City of Ottawa
Transportation Master Plan Update

Phase 4 Engagement Summary Report

1 Introduction

1.1 Project Overview

The Transportation Master Plan (TMP) is the City's blueprint for planning, developing and operating its walking, cycling, transit and road networks over the next several decades. The goal of the TMP is to create a reliable, safe and sustainable transportation system that meets residents' mobility needs and supports growth.

The TMP update is comprised of two parts:

- Part 1 - Policies (completed): Approved in April 2023, Part 1 of the TMP sets out policies that guide how the City plans, builds, operates and maintains its transportation system. The 75 policies span a broad range of topics, and include a focus on heathy communities, complete streets, climate change, safety, equity and regional competitiveness.
- Part 2 – Capital Infrastructure Plan (underway): The TMP Capital Infrastructure Plan will identify the projects and investments that are needed to meet Ottawa's travel needs and achieve the City's Official Plan objectives. It will also identify a subset of projects that are affordable within the City's long-range financial plans, along with the corresponding timelines for implementation.

1.2 Phase 4 Engagement Overview

The TMP Capital Infrastructure Plan is intended to identify the road and transit projects required to meet the needs of Ottawa residents and businesses, both now and in the future. In doing so, long-term affordability constraints must be considered, which will require prioritizing investment in different areas. The City recognizes that there are different approaches to working within its long-term fiscal capacity, and undertook consultation in mid-2024 to assist in developing the Plan's projects and implementation priorities.

The primary objectives of Phase 4 engagement were to hear from residents about transportation issues experienced when travelling by car or transit, and to seek opinion on transportation investment priorities. The City conducted two online surveys from June 12 to August 30, 2024, to allow residents to communicate their comments to the project team. The surveys, which were available on the City's Transportation Master Plan Update project website on Engage Ottawa, could be completed in one of five languages: English, French, Spanish, Arabic, and Simplified Chinese.

The City also conducted an Equity Survey, Pop-ups, and held Stakeholder Engagement sessions.

These activities are described in the subsections below.

1.2.1 Equity Survey

A survey was conducted in equity-deserving neighbourhoods to help the City better understand the residents' transportation needs and their opinions regarding transportation investments. The target audience was youth under 20. The survey was carried out by the Neighbourhood Ambassadors Program (NAP), which is a collaboration between the City's Integrated Neighbourhood Services Team, Ottawa Public Health, and BGC Ottawa. The NAP provides youth-to-youth engagement and outreach in nearly 30 neighbourhoods across the city.

The survey was conducted in November-December 2023 in public places such as community centres and parks. It was made available in English, French, Arabic, Spanish, Somali, and Afghanistan's two main languages (Dari and Pashto).

In addition, the same survey was offered at two local high schools, as part of Trade Shows held at Brookfield High School on February 22, and St Pius X High School on February 26, 2024.

The results of the survey are summarized in **Appendix A**.

1.2.2 Investment Priorities Survey

The Investment Priorities Survey is being used to understand Ottawa residents' preferences on where public funds should be invested across the transportation system. Respondents were asked 12 questions consisting of check-boxes or short answers, on topics such as expansion vs. maintenance of infrastructure, preferred types of new infrastructure, and where the city should consider reducing investment. The City received 1,108 responses, which are summarized in **Appendix B.**

1.2.3 Road and Transit Needs Mapping Survey

The Road and Transit Needs Mapping Survey was used to pin-point the location of specific transit and auto-related concerns across the city. Respondents were able to drag and drop "driving pins" and "transit pins" on an online map, and were asked to add a comment explaining their choices. A total of 4,526 pins were recorded and the resulting geographic trends are summarized in **Appendix C**.

1.2.4 Pop-ups

Fifteen "pop-up" engagement booths were offered across the city, including in rural areas, to give residents an opportunity to learn about the TMP project and provide input. Residents were encouraged to review the Phase 4 consultation materials on the project website and complete the online surveys. The pop-ups were held at the following locations in the June-August period:

POP-UP LOCATION	DATE AND TIME
Richmond Arena Scott Klatt	June 14, 9 am to 1 pm
Francois Dupuis Recreation Centre	June 18, 8 am to 12 pm
UOttawa Transit Station	June 19, 8:30 to 10:30 am
Tunney's Pasture Transit Station	June 21, 8:30 to 10:30 am
Hurdman Transit Station	June 24, 8:30 to 10:30 am
Blair Transit Station	June 25, 8:30 to 10:30 am
St-Laurent Transit Station	June 25, 3 to 5 pm
Bob MacQuarrie Recreation Complex	July 4, 8 am to 12 pm
Rideauview Community Centre	July 5, 4 to 5:30 pm
Richmond Library	July 9, 10 am to 1 pm
Ray Friel Recreation Complex	July 10, 8 to 11 am
Carp Library	July 11, 2 to 4 pm
Greely Library and Community Centre	July 31, 10 am to 4 pm
Lansdowne Farmers Market	August 11, 9 am to 2 pm
Millenium Park	August 14, 2 to 3 pm

The next section summarizes the key themes from Phase 4 engagement. Detailed results from each of these engagements is provided in the appendices (**Appendix A-C**).

2 Key Themes

The following five themes were common across all types of engagement, as described in **Section 1.2**:

- Congestion
- Safety for all Road Users
- Dedicated Transit Infrastructure
- Expanded and More Frequent Transit
- Multi-modal Connectivity of Sustainable Transportation Methods

Of note is that the public was asked to describe concerns related to automobile and transit modes; however, many comments focused on problems encountered by pedestrians and cyclists.

Key findings from each theme are described throughout this section.

2.1 Congestion

Respondents to the survey noted that congestion is a key concern for drivers in the city. Road lane reductions, as well as street parking that limits travel lanes, were particularly problematic. The issue is focused on peak hours for commuting to and from work, and for school pick up and drop off. A related concern is the noise level caused by cars, especially around divided highways and high-volume roads.

Locations with significant congestion that were identified from the map survey include:

- **Greenbank Road Bridge at Jock River** (Barrhaven)
- **Brian Coburn Boulevard** (Orléans) – Roundabouts at Mer Bleue Road, and Tenth Line Road, were highlighted.
- **Strandherd Drive** (Barrhaven) – East approach leading to Highway 416.
- **Bronson Avenue** (Glebe) – Congestion occurs where lanes are reduced, especially at intersections between the Rideau River and Carling Avenue.

The Investment Priorities Survey identified congestion as the third greatest concern at 16% (transit travel time and reliability was first at 25%, and safety for pedestrians and cyclists was flagged by 17% of respondents). Similarly, investments in new road capacity (10%) lagged behind transit and active transportation as priorities for respondents.

2.2 Safety for all Road Users

Safety was reported as a concern for all road users (vehicles, cyclists, and pedestrians), ranking second at 17%, behind transit travel time and reliability. The transition of existing roads into complete streets was the highest priority (21%) for new infrastructure investment, likely reflecting concern over vulnerable users in road corridors.

Responses were segregated into those identified by car drivers and cyclists/pedestrians. Car drivers noted the following areas of concern:

- **Intersections** – Left turns were noted as the key risk
- **Roundabouts** – Where decisions need to be made quickly in complex environments where different road users interact (including at pedestrian crossings);
- **Speeding** – where vehicles speed, or where there are higher posted speed limits on roads with heavy truck traffic.

For cyclists and pedestrians, the following areas were reported as needing safety improvements:

- **Intersections** – Locations without stop signs or traffic signals were noted as affecting pedestrian crossing safety.
- **Auto-oriented roads** – Roads without protected bike lanes combined with high car volumes and/or bus service, and locations missing sidewalk connections to destinations (for example at bus stops near critical services).

Specific locations reported to have safety concerns include:

- **Greenbank Road** (Nepean) – Darjeeling Avenue, Rockville Road, and Strandherd Drive intersections were noted as unsafe for both car users and pedestrians.
- **Strandherd Drive** (Barrhaven) – Signal timing at intersections was felt to promote speeding and create conflicts with pedestrians.
- **Riocan Avenue at Marketplace Avenue** (Barrhaven) – Absence of traffic signals is seen as posing a safety risk for pedestrian crossing.
- **Mer Bleue Road and Brian Coburn Boulevard roundabout** – Volume of car traffic was noted as affecting pedestrian safety (school on northeast corner of intersection).
- **Innes Road** (Orléans) – left turns were identified as unsafe.

Residents would like to see more traffic calming measures on high-traffic roads, and would favour better infrastructure for cyclists and pedestrians, including

complete street design. Additionally, all-way-stops, traffic signals, and roundabouts were suggested to increase safety at intersections.

2.3 Dedicated Transit Infrastructure

Respondents noted that a lack of dedicated transit infrastructure can create conflicts between auto and transit traffic, affecting transit service levels. When asked what the greatest transportation-related concerns the City should address, the top response was “travel time and reliability while using transit” (25%), and when asked how the City should prioritize renewal of existing infrastructure, one of the top three responses was to “prioritize bus routes” (24%).

Participants noted that conflicts between auto and transit traffic occur where buses do not have a dedicated bus lane and are operating in mixed traffic. Cars driving or parking in transit lanes and rideshare vehicles waiting in transit lanes or at transit stops were also mentioned. These conflicts were noted as disrupting travel flow for both autos and buses, and were also felt to be a safety concern for automobiles and transit or rideshare riders as they enter and exit vehicles.

Participants also noted that they frequently wait extended periods of time for transit vehicles to arrive, and also observe bus bunching, where more than one bus arrives at a stop at the same time.

Participants were in favour of dedicated bus lanes on high-traffic streets, including high occupancy vehicle (HOV) lanes, to ease traffic congestion and improve the reliability of transit service.

Specific locations where dedicated transit infrastructure was identified as benefiting residents include:

- **Bank Street** (Downtown)
- **Queen Street** (Downtown)
- **Greenbank Road** (North of Hunt Club)
- **Baseline Road**
- **Merivale Road**
- **Carling Avenue** (Ottawa West)
- **Barrhaven** (general)
- **Tenth Line Road** (Orléans)
- **Innes Road** (Orléans)
- **Brian Coburn Boulevard** (Orléans)

2.4 Expanded and More Frequent Transit

Participants indicated that expanded and more frequent transit service is needed to meet their travel needs. Expansion to developing communities will provide service to these growing areas, and may reduce auto-dependency if implemented early. Better transit connectivity and more frequent service will allow more residents to reach more places, including work and school.

Areas where residents said they would benefit from expanded and more frequent transit include these key locations:

- **Downtown core**
- **Centrepointe** (around Baseline Road and Woodroffe Avenue);
- **Barrhaven** (around Cambrian Road and Greenbank Road); and
- **Orléans** (around Mer-Bleue Road and Brian Coburn Boulevard).

When asked what type of new infrastructure the City's priority should be, the second most common selection was to "Expand the O-train network". Opinions were mixed, however, as seen in responses to where the City should invest less—many indicated a preference for prioritization of more bus service over new O-Train routes.

Overall, transit connectivity between neighbourhoods outside of the downtown core was identified as an improvement that could provide a viable alternative to driving and could help mitigate traffic congestion and affordability of travel.

2.5 Multi-modal Connectivity of Sustainable Transportation Methods

Connectivity of the cycling and pedestrian network was mentioned as needed across the city. When asked how the City should prioritize renewal of existing infrastructure, one of the top three answers was to "prioritize roads that support walking and cycling" (24%).

For cycling infrastructure, these specific items were identified:

- Protected **bike lanes** and **raised cycle tracks**;
- Improved **markings and signage** for cycling infrastructure;
- **Better connectivity** between cycling facilities, especially at intersections; and
- Improved **integration of cycling infrastructure with the transit network**, including at stations and on transit vehicles.

For pedestrian infrastructure, these specific items were identified:

- More **multi-use pathways**; and
- Improved **access to bus stops**, including crosswalks or sidewalks surrounding stops.

Responses indicated that spending more to improve and connect existing cycling and pedestrian infrastructure was a priority for Ottawa residents. In addition to improving or adding new infrastructure, when asked what supporting improvements to existing infrastructure should be made, the top choices were “provide additional shortcuts for pedestrians and cyclists to improve connectivity” (30%), and “expand winter maintenance of the pedestrian and cycling network” (20%).

3 Next Steps

The next phase of the City of Ottawa's Transportation Master Plan Update will result in the draft Capital Infrastructure Plan, which will outline recommended infrastructure projects for the road and transit networks through the planning horizon of 2046. This will be presented to the public during Phase 5 engagement activities, planned for spring 2025.

The next steps to develop the Capital Infrastructure Plan include:

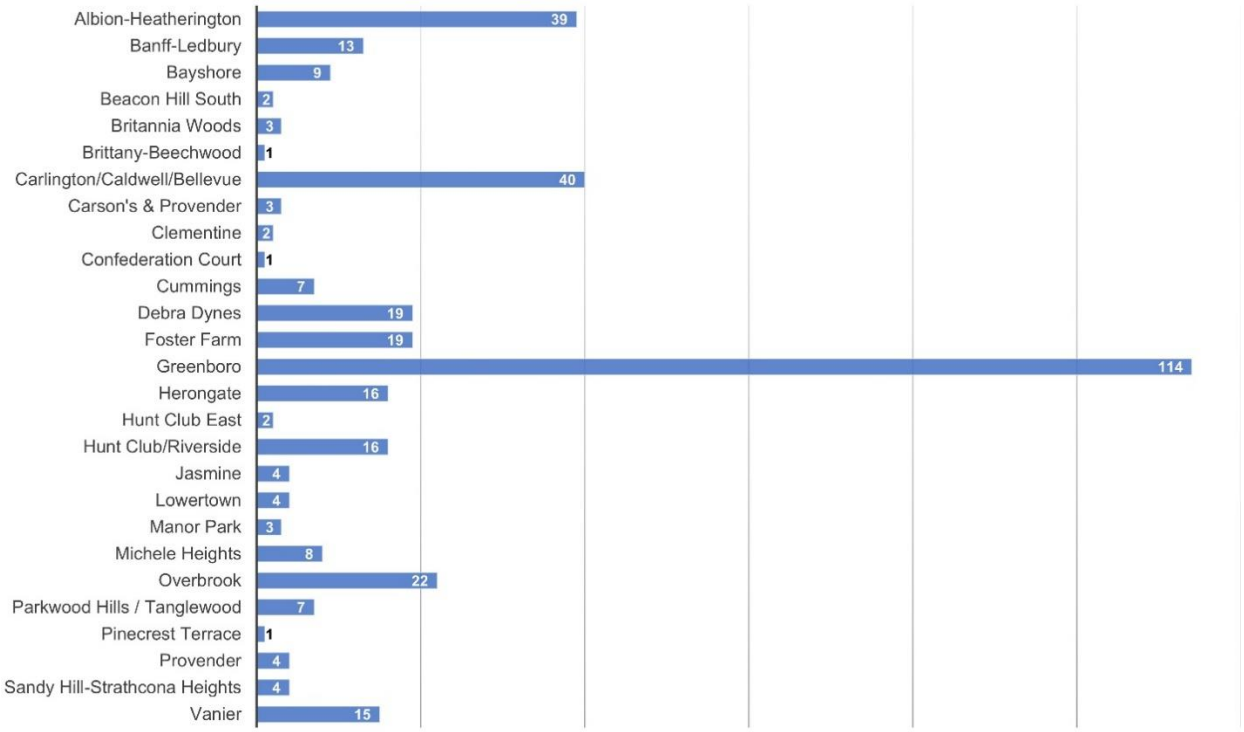
- Developing the travel outlooks to 2046, which includes projecting transportation demand based on future land use, population and employment forecasts, and highlighting transportation gaps and challenges.
- Developing the 2046 transit and road networks by identifying a long list of potential projects, undertaking feasibility analysis, developing cost estimates, and evaluating and prioritizing projects according to the Council-approved Framework.
- Prioritizing Council-approved Active Transportation projects for the first phase of implementation.

The input received during the Phase 4 engagement activities is critical to the next steps in the development of Ottawa's Transportation Master Plan Update. Specifically, potential projects will be identified for the long list of projects noted above in response to the needs and issues identified in this process, and investment scenarios will be developed with input derived from the results of the Investment Priorities survey.

Appendix A Equity Survey Results

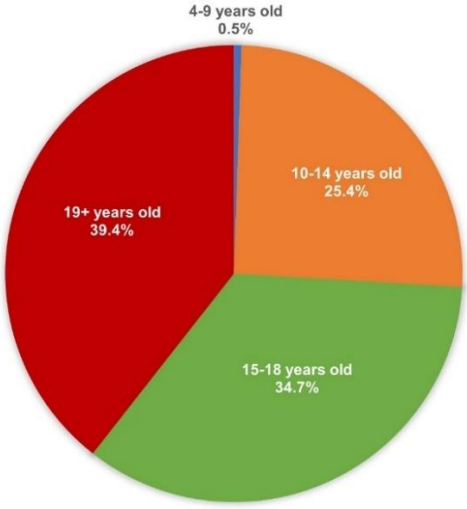
Question 1 asked which neighbourhood the person lives in. **Exhibit A-1** shows the neighbourhoods and number of responses for each.

Exhibit A-1: Number of Responses by Neighbourhood



Question 2 asked the person's age. **Exhibit A-2** shows the breakdown by age of the respondents by percentage.

Exhibit A-2: Responses by Age

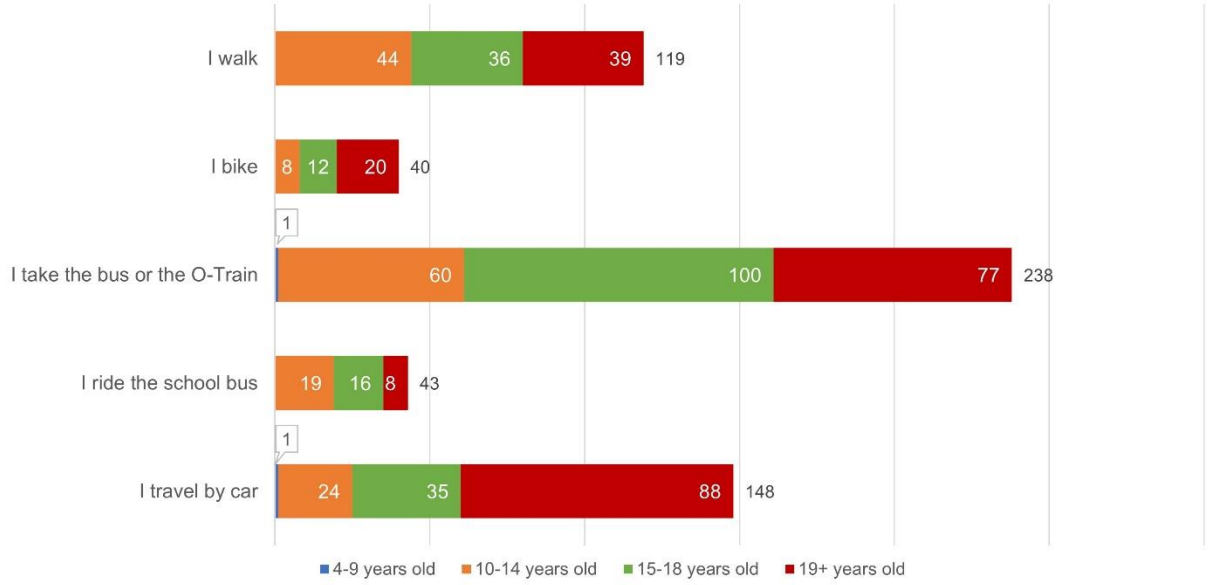


Question 3 asked how people travel around their neighbourhood. The options offered are shown below, and respondents were asked to check all that apply:

- I walk
- I bike
- I take the bus or the O-Train
- I ride the school bus
- I travel by car
- Other, please specify

Exhibit A-3 shows how people travel, along with the age of respondents.

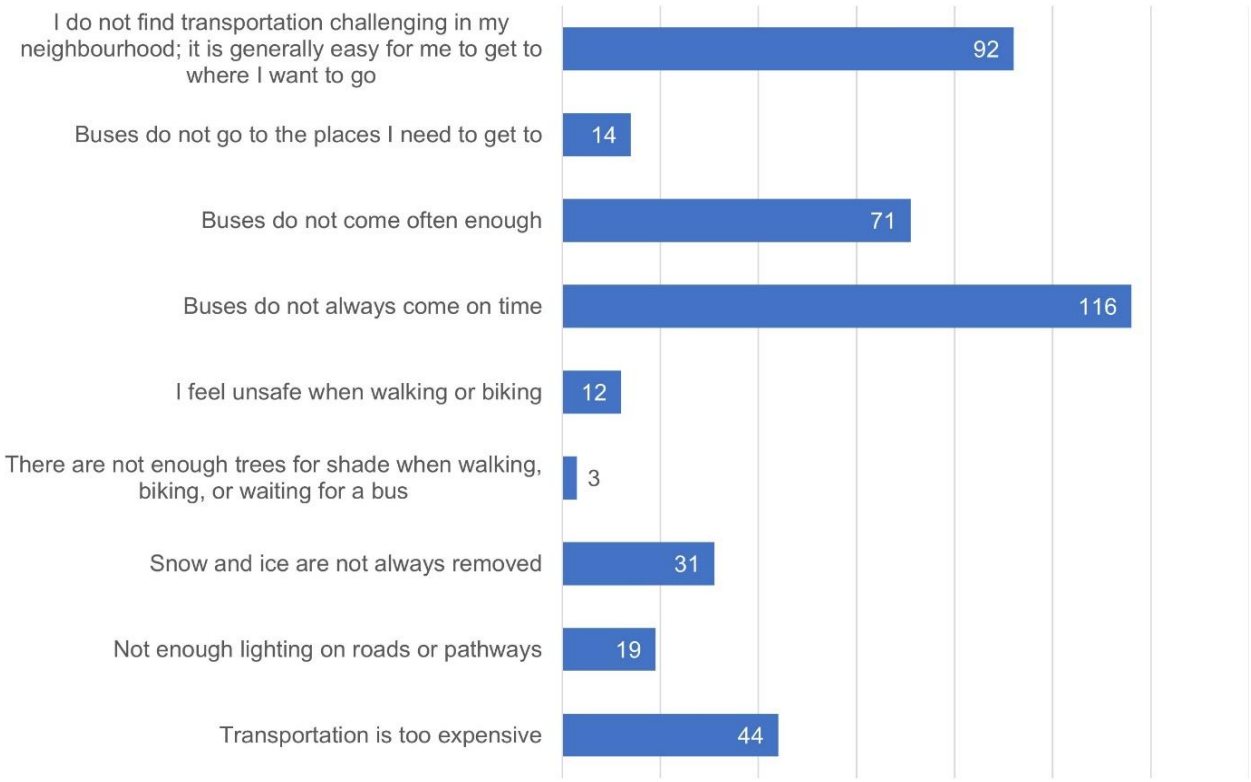
Exhibit A-3 : Mode of Travel by Age



Question 4 noted that the City of Ottawa wants to make it easy for people to get around, and asked residents if there are any transportation issues in their neighbourhood that make it hard to get to where they want to go, and what those issues are.

Exhibit A-4 indicates the key issues identified by respondents.

Exhibit A-4: Transportation Issues



Respondents were also able to indicate other issues in addition to the nine provided in the questionnaire and shown in **Exhibit A-4**. These other issues were grouped together and those with five or more responses were:

- Traffic congestion - 11
- Not enough bus shelters - 6
- Bus drivers sometimes drive past people waiting for bus - 10
- Buses are full - 6
- Streets are in poor condition (potholes) - 8
- In addition to buses being late, they are sometimes cancelled - 9
- Inside bus environment can be unpleasant – sometimes it's dirty or feels unsafe – 7

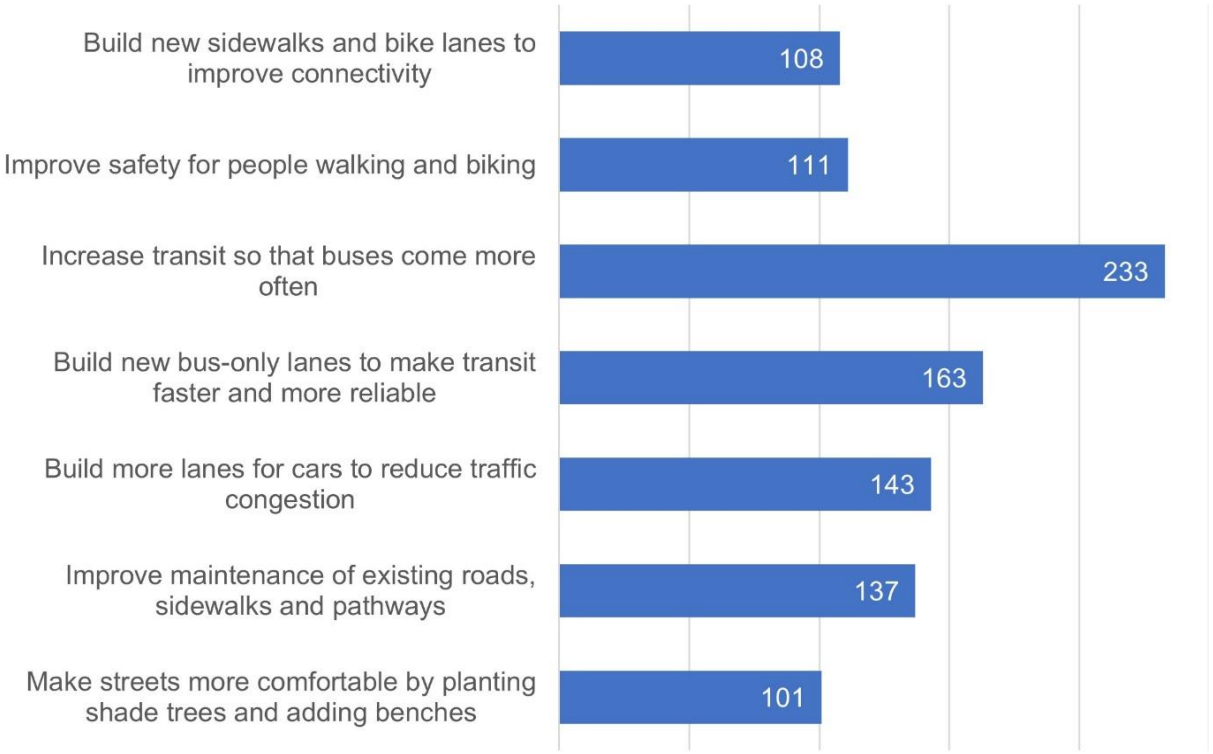
Question 5 asked if there is anywhere that residents need to go that is hard to reach due to a lack of transportation options. Answers were provided by 49 respondents. Responses were generally not geographic-specific but instead noted generic locations like "school" and "work". No trends were evident in the responses.

Question 6 asked the respondents which of the following they thought should be priorities for the City to consider. Up to three responses could be provided from the following choices:

- Build new sidewalks and bike lanes to improve connectivity
- Improve safety for people walking and biking
- Increase transit so that buses come more often
- Build new bus-only lanes to make transit faster and more reliable
- Build more lanes for cars to reduce traffic congestion
- Improve maintenance of existing roads, sidewalks and pathways
- Make streets more comfortable by planting shade trees and adding benches

Exhibit A-5 indicates the responses, which include transit options as the top two priorities.

Exhibit A-5: Transportation Investment Priorities



Question 7 asked the respondents if they have any other suggestions for the City of Ottawa on how to improve transportation in their neighbourhood. Most responses were repeats of their responses in Questions 4 and 6. Responses indicated 5 or more times were:

- Fix potholes - 5
- Need more buses - 13
- Buses are late - 10
- Transit is too expensive - 8

Appendix B Investment Priorities Survey Results

Question 1: What are your primary modes of transportation?

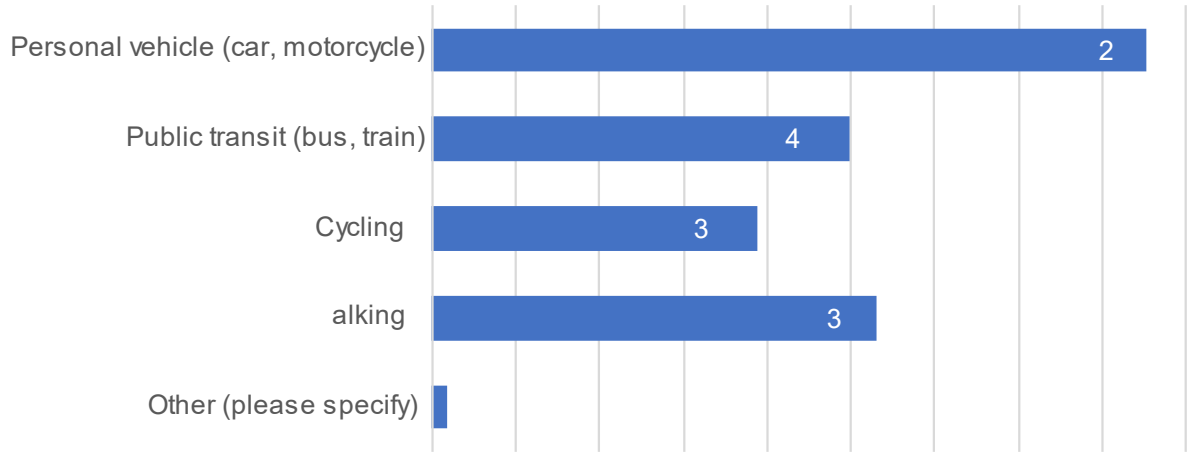
Respondents selected a minimum of 1 and a maximum of 5 modes as their primary transportation, with an average of 2 modes. This suggests that most respondents use more than one transportation mode in their daily lives or may use a combination of modes for the same trip.

Exhibit B-1 shows the number of responses for each mode selected. The highest selected mode of transportation was personal vehicle (37%), followed by walking (23%) and transit (22%) as the top primary modes of travel. All sustainable modes of transportation (walking, cycling, and public transportation) make up 62% of respondents' primary modes of travel.

Other modes of travel not listed, but identified by respondents included:

- Train -1
- Para transit - 2
- Taxi or rideshare (e.g. Uber, Lyft) - 6
- Bike with kids' bike trailer - 1
- Scooter or electric scooter - 5
- Wheelchair - 1
- Running - 1

Exhibit B-1: Question 1 Investment Survey Results



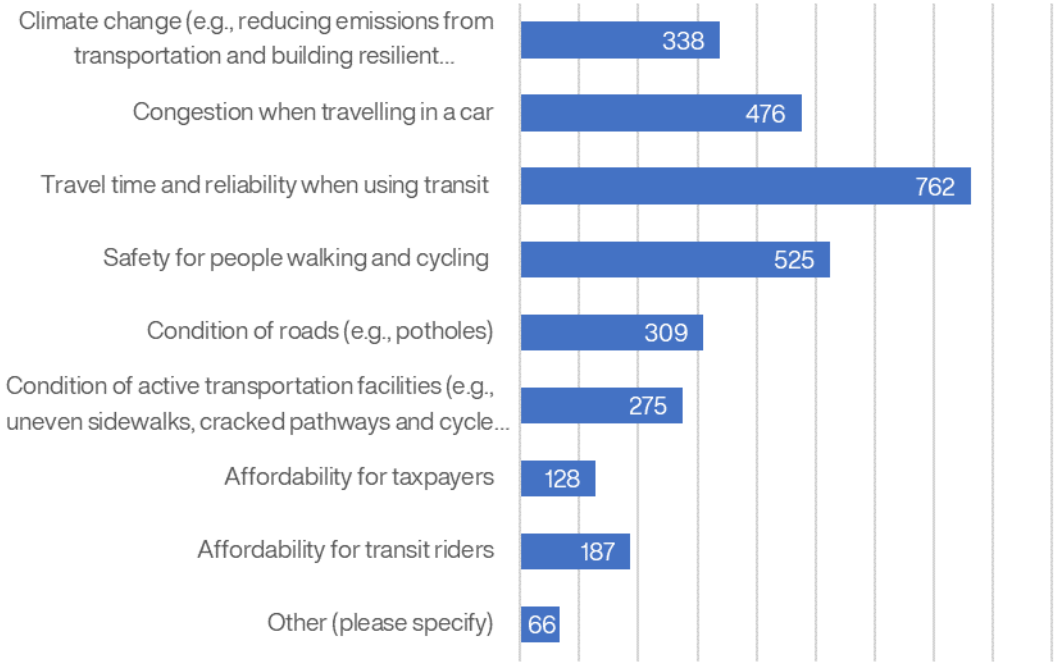
Question 2: What are the greatest transportation-related concerns that you would like the City to address?

Respondents were asked to select their top 3 priorities for transportation related concerns. **Exhibit B-2** shows the number of responses for each concern selected. “Travel time and reliability when using transit” was the most selected priority (2 % of all selected), followed by “Safety for people walking and cycling” (%) and “Congestion when travelling in a car” (%).

Additional concerns not listed, but identified by respondents as “Other” are captured in the following themes:

- Dedicated and protected active transportation infrastructure that is well connected;
- Connected, reliable, frequent, and accessible transit coverage in the suburbs and downtown;
- Winter maintenance of active transportation infrastructure and bus stops;
- Safety of road speeds and at intersections, especially to support growing populations;
- Coordinated traffic controls to manage congestion;
- Greenscapes along transportation corridors to manage air pollution, sound, and provide health and comfort benefits;
- Better multi-modal connectivity, including integration of active transportation uses with the transit network and on transit vehicles; and
- Creating dense, mixed-use, and walkable communities.

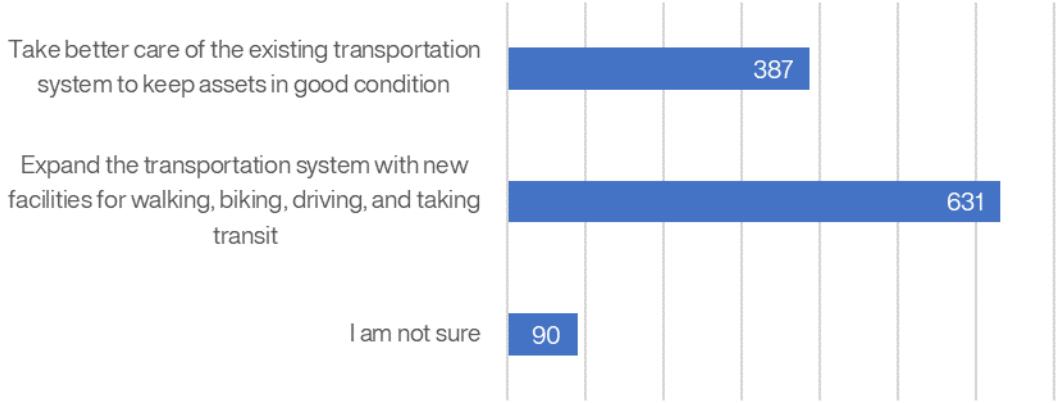
Exhibit B-2: Question 2 Investment Survey Results



Question 3: The City has a limited amount of funds to spend on transportation projects. If you could increase spending in one area, where would it be?

Respondents preferred “Expand the transportation system with new facilities for walking, biking, driving, and taking transit” over “Take better care of the existing transportation system to keep assets in good condition” by a margin of % to 3 %. The remaining 8% were not sure. **Exhibit B-3** shows the breakdown of responses per each spend category.

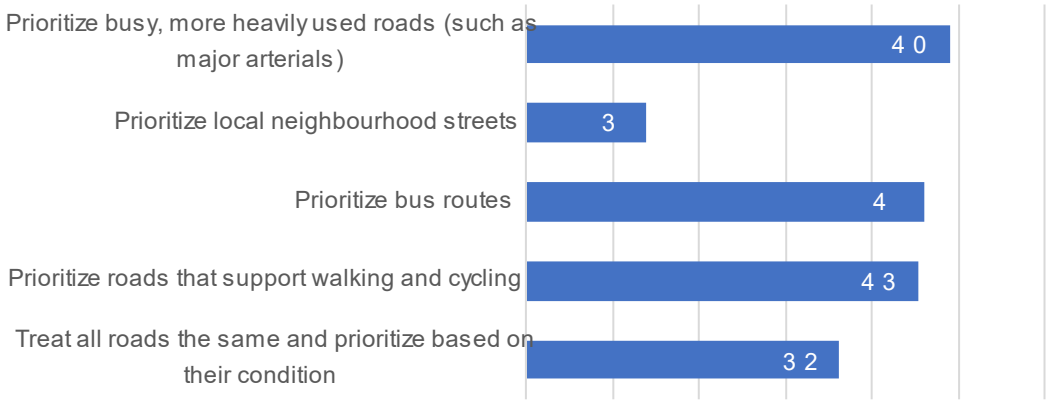
Exhibit B-3: Question 3 Investment Survey Results



Question 4: How would you like the City to prioritize renewal of existing infrastructure? Renewal activities include resurfacing and pavement preservation that keep assets in good working condition.

Respondents were asked to select their top two priorities for renewal of existing infrastructure. **Exhibit B-4** shows the “Prioritize busy, more heavily used roads” received the most selections (26%), closely followed by “Prioritize bus routes” and “Prioritize roads that support walking and cycling” (24% each), and “Treat all roads the same” at %.

Exhibit B-4: Question 4 Investment Survey Results



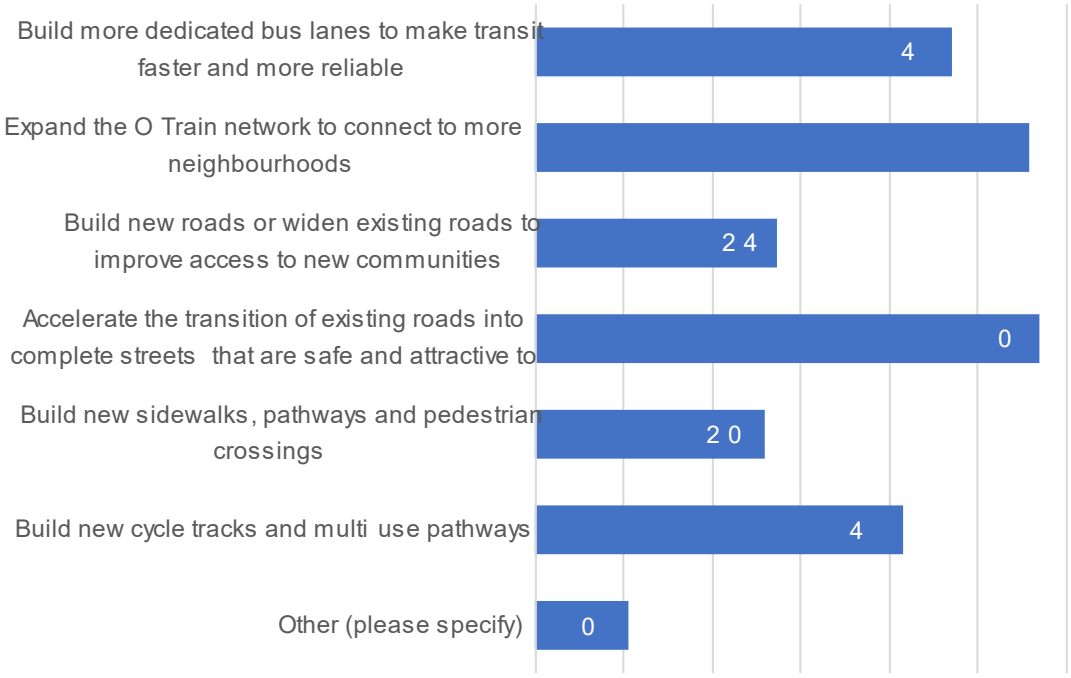
Question 5: What type of new infrastructure should be the City's priority?

Respondents were asked to select their top three priorities for new transportation infrastructure in the city. **Exhibit B-5** shows the number of responses for each priority selected. The top two selections were "Expand the O-Train network…" and "Accelerate the transition of existing roads into 'complete streets'…" (both at 2 %). "Build more dedicated bus lanes…" was the third most selected option (%). "Build new cycle tracks and multi-use pathways" (%) and build new/widened roads each received 16% of the responses.

Other concerns not listed, but identified by respondents as "Other" are captured in the following themes:

- Improve connectivity for all modes between neighbourhoods (outside of the downtown core);
- Build more bridges to connect Ottawa-Gatineau;
- Provide more park and rides to more easily access transit in rural areas;
- Introduce more traffic calming measures to reduce speeds on residential streets and improve safety at intersections; and
- Improve accessibility of transit infrastructure; install more transit shelters.

Exhibit B-5: Question 5 Investment Survey Results



Question 6: Is there any type of new infrastructure that you would be willing to invest less in?

Just over half of respondents (600 responses, 54%) provided comments on new infrastructure they would be wiling to invest less in. Comments align with the following themes:

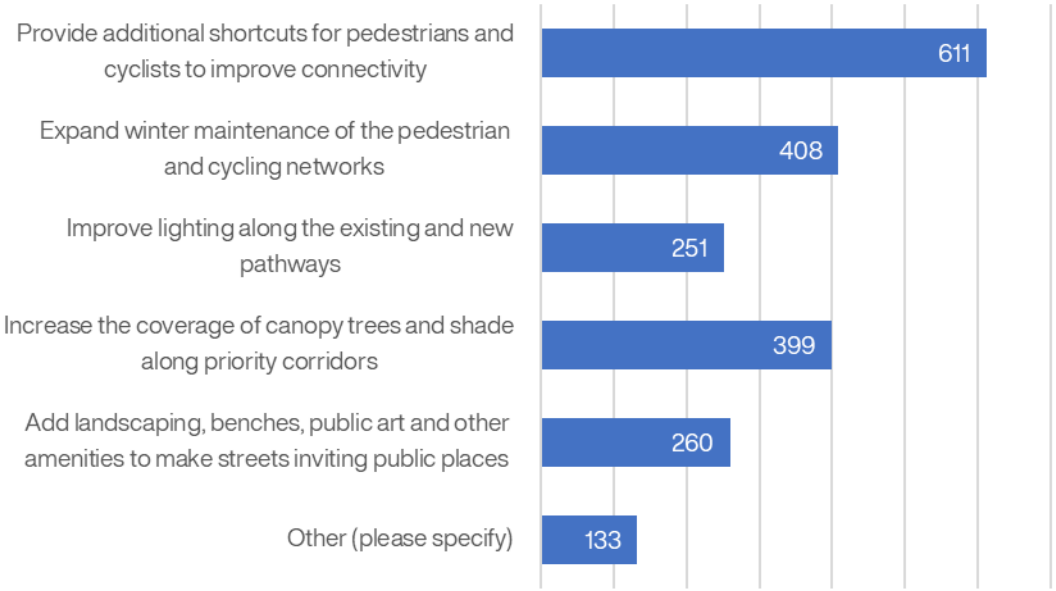
- **Investing less in new roads and road widening** – a majority of the comments are in favour of spending less on roads and infrastructure that may contribute to urban sprawl.
- **Investing less in expanding the light rail transit system –** the second most common comment would prefer less spending on expanding the O-Train system to instead focus on better bus feeders to the existing system and expanding or improving service across the bus network.
- **Cycling infrastructure –** there were mixed comments on cycling infrastructure. Some comments would prefer fewer bike lanes across the city, while others favour only spending on durable, physically separated bike lanes over less protected measures.

Question 7: In addition to providing new infrastructure, there are important supporting improvements that can be made. Which of these should be the City's priority?

Respondents were asked to select their top two priorities. **Exhibit B-6** shows the number of responses for each priority selected. "Provide additional shortcuts for pedestrians and cyclists to improve connectivity" was the most selected priority (30%), followed by "Expand winter maintenance of the pedestrian and cycling networks" (20%), and "Increase the coverage of canopy trees and shade along priority corridors" (19%).

Other concerns identified by respondents included improving environmental control at bus stops (shade in the summer; heat and shelter in the winter), and improving connectivity to green spaces.

Exhibit B-6: Question 7 Investment Survey Results



Question 8: What is your current age?

Exhibit B-7 shows a breakdown of the age groups of survey respondents (for those who answered this question). 2% (18) of total survey respondents did not respond to this question; percentages in **Exhibit B-8** and in this section are adjusted to account for those who responded. Most respondents are in the 35 to 44 age range (29%), followed by 25 to 34 (23%), and 45 to 54 (18%): young to middle-aged adults. Age ranges with the fewest respondents were 85 and older (0%), under 18 (1%), and 64 to 74 (6% each): the youngest and oldest of the population.

Exhibit B-7: Question 8 Investment Survey Results (of those who responded)

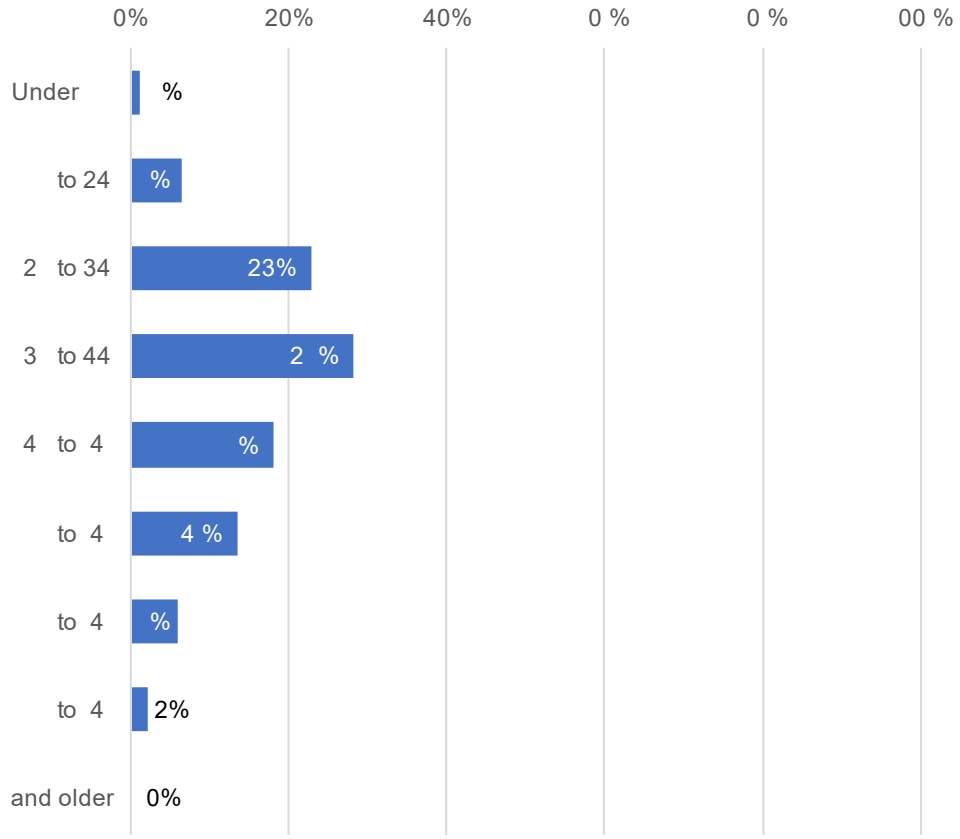
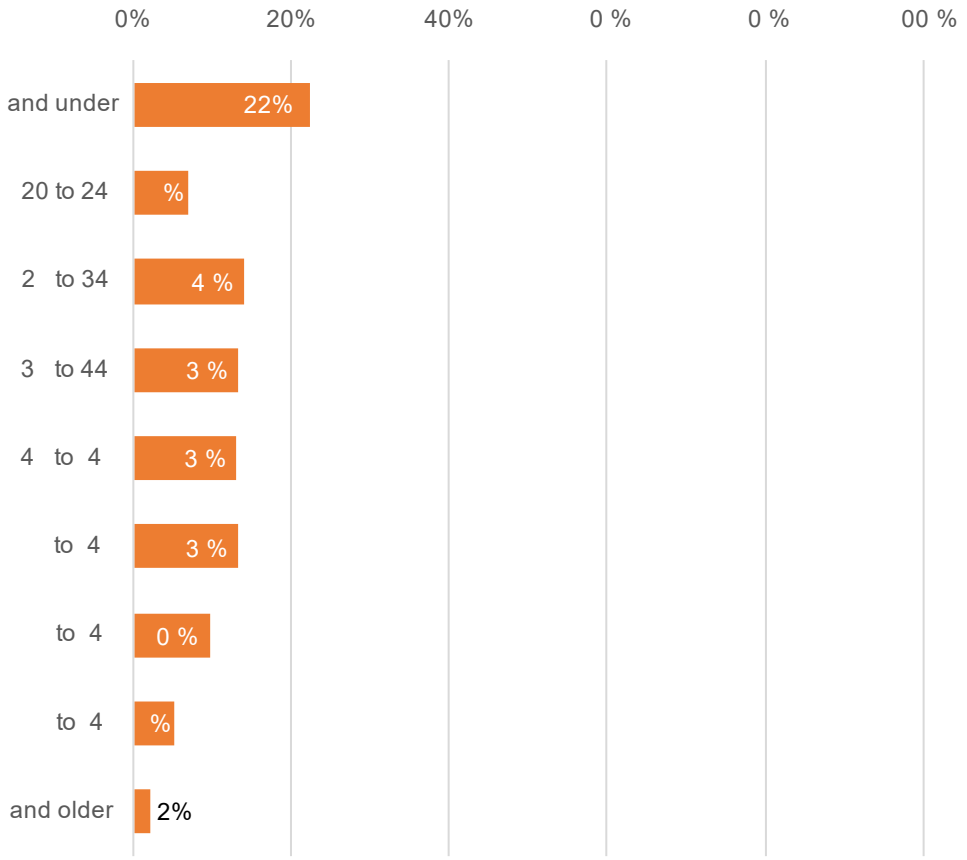


Exhibit B-8 shows a breakdown of the 2021 Census age groups for Ottawa (subdivision). Compared to the 2021 Census, there is a higher representation of young to middle-aged adults (25 to 54) which made up 70% of those who replied to the survey question, compared to 40% for Ottawa in the Census. There is also a lower representation of youth (18 and under) in the survey representation (1%), compared to the Census (19 and under, as per the census categories) (22%). Notably, the breakdown of older adults (55 and over) who completed the survey is more comparable to the Census population.

Exhibit B-8: Age Breakdown of 2021 Census for Ottawa (subdivision)



Question 9: What is your home postal code?

Most respondents who responded to this question (50%) live in the suburbs, followed by inner and outer urban areas (16%) each, and then downtown core (9%). The fewest responses were from participants living in rural areas (6%) and the greenbelt (2%).

The locations are shown on **Exhibit B-9**.

Exhibit B-9: Question 9 Investment Survey Results

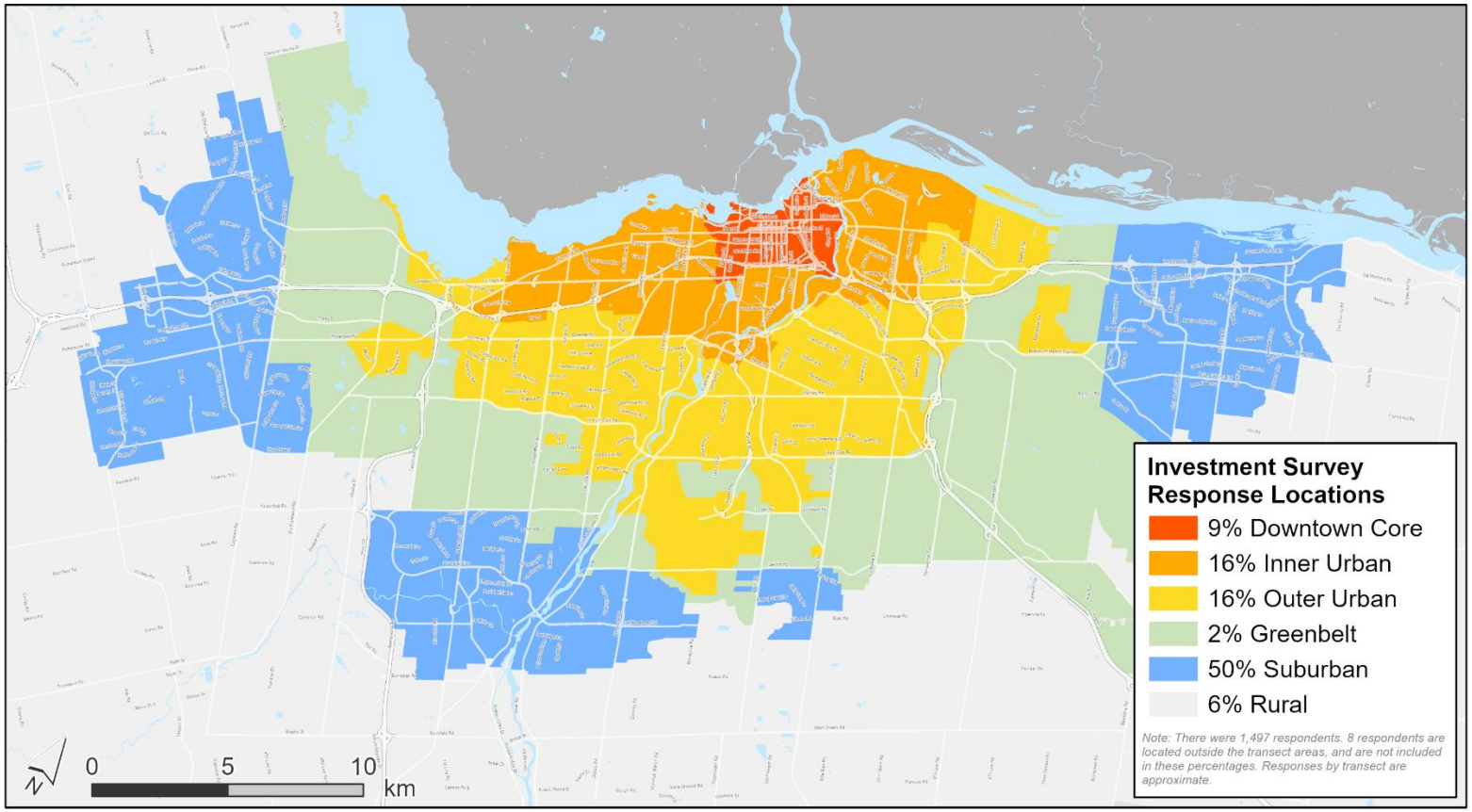
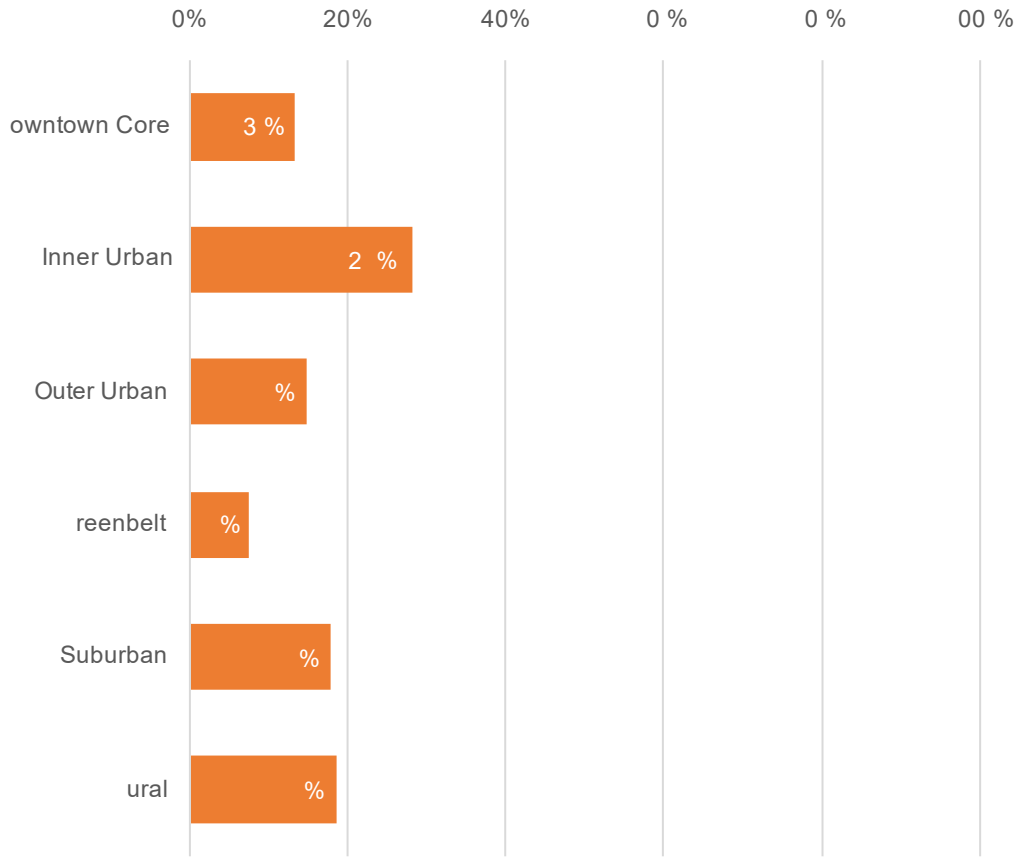


Exhibit B-10 shows a population breakdown of the policy areas in Ottawa, based on categorizing postal codes in the city. Compared to those who answered the survey, there is an under representation of residents in Inner Urban (28% census, 16% survey) and Rural areas (19% census, 6% survey), while there is an over representation of residents living in Suburban areas (18% census, 50% survey).

Exhibit B-10: Policy Area Population Breakdown of 2021 Census for Ottawa



Question 10: Are you a newcomer to Canada in the last five years?

Most of the survey respondents are not newcomers to Canada in the last five years (97%). A small portion (3%) are newcomers.

These survey results show an underrepresentation amongst newcomers, who comprise 6% of the population, according to the 2021 Census for Ottawa (subdivision).

Question 11: What is your gender? (Refers to current gender which may be different from sex assigned at birth and may be different from what is indicated on legal documents.)

Exhibit B-11 shows a breakdown of the gender of survey respondents. 58% of survey respondents were male, with 39% as female or other (37% female, 1% non-binary, and 1% prefer to self-describe). 6% (70) of all survey respondents preferred not to answer this question and are not included in the breakdown.

Exhibit B-11: Question 11 Investment Survey Results

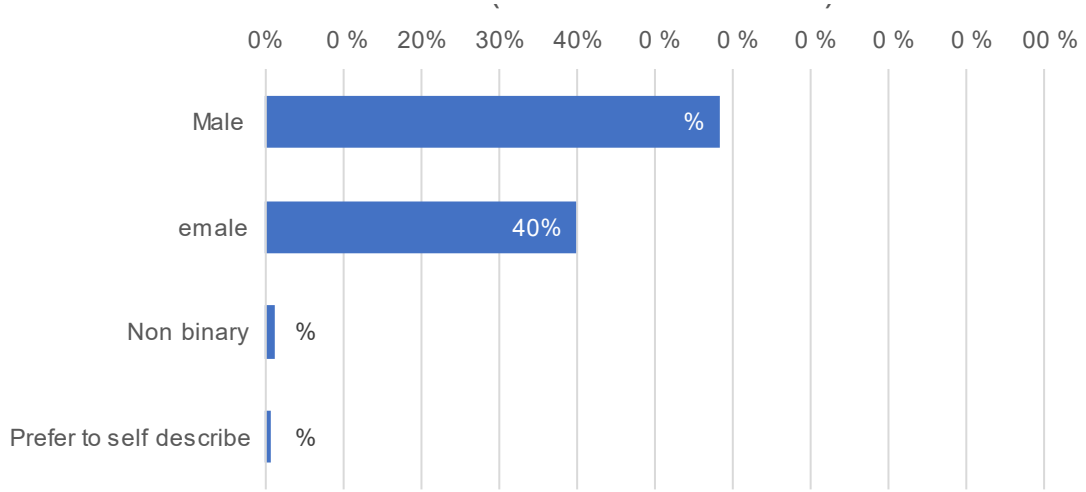
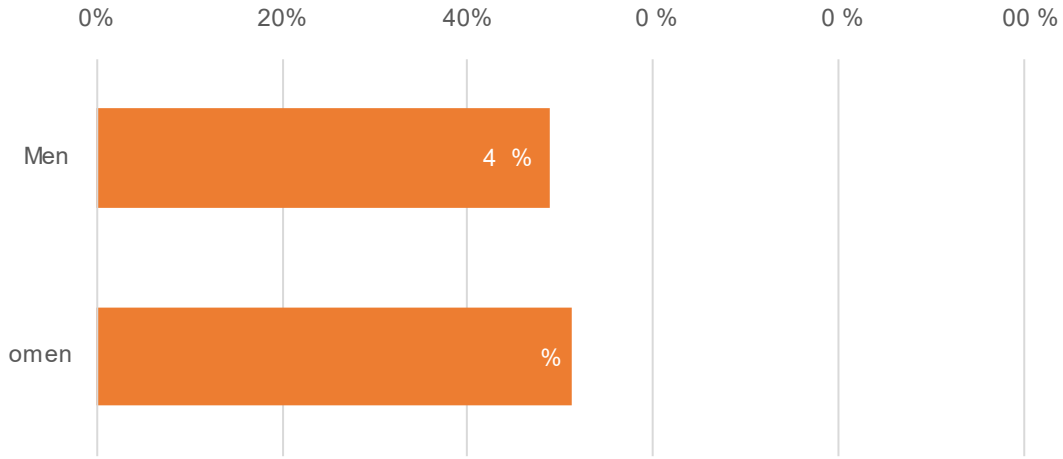


Exhibit B-12 shows the breakdown by gender for Ottawa in the 2021 Census, which only includes “men” and “women” as options. These results show that men make up less than half of the population in Ottawa (49%), and therefore respondents to the survey are over representative of the population at 58%.

Exhibit B-12: Gender Breakdown of 2021 Census for Ottawa (subdivision)



Question 12: What was your household's total gross (before tax) income last year?

Exhibit B-13 shows the breakdown of the before-tax household income of survey respondents (excluding the 181 respondents (16%) who did not respond to this question). Most are in the $150,000 and above household income bracket before taxes (49%). The next two highest income brackets were $100,000 to $149,000 (27%) and $70,000 to $99,000 (15%).

Exhibit B-13: Question 12 Investment Survey Results (household income before-tax)

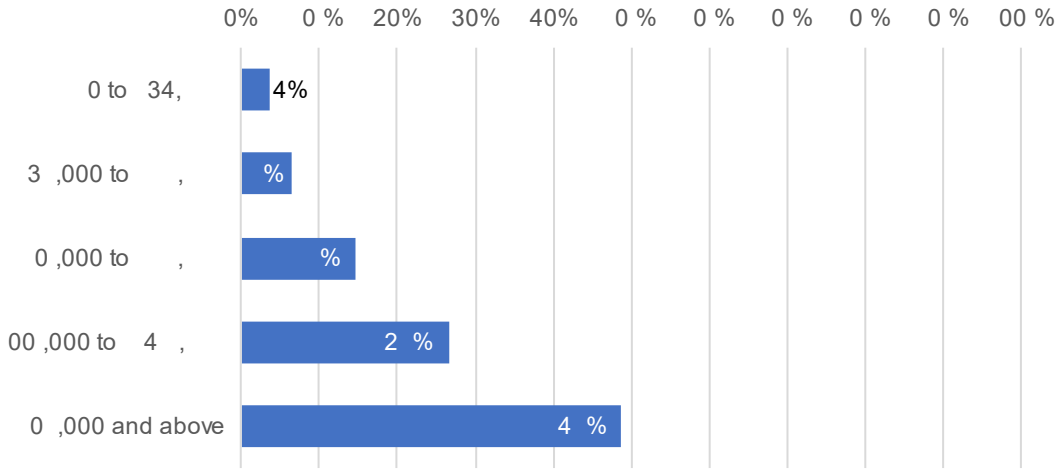
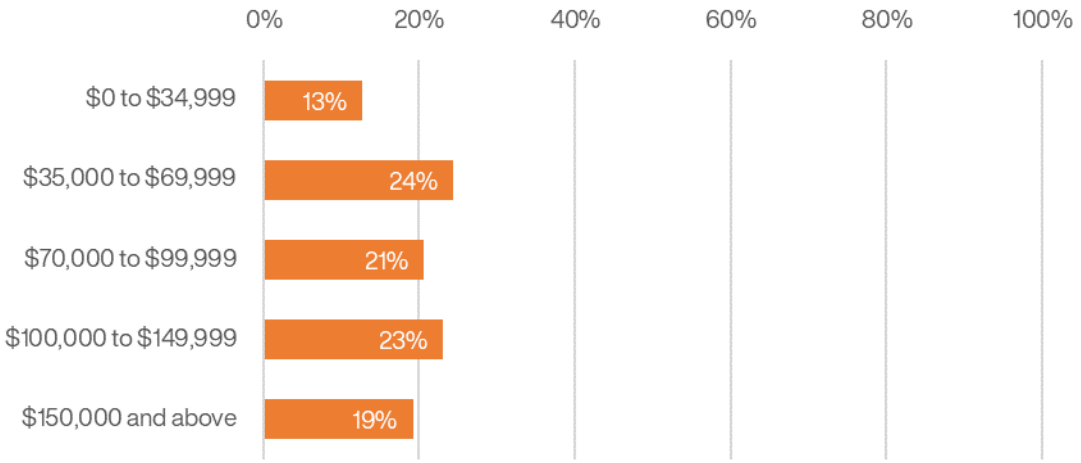


Exhibit B-14 shows a breakdown of household income from the 2021 Census for Ottawa (subdivision). Importantly, this exhibit shows results as after-tax and is not directly comparable to the survey results. However, this breakdown does show a larger proportion of those in lower income brackets ($0 to $69,999) compared to those who completed the survey. Likewise, the survey has a much higher proportion of respondents in the highest income bracket ($150,000 and above) compared to the census. Although several respondents chose not to answer this question, these results suggest that those who completed the survey have higher incomes compared to the average in Ottawa.

Exhibit B-14: Household Income Breakdown of 2021 Census for Ottawa (subdivision) (after-tax)



Appendix C Road and Transit Needs Mapping Survey Results

Survey results for the auto and transit map-based surveys are provided in this Appendix.

Auto Map Survey

The main themes of comments from the Auto Map Survey included:

- **High levels of auto congestion** – Where there are road lane reductions or street parking, especially during peak hours and on weekends.
- **Safety concerns at intersections** – Where traffic signal phases are short and left-turns are difficult, and at roundabouts where decisions need to be made quickly, and pedestrian crossings are less visible.
- **Safety concerns with auto-speeds** – Where vehicles speed, or there are higher speed limits on roads with heavy truck traffic.
- **Conflicts between auto and other travel modes** – Where there is a lack of dedicated infrastructure for transit, cycling, or safe pedestrian crossings.

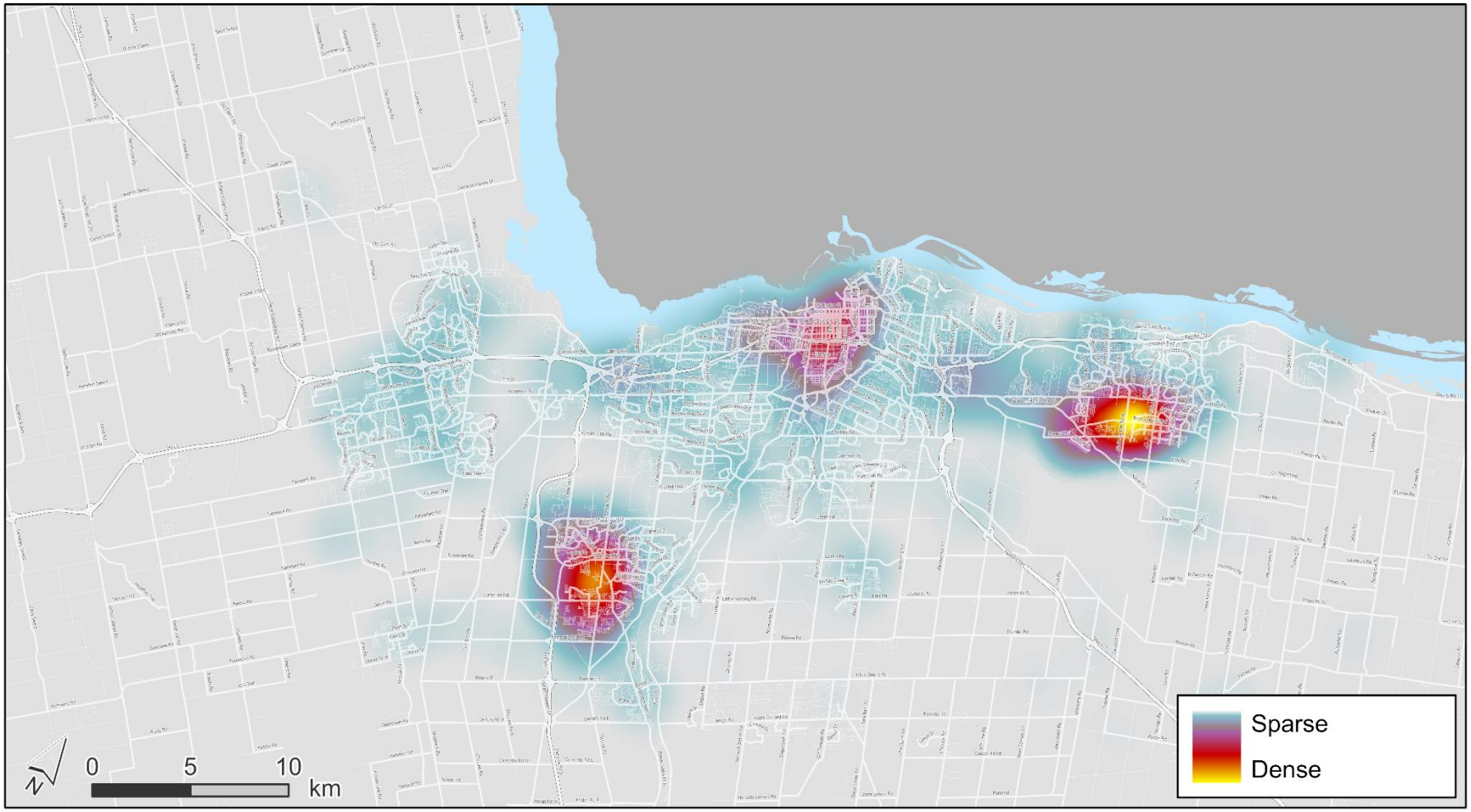
Exhibit C-15 shows where pins with comments relating to automobiles are located across the city. Three hot spots of comments are in the downtown core, Barrhaven (around Cambrian Road and Greenbank Road), and Orléans (around Mer-Bleue Road and Brian Coburn Boulevard).

Some geographic-specific concerns include:

- **Greenbank Road Bridge at Jock River** (Barrhaven) – Congested during rush hour and school peak hours.
- **Brian Coburn Boulevard** (Orléans) – Congestion, including at roundabouts at Mer Bleue Road and Tenth Line Road.
- **Strandherd Drive** (Barrhaven) – Congestion leading to Highway 416.
- **Bronson Avenue** (Chinatown, Glebe) – Congestion where lanes are reduced, especially at intersections.
- **Byward Market** – Parking and congestion cause safety concerns in a highly pedestrianized area.
- **Wellington Street** (LeBreton Flats, Centertown) – Lack of signage and protected bike lanes impact safety for multi-modal traffic.
- **King Edward Avenue** (Lowertown, Sandy Hill) – Congestion and high truck traffic cause safety concerns.

- **Greenbank Road** (Nepean) – Darjeeling Avenue, Rockville Road, and Strandherd Drive intersections were identified as unsafe for both car users and pedestrians.
- **Strandherd Drive** (Barrhaven) – Signal timing at intersections was felt to promote speeding and create conflicts with pedestrians.
- **Riocan Avenue and Marketplace Avenue intersection** (Barrhaven) – Absence of traffic signals is seen as posing a safety risk for pedestrians.
- **Mer Bleue Road and Brian Coburn Boulevard roundabout** – Volume of car traffic was noted as effecting pedestrian safety (school on northeast corner of intersection).
- **Innes Road** (Orléans) – Left turns were identified as dangerous.

Exhibit C-15: Concentration of Comment Pins Relating to Auto



Transit Map Survey

The main themes of comments from the Transit Map Survey included:

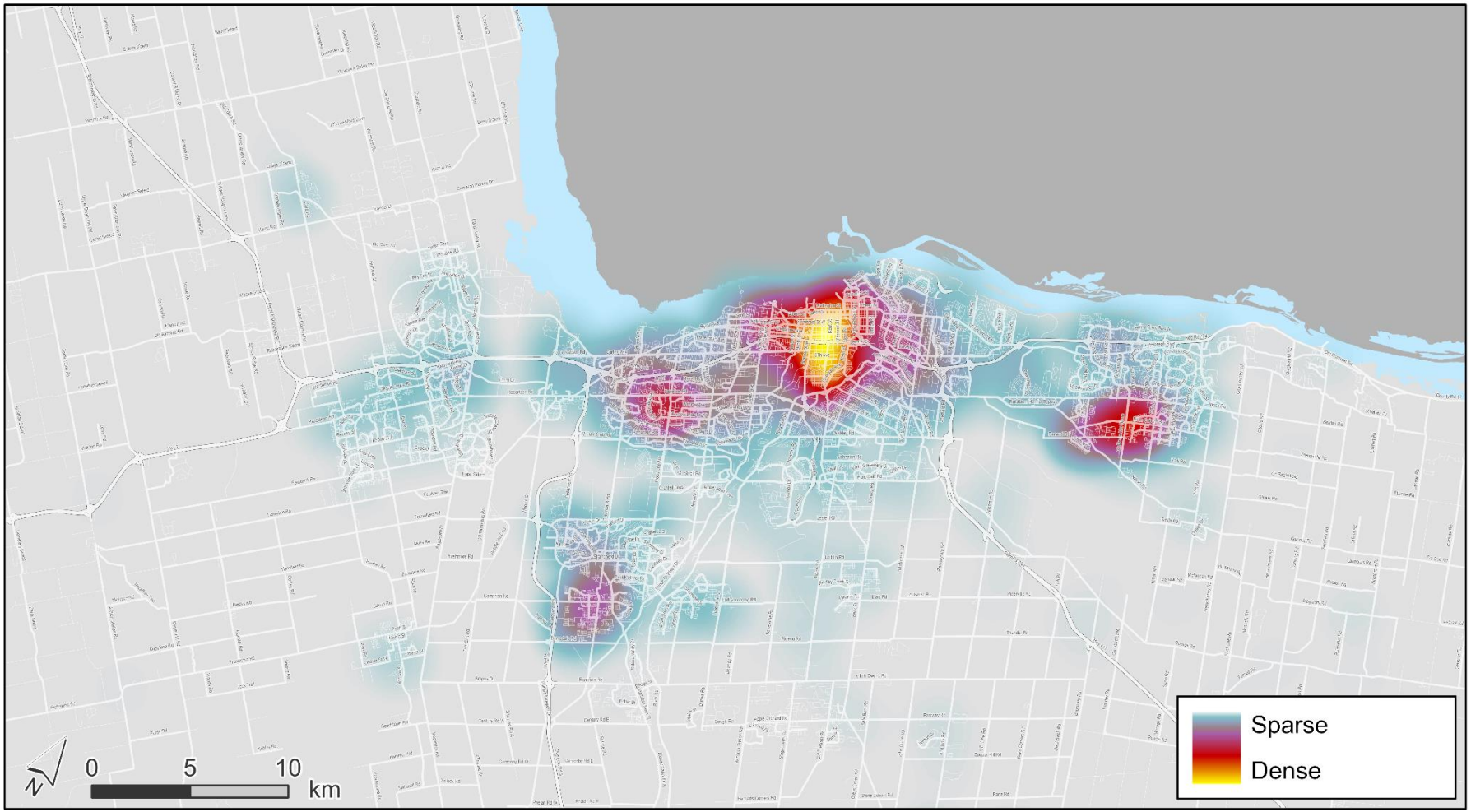
- **Conflicts between auto and transit traffic** –Cars either drive or park in transit lanes and bus stops.
- **Unpredictable transit reliability** – Buses often run behind schedule and delays can result in bus bunching.
- **Need for more transit infrastructure** – There is a lack of transit service to meet the needs of new development, including connections to key destinations.
- **Need for more frequent transit** – Transit is not provided frequently enough.
- **Need for better connectivity to transit** – There are missing crosswalks and sidewalks at bus stops; and lack of cycling access to transit. All these areas (among others) identified the need for more reliable, frequent, and connected transit.

Some specific corridors include:

- **Bank Street** (Downtown) – Bottlenecks and congestion along the corridor create service delays; higher frequency and a dedicated lane are needed.
- **Queen Street** (Downtown) – Bottlenecks and congestion lead to slow service.
- **Greenbank Road** (Nepean) – Lack of pedestrian crossings makes it difficult to access transit. Also, would benefit from more frequent connections to rapid transit.
- **Baseline Road** (Nepean) – Need for rapid transit along the corridor to accommodate new residential developments.
- **Merivale Road** (Nepean) – Congestion and slow travel times along the corridor causing unreliable service.
- **Carling Avenue** (Ottawa West) – Need for rapid transit along the corridor to combat slow and unreliable service due to auto congestion.
- **Barrhaven** (general) – More (express) transit connections needed to the rest of the city.
- **Tenth Line Road** (Orléans) – Need for more frequent transit service.
- **Innes Road** (Orléans) **–** Auto traffic can cause safety concerns if stopped within a transit corridor, also slowing down transit travel speeds.

- **Brian Coburn Boulevard** (Orléans) – Traffic congestion, especially around and between roundabouts, as well as the placement of bus stops, slows down transit travel speeds.

Exhibit C-2: Concentration of Comment Pins Relating to Transit



Summary of Mapping Survey Themes

Comments left with pins on the auto map and transit map were classified into the following four themes:

1. Manage congestion and improve access to development (**Exhibit C-3**)
2. Improve and expand transit city-wide (
3. **Exhibit** C-4)
4. Improve safety, accessibility and equity for all road users (**Exhibit C-5**)
5. Provide multimodal streets and encourage sustainable travel choices (**Exhibit C-6**)

The exhibits referenced above show the geographic distribution of all comments that were posted for both surveys in relation to their respective theme.

Exhibit C-3: Concentration of Comment Pins Tagged with "Managing congestion and improving access to development" Theme

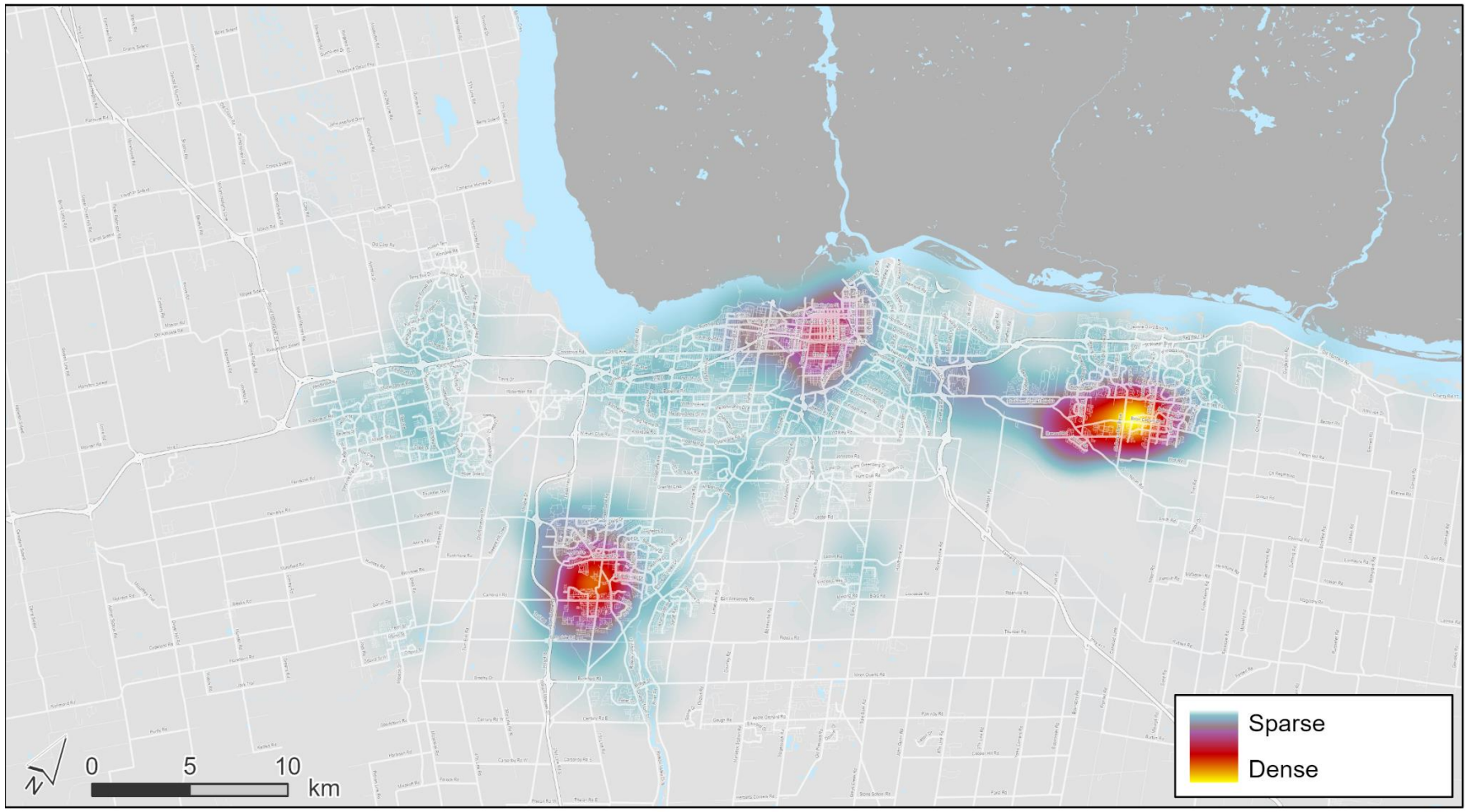


Exhibit C-3a: Concentration of Comment Pins inside the Greenbelt, tagged with "Managing congestion and improving access to development" Theme

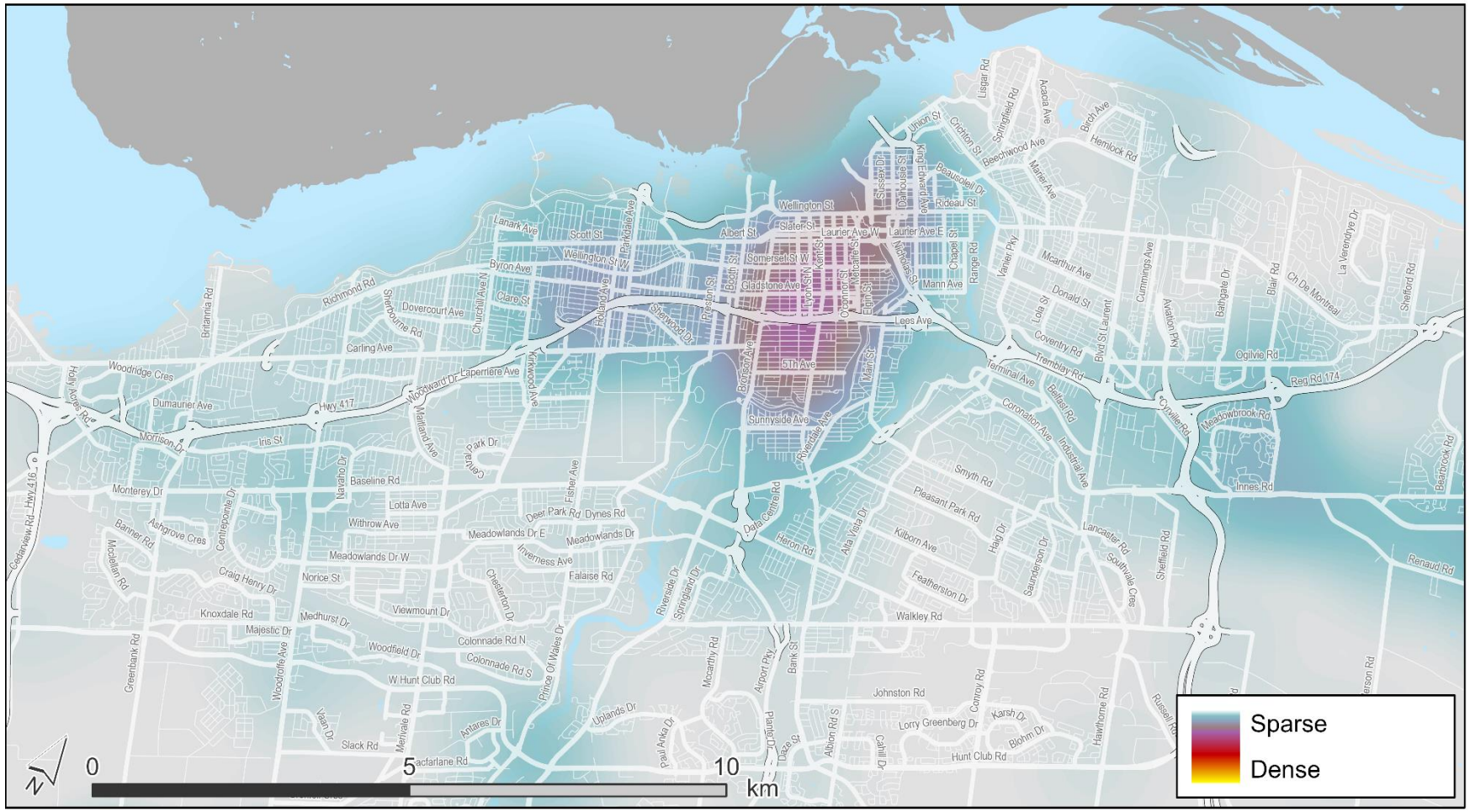


Exhibit C-3b: Concentration of Comment Pins in the East, tagged with "Managing congestion and improving access to development" Theme

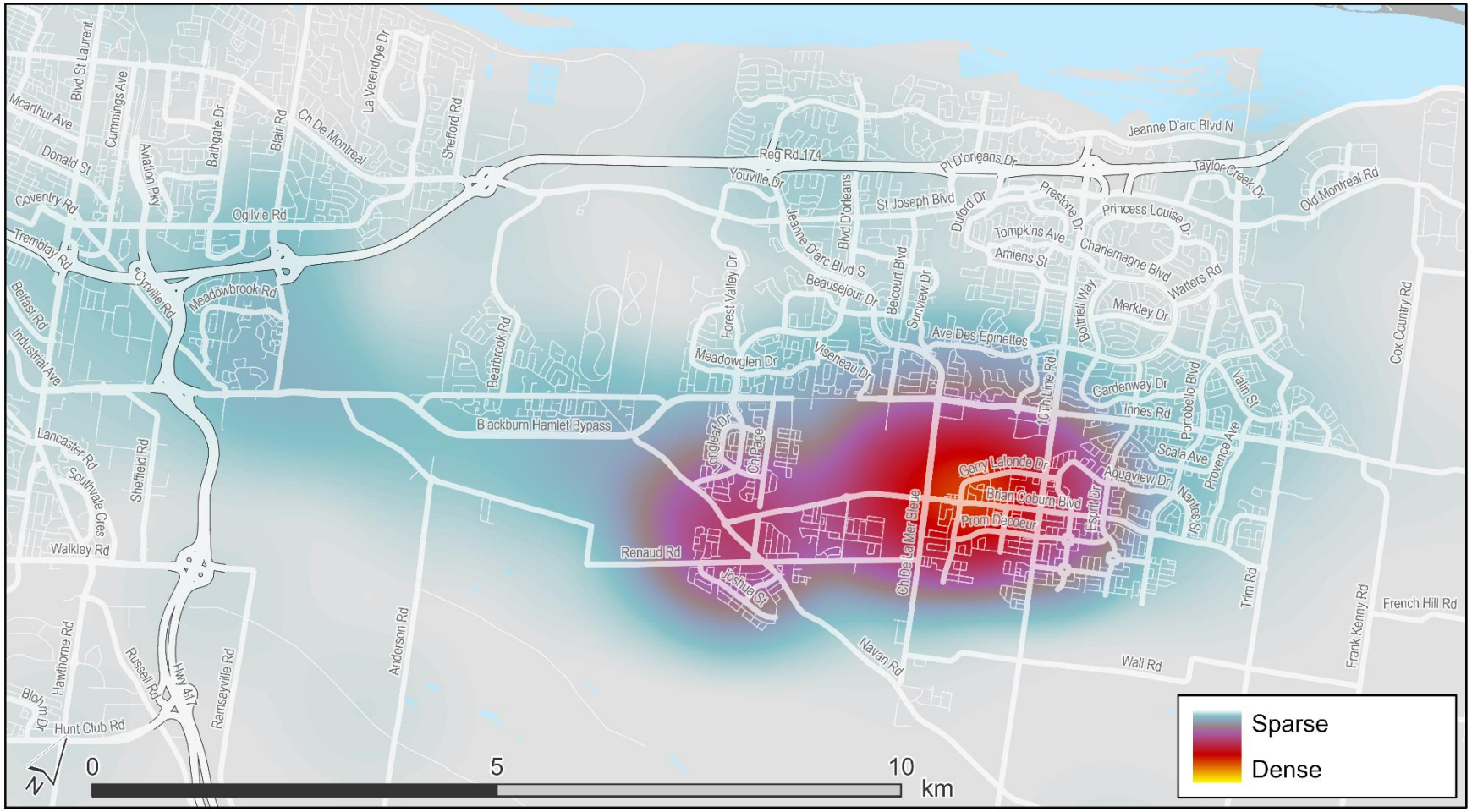


Exhibit C-3c: Concentration of Comment Pins in the South, tagged with "Managing congestion and improving access to development" Theme

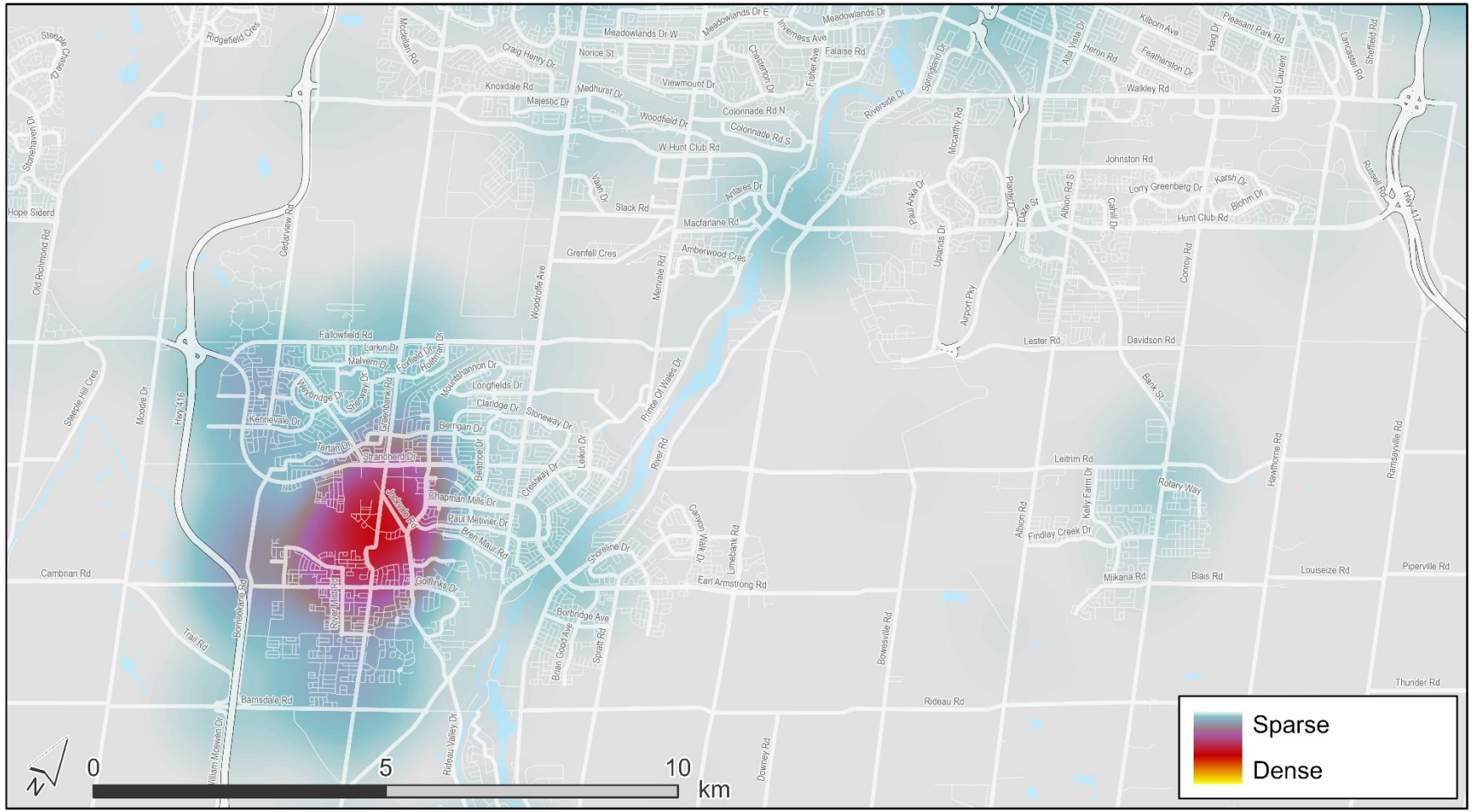


Exhibit C-3d: Concentration of Comment Pins in the West, tagged with "Managing congestion and improving access to development" Theme

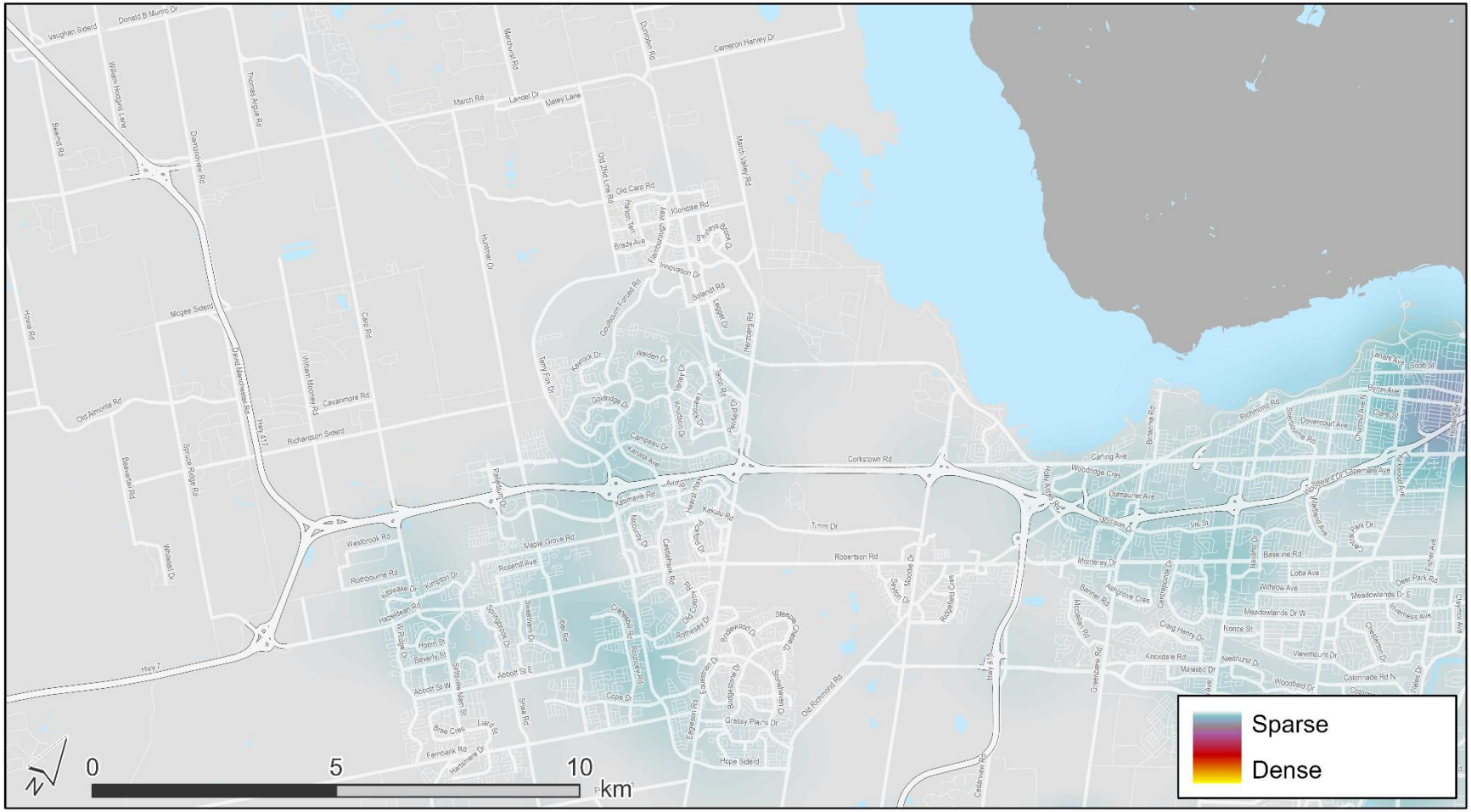


Exhibit C-4: Concentration of Comment Pins Tagged with "Improving and expanding transit city-wide" Theme

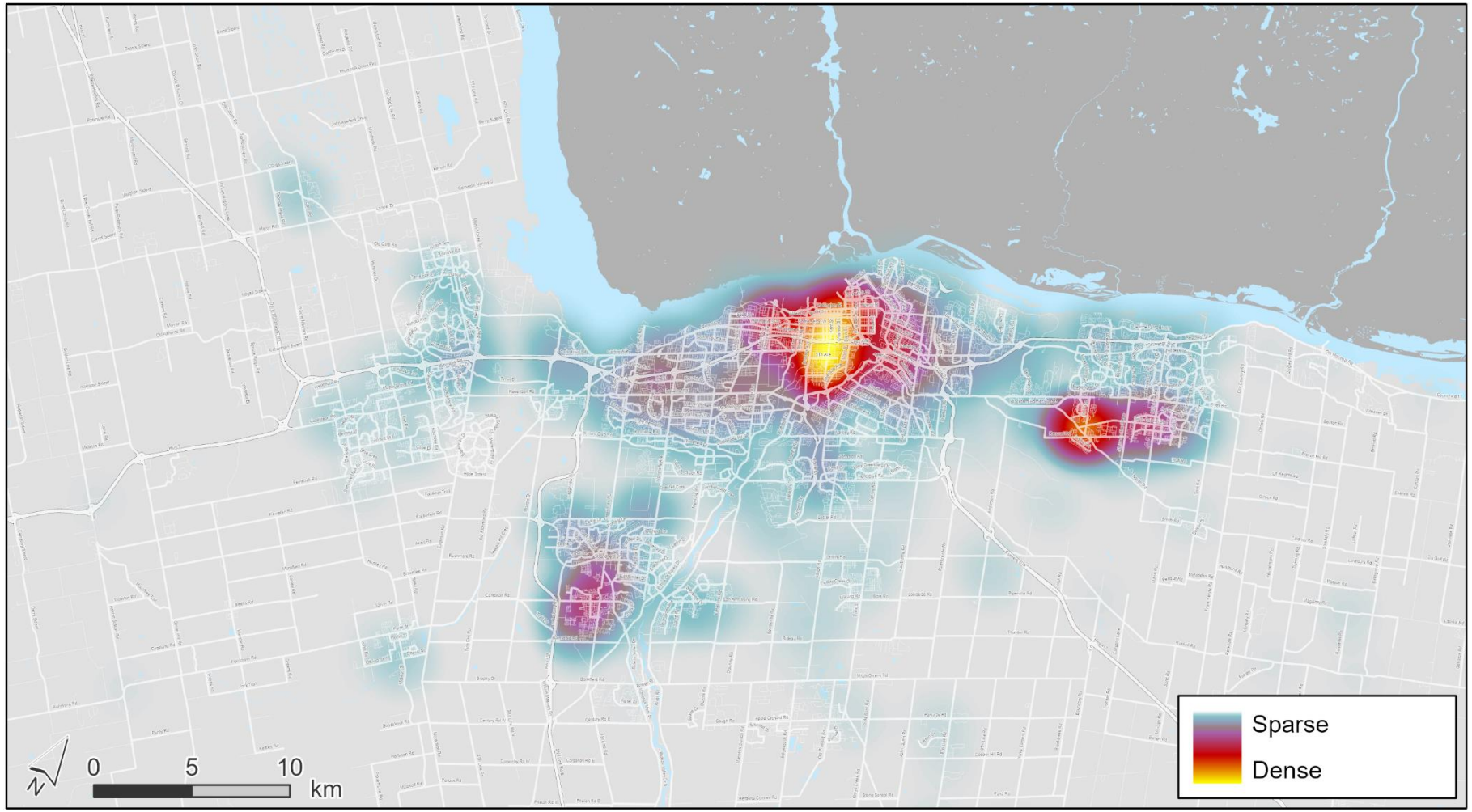


Exhibit C-4a: Concentration of Comment Pins inside the Greenbelt, tagged with "Improving and expanding transit city-wide" Theme

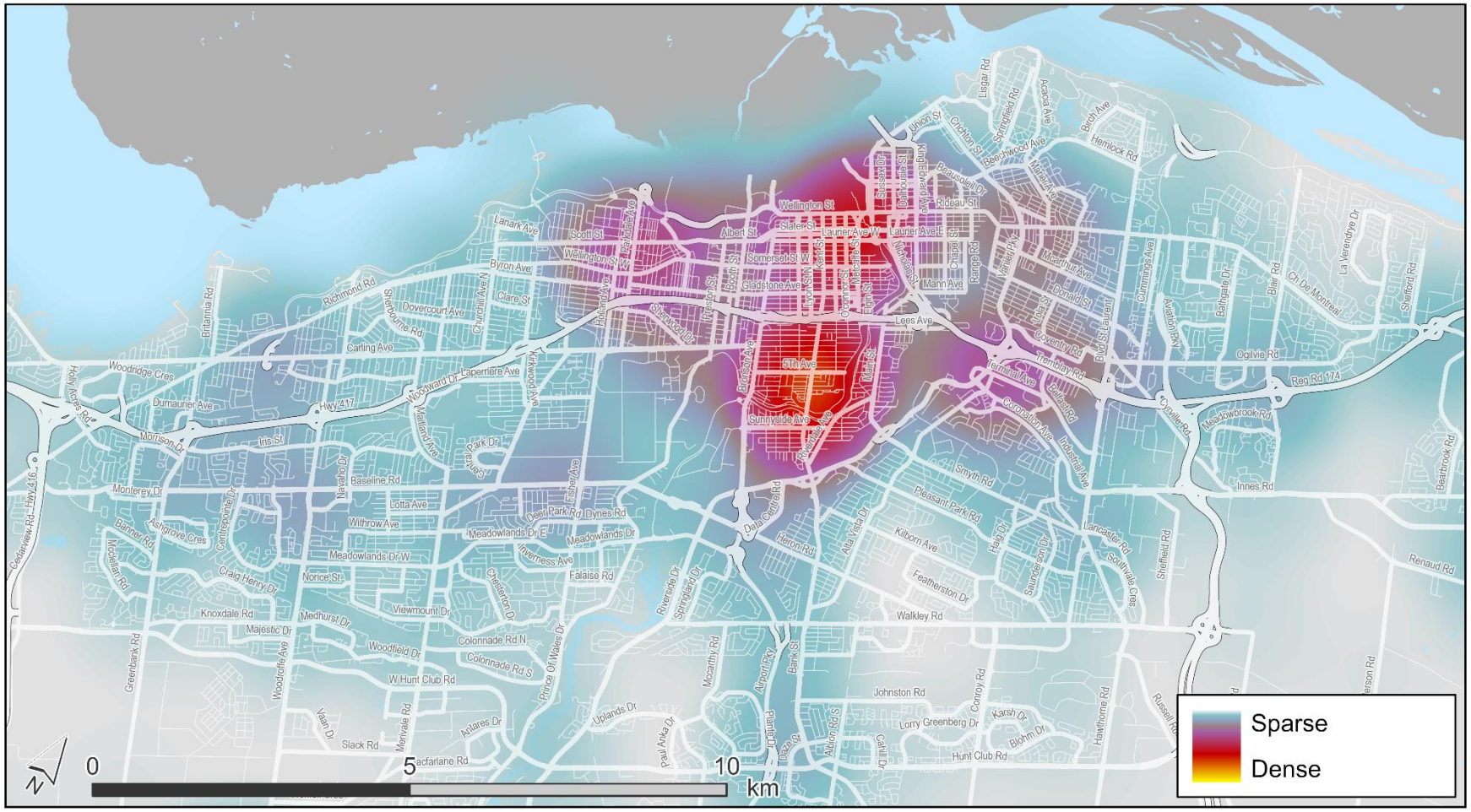


Exhibit C-4b: Concentration of Comment Pins in the East, tagged with "Improving and expanding transit city-wide" Theme

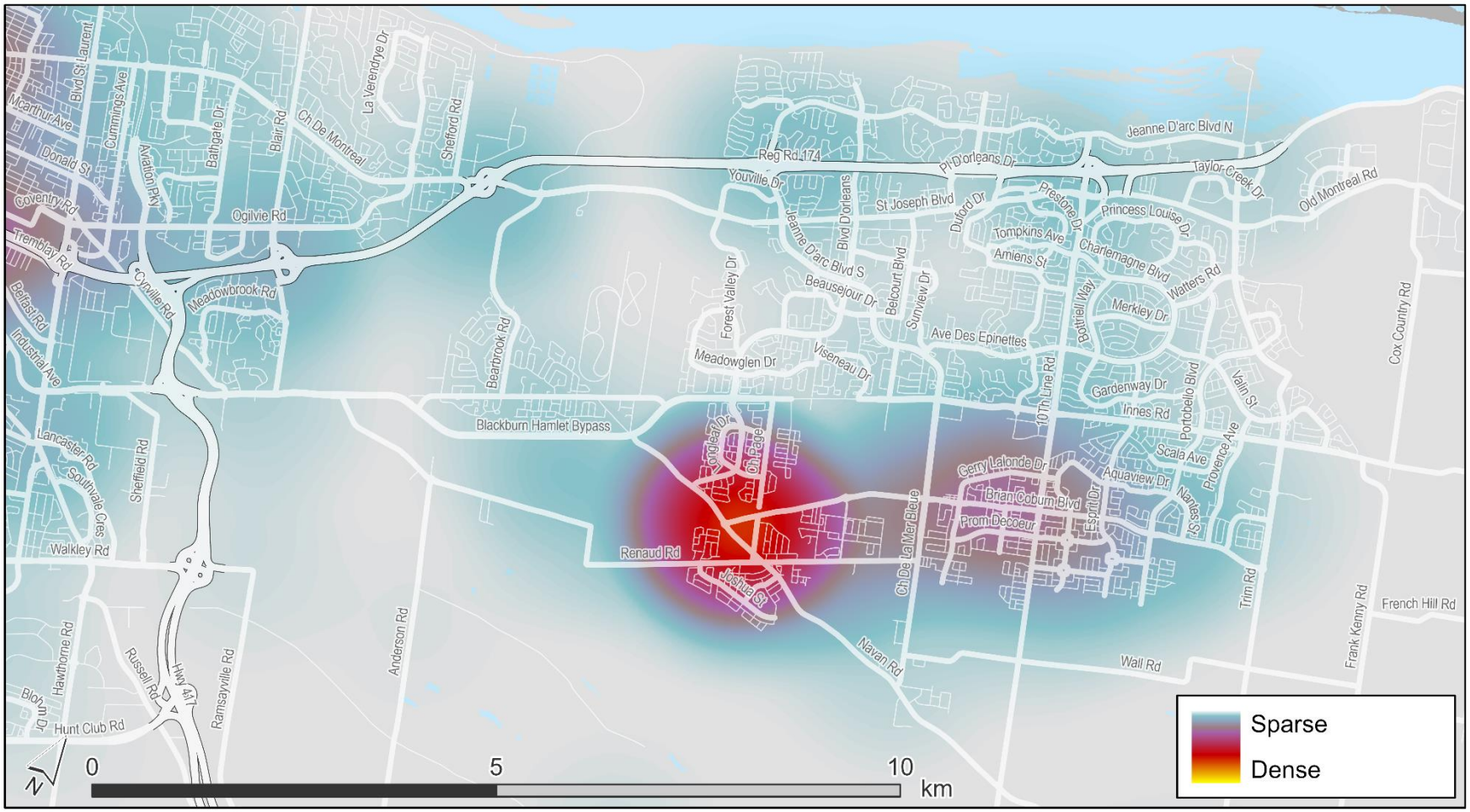


Exhibit C-4c: Concentration of Comment Pins in the South, tagged with "Improving and expanding transit city-wide" Theme

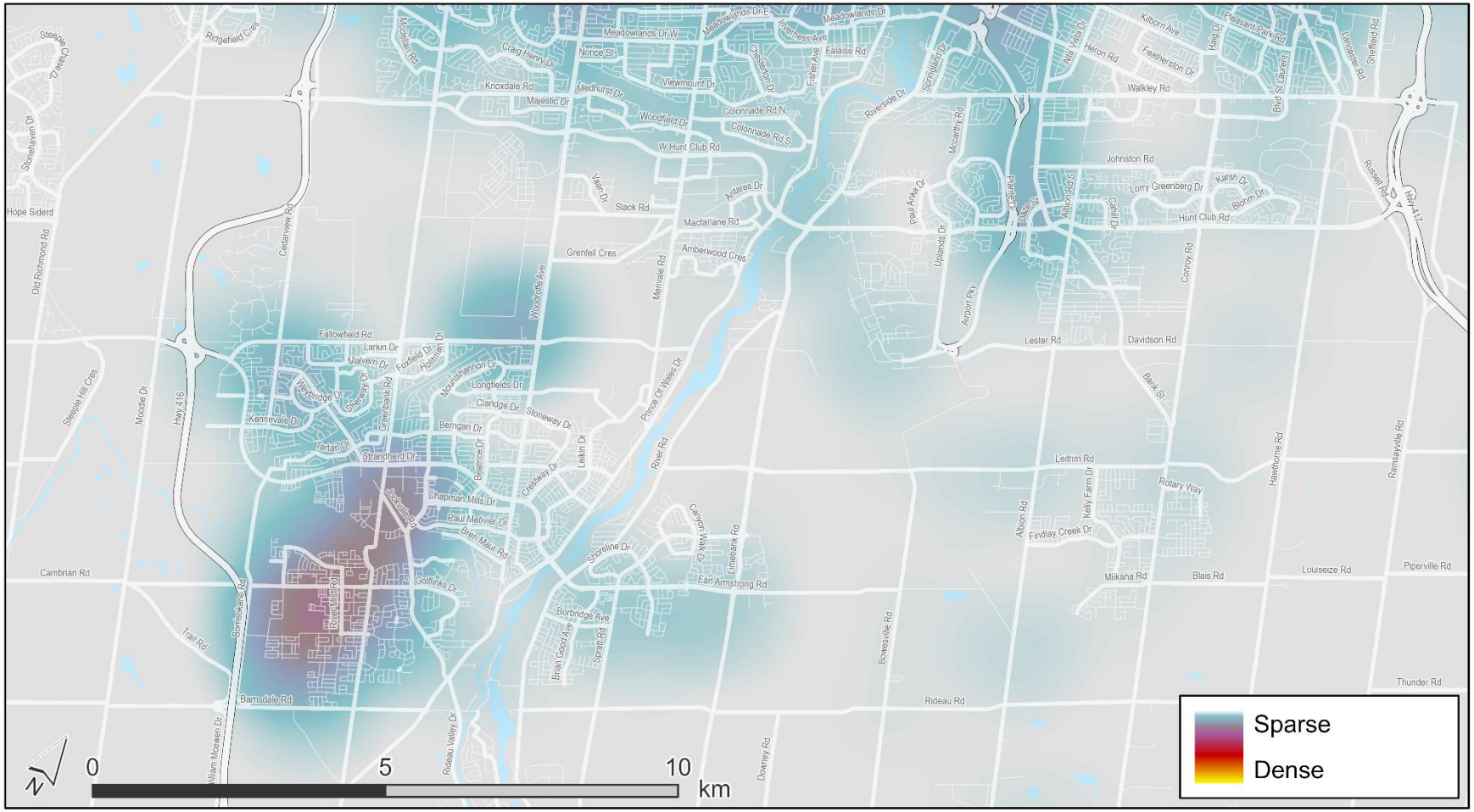


Exhibit C-4d: Concentration of Comment Pins in the West, tagged with "Improving and expanding transit city-wide" Theme

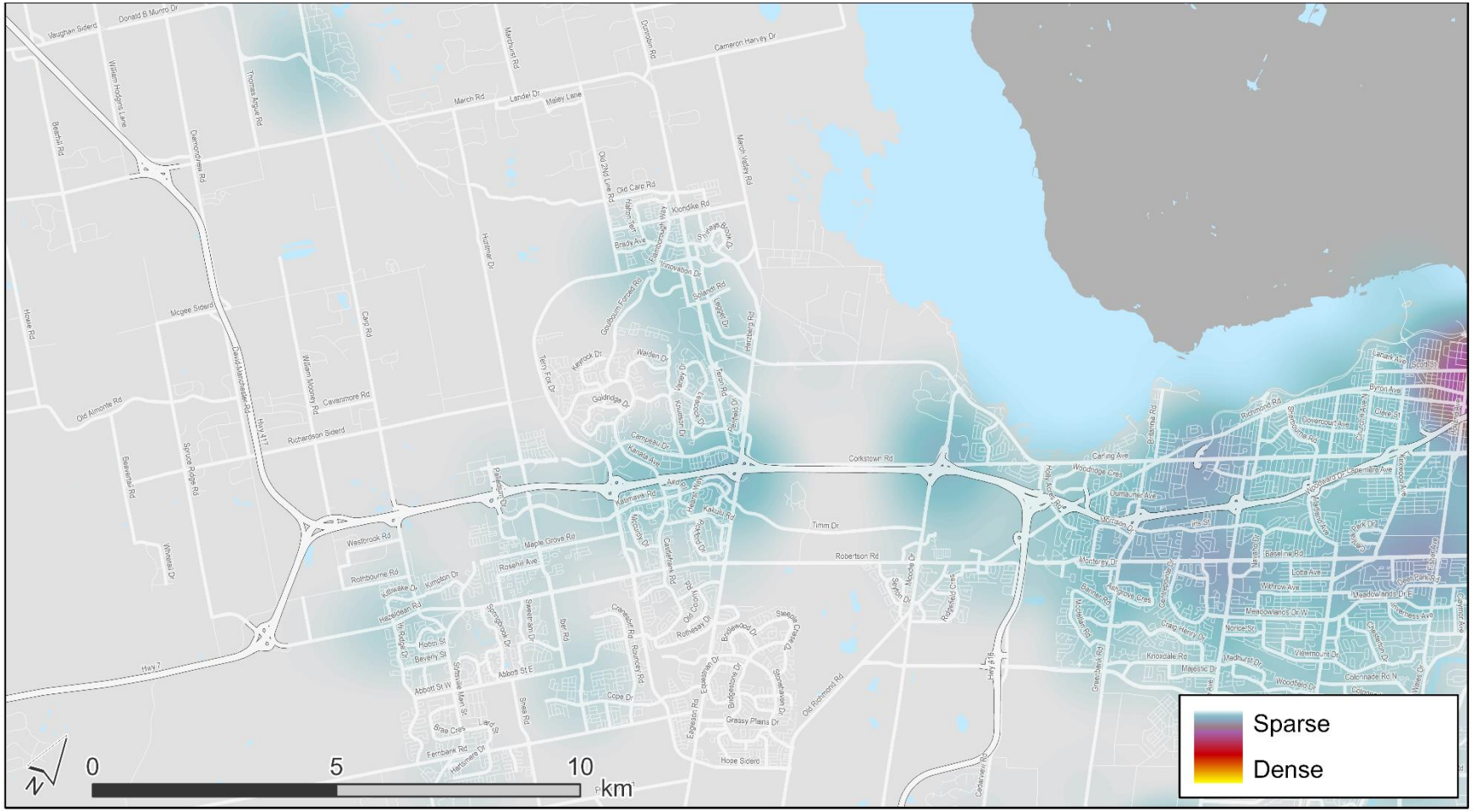


Exhibit C-5: Concentration of Comment Pins Tagged with "Improving safety, accessibility, and equity for all road users" Theme

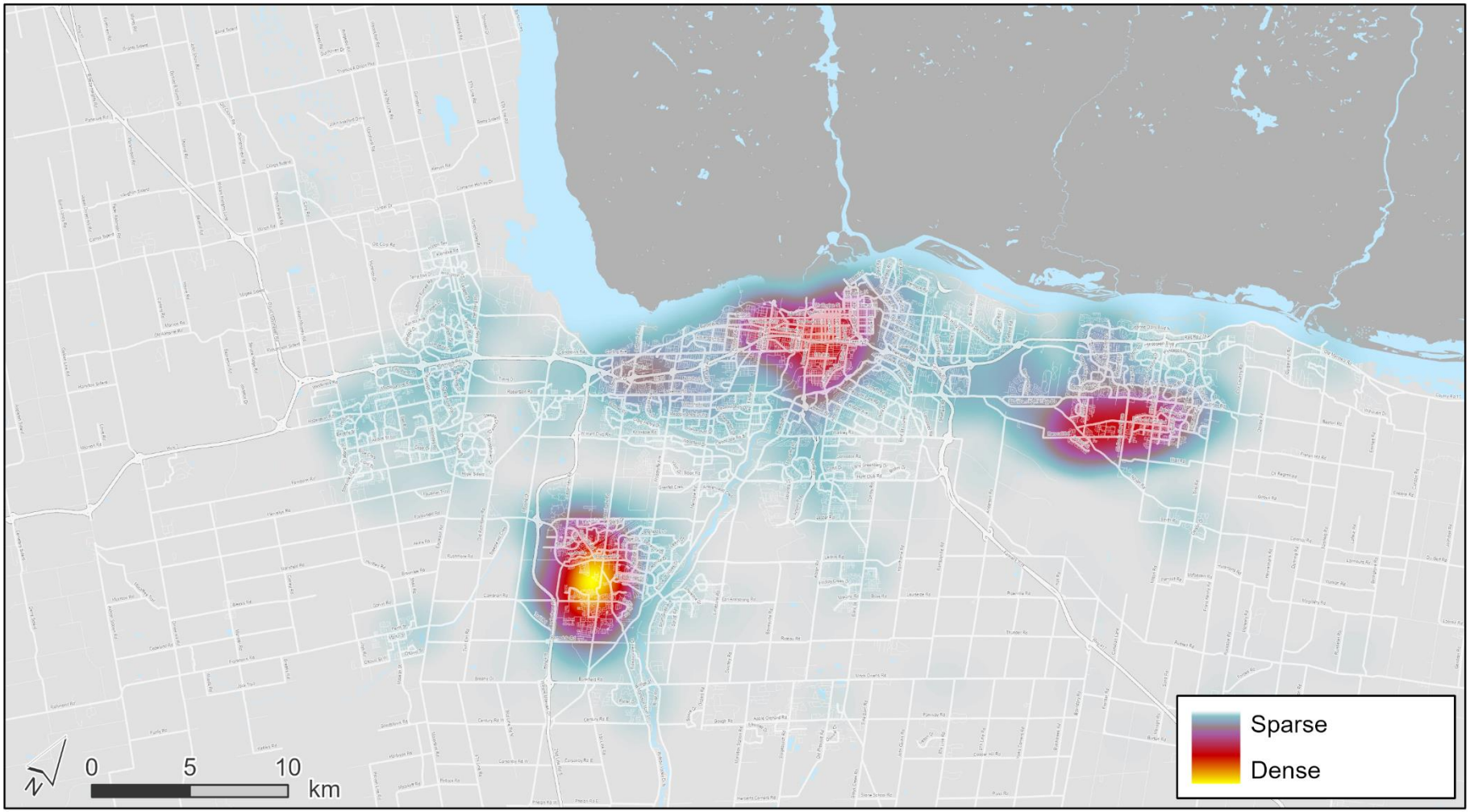


Exhibit C-5a: Concentration of Comment Pins inside the Greenbelt, tagged with "Improving safety, accessibility, and equity for all road users" Theme

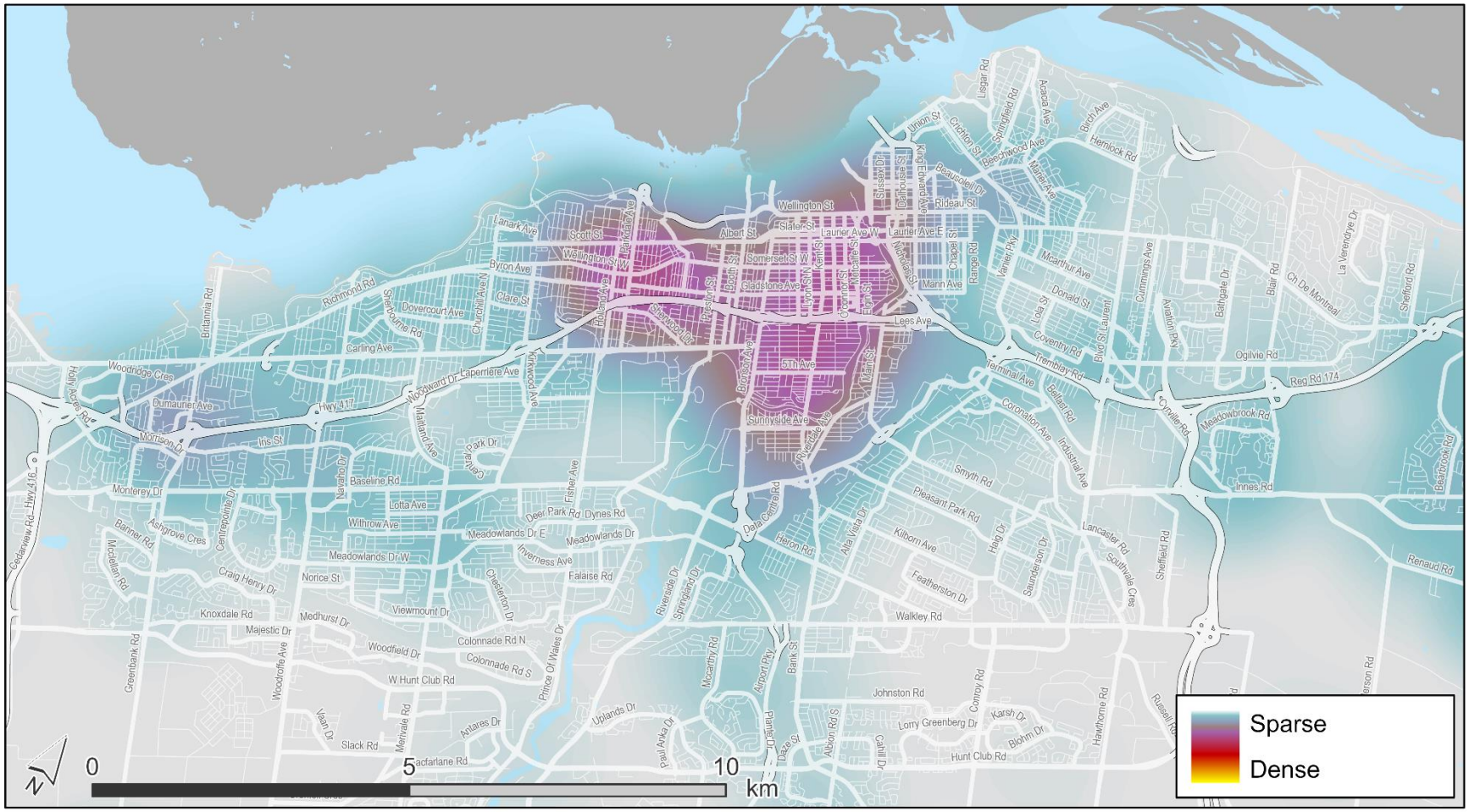


Exhibit C-5b: Concentration of Comment Pins in the East, tagged with "Improving safety, accessibility, and equity for all road users" Theme

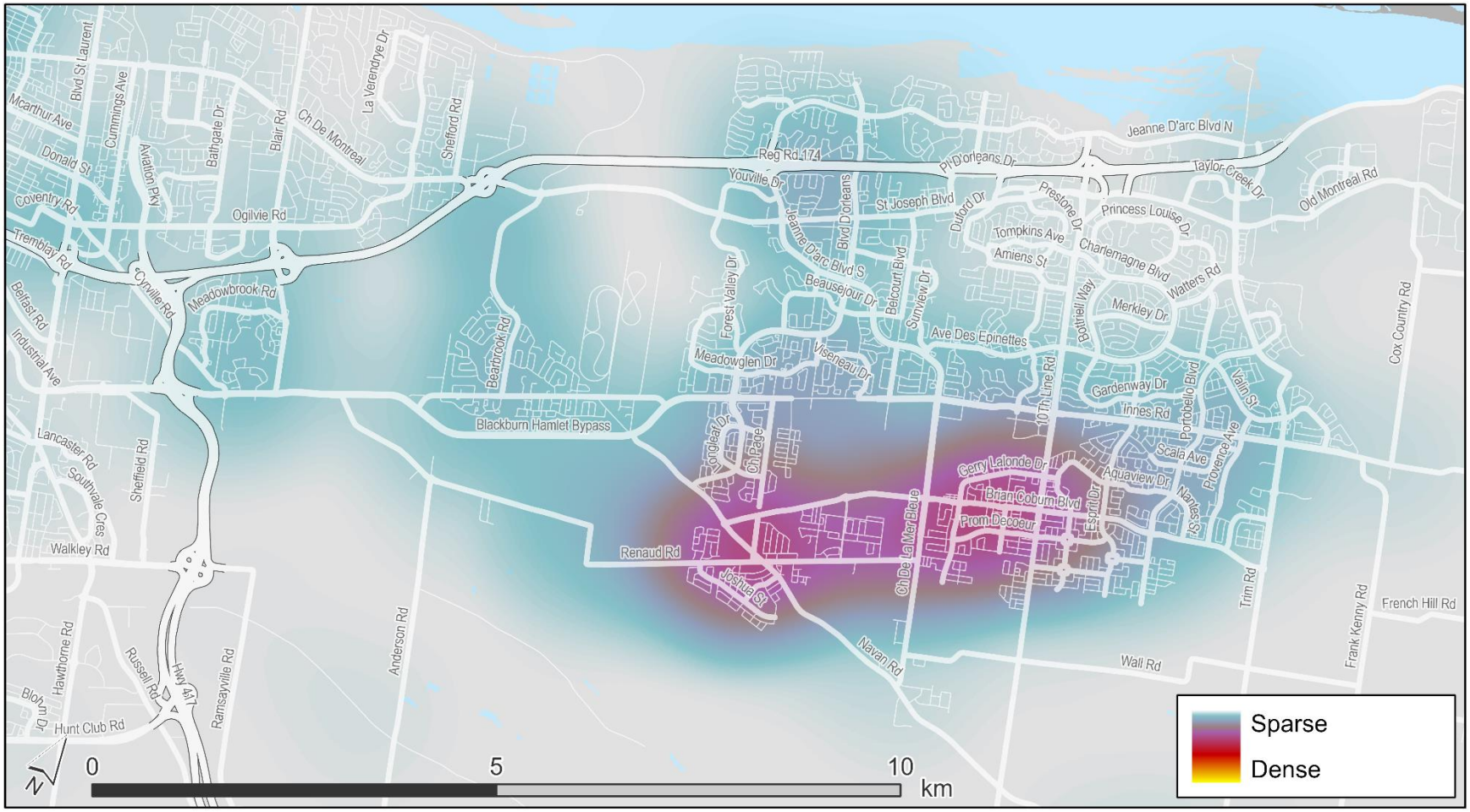


Exhibit C-5c: Concentration of Comment Pins in the South, tagged with "Improving safety, accessibility, and equity for all road users" Theme

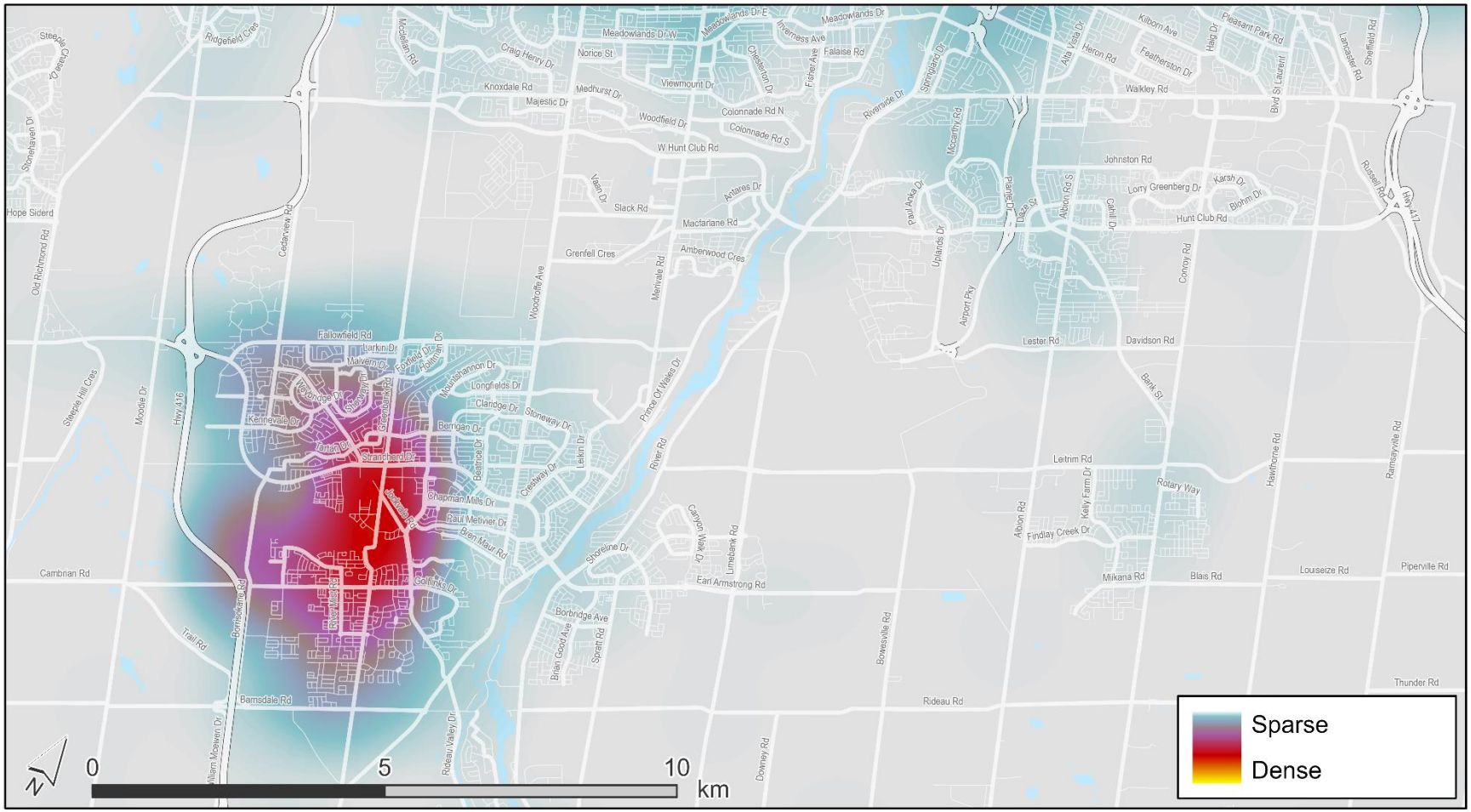


Exhibit C-5d: Concentration of Comment Pins in the West, tagged with "Improving safety, accessibility, and equity for all road users" Theme

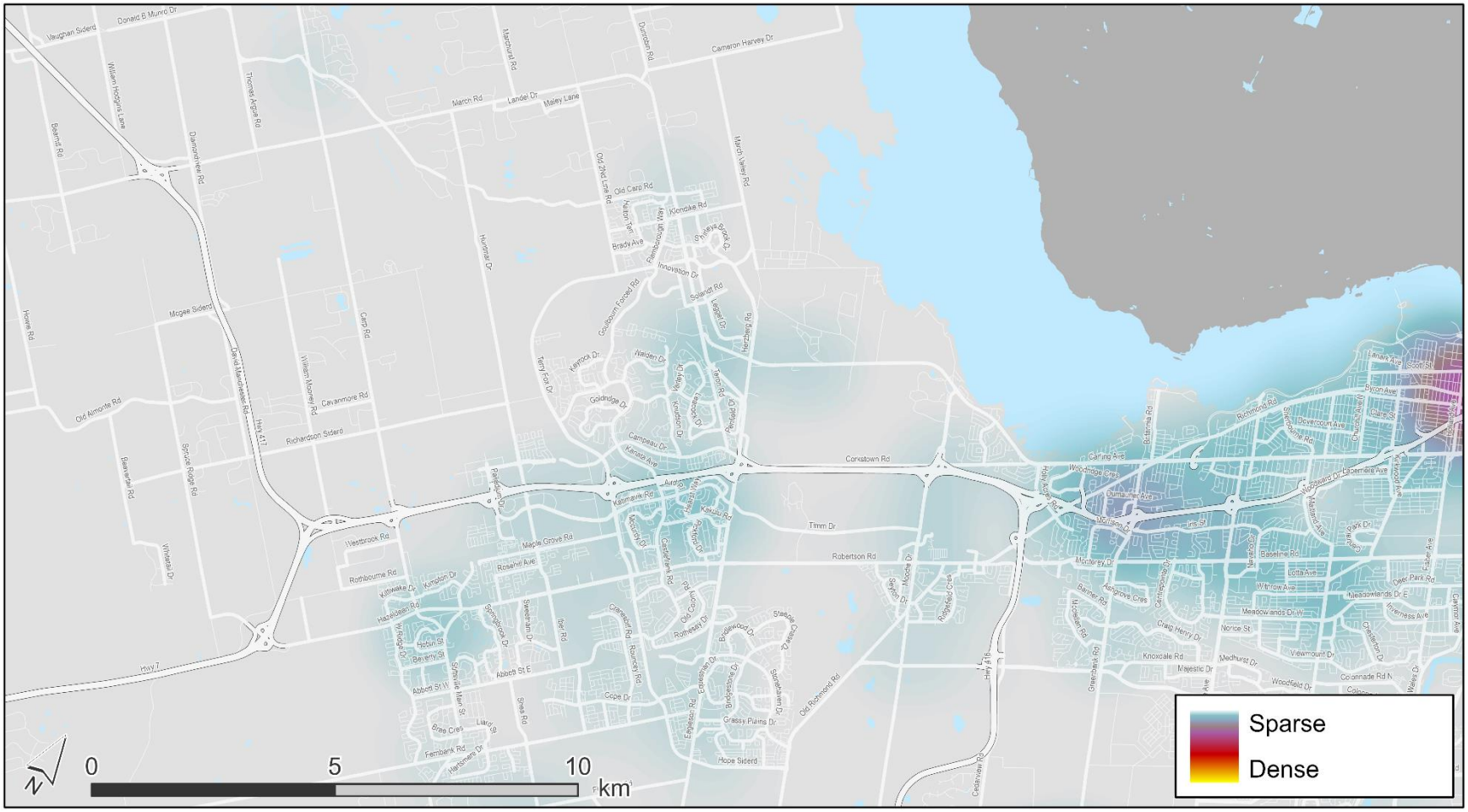


Exhibit C-6: Concentration of Comment Pins Tagged with "Providing multimodal streets and encouraging sustainable travel choices" Theme

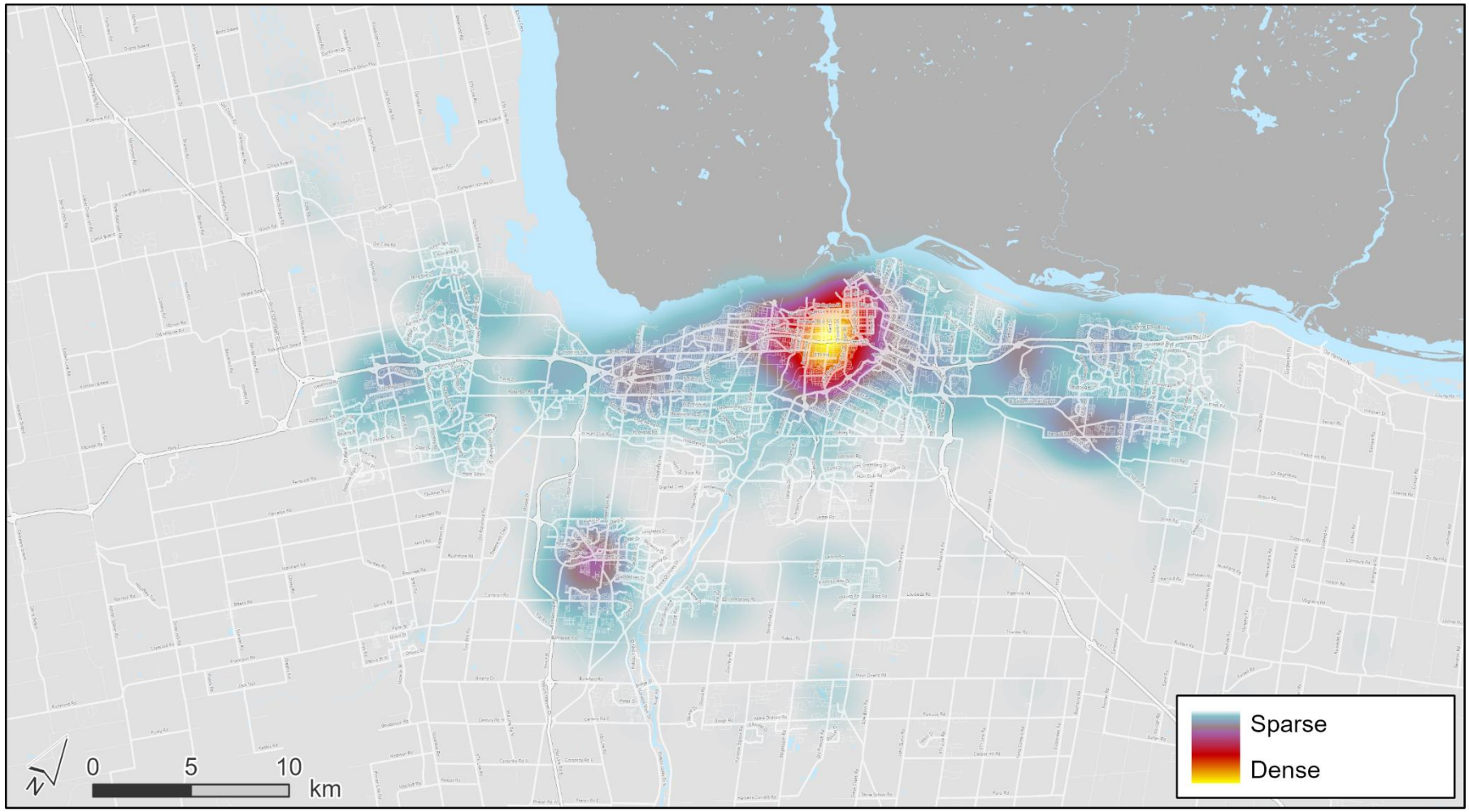


Exhibit C-6a: Concentration of Comment Pins inside the Greenbelt, tagged with "Providing multimodal streets and encouraging sustainable travel choices" Theme

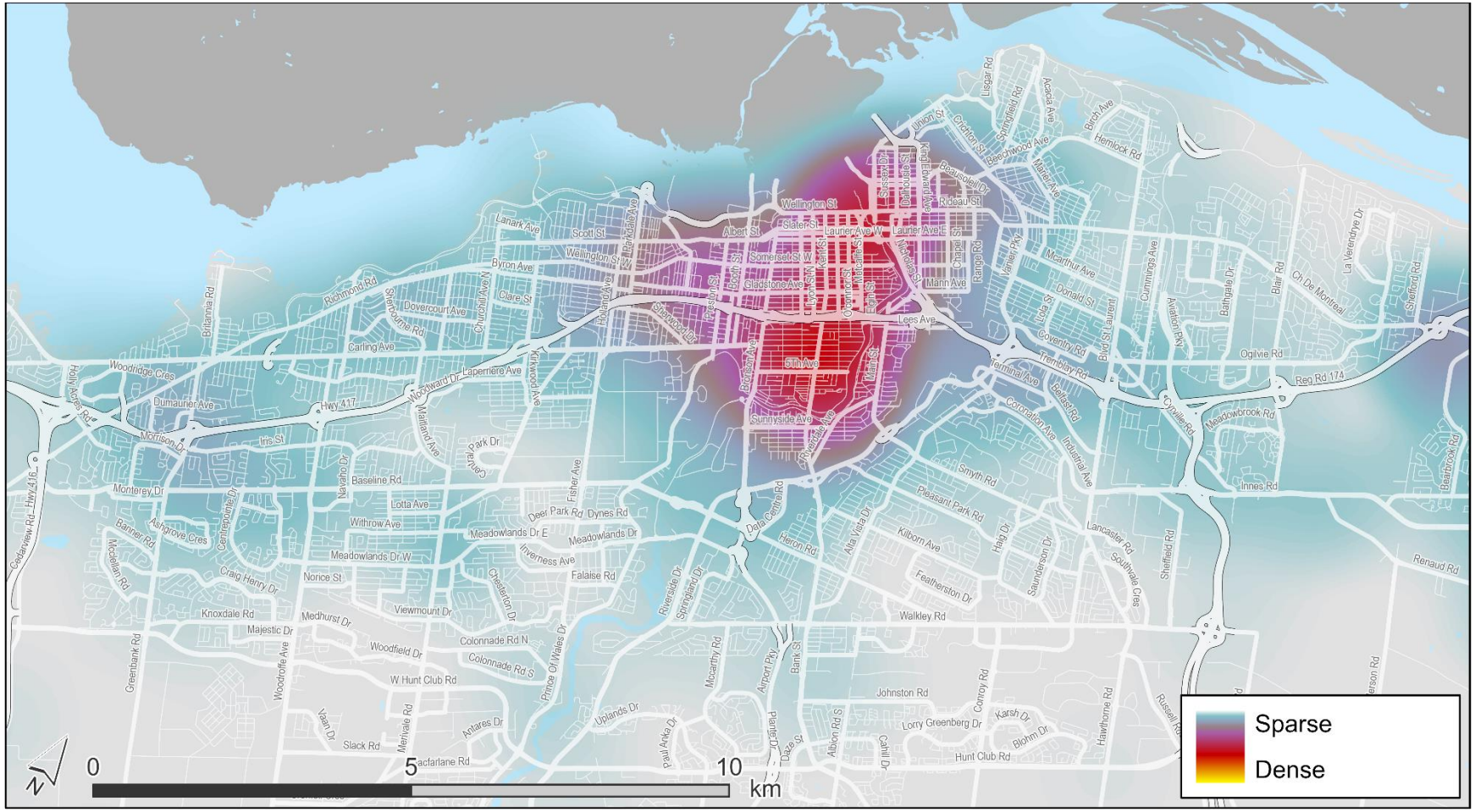


Exhibit C-6b: Concentration of Comment Pins in the East, tagged with "Providing multimodal streets and encouraging sustainable travel choices" Theme

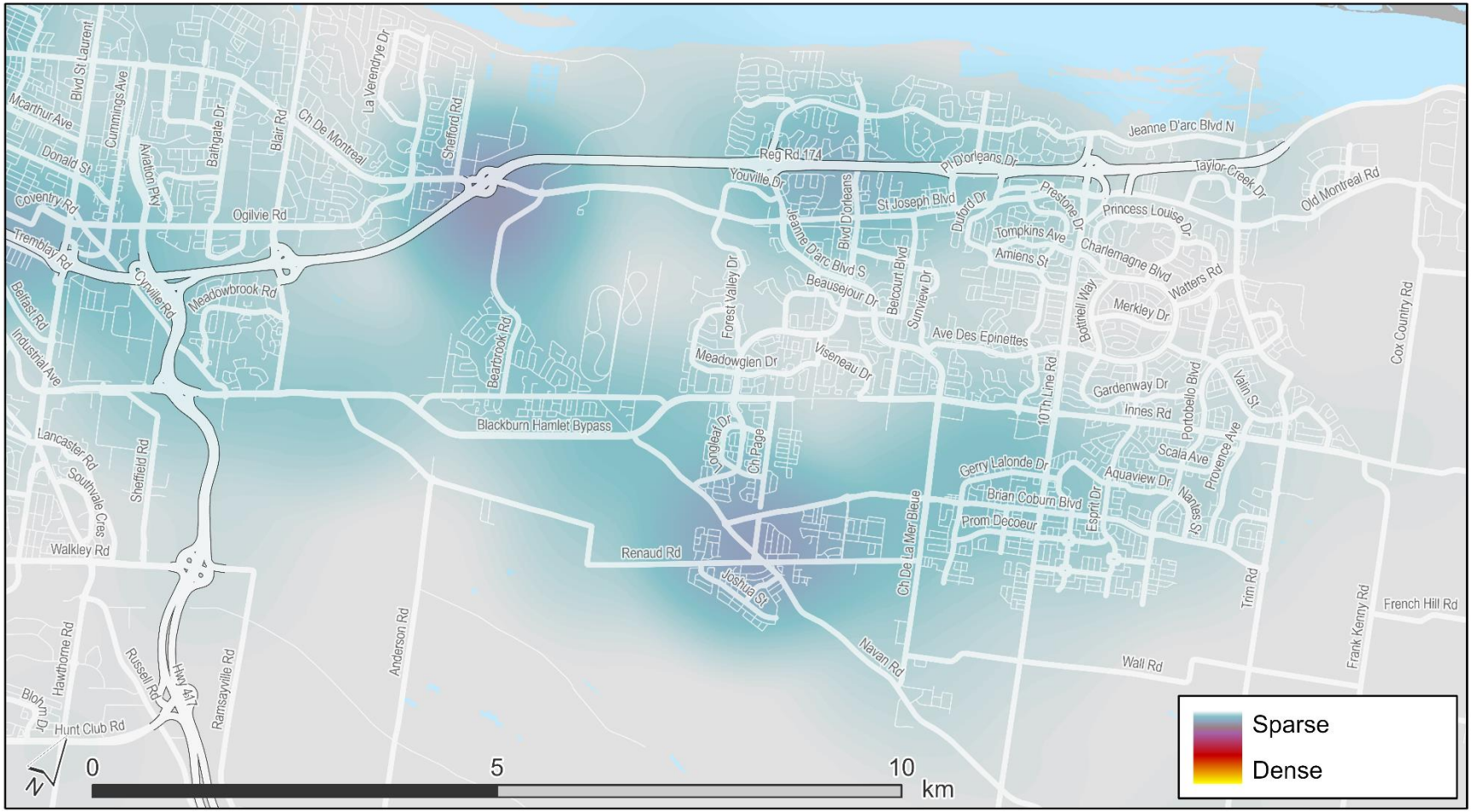


Exhibit C-6c: Concentration of Comment Pins in the South, tagged with "Providing multimodal streets and encouraging sustainable travel choices" Theme

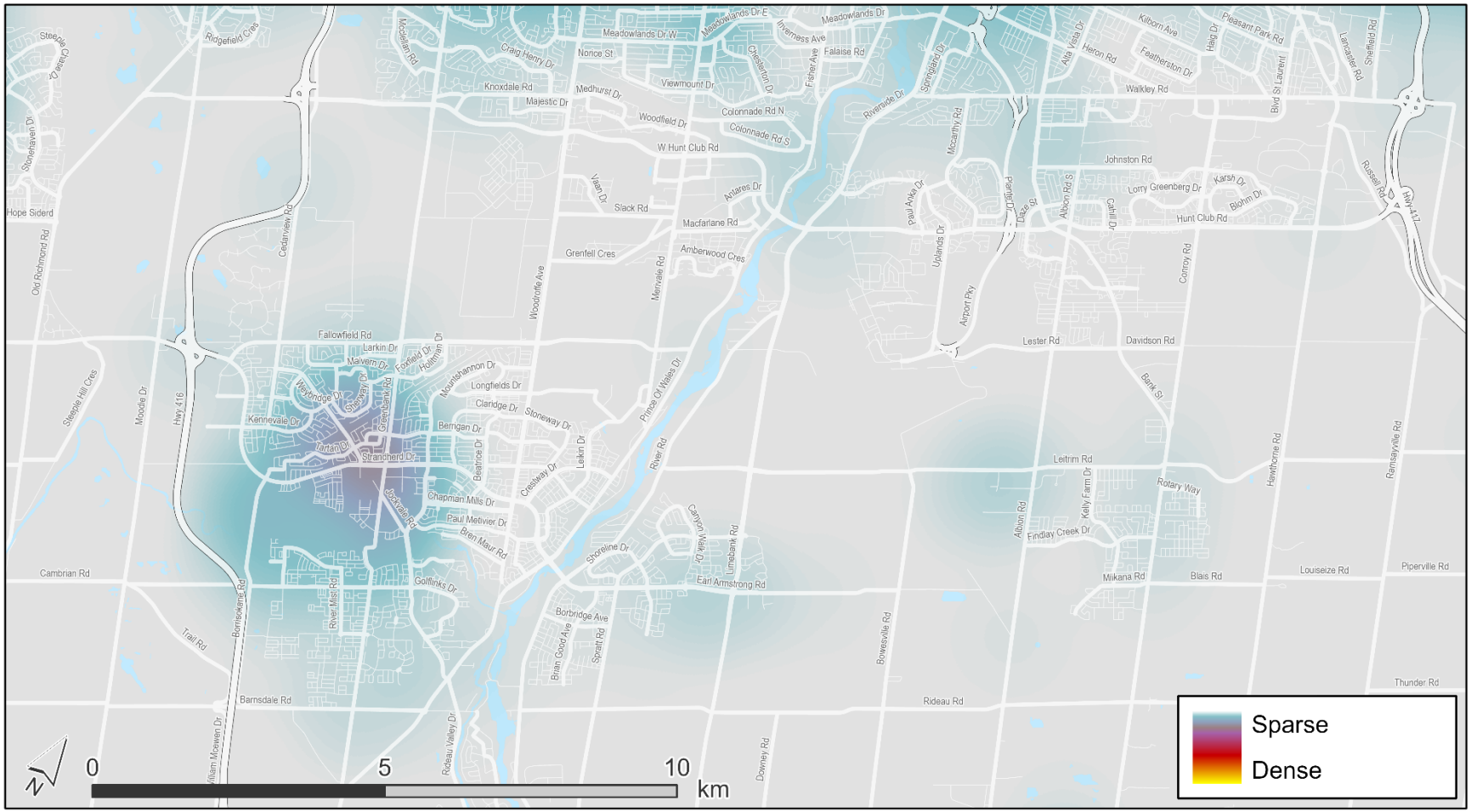


Exhibit C-6d: Concentration of Comment Pins in the West, tagged with "Providing multimodal streets and encouraging sustainable travel choices" Theme