# 4. SPEED REDUCTIONS IN THREE EXISTING 40 KM/HR GATEWAY ZONES

36

ONS DE LA LIMITE DE VITESSE DANS TROIS ZONES DE PASSAGE EXISTANTES DE 40 KM/H

## **COMMITTEE RECOMMENDATIONS**

That Council approve that the existing 40 km/h Gateway Speed Limit be lowered to 30 km/h within the areas bound by:

- 1. Donald Street to the south, North River Road to the west, McArthur Avenue to the north and Vanier Parkway to the east;
- 2. Donald Street to the south, Vanier Parkway to the west, McArthur Avenue to the north and Allen Boulevard to the east; and,
- 3. Donald Street to the south, Allen Boulevard to the west, McArthur Avenue to the north and Brant Street to the east.

## **RECOMMANDATIONS DU COMITÉ**

Que le Conseil approuve que la limite de vitesse passe de 40 km/h à 30 km/h dans les zones délimitées :

- 1. par la rue Donald au sud, le chemin North River à l'ouest, l'avenue McArthur au nord et la promenade Vanier à l'est;
- 2. par la rue Donald au sud, la promenade Vanier à l'ouest, l'avenue McArthur au nord et le boulevard Allen à l'est;
- 3. par la rue Donald au sud, le boulevard Allen à l'ouest, l'avenue McArthur au nord et la rue Brant à l'est.

TRANSPORTATION COMMITTEE REPORT 27 13 APRIL 2022

#### DOCUMENTATION / DOCUMENTATION

1. Committee Coordinator's Report, Council and Committee Services, Office of the City Clerk, dated 28 March 2022 (ACS2022-OCC-TRC-0006).

37

Rapport du Coordonnateur de comité, Services des comités et du conseil, Bureau du greffier municipal, daté le 28 mars 2022 (ACS2022-OCC-TRC-0006).

# Subject: Speed Reductions in Three Existing 40 Km/Hr Gateway Zones

38

### File Number: ACS2022-OCC-TRC-0006

**Report to Transportation Committee on 6 April 2022** 

### and Council 13 April 2022

Submitted on March 28, 2022 by Christopher Zwierzchowski, Committee Coordinator

Contact Person: Councillor M. Fleury, Rideau-Vanier Ward (12)

613-580-2482, Mathieu.Fleury@ottawa.ca

Ward: Rideau-Vanier (12), Rideau-Rockcliffe (13)

Objet : Réductions de la limite de vitesse dans trois zones de passage existantes de 40 km/h

Dossier : ACS2022-OCC-TRC-0006

Rapport au Comité des transports

le 6 avril 2022

et au Conseil le 13 avril 2022

Soumis le 28 mars 2022 par Christopher Zwierzchowski, Coordonnateur du comité

Personne ressource : Conseiller M. Fleury, Quartier Rideau-Vanier (12)

613-580-2482, Mathieu.Fleury@ottawa.ca

Quartier : Rideau-Vanier (12), Rideau-Rockcliffe (13)

#### **REPORT RECOMMENDATION(S)**

That Transportation Committee recommend Council approve that the existing 40 km/h Gateway Speed Limit be lowered to 30 km/h within the areas bound by:

39

- 1. Donald Street to the south, North River Road to the west, McArthur Avenue to the north and Vanier Parkway to the east;
- 2. Donald Street to the south, Vanier Parkway to the west, McArthur Avenue to the north and Allen Boulevard to the east; and,
- 3. Donald Street to the south, Allen Boulevard to the west, McArthur Avenue to the north and Brant Street to the east.

### **RECOMMANDATION(S) DU RAPPORT**

Que le Comité des transports recommande au Conseil d'approuver que la limite de vitesse passe de 40 km/h à 30 km/h dans les zones délimitées :

- 1. par la rue Donald au sud, le chemin North River à l'ouest, l'avenue McArthur au nord et la promenade Vanier à l'est;
- 2. par la rue Donald au sud, la promenade Vanier à l'ouest, l'avenue McArthur au nord et le boulevard Allen à l'est;
- 3. par la rue Donald au sud, le boulevard Allen à l'ouest, l'avenue McArthur au nord et la rue Brant à l'est.

## BACKGROUND

A priority of both the City of Ottawa and the office of Councillor Mathieu Fleury is to improve safety for street users, whether by foot, car or bicycle.

The city implemented the 3 Towards Zero program to eliminate traffic fatalities in the past. The City funded initiatives with its Traffic Services Department and Safer Roads Ottawa taking the lead. In August 2018, the city created gateway speed zones, providing staff and City Council with an efficient choice to lower speed limits within residential communities.

The motion adopted by the council allowed for the creation of speed zones of either 40 km/h or 30 km/h. Currently, there is only one Gateway Speed Zone in the Rideau-Vanier Ward. The residents of the Rideau-Vanier Ward have expressed a desire for lower speeds and safer streets. Residents in Lowertown, Sandy Hill and Vanier have sought safer, slower and calmer streets.

Each neighbourhood's community association takes transportation and safety seriously, with a committee dealing with these concerns. Reducing traffic speed is a goal of these committees. Traffic speed directly impacts the safety of our streets. Implementing gateway speed zones of 30 km/h—coupled with TTC measures and other traffic calming initiatives—aligns with and furthers the city's goal of increased safety for all road users.

On May 12th, 2021, through a Councillor's report at City Council, the Ward Councillor, Mathieu Fleury for Rideau-Vanier, brought forward a report to make all residential zones within his Ward to be signed 30km/h.

## DISCUSSION

In May 2021, the initiative to include all residential zones in Rideau-Vanier was not made possible due to a lack of data for a tiny area of the Ward at the boundary of Rideau-Rockcliffe. The councillor is bringing forward this last zone to complete and meet the previously established commitment to make Rideau-Vanier the first community in Ottawa with all residential streets signed at a 30km/h speed limit.

## 30km/h speed reduction efforts:

Street safety is a significant concern for Vanier, Lowertown, and Sandy Hill residents. Individual residents and the Vanier, Lowertown and Sandy Hill Community Associations have expressed a need for slower, safer streets. Evidence shows that lowering traffic speeds correlates positively with overall street safety and lower fatality rates. Specifically, reducing speeds towards 30 km/h can significantly reduce severe injuries and save lives. A study of 30km and 40km speed reduction zones saw a decrease of about 30% in traffic incidents. From:https://bmcpublichealth.biomedcentral.com/articles/10.1186/s12889-019-8139-5 The City of Calgary found that its drivers drove more carefully, with 85 per cent of driving at or below 32km/h in 30km/h zones. (Kattan, L., Tay, R., & Acharjee, S. (2011). Managing speed at school and playground zones. Accident Analysis & Prevention, 43(5), 1887-1891.) The Government of Nova Scotia 4 Making residential speeds safer benefits children and allows them to be healthier and be more active at school. (Garrard, J., Rissel, C., & Bauman, A. (2012). Health benefits of cycling. In Pucher J. & Buehler R. (Eds.), City Cycling (pp. 31-54). The MIT Press. McDonald, N.C. (2012). Children and cycling. In Pucher J. & Buehler R. (Eds.), City Cycling (pp. 235-256). The MIT Press. O'Brien, C., Ramanathan, S., Gilbert, R. & Orsini, A. (2009). Youth and Sustainable Transportation: A review of the literature. Retrieved from http://www.kidsonthemove.ca) San Francisco State University found that traffic calming and reduced traffic speeds benefit the local economy and make neighbourhoods more desirable places to live. (Drennen, E. (2003). Economic effects of traffic calming on urban small businesses. Department of Public Administration, San Francisco State University, San Francisco. Retrieved from

41

<u>http://www.sfbike.org/download/bikeplan/bikelanes.pdf</u>) The Michigan Department of Transportation found that lower speeds and traffic calming measures increased yielding for pedestrians to 85 per cent. From:

https://www.michigan.gov/documents/mdot/MDOT\_Research\_Report\_RC1585\_408249

<u>7.pdf</u> In one study, the Curtin-Monash Accident Research Centre found the risk of pedestrian death reduced exponentially as collision speeds dropped: "It is estimated that less than 10 per cent of pedestrians would die when struck by a vehicle travelling at 30 km/h, compared with fatality rates of 26 per cent at 40 km/h and over 80 per cent at 50 km/h." (Curtin-Monash Accident Research Centre, Improving Pedestrian Safety and The Impact of Lowered Speed Limits in Urban/Metropolitan Areas.) The European Transport Safety Council found that collisions at 32 km/h resulted in a 5 per cent pedestrian fatality rate. In contrast, collisions at 48 km/h resulted in a 45 per cent pedestrian fatality rate. (ETSC (1995) Reducing Traffic Injuries resulting from excess and inappropriate speed.) In 2004, the World Health Organization noted that studies suggest that for each decrease of 1 km/h in a car's speed, there is a 2 per cent to 3 per cent reduction in collisions. (WHO, World report on road traffic injury prevention). Switzerland saw a fewer accidents (15 per cent ) and a reduction in severity (27 per

cent ) in 30km/h zones. (Lindenmann, H. P. (2005). The effects on road safety of 30 kilometer-per-hour zone signposting in residential districts. Institute of Transportation Engineers. ITE Journal, 75(6), 50-54.) 5 In 32 km/h speed zones in London, UK, there was a significant reduction in road casualties (42 per cent, 48 per cent among those under 16 years old) compared to adjacent areas where the speed limits were not reduced. (Grundy, C., Steinbach, R., Edwards, P., Green, J., Armstrong, B., & Wilkinson, P. 2009. Effect of 20 mph traffic speed zones on road injuries in London, 1986-2006: controlled interrupted time series analysis. BMJ, 339). Lancashire County, UK, implemented 30 km/h speed limit zones in all residential areas and school zones. Initial indications were that deaths and injuries dropped (WHO. 2013. Pedestrian safety: a road safety manual for decisionmakers and practitioners. World Health Organization. from http://apps.who.int/iris/bitstream/10665/79753/1/9789241505352\_eng.pdf. Lowering speed limits is only part of the effort to reduce traffic speed. The city has recently added additional bicycle lanes to several streets, narrowing the roadway and deterring speeding. The Councillor's office remains dedicated to implementing further measures to reduce speeds, such as Temporary Traffic Calming (TTC).

The Councillor's office will continue to use the TTC budget to calm traffic.

# FINANCIAL IMPLICATIONS

This report has no budget implications. Costs for the pavement markings will be funded through TTC budgets over the next few years and signage costs will be absorbed within the 2022 approved Traffic Services operating budget.

# LEGAL IMPLICATIONS

There are no legal impediments to implementing the recommendations as outlined in this report.

# COMMENTS BY THE WARD COUNCILLOR(S)

## Councillor M. Fleury - Rideau-Vanier (12)

Rideau-Vanier was the first community to move towards a 30 km maximum for all residential streets. As many are aware, the Southern boundary of the Rideau-Vanier Ward is not along a Main Street for Vanier. Thankfully, the Vanier and Overbrook

communities work closely together to support each other. Often both communities, although unique, share each other's attributes and boundary confusion.

To advance this 30km Gateway zone for all residential streets in Rideau-Vanier, Councillor Fleury worked closely with neighbour Rideau-Rockcliffe ward Councillor King.

Implementing this zone ensures the 30km residential zones are complete and there is consistency for the City and the communities who live on these residential streets.

This report completes 30km zones with all residential streets in Ridea- Vanier and corrects the missing segment, implementing a compliance environment for Rideau-Vanier and Rideau Rockcliffe communities.

## Councillor R. King - Rideau-Rockcliffe (13)

To increase safer transportation, after listening to resident and community association concerns immediately after my election in April 2019, I began to reduce speed limits with the introduction of residential gateway zones across the Ward. The first zones were introduced in Lindenlea, New Edinburgh and Overbrook in Autumn 2020 to bring down maximum speeds to 40 km/h. This process will continue with a goal to reduce speed limits to 40 km/h as permitted by the residential gateway policy on all applicable residential streets in the Ward by the end of the 2018-2022 Council Term, with an aim to reduce speeds to 30 km/h where permissible by City-wide standards. Newer roads in Wateridge Village have been constructed to 30 km/h standards and the revised Rockcliffe Park Secondary Plan once approved would automatically set speed limits in that neighbourhood to 30 km/h. Working in conjunction with Councillor Mathieu Fleury (Rideau-Vanier, Ward 12), 30 km/h residential gateway zones will also be introduced at the intersection of Ward 12 and 13 in Castle Heights as noted in this Councillor's Report. This is a first step in terms of my office working towards the ultimate conversion of all residential gateway zones to 30 km/h zones throughout Ward 13, once the initial gateway zones have been established.

# ADVISORY COMMITTEE(S) COMMENTS

No Advisory Committees were consulted in the preparation of this report.

### CONSULTATION

### **Public Works Comment:**

Road safety engineering best practices support that it is important to maintain consistent, uniform speed limits on any roadway to provide all users including pedestrians, cyclists, adjacent residents and motorists with a correct representation of the actual speed of traffic on that roadway. The provision of speed limits considers the roadway function and its design. Implementing a speed limit that does not align with these considerations may result in enforcement difficulties and increases in traffic hazard. Lowering the speed limits on City streets without consideration of the physical configuration of the road will have minimal impact on driver behaviour. In such cases where a posted speed limit is below operating speeds, most motorists will continue to drive at speeds they feel are reasonable and prudent unless continual police enforcement is present. The visual and physical cues a driver uses to determine the appropriate travel speed should be consistent with the posted speed limit.

The Public Works Department has two different approaches to consider when lowering a speed limit to less than 50 km/h in Ottawa:

- Existing Policies: When operating speeds are not at 40 km/h or 30 km/h, both the Council-approved Speed Zoning Policy and the <u>30 km/h Speed Limit Policy</u>, provide the criteria which must be met in order for staff to have the authority to implement a speed limit change on a specific roadway; and,
- 2. <u>Council-Approved Gateway Signage By-law</u>: On August 29, 2018, City Council approved <u>the Gateway Speed Limit Signage in Residential Areas Report (2018-TSD-PLN-0008)</u>, and the revised Gateway Speed Limit Signage By-law. By-Law No. 2018- 288 provides the General Manager of Transportation Services the delegated authority to designate certain residential areas with speed limits lower than 50 km/h through the use of 40 km/h or 30 km/h Gateway Signage consistent with both the Speed Zoning and the 30 km/h Speed Limit Policies. When this by-law is applied, the petition requirements identified in the City's Speed Zoning Policy and the 30 km/h Speed Limit Policy are waived for those areas that will be signed using Gateway Speed Limit Signage. This is due to the onerous

44

implications required to undertake a petition process for a large area consisting of multiple residential roadways.

As per the Council-approved eligibility criteria, 30 km/h Gateway Speed Limit Signage can only be used to establish the speed limit in neighborhoods with roadways meeting either of the following criteria:

- operating speed (defined as the 85th Percentile Speed) equal to or less than 35 km/h; or,
- meet Roadway and Traffic Environment criteria, the Active Transportation Environment criteria and Roadway Width as defined in the 30 km/h Speed Limit Policy.

The three areas in which Councillor Fleury and Councillor King are seeking to reduce the speed limits to 30 km/h are areas currently established as 40 km/h Gateway Zones. Traffic Services staff completed a site investigation of the three areas which have been put forward for 30 km/h Gateway Speed Limit speeds; each consist of residential roadways. Staff reviewed the existing speed data on file and also collected additional speed data in order to complete a review of the multiple roadways to assess the areas' eligibility for a reduced speed limit. The additional data was collected during winter conditions and staff expect that speeds along these roadways would be higher during non-winter conditions.

Speed data within the boundaries for the proposed new 30 Km/h Gateway Speed Limit areas are identified in Document 1 – Speed Survey Results. As per the available speed data, the majority of the roadways for which speed data was available have an operating speed greater than 35 km/h. Additionally, upon further review, many of the roadways do not meet the required Roadway and Traffic Environment criteria, the Active Transportation Environment criteria and Roadway Width criteria required for the implementation of 30 km/h Gateway Speed Limit Signage.

In order to meet the policy criteria, given that most operating speeds are greater than 35 km/h, affected roadways would need pavement marking modifications to narrow local residential entrance widths to 7 meters. To modify entrance widths at all intersections within the three areas, it would cost approximately \$10,075.00 in pavement marking

applications. The cost to apply the initial pavement markings, as required, would be funded through Councillor Fleury and Councillor King's Ward Temporary Traffic Calming (TTC) budgets over the next few years.

Posting a 30 km/h speed limit on a roadway where the operating speed is much greater, may increase the crash risk. Some drivers will choose to comply with the 30 km/h speed limit while others will continue to drive the higher speed at which they feel comfortable travelling. The varying difference in operating speeds between individual vehicles may increase the risk of collision as the potential for interactions or conflicts between vehicles is greater.

The Public Works Department does not expect the community's operating speed to be significantly reduced because of the implementation of 30 km/h speed limit gateway signage unless considerable police enforcement occurs on an on-going basis.

Upon Council approval of the report, the Public Works Department will endeavor to replace the existing 40 km/h gateway signage with 30 km/h gateway signage in all three zones as soon as practicable in 2022. The estimated cost for the replacement of the signs is \$2,700.00 for labour and materials and costs will be paid out of the maintenance account.

The replacement of the gateway signage in these areas can be completed prior to the installation of pavement markings, however Traffic Services would recommend that the painted road narrowings be implemented in 2022 at locations where the 30 km/h gateway signs are placed. The narrowings are recommended to provide further guidance to motorists that they are entering a 30 km/h zone, which may lead to improved adherence to the 30 km/h speed limit.

# ACCESSIBILITY IMPACTS

No specific Accessibility Impacts have been identified in the preparation of this report. Staff will be available at the meeting to respond to questions, as may be required.

# ASSET MANAGEMENT IMPLICATIONS

No specific Asset Management Implications have been identified in the preparation of this report. Staff will be available at the meeting to respond to questions, as may be

required.

### **RISK MANAGEMENT IMPLICATIONS**

No specific Risk Management Implications have been identified in the preparation of this report. Staff will be available at the meeting to respond to questions, as may be required.

47

### **RURAL IMPLICATIONS**

No specific Rural Implications have been identified in the preparation of this report. Staff will be available at the meeting to respond to questions, as may be required.

## **TERM OF COUNCIL PRIORITIES**

No specific Term of Council Priorities have been identified in the preparation of this report. Staff will be available at the meeting to respond to questions, as may be required.

## SUPPORTING DOCUMENTATION

Document 1: Speed Survey Results.

## DISPOSITION

The Public Works Department will take appropriate action based on the recommendations made by the Committee and Council.