



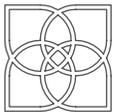
SOUTH YONGE STREET CORRIDOR

Streetscape Master Plan Study *Update*

Phase 5: Implementation Strategy



Consultant



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TABLE OF CONTENTS

1.0 Implementation and Funding Options

- 1.1 Introduction
- 1.2 Defining Implementation
 - 1.2.1 Streetscape Plan
 - 1.2.2 Development Goals For The Corridor
- 1.3 Phasing Plan
 - 1.3.1 Phasing Of Implementation
 - 1.3.2 Framework Of Development Charges
 - 1.3.3 Phase 1 - Short Term: Pre-Subway
 - 1.3.4 Phase 2 - Mid-Term: Subway Construction
 - 1.3.5 Phase 3 - Long Term: Post Subway Construction
 - 1.3.6 Phasing Summary Matrix
- 1.4 Capital Cost And Funding Approaches
 - 1.4.1 Introduction And Assumptions
 - 1.4.2 Standards And Cost Implications
 - 1.4.3 Add-Ons And Defining The Delta Above Standards
 - 1.4.4 Physical Implementation Logistics Plan
 - 1.4.4.1 Step No. 1 – High Level Decision Making
 - 1.4.4.2 Step No. 2 – Preparation Of Pilp And Implementation Packages
 - 1.4.4.3 Step No. 3 – Detailed Implementation Action Plan
 - 1.4.4.4 Funding Model For Implementation
- 1.5 Funding Options
 - 1.5.1 How The Funding Landscape Has Changed
 - 1.5.2 Development Charges Fund Eligibility
 - 1.5.2.1 General Applicability
 - 1.5.2.2 Specifics

- 1.5.3 Section 37 Benefits / Community Benefits Charges (Cbcs)
 - 1.5.3.1 York Region
 - 1.5.3.2 City Of Vaughan
 - 1.5.3.3 City Of Richmond Hill
 - 1.5.3.4 City Of Markham
- 1.5.4 Site Plan Approval
- 1.5.5 Gas Tax Fund
- 1.5.6 Permanent Public Transit Fund
- 1.5.7 Bia Funding Models
- 1.5.8 York region municipal streetscape partnership program
- 1.5.9 York region pedestrian and cycling municipal partnership program
- 1.5.10 Vivanext
- 1.5.11 Alternative funding sources
 - 1.5.11.1 Relative likelihood and associated risks

2.0 Maintenance and Operational Costs

- 2.1 Introduction
- 2.2 Defining maintenance and operations
 - 2.2.1 Existing maintenance costs
 - 2.2.2 Recommended maintenance and operational costs for Yonge Street
 - 2.2.3 Approach to funding

Appendix 1

- Table A: Order of Magnitude Cost Estimate - South Yonge - Ultimate Plan
- Table B: Order of Magnitude Cost Estimate - South Yonge - Pre-Subway Plan
- Table C: Order of Magnitude Operations and Maintenance Cost Estimate South Yonge
- Table D: 2012/2021 Capital / Operations Cost Comparison

Appendix 2: Utilities Location

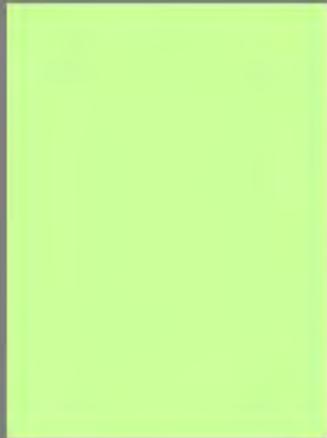
- Public Art Policy Process
 - Policy Recommendations
 - Implementation Recommendations

Appendix 3: Impact of 2021 SYMP Update-- on Existing Development

- Introduction
- Affected Development Applications
 - Plans: Interim Streetscape Constructed, Cash Payout On Ultimate
 - Plans: Ultimate Streetscape Constructed
 - Plans: Ultimate Streetscape Under Review, Not Yet Constructed / Approved



IMPLEMENTATION AND FUNDING OPTIONS



1. Implementation and Funding Options

1.1 INTRODUCTION

This component of the Master Plan deals with:

- the implementation strategy and funding for capital development;
- the often-over-looked aspects of the on-going costs of operations and maintenance.

Capital costs for the implementation of the Ultimate Plan development as well as the Pre-Subway plan are identified. These are compared with the costs for achieving the existing streetscape policy for Regional roads on an incremental basis. Potential funding sources, partnerships and coordination requirements are also identified and evaluated relative to their application to the Master Plan.

This report also proposed an alternative option, in addition to the incremental Implementation one as detailed in this report. This option is based on a bolder and more robust approach to implementation through a proactive Physical Implementation Logistics Plan (PILP). As detailed in Section 1.4.4, this plan will identify logical and critical construction sequences of major components within the structure of the proposed Streetscape Master Plan Update while guided by a more compressed and integrative Work Plan/Project Schedule. This approach will obviously need to be integrated with creative financial and funding strategies through identifying and leveraging forth-coming federal

fund of \$400 million over five years dedicated to building active transportation throughout Canada. This fund was announced by the Honourable Catherine McKenna, Minister of Infrastructure and Communities on March 12, 2021 in Ottawa. Specifically identified, this fund will help communities building new and expanded networks of pathways, cycling facilities, rails and pedestrian bridges.

To achieve success, it is also very important to identify anticipated operational and maintenance costs for the Streetscape Master Plan Update to ensure that it is maintained as the premium urban corridor of York Region. Potential funding sources, partnerships and related coordination requirements are also identified and integrated into the implementation process.

1.2 DEFINING IMPLEMENTATION

Updating of the Streetscape Master Plan for South Yonge Street is based on a comprehensive, research and stakeholder-driven process to implement new directions given by York Region to integrate on boulevard cycling facilities within the study corridor. The study area covers the Yonge Street corridor from Steeles Avenue in the south to Garden Avenue in Richmond Hill, north of Highway 7.

Since the completion of the South Yonge Street Corridor Streetscape Master Plan (SYMP) in 2012, some implementation

of the new streetscape has been completed. Updating of the 2020 SYMP continues to articulate and strengthen a vision of the Ultimate Plan for streetscape development based on the assumption that the Yonge North Subway Extension be extended north from Finch Station to Richmond Hill Centre. It is expected that the process for approval, funding, design and construction of the Yonge North Subway Extension will be accomplished over a 10-15 year period. However, in the interim, development and re-development is expected to continue, thereby creating increased commercial and residential densities with the accompanying demand for infrastructure requirements for pedestrians, transit, cycling and community development amenities and facilities. Moreover, with impacts of Covid 19 on daily life, public support on intensifying implementing safe and secure cycling facilities has gained momentum over placing priority on vehicular movements. To keep pace with this anticipated development, implementation of the streetscape plan in the period before the Yonge North Subway Extension construction will be an important consideration.

Implementation of the Master Plan will require an integrated approach where York Region, the local municipalities and a broad spectrum of stakeholders including a variety of utilities (Power Stream, Ontario Power, communications and gas companies, etc.) Highway 407 ETR, OneT+ and Metrolinx, TRCA, existing and future land owners, developers, and the business community

1. Implementation and Funding Options

will be required to undertake a coordinated effort to complete this significant initiative in building the primary urban corridor of York Region. To achieve and maintain momentum of implementation of the proposed Master Plan, provision of strong leadership by York Region is crucial.

1.2.1 STREETScape PLAN

The Streetscape Master Plan Update envisions a Bold, Sustainable and Achievable public streetscape strategy for Yonge Street. The plan is based on a “Linked District Concept” composed of a series of distinctive character areas that are linked to form a strong and cohesive overall streetscape identity. The plan suggests major enhancements to the boulevards including safe and secured cycling facilities, broad sidewalks, vigorous street tree planting, distinctive street lighting, unique wayfinding signage and street furnishings as well as excellence in public art. The plan contributes significantly to creating a sustainable environment for the public realm that is supported by green technologies including integrated stormwater management, minimization of the urban heat island effect, utilization of local materials, use of native plantings as much as possible and other similar strategies that will help leverage and encourage LEED and SITES – certified development along the corridor. Finally, it is an achievable plan that will be partially buildable in the pre-subway period.

1.2.2 DEVELOPMENT GOALS FOR THE CORRIDOR

The South Yonge Street Corridor represents a major Regional Intensification Corridor between the City of Toronto and Richmond Hill Centre. The Corridor is planned to attract significantly higher densities throughout its length with integrated Transit-Oriented Development (TOD). The Streetscape Plan is developed to respond to the planned densities and to inform future development relative to place making opportunities, urban design, amenities and design quality. This updated Master Plan has also placed heavy emphasis on integrating cycling facility within the boulevard to increase users level of safety and comfort.

1. Implementation and Funding Options

1.3 PHASING PLAN

1.3.1 PHASING OF IMPLEMENTATION

The phasing of implementation of the South Yonge Street Corridor Streetscape Master Plan Update is contingent on a number of assumptions, funding and time-related factors. Without a clearly established construction schedule and also for ease of discussion, a reasonable three-phase program of implementation has been conceptually established that is related to construction of the Yonge North Subway Extension extension from Finch Station to Steeles in the City of Toronto and then from the Yonge-Steeles Station to Richmond Hill Centre in York Region. The three phases are:

- Phase 1 – Short Term: Pre-Subway ■ ■
- Phase 2 – Mid-Term: Subway Construction ■ ■
- Phase 3 – Long Term: Post Subway Construction
- vivaNext BRT (already installed) ■

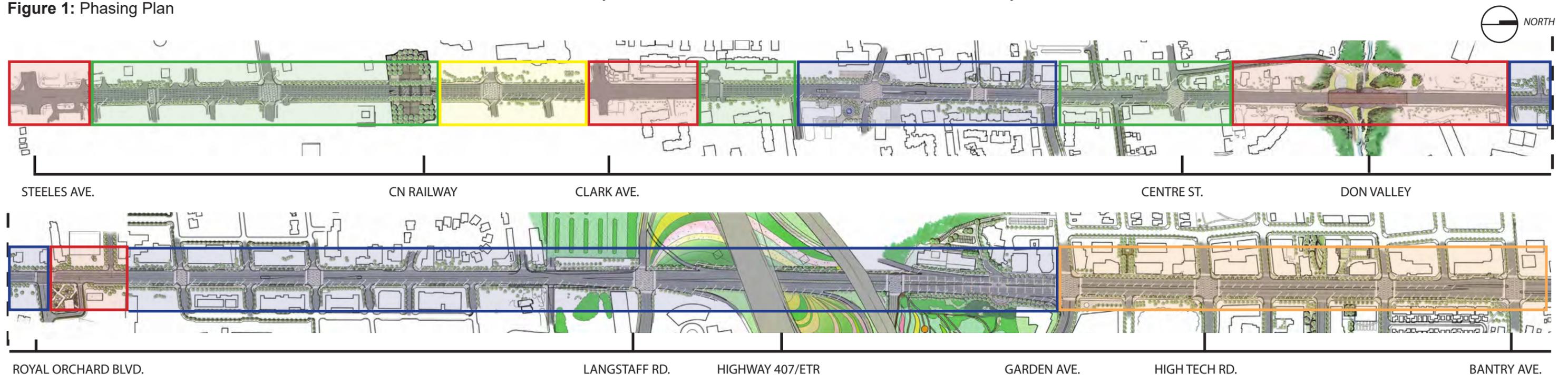
The three phases have been qualified with a time factor in years starting from project initiation based on the understanding that design and construction of the Yonge North Subway Extension will theoretically require up to ten years from start to finish based on the Subway

Environmental Assessment. The actual time may differ from this assumption, but the relative phasing would remain relevant for implementation of the Streetscape Master Plan Update.

1.3.2 FRAMEWORK OF DEVELOPMENT CHARGES

Development Charges are imposed by the Region for all new development (residential and non-residential lands, buildings, and structures). Charges are imposed at the time of development approvals and reflect the provisions of the Development Charges Act, 1997.

Figure 1: Phasing Plan



1. Implementation and Funding Options

The 2017 Region-wide Development Charges By-law (No. 2017-35) is enabled to recuperate costs associated with York Region's growth-related infrastructure for a development program. There are two other area-specific development charges: covering sanitary sewage servicing in Nobleton as well as an area specific charge to cover York Region's share of growth-related capital cost for GO Transit services.

There is no area-specific development charge designation for the Yonge Street Corridor, however, there are strategies that York region should pursue with the Province's approval such as treating the Yonge North Subway Extension as a discreet service which will allow York Region to collect development charges from developers along the Yonge Street Corridor once the Development Charges By-law is updated.

1.3.3 PHASE 1 - SHORT TERM: PRE-SUBWAY

The first phase of implementation of the Streetscape Master Plan Update is envisioned to commence when implementation funding is available.

Assumptions and Principles

- The ultimate Streetscape Master Plan Update design is based on the proposed Yonge North Subway Extension transit system being implemented in accordance with the scope of the work for the Yonge North Subway Extension (YNSE) as envisioned

during the preparation of the 2012 SYMP. This Updated Master Plan will serve as a tool for York Region and its local municipalities on the subway station integration and that flexibility will need to be exercised depending on the ultimate subway design.

- The Yonge North Subway Extension construction will continue throughout the study area from Steeles Avenue to Royal Orchard based on the most current Reference Design Concept from Metrolinx (March 2021)
- Yonge North Subway Extension design work will continue to evolve;
- Transit system being implemented;
- York Region will continue to protect the public right-of-way for future transportation needs;
- Existing roadway infrastructure and curb alignments will continue to be used until the Ultimate Plan / streetscape cross sections are achievable;
- Implementation of the Streetscape Master Plan Update will strive to minimize "throw-away costs" and to build for the long term where possible;
- Candidate areas for early implementation of the Streetscape Master Plan Update are identified based on the continued use of existing curb alignments and areas where subway tunnelling method of construction is contemplated;
- Based on previous assumption, allow for subway construction

activity at areas designated for open cut construction, generally occurring at subway stations and the Don River Bridge area based on Metrolinx's Final Yonge North Subway Extension Design— these will be "no build zones" for streetscapes until after subway construction at these sites is completed;

- New development along the South Yonge Street corridor will continue to occur and the Streetscape Master Plan Update will provide direction relative to streetscape design guidelines within the public realm as well as urban design and built form guidelines on adjacent private development sites;
- York Region and local municipalities will provide commitment to implementation of the Streetscape Master Plan Update for South Yonge Street.

Strategies and Initiatives

- Alignment and harmonization of the Regional and Municipal Official Plans, Richmond Hill Centre – Langstaff Transportation Study, Zoning By-laws and DC By-Law Update and Design Guidelines should be sought relative to South Yonge Street based on the approved Streetscape Master Plan Update;
- Coordination among the various utilities should be pursued in order to establish a mutually satisfactory arrangement and alignment of utilities relative to achieving the streetscape design for South Yonge Street. This may include:
- Formation of a Public Utilities Coordinating Committee (PUCC) as a vehicle for the long term coordination of utility locations,

1. Implementation and Funding Options

future development applications, servicing and maintenance procedures;

- Establish a “no-disturbance” moratorium policy (of approximately 5 years) relative to completed streetscape works.
- On-going discussions, coordination and negotiation with stakeholders such as the Highway 407 ETR relative to streetscape enhancements through the highway corridor, VivaNEXT relative to implementation of the Bus Rapid Transit (BRT) in Richmond Hill, Alectra relative to the removal of overhead wires and the coordination of electrical services for future undergrounding and CN Rail relative to the decking-over of the CN rail corridor north of Steeles Avenue for an urban parkette adjacent to the street;
- Continue to discuss, coordinate and negotiate detailed operational and maintenance agreements between York Region, the local municipalities and the Highway 407 ETR;
- Initiate a process to establish a harmonized public art policy between York Region and the municipalities that will require public art installations as part of the development process for both public realm and private realm projects. Refer to Appendix B – Public Art Policy Process;
- Leverage funds from the Region’s Development Charges By-law Urbanization line item to implement the ultimate cross section not otherwise being improved through a major capital project;
- Establish and package funding sources and mechanisms for

Capital and Operations / Maintenance costs;

- Pursue and leverage federal and provincial grants that support the implementation of the Streetscape Master Plan Update in whole or in part;
- Finalize and confirm with Metrolinx’s early implementation priorities with regard to Yonge North Subway Extension phasing and identification of the extent of construction impact on candidate streetscape development areas. Implementation of Streetscape Development will be phased accordingly.

Design and Construction

- Continue to coordinate with Yonge North Subway Extension design as it moves forward relative to candidate streetscape development areas;
- Coordinate with private development applications especially at subway station areas where there are opportunities to integrate subway stations with private development sites such as the Yonge Steeles Centre, the Langstaff-Longbridge;
- Prepare detailed streetscape designs including schematic design, design development, cost estimates, working drawings and contract documents for the areas where early development of the streetscape works are confirmed possible.

1.3.4 PHASE 2 - MID-TERM: SUBWAY CONSTRUCTION

The second phase of implementation of the Streetscape Master Plan Update would commence upon initiation of construction of the Yonge North Subway Extension.

Assumptions and Principles

- The Yonge North Subway Extension construction will continue throughout the study area from Steeles Avenue to Royal Orchard based on the most current Reference Design Concept from Metrolinx (March 2021);
- Early implementation of the Streetscape Master Plan Update at candidate areas will occur generally where existing curb locations are close to ultimate alignments, where tunnelling construction methods for the Yonge North Subway Extension are contemplated;
- Areas designated for open cut construction, generally occurring at subway stations and the Don River Bridge area, based on Metrolinx’s Final Yonge North Subway Extension Design, will become available for streetscape construction after subway construction at these sites is complete;
- New development along the South Yonge Street corridor will continue to occur and the Streetscape Master Plan Update will provide direction relative to streetscape design guidelines within the public realm as well as urban design and built form guidelines in support of municipal guidelines on adjacent private development sites.

1. Implementation and Funding Options

Strategies and Initiatives

- Continue to coordinate and harmonize Regional and Municipal Official Plans, Richmond Hill Centre – Langstaff Transportation Study, Zoning By-laws and Design Guidelines relative to South Yonge Street based on the Streetscape Master Plan Update;
- Continue to coordinate among the various utilities in order to maintain a mutually satisfactory arrangement and alignment of utilities relative to achieving the streetscape design for South Yonge Street, including:
- A Public Utilities Coordinating Committee (PUCC) as a vehicle for the long term coordination of utility locations, future development applications, servicing and maintenance procedures;
- Continue discussions, coordination and negotiation with stakeholders such as Highway 407 ETR relative to streetscape enhancements through the highway corridor, Alectra relative to the removal of overhead wires and the coordination of electrical services for future undergrounding, City of Toronto relative to the gateway at Steeles Avenue and CN Rail relative to the decking-over of the CN rail corridor north of Steeles Avenue for an urban parkette adjacent to the street;
- Finalize negotiations for detailed operational and maintenance agreements between York Region, the local municipalities and the Highway 407 ETR;

- Continue to leverage funds from the Region's Development Charges By-law Urbanization line item to implement the ultimate cross section not otherwise being improved through a major capital project;
- Continue to pursue and leverage federal and provincial grants that support the implementation of the Streetscape Master Plan Update in whole or in part;
- Continue to expand and develop funding sources and mechanisms that will ensure implementation of the Streetscape Master Plan Update.

Design, Construction and Operations

- Continue to monitor implementation priorities with regard to Yonge North Subway Extension phasing and identification of the extent of construction impact on candidate streetscape development areas;
- Continue to coordinate with Yonge North Subway Extension construction as it moves forward relative to candidate streetscape development areas;
- Continue to coordinate with private development applications especially at subway station areas where there are opportunities to integrate subway stations with private development sites such as the Yonge Steeles Centre, the Langstaff-Longbridge development and others as required;
- Continue to coordinate with BRT infrastructure design in the

Richmond Hill Centre area north of Highway 7 to Bantry Avenue relative to implementation of the Streetscape Master Plan Update;

- Continue to prepare detailed streetscape designs including schematic design, design development, cost estimates, working drawings and contract documents for the areas where mid-term development of the streetscape works are confirmed possible as Yonge North Subway Extension construction is completed;
- Continue to operate and maintain existing streetscapes.

1.3.5 PHASE 3 - LONG TERM: POST SUBWAY CONSTRUCTION

The third phase of implementation of the Streetscape Master Plan Update would be carried out upon completion of the Yonge North Subway Extension construction. However, it should be noted that there may be aspects of this phase that may be undertaken earlier provided that construction has been completed and other agreements are in place.

Assumptions and Principles

New development along the South Yonge Street corridor will continue to occur and the Streetscape Master Plan Update will provide direction relative to streetscape design guidelines within the public realm as well as urban design and built form guidelines in support of municipal guidelines on adjacent private development

1. Implementation and Funding Options

- municipalities and the Highway 407 ETR;
- Continue to leverage funds from the Region's Development Charges By-law Urbanization line item to implement the ultimate cross section not otherwise being improved through a major capital project;
- Continue to leverage funds from the Region's Development Charges By-law Urbanization line item to implement the ultimate cross section not otherwise being improved through a major capital project;
- Continue to expand and develop funding sources and mechanisms that will ensure implementation of the Streetscape Master Plan.

Design, Construction and Operations

- Continue to monitor implementation priorities and opportunities with regard to the CN Rail, Don River Bridge, 407 ETR and Hydro lands;
- Continue to coordinate with private development applications as required;
- Prepare detailed streetscape designs including schematic design, design development, cost estimates, working drawings and contract documents for the areas where long-term development of the streetscape and associated works are confirmed possible after subway construction is completed including the CN Rail deck, Don River Bridge and 407 ETR and

- Hydro lands;
- Continue to operate and maintain existing streetscapes.

1. Implementation and Funding Options

1.3.6 PHASING SUMMARY MATRIX

PHASE	CATEGORY	TASK	LEAD	STAKEHOLDERS										
			York Region	City of Vaughan	City of Markham	City of Richmond Hill	407 ETR	TTC	VivaNEXT	Alectra Utilities	City of Toronto	CN Rail	Hydro One	Business Community
1	Strategies and Initiatives	Align + Harmonize Plans		○	○	○						○		
		Coordinate Among Utilities								○			○	
		Discussion, Coordination + Negotiation w/ Stakeholders		○	○	○	○			○	○		○	
		Discuss O + M Agreements		○	○	○	○					○		○
		Process for Public Art Policy		○	○	○	○					○		○
		Establish Funding Sources + Mechanisms		○	○	○								○
		Confirm Early Implementation Priorities		○	○	○								
	Design and Construction	Coordinate w/ Subway Design		○	○	○			○			○		
		Coordinate w/ Private Developers		○	○	○								○
		Coordinate w/ BRT Design				○				○				○
		Prepare Detailed Streetscape Designs												
2	Strategies and Initiatives	Continue to Align + Harmonize Plans		○	○	○						○		
		Continue Utility Coordination		○	○	○			○		○			○
		Continue Stakeholder Coordination		○	○	○	○			○	○		○	
		Finalize O + M Agreements		○	○	○	○					○		○
		Establish Harmonized Public Art Policy		○	○	○	○					○		○
		Expand + Develop Funding Sources + Mechanisms		○	○	○								○
	Design and Construction	Continue to Monitor Implementation Priorities		○	○	○								
		Continue to Coordinate w/ Subway Construction		○	○	○			○			○		
		Continue to Coordinate w/ Private Developers		○	○	○								○
		Continue to Coordinate w/ BRT Design				○				○				
		Continue Detailed Streetscape Designs												
		Operate + Maintain Existing Streetscape		○	○	○	○						○	

1. Implementation and Funding Options

PHASE	CATEGORY	TASK	LEAD	STAKEHOLDERS										
			<i>York Region</i>	<i>City of Vaughan</i>	<i>City of Markham</i>	<i>City of Richmond Hill</i>	<i>407 ETR</i>	<i>TTC</i>	<i>VivaNEXT</i>	<i>Alectra Utilities</i>	<i>City of Toronto</i>	<i>CN Rail</i>	<i>Hydro One</i>	<i>Business Community</i>
3 <i>Post-Subway Construction</i>	Strategies and Initiatives	Continue to Align + Harmonize Plans		○	○	○					○			○
		Continue to Coordinate Among Utilities		○	○	○				○				○
		Finalize Implementation + Operational Negotiations w/ Stakeholders		○	○	○	○		○	○		○	○	
		Finalize O + M Agreements		○	○	○	○				○			○
		Continue Process for Public Art Policy		○	○	○	○							○
		Continue to Expand + Develop Funding Sources + Mechanisms		○	○	○								○
	Design and Construction	Monitor Implementation Priorities + Opportunities		○	○	○								
		Continue to Coordinate w/ Private Developers (as required)		○	○	○								○
		Prepare Detailed Streetscape Designs												
		Continue to Operate + Maintain Existing Streetscape		○	○	○	○			○				○

1. Implementation and Funding Options

1.4 CAPITAL COST AND FUNDING APPROACHES

1.4.1 INTRODUCTION AND ASSUMPTIONS

The approach to the preparation of construction and operational costs associated with the implementation of the Streetscape Master Plan for South Yonge Street is based on the identification of the incremental costs associated with the proposed streetscape works relative to the existing cost base of the Region's streetscape policy. The estimate of probable capital cost of construction of the Streetscape Master Plan is based on the Ultimate and Pre-Subway plans for the anticipated streetscape works illustrated in the Master Plan. These preliminary estimates are qualified based on several factors:

- Design – the master plan conceptual drawings and sketches illustrate key dimensions and materials, but not all specific conditions throughout the study area;
- Technical – the master plan represents a new design with some application of R+D components relative to several components such as planting, paving, drainage and other features;
- Cost – unit costs are taken from specific experience with other similar projects in York Region (2020 dollars).

Together, these factors provide an overall level of accuracy of approximately $\pm 20\%$. Based on this, the anticipated cost for the Streetscape Master Plan includes a 20% contingency.

1.4.2 STANDARDS AND COST IMPLICATIONS

Three existing standards and associated costs within York Region have been reviewed. These include streetscapes without medians, streetscapes with medians, and enhanced streetscapes, such as those included in the VivaNext projects.

Capital Costs – Existing Streetscape Policy (per km)

The costs are based on 2011 Urban Cross Section from Transportation Services, Roads – Capital Delivery. By applying the rates of CPI since 2011, the total 2020 cost for streetscapes without a median is approximately \$0.8 million / km, while the total cost with a median is \$2.1 million / km. These figures exclude the cost of utilities.

Capital Costs – Enhanced Streetscapes (per km)

Enhanced streetscape costs within the Region (i.e. VivaNext projects) amount are updated to 2020 dollars, approximately \$7.0 - \$8.2 million / km. These enhanced streetscape costs include substantial upgrades from the other existing standards in terms of quality of materials and design.

Proposed Standards for Yonge Street

The proposed standards for the 2020 Yonge Street are based on the Streetscape Master Plan for South Yonge Street predicated on the construction of the Yonge North Subway Extension from Finch to Richmond Hill Centre. As the “Main Street” for York Region, this updated Streetscape Master Plan for South Yonge Street continues

to envision a modern, vibrant, multi-functional urban streetscape integrated with safe and secure cycling facilities and flanked by a variety of land uses including medium to high density residential, at-grade retail and commercial uses, as well as the protection and enlargement of existing heritage areas. The proposed streetscape standards and associated capital costs for Yonge Street reflect this character. The capital costs are detailed in Appendix 1; Table A – Order of Magnitude Capital Cost Estimates: South Yonge Street Corridor Streetscape Master Plan – Ultimate Plan and Table B – Order of Magnitude Capital Cost Estimate: South Yonge Street Corridor Streetscape Master Plan - Pre-Subway Plan.

The Order of Magnitude Capital Cost Estimates for the full build-out of the Streetscape Subway Plan (Ultimate) is approximately \$58 million (+ HST) excluding contingency, soft costs, underground power distribution and other utilities, and public art. This amounts to an average cost of \$12 million per km.

The order of magnitude cost estimate for the Streetscape Pre-Subway Plan is approximately \$55 million (+HST), excluding contingency, soft costs, underground power distribution and other utilities and public art.

The cost of underground power distribution was investigated for the section of Yonge Street from Steeles Avenue to Highway 407 in a report entitled: Yonge Street Overhead Power Distribution

1. Implementation and Funding Options

System Relocation Report, prepared by Giffels Associates Limited in 2007. The final options and associated order of magnitude cost estimates are summarized below escalated to 2020 dollars:

- Totally underground solution \$63,000,000
- Partially underground / overhead solution \$30,100,000 (underground distribution in heritage area)
- Relocated overhead solution \$4,392,500 (plus removals and relocation of other service attachments – Bell, Telus, streetlights, etc)

The costs for these options are based on a coordinated construction process for the power distribution construction of the previously proposed BRT development and streetscape redevelopment comparable to that contemplated in the Streetscape Master Plan.

As a long term visionary planning and design document, the Streetscape Master Plan recommends that power distribution and other associated utilities be relocated to a totally underground solution to support the higher order streetscape vision. Though this bold recommendation is costly, in the long term however, the increased development densities and multi-purpose streetscape envisioned along the Yonge Street Corridor makes the underground solution much more functional and attractive, but at a higher cost. There is, however, a major opportunity within the Yonge North

Subway Extension and streetscape projects to reduce the cost differential between overhead and underground solutions installations in that the roadways and boulevards are being substantially re-configured so that the underground construction could be integrated with other civil works thus causing less disruption and reducing associated capital costs. The feasibility and costs of constructing the required underground ducts during the development of the streetscape works should be investigated further to explore the potential benefits and cost savings.

- 20 ducts encased in concrete @ \$2,755 / 1m (x4.74 kilometres length) equals a total of \$13.06 million + 20% + HST (13%) = \$17.71 million

There are many benefits of constructing the underground ducts during the development of the streetscape. These include:

- Substantial cost savings and reduced throw-away costs;
- The pre-planning for hydro is done early in the process;
- Minimizes the potential disruption of future construction;
- Reduced conflicts with high density private development and streetscape components;
- Major aesthetic quality enhancement to portrait an inviting, modern and contemporary image of York Region and its surrounding municipalities.



Figure 2: Installation of Duct Banks during Streetscape Construction

1.4.3 ADD-ONS AND DEFINING THE DELTA ABOVE STANDARDS

Yonge Street is a primary urban corridor which has an elevated level of streetscape treatment from other regional roads, as specified in the York Region Streetscape Policy (2001) and its latest edition. The resulting enhancements and costs envisioned by the Master Plan (\$4.8 million) are considerably higher than the existing enhanced streetscape capital costs for Regional Roads as stated above.

The costs of development of the Streetscape Master Plan for South Yonge Street represent a significant enhancement and upgrade to existing streetscape standards for York Region for several reasons.

1. Implementation and Funding Options

- Proposed large scale Transit Oriented Development (TOD) with major density increases along the corridor;
- Conversion of South Yonge Street to a subway route with construction of the Yonge North Subway Extension from Finch Station to Steeles Station and then north to Richmond Hill Centre;
- Yonge North Subway Extension development is planned to reduce amount of vehicular commuter traffic on Yonge Street;
- Development of Yonge Street as a multi-purpose street featuring upgrade transit, protected cycling facilities, enhanced pedestrian realm, safe and vibrant street life;
- The Master plan is envisioned as a series of character districts with unique features and components within an overall consistent design framework;
- Design incorporates sustainability measures consistent with LEED and SITES standards;
- Design supports integration of a public art policy and installations (though not included in the cost estimates).

By another measure, these costs compare favourably to other recent major urban streetscape projects including a similar street project along Bloor Street in Toronto and a main street project in the small Ontario City of Grand Bend. The costs, in 2012 dollars, of these projects are as follows:

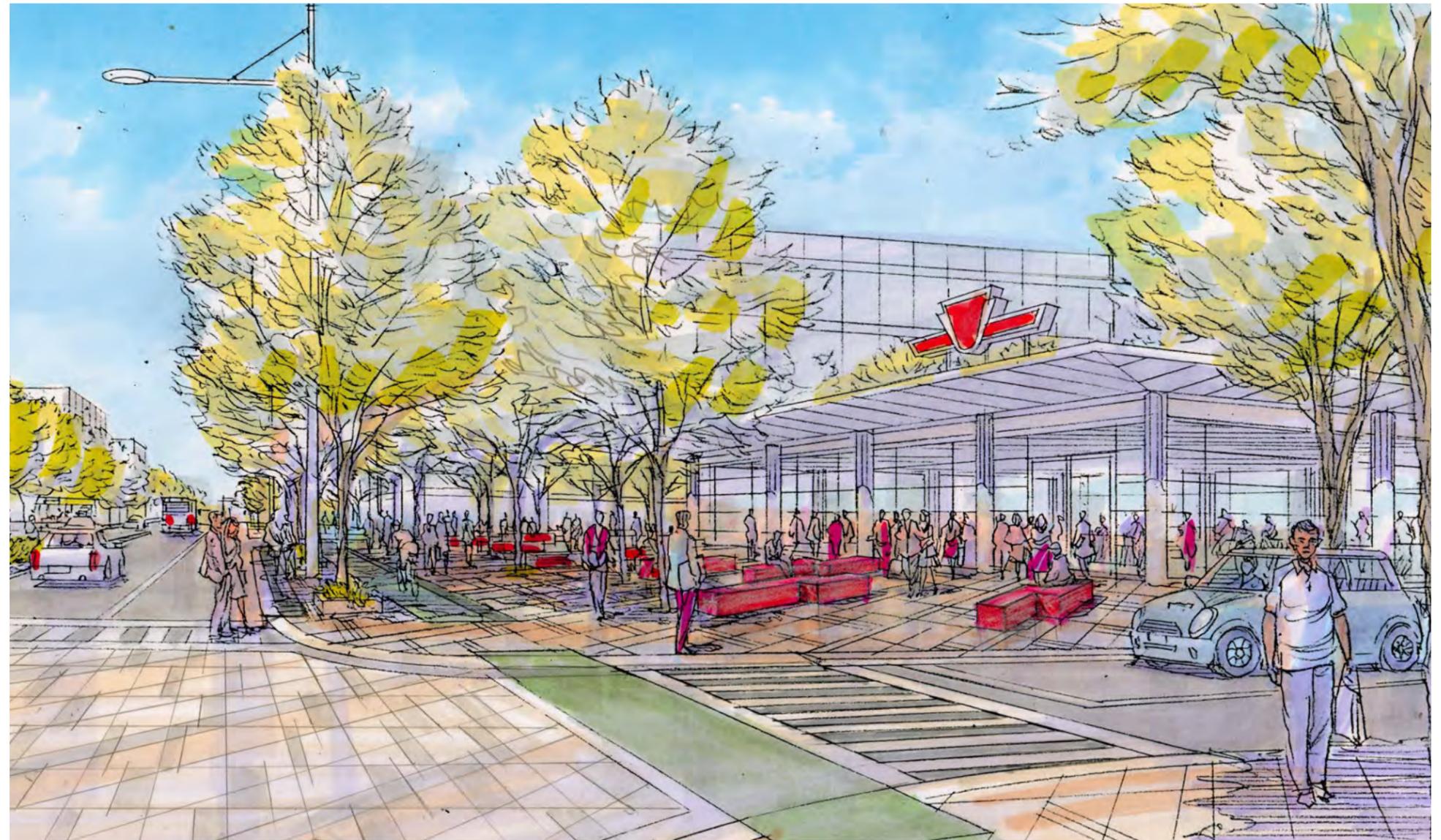


Figure 3: Artist's rendering of Yonge Street as a multi-purpose

1. Implementation and Funding Options

Bloor-Yorkville BIA: Bloor Street, Church Street to Avenue Road, Toronto, Ontario

- Approximately 2.0 km of similar scale envisioned in the Yonge Streetscape Master Plan.
- Cost: \$23 - \$28.6 million overall / \$14.2 million per km

Main Street, Grand Bend, Ontario

- Approximately 0.70 km of a smaller scale street, though of a similar quality envisioned in the Yonge Streetscape Master Plan.
- Cost: \$3.5 - 4 million overall / \$5.7 million per km



Figure 4,5,6 & 7 : Bloor Street Revitalization Imagery



Figure 8,9,10 & 11: Grand Bend Main Street Revitalization Imagery

1. Implementation and Funding Options

1.4.4 PHYSICAL IMPLEMENTATION LOGISTICS PLAN

With the support of the above detailed strategic process, a robust implementation option of the Master Plan can be achieved through a well thought out Physical Implementation Logistics Plan (PILP). With the announcement, by the Honourable Catherine McKenna, Minister of Infrastructure and Communities on March 12, 2021 in Ottawa, of federal fund of \$400 million over five years dedicated to building active transportation throughout Canada, this robust and proactive plan will be an effective tool to leverage this opportunity for the implementation of the master plan in addition to the gradual and incremental approach as advocated in the 2012 Master Plan through private sector development charges and other partnership funding and conventional annual transportation corridor operation and maintenance funding resources as identified in the next Section.

This proactive Implementation Plan is developed based on our knowledge and experience with how major projects such as this one are physically implemented. It also focuses on the approvals of major policy decisions relating to this 2020 SYMP that York Region has to achieve prior to putting this PILP into action. Concurrently, major structural-forming components within the streetscape development and their sequential installation process also have to be identified and structured into a comprehensive Work Plan / Project Schedule. Following is a detailed description of the PILP.

1.4.4.1 Step No. 1 – High Level Decision Making

The first and the most important step to be taken, prior to any physical implementation of the Streetscape Master Plan, would have to be initiated by Council of York Region through the following decisions:

- **Political Leadership:**
 - Given that Regional Council has already approved the 2012 SYMP, senior staff shall take the next step to approve the proposed “Right Sizing of Vehicle Lanes” as recommended in the Updated 2020 SYMP or the latest best practice;
 - A South Yonge Streetscape Implementation Advisory Committee (SYSIAC) should be established to spearhead the application and consolidation of various human and financial resources to guide the implementation process closely. This Committee will consist of representative from York Region, representative from and adjacent municipalities, a senior staff from York Region and external advisors with the background and knowledge in implementing large scale infrastructural facilities. The Committee will then be authorized to work closely with senior staff members each of the adjacent municipality to pursue, identify and secure any new and forthcoming federal/provincial funding opportunities as well as consolidating existing funding mechanism as detailed in

the following Section.

- A SYMP Implementation Committee (SYMPIC) headed by a senior staff shall prepare a Detail Physical Implementation Logistics Plan identifying funding resources for a quick start, critical tasks and milestone dates structured within a critical path schedule.

1.4.4.2 Step No. 2 – Preparation of PILP and Implementation Packages

The following identifies major components for construction within the structure of the Master Plan that require logical sequential implementation. It is also a conceptual framework upon which a detailed Physical Implementation Logistics Plan can be further developed in details.

a) Component No. 1:

- **Design and Funding Sources Identification**
 - **Implementation Funding Resources Consolidation:** Identify and consolidate funding resources as described in the following Sections including funding around station areas in concert with Metrolinx Yonge North Subway Extension (YNSE) project through coordinating with City of Toronto.
 - **Curbs & Gutters and Catchbasins:** The approved Master Plan must be used as a basis and design principle

1. Implementation and Funding Options

and further developed through detailed technical and functional traffic engineering analysis and optimal integrated streetscape and engineering design solutions, throughout the project corridor, of the alignment, median and intersection design, lay-by parking bays and bus/transit stops. This would create a cohesive physical structure, from the new curb and gutter to the private property boundaries, along the project corridor, to ensure sufficient spaces are available for the installation of other major streetscape components within the Construction Phasing Plan. The new curb alignment will require new catchbasins, the existing catchbasin manholes will be converted to manholes, and the existing storm sewer will remain in place. It should be noted that the new curb alignment will trigger possible reconstruction of the lane configurations as dictated by the painted lines.

- **Relocation of utilities:** Conflicts between the new alignment of curbs and gutters and above and underground utilities shall be identified, evaluated and resolved with preparation of a Utilities Relocation Plan which will identify locations of concrete encased duct bands for future installation of utilities; Existing hydro poles will require relocation optimally to their ultimate location. This work can take place concurrently with the new curb construction identified above.

- **Deep Services (Sanitary and Watermain):** In some cases watermains and sanitary sewers exist within the boulevard. In cases where they conflict with above ground features (i.e. hydro poles, light standards, transformers, etc.) they should be relocated to the roadway or an alternate alignment.
- **LIDs:** The LID features identified for this project, namely the exfiltration trench, will require underground infrastructure such as a gravel trench wrapped in filter cloth that is connected to the storm sewer. This work must precede any above ground works within the boulevards (i.e. cycle path, walkway, street trees planting, etc.)
- **Funding Identifications:** Funding Options as detailed in Section 1.5 will be examined, identified and applied to the implementation of this component. It is important to piggy-pack various funding programs to enable full implementation of these components.

b) Component No. 2:

- **Design and Funding Sources Identifications**
 - **Cycling Facilities and Continuity Strip:** Detailed Layout. Grading and Paving design and specification of these elements will be developed within the boulevard including through intersections in accordance with the approved Master Plan;
 - **Relocation of Street Light Fixtures:** Prepare functional,

thematic, and photometric lighting plan for the project corridor, accounting for existing lighting to remain and new lighting that will be installed;

- **Funding Identifications:** With the potential forthcoming federal and provincial infrastructure development funding, and dependant on a successful grant application, cycling facilities have the potential to be constructed either in their entirety or in segments over a compressed period of time. Associated signage and accessories related to the cycling facilities can also be installed under the same funding program - this would be determined by the specifics of the application and successful grant amount. Refer to following Sections for details.

c) Component No. 3:

- **Design and Funding Source Identifications**
 - **Pedestrian Clearway:** This component is closely related to frontages of private properties. Consultation with private property owners must be conducted to ensure integration of the new public pedestrian clearways with existing or proposed site and landscape development within building setbacks and easements, parkettes and urban squares where recommended in some Districts within the Master Plan shall be considered and integrated. Ideally, this major component should be Implemented as one contract package if funding

1. Implementation and Funding Options

is available. However, with the establishment of the curbs and gutters and the cycling facilities, it can be implemented in several phases in accordance with the design guideline of the Streetscape Master Plan Update.

- **Softscape Installation:** Where plantings on grade are recommended, softscape can also be installed followed by the installation of an automatic drip irrigation system. Remainder of the Amenity Zone can be sodded until full installation of Amenity Zones throughout the corridor.
- **Funding Identifications:** Funding Options as detailed in Section 1.5 will be examined, identified and applied to the implementation of this component. It is important to piggy-pack various funding program to enable full implementation of these components.

d) Component No. 4:

• Design and Funding Source Identifications

- **Amenities Zone:** Amenities Zones as documented in the Master Plan can be implemented ideally in their entirety or in phases when funding is available. Within these zones, unit pavings at various locations including lay-by parking bays and bus / transit stops, raised planters, site furniture and signage can be installed.
- **Funding Identifications:** Traditionally, funding for the implementation of these elements would come from various sources including private development charges,

regional and municipal street planting and maintenance programmes, BIA contributions and other sources as stated in the Section below. However, it is important to investigate the feasibility of consolidating these funding sources into one account under the supervision and control of the SYSIAC.

1.4.4.3 Step No. 3 – Detailed Implementation Action Plan

• Preparation of a Detailed Implementation Plan

- The following Funding Model for Implementation will be adopted as a basis to formulate a high-level conceptual Implementation Plan. This Plan will be the foundation upon which a detailed Implementation Action Plan can be built through innovative bundling up of existing and potential funding when available and assembled. This Action Plan will then be a blue print for the systematic execution of implementation of the 2020 SYMP.
- For continuous encouragement, support, monitoring and guidance of the implementation process, it is recommended that an Implementation Steering Committee consisting of representatives from council, senior staff members from key departments within York Region and adjacent municipalities be established. This Committee, authorized by Council, will work closely with various professional consultants throughout the entire duration of the implementation of the 2020 SYMP.

1.4.4.4 Funding Model for Implementation

In determining the key sources of funding for the capital costs identified in the Master Plan, there is a level of uncertainty surrounding implementation and therefore key assumptions include:

- The implementation of the Master Plan is going to be piecemeal based on sections of the corridor as they come up for development, and where construction of the Yonge North Subway Extension does not interfere with the streetscape.
- The order of funding sources to be utilized would not change based on the streetscape components identified and would apply to the entire works involved in any section whether it be the full cross-section or just east or west side.
- To the extent there are decisions made to undertake specific components of the streetscape (as defined in Section 1.4.4.2), such as the bikeway, under timelines set by the Region rather than based on development, the same order of funding would apply, and grants would be sought relevant to those works – such as active transportation grants. This, however, would require careful planning to ensure continuity / appropriate transitions along the corridor if it implies that a sizeable north-south section would be implemented.

1. Implementation and Funding Options



Subject to the existing cap on capital cost development charges eligible as per the historic level of service. This assumes that the works are attributable to growth-related.

Applicable to service standards over and above the historic level of service. Funding from developers through Section 37 / CBCs, in-kind contributions.

Funding through partnership programs (i.e., PCPP, MSPP) with contributions from York Region and relevant local municipalities.

Grant funding, as available. This need to be factored into the future capital cost schedule for DCs, as DCs are to be net of any grants, subsidies, or other contributions which reduce capital costs.

Unfunded amounts after all other funding sources identified above have been utilized, will be funded through a combination of taxation, and further negotiated developer contributions. This will be determined on a project-by-project basis.

1.5 FUNDING OPTIONS

1.5.1 HOW THE FUNDING LANDSCAPE HAS CHANGED

The Provincial government passed Bill 197, the COVID-19 Economic Recovery Act, 2020, on July 21, 2020. This Act includes changes to various pieces of legislation and makes additional changes to those originally proposed in Bill 108 – More Homes, More Choice Act, 2019.

Bill 197 introduces regulation 509/20 under the Planning Act to implement Community Benefits Charges (CBCs), which makes significant changes to Section 37 (bonusing) of the Planning Act. The new regulation reverses the initial move (through Bill 108) to integrate some components of development charges (DCs), parkland dedication / cash-in-lieu, and Section 37 benefits into Community Benefits Charges (CBCs). Now, CBCs effectively only replace Section 37 benefits, while development charges and parkland dedication continue to remain separate requirements.

CBCs and DCs can be used interchangeably to fund eligible services, however, the capital costs that are funded through CBCs must not also be funded by DCs or under parkland dedication. The Development Charges Act clearly identifies a list of services, the eligible costs of which can be levied through DCs, while CBCs are more flexible and can cover “capital costs of facilities, services and matters required because of development or redevelopment.” Once a municipality has included a cost in its DC By-law, a CBC cannot be used to collect for the same item.

1. Implementation and Funding Options

1.5.2 DEVELOPMENT CHARGES FUND ELIGIBILITY

1.5.2.1 General Applicability

Existing Development Charges legislation enables municipalities to impose development charges which are estimated on the following basis:

- The anticipated amount, scale and location of development as well as the increase in service requirements (capital projects and annual operating costs of capital infrastructure as well as LiveCycle cost) attributable to growth-related infrastructure and service costs;
- The average quality and quantity of service for each category of infrastructure and service in existence over the preceding 10-year period – development charges cannot be estimated on the basis of scale and quality of services which are above and beyond the average of the preceding 10-year period;
- Any increase in capital cost which relates to oversize capacity and the portion of such increased capital cost that is related to future growth within the DC plan period (i.e., excludes growth post-planning period); and
- Net of the mandatory 10% reduction for certain services and any grants, subsidies or other contributions which reduce capital costs.

Of course, all such costs for infrastructure and services must be growth-related and exclude any costs associated with a benefit to existing development.

1.5.2.2 Specifics

Under the 2018 Development Charge Background Report for York Region, a number of road programs are included in the DC By-law as a basis of calculating the charge. Road improvements that were carried in the 2018 Development Charges Background Study include the reconstruction of Yonge Street from Centre Street / Thornhill Summit Drive to Highway 407, with an anticipated timeframe of 2022 to 2026.

The planned enhancements to the Yonge Street corridor are likely to be DC eligible subject to the following notations:

- The need to identify the portion of the anticipated capital cost which are a benefit to existing development vs. benefit to future growth. As the streetscape plan relates to transportation infrastructure serving York Region as a whole, determining the proportional benefit to existing versus new growth will be an important consideration; and
- Recognizing that the proposed enhancements to the Yonge Street Corridor may exceed the 10-year average as to quantity and quality of service, this report identifies the works and costs associated with the approved standards of streetscape for the Yonge Street Corridor. It also identifies the works and their costs over and above these standards (see Section 1.4.2 above).

York Region also provides for a general “urbanization” line item within their Capital Budget, which is currently funded through

development charges. This line item would only fund an Ultimate condition in an urban area (as part of the qualifications for use) and only as permitted under the Development Charges Act; however, South Yonge Street would likely be a good candidate to enable quick starting some components of the master plan implementation (e.g., curbs, hydro duct banks, etc.).



Figure 12: Development charges are imposed on new developments to pay for growth-related capital costs.

1. Implementation and Funding Options

1.5.3 SECTION 37 BENEFITS / COMMUNITY BENEFITS CHARGES (CBCS)

Section 37 of the Ontario Planning Act enables municipalities to include provisions within their Official Plans for the granting of additional height and/or density for proposed development (over and above the as-of-right development density) in exchange for community benefits. These community benefits (as categories) are identified within the Official Plans. Below is an outline of the policies in each of the relevant municipal official plans. The central questions for the implementation of regional streetscape improvements are:

- To what extent can these works be funded as community benefits as part of existing or future development proposals received and determined by the area municipalities?
- What is the timing of such development-linked funding compared to the ideal timing for implementation of the road corridor improvements?

CBCs will ultimately replace the agreements between developers and municipalities under Section 37 of the Planning Act. Only single and lower tier municipalities are eligible to levy CBCs, consistent with the existing Section 37 benefits. York Region will therefore support the local municipalities, in principle, to pursue CBCs for the improvement of communities and corridors. CBCs will be calculated based on a maximum cap of 4% of the value of the subject land, providing a greater level of predictability (subject to the determination of land value) for landowners and developers than Section 37 provisions provide.

Each of the lower tier municipalities are currently working through a process of developing their CBC Strategy and associated By-law, which will ultimately be incorporated into their respective Official Plans. The following provides details (as available) of the anticipated CBC Strategy for each of the lower tier municipalities:

City of Vaughan: Based on discussions with the City of Vaughan, it is understood that a CBC Strategy and associated By-law is currently being developed. CBCs will only be collected on high-rise developments at 4% of the land value, with no other form of development subject to the By-law.

City of Richmond Hill: It is understood that the City of Richmond Hill will be undertaking its CBC Strategy in conjunction with the City-wide Parks Plan and the update to their DC By-law. The work is being initiated now and is expected to continue throughout 2021.

City of Markham: It is understood that the City of Markham will be undertaking its CBC Strategy in tandem with their DC Background Study. This Study has recently commenced and is expected to be completed in December 2021. The CBCs are anticipated to be used to fund non-DC fundable portions of the DC Background Study (e.g., cycling facilities are funded through the DCs at a rate of 65%, therefore CBCs could fund the remaining 35%). CBCs are anticipated to be collected at the maximum 4% of land value of developments in Markham. The City plans on collecting CBCs into a

reserve fund for growth related development and use it for non-DC items on an as needed basis. This will need to be distinguished from its existing non-DC Growth Reserve, which is funded by the Gas Tax at a rate of \$4 million per year.

Bill 197, through the introduction of Ontario Regulation 509/20 under the Planning Act, identifies that the existing Section 37 provisions regarding height and density bonusing will remain in effect until a CBC By-law is passed by a municipality or until September 18, 2022, and therefore remain relevant to the Streetscape Master Plan. Any Site or Area-Specific Zoning By-law (that identifies Section 37 contributions are required) enacted before the end of the transition period will continue to apply after the CBC By-law is enacted, and the lands are not subject to CBCs.

1.5.3.1 York Region

With respect to Section 37 policies, the York Region Official Plan (2010, 2019 Office 1Consolidation) has the following language:

“5.4 Regional Centres and Corridors

15. To require local municipalities to adopt official plan policies and related zoning by-law provisions, to provide community benefits in Regional Centres and Corridors in exchange for additional height and density, consistent with the Increased Density provision of the Planning Act. Community benefits shall include consideration of **(bold for emphasis)**:

1. Implementation and Funding Options

- a. **transit station improvements, in addition to lands required as a condition of development approval;**
- b. social housing;
- c. **direct pedestrian connections to transit stations;**
- d. Regional community and health facilities;
- e. Regional emergency medical services and police stations;
- f. **additional facilities and services identified by local municipalities; and,**
- g. **appropriate provisions for pedestrian and cycling facilities.**

The Yonge Street Corridor is identified as a Regional Corridor in the York Region Official Plan and the Regional Centres include the Yonge/Steeles Centre and Richmond Hill Centre. The policies define community benefits to include appropriate provisions for pedestrians and cycling facilities as well as additional facilities and services identified by local municipalities.

In order to implement the opportunities for funding of community benefits, the Regional Official Plan is based on the need for a partnership model involving the Region and the area municipalities. The Regional Official Plan seeks the active participation of the area municipalities in implementing Section 37 agreements to secure community benefits. As such, the opportunity for Section 37 funding lies with the area municipalities and those development proposals which include applications for increased density, triggering the potential for Section 37 benefits. This type

of funding should therefore be considered contingent and subject to uncertainty. Nevertheless, as a source of potential funding in the short-term, bonusing is viable.

A full assessment of this changing funding source should involve a review of existing and potential development opportunities for sites fronting on, or in proximity to, the Yonge Street Corridor.

Area municipality Section 37 policies are outlined below.

1.5.3.2 City of Vaughan

The City of Vaughan Official Plan (Section 10.1.2 Implementation Tools) includes provisions for bonusing Higher Density under provisions of Section 37 of the Planning Act. The Official Plan is currently going through its review process, estimated to be completed in 2023 or 2024, which will remove the Section 37 provisions and incorporate the CBC Strategy (currently in development). The relevant excerpt of the plan is as follows:

“10.1.2 Implementation Tools

Bonusing for Increases in Height or Density (Section 37 of the Planning Act)

10.1.2.9. Increased Height and Density Provision:

- a. In accordance with Section 37 of the Planning Act, Council may authorize an increase in the building height and/or density of development otherwise permitted in areas of the City, as contained

in Volume 1 or Volume 2 of this Plan, or as contained in a site specific zoning by-law, in return for the provision of community benefits in the form of facilities, services or matters provided:

- i. the community benefits bear a reasonable planning relationship to the increase in building height and/or density of the proposed development;
- ii. the development represents good planning, is consistent with the other objectives of this Plan and consistent with applicable built form and neighbourhood compatibility objectives; and
- iii. there is adequate infrastructure to support the increase in building height and/or density.

b. Pursuant to Section 37 of the Planning Act, a by-law may be enacted by Council to achieve the City’s objective of obtaining certain facilities, services or other matters which would not otherwise be secured under the other provisions of the Planning Act or the Development Charges Act, and which may be of particular benefit to a specific area or the City at large. Notwithstanding the generality of the foregoing it is the intent of Council in passing such by-laws to attain community benefits consisting of capital facilities, services or cash contributions toward specific capital facilities or services including but not limited to **(bold for emphasis):**

- i. public parking;
- ii. **public art contributions;**

1. Implementation and Funding Options

- iii. non-profit and/or public arts, and cultural, community or institutional facilities;
- iv. parkland and/or parkland improvements, or cash-in-lieu of parkland or parkland improvements that are over and above the City’s standard levels of service, and above the contributions secured through Development Charges and/or under Section 42 of the Planning Act;**
- v. enhanced public access to natural heritage features, ravines and valleylands supported by the Toronto and Region Conservation Authority, involving offsite improvements/upgrades;
- vi. enhanced below-grade and/or at-grade connections to public transit facilities;
- vii. district energy;
- viii. land for municipal purposes;
- ix. upgrades to community facilities that are above the City’s standard level of service;
- x. upgrades to cultural heritage facilities/elements which are above that which is required by Provincial and municipal Policy;
- xi. fully furnished and equipped non-profit day care facilities, including startup funding;
- xii. The provision of affordable housing in the form of land, residential units or cash contributions to be transferred to the Region (Housing York, Inc.) or to a non-profit housing

provider, free of cost, (including maintenance and condo fees if applicable);

xiii. other community benefits that may be identified in Secondary Plans, Area Specific Policies or Site-Specific Policies as contained in Volume 2 of this Plan; and other community improvements that may be identified through the development approval process.

- 10.1.2.10. Community benefits which are the subject of Section 37 provisions will be determined based on local community needs, intensification issues in the area, and the objectives of this Plan with priority given to provision of benefits in proximity to the proposed development.
- 10.1.2.11. Council reserves the right to select community benefits based on local community needs, the nature of the development application, any Implementation Guidelines or Plans adopted by Council and the policies of this Plan.
- 10.1.2.12. Increased building height and density provisions under Section 37 of the Planning Act will be implemented by site specific zoning by-laws. Such by-laws will specify the facilities, services and matters that are required to be provided under this provision.
- 10.1.2.13. That community benefits provided through

policy 10.1.2.9 shall be secured in one or more agreements to be registered on title. The agreement(s) will specify when the community benefits will be provided. The agreement(s) will be executed, registered and secured in a manner satisfactory to the City, prior to the enactment of an Official Plan and/or zoning by-law amendment

1.5.3.3 City of Richmond Hill

The City of Richmond Hill Official Plan (2010, 2020 Office Consolidation) includes provisions for bonusing pursuant to Section 37 of the Planning Act. A by-law passed in accordance with Section 37 of the Planning Act must relate to community benefits defined as, but not limited to:

“Section 5: Implementation
5.5 Bonusing (Bonusing By-Laws)
It is the policy of Council that:

- 1. In accordance with Section 37 of the Planning Act, Council may, in a By-law passed under Section 34, permit increases in the height and/or density of a development, where such development provides community benefits and provided that:
 - a. The development constitutes good planning;
 - b. The community benefits to be provided bear a reasonable planning relationship with the proposed development; and
 - c. The proposed development can be supported by existing or planned infrastructure or minor upgrades thereto.

1. Implementation and Funding Options

2. A By-law passed in accordance with Section 37 of the Planning Act may be enacted only for the purpose of securing community benefits above and beyond what would otherwise be required under the Planning Act and Development Charges Act.

3. Notwithstanding the generality of the foregoing, the intent of Council in passing such a By-law shall be to obtain community benefits including, but not limited to the following **(bold for emphasis)**:

a. The provision of additional on-site open space or public facilities such as day nurseries, community centres, and/or recreational facilities;

b. The provision of affordable or special needs housing including housing for senior citizens beyond the requirements of this Plan;

c. Enhanced connections between neighbourhoods, including provision of enhancements to the linked system of courtyards, the Greenway System as well as local improvements to transit facilities;

d. Additional street improvements or servicing improvements;

e. The provision of public parking facilities;

f. Public art;

g. Substantial contribution to the tree canopy;

h. Streetscape improvements on the public boulevard not abutting the site;

i. Non-profit cultural facilities;

j. Heritage enhancements beyond the heritage preservation requirements imposed pursuant to the Ontario Heritage Act or other policies in this Plan; and

k. Other local improvements to the satisfaction of the City.

4. Community benefits will be capital facilities and/or cash contributions towards specific capital facilities, and shall be secured in return for an increase in the height and/or density of development, and will be selected based on local needs, the nature of the development and any guidelines or relevant plans adopted by Council and the policies of this Plan. Priority will be given to on-site or local facilities.

5. Where a proponent of development elects to provide community benefits in return for an increase in the height and/or density of the proposed development, the City shall require the owner to enter into one or more agreements with the City dealing with the facilities, services or matters. Any agreement entered into by the owner will be registered against the land to which it applies and the City is entitled to enforce its provisions against the owner, and subject to the provisions of the Registry Act and the Land Titles Act, any person who has an interest in the land or who subsequently acquires an interest in the land.

6. Increases in height and/or density authorized in accordance with Section 37 of the Planning Act will be implemented by site specific

By-laws passed under Section 34 of the Planning Act. Such By-laws will contain the standards of the zoning category applicable to the site if the bonus is not awarded, as well as the standards that would apply if the bonus is awarded. The By-law will also specify the community benefits that are required to be provided before the bonus standards are in effect.”

Community benefits can be either capital facilities or cash contributions towards such facilities secured and returned for an increase in higher density of development and, similar to the City of Vaughan can be selected on a basis of local need, the nature of development itself, and/or any guidelines adopted by Council.

1.5.3.4 City of Markham

Section 10.2.4 of the City of Markham Official Plan identifies increased height and density (bonusing) provisions.

It is the policy of Council:

10.2.4.1 To consider an increase in the height and density of development, in accordance with Section 37 of the Planning Act, beyond what is otherwise permitted in the zoning by-law, in return for the provision of community benefits in the form of facilities, services or matters provided:

a) the community benefits bear a reasonable planning relationship to the increase in height and/or density of the proposed development;

1. Implementation and Funding Options

b) the development must represent good planning, be consistent with the other objectives of this Plan and meet all applicable built form and neighbourhood compatibility objectives; and

c) there is adequate infrastructure to support the increase in height and/or density for the proposed development.

10.2.4.2 That a by-law to implement Section 37 may be enacted to achieve the objectives of this Plan for obtaining certain facilities, services or other Section 37 of the Planning Act provides municipalities with a key planning tool that allows municipalities to grant an increase in height and/or density and receive additional services; facilities and matters (community benefits) from the owner of a contributing development matters that would not otherwise be secured under the other provisions of the Planning Act or the Development Charges Act, and that may be of particular benefit to a specific area of Markham at large.

10.2.4.3 To attain facilities, services and matters such as, but not limited to the following **(bold for emphasis)**:

a) the conservation and/or improvements of cultural heritage resources;

b) the protection and enhancement of Natural Heritage Network lands and Natural Heritage Network Enhancement Lands, which would not be accepted as parkland dedication;

c) a substantial contribution to the urban forest on public lands;

d) provision of public access to valley lands and stream corridors;

e) the provision of increased amounts of open space or community facilities such as day care centres, libraries, community centres, or recreational facilities;

f) the provision of affordable and shared housing;

g) conservation and replacement of rental housing;

h) enhanced connections to transit facilities;

i) enhanced improvements to transit facilities;

j) enhanced road or servicing improvements;

k) provision of public parking facilities;

l) provision for pedestrian and cycling facilities;

m) public art;

n) non profit cultural facilities; and

o) other local improvements identified in Council initiated studies.

10.2.4.4 To determine community benefits that are the subject of Section 37 provisions based on local community needs, intensification issues in the area, and the objectives of this Plan or any secondary plan, with priority given to provision of community benefits in proximity to the proposed

development.

10.2.4.5 To implement increased height and density provisions under Section 37 of the Planning Act through site specific by-laws passed under Section 34. Such by-laws will contain the standards that would apply to the parcel of land in the event the bonus is awarded. The by-law will also specify the facilities, services and matters that are required to be provided or provided for before the Section 37 by-law provisions becomes applicable to a parcel of land.

10.2.4.6 That an agreement between the property owner and Markham shall be entered into in regard to relevant facilities, services and matters, and when an owner is being awarded the increase in height and density and when the increased standards become applicable. Preservation of the unique character or buildings of architectural or historical difference;

All three lower-tier municipalities as well the Regional Municipality have policies in place to commit funding of community benefits through Section 37 provisions. As CBC Strategy documents, and subsequent By-laws are developed by the lower-tier municipalities, these provisions will be replaced with CBCs, and incorporated into the Official Plan policies, while York Region's Section 37 benefits will no longer be applicable after September 18, 2022.

1. Implementation and Funding Options

1.5.4 SITE PLAN APPROVAL

The significant development opportunities which are likely to exist as a result of the future development of the Yonge North Subway Extension or the bus rapid transit system, will enhance land values at certain points along the corridor (around transit stations, typically within 250 to 500 metres). In context of funding major public infrastructure such as heavy rail subways, there is a long history in a number of jurisdictions of various value capture initiatives (capturing the value of land value increases which stem, in part or in whole, from the development of the transit system).

The basic logic to these programs is that private land holdings benefit directly from the provision of public investment in transit nodes (and increased land value should be recaptured in a proportionate amount by the public sector to defray the capital costs of the transit infrastructure). The Sheppard Subway Extension undertaken in during the 1990s and early 2000s, involved the development of area specific development charges (subsequently rescinded) which were designed to be applied to higher order development along the length of the subway line and around the subway station.

In the context of the current streetscape improvement plan, value enhancements as a result of that specific infrastructure program are modest and indirect relative to the provision of the regional infrastructure such as the subway or the BRT. However, the ensuing development which is expected as a result of the creation

of the Yonge North Subway Extension does create an opportunity to pursue development agreements to provide for additional benefits within the public realm. These may be secured as part of negotiations with land developers through site plan approval and other mechanisms, including the creation of benefit assessment districts (BADs), special planning districts (SPDs as used in some States such as California), through area-specific development charges, or the provision of development charge credits for undertaking public realm work beyond the limits of their property.

1.5.5 GAS TAX FUND

The Gas Tax Fund (GTF), initiated in 2004, provides funding for a range of infrastructure projects across Canada. Every municipality in Canada receives a portion of the GTF. The GTF allocations determine the Provincial/Territorial level based on a per capita formula. The Fund delivers over \$816 million every year to 641 communities across Ontario alone.

The GTF is predicated on capital investments and environmentally sustainable municipal infrastructure that improves water and air quality and reduces greenhouse gas emissions. To that end, eligible investments include a range of infrastructure such as water, wastewater and solid waste facilities, public transit, community energy systems, and local roads and bridges. In Ontario, the Association of Municipalities of Ontario (AMO) and the City of Toronto are parties to a bi-lateral agreement with the Federal Government. Outside of Toronto,

the AMO delivers the programs to other Ontario municipalities. For the past 3 years, York Region has received between \$16 and \$17 million (2018 - 2021).

The following is an excerpt from the Canada – Ontario – Association of Municipalities of Ontario – City of Toronto Gas Tax Agreement (Administrative Agreement on the Federal Gas Tax Fund):

Eligible Project categories under the GTF will continue to include: public transit, local roads and bridges, wastewater, water, solid waste and community energy infrastructure and non-capital investments in capacity building initiatives. As announced in Economic Action Plan 2013, new eligible project categories have been added to include highways, local and regional airports, short-line rail, short-sea shipping, disaster mitigation, broadband connectivity, brownfield redevelopment, culture, tourism, sport, and recreation infrastructure. Schedule B of the agreement provides additional information as follows:

Eligible Projects include investments in Infrastructure for its construction, renewal or material enhancement in each of the following categories (**bold for emphasis**):

1. Implementation and Funding Options

1. Local roads and bridges – roads, bridges, tunnels and active transportation infrastructure (active transportation refers to investments that support active methods of travel). This can include: cycling lanes and paths, sidewalks, hiking and walking trails).

2. Highways – highway infrastructure.

3. Short-sea shipping – infrastructure related to the movement of cargo and passengers around the coast and on inland waterways, without directly crossing an ocean.

4. Short-line rail – railway related infrastructure for carriage of passengers or freight.

5. Regional and local airports – airport-related infrastructure (excludes the National Airport System).

6. Broadband connectivity – infrastructure that provides internet access to residents, businesses, and/or institutions in Canadian communities.

7. Public transit – infrastructure that supports a shared passenger transport system which is available for public use.

8. Drinking water – infrastructure that supports drinking water conservation, collection, treatment and distribution systems.

9. Wastewater – infrastructure that supports wastewater and storm water collection, treatment and management systems.

10. Solid waste – infrastructure that supports solid waste management systems including the collection, diversion and disposal of recyclables, compostable materials and garbage.

11. Community energy systems – infrastructure that generates or increases the efficient usage of energy.

12. Brownfield Redevelopment – remediation or decontamination and redevelopment of a brownfield site within municipal boundaries, where the redevelopment includes: – the construction of public infrastructure as identified in the context of any other category under the GTF, and/or; – the construction of municipal use public parks and publicly-owned social housing.

13. Sport Infrastructure – amateur sport infrastructure (excludes facilities, including arenas, which would be used as the home of professional sports teams or major junior hockey teams (e.g. Junior A)).

14. Recreational Infrastructure – recreational facilities or networks.

15. Cultural Infrastructure – infrastructure that supports arts, humanities, and heritage.

16. Tourism Infrastructure – infrastructure that attract travelers for recreation, leisure, business or other purposes.

17. Disaster mitigation – infrastructure that reduces or eliminates long-term impacts and risks associated with natural disasters.

18. Capacity building – includes investments related to strengthening the ability of Municipalities to develop long-term planning practices.

Traditionally, York Region has used the majority of the Gas Tax Fund to support transit initiatives. The potential exists to expand use of this fund to include active transportation facilities and

initiatives, and prospectively towards streetscape design (including sidewalks and cycle paths) which fundamentally supports active transportation and transit.



Figure 13 & 14 : Active Transportation Infrastructure and Public Transit Facilities are potential eligible projects for funding through the Gas Tax Fund

1. Implementation and Funding Options

1.5.6 PERMANENT PUBLIC TRANSIT FUND

An announcement in February 2021 by the Federal Government establishes the creation of a permanent fund for public transit of \$3 billion per year, beginning in 2026-2027. The program for this funding will be developed over the next few years and should be monitored closely by York Region.

In addition to the permanent funding, \$5.9 billion will be made available and accessible starting in 2021, to accelerate ambitious projects and support the recovery from COVID-19. This funding is focused on the following **(bold for emphasis)**:

1. Help Canadians move around easier and create new jobs by building major public transit projects, providing dedicated planning funding to accelerate future major projects, and supporting the expansion of large urban transit systems that many Canadians depend on every day.

2. Reduce pollution and create jobs for Canadians by enhancing public transit systems and switching them to cleaner electrical power, including supporting the use of zero-emission vehicles and related infrastructure.

3. Support healthy lifestyles in our communities and meet the growing demand for active transportation projects, including by building walkways and paths for cycling, walking, scooters, e-bikes, and wheelchairs.

4. Help Canadians living in rural and remote areas travel to and

from work easier and access essential services, by working with rural, remote, and Indigenous communities to identify and create transit solutions that meet their needs.

1.5.7 BIA FUNDING MODELS

There are currently no business improvement areas (BIAs) within the study area. A business improvement area, operated by an elected board and funded through the property tax base (an additional levy on property owners within a defined area), offers the potential for a renewed focus not only on developing the appropriate mix of retail and services at commercial nodes but also the opportunity to secure through partnership access through a range of funding models. Therefore, as a medium to long-term solution, the option of BIAs as opportunities to create a stable and sustainable commercial corridor should be addressed as part of the long-range plan.

The City of Toronto represents a useful example of how BIAs and the City as well as its agencies can work together to secure streetscape improvements, property enhancements as well as the provision of facilities such as off-street parking. The funding model is of a particular note.

The Toronto Parking Authority (TPA) has a rich history of partnering with the neighbourhood commercial areas throughout the City. An existing model for the development of “Green P” parking is based upon the City providing upfront funding for the development of off-

street facilities which serve the wider interest of the commercial community. The model operates on the following principles:

- A defined commercial district such as a BIA requires off street parking or a structured parking facility. The TPA has in the past developed these facilities (based on an amortization of capital costs over a given period -20 years). Parking charges are used to cover these financing costs. Depending at the cost of development, if existing parking charges are unable to cover the full extent of the costs over the amortization period, this is reflected in a contribution to be provided by the BIA. This has worked successfully in a number of occasions.
- Existing BIAs themselves provide an opportunity for a range of partnership models even where a parking authority does not exist as an agency of the municipality. A number of municipalities in Ontario have used Community Improvement plans and other vehicles to help create a focus of support for initiatives including off-street parking and have been able to generate capital contributions by property owners based on a firm understanding of commercial merits associated with these improvements.
- These principles can in theory be applied to funding streetscape improvements, including but not limited to, parking and other matters.

The City of Toronto also offers the capital cost-shared program.

1. Implementation and Funding Options

This is a capital streetscape funding model which provides 50-50 matching capital funding to BIAs to undertake streetscape improvements such as decorative sidewalk treatments, decorative lighting, banners, murals, and more significant features such as fountains, street furniture, landscaping and tree planting. For this program, the maximum annual cost sharing request from a BIA cannot exceed \$600,000, up to a total of \$1.8 million (gross) value of projects over a 5-year period. . Therefore, in recognition of the more significant per km cost associated with the Yonge Street Corridor improvement, this would not represent a significant source of funding. Nevertheless, it does represent a layer of cooperative working between retailers, property owners, and municipalities and should therefore be considered as a long-term opportunity.

1.5.8 YORK REGION MUNICIPAL STREETScape PARTNERSHIP PROGRAM

In 2006, York Region had established a cost-sharing program for streetscape projects on Regional roads to encourage partnerships with local municipalities for a higher level of streetscape design on regional roads. This is a streetscape partnership funding model which offers two tiers of funding (33% and 50% funding) based on the project coordination with the 10-Year Capital Roads and Transit Capital Construction Program. This is a capital streetscape funding model which offers three tiers of funding (25-50% funding) based on the project's location and relation

to the 10-Year Capital Roads Construction Program. Projects are initiated by local municipalities and applications made to York Region to fund capital improvements such as sidewalk paving treatments, median treatments, enhanced landscaping and street tree planting, decorative light standards, water features, and public art. It should be noted that as a condition of funding, that the local municipality assume the operations and maintenance of these streetscape enhancements. In recognition of the more significant per/km cost associated with the construction of South Yonge Street, this program should be considered as a long-term opportunity that would potentially represent a significant source of funding in the future.

1.5.9 YORK REGION PEDESTRIAN AND CYCLING PARTNERSHIP PROGRAM

The Pedestrian and Cycling Partnership Program (PCPP) was developed to assist local and regional stakeholders to promote and encourage active transportation through partnership on walking and cycling infrastructure projects.

Eligible projects include those that encourage active transportation means for commuters through the development of infrastructure that supports a Regional scale network, such as the proposed cycle facility as part of the South Yonge Master Plan. Specific considerations for eligibility include helping reduce traffic

congestion on Regional roads, connecting neighbouring municipalities, providing safe walking/cycling environments, are new projects and are ready for construction, among others.

This is a capital cost-sharing program, with York Region providing up to 50% of total eligible project design and construction costs that are in line with the Regional Capital Plan Project. A commitment from the local municipalities and/or agency for 50% or more of the capital construction costs as well as all maintenance and rehabilitation responsibilities is required for consideration.

The Municipal Streetscape Partnership Program and the Pedestrian and Cycling Partnership Program reinforces the importance of partnerships and collaboration between York Region and its local municipal partners on this primary urban corridor and throughout the region.

1.5.10 VIVANEXT

VivaNext has developed a Bus Rapid Transit (BRT) facility from Highway 7 north to Bantry. The vivaNext BRT streetscape is designed in accordance with their standards and not subject to the SYMP Update/funding. The project was constructed and completed in 2020.

1. Implementation and Funding Options

1.5.11 ALTERNATIVE FUNDING SOURCES

1.5.11.1 Relative Likelihood and Associated Risks

There are a number of questions regarding the likelihood of each of the funding mechanism above as sources for the capital required to implement the project. The degree to which certain of these funding mechanisms is able to contribute, depends on the level of partnership adopted by the Regional Municipality and the area municipalities. For example, the achievement of offsetting contributions from development projects arising from Section 37 provisions, or its replacement CBCs, is driven by the nature of future development and its timing and is unlikely to result in significant funding for the core elements of the streetscape works.

- The Gas Tax Fund is likely to be applicable to several elements of the design including cycling facilities and other sustainable infrastructure contributions to transportation. This source of funding can be applied potentially from the outset of implementation and most particularly when cycling facilities are provided under Phase 2 of the Plan.
- The Development Charge as a source of funding hinges on the applicability of the standard of improvements which are contained in the Master Plan. The fundability is limited by the 10-year average level of service in addition to the proportion of road enhancements that are growth-related versus a benefit to existing development. It is recommended that the appropriate

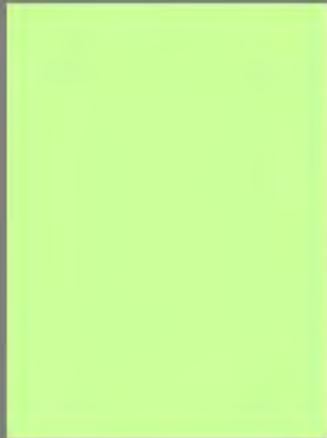
analysis be undertaken to determine whether the project meets or exceeds the level of service limits and the assumed ratio of benefits between existing and new growth.

- The funding tied to enhanced partnership between agencies and municipalities, as well as major grant programs should be an immediate priority in implementing this plan. The existing funding sources offer the potential for funding, but a specific analysis of each potential program is required to assess what elements, if any, could be applied to the project. Allied to this, the potential for enabling the streetscape works as part of the future Yonge North Subway Extension station works should be subject to further analysis and refinement. For example, what are the limits of achieving streetscape enhancements under the Master Plan through the construction activities for the Yonge North Subway Extension?
- The BIA funding options are an example of best practice and are not a substitute for other funding sources. The opportunities for establishing BIAs should be further reviewed with the area municipalities to establish the likelihood of support among the business communities.
- Others: While not directly applicable to the general, or usual, funding sources from streetscapes, there may be other “non-conventional” sources and/or partnerships with stakeholders that should be investigated, including:

- Highway 407 ETR
- CN Rail
- Alectra Utilities
- Private donors / sponsors for public art
- Environmental partnerships (e.g. TRCA, etc.)



MAINTENANCE AND OPERATIONAL COSTS



1. Implementation and Funding Options

2.1 INTRODUCTION

The Streetscape Master Plan for South Yonge Street provides the vision, standards, and guidelines to inform the design, construction, and maintenance of the streetscape and public spaces along Yonge Street as a result of the proposed major transit improvements between the Yonge Steeles Gateway and the Richmond Hill Centre. This section of the report focuses on developing an understanding of the on-going costs involved in maintenance and operation of the enhanced streetscapes as proposed in the Master Plan.

The maintenance and operational costs for the enhanced streetscapes are based on an itemization of considerations and components, as outlined below, that are required to ensure the proper care required for the longevity and attractiveness of the initial investment. Maintenance and operational costs are provided for both the Ultimate Plan as well as the Pre-Subway scenario. Following this is a brief discussion of a possible approach to funding of the maintenance and operational costs.

The approach to the preparation of maintenance and operational costs associated with the Streetscape Master Plan for South Yonge Street is based on the identification of the incremental costs associated with the proposed streetscape works relative to the existing standards of care and operational cost base of the Region's streetscapes.

The estimate of probable maintenance and operational costs of the

2.2 DEFINING MAINTENANCE AND OPERATIONS

Streetscape Master Plan is based on the Ultimate and Pre-Subway plans for the anticipated streetscape works.

Key assumptions for the cost evaluation include:

- Streetscape maintenance costs do not include roadway sweeping or snow removal, trash pick-up or maintenance of existing trees.
- Costs are not separated according to responsibility as this is expected to be negotiated between the Region, municipalities, and other stakeholders, as required.
- Major intersection plazas and subway stations are not included in the analysis since it is assumed that those areas would be maintained by the adjacent landowner.
- Areas that will likely be public parks (municipal or regional) have been included, such as the CN Rail Line Deck and the bridge over the Don Valley.
- Operational costs in this document are "Order of Magnitude" and detailed design will provide more accurate, actual costs.
- Costs are in 2021 Canadian dollars; Consumer Price Index (CPI) to be used in budgeting accurately for year of construction.

Sources of costs included in the 2012 Plan included York Region, the City of Markham and the City of Richmond Hill, Streetscape Elements Lifecycle Cost Analysis Report (2010) for the City and County of San Francisco, which was adapted according to the consultant's local experience. These costs have been escalated from 2011 dollars to 2021 dollars in accordance with the CPI (at an annual rate of inflation

of 1.61) or updated as per recent costs provided by York Region

2.2.1 EXISTING MAINTENANCE COSTS

Existing maintenance and operational costs for Regional Roads are summarized as follows:

Assumptions:

- Street trees are watered by automated irrigation system regularly and pruned and mulched annually.

Item	Unit Cost	Units / Kilometre	Total
Street Trees (<i>water, prune, mulch</i>)	\$30.00	200 trees (@ 10 m spacing)	\$ 6,000
Sidewalks (<i>1.5 m width</i>)	\$3.00 / lm	2000	\$ 6,000
TOTAL (per km / year)			\$ 12,000

The basic amount for tree and sidewalk maintenance is therefore approximately \$12,000 / km / year.

By comparison, the amount anticipated for future York Region Rapidway maintenance costs are as follows:

1. Implementation and Funding Options

Assumptions:

- Additional maintenance may be required to service wider sidewalks, increased snow removal, and enhanced landscape development.
- Snowplowing of the sidewalks is not included.
- Costs are rounded from data provided by York Region and

Item	Unit Cost / Kilometre
Forestry (incl. trees, planters, irrigation, perennials, pruning, mulch, etc.)	\$136,000
Roadway (incl. interlock, sweeping, snow plowing and removal, line and symbol painting, sign replacement, etc.)	\$50,869
Sidewalks (repair and maintenance)	\$6,929
Total (per km/year)	\$193,797

Based on this evaluation, costs for maintenance and operations of the Region’s Rapidway projects are anticipated to be nearly \$200,000 / km / year.

2.2.2 RECOMMENDED MAINTENANCE AND OPERATIONAL COSTS FOR YONGE STREET

Assumptions:

Hardscape

- Concrete Sidewalk (3m wide each side) - Although sidewalks will not all be 3 metres wide, they have been calculated as such for simplicity. Costing is for expected repairs, only, not sweeping or snow removal. Figures were calculated based on \$100 per square metre per 20 years or \$5.00 annually, escalated to \$5.87 in 2021 dollars.
- Unit pavers on concrete base - Figures are calculated based on \$100 per square metre per 7 years, which equates to \$14 annually (\$16.47 in 2021 dollars). It should be noted that repairs to and cleaning of permeable unit pavers set in sand is slightly cheaper to maintain as units do not have to be broken up to remove them. This figure is based on \$85 per square metre per 7 years = \$12.15 annually (equating to \$14.25 in 2021 dollars).
- Streetprint - Streetprint cleaning and repair costs assume washing and colouring once a year (\$2 per square metre), more sweeping (\$1 per square metre) and repainting once every 15 years (\$7 per square metre), which works out to \$10 annually per square metre, escalated to \$11.73 in 2021 dollars.
- Decorative median with unit pavers (without planting, excluding

public art) - priced the same as unit paver costs at \$16.47.

- Crosswalks (all 4 arms) - Figures are based on repainting every 15 years at the price of \$600 per intersection, or \$40 annually, escalated to \$47.04 in 2021 dollars.

Softscape

- Tree - The total figure of \$177.50 annual maintenance costs per tree is based on pruning (\$500 per year on a 6 year cycle) at \$85 per year, irrigation at \$85, mulching & fertilizing (every 3 years, \$15) at \$5, and infiltration & irrigation system maintenance / flushing (\$150 per 30 m2 trench = \$5 per m2) at \$2.50. This cost has remained the same from 2011.
- Planters - Costing, as provided by York Region, is for watering and plant maintenance in addition to tree care at \$82 per square metre.
- Groundcover Planting - Unit cost provided by York Region is \$56 per square metre based on trash removal, irrigation, and minor plant maintenance needs. This unit cost also applies to median planting.

Site Furnishings and Lighting

- Bike Racks – Graffiti removal \$21 per year.
- Trash Cans - \$414 per year for graffiti removal.
- Benches - \$414 per year for graffiti removal.
- Road and Pedestrian Lighting LED fixtures – includes cost for graffiti abatement and ongoing operation and repair of streetlight, estimated at \$117 per year.

1. Implementation and Funding Options

Costs

The maintenance and operational costs for South Yonge are detailed in Table C – Maintenance and Operational Costs. Based on the above cost assumptions, the annual maintenance and operational costs for the proposed Yonge North Subway Extension Plan and Pre-Subway Plan are summarized as follows on an annual basis:

Character Area	Pre-Subway Plan	Subway Plan
Yonge Steeles Gateway District	\$260,000	\$346,000
CN Rail Bridge Threshold	\$149,000	\$186,000
Clark Station District	\$58,000	\$290,000
Old Thornhill Village District	\$223,000	\$297,000
Don River Bridge Threshold	NIC	\$ 36,000
New Thornhill District	\$254,000	\$352,000
Highway 407 / Hydro Threshold	\$234,000	\$234,000
Richmond Hill Centre District	\$82,000	\$82,000
TOTAL	\$1,260,000	\$1,823,000

2.2.3 APPROACH TO FUNDING

Based on conversations with York Region and municipal staff, the current approach to funding of maintenance and operational costs for Regional Roads relies on the partnership between the Region

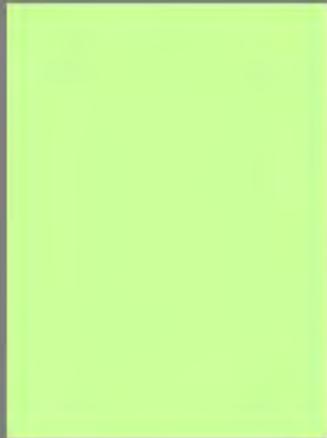
and the local municipalities. Similar to the funding approaches for capital works, there are opportunities to explore additional sources and mechanisms relative to operational and maintenance costs. An initial review identifies that these may include:

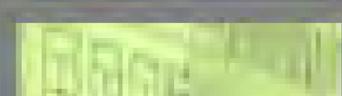
- Expansion and enhancement of the current partnership between the Region and municipalities;
- Business Improvement Areas, as and where possible;
- Transportation entities including VivaNext and TTC;
- Private development owners relative to non-BIA retail areas;
- Community associations and groups; and
- Corporate sponsorships.

While there may be a variety of potential funding sources, it will remain important to ensure that there are consistent and harmonized operational and maintenance standards across the area.



APPENDICES





APPENDIX 1:

TABLE A

TABLE B

TABLE C

TABLE D

Table A: Order of Magnitude Cost Estimate - South Yonge - Ultimate Plan
January, 2021

Item#	Description	Quantity	Unit	Unit Cost	Subtotal	Totals
1	Steeles Gateway (630m Segment)					
	HARDSCAPE					
1.1	Conc. Barrier Curb with Gutter	1265	m	\$143.00	\$180,895.00	
1.2	Conc. Sidewalk (2.1m wide each side)	2657	m ²	\$114.50	\$304,226.50	
1.3	Unit Paving - amenities zone & lay-by parking	3795	m ²	\$250.00	\$948,750.00	
1.4	Steeles and Yonge Gateway	1	Lump sum	\$896,535.00	\$896,535.00	
1.5	Cycle Track	2,404	m ²	\$92.00	\$221,168.00	
1.6	Transit / Bus Stop including unit paving, shelter and site furniture	3	ea.	\$146,200.00	\$438,600.00	
	ROADWAY					
1.7	Median					
1.7.1	Decorative Median	112	m	\$860.00	\$96,320.00	
1.7.2	Median w/ trees+drainage	244	m	\$2,863.00	\$698,572.00	
1.7.3	Median @ left turn lane	183	m	\$515.00	\$94,245.00	
1.8	Intersections					
1.8.1	Two (2) special intersections+Multiple crosswalks @Yonge and Steeles Ave / Yonge and Grandview Ave	1	Lump sum	\$200,375.00	\$200,375.00	
	SOFTSCAPE					
1.9	Tree Planting (includes all infrastructure and pavers in amenities zone)					
1.9.1	Tree @ single-tree in grate	42	ea.	\$11,450.00	\$480,900.00	
1.9.2	Tree @ double-tree planter w/ 450mm high planter wall+drainage	37	ea.	\$22,900.00	\$847,300.00	
	SITE FURNITURE					
1.10	Street Lighting					
1.10.1	Pedestrian Lighting	36	ea.	\$17,175.00	\$618,300.00	
1.10.2	Road and Pedestrian lighting	36	ea.	\$22,900.00	\$824,400.00	
1.10.3	Site Furnishing (Benches, Bollards, Trash cans, Way-finding signage, Bike Racks)	1	Lump sum	7%	\$479,541.06	
	UTILITIES					
1.11	Concrete Encased Duct Banks (20 ducts / lm, one side)	632	lm	\$2,404.50	\$1,519,644.00	
1.12	Relocation of Hydro Pole (w/streetlight)	18	ea.	\$12,000.00	\$216,000.00	
1.13	Relocation of Transformer	4	ea.	\$8,500.00	\$34,000.00	
	SERVICING					
1.14	Relocation of Catchbasin (inc. new CB and lead connection to existing CBMH)	17	ea.	\$5,500.00	\$93,500.00	
						\$9,193,271.56
2	CN Rail Deck (80m Segment)					
2.1	CN Rail Deck (excluding deck structure)	1	Lump sum	\$2,375,875.00	\$2,375,875.00	
2.2	Site Furnishing (Benches, Bollards, Trash cans, Way-finding signage, Bike Racks)	1	Lump sum	10%	\$237,587.50	
2.3	Cycle Track	423	m ²	\$92.00	\$38,916.00	
	SOFTSCAPE					
2.4	Tree Planting					
2.5	Tree @ at grade w/flush curb+drainage and groundcover planting	84	ea.	\$9,160.00	\$769,440.00	
	UTILITIES					
2.6	Concrete Encased Duct Banks (20 ducts / lm, one side)	80	lm	\$2,405.00	\$192,400.00	
						\$3,614,218.50
3	Clark Station (720m Segment)					
	HARDSCAPE					
3.1	Conc. Barrier Curb with Gutter	1440	m	\$143.00	\$205,920.00	
3.2	Conc. Sidewalk (3m wide each side)	3867	m ²	\$114.50	\$442,771.50	
3.3	Unit Paving - amenities zone & lay-by parking	2223	m ²	\$250.00	\$555,750.00	
3.4	Clark Station	1	Lump sum	\$706,465.00	\$706,465.00	
3.5	Cycle Track	3,600	m ²	\$92.00	\$331,200.00	
3.6	Transit/BUS Stop including unit paving, shelter and site furniture	3	ea.	\$146,200.00	\$438,600.00	
	ROADWAY					
3.7	Median					
3.7.1	Median w/ trees+drainage	78	m	\$2,863.00	\$223,314.00	
3.7.3	Median @ left turn lane	267	m	\$515.00	\$137,505.00	

3.8	Intersections					
3.8.1	Two (2) special intersections+Multiple crosswalks @Yonge and Clark Ave / Yonge and Morgan Ave	1	Lump sum	\$280,296.00	\$280,296.00	
	SOFTSCAPE					
3.9	Tree Planting					
3.9.1	Tree @ at grade w/flush curb+drainage and groundcover planting	99	ea.	\$9,160.00	\$906,840.00	
	SITE FURNITURE					
3.10	Street Lighting					
3.10.1	Pedestrian Lighting	45	ea.	\$17,175.00	\$772,875.00	
3.10.2	Road and Pedestrian lighting	45	ea.	\$22,900.00	\$1,030,500.00	
3.11	Site Furnishing (Benches, Bollards, Trash cans, Way-finding signage, Bike Racks)	1	Lump sum	7%	\$422,242.56	
	UTILITIES					
3.12	Concrete Encased Duct Banks (20 ducts / lm, one side)	720	lm	\$2,100.00	\$1,512,000.00	
3.13	Relocation of Hydro Pole (w/streetlight)	13	ea.	\$12,000.00	\$156,000.00	
3.14	Relocation of Transformer	4	ea.	\$8,500.00	\$34,000.00	
	SERVICING					
3.15	Relocation of Catchbasin (inc. new CB and lead connection to existing CBMH)	30	ea.	\$5,500.00	\$165,000.00	
						\$8,321,279.06
4	Old Thornhill (910m Segment)					
	HARDSCAPE					
4.1	Conc. Barrier Curb with Gutter	1820	m	\$143.00	\$260,260.00	
4.2	Conc. Sidewalk (3m wide each side)	4887	m ²	\$114.50	\$559,561.50	
4.3	Unit Paving - amenities zone & lay-by parking	1820	m ²	\$250.00	\$455,000.00	
4.4	Market Square	1	Lump sum	\$877,643.00	\$877,643.00	
4.5	Cycle Track	4550	m ²	\$92.00	\$418,600.00	
4.6	Transit / Bus Stop including unit paving, shelter and site furniture	6	ea.	\$146,200.00	\$877,200.00	
	ROADWAY					
4.7	Median					
4.7.1	Median w/ trees+drainage	45	m	\$2,863.00	\$128,835.00	
4.7.2	Median @ left turn lane	135	m	\$515.00	\$69,525.00	
4.8	Intersections					
4.8.1	Two (2) special intersections+Multiple crosswalks @ Yonge and Elgin St and Yonge and John St	1	Lump sum	\$199,230.00	\$199,230.00	
	SOFTSCAPE					
4.9	Tree Planting					
4.9.1	Tree @ planter with grate	15	ea.	\$11,450.00	\$171,750.00	
4.9.2	Tree @ double-tree planter w/ 450mm high planter wall+drainage	24	ea.	\$22,900.00	\$549,600.00	
4.9.3	Tree @ double-tree planter w/ 150mm high curb+drainage	34	ea.	\$17,175.00	\$583,950.00	
	SITE FURNITURE					
4.10	Street Lighting					
4.10.1	Pedestrian Lighting	56	ea.	\$17,175.00	\$961,800.00	
4.10.2	Road and Pedestrian lighting	56	ea.	\$22,900.00	\$1,282,400.00	
4.10.3	Site Furnishing (Benches, Bollards, Trash cans, Way-finding signage, Bike Racks)	1	Lump sum	7%	\$517,674.82	
	UTILITIES					
4.11	Concrete Encased Duct Banks (20 ducts / lm, one side)	910	lm	\$2,405.00	\$2,188,550.00	
4.11.1	Relocation of Hydro Pole (w/streetlight)	32	ea.	\$12,000.00	\$384,000.00	
4.11.2	Relocation of Transformer	3	ea.	\$8,500.00	\$25,500.00	
	SERVICING					
4.12	Relocation of Catchbasin (inc. new CB and lead connection to existing CBMH)	69	ea.	\$5,500.00	\$379,500.00	
						\$10,890,579.32
5	Don River Bridge (140m Segment)					
5.1	Don River Bridge (excluding bridge structure)	1	Lump sum	\$1,113,169.00	\$1,113,169.00	
5.2	Site Furnishing (Benches, Bollards, Trash cans, Way-finding signage, Bike Racks)		Lump sum	10%	\$111,316.90	
5.3	Unit Paving - amenities zone & lay-by parking	90	m ²	\$250.00	\$22,500.00	
5.4	Cycle Track	700	m ²	\$92.00	\$64,400.00	
	UTILITIES					
5.5	Concrete Encased Duct Banks (20 ducts / lm, one side)	140	lm	\$2,405.00	\$336,700.00	
5.6	Relocation of Hydro Pole (w/streetlight)	4	ea.	\$12,000.00	\$48,000.00	
5.7	Relocation of Transformer	0	ea.	\$8,500.00	\$0.00	
	SERVICING					
5.8	Relocation of Catchbasin (inc. new CB and lead connection to existing CBMH)	3	ea.	\$5,500.00	\$16,500.00	
						\$1,712,585.90

TABLE A: continued

6 New Thornhill (1225m Segment)					
HARDSCAPE					
6.1	Conc. Barrier Curb with Gutter	2450	m	\$143.00	\$350,350.00
6.2	Conc. Sidewalk (3m wide each side)	7350	m ²	\$114.50	\$841,575.00
6.3	Unit Paving - amenities zone & lay-by parking	3628	m ²	\$250.00	\$907,000.00
6.4	Longbridge Station	1	Lump sum	\$510,000.00	\$510,000.00
6.5	Cycle Track	4,900	m ²	\$92.00	\$450,800.00
6.6	Transit /Bus Stop including unit paving, shelterand site furniture	8	ea.	\$146,200.00	\$1,169,600.00
ROADWAY					
6.7	Median				
6.7.1	Median w/ trees+drainage	30	m	\$2,000.00	\$60,000.00
6.7.2	Median @ left turn lane	120	m	\$515.00	\$61,800.00
6.8	Intersections				
6.8.1	Two (2) special intersections+Multiple crosswalks @Yonge and Royal Orchard Blvd / Yonge and Bay Thorn Dr	2	Lump sum	\$154,575.00	\$309,150.00
SOFTSCAPE					
6.9	Tree Planting				
6.9.1	Tree @ double-tree planter w/ 150mm high curb+drainage	24	ea.	\$11,450.00	\$274,800.00
6.9.2	Tree @ double-tree planter w/ 450mm high planter wall+drainage	32	ea.	\$17,175.00	\$549,600.00
6.9.3	Tree @ single-tree in grate	36	ea.	\$11,450.00	\$412,200.00
SITE FURNITURE					
6.10	Street Lighting				
6.10.1	Pedestrian Lighting	76	ea.	\$17,175.00	\$1,305,300.00
6.10.2	Road and Pedestrian lighting	76	ea.	\$22,900.00	\$1,740,400.00
6.11	Site Furnishing (Benches, Bollards, Trash cans, Way-finding signage, Bike Racks)	1	Lump sum	7%	\$625,980.25
UTILITIES					
6.12	Concrete Encased Duct Banks (20 ducts / lm, one side)	1225	lm	\$2,405.00	\$2,946,125.00
6.13	Relocation of Hydro Pole (w/streetlight)	31	ea.	\$12,000.00	\$372,000.00
6.14	Relocation of Transformer	5	ea.	\$8,500.00	\$42,500.00
6.15	SERVICING				
6.16	Relocation of Catchbasin (inc. new CB and lead connection to existing (CBMH)	40	ea.	\$5,500.00	\$220,000.00
					\$13,149,180.25
7 Highway 407 (740m Segment)					
HARDSCAPE					
7.1	Conc. Barrier Curb with Gutter	1480	m	\$143.00	\$211,640.00
7.2	Conc. Sidewalk (3m wide each side)	4440	m ²	\$114.50	\$508,380.00
7.3	Unit Paving - amenities zone & lay-by parking	60	m ²	\$250.00	\$15,000.00
7.4	Cycle Track	2960	m ²	\$92.00	\$272,320.00
7.5	Transit / Bus Stop including unit paving, shelterand site furniture	2	ea.	\$146,200.00	\$292,400.00
ROADWAY					
7.6	Raised Medians				
	Median	105	m	\$859.00	\$90,195.00
7.6.1	Median w/ trees and drainage	205	m	\$2,863.00	\$586,915.00
7.6.2	Median @ left turn lane	113	m	\$515.00	\$58,195.00
7.7	Intersections				
7.7.1	Two (2) special intersections+Multiple crosswalks @Yonge and North Entrance of the Proposed Parking Lot and Yonge and North Exit Ramp Exit of Hwy 407	1	Lump sum	\$364,000.00	\$364,000.00
SOFTSCAPE					
7.8	Tree Planting				
7.8.1	Tree @ single-tree in grate	10	ea.	\$11,450.00	\$114,500.00
7.8.2	Tree @ double-tree planter w/ 150mm high curb+drainage	25	ea.	\$17,175.00	\$429,375.00
7.8.3	Tree @ double-tree planter w/ 450mm high planter wall+drainage	10	ea.	\$22,900.00	\$229,000.00
SITE FURNITURE					
7.9	Street Lighting				
7.9.1	Pedestrian Lighting	48	ea.	\$17,175.00	\$824,400.00
7.9.2	Road and Pedestrian lighting	48	ea.	\$22,900.00	\$1,099,200.00
7.10	Site Furnishing (Benches, Bollards, Trash cans, Way-finding signage, Bike Racks)	1	Lump sum	7%	\$356,686.40
UTILITIES					
7.11	Concrete Encased Duct Banks (20 ducts / lm, one side)	740	lm	\$2,405.00	\$1,779,700.00
7.12	Relocation of Hydro Pole (w/streetlight)	5	ea.	\$12,000.00	\$60,000.00
7.13	Relocation of Transformer	1	ea.	\$8,500.00	\$8,500.00
SERVICING					
7.14	Relocation of Catchbasin (inc. new CB and lead connection to existing CBMH)	1	ea.	\$5,500.00	\$5,500.00
					\$7,305,906.40

8 Richmond Hill Centre (290m Segment)					
HARDSCAPE					
8.1	Conc. Barrier Curb with Gutter	580	m	\$143.00	\$82,940.00
8.2	Conc. Sidewalk (3m wide each side)	1740	m ²	\$114.50	\$199,230.00
8.3	Unit Paving - amenities zone & lay-by parking	290	m ²	\$250.00	\$72,500.00
8.4	Cycle Track	1160	m ²	\$92.00	\$106,720.00
8.5	Transit / Bus Stop including unit paving, shelterand site furniture	2	ea.	\$146,200.00	\$292,400.00
ROADWAY					
8.6	Median				
8.6.1	Decorative Median	148	m	\$859.00	\$127,132.00
8.7	Intersections				
8.7.1	One (1) special intersections+Multiple crosswalks @ Yonge and Garden Ave	1	Lump sum	\$130,000.00	\$130,000.00
SOFTSCAPE					
8.8	Tree Planting				
8.8.1	Tree @ single-tree in grate	12	ea.	\$11,450.00	\$137,400.00
8.8.2	Tree @ at grade w/flush curb+drainage and groundcover planting	14	ea.	\$9,160.00	\$128,240.00
8.8.3	Tree @ double-tree planter w/ 150mm high curb+drainage	3	ea.	\$17,175.00	\$51,525.00
8.8.4	Tree @ double-tree planter w/ 450mm high planter wall+drainage	28	ea.	\$22,900.00	\$641,200.00
SITE FURNITURE					
8.9	Street Lighting				
8.9.1	Pedestrian Lighting	24	ea.	\$17,175.00	\$412,200.00
8.9.2	Road and Pedestrian lighting	24	ea.	\$22,900.00	\$549,600.00
8.10	Site Furnishing (Benches, Bollards, Trash cans, Way-finding signage, Bike Racks)	1	Lump sum	7%	\$205,176.09
UTILITIES					
8.11	Concrete Encased Duct Banks (20 ducts / lm, one side)	290	lm	\$2,405.00	\$697,450.00
8.12	Relocation of Hydro Pole (w/streetlight)	8	ea.	\$12,000.00	\$96,000.00
8.13	Relocation of Transformer	0	ea.	\$8,500.00	\$0.00
SERVICING					
8.14	Relocation of Catchbasin (inc. new CB and lead connection to existing CBMH)	22	ea.	\$5,500.00	\$121,000.00
					\$4,050,713.09
				Subtotal	\$58,237,734.07
				20% Contingency	\$11,647,546.81
				Subtotal	\$69,885,280.88
				13% HST	\$9,085,086.51
				TOTAL	\$78,970,367.39

SUMMARY:

TOTAL WITH UTILITY DUCT BANKS: \$78,970,367.39
 TOTAL WITHOUT UTILITY DUCT BANKS: \$65,563,285.39

NOTES:

- a. Cost Estimate based on Pre-Subway Plan (2012) and is subject to the Final Subway Design by Metrolinx
- b. Scope of Cost Estimate: Yonge Street (Steeles Avenue-Garden Avenue)
- c. Capital and Maintenance/Operations costs provided by York Region and based on Phase 4 Detailed Design Guidelines
- d. Costs account for supply and installation
- e. CPI Index; 2021 Dollars

Table B: Order of Magnitude Cost Estimate - South Yonge - Pre-Subway Plan
January, 2021

Item#	Description	Quantity	Unit	Unit Cost	Subtotal	Totals
1	Steeles Gateway (630m Segment)					
	HARDSCAPE					
1.1	Conc. Barrier Curb with Gutter	1265	m	\$143.00	\$180,895.00	
1.2	Conc. Sidewalk (3m wide each side)	3520	m ²	\$114.50	\$403,040.00	
1.3	Unit Paving - amenities zone & lay-by parking	3795	m ²	\$250.00	\$948,750.00	
1.4	Steeles and Yonge Gateway		Lump sum	\$896,535.00	\$0.00	
1.5	Cycle Track		m ²	\$92.00	\$0.00	
1.6	Transit / Bus Stop including unit paving, shelter and site furniture	3	ea.	\$146,200.00	\$438,600.00	
	ROADWAY					
1.7	Median					
1.7.1	Decorative Median		m	\$860.00	\$0.00	
1.7.2	Median w/ trees+drainage		m	\$2,863.00	\$0.00	
1.7.3	Median @ left turn lane		m	\$515.00	\$0.00	
1.8	Intersections					
1.8.1	Two (2) special intersections+Multiple crosswalks @Yonge and Steeles Ave / Yonge and Grandview Ave	1	Lump sum	\$200,375.00	\$200,375.00	
	SOFTSCAPE					
1.9	Tree Planting (includes all infrastructure and pavers in amenities zone)					
1.9.1	Tree @ single-tree in grate	42	ea.	\$11,450.00	\$480,900.00	
1.9.2	Tree @ double-tree planter w/ 450mm high planter wall+drainage	37	ea.	\$22,900.00	\$847,300.00	
	SITE FURNITURE					
1.10	Street Lighting					
1.10.1	Pedestrian Lighting	36	ea.	\$17,175.00	\$618,300.00	
1.10.2	Road and Pedestrian lighting	36	ea.	\$22,900.00	\$824,400.00	
1.10.3	Site Furnishing (Benches, Bollards, Trash cans, Way-finding signage, Bike Racks)	1	Lump sum	7%	\$345,979.20	
	UTILITIES					
1.11	Concrete Encased Duct Banks (20 ducts / lm, one side)	632	lm	\$2,404.50	\$1,519,644.00	
1.12	Relocation of Hydro Pole (w/streetlight)	18	ea.	\$12,000.00	\$216,000.00	
1.13	Relocation of Transformer	4	ea.	\$8,500.00	\$34,000.00	
	SERVICING					
1.14	Relocation of Catchbasin (incl. new CB and lead connection to existing CBMH)	17	ea.	\$5,500.00	\$93,500.00	
						\$7,151,683.20
2	CN Rail Deck (80m Segment)					
2.1	CN Rail Deck (excluding deck structure)	1	Lump sum	\$2,375,875.00	\$2,375,875.00	
2.2	Site Furnishing (Benches, Bollards, Trash cans, Way-finding signage, Bike Racks)	1	Lump sum	10%	\$237,587.50	
2.3	Cycle Track		m ²	\$92.00	\$0.00	
	SOFTSCAPE					
2.4	Tree Planting					
2.5	Tree @ at grade w/flush curb+drainage and groundcover planting	84	ea.	\$9,160.00	\$769,440.00	
	UTILITIES					
2.6	Concrete Encased Duct Banks (20 ducts / lm, one side)	80	lm	\$2,405.00	\$192,400.00	
						\$3,575,302.50
3	Clark Station (720m Segment)					
	HARDSCAPE					
3.1	Conc. Barrier Curb with Gutter	1440	m	\$143.00	\$205,920.00	
3.2	Conc. Sidewalk (3m wide each side)	3867	m ²	\$114.50	\$442,771.50	
3.3	Unit Paving - amenities zone & lay-by parking	2223	m ²	\$250.00	\$555,750.00	
3.4	Clark Station		Lump sum	\$706,465.00	\$0.00	
3.6	Cycle Track		m ²	\$92.00	\$0.00	
3.7	Transit / Bus Stop including unit paving, shelter and site furniture	3	ea.	\$146,200.00	\$438,600.00	
	ROADWAY					
3.8	Median					
3.8.1	Median w/ trees+drainage		m	\$2,863.00	\$0.00	
3.8.2	Median @ left turn lane		m	\$515.00	\$0.00	

3.9	Intersections					
3.9.1	Two (2) special intersections+Multiple crosswalks @Yonge and Clark Ave / Yonge and Morgan Ave	1	Lump sum	\$280,296.00	\$280,296.00	
	SOFTSCAPE					
3.10	Tree Planting					
3.10.1	Tree @ at grade w/flush curb+drainage and groundcover planting	99	ea.	\$9,160.00	\$906,840.00	
	SITE FURNITURE					
3.11	Street Lighting					
3.11.1	Pedestrian Lighting	45	ea.	\$17,175.00	\$772,875.00	
3.11.2	Road and Pedestrian lighting	45	ea.	\$22,900.00	\$1,030,500.00	
3.12	Site Furnishing (Benches, Bollards, Trash cans, Way-finding signage, Bike Racks)	1	Lump sum	7%	\$324,348.68	
	UTILITIES					
3.13	Concrete Encased Duct Banks (20 ducts / lm, one side)	720	lm	\$2,100.00	\$1,512,000.00	
	Relocation of Hydro Pole (w/streetlight)	13	ea.	\$12,000.00	\$156,000.00	
	Relocation of Transformer	4	ea.	\$8,500.00	\$34,000.00	
	SERVICING					
	Relocaion of Catchbasin (incl. new CB and lead connection to existing CBMH)	30	ea.	\$5,500.00	\$165,000.00	
						\$6,824,901.18
4	Old Thornhill (910m Segment)					
	HARDSCAPE					
4.1	Conc. Barrier Curb with Gutter	1820	m	\$143.00	\$260,260.00	
4.2	Conc. Sidewalk (3m wide each side)	4887	m ²	\$114.50	\$559,561.50	
4.3	Unit Paving - amenities zone & lay-by parking	1820	m ²	\$250.00	\$455,000.00	
4.4	Market Square	0	Lump sum	\$877,643.00	\$0.00	
4.5	Cycle Track		m ²	\$92.00	\$0.00	
4.6	Transit / Bus Stop including unit paving, shelter and site furniture	6	ea.	\$146,200.00	\$877,200.00	
	ROADWAY					
4.7	Median					
4.7.1	Median w/ trees+drainage		m	\$2,863.00	\$0.00	
4.7.2	Median @ left turn lane		m	\$515.00	\$0.00	
4.8	Intersections					
4.8.1	Two (2) special intersections+Multiple crosswalks @ Yonge and Elgin St and Yonge and John St	1	Lump sum	\$199,230.00	\$199,230.00	
	SOFTSCAPE					
4.9	Tree Planting					
4.9.1	Tree @ planter with grate	15	ea.	\$11,450.00	\$171,750.00	
4.9.2	Tree @ double-tree planter w/ 450mm high planter wall+drainage	24	ea.	\$22,900.00	\$549,600.00	
4.9.3	Tree @ double-tree planter w/ 150mm high curb+drainage	34	ea.	\$17,175.00	\$583,950.00	
	SITE FURNITURE					
4.10	Street Lighting					
4.10.1	Pedestrian Lighting	56	ea.	\$17,175.00	\$961,800.00	
4.10.2	Road and Pedestrian lighting	56	ea.	\$22,900.00	\$1,282,400.00	
4.11	Site Furnishing (Benches, Bollards, Trash cans, Way-finding signage, Bike Racks)	1	Lump sum	7%	\$413,052.61	
	UTILITIES					
4.1	Concrete Encased Duct Banks (20 ducts / lm, one side)	910	lm	\$2,405.00	\$2,188,550.00	
4.2	Relocation of Hydro Pole (w/streetlight)	32	ea.	\$12,000.00	\$384,000.00	
4.3	Relocation of Transformer	3	ea.	\$8,500.00	\$25,500.00	
	SERVICING					
4.43	Relocaion of Catchbasin (incl. new CB and lead connection to existing CBMH)	69		\$5,500.00	\$379,500.00	\$9,291,354.11
5	Don River Bridge (140m Segment)					
5.1	Don River Bridge (excluding bridge structure)		Lump sum	\$1,113,169.00	\$0.00	
5.2	Site Furnishing (Benches, Bollards, Trash cans, Way-finding signage, Bike Racks)		Lump sum	10%	\$0.00	
5.3	Unit Paving -amenities zone & lay-by parking	90	m ²	\$250.00	\$22,500.00	
5.4	Cycle Track		m ²	\$92.00	\$22,500.00	
	UTILITIES					
5.5	Concrete Encased Duct Banks (20 ducts / lm, one side)	140	lm	\$2,405.00	\$336,700.00	
						\$381,700.00

TABLE B: continued

6 New Thornhill (1225m Segment)					
HARDSCAPE					
6.1	Conc. Barrier Curb with Gutter	2450	m	\$143.00	\$350,350.00
6.2	Conc. Sidewalk (3m wide each side)	7350	m ²	\$114.50	\$841,575.00
6.3	Unit Paving - amenities zone & lay-by parking	3628	m ²	\$250.00	\$907,000.00
6.4	Longbridge Station		Lump sum	\$510,000.00	\$0.00
6.5	Cycle Track		m ²	\$92.00	\$0.00
6.6	Transit / Bus Stop including unit paving, shelter and site furniture	8	ea.	\$146,200.00	\$1,169,600.00
ROADWAY					
6.7	Median				
6.7.1	Median w/ trees+drainage		m	\$2,000.00	\$0.00
6.7.2	Median @ left turn lane		m	\$515.00	\$0.00
6.8	Intersections				
6.8.1	Two (2) special intersections+Multiple crosswalks @Yonge and Royal Orchard Blvd / Yonge and Bay Thorn Dr	2	Lump sum	\$154,575.00	\$309,150.00
SOFTSCAPE					
6.9	Tree Planting				
6.9.1	Tree @ double-tree planter w/ 150mm high curb+drainage	24	ea.	\$11,450.00	\$274,800.00
6.9.2	Tree @ double-tree planter w/ 450mm high planter wall+drainage	32	ea.	\$17,175.00	\$549,600.00
6.9.3	Tree @ single-tree in grate	36	ea.	\$11,450.00	\$412,200.00
SITE FURNITURE					
6.10	Street Lighting				
6.10.1	Pedestrian Lighting	76	ea.	\$17,175.00	\$1,305,300.00
6.10.2	Road and Pedestrian lighting	76	ea.	\$22,900.00	\$1,740,400.00
6.11	Site Furnishing (Benches, Bollards, Trash cans, Way-finding signage, Bike Racks)	1	Lump sum	7%	\$550,198.25
UTILITIES					
6.12	Concrete Encased Duct Banks (20 ducts / lm, one side)	1225	lm	\$2,405.00	\$2,946,125.00
6.13	Relocation of Hydro Pole (w/streetlight)	31	ea.	\$12,000.00	\$372,000.00
6.14	Relocation of Transformer	5	ea.	\$8,500.00	\$42,500.00
SERVICING					
6.15	Relocaion of Catchbasin (incl. new CB and lead connection to existing CBMH)	40	ea.	\$5,500.00	\$220,000.00
					\$11,990,798.25
7 Highway 407 (740m Segment)					
HARDSCAPE					
7.1	Conc. Barrier Curb with Gutter	1480	m	\$143.00	\$211,640.00
7.2	Conc. Sidewalk (3m wide each side)	4440	m ²	\$114.50	\$508,380.00
7.3	Unit Paving - amenities zone & lay-by parking	60	m ²	\$250.00	\$15,000.00
7.4	Cycle Track	2960	m ²	\$92.00	\$272,320.00
7.5	Transit / Bus Stop including unit paving, shelter and site furniture	2	ea.	\$146,200.00	\$292,400.00
ROADWAY					
7.6	Raised Medians				
	Median	105	m	\$859.00	\$90,195.00
7.6.1	Median w/ trees and drainage	205	m	\$2,863.00	\$586,915.00
7.6.2	Median @ left turn lane	113	m	\$515.00	\$58,195.00
7.7	Intersections				
7.7.1	Two (2) special intersections+Multiple crosswalks @Yonge and North Entrance of the Proposed Parking Lot and Yonge and North Exit Ramp Exit of Hwy 407	1	Lump sum	\$364,000.00	\$364,000.00
SOFTSCAPE					
7.8	Tree Planting				
7.8.1	Tree @ single-tree in grate	10	ea.	\$11,450.00	\$114,500.00
7.8.2	Tree @ double-tree planter w/ 150mm high curb+drainage	25	ea.	\$17,175.00	\$429,375.00
7.8.3	Tree @ double-tree planter w/ 450mm high planter wall+drainage	10	ea.	\$22,900.00	\$229,000.00
SITE FURNITURE					
7.9	Street Lighting				
7.9.1	Pedestrian Lighting	48	ea.	\$17,175.00	\$824,400.00
7.9.2	Road and Pedestrian lighting	48	ea.	\$22,900.00	\$1,099,200.00
7.10	Site Furnishing (Benches, Bollards, Trash cans, Way-finding signage, Bike Racks)	1	Lump sum	7%	\$356,686.40
UTILITIES					
7.11	Concrete Encased Duct Banks (20 ducts / lm, one side)	740	lm	\$2,405.00	\$1,779,700.00
7.12	Relocation of Hydro Pole (w/streetlight)	5	ea.	\$12,000.00	\$60,000.00
7.13	Relocation of Transformer	1	ea.	\$8,500.00	\$8,500.00
SERVICING					
7.14	Relocaion of Catchbasin (incl. new CB and lead connection to existing CBMH)	1	ea.	\$5,500.00	\$5,500.00
					\$7,305,906.40

8 Richmond Hill Centre (290m Segment)					
HARDSCAPE					
8.1	Conc. Barrier Curb with Gutter	580	m	\$143.00	\$82,940.00
8.2	Conc. Sidewalk (3m wide each side)	1740	m ²	\$114.50	\$199,230.00
8.3	Unit Paving - amenities zone & lay-by parking	290	m ²	\$250.00	\$72,500.00
8.4	Cycle Track				
8.5	Transit / Bus Stop including unit paving, shelter and site furniture	2	ea.	\$146,200.00	\$292,400.00
ROADWAY					
8.6	Median				
8.6.1	Decorative Median	148	m	\$859.00	\$127,132.00
8.7	Intersections				
8.7.1	One (1) special intersections+Multiple crosswalks @ Yonge and Garden Ave.	1	Lump sum	\$245,030.00	\$245,030.00
SOFTSCAPE					
8.8	Tree Planting				
8.8.1	Tree @ single-tree in grate	12	ea.	\$11,450.00	\$137,400.00
8.8.2	Tree @ at grade w/flush curb+drainage and groundcover planting	14	ea.	\$9,160.00	\$128,240.00
8.8.3	Tree @ double-tree planter w/ 150mm high curb+drainage	3	ea.	\$17,175.00	\$51,525.00
8.8.4	Tree @ double-tree planter w/ 450mm high planter wall+drainage	28	ea.	\$22,900.00	\$641,200.00
SITE FURNITURE					
8.9	Street Lighting				
8.9.1	Pedestrian Lighting	24	ea.	\$17,175.00	\$412,200.00
8.9.2	Road and Pedestrian lighting	24	ea.	\$22,900.00	\$549,600.00
8.10	Site Furnishing (Benches, Bollards, Trash cans, Way-finding signage, Bike Racks)	1	Lump sum	7%	\$205,757.79
UTILITIES					
8.11	Concrete Encased Duct Banks (20 ducts / lm, one side)	290	lm	\$2,405.00	\$697,450.00
8.12	Relocation of Hydro Pole (w/streetlight)	8	ea.	\$12,000.00	\$96,000.00
8.13	Relocation of Transformer	0	ea.	\$8,500.00	\$0.00
SERVICING					
8.14	Relocaion of Catchbasin (incl. new CB and lead connection to existing CBMH)2	22		\$5,500.00	\$121,000.00
					\$4,059,604.79
				Subtotal	\$50,581,250.42
				20% Contingency	\$10,116,250.08
				Subtotal	\$60,697,500.50
				13% HST	\$7,890,675.07
				TOTAL	\$68,588,175.57

SUMMARY:

TOTAL WITH UTILITY DUCT BANKS: \$68,588,175.57
 TOTAL WITHOUT UTILITY DUCT BANKS: \$55,181,093.57

NOTES:

- a. Cost Estimate based on Pre-Subway Plan (2012) and is subject to the Final Subway Design by Metrolinx
- b. Scope of Cost Estimate: Yonge Street (Steeles Avenue-Garden Avenue)
- c. Capital and Maintenance/Operations costs provided by York Region and based on Phase 4 Detailed Design Guidelines
- d. Costs account for supply and installation
- e. CPI Index; 2021 Dollars

Table C: Order of Magnitude Operations and Maintenance Cost Estimate South Yonge
 March, 2021

Item#	Description	Qty	Unit	Unit Cost	Subtotal	Totals (Ultimate Plan)	Totals (Pre-Subway)
1	Steeles Gateway (630m Segment) (does not include plazas at Yonge-Steeles)						75%
	HARDSCAPE						
1.1	Conc. Sidewalk (3m wide each side)	3520	m ²	\$5.87	\$20,662.40		
1.2	Unit Pavers - amenities zone and lay-by parking	3795	m ²	\$16.47	\$62,503.65		
1.3	Streetprint - cycle tracks and intersections	2530	m ²	\$11.73	\$37,950.00		
1.4	Transit/Bus Stop-Bus Shelter, site furniture, paving	3	ea.	\$2,058.00	\$6,174.00		
	ROADWAY						
1.5	Decorative Median (with unit pavers)	560	m ²	\$16.47	\$9,223.20		
1.6	Crosswalks (all 4 arms)	3	ea.	\$47.04	\$141.12		
	SOFTSCAPE						
1.7	Tree	79	ea.	\$177.50	\$14,022.50		
1.8	Planters	1,097	m ²	\$82.00	\$89,954.00		
1.9	Median Planters	1,219	m ²	\$56.00	\$68,264.00		
	SITE FURNITURE						
1.10	Bike Racks	6	ea.	\$20.70	\$124.20		
1.11	Trash Cans	20	ea.	\$413.94	\$8,278.80		
1.12	Benches	50	ea.	\$413.94	\$20,697.00		
1.13	Road and Pedestrian Lighting	72	ea.	\$117.28	\$8,444.16		
						\$346,439.03	\$259,829.27
2	CN Rail Deck (80m Segment)						80%
	HARDSCAPE						
2.1	Unit Pavers including deck	9000	m ²	\$16.47	\$148,230.00		
2.2	Street Print Cycle Track	423	m ²	\$11.73	\$4,230.00		
	SOFTSCAPE						
2.3	Tree	84	ea.	\$177.50	\$14,910.00		
	SITE FURNITURE						
2.4	Bike Racks	6	ea.	\$20.70	\$124.20		
2.5	Trash Cans	8	ea.	\$413.94	\$3,311.52		
2.6	Road and Pedestrian Lighting	18	ea.	\$117.28	\$2,111.04		
2.7	Benches	32	ea.	\$413.94	\$13,246.08		
						\$186,162.84	\$148,930.27
3	Clark Station (720m Segment) (does not include Market Square or subway station)						20%
	HARDSCAPE						
3.1	Conc. Sidewalk (3m wide each side)	3867	m ²	\$5.87	\$22,699.29		
3.2	Unit Pavers - amenities zone and lay-by parking	2223	m ²	\$16.47	\$36,612.81		
3.3	Streetprint - cycle tracks and intersections	3795	m ²	\$11.73	\$37,950.00		

3.4	Transit/Bus Stop-Bus Shelter, site furniture, paving	3	ea.	\$2,058.00	\$6,174.00		
	ROADWAY						
3.5	Crosswalks (all 4 arms)	4	ea.	\$47.04	\$188.16		
	SOFTSCAPE						
3.6	Tree	99	ea.	\$177.50	\$17,572.50		
3.7	Groundcover Planting	2,045	m ²	\$56.00	\$114,520.00		
3.8	Median Planters	369	m ²	\$56.00	\$20,664.00		
	SITE FURNITURE						
3.9	Trash Cans	20	ea.	\$413.94	\$8,278.80		
3.10	Benches	35	ea.	\$413.94	\$14,487.90		
3.11	Road and Pedestrian Lighting	90	ea.	\$117.28	\$10,555.20		
						\$289,702.66	\$57,940.53
4	Old Thornhill (910m Segment)						75%
	HARDSCAPE						
4.1	Conc. Sidewalk (3m wide each side)	4887	m ²	\$5.87	\$28,686.69		
4.2	Unit Pavers - amenities zone and lay-by parking	1820	m ²	\$16.47	\$29,975.40		
4.3	Streetprint - cycle tracks and intersections	4550	m ²	\$11.73	\$53,371.50		
	ROADWAY						
4.4	Crosswalks (all 4 arms)	3	ea.	\$47.04	\$141.12		
	SOFTSCAPE						
4.5	Tree	73	ea.	\$177.50	\$12,957.50		
4.6	Planters	1,719	m ²	\$82.00	\$140,958.00		
4.7	Median planters	45	m ²	\$56.00	\$2,520.00		
	SITE FURNITURE						
4.8	Trash Cans	22	ea.	\$413.94	\$9,106.68		
4.9	Benches	14	ea.	\$413.94	\$5,795.16		
4.10	Bike Racks	8	ea.	\$20.70	\$165.60		
4.11	Road and Pedestrian lighting	112	ea.	\$117.28	\$13,135.36		
						\$296,813.01	\$222,609.76

TABLE C: continued

5	Don River Bridge (140m Segment)								0%
HARDSCAPE									
5.1	Unit Pavers - amenities zone	90	m ²	\$16.47	\$1,482.30				
5.2	Streetprint - cycle tracks	700	m ²	\$11.73	\$8,211.00				
SOFTSCAPE									
5.3	Planters	180	m ²	\$56.00	\$10,080.00				
SITE FURNITURE									
5.4	Trash Cans	4	ea.	\$413.94	\$1,655.76				
5.5	Benches	30	ea.	\$413.94	\$12,418.20				
5.6	Road and Pedestrian Lighting	18	ea.	\$117.28	\$2,111.04				
5.7	Bike Racks	4	ea.	\$20.70	\$82.80				
							\$36,041.10	\$0.00	
6	New Thornhill (1225m Segment)								72%
HARDSCAPE									
6.1	Conc. Sidewalk (3m wide each side)	7350	m ²	\$5.87	\$43,144.50				
6.2	Unit Pavers - amenities zone and lay-by parking	3628	m ²	\$16.47	\$59,753.16				
6.3	Streetprint - cycle tracks and intersections	4900	m ²	\$11.73	\$49,000.00				
6.4	Transit/Bus Stop-Bus Shelter, site furniture, paving	8	ea.	\$2,058.00	\$16,464.00				
ROADWAY									
6.5	Crosswalks (all 4 arms)	4	ea.	\$47.04	\$188.16				
SOFTSCAPE									
6.6	Tree	92	ea.	\$177.50	\$16,330.00				
6.7	Planters	1,600	m ²	\$82.00	\$131,200.00				
SITE FURNITURE									
6.8	Bike Racks	8	ea.	\$20.70	\$165.60				
6.9	Trash Cans	22	ea.	\$413.94	\$9,106.68				
6.10	Benches	22	ea.	\$413.94	\$9,106.68				
6.11	Road and Pedestrian Lighting	152	ea.	\$117.28	\$17,826.56				
							\$352,285.34	\$253,645.44	
7	Highway 407 (740m Segment)								100%
HARDSCAPE									
7.1	Conc. Sidewalk (3m wide each side)	4440	m ²	\$5.87	\$26,062.80				
7.2	Unit Pavers - amenities zone	60	m ²	\$16.47	\$988.20				
7.3	Streetprint - cycle tracks and intersections	2969	m ²	\$11.73	\$29,690.00				
7.4	Transit/Bus Stop-Bus Shelter, site furniture, paving	2	ea.	\$2,058.00	\$4,116.00				
ROADWAY									
7.5	Decorative Median (with unit pavers)	205	m ²	\$16.47	\$3,376.35				
7.6	Crosswalks (all 4 arms)	2	ea.	\$47.04	\$94.08				
SOFTSCAPE									
7.7	Tree	45	ea.	\$177.50	\$7,987.50				
7.8	Planters	1,038	m ²	\$82.00	\$85,116.00				
7.9	Groundcover Planting	965	m ²	\$56.00	\$54,040.00				
SITE FURNITURE									
7.10	Bike Racks	4	ea.	\$20.70	\$82.80				
7.11	Trash Cans	16	ea.	\$413.94	\$6,623.04				
7.12	Benches	12	ea.	\$413.94	\$4,967.28				
7.13	Road and Pedestrian Lighting	96	ea.	\$117.28	\$11,258.88				
							\$234,402.93	\$234,402.93	

8	Richmond Hill Centre (180m Segment)								100%
HARDSCAPE									
8.1	Conc. Sidewalk (3m wide each side)	1170	m ²	\$5.87	\$6,867.90				
8.2	Unit Pavers - amenities zone and lay-by parking	290	m ²	\$16.47	\$4,776.30				
8.3	Streetprint - cycle tracks and intersections	1160	m ²	\$11.73	\$11,600.00				
8.4	Transit/Bus Stop-Bus Shelter, site furniture, paving	2	ea.	\$2,058.00	\$4,116.00				
ROADWAY									
8.5	Decorative Median (with unit pavers)	148	m ²	\$16.47	\$2,437.56				
8.6	Crosswalks (all 4 arms)	4	ea.	\$47.04	\$188.16				
SOFTSCAPE									
8.7	Tree	29	ea.	\$177.50	\$5,147.50				
8.8	Planters	450	m ²	\$82.00	\$36,900.00				
SITE FURNITURE									
8.9	Bike Racks	4	ea.	\$20.70	\$82.80				
8.10	Trash Cans	8	ea.	\$413.94	\$3,311.52				
8.11	Benches	8	ea.	\$413.94	\$3,311.52				
8.12	Road and Pedestrian Lighting	24	ea.	\$117.28	\$2,814.72				
							\$81,553.98	\$81,553.98	
							Subtotal	\$1,823,400.89	\$1,258,916.66
							20% Contingency	\$364,680.18	\$251,783.33
							Subtotal	\$2,188,081.07	\$1,510,699.99
							13% HST	\$284,450.54	\$196,391.00
							TOTAL	\$2,472,531.61	\$1,707,090.99

NOTES:

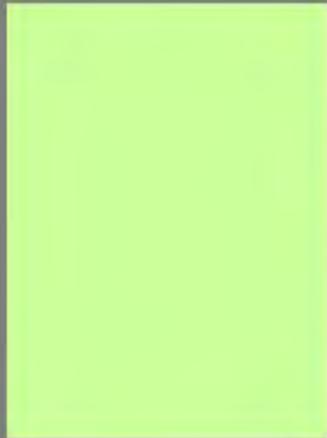
- a. Cost Estimate based on Pre-Subway Plan (2012) and is subject to the Final Subway Design by Metrolinx
- b. Scope of Cost Estimate: Yonge Street (Steeles Avenue-Garden Avenue)
- c. Capital and Maintenance/Operations costs provided by York Region and based on Phase 4 Detailed Design Guidelines
- d. Costs account for supply and installation
- e. CPI Index; 2021 Dollars

TABLE D: 2012/2021 Capital / Operations Cost

	2012 SMYP	2021 SMYP Update
Hydro Undergrounding	\$15 million	\$18 million
Pre-Subway Plan	\$38 million	\$55 million
Ultimate Plan	\$45 million	\$65 million
Operations & Maintenance	Pre-Subway: \$213,000/km Ultimate Plan: \$300,000/km	Pre-Subway: \$210,000/km Ultimate Plan: \$304,000/km



APPENDIX 2: PUBLIC ART POLICY PROCESS



PUBLIC ART POLICY PROCESS

POLICY RECOMMENDATIONS

At the time of the original drafting of the South Yonge Street Corridor Streetscape Master Plan and Pre-Subway Plan (2011), neither City of Markham nor City of Richmond Hill had active public art policies. Since the time of the original report, in 2012, both jurisdictions have implemented public art policies. Further, since the original report, the City of Markham has adopted a five year Public Art Master Plan (2020-2024).

As such, this report recognizes the public art policy documents and recommends that all actions relative to public art policy and implementation follow the guidelines set out in the policies relevant to each City.

The following text is from the original document, for reference purposes:

The area of study involved York Region, the Cities of Markham, Richmond Hill and Vaughan with the City of Toronto lies immediately south of the study area.

Recommendation 1: given that the various stakeholders may have separate public art policies or none at all, it is recommended that a shared public art policy be adopted for the study area or that a special public art zone is created for the study area.

Recommendation 2: A shared vision for public art in the study area should be considered such that stakeholders from the Region and Cities participate on a public art steering committee. This steering

committee would take an overview approach to public art policy and implementation such that a global view of the area is considered, identifying public art opportunities on private and public lands.

IMPLEMENTATION RECOMMENDATIONS

Private Sector Participation

As no changes or modifications have been made since the 2012 Master Plan, the followings from the original document is retained:

Recommendation 1: adoption of a percent for art programme through Section 37 or equivalent planning act mechanism. Artworks should be located in the most publically accessible locations as possible. City of Toronto has an existing policy that can act as a foundation for this programme.

Recommendation 2: all or part of private sector contributions may be transferred off site. Offsite locations should be selected through an overview analysis of appropriate locations. A stakeholder committee representing local interests as well as expertise in art, architecture and urban design should be formed to select these sites.

Recommendation 3: where possible, as determined through the site selection process described above, opportunities for the provision of privately owned, publically accessible space, adjacent to public walkways should be encouraged. These spaces are excellent opportunities for the incorporation of public artwork, either as stand-

alone works or as integrated artworks, in collaboration with landscape and architectural disciplines.

Recommendation 4: Existing sites, identified during the course of this study as suitable for offsite transfer include:

- Powerline Park: located south of the 407 and west of Yonge Street, the hydro-electric transmission corridor provides and excellent opportunity for the creation of a park-like space that capitalizes on the massive scale and specific use of this corridor.
- Valley Crossing Bridge: spanning the valley that is currently occupied by two golf courses, this bridge provides an opportunity for the incorporation of public art into an element of urban infrastructure. A collaboration with the bridge design team is recommended.
- CN Bridge: spanning the CN right of way, renovations to, or reconstruction of this bridge will provide an opportunity for public art vision in the design of improved public space.

Public Sector Participation

The following text is from the original document, for reference purposes:

Recommendation 5: artworks should be incorporated as part of public agency capital expenditure policy. One percent of capital projects should be allocated to the provision of public artwork. The

Toronto Transit Commission operates a percent for art programme; funds from this programme should be considered as a component of the funding base for the provision of public art.

Recommendation 6: existing public sites, identified during the course of this study as suitable for public funding include:

- TTC stations: as a component of the TTC's Yonge Street extension, public artworks should be included within the stations and in the public areas around the stations
- CN Bridge: as noted in the section on private sector funding opportunities, this bridge provides opportunity for both private sector funding as well as funding from CN. Matched funding: one dollar from CN matched to every dollar from the private sector should be a reasonable request.
- 407 ETR: this privately operated toll road should be a partner in funding artworks near the roadway. Developing a relationship with this entity and encouraging their participation in public space improvement, including public art, is encouraged.



APPENDIX 3: IMPACT OF 2021 SYMP ON EXISTING DEVELOPMENT (2012 SYMP)



IMPACT OF 2021 SYMP ON EXISTING DEVELOPMENT (2012 SYMP)

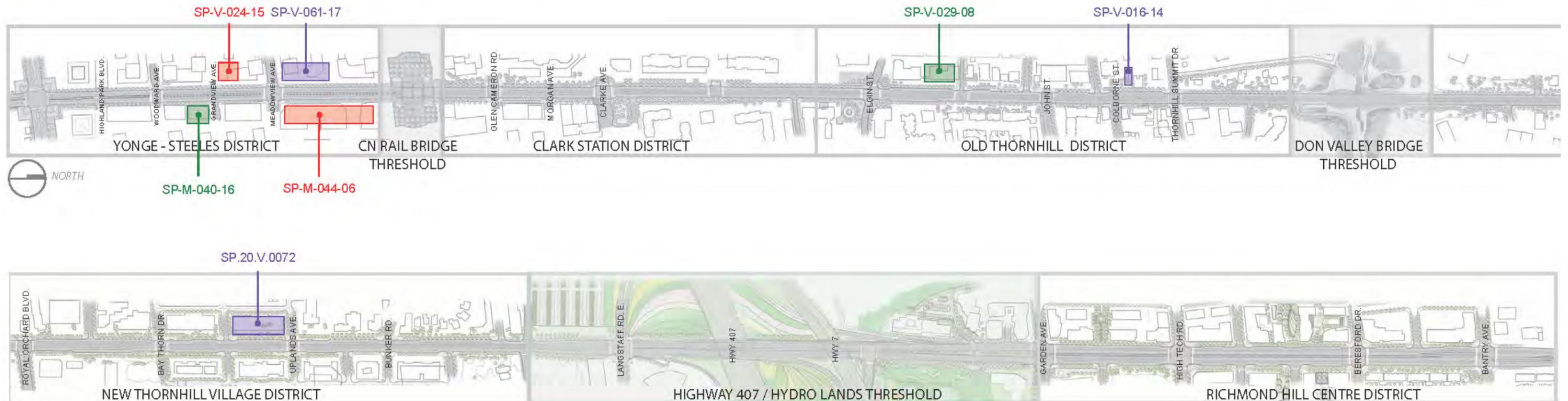
INTRODUCTION

Since the approval of the 2012 South Yonge Corridor Master Plan (SYMP) there have been seven (7) development applications received by York Region. Of those submitted, four (4) have been approved with two (2) having the Interim Streetscape constructed, and a cash payout on Ultimate Streetscape and two (2) having the Ultimate Streetscape constructed. The remaining three (3) applications include the ultimate streetscape and are under review and not yet constructed or approved.

The impacts of these developments on the 2021 updated Master Plan for South Yonge Corridor vary and have been addressed in the following section.

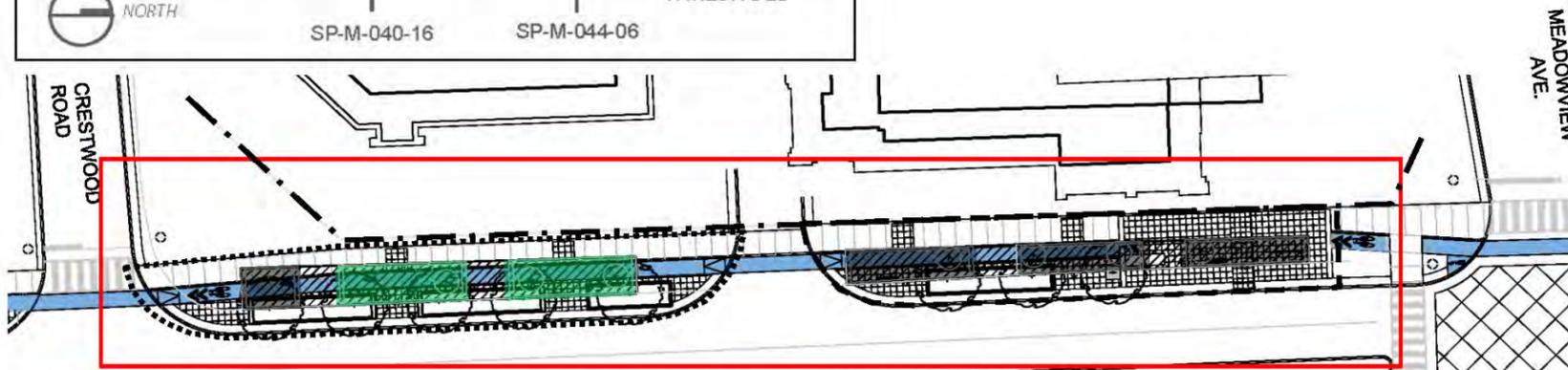
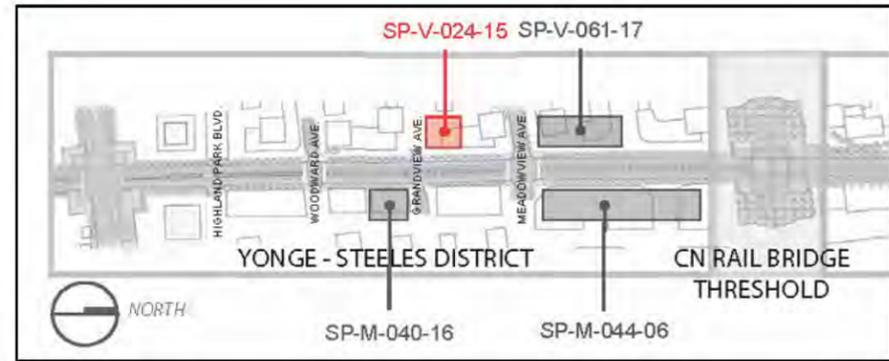
AFFECTED DEVELOPMENT APPLICATIONS

- INTERIM STREETScape CONSTRUCTED, CASH PAYOUT ON ULTIMATE
- ULTIMATE STREETScape CONSTRUCTED
- ULTIMATE STREETScape UNDER REVIEW, NOT YET CONSTRUCTED / APPROVED

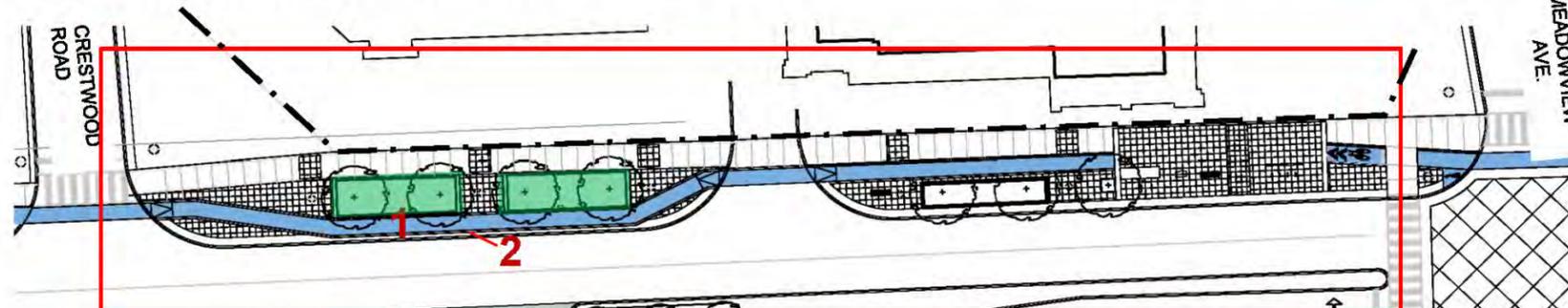


INTERIM STREETScape CONSTRUCTED, CASH PAYOUT ON ULTIMATE (approved 2016)

SP-V-024-15 FORD LINCOLN



PLAN SHOWING EXISTING DEVELOPMENT CONSTRUCTION OVERLAID ON 2021 MASTER PLAN



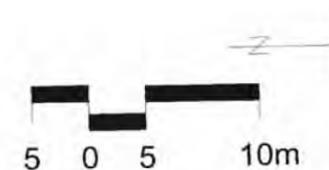
PLAN SHOWING MODIFIED IMPLEMENTATION OF 2021 MASTER PLAN

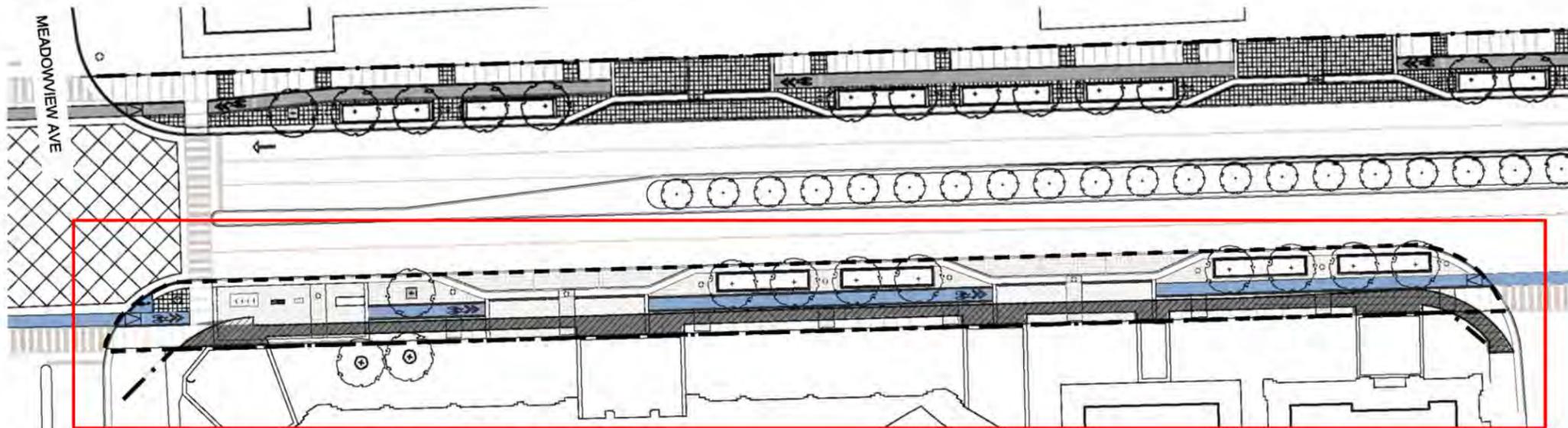
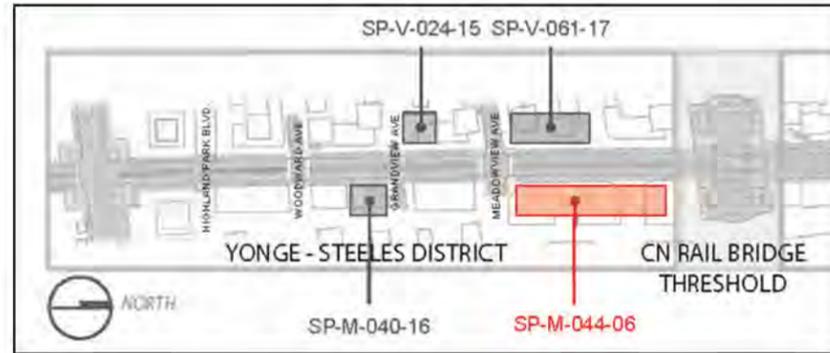
KEY

-  EXISTING R.O.W.
-  PLAN AREA
-  CYCLE TRACK
-  IMPACT AREA
-  EXISTING INTERIM CONSTRUCTION TO BE REMOVED
-  EXISTING INTERIM CONSTRUCTION/PLANTERS TO REMAIN AND BE PROTECTED
-  FULL IMPLEMENTATION OF 2021 MASTER PLAN*
-  MODIFIED IMPLEMENTATION OF 2021 MASTER PLAN**

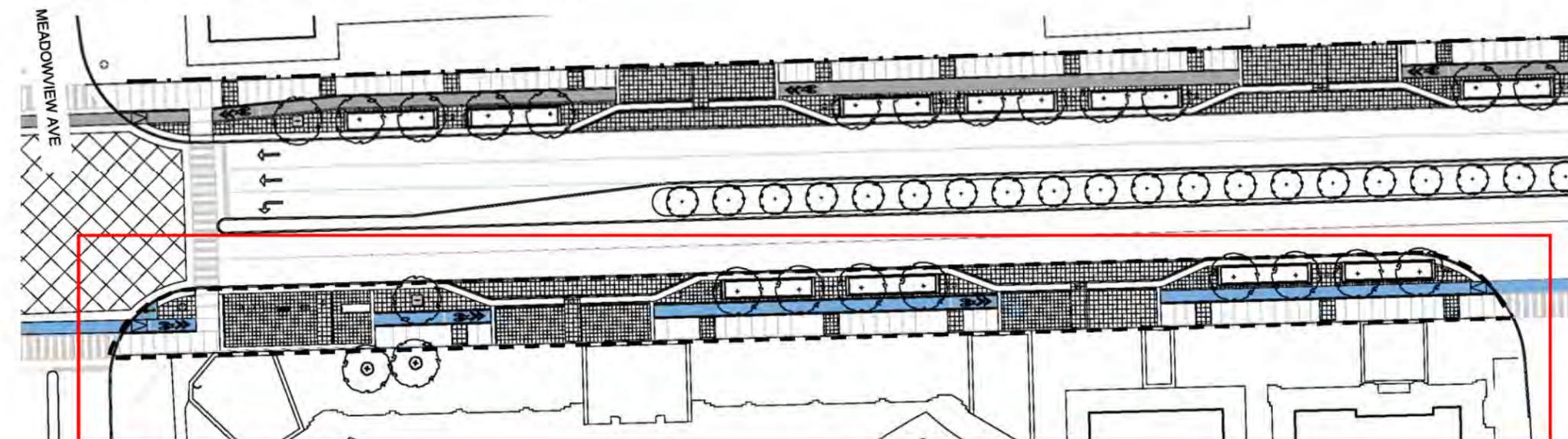
* Full implementation of the 2021 Master Plan is required due to the relocation of the Transit/Bus stop to the south side of Meadowview Avenue.

**Modified implementation of the 2021 Master Plan (1) repositions the cycle track adjacent to the roadway curb and (2) decreases the width of the continuity strip to 0.7m.





PLAN SHOWING EXISTING DEVELOPMENT INTERIM CONSTRUCTION OVERLAID ON 2021 MASTER PLAN

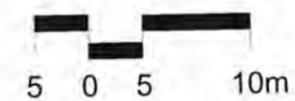


PLAN SHOWING FULL IMPLEMENTAION OF 2021 MASTER PLAN

KEY

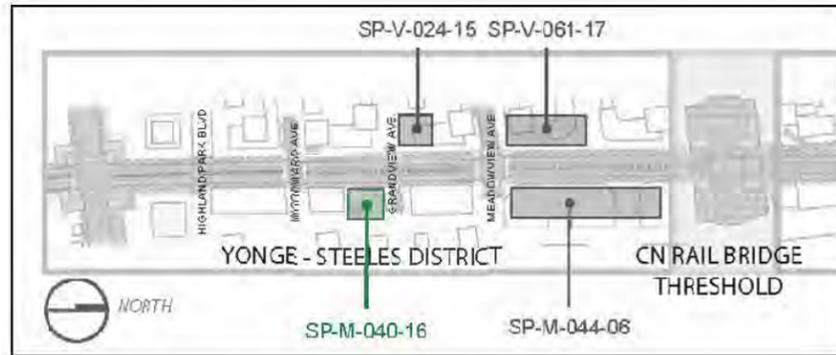
-  EXISTING R.O.W.
-  PLAN AREA
-  CYCLE TRACK
-  IMPACT AREA
-  EXISTING SIDEWALK/ INTERIM CONSTRUCTION TO BE REMOVED*
-  FULL IMPLEMENTAION OF 2021 MASTER PLAN

* Existing trees planted within the Boulevard to be transplanted with the direction of arborist.

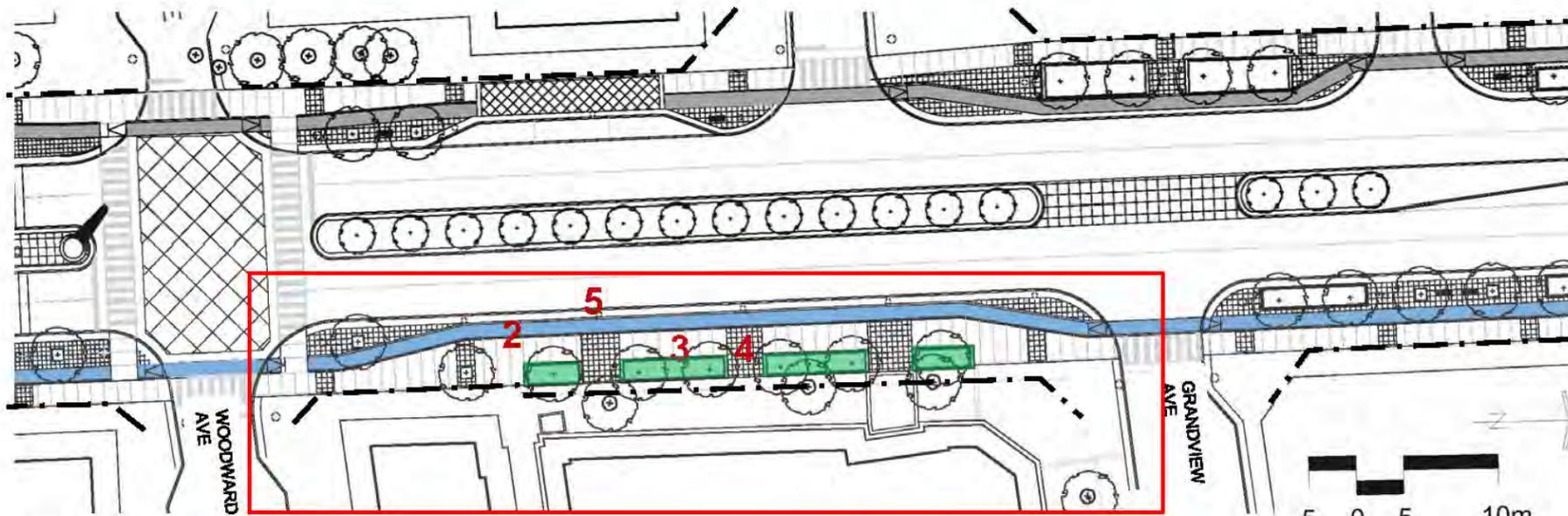
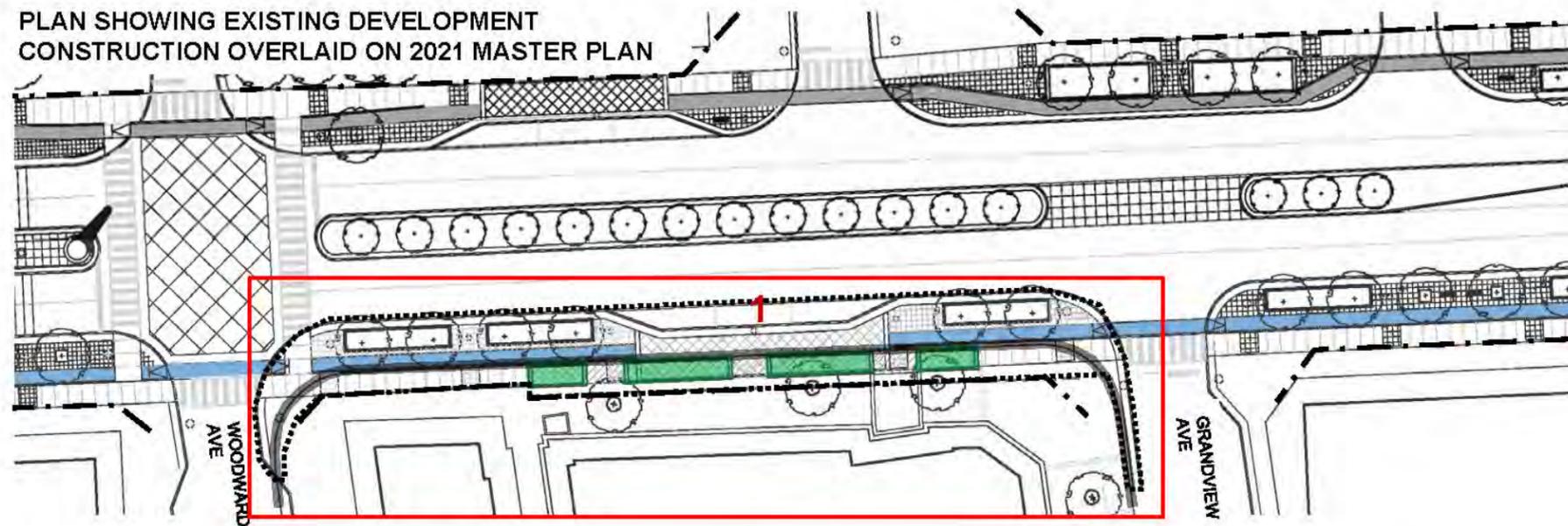


ULTIMATE STREETSCAPE CONSTRUCTED (approved 2018)

SP-M-040-16 YONGE GRANDVIEW CORP./ DEVRON DEVELOPMENTS



PLAN SHOWING EXISTING DEVELOPMENT
CONSTRUCTION OVERLAID ON 2021 MASTER PLAN

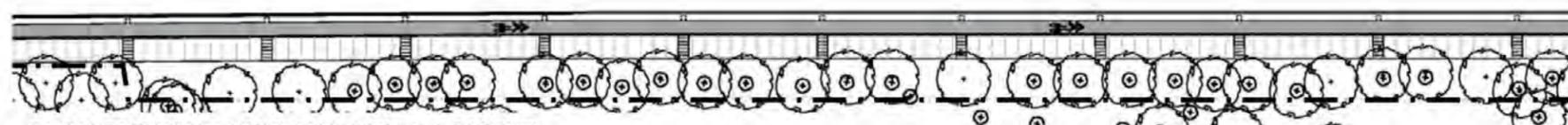
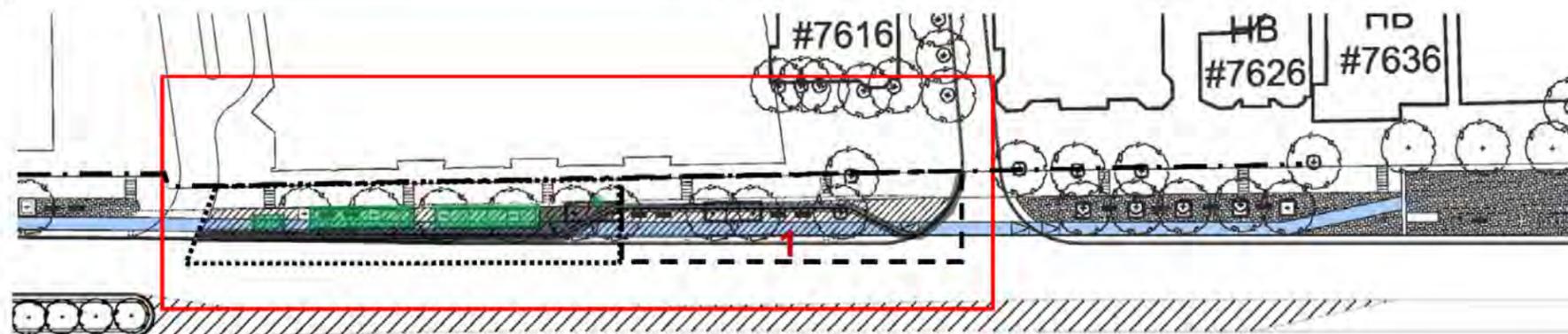
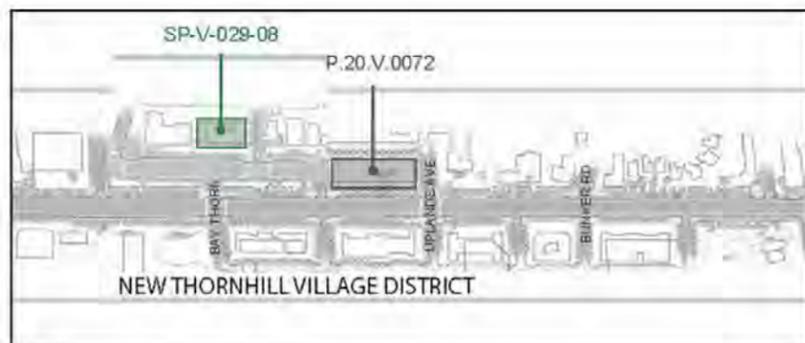


PLAN SHOWING MODIFIED
IMPLEMENTAION OF 2021 MASTER PLAN

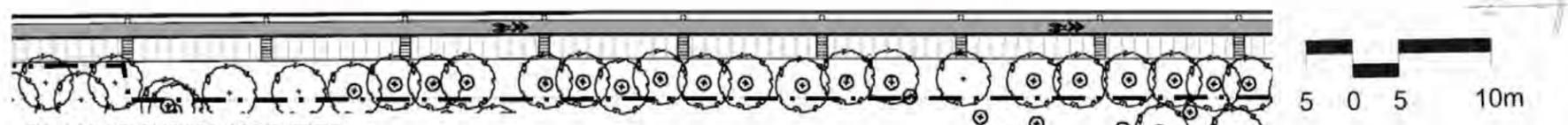
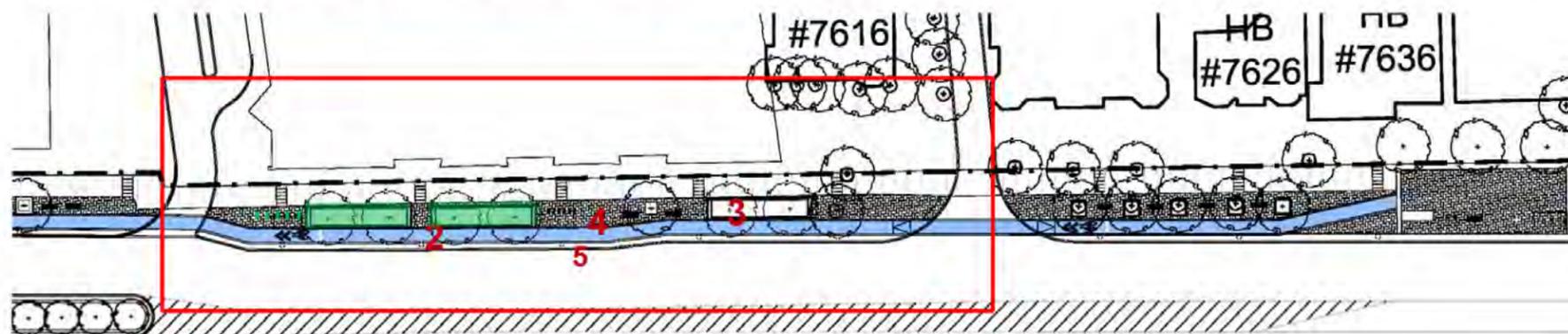
KEY

-  EXISTING R.O.W.
-  PLAN AREA
-  CYCLE TRACK
-  IMPACT AREA
-  EXISTING INTERIM CONSTRUCTION TO BE REMOVED (curb)
-  EXISTING ULTIMATE STREETSCAPE CONSTRUCTION/ PLANTERS TO REMAIN, TREES TO TRANSPLANTED
-  MODIFIED IMPLEMENTAION OF 2021 MASTER PLAN**

* Modified implementation of the 2021 Master Plan (1) eliminates the lay-by parking, (2) repositions the cycle track adjacent to roadway curb with (3) pedestrian clearway adjacent to the cycle track, (4) extends accent paving to the width of the space between the planters, and (5) relocates lighting to within continuity strip w/0.7m door clearance.



PLAN SHOWING EXISTING DEVELOPMENT CONSTRUCTION OVERLAID ON 2021 MASTER PLAN



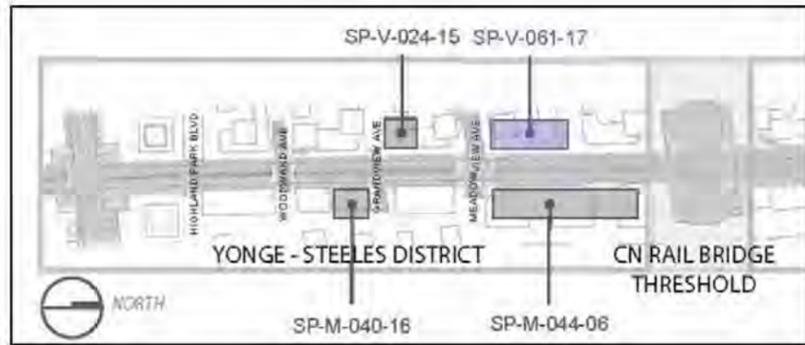
PLAN SHOWING MODIFIED IMPLEMENTATION OF 2021 MASTER PLAN

KEY

- EXISTING R.O.W.
- PLAN AREA
- CYCLE TRACK
- IMPACT AREA
- EXISTING INTERIM CONSTRUCTION TO BE REMOVED (curb)
- EXISTING ULTIMATE STREETScape CONSTRUCTION/ PLANTERS, LIGHTING, AND BICYCLE RACKS TO REMAIN
- FULL IMPLEMENTATION OF 2021 MASTER PLAN*
- MODIFIED IMPLEMENTATION OF 2021 MASTER PLAN**

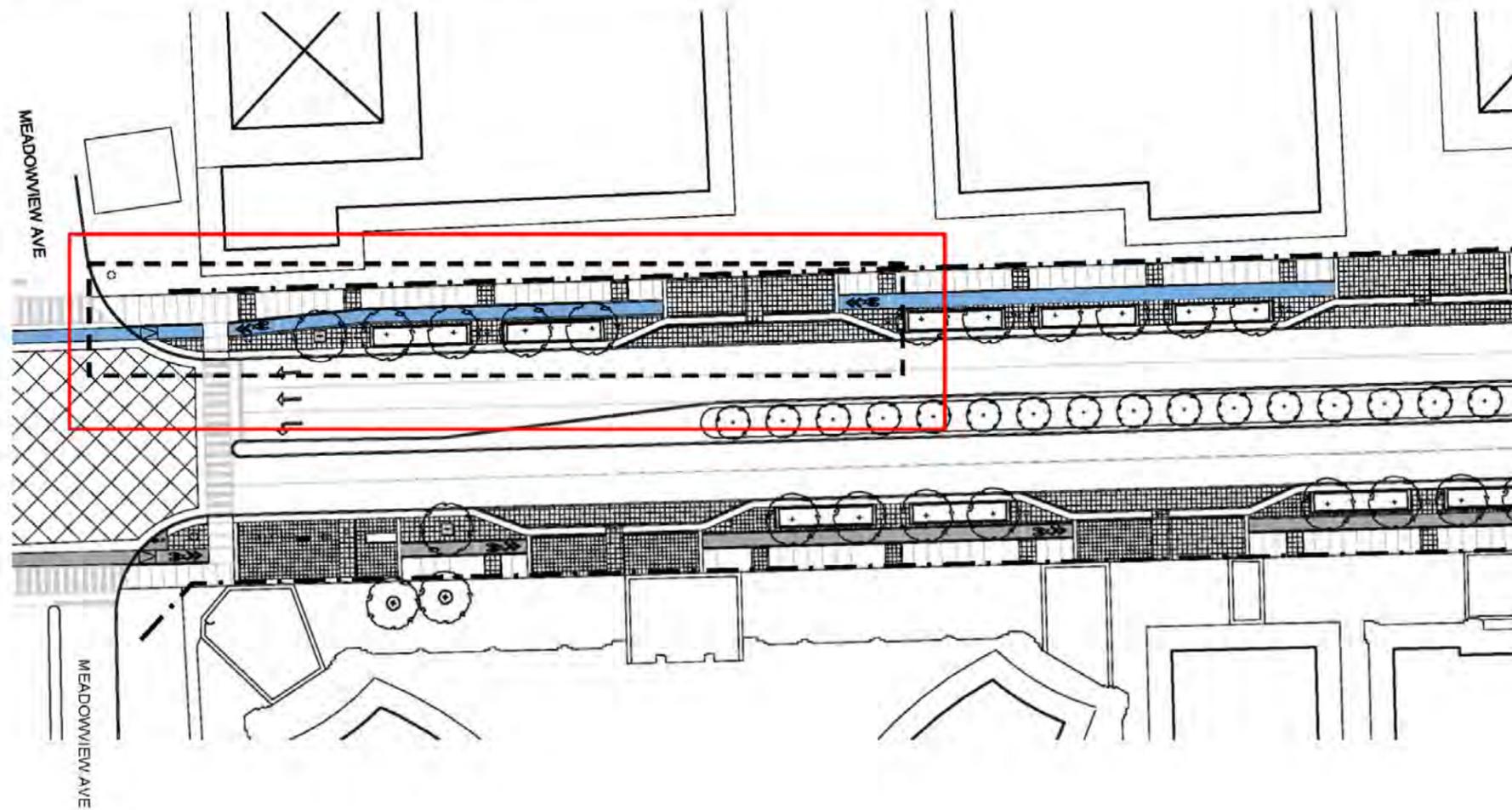
* Full implementation of the 2021 Master Plan is achievable with the elimination of existing lay-by parking.

** Modified implementation of the 2021 Master Plan (1) eliminates the lay-by parking, (2) repositions the cycle track adjacent to roadway curb with (3) additional planter/site furnishing within the amenities zone, (4) extends accent paving to the width of the space between the planters, and (5) relocates lighting to within continuity strip w/0.7m door clearance.



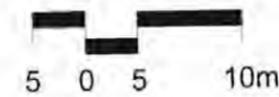
KEY

-  EXISTING R.O.W.
-  PLAN AREA
-  CYCLE TRACK
-  FULL IMPLEMENTAION OF 2021 MASTER PLAN*

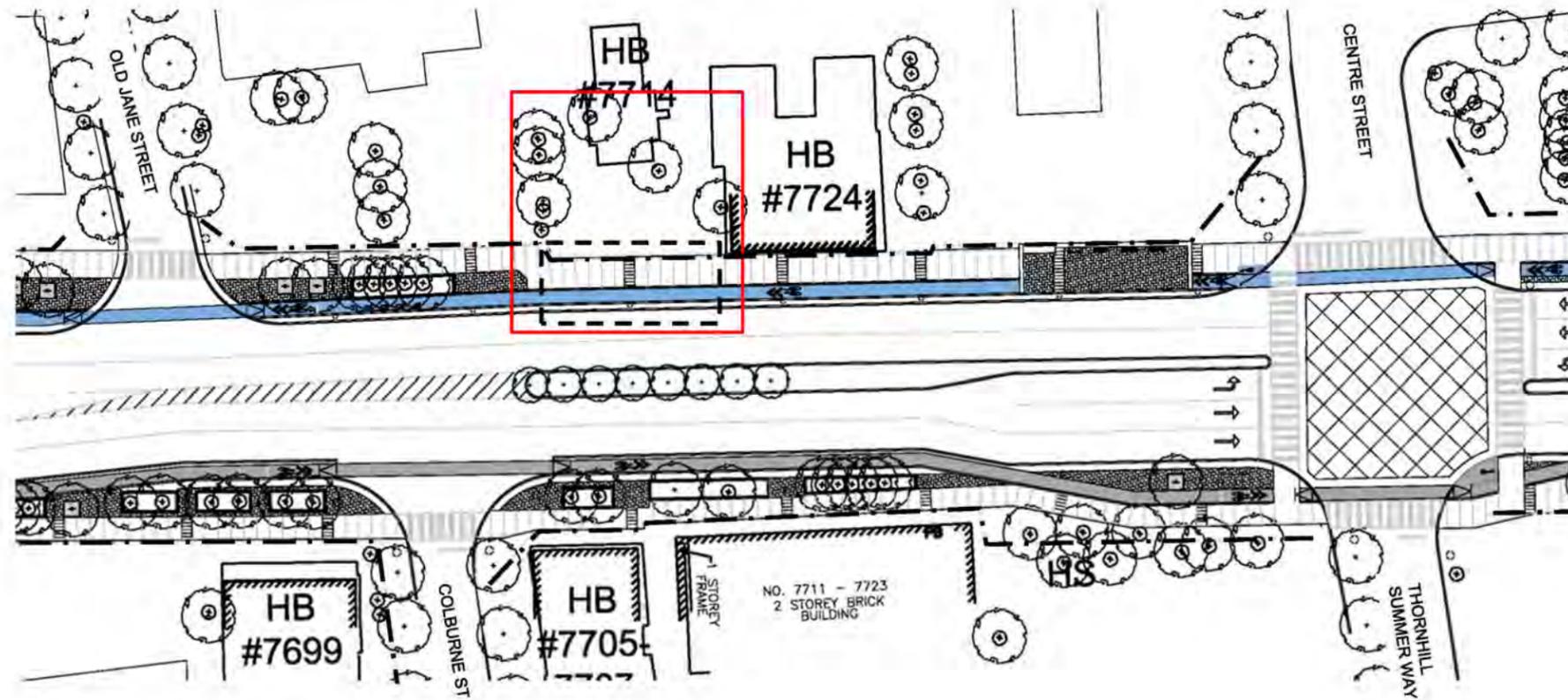
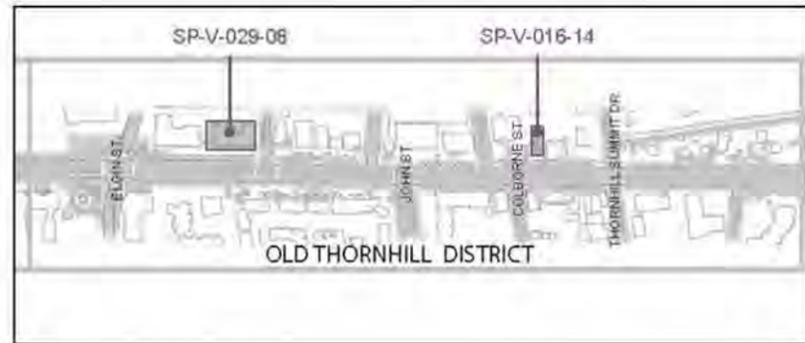


* Full implementation of the 2021 Master Plan is only achievable if the 2012 Ultimate Streetscape is not constructed.

** No Development Plan was available at the time of this study.



PLAN SHOWING FULL IMPLEMENTAION OF 2021 MASTER PLAN**



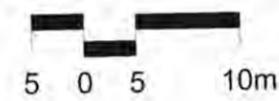
KEY

-  EXISTING R.O.W.
-  PLAN AREA
-  CYCLE TRACK
-  FULL IMPLEMENTAION OF 2021 MASTER PLAN*

PLAN SHOWING FULL IMPLEMENTAION OF 2021 MASTER PLAN**

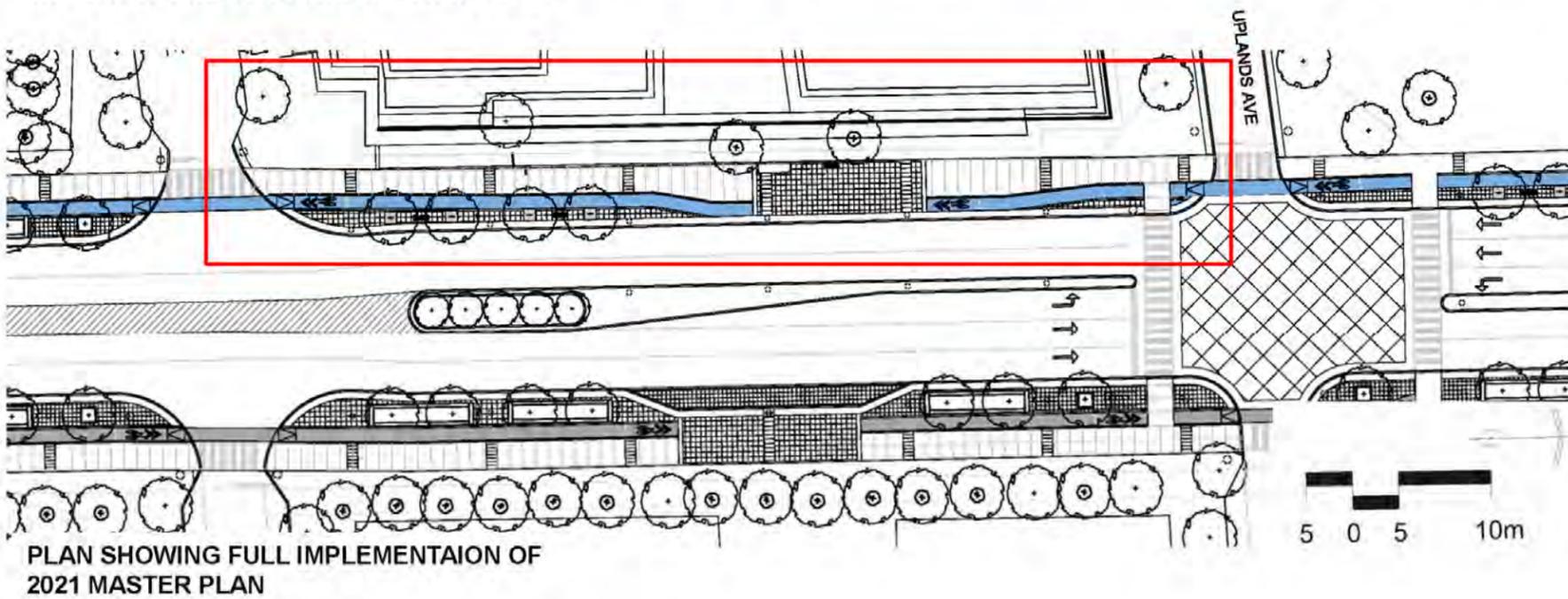
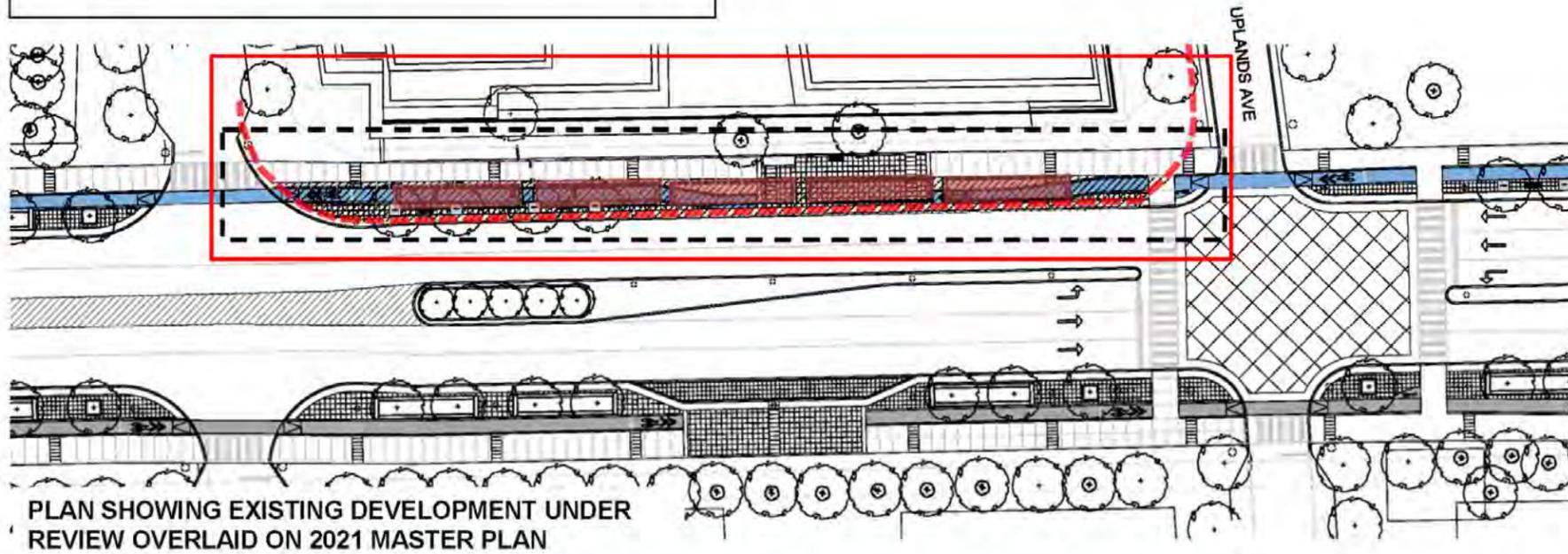
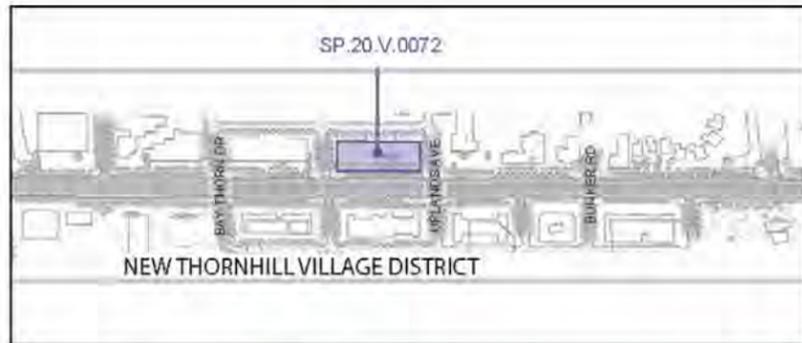
* Full implementation of the 2021 Master Plan is only achievable if the 2012 Ultimate Streetscape is not constructed.

** No Development Plan was available at the time of this study.



ULTIMATE STREETScape UNDER REVIEW, NOT YET CONSTRUCTED / APPROVED

SP.20-V-0072 8188 Yonge Street



KEY

- EXISTING R.O.W.
- PLAN AREA
- CYCLE TRACK
- IMPACT AREA
- 2012 ULTIMATE STREETScape UNDER REVIEW/ NOT CONSTRUCTED/ APPROVED
- 2012 ULTIMATE CURB LOCATION UNDER REVIEW/ NOT CONSTRUCTED/ APPROVED
- FULL IMPLEMENTAION OF 2021 MASTER PLAN*

* Full implementation of the 2021 Master Plan is only achievable if the 2012 Ultimate Streetscape is not constructed as per the approved Development Plan.

