Already Being Implemented Through City Policies	Not Preferred	Preferred

4.3 Preferred Planning Solutions

Based on the results of the results of the evaluation, Alternative 4, Extend The Exchange, is preferred because it fully addresses the Problems and Opportunities by:

- ▶ Supporting the creation of an urban environment that meets planning objectives, network connectivity and access;
- ▶ Fully addressing the City's transportation objectives by creating a fine-grained downtown street network;
- ▶ Providing a new north-south road for anticipated future high-rise, mixed-use development;
- ▶ Providing redundancy in the road network for all vehicles;
- ▶ Creating smaller, more walkable blocks that enhance pedestrian access to transit; and
- ▶ Supporting a mixed-use community by offering high-quality pedestrian environment and street-parking for street-level commerce.

Table 4-1 illustrates that Alternative 1 does not address any of the Problems and Opportunities. Alternatives 2 and 3 only partially address the Problems and Opportunities and do not contribute to a fine-grained street network that supports community growth, improved pedestrian options and access to transit.

4.4 Future Transportation Conditions

In general, future traffic conditions are not likely to change significantly and operations will not improve with the extension of The Exchange, given the expected growth in the downtown core. Traffic modeling indicates that the proposed The Exchange extension would provide north-south access and connectivity within the local road network.

It is important to note that the City's objectives of the Downtown Core Local Area Plan are to prioritize the development of a complete community with a compact urban form that is walkable and convenient to public transit and the cycling network.

MiWay Transit currently operates on the road network around Webb Drive, including on existing Webb Drive, Burnhamthorpe Road, Confederation Parkway, and Kariya Drive. MiWay has confirmed that there are no plans to extend local transit onto the proposed new segment of The Exchange.

The City of Mississauga Cycling Master Plan (2018) does not include plans for dedicated cycling facilities on The Exchange. However, there will be access to the surrounding cycling network which includes: multi-use path on Burnhamthorpe Road and existing and future cycling facilities on Webb Drive.

4.5 Road Design Concept

4.5.1 Initial Road Design Concept

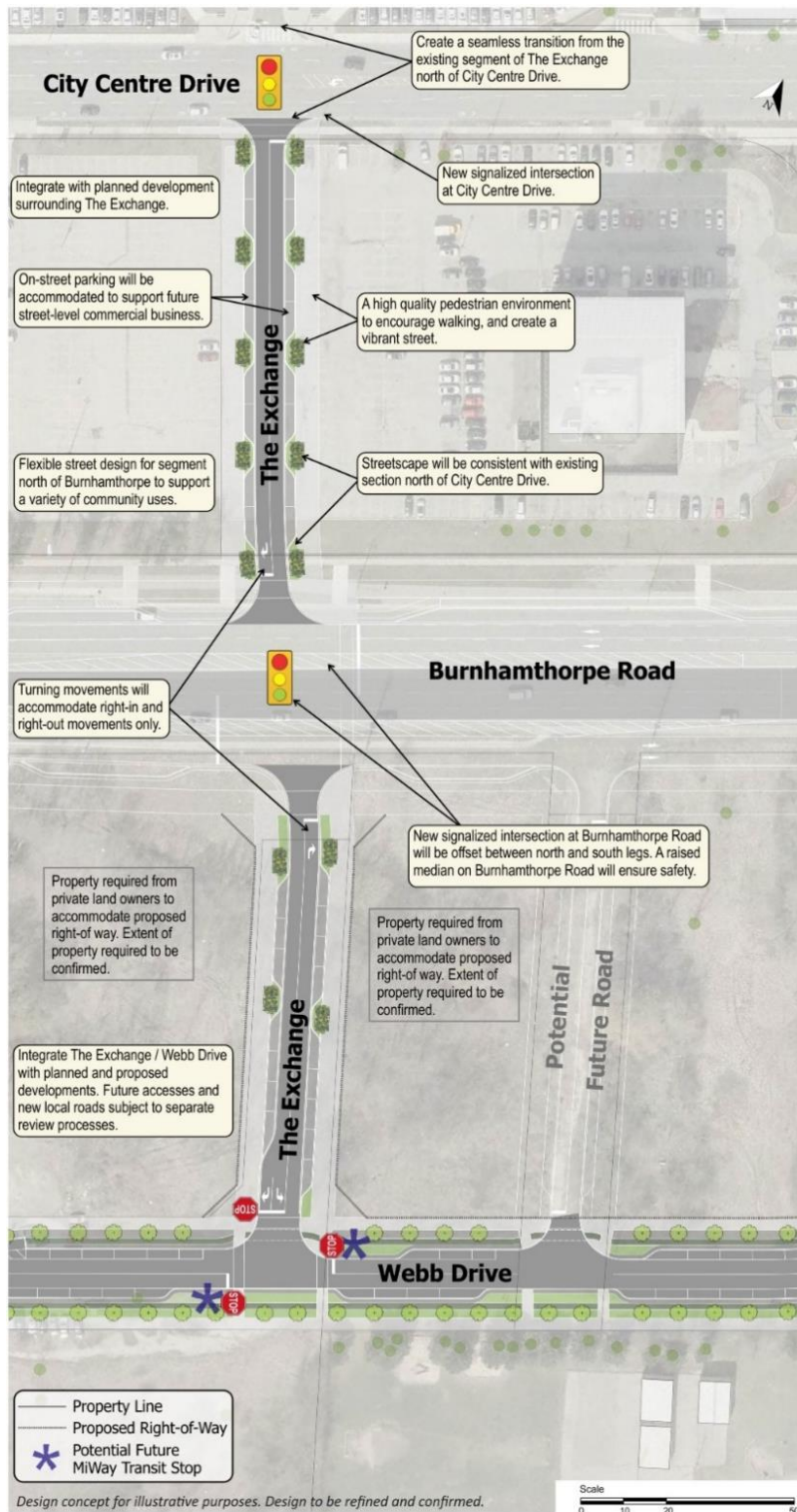
A design concept was developed for the Preferred Planning Solution to extend The Exchange by approximately 225 m, from a new intersection at City Centre Drive to a new intersection at the proposed extension of Webb Drive (planned under a separate Class EA study). The design concept was developed for illustrative purposes only and provided for public and stakeholder review at the Public Information Centre (PIC), which took place on June 12, 2019.

Figure 4-1 depicts the initially proposed typical road cross-section of a 23 m right-of-way, as presented at the PIC. The typical cross-section is based on the Standard City Centre Cross-Section. **Figure 4-2** depicts the original road alignment concept, as presented at the PIC.

Figure 4-1: Initial Typical Cross-Section for The Exchange (23 m Right-of-Way)



Figure 4-2: Initial Design Concept for The Exchange (23 m Right-of-Way)



Note: Streetscape depiction is conceptual only. Green areas are identified for future streetscape design and do not imply the presence of sod. Location of streetscape is subject to further design and integration with building location, utilities and on-street parking considerations.

4.5.2 Road Design Concept Refinements

Following the June 2019 PIC, the City continued to directly engage with property owners and developers within the study area. During the consultations, the City discussed in detail the future land uses, site plans for proposed development, and the road right-of-way for The Exchange with the developers as follows: Baif Development Limited, Wydanco Development and Camrost Felcorp Incorporated. Through this engagement, the City reached an agreement with the developers for a road right-of-way width of 22 m. Therefore, adjustments have been made to the final road cross-section and design concepts. Consultation summaries and correspondence records can be found in Appendix A and on file with the City.

Figure 4-3 depicts the updated typical road cross-section of a 22 m right-of-way, per the above noted agreements. The typical cross-section is based on the Standard City Centre Cross-Section. **Figure 4-4** depicts the updated typical road alignment concept of a 22 m right-of-way.

As depicted in the renderings, the only change to the design concept is a reduction in boulevard width from 5.5 m to 5.05 m on each side of the roadway.

The following design aspects will be of particular interest in future design phases:

- ▶ The use of the City of Mississauga Standard City Centre Road Cross-Section will ensure appropriate space is available for underground utilities, street trees and sidewalk. However, some details of the road cross-section may be subject to minor adjustments during the design phase.
- ▶ Traffic operations including new intersections at City Centre Drive, Burnhamthorpe Road West, and Webb Drive.
- ▶ Design of wide sidewalks to create a high-quality pedestrian environment to encourage walking and create a vibrant street.
- ▶ Design of on-street parking, while maintaining appropriate clearance at intersections.

The streetscape is conceptual only. Green areas are identified for future streetscape design and do not imply the presence of sod. Location of streetscape is subject to further design and integration with the future developments, utilities and municipal services.

Proposed and potential future roads depicted in **Figure 4-4** are subject to separate studies and City approval. A Schedule B Class Environmental Assessment Study for Webb Drive is being carried out at the same time as this study.

Figure 4-3 Final Typical Cross-Section for The Exchange (22 m Right-of-Way)



Figure 4-4: Final Design Concept for The Exchange (22 m Right-of-Way)



Note: Streetscape depiction is conceptual only. Green areas are identified for future streetscape design and do not imply the presence of sod. Location of streetscape is subject to further design and integration with building location, utilities and on-street parking considerations.

4.5.3 Potential Property Requirements

Based on the concept design, four properties are proposed to be directly impacted: 223 Webb Drive, 180 Burnhamthorpe Road West, 151 City Centre Drive, and 201 City Centre Drive (note: municipal address may vary depending on property ownership registration). Since the start of the study, one of the potentially impacted parcels changed ownership; in early 2020, Camrost Felcorp Inc. took over ownership of 180 Burnhamthorpe Road West.

A total of approximately 2,590 m² will be required to accommodate The Exchange right-of-way. The area of each parcel that may be impacted is noted in **Table 4-3**.

Table 4-3: Area of Property Potentially Impacted

Roll Number	Municipal Property Address	Property Owner	Approximate Area of Property Potentially Impacted
05-04-154-06200-0000	223 Webb Drive	Baif Developments Limited	220 m ²
05-04-0-154-06300-0000	180 Burnhamthorpe Road West	2713589 Ontario Inc.	180m ²
05-04-0-154-00440-0000	151 City Centre Drive	Camcentre Holdings Inc.	2,150 m ²
05-04-0-154-00449-0000	201 City Centre Drive	Morguard MCC Ltd.	40 m ²

The potentially impacted properties on Webb Drive and Burnhamthorpe Road West are currently vacant land, designated for future mixed-use development. The existing uses of the properties on City Centre Drive are commercial mixed-use; these lands are designated for future mixed-use development.

5 CONSULTATION

5.1 Key Points of Contact

External agencies, utilities, emergency service providers, and residents and business owners were contacted directly at key points during the study and requested to provide input to the study and feedback on the decision-making process. The key points of contact are listed in **Table 5-1**.

A direct mailing list of residents and businesses, within the defined catchment area, agencies and utilities was developed at the outset of the study. The catchment area for property owners was defined as approximately 300 m on either side of The Exchange within the study area.

Project notices for all four downtown Mississauga road extension Class EA studies (i.e. Redmond Road, Kariya Drive, Webb Drive and The Exchange) were coordinated and sent concurrently. As such the catchment areas overlapped and the mailing list consolidated, as appropriate. The mailing list continued to be updated based on feedback received through the study.

Members of the general public were made aware of the study through notifications in the local newspapers and invited to contact the project team to join the project mailing list. Members of the public requesting to be on the mailing list received direct notification of subsequent study milestones at the key points of contact listed in **Table 5-1**.

A dedicated website and email address were established through the City of Mississauga's website at the outset of the study:

<http://www.mississauga.ca/portal/residents/rwek-ea-studies>

Information about The Exchange and the other three downtown Class EA studies was posted to this website and updated through the study with Notices of Study Commencement, Public Information Centre and Study Completion.

Various Public Information Centre (PIC) materials were made available on the website (e.g. Notices, display material and comment sheets). All notices and study materials contained the dedicated project team email address to facilitate direct contact from interested members of the public.

The potential need for formal Indigenous Community engagement was explored with the Ministry of Environment, Conservation and Parks (MECP). In correspondence dated

January 18, 2019, MECP confirmed that, given the urban downtown setting, the absence of natural features and watercourses, Indigenous Communities were unlikely to have an interest in the study and direct outreach was not required.

Table 5-1: Key Points of Contact

Date	Notification	Purpose
<p>Notice of Study Commencement December 4, 2018</p>	<ul style="list-style-type: none"> - Notice sent to property owners / mailing list – December 4, 2018 - City project website – December 4, 2018 - The Mississauga News – December 6 and December 13, 2018 - Letters and Response Forms sent to agencies and utilities – December 10, 2018 - Letter and Streamlined EA Project Information Form sent to MECP – December 12, 2018 	<p>To introduce and invite participation in the study and to request any preliminary comments or pertinent information.</p>
<p>Public Information Centre June 12, 2019</p>	<ul style="list-style-type: none"> - Postcard notices sent to property owners / mailing list – May 27, 2019 - City project website – May 31, 2019 - City website – June 3, 2019 - The Mississauga News – June 6, 2019 - PIC Display materials posted on City website on June 13, 2019 	<p>To notify and invite interested parties to attend the first Public Information Centre on June 12, 2019 to review information and provide input regarding: the problem and opportunities being addressed, the collection of background information, the evaluation of planning alternatives and early design concepts.</p>
<p>Notice of Study Completion August 6, 2020</p>	<ul style="list-style-type: none"> - Notices sent to property owners / mailing list – August 6, 2020 - Notices sent to agencies and utilities – August 6, 2020 - City project website – August 6, 2020 - The Mississauga News – August 6, 2020 	<p>To announce the completion of the Class EA Study and notify interested parties of the 45-calendar day review period for the Environmental Study Report.</p>

5.2 Agency Consultation

The list of technical agencies was assembled based on previous City of Mississauga Class Environmental Assessment studies and Ministry of the Environment, Conservation and Parks (MECP) Government Review Team (GRT) list.

External 'agencies' (including regulatory/review agencies, utilities and emergency service providers) were first notified of this Class EA Study through written correspondence on December 10, 2018 which included a copy of the Notice of Study Commencement and a Response Form (a copy of the Notice and letter are provided in **Appendix A**). These agencies were:

- ▶ Provincial
 - Ministry of the Environment, Conservation and Parks
 - Ministry of Natural Resources and Forestry
 - Ministry of Tourism, Culture and Sport
 - Ministry of Municipal Affairs and Housing
 - Ontario Heritage Trust
 - Metrolinx
 - Credit Valley Conservation (CVC)
- ▶ Municipal
 - Mississauga Accessibility Advisory Committee
 - Mississauga Cycling Advisory Committee
 - Mississauga Board of Trade
 - Dufferin-Peel Catholic District School Board
 - Region of Peel District School Board
 - Region of Peel Student Transportation
 - Region of Peel Public Works
 - Region of Peel Public Health
 - Region of Peel Paramedic Services
 - Region of Peel Police - Road Safety Services
 - Mississauga Fire and Emergency Services
- ▶ Elected Officials

- Member of Provincial Parliament – Mississauga Centre
- Member of Provincial Parliament – Mississauga East Cooksville
- ▶ Utilities
 - Hydro One Networks Inc.
 - Enbridge Gas Distribution Inc.
 - Rogers Communication Inc.
 - Alectra Utilities
 - Bell Canada

A summary of agency comments received throughout the study and course of action taken by the Project Team, as appropriate, is provided in **Table 5-2**. Copies of correspondence with agencies are included in **Appendix A**.

Table 5-2: Agency Comments

Agency Comment	Course of Action
Ministry of Natural Resources and Forestry Email dated: January 2, 2019 I have received your letter regarding four proposed road extensions in Mississauga. There was no attached notice with a key plan. Please provide.	Notice of Commencement was provided via email.
Ministry of Natural Resources and Forestry Email dated: January 3, 2019 Natural areas to be affected will need to be searched for Butternut trees of all sizes, including seedlings, within 25 metres from proposed works. The woodland areas to be affected will need to be outlined and, if they are at least 0.5 ha averaging at least 30 metres in width with some native oak or maple species, assessed for potential as habitat for endangered bat species (Little Brown Myotis, Northern Myotis, Tri-coloured bat).	An assessment of the natural environment was completed as part of this study.
Ministry of the Environment, Conservation and Parks Letter dated: January 18, 2019 Response to Notice of Commencement providing guidance on consultation with Indigenous Communities.	Given the nature of this project and the existing land uses in the area, separate notification for Indigenous Communities was not required.

Agency Comment	Course of Action
Ministry of Natural Resources and Forestry Emailed dated: June 6, 2019 We have received the Notice of Public Information Centre for this project. If you have any questions regarding natural features/systems or impacts on them, please let us know.	No action required.
Region of Peel Public Health Email dated: June 12, 2019 Thank you for sharing the notice of PIC for the environmental assessment process for Redmond Road, Webb Drive, The Exchange and Kariya Drive. We would like to request digital copies of information being shared at tonight's PIC, including the presentation, so that we may review and provide comments.	PIC materials were provided via email on June 17, 2019.

5.3 Public Information Centre

A Public Information Centre (PIC) was held on June 12, 2019 from 5:30 pm to 7:30 pm in the Great Hall at the Mississauga Civic Centre, located at 300 City Centre Drive in Mississauga.

The PIC was an open house format. A presentation to introduce the study was scheduled from 5:30 pm to 5:45 pm, however, due to low attendance at 5:30 pm, the presentation was cancelled.

The purpose of the PIC was to provide stakeholders and interested members of the public with an opportunity to view study information including project background, the Municipal Class EA process, planning and policy context, assessment and evaluation of alternative planning solutions and the selection of a preliminary preferred solution. A design concept was presented of the preliminary preferred solution, for illustrative purposes.

Twelve people signed in at the PIC. Attendees included local residents / property owners, stakeholders, and staff from the Peel District School Board and City of Mississauga. The PIC was not attended by any Elected Officials or City staff outside of the Project Team. The PIC materials were made available on the City's website the day after the PIC.

No public comments were received via hard copy at the PIC. No additional public comments were received during the comment period, ending July 5, 2019, nor throughout the duration of the Study. Stakeholder feedback is noted in **Section 5.4**.

5.4 Stakeholder Consultation

The proposed extension of The Exchange will be situated on and adjacent to land that is designated and being planned for future mixed-use development. During the Class EA Study, undeveloped land parcels within the study area have been owned by Baif Developments Limited (Baif), Wyandco Development (Wyandco), and Camrost Felcorp Inc. (Camrost). Consultation during the Class EA Study was undertaken with owners and their representatives.

In 2020, the property owned by Wyandco were sold. The parcel is currently owned by 2713589 Ontario Inc. (180 Burnhamthorpe Road West).

Meetings with Bair and Wyandco representatives were held on May 30, 2019. A meeting with Camrost was held on June 12, 2019. Minutes of the meetings are on file with City staff. A summary of the correspondence with each stakeholder is provided below:

Baif Developments Limited

- ▶ A meeting was held with Baif's representatives on May 30, 2019, at the City of Mississauga, 201 City Centre Drive.
- ▶ The purpose of the meeting was to introduce the study, review early design concepts, discuss stakeholder questions and concerns, and review next steps.
- ▶ During the meeting Baif provided an overview of future plans for their properties on Webb Drive. It was noted that the City passed By-law 0156-2016 to amend Zoning By-law 0225-2007 on the south side of Webb Drive, south of The Exchange. The purpose of the By-law is to permit a 25 storey apartment building and a 3 storey horizontal multiple building. This Class EA Study is not anticipated to preclude or adversely impact zoning by-law approval or future site planning processes.
- ▶ During the meeting Baif expressed concerns about the proposed right-of-way for The Exchange and potential property requirements.

- ▶ Following the meeting, Baif provided a copy of the Traffic Impact Study and corresponding Addendum for a proposed residential development and future mixed-use development in the area.
- ▶ Following the Public Information Centre held on June 12, 2019, Baif provided comments related to the status of development in the area, existing planning approvals and outstanding appeals. The correspondence is on file with the City. No further comments about the study process or design concept were received.
- ▶ Prior to finalizing the Project File, the Project Team reached out to Baif representatives to schedule another meeting. Baif did not wish to meet with the Project Team at this time.

Wydanco Development

- ▶ A meeting was held with Wydanco's representatives on May 30, 2019, at the City of Mississauga, 201 City Centre Drive.
- ▶ The purpose of the meeting was to introduce the study, review early design concepts, discuss stakeholder questions and concerns, and review next steps.
- ▶ During the meeting Wydanco expressed concern about the loss of developable land required to accommodate the proposed right-of-way.
- ▶ Following the meeting, a draft property plan quantifying the area directly impacted by the proposed right-of-way was provided to Wydanco.
- ▶ Following the Public Information Centre held on June 12, 2019, Wydanco provided general comments related to the proposed right-of-way and the general loss of developable area. The correspondence on file with the City.
- ▶ No further comments about the study process or design concept were received.

Camrost Felcorp Inc.

- ▶ A meeting was held with Camrost representatives on June 12, 2019, at the City of Mississauga, 201 City Centre Drive.
- ▶ The purpose of the meeting was to introduce the study, review early design concepts, discuss stakeholder questions and concerns, and review next steps.
- ▶ During the meeting Camrost provided an overview of future plans for their property located north of Burnhamthorpe Road. The Class EA Study is not anticipated to preclude their plans.

- ▶ Following the Public Information Centre held on June 12, 2019, Camrost provided comments related to the proposed right-in/right-out configuration of the intersection at Burnhamthorpe Road, proposed underground parking beneath The Exchange right-of-way, and the width of the proposed right-of-way. City staff continue to work with Camrost regarding their development plans along The Exchange. The correspondence is on file with the City.
- ▶ Prior to finalizing the Project File a meeting was held with Camrost representatives on July 14, 2020 via teleconference.
- ▶ The purpose of the meeting was to review the recommendations of the EA study and the functional plan for the proposed extension of The Exchange.
- ▶ Following the meeting, the design concept and draft property plan quantifying the area directly impacted by the proposed right-of-way was provided to Camrost.

Camrost did not express concern with the proposed timeframes to wrap up the Class EA Study. It is understood that discussion/consultation will continue amongst City staff and Camrost representatives following the completion of the Class EA Study and moving forward.

6 POTENTIAL IMPACTS, MITIGATION MEASURES AND COMMITMENTS TO FURTHER WORK

6.1 Integration with Future Development

Timing of construction for The Exchange extension is currently not known. It is likely that the construction of the roadway will be coordinated with surrounding development. The City will continue to coordinate with area land owners/developers to ensure that the roadway design and construction do not preclude planned future development.

6.2 Drainage and Stormwater Management

The stormwater management design will appropriately manage water quality and quantity per applicable City of Mississauga and Credit Valley Conservation design criteria. A Ministry of Environment, Conservation and Parks Environmental Clearance Approval (ECA) permit may be required for the new storm sewer system.

6.3 Soils Management

If soil removed during construction is determined to be contaminated, the disposal of contaminated soil must be consistent with Part XV.1 of the Environmental Protection Act and Ontario Regulation 153/04, Records of Site Condition.

6.4 Utilities

The City and any future developments on the proposed extension of Webb Drive will engage with Alectra Utilities, Peel Region and private utility companies to determine needs and coordinate design and installation.

6.5 Noise and Vibration

6.5.1 Noise Assessment

The potential for Noise Sensitive Areas (NSAs) in close proximity to the proposed The Exchange extension was reviewed. There are no NSAs immediately adjacent to the planned roadway since the setting is within vacant land and adjacent to existing parking lots with adjacent office buildings. Any potential NSAs located adjacent to the study area, including nearby existing condominium towers on the existing portion of Webb Drive will have rear yard noise levels dominated by Burnhamthorpe Road, rather than

from The Exchange. Based on this review, a noise assessment for The Exchange was deemed to be not warranted.

6.5.2 Noise During Construction

The potential for construction noise issues will be further reviewed during detailed design when construction methodology and schedule is fully developed. Construction activities will conform to the City of Mississauga Noise Control By-Laws.

All equipment shall be properly maintained to limit noise emissions. As such, all construction equipment will be operated with effective muffling devices that are in good working order.

Through contract/agreements the developer, the City may include a noise complaint system. In the presence of persistent complaints and subject to the results of a field investigation, alternative noise control measured during construction may be required, where reasonably available. In selecting appropriate noise control and mitigation measures, consideration will be given to the technical, administrative and economic feasibility of the various alternatives.

6.5.3 Vibration

The potential of vibration impacts is described qualitatively in this section as there are no current City of Mississauga, provincial or federal guidelines, standards or protocols for assessing vibration.

Lands on either side of the proposed The Exchange extension south of Burnhamthorpe Road are vacant., North of Burnhamthorpe Road, land use consists of existing parking lots and office buildings.

There are no existing land uses considered to be highly sensitive to vibration impact (e.g. sensitive equipment such as electron microscopes, or laboratory with sensitive scientific equipment, etc.).

Once constructed, the main source of vibration from The Exchange would be from truck traffic. However, vehicles with pneumatic tires generally do not create significant levels of vibration except at very short distances. This road will function as a minor collector road serving only the local community and truck traffic volumes will be low, as such, vibration levels to the community are not expected to be perceptible or significant.

6.5.4 Construction Vibration

Some construction activities associated with the road building may at times create vibration levels that are perceptible at nearby land uses. However, the vibration levels produced by the anticipated construction activities will not be large enough to cause structural damage. The potential vibration generated by the building of the road and the surrounding community should be reviewed in detailed design, once construction methodologies and scheduling are developed.

6.6 Air Quality

6.6.1 Air Quality Assessment

An air quality assessment was undertaken to evaluate the potential change in air quality associated with the extension of four downtown roads, including The Exchange. The Air Quality Assessment Technical Memorandum is provided in **Appendix E**.

Based on the findings, background air quality levels for the primary contaminants were below the air quality thresholds, indicating that the ambient air quality in the vicinity of the study area is good. Benzo(a)Pyrene exceeds the threshold, a condition which is common in southern Ontario and not unique to the study area.

The project involves extending The Exchange and includes considerations of improved traffic access and routing options and enhanced access to transit and downtown walkability. As such, no substantial change in road traffic emissions or in existing air quality is expected.

6.6.2 Air Quality During Construction

During construction of the roadway, emissions sources will include construction equipment engines and air borne dust from construction vehicles travelling over exposed soils/unpaved surfaces. These impacts will be temporary, during construction. Due to the temporary nature of construction activities, there are no air quality criteria specific to construction activities. Construction emissions can be mitigated by appropriate maintenance of equipment and proper phasing that minimizes activity on unpaved surfaced.

The Environment Canada “Best Practices for the Reduction of Air Emissions from Construction and Demolition Activities” document provides several mitigation measures for reducing emissions during construction activities. Mitigation techniques discussed in

the document include material wetting or use of chemical suppressants to reduce dust, use of wind barriers, and limiting exposed areas which may be a source of dust and equipment washing.

6.7 Natural Environment

Ministry of Environment, Conservation and Parks (MECP) recommends that non-chloride dust suppressants be applied. MECP also recommends referring to the following publication in developing dust control measures: Cheminfo Services Inc. Best Practices for the Reduction of Air Emissions from Construction and Demolition Activities. Report prepared for Environment Canada, March 2005.

Natural Environment

A vegetation community is present in the study area: Cultural Woodland. The proposed road extension south of Burnhamthorpe Road West will bisect and remove edge habitat within the cultural woodland. This feature is composed of common species with a high proportion of exotic species.

No Significant Wildlife Habitat was confirmed and no Species at Risk were observed during field investigations or background information. Potential habitat for SAR (bats), candidate SWH, and habitat for locally rare species (Grey Catbird) is present (see Section 4) and will be bisected for approximately 130 m of the road construction.

Given the overall low quality of the habitat and small area of removals, these impacts are not anticipated to have a significant impact on the primarily opportunistic species that use these features. Mitigation to avoid direct removal of these species is provided in Section 6 of **Appendix C**.

As removal of this vegetation in the Cultural Woodland can result in vegetation dieback at the edge of retained woodlands due to exposure of the less disturbed treed areas to additional sunlight which can lead to trunk damage (sunscald), increased drying and localized changes in ground flora (e.g. increase in exotic / invasive species). However, the remaining woodland is already highly disturbed and is unlikely to be retained as it is proposed for future development.

The proposed alignment running north of Burnhamthorpe Road West to City Centre Drive would pass through an existing parking lot bordered by streetscaping. No natural features are present within this portion of the road extension.

Preliminary mitigation measures include:

Migratory Bird Breeding and Bat Roosting - To limit potential impacts to SAR birds, and to avoid contravention of the Migratory Birds Convention Act (1994) and its regulations, vegetation removal (including limbing) should not occur during breeding bird season (April 1st to August 31st), unless a survey by a qualified avian specialist (biologist) confirms that there are no active nests within the vegetation to be removed. To limit potential impacts to SAR bats, any tree removals should not occur during the active season (April 1st – September 30th), unless first assessed and determined not to have bat maternity roost potential.

Wildlife and Species At Risk Encounters - Any wildlife encountered during construction will not be knowingly harmed. Any small wildlife stranded within the construction zone will be captured and released by a suitably qualified individual. During construction, the Study Areas should be monitored for SAR as described in this report. Although not anticipated, if other SAR are discovered during construction, all operations will stop, or be modified to avoid negative impacts to SAR until further direction is provided by the Endangered Species Act (ESA) administering body. The contractor or contract administrator will contact the ESA administering body immediately upon the discovery of a Threatened or Endangered species within the Study Areas.

Other mitigation measures will be developed during future design phases.

Based on this review, it is concluded that the proposed road extensions can be undertaken without impacting sensitive natural features and functions. Existing natural features within the Study Areas are limited and highly impacted due to the urban nature of the site, providing limited habitat functions for plant and wildlife species. With the proper implementation of mitigation measures, residual impacts to the identified natural heritage features are anticipated to be minor and manageable. Potential impacts and measures will be further revisited and confirmed at detailed design when grading and construction requirements are further refined.

6.8 Tree Inventory

Tree removals, preservation and mitigation measures are discussed in the Arborist Report provided in **Appendix D**. The City will prepare an appropriate tree compensation/replacement during the design phase.

6.9 Sustainability

The Downtown Core is located within a major designated growth area and identified as an Anchor Hub in the Regional Transportation Plan. The City's objective is to create a high quality, pedestrian friendly, human scaled environment that attracts lasting public and private investment in the Downtown to support existing and planned infrastructure, particularly higher order transit.

The Exchange extension is part of this integrated plan to transform the downtown into a sustainable, compact mixed-use area with multi-modal transportation options that seek to reduce single occupant vehicle use by creating a live-work-play community, linked to a multi-tier public transit system. The new road will result in smaller scaled blocks; the scale of the street is to be narrower with special attention paid to the public realm.

The existing road pattern is made up of super blocks. An expanded road network is proposed that will create an urban pattern of development blocks that are walkable in scale and well connected. The new road network will result in urban scaled blocks, providing routing options for vehicular, servicing and goods movement, pedestrian movement within the Core. The scale of the streets is to be narrower with special attention paid to the public realm.