

Central Kingston Growth Strategy

Final Recommendations Report

Final Report - July 2021



Submitted to:
Corporation of the City of Kingston
216 Ontario Street,
Kingston, Ontario, K7L 2Z3

Table of Contents

1.0	Introduction	1
1.1	Background	1
1.2	Strategy Process	2
1.3	Study Area	5
2.0	Study Background	9
2.1	Phase 1 - Discovery and Background	9
2.1.1	Planning and Policy Development	9
2.1.2	Urban Design Analysis	10
2.1.3	Secondary Residential Units	12
2.1.4	Public-Private Interface	13
2.1.5	Consultation	15
2.2	Phase 2 - Vision (Options and Recommendations)	16
2.2.1	Elements of Compatibility Analysis	16
2.2.2	Proportionality Analysis	18
2.2.3	Zoning Analysis	18
2.2.5	Heritage Analysis	23
2.2.6	Selection of Intensification Areas	26
2.2.7	Stable Neighbourhoods	33

Table of Contents

3.0	Phase 3&4 Engagement Events	41
3.1	Community Working Group	42
3.1.1	About the Event	42
3.1.2	Summary of Feedback	43
3.2	Phase 3 Virtual Public Meeting	45
3.2.1	About the Event	45
3.2.2	Summary of Feedback	45
3.3	Phase 4 Workshops with the City	47
4.0	Policy Recommendations	49
4.1	Official Plan Recommendations	49
4.1.1	General Recommendations	50
4.1.2	Section-Specific Recommendations	51
4.1.3	Schedule Recommendations	51
4.2	Recommendations For The New City-Wide Zoning By-law (October 2016)	52
4.2.1	Zoning By-Law Strategy	52
4.2.2	Additional Zoning Strategies	56
5.0	Next Steps	59

Table of Contents

Appendix A: Phase 3 Consultation Comments	I
Appendix B: Zoning By-law Provision Recommendations	XVII
Appendix C: Official Plan Policy Recommendations	XIX
Appendix D: Urban Design Guidelines	XXI



Table of Contents

List of Figures

Figure 1-1: Strategy Process	3
Figure 1-2: Study Area	4
Figure 1-3: Study Area Neighbourhoods	6
Figure 1-4: Central Kingston Growth Strategy Study Area Map, identifying six groups of neighbourhoods. The darker portions identified in each of the groups represent the defined Study Area (the residential areas of each neighbourhood).	7
Figure 2-1: Elements of Compatibility	11
Figure 2-2: Public-Private Interface Elements	14
Figure 2-3: Key Metrics for Proportionality Analysis	16
Figure 2-4: Floor Space Index (FSI), classified from low to high across the Study Area	17
Figure 2-5: Existing Conditions versus As-Of-Right Permissions Model for the A Zone	19
Figure 2-6: Cumulative Impacts	20
Figure 2-7: Incremental Increases to GFA within the A Zone As-Of-Right Permissions Box	22
Figure 2-8: Participant Spatial Responses to “Allocating Density”	27
Figure 2-9: Johnson and Brock Corridor Area	29
Figure 2-10: Proposed Intensification Sites (Overall Map)	30
Figure 2-11: Portsmouth Avenue Corridor Areas	31
Figure 2-12: Sir John A. Macdonald & Bath Road Area	32
Figure 2-13: Hillendale streetview (image sourced from Google)	33
Figure 2-14: Strathcona Park streetview (Google)	33
Figure 2-15: Grenville Park streetview (Google)	33
Figure 2-17: Calvin Park streetview showing student housing opposite residences (Google)	34
Figure 2-16: Polson Park streetview (Google)	34
Figure 2-18: Polson Park streetview (Google)	34
Figure 2-19: Fairway Hills streetview (Google)	35
Figure 2-20: Grange Street, Portsmouth (Google)	35

Table of Contents

List of Figures Continued

Figure 2-21: Brock Street, Sydenham (Google)	36
Figure 2-22: Brock Street, Queen's (Google)	36
Figure 2-23: Alwington streetview (Google)	36
Figure 2-24: Churchill Cresc., Sunnyside (Google)	36
Figure 2-25: Williamsville streetview (Google)	37
Figure 2-26: Kingscourt streetview (Google)	37
Figure 2-27: Rideau Heights streetview (Google)	38
Figure 2-28: Markers Acres streetview (Google)	38
Figure 2-29: Summary of Engagement Events Leading up to Phase 3	41
Figure 3-1: Presentation Board from Phase 3 Virtual Presentation	44
Figure 4-1: Johnson and Brock Corridor Area	53
Figure 4-2: Portsmouth Avenue Corridor Areas	53
Figure 4-3: Sir John A. Macdonald & Bath Road Area	53
Figure 5-1: Study Process Summary	59

List of Tables

Table 2-1: Floor Space Index (FSI) by Neighbourhood	17
Table 2-2: Features of Group 4 neighbourhoods, identified through visual survey	24
Table 2-3: Intensification Criteria and Rationale	28
Table 2-4: Zoning Criteria and Rationale	39

This page has intentionally been left blank.

1.0 Introduction

The intent of this Phase 3 Policy Directions Report is to present the recommendations and rationale developed through Phase 3 of the Central Kingston Growth Strategy. The intent of the overall Strategy is to facilitate a long-term vision for the residential areas of Central Kingston by preserving what is valued in Kingston's communities and identifying the appropriate locations and forms for accommodating future growth in the central residential neighbourhoods of the City.

This report includes:

- a narrative on the analysis and background work completed to-date to inform these directions;
- an overview and summary of discussion and feedback at the various community engagement events / online engagement; and,
- a comprehensive set of policy and regulatory directions.

1.1 Background

The need to manage increasing growth pressures within the established areas of Kingston is evident in the [May 2019 Population, Housing & Employment Projections Study](#). The City is looking to add between 2000 to 4000 units in the Central Kingston Growth Strategy study area. Additionally, Central Kingston faces a challenge that is common in many Canadian University cities, where a primary driver of this intensification has been rental accommodations.

Localized growth pressures have resulted in the construction of additions and larger scale residential rebuilds and the conversion of single-unit dwellings into dwellings having two or more units or an addition of multiple bedrooms. While growth is generally a good thing and represents healthy renewal of building stock for municipalities, occasionally new developments and expanded buildings have been much larger than the surrounding homes, and may extend deep into the rear yard, creating a building out of character with the neighbourhood and issues with excessive overlook of neighbouring properties. Such developments have raised public concern regarding

their impact on the built form and character of the affected neighbourhoods. Through consultation events in this study, several members of the public as well as community organizations have also expressed concerns with the overdevelopment in the form of multi-unit developments without planning oversight, and often perceived as being without sufficient amenities.

There is a need to appropriately accommodate this growth pressure within existing residential areas by establishing policies which guide the scale and character of residential development and identifying suitable sites for intensification to help alleviate the growth pressures on stable areas. It is anticipated that focusing future residential development in identified strategic locations will accommodate housing demand, helping to alleviate pressure for additional conversions or densification of single-unit dwellings. Furthermore, the proposed policy and regulatory framework is intended to be context-appropriate to ensure that the physical character of established residential neighbourhoods is maintained and enhanced.

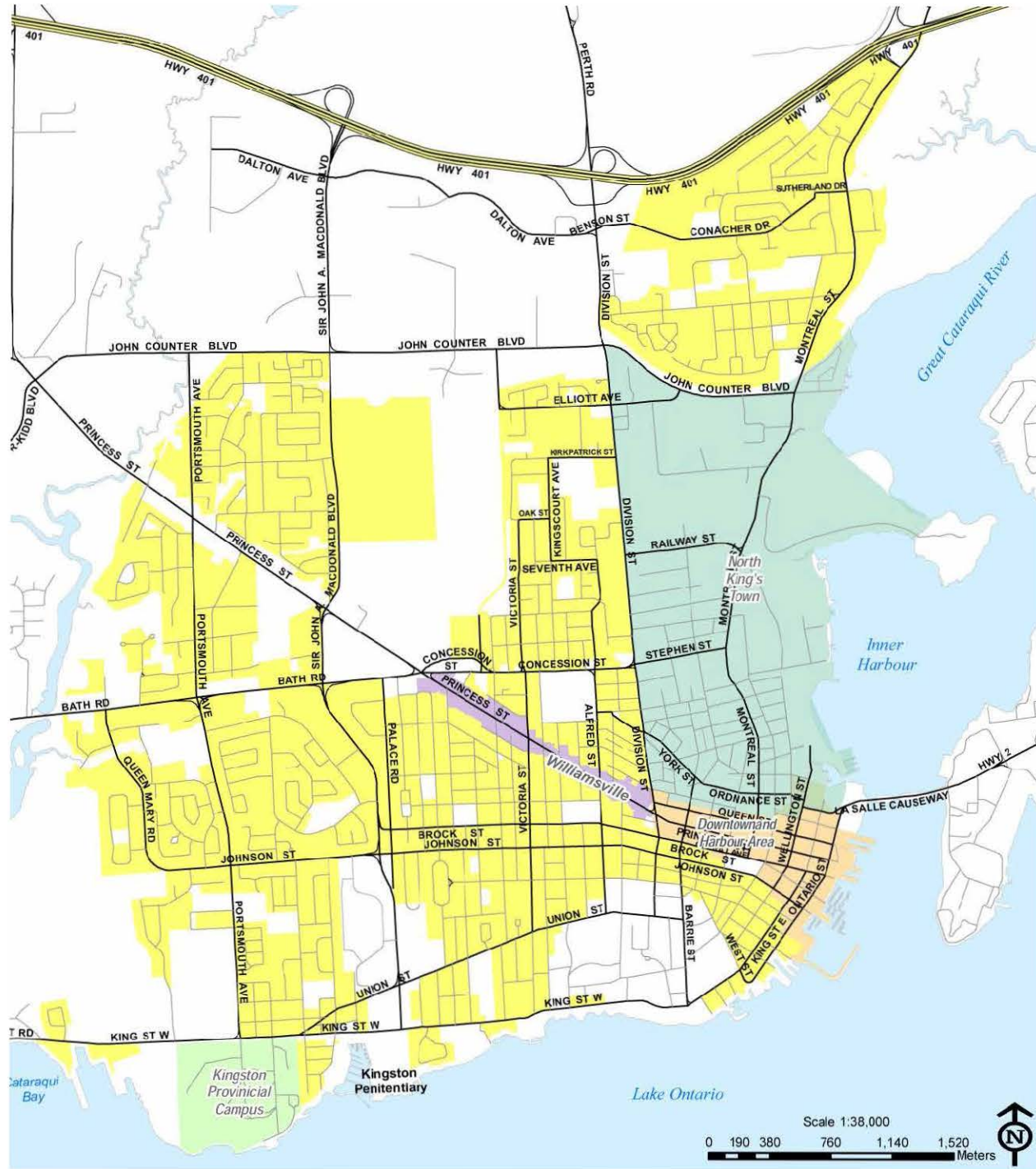
1.2 Strategy Process

Initiated in January 2018, this Study was conducted in three phases, concluding with a presentation of final recommendations to the Planning Committee (**Figure 1-1**). The three Phases include:

- 1. Discovery:** the first phase allowed the Project Team to develop an understanding of existing conditions and community preferences within the Study Area, concluding with the Phase 1 Background Report.
- 2. Vision (Options and Recommendations):** during the second phase, the Project Team undertook an assessment to determine feasible intensification sites and key metrics for preserving neighbourhood character. This phase concluded with the Phase 2 Strategic Report.
- 3. Policy Directions and Final Recommendation:** this final phase integrates all input and findings from the previous phases to develop draft policy, regulatory, design, and infrastructure recommendations, concluding in this Final Recommendations Report and Urban Design Guidelines for the Study Area.



Figure 1-1: Strategy Process



PLANNING, BUILDING &
LICENSING SERVICES

**CENTRAL KINGSTON
GROWTH STRATEGY**

Legend

- Study Area
- North King's Town Secondary Plan (proposed)
- Kingston Provincial Campus Secondary Plan
- Downtown and Harbour Specific Policy Area
- Williamsville Main Street Specific Policy Area

Scale 1:38,000
0 190 380 760 1,140 1,520
Meters



Figure 1-2: Study Area

1.3 Study Area

The Study Area includes the residential areas of Central Kingston with the exception of the residential area that is located within the boundaries of the proposed North King’s Town Secondary Plan and the Kingston Provincial Campus Secondary Plan. Areas of mixed use, including the Downtown and Harbour Area and the Princess Street Corridor (including Williamsville Main Street), are also excluded from the Study Area. A map showing the specific extent of the Study Area is included in **Figure 1-2**.

Based on the neighbourhood boundaries defined by Statistics Canada’s dissemination areas, the Study Area covers portions of 16 neighbourhoods, as outlined in **Figure 1-4** and are organized as follows:

- | | |
|-----------------------------|----------------------------------|
| (1) Alcan; | (9) Sunnyside; |
| (2) Strathcona Park; | (10) Alwington; |
| (3) Grenville Park; | (11) Queen's; |
| (4) Hillendale; | (12) Sydenham, |
| (5) Polson Park; | (13) Williamsville; |
| (6) Calvin Park; | (14) Kingscourt; |
| (7) Fairway Hills; | (15) Rideau Heights; and, |
| (8) Portsmouth; | (16) Markers Acres. |

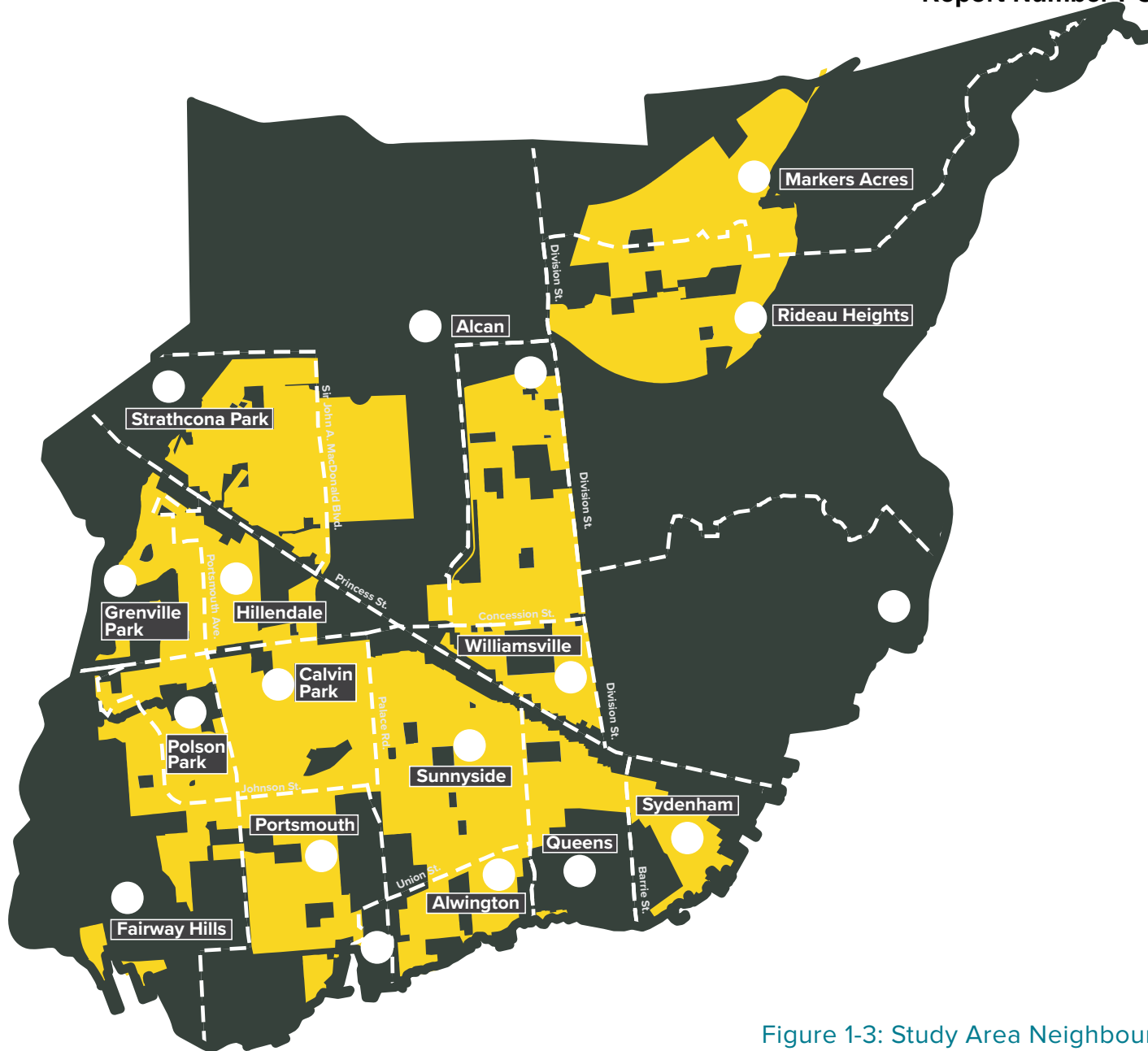


Figure 1-3: Study Area Neighbourhoods

The yellow areas in each neighbourhood represent the defined “Study Area”, being the residential areas in each neighbourhood. The Kingston Penitentiary (17) and Inner Harbour (18) also fall within the jurisdiction of Zoning By-law 8499, but are not a component of this analysis.

These 16 neighbourhoods are differentiated by their built form, lot fabric, history/heritage and era of development. However, to begin understanding them and identifying patterns, the Project Team organized the neighbourhoods into 6 groups based on geography and era of construction, as outlined below and depicted in **Figure 1-4**.

- Group 1**
Hillendale, Grenville Park, Strathcona Park, Alcan
- Group 2**
Polson Park, Calvin Park
- Group 3**
Fairway Hills, Portsmouth
- Group 4**
Sydenham, Queen's, Alwington, Sunnyside
- Group 5**
Kingscourt, Williamsville
- Group 6**
Rideau Heights, Markers Acres

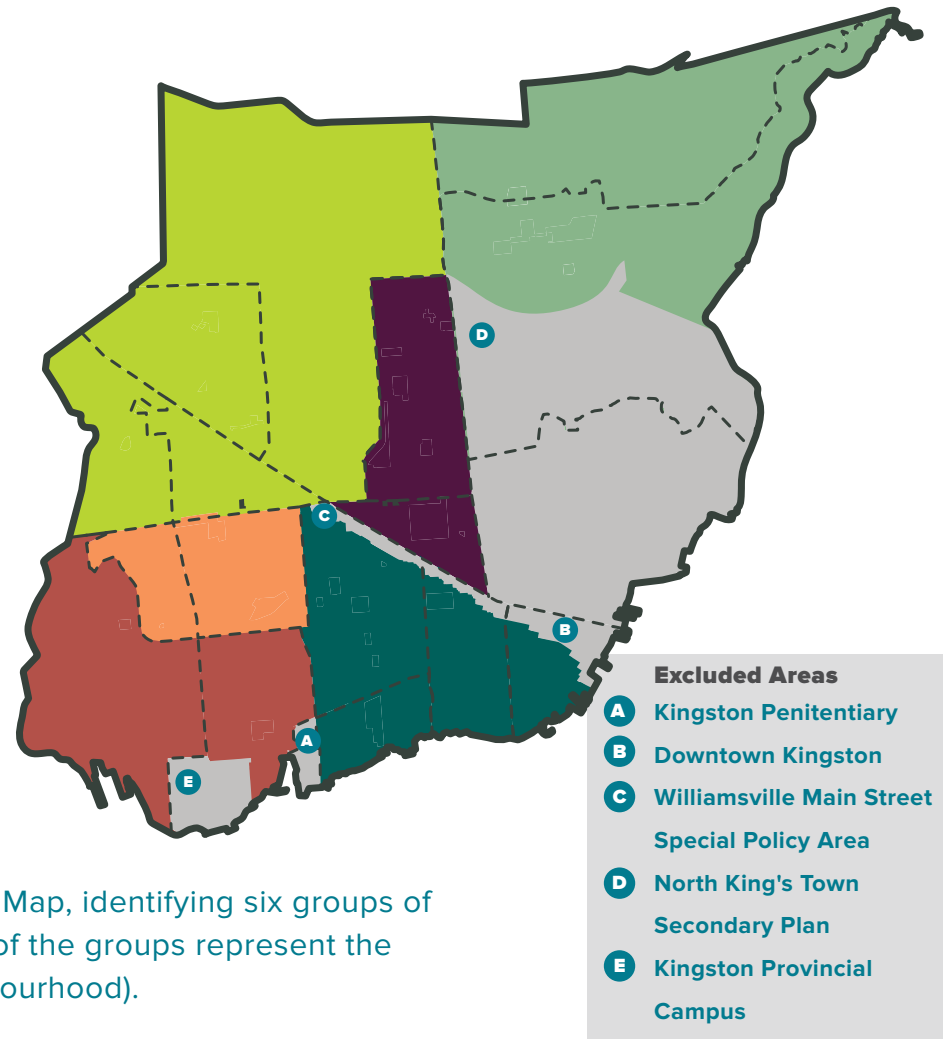


Figure 1-4: Central Kingston Growth Strategy Study Area Map, identifying six groups of neighbourhoods. The darker portions identified in each of the groups represent the defined Study Area (the residential areas of each neighbourhood).

This page has intentionally been left blank.

2.0

Study Background

This section of the report gives a brief synopsis of the key findings, analysis and background work completed in Phases 1 and 2 and summarizes the consultation events completed in Phase 3 and 4. For additional detail, refer to Phase 1 and 2 Reports.

The City of Kingston is in the process of or has completed several studies alongside the Central Kingston Growth Strategy. These studies include:

- [Population, Housing & Employment Projections Study](#) (completed May, 2019);
- New City-wide [Zoning Bylaw Update](#) (draft on hold pending the results of this Strategy);
- [North King’s Town Secondary Plan](#);
- [Kingston Penitentiary and Portsmouth Olympic Harbour](#) (completed July, 2017);
- [Parks and Recreation Master Plan Update](#);
- [Density by Design](#): Kingston's Mid-Rise and Tall Building Policy Project; and,
- Amendments to the Official Plan and the Zoning Bylaw to [broaden Second Residential Units permissions](#) (completed September, 2019).

These studies have either informed this Strategy, or have been considered as they address the areas that are excluded from this Strategy. Together, these studies contribute to a complete planning framework for the City.

2.1 Phase 1 - Discovery and Background

Phase 1 documented the existing planning context, key urban design elements, municipal best practices, preliminary servicing and infrastructure analyses and a brief tax revenue analysis to provide the background and launching point for this Strategy. Several of these key elements are highlighted briefly below.

2.1.1 Planning and Policy Development

Phase 1 identified that additional guidance for intensification and infill is required in the Official Plan (OP), Zoning Bylaw (ZBL) and proposed Urban Design Guidelines (UDGs). This included:

- a. Creating a framework through the ZBL and UDGs to ensure development is compatible with the surrounding context.

- a. Refining policy to protect neighbourhood character while still allowing for 'soft' intensification and compatible development in stable areas.
- b. Recognition of transitional areas in the OP and ZBL.
- c. Allowing for Secondary Residential Units (SRUs) appropriate to the surrounding context.

Phase 1 further provided insight into development trends through application and permit data which fed into the identification of preferred intensification sites. These sites are discussed further under "[2.2 Phase 2 - Vision \(Options and Recommendations\)](#)" of this report.

2.1.2 Urban Design Analysis

Kingston's neighbourhoods have been constantly evolving over time to meet the changing needs of residents. Phase 1 reviewed urban design considerations and factors that influence the perception of density and development.

The urban design analysis in Phase 1 looked at how we **visualize and perceive density**, noting that **design quality** and features such as stepbacks are more visually important than actual building size and height.

It also defined different ways to **transition between densities**, which have influenced the development of this Strategy and been carried through to the current phase. For more detail on **Transitioning Elements**, refer to the Urban Design Guidelines. Another key finding from Phase 1 was the **relationship between lot and building** and its visual impact. The size of a building and how it sits on a lot is one of the most significant contributors to its influence on neighbourhood character.

Elements of compatibility were defined in Phase 1 as features which are consistent within or across neighbourhoods that contribute to their character. These elements included building size, lot width, number and height of storeys, setbacks, separation between houses, mature tree planting and location, front walkway treatment, garage and driveway location and size, existence of rear lanes, facade material and cladding, window scale and proportions, heritage character and ground floor uses. A visual survey was conducted to assess these elements within the Central Kingston neighbourhoods and groupings, which is documented in the Phase 1 Report. Spatial elements of compatibility are shown in **Figure 2-1**.

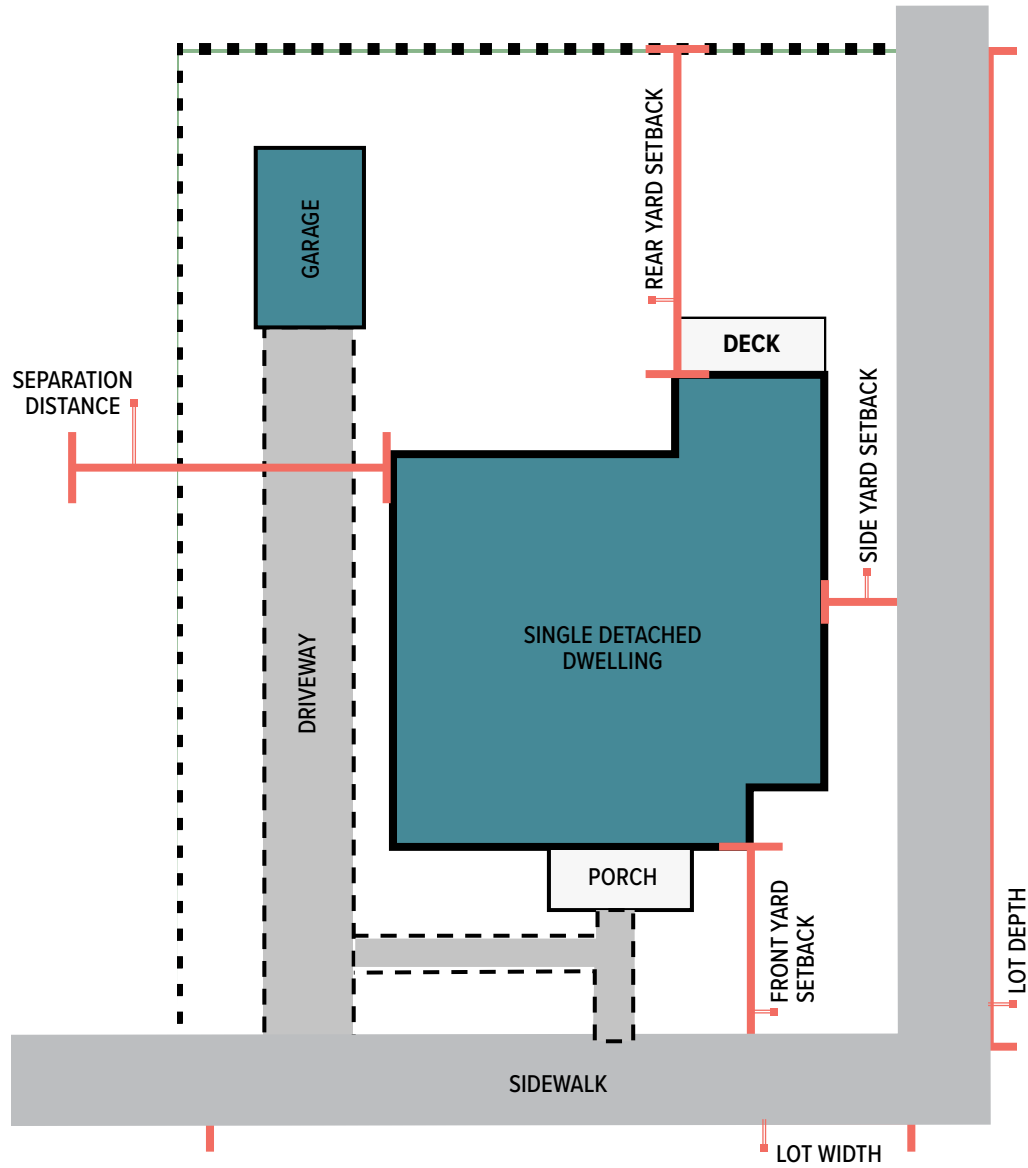


Figure 2-1: Elements of Compatibility



A **Zoning Analysis** was completed to understand the current policy context that has shaped the Central Kingston area. [Bylaw Number 8499](#) governs residential zones within Central Kingston, and places the residential areas in a number of different zones with various permitted uses and applicable performance standards. To better understand these zones, the maximum building size for areas zoned "A" – One-Family Dwelling and Two-Family Dwelling and "A1" – One-Family Dwelling, were analyzed. This high level analysis found that zone requirements regulate the built form differently depending on the zone category (i.e. maximum floor space index and maximum percentage of lot coverage in the A Zone versus minimum building setbacks in the A1 Zone). This results in substantial variations in the permitted building envelope and maximum building potential that may be permitted throughout the Study Area.

2.1.3 Secondary Residential Units

Second Residential Units (SRUs) were looked at in context within the City, a comparison of the impacts of different forms was drawn and other municipalities' approaches to their implementation and design were

reviewed for application to this Strategy. This Strategy aims to promote the contextual implementation, design and uptake of SRUs in appropriate locations within the residential neighbourhoods of Central Kingston.



Interior SRUs are contained within the principal dwelling, built from existing converted space, usually being an attic or basement.



Attached SRUs are additions to the side or rear of the home which adjoin the principal dwelling, or are constructed on top of an attached garage.



Detached SRUs are stand-alone structures separate from the principal dwelling that can be built as entirely separate unit or constructed over / within an existing accessory structure, such as a detached garage.

2.1.4 Public-Private Interface

The public-private interface is the area between the home (private realm) and street (public realm), where a significant portion of daily interaction occurs. Identifying elements which contribute to active street life and community character and developing tools to direct the design of these elements is therefore crucial to the success of redevelopment within communities.

Key design elements identified the **Public-Private interface** analysis in Phase 1 included:

- 1. Smaller setbacks and narrow building configurations contribute to more animated, intimate frontages.** Small front yard setbacks and varied frontages create interest and allows for interaction between the public and private realm. Extensions of the private realm, whether that is a balcony, porch, or open lawn space also add more intrigue.
- 2. Driveway location matters.** Garages and driveways should be located to the side or in the rear yard where feasible. Minimizing the size of driveways and visibility of parking is also desirable.
- 3. Density yields interest.** Mixed densities help to strengthen both activity and diversity. Higher densities of ground-related buildings (i.e. row homes) require more entrances, animating the interface. Additionally, a variety of building forms often results in varied architectural elements and exterior materials, which articulate and add interest. While uncommon in Central Kingston, the addition of mixed use within appropriate areas would allow for increased activity and diversity.
- 4. The effectiveness of transparency is contextual.** Transparency (i.e. windows) along an interface allows for connection between the two realms. However, transparency is less effective when there are large setbacks. Additionally, transparency on the ground floor is most effective, as this is at a scale that will meet the eye level of users within the public realm.

Several of these elements are demonstrated in **Figure 2-2**.



Figure 2-2: Public-Private Interface Elements

The public-private interface has been considered through this Strategy and recommendations for the zoning by-law update and urban design guidelines further articulate this. They include consideration for:

- Physical integration and compatibility;
- Building configuration (Massing, height, setbacks);
- Facade design and architectural elements;
- Landscape elements;
- Garages and accessory structures; and
- Visual linkages between buildings and public space.

Municipal Best Practices were reviewed to inform similar approaches for this Strategy, where appropriate, and a **Tax Revenue Analysis** was completed which identified that the highest tax returns often came from the smallest and most densely populated lots, showing the financial benefit to planning for future density.

In order to continue to allow for adaptability for healthy growth, without losing the sense of character and uniqueness that contributes to distinctive neighbourhood character, the analysis completed in Phase 1 was important to future phases in developing recommendations that support these goals.

2.1.5 Consultation

Public desires expressed in Phase 1 Consultation for future growth and development are summarized below:

- Connectivity and walkability, with a focus on the active and public transportation networks (i.e. widened sidewalks, informal pedestrian routes, bike lanes, connected cycling routes and proximate access to public transit);
- “Street Greening” through increased street trees and green infrastructure within the urban realm;
- Access to safe greenspaces and public spaces, with a particular desire for an increase in the latter;
- Protection and promotion of heritage and neighbourhood character through design;
- Affordability and a variety of housing types which contextually reflects the diversity that currently exists within Kingston; and,
- Encouragement of density and amenities along neighbourhood edges on major streets.

Public desires have been considered throughout this Strategy and have influenced the policy and design recommendations in this Phase.

2.2 Phase 2 - Vision (Options and Recommendations)

Phase 2 was informed and built on the existing conditions analysis and outcomes from Phase 1 of this Strategy. The Phase 2 Report presented a detailed breakdown of the rationale for the selection of intensification sites, identified character elements for preservation in central neighbourhoods, and examined preliminary recommendations for policy to guide future development in Central Kingston residential areas. The following sections summarize some of the key takeaways from Phase 2.

2.2.1 Elements of Compatibility Analysis

The 'Elements of Compatibility' identified in Phase 1 were reviewed for their impact and contribution to neighbourhood character. This analysis fed into the development of preliminary policies and guidelines, outlined in the Phase 2 Report.

The recommended size and dimensions for the elements of compatibility were also reviewed against

the stable residential neighbourhoods to ensure the planning framework reflects the existing context present in the neighbourhoods, while still allowing for them to develop and evolve over time.

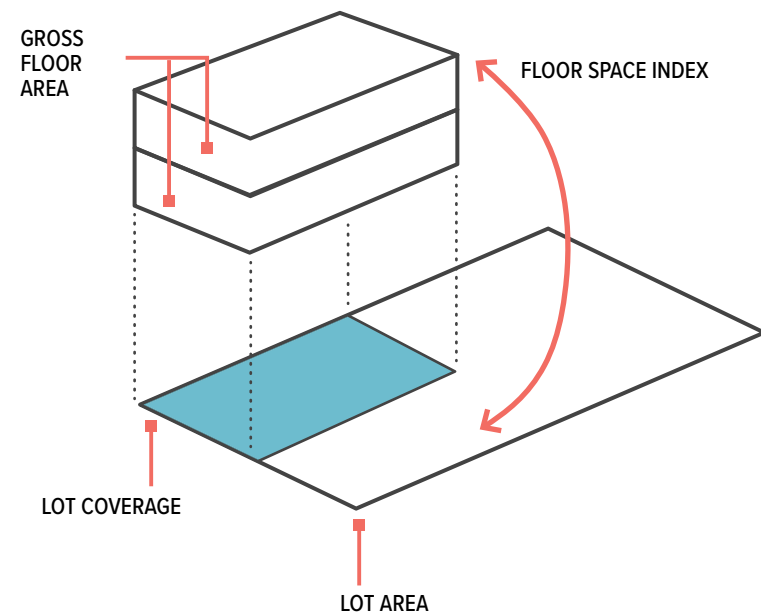


Figure 2-3: Key Metrics for Proportionality Analysis

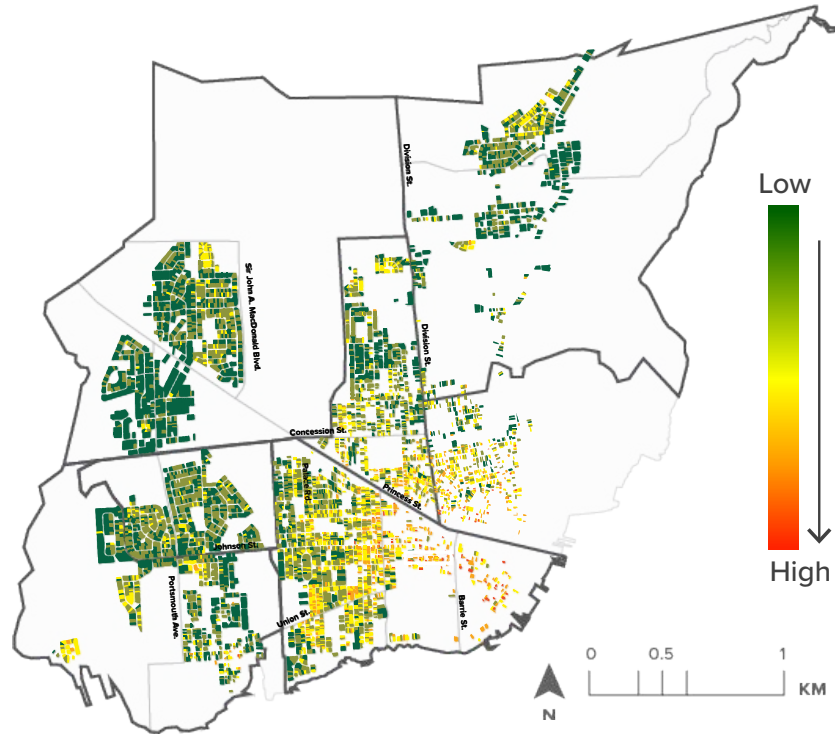

















Figure 2-4: Floor Space Index (FSI), classified from low to high across the Study Area

The central range (the range of data which falls between the first and last quarter for that metric within the subject neighbourhood) and average FSI for each neighbourhood is detailed in **Table 2-4**. Key takeaways:

- FSI ranges from 0.25 – 0.98
- The lowest average FSI is in Hillendale and the highest average FSI is in Sydenham
- The average FSI across Central Kingston is 0.42
- The south end of Sunnyside, Alwington, Queen's, Sydenham and Williamsville have the largest concentration of higher FSIs

Table 2-1: Floor Space Index (FSI) by Neighbourhood

Neighbourhood	Average	Central Range
 Hillendale	0.25	0.18 – 0.31
 Grenville Park	0.27	0.22 – 0.32
 Rideau Heights	0.32	0.23 – 0.40
 Calvin Park	0.34	0.29 – 0.39
 Strathcona Park	0.35	0.28 – 0.40
 Polson Park	0.36	0.31 – 0.39
 Markers Acres	0.36	0.29 – 0.44
 Portsmouth	0.37	0.28 – 0.42
 Fairway Hills	0.38	0.29 – 0.46
 Kingscourt	0.38	0.30 – 0.45
 Alwington	0.48	0.37 – 0.56
 Sunnyside	0.48	0.37 – 0.56
 Williamsville	0.55	0.41 – 0.63
 Queen's	0.78	0.55 – 0.95
 Sydenham	0.98	0.69 – 1.20

2.2.2 Proportionality Analysis

To understand existing conditions and inform future zoning recommendations, an analysis of single-detached residential homes and lots across the Study Area was undertaken. This analysis centred around four key metrics:

1. **Lot Area**, being the total horizontal surface area of the lot within the lot lines;
2. **Gross Floor Area (GFA)**, being the sum of areas of each floor of the subject single detached home;
3. **Lot Coverage**, being the percentage of the lot area covered by building(s), excluding unenclosed steps, patios, decks and balconies, bay windows, canopies and overhanging eaves which are 2+ metres in height above established grade; and,
4. **Floor Space Index (FSI)**, being the ratio of the built-up area (GFA) to the lot area.

Over 8000 properties were analyzed, excluding 82 which could not be digitized. **Figure 2-4** spatially depicts the results of the analysis as a “heat map”. The neighbourhoods have also been ranked from lowest to

highest for each metric, and summarized in tables, as shown in **Table 2-1**.

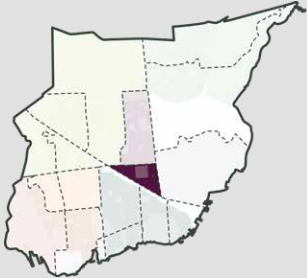
Key outcomes of this analysis included that lot area and GFA were higher in the western and northern neighbourhoods, while lot coverage and FSI were higher in the southern and eastern neighbourhoods. This shows a general trend of smaller lots and proportionally smaller, but denser-spaced buildings towards downtown.

2.2.3 Zoning Analysis

Existing Zoning As-of-Right Permissions

Building on the zoning analysis conducted in Phase 1, the Phase 2 Report modeled a typical lot and the as-of-right building envelope within the most prevalent zone in each of the neighbourhood groups. By using the average lot area and GFA findings from the proportionality analysis, the model visually demonstrated the relationship of a typical lot to the maximum building size permitted under the current ZBL (see the red box on **Figure 2-5**). This analysis

Group 5
Williamsville, A Zone



Lot Area		Gross Floor Area		Landscape Requirement	
Neighbourhood	282 m ² —	Neighbourhood	154 m ² —	Required 30%	106.5 m ²
Central Range	437 m ²	Central Range	206 m ²	Area of Setbacks (Minus Driveway & Area within Dashed Red Box)	230.3m ²
Example Site	355 m ²	Example Site	185 m ²		

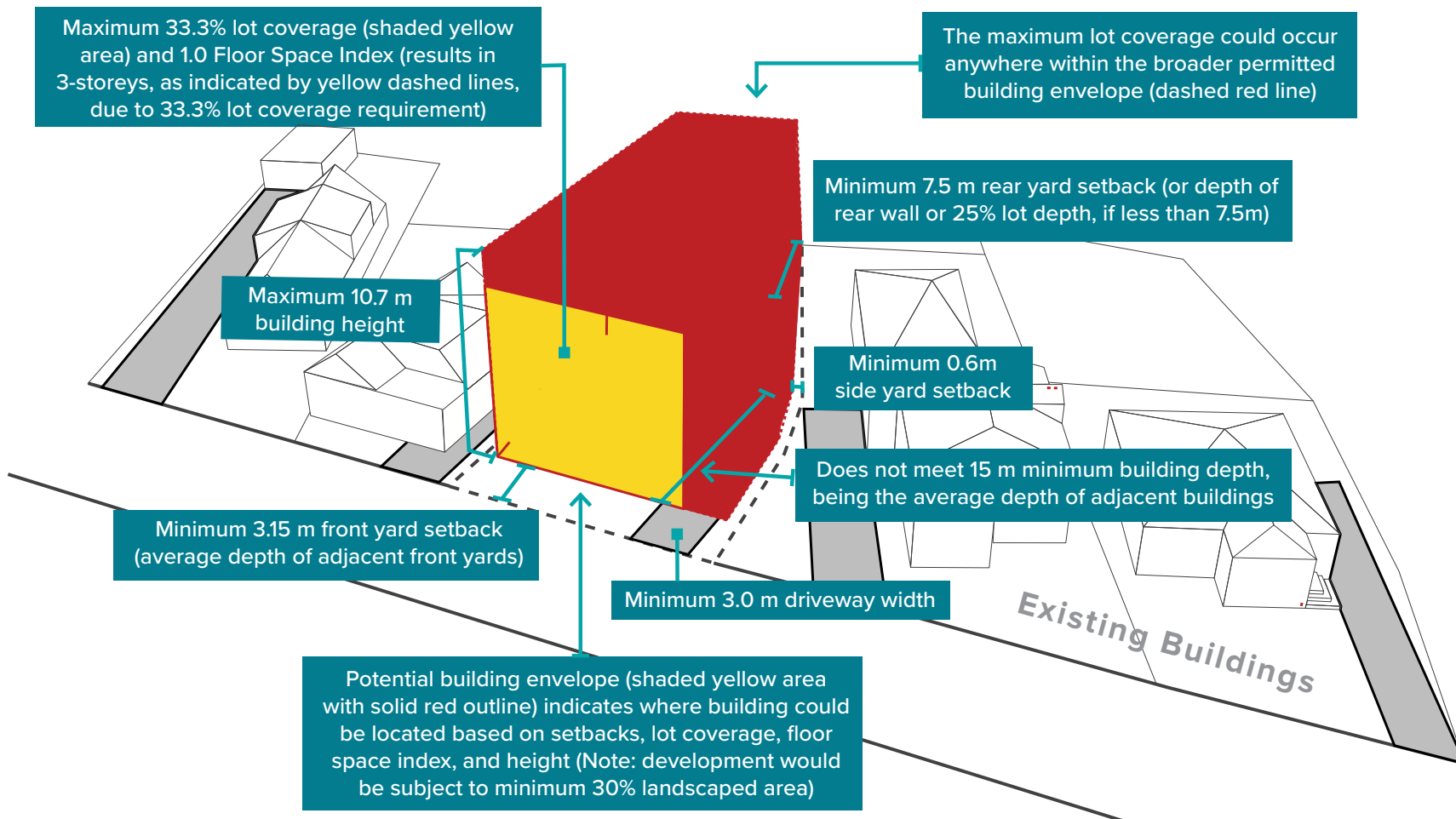


Figure 2-5: Existing Conditions versus As-Of-Right Permissio41 Model for the A Zone

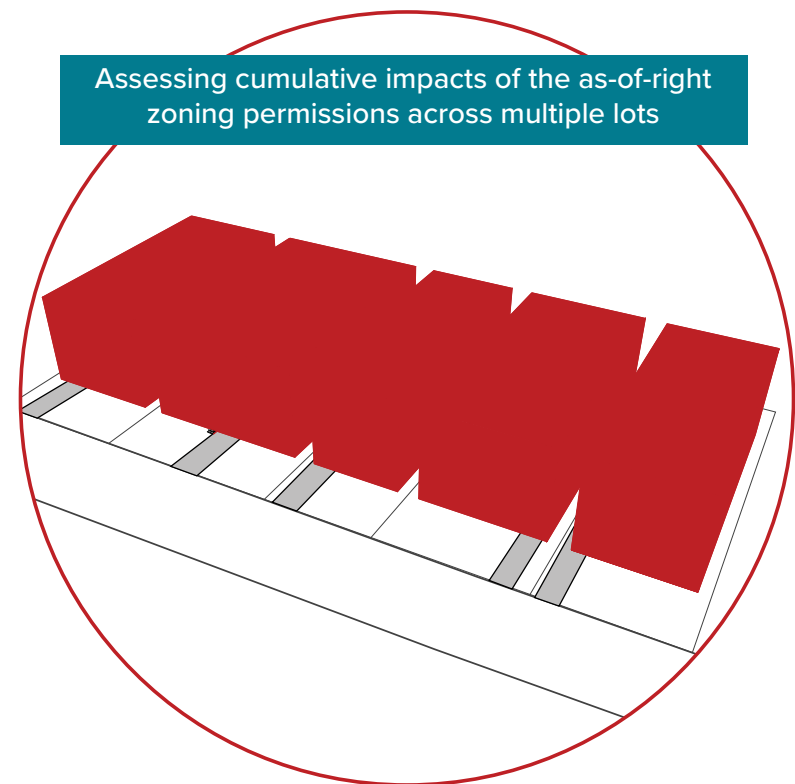
provided a clear demonstration of the discrepancies between what currently exists and is common to the neighbourhood, and what could be developed through as-of-right permissions.

Although each zone has different regulations, once modeled on the sample lots it was evident that the as-of-right permissions of each zone allow for a much larger building envelope when compared to existing conditions. Infill developments / redevelopments within these areas can fill these maximum permitted envelopes, which would have an impact on the character of these neighbourhoods. This impact is most evident when considering cumulative impacts across the entire block as modeled in the red boxes in **Figure 2-6**.

To understand the impact of substantially longer, wider and taller developments, two lots were modeled at 20%, 40%, and 60% increase in size.

This modeling showed that increases in length and width as shown in **Figure 2-7** were viewed as being out of context with the surrounding buildings. However, a

Figure 2-6: Cumulative Impacts



building which maintains a similar depth to the adjacent buildings but is one storey taller appeared to have less impact than a wider or longer building. This suggests that a taller building may in fact be compatible and acceptable if proportional to the surrounding context and appropriately designed.

Draft Zoning Update

The City of Kingston is also currently undergoing a comprehensive review and updating their Zoning By-law. It is anticipated that the recommendations from this Strategy will inform or be incorporated into this ongoing Draft Zoning By-law Update (DZBU).

A review of the proposed Residential Zones R1 through R5 in the first draft of the DZBU, indicated that all the zones may be relying on a consistent 30.0 m lot depth (taking the minimum lot area and frontage, the minimum lot depth for new lot creation would be 30.0 m). As the Study Area is composed of older and more mature neighbourhoods that have a range of lot depths and include much deeper lots, this may not be as applicable as it would be to a greenfield condition. There is still a need to control for building depth into

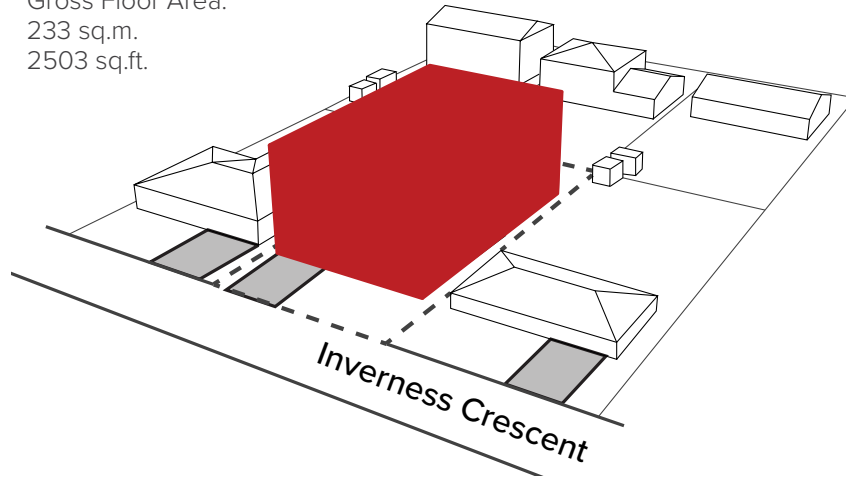
the lot to prevent excessive overlook, and to generally reduce the building footprint to be more in harmony with existing mature neighbourhoods. These and other recommendations are contained in section [4.2 Recommendations For The New City-Wide Zoning By-law \(October 2016\)](#).



Large Lot Example
Strathcona Park, A1 Zone
Lot Area: 724 sq.m / 7,793 sq.ft

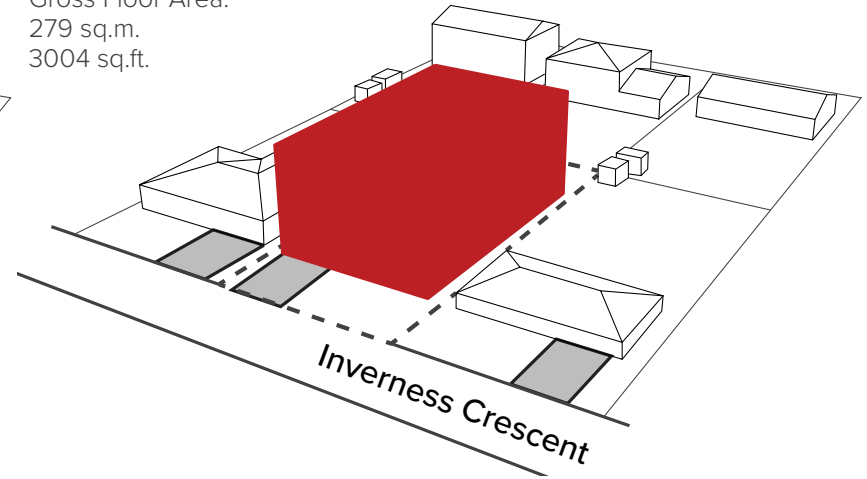
Existing Home

Gross Floor Area:
233 sq.m.
2503 sq.ft.



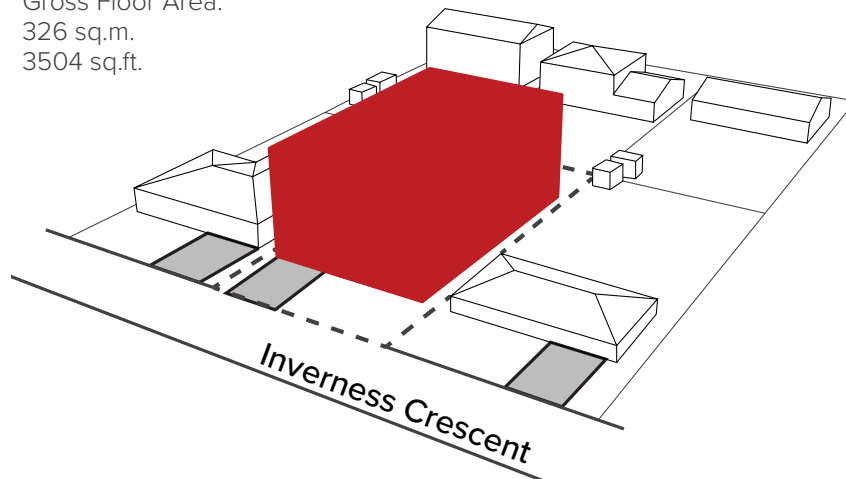
20% Larger

Gross Floor Area:
279 sq.m.
3004 sq.ft.



40% Larger

Gross Floor Area:
326 sq.m.
3504 sq.ft.



60% Larger

Gross Floor Area:
372 sq.m.
4005 sq.ft.

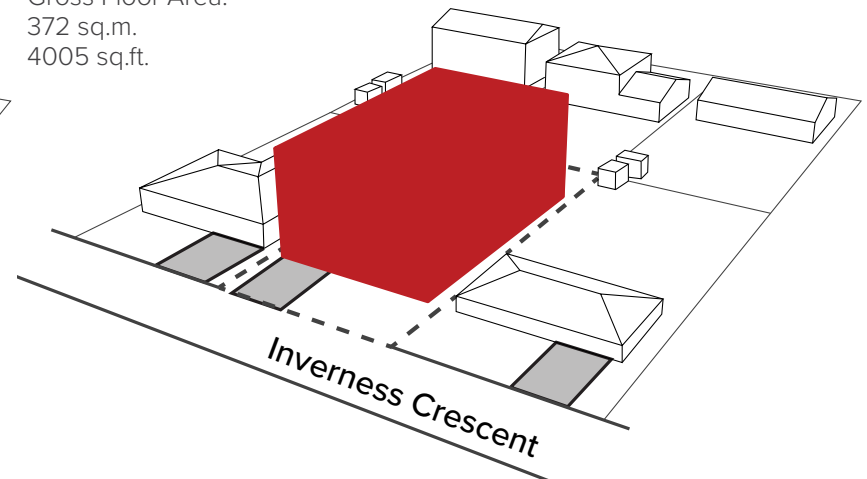


Figure 2-7: Incremental Increases to GFA within the A Zone As-Of-Right Permissions Box

2.2.5 Heritage Analysis

To contextually understand and identify the existing heritage character of each neighbourhood in order to preserve these values, Phase 2 identified the heritage character of Study Area neighbourhoods by:

1. Providing a brief history of each neighbourhood.
2. Identifying the official heritage status within each neighbourhood.
3. Identifying additional properties that may have further heritage value.

Table 2-2 presents a summary of the findings from this analysis. From this summary, it is evident that the Study Area neighbourhoods contain a significant number of designated, listed and potential heritage properties, along with other heritage character typologies.

Important to this Strategy, the following recommendations have been carried forward:

- Proposed intensification and infill development must be appropriately integrated in areas adjacent to all classifications of heritage properties. This includes

appropriate spacing from and transition to these properties.

- Infill and intensification within neighbourhoods with identifiable heritage character should integrate character elements, where possible. These elements may include materiality, roof design, ground floor and entrance treatments.

The City has prepared a master list to identify potential heritage properties within Kingston. Further individual heritage assessments may be required to determine if these properties should be listed heritage properties, or designated heritage properties under Part IV of the *Ontario Heritage Act*.

Any assessment of heritage value for a specific property should include an evaluation of the design, historical and contextual values within the City of Kingston.

Table 2-2: Features of Group 4 neighbourhoods, identified through visual survey

Group	Neighbourhood	Development Era	Housing Stock	Heritage Area / District	Designated Properties	Listed Properties	Potential Properties
1	Hillendale	1950s - 1960s	Mainly apartments	n/a	0	0	3
	Grenville Park	1950s - 1960s	Mainly single detached homes	n/a	1	0	2
	Strathcona Park	1950s - 1960s	Mainly single detached homes, semis-detached homes and row houses	n/a	1	0	0
	Alcan	1940s (WWII)	Greenfield, aluminum factory	n/a	0	0	0
2	Polson Park	1950s - 1960s	Mainly bungalows and apartments	n/a	1	0	0
	Calvin Park	1950s - 1960s	Mainly bungalows, apartments, and institutional uses	n/a	1	0	4
3	Fairway Hills	1950s - 1960s	Mainly single detached homes, row houses, and apartments	n/a	1	1	3
	Portsmouth	1950s	Mainly single detached homes	Heritage Character Area	29	16	43

Table 2-2: (cont.) Features of Group 4 neighbourhoods, identified through visual survey

Group	Neighbourhood	Development Era	Housing Stock	Heritage Area / District	Designated Properties	Listed Properties	Potential Properties
4	Sydenham	1840s	Mainly single detached and semi-detached homes, and row houses	Heritage Conservation District	479	8	22
	Queen's	1840s - 1850s	Mainly single detached and semi-detached dwellings	King St. W. Heritage Conservation Corridor	25	2	82
	Alwington	1850s - 1900s	Mainly single detached homes and institutional uses	King St. W. Heritage Conservation Corridor	24	7	20
	Sunnyside	1900s - 1950s	Mainly single detached and semi-detached dwellings, row houses, and multi-unit buildings	Alamein Drive Heritage Character Area	18	2	96
5	Kingscourt	1940s	Mainly compact single detached homes	Heritage Character Area	3	1	4
	Williamsville	1850s	Mainly single detached homes, row houses, and multi-unit buildings	n/a	2	16	22
6	Rideau Heights	1960s	Mainly single detached and semi-detached dwellings, and low-rise apartments	n/a	0	1	2
	Marker's Acres	1960s	Mainly single detached homes, row houses and low-rise apartments	n/a	0	0	0

2.2.6 Selection of Intensification Areas

The intent for the intensification areas being identified through this Strategy is to appropriately address the need for future development and growth in a sustainable and efficient manner, while ensuring the remaining residential areas experience context appropriate forms of development. Through Phase 2, key trends, public feedback, and principles and criteria for intensification were generated. The rationale for the selection of intensification sites and key preservation measures in stable neighbourhoods was guided by the concept of sustainable development, rooted in the principles and criteria outlined in Phase 2, and informed by existing conditions and outcomes from Phase 1 of this Strategy.

Public Feedback

Through Phase 1 and 2 engagement efforts, residents expressed recognition of the need for intensification, and acceptance of medium density along corridors and in strategic growth areas, identifying some preliminary areas for consideration (**Figure 2-8**). Specifically, residents identified Division St., Concession St., Brock

St., Johnson St., Portsmouth Ave. and Sir John A. MacDonald as appropriate corridors for intensification. The specific areas along these corridors were generally around the two post-secondary institutions, and extensions from the Williamsville Main Street Corridor.

Principles and Criteria

Given the need for intensification demonstrated in the 2019 [Population, Housing & Employment Projections Study](#), as well as desired areas of intensification, coupled with the existing policy framework and community structure of Central Kingston, intensification criteria were identified to appropriately select locations for growth. **Table 2-3** identifies the different criteria elements and the rationale for their selection.

Based on this criteria assessment, coupled with findings from Phase 1, including community engagement, three areas were identified for proposed intensification (**Figure 2-9 to 2-11**).

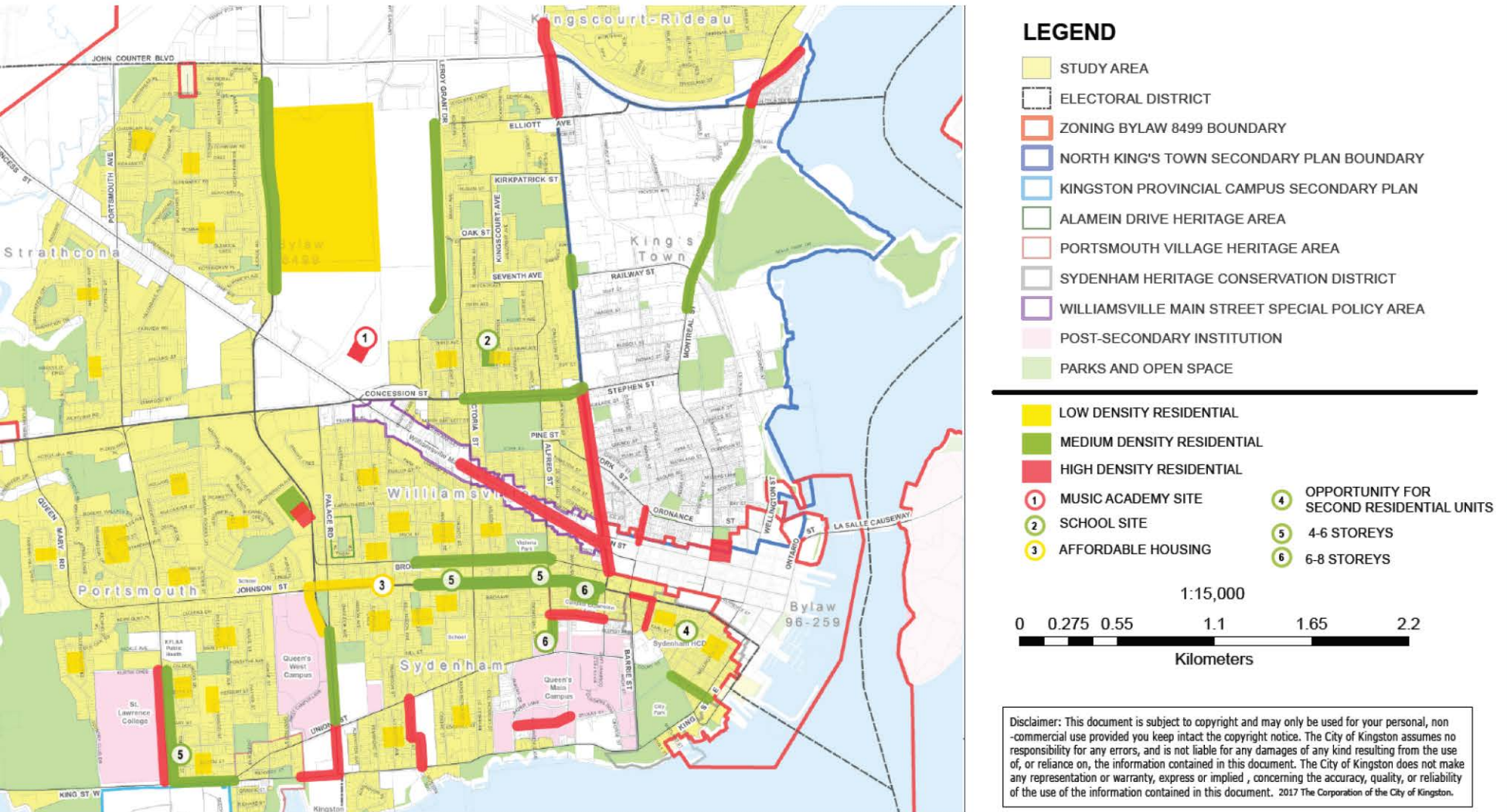


Figure 2-8: Participant Spatial Responses to “Allocating Density”

Table 2-3: Intensification Criteria and Rationale

Criteria	Rationale
Frontage on Major Corridors along the Edges of Neighbourhoods	<p>Key elements: location, compatibility and transition</p> <ul style="list-style-type: none"> — Located at the edge of neighbourhoods, largely based on the appropriate corridors identified through consultation — Adjacent to Mixed Use Centres or Corridors — Lots face onto arterials and flank single-family lots — With consolidation, lots are deep enough to accommodate multiple unit buildings — Allows for transition into inner neighbourhoods
Existing Multi-Unit Higher Density Developments	<p>Key elements: location, compatibility and transition</p> <ul style="list-style-type: none"> — Proximity to existing medium density uses is the most effective way to ensure compatibility — Buildings on existing patterns and character within the area — Speaks to existing market demand
Access to Transit and Active Transportation Networks	<p>Key elements: connectivity, infrastructure, parking</p> <ul style="list-style-type: none"> — Locate close to bus routes (400 m and 800 m pedestrian shed, most effective for transit-oriented development). The Kingston OP uses 600 m for it's definition of walking distance. — Supports the existing network — Allows for consideration of reduced parking requirements
Proximity of Amenities, Services, and Institutional Uses	<p>Key elements: mixed use, provision of amenities, walkability and active transportation</p> <ul style="list-style-type: none"> — An 800 m pedestrian shed (10 minute walk) is anecdotally known to be the furthest an individual will walk comfortably to reach a destination — Allows for compatible integration of mixed use intensification — Ensures residents have access to their daily needs — Encourages / facilitates students living closer to the 2 post-secondary institutions — Ease of access promotes active transportation — Allows for transition into inner neighbourhoods
Infrastructure Capacity	<p>Key elements: storm sewers, sanitary sewers, green infrastructure</p> <ul style="list-style-type: none"> — Cluster up-zoned areas to make upsizing of local pipes to collectors more efficient — Recover investment of strategically located sanitary sewer pipe replacement — Demonstrate infrastructure capacity (existing/planned) — Redeveloped sites to meet or improve on pre-condition run-off coefficients — Redevelopments present potential to increase street greening and incorporate green infrastructure — Allows for transition into inner neighbourhoods

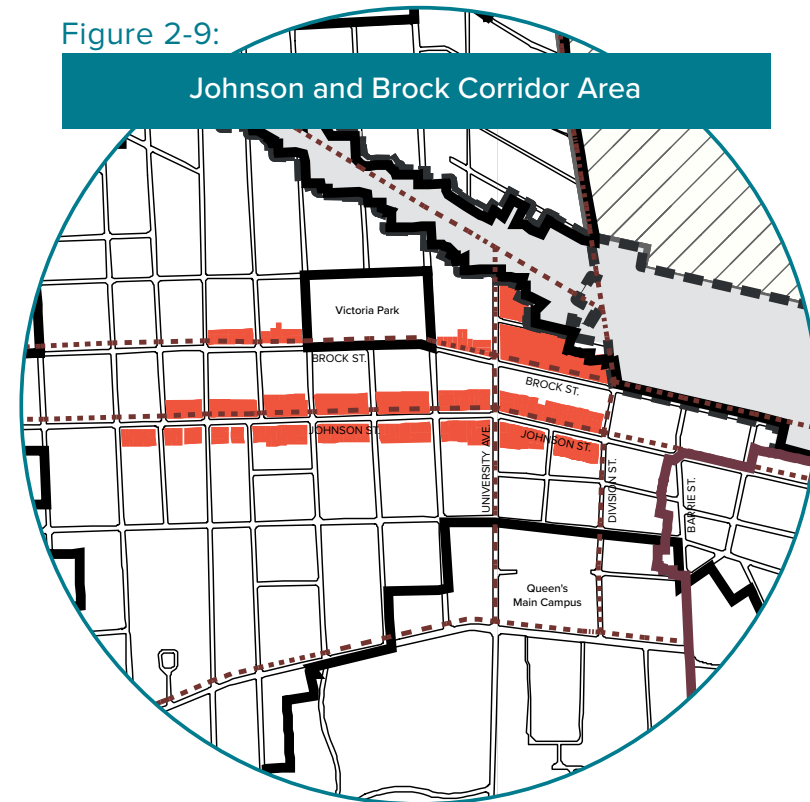
Johnson and Brock Corridor Area

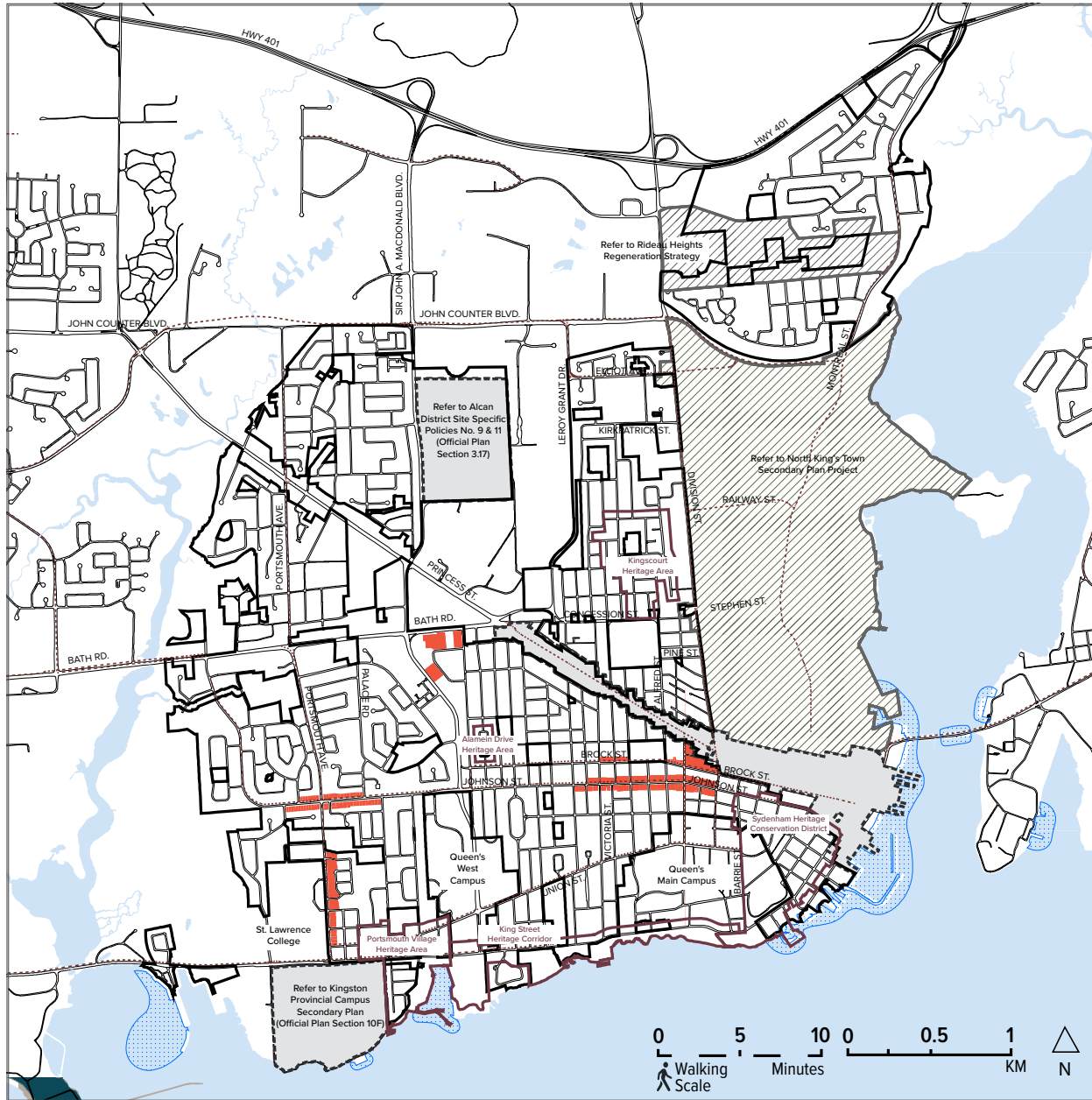
The largest of the three areas is the Johnson and Brock Corridors, north of Queen's Main Campus (**Figure 2-9**). The area is surrounded by, and fronts on, major corridors which provide edge conditions for the inner residential neighbourhoods. It is directly adjacent to the Queen's Main Campus, and has large existing green spaces nearby which would provide amenity to future residents. It is also serviced by several existing bus and cycling routes connecting it to downtown and other attractor locations in the city.

Additionally, clusters of multi-unit residential developments already exist within and around this area. Given these existing elements, the Johnson and Brock Expansion Area has been identified to accommodate future intensification and organic growth within a vital area of Central Kingston.

Figure 2-9:

Johnson and Brock Corridor Area





LEGEND

- Proposed Intensification Sites
- Existing Multi-Unit Residential Developments
- Approved Development Applications
- Commercial
- Employment
- Institutional
- On-going Project Areas
- Existing Policy Areas
- Heritage Areas and Districts
- Open Space
- Environmental Protection Area
- Waterbodies
- Harbour Area
- Bus Routes
- Cycling Routes
- Study Area

AREAS FOR INTENSIFICATION
DRAFT -- July 2019

Figure 2-10: Proposed Intensification Sites (Overall Map)

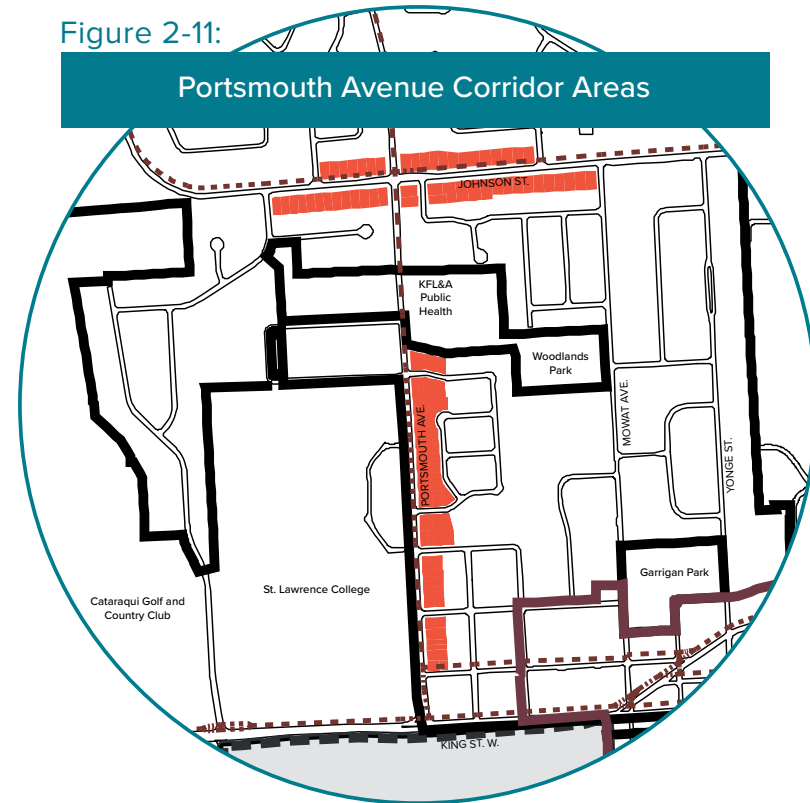
Portsmouth Avenue Corridor Areas

The second area is immediately east of and related to St. Lawrence College along Portsmouth Avenue down to King Street West, with an additional area of proposed intensification extending one block east and west of Portsmouth Avenue along the frontage of Johnson Street (Figure 2-11).

The Portsmouth Avenue Areas front on major corridors, are in close proximity to St. Lawrence College, with a number of existing bus and cycling routes servicing the area. Locating future infill and higher density developments in this area also has the potential to reduce parking requirements due to walkability, transit and active transportation options.

The area also benefits from connections to significant green space and the waterfront through Lake Ontario Park, and local community institutions such as KFL&A Public Health and the Kingston Region Seniors Association. Existing high-rise multi-unit residential developments exist to the northwest of the college, indicating demand.

Figure 2-11:
Portsmouth Avenue Corridor Areas



Overall, the area is well-suited for additional density, and would provide an avenue for future growth and development in an appropriate location.

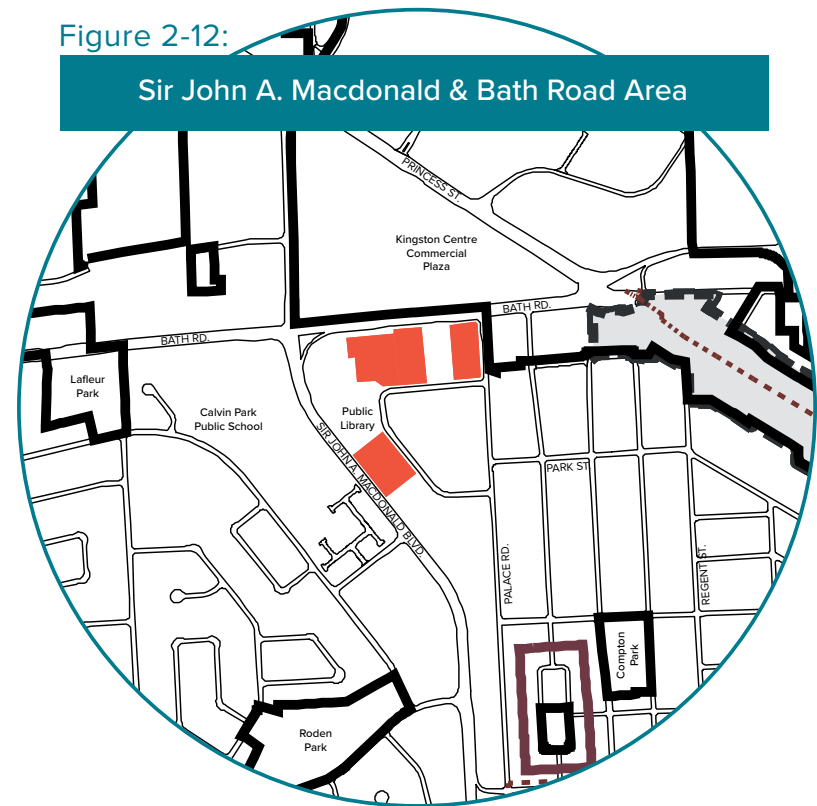
Sir John A. Macdonald & Bath Road Area

The third area identified is south and east of the junction of Bath Road and Sir John A. MacDonald Boulevard, directly south of the Kingston Centre commercial plaza (Figure 2-12).

The Sir John A. Macdonald and Bath Road Area was indicated to be a desirable location for higher density development through the public consultation events. The area is surrounded by, and fronts on, major arterial and collector corridors, and lots identified would accommodate multiple-unit and high-rise buildings without requiring consolidation with adjacent lots. The area is also adjacent to a commercial centre, a public school, library, churches and neighbourhood-scale parks, which would provide amenities to future residents. Additionally, several high-rise multi-unit residential developments already exist within this area and are adjacent to several of the sites identified. Existing bus routes service stops along Bath Road and Palace Road, and while the area does not have dedicated cycling routes, Palace Road connects the area to the cycling routes on Brock Street and Johnson Street, linking the area to downtown Kingston.

Figure 2-12:

Sir John A. Macdonald & Bath Road Area



Given these criteria, this area has been identified to accommodate future intensification and may be most suitable to high-rise development, specifically along Bath Road.



Figure 2-13: Hillendale streetview (image sourced from Google)

2.2.7 Stable Neighbourhoods

Within the Study Area, areas that are outside of the identified intensification areas are considered stable areas. These neighbourhoods are anticipated to develop and grow over time in a way that is complementary with the existing uses and residences. In order to achieve this, development, infill and intensification of existing sites should be designed with consideration for the character of the neighbourhood, street and the context within which it is situated.

Existing policy documents and protections are already in place for stable areas. These include Section 2.2.5 of the Official Plan, which notes that Housing Districts – the majority of the Study Area – are planned to remain stable, but will continue to mature and adapt as the City evolves. Re-investment and upgrading is encouraged through minor infilling and minor development (i.e., that which can integrate compatibly within the prevailing built form standards of height, density and amenity that are generally found in the neighbourhood). This includes Additional Residential Units, which are permitted within residential zones in the Study Area, except in areas with servicing constraints.



Figure 2-14: Strathcona Park streetview (Google)



Figure 2-15: Grenville Park streetview (Google)



Figure 2-17: Calvin Park streetview showing student housing opposite residences (Google)



Figure 2-16: Polson Park streetview (Google)



Figure 2-18: Polson Park streetview (Google)

For any new development, compatibility must be considered; Section 2.7 of the Official Plan indicates that these considerations include, but are not limited to:

- a. Shadowing;
- b. Loss of privacy due to intrusive overlook;
- c. Increased levels of light pollution, noise, odour, dust or vibration;
- d. Increased and uncomfortable wind speed;
- e. Increased level of traffic that can disrupt the intended function or amenity of a use or area or cause a decrease in the functionality of active transportation or transit;
- f. Environmental damage or degradation;
- g. Diminished service levels because social or physical infrastructure necessary to support a use or area are overloaded;
- h. Reduction in the ability to enjoy a property, or the normal amenity associated with it, including safety and access, outdoor areas, heritage or setting;
- i. Visual intrusion that disrupts the streetscape or buildings;
- j. Degradation of cultural heritage resources;
- k. Architectural incompatibility in terms of scale, style, massing and colour; or,

- l.** The loss or impairment of significant views of cultural heritage resources and natural features and areas to residents.

Furthermore, the Official Plan (section 2.7.4) identifies mitigation measures to achieve land use compatibility:

- a.** Ensuring adequate setbacks and minimum yard requirements;
- b.** Establishing appropriate transition in building heights, coverage and massing;
- c.** Requiring fencing, walls or berming to create a visual screen;
- d.** Designing the building in a way that minimizes adverse effects;
- e.** Maintaining mature vegetation and/or additional new landscaping requirements;
- f.** Controlling access locations, driveways, service areas and activity areas; and,
- g.** Regulating location, treatment and size of accessory uses and structures, lighting, parking areas, garbage storage facilities and signage.

While the Official Plan policies form the framework for guiding future development, this study has shown



Figure 2-19: Fairway Hills streetview (Google)



Figure 2-20: Grange Street, Portsmouth (Google)



Figure 2-21: Brock Street, Sydenham (Google)



Figure 2-22: Brock Street, Queen's (Google)

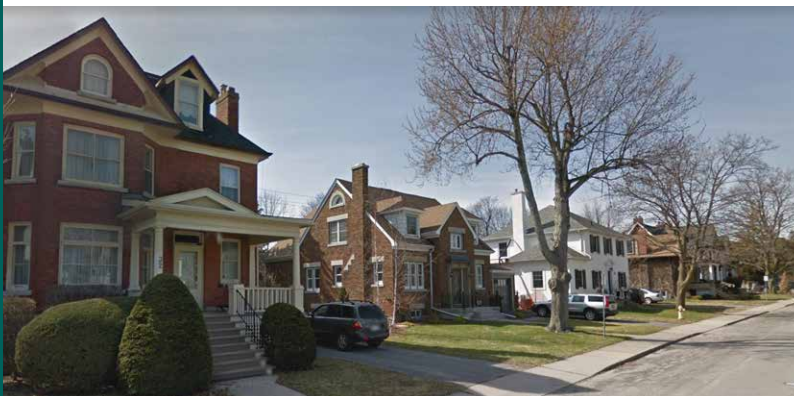


Figure 2-23: Alwington streetview (Google)



Exhibit A
Report Number PC-21-052

Figure 2-24: Churchill Cresc., Sunnyside (Google)

that incompatible development is still occurring as it is *already permitted* by the in effect Zoning By-law. This pointed to a need to refine the existing Zoning to prevent the issues as recorded through this study.

Public Feedback

Residents were open to the idea of compatible infill within their neighbourhoods, and understood this was part of the evolution of their community. Their concerns regarding new developments and infill were surrounding:

- Affordability and neighbourhood accessibility, referring to price increases in neighbourhoods that are currently affordable;
- Loss of heritage and residential character due to incompatible infill;
- Overlarge buildings not only from street, but crowding in on rear yards of neighbouring buildings (leading to excessive overlook);
- Invasive and disruptive development, such as increases in noise, traffic, shadow impacts, etc.; and,
- Inappropriate design such as oversized frontages and uncomplementary materials.

Principles & Criteria

Based on the policy framework, existing conditions and public feedback, the following guiding principles for proposed development within stable areas and mature neighbourhoods were identified:

- 1. Foster compatibility and adaptability**, by carrying forward visually cohesive lot configurations and types of dwellings based on what currently prevails within the neighbourhoods, and respective lot sizes.
- 2. Maintain the character of the neighbourhood**, by distilling the various elements of neighbourhood character identified through neighbourhood walks and the Phase 1 Background Report and by permitting 'gentle density' and intensification which does not negatively impact character.
- 3. Integrate sustainability and accessibility**, through clearly defined requirements for landscape surfaces to control run-off, and a mix of housing tenures / types, where appropriate.



Figure 2-25: Williamsville streetview (Google)

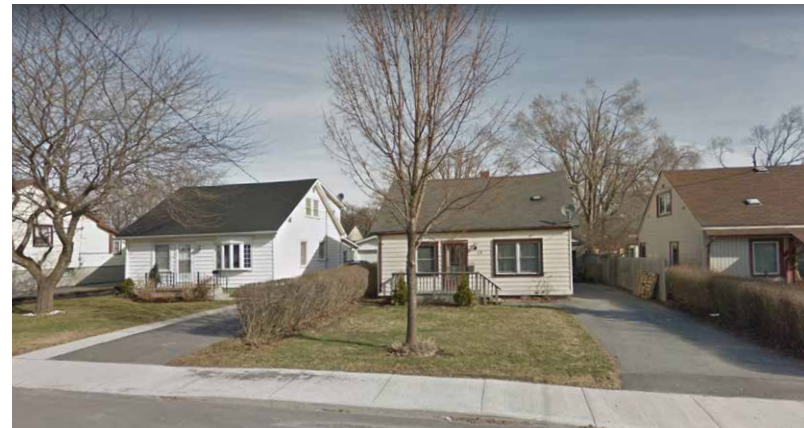


Figure 2-26: Kingscourt streetview (Google)



Figure 2-27: Rideau Heights streetview (Google)



Figure 2-28: Markers Acres streetview (Google)

- 4. Preserve cultural and natural resources**, through appropriate incorporation of heritage elements and protection of canopy cover and landscaping.

Based on the principles stated above, **Table 2-4** outlines zoning criteria which were identified as key considerations in preserving character within the Study Area. These criteria have been considered and, where appropriate, carried into the Zoning By-law Recommendations in **Section 4** of this report.

In addition to the Zoning Criteria and Rationale identified, character preservation also speaks to site organization and specific design features (i.e. roofs, materiality, heritage). As these elements are more subjective and qualitative in nature, they have been integrated into the draft **Urban Design Guidelines** being developed for this Strategy, which will guide development instead of regulating it.

Table 2-4: Zoning Criteria and Rationale

Criteria	Rationale
Lot Coverage	<ul style="list-style-type: none"> Establish a lower maximum lot coverage, based on the typical lot coverage, in addition to permitting a modest building expansion, keeping in character with the neighbourhood. (Note: only the A and B zones currently apply a maximum lot coverage). Lot Coverage in Relation to Lot Area – The permitted maximum lot coverage may be regulated depending on the area of the lot (for example, 40% for smaller lots, and 35% for mid-sized lots, 30% for large lots).
Floor Space Index	<ul style="list-style-type: none"> Establish a maximum FSI for the principal dwelling, based on the typical GFA identified through the GIS analysis, in addition to permitting a modest building expansion, keeping in character with the neighbourhood. Consider removing FSI where appropriate built form requirements are in place. Could establish a base FSI but use lot coverage to control building size.
Maximum Building Depth	<ul style="list-style-type: none"> Establish a maximum <i>ultimate building depth</i> (permitted depth of building from the front yard setback). Can tie the <i>building depth</i> to the lot depth (i.e. <i>building depth</i> not to exceed 40% lot depth) and/or the average of the adjacent lots. Can also establish a general maximum and make the more limiting requirement applicable.
Maximum Building Frontage	<ul style="list-style-type: none"> Establish a building frontage, most applicable for wide lots and/or to control attached garages at the front of buildings (when incompatible within the neighbourhood). Can tie the building frontage to the lot frontage (i.e. determine a maximum building depth for lots within a certain range of frontage, OR building frontage must be 50% of lot frontage).
Rear Yard Setback / Landscaped Open Space	<ul style="list-style-type: none"> Rear Yard: establish a rear yard setback that is tied to the lot area (i.e. minimum rear yard setback must be 1/3 of the lot depth). Landscaped Area: Establish minimum percentage of pervious area.

This page has intentionally been left blank.

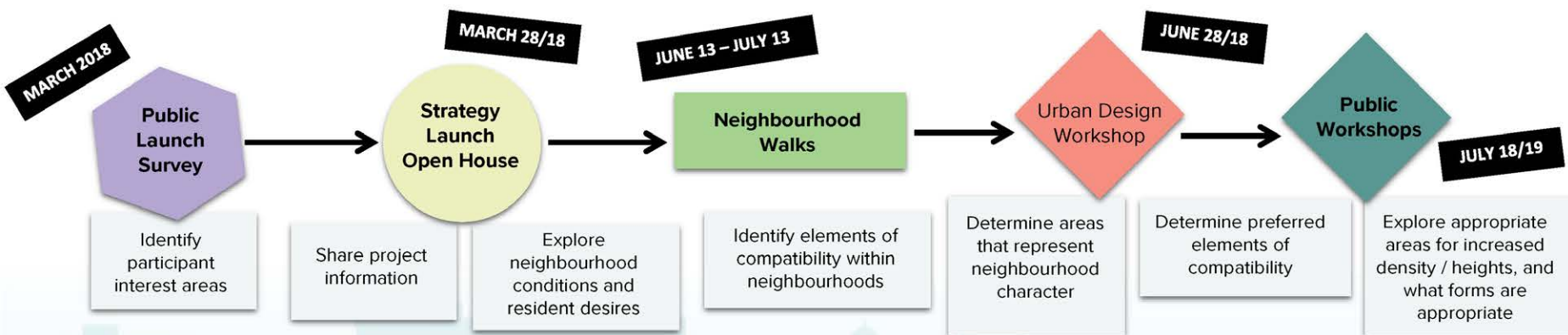
3.0

Phase 3&4 Engagement Events

The framework for community engagement within the Study is guided by the City of Kingston’s Public Engagement Framework and framed by the following guiding principles:

- To be inclusive and accommodating towards Kingston’s diverse community;
- To be transparent and trustworthy;
- To implement a variety of engagement tools and techniques which cater to a broad audience;
- To be responsive and open communicators; and,
- To encourage collaboration and shared purpose among those involved.

Figure 2-29: Summary of Engagement Events Leading up to Phase 3



As mentioned in **Section 1.2**, this Strategy is being completed in three phases. The third phase, Policy Recommendations, is intended to explore the policies in effect and provide preliminary recommendations to update these policies to address the goals and objectives developed in this Strategy. Additionally, as in-person gatherings were not feasible at the time due to COVID-19, consultation events were held virtually. As such, an online public presentation and commenting session were held with the community, along with a presentation and workshops with the Technical Advisory Committee and Community Working Group.

The minutes of the Working Group meetings and comment summaries from the consultation events are attached in **Appendix A**.

3.1 Community Working Group

The Community Working Group (CWG) met on March 26, 2020 to review and discuss the Phase 3 recommendations including:

- Draft Official Plan policy recommendations.
- Draft Zoning recommendations.
- Preliminary urban design guidelines.
- Preliminary Servicing and Infrastructure analyses.

3.1.1 About the Event

The meeting was held virtually due to recent declaration of a state of emergency due to COVID-19. WSP and the City presented recommendations to the CWG, followed by comment and discussion on the preliminary recommendations developed through Phase 3.

3.1.2 Summary of Feedback

Discussion and comments included:

- Refinement of the intensification areas based on currently ongoing servicing investigations.
- Anticipated phasing of development based on current development trends in the City.
- Floor Space Index (FSI) recommendation to reduce FSI in the draft Zoning By-law Update, or remove FSI where other Zoning recommendations put forth by this study create sufficient guidance to prevent overdevelopment.
- Greater protections for heritage districts (example given was that apartments are permitted as-of-right in Sydenham, which is regulated under Zone B of the in effect Zoning By-law).
- Further clarity on setbacks and other transitional elements was requested.
- Endorsement for character elements to be identified by neighbourhood, rather than neighbourhood group, where appropriate.
- It was noted that building styles and character can vary within neighbourhoods, and in some cases characteristic styles would not be applicable (example given was Victorian / Edwardian / Georgian style homes being adjacent to one another).
- Priority needed for the redevelopment of Centres and Corridors prior to Central Kingston intensification areas.

The recommendations of this Report are to use the following design elements to achieve transition between built form densities: setbacks, step backs, landscaped buffers and existing intervening streets.

Setback and Stepping Back Transition



Transition Through Building Typology



Figure 3-1: Presentation Board from Phase 3 Virtual Presentation exploring potential transition strategies

3.2 Phase 3 Virtual Public Meeting

On May 22, 2020, the City of Kingston uploaded a video presentation for public review and comment for the Central Kingston Growth Strategy. The engagement objectives of this virtual engagement session was to obtain feedback on:

- Preliminary Urban Design Guidelines, Official Plan and Zoning By-law recommendations;
- Draft policy directions to preserve neighbourhood character and protect stable areas from extreme overlook and overdevelopment;
- Draft recommendations for proposed intensification areas;
- Transitioning elements and requirements for new developments which would be denser and taller than nearby existing neighbourhoods.

3.2.1 About the Event

The online presentation and question/comment forum were open to the public from May 22, 2020 to June 23, 2020. The video presentation summarized the background work and primary issues the study is

aiming to address, gave a brief summary of public consultation completed to date, and outlined the preliminary recommendations for policy documents related to the intensification and stable areas, urban design guideline objectives, and provided examples of appropriate transitioning elements for built form. The video ended with next steps in the project and encouraged viewers to provide comments or questions to the project team.

3.2.2 Summary of Feedback

Participants were invited to ask questions and provide comment on the video presentation, as well as the Phase 1 and 2 Reports.

In general, there was endorsement for protecting stable neighbourhoods from incompatible development, while still allowing for forms of development that did not impede on existing neighbourhood character.

Some questions centred on the intensification areas and whether the allocated growth would 'water down'

the density plan for neighbouring Williamsville (Princess Street corridor). Additional clarity was provided that the targets within the 2019 Population and Housing Assessment, and concurrent developments such as Williamsville and North Kingstown are being taken into account to prescribe the units required to accommodate projected growth in Central Kingston. The intent of the intensification areas identified is not to detract from Centres and Corridors such as Williamsville, but to reduce the growth pressure on stable areas.

Additional comments received focused around:

- Discussion on servicing constraints in intensification areas: The results of the servicing and infrastructure analyses are currently ongoing, these will be factored into future revisions of the intensification area boundaries and sites.
- Discussion on what intensification in the Campus Expansion Area may look like: This area is being reviewed closely by the City and the boundaries are subject to change pending the outcome of the servicing and infrastructure analyses.

- Support and encouragement for heritage and character preservation.
- Endorsement of “Centres and Corridors” as locations for intensification strategy with concerns about diluting or slowing redevelopment by providing too many potential sites / too great of heights in the Brock and Johnson corridor intensification area.

These comments reflect public opinions, but also need to be balanced against requirements of planning policies, such as the Provincial Policy Statement and good planning principles.

Additionally, written comments were received from the Williamsville Community Association, Student Village Housing Inc., and a member of the Community Working Group, these are included as **Appendix A** to this report, along with the collected responses from the public questions and comments.

3.3 Phase 4 Workshops with the City

Following the completion of Phase 3, the City and WSP met over a series of workshops to refine the draft Zoning By-law provisions, Official Plan policies and Urban Design Guidelines to reflect the culmination of this study, and the direction the City is moving towards which includes 'defining success'. These are:

1. Respect for the existing neighbourhoods and their built form character while also achieving other City objectives including demonstrating leadership on climate action, directing growth and intensification to strategic areas, support for housing affordability and social equity, and meeting other concurrent policy objectives, where applicable;
2. Respect for and reflect new needs and aspirations that have arisen in the City, the intent of the Official Plan, and more recent or current Council direction;
3. An approach that is clear and understandable and is easy to implement by avoiding unnecessary complexity; and,
4. An approach that supports market attractiveness of strategically located intensification areas and allows many/most individual projects to be viable under

reasonable assumptions, with enough projects "green lit" (i.e. allowing development to proceed easily) to address strategic smart growth goals.

With these definitions of success in mind, the City and consultant team reviewed the proposed Zoning, Official Plan and Urban Design Guideline recommendations and revised the overall approach to ensure that they were in keeping with these definitions of success.

This page has intentionally been left blank.

4.0 Policy Recommendations

The following sections outline recommendations for the Official Plan and Zoning By-law in support of the key findings and recommendations of this study. These recommendations have also been carried forward into the Zoning By-law provisions, Official Plan policies and Urban Design Guidelines that have been drafted for the City's consideration and implementation as updates to their current policy framework. These documents are contained in **Appendix B - Zoning By-law Provisions**, **Appendix C - Official Plan Policies** and **Appendix D - Urban Design Guidelines**.

4.1 Official Plan Recommendations

A goal of the Official Plan is to manage future growth within the Urban Boundary in a strategic and efficient manner that:

- Optimizes infrastructure and public investment;
- Promotes diverse economic activity and prosperity;
- Supports an attractive, accessible, safe and sustainable City;
- Protects Kingston's cultural and natural resources;
- Provides a variety of housing options for all residents; and,
- Helps achieve Council's strategic priority for "smart" growth.

To this effect, and based on the findings of this Strategy, the following recommendations present strategies for updating the Official Plan (OP) consolidated as of November 1, 2019. It is noted that within this office consolidation, revisions to permit and provide policy for Secondary Residential Units (SRUs) were included per By-law 2019-86.

In general, the following Official Plan recommendations are intended to permit compatible forms of intensification and infill in stable areas in Central Kingston and to encourage ‘invisible’ or ‘gentle’ density (i.e. second residential units and ground-oriented low-rise developments) to preserve neighbourhood character. They are also intended to direct and encourage significant intensification, such as mid-rise to tall buildings, to occur in the areas identified for this purpose.

4.1.1 General Recommendations

It is recommended that the following general steps be considered in support of the intended goals for this Strategy:

- Create a new specific policy area which identifies and provides guidance for the intensification areas proposed through this Study. This will replace the “Near Campus Neighbourhoods” as shown on Schedule 13 of the Official Plan with a new specific policy area titled “Central Kingston Growth Areas”.
- Add a reference, within Section 8 - Urban Design, to the UDGs developed through this study.

- The City require that an Urban Design Study or an Urban Design Memo (and add a definition for this) for proposed intensification and infill development.
- Permitting mixed-use commercial or retail-at-grade uses along the Brock and Johnson Streets corridors as development progresses and City-defined density targets are reached in these areas. It is also encouraged to allow flexibility for further areas to develop as mixed-use if density and the market support it (e.g. live-work townhouse units).

New Section 10G Central Kingston Communities Specific Area

This section will identify the final location of the intensification area sites developed through this Strategy. The draft policy recommendations for this new section are outlined in [Appendix C](#), and are intended to incorporate the final goals, objectives, and guiding principles developed through the Central Kingston Growth Strategy study. The intent for these areas is to direct and plan for their intensification, address the City’s anticipated growth and sustainability objectives, and mitigate potential growth pressure on existing residential areas.

4.1.2 Section-Specific Recommendations

Specific recommendations have been made in regards to updating the policies of the OP to reflect the outcome of this Strategy. These section-specific directions are contained in [Appendix C](#).

4.1.3 Schedule Recommendations

Schedule 13: Detailed Planning Areas

The “Near Campus Neighbourhoods” area as shown on Schedule 13 of the Official Plan should be replaced with a new specific policy area titled “Central Kingston Communities”. This Specific Policy Area will identify areas for intensification within the Central Kingston Growth Study Area, and be subject to the policies as outlined in Section 10G in [Appendix C](#).

4.2 Recommendations For The New City-Wide Zoning By-law (October 2016)

Zoning recommendations are based on a culmination of the work completed to date, feedback from consultation events, and current best practices. Recommendations of this Study aim to achieve physical compatibility with the established residential built form in existing neighbourhoods and protect the individual character of each of these communities. Detailed Zoning By-law provisions are noted in **Appendix B**.

The City of Kingston is currently undergoing a comprehensive review and updating their Zoning By-law (ZBL). It is anticipated that the recommendations from this study will inform or be incorporated into this ongoing update.

4.2.1 Zoning By-Law Strategy

As noted in the Phase 1 and 2 Reports, the existing in-effect ZBL has a number of residential zones, each with different regulations. The current as-of-right permissions of each zone allow for a much larger building envelope than are currently existing in these neighbourhoods. Infill developments / redevelopments within these areas may be designed to fill these maximum permitted envelopes, which could have a significant impact on the character of these neighbourhoods. In order to prevent negative impacts of significant overdevelopment and incompatible built forms, this Study is examining the update to the draft ZBL (DZBU) as the best method to capture and implement the recommendations of this Strategy.

Intensification Areas

The objective of the proposed new Zones for intensification areas will be to accommodate heights that are appropriate to their context and corridor right-of-way width relationships.

Figure 4-1:

Johnson and Brock Corridor Area

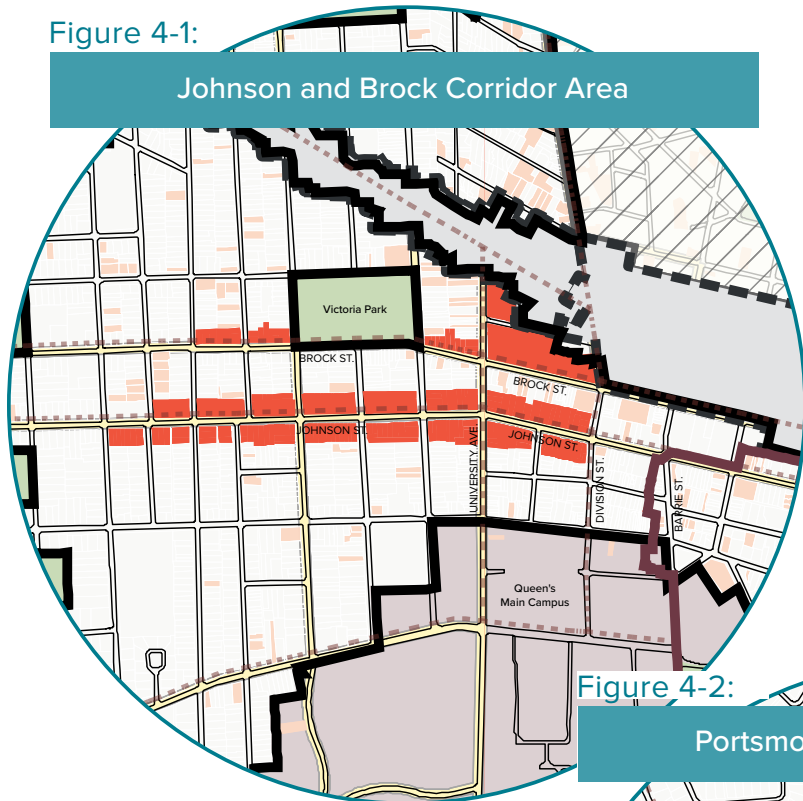


Figure 4-3:

Sir John A. Macdonald & Bath Road Area

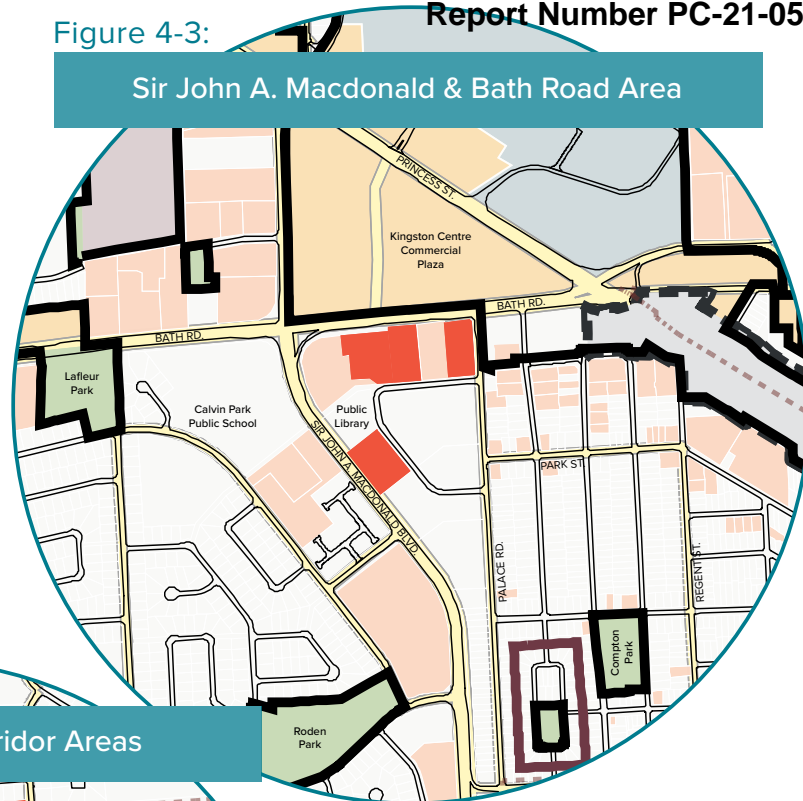
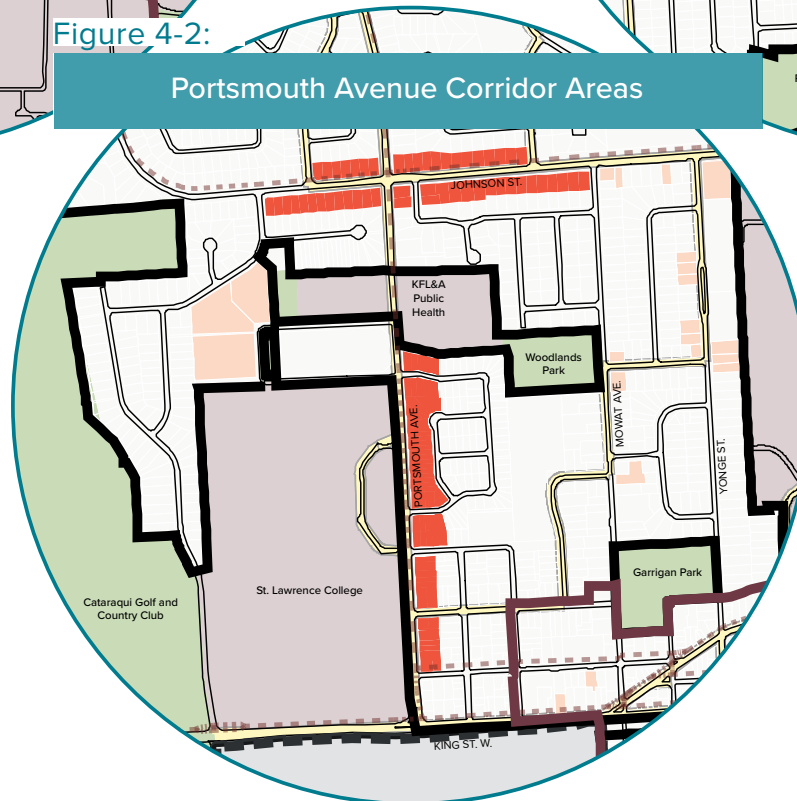


Figure 4-2:

Portsmouth Avenue Corridor Areas



It is recommended that the new zones proposed through the DZBU establish:

- Up-zoning of identified intensification areas and corridors to accommodate and direct increased density, within Central Kingston (refer to **Figures 4-1 to 4-3**). This up-zoning will reflect the desirable density and intensification for the identified areas, potentially including multi-unit low to mid-rise apartments and tall building heights (i.e. on corridors such as Johnson Street, the height of the building will typically reflect the width of the Right-of-Way [ROW]; a 20 m ROW would result in a 20m tall or 6 storey building being permitted);
- With respect to the intensification areas/corridors along Johnson Street, Brock Street and Portsmouth Avenue varying FSI maximums have been provided in **Appendix B** to ensure that desired heights are achieved.

Existing Residential Areas

Within stable areas, the objective of the additional zoning provisions is to address overly long building depths that lead to excessive overlook into adjacent

rear yards, loss of privacy and overbearing built form massing. The following recommendations apply:

- With respect to providing floor space index (FSI) maximums it is not recommended for stable low-rise residential neighbourhoods as the lot sizes within Central Kingston can vary significantly, which could unintentionally lead to an oversized building on the lot.
- It is recommended that prescriptive zoning requirements be added to prevent or mitigate adverse impacts of potential infill over-development in terms of building massing or length in established residential areas, including:
 - a. a maximum *building depth* (the distance between the front yard setback and the main rear wall of the building) for consistency in the extension of building depth into the rear yard and incorporate the definition; and,
 - b. a *maximum building height*, measured as per the height definitions in Section 3 of the Draft Zoning By-law Update (DZBU) but with adjustments related to immediate built form height context; it should take into consideration

finished grade and whether there should be a requirement for pitched and/or flat roofs, depending on the neighbourhood in which it occurs and its height requirements. The City is reviewing the height limits for flat roofs as part of the new Zoning By-Law, which will be incorporated within the low density zones within the study area.

By incorporating the recommended zone revisions into the proposed Zoning By-law Update, existing residential neighbourhoods will be better protected from uncharacteristic or 'monolithic' oversized developments (massing and length) which currently would be permitted as-of-right. Intensification will also be encouraged within the areas identified by this Strategy that are envisioned to accommodate anticipated future growth and added density. Directing growth to the specified corridors or specified locations outlined in this report will reinforce the urban function within them, make more efficient use of existing and planned infrastructure or amenities and will help mitigate potential impact in existing neighbourhoods.

Specific Zone Recommendations

Specific Zone recommendations and provisions are detailed in [Appendix B](#). In general, these recommendations are intended to protect existing stable areas from incompatible development taking place within them while at the same time encouraging more dense and compatible infill and redevelopment. With respect to the identified intensification areas, they are intended to encourage increased densities and/or taller building heights with respect to each of their specific locations. This approach meets the objective of accommodating anticipated growth in Central Kingston by providing housing variety and sensitive increased density while alleviating potential growth pressures on existing residential areas.

4.2.2 Additional Zoning Strategies

Transitioning of Density - In the Phase 1 Background Report, the importance of transitioning of density between low density and higher density forms was apparent. The City should consider including zoning requirements that provide for spatial and visual transition. For example:

- Providing minimum setbacks for higher density buildings where adjacent to low-rise grade related residential use;
- Minimum rear and sideyard setbacks that provide street level transitions between tall and low-rise building forms;
- Building separation that provides a visual break (i.e. through requiring sideyard and rear yard setbacks);
- A combination of a minimum rear yard setback and built form volume;
- Landscaped buffers that provide visual screening and aesthetic enhancement; and/or,
- Intervening streets that are utilized as a form of separation between buildings.

Elements of Compatibility - As outlined in the Phase 1 Background Report and Urban Design Guidelines (**Appendix D**) some common themes or shared elements were identified in the six residential neighbourhood groups and individual neighbourhoods. With respect to influence on potential zoning recommendations some consideration might be given to two particular aspects, **front yard depth** and **sideyard or building separation distance**:

- **Front Yard Setback** - Depending on the neighbourhood, there may be a desire to establish a specific front yard setback for each of the neighbourhoods. Given the variety of setback depending on the particular neighbourhood, this could be a consistent setback distance based on existing and found context but could also include a requirement for a specific distance;and,
- **Sideyard / Building Separation Distance** - In the visual survey conducted, many sideyards were indicated as generous and in many instances this was due to the presence of driveways along one of the sideyards. If there is a desire to maintain this neighbourhood characteristic, recommending a minimum sideyard may not be sufficient for many

of these neighbourhoods. It may be necessary for all new infill development to be required have driveway access. This condition would need to be applied contextually to ensure that it is applicable within that neighbourhood's particular streetscape.

Garages - Should there be a desire to pursue the requirement that all garages in certain neighbourhoods be located behind the main house or detached at the rear, then there will be a need to consider how the width of the lot may impact whether a single or double car garage is permitted.

Secondary Residential Units (SRU) - The City has adopted this potential form of "invisible" density for its residential areas. SRUs can introduce added density without major impact to the streetscape and the neighbourhood, forms such as interior and attached units may have little to no impact on the street character. All developments will still need to be in keeping with the provisions of the applicable Zone. Additionally, specific provisions have been considered to address potential overlook and loss of privacy issues.

Near Campus Neighbourhoods - There may be the need to regulate the number of bedrooms by structure and this study suggested the requirement for rear-yard amenity as one way to address overdevelopment of properties in the Study Area. For higher density development there may be a need to provide separate provisions for these areas in addition to those in the proposed intensification areas zoning. Additionally, the City has introduced a new by-law to address this concern by putting a cap on the number of bedrooms which was adopted by Council but, is currently under appeal.

This page has intentionally been left blank.

5.0 Next Steps

This Report has reviewed the findings from the preceding Phases, the consultation events and analysis conducted in Phase 3 and 4, and their influence on the guidelines and policy recommendations and key metrics for preserving neighbourhood character and guiding infill and intensification in Central Kingston. The final recommendations which include updated Zoning By-law provisions, Official Plan policies and the Urban Design Guidelines that have been created through this project, will be presented to Council for review and approval. The strategic directions of this report,

leading to the ultimate recommendations in the final Strategy, are rooted in the principles, criteria, analysis and findings, which were identified throughout this Strategy and are in accordance with the City's Official Plan. These elements have shaped the determination of the proposed community structure and measures selected to allow for appropriate evolution of the Study Area. Additional study will be required as these areas develop overtime, to complement the servicing, infrastructure and transportation analyses completed.

Figure 5-1: Study Process Summary



Appendix A:

Phase 3 Consultation Comments

There was a wealth of thoughtful and detailed comments and questions following the public engagement events. Consistent themes of contextually-compatible development were at the forefront of comments and questions received.

The following summarizes the questions and letters received in relation to the consultation events. These are presented here as a record of the comments considered through Phase 3 of this study.

Virtual Public Meeting (May 22, 2020) Summary of Feedback

Questions received and answers given during the Q&A session following the virtual public meeting on May 22, 2020 are as follows:

1. Q: I understand the need for intensification in the central city area. However there is a limited amount of land for this approach. This study needs to be complemented by a realistic transportation

plan, that can get persons to and from their work sites and homes. It is clear in Kingston where the employment centers are, and this plan will help but not resolve the transportation issue facing Kingston. A comprehensive and thorough blending of the housing and working zones in our city needs a careful thought approach to intensification and transportation together and in unison. Not individually created. The need for very long term thinking is required, and necessary if we are to maintain the unique character of the central core but still allowing employment growth through institutional expansion. Our institutions are several hundred years of age.

A: Thank you for your comments on the study and the need for transportation studies to support development. This is an important question as this can be problematic, especially in areas that are experiencing intensification where updated transportation modeling has not been completed or was not anticipated. The City is ultimately

responsible for managing the transportation network and completes long term City-wide transportation master plans and neighbourhood level transportation studies that are regularly updated to reflect existing and committed transportation capacity. New developments or site intensification may be required to complete site level transportation analysis that can be incorporated into these neighbourhood and City-wide transportation models. If additional transportation modeling is needed in areas where intensification is occurring, the City would review this and devise next steps from there. The CKGS includes transportation analysis that will inform some of these next steps.

2. Q: Has the parking study been completed and will it be released for this area?

A: Thank you for your email. The parking study is still on-going. The intent is, along with the recommendations that result from the CKGS study, for the recommendations/findings from the parking study to be released and integrated with the 2nd draft of the Zoning By-law Consolidation. We

anticipate the 2nd draft to be ready in late 2020/early 2021.

3. Q: Hello, I had trouble logging in. I reset my password and logged in. I am pasting my questions and comments below. They may be a duplicate if my log in worked. Hello CKGA staff, I have read the slide show (and viewed the video) and the strategic recommendations report. I have not read the background report for this response. Overall, I appreciate the report. I think the concept of proportionality is a valuable conceptualization of how to view developments. If I understood the application of this concept, it is measured in terms of massing, consistency with the character of the neighbourhood, and consistency with set backs and depts of buildings in the neighbourhood, Before getting into the meat of the matter, I wish to comment on a public comment about Kingscourt. I read someone's idea that development should happen in Kingscourt because the cost of housing is moderate there. I find that recommendation to be contrary to the objective of maintaining the supply of moderate cost housing. Increasing the demand for Kingscourt housing will just exacerbate

the pressures on Kingscourt housing prices. We have already seen unseemly overbuilding on some properties and rising house prices in Kingscourt. In terms of the report, I was disappointed in not seeing greater details on the character of Kingscourt. The wartime housing is unique as an early example of pre-fab building. The nature of adapting to the intended temporary nature of the building set the stage for the composition of the community and its life style. It would have been valuable to emphasize this aspect of Kingscourt as an example of maintaining character and how this objective would apply to the land use planning role of the OP and Zoning Bylaw. The short description describing Kingscourt as small single detached homes on relatively small lots compared to other areas is helpful, but incomplete. Of course, Kingscourt has other subneighbourhoods that are somewhat divergent from the wartimers, but relatively modest nonetheless. Also missing from the description was the relatively large number of social housing and low income rentals in the Kingscourt area. I didn't notice these sites on the maps that including markings for social housing (Sorry if I missed it.) I want to be sure that I understood the

recommendations that I perceive as implicating Kingscourt. 1. Do I correctly understand that the 40% maximum coverage recommendation applies to Kingscourt? If the average lot coverage is 24% in Kingscourt, that represents over a 50% greater coverage. How is that consistent with the object of maintaining the character of this historic area. How do you allow that coverage and maintain the depth of building recommendations in this report? 2. Do I understand correctly that the recommendation to limit height to 2.5 stories would apply to Kingscourt? (I was confused by a comment that greater height would be less imposing than greater depth of building. I understand the rationale: incongruous building depth intrudes into the private space of adjacent households. On the other hand, disparate height in Kingscourt would undermine the goal of maintaining the character of the neighbourhood. Some variance in height can be absorbed if it is well designed as suggested. Step backs help in that, even in low rise settings like Kingscourt. Does 2.5 floors satisfy your vision of greater height in place of greater depth of building? If so, this all fits together nicely. 3. If discrepant development has already intruded into a street, will that make

it difficult to implement the protections you are suggesting? 4. Do I correctly understand that you are recommending 8-10 stories along the Leroy Grant right of way on the Alcan site. Can they be formulated for upper floors to be stepped back to reduce impact on the adjacent neighbourhood (Victoria Street and Brant Avenue)? Can a 6-8 story height be suggested and meet intensification goals and be financially viable? Will commercial and retail and local work components be included on the ground floors to encourage active transportation and walking in the neighbourhood? And when do you see these developments happening? 5. My observations of developers providing “studies” such as urban design studies and architectural heritage studies is that they get the results they want. How can we be sure that a review of the Kingscourt warrimer area will not over emphasize the modifications already made and social changes?

A: Hello, thank you for your comments and questions. We will take your comments into consideration as the project progresses. To your questions, we have reached out to the consultants and can offer the following:

1) Regarding the 40% maximum coverage: We are examining the appropriateness of a 40% maximum coverage as it would apply to Kingscourt, as well as the other areas of the Study Area. Variable lot coverages is being examined. In addition, we are proposing to apply added criteria for building length, depth and width which would create a building envelope that must be adhered to as a whole to control the size of development on a lot. In the next phase we will also be reconfirming the appropriateness in the context of the neighbourhood groupings. Some flexibility must be built in to allow neighbourhoods to grow and develop still.

2) Regarding height limit, the current maximum height recommended for homes in Kingscourt is 2-3 storey buildings. Built form is intended to be limited to 2 storeys where adjacent to existing heritage buildings.

3) Regarding discrepant development, in terms of Zoning regulations such as height restrictions and ultimate building depths, for the most part, no, as they will apply to all new development. The only exception is front yard setbacks, which may be reduced to the average of the two adjacent

buildings. This could have an impact in that regard, but the intent is, over time, to have new development aid in achieving a more continuous street frontage by averaging adjacent properties.

4) Regarding greater heights along Leroy Grant, the current recommended maximum height for homes along the Leroy Grant right-of-way is 2-3 storey buildings. Should larger development be proposed in this area that does not comply with the Zoning regulations, a Planning Act application would be required. Development would need to satisfy the transitional criteria in the Zoning and Urban Design Guidelines similar to what you have suggested, with stepbacks on upper floors. It will be the City's decision on whether retail/commercial uses would be permitted at-grade. We do not know when development may occur but we are creating zoning and design criteria to indicate development requirements.

5) Regarding required studies, the City will have the ability to require design studies completed to their satisfaction for higher density developments. Proposed development will also need to demonstrate consideration of the requirements in the Urban Design Guidelines being prepared

as part of this study. These Guidelines will help to identify key design elements to allow new development to integrate well within existing neighbourhoods, respective of the existing character while also recognizing the natural evolution of neighbourhoods. As part of any analysis there needs to be reference to development that has recently occurred as well. The objective of this study is to provide recommendations, criteria and requirements that will result in appropriate development that is sensitive to area context and neighbourhoods.

4. Q: What are the chances the planning department might actually take a lead in promoting interesting architecture downtown, in spite of the planing strategy that seems to stress compatibility/reflection of the environs?. I urge planning and developers to offer up iconic contemporary designs so that we are not shackled by mundane, homogeneous brick and stone. The Isabel Bader is a good start and has been well received. Other cities world wide are giving their citizens fascinating and sometimes controversial but certainly interesting buildings. If you and colleagues don't already, I suggest you

get in the habit of looking at ArchDaily on line for a glimpse of what is happening internationally.

5.

A: Thank you for your comments and the resources referenced. You are correct in noting that one of the goals of the project is to guide new development to better integrate with existing development, another goal of the project is to encourage creativity and flexibility within those same areas. Compatibility does not necessarily mean reflection, however at the same time there are instances for iconic architecture (such as the Isabel Bader Centre) and more often instances for contextual buildings, ones that contribute to the general character of an area. Although, this project is more focused on contextual buildings, the intent is still to allow and encourage a high quality of design. To that end, the Urban Design Guidelines that will be presented in the final phase of the project, are intended to help identify key foundational characteristics of the various neighbourhoods within the study area and identify features to elevate the level of design of new development. Furthermore, beyond the Zoning By-law, which establishes the general form of new buildings (height, width, depth, distance from the

street and neighbouring buildings), the Site Plan Control process provides additional opportunities to determine the design of the building and site through material choice and landscaping. Lastly, as you may be aware, the City is working on a concurrent policy project called “Density by Design: Kingston’s Mid-Rise and Tall Building Policies”. This project will be providing recommendations on appropriate locations and design of mid-rise and tall buildings in the urban area. Examples of topics that will be examined include: building height; ground floor/ street wall design; architectural details; and podium design. Additional information on this project can be found through the following link: <https://www.cityofkingston.ca/city-hall/projects-construction/density-by-design>(External link) Thank you.

Student Village Housing Inc. Letter - June 19 2020

Fotenn Planning + Design has been retained by Student Village Housing Inc. (SVH) to review the City of Kingston’s Central Growth Strategy: Strategic Direction Report, referred to herein as “The Report”. The

following review is specific to the interests of Student Village Housing (SVH). SVH is generally pleased with the overall direction of the Report. The purpose of this letter is to highlight the notion that intensification and existing neighbourhood character can co-exist in a complementary manner.

SVH is cautiously optimistic of the City's identified intensification areas. We believe these neighbourhoods offer a high degree of adaptability and can efficiently accommodate intensification in a manner that is compatible with the existing built form and neighbourhood character. SVH eagerly anticipates further direction regarding policy development and the urban design guidelines for infill and intensification in Central Kingston neighbourhoods.

While we are supportive of the need for design guidelines, SVH would caution that overly prescriptive design requirements could ultimately deter development in these areas. Cost implications should be considered as a critical component in the overall success of the Central Growth Strategy.

On behalf of Student Village Housing Inc., we look forward to reviewing further policy direction for

Kingston's Central Growth Strategy and wish to be notified of any future updates to this project. Should you require any clarification, please feel free to contact us.

Williamsville Community Association Letter - June 23 2020

The previous comments of the Williamsville Community Association have been included in the CKGS Phase Two Report. Those concerns still apply. The WCA has been waiting for the review of the WMSS which basically is looking at where to place more density along Princess St. It seems that the need for any further residential and commercial intensification in Williamsville should be based on the recommendations of that review. Do we need yet more high density housing extending west along Brock and Johnson? We also question the need for possible commercial space on Johnson St when we have observed that the existing commercial in residential buildings on Princess has sat empty for years.

Most of the CKGS development in Williamsville is counting on increased student enrollment which may

or may not occur. The other relevant report is a revision of the Queen's Master Plan which we understand is in the works. With the purchase of St. Mary's of the Lake will the campus focus move south and west? Will the Campus Expansion Area, which is an area we support for intensification, be relevant 5 years from now or will it shift to Union St? If all the current and upcoming construction of apartments /condos are completed and occupied we will already be at a serious shortage for parkland and green streets. Housing infills cut back the amount of green space in area. Covid-19 has shown us the need for green space for our mental and physical wellbeing. We need more parkland!

We support SRU that "are an acceptable form of intensification, providing 'gentle' or 'invisible' density. These forms of intensification should be designed to have minimal or no negative visual impact on the current street character, and should be integrated with neighbouring dwellings and buildings to avoid potential negative impacts, such as overlook." (P86.) However, "overlook" and "visual impact" are not the only issues. We recently saw an application for 17 bedrooms in three units on one lot with 2 parking spaces and very minimal amenity area. We continue to be concerned

about the development of single use housing designed to house large numbers of students which is in fact the reason the CKGS.

Due to Covid -19 the WCA has not been able to meet. However, in the past members of our working group have discussed these ideas and we will circulate this response to them.

Community Working Group (CWG) Member Letter - June 23 2020

Comments received in the working group meeting are summarized in the report. One CWG member also submitted the following letter:

Gentle Intensification - I have no problem with the "gentle" or "invisible" intensification that is being suggested by secondary residential units and "appropriate Infill development designed to reflect the character of its surroundings." However, I have concerns when it comes to intensification through the creation of new high-density zones.

New High Density Zones - From my perspective, there has been no demonstration of the need for extensive

new high-density zones, and no discussion of the problem that is being solved, the current shortage (if any) of land for high-density development, how many units are needed over the next 10-20 years (or even 20-40 years), how much would be supplied by the City's pending and committed housing supply and how much capacity would be added with the creation of these new high-density areas, etc. Instead, a number of relatively large areas are being proposed for high density in areas of low-rise residential or immediately adjacent to lowrise residential. Unfortunately, it looks like a ploy to open up parts of the City to development in order to increase the potential for more development charges. The creation of high-density zones immediately adjacent to low-density residential calls for the protection of those low-density residential areas. Speaking from immediate experience from development on land adjacent to our property, this is difficult to do. The PowerPoint presentation suggests that it will be done through two approaches: "massing, separation and stepback;" and through "transitional massing." With one exception, the examples (PowerPoint slides 21, 22 and 23) that are provided, have a lane or street separating low from high density, have landscaping or a setback of the

structure on the adjoining low-density property. While these conditions may exist, I have not yet seen them applied. Instead I have seen buildings constructed within a metre of the lot line, unmet promises of landscaping in site plan agreements, the suggestion that there will be a lane in the future on the adjoining property (not yet seen, nor is there any way to construct a lane for a mid-block development), a ZBA allowing for minimal setback because the houses on the adjoining lots were sufficiently setback from the property line. In many cases, the adjoining property is expected to provide the transition rather than the new high-density development providing the transition to low density. Opening up new high-density areas dilutes the possibility of the priority areas getting developed anytime in the foreseeable future. The Official Plan (2.2.7) states that the corridors and centres are the highest priority for intensification. In Williamsville District, this means that Williamsville Main Street is the priority for intensification, not Johnson and Brock. While there has been significant movement in terms of developing Princess Street in Williamsville District, there are still many properties that are underutilized. Opening up new high-density areas, especially those close to the university campus on less expensive

land, means that with Kingston's limited population growth and unknown student growth, these properties on Williamsville Main Street could remain empty for many years to come. Identifying other areas for intensification such as Brock and Johnson Streets to Victoria/Toronto/Macdonnell Streets, will dilute the intensification efforts, draw development resources away from Williamsville Main Street and ultimately defeat the OP goal of intensifying the current "centres and corridors." The priorities need to be clarified. Opening up large areas in a low-density zone also means that there needs to be more space set aside for transition from low to high density. Unfortunately, experience has shown that this doesn't happen and that those in the low-density areas bear the brunt of the high density development either because there is no transition or by shouldering the burden of transition on their property.

Brock and Johnson Corridor - In terms of comments on the proposed high-density zones (slides 12, 13 and 14), I am particularly concerned with what is being proposed for the Brock and Johnson Corridors (slide 12). In terms of the area immediately north of the Queen's campus to Princess, between Barrie and University Ave, the Williamsville Community Association

(of which I am a member but these comments represent my personal comments only, not those of the WCA) supported high-density residential zoning for this area when the most recent Queen's Campus Master Plan was being developed. However, without a demonstrated need for the five-block extension of high density west of Alfred Street on Johnson and Brock, the change in zoning simply threatens the low-density residential close to the university campus and dilutes the potential for significant high-density residential areas along Williamsville Main Street. I am particularly concerned with the suggestion that the height should be six storeys without any stepbacks, especially on Brock Street by Victoria Park. These six-storey structures, combined with the traffic on a high-speed arterial will create a very poor pedestrian experience. Apart from the ten-storeys being proposed for Sir John A. and Bath Road, this is the only area that is being targeted for more than four storeys. Why are four storeys with stepbacks being recommended for all other areas and six storeys without stepbacks being recommended for the area designated as Johnson and Brock Corridors? Four storeys (with three storeys in the Victoria Park area, as well as massing and design of the neighbourhood surrounding the park) is a

much better fit for this area. In addition, the illustrated example shows the type of the development being recommended for a full-block development. Although the City was surprised by the property consolidation for development on Williamsville Main Street, a more likely assumption for the Brock and Johnson Corridors is that two or three properties (not a whole block) will be brought together for high density development which will require separation on both sides and behind the high-density building to provide for protection of the adjoining low-density residential. The use of lanes, streets, landscaping and other methods of separation from low-density residential will be very difficult to implement.

Parkland – One of the bullets (#4) on the slide Objectives of Policies and Guidelines (slide 15) makes reference to providing “support for a mix of amenities and land uses (walkability, housing variety, enhancing pedestrian boulevards, public spaces, mixed-use developments).” In terms of public spaces, one of the key concerns is with parkland, especially in light of the intensification for Williamsville District. Williamsville District has the least parkland in terms of parkland per capita when compared with other districts, a shortage that is increasing as the population of Williamsville

has increased substantially over the past five years. Although the Williamsville Main Street secondary plan recognized the importance of parks and recommended a number of parkettes on Princess Street, development after development is getting approved without any additional parkland on Princess Street. The Parks and Recreation Master Plan (March 2020 final draft) identifies “growth being accommodated via intensification and infill development within the downtown and Williamsville area” and the problem wherein “recent changes to the legislation (Bill 108) will potentially reduce the rate of acquiring parkland and associated funds through development, particularly for high-density development.” Areas that are being intensified or infilled in this study (Central Kingston Growth Strategy) need to make specific reference to how parkland will be achieved and not just a reference to supporting a “mix of amenities and land uses.” The intensification planned for Williamsville District cannot continue simply by pointing to the existing parkland of Victoria Park (acquired 1876) and the Community Centre lands (acquired 1897). Where’s the parkland for the planned intensification of Williamsville District? How will it be achieved? It needs to be dealt with as part of the intensification process.

Zoning – Stable Areas – One of the triggers for this study was the legal over-intensification of the near campus properties in ways that threatened the existing neighbourhoods on Centre Street, on Beverley Street, on Albert Street, etc. It is extremely difficult to understand how the recommendations contained in the two slides, Building Depth (slide 18) and Building Height (slide 19) will assist in controlling this problem. I had previously suggested that there be real life examples of how this would help by taking the development at Centre Street (or any other similar infill problem) and showing how it would be made more compatible with the neighbourhood by the use of the new zoning by-laws that are being proposed. Unfortunately, this suggested way of increasing clarity and understanding was not done. In addition, it might have been easier to understand if the presentation had made better use of multiple slides and the animation function in PowerPoint to explain the new zoning by-law proposals for Building Depth (slide 18) and Building Height (slide 19) and the difference that a change in the zoning by-laws would make.

Zoning – Transitioning Density – One of the most important issues is how the low-density residential will transition to high-density. Slides 20 and 21 have some

headings and images but there is very little explanation in how the transition will be made. Two of the more important approaches (Stepbacks and Setbacks (4) and Transitional Massing Approach (5)) are made more difficult to understand because of the text is small and too blurry to read. Of these two approaches, Stepbacks and Setbacks appears far superior to the Transitional Massing Approach, yet the Stepbacks and Setbacks approach has already been discarded in the Density by Design study. The Transitional Massing Approach has been used, unsuccessfully from my perspective, as a transition for the high-density 501 Frontenac Street development to low-density residential. Could you provide positive examples where the Transitional Massing Approach has been used in Kingston?

Urban Design Guidelines – I have seen very little impact in neighbourhoods in terms of applying the currently existing Design Guidelines for Communities and Design Guidelines for Residential Lots. Although design guidelines are noted in the OP (8.1) to clarify the strategic direction and design objectives; to complement and enhance design considerations in development applications; and to assist the City in evaluating development proposals; there is no

visible evidence in the Comprehensive Reports from the Planning Department that the UDGs have been used in assessing development proposals. The previous PowerPoint spoke to use of UDGs - “new developments must consider the guidelines, and the City will have power to require an Urban Design Study to demonstrate this, particularly for larger intensification and infill developments.” Unfortunately “must consider” does not mean “must utilize” but even this was dropped from the current PowerPoint presentation. UDGs are useful only in providing aspirational direction. As much as possible, UDGs should only be used for providing aspirational direction that cannot be implemented through zoning by-laws.

Urban Design Guidelines – Stable Areas (slide 26) refers to “specific elements that contribute to the character of each Neighbourhood Group.” When the Neighbourhood Groups were established at the beginning of the study, there was no reference to using them later for purposes of urban design guidelines. For example, Williamsville Neighbourhood is considerably different than Kingscourt Neighbourhood – the former being largely late Victorian to Second World War, whereas the latter is entirely wartime housing (possibly a heritage district) and post Second

World War which is considerably different than Williamsville Neighbourhood. I assume that the same difference exists with other Neighbourhood Groups such as the Calvin Park – Portsmouth grouping. It is not clear how UDGs for Neighbourhood Groups can be developed in a way that is useful and deals with the significant differences in the variety within the city-defined Neighbourhood Groups.

Downzoning – There is no reference to downzoning in any part of the study area nor even if downzoning was considered. If the Planning Department is attempting to rationalize the current zoning as part of developing the new zoning by-law, it makes sense to consider downzoning. There are parts of the City that were zoned as high-density as part of the original zoning in 1941 when the whole area north of Princess Street to Concession was zoned as “multiple family.” This zoning remained in place until the 1970s and explains the 16-unit apartment blocks which are located in various places of which is otherwise a low-density residential area. In some areas north of Princess, high density zoning remains in place in areas that are low density. Downzoning is one way to preserve neighborhood character, especially in low-density where high-density residential is not a priority.

Summary Notes - The origins of this study arose from an egregious alteration to a house on Centre Street that did not require a zoning by-law amendment or even a minor variance. The creation of new high density areas was added to the study by the Planning Department. There has been little or no discussion on the need for the creation of large areas for high density development, the problem that is being solved, the current shortage (if any) of land for high density development, how many units are needed over the next 10 years, how much would be supplied by the City's pending and committed housing supply and how much capacity would be added with the creation of these new high density areas. Instead a number of relatively large areas are being proposed for high density in areas of low rise residential or immediately adjacent to low rise residential. Getting back to the reason why the study came forward in the first place, the suggested changes to the zoning by-law are difficult to understand. No examples have been provided to show what impact the proposed controls would have nor how it would have dealt with problems like the Centre Street development. In short, I am concerned that the City is creating relatively large areas of high density which will have an impact on and

threaten the low rise residential. At the same time, how the zoning by-law amendments would protect neighbourhoods from further desecration is difficult to understand.

City Response

The City responded individually to each of the letters provided in response to the concerns and issues raised by proponents. As appropriate, elements and suggestions have been incorporated into the final recommendations where they help to achieve the goals of this study.

Community Working Group Minutes - June 23 2020



AGENDA

Project title	Central Kingston Growth Strategy		
Project number	18M-00139-00	Date	March 26, 2020
Time	2:00 pm	Venue	Go To Meeting / Conference Call
Purpose	Community Working Group (CWG) meeting to discuss proposed recommendations.		

Name	Company	Attendance
Mike Szilagyi	Kingston - Planning	✓
Andrea Gummo	Kingston - Planning	✓
Sukriti Agarwal	Kingston - Planning	✓
Niall Oddie	Kingston - Planning	✓
Cathy Styles	Working Group Member	✓
Mac Gervan	Working Group Member	✓
David Gordon	Working Group Member	✓
John Grenville	Working Group Member	✓
Meredith McDonnell	Working Group Member	✓
Tony Gkotsis	Working Group Member	✓
Queen's AMS representative	Working Group Member	x
Councillor Peter Stroud	Working Group Member	x
Councillor Jim Neill	Working Group Member	x
Councillor Rob Hutchison	City Councillor	✓
John Tassiopoulos	WSP - Planning	✓
Jennifer Sisson	WSP - Planning	✓

COPIES TO			
Name	Company	Phone	Email
Chris Tyrrell	WSP	905-882-7303	Chris.Tyrrell@wsp.com
Paige Agnew	Kingston	613-546-4291 x3252	pagnew@cityofkingston.ca

ITEM	ACTION
1.0 WELCOME AND INTRODUCTIONS	
2.0 BRIEF PRESENTATION ON PHASE 3 RECOMMENDATIONS	

AGENDA

3.0 DISCUSSION OF PHASE 3 RECOMMENDATIONS

The long-term vision for the residential areas of Central Kingston to preserve what is valued in Kingston’s communities and identify appropriate locations and forms for accommodating future growth. WSP gave a presentation highlighting the key recommendations and the group discussed a variety of topics, these have been grouped as shown below.

Official Plan Comments & Recommendations

Queen's Campus Expansion Area was originally intended to hold lands for campus expansion and prevent the university from expanding east and west into the adjacent neighbourhoods. Further discussion is required to determine if these lands in full or in part should be used for intensification areas under this study. An Official Plan amendment would be required to remove the structural element from the Official Plan. A comment was made by the CWG that more discussion is needed with Queen’s University regarding the Campus Expansion Area.

Concern was expressed about the extent of the Intensification areas and how they may affect other intensification areas already identified by the City. It was explained that the areas identified were consistent with policies and work completed in earlier phases of the study. The intensification areas and extent will be further refined once results of Service and Infrastructure analysis are provided.

How was phasing of intensification determined? The phasing was developed to assist the Servicing and Infrastructure analysis and was based on a combination of geographical contiguousness and discussions with City planning staff regarding development applications/approvals. The definition of what is appropriate infill was also discussed. Appropriate infill is intrinsic to this study and will be reflected in the policy recommendations and urban design guidelines. This includes appropriate massing and building depth in stable neighbourhoods and human-scaled and context sensitive 4 to 6 storey developments in intensification areas.

Comment provided that “V/C Approaching” lines should be removed to eliminate any possible confusion from the Servicing + Infrastructure slide.

Comment noted regarding sensitivity of using Queen’s and St. Lawrence as the names for the intensification areas. Could lend potential false endorsement from the institutions for the development recommendations, WSP will amend to use geographic indicators such as street names.

Zoning By-law Comments & Recommendations

The CWG expressed concern regarding the size/amount of buildable area that is permitted as of right in the A Zone. The current Floor Space Index (FSI) requirements in the Zoning By-law were noted to be contributing to the overdevelopment issue, the CWG noted that 10-18 bedroom houses may be developed as of right under the current Zoning By-law, and there is a need to reduce the FSI, particularly in neighbourhoods such as Sydenham. WSP indicated the key concern with FSI is that it cannot address the variety of lot sizes and that it alone would not address overdevelopment while at the same time maintain character or streetscape quality in stable neighbourhoods. The other zoning tools of setbacks and building depth/length will be required as it may not be possible to

The City will further discuss with Queen’s representatives the refinement of the defined intensification area in the study with respect to the Campus Expansion area and provide direction to the Project Team on the outcome.

The V/C lines will be removed, or the phasing map may be removed entirely.

WSP to update intensification area names.

WSP will explore whether FSI is an appropriate tool to be used in conjunction with the other tools that are being recommended for the Zoning By-law

AGENDA

provide a definitive FSI across neighbourhoods.

WSP is taking a multi-faceted approach to address the overdevelopment issue; the intent is to create a development “box” within which development will be of an acceptable massing and height. This reduces reliance on just FSI. A combination of zoning tools and their adjustment will be employed to address overdevelopment of lots.

The FSI of 1.0 should be reduced and it was discussed that this FSI is indeed too high for many neighbourhoods in the study area. The CWG also requested information on what other cities were doing in this regard.

There should be limits imposed in the number of apartments or rooms are permitted in houses within stable neighbourhoods to address overdevelopment. Limiting the number of bedrooms was noted as being a difficult approach to take as it comes up against the rights of individuals and families.

Zone B in Sydenham allows apartment buildings as-of-right in a heritage district. Greater protections are needed in the new Zoning By-law.

The CWG wanted clearer directions on how stepbacks and other transitional elements would function, there have been issues in Williamsville for transitioning density.

The City can look into FSI in other cities, or WSP can provide very brief examples.

Zoning will be revised through the Zoning By-law Update.

The following phase will provide further elaboration on transitional elements.

Urban Design Guideline Recommendations

Concern was noted over character elements being identified just for the 6 Neighbourhood Groups identified through this study. These Neighbourhood Groups are geographic identifiers for different neighbourhoods in the study area and not community groups/organizations. WSP noted that this study is intended to provide high-level characteristics that are consistent within neighbourhoods, as well as across neighbourhood groups, such as driveway location. The character elements are also not limited to the Neighbourhood Groups, where individual neighbourhoods vary significantly in character within one Neighbourhood Group, they will be looked at separately.

It was noted that in some neighbourhoods there are Victorian homes next to Edwardian or Georgian style-homes and that it would be difficult to ascertain common character in some neighbourhoods.

Concern was raised over the strength associated with design guidelines and whether they would be effective in reducing overdevelopment within the stable areas. WSP noted that the guidelines considered to be necessary could be transferred to the Zoning by-law so that they have more “teeth” to be more effective; their purpose is to be used in conjunction with the Zoning to further address qualitative aspects of development.

Preliminary Servicing and Infrastructure Analyses / Phasing

Concern was noted over non-contiguous development and the phasing as outlined in the servicing and infrastructure analysis. WSP noted that the phasing shown was for the purposes of the servicing analysis, i.e. the anticipated build out based on development demands. This does not reflect a preferred development order.

AGENDA

The City noted that development phasing is intended to be looked at once the various area studies have concluded so that relevant servicing and infrastructure constraints will be known and can be looked at holistically.

Preliminary Intensification Sites

Concern that Williamsville Main Street will never be built out, and that there is too much density being identified in other areas. It was noted that a lack of infrastructure may restrict development. Prioritizing of areas / phasing will not encourage the development of these intensification areas over Williamsville. The City is intending to look at priorities overall for phasing following the completion of these studies.

General Items

The CWG asked what is to prevent developers from developing 6 storeys at any location of the areas identified for intensification on Johnson and Brock which could create a disparate and not contiguous density in an orderly manner. There was also concern over higher densities creeping into stable areas. WSP explained that locations will be affected and controlled through clear identification of areas, phasing of areas for development and most importantly whether certain areas will have servicing capacity in order to accommodate new development. WSP further explained that the recommendations for the Official Plan and Zoning By-law are intended to clearly outline the areas that can receive heights up to 6 storeys, and there will be a transitional zone at the edges of the intensification sites.

Comments made that policy directions and regulations which limit the size of houses (and by association, number of bedrooms) can and should be supported by new demographic studies that show the size of households shrinking and as a result, larger homes are no longer necessary as they may have once been.

The CWG requested clarification on how the recommendations of this study will be implemented. City staff indicated that after the recommendations of the study are presented to the Planning Committee, staff will initiate the formal Planning Act process to make amendments to the Official Plan. The zoning recommendations will be implemented through the new City-wide Zoning By-Law.

Further clarity/elaboration on transitional elements will be provided in the next phase of Study.

The City has conducted a Population, Housing & Employment Projections Study (May 2019), which is referenced by this study.

4.0 NEXT STEPS

- A revised presentation and materials, refined based on today's discussions and comments will be presented to the public at the next Open House. With the uncertainty surrounding COVID-19, the City and WSP are exploring alternatives to in-person gatherings.

Attachments:

1. Presentation slides.

Appendix B: Zoning By-law Provision Recommendations

New Definitions

Building Depth means the horizontal distance between the required front setback and the principal building's main rear wall, measured perpendicular to the front setback.

Rear Wall means the portion of the main wall of the principal building that is farthest from the front setback. Projections, bay windows, and chimney breasts of 0.5 metres or less are excluded.

11.6. Residential Zone 5 (UR5) [A ZONE]

11.6.1. The use of any lot or building in the UR5 Zone must comply with the provisions of Table 11.6.1.

Table 11.6.1. – UR5 Provisions

Zoning Provision	<i>all permitted uses</i>
1. Minimum <i>lot area</i> (square metres)	370.0
2. Minimum <i>lot frontage</i> (metres)	10.0
3. Maximum <i>height</i> (metres/storeys)	Lesser of 10.7 metres or 3 storeys
4. Minimum <i>front setback</i> (metres)	a) if 2 adjacent <i>buildings</i> , the lesser of: <ul style="list-style-type: none"> i) the average of existing <i>front setbacks</i> of adjacent <i>buildings</i> or ii) 4.5 metres; b) if 1 adjacent <i>building</i> , the lesser of: <ul style="list-style-type: none"> i) the average of 4.5 metres and existing <i>front setback</i> of adjacent <i>building</i>, or ii) 4.5 metres c) if no adjacent <i>buildings</i> : 4.5 metres; d) where a <i>building</i> existed as of the date of the passing of this by-law, and the <i>front setback</i> is less than subsections a), b), or c), the minimum <i>front setback</i> is the existing setback

Zoning Provision	<i>all permitted uses</i>
5. Minimum <i>exterior setback</i> (metres)	a) if 1 adjacent <i>building</i> , the lesser of: i) the average of 4.5 metres and existing <i>front setback</i> of adjacent <i>building</i> , or ii) 4.5 metres b) if no adjacent <i>building</i> : 4.5 metres c) where a <i>building</i> existed as of the date of the passing of this by-law, and the <i>exterior setback</i> is less than a) or b), the minimum <i>exterior setback</i> is the existing setback
6. Minimum <i>interior setback</i> (metres)	a) <i>Single-detached house, duplex</i> : 0.6 metres b) <i>Non-residential buildings</i> : 3.0 metres plus 0.3 metres for each additional 0.6 metres in height above 4.6 metres
7. Minimum aggregate of <i>interior setbacks</i>	a) <i>Single-detached house, duplex</i> : 3.6 metres
8. Minimum <i>landscaped open space</i>	30% of the lot area
9. Maximum number of <i>principal buildings</i> per lot	1
10. Maximum <i>building depth</i>	18 metres from required minimum <i>front setback</i> . In no instance shall the rear wall of the <i>principal building</i> be closer than 7.5 metres to the <i>rear lot line</i> .

Additional Provisions for Lots Zoned UR5

11.6.2. Existing Semi-Detached Houses and Townhouses Permitted:

Notwithstanding the uses listed in Table XX – Permitted Uses in the Residential Zones, a *semi-detached house* or a *townhouse* that existed as of the date of passage of this By-Law is deemed to be a permitted use in the UR5 Zone, subject to the following provisions:

- a) Where a common party wall is located along a *lot line*, the minimum *interior setback* shall be 0 metre along the lot line, and 3.0 metres on the other side.
- b) Existing semi-detached houses and townhouses must comply with all other provisions of Table 11.6.1.

11.7. Residential Zone 6 (UR6) [A1 ZONE]

11.7.1. The *use* of any *lot* or *building* in the UR6 Zone must comply with the provisions of Table 11.7.1.

Table 11.7.1. – UR6 Provisions

Zoning Provision	all permitted uses
1. Minimum <i>lot area</i> (square metres)	665.0
2. Minimum <i>lot frontage</i> (metres)	18.0
3. Maximum <i>height</i> (metres/storeys)	The lesser of 10.7 metres or 3 storeys
4. Minimum <i>front setback</i> (metres)	a) 7.5 b) Where a <i>building</i> existed as of the date of the passing of this by-law, and the existing <i>front setback</i> is less than 7.5 metres, the minimum <i>front setback</i> is the existing setback.
5. Minimum <i>exterior setback</i> (metres)	7.5
6. Minimum <i>interior setback</i> (metres)	a) <i>single detached house</i> : 1.2 metres b) all other <i>buildings</i> : 3.0 metres plus 0.3 metres for each additional 0.6 metres in <i>height</i> above 4.6 metres
7. Minimum aggregate of <i>interior setbacks</i>	3.6
8. Minimum <i>landscaped open space</i>	30%
9. Maximum number of <i>principal buildings per lot</i>	1
10. Maximum <i>building depth</i>	18 metres from required minimum <i>front setback</i> . In no instance shall the rear wall of the <i>principal building</i> be closer than 7.5 metres to the <i>rear lot line</i> .

11.8. Residential Zone 7 (UR7) [A2 ZONE]

11.8.1. The *use* of any *lot* or *building* in the UR7 Zone must comply with the provisions of Table 11.8.1.

Table 11.8.1. – UR7 Provisions

Zoning Provision	<i>all permitted uses</i>
1. Minimum <i>lot area</i> (square metres)	555.0
2. Minimum <i>lot frontage</i> (metres)	a) for corner <i>lots</i> : 16.5 b) all other <i>lots</i> : 15.0
3. Maximum <i>height</i> (metres/storeys)	The lesser of 10.7 metres or 3 storeys
4. Minimum <i>front setback</i> (metres)	a) 7.5 b) Where a <i>building</i> existed as of the date of the passing of this by-law, and the existing <i>front setback</i> is less than 7.5 metres, the minimum <i>front setback</i> is the existing setback.
5. Minimum <i>exterior setback</i> (metres)	7.5
6. Minimum <i>interior setback</i> (metres)	a) non-residential <i>buildings</i> : 3.0 metres plus 0.3 metres for each additional 0.6 metres in height above 4.6 metres b) residential <i>buildings</i> : 1.2
7. Minimum aggregate of <i>interior setbacks</i>	3.6
8. Minimum <i>landscaped open space</i>	30%
9. Maximum number of <i>principal buildings</i> per <i>lot</i>	1
10. Maximum <i>building depth</i>	18 metres from required minimum <i>front setback</i> . In no instance shall the rear wall of the principal building be closer than 7.5 metres to the <i>rear lot line</i> .

11.9. Residential Zone 8 (UR8) [A3 ZONE]

11.9.1. The use of any lot or building in the UR8 Zone must comply with the provisions of Table 11.9.1.

Table 11.9.1. – UR8 Provisions

Zoning Provision	<i>all permitted uses</i>
1. Minimum <i>lot area</i> (square metres)	a) <i>single detached house</i> : 418.0 b) <i>duplex, semi-detached house</i> : 555.0 (277.5 per <i>dwelling unit</i>)
2. Minimum <i>lot frontage</i> (metres)	a) <i>corner lots</i> : 16.5 b) <i>all other lots</i> : 13.7
3. Maximum <i>height</i> (metres/storeys)	The lesser of 10.7 metres or 3 storeys
4. Minimum <i>front setback</i> (metres)	6.0 Where a building existed as of the date of the passing of this by-law, and the existing <i>front setback</i> is less than 6.0 metres, the minimum <i>front setback</i> is the existing setback.
5. Minimum <i>exterior setback</i> (metres)	6.0
6. Minimum <i>interior setback</i> (metres)	a) <i>single detached house, duplex</i> : 1.2 b) <i>semi-detached house</i> : i) 2.4 metres ii) Where a common party wall is located along a lot line: 0 metre
7. Minimum aggregate of <i>interior setbacks</i>	<i>single detached house, duplex</i> : 3.0
8. Minimum <i>landscaped open space</i>	30%
9. Maximum number of <i>principal buildings per lot</i>	1
10. Maximum <i>building depth</i>	18 metres from required minimum <i>front setback</i> . In no instance shall the rear wall of the <i>principal building</i> be closer than 6 metres to the rear lot line

Additional Provisions for Lots Zoned UR8

11.9.2. *Semi-Detached House where both dwelling units are located on the same lot:*

A Semi-Detached House, where both *dwelling units* are located on the same *lot*, must comply with all of the provisions of Table 11.9.1 that are applicable to a *single-detached house*.

11.10. Residential Zone 9 (UR9) [A4 ZONE]

11.10.1. The *use* of any *lot* or *building* in the UR9 Zone must comply with the provisions of Table 11.10.1.

Table 11.10.1. – UR9 Provisions

Zoning Provision	<i>all permitted uses</i>
1. Minimum <i>lot area</i> (square metres)	a) <i>single detached house</i> : 465.0 b) <i>duplex, semi-detached house</i> : 418.0 per <i>dwelling unit</i>
2. Minimum <i>lot frontage</i> (metres)	a) <i>corner lots</i> : 16.5 b) <i>other lots</i> : 12.0
3. Maximum <i>height</i> (metres/storeys)	The lesser of 10.7 metres or 3 storeys
4. Minimum <i>front setback</i> (metres)	a) 4.5 metres b) Where a <i>building</i> existed as of the date of the passing of this by-law, and the existing <i>front setback</i> is less than 4.5 metres, the minimum <i>front setback</i> is the existing setback.
5. Minimum <i>exterior setback</i> (metres)	4.5
6. Minimum <i>interior setback</i> (metres)	a) <i>Single detached house, duplex</i> : 1.2 b) <i>Semi-detached house</i> : i) 2.4 metres ii) Where a common party wall is located along a <i>lot line</i> : 0 metre c) <i>Non-residential buildings</i> : 3.0 metres plus 0.3 metres for each additional 0.6 metres in height above 4.6 metres
7. Minimum aggregate of <i>interior setbacks</i>	<i>Single detached house, duplex</i> : 3.6
8. Minimum <i>landscaped open space</i>	30%
9. Maximum number of <i>principal buildings</i> per <i>lot</i>	1
10. Maximum <i>building depth</i>	18 metres from required minimum <i>front setback</i> .

Zoning Provision	<i>all permitted uses</i>
	In no instance shall the rear wall of the <i>principal building</i> be closer than 7.5 metres to the <i>rear lot line</i> .

Additional Provisions for Lots Zoned UR9

11.10.2. *Semi-Detached House* where both *dwelling units* are located on the same lot:

A *Semi-Detached House*, where both *dwelling units* are located on the same lot, must comply with all of the provisions of Table 11.10.1 that are applicable to a *single-detached house*.

11.11. Residential Zone 10 (UR10) [A5 ZONE]

11.11.1. The *use* of any *lot* or *building* in the UR10 Zone must comply with the provisions of Table 11.11.1.

Table 11.11.1. – UR10 Provisions

Zoning Provision	all permitted uses
1. Minimum <i>lot area</i> (square metres)	a) <i>single detached house</i> : 465.0 b) <i>duplex, semi-detached house</i> : 370.0 per dwelling unit c) all other permitted uses: 465.0
2. Minimum <i>lot frontage</i> (metres)	15.0
3. Maximum <i>height</i> (metres/storeys)	The lesser of 10.7 metres or 3 storeys
4. Minimum <i>front setback</i> (metres)	a) 7.5 metres b) Where a building existed as of the date of the passing of this by-law, and the existing <i>front setback</i> is less than 7.5 metres, the minimum <i>front setback</i> is the existing setback.
5. Minimum <i>exterior setback</i> (metres)	7.5
6. Minimum <i>interior setback</i> (metres)	a) <i>single-detached house, duplex</i> : 1.2 b) <i>semi-detached house</i> : i) 2.4 metres ii) Where a common party wall is located along a lot line: 0 metre c) non-residential <i>buildings</i> : 3.0 metres plus 0.3 metres for each additional 0.6 metres in height above 4.6 metres
7. Minimum aggregate of <i>interior setbacks</i>	3.0
8. Minimum <i>landscaped open space</i>	30%
9. Maximum number of <i>principal buildings per lot</i>	1
10. Maximum <i>building depth</i>	18 metres from the required minimum <i>front setback</i> .

Zoning Provision	<i>all permitted uses</i>
	In no instance shall the rear wall of the <i>principal building</i> be closer than 6 metres to the <i>rear lot line</i> .

Additional Provisions for Lots Zoned UR10

11.11.2. *Semi-Detached House* where both *dwelling units* are located on the same *lot*:

A *Semi-Detached House*, where both *dwelling units* are located on the same *lot*, must comply with all of the provisions of Table 11.11.1 that are applicable to a *single-detached house*.

11.12. Residential Zone 11 (UR11) [A7 ZONE]

11.12.1. The *use* of any *lot* or *building* in the UR11 Zone must comply with the provisions of Table 11.12.1.

Table 11.12.1. – UR11 Provisions

Zoning Provision	<i>all permitted uses</i>
1. Minimum <i>lot area</i> (square metres)	a) single detached house: 320.0 b) semi-detached house, linked dwelling house: 540.0 (270.0 per dwelling unit)
2. Minimum <i>lot frontage</i> (metres)	a) corner lot, single detached house: 14.0 metres b) other lots, single detached house: 10.6 metres c) corner lots, semi-detached house, linked dwelling house: 20.0 metres d) other lots, semi-detached house, linked dwelling house: 18.0 metres
3. Maximum <i>height</i> (metres/storeys)	The lesser of 10.7 metres or 3 storeys
4. Minimum <i>front setback</i> (metres)	6.0
5. Minimum <i>rear setback</i> (metres)	6.0
6. Minimum <i>exterior setback</i> (metres)	6.0
7. Minimum <i>interior setback</i> (metres)	a) single detached house: i) where there is an attached <i>private garage</i> or attached <i>carport</i> : 1.2 metres ii) where there is no attached <i>private garage</i> or attached <i>carport</i> : 1.2 metres on one side and 2.4 metres on the other side b) semi-detached house: i) side that is not attached to another <i>dwelling unit</i> and for which an attached <i>private garage</i> or attached <i>carport</i> is provided: 1.2 metres ii) side that is not attached to another <i>dwelling unit</i> and for which an attached <i>private garage</i> or attached <i>carport</i> is not provided: 2.4 metres b) linked dwelling house:

Zoning Provision	<i>all permitted uses</i>
	<p>i) side that is not attached to another <i>dwelling unit</i> below ground level and for which an attached <i>private garage</i> or <i>carport</i> is provided: 1.2 metres</p> <p>ii) side that is not attached to another <i>dwelling unit</i> below ground level and for which an attached garage or carport is not provided: 2.4 metres</p> <p>iii) Minimum horizontal distance between the two dwelling units comprising a linked dwelling house: 1.8 metres provided no windows shall be permitted on the exterior wall of a <i>linked dwelling</i> facing the <i>dwelling unit</i> to which it is connected.</p>
8. Minimum aggregate of <i>interior setbacks</i>	3.6 metres
9. Minimum <i>landscaped open space</i>	30%
10. Maximum number of <i>principal buildings per lot</i>	1

Additional Provisions for Lots Zoned UR11

11.12.2. In addition to the provisions of Table 11.12.1., *uses* must comply with the following provisions:

- 1.** The location of a parking facility may extend from the front of the house to the front lot line, the maximum width of which shall be the lesser of 50 per cent of the lot frontage or 5.6 metres.

(a) Notwithstanding the above provisions the following addresses shall be limited to the following widths:

60	Eugene Court	5.8 meters
63	Eugene Court	4.7 meters
67	Eugene Court	5.0 meters
68	Eugene Court	4.8 meters
71	Eugene Court	5.3 meters
34	Wiley Street	5.9 meters

36	Wiley Street	6.1 meters
42	Wiley Street	5.2 meters
44	Wiley Street	4.1 meters
46	Wiley Street	5.7 meters
48	Wiley Street	5.7 meters
49	Wiley Street	5.9 meters
54	Wiley Street	6.3 meters
56	Wiley Street	5.5 meters
60	Wiley Street	6.3 meters
96	Briceland Street	4.7 metres
100	Briceland Street	6.0 metres
102	Briceland Street	4.7 metres
104	Briceland Street	5.4 metres
108	Briceland Street	4.6 metres
110	Briceland Street	4.6 metres
116	Briceland Street	4.3 metres
120	Briceland Street	5.5 metres
124	Briceland Street	4.7 metres
126	Briceland Street	4.7 metres
128	Briceland Street	5.5 metres
130	Briceland Street	5.2 metres
132	Briceland Street	5.7 metres
134	Briceland Street	4.6 metres
138	Briceland Street	5.7 metres
140	Briceland Street	5.1 metres
142	Briceland Street	4.7 metres
146	Briceland Street	5.2 metres
148	Briceland Street	5.0 metres
150	Briceland Street	4.6 metres
152	Briceland Street	5.2 metres
158	Briceland Street	5.2 metres
162	Briceland Street	5.8 metres
164	Briceland Street	5.4 metres
166	Briceland Street	4.8 metres
168	Briceland Street	5.0metres
170	Briceland Street	5.2 metres
171	Briceland Street	5.2 metres
172	Briceland Street	5.4 metres
174	Briceland Street	5.0 metres
175	Briceland Street	4.9 metres

176	Briceland Street	5.6 metres
177	Briceland Street	6.0 metres
178	Briceland Street	5.2 metres
180	Briceland Street	5.2 metres
182	Briceland Street	5.2 metres
184	Briceland Street	5.3 metres
186	Briceland Street	5.0 metres
188	Briceland Street	4.6 metres
190	Briceland Street	5.7 metres
192	Briceland Street	5.3 metres
194	Briceland Street	5.2 metres
196	Briceland Street	5.0 metres
198	Briceland Street	4.6 metres
200	Briceland Street	5.2 metres
202	Briceland Street	5.0 metres
206	Briceland Street	5.6 metres
208	Briceland Street	5.0 metres
210	Briceland Street	4.8 metres
212	Briceland Street	5.0 metres
214	Briceland Street	4.8 metres
216	Briceland Street	6.0 metres
219	Briceland Street	5.7 metres
221	Briceland Street	6.6 metres
222	Briceland Street	4.7 metres
224	Briceland Street	5.4 metres
226	Briceland Street	5.4 metres
228	Briceland Street	4.3 metres
230	Briceland Street	4.6 metres
232	Briceland Street	4.5 metres
234	Briceland Street	4.0 metres
234	Briceland Street	5.1 metres
61	Wiley Street	3.4 metres
63	Wiley Street	3.4 metres
5	Wilfred Crescent	5.6 metres
10	Wilfred Crescent	5.5 metres
18	Wilfred Crescent	5.5 metres
19	Wilfred Crescent	4.7 metres
21	Wilfred Crescent	4.8 metres
23	Wilfred Crescent	4.4 metres
41	Wilfred Crescent	4.3 metres

43	Wilfred Crescent	4.0 metres
46	Wilfred Crescent	5.4 metres
47	Wilfred Crescent	4.3 metres
48	Wilfred Crescent	5.8 metres
55	Wilfred Crescent	5.7 metres
61	Wilfred Crescent	6.2 metres
63	Wilfred Crescent	6.3 metres
54	Wilson Street	5.5 metres
62	Wilson Street	4.0 metres

11.13 Residential Zone 12 (UR12) [Portsmouth Village HCA]

11.13.1 The use of any lot or building in the UR12 Zone must comply with the provisions of Table 11.13.1.

Table 11.13.1. – UR12 Provisions

Zoning Provision	<i>all permitted uses</i>
1. Minimum <i>lot area</i> (square metres)	a) <i>single detached house</i> : 465.0 b) <i>duplex, semi-detached house</i> : 370.0 per dwelling unit c) all other permitted uses: 465.0
2. Minimum <i>lot frontage</i> (metres)	15
3. Maximum <i>height</i> (metres/storeys)	The lesser of 10.7 metres or 3 storeys
4. Minimum <i>front setback</i> (metres)	a) 4.5 metres b) Where a building existed as of the date of the passing of this by-law, and the <i>front setback</i> is less than 4.5 metres, the minimum <i>front setback</i> is the existing setback
5. Minimum exterior side yard setback (metres)	a) 4.5 metres b) where a building existed as of the date of the passing of this by-law, and the <i>exterior setback</i> is less than 4.5 metres, the minimum <i>exterior setback</i> is the existing setback
6. Minimum interior side yard setback (metres)	a) <i>single-detached house, duplex</i> : 1.2 b) <i>semi-detached house</i> : i) 2.4 metres ii) Where a common party wall is located along a <i>lot line</i> : 0 metre c) non-residential <i>buildings</i> : 3.0 metres plus 0.3 metres for each additional 0.6 metres in height above 4.6 metres
7. Minimum aggregate of <i>interior setbacks</i>	<i>Single detached house, duplex</i> : 3
8. Minimum landscaped open space	30%
9. Maximum number of <i>principal buildings</i> per lot	1

Zoning Provision	<i>all permitted uses</i>
10. Maximum building depth	18 metres from required minimum <i>front setback</i> . In no instance shall the rear wall of the <i>principal building</i> be closer than 6 metres to the <i>rear lot line</i> .

11.14. Residential Zone 13 (UR13) [Kingscourt]

11.14.1. The *use* of any *lot* or *building* in the UR13 Zone must comply with the provisions of Table 11.14.1.

Table 11.14.1. – UR13 Provisions

Zoning Provision	<i>all permitted uses</i>
1. Minimum <i>lot area</i> (square metres)	a) <i>single detached house</i> : 465.0 b) <i>duplex, semi-detached house</i> : 370.0 per dwelling unit c) all other permitted uses: 465.0
2. Minimum <i>lot frontage</i> (metres)	15.0
3. Maximum <i>height</i> (metres/storeys)	The lesser of 10.7 metres or 3 storeys
4. Minimum <i>front setback</i> (metres)	a) if 2 adjacent <i>buildings</i> , the lesser of: i) the average of existing <i>front setbacks</i> of adjacent <i>buildings</i> or ii) 4.5 metres; b) if 1 adjacent <i>building</i> , the lesser of: i) the average of 4.5 metres and existing <i>front setback</i> of adjacent <i>building</i> , or ii) 4.5 metres c) if no adjacent <i>buildings</i> : 4.5 metres; d) where a <i>building</i> existed as of the date of the passing of this by-law, and the <i>front setback</i> is less than subsections a), b), or c), the minimum <i>front setback</i> is the existing setback
5. Minimum <i>exterior setback</i> (metres)	a) if 1 adjacent <i>building</i> , the lesser of: i) the average of 4.5 metres and existing <i>front setback</i> of adjacent <i>building</i> , or ii) 4.5 metres b) if no adjacent <i>building</i> : 4.5 metres c) where a <i>building</i> existed as of the date of the passing of this by-law, and the <i>exterior setback</i> is less than a) or b), the minimum <i>exterior setback</i> is the existing setback

Zoning Provision	<i>all permitted uses</i>
6. Minimum <i>interior setback</i> (metres)	a) <i>single-detached, duplex</i> : 1.2 b) <i>semi-detached house</i> : i) 2.4 metres ii) Where a common party wall is located along a <i>lot line</i> : 0 metre c) non-residential <i>buildings</i> : 3.0 metres plus 0.3 metres for each additional 0.6 metres in height above 4.6 metres
7. Minimum aggregate of <i>interior setbacks</i>	<i>Single-detached, duplex</i> : 3.0
8. Minimum <i>landscaped open space</i>	30%
9. Maximum number of <i>principal buildings per lot</i>	1
10. Maximum <i>building depth</i>	18 metres from the required minimum <i>front setback</i> . In no instance shall the rear wall of the principal building be closer than 7.5 metres to the rear lot line

Additional Provisions for Lots Zoned UR13

11.14.2. *Semi-Detached House* where both *dwelling units* are located on the same *lot*:

A *Semi-Detached House*, where both *dwelling units* are located on the same *lot*, must comply with all of the provisions of Table 11.14.1 that are applicable to a *single-detached house*.

12.5. Multi-Unit Residential Zone 3 (URM3) [B ZONE]

12.5.1. The *use* of any *lot* or *building* in the URM3 Zone must comply with the provisions of Table 12.5.1.

Table 12.5.1. – URM3 Provisions

Zoning Provision	<i>all permitted uses</i>
1. Minimum <i>lot area</i> (square metres)	370 square metres
2. Minimum <i>lot frontage</i> (metres)	10
3. Maximum <i>height</i> (metres/storeys)	The lesser of 10.7 metres or 3 storeys
4. Minimum <i>front setback</i> (metres)	<p>a) if 2 adjacent <i>buildings</i>, the lesser of:</p> <ul style="list-style-type: none"> iii) the average of existing <i>front setbacks</i> of adjacent <i>buildings</i> or iv) 4.5 metres; <p>b) if 1 adjacent <i>building</i>, the lesser of:</p> <ul style="list-style-type: none"> iii) the average of 4.5 metres and existing <i>front setback</i> of adjacent <i>building</i>, or iv) 4.5 metres <p>c) if no adjacent <i>buildings</i>: 4.5 metres;</p> <p>d) where a <i>building</i> existed as of the date of the passing of this by-law, and the <i>front setback</i> is less than subsections a), b), or c), the minimum <i>front setback</i> is the existing setback</p>
5. Minimum <i>exterior setback</i> (metres)	<p>a) if 1 adjacent <i>building</i>, the lesser of:</p> <ul style="list-style-type: none"> iii) the average of 4.5 metres and existing <i>front setback</i> of adjacent <i>building</i>, or iv) 4.5 metres <p>b) if no adjacent <i>building</i>: 4.5 metres</p> <p>c) where a <i>building</i> existed as of the date of the passing of this by-law, and the <i>exterior setback</i> is less than a) or b), the minimum <i>exterior setback</i> is the existing setback</p>

Zoning Provision	<i>all permitted uses</i>
6. Minimum <i>interior setback</i> (metres)	0.6
7. Minimum aggregate of <i>interior setbacks</i>	3.6 metres
8. Minimum <i>landscaped open space</i>	30%
9. Maximum number of <i>principal buildings per lot</i>	1
10. Maximum number of <i>principal dwelling units per lot</i>	6
11. Maximum <i>building depth</i>	18 metres from required minimum <i>front setback</i> . In no instance shall the rear wall of the principal building be closer than 7.5 metres to the rear lot line.

12.6. Multi-Unit Residential Zone 4 (URM4) [B1 ZONE]

12.6.1. The *use* of any *lot* or *building* in the URM4 Zone must comply with the provisions of Table 12.6.1.

Table 12.6.1. – URM4 Provisions

Zoning Provision	<i>all permitted uses</i>
1. Minimum <i>lot area</i> (square metres)	Duplex: 670 Triplex: 860 Apartment building with 4 or more dwelling units: 870
2. Minimum <i>lot frontage</i> (metres)	18.0
3. Minimum <i>front setback</i> (metres)	7.5
4. Minimum <i>rear setback</i> (metres)	7.5 metres up to 5-storeys in height, then additional 1.2 metres for every storey above 5
5. Minimum <i>exterior setback</i> (metres)	7.5
6. Minimum <i>interior setback</i> (metres)	a) non-residential buildings: ½ the height of the building b) residential building, 1-storey: 1.8 metres c) residential building, 2-storey: 3.0 metres d) residential building greater than 2-storeys: 3.0 metres for first 2 storeys, then additional 1.2 metres for every storey above 2
7. Minimum <i>landscaped open space</i>	30%

12.7. Multi-Unit Residential Zone 5 (URM5) [B2 ZONE]

12.7.1. The *use* of any *lot* or *building* in the URM5 Zone must comply with the provisions of Table 12.7.1.

Table 12.7.1. – URM5 Provisions

Zoning Provision	<i>all permitted uses</i>
1. Maximum <i>height</i>	Lesser of: a) 10.7 metres b) 3-storeys
2. Minimum <i>front setback</i> (metres)	7.5
3. Minimum <i>rear setback</i> (metres)	a) Where parking spaces are provided in the <i>rear yard</i> : 12.0 metres b) Where parking spaces are not provided in the <i>rear yard</i> : 7.5 metres c) Where parking spaces are not provided in the <i>rear yard</i> and where the <i>rear yard</i> abuts a <i>side yard</i> or a <i>park</i> : 6.0 metres
4. Minimum <i>exterior setback</i> (metres)	7.5
5. Minimum <i>interior setback</i> (metres)	3.6
6. Minimum <i>landscaped open space</i>	30%
7. Maximum number of <i>principal dwelling units per building</i>	12
8. Maximum density	69 dwelling units per net hectare
9. Maximum <i>floor space index</i>	3.5

Additional Provisions for Lots Zoned RM6

12.7.2. In addition to the provisions of Table 12.7.1., *uses* must comply with the following provisions:

- 1.** Separation distance between residential buildings on the same lot: 4.5 metres
- 2.** Separation distance between the rear walls of residential buildings on adjacent lots: 15.0 metres

12.8. Multi-Unit Residential Zone 6 (URM6) [B3 ZONE]

12.8.1. The *use* of any *lot* or *building* in the URM6 Zone must comply with the provisions of Table 12.8.1.

Table 12.8.1. – URM6 Provisions

Zoning Provision	<i>all permitted uses</i>
1. Minimum <i>front setback</i> (metres)	7.5
2. Minimum <i>rear setback</i> (metres)	Equal to the height of the building
3. Minimum <i>exterior setback</i> (metres)	7.5
4. Minimum <i>interior setback</i> (metres)	a) where adjacent to single detached house, duplex or semi-detached house: equal to height of building b) all other: ½ height of building
5. Minimum aggregate of <i>interior setbacks</i>	1.5 times the height of the building
6. Minimum <i>landscaped open space</i>	30%
7. Maximum density	123 dwelling units per net hectare
8. Maximum <i>floor space index</i>	1

Additional Provisions for Lots Zoned URM6

12.8.2. In addition to the provisions of Table 12.8.1., *uses* must comply with the following provisions:

1. Side yards abutting any part of a lot occupied by a single detached house, duplex or semi-detached house must be fenced with a masonry wall not less than 1.4 metres in height. Such fence is to be erected 0.2 metre from the side lot line and extend to the rear lot line.

12.8. Multi-Unit Residential Zone 7 (URM7) [B3 ZONE – north of Williamsville]

12.8.1. The *use* of any *lot* or *building* in the URM7 Zone must comply with the provisions of Table 12.8.1.

Table 12.8.1. – URM7 Provisions

Zoning Provision	<i>all permitted uses</i>
1. Maximum <i>height</i> (metres/storeys)	Lesser of 13.5 metres or 4 storeys
2. Minimum <i>front setback</i> (metres)	a) if 2 adjacent <i>buildings</i> , the greater of: i) the average of existing <i>front setbacks</i> of adjacent <i>buildings</i> or ii) 2 metres; b) if 1 adjacent <i>building</i> , the greater of: i) the average of 1 metre and existing <i>front setback</i> of adjacent <i>building</i> , or ii) 2 metres c) if no adjacent <i>buildings</i> : 3.5 metres;
3. Minimum <i>rear setback</i> (metres)	7.5
4. Minimum <i>exterior setback</i> (metres)	3.5
5. Minimum <i>interior setback</i> (metres)	3
6. Minimum <i>landscaped open space</i>	30%
7. Maximum density	123 dwelling units per net hectare
8. Maximum <i>floor space index</i>	1

12.9. Intensification Area – Johnson & Brock Streets (URM8-H)

Zoning Provision	<i>all permitted uses</i>
1. Minimum lot area (square metres)	Apartment building, mixed-use building: 1,480
2. Maximum height (metres/storeys)	Lesser of 20 metres or 6 storeys, excluding the basement storey
3. Minimum streetwall height (metres)	12 metres or 4 storeys
4. Minimum front setback (metres)	2 metres
5. Minimum rear setback (metres)	10.0 with a 2.0m planting strip along the full extent of the rear lot line.
6. Minimum exterior setback (metres)	3.0
7. Minimum interior setback (metres)	3.0
8. Stepback where the building faces Johnson Street or Brock Street – fifth and sixth storeys	2.0 metres from the exterior wall of the fourth storey
9. Minimum landscaped open space	10%
10. Maximum lot coverage	55%
11. Maximum floor space index (FSI)	3.2

Additional Provisions for Intensification Area – Johnson and Brock Streets

In addition to the provisions of Table 12.9, *uses* must comply with the following provisions:

1. Balconies are permitted above the second storey of a building façade, to a maximum depth of 1.5 metres.
2. Balconies shall not be included in the calculation of maximum FSI.
3. Within the minimum *rear setback*, a minimum landscape buffer depth of 2 metres along the rear lot line is required.

4. Parking is prohibited in the *front yard* and the *exterior side yard*.
5. Mechanical penthouses and rooftop mechanical equipment
 - (a) Notwithstanding Section XX, mechanical penthouses shall be permitted to exceed the maximum allowable building height by up to 3.5 metres.
 - (b) Mechanical penthouses shall not exceed 10 percent of the roof area on which they are located.
 - (c) Mechanical penthouses and other rooftop equipment shall be setback from the edge of the roof line a minimum distance equal to the height of the mechanical penthouse or other piece of rooftop mechanical equipment.
 - (d) Notwithstanding subsection (c) above, enclosures dedicated only to stairs that are located at the end of a building shall be permitted within the required setback from the edge of a roof line.
6. Architectural appurtenances to support green roofs, other rooftop sustainability elements, or outdoor rooftop amenity spaces shall be permitted to exceed the maximum allowable building height by up to 3.5 metres.
7. Holding Symbol: Prior to the removal of any lot from the “-H” Holding Symbol and the issuance of a building permit for any new development of a lot, the following conditions must be satisfied:
 - (a) The City is satisfied that there is adequate servicing capacity (i.e. water, wastewater, natural gas, and electrical) for the proposed development.
 - (b) A Transportation Impact Study is completed that includes micro-simulation scoped to the satisfaction of the City.
 - (c) Interim permitted uses: Notwithstanding Subclauses (a) and (b), uses that are permitted by the UR5 Zone on lots located west of Albert Street, and by the URM3 Zone on lots located east of Albert Street, in accordance with the corresponding zone provisions.

12.10. Intensification Area - Johnson and Portsmouth (URM9-H)

Zoning Provision	<i>all permitted uses</i>
1. Minimum <i>lot area</i> (square metres)	Apartment building: 1,200
2. Maximum <i>height (metres/storeys)</i>	Lesser of 12 metres or 4 storeys, excluding the basement storey
3. Minimum <i>front setback</i> (metres)	3.0
4. Minimum <i>rear setback</i> (metres)	10.0
5. Minimum <i>exterior setback</i> (metres)	3.0
6. Minimum interior setback (metres)	3.0
7. Minimum <i>landscaped open space</i>	10%
8. Maximum <i>lot coverage</i>	55%
9. Maximum number of <i>principal buildings per lot</i>	1
10. Maximum <i>floor space index</i>	2.2

Additional Provisions for Intensification Area - Johnson & Portsmouth

In addition to the provisions of Table 12.10., *uses* must comply with the following provisions:

1. Parking is prohibited in the *front yard* and the *exterior side yard*.
2. Within the minimum rear setback, a minimum landscape buffer depth of 2 metres along the rear property line is required..
3. Balconies are permitted above the second storey of a building façade, to a maximum depth of 1.5 metres.
4. Balconies shall not be included in the calculation of maximum FSI.

- 5.** Holding Symbol: Prior to the removal of any lot from the “-H” Holding Symbol and the issuance of a building permit for any new development of a lot, the following conditions must be satisfied:
- (a)** The City is satisfied that there is adequate servicing capacity (i.e. water, wastewater, natural gas, and electrical) for the proposed development.
 - (b)** A Transportation Impact Study is completed that includes micro-simulation scoped to the satisfaction of the City.
 - (c)** Interim permitted uses: Notwithstanding Subclauses (a) and (b), uses that are permitted by the UR6 Zone on lots east of Portsmouth Avenue, and by the UR7 Zone west of Portsmouth Avenue, in accordance with the corresponding zone provisions.

12.11. Intensification Area - Portsmouth Corridor (South of Calderwood) (URM10-H)

Zoning Provision	<i>all permitted uses</i>
1. Minimum lot area (square metres)	950
2. Maximum height (/metres/storeys)	The lesser of 12 metres or 4 storeys, excluding the basement storey
3. Minimum front setback (metres)	3.0
4. Minimum rear setback (metres)	10.0
5. Minimum exterior setback (metres)	3.0
6. Minimum interior side yard setback (metres)	3.0
7. Minimum landscaped open space	10%
8. Maximum lot coverage	55%
9. Minimum Lot Depth (metres)	32.0
10. Maximum floor space index	2.2

Additional Provisions for Intensification Area – Portsmouth Corridor

In addition to the provisions of Table 12.11., *uses* must comply with the following provisions:

1. Parking is prohibited in the *front yard* and the *exterior side yard*.
2. Within the minimum rear setback, a minimum landscape buffer depth of 2 metres along the rear property line is required.
3. Balconies are permitted above the second storey of a building façade, to a maximum depth of 1.5 metres.

4. Balconies shall not be included in the calculation of maximum FSI.
5. Holding Symbol: Prior to the removal of any lot from the “-H” Holding Symbol and the issuance of a building permit for any new development of a lot, the following conditions must be satisfied:
 - (a) The City is satisfied that there is adequate servicing capacity (i.e. water, wastewater, natural gas, and electrical) for the proposed development.
 - (b) A Transportation Impact Study is completed that includes micro-simulation scoped to the satisfaction of the City.
 - (c) Interim permitted uses: Notwithstanding Subclauses (a) and (b), uses that are permitted by the UR10 Zone in accordance with the corresponding zone provisions.

12.12. Intensification Area - Portsmouth Corridor (between the two ends of Calderwood) (URM11-H)

Zoning Provision	<i>all permitted uses</i>
1. Minimum lot area (square metres)	1,600
2. Maximum height (metres/storeys)	The lesser of 12 metres or 4 storeys, excluding the basement storey
3. Minimum front setback (metres)	3 metres along Portsmouth Avenue; 3 metres along Woodstone Crescent
4. Minimum exterior setback (metres)	3.0
5. Minimum interior side yard setback (metres)	3.0
6. Minimum landscaped open space	10%
7. Maximum lot coverage	55%
8. Maximum floor space index	2.2

Additional Provisions for Intensification Area – Portsmouth Corridor

In addition to the provisions of Table 12.11., *uses* must comply with the following provisions:

1. Parking is prohibited in the *front yard* and the *exterior side yard*.
2. A maximum of one driveway shall be permitted per lot.
3. Balconies are permitted above the second storey of a building façade, to a maximum depth of 1.5 metres.
4. Balconies shall not be included in the calculation of maximum FSI.
5. Proposed development shall include two frontages within this block where accessible from both Portsmouth Avenue and Woodstone Crescent. One frontage will face onto Portsmouth Avenue and the other Woodstone Crescent. Corner dwellings shall also address Calderwood Drive. Rear lotting shall not be permitted.

- 6.** Holding Symbol: Prior to the removal of any lot from the “-H” Holding Symbol and the issuance of a building permit for any new development of a lot, the following conditions must be satisfied:
- (a)** The City is satisfied that there is adequate servicing capacity (i.e. water, wastewater, natural gas, and electrical) for the proposed development.
 - (b)** A Transportation Impact Study is completed that includes micro-simulation scoped to the satisfaction of the City.
 - (c)** Interim permitted uses: Notwithstanding Subclauses (a) and (b), uses that are permitted by the UR8 Zone in accordance with the corresponding zone provisions.

12.13. Intensification Area - Wright Crescent (URM12-H and URM13-H)

Zone along Sir John A. Macdonald Blvd. and Bath Road (RM12-H)

Zoning Provision	<i>all permitted uses</i>
1. Maximum <i>height</i> (metres/storeys)	Podium: Lesser of 20 metres or 6 storeys, excluding the basement storey. Podium and Tower combined: Lesser of 38.0 metres or 12 storeys, excluding the basement storey.
2. Minimum streetwall height (metres)	12 metres
3. Minimum <i>front setback</i> (metres)	3 metres along Bath Road, Sir John A. MacDonald Boulevard
4. Minimum <i>rear setback</i> (metres)	10.0
5. Minimum <i>exterior setback</i> (metres)	3.0
6. Minimum <i>interior setback</i> (metres)	3.0
7. Minimum <i>landscaped open space</i>	25%
8. Maximum <i>lot coverage</i>	60%
9. Maximum <i>floor space index</i>	6.0

Additional Provisions for Intensification Area - Sir John A. Macdonald Blvd. and Bath Road (URM12-H)

In addition to the provisions of Table 12.13., *uses* must comply with the following provisions:

- 1.** A tower shall be stepped back from the podium by a minimum distance of 3 metres on the façade along the Sir John A. Macdonald Boulevard and Bath Road frontages .

2. Balconies are permitted above the second storey of a building façade, to a maximum depth of 1.5 metres.
3. Balconies shall not be included in the calculation of maximum FSI.
4. The floor plate size of a tower shall not exceed 790 square metres. Tower floor plate shall include all areas enclosed within exterior walls, including hallways, elevators, stairs, mechanical shafts, etc.
5. Tower separation shall be 20 metres between narrow facades that face each other, and 25 metres along longer facades that face each other.
6. Parking is prohibited in the front yard and in the exterior side yard..
7. Mechanical penthouses and rooftop mechanical equipment
 - (a) Notwithstanding Section XX, mechanical penthouses shall be permitted to exceed the maximum allowable building height by up to 3.5 metres.
 - (b) Mechanical penthouses shall not exceed 10 percent of the roof area on which they are located.
 - (c) Mechanical penthouses and other rooftop equipment shall be setback from the edge of the roof line a minimum distance equal to the height of the mechanical penthouse or other piece of rooftop mechanical equipment.
 - (d) Notwithstanding subsection (c) above, enclosures dedicated only to stairs that are located at the end of a building shall be permitted within the required setback from the edge of a roof line.
8. Architectural appurtenances to support green roofs, other rooftop sustainability elements, or outdoor rooftop amenity spaces shall be permitted to exceed the maximum allowable building height by up to 3.5 metres.
9. Holding Symbol: Prior to the removal of any lot from the "-H" Holding Symbol and the issuance of a building permit for any new development of a lot, the following conditions must be satisfied:
 - (a) The City is satisfied that there is adequate servicing capacity (i.e. water, wastewater, natural gas, and electrical) for the proposed development.

(b) A Transportation Impact Study is completed that includes micro-simulation scoped to the satisfaction of the City.

(c) Interim permitted uses: Notwithstanding Subclauses (a) and (b), uses that are permitted by the URM4 Zone in accordance with the corresponding zone provisions.

10. Notwithstanding Section XX, where a lot is divided into more than one zone, the Zone boundary is treated as a lot line and each portion of the lot must be used in accordance with the provisions of the underlying Zone.

Definitions – The following definitions shall apply to lands, buildings or structures in the URM12-H Zone:

1. **Podium** means the base component of any **building** that is greater than 20 meters in **height** (excluding mechanical penthouses) and only includes the **first storey** through sixth **storeys** of such **building**.
2. **Tower** means any portion of any **building** that is greater than 20 metres in **height**, excluding a **podium**, below grade building components and mechanical penthouses.

Portion fronting on Wright Crescent (URM13-H)

Zoning Provision	<i>all permitted uses</i>
1. Maximum <i>height</i> (metres/storeys)	Lesser of 20.0 metres or 6 storeys, excluding the basement storey
2. Minimum streetwall height (metres)	12.0
3. Minimum <i>front setback</i> (metres)	3 metres
4. Minimum <i>rear setback</i> (metres)	10.0
5. Minimum <i>exterior setback</i> (metres)	3.0
6. Minimum <i>interior setback</i> (metres)	3.0

Zoning Provision	<i>all permitted uses</i>
7. Stepback where the building faces Wright Crescent – fifth and sixth storeys	2.0 metres from the exterior wall of the fourth storey
8. Minimum <i>landscaped open space</i>	30%
9. Maximum <i>lot coverage</i>	55%
10. Maximum <i>floor space index</i>	3.0

Additional Provisions for Intensification Area – Wright Crescent

In addition to the provisions of Table XX, *uses* must comply with the following provisions:

- 3.** Balconies are permitted above the second storey of a building façade, to a maximum depth of 1.5 metres.
- 4.** Balconies shall not be included in the calculation of maximum FSI.
- 5.** Parking is prohibited in the *front yard* and the *exterior side yard*.
- 6.** Mechanical penthouses and rooftop mechanical equipment
 - (a)** Notwithstanding Section XX, mechanical penthouses shall be permitted to exceed the maximum allowable building height by up to 3.5 metres.
 - (b)** Mechanical penthouses shall not exceed 10 percent of the roof area on which they are located.
 - (c)** Mechanical penthouses and other rooftop equipment shall be setback from the edge of the roof line a minimum distance equal to the height of the mechanical penthouse or other piece of rooftop mechanical equipment.
 - (d)** Notwithstanding subsection (c) above, enclosures dedicated only to stairs that are located at the end of a building shall be permitted within the required setback from the edge of a roof line.

7. Architectural appurtenances to support green roofs, other rooftop sustainability elements, or outdoor rooftop amenity spaces shall be permitted to exceed the maximum allowable building height by up to 3.5 metres.
8. Holding Symbol: Prior to the removal of any lot from the “-H” Holding Symbol and the issuance of a building permit for any new development of a lot, the following conditions must be satisfied:
 - (a) The City is satisfied that there is adequate servicing capacity (i.e. water, wastewater, natural gas, and electrical) for the proposed development.
 - (b) A Transportation Impact Study is completed that includes micro-simulation scoped to the satisfaction of the City.
 - (c) Interim permitted uses: Notwithstanding Subclauses (a) and (b), uses that are permitted by the URM4 Zone in accordance with the corresponding zone provisions.
9. Notwithstanding Section XX, where a lot is divided into more than one zone, the Zone boundary is treated as a lot line and each portion of the lot must be used in accordance with the provisions of the underlying Zone.

Section 13: Heritage Zones

Heritage Conservation District 3 (HCD3) [Sydenham HCD]

The use of any *lot* or *building* in the HCD 3 Zone must comply with the provisions of Table XX.

Table XX. – HCD3 Provisions

Zoning Provision	all permitted uses
1. Minimum <i>lot area</i> (square metres)	370 square metres
2. Minimum <i>lot frontage</i> (metres)	10
3. Maximum <i>height</i> (metres)	10.7
4. Minimum <i>front setback</i> (metres)	<p>a) if 2 adjacent <i>buildings</i>, the lesser of:</p> <ul style="list-style-type: none"> iii) the average of existing <i>front setbacks</i> of adjacent <i>buildings</i> or iv) 3.5 metres; <p>b) if 1 adjacent <i>building</i>, the lesser of:</p> <ul style="list-style-type: none"> iii) the average of 3.5 metres and existing <i>front setback</i> of adjacent <i>building</i>, or iv) 3.5 metres <p>c) if no adjacent <i>buildings</i>: 3.5 metres;</p> <p>d) where a <i>building</i> existed as of the date of the passing of this by-law, and the <i>front setback</i> is less than subsections a), b), or c), the minimum <i>front setback</i> is the existing setback.</p>
5. Minimum <i>exterior side yard setback</i> (metres)	<p>a) if 1 adjacent <i>building</i>, the lesser of:</p> <ul style="list-style-type: none"> iii) the average of 3.5 metres and existing <i>front setback</i> of adjacent <i>building</i>, or iv) 3.5 metres <p>b) if no adjacent <i>building</i>: 3.5 metres</p> <p>c) where a <i>building</i> existed as of the date of the passing of this by-law, and the <i>exterior setback</i> is less than a) or b), the minimum <i>exterior setback</i> is the existing setback</p>

Zoning Provision	<i>all permitted uses</i>
6. Minimum <i>interior side yard setback</i> (metres)	<p>a) <i>semi-detached house, rowhouse</i>:</p> <p style="padding-left: 40px;">i) 3.5 metres</p> <p style="padding-left: 40px;">ii) Where a common party wall is located along a lot line: 0 metre</p> <p>b) all other uses:</p> <p style="padding-left: 40px;">i) 1.2 metres where there are openings in the exterior wall directly adjacent to the <i>interior side lot line</i>;</p> <p style="padding-left: 40px;">ii) 0.6 metre where there are no openings in the exterior wall directly adjacent to the <i>interior side lot line</i>.</p>
7. Minimum <i>landscaped open space</i>	30%
8. Maximum number of <i>principal buildings per lot</i>	1
10. Maximum number of <i>principal dwelling units per lot</i>	6
9. Maximum <i>building depth</i>	18 metres from required minimum front setback. In no instance shall the rear wall of the principal building be closer than 7.5 metres to the rear lot line.

Additional Provisions for Lots Zoned HCD3

11.13.2. In addition to the provisions of Table XX, *uses* must comply with the following provisions:

- 1.** A sloping roof extending from a ridge line to the top of a perimeter wall may contain a dormer(s) provided that:
 - (a)** The front wall of the dormer(s) is setback at least 40.6 cm from the building's main wall;
 - (b)** The sidewalls of the dormer(s) are setback at least 106.7 cm from the roof at the end of the existing roof; and
 - (c)** The dormer(s) does not exceed 4.6m or one-half (1/2) of the main roof's length, whichever is shorter. Where a sloping roof has more than one

dormer, the combined length of all dormers shall not exceed 4.6m or one-half (1/2) of the main roof's length, whichever is shorter.

2. Notwithstanding the provisions of Section XX to the contrary, the minimum setback for accessory buildings or structures adjacent to Lily Lane shall be 2 metres.
3. Accessory buildings or structures adjacent to Lily Lane shall not be utilized as additional residential units.

Proposed Zoning Changes

The following zone changes are recommended to be adopted to reflect both existing and desired conditions for these areas. New proposed zones are noted in red.

The below highlighted properties outlined in red shall be changed from the E Zone to the proposed UR5 Zone (Union/Collingwood).



The below highlighted properties outlined in red shall be changed from the E Zone to the proposed UR5 Zone (Jenkins/Frontenac).

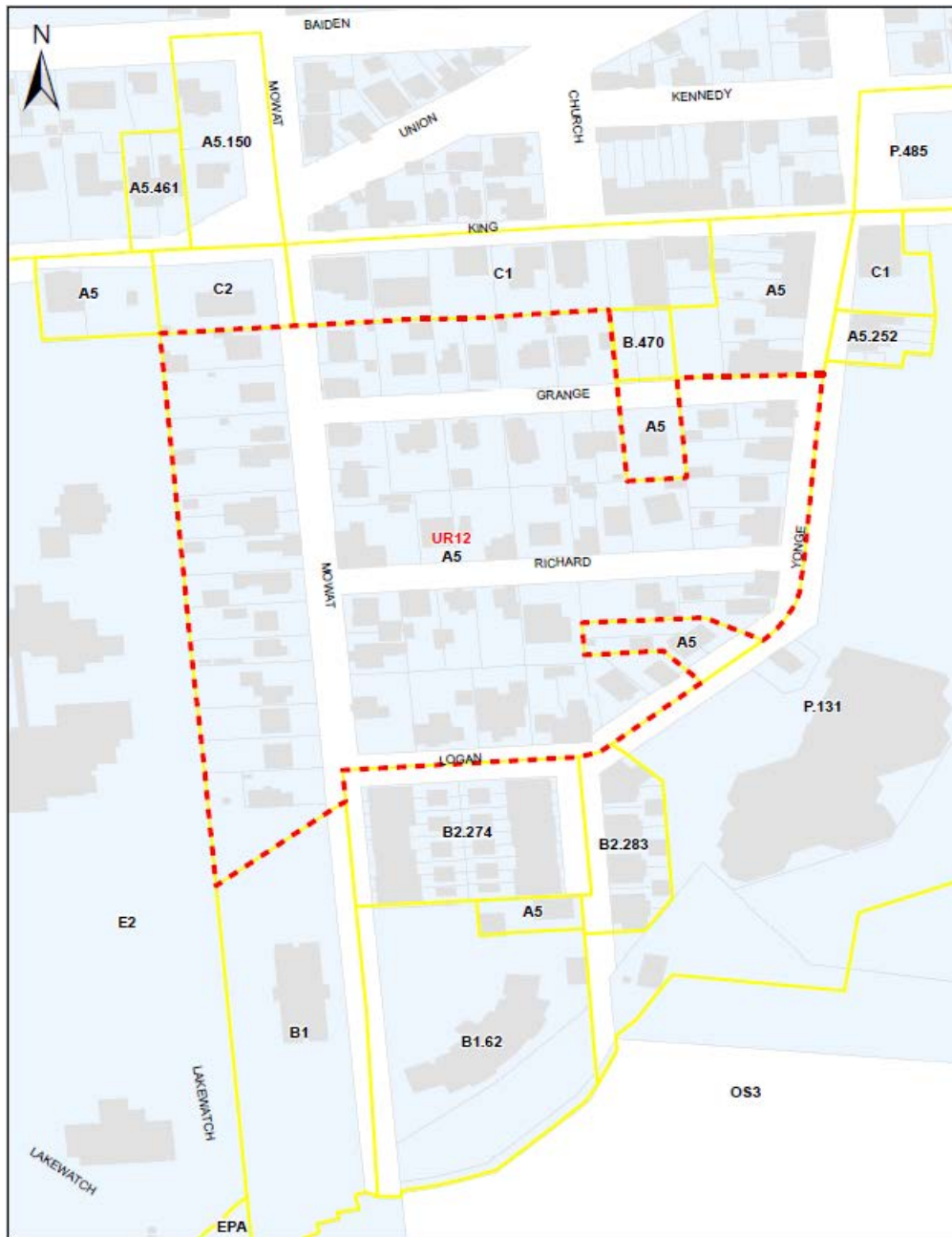


The below highlighted properties outlined in red, except the site-specific zones, shall be changed from the A5 Zone to the proposed UR12 Zone (Portsmouth Village).

a) North of King Street:



b) South of King Street – UR 12 Zone:



The below highlighted properties outlined in red, except the site-specific zones, shall be changed from the B3 Zone to the proposed URM7 Zone (Chatham/ Colborne area, west of Division St.)



The below highlighted properties, fronting on Bath and Sr. John A. MacDonald, outlined in red be changed to the proposed URM12-H Zone.

The below highlighted properties fronting on Wright Crescent outlined in red shall be changed to the proposed URM13-H Zone.



The zone categories below within the existing Zoning By-law 8499 are recommended to be updated as follows:

Existing 8499	New ZBL
B	URM3
B1	URM4
B2	URM5
B3	URM6

Appendix C: Official Plan Policy Recommendations

Sustainability through Secondary Plans & Evaluation Reports

2.1.3. In the preparation of secondary plans, and in the preparation of the evaluation reports for the Special Planning Areas and any Special Planning Areas that may be identified in the future the City will promote *sustainability* through:

- a. encouraging transit-supportive densities (~~a minimum of~~ 37.5 units per net hectare) and a mix of uses that foster *active transportation*;
- b. encouraging efficient development and land use patterns which accommodate an appropriate range and mix of uses to meet long-term needs and sustain the financial well-being of the City of Kingston and the Province for the long-term;
- c. planning road design that promotes the operation of transit, ready access to transit stops, facilitates snow clearing and maintenance, and access by emergency vehicles;
- d. designing and constructing *active transportation* pathways and linked routes for non-motorized vehicles;
- e. incorporating passive *renewable energy sources*;
- f. promoting *urban agriculture*;
- g. protecting and enhancing the City's *natural heritage system* and *cultural heritage resources*;
- h. promoting sustainable site proposals;
- i. protecting and acquiring key waterfront properties;
- j. promoting the City's program to clean up *brownfield sites*;
- k. encouraging the creation of spaces, facilities and services that can generate and sustain cultural vitality; and,
- l. encouraging *district energy facilities* in areas where higher density and higher intensity land uses with higher energy demands are concentrated.

(Amended by By-Law Number 2017-57, OPA Number 50)

Urban Boundary

- 2.2.4. The *Urban Boundary* shown by the dashed line on Schedule 2 has been established to recognize the substantially built up areas of the City where major sewer, water and transportation *infrastructure* has been planned. The land within the *Urban Boundary* will be the focus of growth and *development* in the City and contains sufficient land to accommodate the projected growth for a planning horizon of 2036. The Area Specific Phasing area within the *Urban Boundary* is subject to site-specific urban growth management policies. The Special Planning Area sites are also within the *Urban Boundary* and are now committed to a substantial land use but could accommodate future growth.

(Amended by By-Law Number 2017-57, OPA Number 50)

Housing Districts

- 2.2.5. Housing Districts are planned to remain stable in accordance with Section 2.6 of this Plan, but will continue to mature and adapt as the City evolves. Re-investment and upgrading shall encourage gentle or invisible density in the form of *Second Residential Units* and appropriate forms of ground-oriented and low-rise residential development ~~will be encouraged through minor infilling and minor *development*~~ (i.e., that which can integrate compatibility within the prevailing built form standards of height, density and amenity that are generally found in the neighbourhood). Housing Districts will be designated for residential uses of different types, but will also contain areas of open space, community facilities and commercial uses.

(Amended by By-Law Number 2017-57, OPA Number 50)

Business Districts

- 2.2.6. Business Districts are primarily intended to accommodate employment opportunities. These include General Industrial and Business Park Industrial designations, as well as the Waste Management Industrial designation and limited retail and service commercial uses that serve business activities. The Norman Rogers Airport is also recognized as being in a Business District under an Airport designation. Regional Commercial uses and some specialized quasi-commercial uses will be limited to the permitted uses for the specific designations, as described in Section 3. Standards in Business Districts will be sufficiently flexible to allow a ready response to new types of employment uses provided that:
- a. areas of interface with *sensitive uses* are addressed so that *compatible* development is achieved and there is no *adverse effect* on the *sensitive use* or to the proposed employment use(s);

November 1, 2019 -

Specific Policy Areas

- 2.3.4** Specific Policy Areas, identified in Schedule 13 to the Plan, are those areas which are largely developed and are experiencing fundamental change. Planning for such change may occur by way of a special area study (e.g., Williamsville Main Street Study), used to set expectations for guiding development and land use change.

(Added by By-Law Number 2017-57, OPA Number 50)

Future Planning Study Areas

- 2.3.5** The Future Planning Study Areas, identified in Schedule 13, may be added to from time to time to address local issues (e.g., demographic shift, increased post-secondary school enrolment, rural development, etc.) that may affect growth and development in specific area contexts.

(Added by By-Law Number 2017-57, OPA Number 50)

- 2.3.5.1** The delineation of the boundaries of any Future Planning Study Area will be considered at the outset of undertaking any area-specific planning study.

(Added by By-Law Number 2017-57, OPA Number 50)

- 2.3.6** In accordance with the Central Accommodation Review, the City has undertaken an intensification study of areas near to the campuses of Queen’s University and St. Lawrence College to identify locations that would be appropriate for larger scale, medium to high density, residential development. This study also looked at *infill* and *intensification* in stable residential neighbourhoods within the Central Kingston area. The findings of the Study have been incorporated into a new Planning Area 13, titled “Central Kingston Growth Areas” as shown on Schedule 13. The new Specific Policy Areas are subject to the requirements of this plan, including Specific Area Policies outlined in Section 10.G, as well as the implementing Zoning By-law and associated Urban Design Guidelines. ~~In accordance with the Central Accommodation Review, the City will undertake an *intensification* study of areas near to the campuses of Queen’s University and St. Lawrence College (Planning Area Number 13 on Schedule 13) to identify locations that would be appropriate for larger scale, medium or higher density, residential development. Once complete, the findings of the Study will be implemented through Official Plan amendments and the use of regulatory controls (e.g., pre-zoning), as appropriate. The process of undertaking the Study will include a comprehensive process of public engagement and opportunities for stakeholder input.~~

(Added by By-Law Number 2017-57, OPA Number 50)

Employment

- 2.3.7. The City will promote and protect *employment areas* and pursue increased levels of job creation in the commercial, institutional and industrial sectors in order to foster a diversified and vigorous economic base with a range of opportunities for its residents.

(Amended by By-Law Number 2017-57, OPA Number 50)

Cultural Heritage

- 2.3.8. *Cultural heritage resources* will continue to be valued and *conserved* as part of the City's defining character, quality of life, and as an economic resource that contributes to tourism in both the urban and rural portions of the City.

Arts and Culture

- 2.3.9. Kingston's vibrant *arts and culture* will continue to be valued and recognized for its role in promoting and sustaining cultural vitality. *Arts and culture* are central components of the City's Integrated Cultural Heritage and Cultural Tourism Strategy. Spaces, facilities, and services that can generate and sustain cultural vitality throughout the community will be encouraged.

(Added by By-Law Number 2017-57, OPA Number 50)

UNESCO World Heritage Designation

- 2.3.10. The Rideau Canal system and the associated fortifications, which include Fort Henry and the four Martello Towers of Fort Frederick, Murney, Shoal, and Cathcart, are designated as a World Heritage Site by the United Nations Educational, Scientific and Cultural Organization (UNESCO). It is the City's intention to protect and enhance this natural and cultural heritage asset and develop, in a sustainable way, the tourism potential which may arise from this inscription.

(Amended by By-Law Number 2017-57, OPA Number 50)

Transportation

- 2.3.11. In order to implement the Strategic Direction of the Kingston Transportation Master Plan, *active transportation* will be aggressively promoted with greater emphasis on pedestrians, cyclists and transit, and accessibility for all residents and visitors, particularly in the areas identified for higher density as Centres and Corridors, Secondary Plans and Specific Policy Areas.~~visitors.~~

(Amended by By-Law Number 2017-57, OPA Number 50)

Boundary in accordance with the directions of the Municipal Housing Strategy Locational Analysis Study (2012). The City supports and encourages the development of a range of unit types and sizes, including Second Residential Units, as per Section 3.3.11, to be dedicated to affordable housing within the Urban Boundary.

(Amended by By-Law Number 2017-57, OPA Number 50)

Accessibility

- 2.3.18.** Through the prevention and removal of barriers for persons with disabilities, and the application of *universal design principles*, the City supports and promotes opportunities for all people to access the City and make contributions as citizens. The application of *universal design principles* in *development* and renovation is promoted. The City also encourages owners of private properties with public access to do the same.

(Amended by By-Law Number 2017-57, OPA Number 50)

2.4 Phasing of Growth

The physical structure of the City of Kingston is shown on Schedule 2 City Structure. The *Urban Boundary* includes existing and planned service areas, Areas of Specific Phasing and Special Planning Areas. Almost all of the City's future population and employment growth is planned to occur within this boundary in a controlled and phased manner. Some areas outside of and adjacent to the *Urban Boundary* have partial services and have had commitments for growth in prior Official Plans. These areas may be brought into the *Urban Boundary* at a future time if an expansion of the *Urban Boundary* is justified through a *comprehensive review*. Studies, analyses and commitments will be necessary prior to approving additional municipal services and enabling *development* in Areas of Specific Phasing and Special Planning Areas.

Land in Rural Areas is intended for long term resource use for agriculture, mining and as the setting for existing Hamlets, estate and rural residences. A limited amount of additional residential growth is planned in Rural Areas.

The land uses within the *Urban Boundary* will generally be reviewed every five years. The City's *intensification* objectives have been based on population growth projections and the 2011-2013 Urban Residential Growth and Density Study Update, which indicates where residential *development* is both planned and anticipated to occur within the City of Kingston. Special Planning Areas have the potential to accommodate future growth and will be considered in the advancement of a long term servicing strategy for the City; the development of these lands, is largely dependent on their disposal to the private market by the federal government. The 2016 Pending and Committed Housing Report and the 2011-2013 Urban Residential Growth and Density Study Update demonstrate that the City of Kingston has sufficient land located within the *Urban Boundary* to accommodate residential and commercial growth to 2036 (i.e., 20 years).

Residential Density

- 2.4.3.** It is the intent of this Plan to achieve an increase in the City's net *urban residential densities* through promoting *intensification* and requiring minimum densities for residential *development*. It is also the intent of the City that intensification be achieved within Centres and Corridors, as well as in Secondary Plans and Specific Policy Areas, where permitted.

(Amended by By-Law Number 2017-57, OPA Number 50)

Minimum Residential Density

- 2.4.4.** New residential *development* and new secondary plans are subject to the following policies and minimum densities:
- a. for the existing built-up residential areas, a net *urban residential density* of 22 dwelling units per net hectare is established as the overall minimum density, except where specifically increased in subsections (b), (c), and (d) below;
 - b. for large-scale *developments* and greenfield areas, a minimum of 37.5 *residential units* per net hectare is established for new residential *development* in order to be transit supportive;
 - c. for mixed use building *developments* in existing and proposed Centres and Corridors, a minimum density of 75 *residential units* per net hectare is established as the target for new residential *development* in order to support *active transportation* and transit; and,
 - d. a moderate increase in density will be permitted adjacent to Centres and Corridors so as to accommodate a transition in density from areas intended to support high density residential to those supporting low and medium densities, provided the proposal demonstrates conformity to the policies of Section 2.6 and 2.7 of this Plan.

(Amended by By-Law Number 2017-57, OPA Number 50)

Intensification Targets

- 2.4.5.** The City has established the following minimum targets for *intensification* to occur within the *Urban Boundary*.
- a. It is the intent of the City that 40 percent (%) of new residential *development* occur through *intensification*.
 - b. It is the intent of the City that ten percent (10%) of new non-residential *development* occur through *intensification*.

November 1, 2019 -

General Residential Policies:

Permitted Uses

- 3.3.1. The predominant use of land in a Residential designation will be for various forms of housing. Community facilities are permitted in accordance with Section 3.2.

Neighbourhood Commercial

- 3.3.2. Where appropriate and *compatible*, small-scale convenience commercial uses are allowed by zoning within apartment buildings or on a site specific basis on a low or medium density residential site. Section 3.4.F provides detailed policies for neighbourhood commercial uses.

Zoning

- 3.3.3. The zoning by-law will establish standards for low, medium and high density areas, as well as standards for such matters as private open space, massing, height, setbacks, yards, *accessory uses*, and parking for vehicles and bicycles.

(Amended by By-Law Number 2017-57, OPA Number 50)

Green Building Design Features

- 3.3.4. New *development* is encouraged and expected to incorporate “green building features” as recommended in Section 2.1.4 of this Plan, and must comply with the policies of all other sections of this Plan.

(Amended by By-Law Number 2017-57, OPA Number 50)

Home Occupations

- 3.3.5. Home occupations are permitted subject to Section 3.1.7 of this Plan.

Existing Residential Areas Stable

- 3.3.6. Existing Housing Districts as shown on Schedule 2 are considered stable, unless otherwise identified by this Plan. Only minor changes in the predominant pattern of housing type, height or density, are permitted in accordance with Sections 2.6 and 2.7.

(Amended by By-Law Number 2017-57, OPA Number 50)

Infill

- 3.3.7. Within existing stable residential areas, applications for *infill* must be located and organized to ~~fit~~ be compatible with neighbouring properties,

November 1, 2019 -

provisions of the zoning by-law respecting the number, size and location of spaces;

- e. the size of any addition may be limited through zoning standards that address the maximum length of a building, maximum size of an addition, extent of attic conversions, or other matters as deemed appropriate by the City;
- f. the *amenity area* must be large enough to be useful to residents of all *residential units*;
- g. the privacy of adjoining residential properties will be assured by means of adequate screening, and any proposed addition will minimize impacts on overview or shadowing of adjacent residences;
- h. cash-in-lieu of parkland may be taken by the City for new *residential units* created in accordance with the provisions of the parkland conveyance by-law;
- i. provision of adequate full municipal services; and
- j. any other issues that the City requires must be satisfied to ensure that the proposed conversion will provide a safe, healthy and convenient living environment for all residents over the long term.

(Amended by By-Law Number 2013-41, OPA Number 19)

(Ministerial Modification, OPA Number 50)

Affordable Housing

3.3.10. The City's *affordable* housing initiatives are designed to support development of housing that is *affordable* for *low and moderate income households* and to help households transition out of *core housing need*. *Affordable* initiatives are designed to provide a full range of housing in terms of tenure, affordability, accessibility, and locations in different urban residential neighbourhoods, to increase choice for *low and moderate income households*. Such initiatives include:

- a. a minimum target that 25 percent of all new ~~housing~~ housing/units in the City be *affordable* to *low and moderate income households*.
- b. in accordance with Section 9.5.25 of this Plan, where an increase in height, density or both, is requested, the City will place a high priority on the provision of *affordable* housing where community benefits are requested. This *affordable* housing contribution may take the form of *affordable* housing construction on-site, the conveyance of land near the proposed *development* site, or cash-

in-lieu for the purpose of constructing *affordable* housing, with each site negotiated on an individual basis;

- c. a Municipal Non-Profit Housing Corporation or other not-for-profit housing associations that may acquire, assemble, rehabilitate or dispose of lands, buildings or structures for the purpose of providing *residential units*;
- d. the use of surplus lands owned by the municipality and other governmental agencies be considered for *affordable* housing as promoted in Section 9.9.4 of this Plan;
- e. promoting the *development* of not-for-profit housing projects by cooperative and not-for-profit housing organizations;
- f. the use of upper storey space in mixed use commercial development through such mechanisms as reduced parking requirements, financial incentives, or other programs;
- g. participation in programs of higher levels of government, and conformity with legislation of higher levels of government;
- h. other initiatives suggested through the City of Kingston 10-Year Municipal Housing and Homelessness Plan (2013), as may be amended from time to time;
- i. monitoring the development and availability of *affordable* housing, including by:
 - tracking the percentage and number of new *affordable* housing units, with reference to the 25 percent target and information provided as required in Section 9.12.2.c.;
 - tracking the number of *affordable* housing units that receive *affordable* housing capital funding;
 - tracking the number of building permits issued for second - residential units; and, -
 - other methods as may be developed;
- j. encouraging *intensification* and a mix-range of densities, building and unit types and sizes in new ~~communities~~ development as a way to promote affordability; and,
- k. promoting the use of *second residential units* as *affordable* housing, as per Section 3.3.11.

- a. preserving human scale in locations that are pedestrian-oriented and establishing an appropriate street wall height by controlling building heights through an implementing zoning by-law, requiring building step-backs, having entrances at street level, providing street furniture, and other means as appropriate;
- b. providing shade through natural or built means to provide comfortable outdoor environments and provide protection from ultraviolet radiation;
- c. protecting views to the water, City Hall and other *significant* buildings or landscapes;
- d. siting new buildings and structures in a manner that repeats and complements the siting and spacing of existing buildings, structures or landscaped areas in order to continue a pattern that is characteristic of surrounding neighbourhoods and heritage areas;
- e. the strategic use of building separation, landscaping and buffers to mitigate inharmonious elements of the built or natural environment, such as railways, service areas, or incompatible uses;
- f. designing public spaces or requiring the design of common spaces in private projects to have a clear sense of definition, and provide sufficient amenity, accessibility and security to encourage public use and linkage to other public areas;
- g. preserving and enhancing the context of special buildings, streetscapes, landscapes and sites that have been identified as having architectural, or cultural heritage value or interest; and,
- h. encouraging innovative methods to minimize the visual impact of utility features, either by containing utility features within streetscape elements or by screening them from view.

(Amended by By-Law Number 2017-57, OPA Number 50)

New Development

- 8.6. The City requires the design of new *development* to be visually *compatible* with surrounding neighbourhoods and areas of cultural heritage value or interest through its site plan control review, preparation of zoning standards, and urban design guidelines, as appropriate, that address the following:
 - a. siting, scale and design of new *development* in relation to the characteristics of the surrounding neighbourhood or the *significant cultural heritage resources* including, scale, massing, setbacks,

November 1, 2019 -

access, landscaped treatment, building materials, exterior design elements or features;

- b. protecting *natural heritage features and areas* and *cultural heritage landscapes* through the siting, design and review of new development in compliance with Section 2.6;
- c. promoting innovation in building design to create an interesting and varied built environment, to increase *sustainability* by improving energy efficiency, and to deliver barrier-free accessibility;
- d. achieving *compatibility* in land use and with a predominant architectural style, street pattern or site arrangement where that style or arrangement forms a valuable component of the existing neighbourhood or the cultural heritage value or interest of the identified area. Section 2.7 provides additional policy in this regard; and,
- e. encourage spaces, services and facilities that highlight *arts and culture* in a manner that generates and sustains cultural vitality.

(Amended by By-Law Number 2017-57, OPA Number 50)

Sign By-law

- 8.7. The City regulates signage in accordance with the consolidated sign by-law, so that signage complements the streetscape and conforms to any approved streetscape plan. Signage should be harmonious with the type and location of *development*, placed to serve its function, sized appropriately, and not overwhelm the streetscape, cause inappropriate light pollution that is not necessary in the circumstances, or dominate the skyline. It is the policy of this Plan to use signage in a manner that protects views to historic sites, *significant* landmarks or vistas of Lake Ontario or other *natural heritage features* or *cultural heritage landscapes*.

(Amended by By-Law Number 2017-57, OPA Number 50)

Protected Views

- 8.8. Protected views identified on Schedule 9 on streets that terminate at the water must be preserved by:
- a. restricting or not allowing *development* of buildings and structures that would interrupt sightlines;
 - b. requiring that the siting, massing and design of buildings and structures in areas adjacent to protected views maintain the views;

10G Central Kingston Intensification Area

The Central Kingston Intensification Area, has been identified to indicate areas that are appropriate for higher density uses (i.e. mid-rise to tall buildings) in Central Kingston. The intent of these areas is both to recognize and plan for intensification to support the City's anticipated growth and sustainability objectives, as well as relieving the development pressure on stable residential areas and directing growth to appropriate locations within the residential areas of Central Kingston in the near and long term.

Goal:

To direct and guide proposed mid-rise to tall residential intensification within the Central Kingston residential areas to those sites which have been identified for this purpose.

10G.1 Objectives

The guiding principles for these areas are to encourage higher densities in appropriate, concentrated areas, and encourage compatible forms of development and appropriate transition. To that effect the following policies apply.

10G.2 General Intensification Area Policies

10G.2.1. Proposed *developments* are subject to site plan control review and consideration of the urban design principles as outlined in Section 8 of this Plan.

10G.2.2. Every reasonable effort will be made to ensure that any proposed *development* is *compatible* with existing adjacent residential areas.

10G.3 Permitted Uses, Densities and Heights

10G.3.1. The general uses contemplated within the Intensification Areas include:

- a. the predominant use of land and buildings being for residential purposes; and,
- b. mixed-uses which are complementary to and serve the principal residential uses such as ground-oriented commercial, or compatible work spaces are also permitted in the Johnson/Brock Street Area as identified in this Plan.

Home Occupations

10G.3.2. Home Occupations are permitted in accordance with Section 3.1.7 of this Plan.

10G.3.3. Home occupations may be further regulated in the Zoning By-law.

Johnson/Portsmouth Area

10G.3.4. Any form of residential housing which conforms to the *development*, density and building height policies outlined below is permitted.

10G.3.5. The overall density of *development* for Johnson/Portsmouth Area is intended to reach a minimum target of 100 dwelling units per net hectare of land.

10G.3.6. The maximum building height in this areas is four storeys. Variations in building height that are sensitive to existing and proposed housing forms on adjoining lands is encouraged.

10G.3.7. To avoid excessively long blocks that are not conducive to pedestrian circulation and to increase pedestrian permeability and connectivity in this area, a mid-block connection shall be introduced between Portsmouth Avenue and Woodstone Crescent. This mid-block connection should ideally be aligned with either the St. Lawrence College entrance or Foster Street. Alternatively a green amenity space/parkette, at mid-block, can also serve as a connector.

Johnson/Brock Area

10G.3.8. Any form of medium to high density residential housing which conforms to the *development*, density and building height policies outlined below is permitted.

10G.3.9. The density of *development* for Johnson/Brock Area is intended to reach a target of 130 dwelling units per net hectare of land.

10G.3.10. The minimum building height is four storeys and maximum building height is six storeys, where adequate transition can be achieved to adjacent lower-density residential neighbours.

10G.3.11. Buildings must be oriented to the street in order to create a prominent building presence along the street and in a manner that is *compatible* with adjacent *development*.

10G.3.12. Mixed-use is permitted in the Johnson/Brock Area to support the primary residential uses. Commercial mixed-use shall provide some of the convenience service and shopping needs of neighbourhood residents,

Kingston Official Plan

including convenience stores, post offices, laundromats and dry cleaner facilities, take-out restaurants, day care centres, churches or other similar uses.

10G.3.13. Buildings within the Mixed-Use area are to be oriented towards the street.

10G.3.14. It is Council's intent to encourage:

- a. consistent building facades along streets;
- b. transitioning of built form massing to support compatibility with existing residential neighbourhoods;
- c. locating the majority of parking below grade or at-grade at the rear of buildings;
- d. a public streetscape between the front of buildings and the street curb for a safe, convenient, attractive, and barrier-free pedestrian area; and,
- e. building and site designs that complement and contribute to a safe and desirable neighbourhood character.

10G.3.15. The Mixed-Use area will be served by public transit and provide safe and convenient access for all modes of *active transportation*.

Wright Crescent/Bath/Sir John A. -MacDonald Area

10G.3.16. Any form of medium to high density residential housing which conforms to the *development*, density and building height policies outlined below is permitted.

10G.3.17. The density of *development* that fronts on Bath/Sir John A. MacDonald is intended to range from 230-300 dwelling units per net hectare of land. The density of *development* fronting on Wright Crescent area is intended to range from 100-150 dwelling units per net hectare of land.

10G.3.18. The maximum podium height is six storeys and maximum tower height is twelve storeys (from finished grade) on Sir John A. MacDonald Boulevard and Bath Road. The minimum building height shall be four storeys and maximum building height shall be six storeys on Wright Crescent, where adequate transition can be achieved to adjacent lower-density residential neighbours and urban design guidelines are applied.

10G.3.19. Buildings must be oriented to the street in order to create a prominent building presence along the street and in a manner that is *compatible* with adjacent *development*.

Overall Densities

10G.3.20. An overall density of *development*, sufficient to foster a healthy and safe neighbourhood environment in which a wide range of services, amenities and employment opportunities can be provided in an efficient and financially-sustainable manner, is encouraged.

10G.3.21. Varying densities of *development*, calculated on a net area basis, will be distributed throughout the neighbourhood to ensure that a high proportion of residents will live within a short walking distance of local facilities and services.

Multi-unit Buildings

10G.3.22. Buildings containing three *residential units* or more should be oriented to the street wherever possible in order to create a prominent building presence along the street and in a manner which is *compatible* with adjacent *development*.

Signage

10G.3.23. Advertising and associated signs related to non-residential uses must be designed and situated so as to be *compatible* with adjoining residential uses.

10G.3.24. Open storage of goods and materials is not permitted in residential areas.

10G.4 Design Principles

The following guiding principles apply to all mid-rise to tall development within the Central Kingston Intensification Areas:

10G.4.1. Areas identified to receive mid-rise and tall development *intensification* shall be those which:

- a. Are supported by existing active transportation and/or transit-infrastructure;
- b. Are of a lot or block size and width that may accommodate such buildings which will generally require the consolidation of lots to meet lot size and setback requirements to accommodate taller buildings.
- c. Are well connected to everyday resident needs and services and amenities;

Kingston Official Plan

- d. Have adequate servicing to accommodate the proposed growth; and,
- e. Will contribute to the City's goals of sustainability through lower infrastructure costs, lower carbon footprints and better support for public health by making efficient use of existing servicing and infrastructure capacity and resources.

10G.4.2. Proposed development shall be compatible and provide appropriate land use and built form transitions to existing uses and neighbouring properties, within the context of planned growth and existing residential areas to remain.

- a. The City at its discretion may request an Urban Design Study for intensification development proposals to demonstrate that Urban Design Guidelines have been appropriately considered, especially, but not limited to, where multiple properties are involved.

10G.4.3. Residential areas must be designed to allow for convenient pedestrian movement incorporating universal design standards.

10G.4.4. Intensification and infill development shall be appropriately designed, be complimentary and harmoniously co-exist with the physical character of adjacent neighbourhoods, including Kingston's existing cultural heritage features, where applicable.

10G.4.5. Integrate a mix of amenities and land uses – and optimize areas that currently have this integration – to promote integration, inclusion and healthy living, by:

- a. Creating well-connected and walkable environments;
- b. Providing a range of housing opportunities and choices, inclusive of dwelling type, tenure and affordability;
- c. Incorporating “street greening” and providing public spaces, where possible; and,
- d. Incorporating mixed-use developments on intensification sites, where appropriate.

10G.4.6. Optimize the use of existing and new infrastructure to support growth in a compact, efficient form through:

- a. Ensuring there's is existing or planned capacity for servicing development sites; and,

- b. Give higher priority to development proximate to transit and cycling routes, and development is required to incorporate pedestrian access to amenities and community services.
- c. The implementing Zoning By-law may include a Holding provision to:
 - a. -Ensure the availability of servicing; and,
 - b. -For the purposes of requiring a Transportation Impact Study.

Appendix D: Urban Design Guidelines

Central Kingston Neighbourhoods

Urban Design Guidelines

July 2021



BrookMcIlroy/

Submitted to:
Corporation of the City of Kingston
216 Ontario Street,
Kingston, Ontario, K7L 2Z3

Table of Contents

1.0	Introduction	viii
1.1	Purpose of the Guidelines	1
1.2	Central Kingston Neighbourhood Area	2
1.3	Central Kingston Neighbourhood Area	2
1.3.1	Neighbourhood Groupings	4
1.4	Neighbourhood Evolution	5
1.5	Implementation with other Documents	6
1.5.1	Official Plan (OP)	6
1.5.2	Zoning By-law (ZBL)	6
1.6	How to use these Guidelines	7
2.0	Neighbourhood Character Guidelines	8
2.1	Design Principles	9
2.1.1	Elements of Compatibility	9
2.2	Neighbourhood Guidelines	11
2.2.1	General Urban Design Guidelines	11
2.2.2	General Heritage Considerations	12
2.2.3	Neighbourhood Group One	14
2.2.4	Neighbourhood Group Two	17
2.2.5	Neighbourhood Group Three	19
2.2.6	Neighbourhood Group Four	22

Table of Contents

2.2.7	Neighbourhood Group Five	24
2.2.8	Neighbourhood Group Six	26
2.3	Additional Residential Units	28
3.0	Intensification Area & Mid-Rise to Tall Development Guidelines	30
3.1	Intensification Areas	31
3.2	Public Realm Guidelines	35
3.2.1	Street & Built Form Relationship in Intensification Areas	35
3.3	Private Realm Guidelines	42
3.3.1	Building Siting and Orientation	42
3.3.2	Townhouses and Stacked Townhouses	44
3.3.3	Multi-unit Buildings	45
3.3.4	Mixed-use Buildings	48
3.3.5	Access and Parking	49
3.3.7	Utilities	55
3.3.6	Servicing and Loading	55
3.4	Transitioning Elements	57
3.5	Intensification Areas - Area Specific Guidelines	62
3.5.1	Johnson and Brock Expansion Area	62
3.5.2	Portsmouth and Johnson Corridors	65
3.5.3	Sir John A. Macdonald & Bath Road	68

Table of Contents

4.0 Glossary of Terms

70

Figures

Section 1.0

Figure 1-1: Study Area	3
Figure 1-2: Central Kingston Neighbourhood Area Map, identifying six groups of neighbourhoods. The darker portions identified in each of the groups represent the residential areas of each neighbourhood	4
Figure 1-3: Example of a low-rise apartment building development in a stable area	5
Figure 2-1: Elements of Compatibility	10

Figures

Section 2.0

Figure 2-2: Study Area Neighbourhoods	11
Figure 2-3: Neighbourhood Group One	14
Figure 2-4: Typical single detached dwellings in Group 1	15
Figure 2-5: Typical neighbourhood streetscape in Group 1	15
Figure 2-6: Typical apartment building on Bath Road in Hillendale	16
Figure 2-7: Neighbourhood Group Two	17
Figure 2-8: Typical low-rise apartment building in Group 2	17
Figure 2-9: Typical single detached house in Group 2	18
Figure 2-10: Typical single detached house in Group 2	18
Figure 2-11: Neighbourhood Group Three	19
Figure 2-12: Newer development with front yard parking and garages in Group 3	21
Figure 2-14: A mix of building setbacks in Portsmouth	21
Figure 2-13: A mix of street trees and a large front yard setback in Group 3	21
Figure 2-15: Street-oriented heritage buildings at the sidewalk in Portsmouth	21
Figure 2-16: Neighbourhood Group Four	22
Figure 2-17: Newer development project with a rhythm of front doors, porches and roof dormers in Group 4	23
Figure 2-18: Larger semi-detached house with heritage character in Group 4	23

Figures

Figure 2-19: Neighbourhood Group Five	24
Figure 2-20: Typical single detached one storey house in Group 5	25
Figure 2-21: Typical single detached house with apartment building in the background in Group 5	25
Figure 2-22: Neighbourhood Group Six	26
Figure 2-23: Six storey apartment buildings with parking at side in Group 6	27
Figure 3-1: Proposed Intensification Sites	32
Figure 3-2: Proposed Intensification Sites in Johnson and Brock Area	33
Figure 3-4: Proposed Intensification Sites in Sir John A. MacDonald & Bath Road Area	33
Figure 3-3: Proposed Intensification Sites in Johnson and Portsmouth Area	33

Section 3.0

Figure 3-5: Arterial Road Concept: Sir John A Macdonald (right of way) width varies, desired 36.6m as per Official Plan) and Bath Road (desired ROW width 42.0m per Official Plan)	36
Figure 3-6: Potential Mid-Block Connections	37
Figure 3-7: Examples of Mid-Block Connections	37
Figure 3-8: Potential Mid Block Connection	38
Figure 3-9: Collector Road Concept: Portsmouth Avenue and Johnson Street at Portsmouth Avenue	39
Figure 3-10: Collector Road Concept: Portsmouth Avenue and Johnson Street at Portsmouth Avenue (Maximum Permitted Building Heights Depicted)	40

Figures

Figure 3-11: Building with setbacks along the streetfacing wall and defined private area	42
Figure 3-12: Variation between units should be incorporated while reinforcing visually unifying characteristics	44
Figure 3-13: Corner building addressing both streets	46
Figure 3-14: Townhome development with defined front yards and trees	47
Figure 3-15: Mixed-use buildings oriented for pedestrian use	48
Figure 3-16: Example of layby parking and planting bump-outs to create on street parking spaces	49
Figure 3-17: Street lighting can enhance the public realm and facilitate wayfinding	52
Figure 3-18: Moveable street furniture in the public/private interface	52
Figure 3-19: Outdoor amenity space with street furnishings	53
Figure 3-20: Built form transition through lower massing form	58
Figure 3-21: Built form transition using separation and landscaping	58
Figure 3-22: Built form transition through stepping back transition	60
Figure 3-23: Built form transition using building typology (townhomes)	60
Figure 3-24: Proposed Intensification Sites in the Johnson and Brock Area	62
Figure 3-25: Example of potential development forms for Johnson Street and Brock Street	63
Figure 3-26: Taller buildings may be permitted opposite parks as they have a lower visual impact adjacent to an open space on the opposing street side	64
Figure 3-27: Proposed Intensification Sites in Johnson and Portsmouth Area	65
Figure 3-28: Examples of townhouse development blocks for Portsmouth Avenue	66

Figures

Figure 3-29: Proposed Intensification Sites in Sir John A. MacDonald & Bath Road Area	68
Figure 3-30: Example of potential development forms for Sir John A Macdonald and Bath Road	69



1.0 Introduction

The Central Kingston Neighbourhood Urban Design Guidelines intend to ensure that new development is generally compatible (while considering the many public interest goals of the City), fits harmoniously with the existing built form fabric, supports an attractive and safe pedestrian realm and modes of transportation, is environmentally sustainable, and promotes the general urban design objectives of the City of Kingston.

1.1 Purpose of the Guidelines

These Guidelines intend to facilitate a long-term vision for development in both the established but still evolving residential areas, and the identified intensification areas or street corridors, in Central Kingston. These guidelines provide approaches to ensure that built form proposed in these study areas is sensitive to and generally compatible with the built form fabric in Kingston, while also providing guidance for more strategic, intensive residential use to accommodate future growth in the central residential neighbourhoods of the City, in keeping with the City's larger goals and priorities.

This does not mean that development is expected to emulate or even be substantially similar to the built form found in these residential neighbourhoods, as diversity can still represent general compatibility. Rather, it means that their form, massing, and materiality can positively coexist within that context. This

approach supports results that generally reflect a sensitivity to the mature neighbourhood physical character where feasible and strategic, while ensuring that important City priorities are achieved with respect to:

- sustainability, affordability and equity;
- public and private realm;
- accommodating growth through intensification; and,
- the intent of the Official Plan.

1.2 Central Kingston Neighbourhood Area

During the development of the guidelines and in consultation with City staff and the project working group, definitions of success were developed with respect to the design guidelines. Consideration was given with respect to the City’s “definitions of success”, which in the case of these guidelines, includes consideration of strategically located intensification development. It also includes support for and ensuring that the guidelines are easily understandable and can be implemented with respect to built form changes over time.

The following four “definitions of success” were identified and utilized:

1. Respect for the existing neighbourhoods and their built form character while also achieving other City objectives including climate action, directing growth and intensification, support for housing affordability and social equity, and meeting other concurrent policy objectives where applicable through urban design guidelines;
2. Respect for and reflect the new needs and aspirations that have arisen in the City, including the intent of the Official Plan and current Council direction;
3. A need for clear and understandable guideline objectives and approaches that are easy to implement by avoiding unnecessary complexity; and,
4. An approach that allows many/most individual projects to be viable under reasonable assumptions, with enough projects "green lit" (i.e. allowing development to proceed easily) to address strategic smart growth goals particularly in the identified intensification areas.

1.3 Central Kingston Neighbourhood Area

These guidelines shall apply to the Central Kingston Neighbourhood Area, which includes the residential areas of Central Kingston except the residential areas located within the boundaries of the proposed North King’s Town Secondary Plan and the Kingston Provincial Campus Secondary Plan. Areas of mixed-use including the Downtown and Harbour Area and the Princess Street Corridor (including Williamsville Main Street) are also excluded from the Central Kingston Neighbourhood Area. A map showing the specific extent of the area is included in

Figure 1-1.

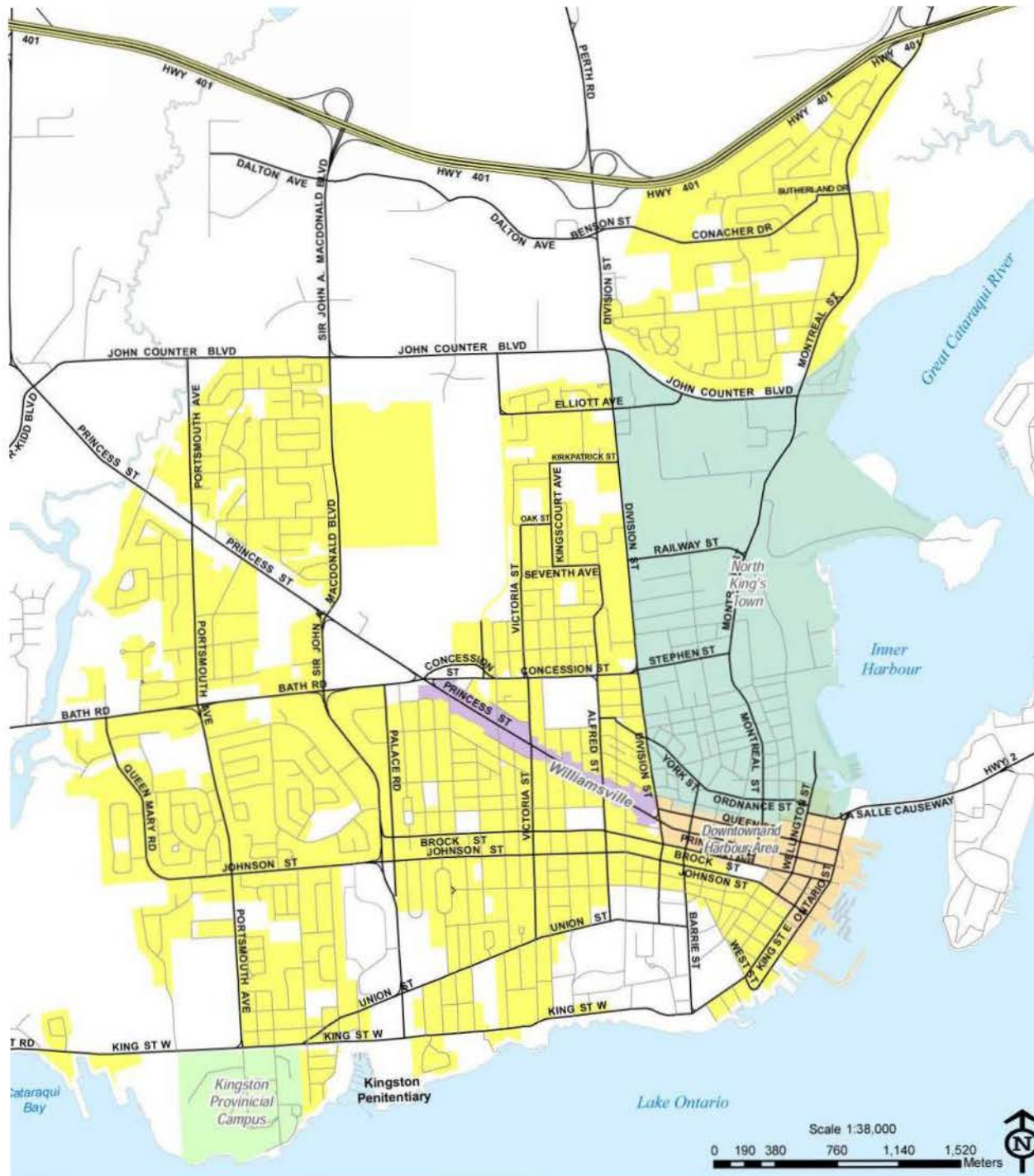


Figure 1-1: Study Area

 PLANNING, BUILDING &
LICENSING SERVICES

**CENTRAL KINGSTON
GROWTH STRATEGY**

Legend

-  Study Area
-  North King's Town Secondary Plan (proposed)
-  Kingston Provincial Campus Secondary Plan
-  Downtown and Harbour Specific Policy Area
-  Williamsville Main Street Specific Policy Area

1.3.1 Neighbourhood Groupings

Based on the neighbourhood boundaries defined by Statistics Canada’s dissemination areas, the Central Kingston Neighbourhood Area covers portions of 16 neighbourhoods, as outlined in **Figure 1-2** and as listed below. These neighbourhoods were divided into six overall groups, based on their geographic location, and similarities between neighbourhoods.

Group 1

Hillendale, Grenville Park, Strathcona Park, Alcan

Group 2

Polson Park, Calvin Park

Group 3

Fairway Hills, Portsmouth

Group 4

Sydenham, Queens, Alwington, Sunnyside

Group 5

Kingscourt, Williamsville

Group 6

Rideau Heights, Markers Acres

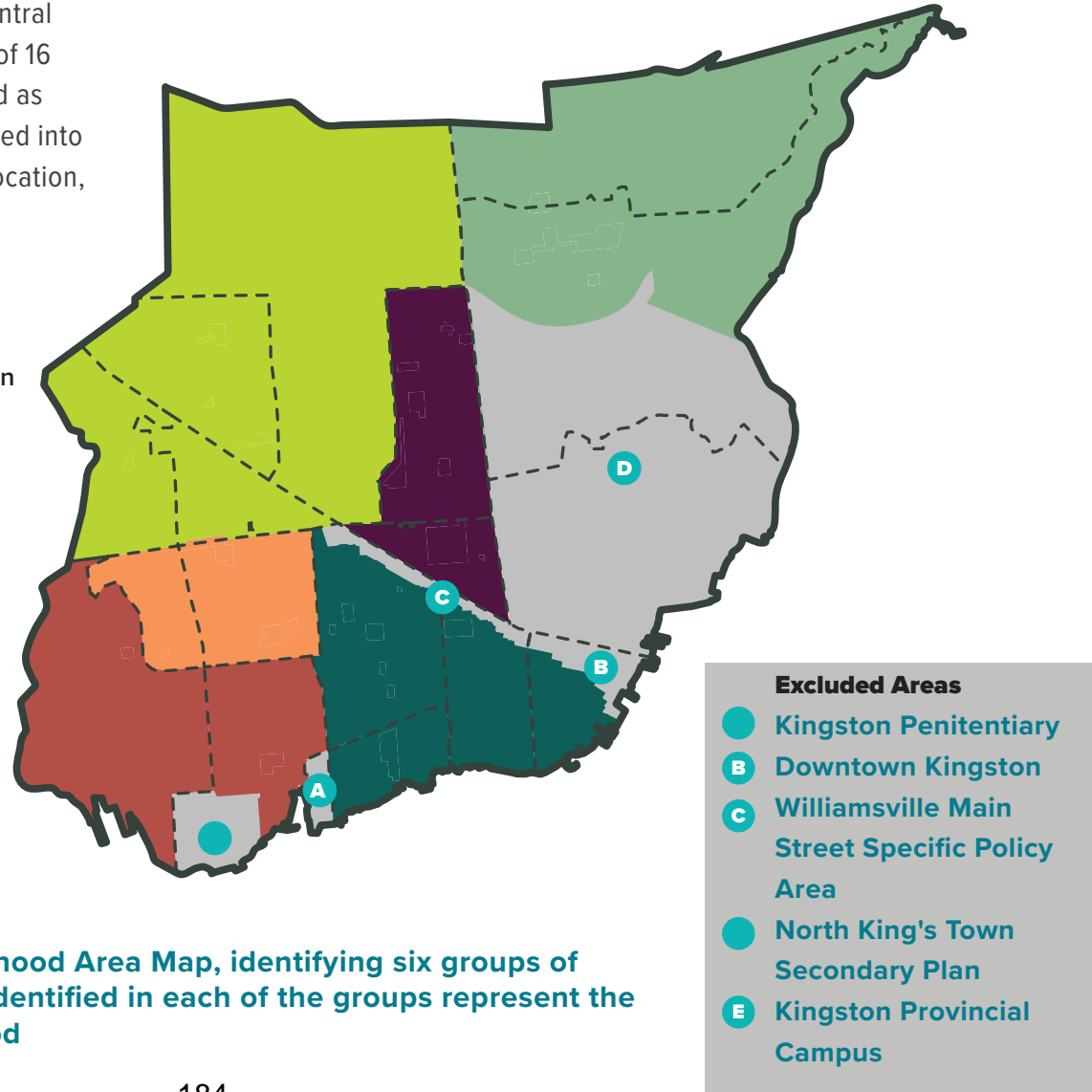


Figure 1-2: Central Kingston Neighbourhood Area Map, identifying six groups of neighbourhoods. The darker portions identified in each of the groups represent the residential areas of each neighbourhood



Figure 1-3: Example of a low-rise apartment building development in a stable area

1.4 Neighbourhood Evolution

The need to manage increasing growth pressures within established neighbourhood areas is important for the City of Kingston. Achieving sustainable and contextually-appropriate growth and development is key to the success for ensuring that mature neighbourhoods in the City of Kingston grow in an attractive and sustainable manner. In order to meet these growth pressures appropriate forms of *infill* and *intensification* need to be defined.

Infill is where new residential dwellings are created within an existing neighbourhood, typically on underutilized or vacant lots. For example, infill development may include a new house on a previously vacant lot, a large addition to accommodate a new unit, or a replacement building. Infill may also introduce "gentle densification" through more dense low-rise development; this may include the creation of new, additional dwelling units within existing buildings, a new house in a rear severed lot or accessed from a lane, and low rise multi-units (townhouses, duplexes, triplexes, quadplexes). In gentle densification infill, adverse impacts to the surrounding context and neighbourhood are mitigated and the associated built form, landscaping and streetscape relationship should be considered with respect to its surrounding context.

Intensification is where an existing area or lot is proposed for redevelopment at a higher density than currently present,

supporting more efficient use of urban infrastructure, greater walkability, and a concentration of services and amenities in areas of higher density development. Intensification may be achieved through infill developments, the re-use of brownfield sites, or the expansion or conversion of existing buildings.

1.5 Implementation with other Documents

These guidelines are to be used in conjunction with existing documents in the City of Kingston, including the Official Plan (OP), and any applicable Secondary Plans. Where there is a conflict between the guideline requirements, whichever has the higher standard shall prevail.

These guidelines are intended to support the goals and objectives of the City of Kingston Official Plan and Zoning By-law, and add additional considerations for development in respect of urban design goals and objectives, as well as neighbourhood-specific considerations.

1.5.1 Official Plan (OP)

Section 8 of the Official Plan establishes the goals and policies of urban design throughout all areas of the City. The goal of the Official Plan is to provide a framework for the provision and maintenance of a safe, efficient, accessible, and harmonious environment which recognizes, values and supports the specific aspects of the built and natural environment that contribute to

an area's sense of place and significance to the community. Per Section 8.1, Urban Design Guidelines are used to:

- Clarify the strategic direction and design objectives of the Official Plan;
- Complement and enhance any design considerations in development applications;
- Assist in the preparation of any future secondary plan, community improvement plan, or other relevant planning documents; and,
- Assist the City in evaluating development proposals.

Sections 8.2 and 8.3 of the Official Plan establish guiding principles for the development of new communities and the development of residential lots.

1.5.2 Zoning By-law (ZBL)

The Zoning By-law regulates how land may be used, where buildings and other structures can be located, and the types of buildings that are permitted and how they may be used, whereas these design guidelines provide a general urban design framework and objectives with respect to built form siting, orientation, and relationship of proposed developments.

1.6 How to use these Guidelines

These Guidelines are organized into several different areas:

Section 1.0 is an **introduction** to these Guidelines with details on how to use them.



Section 2.0 details the **Neighbourhood Character Guidelines** and how these apply to the stable areas of Central Kingston. These areas are subdivided into neighbourhood groupings which serve to identify characteristics that should be carried into future developments, as well as heritage elements to be preserved and/or referenced in new design and development.



Section 3.0 contains the **Intensification Area Corridors and Mid-Rise to Tall Development Guidelines**. These guidelines apply to mid-rise to tall development that occurs in the Central Kingston Neighbourhood Area. The guidelines are organized into General Public Realm (3.2) and Private Realm (3.2) guidelines. The section on Transitioning Elements (3.4), provides measures to create compatible new development which is contextually appropriate to its surroundings. Individual Intensification Areas (3.5) provides area-specific guidelines. These



guidelines should be used in conjunction with the City's Design By Density, which provides policies for the design of mid-rise and tall buildings

Section 4.0 provides an outline and framework with respect to **implementing** these guidelines and the urban design review process that can be utilized by the City to ensure the objectives of the guidelines are met.



Section 5.0 includes a **glossary** of common elements and terms associated with urban design guidelines, and their relevance to neighbourhood character.



These guidelines are arranged from general to specific, and should be read in that order to understand the overall intent of the guidelines before getting into the detailed recommendations and requirements.



2.0 Neighbourhood Character Guidelines

The Neighbourhood Character Guidelines are intended to foster compatibility with the existing character of the neighbourhood, while still allowing for flexibility and adaptability to allow new development and infill to progress.

The following guidelines are intended to guide contextual growth while preserving key character elements of Kingston’s residential neighbourhoods. This section provides neighbourhood-specific design guidelines by each neighbourhood group, as shown in **Figure 1-2**.

2.1 Design Principles

The following guiding principles apply to the stable areas and mature neighbourhoods of Central Kingston:

- a. **Fostering compatibility and adaptability**, by carrying forward consistent and/or complementary lot configurations and types of dwellings based on the currently prevalent dwelling types and lot configurations

The City of Kingston Official Plan defines Compatible (or Compatibility) as,

“The ability of various land uses, buildings, sites, or urban design treatments to co-exist with one another in a manner that will not have an undue physical or functional adverse effect on, existing or proposed development in the area, or pose an unacceptable risk to environmental or human health.”

within the neighbourhoods. It also includes introducing new development that can harmoniously coexist and be complimentary to their growth.

- b. **Maintain and complement the character of the neighbourhood**, by distilling and incorporating the various elements of neighbourhood character identified through public consultation events, neighbourhood walks and background research.

2.1.1 Elements of Compatibility

Each of these neighbourhood groups have their own character based on patterns of site and building design elements. Understanding how these elements currently exist within each neighbourhood and neighbourhood group is important to preserving the character of these areas.

To understand these elements of compatibility, the Project Team assessed each of these neighbourhoods based on a set of elements that speak to compatibility within the Phase 1 Background Report. These elements of compatibility are outlined below, and key elements are demonstrated visually in **Figure 2-1**, following the description of elements below. These elements can be considered in two categories, dealing with **(1) scale and proportionality** and **(2) site organization**

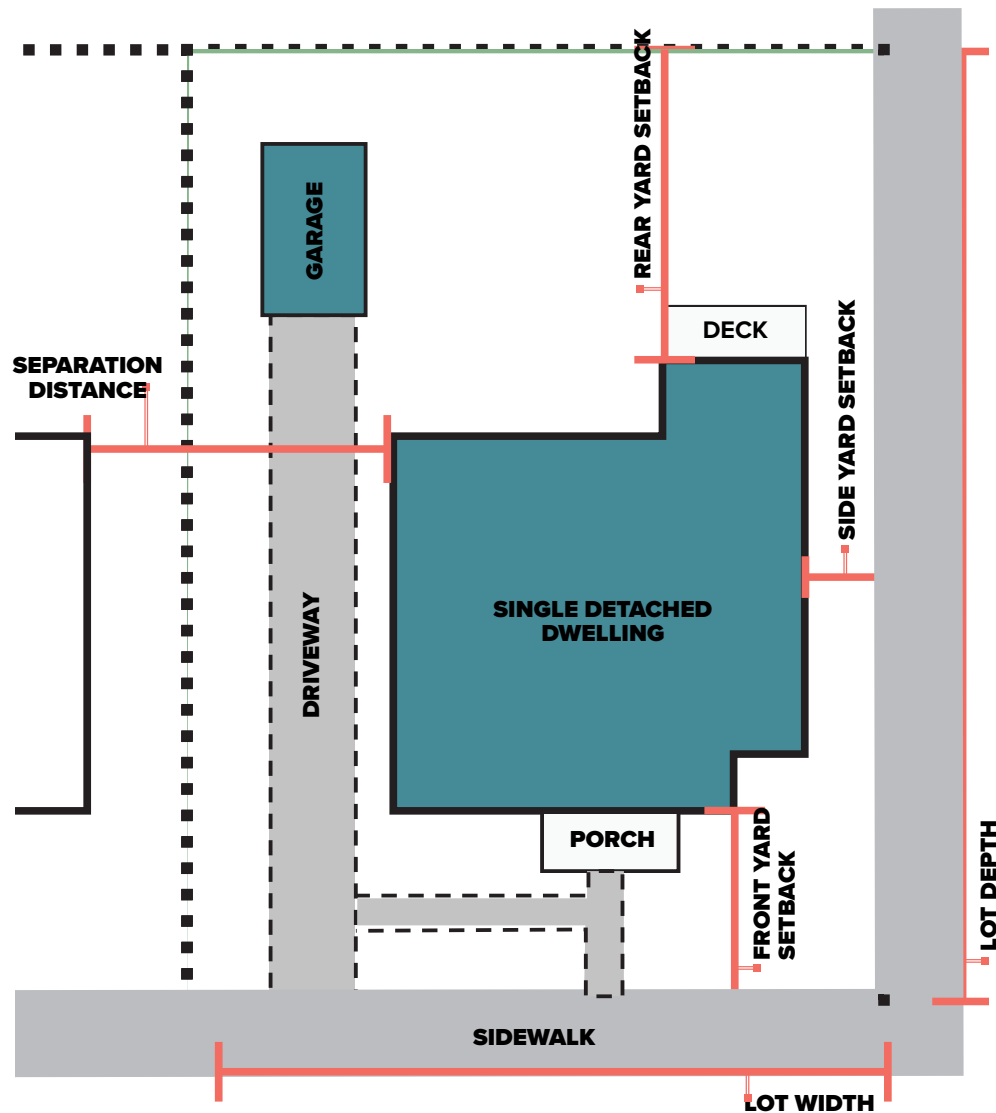


Figure 2-1: Elements of Compatibility

and building design. The former refers to the quality of corresponding in size and the lot to building relationship, while the latter addresses various site and building design elements.

The following neighbourhood group guidelines provide guidance with respect to the elements of compatibility:

- a. Transition is required between taller built form to the low-rise neighbourhoods as new development or redevelopment occurs, primarily through separation distances and building setbacks. For additional details on required Transitioning Elements, refer to Section 3.4.
- b. Consideration must be had for how buildings address the street, i.e. setbacks and landscaping.
- c. Mature trees should be preserved and in neighbourhoods with treed front lawns, new development should include tree planting as suitable to the surrounding context.
- d. Consistent separation distances, front yard setbacks, location and width of sidewalks, location and size of driveway and garage all influence the character of a street or neighbourhood. New development must be aware of and compatible with that character, and may incorporate the identified elements of compatibility, where appropriate and as outlined in the following sections.

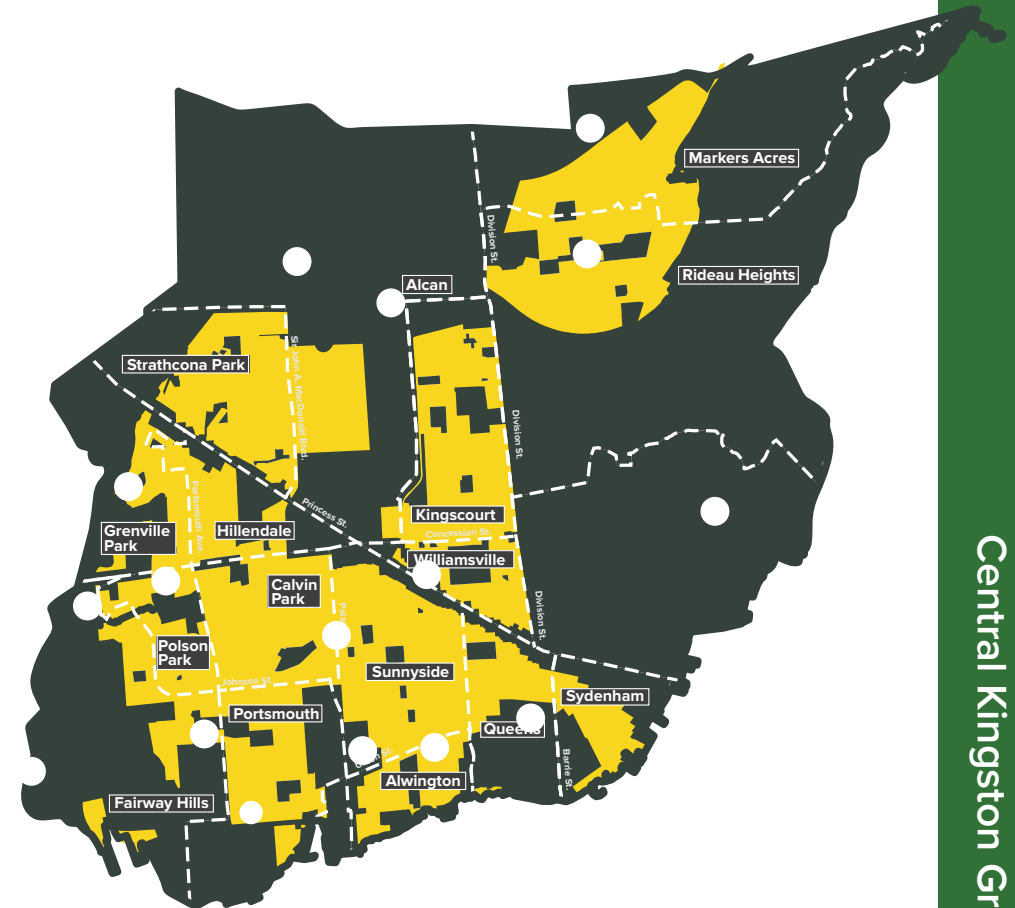
2.2 Neighbourhood Guidelines

The following general guidelines are intended to consider contextual growth while preserving the character of Kingston’s stable residential neighbourhoods. For Intensification Area guidelines, refer to Section 3.0 of this report. In addition to these guidelines, each of the neighbourhood groups that follow will also include guidelines specific to them.

2.2.1 General Urban Design Guidelines

The following guidelines apply to all new development within the Study Area:

- a. Materials used should have consideration for the predominant materials used in the surrounding neighbourhood.
- b. Roofs, dormers, windows, and doors should generally be reflective of the general forms present in the neighbourhood, but may include more contemporary details and flat roofs that vary but fit in the existing context.
- c. Garages should be located in line with or setback from the main front wall of the dwelling or detached at the rear of the lot to reduce their visual dominance.
- d. Setback distance from street frontage(s) should be consistent with adjacent buildings, wherever possible, or be an average setback of the adjacent buildings on either side that have varying setback at depths.
- e. Preservation of mature trees is encouraged, and new tree plantings are encouraged to replace removed mature trees at a minimum 2:1 ratio.



- | | |
|----------------------|---------------------------|
| (1) Alcan; | (9) Sunnyside; |
| (2) Strathcona Park; | (10) Alwington; |
| (3) Grenville Park; | (11) Queens; |
| (4) Hillendale; | (12) Sydenham, |
| (5) Polson Park; | (13) Williamsville; |
| (6) Calvin Park; | (14) Kingscourt; |
| (7) Fairway Hills; | (15) Rideau Heights; and, |
| (8) Portsmouth; | (16) Markers Acres. |

Figure 2-2: Study Area Neighbourhoods

2.2.2 General Heritage Considerations

In areas that have been recognized for their heritage character and other built heritage resources, the following guidelines should apply:

- a.** New buildings should be designed so that it is clear they are not heritage buildings, but may be encouraged to reflect the rhythm, scale, pattern heritage design features to achieve a consistent appearance within the neighbourhood context.
- b.** Use complementary architectural characteristics such as window alignment, roof-lines, entrance location, ground floor treatment and materials for residential infill. Do not design new buildings to mimic adjacent built heritage resources; instead, create sympathetic design treatments using a common architectural vocabulary.
- c.** Consider incorporating recessed entries and significant glazing on windows in storefront design for mixed-use buildings in order to maintain a heritage rhythm and character.
- d.** The involvement of a heritage professional in any renovations/alterations to a protected heritage property is encouraged to ensure that the most appropriate renovation techniques and materials are employed.
- e.** The original materials, heritage details and attributes on protected heritage properties will be retained and repaired wherever possible and should not be covered. Renovations should be in keeping with heritage conservation best practices, repairing those elements that are missing or damaged beyond repair (e.g. columns, cornices, windows, doors, etc.). Repair existing windows and doors and make them energy efficient. Their replacement should be seen as a last resort.
- f.** Do not alter the original stylistic intent of existing buildings through embellishment or other decorative means (e.g. applying Italianate embellishment to a Victorian building's original character).
- g.** Use materials that complement the original structure (e.g. colour, texture, scale, etc.) when carrying out additions or renovations to a protected heritage property. New additions to protected heritage properties should be subordinate in scale, massing and design to the heritage building and located to the rear, wherever possible. If a new addition must be located to the side of a protected heritage property, it should be setback from the front wall of the heritage building in order to allow the heritage building to maintain its prominence on the property.
- h.** Using documentary evidence, consider reintegrating key aspects of heritage design that have been lost. Add these elements to additions or renovations in older built up areas where these features have been lost through degradation or previous renovation.
- i.** Protect and retain site elements and features, such as large mature trees, wrought-iron fencing, stone walls, and stone paving.
- j.** Solar panels, skylights, green roofs, windmills, satellite dishes and window mounted air-conditioning units may be permitted provided their installation is reversible and done in a way that does not obstruct, damage or remove a

heritage attribute of a protected property. Such installations for heritage properties should not be visible from the street.

The City of Kingston is well known for its cultural heritage resources, which play a key role in the City's identity, and contribute to its economic prosperity as well as to the cultural enrichment of its residents and visitors. These guidelines are intended to protect the City's cultural heritage resources and character, but are not designed to create 'faux heritage' where non-heritage buildings mimic heritage ones.

2.2.3 Neighbourhood Group One

The Group One neighbourhoods consist of Hillendale, Grenville Park, Strathcona Park and Alcan, as shown in **Figure 2-3**.

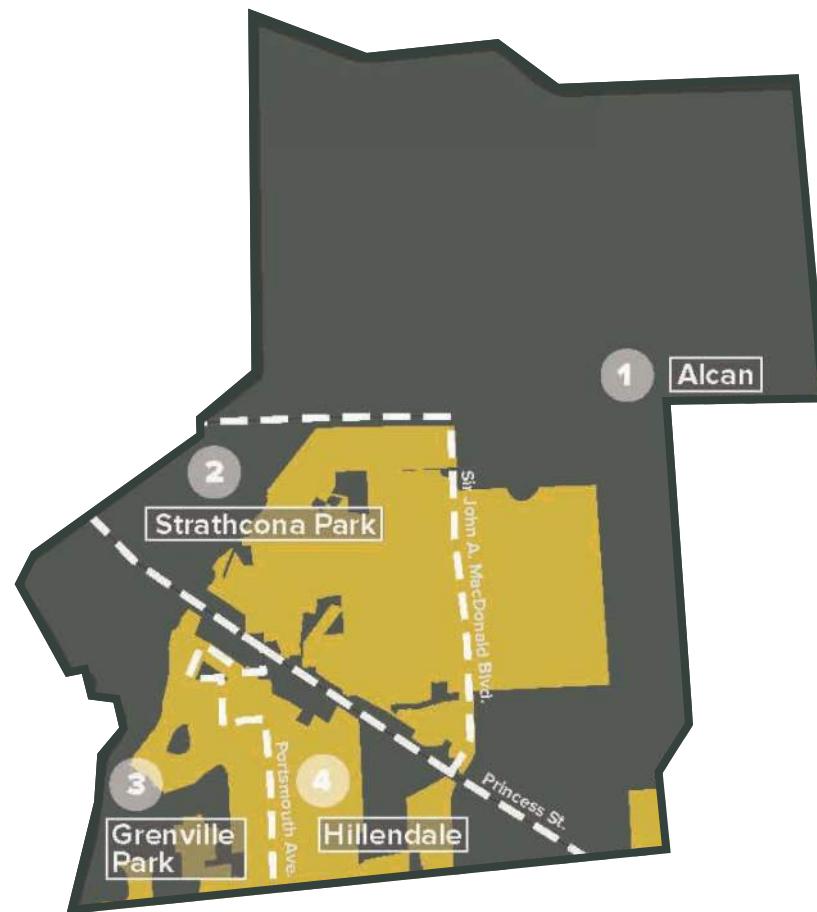


Figure 2-3: Neighbourhood Group One

Group One was predominantly developed after the second world war in the 1950-1960s. Building types vary, from mainly apartments in Hillendale, to mainly single-detached homes in Grenville Park. Strathcona has a range from single- and semi-detached to row homes. Alcan currently does not have residential uses and the main built form in the area is the aluminum factory which was built in 1940 (previously called Alcan, now known as Novelis). For the Alcan neighbourhood the general guidelines in Section 2.2.1 and the City of Kingston's **Design Guidelines for Residential Lots** apply.

2.2.3.1 Neighbourhood Character

The dwellings in Group One contain one and two storey buildings constructed of brick, limestone and vinyl siding. The low rise dwellings in these neighbourhoods have significant front yards with large driveways. The location of garages varies between each neighbourhood, and includes a mix of carports, single car garages and two car garages. The lots in each neighbourhood are relatively wide with a large side yard, largely due to the driveways that are located adjacent to the houses. Most houses in the neighbourhood group are accessed by a driveway and do not have separate walkways to access their front doors. The neighbourhoods generally have several mature trees on the front lawns of the properties. Front yard depths appear to be relatively consistent in the low-rise residential areas within Group One and are a defining character element contributing to the quality of the street. It should also be noted that more than half of the Hillendale neighbourhood

is composed of apartment buildings, generally between 5-12 storeys in height.

2.2.3.2 Heritage Considerations

There are two designated properties, no listed properties and five properties of potential heritage significance noted within Group One in the Phase 2 Report of the Central Kingston Growth Strategy (2020). Neighbourhood Group One does not have any designated Heritage Character Areas or Heritage Conservation Districts under the City of Kingston Official Plan. Of the properties that are designated, listed or identified as having heritage potential, significant characteristics noted in the Phase 2 Report (2020) included the red brick vernacular style of the one designated property, and the white, boxy, two storey structure, and horizontal articulation of the building massing and/or colour of two properties with potential heritage within the Grenville Park Study Area.

Given the low concentration and variety, no heritage specific characteristics apply to Neighbourhood Group One as a whole.

2.2.3.3 Urban Design Guidelines

The following guidelines apply to development within Neighbourhood Group One:

- a. Materials used should have consideration for the predominant materials used in the surrounding neighbourhood. Materials



Figure 2-4: Typical single detached dwellings in Group 1



Figure 2-5: Typical neighbourhood streetscape in Group 1

used may include, but are not limited to brick, limestone and/or high-quality siding (e.g. cementitious, engineered wood).

- b.** Driveways should be located in the side yard, consistent with the street the development is proposed for, and garages located in line with or setback from the main entry point to the home.

2.2.3.3.1 Hillendale

In addition to the above guidelines for the interior of Hillendale, the south edge of the neighbourhood includes apartment buildings along Bath Road and Sir John A. Macdonald Blvd. and guidelines which apply to this area include:

- a.** The general guidelines for mid-rise to tall buildings should apply to these sites, refer to Section 3.0 for recommended transitions and guidelines.
- b.** Encouraging the application of stepbacks and building separation distances, to transition down to adjacent low-rise residential dwellings, parks and open spaces.
- c.** Site buildings to minimize shadow impact and provide for sunlight access and privacy to neighbouring buildings and properties.
- d.** Where buildings are adjacent to commercial/retail and employment uses, landscape property edges, buffering and screening are recommended for better visual transition.

Image Source: Google Streetview



Figure 2-6: Typical apartment building on Bath Road in Hillendale

2.2.4 Neighbourhood Group Two

Consisting of Polson Park and Calvin Park, the Group Two Neighbourhoods were originally developed in the 1950-1960s. Building types are predominately bungalows and apartment buildings, with some institutional uses in the Calvin Park neighbourhood (Figure 2-7).



Figure 2-7: Neighbourhood Group Two



Figure 2-8: Typical low-rise apartment building in Group 2

2.2.4.1 Neighbourhood Character

In Group 2, the front yard depths are relatively consistent at approximately 7 meters in depth. Similarly, the side yard depth and house separations are relatively consistent, with a driveway on one side, and the houses are close together on the other side. A key difference between Polson Park and Calvin Park is the presence of a significant number of mature trees in the Polson Park area, while Calvin Park has a mixture of young and mature trees. In Group Two, the neighbourhoods generally have sidewalks on one side of the road or neither side of the road. Front walkways are inconsistent in this group, but where they do exist, they are neatly landscaped. There is a wide variety of single or two car garages and carports. Lots are of a consistent width at approximately 18 metres in width and primarily have single-storey (bungalow) houses, though there is significant variation in the overall height of homes within Neighbourhood Group Two. The façade materials are fairly consistent, often using both brick and vinyl siding.

2.2.4.2 Heritage Considerations

Two designated properties, no listed properties and four potential properties of heritage significance are noted withing Group Two in the Phase 2 Report of the Central Kingston Growth Strategy (2020). Neighbourhood Group Two does not have any designated Heritage Character Areas or Heritage Conservation Districts under the City of Kingston Official Plan. Of the properties that are designated, listed or identified as having

heritage potential, characteristics noted in the Phase 2 Report (2020) included low-rise, institutional buildings, most are typical of modern or mid-twentieth century architecture (including red brick structures) and comprise various characteristics, materials, and forms.

Given the low concentration and variety of properties or area with heritage potential, no heritage specific characteristics apply to Neighbourhood Group Two.

2.2.4.3 Urban Design Guidelines

The following guidelines apply to development withing Neighbourhood Group Two:

- a. Separation distances to adjacent properties, adequate privacy, and minimal shadowing impacts must be maintained.
- b. Lots should be consistent in width with the street on which they front.
- c. Materials used may include, but are not limited to brick, and/or high-quality siding (e.g. cementious, engineered wood).



Figure 2-9: Typical single detached house in Group 2



Figure 2-10: Typical single detached house in Group 2

2.2.5 Neighbourhood Group Three

Consisting of Fairway Hills and Portsmouth, Group Three was developed predominantly in the 1950s and 1960s. Building types are mainly single detached houses, with some row houses and apartments in the Fairway Hills neighbourhood (Figure 2-11).



Figure 2-11: Neighbourhood Group Three

2.2.5.1 Neighbourhood Character

The Fairway Hills and Portsmouth neighbourhoods in Group 3 have significant differences between the existing properties and neighbourhoods including varied separation distances, large variation in lot widths, and combination of young and mature trees. The main similarity between these neighbourhoods is the presence of sidewalks on only one side of the road.

2.2.5.2 Heritage Considerations

Within Group Three, 30 designated properties, 17 listed properties and 46 potential properties of heritage significance are noted in the Phase 2 Report of the Central Kingston Growth Strategy (2020). Within Neighbourhood Group Three, Portsmouth Village is identified as a Heritage Character Area and is being investigated as a potential Heritage Conservation District under the City of Kingston Official Plan. The identified properties are primarily one to two storey residential structures clad in wood and siding, and are generally clustered along Mowat Avenue, Baiden Street, King Street West, Richard Street, and Yonge Street. Of the properties that are designated, listed or identified as having heritage potential, characteristics noted in the Phase 2 Report (2020) included generally two storey buildings with painted stucco, red brick, wood cladding or limestone construction.

With the concentration of heritage buildings in and around Portsmouth Village, development in this area should be

consistent within the neighbourhood context. For general heritage considerations, refer to Section 2.2.2.

2.2.5.3 Urban Design Guidelines

2.2.5.3.1 Fairway Hills

Fairway Hills is a community where the majority of houses are built on larger lots and are clad in brick and/or stone with attached two and three car garages. There is a mix of single detached and higher density residential. Currently there is limited transition between the higher density and single detached houses. Where they exist, transitions are achieved through significant landscape setbacks between the two building typologies. Existing development within Fairway Hills typically has large landscaped front yard setbacks.

The following guidelines apply to Fairway Hills in Neighbourhood Group Three:

- a.** Built form transition between different forms and densities of development (such as lower and higher densities) should be achieved through separation distance or through gradual built form articulation that provides a visual transition between the two (e.g. high density buildings with a lower built form / podium or townhouse block).
- b.** The existing wide lot widths in Fairway Hills should be maintained through redevelopment.

2.2.5.3.2 Portsmouth

Portsmouth is a neighbourhood made up of 1 to 2 storey houses clad in brick, stone, or siding. The buildings are characterized by front doors with windows on either side. Many of the houses have steps up to a small porch or front door landing with the ground floor located above grade. Respect for the historical feel, setting, and significance of Portsmouth Village and its buildings is important to the character of the area and should be preserved.

The following guidelines apply to Portsmouth within Neighbourhood Group Three:

- a.** New development should, where possible, and in keeping with the Zoning By-law maintain the shallow front yard setbacks present within the neighbourhood.
- b.** Pitched roofs are preferred over flat roofs.
- c.** Appropriate materials for building exteriors, particularly street-facing walls, include red brick, stone, and high-quality engineered wood cladding (e.g. cementitious, engineered wood). Generally, one to two storey developments are encouraged, with consideration for adjacent dwelling height.
- d.** Raised homes which have a partially above-ground basement and a small porch or front door landing are encouraged.



Figure 2-12: Newer development with front yard parking and garages in Group 3



Figure 2-13: A mix of street trees and a large front yard setback in Group 3



Figure 2-14: A mix of building setbacks in Portsmouth



Figure 2-15: Street-oriented heritage buildings at the sidewalk in Portsmouth

2.2.6 Neighbourhood Group Four

Consisting of Sydenham, Queens, Alwington and Sunnyside, Group Four contains the highest number of heritage properties (**Figure 2-16**). Developed from the 1840s and 50s (Sydenham, Queens and Alwington) to the early to mid 1900's (Sunnyside), building types are mainly single detached houses, with some semi-detached, and row houses, as well as multi-unit buildings in the Sunnyside neighbourhood.

2.2.6.1 Neighbourhood Character

Different from other neighbourhood groups, the properties in these neighbourhoods typically do not have deep front yards, have much narrower lot widths, and houses are set very close to the road. The houses also typically contain a small side separation distance. Throughout all of the neighbourhoods in this group, there are sidewalks on both sides of the road. Many of the houses in these neighbourhoods do not have garages in front. One of the largest differences between the houses in this group versus other groups is the introduction of three storey single detached houses and row houses clad in red brick. Portions of all neighbourhoods in this group are noted as Heritage Character Areas or designated as Heritage Conservation Districts.

2.2.6.2 Heritage Considerations

Within Group Four, 546 designated properties, 19 listed properties and 220 potential properties of heritage significance are noted in the Phase 2 Report of the Central Kingston Growth Strategy (2020). Within Neighbourhood Group Four, Old Sydenham is identified as a Heritage Conservation District (HCD), King Street West (Queens Neighbourhood) and parts of Alwington are identified as Heritage Corridors, and Alamein Drive (Sunnyside) is designated as a Heritage Character Area under the City of Kingston Official Plan. Buildings in these areas contain a range of architectural styles, massing and features, such as three to four storey buildings with red brick walls or



Figure 2-16: Neighbourhood Group Four

limestone and flat or pitched roofs. Architectural details include features such as arched window features and vertical glass elements. For general heritage considerations, refer to Section 2.2.2.

2.2.6.3 Urban Design Guidelines

The following guidelines apply to Neighbourhood Group Four:

- a. Appropriate built form may include a variety of typologies and forms that are reflective of the existing buildings in the area.
- b. Development should, where feasible and in keeping with the ZBL, maintain shallow front yard setbacks consistent within their neighbourhood.
- c. Materials and colours, outside of the Old Sydenham Heritage Conservation District (HCD), should complement the immediate neighbourhood, and may include brick or horizontal wood-profile siding.
- d. Raised homes which have a partially above-ground basement and front steps and/or porch are encouraged.
- e. Garages should be visually minimized, located in the rear yard or setback from the main front wall of the home.
- f. Where possible, window styles that include arched headers are encouraged for residential infill development.



Figure 2-17: Newer development project with a rhythm of front doors, porches and roof dormers in Group 4



Figure 2-18: Larger semi-detached house with heritage character in Group 4

2.2.7 Neighbourhood Group Five

Consisting of Kingscourt and Williamsville, Group Five residential buildings were mainly developed in the 1940s (Kingscourt) and 1850s (Williamsville) (**Figure 2-19**). Building types are mainly single detached (compact in Kingscourt), with some row houses and multi-unit buildings in the Williamsville neighbourhood.

2.2.7.1 Neighbourhood Character

Within Neighbourhood Group Five, Williamsville is made up of semi-detached and detached houses, as well as several row house and apartment buildings. The houses are primarily between one and two storeys in height. Kingscourt is characterized by primarily single storey wartime houses, developed in and around the 1940s. These homes are often clad in brick, wood shingles, plywood, wood sidling, and/or asbestos shingles. The streetscapes vary in front yard depth (setbacks of houses) with fairly consistent lot width and building separation. This wartime neighbourhood has shaped the existing character of the area of Neighbourhood Group 5, though only a handful of wartime houses remain in Williamsville. Additions and alterations have been made to many of the existing dwelling units, while the streetscape still retains the same configuration as in the 1940s.

2.2.7.2 Heritage Considerations

Within Group Five, 5 designated properties, 17 listed properties and 26 potential properties of heritage significance are noted in the Phase 2 Report of the Central Kingston Growth Strategy (2020). Within Neighbourhood Group Five, Kingscourt is identified as a Heritage Character Area under the City of Kingston Official Plan. Buildings in these areas contain a range



Figure 2-19: Neighbourhood Group Five

of architectural styles, massing and features, such as one to 2.5 storey buildings with wooden shutters, red brick walls, vinyl siding and slight inverse/flat or pitched roofs.

2.2.7.3 Urban Design Guidelines

The following guidelines apply to Neighbourhood Group Five:

- a. Buildings with pitched roofs and dormers are encouraged.
- b. Materials and colours should reflect the immediate neighbourhood, and may include wood shingles, and wood siding or visually similar high-quality materials (e.g. cementitious boards).
- c. Garages should be located in the rear yard or at minimum, setback from the main entry point to the home.
- d. Wooden shutters are encouraged on the street-facing side of buildings.



Figure 2-20: Typical single detached one storey house in Group 5



Figure 2-21: Typical single detached house with apartment building in the background in Group 5

2.2.8 Neighbourhood Group Six

Within Group Six, no designated properties, listed properties nor potential properties of heritage significance are noted in the Phase 2 Report of the Central Kingston Growth Strategy (2020). Consisting of Rideau Heights and Marker's Acres, Group Six was developed predominately in the 1960s (Figure 2-22). Building types vary, from mainly single-detached homes to semi-detached, rows and low-rise apartments.

2.2.8.1 Neighbourhood Character

The houses in Group Six are similar in size and materiality. They are primarily constructed from brick, or have vinyl siding and are a mix of one and two storey houses. The houses mostly have a minimum of one large window facing the street, and a sidewalk on one side of the road.

2.2.8.2 Urban Design Guidelines

The following guidelines apply to Neighbourhood Group Six:

- a. Consistent front yard setbacks should be maintained, where feasible and in keeping with the ZBL.
- b. Garages should be located in the rear yard or at minimum, setback from the main entry point to the home.
- c. Large street facing windows are encouraged.
- d. Buildings with pitched roofs and dormers are encouraged.

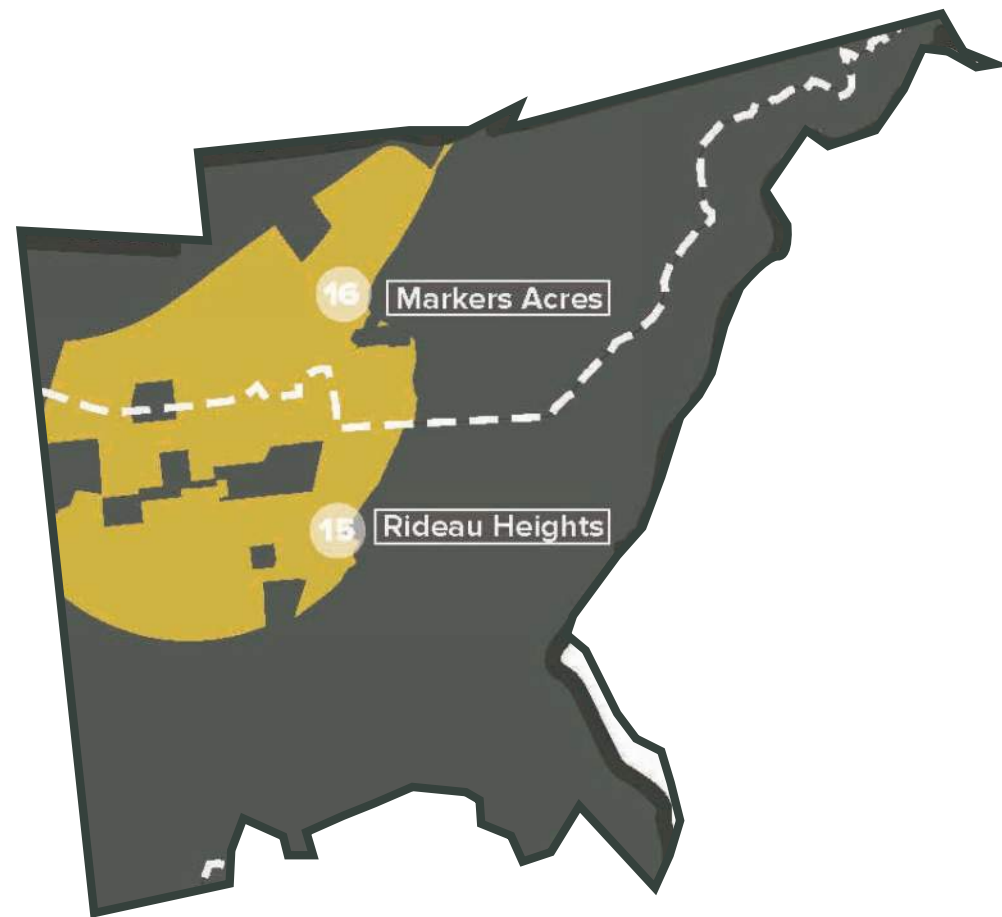


Figure 2-22: Neighbourhood Group Six



Figure 2-23: Six storey apartment buildings with parking at side in Group 6

2.3 Additional Residential Units

The purpose of this section is to promote the contextual implementation, design and uptake of Additional Residential Units (ARUs) in appropriate locations within the residential neighbourhoods of Central Kingston.

ARUs are most broadly known as separate additional living units which are attached or detached from the primary residential unit on a single family lot containing ground-related residential forms. ARUs have been a valued solution for addressing growth-related issues in an affordable, inclusive, and contextual manner.

ARUs may take on various forms, each offering features that are more compatible within certain neighbourhoods and based on owner/renter desires and preferences. ARUs are intended to be equal or subordinate in size, location, and appearance in relation to the principal residential unit to increase integration and minimize neighbourhood impacts. As such, they often gain greater acceptance from the neighbourhood, compared to more obvious forms of intensification.

New units should not cause excessive overlook or loss of privacy for adjacent residential lots. Mitigation measures could include placing windows on the front/rear elevations, higher traffic living spaces on the ground floor, use of clerestory windows to allow light in but discourage overlook, preserving existing vegetation around the perimeter of the property.

ARUs can be classified by their relationship to the principal dwelling, which may take three forms:



Interior ARUs are contained within the principal dwelling, built from existing converted space, usually being an attic or basement.



Attached ARUs are additions to the side or rear of the home which adjoin the principal dwelling, or are constructed on top of an attached garage.



Detached ARUs are stand-alone structures separate from the principal dwelling that can be built as entirely separate unit or constructed over or within an existing accessory structure, such as a detached garage. These units must remain under ownership of the main house and are not severable.

These three forms fall on a spectrum in terms of design, affordability, and neighbourhood impacts. For instance, the interior typology is the most affordable and implementable form of ARUs which has the least amount of neighbourhood impact.

ARUs can introduce added density without major impact to the streetscape and the neighbourhood. ARUs may also stabilize or re-establish the density within neighbourhoods where the general people per unit have diminished in past years.



3.0 Intensification Area & Mid-Rise to Tall Development Guidelines

To help realize the vision for the Central Kingston Neighbourhood Areas, the following guidelines provide additional direction and frame the intent and design principles for new mid-rise to tall development, primarily located within the identified intensification areas, but also where permitted within stable areas.

3.1 Intensification Areas

Intensification sites for the Central Kingston Neighbourhood Area have been identified in three main areas in the City of Kingston Growth Strategy (2019), as shown in **Figure 3-1**.

These intensification areas are:

- Johnson and Brock Streets;
- Johnson Street & Portsmouth Avenue; and
- Sir John A. MacDonald Blvd. & Bath Road.

The largest of the three areas is the Johnson and Brock Corridors Expansion Area, north of Queen's Main Campus. Sites have been identified from Division Street to MacDonnell Street stretching east and west along the frontages of Brock Street and Johnson Street (**Figure 3-2**).

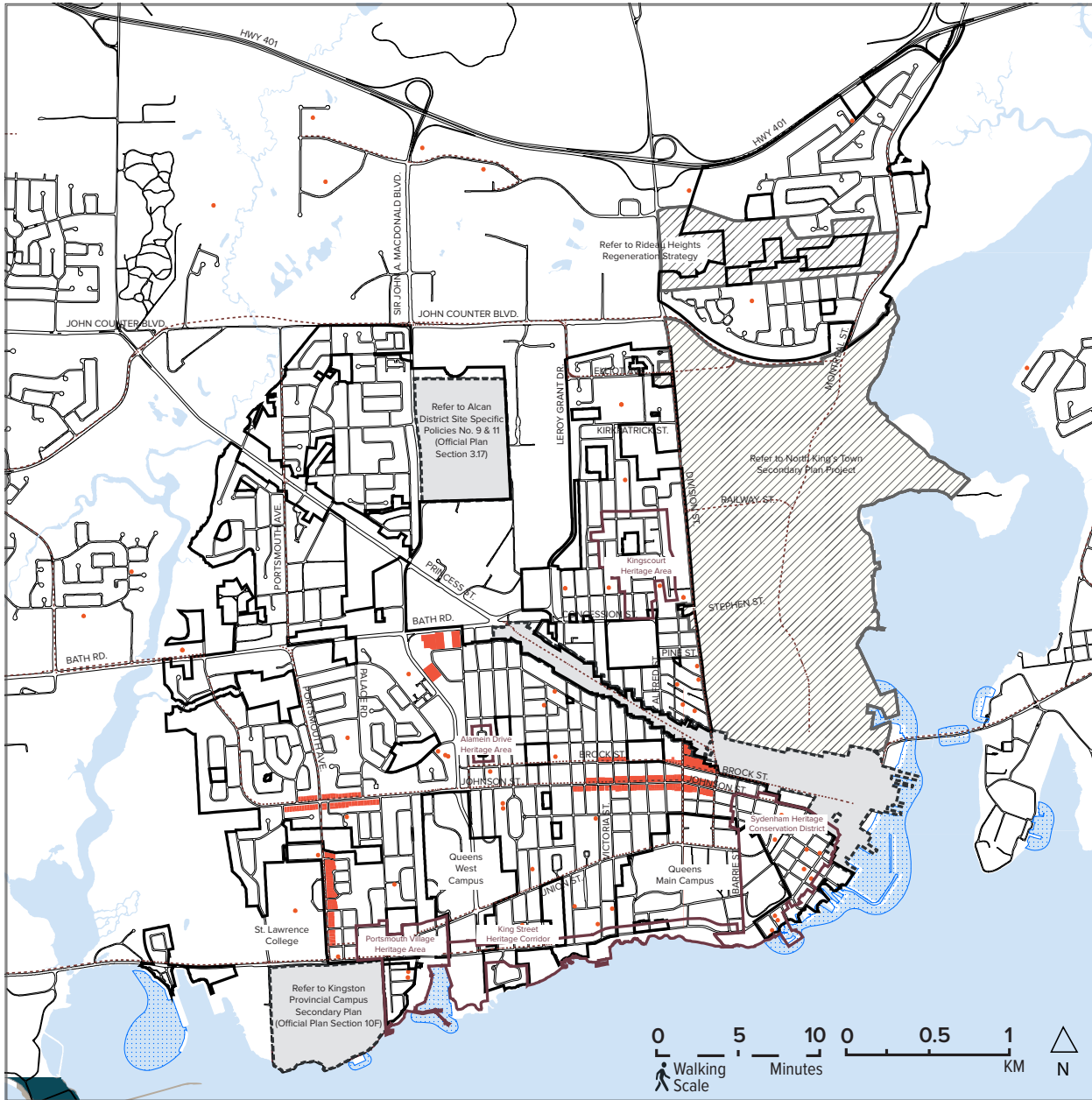
The second area is immediately east of St. Lawrence College along Portsmouth Avenue down to King Street West, with an additional area of proposed intensification extending one block east and west of Portsmouth Avenue along the frontage of Johnson Street (**Figure 3-3**).

The third area identified is south and east of the junction of Bath Road and Sir John A. Macdonald Boulevard, directly south of the Kingston Centre commercial plaza (**Figure 3-4**).

Key to the success of these intensification areas is that they are developed to:

- Optimize infrastructure and public investment;
- Promote diverse economic activity and prosperity;
- Support an attractive, accessible, safe and sustainable City;
- Protect Kingston's cultural and natural heritage resources;
- Provide a variety of housing options for all residents; and
- Help achieve Council's strategic priority for "smart" growth.

The following sections provide detailed guidelines for the design and implementation of new mid-rise and tall developments in each identified intensification areas.



LEGEND

- Proposed Intensification Sites
- Existing Multi-Unit Residential Developments
- Commercial
- Employment
- Institutional
- On-going Project Areas
- Existing Policy Areas
- Heritage Areas and Districts
- Open Space
- Environmental Protection Area
- Waterbodies
- Harbour Area
- Central Kingston Neighbourhood Area

0 5 10 0 0.5 1 KM N
 Walking Scale Minutes

AREAS FOR INTENSIFICATION
 June 2020

Figure 3-1: Proposed Intensification Sites

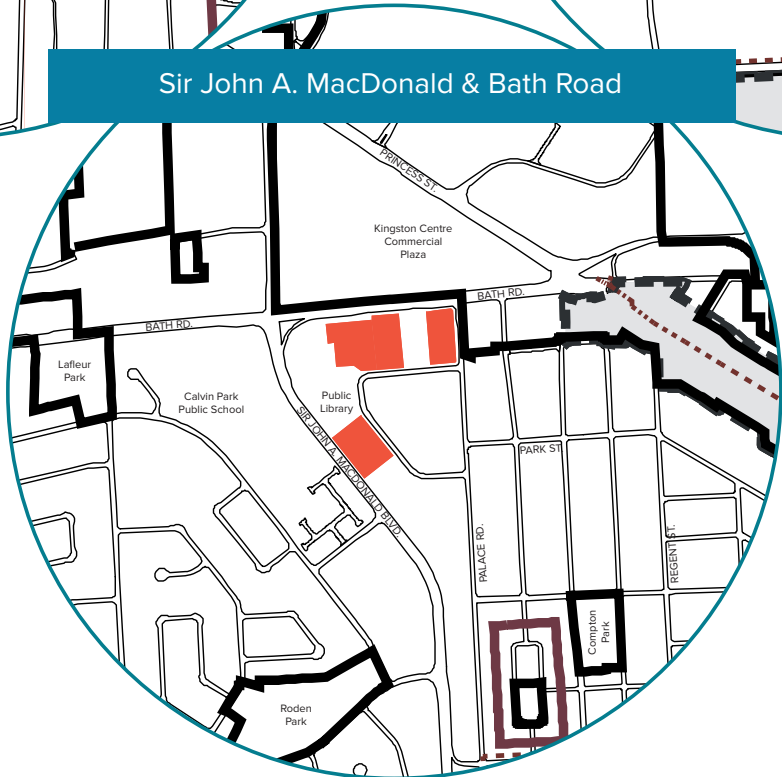
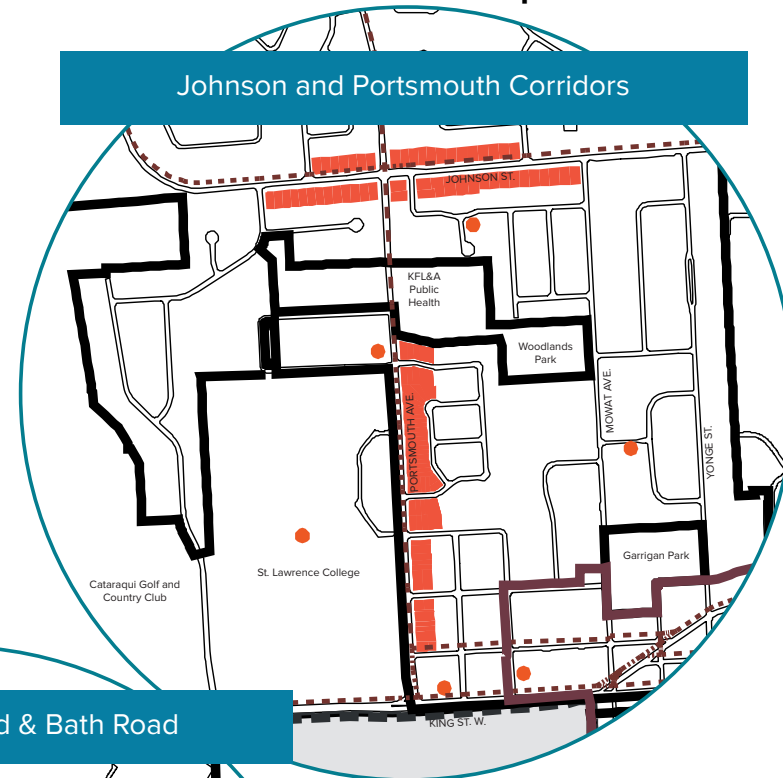
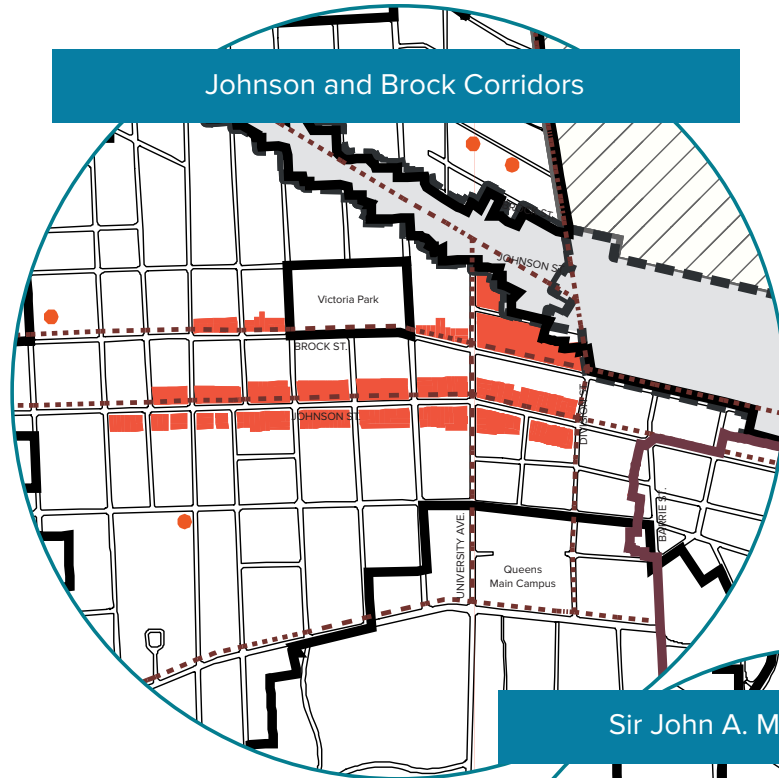


Figure 3-2: Proposed Intensification Sites in Johnson and Brock Area

Figure 3-3: Proposed Intensification Sites in Johnson and Portsmouth Area

Figure 3-4: Proposed Intensification Sites in Sir John A. MacDonald & Bath Road Area



3.2 Public Realm Guidelines

The public realm can enhance public life and provide Kingston with vibrant and enlivened places. The guidelines in this section provide a framework for major components of the public realm.

A driving force for future development within the Central Kingston Neighbourhoods is the desire to create sustainable development. In keeping with this principle, it is the intent of these guidelines to foster a compact and connected community. The public realm in Central Kingston should be designed to make efficient use of land, support a pedestrian-scaled environment, and incorporate community-centric design.

With respect to **areas identified for intensification**, design should include public realm improvements and create street character by considering and encouraging active uses, enhanced streetscaping, tree planting, widened sidewalks and public art to suit the local character, along with other opportunities and enhancements to infrastructure.

3.2.1 Street & Built Form Relationship in Intensification Areas

As shown in **Figure 3-2**, **Figure 3-3** and **Figure 3-4**, the areas identified for intensification within Central Kingston contain arterial, collector and local roads. Design guidelines which apply to these street typologies are outlined in the following sections.

3.2.1.1 Arterial Streets (Bath Road, Johnson Street, Brock Street and Sir John A. Macdonald Boulevard)

These arterial streets are important to both vehicular and pedestrian circulation and the proposed built form for intensification areas should be developed to support current circulation and accommodate the potential for active transportation in the future. Built form on arterial streets should support a mix of transportation modes through the following design considerations:

- a. Orient the main elements of built form to address the arterial road, which may include main entry location, architectural detailing, wall articulation, placement of windows and fenestration details.
- b. Ensure that the main elements of corner lot buildings at intersections address both streets and provide architectural detail or massing that defines and anchors the corner.
- c. Coordinate built form with landscape features along the streetscape to support a comfortable pedestrian environment. Key factors to consider are views and natural surveillance of the streetscape, accessibility, and intuitive wayfinding.
- d. Relocate driveways away from arterial roads to the flanking local street and include rear laneways to allow vehicular access to all buildings.
- e. Locate parking at the rear of buildings, behind building wall face or below grade and avoid placing in between the building and road frontage (concept shown in **Figure 3-5**).

3.2.1.1.1 Commercial Uses (Johnson Street and Brock Street)

Johnson Street and Brock Street are encouraged to facilitate development with at-grade retail and commercial uses. Johnson and Brock streets are well connected via public transportation (bus routes); future streetscape design should support a high volume and mix of pedestrian movement and vehicular traffic.



Figure 3-5: Arterial Road Concept: Sir John A Macdonald (right of way) width varies, desired 36.6m as per Official Plan) and Bath Road (desired ROW width 42.0m per Official Plan)

3.2.1.1.2 Mid-Block Crossings (Sir John A Macdonald Boulevard and Bath Road)

The intensification area identified at Wright Crescent and abutting Sir John A MacDonal Boulevard, and Bath Road has many large blocks that require mid-block connections to support pedestrian circulation and connectivity while contributing to the pedestrian network in the area. Potential mid-block connections have been identified in **Figure 3-6**, in order to provide more direct pedestrian connections to encourage pedestrian activity with more direct connections from Wright Crescent to Sir John A Macdonald Boulevard, and Bath Road. Where introduced, mid-block connections should consider the following guidelines:

- a. Provide flexibility to accommodate pedestrians and cyclists and include walkway widths that assist emergency services in the City. The minimum width (wall face to wall face) of mid-block crossing should be 10.0m, where feasible.
- b. The mid-block crossing should also accommodate seating areas in addition to the pedestrian clearway to add more vibrancy and passive surveillance to these paths.
- c. Where possible, weather protection should be included by providing canopies on abutting buildings. Canopy height and location should be at a height to accommodate winter maintenance equipment.
- d. Where possible, streetscape furniture and bicycle parking should be accommodated within mid-block connections to support active transportation.

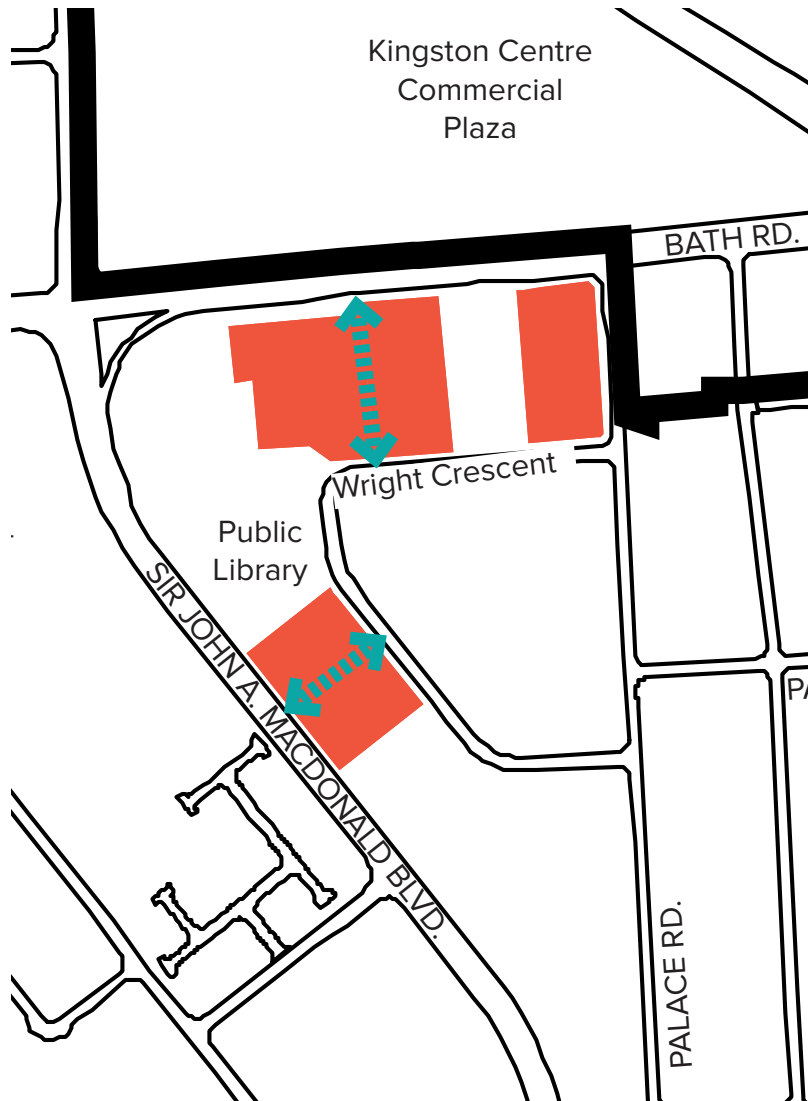


Figure 3-6: Potential Mid-Block Connections



Figure 3-7: Examples of Mid-Block Connections

- e. Flanking buildings should address the mid-block connection through active façades to provide passive surveillance and overlook of the connection.
- f. Lighting should be provided to ensure the mid-block connection is well lit throughout the day.

3.2.1.2 Collector Streets (Portsmouth Avenue and Johnson Street west of Portsmouth Avenue)

Within Central Kingston's identified intensification areas, Portsmouth Avenue and Johnson Street west of Portsmouth Avenue are intended to be predominantly residential areas, with institutional uses and smaller neighbourhood commercial sites in close proximity. Proposed development for these areas should consider the following guidelines:

- a. Where feasible, driveways should be relocated from collectors to the flanking local street and include rear laneways to allow vehicular access to all buildings.
- b. Development in the intensification area along Portsmouth Avenue will be designed to be compatible with the character of the street and supportive of surrounding neighbourhoods (e.g. 4 storey townhouses or apartment buildings).
- c. Development in the intensification area at **Johnson Street and Portsmouth Avenue** should include rear laneway garage access.

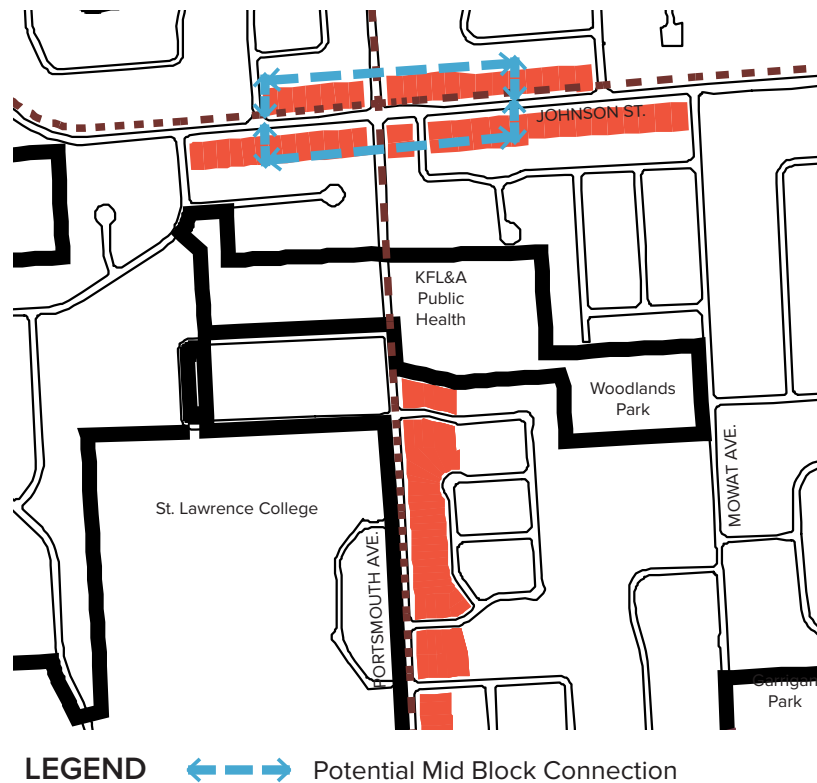


Figure 3-8: Potential Mid Block Connection



Figure 3-9: Collector Road Concept: Portsmouth Avenue and Johnson Street at Portsmouth Avenue



Figure 3-10: Collector Road Concept: Portsmouth Avenue and Johnson Street at Portsmouth Avenue (Maximum Permitted Building Heights Depicted)



3.3 Private Realm Guidelines

The private realm in Central Kingston, particularly in the intensification areas, has an important role to play in shaping the built form and growth of these areas. To achieve attractive built form that respects or enhances the existing neighbourhood character and context is the primary objective of these design guidelines.

The City of Kingston defines low-rise, mid-rise and high-rise buildings as follows:

- Low-rise residential buildings in Kingston are considered to be up to 3 storeys in height.
- Mid-rise buildings are buildings 4-6 storeys; and,
- Tall buildings are buildings over 7 storeys in height.

The guidelines that follow have considered these definitions with respect to built form.

3.3.1 Building Siting and Orientation

Buildings designed to be distinct, reflect on the design of surrounding buildings, minimize blank walls, have sensitive architectural detailing, and provide streetscapes with visual quality and a sense of place. When appropriate orientation and design are combined, communities are able to establish a sense of identity. Opportunities for casual surveillance should also provide local residents and visitors with a sense of comfort and an improved perception of safety.

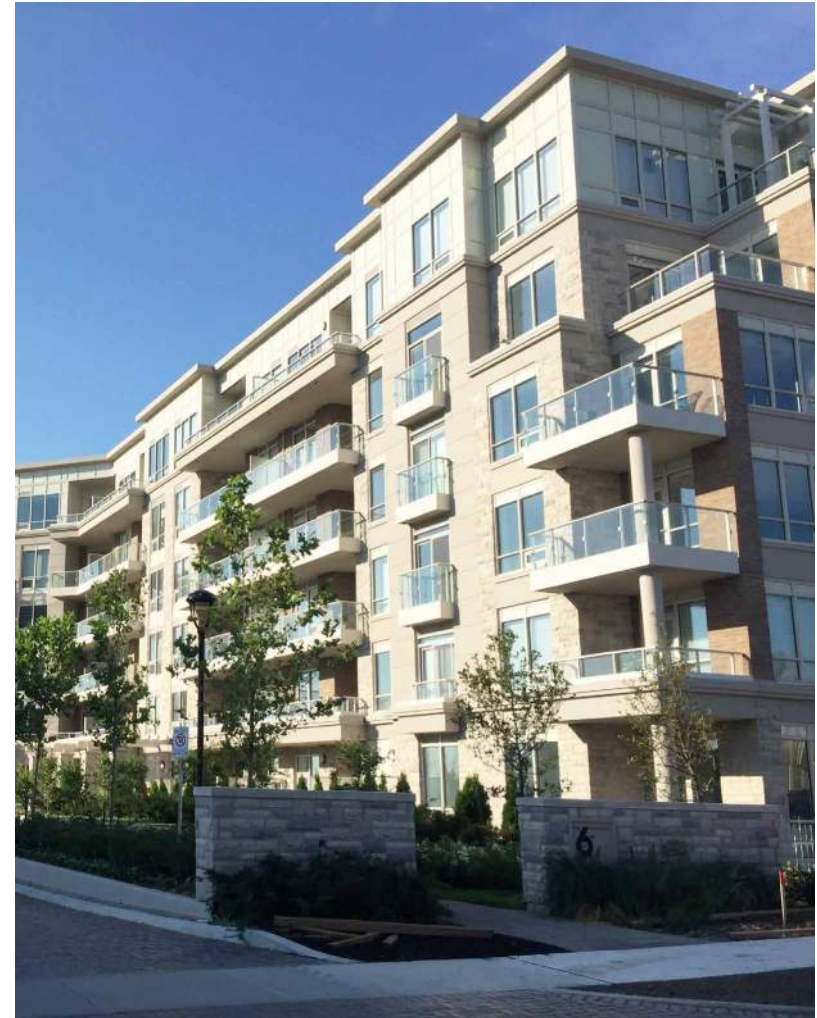


Figure 3-11: Building with setbacks along the streetfacing wall and defined private area

The following guidelines apply to building siting and relationship to the street:

- a. Buildings should be aligned parallel to a public street with siting and massing that provides a consistent building relationship to frame public streets.
- b. Alterations to existing buildings should also match or average the setback of adjacent buildings to ensure a continuous street wall where it won't negatively impact character. This is especially beneficial on sites where buildings are currently set farther back from the street than neighbouring buildings.
- c. Building massing should be articulated to address the public realm, and include a continuous street wall frontage to help frame the pedestrian clearway.
- d. Buildings on corner lots should be oriented to address both streets and generally located close to the street edge. Where corner lot rear elevations are exposed to street view they should be consistent in architectural design and quality with the front and external side elevations.
- e. Buildings located adjacent to, or at the edge of parks and open spaces, should be designed, sited and massed to address the open space and where appropriate, provide opportunities for overlook of these features.
- f. Development should coordinate all streetscape elements and utilities located within the street right-of-way, to ensure there are no conflicts between buildings, driveway, walkway or other site plan components.
- g. Mixed-use developments should have a minimum ground floor height of 4.5 metres to provide flexibility for retail/commercial uses and a pedestrian-scaled edge. For private realm guidelines for mixed-use buildings, refer to Section 3.3.4.

3.3.2 Townhouses and Stacked Townhouses

Townhouses are encouraged to be introduced in some intensification areas to address the context of adjacent low-rise residential areas, to visually transition density from corridors to existing residential uses, and to sensitively introduce density with pedestrian-scaled built form. The following guidelines should apply to townhome development:


- a. The elevations of the townhouse block should be articulated in a manner that provides visual interest and common characteristics that visually unite the block.
 - b. The massing and form of townhouse units adjacent to detached and semi-detached dwellings should transition to those dwellings through height and architectural features for visual continuity along the streetscape.
 - c. The length of the townhouse blocks should not exceed 50 metres unless it is essential to the architectural style of the townhouse block.
 - d. The main front entry should be oriented to the front lot line or the flanking street of the corner unit. Where a dwelling unit flanks a laneway, the main entrance should face the public street.
 - e. Where a complex of townhouses is proposed they are encouraged to have elevation, massing, and material/colour package variety to address excessive townhouse block repetition.
 - f. Rear lane accessed garages are preferred for townhouse blocks units.
- 
- g. Where townhouse blocks are sited along collector and arterial roads, they should include rear lane or rear accessed garages, to reduce the visual and functional impact of garages and driveways on the streetscape.
 - h. Front facing garages should be flush or behind the main building face of the townhouse unit and not exceed 50% of unit width.

Figure 3-12: Variation between units should be incorporated while reinforcing visually unifying characteristics

- i. Where parking is integrated at the rear, a private amenity space should be provided above the parking area in the form of a deck and/or balcony.
- j. Utility meters should be screened from public view by integrating them into the design of the townhouse units through the use of wall recesses, enclosures, or inseting within the building walls. Rear lane townhouses shall locate utility meters at the rear.
- k. Side and rear elevations visible from public areas should have architectural treatments consistent with the design of the front elevation.

3.3.3 Multi-unit Buildings

Multi-unit buildings are residential buildings that provide for increased density in the identified intensification areas and other appropriate locations within Central Kingston. They are envisioned to include mid-rise buildings of 4-6 storeys and tall buildings.

The following guidelines apply to multi-unit buildings in Central Kingston:

- a. Where tall buildings are adjacent to lower density residential areas that are not planned for redevelopment, incorporate appropriate transitioning elements. Potential negative impacts such as an overbearing or obtrusive visual presence should be mitigated by utilizing the transitioning elements as outlined in Section 3.4.
- b. Orient and design taller buildings (e.g. apartment buildings) to minimize shadows cast on adjacent properties, especially other residential buildings and open spaces. Perform a sun/shadow analysis to identify potential impacts on adjacent public and private property where potential conflicts have been identified. Create design alternatives that demonstrate a reduction in the degree of impact.
- c. Locate taller buildings adjacent to or near amenities or transit opportunities such as commercial areas or centres, on the periphery of neighbourhoods, near parkland or open spaces, and at the intersections of arterial or collector roads. Design taller buildings to reinforce the prominence of these locations

through appropriate massing, building projections, recesses at-grade, lower storey design and open space treatments.

- d. Stepbacks at the rear of the building are encouraged above the 4th floor on north-facing buildings to reduce shadowing and to transition to lower density uses.
- e. To create a pedestrian-scaled streetscape, carefully consider the mass and highlight the building base and façade through architectural elements, including entrances, awnings, large areas of glazing and retail opportunities,
- f. Covered entrances, architectural detailing and weather protection features such as canopies should be provided adjacent to boulevard and/or open space areas. Canopies should be designed to a height and/or offset that does not cause obstruction with maintenance procedures within the right-of-way, such as sidewalk plows and street cleaning.
- g. Provide publicly-accessible mid-block connections and address them through clear glazing and program to enhance pedestrian circulation in larger developments.
- h. Buildings and their primary entrance should be oriented and face onto the public street with a minimum setback as required by the Zoning by-law.
- i. Servicing, loading and parking access should be from a shared lane at the rear of the building.
- j. Permanent parking should be located below grade. Where it cannot be, it should be located behind the building and screened from street view.
- k. Rooftop mechanical equipment should be screened from public view and integrated into the design of the building



Figure 3-13: Corner building addressing both streets

with materials and/or colours that are complementary to the building.

- l.** Where townhouse style units are proposed at the base of a larger building they should incorporate a defined front yard that can accommodate tree planting and landscaping. Where this is not possible, the front entrance should be raised (e.g. 4-5 risers from grade), where possible.
- m.** Multi-unit buildings should provide high-quality, strategic amenity areas. These areas may include:
 - Private outdoor amenity areas – a private yard, balcony or terrace.
 - Communal outdoor amenity areas – large, communal yards or courtyards to accommodate social gatherings and recreation in larger building complexes.
 - Communal indoor amenity areas – an indoor area to accommodate social gatherings, meetings, recreational activities, and play space.
 - Play space for children – a separate communal play space for children with formal play equipment and some seating for adults (generally provided with high density residential developments).
 - Provide communal amenity areas when providing a private outdoor amenity area per residential unit in an apartment building is not appropriate or feasible.



Figure 3-14: Townhome development with defined front yards and trees

3.3.4 Mixed-use Buildings

Mixed-use buildings are encouraged in the intensification areas along Johnson and Brock streets. Mixed-use buildings comprise at-grade commercial or retail uses with residential uses above ground level. The following guidelines apply:


- a. Mixed-use buildings should maintain an appropriate scale and transition to adjacent grade-related residential uses.
 - b. Mixed-use buildings should be sited at a minimum setback from the front property line to create a consistent wall face. Building setbacks at-grade are encouraged where the boulevard is narrow or to allow for patio uses.
 - c. Longer buildings should be articulated to avoid large expansions of uninterrupted blank façades and grade level retail frontages should be broken down to a fine grain to provide a pedestrian-scale frontage.
 - d. Residential entrances should be clearly distinguished from the commercial entrances through building design and can be located at the front or side of the building.
 - e. Storefront entrances should be highly visible and clearly articulated. Entrances should be located at or near grade. Split level, raised or sunken entrances shall not be permitted.
 - f. A minimum floor to ceiling height of 4.5 metres should be provided on the ground floor to allow for flexibility and accommodate a variety of retail/commercial/office uses.
 - g. Where located at a corner, buildings should have higher visual interest to “anchor” the building.
- 
- h. Commercial signage should be illuminated using accent lighting complementary to the building façade.
 - i. Signage should not obscure windows, cornices, columns or other architectural elements and be limited to the storefront of a building and in a consistently defined area above the store front to limit visual clutter.
 - j. Awnings or canopies are encouraged to provide weather protection and should provide an identifiable break or gap between storefronts. Where proposed buildings are very long, consistent multiple smaller width awnings/canopies are encouraged.

Figure 3-15: Mixed-use buildings oriented for pedestrian use

3.3.5 Access and Parking

Where higher density uses are found, higher demand for parking may follow. To maintain a pedestrian-focus, parking should be located underground where possible, accessed from side streets, and screened from the public realm. The following guidelines apply to the location and design of parking for mid-rise to tall buildings.

- a. In order of preference, parking should be located underground or in parking structures which are integrated into or screened by buildings. If none of these options are feasible, surface parking should be permitted if located behind the building and screened from the street.



Figure 3-16: Example of layby parking and planting bump-outs to create on street parking spaces

- b. Driveway and vehicular access lanes should be minimized through shared driveways and common access lanes at the rear of the buildings.
- c. Parking entrances should be directed away from any outdoor amenity areas, opens spaces, parks, and/or high-traffic pedestrian pathways.
- d. Consider permeable paving for street and surface parking to promote drainage, especially in areas only used during peak parking times.
- e. Consider providing preferential parking for bicycles, energy efficient vehicles and car-share services. Ensure the provision of secure sheltered bicycle storage which is easily accessible in well lit, highly visible locations on or near the building entrance to encourage use.
- f. Provide a continuous, clearly marked walkway to enable safe and direct pedestrian movement from parking areas to main entrances of buildings. Use distinctive pavement and/or markings to indicate pedestrian crossings.
- g. Locate pedestrian entry paths adjacent to entry drives.
- h. Minimize cross circulation between vehicles and pedestrians.

3.3.5.1 Structured Parking

To avoid large surface parking lots, structured parking should be considered. Structured parking can be integrated into new development as mixed-use buildings with retail or commercial frontages, maintaining a positive urban environment and allowing more parking spaces and more efficient land use. The following guidelines apply to structured parking:

- a. Integrate an active at-grade use (such as retail) for parking structures fronting onto streets or open spaces. This will provide attractive façades, animate the streetscape and enhance pedestrian safety.
- b. Locate vehicular access to parking structures at the rear and/or side of buildings away from main building frontages and major streets.
- c. Locate pedestrian entrances for parking structures in highly visible locations adjacent to main building entrances and public streets. Incorporate Crime Prevention Through

Environmental Design (CPTED) principles including enhanced lighting, defined exits, and avoiding hidden areas.

- d. Screen parking within a structure from view at sidewalk level. Enhance the street-level wall through architectural detailing and landscaping.

3.3.5.2 Surface Parking

Surface parking is not an efficient use of land, and is not preferred. Benefits of vegetation within surface parking lots include reduced heat island impacts, increased visual appeal, opportunities for low impact development measures to be integrated into the design and the multitude of environmental benefits that come with adding vegetation in urban areas. Where no other parking option is feasible, surface parking should follow these guidelines:

- a. Design parking areas to reduce their visibility. Locate surface parking areas at the rear of multi-unit buildings in areas that incorporate natural surveillance.
- b. Avoid constructing large areas of uninterrupted parking and visually divide lots to create smaller parking courts that include landscaped curbs and defined pedestrian pathways.
- c. Preserve sight lines to surface parking areas and primary building façade, but screen parking with softened views at sidewalk level by using landscaping such as trees and shrubs, or other interesting visual features.
- d. Clearly define boundaries by using planting strips, landscaped traffic islands and/or paving articulation to

separate adjoining uses, site boundaries, vehicle routes, parking courts, and pedestrian walkways.

- e. Provide pedestrian-scaled lighting along pathways to enhance visibility and security. Adjust the height and intensity of light to be sensitive to adjacent land uses.
- f. Provide tree landscaping that is proportionate to the overall parking lot size, with generally 1 tree for every 8 parking spaces.
- g. Where parking areas are adjacent to a public sidewalk provide buffers between parked vehicles and the sidewalk to visually screen the parking area.

3.3.5.3 Public Art and POPS (Privately Owned Publicly-Accessible Spaces)

Public art is a key component to public expression and establishing a community’s unique identity. Public art pieces act as landmarks, and help to beautify the public realm, increasing civic pride and promoting inclusiveness. They reinforce a sense of place, and are recognized in the City of Kingston as key indicators of vibrant cities competing to attract new businesses, families and tourism. Guidelines that apply to public art in the streetscape include:

- h. The design and location of public art should be a collaborative effort between the public and private sector, artists and members of the community.



Figure 3-17: Street lighting can enhance the public realm and facilitate wayfinding

- i.** Public art should be visually accessible and easily maintained.
- j.** Public art should be located at key intersections, gateways and POPS to denote special places in the Intensification Areas.

A privately owned publicly-accessible space (POPS) is a privately-owned and maintained space that is open for use by the public. POPS should be:



Figure 3-18: Moveable street furniture in the public/private interface

- a.** Designed for pedestrian comfort, safety, access, and circulation.
- b.** Designed to integrate with the adjacent public realm by incorporating similar materials, furnishings, and styles.

3.3.5.4 Commercial / Retail Amenity Spaces

At the interface of the public and private realm is often the location for spillover commercial / retail amenity space. Where proposed developments are facing corridors appropriate for local commercial or retail (such as Brock or Johnson), the following apply:

- a. A consistent and complementary pedestrian-scaled streetscape design including such elements as decorative and conventional paving, landscaping, lighting and signage.
- b. Areas for outdoor seating and sidewalk retail should be provided adjacent to retail and commercial frontages, to contribute to a vibrant public realm.
- c. Private spaces and activity areas, including building entrances, terraces and porches, should be oriented toward public streets to act as an interface between private and public spaces and enliven the public realm.
- d. Street furniture, such as seating, waste and recycling receptacles and bicycle racks, should be provided at appropriate locations and regular intervals.
- e. Outdoor amenity spaces should provide both planted and paved areas.
- f. Careful design of the commercial/retail façade should reinforce the pedestrian-oriented vision and ensure a vibrant public realm.



Figure 3-19: Outdoor amenity space with street furnishings

- a. Pedestrian-scale lighting can be used creatively to enhance the night image of the commercial/retail area.
- b. Clear fenestration facing public areas should be provided to promote a visually active façade and provide passive surveillance.

3.3.7 Utilities

Concealing service infrastructure and utilities contributes to attractive streetscapes. Utilities should be considered as an integrated component of building design and the public realm. Design of utilities should:

- a. Enhance the streetscape by hiding and combining utilities.
- b. Bury utilities below grade in urban residential communities.
- c. Use joint utility trenches for access and maintenance benefits.
- d. Group above-grade utilities in a single location chosen based on access, street hierarchy, and location of stormwater facilities, parks and other open space components. Avoid grouping or placing above-grade utilities directly in front of homes or businesses.
- e. Incorporate utilities into multi-unit building design. This includes utility cabinets, transformer vaults, hydro meters and gas meters. Where this is not possible, place utilities in discrete locations screened from public view, where they will not interfere with pedestrian movement or transit stops.
- f. Explore new and innovative solutions for integrated utility services to minimize street clutter. Products that incorporate street lighting and telecommunication facilities within the same pole are encouraged.

3.3.6 Servicing and Loading

Where servicing and loading areas are required, they should not be visually obtrusive.

- a. Loading docks and service areas should be located at the side or rear of buildings and should be screened from public view.
- b. Where possible, garbage storage areas should be accommodated internally.
- c. Servicing enclosures should be constructed of materials that complement the main building (e.g. no chain link fencing).
- d. Service and refuse areas should be paved with an impervious surface of asphalt or concrete to minimize the potential for infiltration of harmful materials.
- e. Service and refuse areas should not encroach into the exterior side or front yard set-back.
- f. Loading and service areas may occupy the full rear yard if adequate landscape edge and buffer treatments are provided



3.4 Transitioning Elements

In order to address issues of compatibility between higher density buildings or areas and lower density residential uses or neighbourhoods, transitioning elements are required. These elements should be applied in a context-based, site-specific way that will encourage planned growth, while allowing for greater compatibility with lower density residential areas. Transitioning should be balanced with respect to sustainable building practices and housing affordability while minimizing built form visual impacts. These elements are described in general below and demonstrated in **Figures 3-21 to 3-30**.

- **Building Separation and Spacing** is an essential consideration when looking at the transitioning of densities. Development proposals should provide adequate separation between adjacent buildings and incrementally reduce or increase the spacing along the length of the transition zone to align with adjacent existing development. Buildings which have existing lower densities at the rear may achieve separation through incorporating a rear lane and parking as well as a defined landscaped edge (e.g. trees and planting) along the property line. Additional landscape buffering to adjacent residential uses would apply from the parking area.
- **Ground Floor Treatments** should be consistently designed to transition from commercial/public to residential/private uses and have an overall positive impact on the character of the street by ensuring the existing character of the street is reflected in the building design. This may

include incorporating architectural features, materials, colours or other elements that are characteristic of the neighbourhood.

- **Lot Size and Gross Density** are typically applied throughout a zone. Within transition areas, a more incremental approach may need to be considered for redevelopment. New development through the consolidation of lots would be allowed minimum and/or maximum lots sizes to incrementally change to align with that of the higher or lower density areas.
- **Setbacks and Stepbacks** can be used effectively to create a consistent relationship between a street and the buildings that frame it. **Stepbacks of the upper storeys** of buildings (i.e. above the 3rd or 4th storey, the building face is setback a set distance) reduce a pedestrian's perception of overall building height, as well as shadow and wind impacts on the street. Stepbacks could be implemented to create a continuous building height along streetscape frontages, reduce visual impact on adjacent neighbourhoods and buildings, prevent or reduce overlook of adjacent properties, and provide access

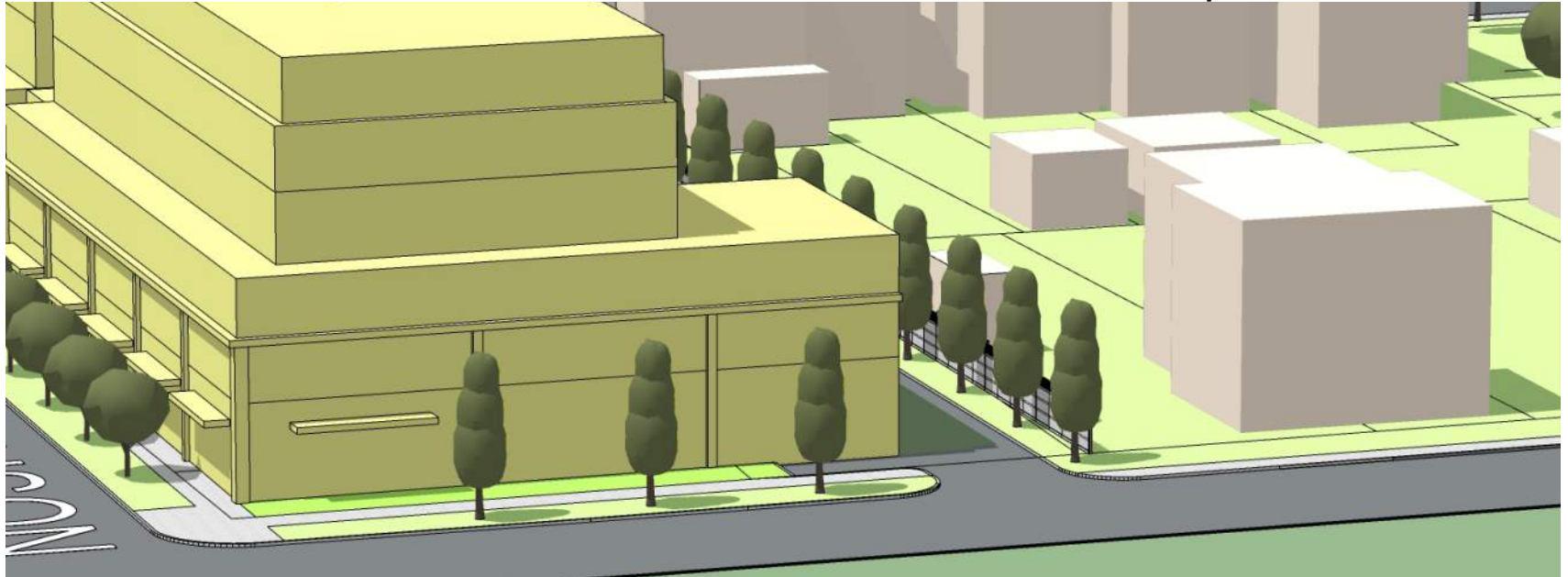


Figure 3-20: Built form transition through lower massing form



Figure 3-21: Built form transition using separation and landscaping

to sunlight for neighbouring uses. Consistent **setbacks** create a continuous street wall and building façade line that frames the street. Proposed development should maintain this proportional streetscape condition between existing and new development. For larger redevelopment areas where there are significant transitions between densities, the setback will be as outlined in the Zoning By-law and will have consideration for, but not be dependent on the adjacent context.

- **Facade Rhythm and Articulation** is an essential consideration when looking at the transitioning of higher densities. Development proposals should consider the spacing between adjacent buildings and look to incrementally reduce or increase the spacing along the length of the transition zone to align with adjacent existing development. Articulation of continuous block development is also required to create a pedestrian visual scale.
- **Transitional Building Height** permits a gradual change in building height along the length of a transition area. Building heights should establish appropriate height transitions to existing adjacent developments, and suitable interfaces with adjacent streets, lanes, intersections, and open spaces. Compatible height and massing for new residential buildings are required adjacent to existing dwellings and in existing neighbourhoods to avoid appearing out of scale or visually dominating.

The planning and design of new development will require sensitive consideration of how that development transitions to existing residential uses and adjacent mature neighbourhoods. The aim is to protect privacy, views and minimize shadowing impacts on adjacent properties. The following guidelines should apply to all new mid-rise to tall development in Central Kingston:

- a. Built form transition may be achieved by incorporating transitioning elements, such as separation distances, stepbacks of upper storeys, or by providing buffer spacing between buildings using elements such as parkettes, plazas, or streets.
- b. Where separation / spacing is not feasible, building wall height could transition using massing articulation, varied height and stepbacks.
- c. Buildings adjacent or opposite one another should be compatible in massing and height. Extreme variation in massing and height should be avoided, where possible.
- d. The side and rear of buildings abutting low-rise residential properties should generally be of similar height as the residential dwellings or should be stepped back to maintain an appropriate scale and transition in relation to adjacent residential uses.

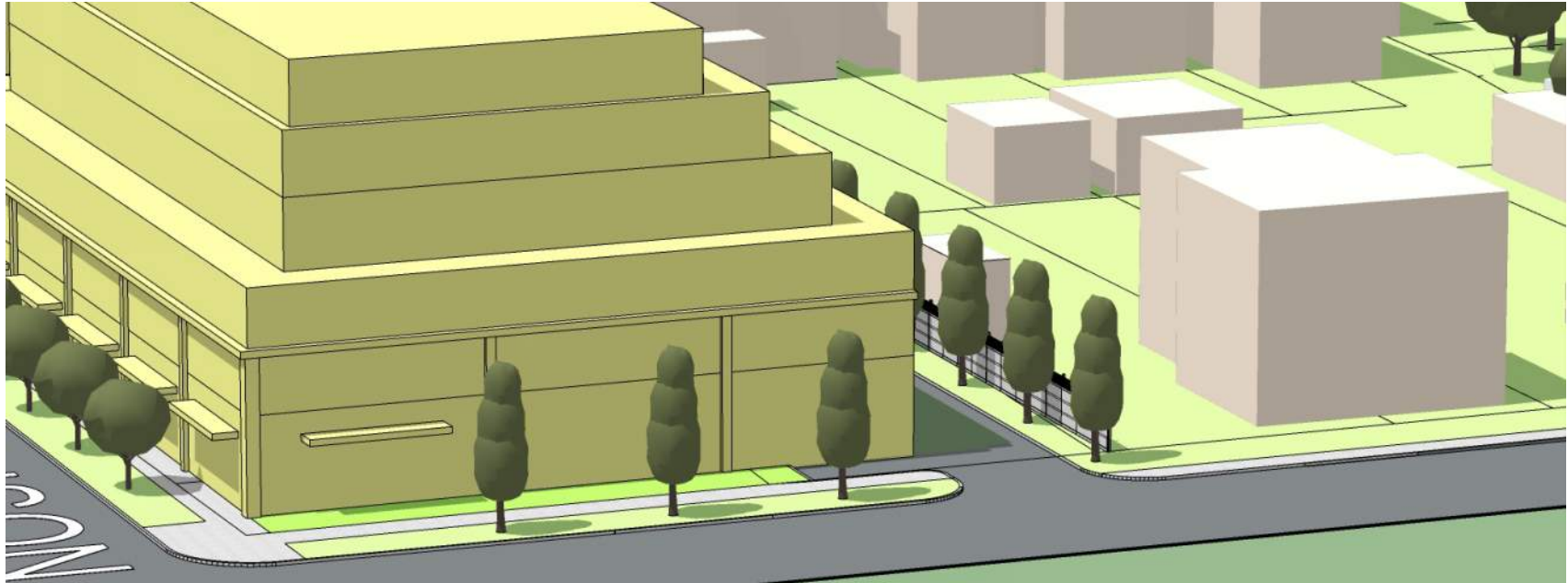


Figure 3-22: Built form transition through stepping back transition



Figure 3-23: Built form transition using building typology (townhomes)



3.5 Intensification Areas - Area Specific Guidelines

3.5.1 Johnson and Brock Expansion Area

This intensification area is envisioned to have active and vibrant street frontages along the established corridors of Johnson and Brock Expansion Area which may include active streets and the provision of facilities and outdoor spaces associated with student residences and university services.

In addition to the general public and private realm guidelines, the following key design characteristics should be considered:

- a. Buildings should generally be mixed-use and multi-unit residences of 6 storeys in height.
- b. Provide enhanced pedestrian streetscape treatments through decorative paving and street furniture.
- c. Buildings should include a stepback at the 5th storey as per the ZBL along the street frontage to create a more pedestrian scaled street edge.
- d. Mixed-use and multi-unit residential buildings should include weather protection interfaces with the pedestrian boulevard in the form of canopies.
- e. Buildings are encouraged to have an increased setback at grade to accommodate patios.
- f. Along Brock Street, park space also provides the opportunity to plant larger deciduous shade tree species, where feasible and not in conflict with utilities. A second row of street trees may also be located on the park side of the sidewalk along Brock Street, where feasible.



Figure 3-24: Proposed Intensification Sites in the Johnson and Brock Area



Figure 3-25: Example of potential development forms for Johnson Street and Brock Street



Figure 3-26: Taller buildings may be permitted opposite parks as they have a lower visual impact adjacent to an open space on the opposing street side

3.5.2 Portsmouth and Johnson Corridors

The intersection of Portsmouth and Johnson, and the Portsmouth corridor opposite St. Lawrence College is envisioned to include lower multi-unit building types such as stacked townhouses to low-rise apartments. The intensification should concentrate on orienting new development to face the street to address the street edge and provide a pedestrian-scaled and comfortable streetscape. In addition to the general public and private realm guidelines, the following key design characteristics should apply:

3.5.2.1 Portsmouth Corridor

- a. Where feasible, continuous street tree planting should be accommodated in the boulevard.
- b. Where feasible, provide enhanced pedestrian streetscape treatments through decorative paving and street furniture.
- c. Buildings backing onto existing residential areas will provide massing and height variations and a visual transition between new development and existing low-rise dwellings, including breaks in contiguous block frontages and setbacks.
- d. Where lots have been assembled that are currently rear lotted along Portsmouth Avenue and face onto local streets, built form should have dual frontages or provide a design that has units also fronting the internal streets to provide enhanced streetscape character on all street frontages.
- e. Where lots are assembled along the corridor, mid-block pedestrian walkways should be provided, creating direct pedestrian connections from interior residential streets.

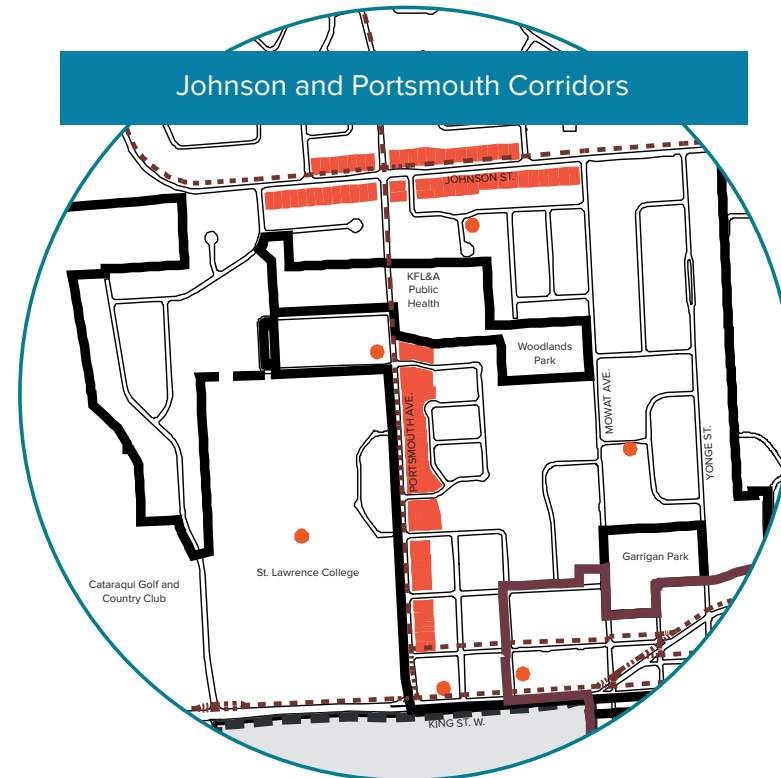


Figure 3-27: Proposed Intensification Sites in Johnson and Portsmouth Area



Courtesy of Google



Courtesy of Google

Figure 3-28: Examples of townhouse development blocks for Portsmouth Avenue

Mid-block walkways in this area should include landscaping, have flanking units with active flankage elevations and clear glazing, and be well lit to increase passive surveillance and safety.

3.5.2.2 Johnson and Portsmouth

- a. Continuous street tree planting should be accommodated in the boulevard.
- b. Where feasible, provide enhanced pedestrian streetscape treatments through a wider pedestrian clearway, decorative paving and street furniture.
- c. Buildings backing on to existing residential areas will utilize transitioning elements such as massing and height variations to transition between new development and existing low-rise dwellings.
- d. Where townhouse developments are proposed, parking should be located at the rear or below grade.
- e. Where townhouse built form is proposed, a minimum front yard setback should allow for tree planting/landscaping and separation distances for privacy from the street for at-grade residential units.

3.5.3 Sir John A. Macdonald & Bath Road

The Kingston Centre Plaza Area presents a significant opportunity for the creation of a comprehensive development plan along Sir John A. Macdonald Boulevard and Bath Road. Being centered around the blocks that also front Wright Crescent provides for opportunities to have future development address both the internal and external street frontages. In addition to the general public and private realm guidelines, the following key design characteristics should be considered:

- a. Proposed intensification should generally be mid-rise to tall building multi-unit form as appropriate to road widths and to the immediate context;
- b. Blocks should include built form frontages along both Wright Crescent through a continuous podium, where appropriate and/or a complex of buildings where a continuous podium is out of scale for the block or its adjacent context;
- c. Access to parking shall be from Wright Crescent and below grade parking or a parking courtyard screened from the street frontages should be provided;
- d. Large parking areas should be broken up into smaller courts of parking divided by landscaping and include planted medians wide enough to accommodate tree planting;
- e. Defined walkways should be provided within new development to provide a safe connection between rear parking areas and rear entries to a building; and,
- f. Locate service areas including loading and garbage, in locations that are not directly visible from the street and/or

provide screening through landscaping or integrated wing wall in the building design.

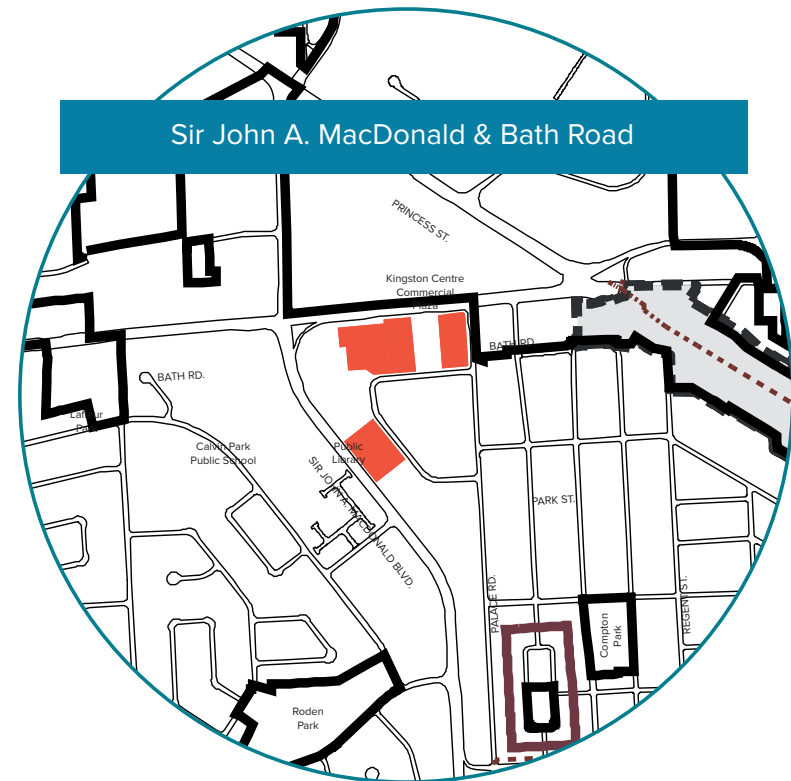


Figure 3-29: Proposed Intensification Sites in Sir John A. MacDonald & Bath Road Area



Figure 3-30: Example of potential development forms for Sir John A Macdonald and Bath Road



Courtesy of Google

4.0 Glossary of Terms

The following glossary provides definitions of common urban design elements and terms and their importance to neighbourhood character.

The glossary definitions provided here are to be referenced for the purposes of this document only.

Front Yard Setback.

The distance between the front of a building and the front facing property line is an important unifying element as it frames the street and creates a rhythm of front yards.

Side Yard Setback.

The distance between the side of a building and the side yard property line defines a sense of permeability in the community.

House Separation.

The separation distance between two houses is the total wall face to wall face depth measured between two adjacent properties, and provides a sense of uniformity in communities.

Mature Tree Planting and Location.

The type, size and location of existing planting can be a unifying characteristic in a community.

Sidewalk Location.

The width and location of a sidewalk relative to adjacent properties and the existing roadway can be an element that is consistent throughout a community.

Front Walkway Treatment.

Front walkways can be grouped together or separated. A consistent design approach is encouraged to create a unifying treatment.

Garage and Driveway Location and Size.

The design, location and size of a garage or driveway can have a significant impact on the streetscape and character of a community. Areas that are built during the same era typically have the same approach to the design of driveway and garages. This is not to be confused with front yard parking which is discouraged in the City of Kingston.

Rear Lane.

Laneways along the rear of a property provide a means of secondary access, typically used for parking / access to a garage, and/or as utilitarian service corridor (i.e., garbage pick-up, emergency access routes).

Lot Width.

Minimum and maximum lot widths (side lot line to side lot line) establish a pattern of ownership along the street. Controlling the width of a property in conjunction with other measures should ensure the rhythm of building to landscape area is maintained.

Building Size.

The size of a building is typically measured in the total height and floor areas of the structure. When this is considered in relationship to the total property area a consistent approach to building size can be established.

Façade Materials and Cladding.

The materials used to build houses vary significantly between neighbourhoods. Neighbourhoods built in the same era typically employ a similar material palette.

Number and Height of Storeys.

The variation between the permitted number of storeys and their heights can create a unified street character. Varying approaches to peaked and flat roofs are also a compatibility consideration.

Window Scale and Proportion.

Location, size and framing can create continuity along the street and within the community. This is particularly evident in areas where buildings have small side yard separations.

Heritage Character.

The overall heritage character of a block, adjacent building, or neighbourhood has a substantial effect on the overall compatibility of the community. A collection of features,, materials, proportions, rhythms of openings, architectural detailing, locations of buildings and landforms, trees, landscaping and setting that have collectively, through history, contributed to the sense of place, beauty and continuity of an area and which sets it apart from other parts of the City.

Ground Floor Uses.

How a building and its internal uses are oriented towards the street has an impact on community character. When public rooms (living rooms, kitchens, etc) face the street at grade, there is a more engaged relationship between the building users and the street. When bedrooms, washrooms or garages face the street, the relationship is less connected.

MEMO

TO: Sukriti Agarwal, City of Kingston
FROM: Jennifer Sisson, John Tassiopoulos, Michael Flowers, Meir Klein and Andrew Wallace
SUBJECT: Assumptions for the Servicing and Infrastructure Assessment
DATE: July 23, 2021

ASSUMPTIONS FOR THE SERVICING AND INFRASTRUCTURE ASSESSMENT

The following are the assumptions made for the servicing and infrastructure assessment.

INTENSIFICATION AREAS

As shown in the attached maps, the intensification areas were identified through public consultation, background research and iterative design and discussion with relevant stakeholders, including the City of Kingston. These areas are broken down into 3 main areas: Johnson and Brock Expansion Area, Portsmouth Avenue Expansion Area and Sir John A. MacDonald and Bath Road Area, as shown below. The intensification area at Johnson and Brock has been slightly reduced from the time this study was completed, but no further update was required for the Servicing and Infrastructure analyses as part of this study. The original area used for the calculations below are contained in the Area Maps, attached.



DENSITY ASSUMPTIONS FOR THE INTENSIFICATION AREAS

As shown in the attached excel chart (**CKGS_Density Calculations_2020.10.01**), assumptions for density within the proposed intensification areas was completed either as a corridor, or using Units per Hectare, based on industry standards for townhome and mid-rise developments, and the Persons per Unit standard rate for the City of Kingston (2.3). The corridor approach looked at a low and high ranges

for potential build-out, factors considered included 90m² vs. 70m² units, 22m vs. 24m building depths, and ground floor retail vs. all storeys being residential, to provide a conservative and less conservative range of estimates, respectively. These created low- and high-end unit estimates and total persons based on the above assumptions.

It is to be noted that the intensification area at Johnson/Brock has been refined from the time this study was completed, but no further update was required for the background Transportation, Servicing and Infrastructure analyses, as these service reviews detailed herein looked at a higher population scenario.

PHASING ASSUMPTIONS FOR THE INTENSIFICATION AREAS

Based on coordination with the City of Kingston, phasing assumptions for future development of the intensification sites are as follows:

Short term (0-10 years)

- Sir John A MacDonald and Bath Road Area, (as shown in attached **Area 4_Wright Crescent map**) and the Queens Campus Expansion Area south and east of University and Johnson (as shown in attached **Area 1_Johnson and Brock map**) are anticipated to be developed in the short-term (10yrs) due to current demands and development pressure.

Mid-term (10-20 years)

- Johnson and Brock east of University (as shown in attached **Area 1_Johnson and Brock map**).
- Portsmouth corridor (due to pressures around St. Lawrence), labelled as Area 3 in attached **Area 2+3_Johnson and Portsmouth map**.

Long-term (20+ years for full build out)

- Johnson and Brock west of University would be longer-term (full build out), based on near-campus needs (as shown in attached **Area 1_Johnson and Brock map**).
- Johnson at Portsmouth, labelled as Area 2 in attached **Area 2+3_Johnson and Portsmouth map**.

ESTIMATION OF ELECTRICAL LOAD IN THE INTENSIFICATION AREAS

Four areas, shown on the attached maps, were considered for intensification. The previous calculations have been updated to the latest electrical load calculations as of May 2020. The computation of the electrical load demand for each new block/building in these areas is based on guidelines in the Ontario Electrical Safety Code (OESC) and a number of assumptions, listed below.

For each area/block, electrical demands are provided for a high-density alternative (dwelling unit size of 70 m² and lot depth of 24 m) and for a low-density alternative (dwelling unit size of 90 m² and lot depth of 22 m).

Assumption

- I. Electrical load and diversity factors for residential buildings based on OESC, Section 8-202
- II. Residential units will have an electric range and dryer
- III. Electrical load of commercial/retail space based on OESC, Table 14
- IV. Number of EV charging stations: 20% of the number of dwelling units
- V. Each EV charging station will be equipped with a level 2 charger rated at 5 kW
- VI. Natural gas will be used for winter heating

- VII. Air conditioning will provide cooling in the summer, and will add 1.5 kW/unit (1)
- VIII. Power factor for winter and summer loads: 0.9

(1) WSP's Building Services Specialist, Malcom Wallace, FCIBSE advised on the AC load

Refer to **High & low density electrical demands – May 6, 2020. Xlsx** excel sheet for the load calculations and additional details.

ASSUMPTIONS FOR GAS CALCULATIONS

- Furnace – 100% are assumed to use gas. Capacity was chosen based on Trace 700 calculations and typical furnaces commonly available. Townhome units as they typically have more wall/window/roof per unit.
- Hot Water – assumed to be in 90% of the residences.
- Gas Range – 10%=15% of units were assumed to include a gas range. 5% in townhouse units where upgrades may occur more frequently.
- Gas dryer – 10%-15% of units were assumed to include a gas dryer. 5% in townhouse units where upgrades may occur more frequently.

As per the November 24, 2020 Servicing Comments, UK indicated that a review has been performed upon the natural gas system. The preliminary modelling indicates that upgrades will be required, but that further studies, internal to UK, will be required for a final determination. A preliminary upgrade cost of \$7M was provided based on the preliminary review, but the number is indicated to be variable based on the upcoming further UK studies on their piping model.

Refer to **Mechanical Load Calculation – UK by ID.xlsx** excel sheet for the load calculations and additional details.

ASSUMPTIONS FOR SANITARY SERVICING AND CALCULATIONS

The calculation and assessment of increased sanitary loading from intensification sites to the Central Kingston collection system is reviewed for impacts to local sewers and calculated total flows generated to trunk sewers will be provided to Utilities Kingston for the analysis of system facilities and impacts to the combined sewer system. Design assumptions are based on the growth scenario and Central Kingston design criteria presented in the City of Kingston Water & Wastewater Master Plan. A number of assumptions, for the calculations will be as follows:

- I. Impacts to local sewers will be reviewed following the City Subdivision Development Guidelines and Utilities Kingston Technical Standards. An Infiltration Rate of 0.14 L/s/ha and Flow of 350 L/cap/day will be applied. Local combined sewers will be identified in the analysis and contributions from stormwater sources will be adjusted on a case-by-case basis based on lot coverage.
- II. Local sewer peaking factors will follow the Harmon Peaking Factor method.
- III. Review of local sewer capacities will be based on the provided As-Built drawings and GIS information received.
- IV. Existing lots not to be intensified which contribute to local sewers impacted will be accounted for using the City of Kingston Wastewater Master Plan design criteria assumptions for Commercial, Residential, Industrial, and Institutional properties as applicable.
- V. Short-Term projection flows for trunk sewer analysis will be assigned to the 2026 Model Scenario
- VI. Medium-Term projection flows for the trunk sewer analysis will be assigned to the 2036 Model Scenario

- VII. Long-Term projection flows for the trunk sewer analysis will be assigned to the Full Build-Out Model Scenario
- VIII. Each calculated ADF for intensification site locations in the study area will be assigned to a GIS shapefile point file based on their location in L/s.
- IX. Wastewater average daily flow calculation will be provided in excel document format.

Excel spreadsheets are attached showing the baseline calculations. The calculations in the sheets include additional details and flow calculations for existing properties and density calculations for intensification sites. These sheets show the detail and base assumptions for local sewers in the **Sanitary Flow Intensification Areas_Mar 2020_v3.xlsx** spreadsheet. The total site contributions by projection year is detailed in the **Sanitary Serviceability Analysis for proposed intensification areas_Mar 2020_v5.xlsx** spreadsheet.

ASSUMPTIONS FOR WATER SERVICING AND CALCULATIONS

The calculation and assessment of impacts of increased water demand and usage from intensification areas to local sewers is reviewed by following the density assumptions for site development. Design flow assumptions are based on the growth scenario and Central Kingston design criteria presented in the City of Kingston Water & Wastewater Master Plan. A number of assumptions, for the calculation will be as follows:

- I. Short-Term projection flows will be assigned to the 2026 Model Scenario
- II. Medium-Term projection flows will be assigned to the 2036 Model Scenario
- III. Long-Term projection flows will be assigned to the Full Build-Out Model Scenario
- IV. Fire Flow Calculations to follow the Fire Underwriters Survey (FUS) method.
- V. Average Day Flow (ADF) will be calculated for sites in L/s. With a base assumption of 350 L/cap/day for residential demand following the Water Master Plan design criteria for Central Kingston
- VI. Each calculated ADF and Fire Flow for intensification site locations in the study area will be assigned to a GIS shapefile point file based on their location.
- VII. Water demand calculation will be provided in excel document format.

Excel spreadsheets are attached showing the baseline calculations and assumptions used. The calculations in the sheets include additional demand calculations for existing properties and density calculations for intensification sites. These sheets include **Water Demands_Intensification Areas_Mar 2020_v9.xlsx** and the Fire Underwriters Survey (FUS) baseline calculations and assumptions in the excel sheet entitled **Intensification Area_FUS_2020 May_v1.xls**.

ASSUMPTIONS FOR STORMWATER MANAGEMENT AND CALCULATIONS

The calculation and assessment of impacts of stormwater runoff caused by the development of intensification sites are reviewed for local storm sewers and streetscapes assuming changes to the lot coverage from larger buildings. Sites are reviewed for the worst-case lot coverage assumption and a sensitivity analysis is conducted for different site development policy recommendations following the review of Low-Impact Development in accordance with the Ministry of Environment, Conservation and Parks (MECP) Best Management Practices (BMPs) for Stormwater Management. The following calculation assumptions are as follows:

- I. A minimum 30% pervious area to remain for all proposed intensification areas.
- II. Campus Expansion Area's (CEAs) may be developed at up to 50% pervious area (landscape/open area). Sites will be reviewed for both 30% and 50% pervious area lot coverage.
- III. Pre vs. Post conditions will be reviewed for the assessment to identify sewer capacity constraints and system upgrade opportunities.

- IV. Evaluation of existing conditions will be based on latest available ariel photography and storm catchment information (Received GIS).
- V. Review of local sewer capacities will be based on the provided As-Built drawings and GIS information received.
- VI. Storm calculations for sewers will follow the City of Kingston Technical Standards and Specifications.
- VII. Lot quantity and quality calculation in accordance with MECP BMPs

Additional details and assumptions used for the baseline calculations for stormwater runoff and sewer capacity checks are summarized by intensification area in three separate excel sheets as follows:

- 18M-00139-00_Growth and Infill_Stormwater Area 1.xls
- 18M-00139-00_Growth and Infill_Stormwater Area 2 and 3.xls
- 18M-00139-00_Growth and Infill_Stormwater Area 4.xls



MEMO

TO: Sukriti Agarwal - City of Kingston

CC: Chris Tyrrell, Jennifer Sisson, Michael Flowers, Ben Worth, Malcolm Wallace – WSP, Mike Szilagyi – City of Kingston

FROM: Shawn Smith, P.Eng., M.Eng.

SUBJECT: Central Kingston Growth Strategy – Transportation Review of Intensification Areas

DATE: July 28, 2021

TRANSPORTATION REVIEW OF INTENSIFICATION AREAS

1. INTRODUCTION

As part of the transportation review for the Central Kingston Growth Study (CKGS), an analysis of three proposed intensification areas was undertaken. The CKGS study area consists of the inner suburbs and downtown Kingston except for certain areas (school campuses, North King’s Town, etc.). The study area is shown in dark gray in Figure 1, with the three intensification areas identified in blue.

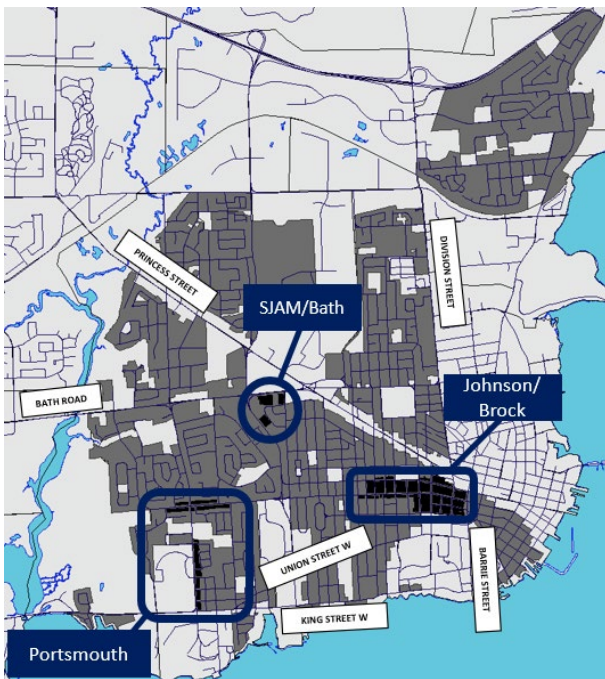


Figure 1: Central Kingston Growth Study Area

Suite 300
2611 Queensview Drive
Ottawa, ON, Canada K2B 8K2

T: +1 613 829-2800
F: +1 613 829-8299
wsp.com



The three intensification areas are more closely shown in red in Figure 2. Two of the three intensification areas (Brock and Johnson Area & Portsmouth Avenue Area) are neighbouring the educational institutions. The third area (Sir John A. MacDonald & Bath Road Area) is opposite the Kingston Centre Commercial Plaza. The anticipated timing of the development of the intensification areas varies by locations. The Sir John A. MacDonald & Bath Road Area are expected to be developed within the next 10 years, whereas the Johnson/Brock Expansion Area and the Portsmouth Avenue Expansion Area are anticipated to intensify over the next 20 years. A greater breakdown is provided later in the report.

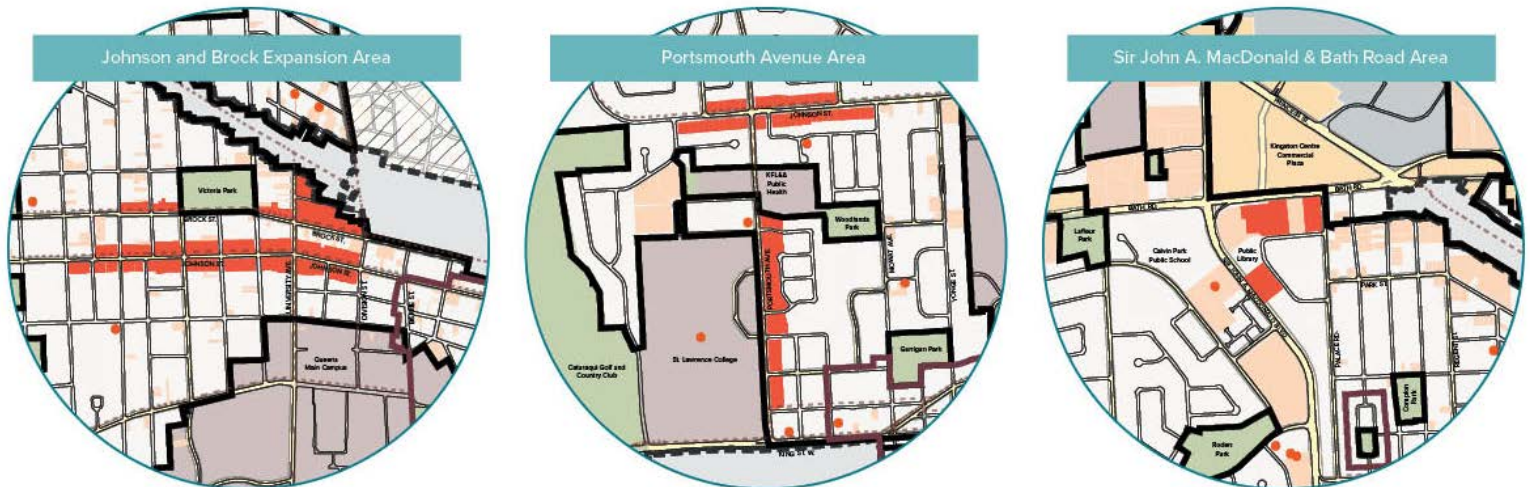


Figure 2: CKGS Intensification Areas

Note that, the intensification area at Johnson/Brock has been refined from the time this study was completed, but no further update was required for the background Transportation, Servicing and Infrastructure analyses, as they looked at a higher population scenario.

2. METHODOLOGY

Developed by the City of Kingston, the Kingston Transportation Forecast Model (“the Model”) is a representation of the PM peak hour in the Greater Kingston Area. The Model has been updated several times as part of updates to the Kingston Transportation Master Plan (KTMP). For the current transportation review, results from the most recent update of the Model were provided from Dillon Consulting Limited (“Dillon”) on January 17, 2020, giving insight into the future roadway demands to the year 2036 in the CKGS area. Existing (2016) and future (2036) land use changes (population and employment) were also obtained to supplement Model outputs.

Using this information along with City of Kingston transportation policies, the current and future transportation needs to and from the CKGS area were assessed. The assessment focuses on the proposed land use intensification areas and the surrounding roadway corridors that are near or exceeding capacity.

DATA LIMITATIONS

The following limitations for this analysis are:

- An analysis was undertaken using the data output from Dillon. There was no additional modeling conducted for this study
- All information received from Dillon (employment, population, and trip data) is presented by Traffic Analysis Zones (TAZs). While the granularity of the information is helpful, there are some TAZs that are partially included in the CKGS area. This lack of 1:1 comparison may have slightly affected the results.



- Data provided for the Model originates from the 2008 Household Travel Survey, as well turning movement counts from 2008 and 2013. It is possible that travel patterns have changed considerably since then. The City of Kingston is in the process of completing a new household survey, but it was not ready for this report.
- While the Model includes the City-wide growth projections, which includes some growth in the CKGS intensification areas, it does not apply the anticipated growth for these intensification areas at the block or traffic analysis zone level that has been identified through the Central Kingston Growth Study. Future modelling work could be done to better understand travel patterns due to the specific intensification nodes and microsimulations to understand localized impacts on traffic operations.
- The 2036 mode share in the Model differs slightly from the future mode share targets for the City. The output from the Model shows a greater auto mode share, and lower transit and active transportation mode share than the city-wide targets.

3. LAND USE

The CKGS area is comprised 41 TAZs which contain several land use types including residential, commercial, and office space. Population and employment are key determinants in identifying how land use will change over time.

POPULATION GROWTH

From 2016 to 2036, the population of the CKGS area is expected to grow by just over 10,000. As shown in Table 1, the annual growth rate of the CKGS is slightly greater than that of the City of Kingston.

Table 1: Future Population Growth (Source: Dillon Consulting Limited)

	2016	2036	Annual Growth Rate
CKGS Area	59,623	69,924	0.80%
City of Kingston	194,500	220,200	0.62%

From the Model results, most of the population growth within the CKGS (52%) is expected in the area northwest of the Princess Street/Bath Road intersection, as shown in Figure 3. Additional development is expected on Princess Street just east of the Bath Road intersection.

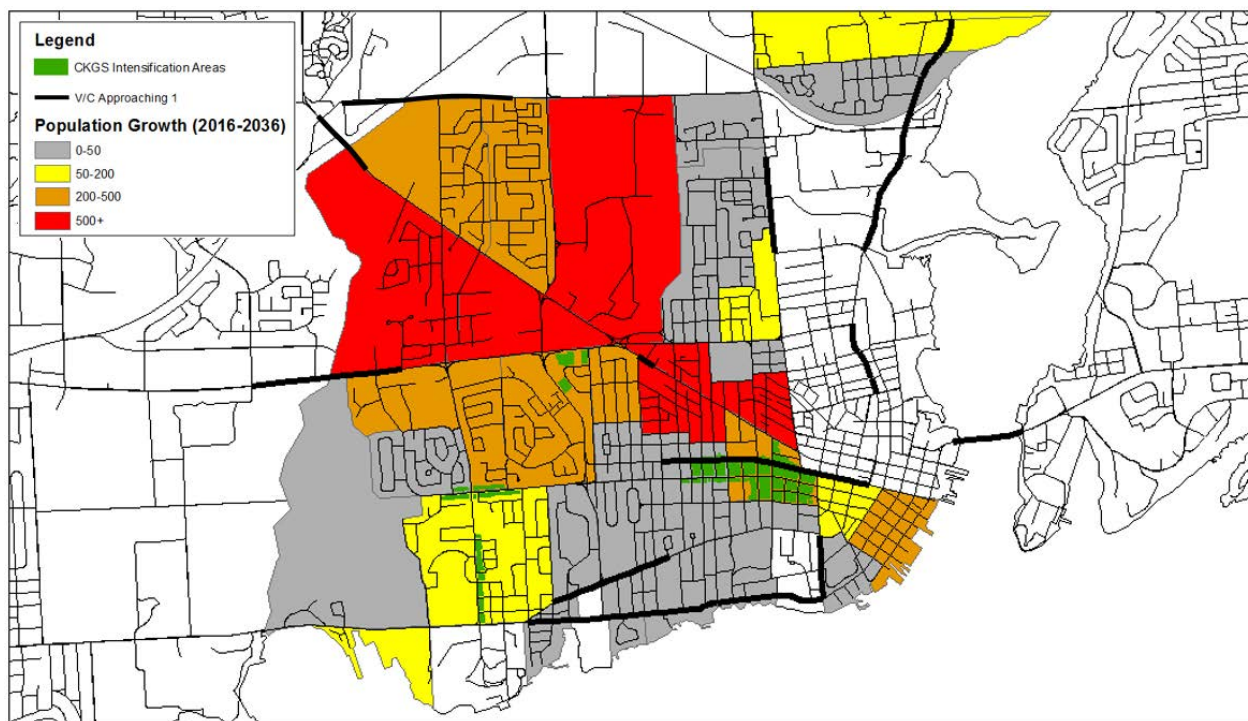


Figure 3: Map of Future Population Growth and Existing Transportation Corridors Near Capacity

EMPLOYMENT GROWTH

From the Model results, employment in the CKGS area is expected to grow at a slower rate than population (0.27% compared to 0.80%). Additionally, the annual growth rate for the CKGS area, as shown in Table 2, is less than that of the City of Kingston.

Table 2: Future Employment Growth (Source: Dillon Consulting Limited)

	2016	2036	Annual Growth Rate
CKGS Area	26,435	27,927	0.27%
City of Kingston	83,315	92,201	0.51%

There are two locations in the CKGS where most of the employment growth (75%) is expected to take place, as shown in Figure 4. From the Model results, the area just north of the Princess Street/Bath Street intersection is anticipated to produce more than 600 jobs, while the Kingston Downtown area is expected to create just over 400 jobs.

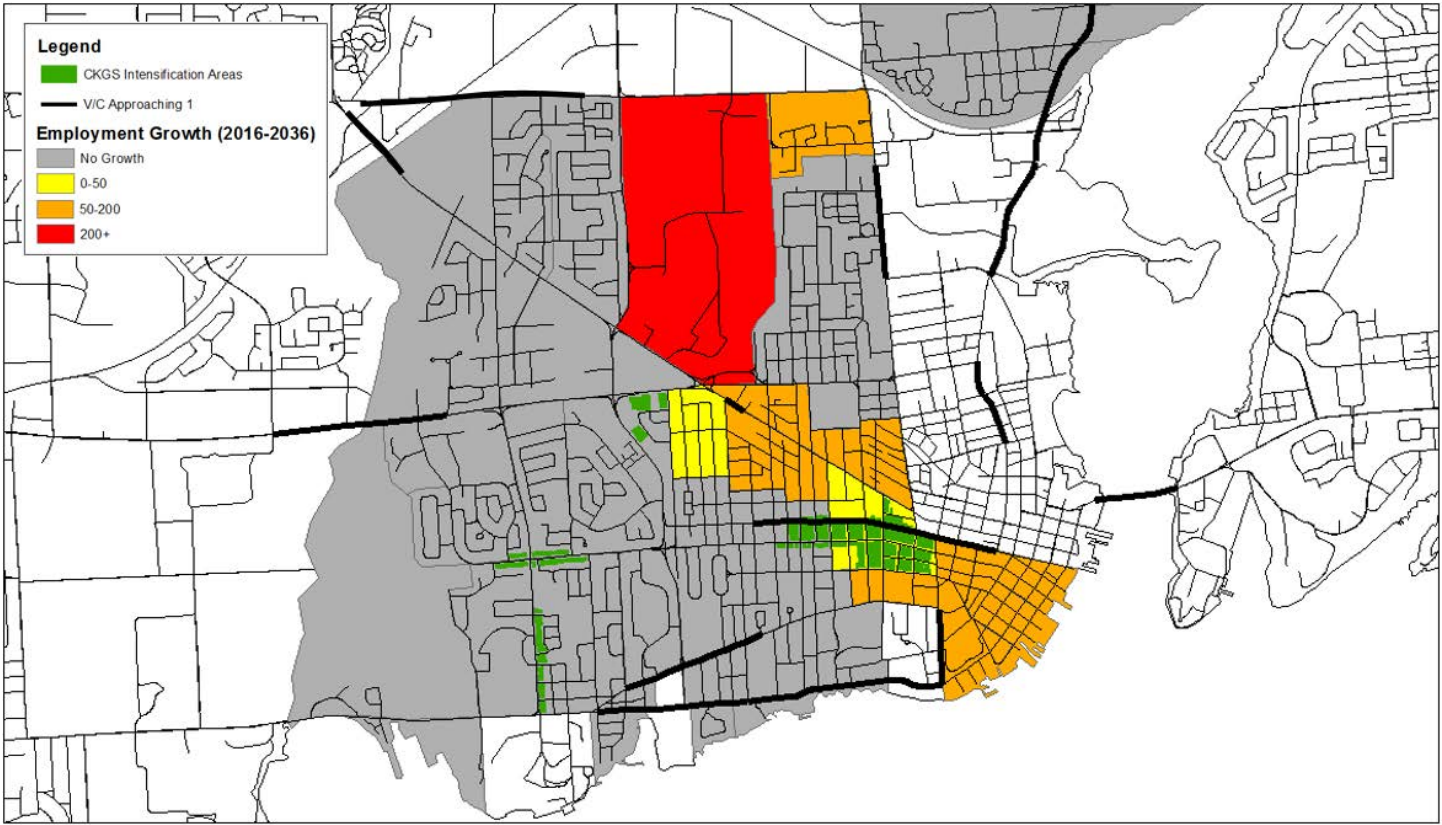


Figure 4: Map of Future Employment Growth



FUTURE LAND USE CONDITIONS

Finally, the future land use conditions for population and employment are presented in Figure 5 and Figure 6 respectively.

Figure 5 illustrates the significant anticipated number of people living near or around Princess Street and Bath Road in 2036. From the Model results, the TAZs with the highest projected population densities are found along Princess Street between Hillendale Avenue and Bath Road, as well as a large population at the northeastern edge of the CKGS area.

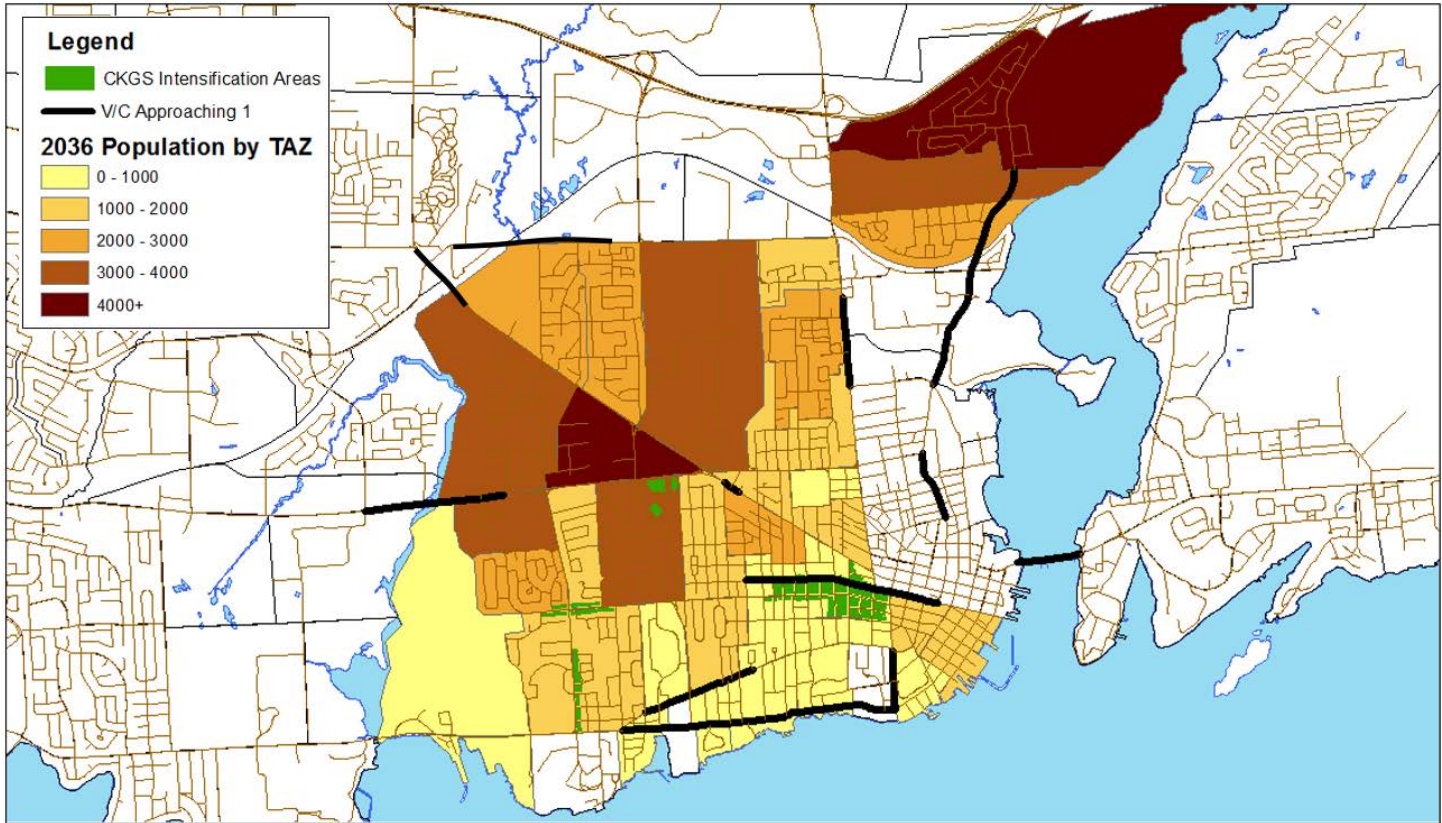


Figure 5: 2036 Population of the CKGS Area and Existing Transportation Corridors Near Capacity

The distribution of employment in 2036, as illustrated in Figure 6, indicates that just west of the intersection of Bath Road and Princess Street, and downtown Kingston are two primary employment hubs in the CKGS area. From the Model results, the highest density of employment within the CKGS is in downtown Kingston and the western half of Queen’s University Main Campus.

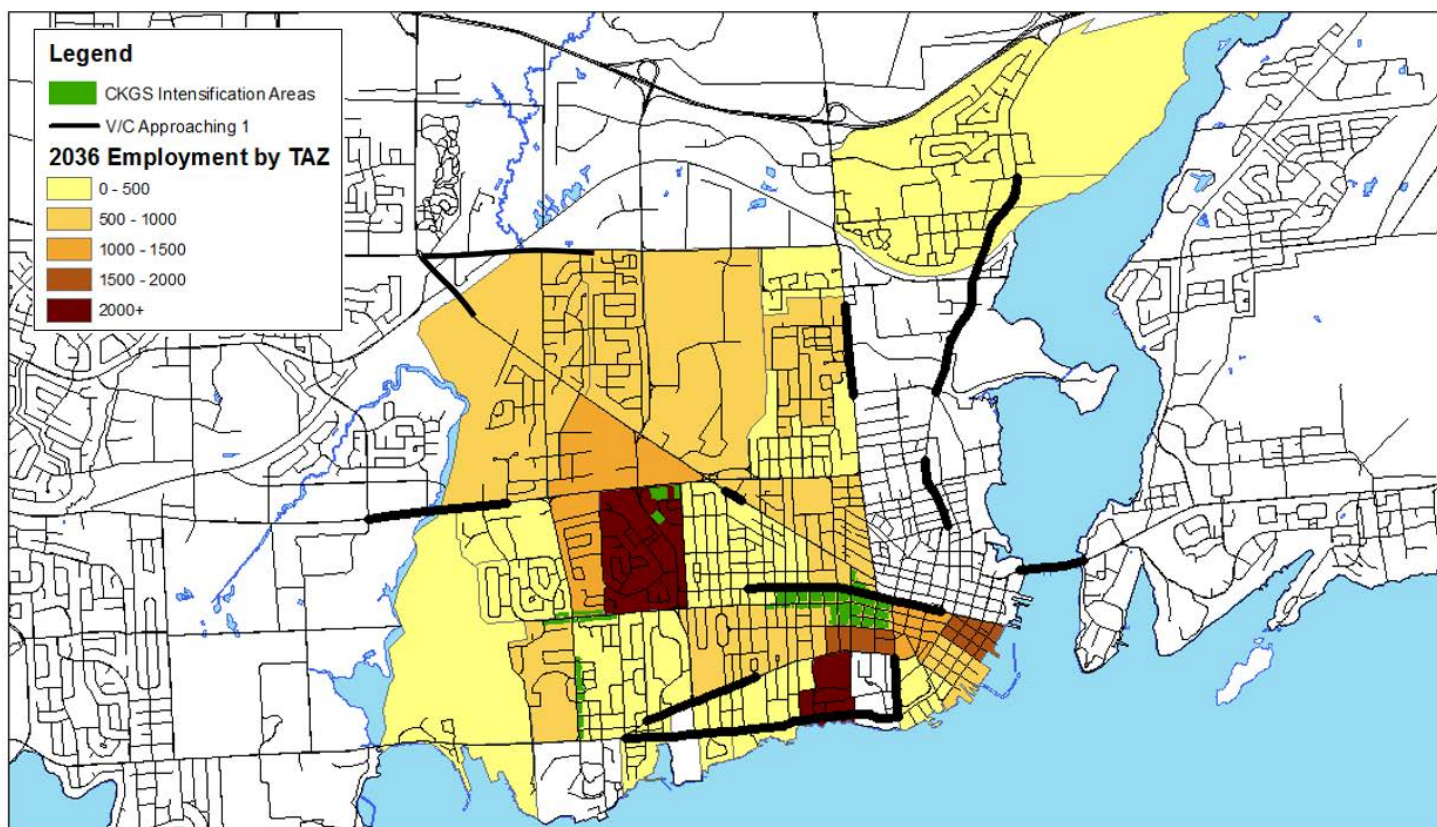


Figure 6: 2036 Employment of the CKGS Area and Existing Transportation Corridors Near Capacity

4. TRIP GENERATION

Along with land use information, the trip generation to and from each TAZ in the City of Kingston was provided and analyzed along with the mode of transportation and trip purpose.

TOTAL TRIPS

With the expected land use changes over time, the total trips in and out of the CKGS area are expected to increase. As shown in Table 3, there is an estimated increase of just over 13,000 trips in the CKGS area during the PM peak hour from 2016 to 2036. Additionally, from the Model results, the annual growth rate of trips to and from the CKGS area is in line with that for the City of Kingston.

Table 3: Future Trip Growth

	2016	2036	Annual Growth Rate
CKGS Area	74,373	87,765	0.83%
City of Kingston	226,053	267,625	0.85%

From the Model results, there are three locations in the CKGS area that will produce the majority (70%) of the new trips. All three locations, as shown in Figure 7, coincide with the three intensification areas. The areas near the Brock and Johnson Corridor Area and the Portsmouth Avenue area are expected to produce and attract an additional 4,600 and 1,600 trips by



2036, respectively. Meanwhile, the area west of the Princess/Bath intersection is expected to produce an additional 2,850 trips. Some of these trips are expected start/finish across from the Sir John A. MacDonald & Bath Road intensification area.

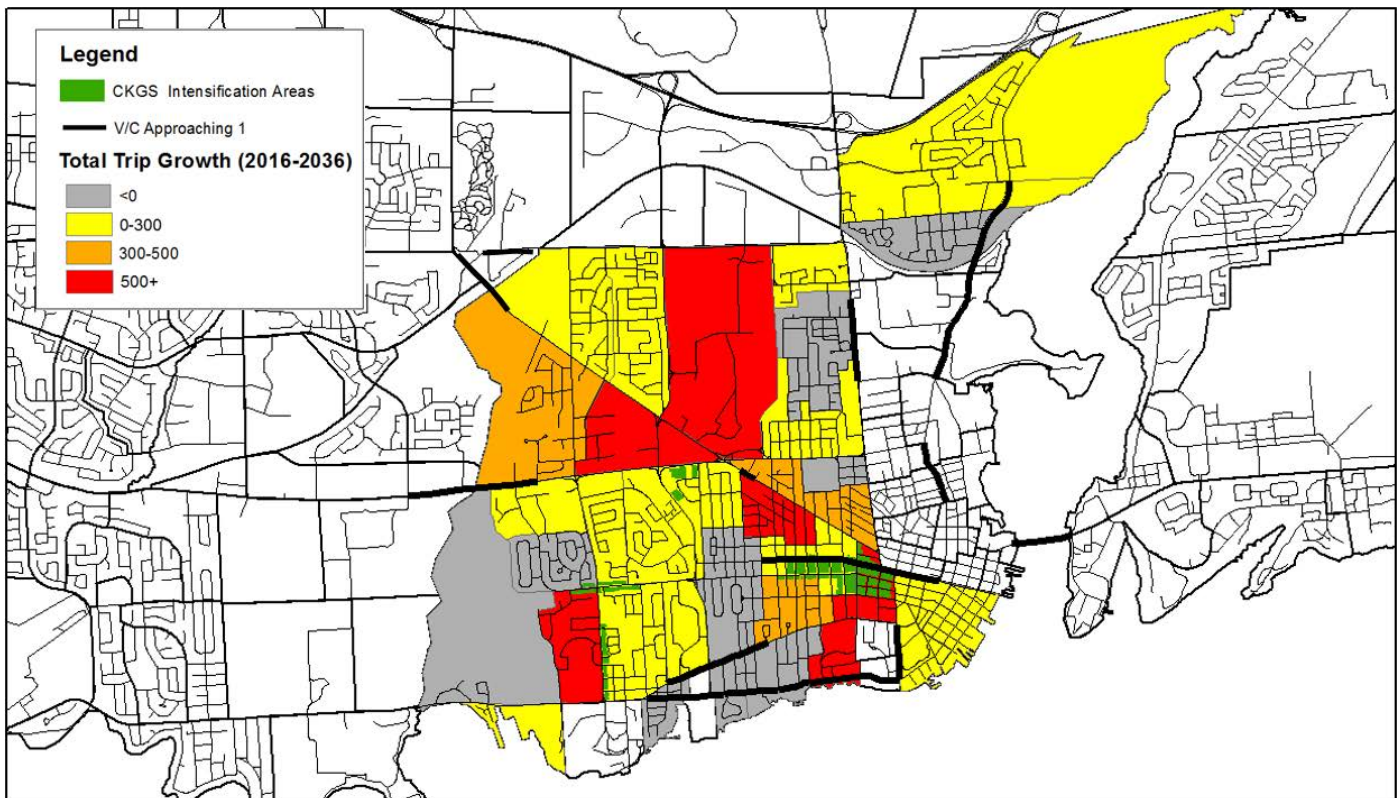


Figure 7: Map of Future Trip Growth and Existing Transportation Corridors Near Capacity

Many of the new trips (75%) are starting and ending west of the CKGS. It is expected that about two thirds of these new trips will access the CKGS by Princess Street, while the other third will travel along Bath Road. The number of trips travelling through Union Street and King Street W will remain constant. Finally, there are several areas expecting to see slight decreases in trips. While there is no discernable geographic pattern and the reductions are very minor, it is still noteworthy.

MODE SHARE

The future mode share targets set forth by the City are intended to increase the use of transit and active transportation as viable modes for commuting and personal trips as a measure to use the existing transportation assets most efficiently and ease the level of future capital expenditures to expand and upgrade the municipal road network. The City initially set mode share targets of 14% pedestrian trips, 3% cycling trips and 9% transit trips; these targets were increased through a council amendment upon receipt of the KTMP to 20% for active transportation (walking and cycling) and 15% for transit. The existing mode shares from the 2002 and 2008 Kingston household travel surveys (all trips), 2016 Census (only commuter-based trips) and the updated KTMP mode share targets (weekday PM peak) are summarized for comparison in Table 4. The trend is toward greater use of public transit and active transportation, and less reliance on auto travel, which is consistent with the direction the City is taking not to prioritize single-occupancy travel when making transportation investments. The City's "Walk 'n' Roll" Active Transportation Master Plan (ATMP) and Kingston Transit Business Plan support an increase in the non-vehicle mode share to meet the 20% active transportation and 15% transit targets, respectively.



Table 4: Development of Kingston Mode Share

Mode of Travel	2002 Household Survey	2008 Household Survey	2016 Census	2015 KMTP Target (Council Amendment)
Walking	11%	13%	9.2%	20%
Cycling	1%	1%	2.4%	
Public Transit	3%	5%	8.3%	15%
Auto Driver and Passenger	82%	76%	78.7%	65%
Other	3%	5%	1.2%	-

The mode share for existing and future conditions from the Model indicate that a gradual shift will have taken place city-wide and in the CKGS. While the mode share from the Model does not match the City’s targets for sustainable transportation, it does show an increase in non-auto mode share for 2036.

Table 5: Mode Share from The Model

Mode of Travel	City of Kingston		CKGS	
	Existing (2016)	Future (2036)	Existing (2016)	Future (2036)
Walking	15%	15%	21%	19%
Cycling				
Public Transit	5%	9%	6%	11%
Auto Driver and Passenger	80%	76%	73%	70%

PURPOSE OF TRIPS

As shown in Table 6, the number home-based work and other trips make up about two-thirds of the overall trips in the CKGS area. However, nearly half of the trip growth (46%) is expected from home-based school trips, i.e. from home to school or vice versa.

Table 6: Trip Growth by Trip Purpose in Central Kingston Growth Strategy Area

Trip Purpose	2016	2036	Increase in Trips
Home-Based Work	27,042	30,078	3,036
Home-Based Other	22,629	25,898	3,269
Non-Home Based	9,956	10,884	928
Home-Based School	14,745	20,905	6,160



Generally, school-based trips have higher non-auto mode share, while work-based trips have a higher auto mode share. The greater increase in school-based trips could play a role in the decrease in future auto mode share.

5. ASSESSMENT – CORRIDORS NEAR CAPACITY

In 2015, the City of Kingston highlighted road segments for existing conditions (2014) with a volume-to-capacity (v/c) ratio near, at or greater than 1.0. These corridors are illustrated in Figure 8. A v/c ratio is a percentage of available road capacity used and is a metric that determines the Level of Service (LOS) of a roadway. Traditionally, a v/c ratio limit of 0.9 (LOS D) has been used by the City of Kingston as a threshold to determine the need for road improvements; recently it was revised to 1.0 (LOS E), recognizing the desire to explore opportunities to encourage the use of other modes and defer capital costs for road construction until roads reach capacity. The v/c of 1.0 also recognizes the desire to design a roadway network that responds to more than just the peak demand, which occurs for only one or two hours of the day. More recently, the City has established strategic priorities related to active transportation and transit improvements reflecting long standing policy direction to prioritize active transportation and transit improvements over single-occupancy vehicles.

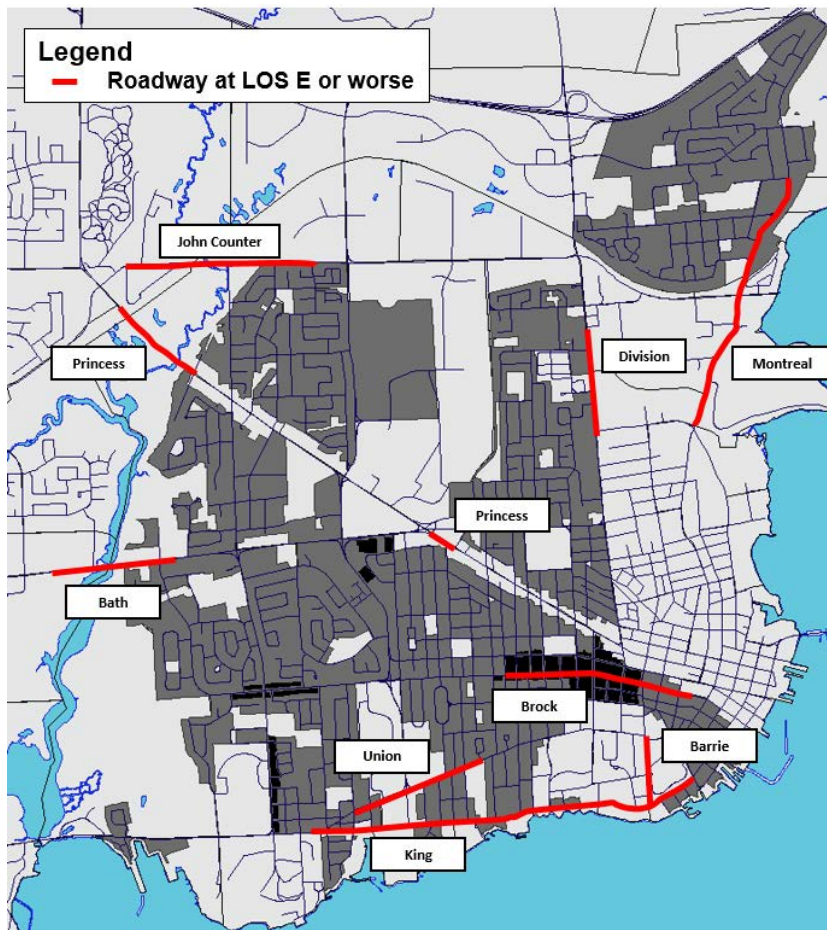


Figure 8: 2014 Transportation Forecast Model Results – Existing Conditions

Also, the City shared a 2034 “Do Nothing” scenario generated in 2015 where only projects through 2013 were considered and mode share remained consistent with the existing conditions. The results were consistent with the existing conditions in Figure 8, with many of the same corridors with similar or worse v/c ratios. In addition, there were several new north-south corridors that had a v/c ratio of 0.9 or greater including Sir John A. MacDonald Boulevard and Portsmouth Avenue.



While the “Do Nothing” scenario clarifies the potential outcomes, this report has shown that the City of Kingston continues to decrease auto mode share and improve sustainable transportation. Therefore, the “Do Nothing” scenario is unlikely to be realized. For this reason, this section reviewed the potential opportunities and constraints for roadways at LOS E or worse using existing conditions.

This report focuses on multi-modal transportation efficiency for each corridor. Opportunities are explored for potential congestion mitigation improvements through sustainable transportation, and planned road network improvements for public transit. The constraints are identified by land use changes and roadway capacity limitations. The following areas are further evaluated:

1. The crossings of the Little Cataraqui Creek on Princess Street, Bath Road and John Counter Boulevard
2. Princess Street immediately east of Bath Road and for most of the length between Bath Road and Albert Street
3. Brock Street between approximately Victoria Street and Sydenham Street, and Johnson Street, the adjacent one-way pair
4. King Street between Union Street W and east of Barrie Street, and Union Street W, representing a parallel route to and from the Kingston downtown area, between east of King Street and Ellerbeck Street (east of Sir John A. MacDonald Boulevard)
5. Barrie Street between King Street and Union Street
6. Montreal Street from approximately McCauley Street to Raglan Road; and Division Street between Elliott Avenue and Railway Street

CROSSINGS OF LITTLE CATARAQUI CREEK

EXISTING CONDITIONS

The crossings of the Little Cataraqui Creek along Bath Road, Princess Street and John Counter Boulevard provide access from Kingston West to downtown. At the northern edge of the CKGS area, John Counter Boulevard is served by some local transit routes. The other two routes, Bath Road and Princess Street, converge east of the creek which creates an important link between the two. Along with local routes, both corridors are serviced by Kingston Transit express routes: 501/502 along Princess Street and 701/702 along Bath Road. At weekday peak periods, the frequency of service of 7-10 minutes for 501/502 and 701/702 (increased from 10 minutes in 2019, and from 15 minutes in 2016) and 15 minutes, respectively. Both routes provide considerable express service from Kingston West to many important connection points in the CKGS area and downtown Kingston. As for active transportation, there exists a bicycle lane on Bath Road along the crossing, and then continues south along Portsmouth Avenue before continuing further east along Johnson Street. The existing transit express routes and cycling routes are shown in Figure 9.

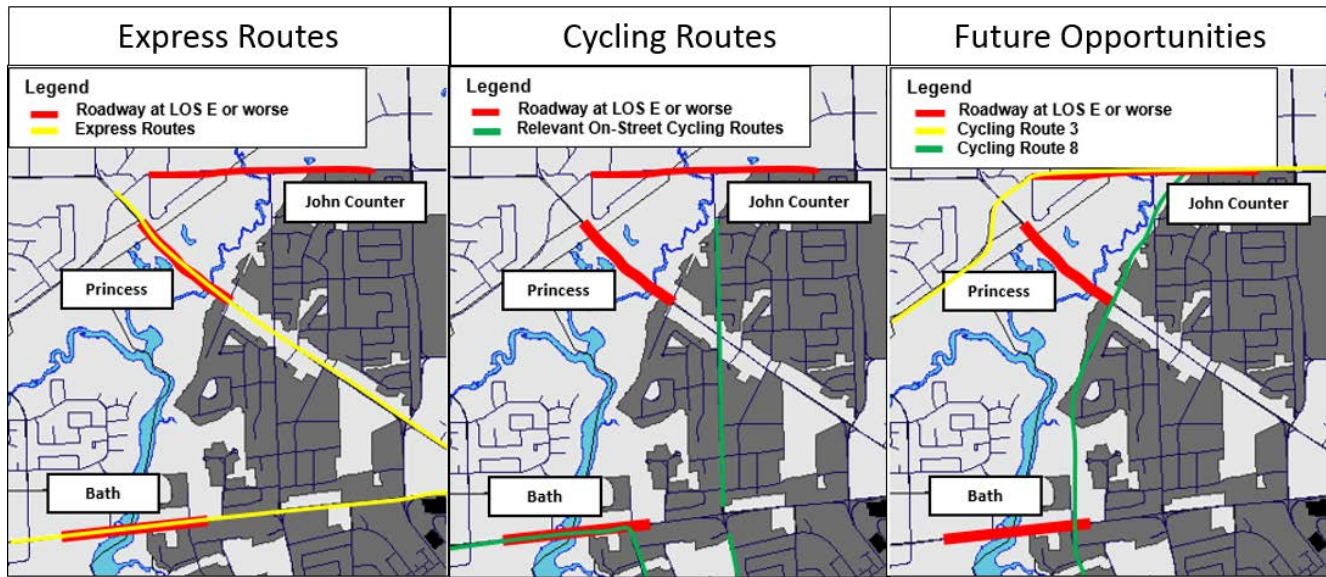


Figure 9: Existing and Future Sustainable Transportation Conditions of the Crossing of Little Cataraqui Creek

OPPORTUNITIES

In accordance with the Kingston Transit Business Plan 2017-2021 (KTBP), express route 701/702 is expected to expand along John Counter Boulevard between King’s Crossing and the Cataraqui Centre. Additionally, the KTBP identified new and improvements to local service routes including in Kingston West neighbourhoods. Along with providing better connectivity to local neighbourhoods, other transit-based road enhancements could lead to increased ridership along these two corridors. Some options mentioned in the KTBP include queue jump lanes and transit signal priority for the express routes. Note that timing related to the KTBP are subject to review given delays in implementing new transit services during COVID-19. The Kingston Active Transportation Implementation Plan 2019-2023 (ATIP) contains a prioritized route (Cycling Route 8) which cuts through each corridor and one that borders along John Counter Boulevard (Cycling Route 3). Construction for both routes is expected to be complete by the end of 2023. As shown in Figure 9, the two routes will connect along John Counter Boulevard with Cycling Route 8 passing through all three corridors, which could be beneficial for cyclists along this route.

CONSTRAINTS

With an expected increase in the number of trips to and from Kingston West due to population growth in the study area, there is additional volume expected to be passing through these two corridors, which may contribute to additional congestion. There are no additional new or expanded east-west corridors planned for vehicles in the near term.

PRINCESS STREET (EAST SECTION)

EXISTING CONDITIONS

The corridor on Princess Street, east of Bath Road to Albert Street, is a vital connection to downtown Kingston and is near capacity. In addition to providing access from the west, it connects to central Kingston neighborhoods. As shown in Figure 10, the corridor is just east of the converging point of the two corridors previously discussed. There are two Kingston Transit routes along this corridor: local route 4 and express routes 501/502. As previously mentioned, the frequency of the 501/502 is 7.5 minutes, while route 4 passes by every 30 minutes. Both routes provide access from Kingston West to downtown Kingston. For cyclists, a buffered bike lane exists along Princess Street between Bath Road and Division Street providing a connection to the downtown core.

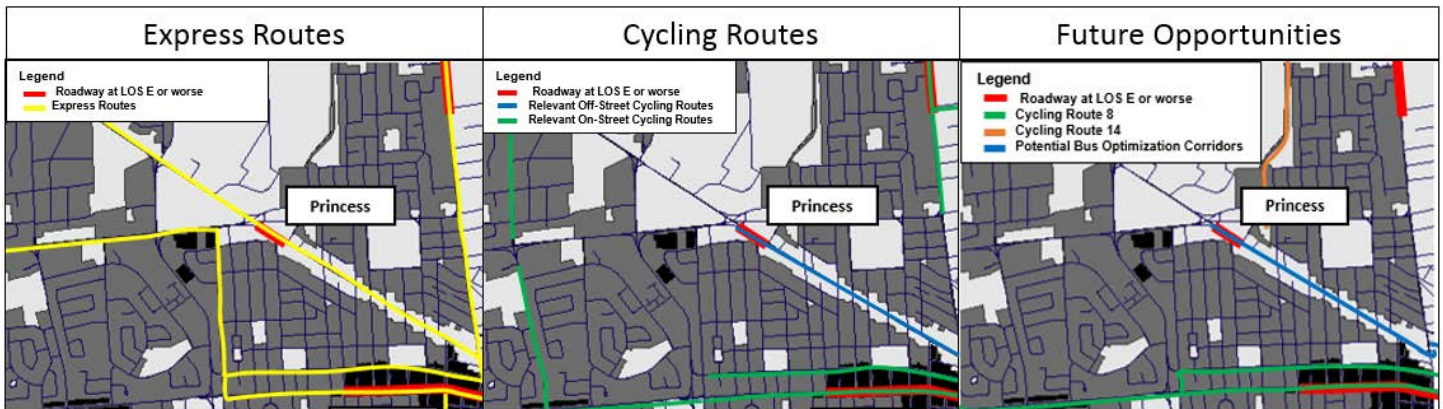


Figure 10: Existing and Future Sustainable Transportation Conditions on Princess Street

OPPORTUNITIES

Most of the future opportunities along this corridor are in-line with the opportunities for the Crossings of Little Cataraqui Creek. For instance, the increased frequency during weekday peak periods for 501/502 from 10 to 7.5 minutes during weekday peak periods, as of 2019, and the construction of Route 8 from the ATIP will provide support for those traveling from Kingston West to downtown Kingston by connecting to the existing buffered bike lane. Additionally, from the ATMP and ATIP, several neighbourhood routes are proposed to increase connectivity to residential areas including Cycling Route 14 which ends just north of the corridor. Also, while not identified as a priority cycling route in the ATIP, Cycling Route 9 along Princess Street would provide increased connectivity to the downtown core. From a transit perspective, the KTBP considers implementing transit priority technology along with on-road infrastructure such as queue jump and discharge lanes along Princess Street. If these were implemented, then the quality of service for the 501/502 would likely improve. Moreover, since there are two corridors along Princess Street with capacity concerns, the implementation of a bus-only lane during peak periods throughout all or some of the street would further incentivize commuters to take the bus. Since there is no mention of this in the KTBP, a more comprehensive review of traffic conditions would be required for a formal recommendation on where the bus-only (or high-occupancy vehicle) lane would be placed.

CONSTRAINTS

While there is already a high mode share of sustainable transportation in the area, the corridor is still approaching capacity. This is likely due to the existing road configuration that combines the downtown-bound volumes from Bath Road and Princess Street. It is also a sign of positive economic activity. As mentioned earlier, these are two of the primary routes for vehicles from Kingston West. The funnelling of volumes will inevitably lead to increased congestion if additional trips do not shift to alternate modes. In addition, there is expected to be a notable increase in population and employment along the Princess Street corridor causing a large increase in total trips to and from the area on top of the existing volumes. With the right investments and supporting encouragement, these new trips will take place either by active transportation or public transit.

BROCK STREET

EXISTING CONDITIONS

A one-way westbound corridor located near the centre of the city, Brock Street between Victoria Street and Sydenham Street, provides access for two regular bus routes (including express route 701) and one seasonal route. The 701, which provides connection to Kingston Centre and the downtown core provides a frequency of service of 15 minutes during the weekday peak periods. Additionally, the Kingston Transit Downtown Transfer Point is just two blocks east of Sydenham



Street on Brock Street and provides connection for all express routes along with several local routes. Furthermore, the corridor contains a buffered bike lane from Palace Road to Division Street, and then a signed route with sharrows from Division Street to Sydenham Street. Sharrows are lane markings that indicate cyclists and motorists are to share a lane. Public transit express routes and relevant cycling routes are shown in Figure 11.

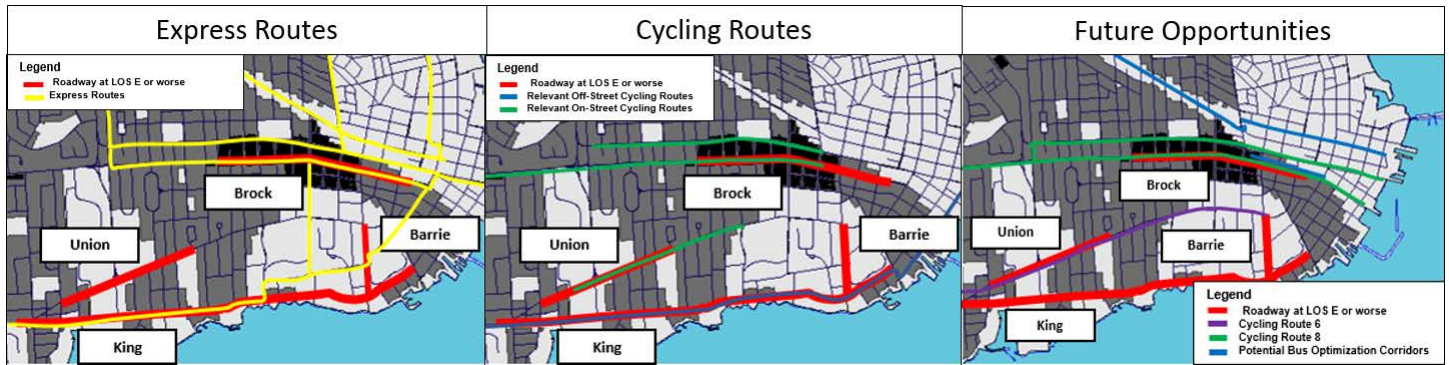


Figure 11: Existing and Future Sustainable Transportation Conditions near Downtown Kingston

OPPORTUNITIES

The enhancements for Route 8 along Brock Street will include providing additional level of separation with flex bollards for cyclists. These enhancements were completed in 2019. As shown in Figure 11, completing the construction along Cycling Route 8 will provide a key east-west connection to downtown Kingston and connect to communities further west. In addition, nearby neighborhood cycling routes are to be implemented in the ATMP’s ultimate cycling network to improve connectivity in the area. Given its proximity to the Kingston Transit Downtown Transfer Point, the improved service along most of the express routes and the implementation of further local routes should increase the rate of transit trips to the downtown core and further provides infrastructure that is essential for future intensification.

CONSTRAINTS

The corridor is located very close to the highest concentration of population and employment in the City of Kingston. Additionally, there is some employment and population growth expected through 2036. This increase in densification is likely to lead to an increase in trips, which would need to be taken by sustainable modes of transportation. It is noted that Johnson Street, the adjacent eastbound one-way corridor, is not identified as being near capacity for the PM peak hour scenario assessed; it is anticipated that there will be similar capacity constraints on Johnson Street in the morning when eastbound is the peak direction for traffic. That said, the opportunities presented for Brock Street are the same for Johnson Street and provide a base infrastructure for future intensification.

UNION STREET W & KING STREET W

EXISTING CONDITIONS

These corridors represent the primary connections between downtown Kingston and the portions of the Queen’s, St. Lawrence College neighbourhoods along the Lake Ontario waterfront, as well as areas to the west. Union Street W from King Street W to Ellerbeck Street, and King Street W from Union Street W to Barrie Street are two corridors just east of the southernmost crossing of the Little Cataraqui Creek. The streets provide access to and from both St. Lawrence College and Queen’s University as well as smaller residential streets. While there are no express routes along Union Street W, there are three local and four seasonal bus routes traveling along the corridor with overlapping service. In contrast, King Street W has one express route (501/502) and one local route (3). As previously mentioned, the frequency of the 501/502 is 7.5



minutes. Additionally, there are cycling facilities along both corridors. The cycling facilities along Union Street vary from a signed route to a more formal bicycle lane. King Street W provides access to the Waterfront Trail, a separate multi-use pathway for cyclists and pedestrians which continues along the entirety of the King Street W corridor. Public transit express routes and relevant cycling routes are shown in Figure 11.

OPPORTUNITIES

The 801/802 express route is expected to be extended further south and west to serve St. Lawrence College and the Providence Care Hospital on King Street W. Additionally, the frequency of service for the 501/502 improved from 10 to 7.5 minutes during weekday peak periods in 2019. As shown in Figure 11, Cycling Route 6 from the ATIP provides cyclists access from Kingston West through Union Street W to Downtown Kingston. While most of this route has been constructed, it is expected to be completed by 2022. Additionally, there are many proposed neighbourhood cycling routes in the ATMP east of the two corridors that will increase connectivity further east to Queen's and Downtown Kingston.

CONSTRAINTS

The area immediately surrounding the two corridors is not expecting any employment growth. However, as shown in Figure 4, the area to the east of the King Street W corridor is expecting a notable growth in employment. Similarly, St. Lawrence College and its surrounding areas, just west of the two corridors, are expecting some population growth. Additional development in the southern portion of the study area may exacerbate the existing congestion along these routes.

BARRIE STREET

EXISTING CONDITIONS

Adjacent to the easternmost edge of Queen's campus, Barrie Street provides another connection from King Street W and Union Street W to downtown Kingston. While there are no bus routes along the corridor, there is an abundance of transit options within walking distance, including the downtown Transfer Point which provides connection for all express routes along with several local routes. Similarly, there are no bike lanes along Barrie Street, however the area is very close to the Waterfront Trail along King Street W and the buffered bike lanes along Brock and Johnson Street. Public transit express routes and relevant cycling routes are shown in Figure 11.

OPPORTUNITIES

Given its proximity to Kingston Transit's Downtown Transfer Point, the improved frequency for the express routes will improve the quality of service in this area. Additionally, the expanded service in the suburbs shall improve connectivity and potentially reduce the vehicular traffic near the Queen's campus. Like Union Street W and King Street W, Cycling Route 6 for cyclists will provide a direct link from Kingston West to Queen's campus and the downtown core. The ATMP also mentions cycling and pedestrian facilities are expected along Barrie Street and nearby roads for improved active transportation connectivity. Finally, since the Barrie Street corridor is located between several east-west bike routes, it could be a prime candidate for a potential north-south cycling facility in place of on-street parking to connect the other facilities. A comprehensive review of traffic and parking conditions would be required before a formal recommendation could be put forward.

CONSTRAINTS

The area north and east of Barrie Street is expected to have considerable employment growth through 2036. Along with a likely increase from Queen's (the campus is not part of the CKGS area), the area is expected to continue growing over the coming years. Thus, an emphasis of improving active transportation connectivity and safety, and public transit quality of service is paramount in and around this corridor.



DIVISION STREET & MONTREAL STREET

EXISTING CONDITIONS

The two primary roads from northern residential areas, Division Street (between Elliot Avenue and Railway Street) and Montreal Road (between McCauley Street and Raglan Road) provide connection to one of the most populated neighborhoods in the CKGS area. The 701/702 express route travels along the Division Street corridor and provides service every 15 minutes during weekday peak periods. Similarly, the 801/802 express route travels along the Montreal Street corridor and provides service every 15 minutes during weekday peak periods. In addition, local routes travel along each corridor (Division: 2 & 18; Montreal: 1). For cyclists, there is a bike lane along both corridors, however they currently connect to signed routes, which provide no markings or separation from traffic. Public transit express routes and relevant cycling routes are shown in Figure 12.

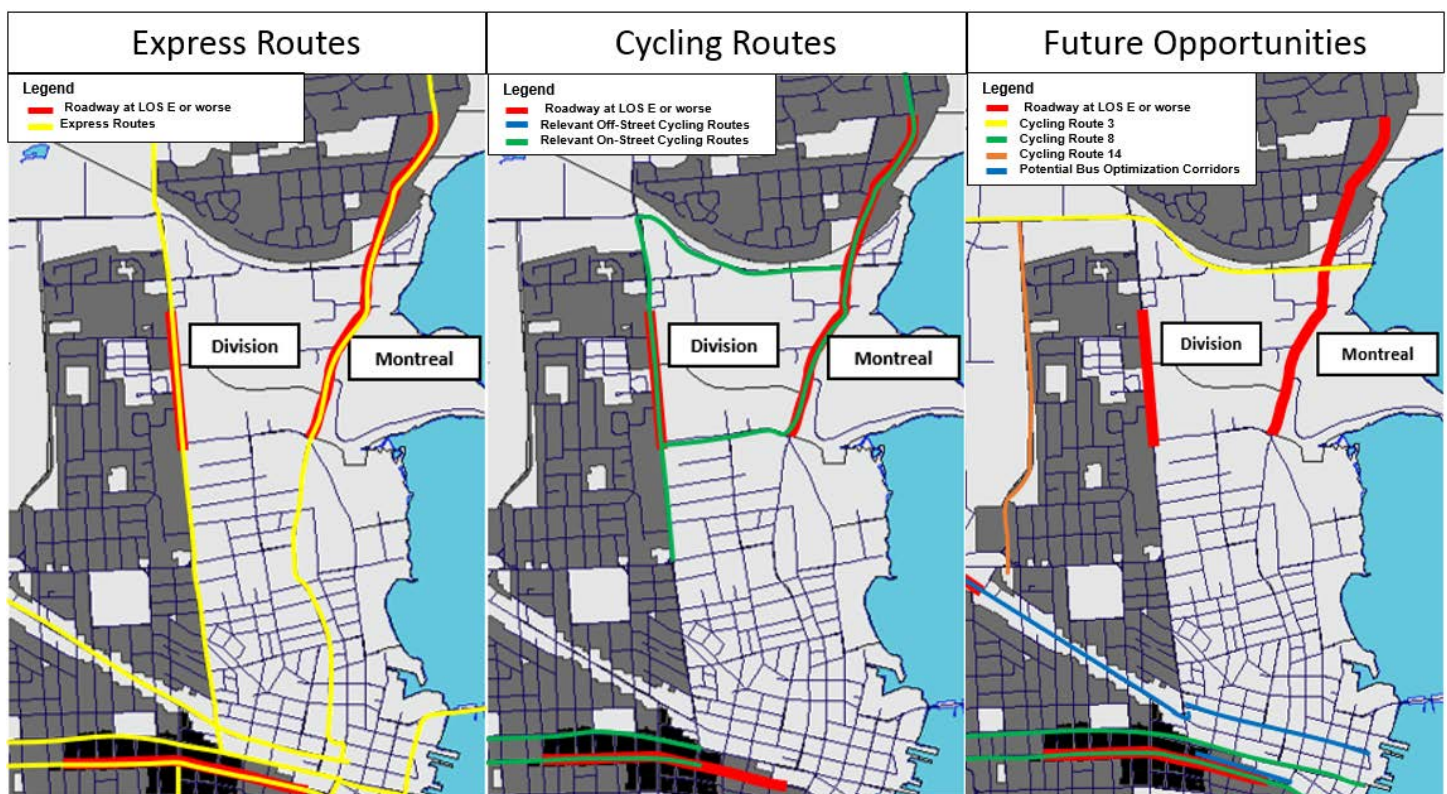


Figure 12: Existing and Future Conditions of Sustainable Transportation on Division Street & Montreal Street

OPPORTUNITIES

The 801/802 express route is expected to be extended further south and west to serve St. Lawrence College and the Providence Care Hospital on King Street W. This will allow those living in Rideau Heights and Marker Acres to potentially remove a connecting bus from their commute. While not mentioned in the KTBP, since both corridors provide routing for express buses, they are both candidates for transit signal priority technology and on-road infrastructure such as queue jump and discharge lanes. A comprehensive review of traffic conditions would be required for a formal recommendation to be justified. Improvements for active transportation are expected via new neighbourhood cycling and pedestrian routes on nearby streets. Additionally, as shown in Figure 12, Cycling Route 3 and 14 will provide some benefit to cyclists.



CONSTRAINTS

There is very little employment and population growth in the CKGS areas west of Division Street. That said, the population of these northern CKGS neighbourhoods remains substantial compared to others within the CKGS area. The construction of the Third Crossing of the Cataraqui River will create an alternative route for traffic from the north and east that will impact volumes on the corridor.

6. ASSESSMENT – INTENSIFICATION AREAS

The previous section provided an understanding of the key constrained corridors related to the CKGS. An important factor to consider for the transportation impacts of the intensification areas is the time frame that they are expected to be built. The phasing assumptions for the areas is shown in Figure 13.

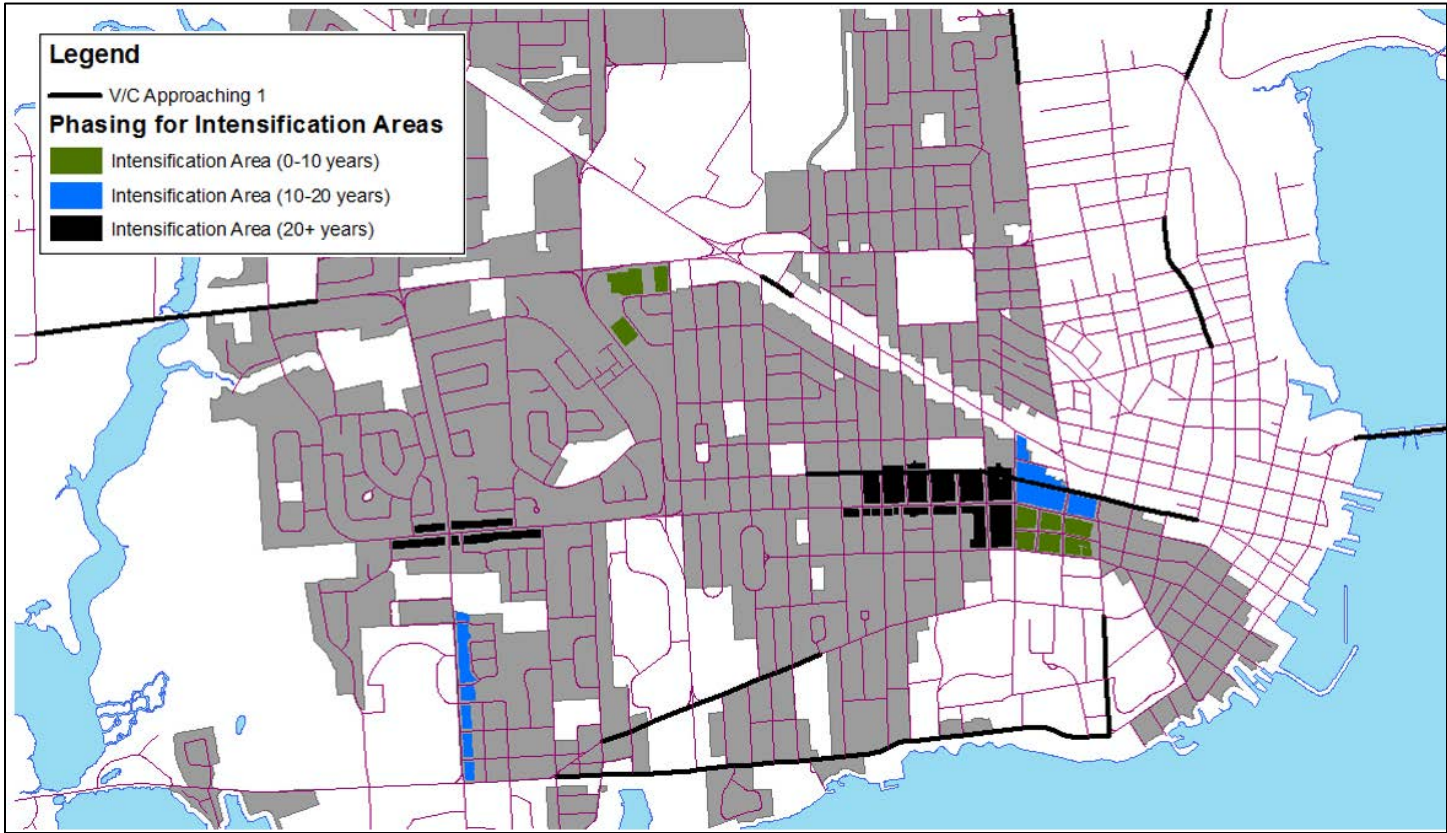


Figure 13: Phasing Assumptions for the Intensification Areas

The intensification areas are to be comprised primarily, if not exclusively, of mid-rise (6 floor) multi-family residential units. Additionally, the buildings may or may not include a ground floor dedicated to commercial use. These new housing options within the CKGS will provide more options for those working or going to school who currently live in other areas of Kingston. In theory, the intensification should increase active transportation rates within the CKGS area.

JOHNSON/BROCK CORRIDOR EXPANSION AREA

The area north of Queen’s campus is the most complex intensification area given the phasing schedule assumptions and its location relative to the corridors mentioned in the previous section. Given its central location, the existing vehicular capacity concerns from outside the CKGS area (funnelled from Princess Street and Bath Road) raise the need for increased transit ridership. Currently, all express buses from beyond the downtown and inner suburbs provide a transfer point at the intersection of Brock/Bagot. As mentioned earlier, to continue increasing the transit mode share, Kingston Transit will be



increasing the frequency along several of their express routes and be providing better local service to connect to the express routes. Similarly, the completion of Cycling Route 6 & 8 will provide improved connectivity for those travelling by bike. While many of the capacity concerns within the Johnson/Brock Expansion Area are due to commuters from outside the CKGS, many of the capacity concerns on Brock Street can be linked to the high concentration of population and employment in the area. If full build out is achieved as envisioned within the intensification area, it is estimated it will support an increase of 7,600 to 12,350 residents and 850 to 950 jobs will be created. Considering that there is also a notable amount of population growth expected along Princess Street, along with the slight growth along Brock Street, it will be helpful that the intensification is phased to allow travel patterns to be monitored by the City and adapted over time if necessary with additional support for active and public transportation. It is important to note that the Johnson/Brock Expansion Area is in an area that is likely to always be at or near capacity during the peak hour, thus LOS E may be a realistic goal. Land use intensification with thorough transit-oriented development along high frequency transit corridors supports multi-modal transportation goals by making transit, walking and cycling more viable options that are competitive with motor vehicle travel.

PORTSMOUTH AVENUE AREA

The intensification near St. Lawrence College is also expected to be phased in over time. More importantly, none of the development is expected within the next 10 years. In total, the intensification is expected to provide housing for 2,100 to 3,600 people. Beyond the development within the intensification area, there is no expected population growth and some employment growth. The College provides transfer from a handful of local routes and connection to the 501/502 express bus. Additionally, the extension of the 701/702 express bus will further improve public transit to and from the school. Similarly, the proposed cycling route along Portsmouth Avenue would connect to existing facilities along Johnson and Union Street and to the Waterfront Trail on King Street W. Also, the completion of Cycling Route 6 along Union Street W will provide another option for short-trip commuters traveling to downtown Kingston. Finally, it is likely that much of the development along Portsmouth Avenue will be ideally suited for students or employees of St. Lawrence College, meaning that much of their peak hour travel will be possible by walking and cycling trips.

SIR JOHN A. MACDONALD & BATH ROAD AREA

Unlike the other two intensification areas, the Sir John A. MacDonald & Bath Road Area is expected to be built relatively soon and have a much smaller population increase (350 to 600 residents). The capacity corridors likely affected by a dense increase in population are Bath Street and both the east and west section along Princess Street. Given the high increase of trips expected from Kingston West, along with the growth expected north of Princess Street, these corridors are likely to continue to have high vehicular volumes. The proximity of the Kingston Centre Transfer Point, providing connection to many local routes, and a connection to express transit services along Princess Street and Bath Road provide sufficient transit access to many destinations. The improved service of the 501/502 express bus will further enhance the quality of service. For active transportation, the proposed cycling routes along Princess and Bath Street will give those commuting from Kingston West an alternative option. Meanwhile, many of the proposed neighborhood routes will allow local users, including those living in the intensification area, to commute within the inner suburbs by bike or walking.

7. CONCLUSION

This report assessed the transportation conditions surrounding three proposed intensification areas within the CKGS area, taking into account existing transportation policies, future mode share targets, future population and employment growth, recent and planned investments in sustainable transportation, and trip generation. The three intensification areas will increase pressure on some arterial roadways that have capacity deficiencies during peak travel times.

The roadways that were assessed with capacity constraints (from 2014) are anticipated to receive some improvement with regards to sustainable transportation improvements per current plans in the Kingston Transit Business Plan 2017-2021 and



the Kingston Active Transportation Implementation Plan 2019-2023, which will be effective in attracting ridership growth and in serving future development.

No additional capacity upgrades in the form of road widenings are recommended as a result of the infill development proposed as part of the Central Kingston Growth Strategy. Capacity upgrades would not only induce additional traffic demand, but also lead to very wide streets and excessive vehicle speeds for most of the day. This would degrade pedestrian and cyclist conditions in areas where increasing sustainable transportation is desired.

Finally, Transportation Demand Management (TDM) is a wide range of policies, programs, services and products that influence how, why, when and where people travel. TDM provides the framework for using the transportation system more efficiently, to reduce congestion and pollution, and to use municipal transportation resources more effectively. The City of Kingston has a comprehensive TDM strategy that has been implemented with several programs and policies to support infrastructure improvements and foster a culture of using sustainable transportation, including;

- Updated travel survey in 2019;
- AT implementation plan (2019-2023);
- Transpass programs;
- Parking policies that promote transit use;
- Transit ride planning and outreach;
- Highschool transit programs;
- Field trip programs for elementary schools on transit;
- Guaranteed ride home options;
- AT programs including safe route to school; and
- Commuter challenge.

Site-specific TDM measures are recommended for the intensification areas to capitalize on the key period when people move and are establishing new travel habits, such as social marketing and personalized travelling planning with transit and active transportation incentives for the new communities.