

**Agenda – Standing Policy Committee on Infrastructure Renewal and Public Works –
March 11, 2021**

REPORTS

**Item No. 21 Traffic Study – East Mint Plaza and Lagimodiere Boulevard
(Transcona Ward)**

WINNIPEG PUBLIC SERVICE RECOMMENDATION:

That this report be received as information.

**Agenda – Standing Policy Committee on Infrastructure Renewal and Public Works –
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DECISION MAKING HISTORY:

STANDING COMMITTEE RECOMMENDATION:

On February 11, 2021, the Standing Policy Committee on Infrastructure Renewal and Public Works granted a further extension of time of 30 days for the Winnipeg Public Service to report back on the matter.

On September 16, 2020, the Standing Policy Committee on Infrastructure Renewal and Public Works granted a further extension of time to its February, 2021 meeting for the Winnipeg Public Service to report back on the matter.

On March 3, 2020, the Standing Policy Committee on Infrastructure Renewal and Public Works granted an extension of time to its September 10, 2020 meeting for the Winnipeg Public Service to report back on the matter.

The following persons submitted communications in support of the matter:

- Luis Jimenez submitted a communication dated March 1, 2020
- Angie Janz submitted a communication dated March 2, 2020
- Michelle Friesen submitted a communication dated March 2, 2020

On September 12, 2019, the Standing Policy Committee on Infrastructure Renewal and Public Works concurred in the recommendation of the East Kildonan-Transcona Community Committee and directed the Winnipeg Public Service to report back to the Standing Committee within 180 days.

COMMUNITY COMMITTEE RECOMMENDATION:

On June 18, 2019, the East Kildonan-Transcona Community Committee passed the following motion:

BE IT RESOLVED that the East Kildonan-Transcona Community Committee recommends to the Standing Policy Committee on Infrastructure Renewal and Public Works that the Winnipeg Public Service be requested to conduct a traffic study at the intersection of East Mint Plaza and Lagimodiere Boulevard after school is back in session to account for the full extent of traffic in September 2019.

ADMINISTRATIVE REPORT

Title: Traffic Study – East Mint Place and Lagimodiere Boulevard

Critical Path: Standing Policy Committee on Infrastructure Renewal and Public Works

AUTHORIZATION

Author	Department Head	CFO	CAO
D. Patman, P. Eng.	J. Berezowsky	N/A	M. Ruta, Interim CAO

EXECUTIVE SUMMARY

A traffic study was conducted at the intersection of East Mint Place and Lagimodiere Boulevard to identify potential intersection improvements. The following actions were taken:

- This intersection was forwarded to the Photo Enforcement Unit of the Winnipeg Police Service for future consideration of an intersection safety camera.
- In October 2020 the traffic signal timing plan was modified so that the eastbound and westbound phases are on “automatic recall” during the entire AM peak period. This means that the intersection is continuously cycling through phases regardless of if there is a vehicle detected at the eastbound or westbound stop bar. This provides regular gaps in traffic for vehicles exiting East Mint Place to find an acceptable gap in traffic on Lagimodiere Boulevard.
- Following completion of the construction at the Lagimodiere Boulevard/Fermor Avenue intersection in 2020, Traffic Signals Branch completed an extensive review of signal timing at both the Lagimodiere Boulevard/Fermor Avenue and Lagimodiere Boulevard/East Mint Place intersections and optimized the signal timing.

A previously submitted report, *Northbound Turning Lane – East Mint Place along Lagimodiere Boulevard toward Highway No. 1*, evaluated the feasibility of installing a northbound turning lane from East Mint Place to northbound Lagimodiere Boulevard. The report recommended that the northbound acceleration lane not be constructed and the Standing Policy Committee on Infrastructure Renewal and Public Works concurred in this recommendation at their April 2, 2019 meeting. This recent recommendation was not re-evaluated as part of this report.

RECOMMENDATIONS

That this report be received as information.

REASON FOR THE REPORT

On September 12, 2019, the Standing Policy Committee on Infrastructure Renewal and Public Works concurred in the recommendation of the East Kildonan-Transcona Community Committee and directed the Winnipeg Public Service to conduct a traffic study at the intersection of East Mint Plaza and Lagimodiere Boulevard after school is back in session to account for the full extent of traffic in September 2019, and report back to the Standing Committee within 180 days.

Subsequent extensions to this timeline have since been granted.

IMPLICATIONS OF THE RECOMMENDATIONS

As this report is for information purposes only, there are no implications.

HISTORY/DISCUSSION**BACKGROUND INFORMATION**

On April 2, 2019, the Standing Policy Committee on Infrastructure Renewal and Public Works (SPC IRPW) concurred in the recommendation of the Winnipeg Public Service and received the report *Northbound Turning Lane – East Mint Place along Lagimodiere Boulevard toward Highway No. 1* as information. As part of that report, a traffic study and field observation were conducted and it was recommended that an acceleration lane from the Southland Park community at East Mint Place onto northbound Lagimodiere Boulevard not be implemented at the time.

On September 12, 2019, the SPC IRPW directed the Winnipeg Public Service to conduct a traffic study at the intersection of East Mint Place and Lagimodiere Boulevard. No specific issues for evaluation were identified as part of the SPC IRPW's direction.

On September 16, 2020, the SPC IRPW received submissions in support of the traffic study at the intersection of East Mint Place and Lagimodiere Boulevard which specifically requested the following be evaluated at the intersection:

- Construction of an acceleration merge lane for motorists exiting East Mint Place onto northbound Lagimodiere Boulevard.
- Installation of red-light cameras (intersection safety cameras) at the intersection to reduce red-light-running at the intersection and motorists from stopping within the intersection.
- Installation of traffic sensors at the westbound right yield sign to trigger a red-light phase at the signalized intersection and produce a gap in traffic on Lagimodiere Boulevard.

TRAFFIC CHARACTERISTICS

The intersection of Lagimodiere Boulevard and East Mint Place is a four-legged signalized intersection. The west leg of the intersection provides access to the Royal Canadian Mint. The east leg of the intersection is East Mint Place which provides primary access to the Southland Park neighbourhood. There are deceleration lanes for vehicles exiting Lagimodiere Boulevard. There are channelized right turns but no acceleration lanes for vehicles entering Lagimodiere Boulevard. The intersection is illustrated in Figure 1.

Lagimodiere Boulevard in the vicinity of East Mint Place is a four-lane divided roadway, a regional street, and a full-time truck route. The most recent Average Weekday Daily Traffic estimate is 46,600 (2018 Traffic Flow Map). The posted speed limit is 80 km/h. East Mint Place is a non-regional collector street. It has a default speed limit of 50 km/h.

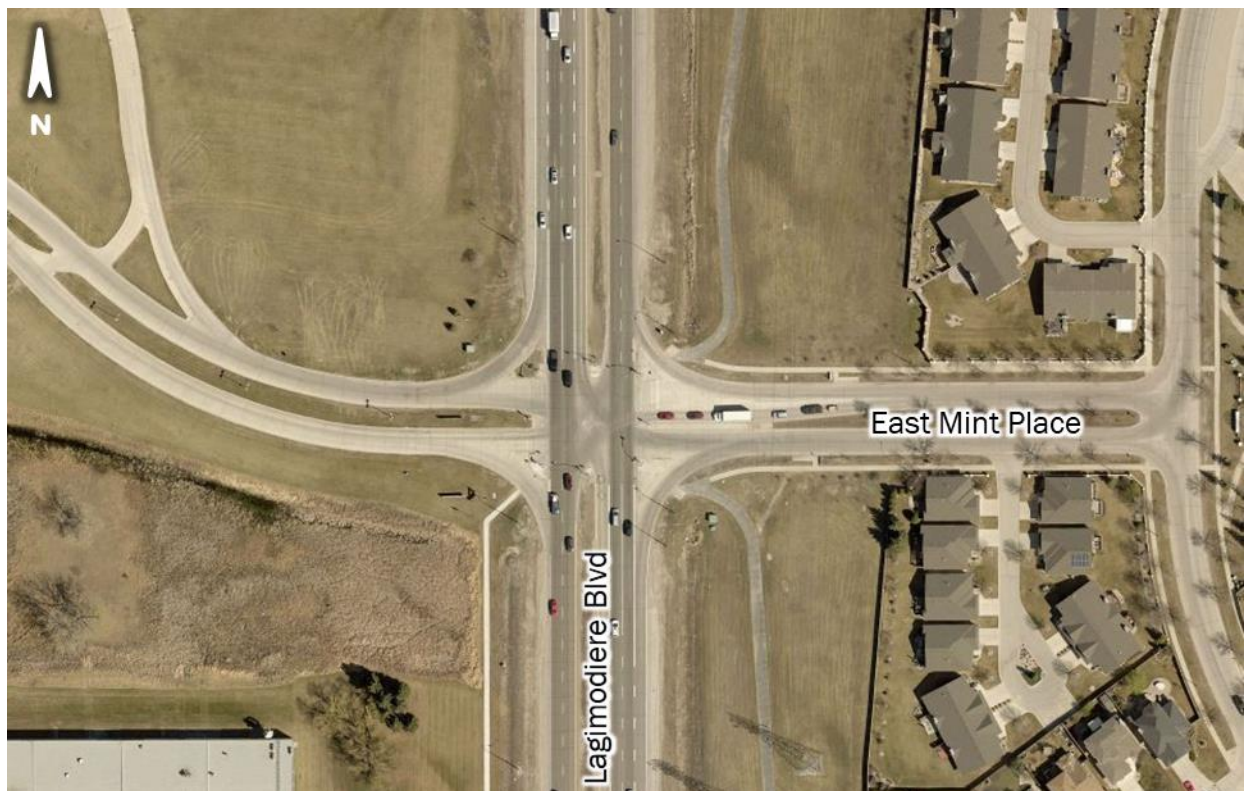


Figure 1: Lagimodiere Boulevard and East Mint Place
(image source: City of Winnipeg iView)

ACCELERATION /MERGE LANE – EAST MINT PLACE TO LAGIMODIERE BOULEVARD

A previously submitted report, [Northbound Turning Lane – East Mint Place along Lagimodiere Boulevard toward Highway No. 1](#), evaluated the feasibility of installing a northbound turning lane from East mint Place to northbound Lagimodiere Boulevard. A Preliminary Design drawing and project cost estimate was completed. The report identified that acceleration lanes work poorly when the through traffic is closely queued together accelerating away from a signal or when through traffic is slowing for a signal ahead, which reduces the size of acceptable gaps; both of these conditions occur at Lagimodiere Boulevard and East Mint Place. The report recommended that the northbound acceleration lane not be constructed and the SPC IRPW

concluded in this recommendation at their April 2, 2019 meeting. This recent recommendation was not re-evaluated as part of this report.

The Transportation Master Plan (TMP) will identify plans and priorities of the future transportation network. Lagimodiere Boulevard in its entirety has been identified as a potential corridor study. Prioritization of the major corridor studies, such as this, will result from the TMP.

INTERSECTION SAFETY CAMERAS

A submission letter in support of the traffic study identified that there are concerns with the number of motorists on Lagimodiere Boulevard red-light-running and also motorists stopping within the intersection at East Mint Place when there is a queue extending back from the Fermor Avenue intersection.

This intersection was forwarded to the Photo Enforcement Unit of the Winnipeg Police Service for future consideration of an intersection safety camera.

Following the completion of the construction at the Lagimodiere Boulevard/Fermor Avenue intersection in 2020, Traffic Signals Branch completed an extensive review of signal timing at both the Lagimodiere Boulevard/Fermor Avenue and Lagimodiere Boulevard/East Mint Place intersections. New dual left-turn lanes were constructed for the eastbound and westbound directions at the Lagimodiere Boulevard/Fermor Avenue intersection which will increase the capacity of the intersection. The new construction and the new optimized signal timings will result in improved traffic flow and less frequency of northbound traffic on Lagimodiere Boulevard queuing back to the Lagimodiere Boulevard/East Mint Place intersection. The Traffic Signals Branch has a corridor review scheduled for Lagimodiere Boulevard in 2021 to analyze various scenarios and determine the optimal signal timing plan for the entire corridor.

GAPS FOR WESTBOUND RIGHT-TURNING MOTORISTS ONTO NORTHBOUND LAGIMODIERE BOULEVARD

A submission letter in support of the traffic study identified a concern with the heavy traffic volume on northbound Lagimodiere Boulevard and the availability of safe gaps in traffic for westbound right-turning motorists from East Mint Place. A vehicle sensor was requested at the westbound right yield location to trigger the traffic light to turn red for northbound Lagimodiere Boulevard traffic and therefore create gaps in northbound traffic.

Figure 2, below, shows the AM and PM peak hour turning movement volumes (November 2018 count). The highest northbound volumes and the highest westbound right-turning volumes both occur during the AM peak hour.

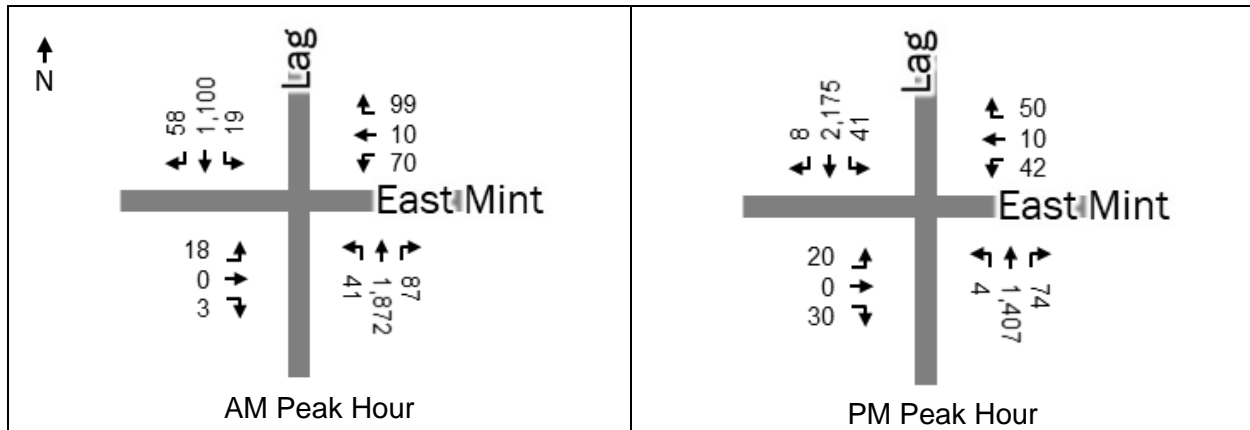


Figure 2: Peak Hour Turning Movement Volumes

Historically, the timing plan at the intersection has been “actuated” so that a green signal indication is always provided on Lagimodiere Boulevard unless a vehicle is detected at the stop bar of the eastbound, westbound, or southbound left approaches which would then trigger (or “actuate”) the signal phase change.

In October 2020 the traffic signal timing plan was modified so that the eastbound and westbound phases are on “automatic recall” during the entire AM peak period. This means that the intersection is continuously cycling through phases regardless of if there is a vehicle detected at the eastbound or westbound stop bar. Although this results in increased delay for Lagimodiere Boulevard traffic it provides regular gaps in traffic for westbound right-turning vehicles. This is most beneficial during the AM peak period when there are the fewest gaps in northbound traffic and the westbound right-turning volumes are the highest.

During the off-peak hours and the PM peak period the intersection still operates on “actuated” phasing with Lagimodiere Boulevard having a green signal indication unless a vehicle is detected at the stop bar of the eastbound, westbound, or southbound left approaches. During these time periods, there are vehicles detected that result in a red-light for northbound Lagimodiere Boulevard traffic approximately 75% of each signal phase cycle. Due to the lower vehicle volumes on northbound Lagimodiere Boulevard, and lower vehicle volumes completing the westbound right-turns during these periods, there are sufficient gaps provided. This will continue to be monitored and the signal phasing altered in the future if necessary.

FINANCIAL IMPACT

Financial Impact Statement Date: [February 4, 2021](#)

Project Name:**Traffic Study – East Mint Place and Lagimodiere Boulevard****COMMENTS:**

There is no financial impact associated with the recommendation of this report.

"Original signed by J. Peters, CPA, CGA"
J. Peters CPA, CGA

CONSULTATION

This Report has been prepared in consultation with: N/A

OURWINNIPEG POLICY ALIGNMENT

The Sustainable Transportation Direction Strategy developed as part of OurWinnipeg forms the policy framework for the Transportation Master Plan (TMP). Sustainable Transportation identified a vision and five Key Strategic Goals which are critical to achieving a balanced and sustainable transportation system for Winnipeg. These goals form the basis for the TMP and the directions and strategies contained within it:

- 1.A transportation system that is dynamically integrated with land use;
- 2.A transportation system that supports active, accessible and healthy lifestyle options;
3. A safe, efficient and equitable transportation system for people, goods and services;
- 4.Transportation infrastructure that is well maintained
- 5.A transportation system that is financially sustainable

The recommendations within this report are consistent with the Key Strategic Goals.

WINNIPEG CLIMATE ACTION PLAN ALIGNMENT

There is a linkage between making Winnipeg’s transportation network safer and more efficient with Key Direction 3.5 “Reduce Traffic Congestion”.

SUBMITTED BY

Department: Public Works Department
Division: Transportation Division
Prepared by: Keenan Patmore, M.Sc., P.Eng., Regional Traffic Engineer
Date: February 4, 2021