

3.2 Key Design Analysis

The hybrid design for the Yonge Street & Davis Drive Streetscape Master Plan utilizes the key principles from both the Active Yonge & Davis Concept as well as the Green Yonge & Davis Concept, prioritizing different principles based on the streetscape context. The streetscape design aims to optimize:

- Pedestrian Experience
- Cycling Infrastructure
- Accessibility
- Environmental Resilience
- Streetscape Transitions

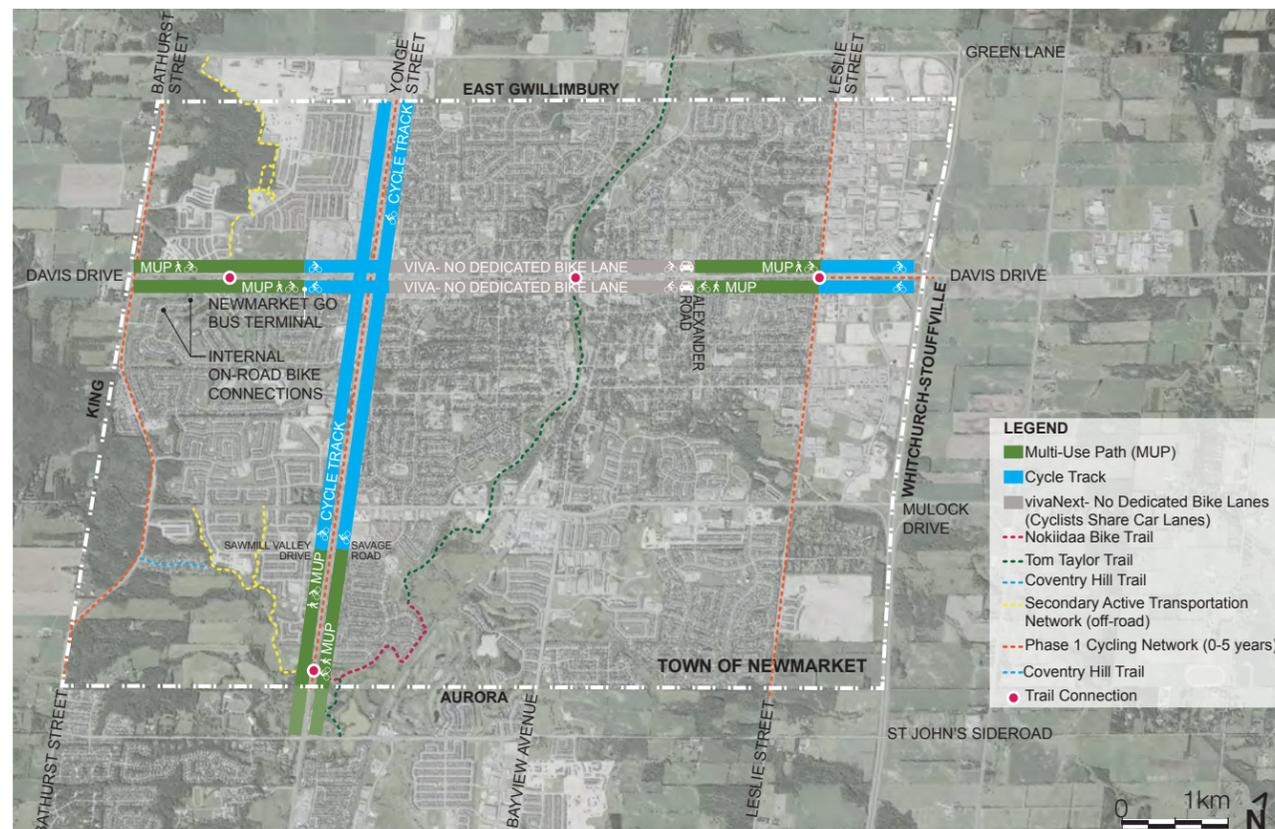
3.2.1 Pedestrian Experience

In order to encourage an active streetscape, the Streetscape Master Plan prioritizes pedestrians. Continuous accessible paths are present along both sides of the street along all corridors. In the more urban areas, these paths are sidewalks. In the urbanized areas street trees are planted in grates approaching signalized intersections to facilitate pedestrian circulation. The less urbanized areas contain multi-use paths that are shared between pedestrians and cyclists. These multi-use paths connect with the existing trail systems and are sheltered from vehicular traffic with landscaped buffers. When pedestrian circulation intersects with vehicular circulation such as driveways, pedestrians are given priority.

3.2.2 Cycling Infrastructure

Active transportation is also encouraged through the presence of cycling facilities along all corridors. Yonge Street North is being designed with a raised cycle track that is segregated from vehicular traffic by a furnishing/ planting zone. The majority of the remaining corridors are equipped with multi-use paths, to be shared by cyclists and pedestrians.

Cyclists' paths through intersections are demarcated through road markings in compliance with Provincial standards. York Region standard bike boxes provide a means for safer left-turns at signalized intersections. Creating enhanced cycling facilities throughout the corridors and therefore encouraging active transportation, as well as transit, could lead to an increase in cyclists and a decrease in the reliance on private vehicles. The Cycling Master Plan conceptually illustrates the planned and existing cycling infrastructure within the project area.



Cycling Master Plan for Yonge Street and Davis Drive

Multi-Use Path



Boulevard Cycle Track



3.2.3 Accessible Intersection Treatment

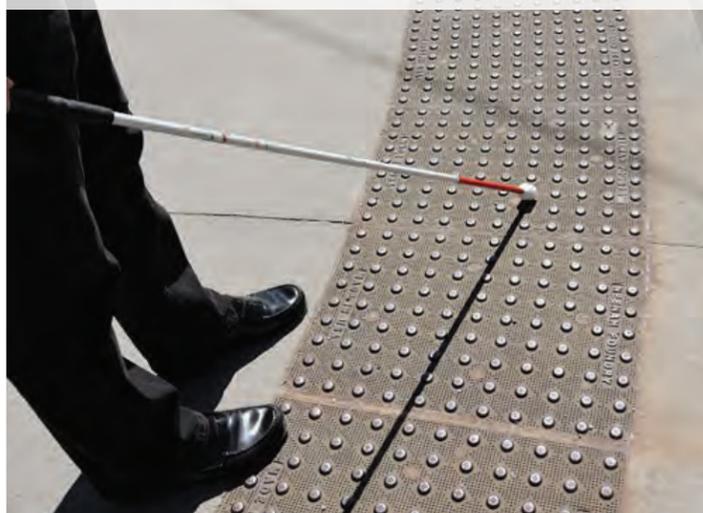
The intersections reinforce a sense of place unique to Newmarket through the use of specialized intersection paving treatments.

Accessible curbs are used at all intersection crossings and AODA compliant tactile plates warn pedestrians that they are transitioning the sidewalk to the roadway. Textured crosswalks provide cues for the visually impaired.

Accessible Wayfinding



Accessible Intersection



3.2.4 Environmental Resilience/LID

Stormwater Management

Stormwater infiltration planters (in more urbanized corridors) and vegetated bioswales collect and filter stormwater in order to take pressure off of the sewer system during extreme weather events, as well as minimize the usage of potable water for irrigation. Appropriate low maintenance plant species are proposed to minimize upkeep and irrigation needs. Stormwater management (SWM) ponds also aid in the collection and filtering of stormwater, as well as present the opportunity for an animated community space.

Street Trees

The streets are lined with diverse and context-appropriate deciduous tree species to aid in offsetting the carbon emissions produced from the heavily vehicular traffic. Trees are planted 6 metres on centre at intersections in order to create an urban grove effect, maximizing canopy and establishing a strong sense of place throughout the corridors. Tree species are salt and drought tolerant and native when possible.

Buffer Planting

Landscape screens create opportunities for additional planting along rear lot residential areas. The landscape screens create visual cohesion in an area that currently lacks continuity.

Paving Materials

Light coloured paving is used in order to mitigate the heat island effect. There are also opportunities to implement Low Impact Development (LID) techniques such as pervious materials on the multi-use paths, in pedestrian zones and the continuity strips.

Green Living Labs

Opportunities for the community to engage in environmentalism are presented through urban agriculture plots and treatment of the streetscape as a living lab in which the community can learn about nature.

Stormwater Management



Stormwater Management- Bioswale



Street Trees



Buffer Planting



Street Trees



Paving Material



3.3 Streetscape Corridors

The next section of the report is organized into four sections that examine the four segments of the Streetscape Master Plan:



Yonge Street North (section 3.3.1)



Yonge Street South (section 3.3.2)



Davis Drive West (section 3.3.3)



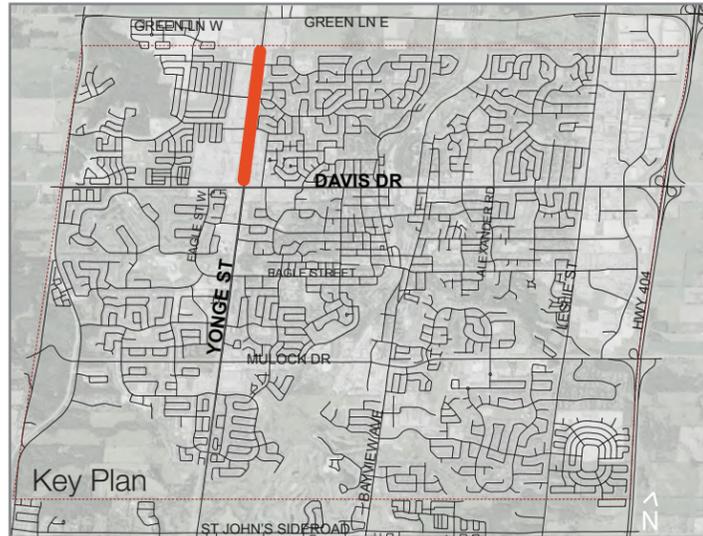
Davis Drive East (section 3.3.4)

Each section will begin with a brief summary of the existing streetscape conditions, the philosophy and approach for the section, the key objectives, key challenges, and key streetscape elements. The overall Master Plan for the corridor will follow. The Master Plan also serves as a key plan for areas that are depicted in further detail. A larger version of the Master Plan can be found at the end of the document.

The report goes on to examine the design in more detail, illustrating the typical conditions as well as unique areas (such as the gateway) through sections, detailed plans and perspective renderings.

Both Yonge Street segments (Yonge Street North and Yonge Street South) are examined from south to north and both Davis Drive segments (Davis Drive West and Davis Drive East) are examined from west to east.

The examination into the section begin with sections that depict the typical streetscape condition(s) throughout the segments. Detailed plans and visualizations follow to provide more detail regarding the streetscape conditions.



Yonge Street North

3.3.1 Yonge Street North Segment

PHILOSOPHY & APPROACH

Yonge Street North is identified primarily as a mixed use area in the Urban Centres Secondary Plan, with priority commercial areas extending from Davis Drive to Bonshaw Avenue, and again at Aspenwood Drive. According to the Secondary Plan, the corridor is also a preferred location for up to two elementary schools as well as a neighbourhood park.

Where the streetscape currently lacks animation, future commercial and institutional developments will consist of animated frontages in close proximity to the sidewalk.

The Yonge Street North segment of the Streetscape Master Plan will encourage the growing pedestrian population in this changing corridor. Through the presence of continuous urban pedestrian circulation, street furniture, pedestrian lighting, tree canopy and public art, Yonge Street North will hold a strong sense of place and act as a community hub.

KEY OBJECTIVES

The main objective for Yonge Street North is to create an urbanized, vibrant streetscape that encourages an animated pedestrian atmosphere and supports multi-modal transportation.

KEY CHALLENGES

The current streetscape condition is car-dominated. In some areas large parking lots line the sidewalks. These parking lots serve as physical barriers between the sidewalk and commercial establishments, discouraging pedestrian presence and interaction with the streetscape. A key challenge to Yonge Street North will be establishing the corridor as an animated, interactive complete street given the current lack of pedestrian culture.

Another major challenge to the development of Yonge Street North is the potential addition of a Bus Rapid Transit (BRT) centre lane in the future. Accordingly, the centre median may serve as a place holder for the BRT lane.

APPLICATION OF STREETScape TYPOLOGIES

The Yonge Urban Streetscape Typology is utilized for the entire Yonge Street North corridor. Due to the large ROW, the placement of the furnishing/planting zone curbside visually reduces the pavement width of the ROW with a row of street trees, creating a more pleasant streetscape condition. The pedestrian sidewalk, segregated cycle track and furnishing/planting zones utilized in the typology supports the initiative to make Yonge Street North a more animated pedestrian friendly environment.

The Yonge Urban Streetscape Typology demonstrated in this report is the **interim condition** which protects the center of the ROW for the future BRT. The future BRT will be implemented pending approval and funding by the Province and Metrolinx.

KEY DESIGN ELEMENTS

The following presents the typical streetscape conditions throughout the Yonge North segment:

Intersection Treatment

- Clear pedestrian path
- Reduced radii
- AODA compliant
- Enhanced crosswalk paving
- Trees in grates with soil cells in a continuous trench
- Group of five deciduous trees spaced 6 metres on centre at signalized intersections to create tree groves
- Far-side York Region standard bike boxes
- Feature paving at intersection corners
- Cycle track ramps down and meanders roadside at intersections
- Pavement marking demarcate cycling path through intersections

Midblock Treatment

- Pedestrian priority at driveways
- Clear pedestrian path
- Cycle track adjacent pedestrian circulation
- Cycle track priority at driveway locations
- Trees in boulevard planters spaced 8 metres on centre to provide a green street wall
- Utility poles and light standards located in furnishing zone

Median Treatment

- Trees spaced 6 metres on centre at intersections
- Hardy shrub understory
- Unit paver splash strip

Existing Conditions Summary

Yonge Street North is a high volume arterial located within the commercial core of the Town of Newmarket. The street carries significant amounts of traffic at a design speed of 100km/h. This influx of traffic is beneficial for businesses located adjacent to Yonge Street, but currently presents challenges for pedestrian and cyclist safety. This stretch of roadway has no bike lanes and the existing pedestrian environment lacks pedestrian amenities and character.

Key existing characteristics of Yonge Street North include:

- Wide ROW and paved area (ranging from 39.5 metres – 49.1 metres);
- Streetscape character is predominantly large big-box stores with significant setbacks from Yonge Street;
- Numerous large asphalt parking lots front Yonge Street and contribute to the heat island effect;
- Frequent consolidated driveways due to large lots;
- Open ditches adjacent to roadway and sidewalks;
- Significant grade changes at some properties;
- Visual dominance of hydro poles and above ground utilities.



3.3.1.1. Streetscape Master Plan

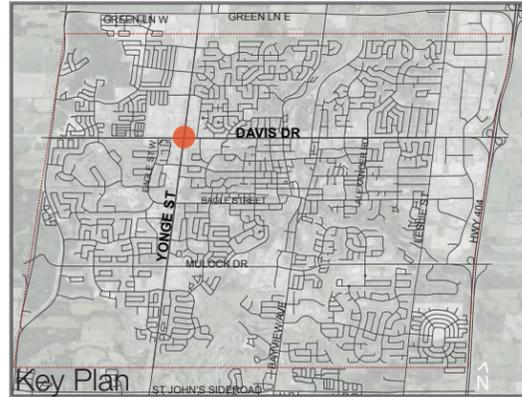
The following illustrates the Master Plan for the Yonge Street North segment of the Yonge Street & Davis Drive Streetscape Master Plan with a key plan of Streetscape Typologies. The design represents the interim condition which protects for the future BRT down the centre of the rapidway. The Plan is overlaid over an aerial image of the current conditions to provide context. Further detail on the Master Plan is provided in the following section, complete with sections, visualizations and detailed plans.



Yonge Urban Streetscape Typology (Refer to 3.3.1.4)



Yonge Urban Streetscape Typology



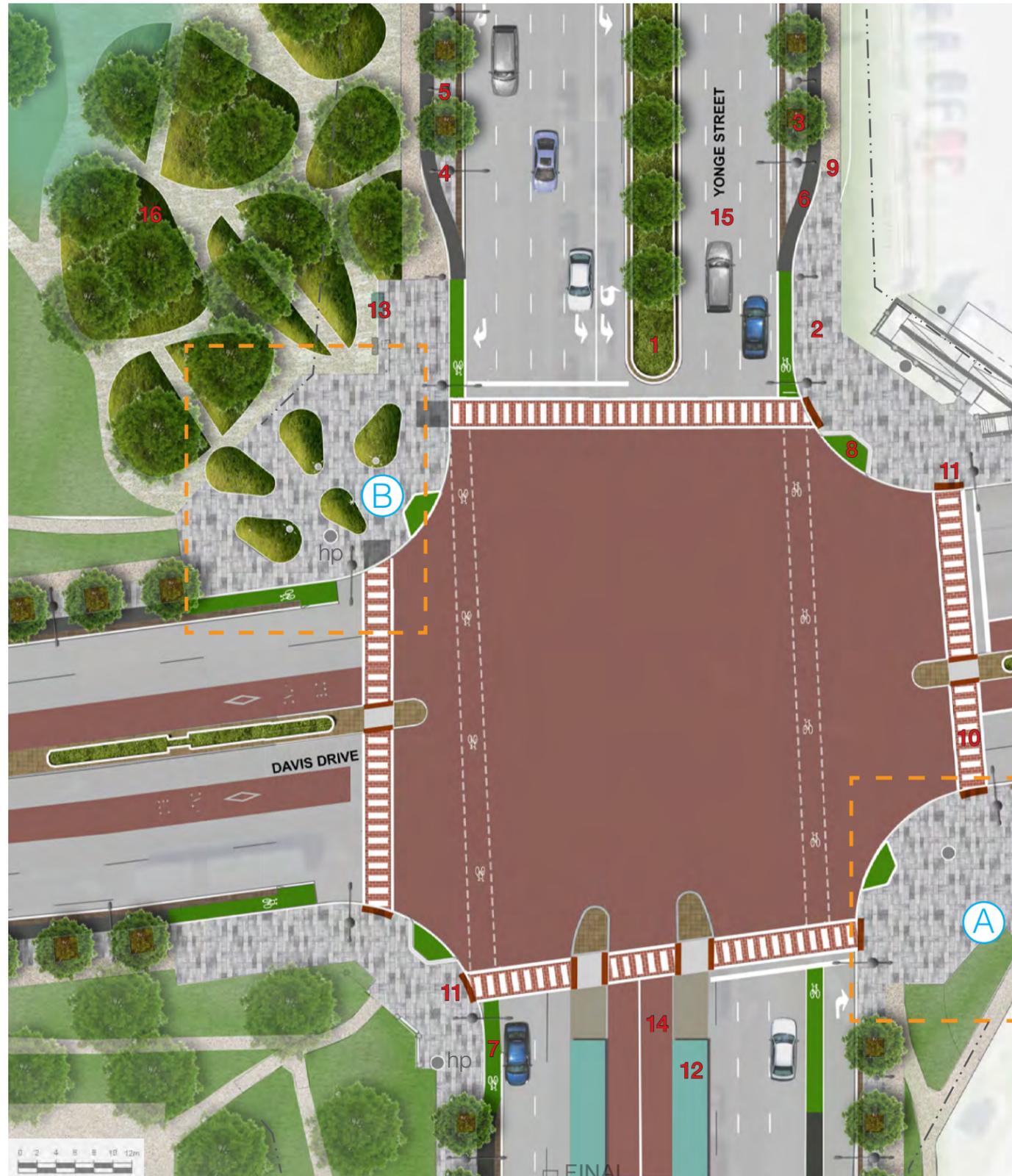
Yonge Street & Davis Drive

3.3.1.3. Intersection Detailed Plan

Yonge Street and Davis Drive is a significant intersection in the Town of Newmarket. The intersection marks the crossing of two major corridors and is celebrated through the addition of unique placemaking initiatives such as public art and landscape design.

This intersection is also a transitional zone from the vivaNext streetscape into the Yonge Street & Davis Drive Streetscape Master Plan (refer to section 3.2.5).

The Yonge Street North streetscape plan demonstrated in this report is the interim condition which protects the center of the ROW for the future vivaNext BRT planned for in the next 25 years. The future BRT will be implemented pending approval and funding by the Province and Metrolinx.

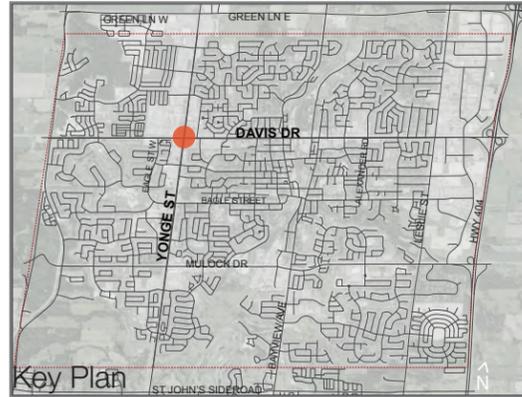


Key Features Legend

1. Planted median with ornamental grasses, hardy shrubs and trees aid in establishing a strong sense of place
2. Enhanced paving at intersections contribute to a more urbanized environment
3. Street trees in grates 6 metres on centre at intersections
4. Signature street lights with pedestrian luminaires provides illumination for vehicles, cyclists and pedestrians
5. Pedestrian lights further illuminate pedestrian and cyclist realm
6. 1.5 metre wide cycle track with buffer provides a safe aesthetic riding environment for cyclists
7. Cycle track transitions to on-road bike lane on Yonge Street (vivaNext streetscape)
8. York Region Standard bike boxes enhance left-turns for cyclists
9. 2.4 metre wide pedestrian sidewalk connects to parks, private plazas and patios
10. vivaNext Standard TrafficPattern XD pedestrian crosswalk
11. AODA tactile plates
12. vivaNext stations
13. YRT bus shelter
14. vivaNext BRT lane
15. 3.3 metre wide through lane
16. Potential for future park that extends the active transportation route (currently a SWM pond)

A & **B**: Town of Newmarket placemaking features (more information on the following page)

*hp: hydro pole



Yonge Street & Davis Drive

3.3.1.4. Intersection Placemaking Features

The southeast corner and the northeast corner of Yonge Street and Davis Drive provide the sites for art and landscape installations to recognize the importance of the intersection and create a strong sense of place.



A Southeast Corner of Yonge Street & Davis Drive



The 'N' Arch is a public art installation that celebrates this key intersection in the Town of Newmarket. The community can interact with the piece by walking through it. The "N" stands for Newmarket and is etched with the Town's street network. In late afternoon, the shadow creates a shape reminiscent of the letter "D" for Davis Drive. The gateway design at this intersection has been approved by Town of Newmarket Council.

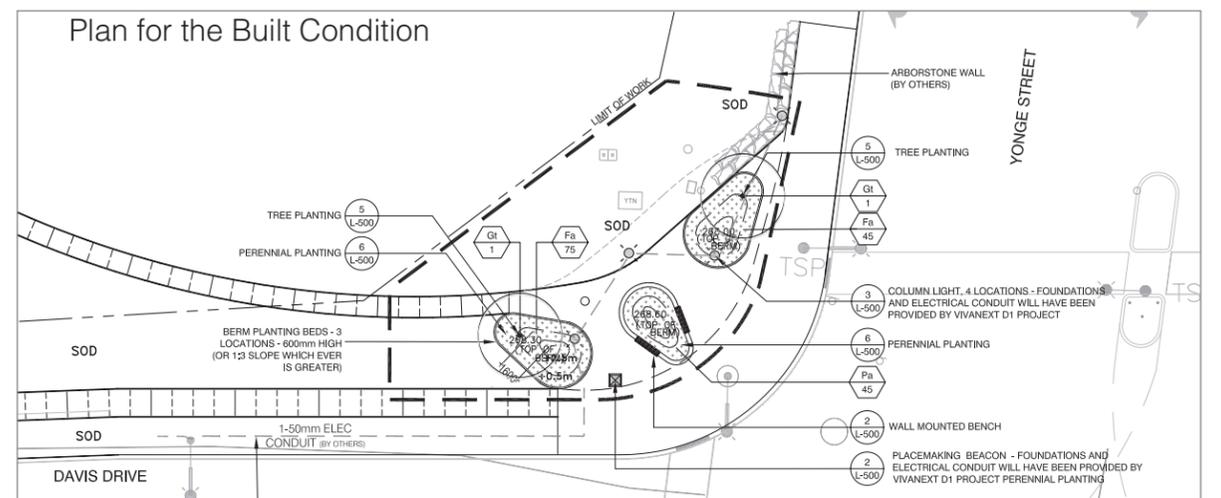
The Yonge Street and Davis Drive feature creates a gateway to a future park at the northwest corner and an urban plaza on the southeast corner. Unique custom beacons will be illuminated at night for an additional element of animation.

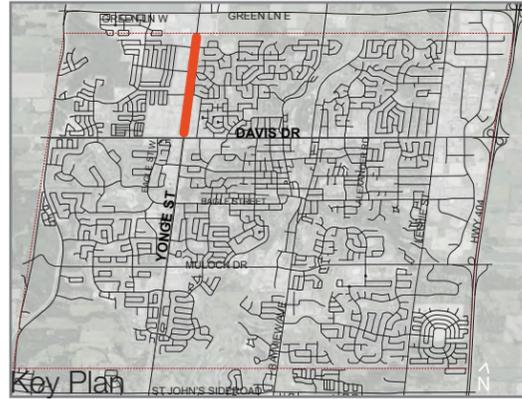
The plan to the right depicts the conditions that will be built. The renderings display the potential future of the space with the addition of a park.

B Northwest Corner of Yonge Street & Davis Drive Concept



The rendered plan of the intersection with five planters represents the ultimate design vision which ties into the future parkland at this intersection.





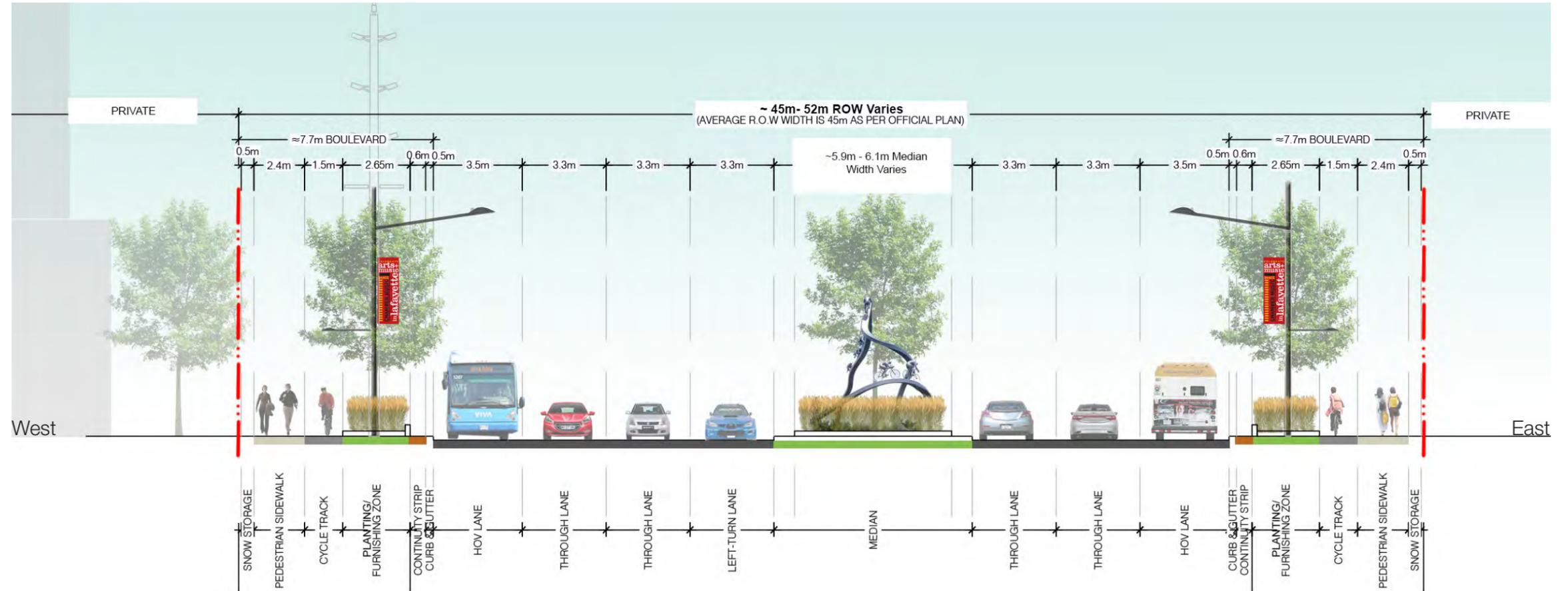
Yonge Street North

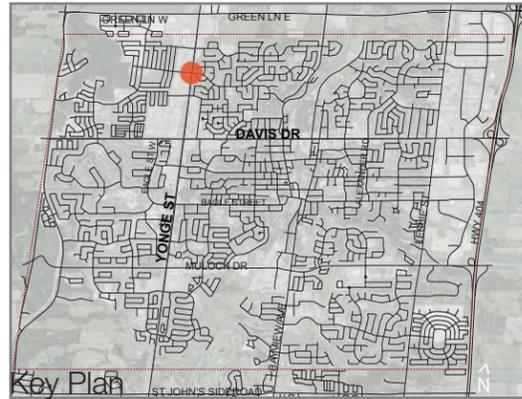
3.3.1.5. Yonge Urban Streetscape Typology Section (From Town Boundary to Davis Drive)

This Urban Streetscape Typology is applicable for the length of the Yonge Street North corridor. Characterized by distinctive urban placemaking elements such as cycle tracks, street trees in grates and public art, this design responds to the urbanized future of the Town of Newmarket.

Key Features

- Planted median with ornamental grasses, shrubs, trees and public art aid in establishing a strong sense of place
- HOV lane promotes efficient transit
- Reduced through lane width
- Raised cycle track promotes active transportation
- Clear pedestrian routes
- Snow storage
- Right Size geometry:
 - 3.3 metre through lane;
 - 3.5 metre curbside lane;
 - 3.0 metre turn lane;
 - 2.4 metre sidewalk;
 - 1.5 metre bike lane.





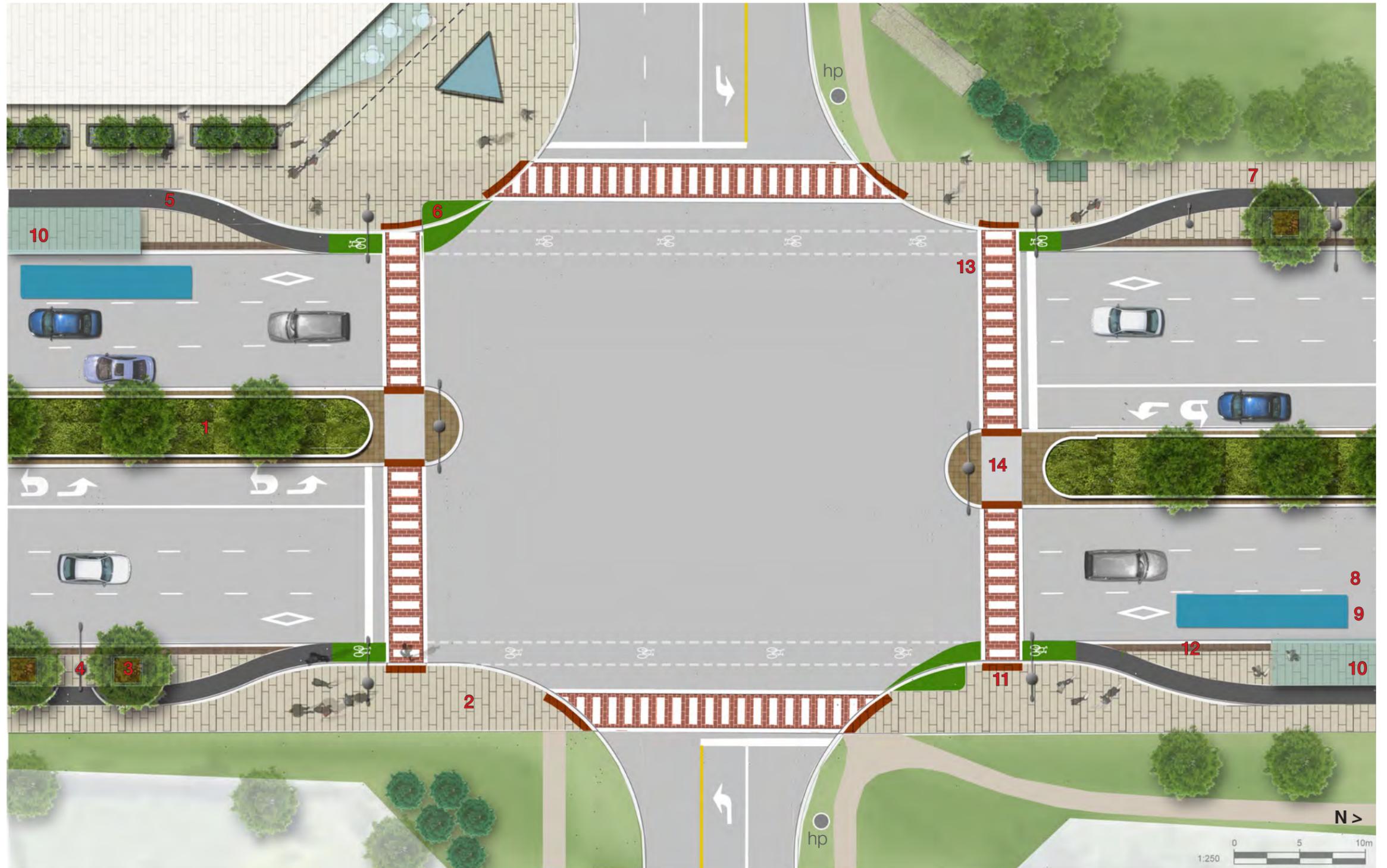
Yonge Street North

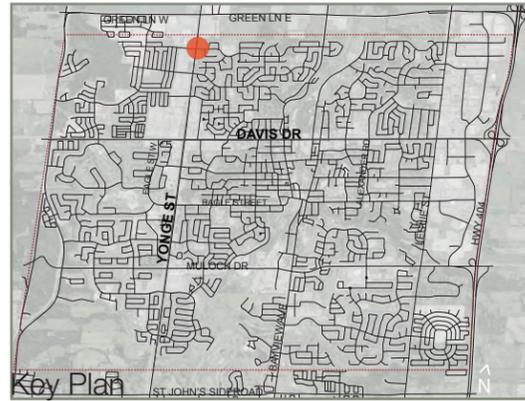
3.3.1.6. Detailed Plan at Signalized Intersection in Urban Zone

This plan illustrates a typical signalized intersection in the Yonge Street North corridor. The streetscape is urban in nature with street trees in grates and the Town of Newmarket signature boulevard paving treatment. The raised cycle track ramps down at the intersection and pavement markings demarcate the cycling route across the intersection.

Key Features Legend

1. Planted median with ornamental grasses, shrubs and trees aid in establishing a strong sense of place
2. Enhanced paving at intersections and street trees in grates contribute to a more urbanized environment
3. Street trees 6 metres on centre in grates
4. Signature lighting provides illumination for vehicles and pedestrians
5. 1.5 metre wide cycle track provides an enhanced aesthetic riding environment for cyclists
6. Bike boxes provide the infrastructure for safer left-turns
7. 2.4 metre wide pedestrian sidewalk
8. Three through lanes in either direction
9. Curbside HOV/ Bus lane for efficient transit
10. vivaNext bus shelters
11. AODA tactile plates at intersections
12. Continuity strip aids in establishing a cohesive streetscape
13. Enhanced pedestrian crosswalk
14. Two-stage crossing



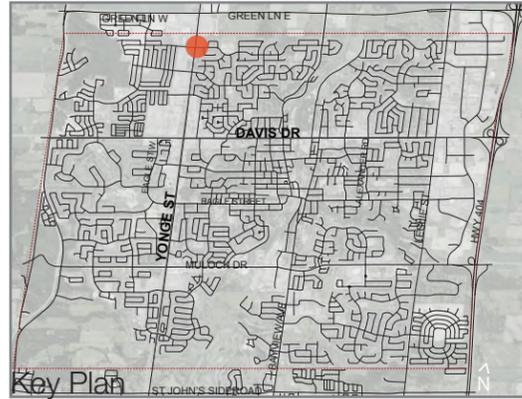


3.3.1.7. Streetscape Gateway: Detailed Plan at Aspenwood Drive

Key Features Legend

1. Streetscape defines the gateway into the Town of Newmarket through coloured banding and accompanying planting
2. Planted median with ornamental grasses, hardy shrubs and trees aid in establishing a strong sense of place
3. Median and pedestrian plazas provide opportunities for public art
4. Enhanced paving at intersections contribute to a more urbanized environment
5. Street trees in grates 6 metres on centre
6. Signature street lights with pedestrian luminaires provides illumination for vehicles and pedestrians
7. Pedestrian lights further illuminate pedestrian realm
8. 1.5 metre wide cycle track with buffer provides a safe aesthetic riding environment for cyclists
9. York Region Standard bike boxes support safer left-turns for cyclists
10. 2.4 metre wide pedestrian sidewalk connects to private plazas and patios
11. 3.5 metre wide HOV/ Bus Lane for more efficient transit





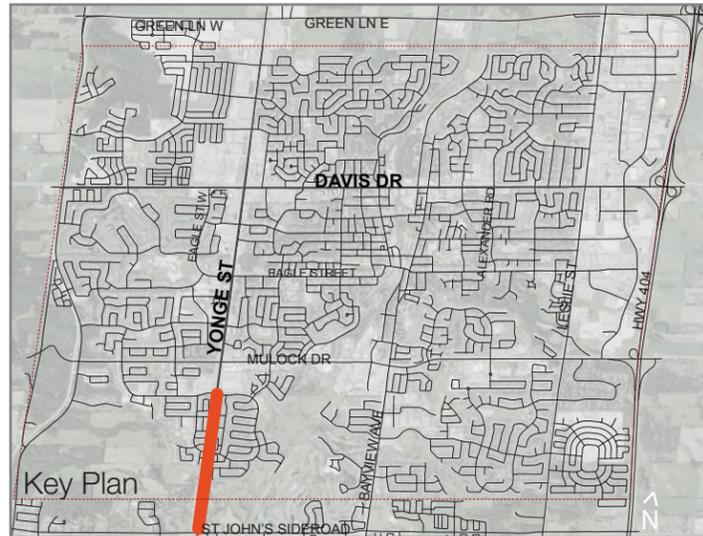
Yonge Street North

3.3.1.8. Visualization at Aspenwood Drive Gateway

Aspenwood Drive marks the closest signalized intersection to the northern boundary to the Town of Newmarket and consequently provides a logical placement for the Town gateway. The streetscape gateway design reflects the Town border and establishes a strong sense of place.

This visualization depicts a future more urbanized context that includes animated private amenity areas with potential patio space, additional planting, and seating which interfaces harmoniously with the public streetscape design.





Yonge Street South

3.3.2 Yonge Street South Segment

PHILOSOPHY & APPROACH

The Yonge Street South segment consists of stable residential in the northern portion and a more rural area with trail connections along the southern portion. Accordingly, this corridor of the Streetscape Master Plan utilizes two differing streetscape typologies in order to serve both land usages.

The Streetscape Master Plan proposes the possibility of animating the more rural edges through urban agriculture. The streetscape design also enhances the green elements of the streetscape through the addition of a planted median.

The streetscape design extends beyond the official Town boundary to the nearest intersection (St. John's Sideroad) in order to establish a spatially logical transition from the Town of Aurora to the Town of Newmarket.

KEY OBJECTIVES

The key objectives for Yonge Street South is to cater to the residential population as well as those utilizing the trail systems along the southern segment of the corridor.

KEY CHALLENGES

Currently, trail users are not provided with a safe path to and from the trail connections, sometimes forced to walk along the roadway shoulder. The streetscape design works towards making the trail connections more visible and accessible for community members.

Additionally, the residential areas currently lack continuity and animation along the rear lot residential land. The streetscape design works towards creating a strong sense of visual cohesion in these areas, predominantly through planting.

APPLICATION OF STREETScape TYPOLOGIES

Yonge Street South consists of the Green Streetscape Typology.

Existing Conditions Summary

The Yonge Street South section of this study is suburban in character and is predominantly low density residential. The street carries significant amounts of traffic, but mostly as a thoroughfare in the area. This stretch of roadway does not have any existing bike lanes and minimal pedestrian amenities.

Key existing characteristics of Yonge Street South include:

- Wide ROW (ranging from 44.5 metres – 59.1 metres);
- Land use is predominantly low density residential;
- Above ground utilities and hydro poles dominate the streetscape and contribute to visual clutter;
- Rural cross section south of Joe Persechini Drive;
- The sidewalk is not continuous in some locations;
- Streetscape components such as paving materials, lighting, signage and furniture are utilitarian.

KEY DESIGN ELEMENTS

The following presents the typical streetscape conditions throughout the Yonge Street South segment:

Intersection Treatment

- Clear pedestrian path
- Reduced radii
- AODA compliant
- Enhanced crosswalk paving
- Trees in planters spaced 6 metres on centre in a continuous soil trench

Midblock Treatment

- Pedestrian priority at driveways
- Clear pedestrian path
- Vegetative buffer
- Trees in softscape spaced 8 metres on centre
- Double row of trees where possible
- Urban agriculture
- Feature paving at intersection corners

Median Treatment

- Hardy tree species
- Trees spaced 6 metres on centre at intersections and 8 metres on centre midblock
- Hardy shrub understorey



3.3.2.1. Streetscape Master Plan

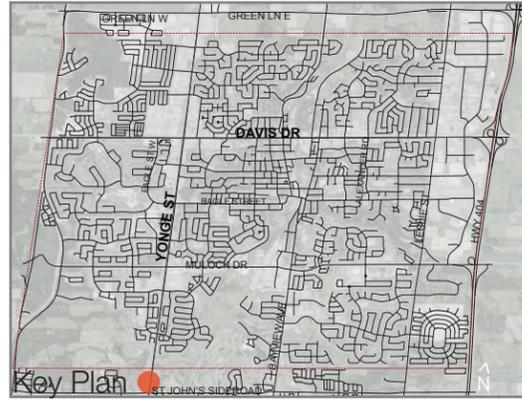
The following illustrates the Master Plan for the Yonge Street South segment of the Yonge Street & Davis Drive Streetscape Master Plan. The Plan displayed over an aerial image of the current conditions to provide context.



Green Streetscape Typology (Refer to 3.3.2.3)



Green Streetscape Typology

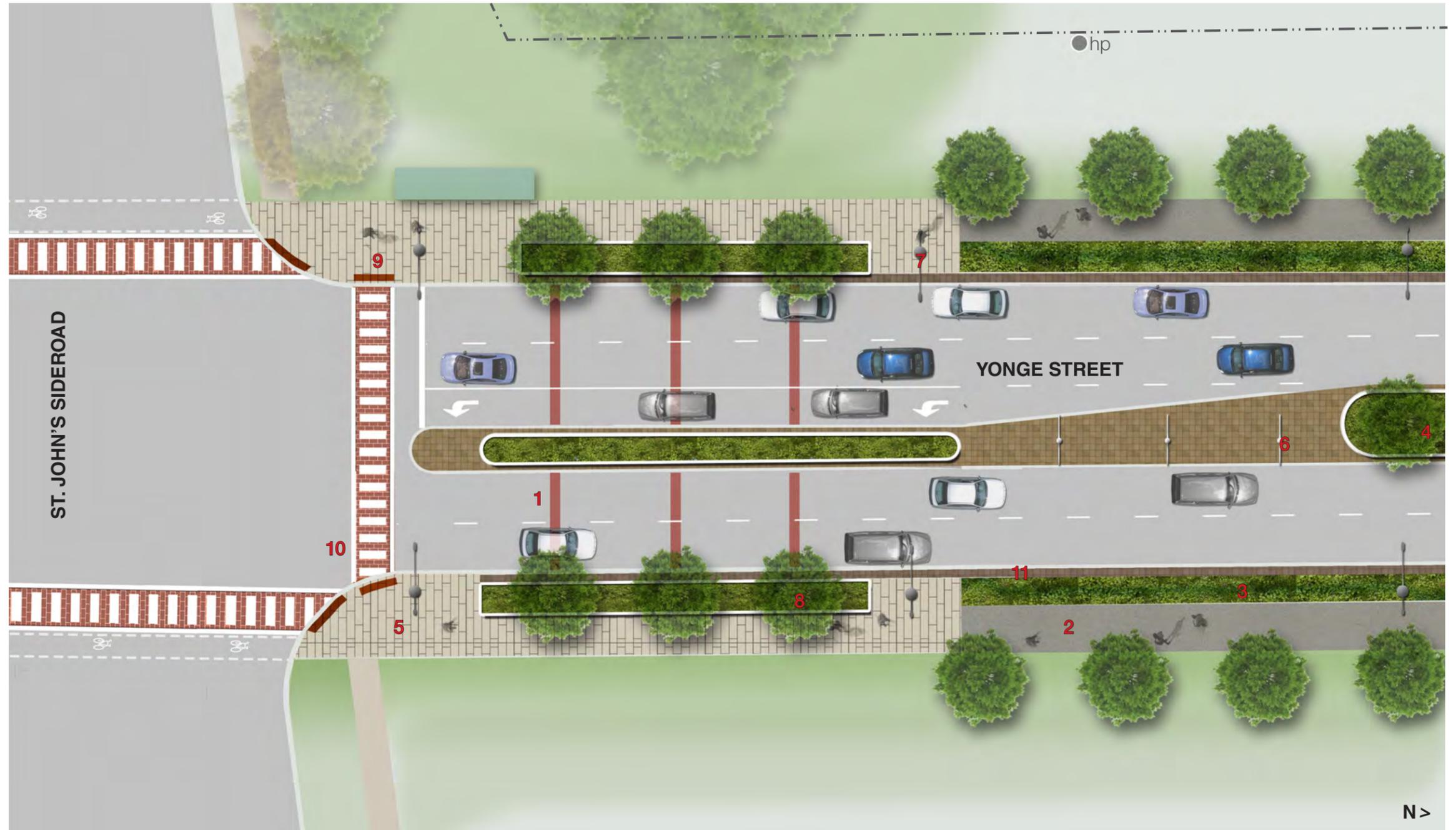


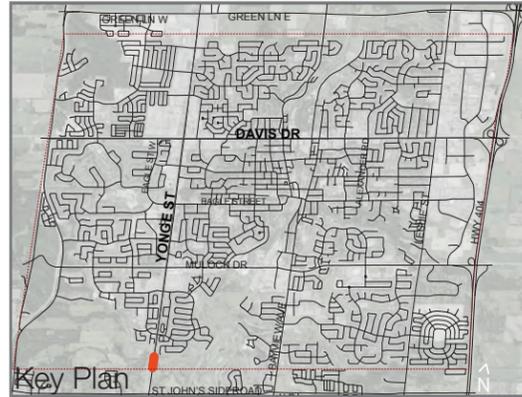
3.3.2.2. Streetscape Gateway: Detailed Plan at St. John's Sideroad

The Town of Newmarket streetscape gateway is a gradual transition from the Town of Aurora that originates at the signalized intersection at St. John's Sideroad, approximately 500 metres south of the Town boundary.

Key Features Legend

1. The Town of Newmarket streetscape gateway is established through banding with accompanying street trees signifying the entrance to the Town of Newmarket
2. 3.0 metres wide multi-use path that connects with the existing local trail system
3. Vegetated buffer between multi-use path and vehicles
4. Planted median with shrubs and trees
5. Enhanced boulevard paving
6. Banners provide visual interest, placemaking opportunities and a space for conveying information about Town events
7. Signature lighting provides illumination for pedestrians, cyclists and vehicles
8. Street trees in planters 6 metres on centre to define the intersection and gateway
9. AODA tactile plates
10. Enhanced pedestrian crosswalk
11. Continuity strip creates visual cohesion throughout the streetscape



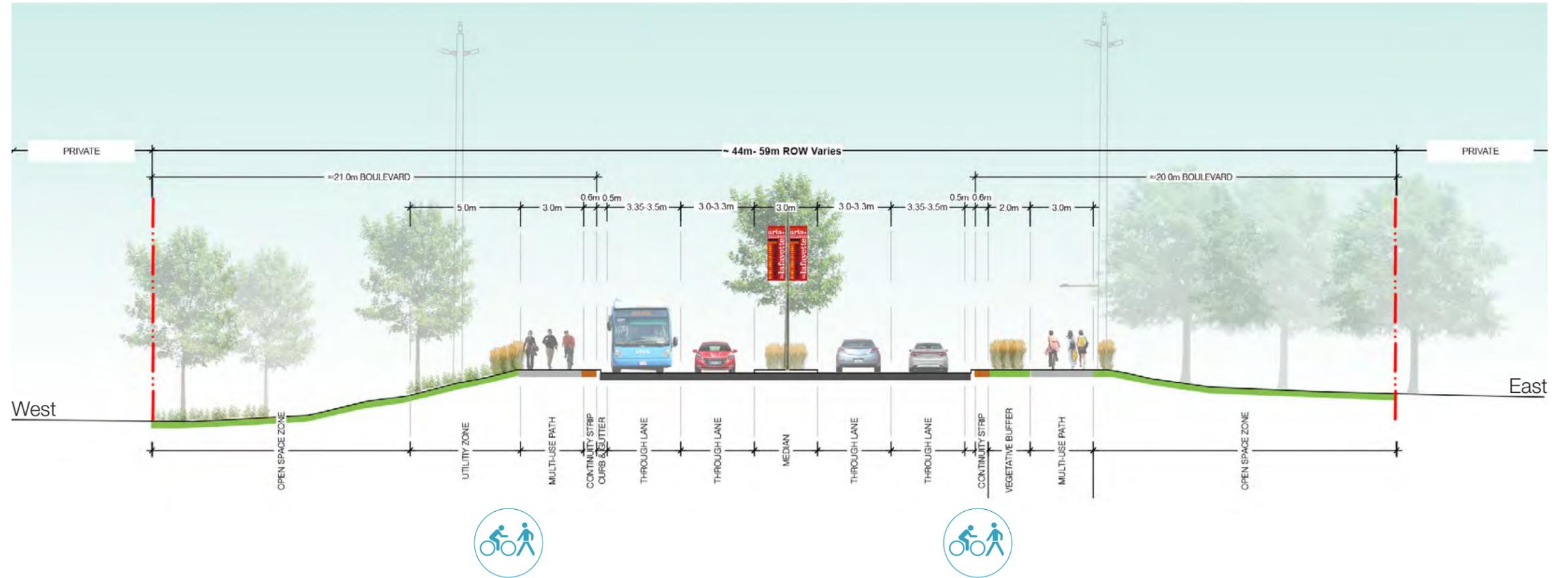


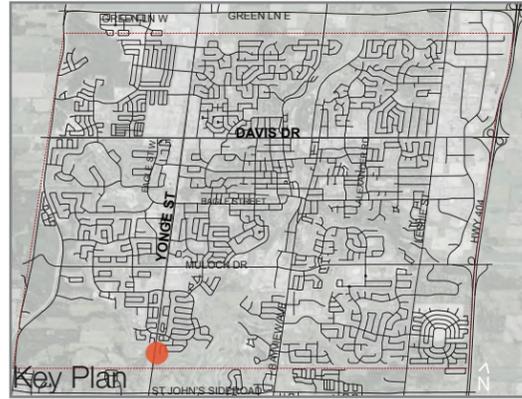
Yonge Street South

3.3.2.3. Green Streetscape Typology Section (Nokiidaa Bike Trail to St. John's Sideroad)

Key Features

- Planted median with shrubs and trees
- Two through lanes in either direction
- Multi-use path
- Landscape buffer segregates cyclists and pedestrians using the multi-use path from vehicular traffic
- Banners provide visual interest and a space for conveying information about Town events
- Signature lighting provides illumination for pedestrians, cyclists and vehicles
- Right Size geometry:
 - 3.0- 3.3 metre through lane;
 - 3.35-3.5 metre curbside lane;
 - 3.0 metre turn lane;
 - 3.0 metre MUP.



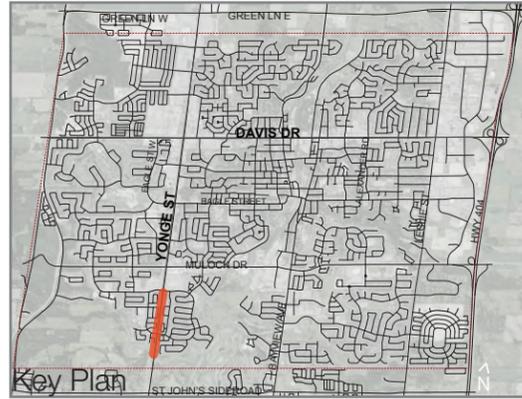


3.3.2.4. Visualization at Nokiidaa Bike Trail Connection

This visualization illustrates a view of the streetscape as one approaches Yonge Street from the Nokiidaa Bike Trail.

Through the addition of a multi-use path as well as planting in the landscape buffers and the centre median, the surrounding green space and trail network is extended into the streetscape.





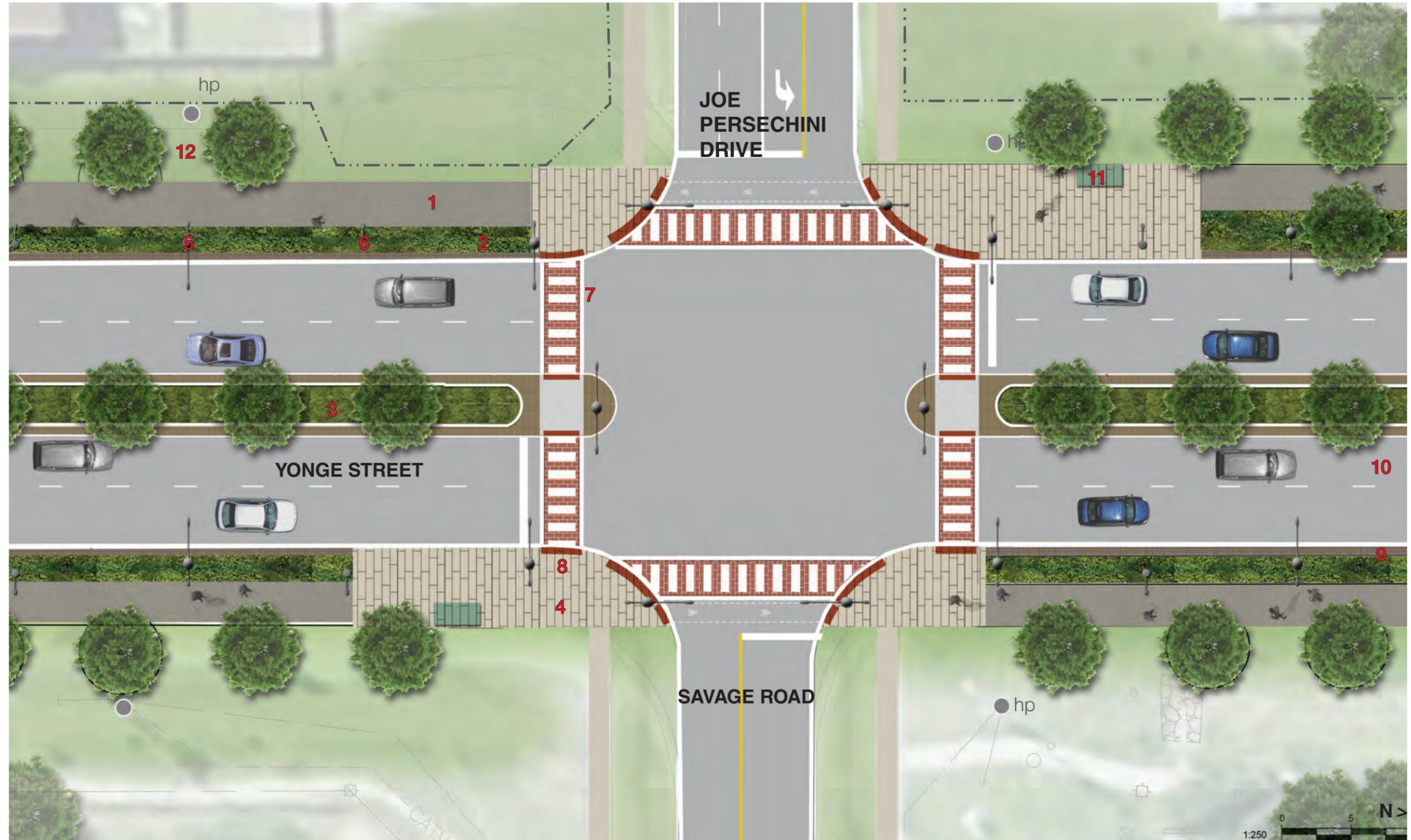
Yonge Street South

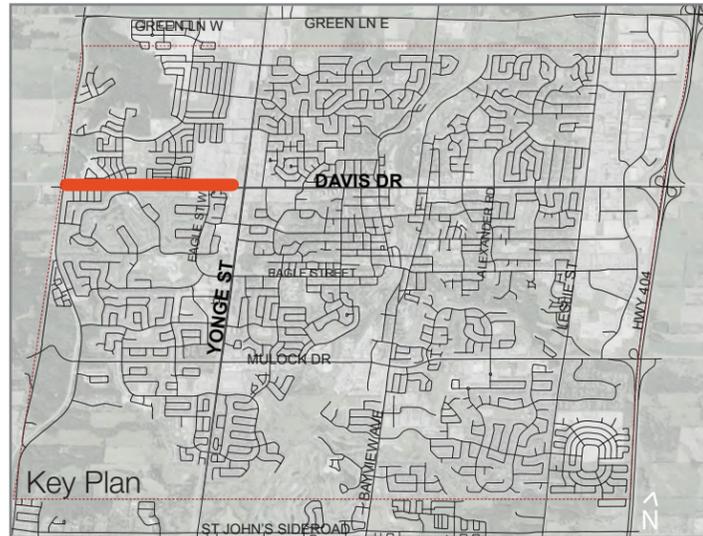
3.3.2.5. Detailed Design at Signalized Intersection in Residential Zone

This plan illustrates a typical Green Streetscape Typology intersection.

Key Features Legend

1. 3.0 metre wide multi-use path
2. Landscaped buffer between the multi-use path and vehicular traffic
3. Planted median with shrubs and trees
4. Enhanced boulevard paving at intersection
5. Signature street lights with pedestrian luminaires provides illumination for pedestrians, cyclists and vehicles
6. Pedestrian lighting further illuminates the pedestrian and cyclist realm
7. Enhanced pedestrian crosswalk
8. AODA tactile plates
9. Continuity strip creates visual cohesion throughout the streetscape
10. Two through lanes in either direction
11. YRT Bus shelter
12. Deciduous trees in softscape spaced 6 metres on centre where there is property behind the multi-use path





Davis Drive West

3.3.3 Davis Drive West Segment

Existing Conditions Summary

Davis Drive West has a varied streetscape character with predominantly commercial developments from Yonge Street to Eagle Street and a more rural cross section from Eagle Street to Bathurst Street. Davis Drive West carries a significant amount of through traffic, with the intersection of Yonge Street and Davis Drive noted as a key intersection and urban centre of the Town of Newmarket. There is a continuous sidewalk on the south side of the street for the majority of the length and no existing bike lanes. Most of the commercial development is focused towards the Yonge Street and Davis Drive intersection, with a GO Transit hub at Eagle Street. There are two residential subdivisions (Mosaik and Mattamy) near Bathurst Street, as well as a newly constructed gateway entry feature to be complemented by enhanced paving and planting. Sundial and Glenway subdivisions at Bathurst Street will provide low to medium density residential communities.

Key existing characteristics of Davis Drive West includes:

- Wide ROW (from 33.5 metres – 51 metres);
- Varied character with commercial land to the east and rural low density residential to the west;
- Non-continuous sidewalks along the corridor;
- The average distance between existing signalized intersections is approximately 720 linear metres, which is geared towards vehicular travel and encourages pedestrian jay walking;
- The average distance between transit stops is approximately 1150 linear metres.

PHILOSOPHY & APPROACH

The Davis Drive West segment consists of commercial development on the east end and two new residential/ mixed-use developments at the west end with two more low to medium density residential communities forthcoming. Accordingly, this corridor of the Streetscape Master Plan utilizes two differing streetscape typologies in order to serve both land usages.

The Urban Centres Secondary Plan (2015) has identified Davis Drive west at Yonge Street as a mixed use area, and priority commercial areas have been identified further west along Davis Drive. These commercial areas extend from Yonge Street to just west of Eagle Street.

The Davis Drive and Bathurst Street area contains two existing residential subdivisions (Mosaik and Mattamy)

The Sundial Subdivision is proposed on the north side of Davis Drive (from west of Eagle Street to east of Ford Wilson Boulevard), and the Glenway Subdivision along the south (from Eagle Street to west of Ford Wilson Boulevard).

The Streetscape Master Plan along the Davis Drive West corridors caters to the growing nature of this corridor by providing amenities for the changing population.

KEY OBJECTIVES

The Davis Drive West's key objective is to cater to the growing population and create a streetscape that is fitting for the more urbanized corridor. The Streetscape Master Plan creates a green and vibrant streetscape with a strong sense of place for the new mixed use developments and future more urban commercial area. Further, the streetscape provides safe means for active transportation throughout the corridor.

KEY CHALLENGES

The main challenge for Davis Drive West is to establish the corridor as an animated urban streetscape and a pleasant residential area given the large ROW and the significant amount of commuter traffic traveling to and from Highway 404.

Davis Drive is not on York Region's current 10-Year Capital Plan and consequently in the future York Region and the Town of Newmarket must budget for a higher level of streetscape, not covered by development.

Further, because Bathurst Street is the boundary between the Town of Newmarket and the Township of King, constructing a unified and coordinated gateway may be challenging. Additional challenges at the gateway may arise due to the dominant visual impact of Hydro poles and utilities.

Existing mature trees within the public ROW contribute to the structure of the streetscape by enhancing the urban canopy. At the detailed design phase, all existing vegetation should be assessed and analyzed by a certified arborist to determine preservation status. Of particular note is an existing mature elm with a 92.6 cm DBH caliper on the south side of Davis Drive West adjacent to the Glenway Estates subdivision.

APPLICATION OF STREETScape TYPOLOGIES

Davis Drive West consists of the Green Streetscape Typology to the west and the Davis Urban Streetscape Typology to the east (refer to key map 3.3.3.1). The Davis Urban Streetscape Typology is utilized to achieve a more efficient cycling route, due to less pedestrian cyclist conflict and the ability for cyclists to enter the roadway when necessary to pass other cyclists.

KEY DESIGN ELEMENTS

The following presents the typical streetscape conditions throughout the Davis Drive West segment:

Intersection Treatment

- Clear pedestrian path
- Reduced radii
- AODA compliant
- Enhanced crosswalk paving
- Trees in grates or linear planters in a continuous trench
- Trees spaced 6 metres on centre at intersections
- Feature paving at intersection corners

Midblock Treatment

- Pedestrian and cyclist priority at driveways
- Clear pedestrian path
- Meandering multi-use path
- Vegetative buffer
- Trees in softscape spaced 8 metres on centre

Median Treatment

- Hardy tree species
- Trees spaced 6 metres on centre at intersections and 8 metres on centre midblock
- Hardy shrub understorey



3.3.3.1. Streetscape Master Plan

The following illustrates the Master Plan for the Davis Drive West segment of the Yonge Street & Davis Drive Streetscape Master Plan. The plan is overlaid on an aerial image of the current conditions in order to provide context.

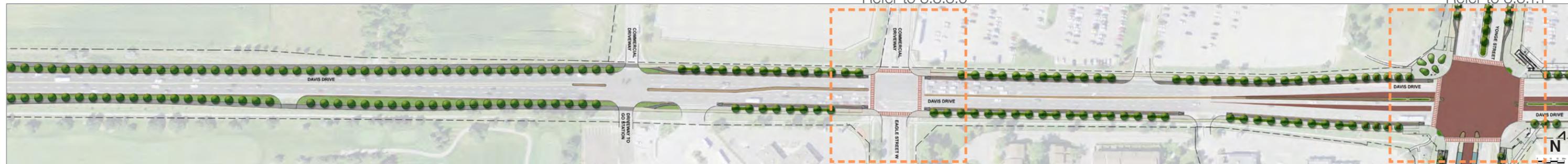
Refer to 3.3.3.2-3



Green Streetscape Typology (Refer to 3.3.3.4)

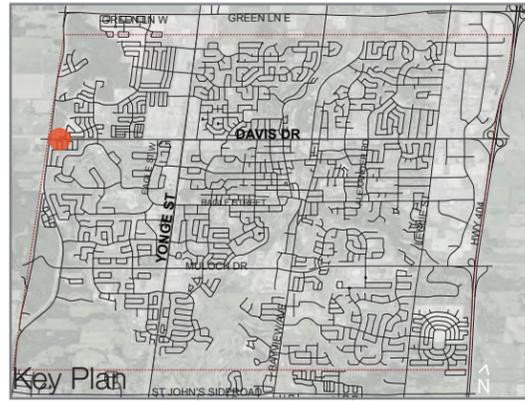
Refer to 3.3.3.6

Refer to 3.3.1.1



Green Streetscape Typology (Refer to 3.3.3.4)

Davis Urban Streetscape Typology (Refer to 3.3.3.5)

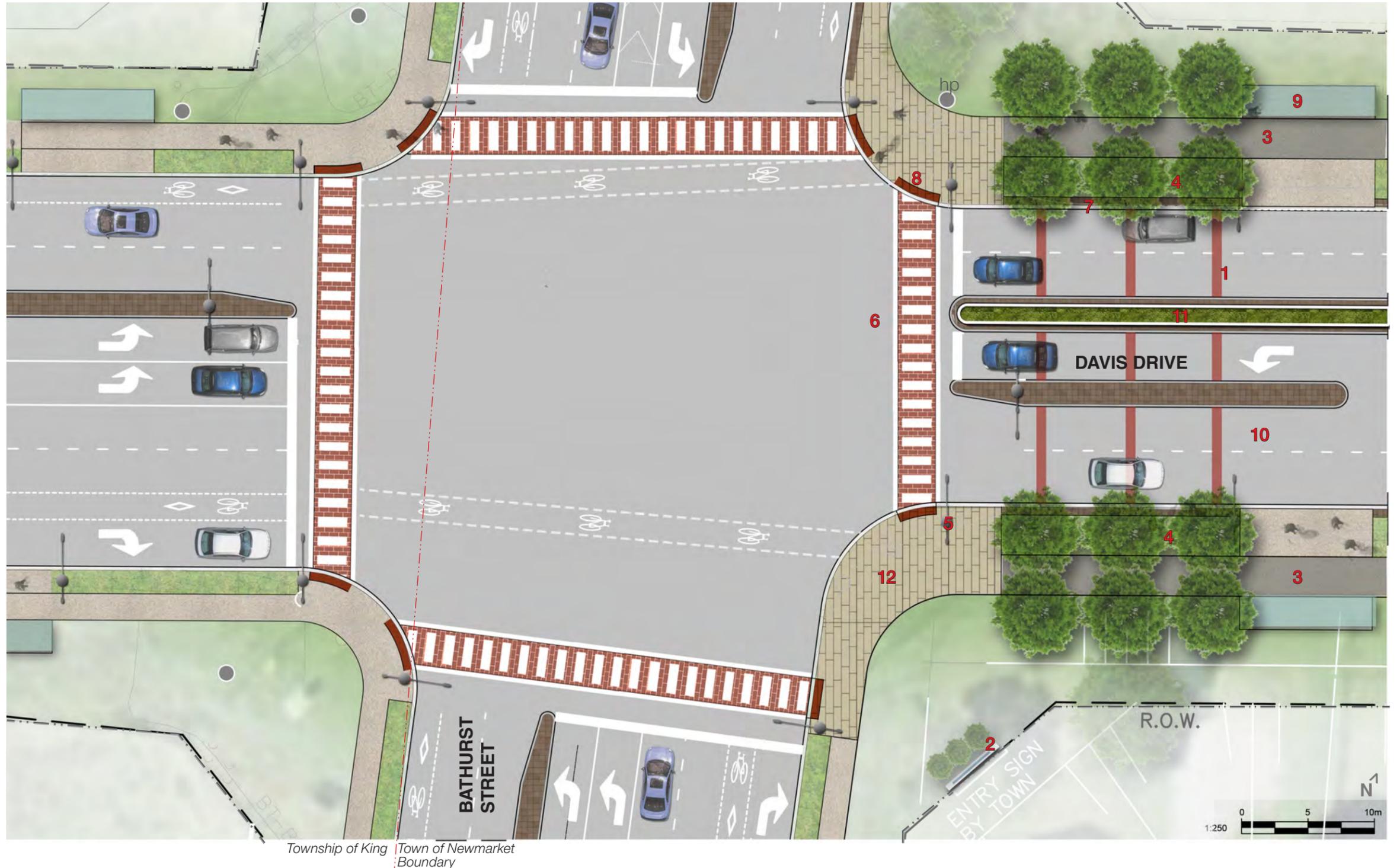


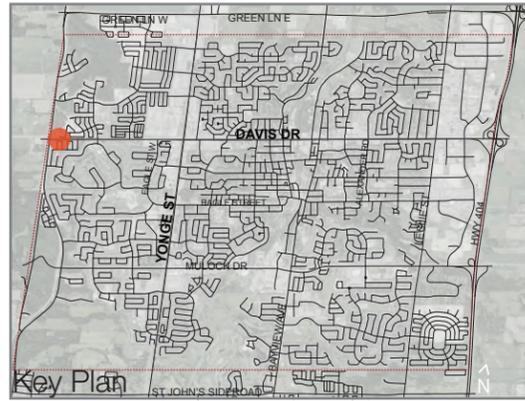
3.3.3.2. Streetscape Gateway: Detail Plan at Bathurst Street

This plan depicts the Town of Newmarket gateway at Davis Drive and Bathurst Street. The streetscape design provides visual cues that commuters, pedestrians and cyclists are entering the Town of Newmarket.

Key Features Legend

1. Streetscape defines the gateway of the Town of Newmarket through coloured banding and accompanying double row of tree planting
2. Town of Newmarket gateway signage
3. 3.0 metre wide multi-use path for pedestrians and cyclists
4. Vegetated buffer between multi-use path and vehicular traffic
5. Signature street lights with pedestrian luminaire provides illumination for vehicles, cyclists and pedestrians
6. Enhanced pedestrian crosswalk paving
7. Continuity strip creates visual cohesion throughout the streetscape
8. AODA tactile plates
9. Front and back York Region bus pad
10. Two vehicular through lanes in either direction with a dedicated left turn lane
11. Planted median
12. Enhanced boulevard paving at intersections



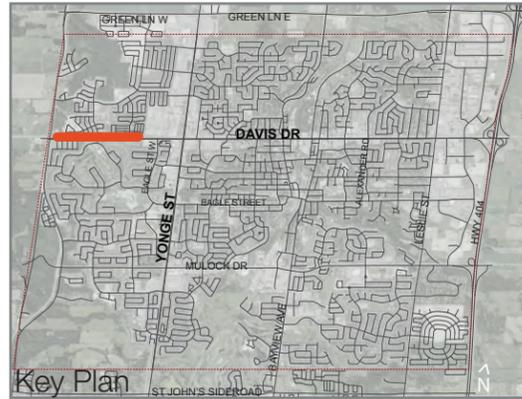


3.3.3.3. Visualization at Bathurst Street Gateway

This visualization depicts the Town of Newmarket gateway at Davis Drive and Bathurst Street. The Town Boundary is recognized through Town of Newmarket signage and the signature pavement banding with accompanying planting.

Both sides of the streetscape are met with green open space. The lush landscape is carried into the streetscape design through landscape buffers and a planted median. This Town of Newmarket gateway strongly established the Town as a green and environmental municipality.





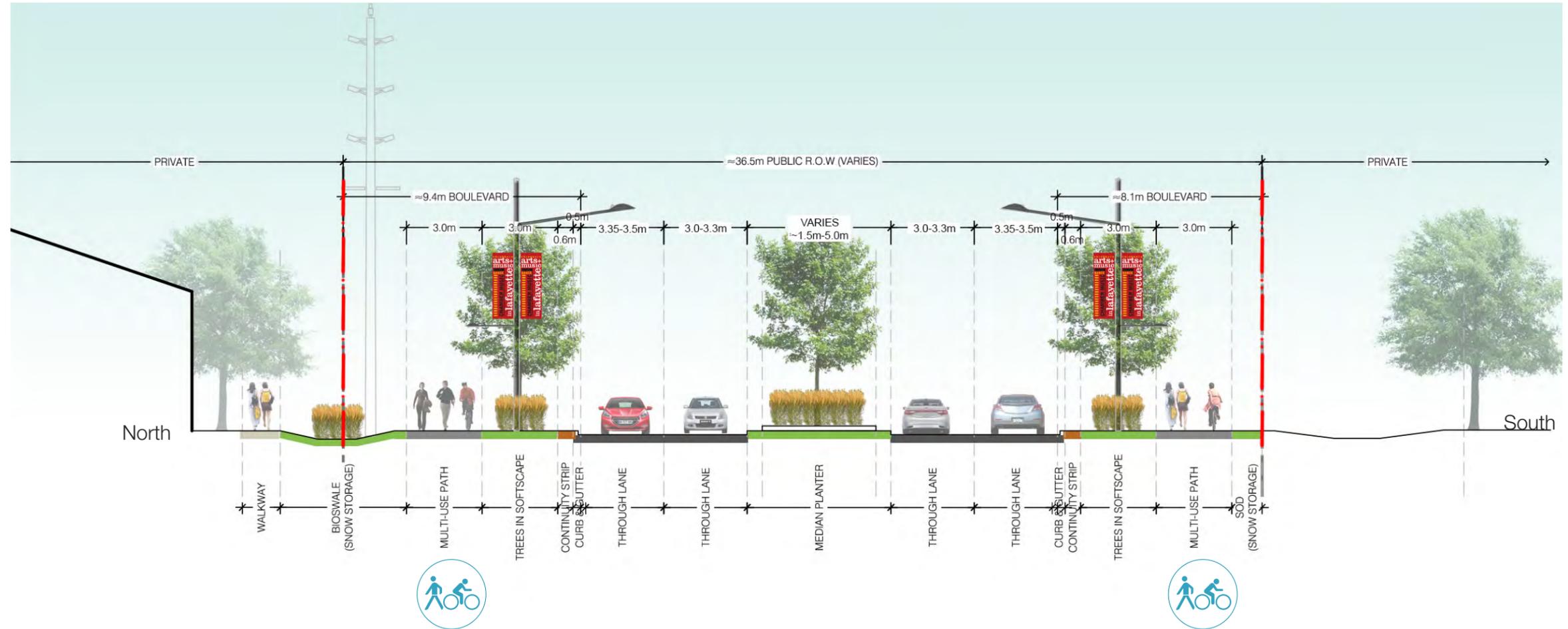
Davis Drive West

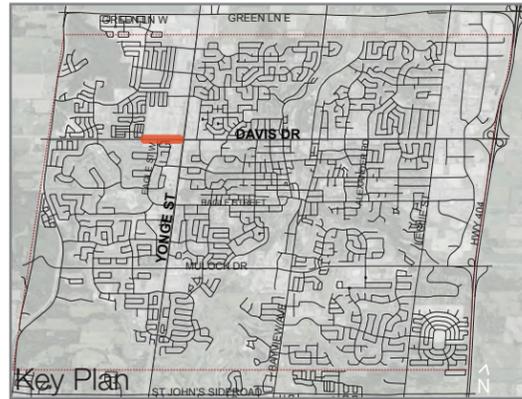
3.3.3.4. Green Streetscape Typology Section (Bathurst Street to West of Eagle Street)

This section illustrates the Green Streetscape Typology along Davis Drive West. The geometry is applicable from Bathurst Street to just west of Eagle Street West.

Key Features

- Bioswale for stormwater management
- Multi-use path with landscaped buffer encourages active transportation
- Continuity strip creates visual cohesion throughout the streetscape
- Planted median minimizes the scale of the expansive ROW
- Two through lanes in either direction
- Right Size geometry:
 - 3.0- 3.3 metre through lane;
 - 3.35-3.5 metre curbside lane;
 - 3.0 metre turn lane;
 - 3.0 metre MUP.



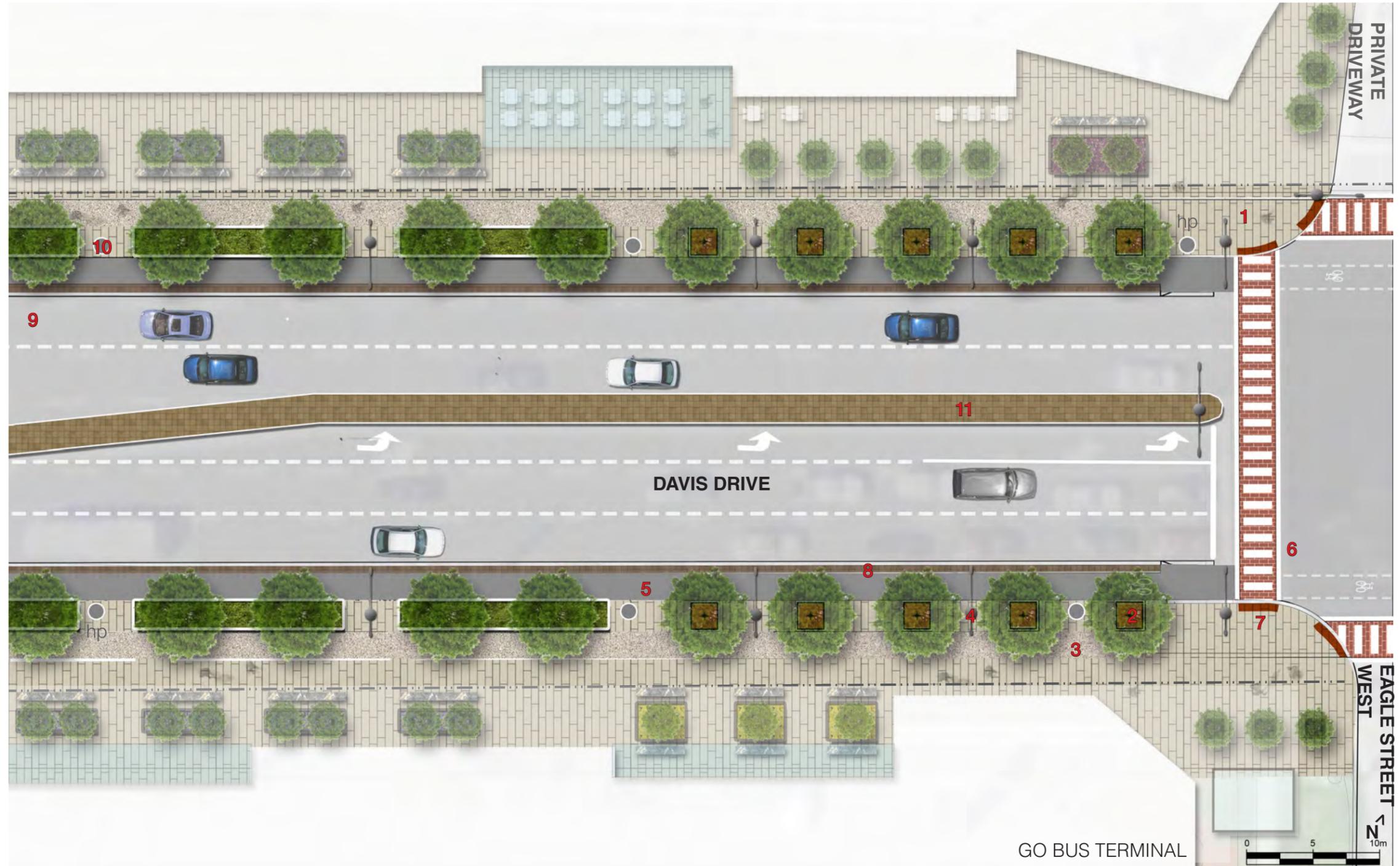


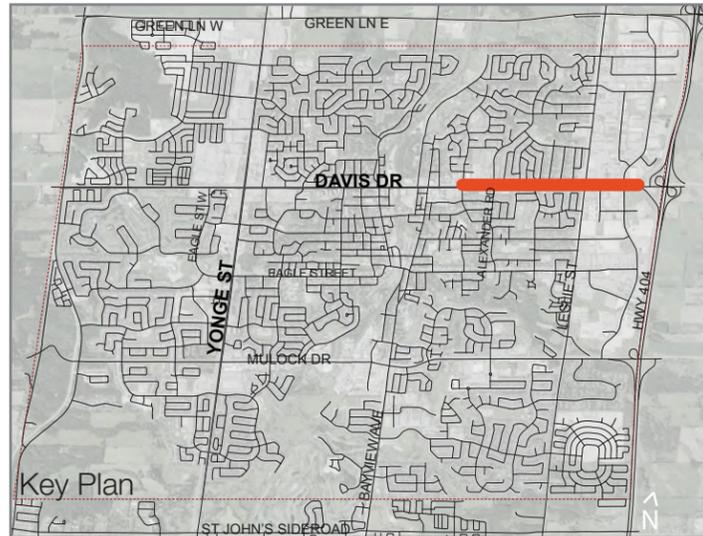
3.3.3.6. Streetscape Detail Plan in Commercial Urbanized Zone

This plan illustrates an urbanized intersection along Davis Drive West with the future urbanized context of the streetscape. This typology extends from Yonge Street to Eagle Street West.

Key Features Legend

1. Enhanced boulevard paving at intersections and street trees in grates and planters contribute to a more urbanized environment and facilitate pedestrian circulation
2. Street trees in grates spaced 6 metres on centre
3. 2.0 metre minimum pedestrian sidewalk connects to privately owned future animated plaza space
4. Signature street lights with pedestrian luminaires provides illumination for vehicles, cyclists and pedestrians
5. 1.5 metre wide cycle track with 0.6 metre buffer provides safe segregated space for cyclists
6. Enhanced pedestrian crosswalk
7. AODA tactile plate
8. Continuity strip creates visual cohesion throughout the streetscape
9. Two vehicular through lanes in either direction
10. Utility poles
11. Decorative paving in narrow median ties into streetscape language





Davis Drive East

3.3.4 Davis Drive East Segment

Existing Conditions Summary

Davis Drive East has a varied and inconsistent street character that is dominated by residential rear lots, commercial strip plaza development and medical facilities. This section of Davis Drive has continuous sidewalks for the entire length, as well as an existing bicycle facility (on-road shared) for the majority of length (from Alexander Road to Harry Walker Parkway). Although sidewalks and cycling facilities currently exist, there is a lack of amenities resulting in a poor pedestrian environment and a cluttered public realm. In addition, there are frequent driveways, interrupting traffic, cyclist and pedestrian flow. Davis Drive interfaces with the vivaNext rapidway near Patterson Street.

Key existing characteristics of Davis Drive East include:

- Varied street character with a mix of commercial and low density residential;
- Above grade utilities contribute to clutter in the public realm;
- Hydro poles along north side of street dominate the streetscape;
- Significant grade changes including at Leslie Street and Davis Drive on the southeast quadrant;
- Residential rear lots create an unanimated streetscape that lacks visual continuity;
- Car-oriented public realm.

PHILOSOPHY & APPROACH

The Davis Drive East segment consists of residential land usage and commercial. Accordingly, this corridor of the Streetscape Master Plan utilizes two differing streetscape typologies in order to serve both land usages.

The Davis Drive East streetscape design provides safe, accessible transportation options for pedestrians and cyclists and is accessible for all users including the elderly and those with disabilities. Through the presence of continuous urban pedestrian circulation, street furniture, pedestrian lighting, and tree canopy, Davis Drive East will hold a stronger sense of place.

KEY OBJECTIVES

The key objective for the Davis Drive East segment is to serve both the residential population as well as the population utilizing the commercial facilities. Through creating visual cohesion and comfortable active transportation facilities with green buffers, the streetscape will provide an animated space for residents to enjoy. The commercial area also provides dedicated active transportation in a more urban environment with street trees in grates and space for placemaking features such as public art.

KEY CHALLENGES

A major challenge to the Davis Drive East segment is its close proximity to Highway 404 and the accompanying commuter traffic volumes. Establishing a strong sense of place and creating a buffer between the roadway and the pedestrian/cycling realm aids in establishing a safe and animated streetscape.

APPLICATION OF STREETScape TYPOLOGIES

The Davis Drive East segment consists of the Green Streetscape Typology toward the west and the Davis Urban Streetscape Typology to the east (refer to key map 3.3.4.1). Davis Urban Streetscape Typology is utilized in order to minimize conflict between pedestrians and cyclists. In this corridor, it is appropriate to use the Davis Urban Streetscape Typology as the relatively smaller ROW can accommodate the cycle track roadside without an excessive amount of hardscape.

KEY DESIGN ELEMENTS

The following presents the typical streetscape conditions throughout the Davis Drive West segment.

Intersection Treatment

- Clear pedestrian paths
- Reduced radii at intersections to decrease crossing distances for pedestrians
- AODA compliance
- Enhanced crosswalk paving
- Trees in grates with soil cells in a continuous trench
- Trees spaced 6 metres on centre at intersections
- Feature paving at intersection corners contribute to placemaking

Midblock Treatment

- Pedestrian priority at driveways
- Clear pedestrian path
- Multi-use path in residential zones
- Cycle track in commercial areas
- Cycle track priority at driveway locations
- Trees in boulevard planters near commercial zone
- Vegetative buffer
- Trees in softscape near residential zone
- Trees spaced 8 metres on centre
- Hydro poles and light standards located in furnishing zone

Median Treatment

- Hardy shrub understory
- Deciduous trees spaced 8 metres on centre where space permits



3.3.4.1. Davis Drive East Streetscape Master Plan

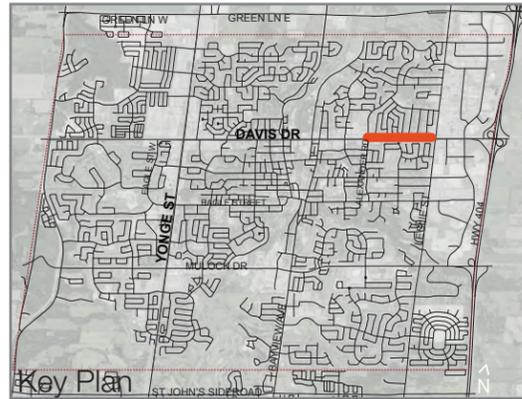
The following illustrates the Master Plan for the Davis Drive East segment of the Yonge Street & Davis Drive Streetscape Master Plan including a key plan of Streetscape Typology limits. The plan displays an aerial image of the current local context.



Green Streetscape Typology (3.3.4.2)



Davis Urban Streetscape Typology (3.3.4.3)



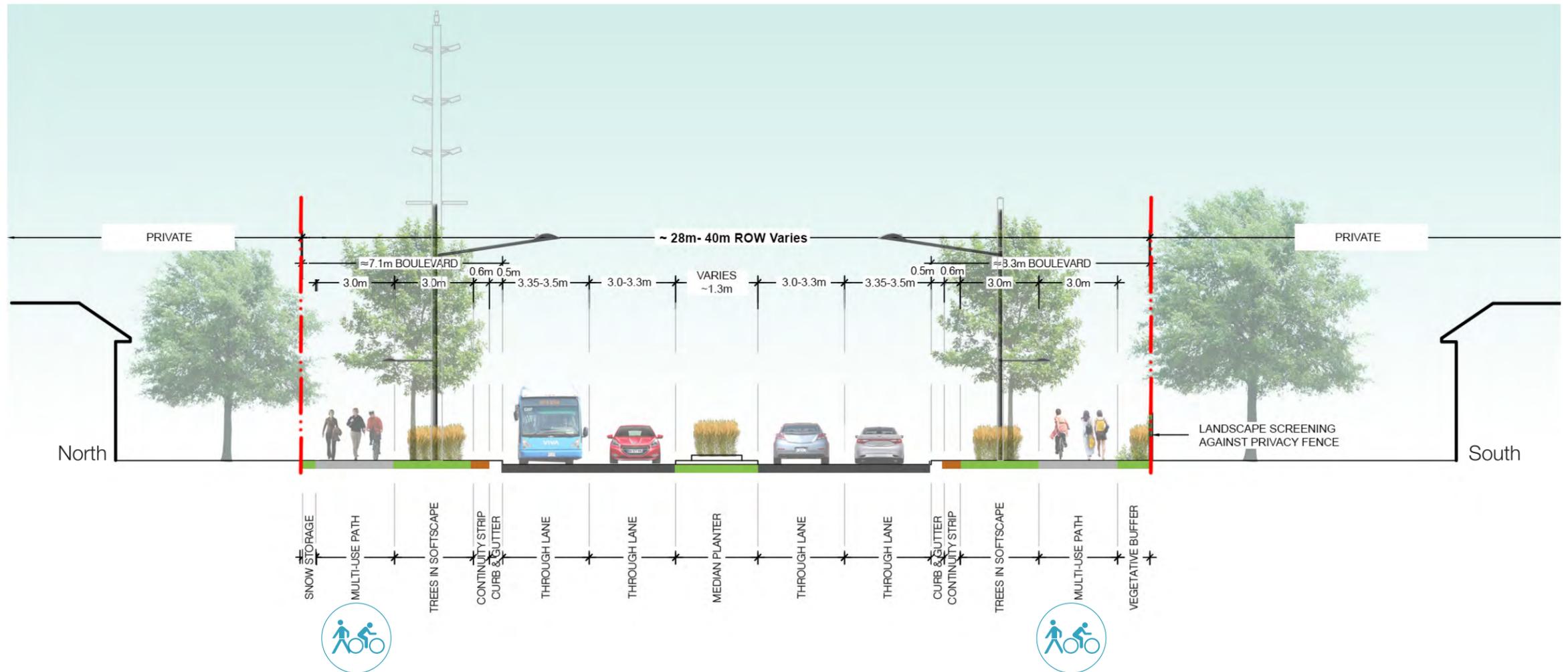
Davis Drive East

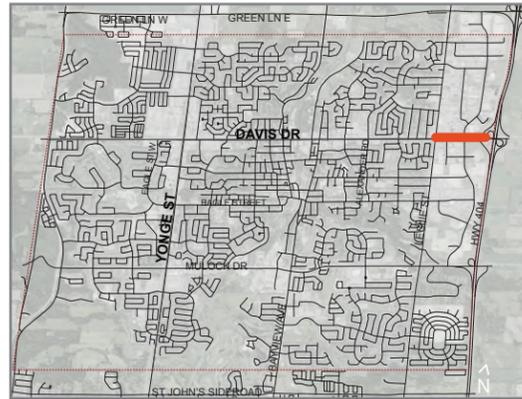
3.3.4.2. Green Streetscape Typology Section (From Patterson Street to Leslie Street)

This Green Streetscape Typology section illustrates the conditions in stable low density residential areas with rear lots.

Key Features Legend

- Multi-use path for pedestrians and cyclists with vegetated buffer from vehicular traffic
- Landscape screening of varied privacy fences creates visual cohesion along rear lot residential properties
- Signature lighting provides illumination for pedestrians, cyclists and vehicles
- Right Size geometry:
 - 3.0- 3.3 metre through lane;
 - 3.35-3.5 metre curbside lane;
 - 3.0 metre turn lane;
 - 3.0 metre MUP.





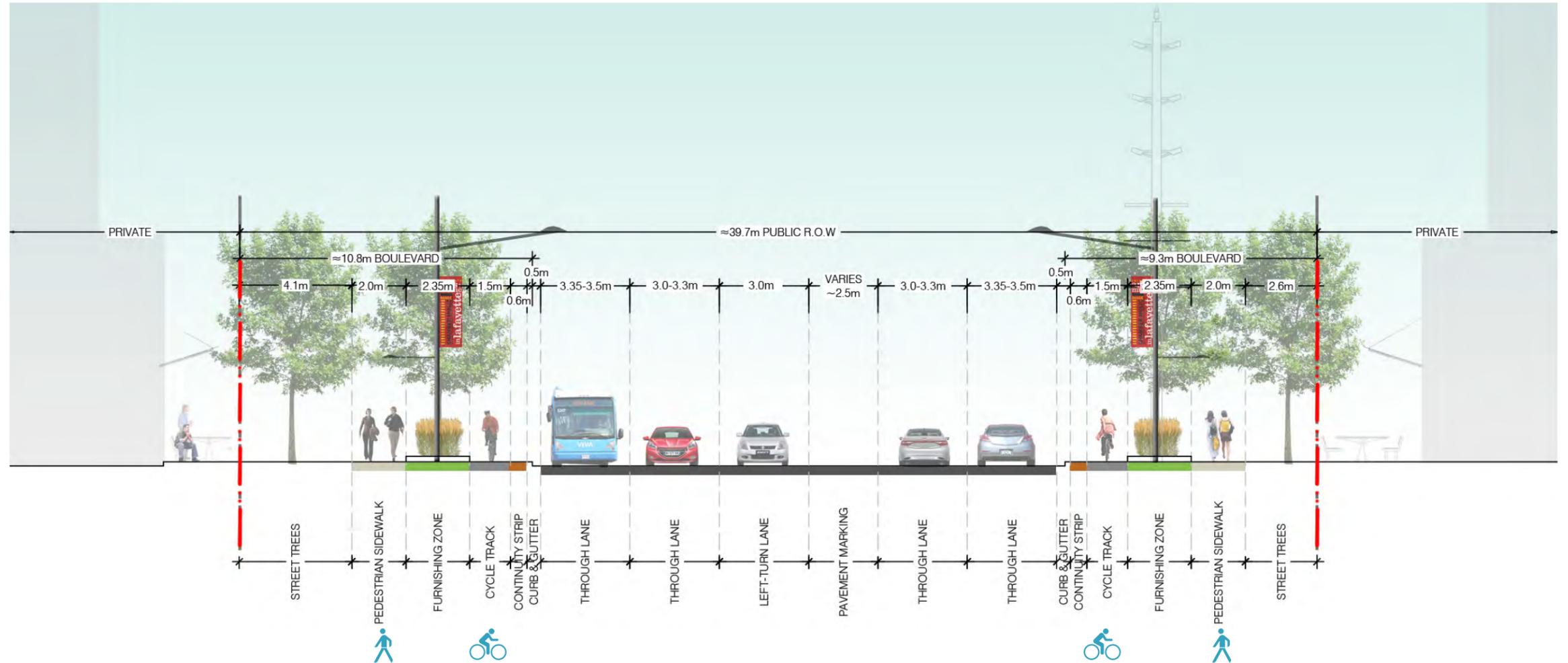
Davis Drive East

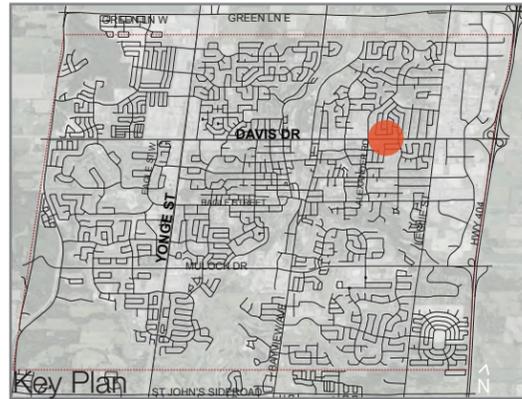
3.3.4.3. Davis Urban Streetscape Typology Section (From Leslie Street to Town Boundary)

This Davis Urban Streetscape Typology section illustrates the conditions in a developing urban zone.

Key Features Legend

- Curbside raised cycle track with buffer
- Furnishing/ planting zone buffer between cycle track and 2.0 metre wide pedestrian sidewalk
- Signature lighting provides illumination for pedestrians, cyclists and vehicles
- Right Size geometry:
 - 3.0- 3.3 metre through lane;
 - 3.35-3.5 metre curbside lane;
 - 3.0 metre turn lane;
 - 2.0 metre sidewalk;
 - 1.5 metre bike lane with a 0.6 metre buffer.





Davis Drive East

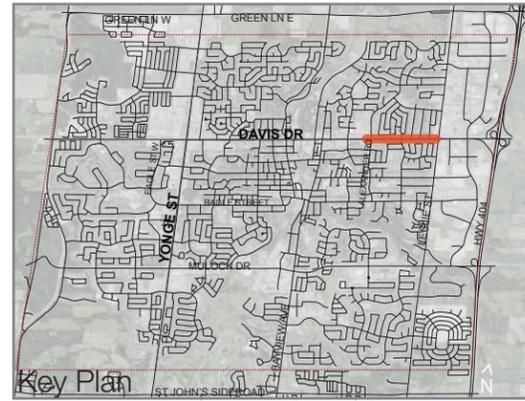
3.3.4.4. Visualization in Residential Zone

This visualization depicts the streetscape condition in a stable residential zone with rear lots.

Key Features

- 3.0 metre wide multi-use path for pedestrians and cyclists with vegetated buffer from vehicular traffic
- Vegetated buffer consists of hardy deciduous street trees spaced 8 metres on centre with an understory of ornamental grasses and hardy shrubs
- Landscape screening creates visual continuity along rear lot residential zone
- Signature lighting provides illumination for pedestrians, cyclists and vehicles
- Planted median visually reduces the scale of the ROW and contributes to greening of the corridor



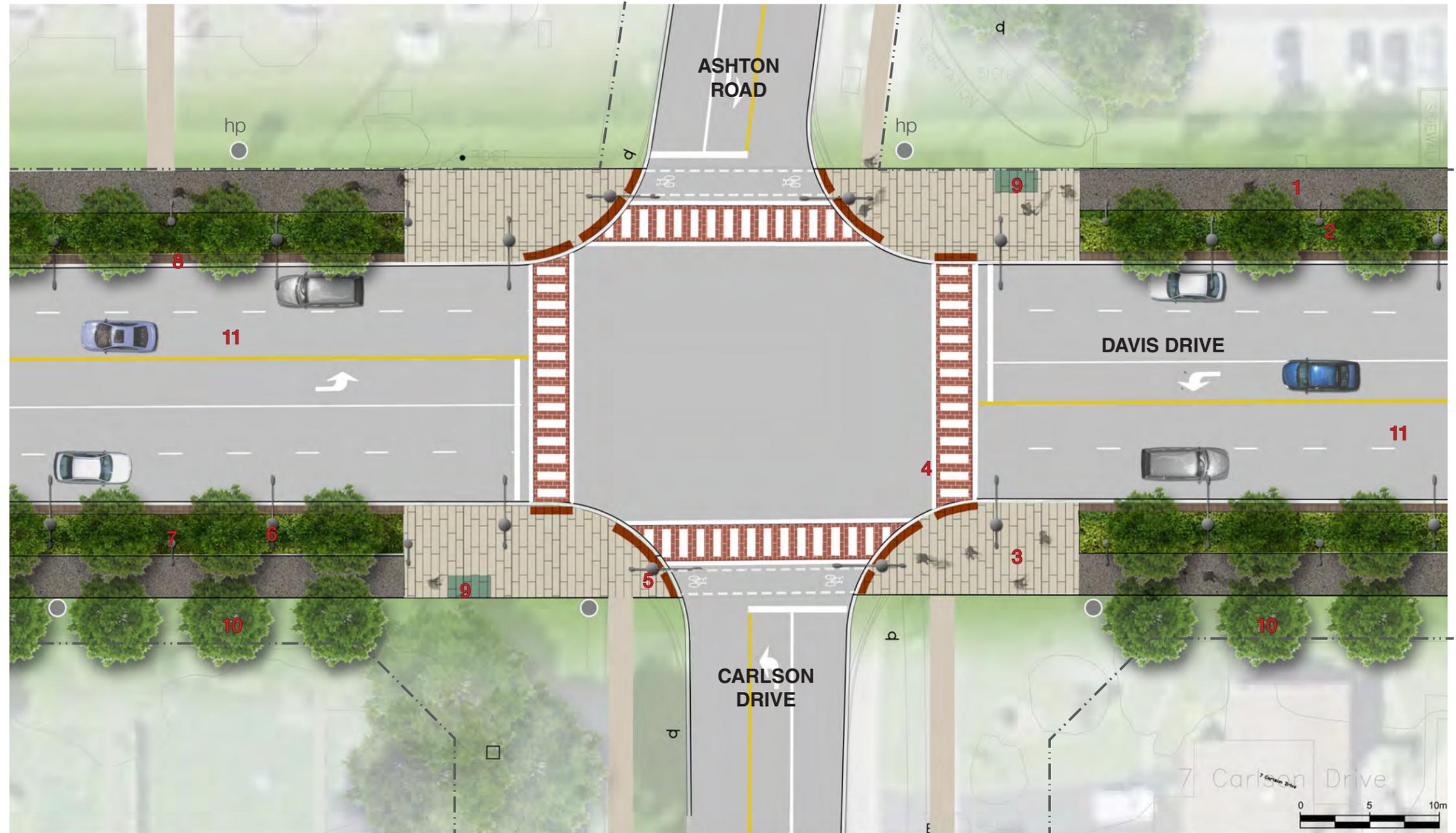


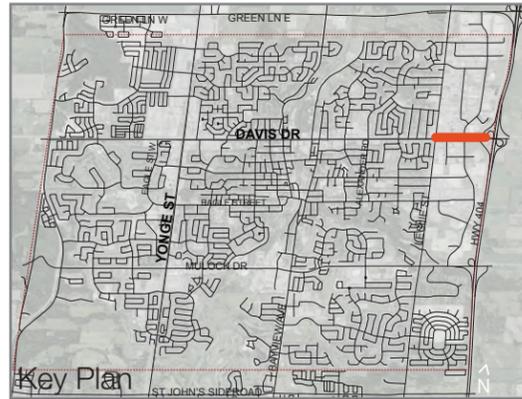
3.3.4.5. Detailed Plan at Typical Signalized Intersection in Residential Zone

This streetscape detail plan illustrates the detailed streetscape design at a signalized intersection in a stable residential areas with rear lots.

Key Features Legend

1. 3.0 metre wide multi-use path for pedestrians and cyclists
2. Vegetated buffer with trees between multi-use path and vehicular traffic
3. Enhanced boulevard paving at intersection
4. Enhanced crosswalk paving
5. AODA tactile domes
6. Signature street lights with pedestrian luminaries provides illumination for pedestrians, cyclists and vehicles
7. Pedestrian lighting further illuminates pedestrian realm
8. Continuity strip creates cohesion throughout the streetscape
9. Bus shelter
10. Deciduous trees in softscape line the back of the multi-use trail where there is available space
11. Two vehicular through lanes in either direction





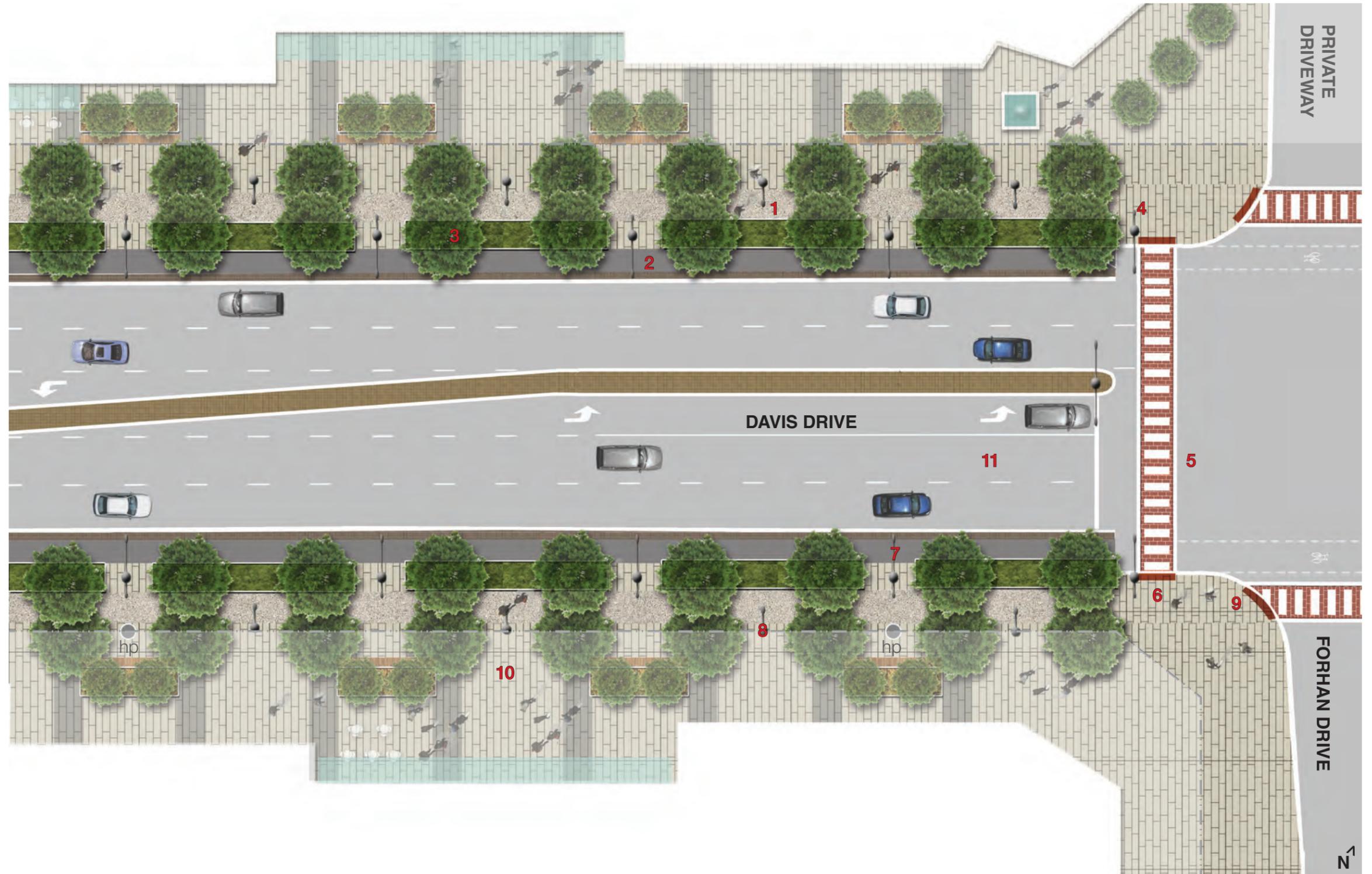
Davis Drive East

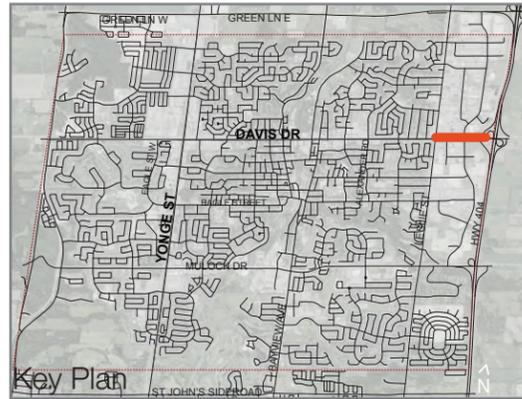
3.3.4.6. Detailed Plan in Urban Zone

This visualization depicts the streetscape design in an urbanized context.

Key Features Legend

1. 2.0 metre wide pedestrian sidewalk
2. 1.5 metre raised cycle track with a 0.6 metre buffer
3. Trees in planters provide an urbanized condition in commercial areas
4. Enhanced boulevard paving at intersections
5. Enhanced crosswalk paving
6. AODA tactile plates
7. Signature street lights with pedestrian luminaires provide illumination for pedestrians, cyclists and vehicles
8. Pedestrian realm further illuminated through pedestrian lighting
9. Decorative unit paving defines narrow centre median
10. Interface between private and public realm paving is seamless and provides for visual cohesion
11. Two vehicular through lanes in either direction with a dedicated left turn lane
12. Decorative paving in narrow median ties into streetscape language



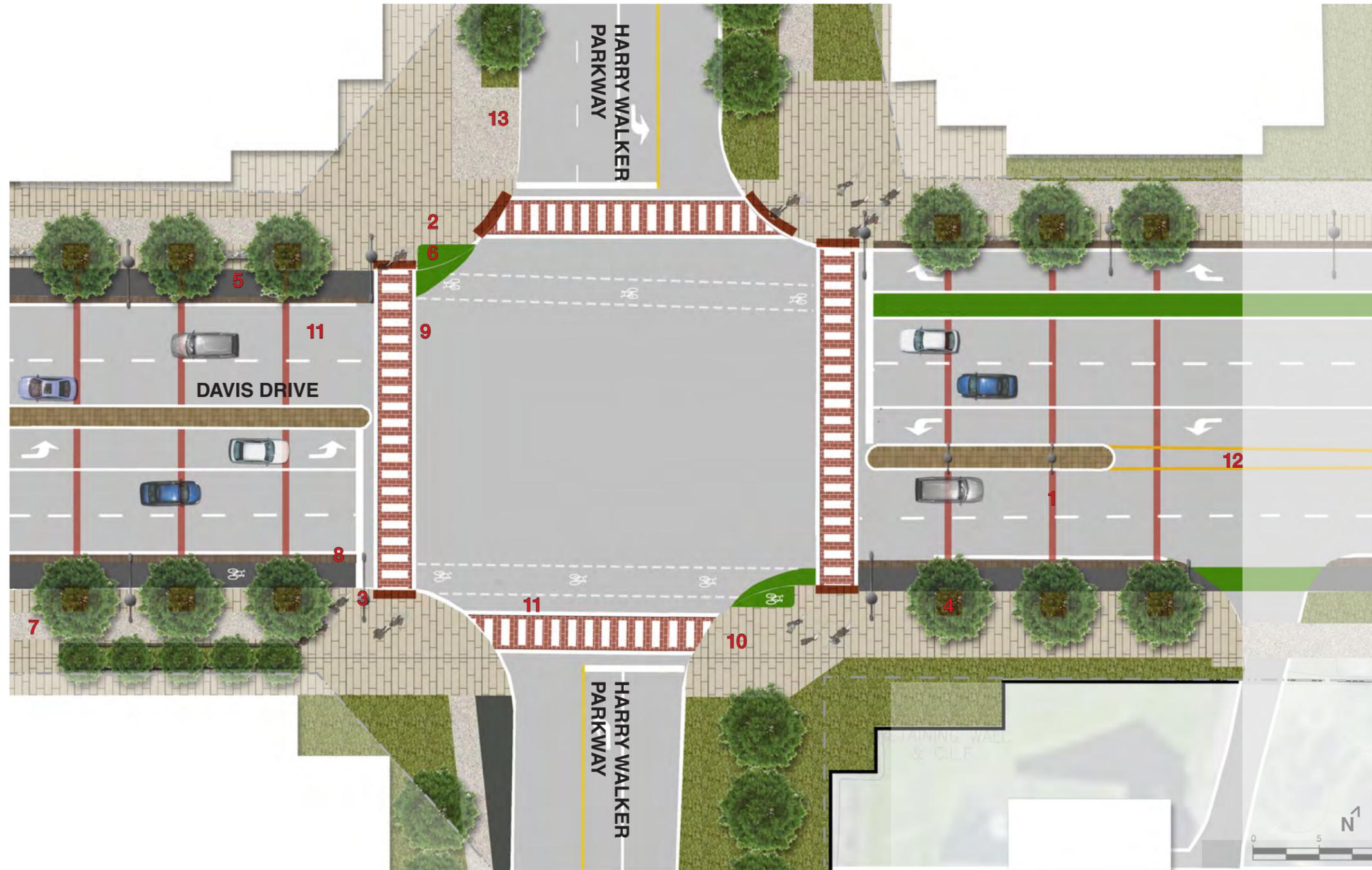


3.3.4.7. Streetscape Gateway: Detailed Plan at Harry Walker Parkway

This streetscape typology illustrates the conditions in a urban area.

Key Features Legend

1. Streetscape defines the gateway of the Town of Newmarket through coloured banding and accompanying tree planting
2. Enhanced boulevard paving at intersections
3. Signature streetlights with pedestrian luminaires provide illumination for pedestrians, cyclists and vehicles
4. Enhanced paving at intersections and street trees in grates contribute to a more urbanized environment
5. 1.5 metre wide cycle track with a 0.6 metre buffer provides a safe aesthetic riding environment for cyclists
6. York Region standard bike box
7. 2.0 metre wide pedestrian sidewalk with street trees and site furnishing provides a pedestrian-friendly environment
8. Continuity strip creates visual cohesion throughout streetscape
9. Enhances crosswalk paving
10. AODA tactile plate
11. Two vehicular through lanes in either direction
12. Streetscape Master Plan Boundary
13. YRT Bus Stop





4.0 Next Steps

The Yonge Street & Davis Drive Streetscape Master Plan utilizes different streetscape typologies in order to achieve a context driven streetscape design. A cohesive theme for the Town of Newmarket is maintained through paving materials, consistent street furniture, a unique plant palette and repeating streetscape typologies. These streetscape typologies work together to achieve the vision of a **Vibrant, Green & Active** Streetscape.

Now that the geometry of the streetscape has been established, Phase 4: Detailed Design and Guidelines will move on to establish detailed design guidelines and standards including a consolidated checklist of urban design criteria and requirements. This information will be utilized for local municipal and Regional review of development applications and site plans. It will also be a valuable tool to inform the detailed design process

Phase 4 will establish a 'Kit of Parts' for the streetscape that distills items of continuity and items of variability throughout the streetscape. The report will present detailed guidelines for the geometry and dimensions for intersections and midblock conditions. Phase 4 will also establish the materials to be utilized for the streetscape as well as the street furniture style.

Phase 4 of the project will further develop the Streetscape Master Plan to ensure that future development upholds the vision for Yonge Street and Davis Drive.

4.1 Glossary of Terms

Auto Turn Analysis: CAD analysis of the movement of vehicles turning within certain streetscape dimensions.

Complete Streets: Streets that are designed for all users, including pedestrians, bicyclists, motorists and transit riders of differing ages and abilities.

Right Size Streets: Streets which contain dimensions that encourage the comfortable transport of all users.

Urban Heat Island (UHI) Effect: Raised temperatures in urban areas as a result of the built form.

