Simpson Road Landowners Group Inc.

TRANSPORTATION IMPACT STUDY

Proposed Industrial Development
Coleraine Drive and Mayfield Road,
Town of Caledon

November 2023
24085

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November 7, 2023

Reference Number: 24085

Simpson Road Landowners Group Inc.
c/o Helen Mihailidi
7501 Keele Street, Suite 200
Vaughan, ON
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Dear Helen Mihailidi,

RE: Transportation Impact Study
Proposed Industrial Development
Coleraine Drive and Mayfield Road, Town of Caledon

LEA Consulting Ltd. (LEA) is pleased to present the findings of our Transportation Impact Study for the proposed development of an industrial block located at the northeast corner of Coleraine Drive and Mayfield Road in the Town of Caledon. This report concludes that the proposed development is expected to have an acceptable impact on the road network operations in the surrounding area.

Should you have any questions regarding this Transportation Impact Study, please do not hesitate to contact the undersigned.

Yours truly,

LEA CONSULTING LTD.

Zara Georgis, M. Eng., P. Eng.
Project Manager, Transportation Planning and Engineering

Encl. Transportation Impact Study – Coleraine Drive and Mayfield Road, Proposed Industrial Development, Town of Caledon (November 2023)

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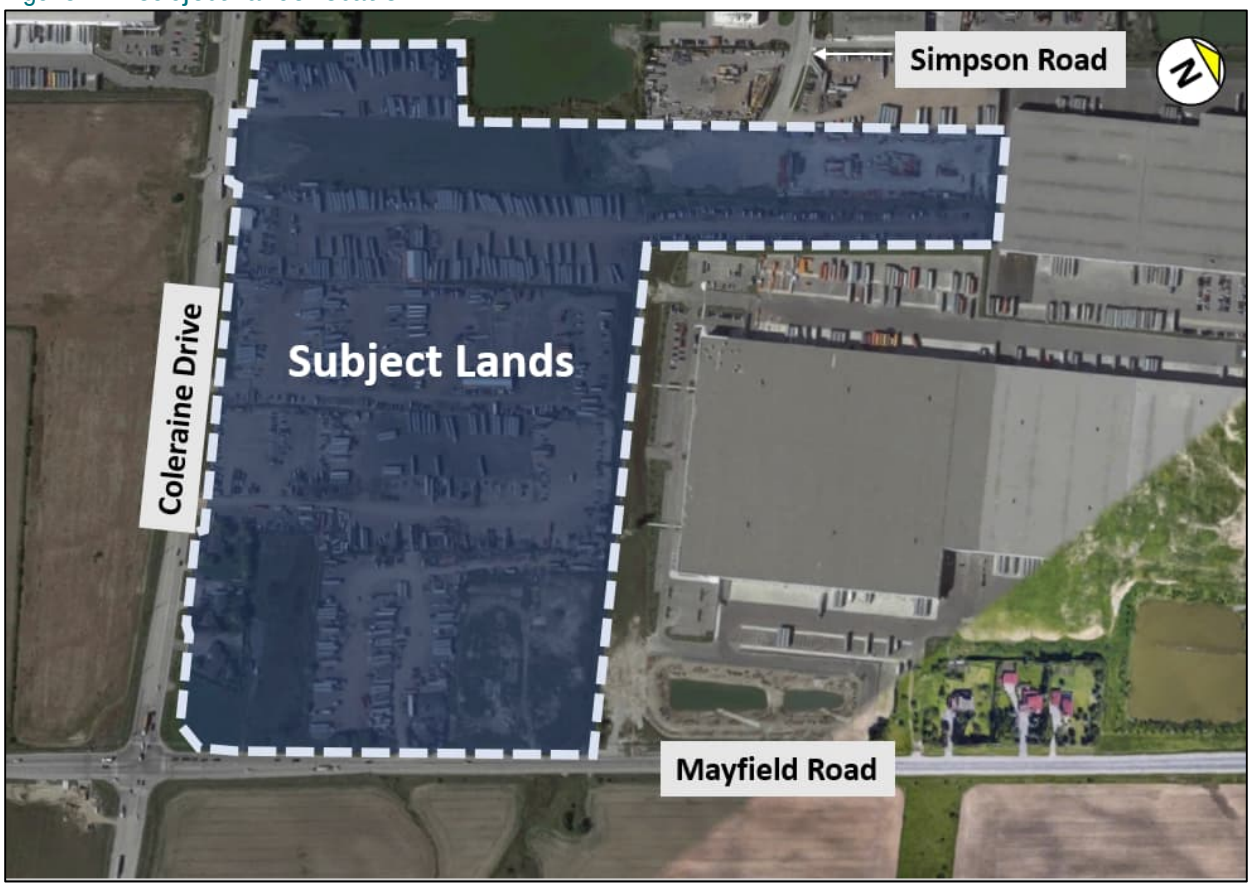
1 INTRODUCTION

LEA Consulting Ltd. (LEA) was retained by Simpson Road Landowners Group Inc. to undertake a Transportation Impact Study (TIS) for the proposed development of an industrial block of approximately 23.6 hectares of land located at the northeast corner of Coleraine Drive and Mayfield Road in the Town of Caledon, herein referred to as the "subject lands".

The subject lands are bounded by Coleraine Road to the west, and Mayfield Road to the south. To the east and north of the site, industrial parcels of land are present. The subject lands are currently occupied by residential use on the southwest corner of the site, open lands, various truck and transportation uses, and a former garden supply store. The location of the subject lands is illustrated in Figure 1-1.

Figure 1-1: Subject Lands Location



Source: Google Maps, accessed July 2023

The purpose of this study is to assess the proposed redevelopment from a transportation perspective, determine the traffic impacts to the adjacent road network, and identify any required mitigation measures. This TIS will assess a five-year horizon to the year 2028 and a 10-year horizon to the year 2033. The study will be prepared in accordance with the Town of Caledon's TIS Terms of Reference and Guidelines (2017).

1.1 PROPOSED LAND USE PLAN

The block plan consists of 12 blocks. It is noted that some parcels in the block plan are categorized as "pending participation" or "non-participating landowners" due to the pending finalization of the development plan. Figure 1-2 illustrates the current ownership mapping with a breakdown of the parcels.

Figure 1-2: Subject Land's Parcel Mapping

Source: Weston Consulting, July 2023

As this TIS is for the whole block plan, for the parcels that do not yet have development plans, it was assumed that these sites would occupy 50% lot coverage. Further, the subject lands are planned for warehouse and office uses. A breakdown of the proposed GFA by parcel is summarized in Table 1-1.

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Table 1-1: Proposed GFA

Parcel Number	Address	Land Use	Site Area		GFA	
			m^2	ha	m^2	ft^2
1	0 Coleraine Drive	Warehouse	40111.9 m^2	4.0 ha	3,309 m^2	35,617.78 ft^2
		Office			4,020 m^2	43,270.92 ft^2
2	12155 Coleraine Road	Warehouse	41551.8 m^2	4.2 ha	1,995.57 m^2	21,480.14 ft^2
3	PT LT 1 CON 6 ALBION	Warehouse	39746.4 m^2	4.0 ha	19,873.20 m^2	213,913.34 ft^2
4	0 Coleraine Drive	Warehouse	38278.1 m^2	3.8 ha	19,139.05 m^2	206,011.02 ft^2
5	8602 Mayfield Road	Warehouse	19410.5 m^2	1.9 ha	7,265.92 m^2	78,209.71 ft^2
6	12197 Coleraine Drive	Warehouse	11326.6 m^2	1.1 ha	5,663.30 m^2	60,959.25 ft^2
7	10265 Coleraine Drive	Warehouse	2235.4 m^2	0.2 ha	1,177 m^2	12,669.12 ft^2
8	12045 Coleraine Drive	Warehouse	2360 m^2	0.2 ha	1,180 m^2	12,701.41 ft^2
9	12029 Coleraine Drive	Warehouse	4721.9 m^2	0.5 ha	2,360.95 m^2	25,413.05 ft^2
10	8576 Mayfield Road	Warehouse	23229 m^2	2.3 ha	11,614.50 m^2	125,017.44 ft^2
11	0 Coleraine Drive	Warehouse	2008.7 m^2	0.2 ha	1,004.35 m^2	10,810.73 ft^2
12	8522 Mayfield Road	Warehouse	11,526 m^2	1.1 ha	5,763 m^2	62,032.42 ft^2
		Total	**236,506.3 m^2**	**23.6 ha**	**84,365.8 m^2**	**908,106 ft^2**

2 POLICY CONTEXT & BACKGROUND STUDIES

The study area is guided by the regulatory framework of various policy documents, standards, and guidelines. This section summarizes the various provincial, regional, and local planning policies and guiding documents influencing the study area.

2.1 PROVINCIAL POLICY FRAMEWORK

Several provincial policy documents provide the basis and guidance for the transportation vision for the Transportation Impact Study. Provincial plans are identified and summarized below.

2.1.1 Provincial Policy Statement (2020)

The *Provincial Policy Statement* (PPS) guides land use planning and development in Ontario. It contains a set of policies that outline a municipality's responsibility regarding transportation infrastructure and corridors to align with land use patterns and support multimodal travel for the efficient movement of people and goods. Section 1 of the PPS outlines the direction for building strong healthy communities and includes guidance in relation to managing effective land uses and implementation of infrastructure and public service facilities. Sections 1.6.7 and 1.6.8 provide policy direction on transportation systems and infrastructure corridors to ensure safe and energy-efficient networks to facilitate the movement of people and goods.

2.1.2 A Place to Grow - Growth Plan for the Greater Golden Horseshoe (2020)

The *A Place to Grow: Growth Plan for the Greater Golden Horseshoe* (The Growth Plan) guides decisions on a wide range of issues, such as land use, urban form, housing, environment, resource protection, transportation, and infrastructure, in the interest of economic prosperity. The Growth Plan provides population and employment growth forecasts for the Region that are required to be used for regional and local planning purposes. It also sets minimum intensification targets for delineated built-up areas and designated greenfield areas in the Region. The study area is located within the Greater Golden Horseshoe Growth Plan area. Key tenets of the Growth Plan include providing an integrated transportation network that is accessible and supports employment and a variety of housing.

2.1.3 Provincial Planning Statement (Proposed 2023)

The Ministry of Municipal Affairs and Housing (MMAH) is consulting on proposed policies for an integrated province-wide land use planning policy document that combines policies from The Growth Plan and the PPS to support the achievement of the province's housing objectives. Should the government adopt the proposed Provincial Planning Statement, the government would revoke the PPS 2020 and amend regulations (O. Reg. 416/05 and O. Reg. 311/06) under the Places to Growth Act 2005.

The proposed Provincial Planning Statement will continue to outline the strategic vision for land use and development within Ontario. It represents the minimum standards that will guide planning authorities and decision-makers in developing and implementing specific plans, including transportation facilities to support the long-term prosperity and social well-being of Ontario.

Transportation policies within the proposed Provincial Planning Statement focus on the safe and efficient movement of people and goods through a multi-modal transportation system and land use pattern that supports transit and active transportation. Proposed policies also recognize that new developments should be compatible with existing or planned corridors and transportation facilities.

Furthermore, the proposed Provincial Planning Statement will guide decisions on a wide range of issues including land use, urban form, housing, environment, resource protection, transportation, and infrastructure in the interest of economic prosperity. The proposed statement addresses specific issues through policy direction, including designating lands within settlement areas located adjacent to major goods movement facilities and corridors (i.e., major highway interchanges) for manufacturing, warehousing, and employment activities.

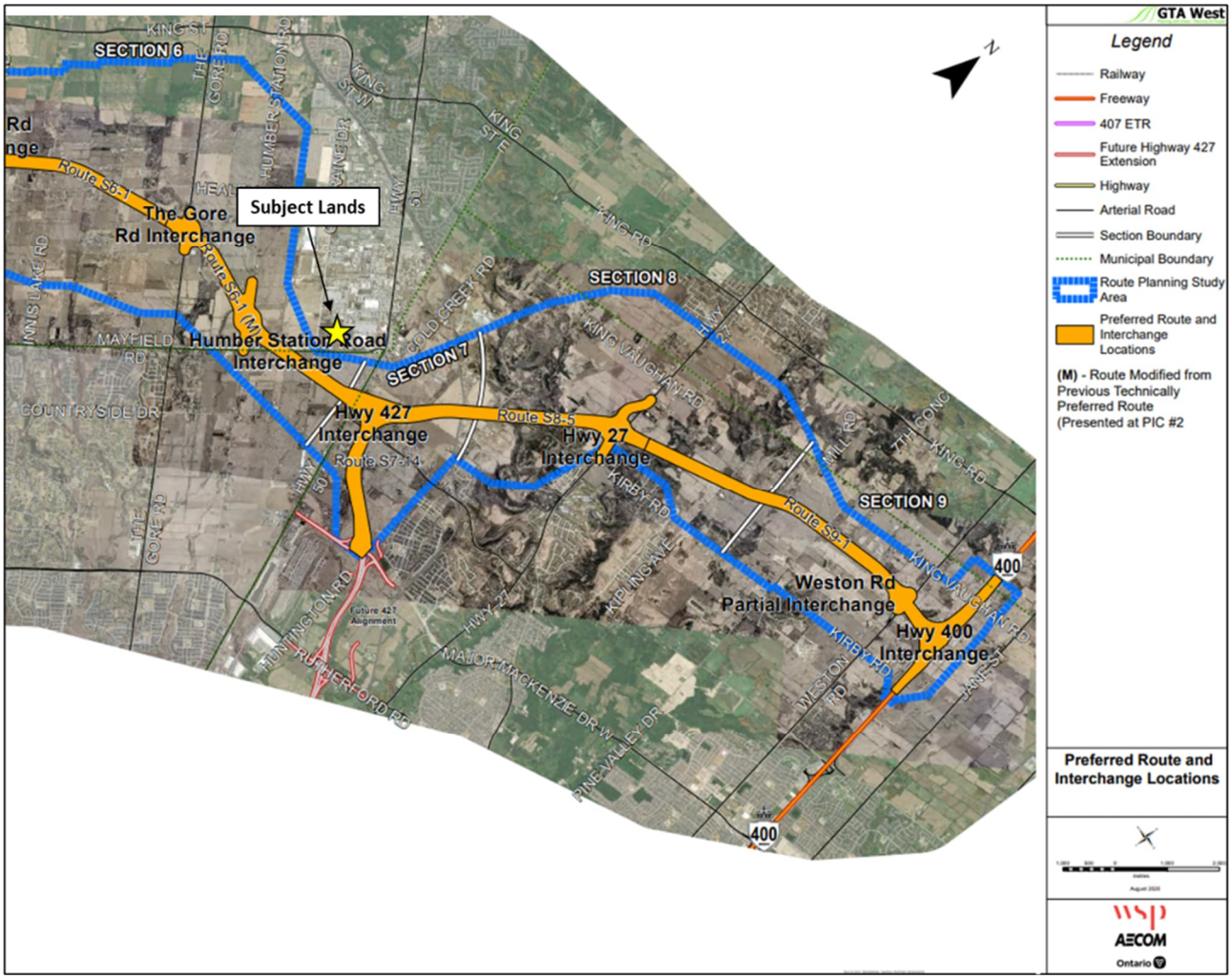
2.1.4 Highway 413 Transportation Corridor Route Planning and Environmental Assessment Study

The Ministry of Transportation (MTO) initiated the Highway 413 Transportation Corridor Environmental Assessment (EA) (formerly GTA West Corridor) in 2007 to propose a new 400-series highway and transit corridor across the Halton, Peel, and York Regions. The 52-kilometre proposed highway and transitway will extend from Highway 400 (between Kirby Road and King-Vaughan Road) in the east to Highway 401/407 ETR interchange area in the west. The project also includes a 3 km extension to Highway 427. The transitway would be a separate corridor running alongside the highway dedicated exclusively for public transit, such as buses or light rail transit.

A Terms of Reference was prepared for approval by the Ministry of the Environment (MOE) outlining the preliminary transportation problems and opportunities, existing environmental conditions, and the proposed alternatives to the undertaking. The need for Highway 413 was identified as a response to the overarching problem of the inter-regional transportation system as much of the higher-order road system (Highway 401, 400, 410, and 427) is expected to be heavily congested during peak periods and increasingly throughout the day. Furthermore, the lack of integration between local and inter-regional transit services beyond corridors served by GO Transit was identified as an issue that Highway 413 could address.

Following approval of the Terms of Reference, Stage 1 of the EA included a Transportation Development Strategy to determine recommendations for transit improvements, transportation demand management measures, and widening of provincial facilities in the western GTA. The Ontario government is currently in Stage 2 of the EA which was initiated in 2014. Stage 2 focuses on identifying the route and developing the preliminary design for the new multi-modal transportation corridor. Currently, the preferred route includes 11 interchanges along municipal roads. As illustrated in Figure 2-1, the subject lands are located just outside of the route planning study area.

Figure 2-1: Highway 413 Technically Preferred Route and Interchange Locations



Source: Highway 413 project website (WSP, AECOM, Government of Ontario, August 2020)

2.2 REGIONAL POLICY FRAMEWORK

Several regional policy documents provide the basis and guidance for the transportation vision for the Transportation Impact Study. Regional plans are identified and summarized below.

2.2.1 Region of Peel Official Plan (2022)

The Region of Peel Official Plan provides the long-term strategic policy framework for managing growth and development to create healthy, resilient, equitable, and sustainable regional communities for those living and working in Peel Region. The Regional Official Plan has an overarching theme of sustainable development to enable the integration of the environmental, social, economic, and cultural imperatives throughout the Plan.

Under the Regional Official Plan, the subject lands are included as part of the Pearson Airport Hub (Hwy 50 Corridor), a provincially significant employment zone. From a transportation perspective, the Regional Official Plan includes policies to support goods movement by coordinating the major road network, the provincial freeway network, areas of significant employment activity, and major goods movement corridors.

Furthermore, the Regional Official Plan includes policies to strengthen the regional network to accommodate current and projected travel demands of the people who live, work, or travel within the Region. Policies focus on creating a sustainable transportation system by encouraging the development of a safe, attractive, accessible, and integrated network for all travel modes.

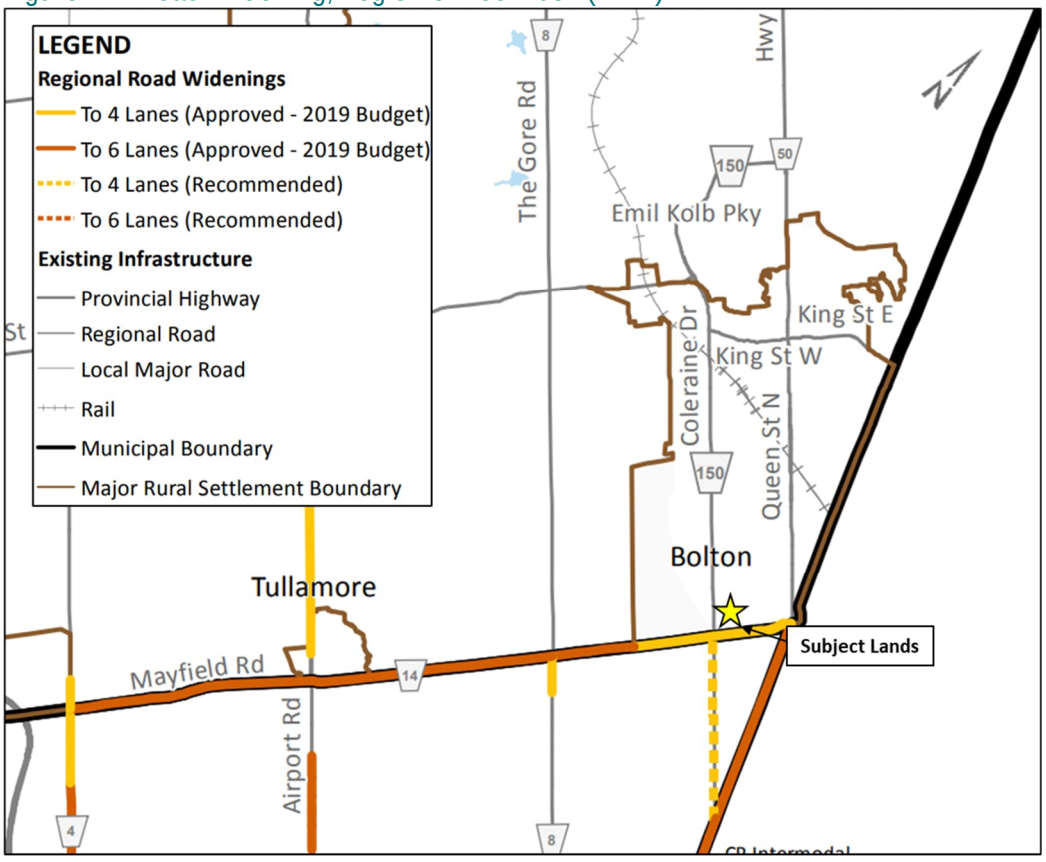
2.2.2 Peel Region Long Range Transportation Plan (2019)

Peel Region's Long Range Transportation Plan (LRTP) is a 5-year plan based on a 2041 horizon that guides transportation planning needs in the Region of Peel. The overarching goal of the LRTP is to establish a transportation network system where 50% of travel is through sustainable modes, such as walking, cycling, transit, and carpooling by 2041. The LRTP includes 3 focus areas including sustainable mobility, safe mobility, and vehicular mobility & goods movement to achieve a safer and more efficient road system.

To allow for growth, the LRTP prioritizes Region-wide strategies that focus on balancing intersection improvements and new infrastructure to facilitate transit, walking, and cycling with road widening and new road development.

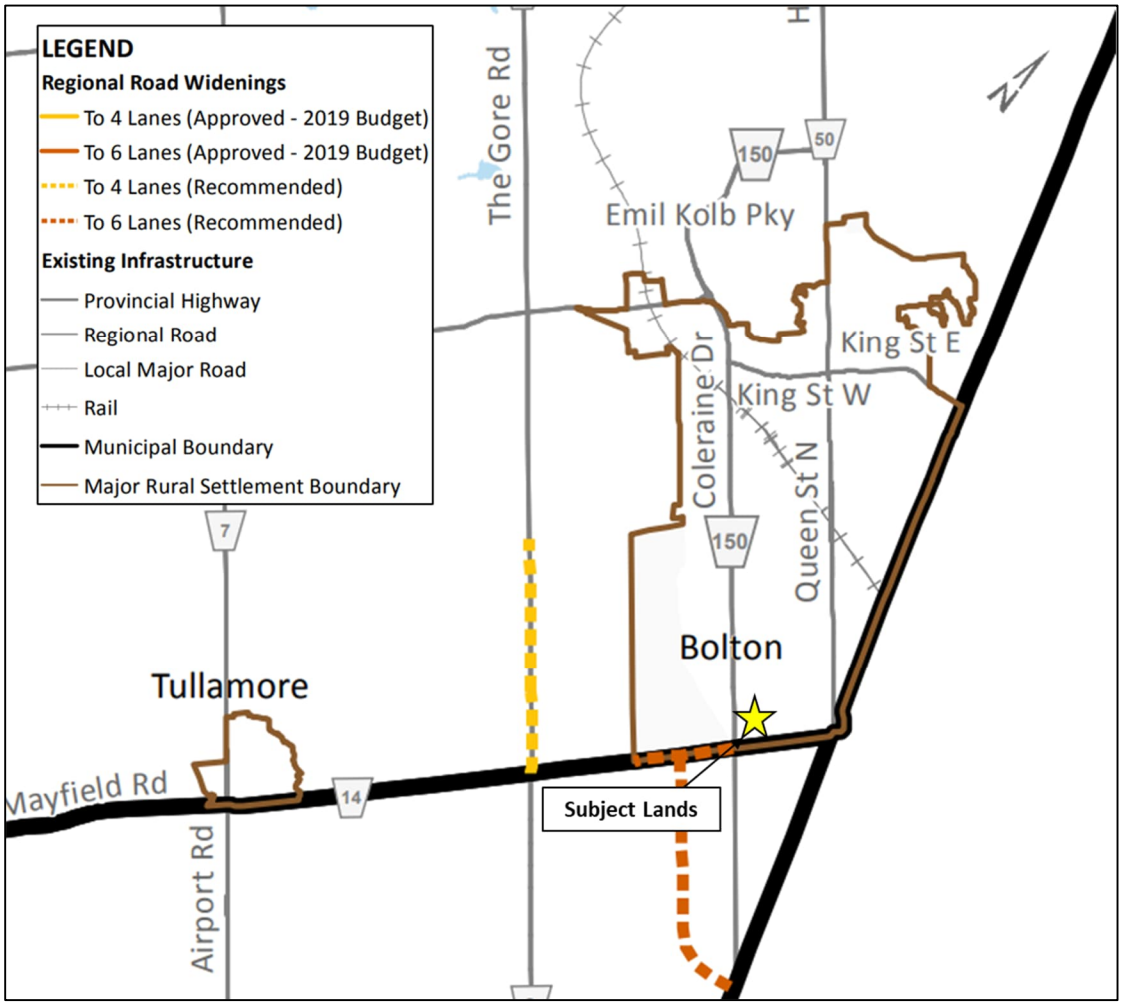
As illustrated in Figure 2-2, by the 2031 horizon year, Mayfield Road is proposed to widen to 4 lanes east of Humber Station Road while Coleraine Drive is recommended to widen to 4 lanes south of Mayfield Road to Highway 50. As illustrated in Figure 2-3, by the 2041 horizon year, Mayfield Road is proposed to widen to 6 lanes between Humber Station Road and Coleraine Drive. Cycling infrastructure is also proposed along Mayfield Road and Coleraine Drive.

Figure 2-2: Road Widening, Region of Peel 2031 (LRTP)



Source: Long Range Transportation Plan (Region of Peel, 2019)

Figure 2-3: Road Widening, Region of Peel 2041 (LRTP)



Source: Long Range Transportation Plan (Region of Peel, 2019)

2.3 LOCAL POLICY FRAMEWORK

Several local policy documents provide the basis and guidance for the transportation vision for the Transportation Impact Study. Local plans are identified and summarized below.

2.3.1 Town of Caledon Official Plan (2018)

The Town of Caledon Official Plan sets out the policy framework for guiding future land use, physical development, and change within the Town. The broad transportation policies of the Official Plan include developing a safe, convenient, economical, efficient, sustainable, and energy-conserving transportation system for the movement of people and goods which will be well-integrated with the envisioned land use designations.

Objectives include improved transportation mobility choices for residents, employees, and visitors to provide appropriate linkages between local, regional, and provincial roads, optimizing the use of existing and planned transportation infrastructure, and creating safe and efficient movement of goods and services within the

Town. While the Official Plan recognizes that the primary mode of travel will be the automobile, transportation policies aim to create a comprehensive transportation system that accommodates all modes of travel.

2.3.2 Future Caledon: Official Plan (Draft 2023)

The draft Future Caledon Official Plan was prepared to conform with the 2020 Provincial Policy Statement, 2019 Growth Plan for the Greater Golden Horseshoe, and 2022 Region of Peel Official Plan. The new Official Plan will be implemented in 3 phases to replace the existing 2018 plan. The current draft provides the Phase 1 framework and policies to guide development and support population and employment growth to 2051.

The new Official Plan envisions a multimodal transportation system for the Town that is safe, efficient, manages future demand and congestion, and is well-integrated with the land use and development within the Town and across the Region. Based on Schedule C1: Town-Wide Transportation Network of the draft Official Plan, a conceptual north-south and conceptual east-west collector road is proposed throughout the subject lands. The feasibility of new collector roads will be conducted through secondary planning to facilitate development, connect future communities and employment lands, and accommodate continuity of transit service and active transportation routes while protecting the natural environmental features.

2.3.3 Caledon Transportation Master Plan (2017)

The Town of Caledon Transportation Master Plan (TMP) addresses the Town's transportation needs for the year 2031. The goals of the TMP include providing a transportation framework that will support economically sustainable and environmentally respectful growth and identifying opportunities for a multimodal transportation network while considering the needs of automobiles and safe and efficient goods movement.

The recommended transportation network identified in Caledon's TMP includes intersection and road improvements, plans for a Transit Implementation Strategy for future public transit service, and recommended active transportation facilities to connect Rural Service Centres to nearby communities, conservation areas, and scenic areas.

2.3.4 Caledon Multi-Modal Transportation Master Plan (On-going)

The Town of Caledon has initiated a Multi-Modal Transportation Master Plan (MMTMP) in coordination with the Caledon Official Plan to develop the long-term strategy for Caledon's transportation system to accommodate the needs of pedestrians, cyclists, transit riders, and motorists while enhancing connectivity and accessibility.

The MMTMP study is currently underway to recommend improvements for the road, active transportation, and transit networks. As a policy update, future collector roads would be assessed as part of the secondary or block plan process to connect to the Town's collector and arterial road network.

The recommended MMTMP strategy includes the widening of Mayfield Road. The MMTMP strategy also recommends separated cycling facilities along Parr Boulevard and proposes a local transit network throughout the study area.

2.3.5 Caledon Active Transportation Master Plan (On-going)

The Town of Caledon initiated its Active Transportation Master Plan (ATMP) in April 2022 to promote active transportation, trail development, and sustainable development. The ATMP builds on the Town's Multi-Modal Transportation Master Plan to identify gaps in the existing active transportation network and to prioritize the implementation of a trail system, routes, and facilities to support a network of active transportation opportunities for people of all ages and abilities.

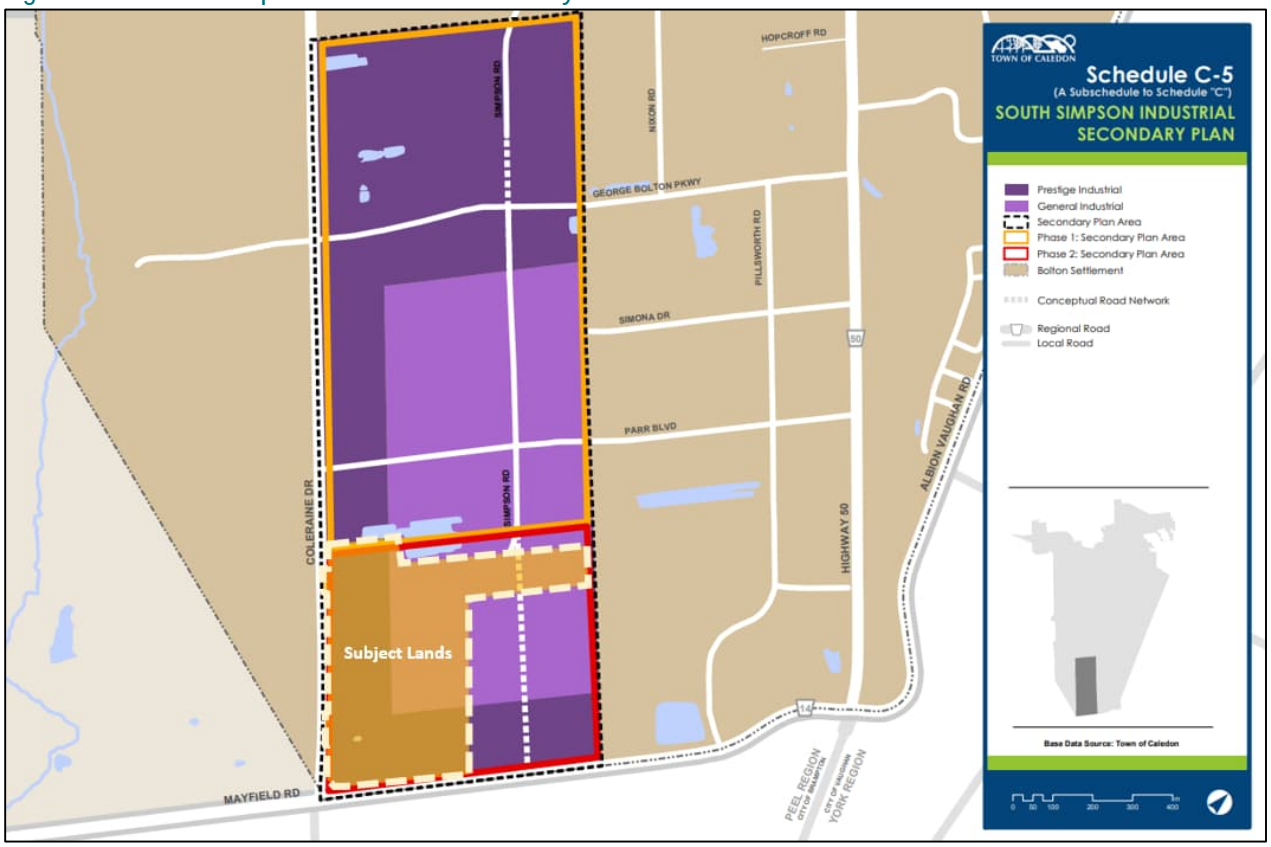
2.3.6 South Simpson Industrial Secondary Plan (2018)

It is understood that the subject lands are located within the southwestern corner of the South Simpson Industrial Secondary Plan lands. The South Simpson Industrial Secondary Plan was approved by the Town of Caledon in April 2018. The Secondary Plan applies to lands north of Mayfield Road, located on the east side of Coleraine Drive.

The subject lands are located in the Phase 2 Secondary Plan Area as identified by Figure 2-4 below. The *Prestige Industrial* designation permits the following uses:

- Manufacturing, fabricating, printing, processing, assembling and packaging operations;
- Warehousing and wholesale operations;
- Laboratories;
- Computer and data processing;
- Research and development facilities;
- Corporate offices;
- Offices related to permitted industrial uses;
- Complementary uses, such as open space and recreation facilities, public uses and utilities, which do not detract from, and which are compatible with the development and operation of prestige industrial uses;
- Day care facility; and
- Commercial uses (no major retail use).

Figure 2-4: South Simpson Industrial Secondary Plan Schedule C-5



Source: Town of Caledon, 2018

The proposed Block development will incorporate the Town of Caledon Official Plan and the South Simpson Industrial Secondary Plan policies.

2.3.7 Proposed Block Plan, Master Environmental Servicing Plan and Proposed Development

It is our understanding that a Block Plan and Master Environmental Servicing Plan are being undertaken for the subject lands. It is understood that the policies of the Secondary Plan speak to development which adheres to a Master Environmental Servicing Plan (MESP) which was completed in 2000. In 2013, an Environmental Assessment was undertaken for Simpson Road, which currently terminates at the north end of the subject lands. The EA alters the previously approved MESP for several aspects.

Given the fragmented ownership of the land in addition to changes which have occurred since the MESP was approved and the lack of details on how some of the Secondary Plan lands will be serviced appropriately, an update to the MESP is required. It is understood that Town of Caledon staff are requiring the South Simpson Landowners Group Inc. to prepare and receive approval of a Block Plan for the proposed development and to update the Master Environmental and Servicing Plan to the Town's satisfaction before submitting a development application and site development in the South Simpson Secondary Plan lands identified as the South Simpson Landowners Group Inc. lands.

As part of the studies required as part of the Block Plan, it is understood that a Transportation Impact Study is required, which this report serves as.

2.4 MUNICIPAL CLASS ENVIRONMENTAL ASSESSMENT

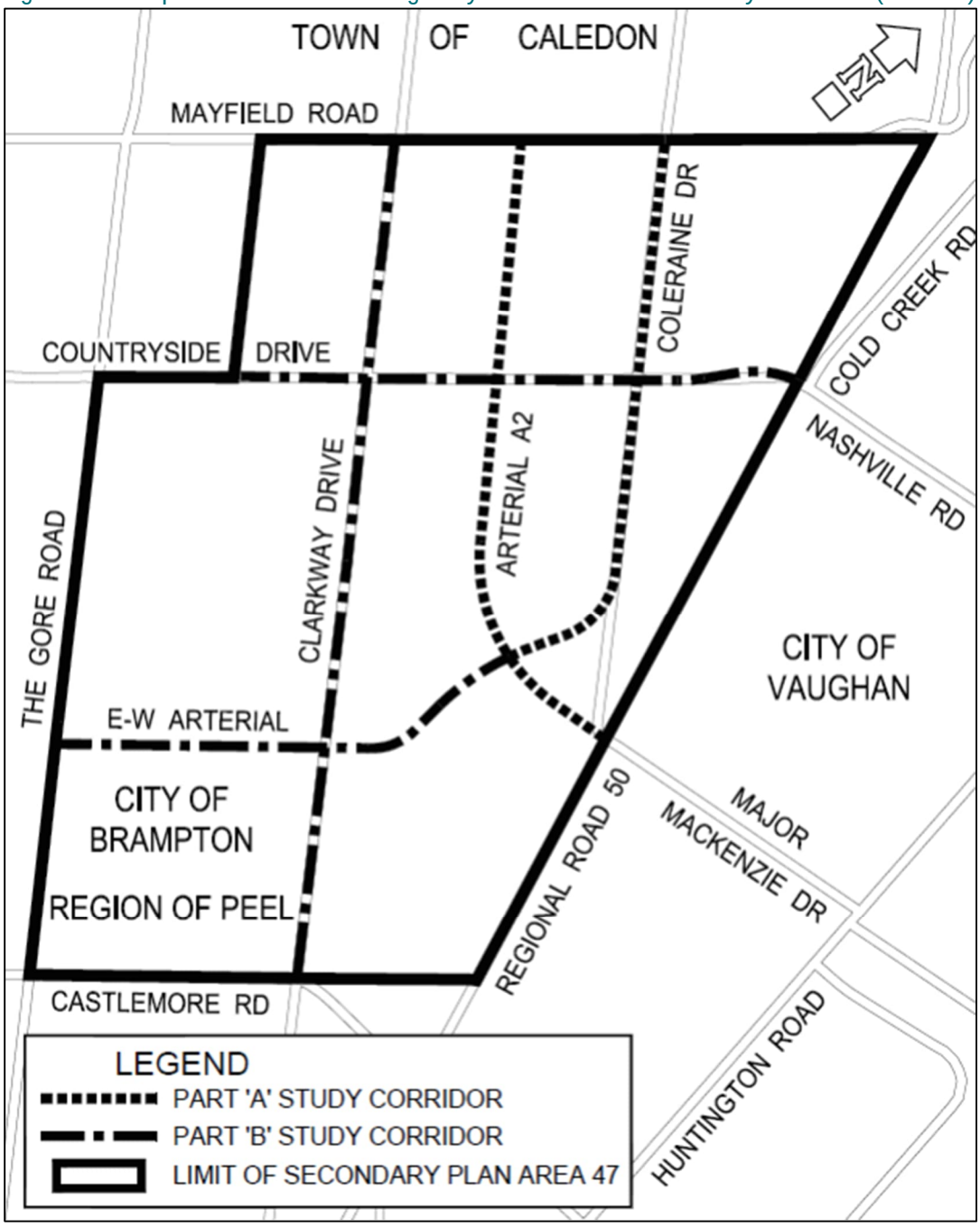
2.4.1 Highway 427 Industrial Secondary Plan Area (Area 47)

The Region of Peel and the City of Brampton undertook two Schedule 'C' Municipal Class Environmental Assessments (Class EA) Phases 3 & 4 study for the arterial roads within the Highway 427 Industrial Secondary Plan Area (Area 47), located south of the subject lands. The purpose of the study was to consider a range of transportation improvements to satisfy future capacity needs. The preferred design identified in the Highway 427 Industrial Secondary Plan Area Class EA includes the following:

- Arterial A2: a new 6-lane north-south roadway that connects Major Mackenzie Drive to Mayfield Road
- Coleraine Drive: an existing roadway that will be widened to 4 lanes and upgraded to include curb and gutter and multi-use pathways (MUP)
- Countryside Drive: an existing roadway which will be widened to 4 lanes and upgraded to include curb and gutter and MUP
- Clarkway Drive: an existing roadway that will have portions widening to 4 lanes and upgraded to include storm sewers, sidewalks, and cycle lanes
- East-West Arterial: a new 4-lane roadway connecting the Gore Road to Arterial A2.

The proposed roadways within the Highway 427 Industrial Secondary Plan Area are illustrated in Figure 2-5.

Figure 2-5: Proposed Roads within Highway 427 Industrial Secondary Plan Area (Area 47)



Source: Region of Peel, 2022

3 EXISTING TRANSPORTATION CONDITIONS

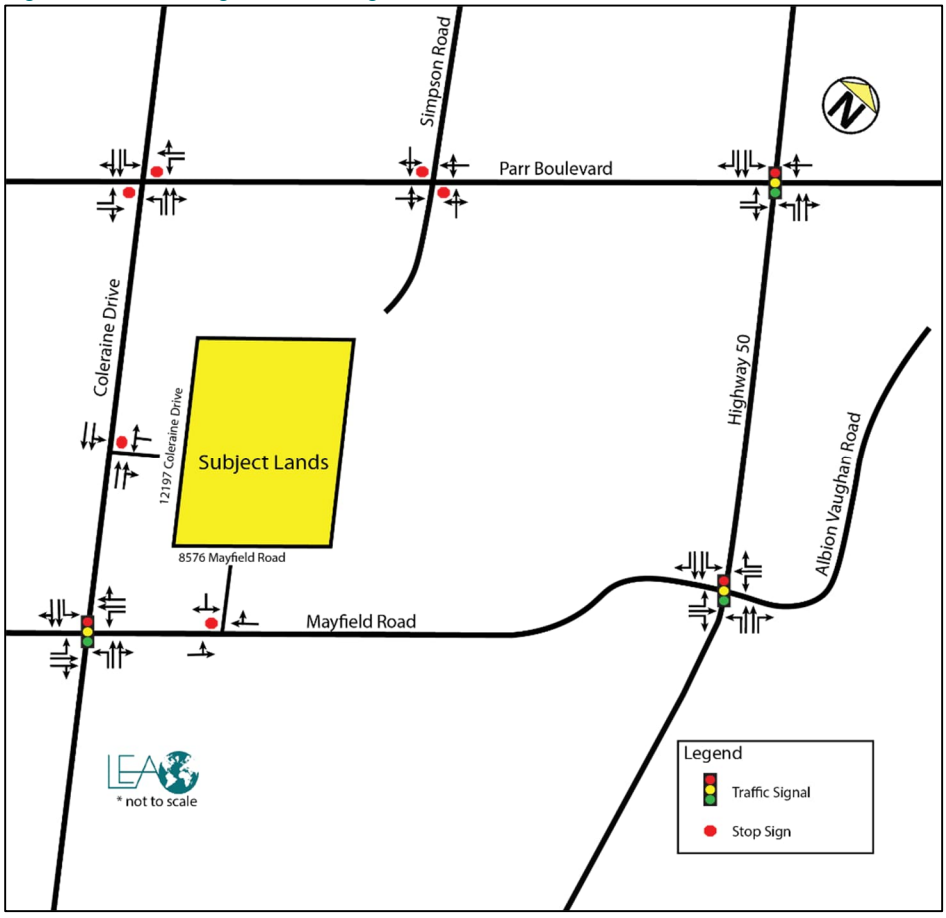
This section identifies the existing transportation conditions present in the study area, including the road, transit, cyclist and pedestrian networks. The study area was determined by assessing the size of the proposed development and its anticipated transportation impact. The terms of reference and correspondence confirming the scope and details of this study with the Town are included in Appendix A. The study area includes the following intersections:

- Mayfield Road and Coleraine Drive (Signalized);
- Parr Boulevard and Coleraine Drive (Unsignalized);
- Parr Boulevard and Simpson Road (Unsignalized);
- Parr Boulevard and Highway 50 (Signalized); and
- Mayfield Road/Albion-Vaughan Road and Highway 50 (Signalized).

3.1 EXISTING ROAD NETWORK

This section will describe the road network with the above-mentioned study area. The existing intersection controls and lane configuration are illustrated in Figure 3-1.

Figure 3-1: Existing Lane Configuration



Coleraine Drive is a north-south Medium Capacity Arterial roadway with a four-lane cross-section (two (2) lanes per direction) in the vicinity of the subject site. Under the Region of Peel's jurisdiction, the roadway extends from the intersection with Highway 50 in the south in the City of Brampton to the intersection with King Street West/Harvest Moon Drive in the Town of Caledon in the north. The roadway operates with a posted speed limit of 70 km/h within the study area.

Highway 50 is a north-south High Capacity Arterial roadway with a four-lane cross-section (two (2) lanes per direction) in the vicinity of the subject site. Under the jurisdiction of the Region of Peel, the roadway extends north from the intersection with Steeles Avenue (the road continues south of the intersection as Albion Road) in the south in the City of Brampton to the intersection with Highway 9 in the north in the Town of Caledon. The roadway operates with posted speed limits of 60 km/h and 70 km/h within the study area.

Mayfield Road is an east-west High Capacity Arterial roadway with a two-lane cross-section (one (1) lane per direction) in the vicinity of the subject site. Under the jurisdiction of the Region of Peel, the roadway operates between the intersection with Highway 50 in the east (the road continues east of the intersection as Albion Vaughan Road) to the intersection with Winston Churchill Boulevard in the west (the roadway continues west of the intersection as Side Road 17) straddling the border of the City of Brampton and the Town of Caledon. The roadway operates with a posted speed limit of 60 km/h within the study area.

Albion Vaughan Road is a north-south Medium Capacity Arterial roadway with a two-lane cross-section (one (1) lane per direction) in the vicinity of the subject site. Under the jurisdiction of the Town of Caledon, the roadway extends north from the intersection with Highway 50 in the south to the intersection with King Street East/King Road in the north (the road continues north of the intersection as Caledon King Townline). The roadway operates with a posted speed limit of 50 km/h within the study area.

Parr Boulevard is an east-west local road with a two-lane cross-section (one (1) lane per direction) in the vicinity of the subject site. Under the jurisdiction of the Town of Caledon, the roadway extends from the intersection with Highway 50 in the east to Coleraine Drive in the west. The roadway operates with an assumed speed limit of 50 km/h within the study area.

Simpson Road is a north-south local road with a two-lane cross-section (one (1) lane per direction) in the vicinity of the subject site. Under the jurisdiction of the Town of Caledon, the roadway extends from the northern property limits of the subject lands in the south to the intersection with Healey Road in the north (the road continues north of the intersection as Holland Drive). The roadway operates with an assumed speed limit of 50 km/h within the study area.

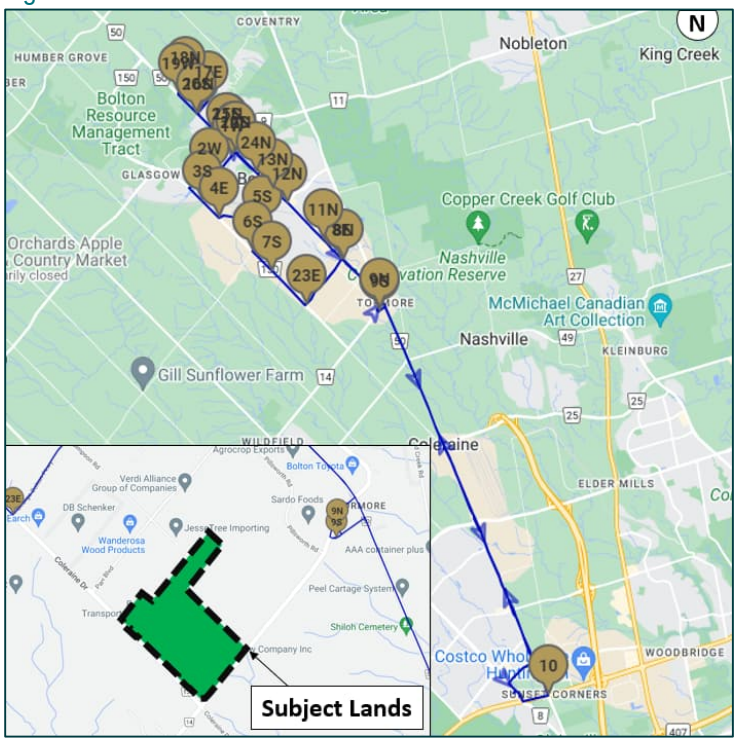
3.2 TRANSIT NETWORK

There is currently no Town-wide local public transit service operated by the Town of Caledon. However, following the Town's Transit Feasibility Study in 2019, Voyago was retained to provide local service in the Bolton area. The local transit line includes 39 bus stops between the area of Highway 50 & Highway 7 and Highway 50 & Columbia Way.

An inter-regional commuter bus service is also available within the Bolton area. The inter-regional route is operated by GO Transit between Malton and the area of Highway 50 and Columbia Way with opportunities to transfer to Metrolinx's GO rail transit. The route operates Monday to Friday during peak hours.

The location of the Bolton transit service provided by Voyago is illustrated in Figure 3-2 with location of the 38 Bolton/Malton route and is illustrated below in Figure 3-3.

Figure 3-2: Bolton Local Transit Route



Source: Buswhere (2023)

Figure 3-3: GO Transit Route 38

Source: GO Train and Bus Schedule (Metrolinx, April 2023)

Voyago Bolton Line is a bus route that generally operates in a north-south direction between the area of Highway 50 and Columbia Way in the north and the area of Queen Street/Highway 7 and Highway 50 in the south. The route operates Monday to Friday during peak commute hours from 6:00 AM to 9:30 AM in the AM and 3:00 PM to 6:30 PM in the PM periods.

> *Access Location:* The Voyago Bolton Line is accessible via transit stops 9N and 9S stops which are accessible at the Park & Ride lot at the intersection of Highway 50 and Mayfield Road, which are located approximately 750 m from the southeastern (closest) end of the subject lands (equivalent to a 10-minute walk).

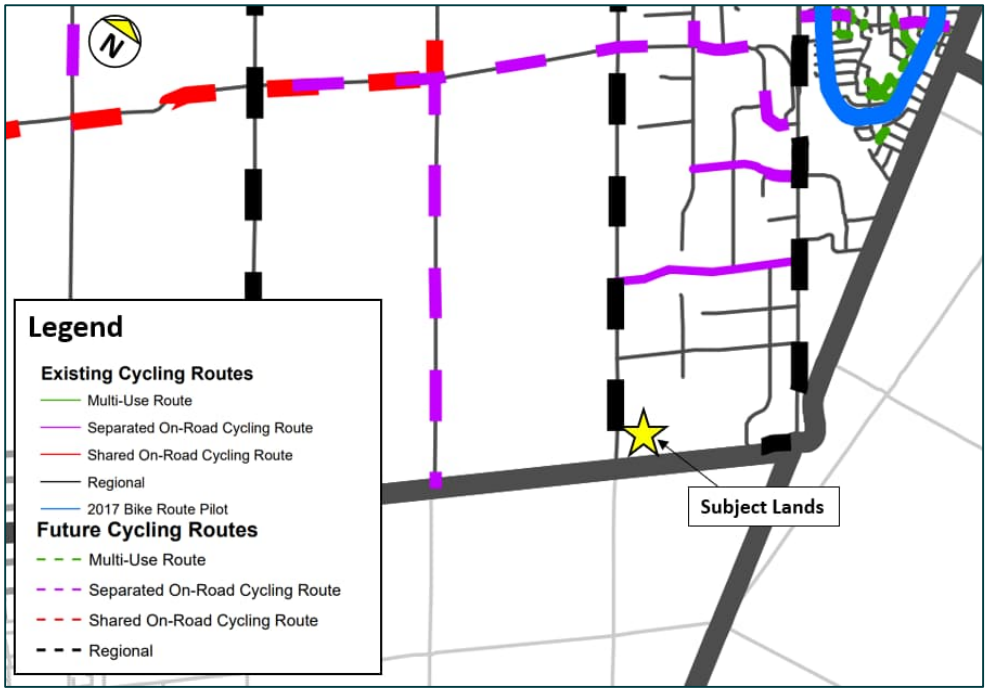
GO Route 38 Bolton/Malton is a GO Transit bus route that generally operates in a north-south direction between the area of Highway 50 and Columbia Road in the Town of Caledon in the north and Malton GO Station in the south. The route operates Monday to Friday during peak hours at 5:17 AM and 6:17 AM for southbound travel in the AM period and 4:55 PM and 5:20 PM for northbound travel in the PM period. Connections to/from Union Station are provided via Malton GO Station.

> *Access Location:* The 38 Bolton/Malton GO Transit route is accessible via the Park & Ride lot at the intersection of Highway 50 and Mayfield Road, which is located approximately 750 m from the southeastern (closest) end of the subject lands (equivalent to a 10-minute walk).

3.3 CYCLING NETWORK

The subject site is located in a location with limited access to existing cycling infrastructure. The closest cycling infrastructure to the subject site are Separated On-Road Cycling Route facilities along George Bolton Parkway. Of note, there are future regional cycling facilities planned for both Highway 50 and Coleraine Drive which will be accessible to the subject lands for future cycling use as a mode of travel. The existing and planned cycling network is illustrated in Figure 3-4.

Figure 3-4: Existing and Planned Cycling Network



Source: Town of Caledon, 2017

3.4 PEDESTRIAN NETWORK

Pedestrian facilities are limited within the study area. In the area immediately surrounding the subject lands, the existing pedestrian network consists of sidewalks provided along one side of Parr Boulevard and Simpson Road as well as along parts of Highway 50. Of note, sidewalk infrastructure is largely not provided along the segments of Mayfield Road or Coleraine Drive and is not provided along Albion Vaughan Road within the vicinity of the subject site. Some sidewalk infrastructure is provided along Coleraine Drive and Mayfield Road in the vicinity of the intersection of the two roads.

Despite the lack of sidewalk infrastructure provided on the above-mentioned roadways, pedestrian crosswalks are available on all approaches with protected pedestrian phases at all signalized intersections in the study area. The exception to this is that there is no pedestrian crosswalk infrastructure provided across the south leg of the Highway 50 and Mayfield Road intersection.

3.5 TRAFFIC DATA COLLECTION

Turning movement counts (TMCs) were used as the source of traffic data in the intersection capacity analysis. Traffic counts were collected by LEA Consulting on Thursday, September 14, 2023, and Saturday, September 16, 2023, between 7:00 AM - 9:30 AM and 4:00 PM - 6:00 PM and to capture the weekday and weekend AM and PM peak periods.

It is noted that there was construction at the intersection of Mayfield Road and Coleraine Drive during the surveys. The Saturday counts were not adjusted as it is assumed that the construction would not have a significant impact. However, December 2021 counts were obtained and utilized for the weekday AM and PM peak hours, and traffic volume balancing was completed along Coleraine Drive.

Signal timing plans at the signalized intersections were obtained from the Region of Peel. A summary of the TMC data collected is outlined in Table 3-1 with details of the TMC data collected found within Appendix B.

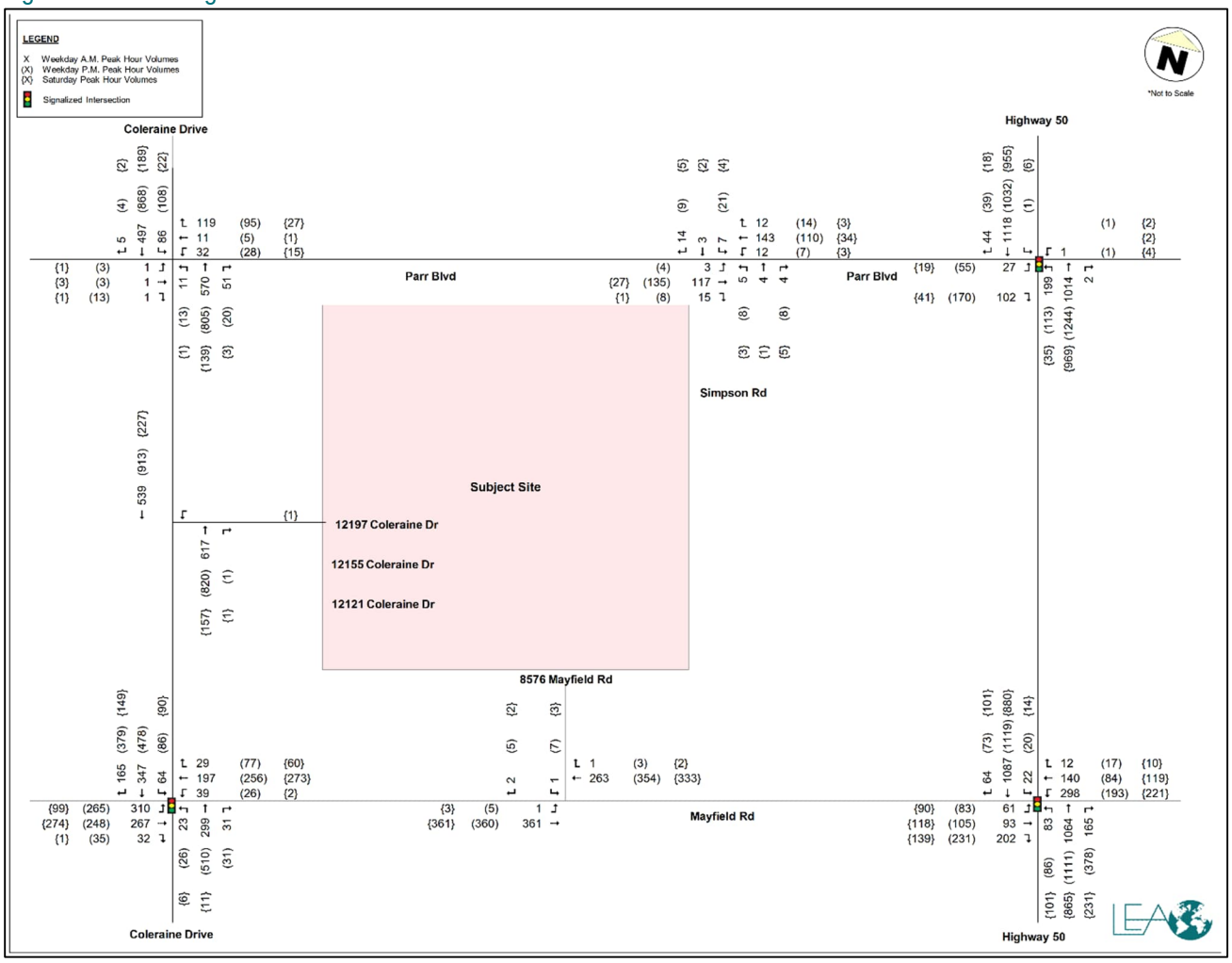
Table 3-1: Data Collection Summary

Intersection	TMC Date	Source
Mayfield Road & Coleraine Drive	Wednesday, December 8, 2021	Spectrum
	Saturday, September 16, 2023	LEA Consulting Ltd.
Coleraine Drive & Parr Boulevard	Thursday, September 14, 2023 Saturday, September 16, 2023	LEA Consulting Ltd.
Parr Boulevard & Simpson Road		
Parr Boulevard & Highway 50		
Mayfield Road & Highway 50		
Mayfield Road & South Site Access		
Coleraine Drive and West Site Access		

3.6 EXISTING TRAFFIC VOLUMES

The existing traffic volumes in the study area during the weekday AM, PM and Saturday peak hours are illustrated in Figure 3-5.

Figure 3-5: Existing Traffic Volumes



4 FUTURE BACKGROUND TRAFFIC CONDITIONS

For the analysis of future background traffic conditions, this study considers a five- and ten-year horizon from the existing year 2023 to the future years 2028 and 2033, respectively. Future background conditions include the traffic added to the network from other future developments, corridor growth, and road network improvements. The future background conditions will be used as the baseline for evaluating the impact of the proposed development.

4.1 CORRIDOR GROWTH

The Region of Peel provided growth rates for the study area corridors, which were subsequently applied to all through movements in addition to major movements at the studied intersections. Table 4-1 summarizes the applied growth rates.

Table 4-1: Corridor Growth

Corridor	AM/PM/Sat Peak Annual Growth
Mayfield Rd EB	0.5%
Mayfield Rd WB	1%
Coleraine Dr NB	0.5%
Coleraine Dr SB	0.5%
Hwy 50 NB	0.5%
Hwy 50 SB	0.5%

4.2 BACKGROUND DEVELOPMENTS

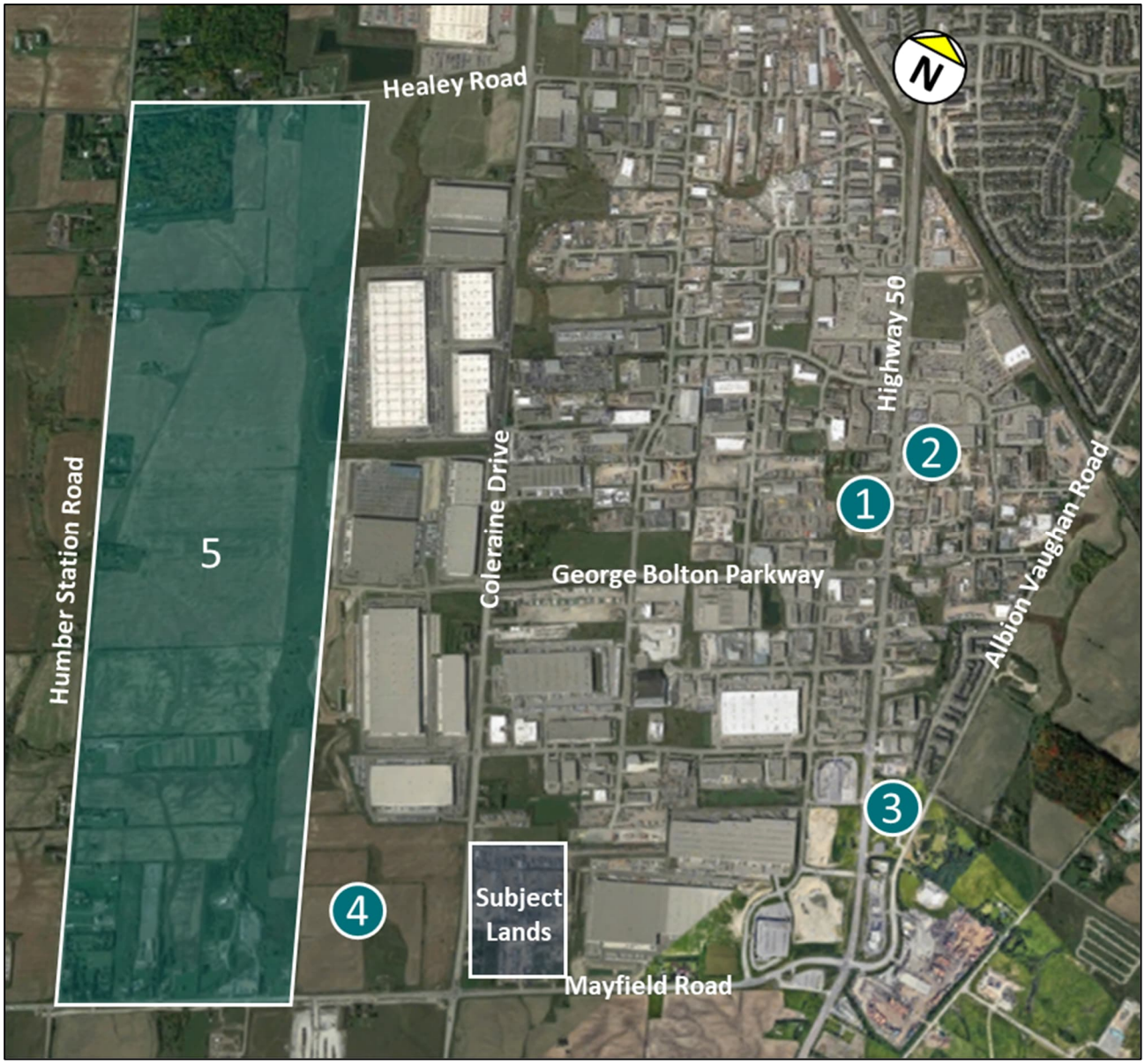
Five (5) background developments located within or near the study area were considered under future background conditions. Detailed information on the background developments included in the analysis was obtained from the Town's development application online inventory. The site statistics of the background developments are summarized below in Table 4-2 and the location of each background development relative to the location of the subject site is illustrated below in Figure 4-1

Table 4-2: Background Developments

#	Location	Proposed Development	Anticipated Horizon	Source of Traffic Volumes
1	12544 Highway 50	Gas Station 279 m^2 of retail GFA 461 m^2 of retail GFA	2028	TIS dated March 2017 (Figure 5-1) LMM Engineering Inc.
2	12563 & 12599 Highway 50 (Phase 1)	2,238 residential units; 3,179 m^2 Retail	2033	TIS dated January 2022 (Figure 21 & 24) BA Group
3	12148 Albion Vaughan Road	306 residential units; 225m^2 commercial space	2028	TIS dated September 2021 (Figure 4.2A -4.2B) Paradigm
4	Triangle Lands	406,000 m^2 of industrial GFA	2028	TIS dated Sept 2023 LEA Estimate
5	Humber Station Lands (Phase 1)	2,028 Jobs/Employee Warehousing	2028	TIS Dated Sept 2023 (Figure 5-1:5-4) LEA Consulting Ltd
	Humber Station Lands (Full Buildout)	2,548 Jobs/Employee Warehousing	2033	

The background development traffic volumes were extracted from their respective traffic studies for their development applications and subsequently assigned to the study area road network. Relevant excerpts from the traffic studies for each background development are included in Appendix C.

Figure 4-1: Background Development Locations

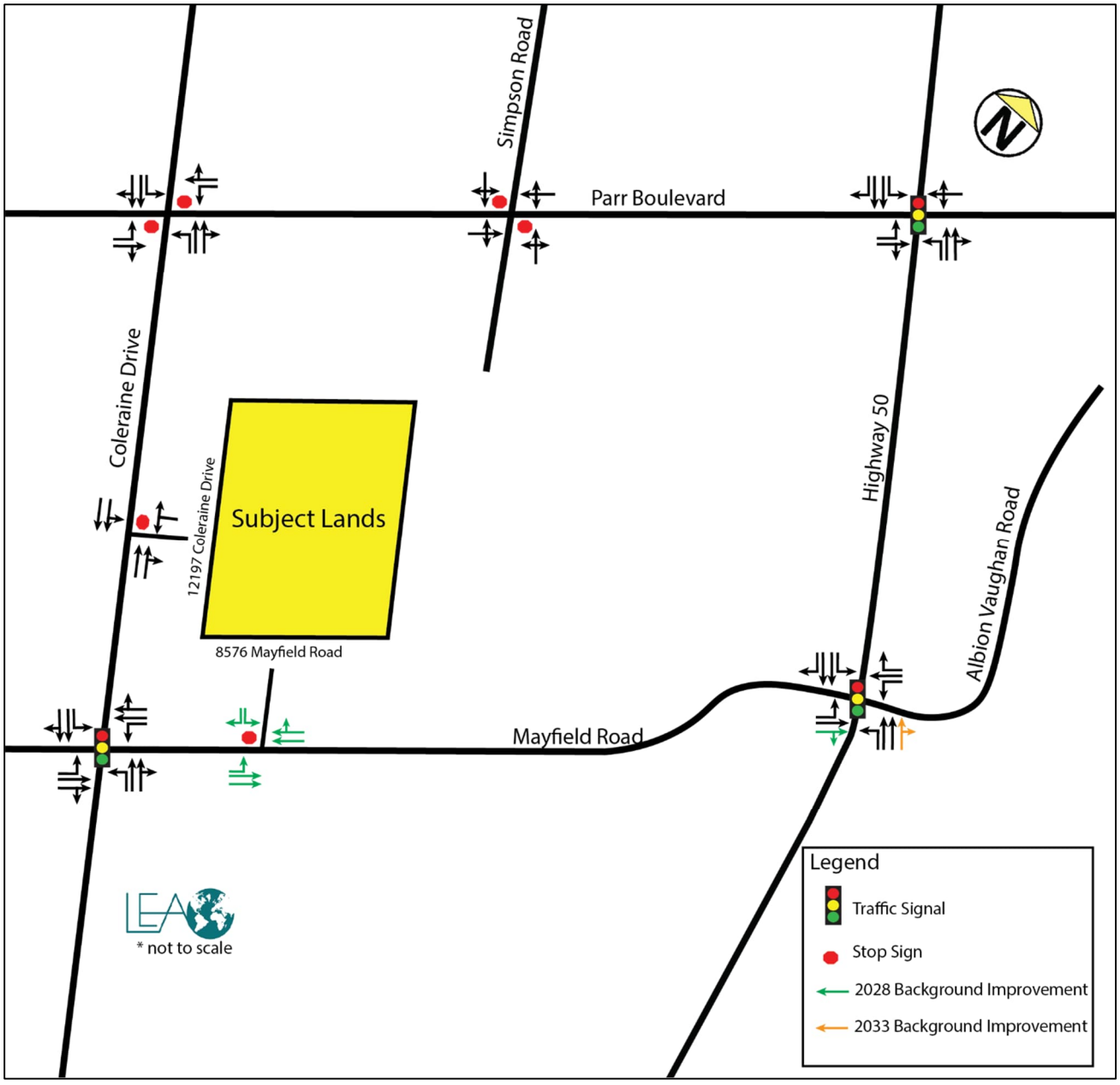


Source: Google Maps, 2023

4.3 PLANNED EXTERNAL ROAD NETWORK

As identified in Section 2, it is understood that Mayfield Road will be widened from 2 lanes to 4 lanes between Humber Station Road and Highway 50 by the 2028 horizon year and Highway 50 will be widened from 5 lanes to 7 lanes from Castlemore Road to Mayfield Road by the 2033 horizon year. For the purposes of this TIS, the Simpson Road extension is expected to completed with the build out of the block plan. Figure 4-2 illustrates the future background road network.

Figure 4-2: Future Background Road Network

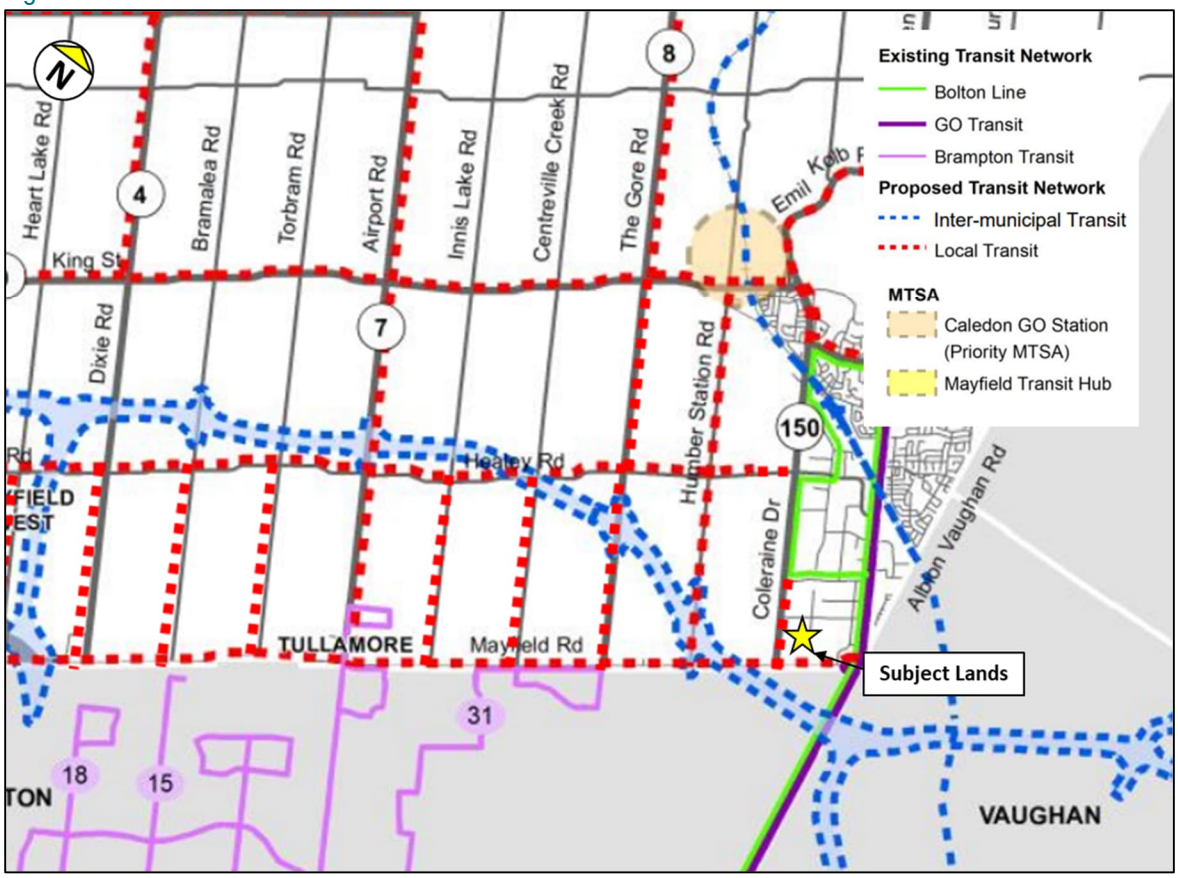


4.4 PLANNED TRANSIT AND ACTIVE TRANSPORTATION IMPROVEMENTS

As illustrated in Figure 4-3, the Town of Caledon's draft Multi-Modal Transportation Master Plan (MMTMP) proposes a future transit network including local transit routes along the subject land's boundary roadways and improvements to the nearby priority areas including the Caledon GO Station (planned at King Street & Humber Station Road).

These nearby transit initiatives aim to expand transit reach to existing and proposed residential and employment land uses. Having more frequent and reliable transit service, as well as improving first/last mile initiatives to existing transit stops will enhance the multi-modal transportation network in the study area.

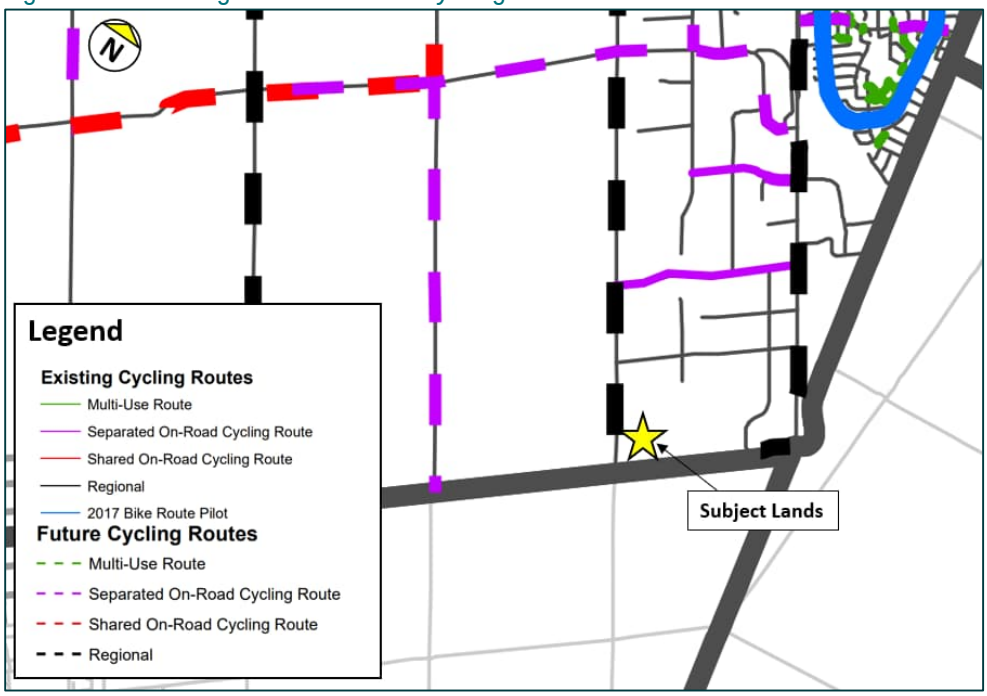
Figure 4-3: Future Transit Network



Source: Multi-Modal Transportation Master Plan Public Information Centre #2 (Town of Caledon, May 2022)

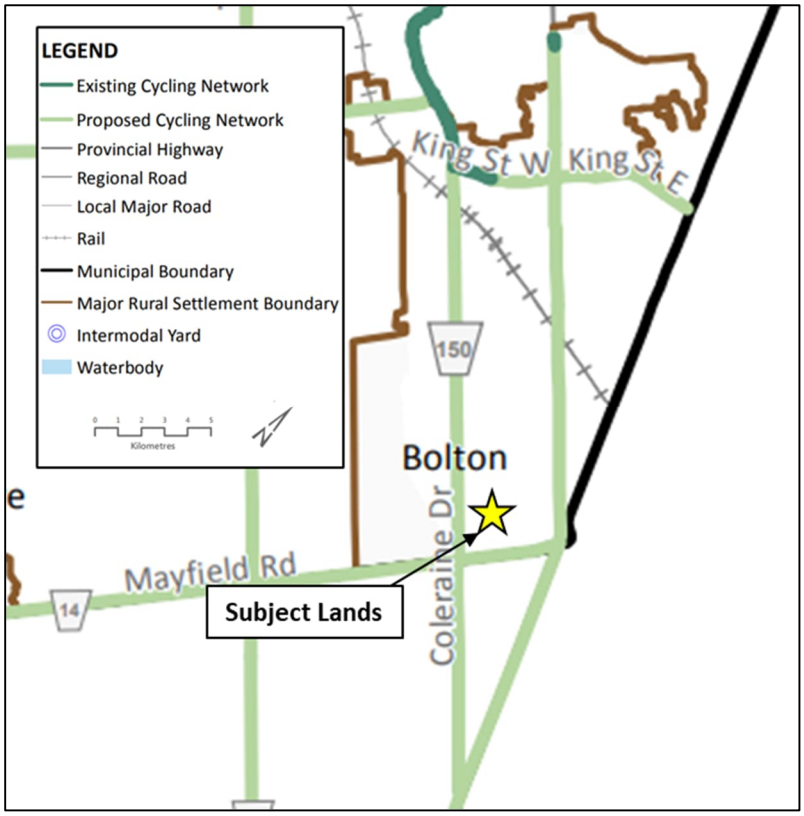
As illustrated in Figure 4-4, the Town of Caledon's 2017 Transportation Master Plan and Draft Active Transportation Master Plan proposes separated on-road facilities near the subject lands along Humber Station Road. In addition, regional cycling facilities (see Figure 4-5) are proposed along Coleraine Drive and Mayfield Road.

Figure 4-4: Existing & Future Local Cycling Network



Source: Transportation Master Plan (Town of Caledon, October 2017)

Figure 4-5: Future Regional Cycling Network



Source: Long Range Transportation Plan (Peel Region, 2019)

4.5 FUTURE BACKGROUND TRAFFIC VOLUMES

The future background traffic volumes for the weekday AM, PM and Saturday peak hours under the 2028 and 2033 horizon years illustrated in Figure 4-6 and Figure 4-7.

Figure 4-6: 2028 Future Background Traffic Volumes

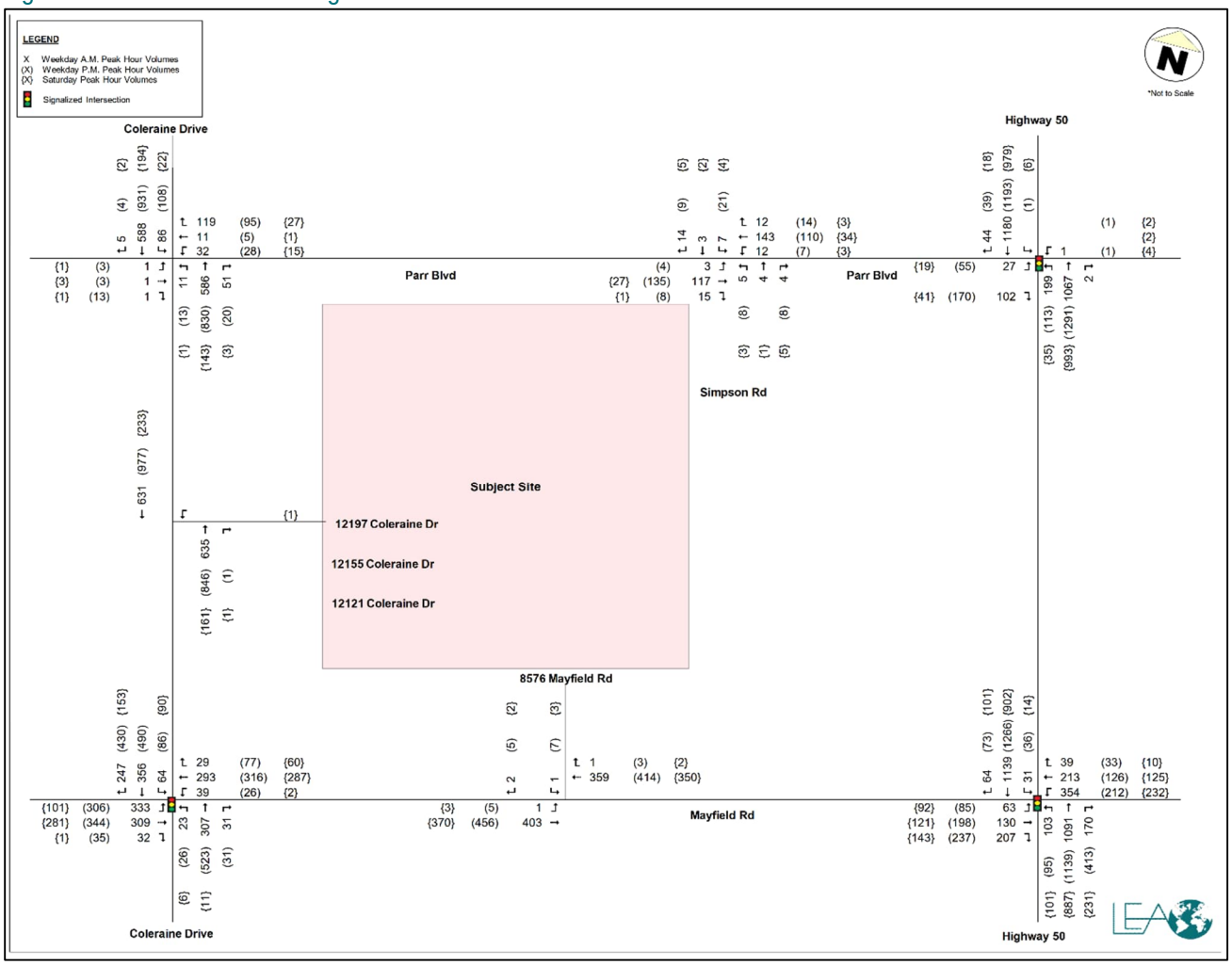
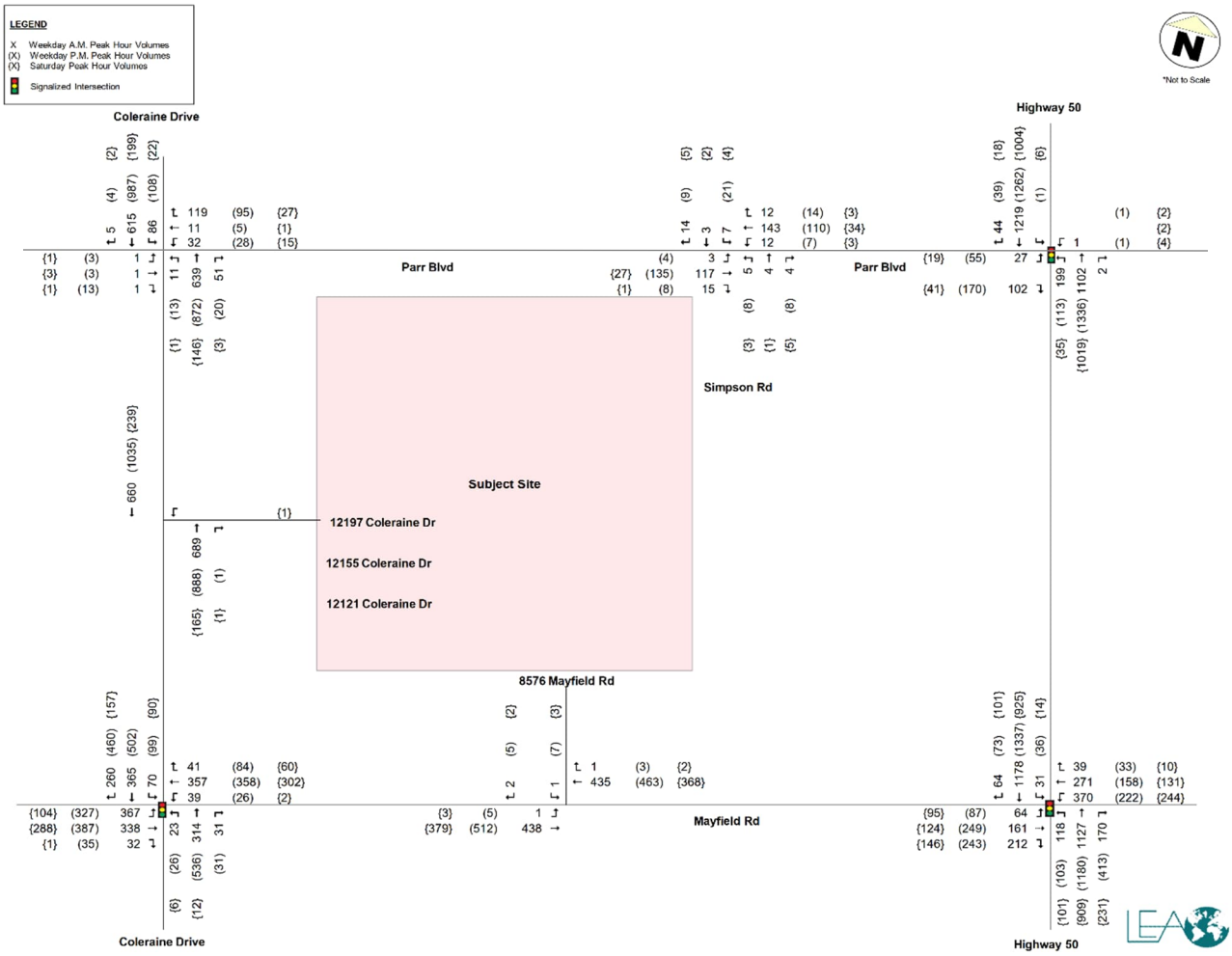


Figure 4-7: 2033 Future Background Traffic Volumes



5 SITE-GENERATED TRAFFIC

As mentioned earlier, the full buildout of the subject lands is not yet confirmed. Resultantly, for the pending parcels, an assumed 50% lot coverage was utilized to estimate the total GFA and calculate site trips for the analysis. Therefore, the approximate full buildout of the subject lands consists of approximately 908,500 ft^2 of warehouse GFA. In addition, it was assumed that all trips would enter the subject lands via Simpson Road.

This section provides details regarding the site-generated traffic that has been conducted to assess the future travel demand and capacity deficiencies of the road network upon the full buildout of the subject lands. The calculation, distribution, and assignment of future site-generated trips are discussed below.

5.1 TRIP GENERATION

It is understood that warehousing activities are proposed for the subject lands. As such, trip generation for the development was estimated using the average baseline auto and truck trip rates from the ITE Trip Generation Manual 11th Edition for ITE LUC 150 – Warehousing in General Urban/Suburban and based on the proposed estimated GFA of 908,500 ft^2. The trip generation was calculated for the AM, PM, and Saturday peak hours.

A summary of the site trip generation for auto and truck trips is provided in Table 5-1 and Table 5-2, respectively.

Table 5-1: Subject Site Trip Generation (Auto Trips)

Land Use	Description	Weekday AM Peak Hour			Weekday PM Peak Hour			Weekend Saturday Peak Hour		
		In	Out	Total	In	Out	Total	In	Out	Total
ITE LUC 150 Warehousing 908, 500 ft^2	Auto Trip Rate (/1000 ft^2)	0.13	0.04	0.17	0.05	0.13	0.18	0.05	0.13	0.18
	Total ITE Auto Trips	119	36	155	46	118	164	46	118	164
	External Auto Trips (100%)	**119**	**36**	**155**	**46**	**118**	**164**	**46**	**118**	**164**

Table 5-2: Subject Site Trip Generation (Truck Trips)

Land Use	Description	Weekday AM Peak Hour			Weekday PM Peak Hour			Weekend Saturday Peak Hour		
		In	Out	Total	In	Out	Total	In	Out	Total
ITE LUC 150 Warehousing 908, 500 ft^2	Truck Trip Rate (/1000 ft^2)	0.01	0.01	0.02	0.02	0.01	0.03	0.02	0.01	0.03
	Total ITE Truck Trips	9	9	18	14	13	27	14	13	27
	External Auto Trips (100%)	**9**	**9**	**18**	**14**	**13**	**27**	**14**	**13**	**27**

The subject lands are anticipated to generate 155 two-way auto vehicle trips during the AM peak hour (119 inbound and 36 outbound), 164 two-way auto vehicle trips during the PM peak hour (46 inbound, 118 outbound) and 164 two-way auto vehicle trips during the Saturday peak hour (46 inbound, 118 outbound).

In addition, 18 two-way truck trips (9 inbound, 9 outbound) are anticipated for the AM peak hour, 27 two-way truck trips (14 inbound, 13 outbound) are anticipated for the PM peak hour and 27 two-way truck trips (14 inbound, 13 outbound) are anticipated for the Saturday peak hour.

5.2 TRIP DISTRIBUTION AND ASSIGNMENT

The directional trip distribution of site traffic was derived using 2016 TTS data filtered for trips originating in/ destined to industrial areas during the AM and PM and Saturday peak periods within Traffic Analysis Zone 3191. Inbound and outbound distribution was based on the results of the peak hour for the peak direction (i.e., inbound direction based on AM in and outbound direction based on PM out). Site traffic was assigned to the road network based on logical routing, turn restrictions, and changes in the future network.

The trip distribution for the subject lands is outlined in Table 5-3. Detailed TTS data is provided in Appendix D.

Table 5-3: Trip Distribution

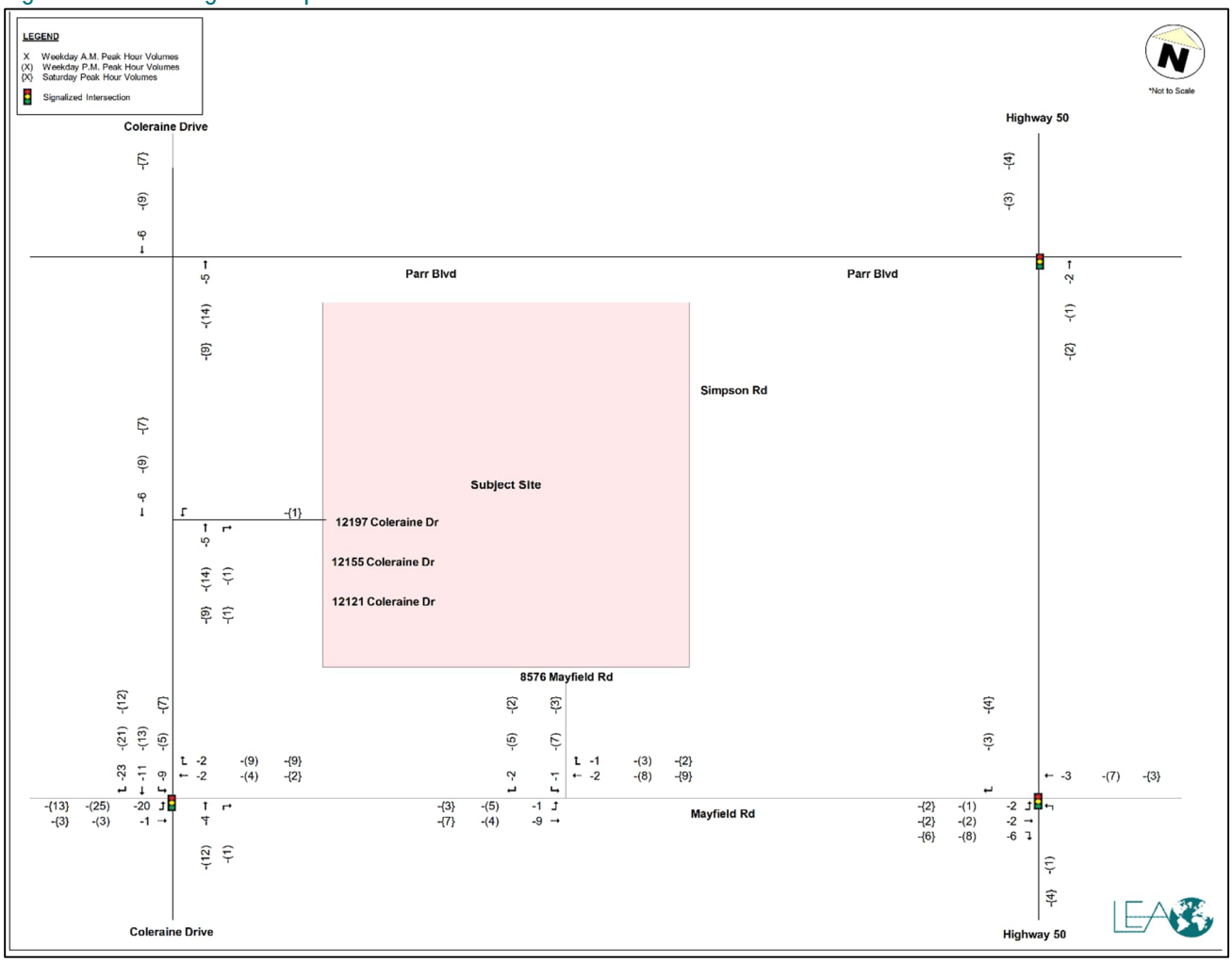
Direction From/To	Expected Route	Weekday AM/PM/Saturday Peak Hour	
		In	Out
North	Albion Vaughan Road	12%	4%
	Coleraine Drive	26%	36%
	Highway 50	4%	5%
South	Highway 50	23%	19%
West	Mayfield Road	35%	36%
	TOTAL	**100%**	**100%**

The existing trips on-site were removed based on existing trip patterns. 12197 Coleraine Drive was surveyed and removed accordingly based on observed traffic volumes. 12155 Coleraine Drive trips were derived from the video footage at 12197 Coleraine Drive. The driveway trips for 12121 Coleraine Drive and 8576 Mayfield Road were determined based on the trip drop-off between the intersection of Coleraine Drive & Mayfield Road to 12155 Coleraine Drive. Inbound/Outbound trip proportions at this driveway were assumed to match neighboring driveways due to the similar land uses. Table 5-4 summarizes the trips removed and Figure 5-1 illustrates the trips removed on the road network.

Table 5-4: Existing Trips Removal

Existing Trips Removal (Vehicle + Trucks)									
Address	Weekday AM Peak Hour			Weekday PM Peak Hour			Weekday Sat Peak Hour		
	In	Out	Total	In	Out	Total	In	Out	Total
12197 Coleraine Dr, Caledon	-0	-0	-0	-1	-0	-1	-1	-1	-2
12155 Coleraine Dr, Caledon	-14	-18	-32	-20	-31	-51	-16	-13	-29
12121 Coleraine Dr, Caledon	-18	-30	-48	-32	-20	-52	-12	-14	-26
8576 Mayfield Rd, Bolton	-2	-3	-5	-8	-12	-20	-5	-5	-10
Sum	**-34**	**-51**	**-85**	**-61**	**-63**	**-124**	**-34**	**-33**	**-67**

Figure 5-1: Existing Site Trip Removal



The site generated traffic volumes for the weekday AM, PM and Saturday peak hours for auto trips are illustrated in Figure 5-2 and the site generated truck trips are illustrated in Figure 5-3.

Figure 5-2: Total Site-Generated Auto Peak Hour Traffic Volumes

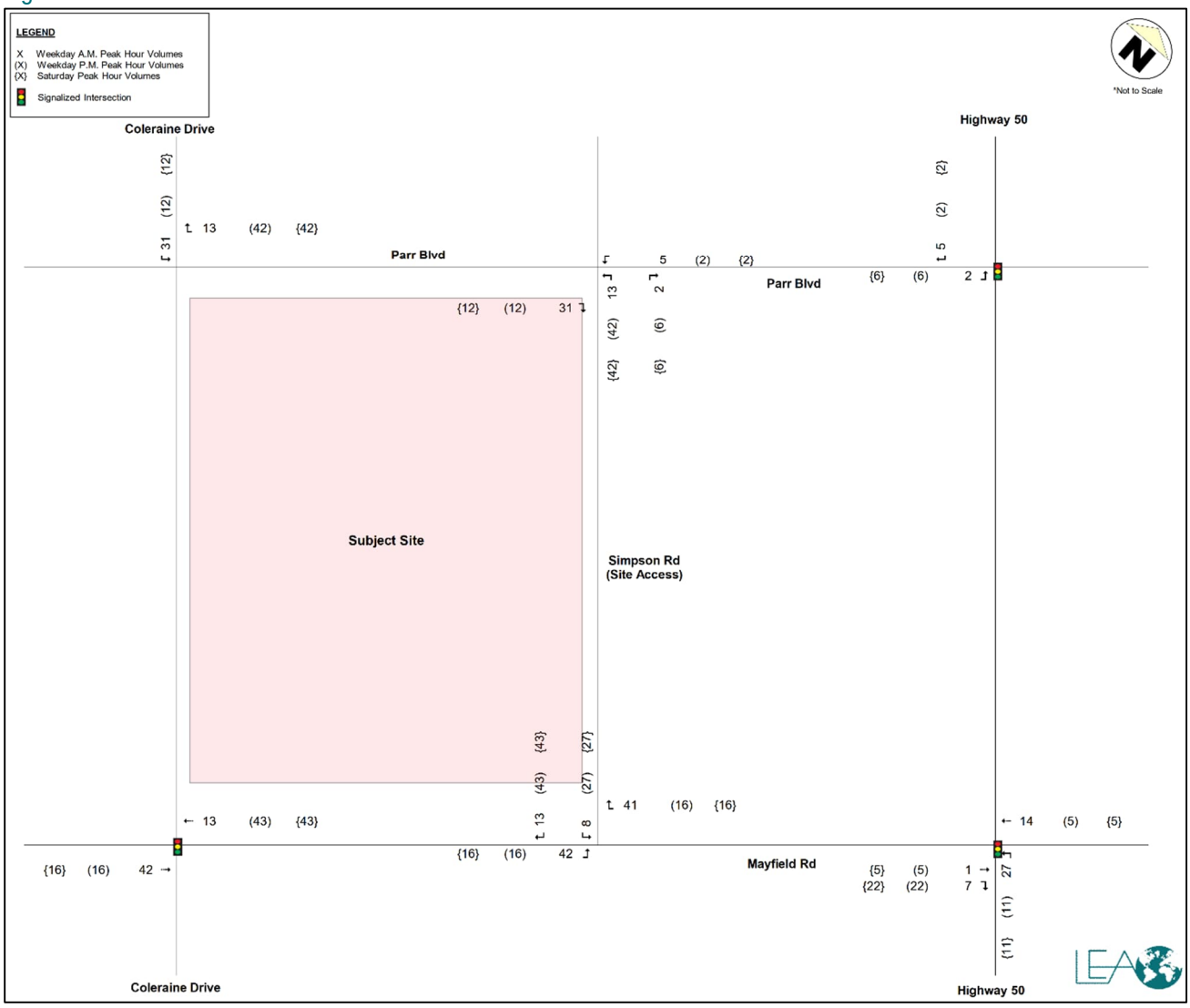
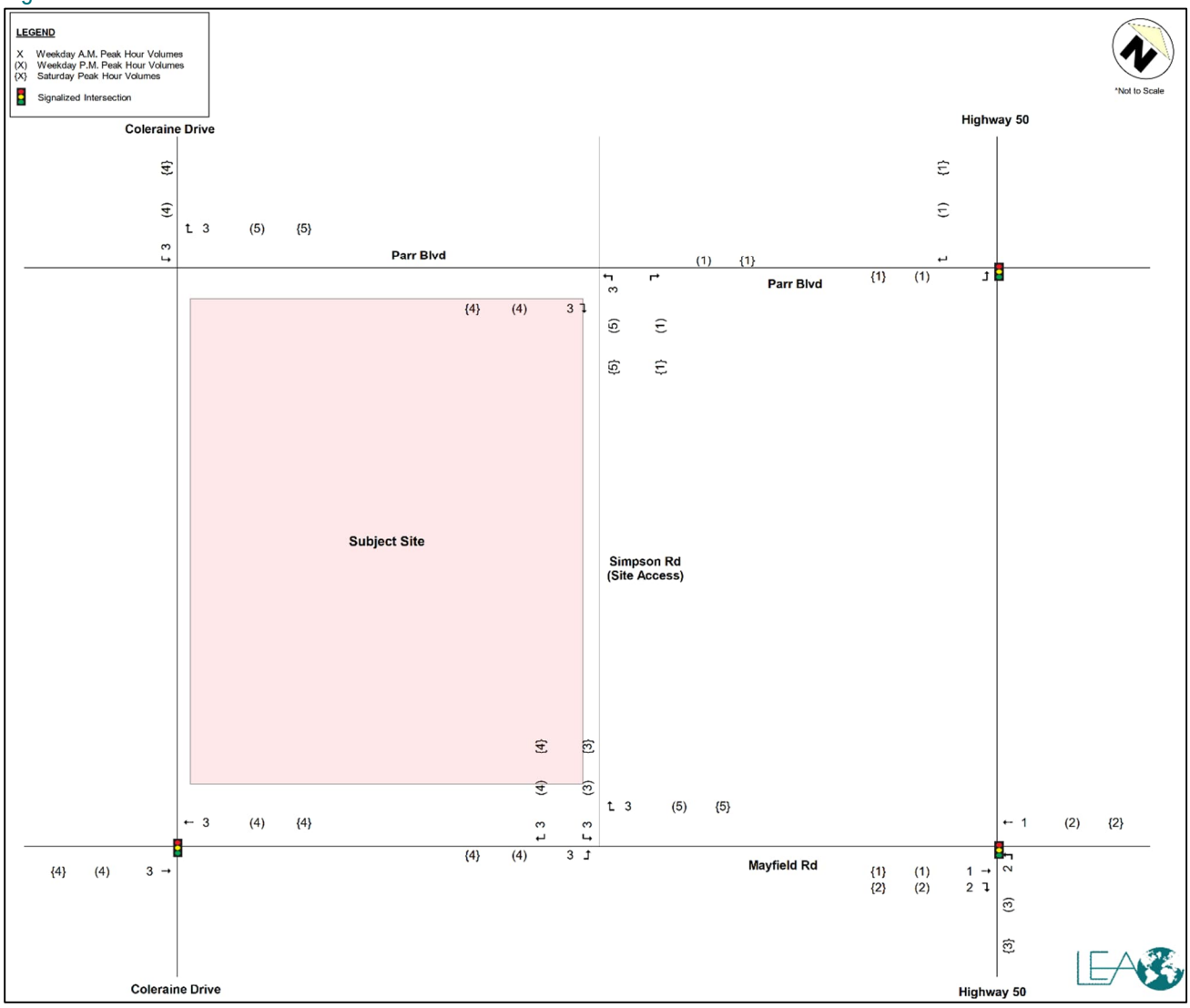


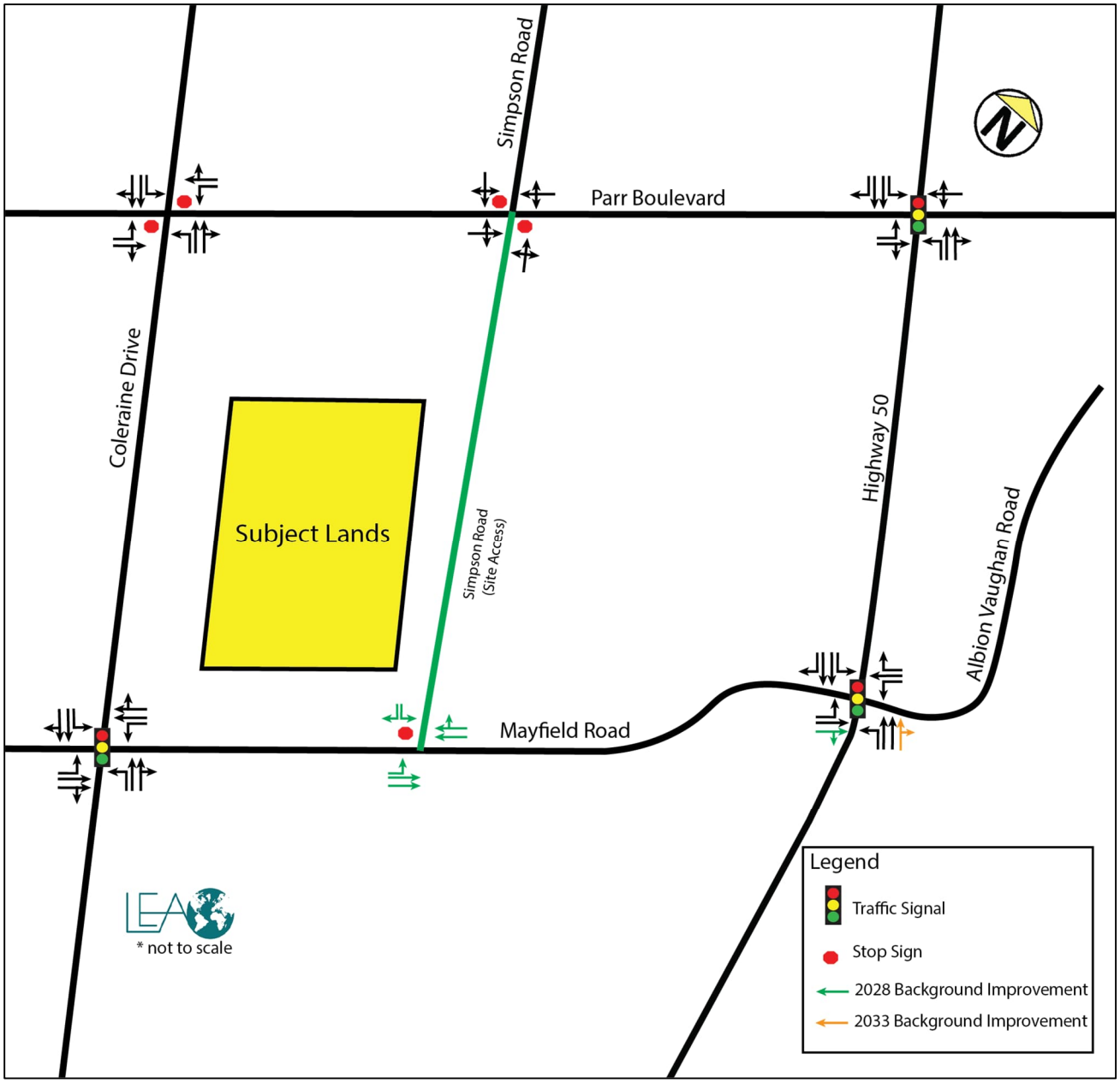
Figure 5-3: Total Site Generated Truck Peak Hour Traffic Volumes



6 FUTURE TOTAL TRANSPORTATION CONDITIONS

Future total traffic conditions include the addition of site trips to the 2028 and 2033 future background volumes. Changes noted under future background conditions were maintained in the future total analysis. As requested by the Region, the Simpson Road extension was included as part of the future analysis. The future road network configuration in 2033 is illustrated below in Figure 6-1.

Figure 6-1: Future Road Network



6.1 FUTURE TOTAL TRAFFIC VOLUMES

The future total traffic volumes for the weekday AM, PM and Saturday peak hours under the 2028 and 2033 horizon years are illustrated in Figure 6-2 and Figure 6-3, respectively.

Figure 6-2: 2028 Future Total Peak Hour Traffic Volumes

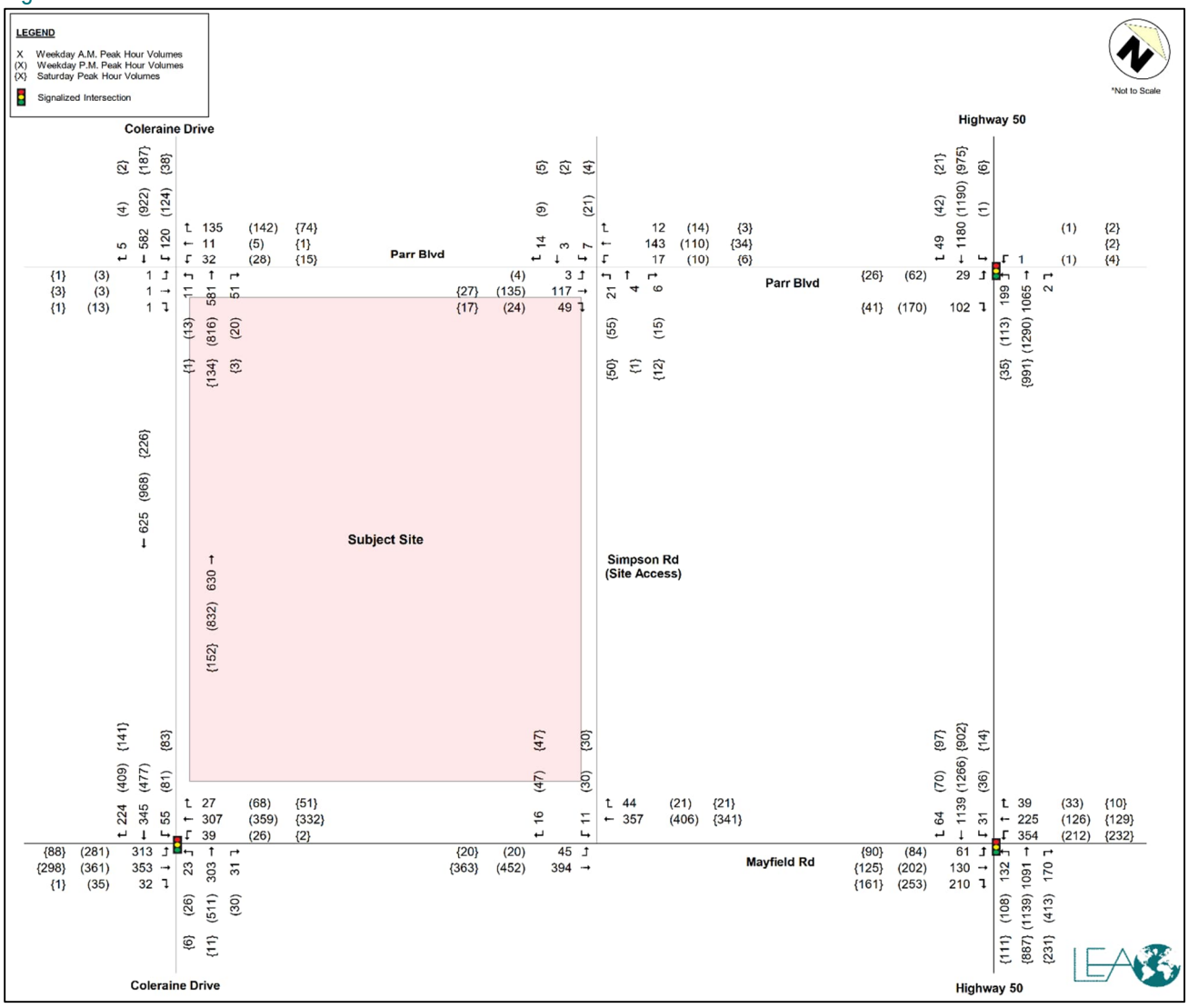
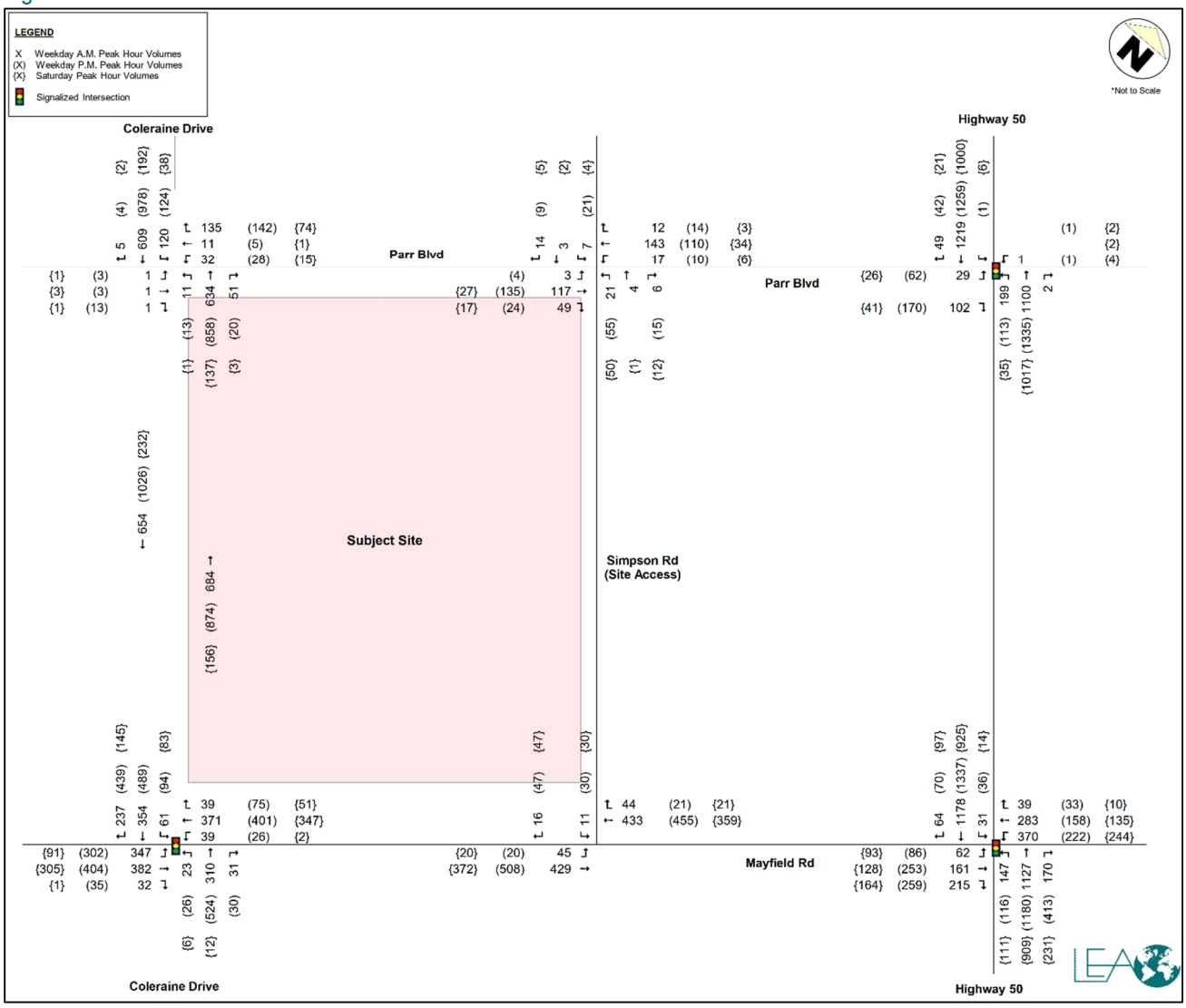


Figure 6-3: 2033 Future Total Peak Hour Traffic Volumes



7 INTERSECTION CAPACITY ANALYSIS

The intersection capacity analysis was undertaken using Synchro 11.0, which is based on the Highway Capacity Manual (2000) methodology and adheres to the Town of Caledon's Transportation Impact Studies Terms of Reference and Guidelines (2017). HCM 2000 and 6 results are presented for signalized and unsignalized study intersections, respectively.

As per the Town of Caledon guidelines, critical movements of interest for signalized intersections were identified as those with a volume-to-capacity (v/c) ratio greater than 0.90 for overall intersection operations, through movements or shared through/turning movements and a v/c ratio greater than 1.00 for exclusive turning movements. For unsignalized intersections, critical movements were identified as those with a level-of-service (LOS) 'E' or greater. LOS definitions are included in Appendix E.

The following sections outline a comparison of the capacity analysis results under existing, future background (2028 and 2033), and future total (2028 and 2033) conditions. The analysis outlines the intersection capacity analysis for signalized and unsignalized intersections. Detailed intersection capacity analysis is provided in the following appendices:

- Appendix F: Existing Intersection Capacity Analysis;
- Appendix G: 2028 and 2033 Future Background Intersection Capacity Analysis; and
- Appendix H: 2028 and 2033 Future Total Intersection Capacity Analysis.

7.1 SYNCHRO MODEL INPUTS AND ASSUMPTIONS

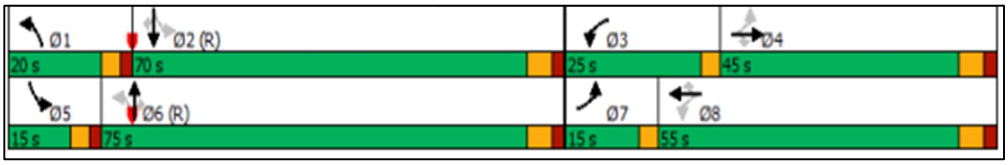
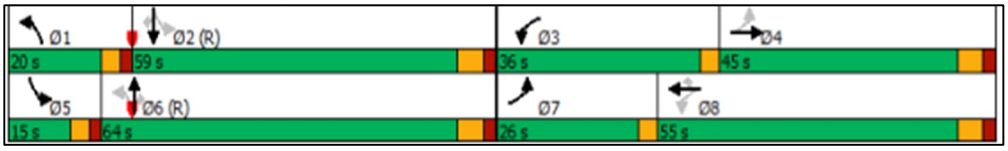
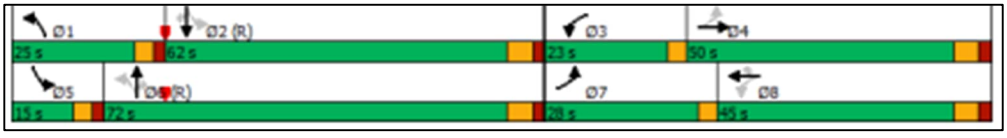
7.1.1 Existing Synchro Model Inputs

Existing traffic operations were assessed to provide a baseline for future traffic operations and identify intersections currently experiencing capacity constraints. The existing analysis incorporates the most recent signal timing plans for the study intersections. Furthermore, as stated by the Region of Peel Synchro guidelines, a peak hour factor (PHF) of 1.00 was utilized.

7.1.2 Future Background Synchro Model Inputs

Input parameters from the existing conditions scenario were maintained with corresponding future background volumes. However, signal timing modifications were made to accommodate capacity constraints identified due to the addition of future background traffic under all horizon years. The existing cycle length of 160 seconds was maintained for each peak hour. The detailed signal timings recommended under future conditions for each horizon year is provided in Table 7-1.

Table 7-1: Recommended Signal Timing Plan Modifications - Mayfield Road/Albion Vaughan Road & Highway 50

Timing Plan	Cycle Length	Timings
AM Peak Hour		
Original	160	
Proposed		
PM Peak Hour		
Original	160	
Proposed		

7.1.3 Future Background Left-Turn Warrant Analysis

At the intersection of Mayfield Drive and the future Simpson Road, an analysis was undertaken to determine if an exclusive eastbound left was warranted.

The Ministry of Transportation of Ontario (MTO) Geometric Design Standard Chapter E has a methodology for determining appropriate storage lengths for left-turn lanes for at-grade intersections. In Appendix B of Chapter E, Figure E8-1 titled "Left turn storage lanes four-lane undivided highways Unsignalized" displays graphically the relationship between opposing volumes and the minimum left-turn volumes to determine the storage lane and length requirements.

Based on the comparison between the opposing volumes and the left-turning volumes, it was determined that a left-turn warrant was met during the AM peak hour. As such, for the future background and future total scenarios, the analysis includes an exclusive eastbound-left movement. A detailed summary of the left-turn warrant analysis is provided in Appendix I.

7.1.4 Future Total Synchro Model Inputs

Input parameters from the existing and future background scenarios were maintained with the corresponding future total volumes.

7.2 SIGNALIZED INTERSECTION CAPACITY ANALYSIS (2028)

The results for the studied signalized intersections under the 2028 horizon year during the weekday AM, PM and Saturday peak hours are summarized in the sections below.

7.2.1 Coleraine Drive and Mayfield Road

The intersection capacity analysis results at Coleraine Drive and Mayfield Road during the AM, PM and Saturday peak hours are summarized in Table 7-2.

Table 7-2: Coleraine Drive and Mayfield Road Intersection Capacity Analysis

AM	Existing Conditions (2023)				Future Background (2028)				Future Total (2028)			
Mvmt	Vol	V/C	Delay (LOS)	Queue 50th (95th)	Vol	V/C	Delay (LOS)	Queue 50th (95th)	Vol	V/C	Delay (LOS)	Queue 50th (95th)
Overall	**-**	**0.51**	**31 (C)**	**-**	**-**	**0.57**	**31 (C)**	**-**	**-**	**0.52**	**30 (C)**	**-**
EBL	310	0.43	10 (B)	31 (55)	333	0.50	11 (B)	34 (60)	313	0.45	10 (B)	30 (55)
EBTR	299	0.15	9 (A)	15 (25)	341	0.17	9 (A)	18 (29)	385	0.19	9 (A)	20 (33)
WBL	39	0.08	16 (B)	5 (14)	39	0.08	17 (B)	6 (14)	39	0.09	16 (B)	5 (14)
WBTR	226	0.15	17 (B)	16 (26)	322	0.21	18 (B)	25 (38)	334	0.21	17 (B)	25 (39)
NBL	23	0.19	50 (D)	6 (14)	23	0.22	50 (D)	6 (15)	23	0.21	50 (D)	6 (14)
NBTR	330	0.66	56 (E)	44 (59)	338	0.67	56 (E)	46 (60)	334	0.67	56 (E)	45 (60)
SBL	64	0.47	43 (D)	13 (24)	64	0.47	42 (D)	13 (24)	55	0.42	42 (D)	12 (21)
SBTR	512	0.61	45 (D)	57 (70)	603	0.65	46 (D)	60 (75)	569	0.62	46 (D)	57 (71)
PM	**Existing Conditions (2023)**				**Future Background (2028)**				**Future Total (2028)**			
Mvmt	Vol	V/C	Delay (LOS)	Queue 50th (95th)	Vol	V/C	Delay (LOS)	Queue 50th (95th)	Vol	V/C	Delay (LOS)	Queue 50th (95th)
Overall	**-**	**0.61**	**37 (D)**	**-**	**-**	**0.70**	**37 (D)**	**-**	**-**	**0.65**	**35 (D)**	**-**
EBL	265	0.48	13 (B)	31 (51)	306	0.59	16 (B)	37 (59)	281	0.54	14 (B)	33 (53)
EBTR	283	0.14	11 (B)	16 (25)	379	0.19	12 (B)	23 (34)	396	0.20	12 (B)	24 (35)
WBL	26	0.06	17 (B)	4 (10)	26	0.06	18 (B)	4 (10)	26	0.06	18 (B)	4 (10)
WBTR	333	0.23	19 (B)	24 (35)	393	0.28	20 (C)	31 (43)	427	0.29	20 (C)	35 (47)
NBL	26	0.45	52 (D)	6 (17)	26	0.51	55 (D)	6 (19)	26	0.51	54 (D)	6 (19)
NBTR	541	0.81	58 (E)	73 (91)	554	0.82	58 (E)	75 (94)	541	0.76	54 (D)	73 (91)
SBL	86	0.54	40 (D)	17 (29)	86	0.55	40 (D)	17 (29)	81	0.53	39 (D)	16 (27)
SBTR	857	0.78	47 (D)	92 (112)	920	0.83	49 (D)	100 (122)	886	0.80	47 (D)	95 (116)
Sat	**Existing Conditions (2023)**				**Future Background (2028)**				**Future Total (2028)**			
Mvmt	Vol	V/C	Delay (LOS)	Queue 50th (95th)	Vol	V/C	Delay (LOS)	Queue 50th (95th)	Vol	V/C	Delay (LOS)	Queue 50th (95th)
Overall	**-**	**0.23**	**16 (B)**	**-**	**-**	**0.24**	**16 (B)**	**-**	**-**	**0.24**	**15 (B)**	**-**
EBL	99	0.16	6 (A)	4 (11)	101	0.16	6 (A)	4 (12)	88	0.14	6 (A)	3 (10)
EBTR	275	0.12	6 (A)	7 (15)	282	0.12	6 (A)	7 (16)	299	0.13	6 (A)	8 (17)
WBL	2	0.01	9 (A)	0 (1)	2	0.01	9 (A)	0 (1)	2	0.01	8 (A)	0 (1)
WBTR	333	0.17	10 (A)	12 (24)	347	0.17	10 (A)	12 (26)	383	0.19	10 (A)	14 (28)
NBL	6	0.07	49 (D)	1 (5)	6	0.07	49 (D)	1 (5)	6	0.07	49 (D)	1 (5)
NBTR	11	0.05	48 (D)	1 (4)	11	0.05	48 (D)	1 (4)	11	0.05	48 (D)	1 (4)
SBL	90	0.45	41 (D)	19 (31)	90	0.45	41 (D)	19 (31)	83	0.41	41 (D)	17 (29)
SBTR	149	0.05	38 (D)	0 (0)	153	0.05	38 (D)	0 (0)	141	0.05	38 (D)	0 (0)

Existing Conditions: The signalized intersection operates within capacity, with acceptable delays and an overall LOS of 'D' or better during the weekday AM, PM, and Saturday peak hours. No critical movements have been identified.

Future Background Conditions: Volumes from the background development traffic and growth are expected to minorly increase delays and v/c ratios, however, the signalized intersection continues to operate within capacity, with acceptable delays and an overall LOS of 'D' or better during the weekday AM, PM, and Saturday peak hours. No critical movements have been identified.

Future Total Conditions: Minor increases in delay and v/c ratio are expected under future total conditions compared to future background conditions during the AM, PM, and Saturday peak hours. Overall, the intersection is expected to operate under acceptable conditions.

7.2.2 Highway 50 and Parr Boulevard

The intersection capacity analysis results at Highway 50 and Parr Boulevard during the AM, PM and Saturday peak hours are summarized in Table 7-3.

Table 7-3: Highway 50 and Parr Boulevard Intersection Capacity Analysis

AM	Existing Conditions (2023)				Future Background (2028)				Future Total (2028)			
Mvmt	Vol	V/C	Delay (LOS)	Queue 50th (95th)	Vol	V/C	Delay (LOS)	Queue 50th (95th)	Vol	V/C	Delay (LOS)	Queue 50th (95th)
Overall	-	**0.51**	**9 (A)**	-	-	**0.53**	**9 (A)**	-	-	**0.53**	**9 (A)**	-
EBL	27	0.28	54 (D)	7 (16)	27	0.28	54 (D)	7 (16)	29	0.29	54 (D)	7 (17)
EBTR	102	0.09	52 (D)	0 (1)	102	0.09	52 (D)	0 (4)	102	0.09	52 (D)	0 (4)
WBLTR	1	0.01	52 (D)	0 (2)	1	0.01	52 (D)	0 (2)	1	0.01	51 (D)	0 (2)
NBL	199	0.52	5 (A)	6 (12)	199	0.54	6 (A)	6 (12)	199	0.54	6 (A)	6 (12)
NBTR	1016	0.37	3 (A)	26 (38)	1069	0.39	3 (A)	28 (41)	1067	0.39	3 (A)	28 (42)
SBL	0	-	-	-	0	-	-	-	0	-	-	-
SBT	1118	0.50	9 (A)	56 (89)	1180	0.54	10 (A)	63 (100)	1180	0.54	10 (A)	63 (101)
SBR	44	0.03	2 (A)	0 (3)	44	0.03	2 (A)	0 (3)	48	0.03	2 (A)	0 (3)
PM	**Existing Conditions (2023)**				**Future Background (2028)**				**Future Total (2028)**			
Mvmt	Vol	V/C	Delay (LOS)	Queue 50th (95th)	Vol	V/C	Delay (LOS)	Queue 50th (95th)	Vol	V/C	Delay (LOS)	Queue 50th (95th)
Overall	-	**0.48**	**10 (A)**	-	-	**0.50**	**10 (A)**	-	-	**0.50**	**10 (B)**	-
EBL	55	0.46	55 (D)	13 (26)	55	0.46	55 (D)	13 (26)	62	0.50	55 (D)	15 (29)
EBTR	170	0.11	51 (D)	0 (17)	170	0.20	52 (D)	3 (24)	170	0.19	51 (D)	3 (24)
WBLTR	2	0.00	50 (D)	0 (0)	2	0.00	50 (D)	0 (0)	2	0.00	49 (D)	0 (0)
NBL	113	0.32	4 (A)	4 (9)	113	0.38	5 (A)	4 (9)	113	0.38	5 (A)	4 (10)
NBTR	1244	0.47	4 (A)	41 (63)	1291	0.48	5 (A)	43 (66)	1290	0.49	5 (A)	44 (69)
SBL	1	0.00	5 (A)	0 (1)	1	0.00	5 (A)	0 (1)	1	0.00	5 (A)	0 (1)
SBT	1032	0.41	7 (A)	47 (72)	1193	0.48	8 (A)	59 (89)	1190	0.48	8 (A)	60 (91)
SBR	39	0.03	2 (A)	0 (3)	39	0.03	2 (A)	0 (3)	42	0.03	3 (A)	0 (3)

Sat	Existing Conditions (2023)				Future Background (2028)				Future Total (2028)			
Mvmt	Vol	V/C	Delay (LOS)	Queue 50th (95th)	Vol	V/C	Delay (LOS)	Queue 50th (95th)	Vol	V/C	Delay (LOS)	Queue 50th (95th)
Overall	**-**	**0.35**	**5 (A)**	**-**	**-**	**0.35**	**5 (A)**	**-**	**-**	**0.36**	**5 (A)**	**-**
EBL	19	0.22	51 (D)	4 (12)	19	0.22	51 (D)	4 (12)	26	0.30	52 (D)	6 (15)
EBTR	41	0.03	49 (D)	0 (0)	41	0.03	49 (D)	0 (0)	41	0.03	48 (D)	0 (0)
WBLTR	8	0.10	50 (D)	1 (7)	8	0.10	50 (D)	1 (7)	8	0.10	49 (D)	1 (6)
NBL	35	0.08	2 (A)	1 (3)	35	0.09	2 (A)	1 (3)	35	0.09	2 (A)	1 (3)
NBTR	969	0.34	3 (A)	24 (32)	993	0.35	3 (A)	24 (33)	991	0.35	3 (A)	24 (36)
SBL	6	0.02	3 (A)	0 (2)	6	0.02	3 (A)	0 (2)	6	0.02	3 (A)	0 (2)
SBT	955	0.35	5 (A)	36 (50)	979	0.36	5 (A)	38 (51)	975	0.36	5 (A)	37 (53)
SBR	18	0.01	2 (A)	0 (1)	18	0.01	2 (A)	0 (1)	21	0.01	2 (A)	0 (1)

Existing Conditions: The signalized intersection operates within capacity, with acceptable delays and an overall LOS of 'A' during the weekday AM, PM, and Saturday peak hours. No critical movements have been identified.

Future Background Conditions: Volumes from the background development traffic and growth are expected to minorly increase delays and v/c ratios, however, the signalized intersection continues to operate within capacity, with acceptable delays and an overall LOS of 'A' during the weekday AM, PM, and Saturday peak hours. No critical movements have been identified.

Future Total Conditions: Minor increases in delay and v/c ratio are expected under future total conditions compared to future background conditions during the AM, PM, and Saturday peak hours. Overall, the intersection is expected to operate under acceptable conditions.

7.2.3 Highway 50 & Mayfield Road/Albion Vaughan Road

The intersection capacity analysis results at Highway 50 and Mayfield Road/Albion Vaughan Road during the AM, PM and Saturday peak hours are summarized in Table 7-4. As mentioned in Section 7.1.2, the signal timing plan was optimized during the AM and PM peak hour for the future scenarios.

Table 7-4: Highway 50 and Mayfield Road/Albion Vaughan Road Intersection Capacity Analysis

AM	Existing Conditions (2023)				Future Background (2028 - Optimized)				Future Total (2028 - Optimized)			
Mvmt	Vol	V/C	Delay (LOS)	Queue 50th (95th)	Vol	V/C	Delay (LOS)	Queue 50th (95th)	Vol	V/C	Delay (LOS)	Queue 50th (95th)
Overall	**-**	**0.71**	**35 (C)**	**-**	**-**	**0.84**	**45 (D)**	**-**	**-**	**0.86**	**46 (D)**	**-**
EBL	61	0.29	59 (E)	16 (26)	63	0.31	60 (E)	14 (24)	61	0.30	60 (E)	14 (24)
EBT	93	0.58	73 (E)	31 (48)	337	0.71	79 (E)	27 (44)	340	0.72	79 (E)	28 (45)
EBR	202	0.38	69 (E)	6 (37)	-	-	-	-	-	-	-	-
WBL	298	0.89	78 (E)	90 (114)	354	**0.96**	**83 (F)**	**99 (145)**	**354**	**0.96**	**84 (F)**	**99 (147)**
WBT	140	0.40	57 (E)	43 (62)	213	0.47	51 (D)	62 (85)	225	0.49	51 (D)	66 (90)
WBR	12	0.01	52 (D)	0 (0)	39	0.03	45 (D)	0 (1)	39	0.03	45 (D)	0 (1)
NBL	83	0.41	16 (B)	9 (20)	103	0.54	-	14 (31)	132	0.60	29 (C)	19 (44)
NBT	1064	0.55	21 (C)	115 (158)	1091	0.65	30 (C)	141 (186)	1091	0.65	30 (C)	140 (186)
NBR	165	0.13	15 (B)	4 (18)	170	0.15	21 (C)	8 (26)	170	0.15	21 (C)	8 (26)
SBL	22	0.09	15 (B)	2 (7)	31	0.14	21 (C)	4 (10)	31	0.14	22 (C)	4 (10)
SBT	1087	0.64	27 (C)	122 (187)	1139	0.79	-	167 (254)	1139	0.83	45 (D)	176 (263)
SBR	64	0.04	17 (B)	0 (3)	64	0.04	24 (C)	0 (3)	64	0.04	25 (C)	0 (3)

PM	Existing Conditions (2023)				Future Background (2028 - Optimized)				Future Total (2028 - Optimized)			
Mvmt	Vol	V/C	Delay (LOS)	Queue 50th (95th)	Vol	V/C	Delay (LOS)	Queue 50th (95th)	Vol	V/C	Delay (LOS)	Queue 50th (95th)
Overall	**-**	**0.61**	**29 (C)**	**-**	**-**	**0.75**	**37 (D)**	**-**	**-**	**0.77**	**37 (D)**	**-**
EBL	83	0.33	59 (E)	22 (37)	85	0.30	55 (D)	21 (34)	84	0.29	54 (D)	21 (33)
EBT	105	0.62	77 (E)	35 (55)	435	0.75	76 (E)	44 (62)	455	0.76	76 (E)	47 (65)
EBR	231	0.18	67 (E)	0 (29)	-	-	-	-	-	-	-	-
WBL	193	0.74	66 (E)	56 (79)	212	**0.89**	**82 (F)**	**58 (89)**	**212**	**0.89**	**82 (F)**	**58 (89)**
WBT	84	0.49	67 (E)	27 (46)	126	0.50	61 (E)	38 (60)	126	0.48	60 (E)	38 (59)
WBR	17	0.01	61 (E)	0 (0)	33	0.02	54 (D)	0 (0)	33	0.02	54 (D)	0 (0)
NBL	86	0.41	14 (B)	9 (17)	95	0.54	-	11 (27)	108	0.58	26 (C)	13 (33)
NBT	1111	0.55	18 (B)	113 (147)	1139	0.62	24 (C)	135 (178)	1139	0.63	25 (C)	136 (180)
NBR	378	0.29	14 (B)	11 (32)	413	0.33	19 (B)	17 (46)	413	0.33	19 (B)	17 (46)
SBL	20	0.08	13 (B)	2 (5)	36	0.15	16 (B)	4 (10)	36	0.15	17 (B)	4 (10)
SBT	1119	0.57	23 (C)	118 (170)	1266	0.70	-	163 (234)	1266	0.71	32 (C)	168 (240)
SBR	73	0.05	15 (B)	0 (0)	73	0.05	18 (B)	0 (0)	70	0.04	19 (B)	0 (0)
SAT	Existing Conditions (2023)				Future Background (2028)				Future Total (2028)			
Mvmt	Vol	V/C	Delay (LOS)	Queue 50th (95th)	Vol	V/C	Delay (LOS)	Queue 50th (95th)	Vol	V/C	Delay (LOS)	Queue 50th (95th)
Overall	**-**	**0.52**	**29 (C)**	**-**	**-**	**0.55**	**30 (C)**	**-**	**-**	**0.56**	**30 (C)**	**-**
EBL	90	0.35	58 (E)	23 (37)	92	0.39	60 (E)	25 (39)	90	0.38	60 (E)	24 (39)
EBT	118	0.65	77 (E)	39 (60)	264	0.53	72 (E)	21 (37)	286	0.54	72 (E)	22 (38)
EBR	139	0.11	66 (E)	0 (22)	-	-	-	-	-	-	-	-
WBL	221	0.71	59 (E)	62 (85)	232	0.85	76 (E)	68 (96)	232	0.88	80 (F)	68 (100)
WBT	119	0.43	62 (E)	36 (58)	125	0.51	65 (E)	39 (62)	129	0.52	65 (E)	41 (64)
WBR	10	0.01	57 (E)	0 (0)	10	0.01	59 (E)	0 (0)	10	0.01	59 (E)	0 (0)
NBL	101	0.29	12 (B)	11 (21)	101	0.29	11 (B)	10 (19)	111	0.32	11 (B)	11 (21)
NBT	865	0.41	17 (B)	64 (110)	887	0.41	15 (B)	61 (108)	887	0.41	16 (B)	62 (108)
NBR	231	0.16	14 (B)	0 (14)	231	0.16	13 (B)	0 (14)	231	0.16	13 (B)	0 (14)
SBL	14	0.04	13 (B)	2 (5)	14	0.04	12 (B)	1 (4)	14	0.04	13 (B)	1 (4)
SBT	880	0.44	20 (C)	86 (116)	902	0.44	19 (B)	84 (113)	902	0.44	19 (B)	84 (115)
SBR	101	0.06	15 (B)	0 (8)	101	0.06	14 (B)	0 (8)	97	0.06	14 (B)	0 (7)

Existing Conditions: The signalized intersection operates within capacity, with acceptable delays and an overall LOS of 'C' during the weekday AM, PM, and Saturday peak hours. No critical movements have been identified.

Future Background Conditions: Volumes from the background development traffic and growth are expected to increase delays and v/c ratios, and the westbound left movement is expected to operate above capacity. With signal optimization, the westbound left is expected to operate with a V/C ratio of 0.96 and delay of 83 seconds during the AM peak hour, and a V/C ratio of 0.89 and delay of 82 seconds during the PM peak hour. This is a result of background traffic. During the Saturday peak hour, all movements are expected to operate sufficiently and within capacity.

Future Total Conditions: Similar to future background conditions, with signal optimization, the westbound left movement is expected to operate with a V/C ratio of 0.96 and delay of 84 seconds during the AM peak hour and a V/C ratio of 0.89 and delay of 82 seconds during the PM peak hour. This is not a result of the proposed development; however, it is expected that this movement can sufficiently progress through the intersection within one (1) cycle. During Saturday peak hours, all movements are expected to operate sufficiently and within capacity. Overall, with a result of the added site traffic, the intersection is expected to operate sufficiently in the future with the optimized signal timing plan.

7.3 UNSIGNALIZED INTERSECTION CAPACITY ANALYSIS (2028)

The results for the studied unsignalized intersections under the 2028 horizon year during the weekday AM, PM and Saturday peak hours are summarized in the sections below.

7.3.1 Coleraine Drive and Parr Boulevard

The intersection capacity analysis results at Coleraine Drive and Parr Boulevard during the AM, PM and Saturday peak hours are summarized in Table 7-5.

Table 7-5: Coleraine Drive and Parr Boulevard Intersection Capacity Analysis

AM	Existing Conditions (2023)				Future Background (2028)				Future Total (2028)			
Mvmt	Vol	V/C	Delay (LOS)	Queue 95th	Vol	V/C	Delay (LOS)	Queue 95th	Vol	V/C	Delay (LOS)	Queue 95th
EBL	1	0.00	18 (C)	0	1	0.00	19 (C)	0	1	0.00	22 (C)	0
EBTR	2	0.00	13 (B)	0	2	0.00	14 (B)	0	2	0.01	15 (B)	0
WBL	32	0.10	17 (C)	3	32	0.10	18 (C)	3	32	0.11	19 (C)	3
WBTR	130	0.23	13 (B)	7	130	0.24	14 (B)	7	146	0.27	14 (B)	9
NBL	11	0.01	9 (A)	0	11	0.01	9 (A)	0	11	0.01	9 (A)	0
NBT	380	0.22	0 (A)	0	391	0.23	0 (A)	0	387	0.23	0 (A)	0
NBTR	241	0.14	0 (A)	0	246	0.14	0 (A)	0	245	0.14	0 (A)	0
SBL	86	0.10	10 (A)	3	86	0.11	10 (A)	3	120	0.14	10 (A)	4
SBT	331	0.19	0 (A)	0	392	0.23	0 (A)	0	388	0.23	0 (A)	0
SBTR	171	0.10	0 (A)	0	201	0.12	0 (A)	0	199	0.12	0 (A)	0
PM	Existing Conditions (2023)				Future Background (2028)				Future Total (2028)			
Mvmt	Vol	V/C	Delay (LOS)	Queue 95th	Vol	V/C	Delay (LOS)	Queue 95th	Vol	V/C	Delay (LOS)	Queue 95th
EBL	3	0.02	27 (D)	0	3	0.02	29 (D)	1	3	0.02	33 (D)	1
EBTR	16	0.05	16 (C)	1	16	0.05	16 (C)	1	16	0.05	17 (C)	1
WBL	28	0.13	25 (C)	4	28	0.14	26 (D)	4	28	0.14	27 (D)	4
WBTR	100	0.21	15 (B)	6	100	0.22	15 (C)	7	147	0.30	16 (C)	10
NBL	13	0.03	14 (B)	1	13	0.03	15 (B)	1	13	0.03	15 (B)	1
NBT	537	0.32	0 (A)	0	553	0.33	0 (A)	0	544	0.32	0 (A)	0
NBTR	288	0.17	0 (A)	0	297	0.17	0 (A)	0	292	0.17	0 (A)	0
SBL	108	0.14	11 (B)	4	108	0.15	11 (B)	4	124	0.17	11 (B)	5
SBT	579	0.34	0 (A)	0	621	0.37	0 (A)	0	615	0.36	0 (A)	0
SBTR	293	0.17	0 (A)	0	314	0.18	0 (A)	0	311	0.18	0 (A)	0

SAT	Existing Conditions (2023)				Future Background (2028)				Future Total (2028)			
Mvmt	Vol	V/C	Delay (LOS)	Queue 95th	Vol	V/C	Delay (LOS)	Queue 95th	Vol	V/C	Delay (LOS)	Queue 95th
EBL	1	0.00	10 (B)	0	1	0.00	10 (B)	0	1	0.00	11 (B)	0
EBTR	4	0.01	10 (B)	0	4	0.01	10 (B)	0	4	0.01	10 (B)	0
WBL	15	0.02	10 (A)	1	15	0.02	10 (B)	1	15	0.02	10 (B)	1
WBTR	28	0.03	9 (A)	1	28	0.03	9 (A)	1	75	0.08	9 (A)	2
NBL	1	0.00	8 (A)	0	1	0.00	8 (A)	0	1	0.00	8 (A)	0
NBT	93	0.05	0 (A)	0	95	0.06	0 (A)	0	89	0.05	0 (A)	0
NBTR	49	0.03	0 (A)	0	51	0.03	0 (A)	0	48	0.03	0 (A)	0
SBL	22	0.02	8 (A)	0	22	0.02	8 (A)	0	38	0.03	8 (A)	1
SBT	126	0.07	0 (A)	0	129	0.08	0 (A)	0	125	0.07	0 (A)	0
SBTR	65	0.04	0 (A)	0	67	0.04	0 (A)	0	64	0.04	0 (A)	0

No capacity constraints have been identified as all movements have available capacity and experience a LOS of 'D' or better under existing and future scenarios during the AM, PM and Saturday peak hours. Site traffic has a negligible impact on intersection operation.

7.3.2 Simpson Road and Parr Boulevard

The intersection capacity analysis results at Simpson Road and Parr Boulevard during the AM, PM and Saturday peak hours are summarized in Table 7-6.

Table 7-6: Simpson Road and Parr Boulevard Intersection Capacity Analysis

AM	Existing Conditions (2023)				Future Background (2028)				Future Total (2028)			
Mvmt	Vol	V/C	Delay (LOS)	Queue 95th	Vol	V/C	Delay (LOS)	Queue 95th	Vol	V/C	Delay (LOS)	Queue 95th
EBLTR	3	0.00	0 (A)	0	3	0.00	0 (A)	0	3	0.00	0 (A)	0
WBLTR	12	0.01	1 (A)	0	12	0.01	1 (A)	0	17	0.01	1 (A)	0
NBLTR	13	0.02	11 (B)	1	13	0.02	11 (B)	1	31	0.05	12 (B)	1
SBLTR	24	0.04	11 (B)	1	24	0.04	11 (B)	1	24	0.04	11 (B)	1
PM	**Existing Conditions (2023)**				**Future Background (2028)**				**Future Total (2028)**			
Mvmt	Vol	V/C	Delay (LOS)	Queue 95th	Vol	V/C	Delay (LOS)	Queue 95th	Vol	V/C	Delay (LOS)	Queue 95th
EBLTR	4	0.00	0 (A)	0	4	0.00	0 (A)	0	4	0.00	0 (A)	0
WBLTR	7	0.01	1 (A)	0	7	0.01	1 (A)	0	10	0.01	1 (A)	0
NBLTR	16	0.02	10 (B)	1	16	0.02	10 (B)	1	70	0.11	11 (B)	3
SBLTR	30	0.04	10 (B)	1	30	0.04	10 (B)	1	30	0.04	11 (B)	1
SAT	**Existing Conditions (2023)**				**Future Background (2028)**				**Future Total (2028)**			
Mvmt	Vol	V/C	Delay (LOS)	Queue 95th	Vol	V/C	Delay (LOS)	Queue 95th	Vol	V/C	Delay (LOS)	Queue 95th
EBLTR	28	0.00	0 ()	0	28	0.00	0 ()	0	0	0.00	0 ()	0
WBLTR	3	0.00	1 (A)	0	3	0.00	1 (A)	0	6	0.00	1 (A)	0
NBLTR	9	0.01	9 (A)	0	9	0.01	9 (A)	0	63	0.07	9 (A)	2
SBLTR	11	0.01	9 (A)	0	11	0.01	9 (A)	0	11	0.01	9 (A)	0

No capacity constraints have been identified as all movements have available capacity and experience a LOS of 'B' or better under existing and future scenarios during the AM, PM and Saturday peak hours. Site traffic has a negligible impact on intersection operation.

7.3.3 Mayfield Road & 8576 Mayfield Road (The Tow Company Inc.)/Future Site Access

The intersection capacity analysis results at Mayfield Road and 8567 Mayfield Road for the existing and future background scenarios, and Mayfield Road and the future site access via Simpson Road for the future total scenario during the AM, PM and Saturday peak hours are summarized in Table 7-7.

Table 7-7: Mayfield Road & 8576 Mayfield Road (The Tow Company Inc.)/Future Site Access Intersection Capacity Analysis

AM	Existing Conditions (2023) Mayfield Road & 8567 Mayfield Road				Future Background (2028) Mayfield Road & 8567 Mayfield Road				Future Total (2028) Mayfield Road & Future Site Access			
Mvmt	Vol	V/C	Delay (LOS)	Queue 95th	Vol	V/C	Delay (LOS)	Queue 95th	Vol	V/C	Delay (LOS)	Queue 95th
EBL	1	0.00	0 (A)	0	1	0.00	8 (A)	0	45	0.04	8 (A)	1
EBT	361	-	-	-	403	0.12	0 (A)	0	197	0.12	0 (A)	0
WBT	-	-	-	-	239	0.14	0 (A)	0	238	0.14	0 (A)	0
WBTR	264	0.16	0 ()	0	121	0.07	0 (A)	0	163	0.10	0 (A)	0
SBL	1	0.01	12 (B)	0	1	0.01	12 (B)	0	11	0.03	16 (C)	1
SBR	2	0.01	12 (B)	0	2	0.01	12 (B)	0	16	0.02	10 (A)	1
PM	Existing Conditions (2023)				Future Background (2028)				Future Total (2028)			
Mvmt	Vol	V/C	Delay (LOS)	Queue 95th	Vol	V/C	Delay (LOS)	Queue 95th	Vol	V/C	Delay (LOS)	Queue 95th
EBL	5	0.01	0 (A)	0	5	0.01	9 (A)	0	20	0.02	9 (A)	1
EBT	365	0.01	0 (A)	0	456	0.15	0 (A)	0	226	0.13	0 (A)	0
WBT	-	-	-	-	276	0.18	0 (A)	0	271	0.16	0 (A)	0
WBTR	357	0.21	0 (A)	0	141	0.09	0 (A)	0	156	0.09	0 (A)	0
SBL	7	0.03	13 (B)	1	7	0.03	13 (B)	1	30	0.08	15 (C)	2
SBR	5	0.03	13 (B)	1	5	0.03	13 (B)	1	47	0.06	10 (A)	2
SAT	Existing Conditions (2023)				Future Background (2028)				Future Total (2028)			
Mvmt	Vol	V/C	Delay (LOS)	Queue 95th	Vol	V/C	Delay (LOS)	Queue 95th	Vol	V/C	Delay (LOS)	Queue 95th
EBL	3	0.00	0 (A)	0	3	0.00	9 (A)	0	20	0.02	8 (A)	1
EBT	361	0.00	0 (A)	0	370	0.11	0 (A)	0	182	0.11	0 (A)	0
WBT	-	-	-	-	233	0.14	0 (A)	0	227	0.13	0 (A)	0
WBTR	335	0.20	0 (A)	0	119	0.07	0 (A)	0	135	0.08	0 (A)	0
SBL	3	0.01	13 (B)	0	3	0.01	12 (B)	0	30	0.07	14 (B)	2
SBR	5	0.01	13 (B)	0	5	0.01	12 (B)	0	47	0.06	10 (A)	2

No capacity constraints have been identified as all movements have available capacity and experience a LOS of 'C' or better under existing and future scenarios during the AM, PM and Saturday peak hours. Site traffic has a negligible impact on intersection operation. The future unsignalized access is expected to operate sufficiently.

7.3.4 Coleraine Drive and 12155 Coleraine Drive (Babbar Transport Bolton Yard)

The intersection capacity analysis results at Coleraine Drive and 12155 Coleraine Drive (Babbar Transport Bolton Yard) during the AM, PM and Saturday peak hours are summarized in Table 7-8.

Table 7-8: Coleraine Drive and 12133 Coleraine Drive (Babbar Transport Bolton Yard) Intersection Capacity Analysis

AM	Existing Conditions (2023)				Future Background (2028)				Future Total (2028)			
Mvmt	Vol	V/C	Delay (LOS)	Queue 95th	Vol	V/C	Delay (LOS)	Queue 95th	Vol	V/C	Delay (LOS)	Queue 95th
WBLR	0	0.00	0 (A)	0	0	0.00	0 (A)	0	N/A			
NBT	411	0.24	0 (A)	0	423	0.25	0 (A)	0				
NBTR	206	0.12	0 (A)	0	212	0.12	0 (A)	0				
SBLT	180	0.00	0 (A)	0	210	0.00	0 (A)	0				
SBT	359	0.21	0 (A)	0	421	0.25	0 (A)	0				
PM	Existing Conditions (2023)				Future Background (2028)				Future Total (2028)			
Mvmt	Vol	V/C	Delay (LOS)	Queue 95th	Vol	V/C	Delay (LOS)	Queue 95th	Vol	V/C	Delay (LOS)	Queue 95th
WBLR	0	0.00	0 (A)	0	0	0.00	0 (A)	0	N/A			
NBT	547	0.32	0 (A)	0	564	0.33	0 (A)	0				
NBTR	274	0.16	0 (A)	0	283	0.17	0 (A)	0				
SBLT	304	0.00	0 (A)	0	326	0.00	0 (A)	0				
SBT	609	0.36	0 (A)	0	651	0.38	0 (A)	0				
SAT	Existing Conditions (2023)				Future Background (2028)				Future Total (2028)			
Mvmt	Vol	V/C	Delay (LOS)	Queue 95th	Vol	V/C	Delay (LOS)	Queue 95th	Vol	V/C	Delay (LOS)	Queue 95th
WBLR	1	0.00	11 (B)	0	1	0.00	11 (B)	0	N/A			
NBT	105	0.06	0 (A)	0	107	0.06	0 (A)	0				
NBTR	53	0.03	0 (A)	0	55	0.03	0 (A)	0				
SBLT	0	0.00	0 (A)	0	78	0.00	0 (A)	0				
SBT	151	0.09	0 (A)	0	155	0.09	0 (A)	0				

No capacity constraints have been identified as all movements have available capacity and experience a LOS of 'B' or better under existing and future scenarios during the AM, PM and Saturday peak hours. Site traffic has a negligible impact on intersection operation.

7.4 SIGNALIZED INTERSECTION CAPACITY ANALYSIS (2033)

The results for the studied signalized intersections under the 2033 horizon year during the weekday AM, PM and Saturday peak hours are summarized in the sections below.

7.4.1 Coleraine Drive and Mayfield Road

The intersection capacity analysis results at Coleraine Drive and Mayfield Road during the AM, PM and Saturday peak hours are summarized in Table 7-9.

Table 7-9: Coleraine Drive and Mayfield Road Intersection Capacity Analysis

AM	Existing Conditions (2023)				Future Background (2033)				Future Total (2033)			
Mvmt	Vol	V/C	Delay (LOS)	Queue 50th (95th)	Vol	V/C	Delay (LOS)	Queue 50th (95th)	Vol	V/C	Delay (LOS)	Queue 50th (95th)
Overall	**-**	**0.50**	**32 (C)**	**-**	**-**	**0.64**	**31 (C)**	**-**	**-**	**0.59**	**30 (C)**	**-**
EBL	310	0.42	10 (B)	31 (55)	367	0.58	12 (B)	39 (67)	347	0.54	11 (B)	35 (62)
EBTR	299	0.15	9 (A)	15 (25)	370	0.19	10 (A)	20 (32)	414	0.20	10 (A)	22 (35)
WBL	39	0.08	16 (B)	5 (14)	39	0.09	17 (B)	6 (14)	39	0.09	17 (B)	5 (14)
WBTR	197	0.24	18 (B)	30 (51)	398	0.26	19 (B)	32 (47)	410	0.25	18 (B)	32 (48)
NBL	23	0.19	50 (D)	6 (14)	23	0.23	50 (D)	6 (15)	23	0.21	50 (D)	6 (15)
NBTR	330	0.66	56 (E)	44 (59)	345	0.67	56 (E)	47 (61)	341	0.67	56 (E)	46 (61)
SBL	64	0.47	43 (D)	13 (24)	70	0.49	42 (D)	15 (26)	61	0.44	42 (D)	13 (23)
SBTR	512	0.61	45 (D)	57 (70)	625	0.67	46 (D)	62 (78)	591	0.64	46 (D)	59 (73)
PM	**Existing Conditions (2023)**				**Future Background (2033)**				**Future Total (2033)**			
Mvmt	Vol	V/C	Delay (LOS)	Queue 50th (95th)	Vol	V/C	Delay (LOS)	Queue 50th (95th)	Vol	V/C	Delay (LOS)	Queue 50th (95th)
Overall	**-**	**0.60**	**38 (D)**	**-**	**-**	**0.77**	**38 (D)**	**-**	**-**	**0.71**	**36 (D)**	**-**
EBL	265	0.47	14 (B)	31 (51)	327	0.67	19 (B)	41 (64)	302	0.61	16 (B)	36 (58)
EBTR	283	0.14	11 (B)	16 (25)	422	0.21	13 (B)	26 (38)	439	0.22	12 (B)	27 (39)
WBL	26	0.06	17 (B)	4 (10)	26	0.07	18 (B)	4 (10)	26	0.07	18 (B)	4 (10)
WBTR	256	0.32	21 (C)	43 (64)	442	0.31	21 (C)	36 (49)	476	0.32	21 (C)	40 (53)
NBL	26	0.45	52 (D)	6 (17)	26	0.51	55 (D)	6 (19)	26	0.51	55 (D)	6 (19)
NBTR	541	0.81	58 (E)	73 (91)	567	0.82	58 (E)	77 (96)	554	0.82	58 (E)	75 (94)
SBL	86	0.54	40 (D)	17 (29)	99	0.61	42 (D)	19 (33)	94	0.57	40 (D)	18 (31)
SBTR	857	0.78	47 (D)	92 (112)	962	0.86	51 (D)	106 (130)	928	0.83	49 (D)	100 (123)
Sat	**Existing Conditions (2023)**				**Future Background (2033)**				**Future Total (2033)**			
Mvmt	Vol	V/C	Delay (LOS)	Queue 50th (95th)	Vol	V/C	Delay (LOS)	Queue 50th (95th)	Vol	V/C	Delay (LOS)	Queue 50th (95th)
Overall	**-**	**0.29**	**18 (B)**	**-**	**-**	**0.24**	**16 (B)**	**-**	**-**	**0.24**	**15 (B)**	**-**
EBL	99	0.15	6 (A)	4 (11)	104	0.17	6 (A)	4 (12)	91	0.15	6 (A)	4 (11)
EBTR	275	0.12	6 (A)	7 (15)	289	0.12	6 (A)	7 (16)	306	0.13	6 (A)	8 (17)
WBL	2	0.01	9 (A)	0 (1)	2	0.01	9 (A)	0 (1)	2	0.01	8 (A)	0 (1)
WBTR	273	0.25	11 (B)	21 (46)	362	0.18	10 (B)	13 (27)	398	0.19	10 (A)	15 (30)
NBL	6	0.07	49 (D)	1 (5)	6	0.07	49 (D)	1 (5)	6	0.07	49 (D)	1 (5)
NBTR	11	0.05	48 (D)	1 (4)	12	0.05	48 (D)	1 (4)	12	0.05	48 (D)	1 (4)
SBL	90	0.45	41 (D)	19 (31)	90	0.45	41 (D)	19 (31)	83	0.41	41 (D)	17 (29)
SBTR	149	0.05	38 (D)	0 (0)	153	0.05	38 (D)	0 (0)	145	0.05	38 (D)	0 (0)

Existing Conditions: The signalized intersection operates within capacity, with acceptable delays and an overall LOS of 'D' or better during the weekday AM, PM, and Saturday peak hours. No critical movements have been identified.

Future Background Conditions: Volumes from the background development traffic and growth are expected to minorly increase delays and v/c ratios, however, the signalized intersection continues to operate within capacity, with acceptable delays and an overall LOS of 'E' or better during the weekday AM, PM, and Saturday peak hours. No critical movements have been identified.

Future Total Conditions: Minor increases in delay and v/c ratio are expected under future total conditions compared to future background conditions during the AM, PM, and Saturday peak hours. Overall, the intersection is expected to operate under acceptable conditions.

7.4.2 Highway 50 and Parr Boulevard

The intersection capacity analysis results at Highway 50 and Parr Boulevard during the AM, PM and Saturday peak hours are summarized in Table 7-10.

Table 7-10: Highway 50 and Parr Boulevard Intersection Capacity Analysis

AM	Existing Conditions (2023)				Future Background (2033)				Future Total (2033)			
Mvmt	Vol	V/C	Delay (LOS)	Queue 50th (95th)	Vol	V/C	Delay (LOS)	Queue 50th (95th)	Vol	V/C	Delay (LOS)	Queue 50th (95th)
Overall	**-**	**0.51**	**9 (A)**	**-**	**-**	**0.53**	**9 (A)**	**-**	**-**	**0.54**	**9 (A)**	**-**
EBL	27	0.28	54 (D)	7 (16)	27	0.28	54 (D)	7 (16)	29	0.29	54 (D)	7 (17)
EBTR	102	0.09	52 (D)	0 (1)	102	0.09	52 (D)	0 (5)	102	0.09	52 (D)	0 (5)
WBLTR	1	0.01	52 (D)	0 (2)	1	0.01	52 (D)	0 (2)	1	0.01	51 (D)	0 (2)
NBL	199	0.52	5 (A)	6 (12)	199	0.54	7 (A)	6 (13)	199	0.54	7 (A)	6 (13)
NBTR	1016	0.37	3 (A)	26 (38)	1104	0.40	3 (A)	29 (43)	1102	0.40	4 (A)	29 (44)
SBL	0	-	-	-	0	-	-	-	0	-	-	-
SBT	1118	0.50	9 (A)	56 (89)	1219	0.56	11 (B)	70 (108)	1219	0.56	11 (B)	70 (109)
SBR	44	0.03	2 (A)	0 (3)	44	0.03	2 (A)	0 (3)	49	0.03	2 (A)	1 (3)
PM	**Existing Conditions (2023)**				**Future Background (2033)**				**Future Total (2033)**			
Mvmt	Vol	V/C	Delay (LOS)	Queue 50th (95th)	Vol	V/C	Delay (LOS)	Queue 50th (95th)	Vol	V/C	Delay (LOS)	Queue 50th (95th)
Overall	**-**	**0.48**	**10 (A)**	**-**	**-**	**0.51**	**10 (A)**	**-**	**-**	**0.52**	**10 (B)**	**-**
EBL	55	0.46	55 (D)	13 (26)	55	0.45	54 (D)	13 (26)	62	0.50	55 (D)	15 (29)
EBTR	170	0.11	51 (D)	0 (17)	170	0.26	52 (D)	5 (27)	170	0.25	51 (D)	5 (26)
WBLTR	2	0.00	50 (D)	0 (0)	2	0.00	50 (D)	0 (0)	2	0.00	49 (D)	0 (0)
NBL	113	0.32	4 (A)	4 (9)	113	0.40	5 (A)	4 (9)	113	0.40	6 (A)	4 (10)
NBTR	1244	0.47	4 (A)	41 (63)	1336	0.50	5 (A)	45 (72)	1335	0.50	5 (A)	47 (73)
SBL	1	0.00	5 (A)	0 (1)	1	0.00	5 (A)	0 (1)	1	0.00	5 (A)	0 (1)
SBT	1032	0.41	7 (A)	47 (72)	1262	0.51	9 (A)	64 (103)	1259	0.51	9 (A)	65 (102)
SBR	39	0.03	2 (A)	0 (3)	39	0.03	3 (A)	0 (3)	42	0.03	3 (A)	0 (3)

Sat	Existing Conditions (2023)				Future Background (2033)				Future Total (2033)			
Mvmt	Vol	V/C	Delay (LOS)	Queue 50th (95th)	Vol	V/C	Delay (LOS)	Queue 50th (95th)	Vol	V/C	Delay (LOS)	Queue 50th (95th)
Overall	-	**0.35**	**5 (A)**	-	-	**0.36**	**5 (A)**	-	-	**0.37**	**6 (A)**	-
EBL	19	0.22	52 (D)	4 (12)	19	0.22	52 (D)	4 (12)	26	0.30	51 (D)	6 (15)
EBTR	41	0.03	49 (D)	0 (0)	41	0.03	49 (D)	0 (0)	41	0.03	48 (D)	0 (0)
WBLTR	8	0.10	50 (D)	1 (7)	8	0.10	50 (D)	1 (7)	8	0.10	49 (D)	1 (6)
NBL	35	0.08	2 (A)	1 (3)	35	0.09	2 (A)	1 (3)	35	0.09	2 (A)	1 (3)
NBTR	969	0.34	3 (A)	24 (32)	1019	0.36	3 (A)	25 (35)	1017	0.36	3 (A)	25 (37)
SBL	6	0.02	3 (A)	0 (2)	6	0.02	3 (A)	0 (2)	6	0.02	4 (A)	0 (2)
SBT	955	0.35	5 (A)	36 (50)	1004	0.37	5 (A)	39 (53)	1000	0.37	5 (A)	39 (55)
SBR	18	0.01	2 (A)	0 (1)	18	0.01	2 (A)	0 (1)	21	0.01	2 (A)	0 (1)

Existing Conditions: The signalized intersection operates within capacity, with acceptable delays and an overall LOS of 'A' during the weekday AM, PM, and Saturday peak hours. No critical movements have been identified.

Future Background Conditions: Volumes from the background development traffic and growth are expected to minorly increase delays and v/c ratios, however, the signalized intersection continues to operate within capacity, with acceptable delays and an overall LOS of 'D' during the weekday AM, PM, and Saturday peak hours. No critical movements have been identified.

Future Total Conditions: Minor increases in delay and v/c ratio are expected under future total conditions compared to future background conditions during the AM, PM, and Saturday peak hours. Overall, the intersection is expected to operate under acceptable conditions.

7.4.3 Highway 50 & Mayfield Road/Albion Vaughan Road

The intersection capacity analysis results at Highway 50 and Mayfield Road/Albion Vaughan Road during the AM, PM and Saturday peak hours are summarized in Table 7-11. As mentioned in Section 7.1.2, the signal timing plan was optimized during the AM and PM peak hour for the future scenarios.

Table 7-11: Highway 50 and Mayfield Road/Albion Vaughan Road Intersection Capacity Analysis

AM	Existing Conditions (2023)				Future Background (2033 - Optimized)				Future Total (2033 - Optimized)			
Mvmt	Vol	V/C	Delay (LOS)	Queue 50th (95th)	Vol	V/C	Delay (LOS)	Queue 50th (95th)	Vol	V/C	Delay (LOS)	Queue 50th (95th)
Overall	-	**0.71**	**35 (C)**	-	-	**0.90**	**48 (D)**	-	-	-	**0.92**	**50 (D)**
EBL	61	0.29	59 (E)	16 (26)	64	0.30	57 (E)	14 (23)	14 (23)	62	0.29	58 (E)
EBT	93	0.58	73 (E)	31 (48)	373	0.76	79 (E)	35 (53)	35 (53)	376	0.77	80 (E)
WBL	298	0.89	78 (E)	90 (114)	**370**	**0.98**	**87 (F)**	**102 (153)**	**370**	**0.99**	**90 (F)**	**103 (156)**
WBT	140	0.40	57 (E)	43 (62)	271	0.55	51 (D)	79 (105)	283	0.56	51 (D)	83 (109)
WBR	12	0.01	52 (D)	0 (0)	39	0.03	42 (D)	0 (1)	39	0.03	-	-
NBL	83	0.41	16 (B)	9 (20)	118	0.62	33 (C)	18 (43)	147	0.66	44 (D)	29 (57)
NBT	1064	0.55	21 (C)	115 (158)	1297	0.56	29 (C)	111 (141)	1297	0.56	29 (C)	111 (141)
SBL	22	0.09	15 (B)	2 (7)	31	0.16	23 (C)	4 (11)	31	0.16	24 (C)	4 (11)
SBT	1087	0.64	27 (C)	122 (187)	1178	0.86	48 (D)	187 (283)	1178	0.91	55 (D)	196 (287)
SBR	64	0.04	17 (B)	0 (3)	64	0.04	26 (C)	0 (3)	64	0.04	28 (C)	0 (3)

PM	Existing Conditions (2023)				Future Background (2033 - Optimized)				Future Total (2033 - Optimized)			
Mvmt	Vol	V/C	Delay (LOS)	Queue 50th (95th)	Vol	V/C	Delay (LOS)	Queue 50th (95th)	Vol	V/C	Delay (LOS)	Queue 50th (95th)
Overall	**-**	**0.61**	**29 (C)**	**-**	**-**	**0.83**	**41 (D)**	**-**	**-**	**0.85**	**42 (D)**	**-**
EBL	83	0.33	59 (E)	22 (37)	87	0.28	51 (D)	21 (33)	86	0.27	50 (D)	21 (32)
EBT	105	0.62	77 (E)	35 (55)	492	0.80	74 (E)	60 (78)	512	0.80	74 (E)	63 (81)
WBL	193	0.74	66 (E)	56 (79)	**222**	**0.92**	**85 (F)**	**58 (95)**	**222**	**0.93**	**87 (F)**	**58 (99)**
WBT	84	0.49	67 (E)	27 (46)	158	0.51	57 (E)	47 (70)	158	0.48	56 (E)	47 (69)
WBR	17	0.01	61 (E)	0 (0)	33	0.02	50 (D)	0 (0)	33	0.02	-	-
NBL	86	0.41	14 (B)	9 (17)	103	0.64	37 (D)	15 (39)	116	0.68	45 (D)	21 (45)
NBT	1111	0.55	18 (B)	113 (147)	1593	0.64	27 (C)	134 (168)	1593	0.64	27 (C)	135 (169)
SBL	20	0.08	13 (B)	2 (5)	36	0.22	20 (B)	4 (11)	36	0.22	20 (C)	5 (11)
SBT	1119	0.57	23 (C)	118 (170)	1337	0.79	38 (D)	193 (289)	1337	0.81	39 (D)	197 (295)
SBR	73	0.05	15 (B)	0 (0)	73	0.05	21 (C)	0 (0)	70	0.04	22 (C)	0 (0)
SAT	**Existing Conditions (2023)**				**Future Background (2033)**				**Future Total (2033)**			
Mvmt	**Vol**	**V/C**	**Delay (LOS)**	**Queue 50th (95th)**	**Vol**	**V/C**	**Delay (LOS)**	**Queue 50th (95th)**	**Vol**	**V/C**	**Delay (LOS)**	**Queue 50th (95th)**
Overall	**-**	**0.52**	**29 (C)**	**-**	**-**	**0.57**	**30 (C)**	**-**	**-**	**0.58**	**31 (C)**	**-**
EBL	90	0.35	58 (E)	23 (37)	95	0.39	60 (E)	25 (40)	93	0.39	60 (E)	25 (39)
EBT	118	0.65	77 (E)	39 (60)	270	0.54	72 (E)	22 (37)	292	0.55	73 (E)	22 (39)
WBL	221	0.71	59 (E)	62 (85)	244	0.89	83 (F)	72 (107)	**244**	**0.91**	**88 (F)**	**72 (102)**
WBT	119	0.43	62 (E)	36 (58)	131	0.52	65 (E)	41 (65)	135	0.53	66 (E)	43 (66)
WBR	10	0.01	57 (E)	0 (0)	10	0.01	59 (E)	0 (0)	10	0.01	-	-
NBL	101	0.29	12 (B)	11 (21)	101	0.30	11 (B)	10 (20)	111	0.33	12 (B)	12 (22)
NBT	865	0.41	17 (B)	64 (110)	1140	0.37	15 (B)	51 (87)	1140	0.37	15 (B)	52 (87)
SBL	14	0.04	13 (B)	2 (5)	14	0.05	12 (B)	1 (4)	14	0.05	13 (B)	1 (4)
SBT	880	0.44	20 (C)	86 (116)	925	0.45	19 (B)	87 (117)	925	0.45	20 (B)	87 (120)
SBR	101	0.06	15 (B)	0 (8)	101	0.06	14 (B)	0 (8)	97	0.06	15 (B)	0 (7)

Existing Conditions: The signalized intersection operates within capacity, with acceptable delays and an overall LOS of 'C' during the weekday AM, PM, and Saturday peak hours. No critical movements have been identified.

Future Background Conditions: Volumes from the background development traffic and growth are expected to increase delays and v/c ratios, and overall, the intersection is expected to operate with a V/C ratio of 0.90 during the AM peak hour and 0.83 during the PM peak hour. With signal optimization, the westbound left is expected to operate with a V/C ratio of 0.98 and delay of 87 seconds during the AM peak hour, and a V/C ratio of 0.92 and delay of 85 seconds during the PM peak hour. This is a result of background traffic. During Saturday peak hour, all movements are expected to operate sufficiently and within capacity.

Future Total Conditions: Similar to future background conditions, with signal optimization, the westbound left movement is expected to operate with a V/C ratio of 0.99 and delay of 90 seconds during the AM peak hour and a V/C ratio of 0.93 and delay of 87 seconds during the PM peak hour. This is not a result of the proposed development; however, it is expected that this movement can sufficiently progress through the intersection within one (1) cycle. During Saturday peak hours, all movements are expected to operate sufficiently and within capacity. Overall, with a result of the added site traffic, the intersection is expected to operate sufficiently in the future with the optimized signal timing plan.

7.5 UNSIGNALIZED INTERSECTION CAPACITY ANALYSIS (2033)

The results for the studied unsignalized intersections under the 2033 horizon year during the weekday AM, PM and Saturday peak hours are summarized in the sections below.

7.5.1 Coleraine Drive and Parr Boulevard

The intersection capacity analysis results at Coleraine Drive and Parr Boulevard during the AM, PM and Saturday peak hours are summarized in Table 7-12.

Table 7-12: Coleraine Drive and Parr Boulevard Intersection Capacity Analysis

AM	Existing Conditions (2023)				Future Background (2033)				Future Total (2033)			
Mvmt	Vol	V/C	Delay (LOS)	Queue 95th	Vol	V/C	Delay (LOS)	Queue 95th	Vol	V/C	Delay (LOS)	Queue 95th
EBL	1	0.01	36 (E)	0	1	0.01	47 (E)	0	1	0.00	23 (C)	0
EBTR	2	0.01	20 (C)	0	2	0.01	25 (C)	0	2	0.01	15 (C)	0
WBL	32	0.22	36 (E)	6	32	0.27	47 (E)	8	32	0.12	20 (C)	3
WBTR	130	0.28	16 (C)	9	130	0.31	18 (C)	11	146	0.28	14 (B)	9
NBT	11	0.01	1 (A)	0	11	0.01	1 (A)	0	11	0.01	10 (A)	0
NBTR	336	0.20	0 (A)	0	370	0.22	0 (A)	0	423	0.25	0 (A)	0
SBL	86	0.10	10 (A)	3	86	0.11	10 (B)	3	262	0.15	0 (A)	0
SBT	331	0.19	0 (A)	0	410	0.24	0 (A)	0	120	0.15	10 (B)	4
SBTR	171	0.10	0 (A)	0	210	0.12	0 (A)	0	406	0.24	0 (A)	0
PM	**Existing Conditions (2023)**				**Future Background (2033)**				**Future Total (2033)**			
Mvmt	Vol	V/C	Delay (LOS)	Queue 95th	Vol	V/C	Delay (LOS)	Queue 95th	Vol	V/C	Delay (LOS)	Queue 95th
EBL	3	0.07	93 (F)	2	3	0.10	133 (F)	2	3	0.02	35 (E)	1
EBTR	16	0.10	31 (D)	3	16	0.13	40 (E)	4	16	0.05	18 (C)	1
WBL	28	0.49	118 (F)	15	28	0.64	180 (F)	19	28	0.15	29 (D)	4
WBTR	100	0.35	24 (C)	12	100	0.43	32 (D)	16	147	0.32	16 (C)	11
NBT	13	0.03	1 (A)	1	13	0.04	1 (A)	1	13	0.04	16 (C)	1
NBTR	422	0.25	0 (F)	0	456	0.27	0 (F)	0	572	0.34	0 (A)	0
SBL	108	0.14	11 (B)	4	108	0.15	11 (B)	4	306	0.18	0 (A)	0
SBT	579	0.34	0 (F)	0	658	0.39	0 (F)	0	124	0.18	11 (B)	5
SBTR	293	0.17	0 (F)	0	333	0.20	0 (F)	0	652	0.38	0 (A)	0
SAT	**Existing Conditions (2023)**				**Future Background (2033)**				**Future Total (2033)**			
Mvmt	Vol	V/C	Delay (LOS)	Queue 95th	Vol	V/C	Delay (LOS)	Queue 95th	Vol	V/C	Delay (LOS)	Queue 95th
EBL	1	0.00	11 (B)	0	1	0.00	11 (B)	0	1	0.00	11 (B)	0
EBTR	4	0.01	11 (B)	0	4	0.01	11 (B)	0	4	0.01	10 (B)	0
WBL	15	0.02	11 (B)	1	15	0.02	11 (B)	1	15	0.02	10 (B)	1
WBTR	28	0.03	9 (A)	1	28	0.03	9 (A)	1	75	0.08	9 (A)	2
NBT	1	0.00	0 (A)	0	1	0.00	0 (A)	0	1	0.00	8 (A)	0
NBTR	72	0.04	0 (A)	0	76	0.04	0 (A)	0	91	0.05	0 (A)	0
SBL	22	0.02	8 (A)	0	22	0.02	8 (A)	0	49	0.03	0 (A)	0
SBT	126	0.07	0 (A)	0	133	0.08	0 (A)	0	38	0.03	8 (A)	1
SBTR	65	0.04	0 (A)	0	68	0.04	0 (A)	0	128	0.08	0 (A)	0

No capacity constraints have been identified as all movements have available capacity and under existing and future scenarios during the AM, PM, and Saturday peak hours. While some movements are projected to operate with noticeable delay, notably the eastbound and westbound left turn movements, there is significant residual capacity associated with those movements.

7.5.2 Simpson Road and Parr Boulevard

The intersection capacity analysis results at Simpson Road and Parr Boulevard during the AM, PM and Saturday peak hours are summarized in Table 7-13.

Table 7-13: Simpson Road and Parr Boulevard Intersection Capacity Analysis

AM	Existing Conditions (2023)				Future Background (2033)				Future Total (2033)			
Mvmt	Vol	V/C	Delay (LOS)	Queue 95th	Vol	V/C	Delay (LOS)	Queue 95th	Vol	V/C	Delay (LOS)	Queue 95th
EBLTR	3	0.00	0 (A)	0	3	0.00	0 (A)	0	3	0.00	0 (A)	0
WBLTR	12	0.01	1 (A)	0	12	0.01	1 (A)	0	17	0.01	1 (A)	0
NBL	-	-	-	-	5	0.01	12 (B)	0	21	0.05	12 (B)	1
NBTR	13	0.02	11 (B)	1	8	0.01	11 (B)	0	6	0.05	12 (B)	1
SBLTR	24	0.04	11 (B)	1	24	0.04	11 (B)	1	24	0.04	11 (B)	1
PM	**Existing Conditions (2023)**				**Future Background (2033)**				**Future Total (2033)**			
Mvmt	Vol	V/C	Delay (LOS)	Queue 95th	Vol	V/C	Delay (LOS)	Queue 95th	Vol	V/C	Delay (LOS)	Queue 95th
EBLTR	4	0.00	0 (A)	0	4	0.00	0 (A)	0	4	0.00	0 (A)	0
WBLTR	7	0.01	1 (A)	0	7	0.01	1 (A)	0	10	0.01	1 (A)	0
NBL	-	-	-	-	8	0.01	11 (B)	0	55	0.11	11 (B)	3
NBTR	16	0.02	10 (B)	1	8	0.01	9 (A)	0	15	0.11	11 (B)	3
SBLTR	30	0.04	10 (B)	1	30	0.04	10 (B)	1	30	0.04	11 (B)	1
SAT	**Existing Conditions (2023)**				**Future Background (2033)**				**Future Total (2033)**			
Mvmt	Vol	V/C	Delay (LOS)	Queue 95th	Vol	V/C	Delay (LOS)	Queue 95th	Vol	V/C	Delay (LOS)	Queue 95th
EBLTR	28	0.00	0 ()	0	28	0.00	0 ()	0	0	0.00	0 ()	0
WBLTR	3	0.00	1 (A)	0	3	0.00	1 (A)	0	6	0.00	1 (A)	0
NBL	-	-	-	-	3	0.00	9 (A)	0	50	0.07	9 (A)	2
NBTR	9	0.01	9 (A)	0	6	0.01	9 (A)	0	12	0.07	9 (A)	2
SBLTR	11	0.01	9 (A)	0	11	0.01	9 (A)	0	11	0.01	9 (A)	0

No capacity constraints have been identified as all movements have available capacity and experience a LOS of 'B' or better under existing and future scenarios during the AM, PM, and Saturday peak hours. The Simpson Road extension is expected to operate sufficiently with Parr Boulevard. Site traffic has a negligible impact on intersection operation.

7.5.3 Mayfield Road & Site Access

The intersection capacity analysis results at Mayfield Road & Site Access via Simpson Road during the AM, PM and Saturday peak hours are summarized in Table 7-14.

Table 7-14: Mayfield Road & Site Access Intersection Capacity Analysis

AM	Existing Conditions (2023)				Future Background (2033)				Future Total (2033)			
Mvmt	Vol	V/C	Delay (LOS)	Queue 95th	Vol	V/C	Delay (LOS)	Queue 95th	Vol	V/C	Delay (LOS)	Queue 95th
EBL	1	0.00	0 (0)	0	1	0.00	8 (A)	0	45	0.04	9 (A)	1
EBT	361	0.00	0 (A)	0	438	0.13	0 (A)	0	214	0.13	0 (A)	0
WBT	-	-	-	-	290	0.17	0 (A)	0	289	0.17	0 (A)	0
WBTR	264	0.16	0 (A)	0	146	0.09	0 (A)	0	188	0.11	0 (A)	0
SBL	1	0.01	12 (B)	0	1	0.00	14 (B)	0	11	0.04	18 (A)	1
SBR	3	0.01	12 (B)	0	2	0.00	12 (B)	0	16	0.02	10 (B)	1
PM	**Existing Conditions (2023)**				**Future Background (2033)**				**Future Total (2033)**			
Mvmt	Vol	V/C	Delay (LOS)	Queue 95th	Vol	V/C	Delay (LOS)	Queue 95th	Vol	V/C	Delay (LOS)	Queue 95th
EBL	5	0.01	0 (A)	0	5	0.01	10 (A)	0	20	0.02	9 (A)	1
EBT	365	0.01	0 (A)	0	512	0.15	0 (A)	0	254	0.15	0 (A)	0
WBT	-	-	-	-	309	0.18	0 (A)	0	303	0.18	0 (A)	0
WBTR	357	0.21	0 (A)	0	157	0.09	0 (A)	0	173	0.10	0 (A)	0
SBL	7	0.03	13 (B)	1	7	0.02	16 (C)	1	30	0.08	16 (C)	2
SBR	5	0.03	13 (B)	1	5	0.01	10 (B)	0	47	0.06	10 (B)	2
SAT	**Existing Conditions (2023)**				**Future Background (2033)**				**Future Total (2033)**			
Mvmt	Vol	V/C	Delay (LOS)	Queue 95th	Vol	V/C	Delay (LOS)	Queue 95th	Vol	V/C	Delay (LOS)	Queue 95th
EBL	3	0.00	0 (A)	0	3	0.00	9 (A)	0	20	0.02	9 (A)	1
EBT	361	0.00	0 (A)	0	379	0.11	0 (A)	0	186	0.11	0 (A)	0
WBT	-	-	-	-	245	0.14	0 (A)	0	239	0.14	0 (A)	0
WBTR	335	0.20	0 (A)	0	125	0.07	0 (A)	0	141	0.08	0 (A)	0
SBL	3	0.01	13 (B)	0	3	0.01	14 (B)	0	30	0.07	14 (B)	2
SBR	5	0.01	13 (B)	0	2	0.00	9 (A)	0	47	0.06	10 (A)	2

No capacity constraints have been identified as all movements have available capacity and experience a LOS of 'C' or better under existing and future scenarios during the AM, PM, and Saturday peak hours. Site traffic has a negligible impact on intersection operation. The future unsignalized access is expected to operate sufficiently.

7.5.4 Coleraine Drive and 12155 Coleraine Drive (Babbar Transport Bolton Yard)

The intersection capacity analysis results at Coleraine Drive and 12155 Coleraine Drive (Babbar Transport Bolton Yard) during the AM, PM and Saturday peak hours are summarized in Table 7-15.

Table 7-15: Coleraine Drive and 12133 Coleraine Drive (Babbar Transport Bolton Yard) Intersection Capacity Analysis

AM	Existing Conditions (2023)				Future Background (2033)				Future Total (2033)			
Mvmt	Vol	V/C	Delay (LOS)	Queue 95th	Vol	V/C	Delay (LOS)	Queue 95th	Vol	V/C	Delay (LOS)	Queue 95th
WBLR	0	0.00	0 (A)	0	0	0.00	0 (A)	0	N/A			
NBT	411	0.24	0 (A)	0	459	0.27	0 (A)	0				
NBTR	206	0.12	0 (A)	0	230	0.14	0 (A)	0				
SBLT	0	0.00	0 (A)	0	0	0.00	0 (A)	0				
SBT	359	0.21	0 (A)	0	440	0.26	0 (A)	0				
PM	Existing Conditions (2023)				Future Background (2033)				Future Total (2028)			
Mvmt	Vol	V/C	Delay (LOS)	Queue 95th	Vol	V/C	Delay (LOS)	Queue 95th	Vol	V/C	Delay (LOS)	Queue 95th
WBLR	0	0.00	0 (A)	0	0	0.00	0 (A)	0	N/A			
NBT	547	0.32	0 (A)	0	592	0.35	0 (A)	0				
NBTR	274	0.16	0 (A)	0	297	0.17	0 (A)	0				
SBLT	0	0.00	0 (A)	0	0	0.00	0 (A)	0				
SBT	609	0.36	0 (A)	0	690	0.41	0 (A)	0				
SAT	Existing Conditions (2023)				Future Background (2033)				Future Total (2028)			
Mvmt	Vol	V/C	Delay (LOS)	Queue 95th	Vol	V/C	Delay (LOS)	Queue 95th	Vol	V/C	Delay (LOS)	Queue 95th
WBLR	1	0.00	11 (B)	0	1	0.00	11 (B)	0	N/A			
NBT	105	0.06	0 (A)	0	110	0.06	0 (A)	0				
NBTR	53	0.03	0 (A)	0	56	0.03	0 (A)	0				
SBLT	0	0.00	0 (A)	0	0	0.00	0 (A)	0				
SBT	151	0.09	0 (A)	0	159	0.09	0 (A)	0				

No capacity constraints have been identified as all movements have available capacity and experience a LOS of 'B' or better under existing and future scenarios during the AM, PM, and Saturday peak hours. Site traffic has a negligible impact on intersection operation.

7.6 SUMMARY OF INTERSECTION CAPACITY ANALYSIS RESULTS

With signal optimization, the planned widenings along the adjacent regional roads, and other road network infrastructure improvements, the intersection capacity analysis indicates that site traffic is expected to have an acceptable impact on the surrounding road network. In addition, the proposed site access to the subject lands on the future Simpson Road extension is expected to operate sufficiently under future horizons.

A small number of capacity constraints have been identified due to high volumes of background development traffic and general traffic growth at the intersection of Highway 50 and Mayfield Road/Albion Vaughan Road; however, this is not attributed to site traffic. Overall, the subject lands are expected to have an acceptable impact on the road network operations in the surrounding area.

8 PARKING AND LOADING ASSESSMENT

8.1 VEHICLE PARKING REQUIREMENTS

Upon the development of the site, the subject lands will be required to follow the Town of Caledon Zoning By-law 2006-50 parking standards. Table 8-1 summarizes the parking requirements.

Table 8-1: Town of Caledon Parking Standards – Vehicle Parking

Land Use	Town of Caledon ZBL 2006-50	
	Parking Rate	Minimum Parking Requirement
Industrial	Up to 5,000 m^2	1 space per 60 m^2 net floor area
	5,000 m^2 to 10,000 m^2	83 parking spaces, plus 1 space per 90 m^2 of net floor area or portion thereof over 5,000 m^2
	Over 10,000 m^2	139 parking spaces, plus 1 space per 170 m^2 or portion thereof of net floor area of 10,000 m^2

8.1.1 Accessible Parking Requirements

The Town of Caledon Zoning By-law 2015-058 provides accessible parking standards based on the number of required parking spaces. Table 8-2 summarizes the accessible parking requirements.

Table 8-2: Town of Caledon Accessible Parking Standards

Number of Required Parking Spaces	Number of Designated Accessible Spaces(1)
1 to 12	1 Type A
13 to 100	4%
101 to 200	1 accessible space plus 3%
201 to 1000	2 accessible spaces plus 2%
More than 1000 parking spaces	11 accessible spaces plus 1%

(1) *Where an even number of accessible parking spaces are required, an equal number of Type A and B accessible parking spaces shall be provided. Where an odd number of accessible parking spaces are required, an equal number of Type A and B accessible parking spaces shall be provided but the last accessible parking space may be Type B*

8.2 LOADING REQUIREMENTS

The Town of Caledon Zoning By-law 2006-50 also provides loading standards applicable to the subject lands. Each loading space shall be at least 14 metres long, 3.5 metres wide and have a vertical clearance of at least 3.35 metres. Table 8-3 summarizes the loading requirements.

Table 8-3: Town of Caledon Loading Standards

Land Use	Town of Caledon ZBL 2006-50	
	Loading Rate	Minimum Loading Requirement
Industrial	300 m^2 or less	No requirement
	301 m^2 to 2,325 m^2	1 loading space
	2,326 m^2 to 7,440 m^2	2 loading spaces
	7,441 m^2 or greater	3 loading spaces plus 1 additional loading space for each additional 9,300 m^2 or portion thereof in excess of 7,441m^2

9 CONCLUSIONS

- This Transportation Impact Study has been prepared to support the Secondary Plan study and development of the transportation network in the Simpson Lands. The subject lands are planned for industrial and office use consisting of approximately 908,500 ft^2 of warehouse GFA.
- The subject lands study area is serviced by Peel Region, Town of Caledon, and City of Brampton roads. There are 3 regional roadways and 3 municipal roadways comprising the arterial, collector, and local road network in the study area.
- Local transit service for the Bolton area is provided by Voyago while inter-regional commuter bus service is operated by GO Transit between Malton and the area of Highway 50 & Columbia Way. Bike lanes are provided on both sides of George Bolton Parkway, east of Coleraine Drive. However, no cycling facilities are available along the remaining study area roadways. The study area also exhibits poor pedestrian connectivity which can be attributed to the lack of collector/local streets, missing facilities, and discontinuous sidewalks.
- This Transportation Assessment considers the 5 and 10-year horizon from the existing year 2023. The future background conditions include traffic added to the network from other future developments, corridor growth, and road network improvements.
- The subject lands are anticipated to generate 155 two-way auto vehicle trips during the AM peak hour (119 inbound and 36 outbound), 164 two-way auto vehicle trips during the PM peak hour (46 inbound, 118 outbound) and 164 two-way auto vehicle trips during the Saturday peak hour (46 inbound, 118 outbound). In addition, 18 two-way truck trips (9 inbound, 9 outbound) are anticipated for the AM peak hour, 27 two-way truck trips (14 inbound, 13 outbound) are anticipated for the PM peak hour and 27 two-way truck trips (14 inbound, 13 outbound) are anticipated for the Saturday peak hour.
- The intersection capacity analysis was conducted for the AM, PM and Saturday peak hours under the existing, future background (2028 and 2033) and future total (2028 and 2033) horizons. With signal optimizations, planned widenings along adjacent regional roads, and other road network infrastructure improvements, the intersection capacity analysis results indicate that site traffic is expected to have an acceptable impact on the surrounding road network. In addition, the proposed site accesses to the subject lands are expected to operate sufficiently under future horizons.
- A small number of capacity constraints have been identified due to high volumes of background development and growth traffic at study area intersections; however, none are attributed to site traffic. Overall, the subject lands are expected to have an acceptable impact on the road network operations in the surrounding area.

APPENDIX A

Terms of Reference

LEA Consulting Ltd.
625 Cochrane Drive, 9th Floor
Markham, ON, L3R 9R9 Canada
T | 905 470 0015 F | 905 470 0030
WWW.LEA.CA

July 31st,2023

Reference Number: 24085

Hashim Hamdani
10 Peel Centre Drive
Brampton, ON, L6T 4B9

RE: Terms of Reference – Coleraine Drive and Mayfield Road

Dear Hashim,

LEA Consulting Ltd. (LEA) has prepared the following letter outlining our proposed Terms of Reference (TOR) pertaining to a Transportation Impact Study (TIS) for your review. The TIS will be conducted for a proposed block plan in the Town of Caledon (herein referred to as the "Subject Lands"). The property contains approximately 36.75 hectares of land which is located in the northeast quadrant of Coleraine Drive and Mayfield Road as shown in **Figure 1**. The subject lands are currently occupied by open lands, various truck and transportation uses and a former garden supply store.

Figure 1: Study Area

1. DESCRIPTION OF THE DEVELOPMENT

- Proposed Block Plan (Industrial uses)

2. PROPOSED STUDY AREA

- Based on the scale of the project and the existing road network layout, the following intersections are proposed to be analyzed:
  - Mayfield Road and Coleraine Drive (Signalized)
  - Parr Boulevard and Coleraine Drive (Unsignalized)
  - Parr Boulevard and Simpson Road (Unsignalized)
  - Parr Boulevard and Highway 50 (Signalized)
  - Mayfield Road/Albion Vaughn Road and Highway 50 (Signalized)

3. HORIZON & ANALYSIS

- 2023 existing condition and 2028 future background and future total conditions.
- Analysis will be conducted for weekday AM, PM, and Sat peak hours.

4. DATA COLLECTION

- Turning movement counts (TMC) will be obtained from the Region of Peel for the public road intersections listed above or surveyed by Lea Consulting Ltd.

5. FUTURE BACKGROUND CONDITIONS

- *Road Network Improvements* – Lea will note any network improvements identified within the study area and account for any traffic diversions associated with these improvements within our analysis.
- *Background Development Traffic* –Lea has identified the following background developments within the study area:
  - **12148 Albion Vaughan Road – 265 Residential Units**
- Please advise of any other relevant background developments to be considered. LEA also requests that any other relevant background development documents be made available including the South Simpson Industrial Secondary Plan and the Municipal Class Environmental Assessment for Simpson Road (2013).
- Relatedly, please confirm the status of the South Simpson Industrial Secondary Plan if it is not approved as of yet, and please confirm the road extensions which should be considered for the analysis. It is understood the Town is contemplating a potential new east-west road intersecting with Coleraine Drive, which may extend east of the intersection into the subject lands.
- *General Corridor Growth Rate* – Historical intersection TMC data will be reviewed, and LEA will consult with City Staff to determine corridor growth rates.

6. TRIP GENERATION, DISTRIBUTION AND TRIP ASSIGNMENT

- Please note, at this time, no site statistics are available. Should a trip generation assessment be required for this block application, trip generation will be based on ITE trip generation rates.
- Trip distribution and assignment shall be based on a review of the existing traffic data (i.e. directional splits of site traffic) and TTS 2016 survey data. Modal split shall also be based on TTS 2016 survey data.

7. INTERSECTION CAPCITY ANALYSIS

- Shall be conducted for signalized and unsignalized intersections using Synchro Version 11 Software adhering to the analysis methodology outlined in the Highway Capacity Manual 2000.
- Input parameters shall be based on the suggested values as outlined in the Town of Caledon/Peel Region Synchro Guidelines.

8. PARKING AND LOADING

- It is assumed that no parking and loading assessment will be required to be undertaken at the block plan level. Please confirm if this should be required.

9. TRANSPORTATION DEMAND MANAGEMENT

- Please confirm if a high-level Transportation Demand Management (TDM) plan will be required to be provided for the block plan.

Should you have any comments with our assumptions or have any concerns, please contact the undersigned at (905) 470-0015 ext. 354 (ZGeorgis@lea.ca).

Yours truly,

LEA CONSULTING LTD.

Zara Georgis, M.Eng., P.Eng.

Project Manager, Transportation Engineering and Planning

Transportation Development Comments - Terms of Reference - Coleraine Drive and Mayfield Road Block Plan

Barnes, Catherine <catherine.barnes@peelregion.ca>

Thu 8/3/2023 2:45 PM

To:Harkarandeep Bains <HBains@lea.ca>

Cc:Hamdani, Hashim <hashimali.hamdani@peelregion.ca>

External Sender

Hi Harkarandeep,

The Region has reviewed the Terms of Reference you provided and offer the following information to assist the Applicant with the submission of a complete Traffic Impact Study.

To answer the questions in your email first; please note that we do require site statistics. Secondly, we are ok with traffic counts being taken in summer, but only in conjunction with previous traffic counts from previous years. As summer traffic counts are not all encompassing of traffic and can be misleading.

Please see the traffic comments below and the link here for the detailed Region of Peel TIS formatting and contact information for background traffic (growth rate, AADT, signal timing, etc.).

- Regional Road 14 (Mayfield Road) – Industrial Connector

Access Type	Minimum Spacing Requirement
Full to Full	450 m
Full to RI/RO	100 m
RI/RO to RI/RO	100m

- Regional Road 150 (Coleraine Road) – Industrial Connector

Access Type	Minimum Spacing Requirement
Full to Full	450 m
Full to RI/RO	100 m
RI/RO to RI/RO	100m

- Please review the Controlled Access By-law 62-2013, which speaks to the Road Characterization Study (RCS). The RCS defines our various road classifications as well as the minimum access spacing distances that are associated with them.
- Proposed Study Area – we would like to see the future Simpson Road at Mayfield Road included in the study.
- Horizon & Analysis Periods – we would like to see 5 & 10 year analysis. We would like to see off Peak hours as well.
- Data Collection - please use Region of Peel TMCs – in conjunction with any counts surveyed by Lea Consulting Ltd.
- Access justification, type and location will be reviewed/determined after review of the TIS;
- Please note that the future Simpson Road extension should be considered in the study as this will be the main access to the sites that front Simpson Road.
- Any accesses proposed off a Regional Road may require auxiliary turn lanes, this will be reviewed/determined after review of the TIS;
- Please review the Region's 'Heavy Truck Restrictions,'& "Axle Load Restrictions' as per our Region of Peel By-Law 15-2013 https://www.peelregion.ca/pw/transportation/business/heavy-truck-restrictions.asp
- Please see the following contacts to obtain data for your analysis:
    - Please contact Transportation to confirm growth rates along the subject Regional road(s).

- Please contact Damian Jamroz (damian.jamroz@peelregion.ca) Supervisor of Traffic Operations to obtain the most recent TMCs and/or average annual daily traffic (AADT).
- Please contact Rebecca Caughey (Rebecca.caughey@peelregion.ca)Acting Supervisor's of Traffic Signals and Streetlighting, to obtain traffic signal timing parameters and ensure that the information includes the appropriate walk/don't walk splits, recall modes and offsets.
- Please contact Development Services Planning staff to obtain details on surrounding developments in the area that would affect traffic capacity in the planning horizon year(s)

Please reach out to the Town for further information in regards to Future Background Conditions, etc.

I trust this to be satisfactory; please do not hesitate to contact me should you have any questions or concerns.

Thank you,

Catherine Barnes
Region of Peel
Specialist, Transportation Development
Transportation Division, Public Works.
10 Peel Centre Drive, Suite B, 4th Floor
Brampton, ON , L6T 4B9
During this Health Emergency please contact me via email as I am out of the office working remotely.

Region of Peel
working with you

P **Please consider the environment before printing this email.**

Our working hours may be different. Please do not feel obligated to reply outside of your working hours.

The Region of Peel is situated on the Treaty Lands and Territory of the Mississaugas of the Credit First Nation as well as the traditional territory of the Anishinabeg, Huron-Wendat and Haudenosaunee peoples.

From: Kavleen Younan <Kavleen.Younan@caledon.ca>
Sent: July 31, 2023 10:39 AM
To: Zara Georgis
Cc: Matthew Doren; Harkarandeep Bains; Anatole Kung; James Todd; Emma Howlett
Subject: FW: Coleraine Drive and Mayfield Road Block Plan (South Simpson Landowners)
Attachments: 24085-Coleraine Drive and Mayfield Road Block Plan- TOR (July 28, 2023).pdf

External Sender

Good Morning Zara,

Thank you for your email. We will review the proposed TOR and get back to you with any comments shortly.

Regarding the collection of traffic counts, as outlined in your Terms of Reference (TOR), TMC data (non-summer) should be obtained from the Region. Alternatively, if you prefer to conduct new counts during the summer, it would be essential to provide appropriate justification demonstrating that the collected counts do not significantly differ from non-summer counts.

Thanks

Kavleen Sachdeva Younan, P.Eng.
Transportation Engineer
Engineering Services

Office: 905.584.2272 x 4416
Email: kavleen.younan@caledon.ca

Town of Caledon | www.caledon.ca | www.visitcaledon.ca | Follow us @TownofCaledon

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From: Zara Georgis <ZGeorgis@lea.ca>
Sent: July 28, 2023 3:54 PM
To: Jillian Britto <Jillian.Britto@caledon.ca>
Cc: Matthew Doren <MDoren@lea.ca>; Harkarandeep Bains <HBains@lea.ca>; Anatole Kung <AKung@lea.ca>; James Todd <jtodd@westonconsulting.com>
Subject: Coleraine Drive and Mayfield Road Block Plan (South Simpson Landowners)

Hi Jillian,

I hope you are doing well.

Kindly find attached TOR for your review. It is our understanding that the block plan will propose industrial uses, but site statistics and density are not yet forecasted. Please advise if this would be required for the Block Plan TIS study.

In addition, LEA proposes to undertake counts next week in order to meet an end of August submission timeline. Please advise if you have any concerns with undertaking summer counts in support of this study.

Thanks,

Zara Georgis, M.Eng., P.Eng.
Project Manager, Transportation Planning & Engineering
LEA Consulting Ltd.
40 University Avenue, Suite 503 | Toronto, ON | M5J 1T1
T: 905 470 0015 E: ZGeorgis@lea.ca W: www.LEA.ca

We've Moved!
Our Downtown office has moved, please make note of our new address above.

APPENDIX B

Traffic Data & Signal Timing Plans

Spectrum

Turning Movement Count
Location Name: MAYFIELD RD & COLERAINE DR
Date: Wed, Dec 08, 2021 Deployment Lead: Theo Daglis

Turning Movement Count (3 . MAYFIELD RD & COLERAINE DR) CustID: 01401354 MioID:

Start Time	N Approach COLERAINE DR						E Approach MAYFIELD RD						S Approach COLERAINE DR						W Approach MAYFIELD RD						Int. Total (15 min)	Int. Total (1 hr)
	Right N:W	Thru N:S	Left N:E	UTurn N:N	Peds N:	Approach Total	Right E:N	Thru E:W	Left E:S	UTurn E:E	Peds E:	Approach Total	Right S:E	Thru S:N	Left S:W	UTurn S:S	Peds S:	Approach Total	Right W:S	Thru W:E	Left W:N	UTurn W:W	Peds W:	Approach Total		
07:00:00	71	99	14	0	0	184	7	43	6	0	0	56	5	82	3	0	0	90	8	58	118	0	0	184	514	
07:15:00	31	88	22	0	0	141	5	51	12	0	0	68	7	79	6	0	0	92	14	68	73	0	0	155	456	
07:30:00	34	97	16	0	0	147	6	55	14	0	0	75	4	58	3	0	0	65	5	65	62	0	0	132	419	
07:45:00	29	63	12	0	0	104	11	48	7	0	0	66	15	80	11	0	0	106	5	76	57	0	0	138	414	1803
08:00:00	37	68	18	0	0	123	10	44	9	0	0	63	11	67	8	0	0	86	12	56	48	0	0	116	388	1677
08:15:00	31	72	13	0	0	116	14	49	13	0	0	76	4	69	7	0	0	80	7	60	60	0	0	127	399	1620
08:30:00	23	75	19	0	0	117	12	47	4	0	0	63	6	51	2	0	0	59	11	53	56	0	0	120	359	1560
08:45:00	25	65	21	0	0	111	10	29	4	0	0	43	7	63	3	0	0	73	10	45	50	0	0	105	332	1478
09:00:00	27	69	16	0	0	112	15	33	6	0	0	54	7	59	4	0	0	70	16	53	48	0	0	117	353	1443
09:15:00	20	61	14	0	0	95	18	31	5	0	0	54	13	50	7	0	0	70	8	61	34	0	0	103	322	1366
09:30:00	26	40	20	0	0	86	15	41	2	0	0	58	3	42	3	0	0	48	17	50	38	0	0	105	297	1304
09:45:00	17	61	18	0	0	96	15	36	2	0	0	53	4	50	4	0	0	58	5	43	34	0	0	82	289	1261
BREAK																										
15:00:00	88	75	24	0	0	187	13	54	11	0	0	78	10	100	3	0	0	113	11	47	62	0	0	120	498	
15:15:00	51	73	21	0	0	145	21	61	5	0	0	87	7	81	14	0	0	102	9	71	38	0	0	118	452	
15:30:00	55	80	15	0	0	150	10	86	23	0	0	119	8	83	2	0	0	93	6	72	39	0	0	117	479	
15:45:00	59	60	15	1	0	135	15	50	14	0	0	79	12	79	14	0	0	105	7	67	48	0	0	122	441	1870
16:00:00	72	80	11	0	0	163	18	62	7	0	0	87	11	105	8	0	0	124	10	57	34	0	0	101	475	1847
16:15:00	62	51	18	0	0	131	14	75	5	0	0	94	6	105	7	0	0	118	12	81	46	0	0	139	482	1877
16:30:00	64	70	13	0	0	147	18	69	13	0	0	100	13	100	10	0	0	123	8	70	42	0	0	120	490	1888
16:45:00	50	59	20	0	0	129	19	66	3	0	0	88	8	116	12	1	0	137	5	77	46	0	0	128	482	1929
17:00:00	111	115	16	0	0	242	16	74	10	0	0	100	10	103	14	0	0	127	9	56	36	0	0	101	570	2024
17:15:00	96	127	28	0	0	251	15	71	7	0	0	93	9	129	3	0	0	141	16	80	51	0	0	147	632	2174
17:30:00	87	120	20	0	0	227	26	58	5	0	0	89	10	126	3	0	0	139	8	61	77	0	0	146	601	2285
17:45:00	85	116	22	0	0	223	20	53	4	0	0	77	2	152	6	0	0	160	2	51	101	0	0	154	614	2417
Grand Total	1251	1884	426	1	0	3562	343	1286	191	0	0	1820	192	2029	157	1	0	2379	221	1478	1298	0	0	2997	**10758**	-
Approach%	35.1%	52.9%	12%	0%		-	18.8%	70.7%	10.5%	0%		-	8.1%	85.3%	6.6%	0%		-	7.4%	49.3%	43.3%	0%		-	**-**	-
Totals %	11.6%	17.5%	4%	0%		33.1%	3.2%	12%	1.8%	0%		16.9%	1.8%	18.9%	1.5%	0%		22.1%	2.1%	13.7%	12.1%	0%		27.9%	**-**	-
Heavy	232	82	321	0		-	279	255	18	0		-	22	86	25	1		-	13	224	278	0		-	**-**	-
Heavy %	18.5%	4.4%	75.4%	0%		-	81.3%	19.8%	9.4%	0%		-	11.5%	4.2%	15.9%	100%		-	5.9%	15.2%	21.4%	0%		-	**-**	-
Bicycles	-	-	-	-		-	-	-	-	-		-	-	-	-	-		-	-	-	-	-		-	**-**	-
Bicycle %	-	-	-	-		-	-	-	-	-		-	-	-	-	-		-	-	-	-	-		-	**-**	-

Spectrum

Turning Movement Count
Location Name: MAYFIELD RD & COLERAINE DR
Date: Wed, Dec 08, 2021 Deployment Lead: Theo Daglis

Peak Hour: 07:00 AM - 08:00 AM Weather: Light Snow (-6.56 °C)

Start Time	N Approach COLERAINE DR						E Approach MAYFIELD RD						S Approach COLERAINE DR						W Approach MAYFIELD RD						Int. Total (15 min)
	Right	Thru	Left	UTurn	Peds	Approach Total	Right	Thru	Left	UTurn	Peds	Approach Total	Right	Thru	Left	UTurn	Peds	Approach Total	Right	Thru	Left	UTurn	Peds	Approach Total	
07:00:00	71	99	14	0	0	184	7	43	6	0	0	56	5	82	3	0	0	90	8	58	118	0	0	184	514
07:15:00	31	88	22	0	0	141	5	51	12	0	0	68	7	79	6	0	0	92	14	68	73	0	0	155	456
07:30:00	34	97	16	0	0	147	6	55	14	0	0	75	4	58	3	0	0	65	5	65	62	0	0	132	419
07:45:00	29	63	12	0	0	104	11	48	7	0	0	66	15	80	11	0	0	106	5	76	57	0	0	138	414
Grand Total	165	347	64	0	0	576	29	197	39	0	0	265	31	299	23	0	0	353	32	267	310	0	0	609	**1803**
Approach%	28.6%	60.2%	11.1%	0%		-	10.9%	74.3%	14.7%	0%		-	8.8%	84.7%	6.5%	0%		-	5.3%	43.8%	50.9%	0%		-	**-**
Totals %	9.2%	19.2%	3.5%	0%		31.9%	1.6%	10.9%	2.2%	0%		14.7%	1.7%	16.6%	1.3%	0%		19.6%	1.8%	14.8%	17.2%	0%		33.8%	**-**
PHF	0.58	0.88	0.73	0		0.78	0.66	0.9	0.7	0		0.88	0.52	0.91	0.52	0		0.83	0.57	0.88	0.66	0		0.83	**-**
Heavy	41	17	52	0		110	22	37	5	0		64	4	9	1	0		14	2	53	28	0		83	**-**
Heavy %	24.8%	4.9%	81.3%	0%		19.1%	75.9%	18.8%	12.8%	0%		24.2%	12.9%	3%	4.3%	0%		4%	6.3%	19.9%	9%	0%		13.6%	**-**
Lights	124	330	12	0		466	7	160	34	0		201	27	290	22	0		339	30	214	282	0		526	**-**
Lights %	75.2%	95.1%	18.8%	0%		80.9%	24.1%	81.2%	87.2%	0%		75.8%	87.1%	97%	95.7%	0%		96%	93.8%	80.1%	91%	0%		86.4%	**-**
Single-Unit Trucks	19	16	28	0		63	14	14	3	0		31	1	9	1	0		11	2	17	8	0		27	**-**
Single-Unit Trucks %	11.5%	4.6%	43.8%	0%		10.9%	48.3%	7.1%	7.7%	0%		11.7%	3.2%	3%	4.3%	0%		3.1%	6.3%	6.4%	2.6%	0%		4.4%	**-**
Buses	1	0	0	0		1	0	5	0	0		5	0	0	0	0		0	0	6	2	0		8	**-**
Buses %	0.6%	0%	0%	0%		0.2%	0%	2.5%	0%	0%		1.9%	0%	0%	0%	0%		0%	0%	2.2%	0.6%	0%		1.3%	**-**
Articulated Trucks	21	1	24	0		46	8	18	2	0		28	3	0	0	0		3	0	30	18	0		48	**-**
Articulated Trucks %	12.7%	0.3%	37.5%	0%		8%	27.6%	9.1%	5.1%	0%		10.6%	9.7%	0%	0%	0%		0.8%	0%	11.2%	5.8%	0%		7.9%	**-**

Spectrum

Turning Movement Count
Location Name: MAYFIELD RD & COLERAINE DR
Date: Wed, Dec 08, 2021 Deployment Lead: Theo Daglis

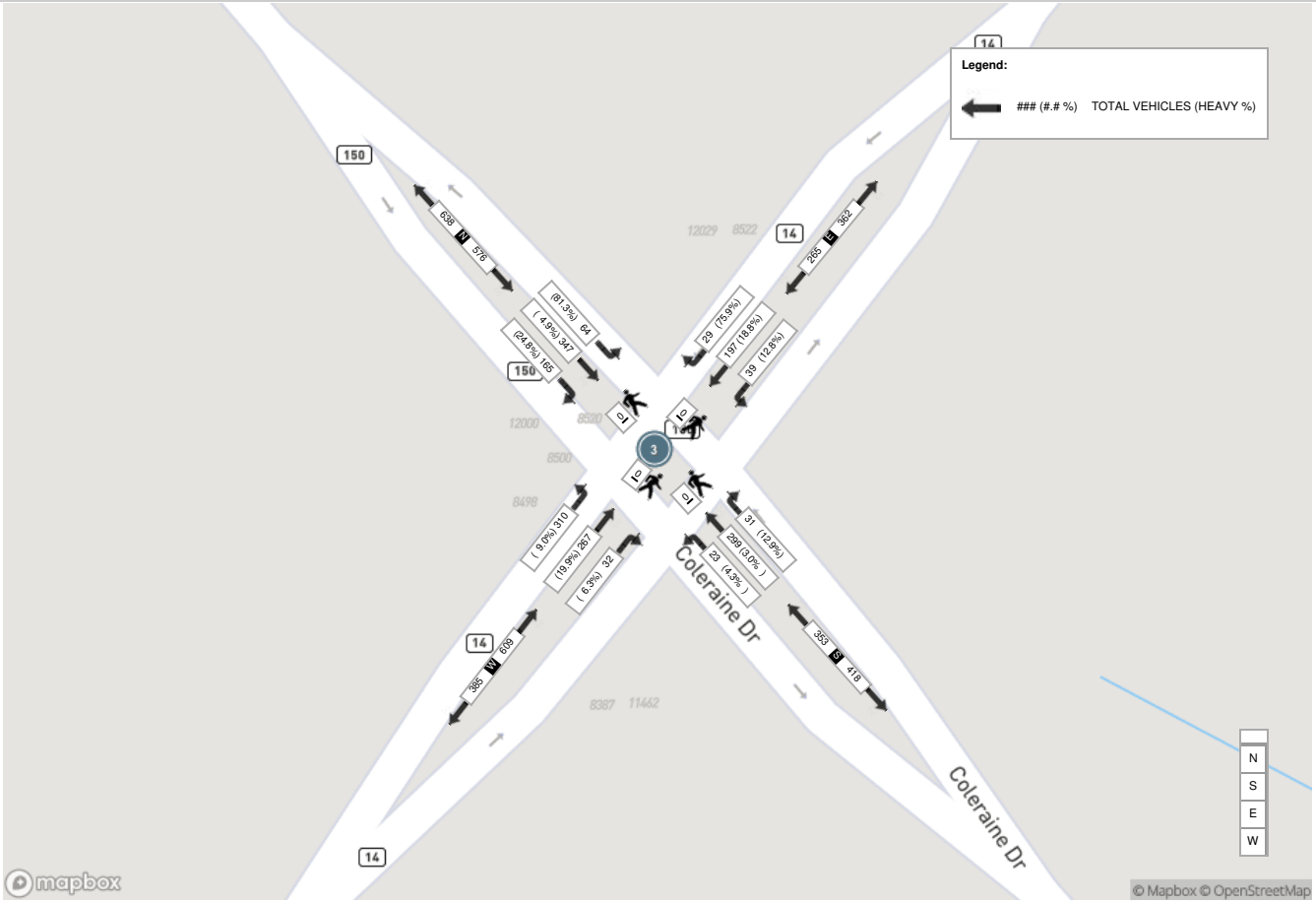
Peak Hour: 05:00 PM - 06:00 PM Weather: Light Snow (-2.17 °C)

Start Time	N Approach COLERAINE DR						E Approach MAYFIELD RD						S Approach COLERAINE DR						W Approach MAYFIELD RD						Int. Total (15 min)
	Right	Thru	Left	UTurn	Peds	Approach Total	Right	Thru	Left	UTurn	Peds	Approach Total	Right	Thru	Left	UTurn	Peds	Approach Total	Right	Thru	Left	UTurn	Peds	Approach Total	
17:00:00	111	115	16	0	0	242	16	74	10	0	0	100	10	103	14	0	0	127	9	56	36	0	0	101	570
17:15:00	96	127	28	0	0	251	15	71	7	0	0	93	9	129	3	0	0	141	16	80	51	0	0	147	632
17:30:00	87	120	20	0	0	227	26	58	5	0	0	89	10	126	3	0	0	139	8	61	77	0	0	146	601
17:45:00	85	116	22	0	0	223	20	53	4	0	0	77	2	152	6	0	0	160	2	51	101	0	0	154	614
Grand Total	379	478	86	0	0	943	77	256	26	0	0	359	31	510	26	0	0	567	35	248	265	0	0	548	**2417**
Approach%	40.2%	50.7%	9.1%	0%		-	21.4%	71.3%	7.2%	0%		-	5.5%	89.9%	4.6%	0%		-	6.4%	45.3%	48.4%	0%		-	**-**
Totals %	15.7%	19.8%	3.6%	0%		39%	3.2%	10.6%	1.1%	0%		14.9%	1.3%	21.1%	1.1%	0%		23.5%	1.4%	10.3%	11%	0%		22.7%	**-**
PHF	0.85	0.94	0.77	0		0.94	0.74	0.86	0.65	0		0.9	0.78	0.84	0.46	0		0.89	0.55	0.78	0.66	0		0.89	**-**
Heavy	26	9	30	0		65	58	44	4	0		106	3	16	3	0		22	2	25	55	0		82	**-**
Heavy %	6.9%	1.9%	34.9%	0%		6.9%	75.3%	17.2%	15.4%	0%		29.5%	9.7%	3.1%	11.5%	0%		3.9%	5.7%	10.1%	20.8%	0%		15%	**-**
Lights	353	469	56	0		878	19	212	22	0		253	28	494	23	0		545	33	223	210	0		466	**-**
Lights %	93.1%	98.1%	65.1%	0%		93.1%	24.7%	82.8%	84.6%	0%		70.5%	90.3%	96.9%	88.5%	0%		96.1%	94.3%	89.9%	79.2%	0%		85%	**-**
Single-Unit Trucks	9	4	5	0		18	28	16	1	0		45	2	13	2	0		17	2	11	21	0		34	**-**
Single-Unit Trucks %	2.4%	0.8%	5.8%	0%		1.9%	36.4%	6.3%	3.8%	0%		12.5%	6.5%	2.5%	7.7%	0%		3%	5.7%	4.4%	7.9%	0%		6.2%	**-**
Buses	0	0	0	0		0	0	0	0	0		0	0	0	0	0		0	0	0	0	0		0	**-**
Buses %	0%	0%	0%	0%		0%	0%	0%	0%	0%		0%	0%	0%	0%	0%		0%	0%	0%	0%	0%		0%	**-**
Articulated Trucks	17	5	25	0		47	30	28	3	0		61	1	3	1	0		5	0	14	34	0		48	**-**
Articulated Trucks %	4.5%	1%	29.1%	0%		5%	39%	10.9%	11.5%	0%		17%	3.2%	0.6%	3.8%	0%		0.9%	0%	5.6%	12.8%	0%		8.8%	**-**

Spectrum

Turning Movement Count
Location Name: MAYFIELD RD & COLERAINE DR
Date: Wed, Dec 08, 2021 Deployment Lead: Theo Daglis

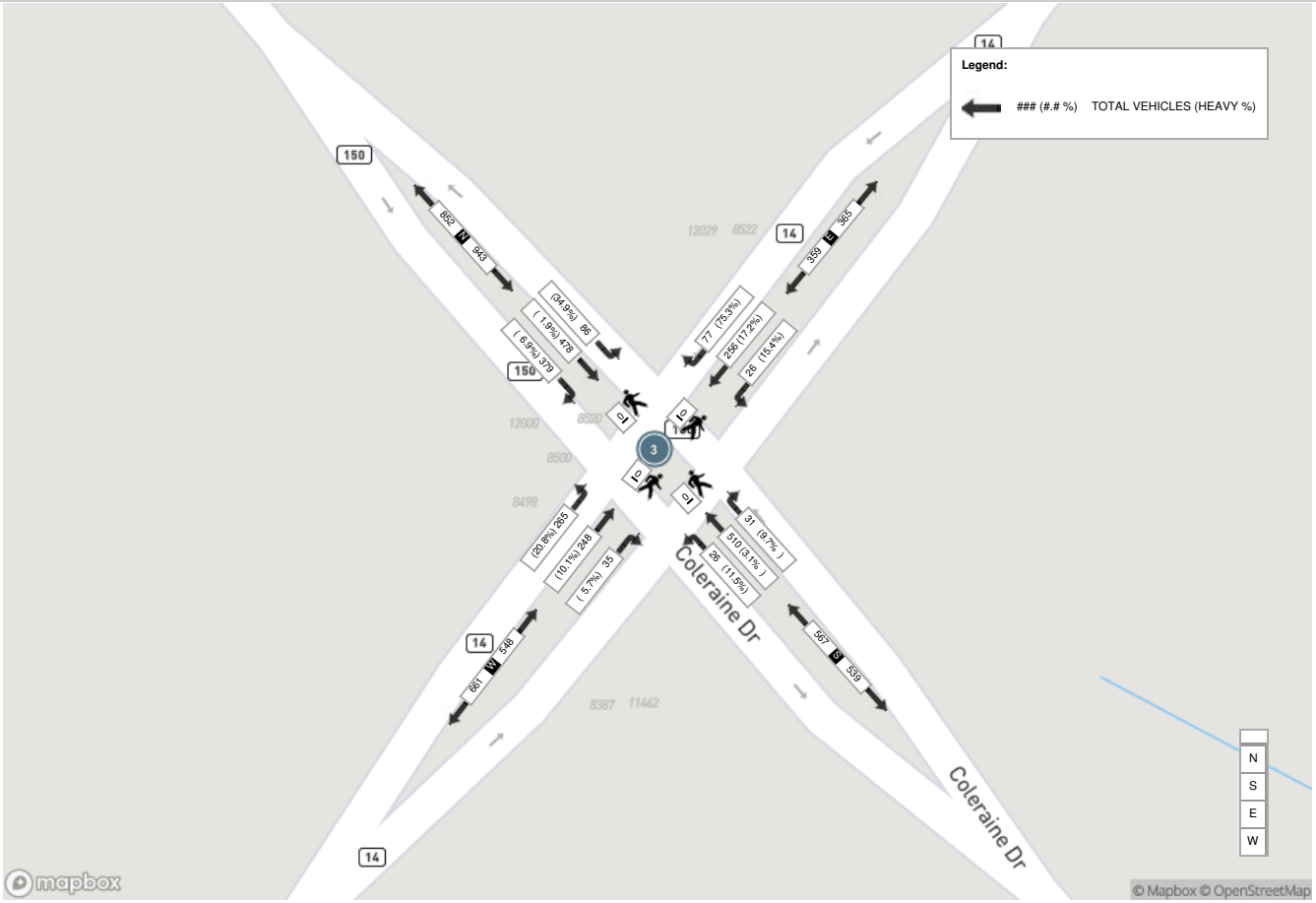
Peak Hour: 07:00 AM - 08:00 AM Weather: Light Snow (-6.56 °C)



Spectrum

Turning Movement Count
Location Name: MAYFIELD RD & COLERAINE DR
Date: Wed, Dec 08, 2021 Deployment Lead: Theo Daglis

Peak Hour: 05:00 PM - 06:00 PM Weather: Light Snow (-2.17 °C)



LEA Consulting Ltd.
625 Cochrane Drive

Markam, Ontario, Canada L3R 9R9
905-470-0015 x240 idinsmore@lea.ca

Count Name: 24085_Coleraine Dr & Mayfield Rd-SAT
Site Code: 24085
Start Date: 09/16/2023

Turning Movement Data

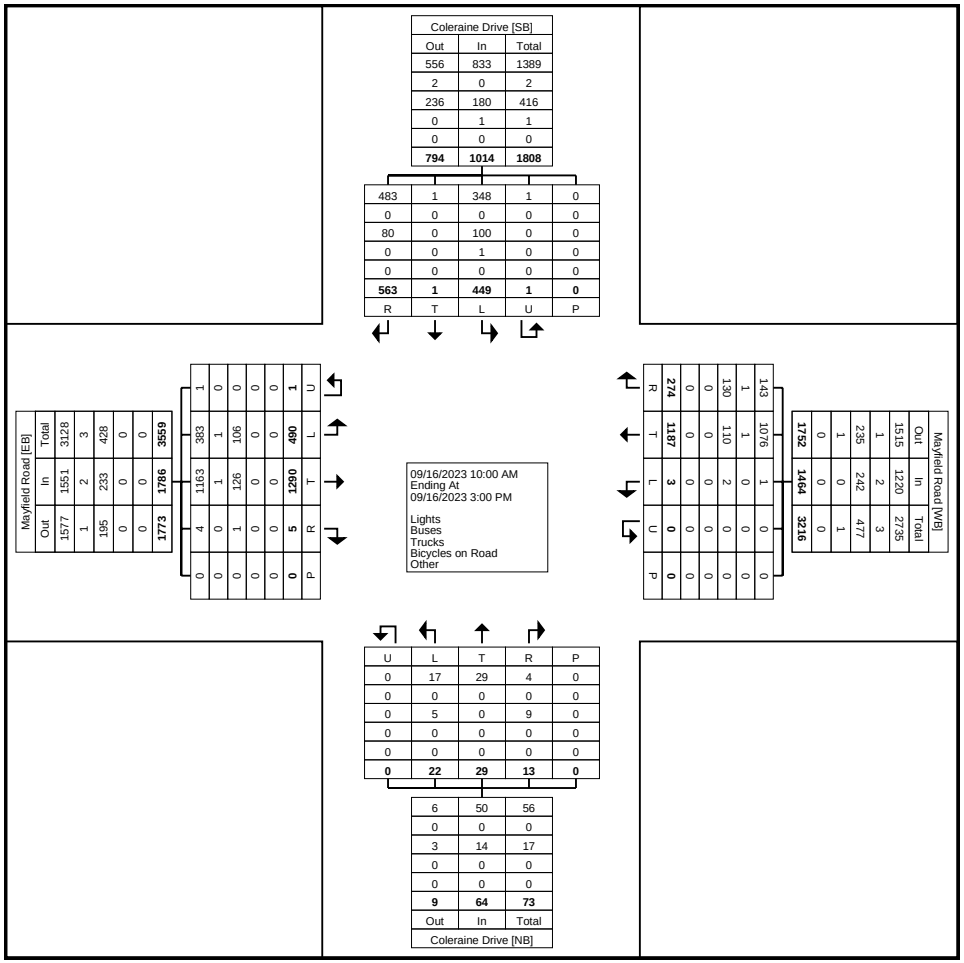
Start Time	Coleraine Drive Southbound						Mayfield Road Westbound						Coleraine Drive Northbound						Mayfield Road Eastbound						Int. Total
	Right	Thru	Left	U-Turn	Peds	App. Total	Right	Thru	Left	U-Turn	Peds	App. Total	Right	Thru	Left	U-Turn	Peds	App. Total	Right	Thru	Left	U-Turn	Peds	App. Total	
10:00 AM	25	0	32	0	0	57	10	40	0	0	0	50	0	1	0	0	0	1	0	62	25	0	0	87	195
10:15 AM	25	0	25	0	0	50	12	49	0	0	0	61	1	0	2	0	0	3	0	64	19	0	0	83	197
10:30 AM	17	0	21	0	0	38	18	67	0	0	0	85	0	1	0	0	0	1	1	47	24	0	0	72	196
10:45 AM	23	0	22	0	0	45	11	50	0	0	0	61	0	0	1	0	0	1	0	70	13	0	0	83	190
Hourly Total	90	0	100	0	0	190	51	206	0	0	0	257	1	2	3	0	0	6	1	243	81	0	0	325	778
11:00 AM	26	0	18	0	0	44	6	51	0	0	0	57	0	0	2	0	0	2	0	73	28	1	0	102	205
11:15 AM	25	0	21	0	0	46	10	56	0	0	0	66	1	1	0	0	0	2	0	57	25	0	0	82	196
11:30 AM	20	0	28	0	0	48	9	50	0	0	0	59	1	0	1	0	0	2	0	69	28	0	0	97	206
11:45 AM	20	0	19	1	0	40	13	53	0	0	0	66	0	0	0	0	0	0	0	55	23	0	0	78	184
Hourly Total	91	0	86	1	0	178	38	210	0	0	0	248	2	1	3	0	0	6	0	254	104	1	0	359	791
12:00 PM	18	0	23	0	0	41	31	78	0	0	0	109	0	1	1	0	0	2	0	82	28	0	0	110	262
12:15 PM	26	0	22	0	0	48	10	60	1	0	0	71	3	2	3	0	0	8	3	62	25	0	0	90	217
12:30 PM	29	0	23	0	0	52	13	65	0	0	0	78	1	5	2	0	0	8	0	46	26	0	0	72	210
12:45 PM	19	0	22	0	0	41	14	47	0	0	0	61	1	1	2	0	0	4	0	62	28	0	0	90	196
Hourly Total	92	0	90	0	0	182	68	250	1	0	0	319	5	9	8	0	0	22	3	252	107	0	0	362	885
1:00 PM	44	0	21	0	0	65	20	68	0	0	0	88	0	0	0	0	0	0	0	63	24	0	0	87	240
1:15 PM	20	0	22	0	0	42	12	48	0	0	0	60	2	2	1	0	0	5	0	65	18	0	0	83	190
1:30 PM	41	0	21	0	0	62	12	57	0	0	0	69	3	2	1	0	0	6	0	66	28	0	0	94	231
1:45 PM	36	1	19	0	0	56	13	75	0	0	0	88	0	2	0	0	0	2	0	77	29	0	0	106	252
Hourly Total	141	1	83	0	0	225	57	248	0	0	0	305	5	6	2	0	0	13	0	271	99	0	0	370	913
2:00 PM	28	0	26	0	0	54	15	56	2	0	0	73	0	2	4	0	0	6	0	72	18	0	0	90	223
2:15 PM	37	0	26	0	0	63	14	71	0	0	0	85	0	4	1	0	0	5	1	78	27	0	0	106	259
2:30 PM	57	0	18	0	0	75	14	80	0	0	0	94	0	2	0	0	0	2	0	51	27	0	0	78	249
2:45 PM	27	0	20	0	0	47	17	66	0	0	0	83	0	3	1	0	0	4	0	69	27	0	0	96	230
Hourly Total	149	0	90	0	0	239	60	273	2	0	0	335	0	11	6	0	0	17	1	270	99	0	0	370	961
Grand Total	563	1	449	1	0	1014	274	1187	3	0	0	1464	13	29	22	0	0	64	5	1290	490	1	0	1786	4328
Approach %	55.5	0.1	44.3	0.1	-	-	18.7	81.1	0.2	0.0	-	-	20.3	45.3	34.4	0.0	-	-	0.3	72.2	27.4	0.1	-	-	-
Total %	13.0	0.0	10.4	0.0	-	23.4	6.3	27.4	0.1	0.0	-	33.8	0.3	0.7	0.5	0.0	-	1.5	0.1	29.8	11.3	0.0	-	41.3	-
Lights	483	1	348	1	-	833	143	1076	1	0	-	1220	4	29	17	0	-	50	4	1163	383	1	-	1551	3654
% Lights	85.8	100.0	77.5	100.0	-	82.1	52.2	90.6	33.3	-	-	83.3	30.8	100.0	77.3	-	-	78.1	80.0	90.2	78.2	100.0	-	86.8	84.4
Buses	0	0	0	0	-	0	1	1	0	0	-	2	0	0	0	0	-	0	0	1	1	0	-	2	4
% Buses	0.0	0.0	0.0	0.0	-	0.0	0.4	0.1	0.0	-	-	0.1	0.0	0.0	0.0	-	-	0.0	0.0	0.1	0.2	0.0	-	0.1	0.1
Trucks	80	0	100	0	-	180	130	110	2	0	-	242	9	0	5	0	-	14	1	126	106	0	-	233	669
% Trucks	14.2	0.0	22.3	0.0	-	17.8	47.4	9.3	66.7	-	-	16.5	69.2	0.0	22.7	-	-	21.9	20.0	9.8	21.6	0.0	-	13.0	15.5
Bicycles on Road	0	0	1	0	-	1	0	0	0	0	-	0	0	0	0	0	-	0	0	0	0	0	-	0	1

% Bicycles on Road	0.0	0.0	0.2	0.0	-	0.1	0.0	0.0	0.0	-	-	0.0	0.0	0.0	0.0	-	-	0.0	0.0	0.0	0.0	0.0	-	0.0	0.0
Bicycles on Crosswalk	-	-	-	-	0	-	-	-	-	-	0	-	-	-	-	-	0	-	-	-	-	-	0	-	-
% Bicycles on Crosswalk	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Pedestrians	-	-	-	-	0	-	-	-	-	-	0	-	-	-	-	-	0	-	-	-	-	-	0	-	-
% Pedestrians	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-

LEA Consulting Ltd.
625 Cochrane Drive

Markam, Ontario, Canada L3R 9R9
905-470-0015 x240 idinsmore@lea.ca

Count Name: 24085_Coleraine Dr & Mayfield Rd-SAT
Site Code: 24085
Start Date: 09/16/2023



Turning Movement Data Plot

LEA Consulting Ltd.
625 Cochrane Drive

Markam, Ontario, Canada L3R 9R9
905-470-0015 x240 idinsmore@lea.ca

Count Name: 24085_Coleraine Dr & Mayfield Rd-SAT
Site Code: 24085
Start Date: 09/16/2023

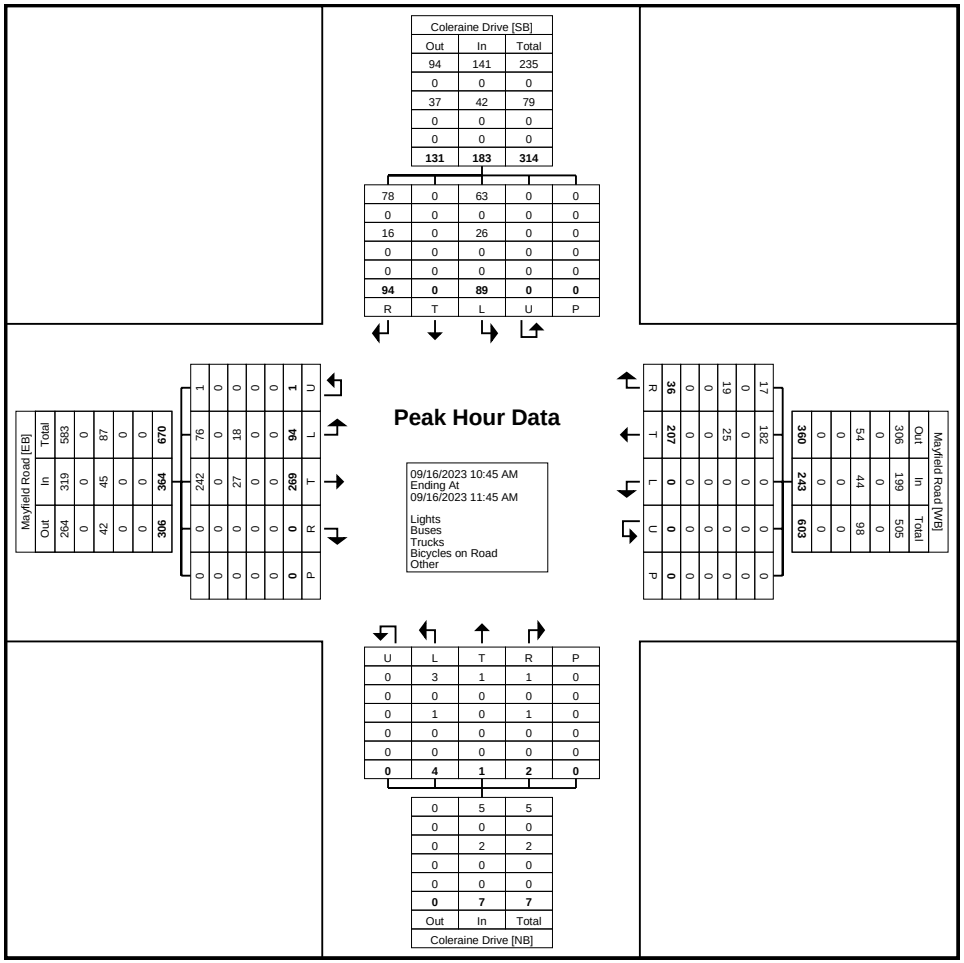
Turning Movement Peak Hour Data (10:45 AM)

Start Time	Coleraine Drive Southbound						Mayfield Road Westbound						Coleraine Drive Northbound						Mayfield Road Eastbound						Int. Total
	Right	Thru	Left	U-Turn	Peds	App. Total	Right	Thru	Left	U-Turn	Peds	App. Total	Right	Thru	Left	U-Turn	Peds	App. Total	Right	Thru	Left	U-Turn	Peds	App. Total	
10:45 AM	23	0	22	0	0	45	11	50	0	0	0	61	0	0	1	0	0	1	0	70	13	0	0	83	190
11:00 AM	26	0	18	0	0	44	6	51	0	0	0	57	0	0	2	0	0	2	0	73	28	1	0	102	205
11:15 AM	25	0	21	0	0	46	10	56	0	0	0	66	1	1	0	0	0	2	0	57	25	0	0	82	196
11:30 AM	20	0	28	0	0	48	9	50	0	0	0	59	1	0	1	0	0	2	0	69	28	0	0	97	206
Total	94	0	89	0	0	183	36	207	0	0	0	243	2	1	4	0	0	7	0	269	94	1	0	364	797
Approach %	51.4	0.0	48.6	0.0	-	-	14.8	85.2	0.0	0.0	-	-	28.6	14.3	57.1	0.0	-	-	0.0	73.9	25.8	0.3	-	-	-
Total %	11.8	0.0	11.2	0.0	-	23.0	4.5	26.0	0.0	0.0	-	30.5	0.3	0.1	0.5	0.0	-	0.9	0.0	33.8	11.8	0.1	-	45.7	-
PHF	0.904	0.000	0.795	0.000	-	0.953	0.818	0.924	0.000	0.000	-	0.920	0.500	0.250	0.500	0.000	-	0.875	0.000	0.921	0.839	0.250	-	0.892	0.967
Lights	78	0	63	0	-	141	17	182	0	0	-	199	1	1	3	0	-	5	0	242	76	1	-	319	664
% Lights	83.0	-	70.8	-	-	77.0	47.2	87.9	-	-	-	81.9	50.0	100.0	75.0	-	-	71.4	-	90.0	80.9	100.0	-	87.6	83.3
Buses	0	0	0	0	-	0	0	0	0	0	-	0	0	0	0	0	-	0	0	0	0	0	-	0	0
% Buses	0.0	-	0.0	-	-	0.0	0.0	0.0	-	-	-	0.0	0.0	0.0	0.0	-	-	0.0	-	0.0	0.0	0.0	-	0.0	0.0
Trucks	16	0	26	0	-	42	19	25	0	0	-	44	1	0	1	0	-	2	0	27	18	0	-	45	133
% Trucks	17.0	-	29.2	-	-	23.0	52.8	12.1	-	-	-	18.1	50.0	0.0	25.0	-	-	28.6	-	10.0	19.1	0.0	-	12.4	16.7
Bicycles on Road	0	0	0	0	-	0	0	0	0	0	-	0	0	0	0	0	-	0	0	0	0	0	-	0	0
% Bicycles on Road	0.0	-	0.0	-	-	0.0	0.0	0.0	-	-	-	0.0	0.0	0.0	0.0	-	-	0.0	-	0.0	0.0	0.0	-	0.0	0.0
Bicycles on Crosswalk	-	-	-	-	0	-	-	-	-	-	0	-	-	-	-	-	0	-	-	-	-	-	0	-	-
% Bicycles on Crosswalk	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Pedestrians	-	-	-	-	0	-	-	-	-	-	0	-	-	-	-	-	0	-	-	-	-	-	0	-	-
% Pedestrians	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-

LEA Consulting Ltd.
625 Cochrane Drive

Markam, Ontario, Canada L3R 9R9
905-470-0015 x240 idinsmore@lea.ca

Count Name: 24085_Coleraine Dr & Mayfield Rd-SAT
Site Code: 24085
Start Date: 09/16/2023



Turning Movement Peak Hour Data Plot (10:45 AM)

LEA Consulting Ltd.
625 Cochrane Drive

Markam, Ontario, Canada L3R 9R9
905-470-0015 x240 idinsmore@lea.ca

Count Name: 24085_Coleraine Dr & Mayfield Rd-SAT
Site Code: 24085
Start Date: 09/16/2023

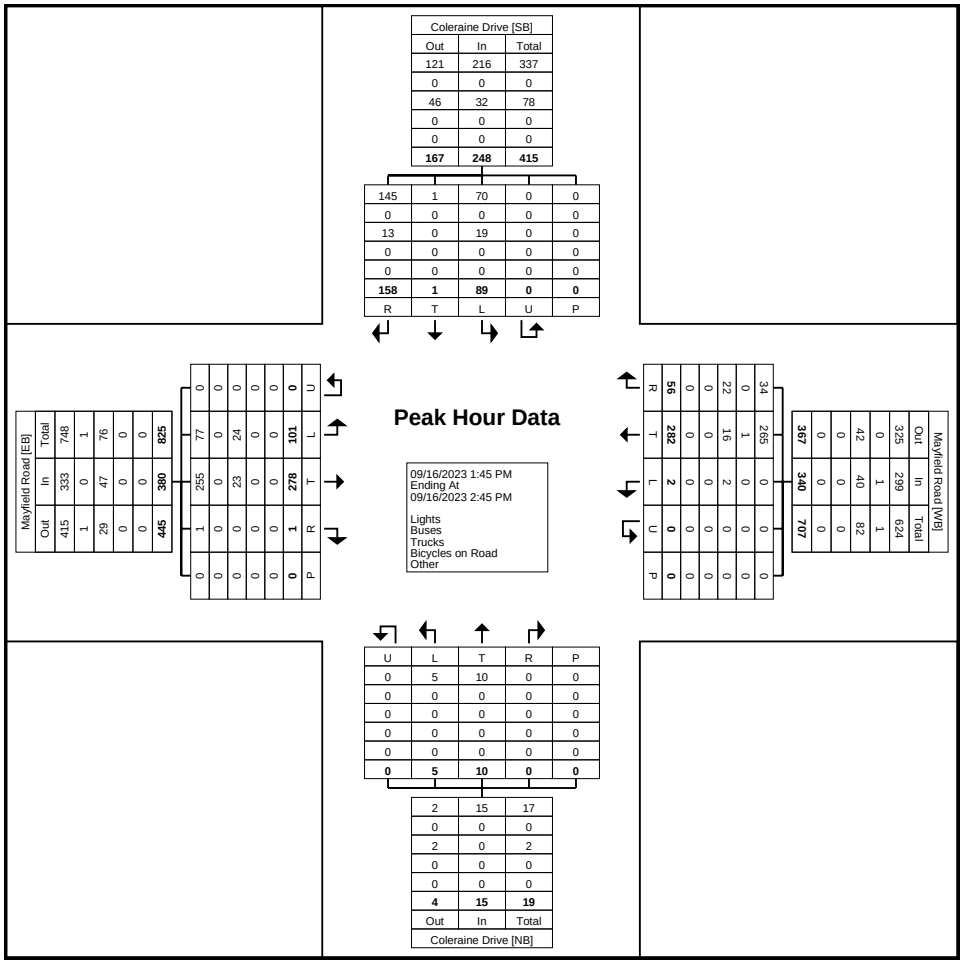
Turning Movement Peak Hour Data (1:45 PM)

Start Time	Coleraine Drive Southbound						Mayfield Road Westbound						Coleraine Drive Northbound						Mayfield Road Eastbound						
	Right	Thru	Left	U-Turn	Peds	App. Total	Right	Thru	Left	U-Turn	Peds	App. Total	Right	Thru	Left	U-Turn	Peds	App. Total	Right	Thru	Left	U-Turn	Peds	App. Total	Int. Total
1:45 PM	36	1	19	0	0	56	13	75	0	0	0	88	0	2	0	0	0	2	0	77	29	0	0	106	252
2:00 PM	28	0	26	0	0	54	15	56	2	0	0	73	0	2	4	0	0	6	0	72	18	0	0	90	223
2:15 PM	37	0	26	0	0	63	14	71	0	0	0	85	0	4	1	0	0	5	1	78	27	0	0	106	259
2:30 PM	57	0	18	0	0	75	14	80	0	0	0	94	0	2	0	0	0	2	0	51	27	0	0	78	249
Total	158	1	89	0	0	248	56	282	2	0	0	340	0	10	5	0	0	15	1	278	101	0	0	380	983
Approach %	63.7	0.4	35.9	0.0	-	-	16.5	82.9	0.6	0.0	-	-	0.0	66.7	33.3	0.0	-	-	0.3	73.2	26.6	0.0	-	-	-
Total %	16.1	0.1	9.1	0.0	-	25.2	5.7	28.7	0.2	0.0	-	34.6	0.0	1.0	0.5	0.0	-	1.5	0.1	28.3	10.3	0.0	-	38.7	-
PHF	0.693	0.250	0.856	0.000	-	0.827	0.933	0.881	0.250	0.000	-	0.904	0.000	0.625	0.313	0.000	-	0.625	0.250	0.891	0.871	0.000	-	0.896	0.949
Lights	145	1	70	0	-	216	34	265	0	0	-	299	0	10	5	0	-	15	1	255	77	0	-	333	863
% Lights	91.8	100.0	78.7	-	-	87.1	60.7	94.0	0.0	-	-	87.9	-	100.0	100.0	-	-	100.0	100.0	91.7	76.2	-	-	87.6	87.8
Buses	0	0	0	0	-	0	0	1	0	0	-	1	0	0	0	0	-	0	0	0	0	0	-	0	1
% Buses	0.0	0.0	0.0	-	-	0.0	0.0	0.4	0.0	-	-	0.3	-	0.0	0.0	-	-	0.0	0.0	0.0	0.0	-	-	0.0	0.1
Trucks	13	0	19	0	-	32	22	16	2	0	-	40	0	0	0	0	-	0	0	23	24	0	-	47	119
% Trucks	8.2	0.0	21.3	-	-	12.9	39.3	5.7	100.0	-	-	11.8	-	0.0	0.0	-	-	0.0	0.0	8.3	23.8	-	-	12.4	12.1
Bicycles on Road	0	0	0	0	-	0	0	0	0	0	-	0	0	0	0	0	-	0	0	0	0	0	-	0	0
% Bicycles on Road	0.0	0.0	0.0	-	-	0.0	0.0	0.0	0.0	-	-	0.0	-	0.0	0.0	-	-	0.0	0.0	0.0	0.0	-	-	0.0	0.0
Bicycles on Crosswalk	-	-	-	-	0	-	-	-	-	-	0	-	-	-	-	-	0	-	-	-	-	-	0	-	-
% Bicycles on Crosswalk	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Pedestrians	-	-	-	-	0	-	-	-	-	-	0	-	-	-	-	-	0	-	-	-	-	-	0	-	-
% Pedestrians	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-

LEA Consulting Ltd.
625 Cochrane Drive

Markam, Ontario, Canada L3R 9R9
905-470-0015 x240 idinsmore@lea.ca

Count Name: 24085_Coleraine Dr & Mayfield Rd-SAT
Site Code: 24085
Start Date: 09/16/2023



Turning Movement Peak Hour Data Plot (1:45 PM)

LEA Consulting Ltd.
625 Cochrane Drive

Markam, Ontario, Canada L3R 9R9
905-470-0015 x240 idinsmore@lea.ca

Count Name: 24085_Coleraine Dr & Parr Blvd-AM
Site Code: 24085
Start Date: 09/14/2023

Turning Movement Data

Start Time	Coleraine Drive Southbound						Parr Boulevard Westbound						Coleraine Drive Northbound						Eastbound Approach Eastbound						Int. Total
	Right	Thru	Left	U-Turn	Peds	App. Total	Right	Thru	Left	U-Turn	Peds	App. Total	Right	Thru	Left	U-Turn	Peds	App. Total	Right	Thru	Left	U-Turn	Peds	App. Total	
7:00 AM	1	91	20	0	0	112	28	3	15	1	0	47	8	128	3	0	0	139	0	0	0	0	0	0	298
7:15 AM	1	69	12	0	0	82	42	0	9	0	0	51	11	134	4	0	0	149	0	0	0	0	0	0	282
7:30 AM	2	76	26	0	0	104	28	6	2	0	0	36	15	61	1	0	0	77	0	0	1	0	0	1	218
7:45 AM	1	65	28	0	0	94	21	2	6	0	0	29	17	81	3	0	0	101	1	1	0	0	0	2	226
Hourly Total	5	301	86	0	0	392	119	11	32	1	0	163	51	404	11	0	0	466	1	1	1	0	0	3	1024
8:00 AM	2	61	27	0	0	90	8	3	5	0	0	16	20	76	5	0	0	101	1	1	1	0	0	3	210
8:15 AM	1	50	26	0	0	77	21	5	10	0	0	36	31	60	2	0	0	93	1	2	0	0	0	3	209
8:30 AM	0	64	26	0	0	90	20	2	17	0	1	39	19	56	2	0	0	77	2	1	1	0	0	4	210
8:45 AM	4	58	24	0	0	86	20	4	13	0	0	37	22	64	4	0	0	90	2	2	0	0	0	4	217
Hourly Total	7	233	103	0	0	343	69	14	45	0	1	128	92	256	13	0	0	361	6	6	2	0	0	14	846
9:00 AM	4	42	16	0	0	62	18	2	6	0	0	26	22	63	7	0	0	92	1	2	1	0	0	4	184
9:15 AM	2	72	24	0	0	98	16	6	2	0	0	24	10	42	2	0	0	54	0	2	0	0	0	2	178
Grand Total	18	648	229	0	0	895	222	33	85	1	1	341	175	765	33	0	0	973	8	11	4	0	0	23	2232
Approach %	2.0	72.4	25.6	0.0	-	-	65.1	9.7	24.9	0.3	-	-	18.0	78.6	3.4	0.0	-	-	34.8	47.8	17.4	0.0	-	-	-
Total %	0.8	29.0	10.3	0.0	-	40.1	9.9	1.5	3.8	0.0	-	15.3	7.8	34.3	1.5	0.0	-	43.6	0.4	0.5	0.2	0.0	-	1.0	-
Lights	16	402	178	0	-	596	143	28	71	1	-	243	161	598	24	0	-	783	4	7	4	0	-	15	1637
% Lights	88.9	62.0	77.7	-	-	66.6	64.4	84.8	83.5	100.0	-	71.3	92.0	78.2	72.7	-	-	80.5	50.0	63.6	100.0	-	-	65.2	73.3
Buses	0	3	0	0	-	3	0	0	0	0	-	0	0	4	0	0	-	4	0	0	0	0	-	0	7
% Buses	0.0	0.5	0.0	-	-	0.3	0.0	0.0	0.0	0.0	-	0.0	0.0	0.5	0.0	-	-	0.4	0.0	0.0	0.0	-	-	0.0	0.3
Trucks	2	243	51	0	-	296	79	5	14	0	-	98	14	162	9	0	-	185	4	4	0	0	-	8	587
% Trucks	11.1	37.5	22.3	-	-	33.1	35.6	15.2	16.5	0.0	-	28.7	8.0	21.2	27.3	-	-	19.0	50.0	36.4	0.0	-	-	34.8	26.3
Bicycles on Road	0	0	0	0	-	0	0	0	0	0	-	0	0	1	0	0	-	1	0	0	0	0	-	0	1
% Bicycles on Road	0.0	0.0	0.0	-	-	0.0	0.0	0.0	0.0	0.0	-	0.0	0.0	0.1	0.0	-	-	0.1	0.0	0.0	0.0	-	-	0.0	0.0
Bicycles on Crosswalk	-	-	-	-	0	-	-	-	-	-	0	-	-	-	-	-	0	-	-	-	-	-	0	-	-
% Bicycles on Crosswalk	-	-	-	-	-	-	-	-	-	-	0.0	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Pedestrians	-	-	-	-	0	-	-	-	-	-	1	-	-	-	-	-	0	-	-	-	-	-	0	-	-
% Pedestrians	-	-	-	-	-	-	-	-	-	-	100.0	-	-	-	-	-	-	-	-	-	-	-	-	-	-

LEA Consulting Ltd.
625 Cochrane Drive

Markam, Ontario, Canada L3R 9R9
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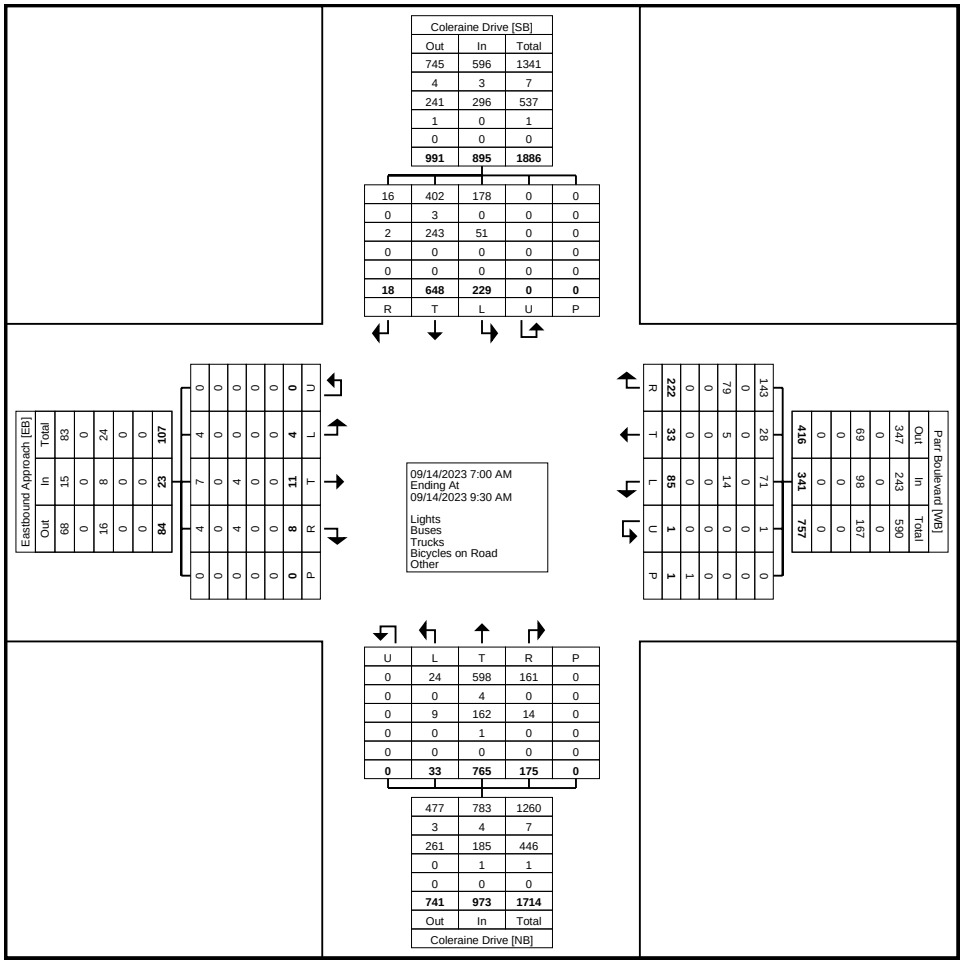
Count Name: 24085_Coleraine Dr & Parr Blvd-AM
Site Code: 24085
Start Date: 09/14/2023



Turning Movement Data Plot

LEA Consulting Ltd.
625 Cochrane Drive

Markam, Ontario, Canada L3R 9R9
905-470-0015 x240 idinsmore@lea.ca

Count Name: 24085_Coleraine Dr & Parr Blvd-AM
Site Code: 24085
Start Date: 09/14/2023

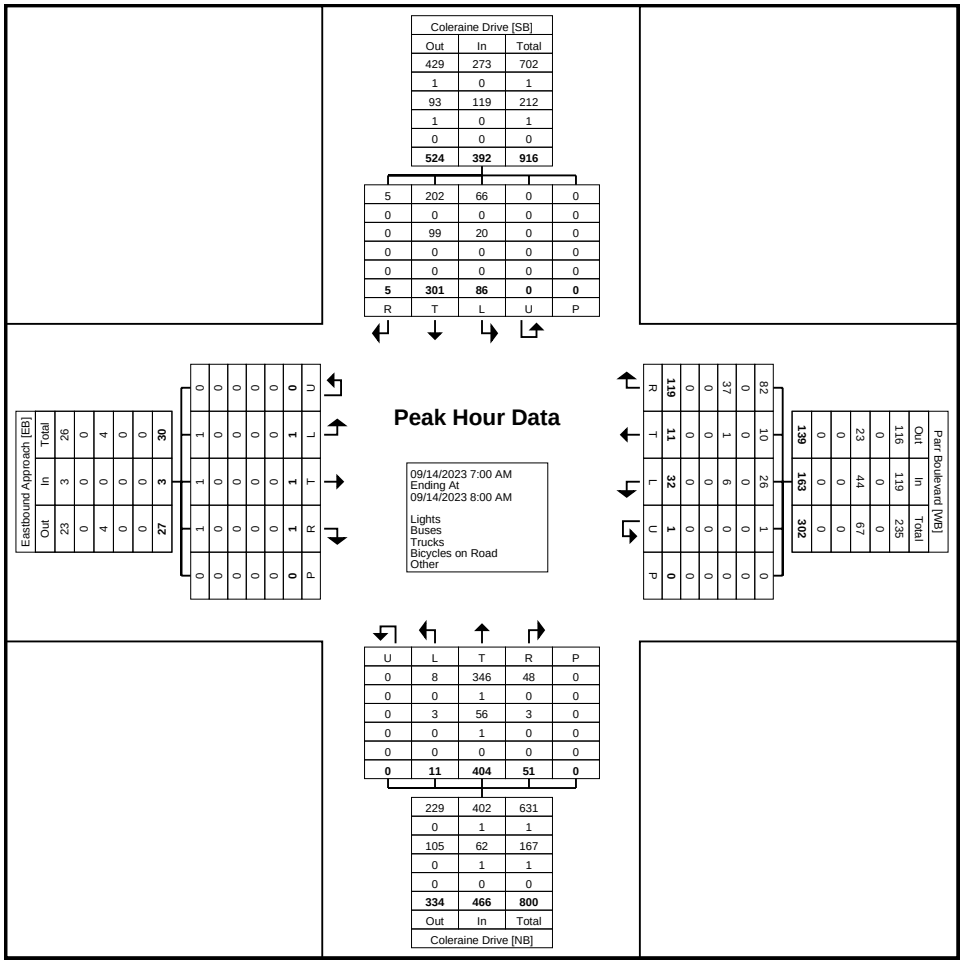
Turning Movement Peak Hour Data (7:00 AM)

Start Time	Coleraine Drive Southbound						Parr Boulevard Westbound						Coleraine Drive Northbound						Eastbound Approach Eastbound						Int. Total
	Right	Thru	Left	U-Turn	Peds	App. Total	Right	Thru	Left	U-Turn	Peds	App. Total	Right	Thru	Left	U-Turn	Peds	App. Total	Right	Thru	Left	U-Turn	Peds	App. Total	
7:00 AM	1	91	20	0	0	112	28	3	15	1	0	47	8	128	3	0	0	139	0	0	0	0	0	0	298
7:15 AM	1	69	12	0	0	82	42	0	9	0	0	51	11	134	4	0	0	149	0	0	0	0	0	0	282
7:30 AM	2	76	26	0	0	104	28	6	2	0	0	36	15	61	1	0	0	77	0	0	1	0	0	1	218
7:45 AM	1	65	28	0	0	94	21	2	6	0	0	29	17	81	3	0	0	101	1	1	0	0	0	2	226
Total	5	301	86	0	0	392	119	11	32	1	0	163	51	404	11	0	0	466	1	1	1	0	0	3	1024
Approach %	1.3	76.8	21.9	0.0	-	-	73.0	6.7	19.6	0.6	-	-	10.9	86.7	2.4	0.0	-	-	33.3	33.3	33.3	0.0	-	-	-
Total %	0.5	29.4	8.4	0.0	-	38.3	11.6	1.1	3.1	0.1	-	15.9	5.0	39.5	1.1	0.0	-	45.5	0.1	0.1	0.1	0.0	-	0.3	-
PHF	0.625	0.827	0.768	0.000	-	0.875	0.708	0.458	0.533	0.250	-	0.799	0.750	0.754	0.688	0.000	-	0.782	0.250	0.250	0.250	0.000	-	0.375	0.859
Lights	5	202	66	0	-	273	82	10	26	1	-	119	48	346	8	0	-	402	1	1	1	0	-	3	797
% Lights	100.0	67.1	76.7	-	-	69.6	68.9	90.9	81.3	100.0	-	73.0	94.1	85.6	72.7	-	-	86.3	100.0	100.0	100.0	-	-	100.0	77.8
Buses	0	0	0	0	-	0	0	0	0	0	-	0	0	1	0	0	-	1	0	0	0	0	-	0	1
% Buses	0.0	0.0	0.0	-	-	0.0	0.0	0.0	0.0	0.0	-	0.0	0.0	0.2	0.0	-	-	0.2	0.0	0.0	0.0	-	-	0.0	0.1
Trucks	0	99	20	0	-	119	37	1	6	0	-	44	3	56	3	0	-	62	0	0	0	0	-	0	225
% Trucks	0.0	32.9	23.3	-	-	30.4	31.1	9.1	18.8	0.0	-	27.0	5.9	13.9	27.3	-	-	13.3	0.0	0.0	0.0	-	-	0.0	22.0
Bicycles on Road	0	0	0	0	-	0	0	0	0	0	-	0	0	1	0	0	-	1	0	0	0	0	-	0	1
% Bicycles on Road	0.0	0.0	0.0	-	-	0.0	0.0	0.0	0.0	0.0	-	0.0	0.0	0.2	0.0	-	-	0.2	0.0	0.0	0.0	-	-	0.0	0.1
Bicycles on Crosswalk	-	-	-	-	0	-	-	-	-	-	0	-	-	-	-	-	0	-	-	-	-	-	0	-	-
% Bicycles on Crosswalk	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Pedestrians	-	-	-	-	0	-	-	-	-	-	0	-	-	-	-	-	0	-	-	-	-	-	0	-	-
% Pedestrians	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-

LEA Consulting Ltd.
625 Cochrane Drive

Markam, Ontario, Canada L3R 9R9
905-470-0015 x240 idinsmore@lea.ca

Count Name: 24085_Coleraine Dr & Parr Blvd-AM
Site Code: 24085
Start Date: 09/14/2023



Turning Movement Peak Hour Data Plot (7:00 AM)

LEA Consulting Ltd.
625 Cochrane Drive

Markam, Ontario, Canada L3R 9R9
905-470-0015 x240 idinsmore@lea.ca

Count Name: 24085_Coleraine Dr & Parr Blvd-PM
Site Code: 24085
Start Date: 09/14/2023

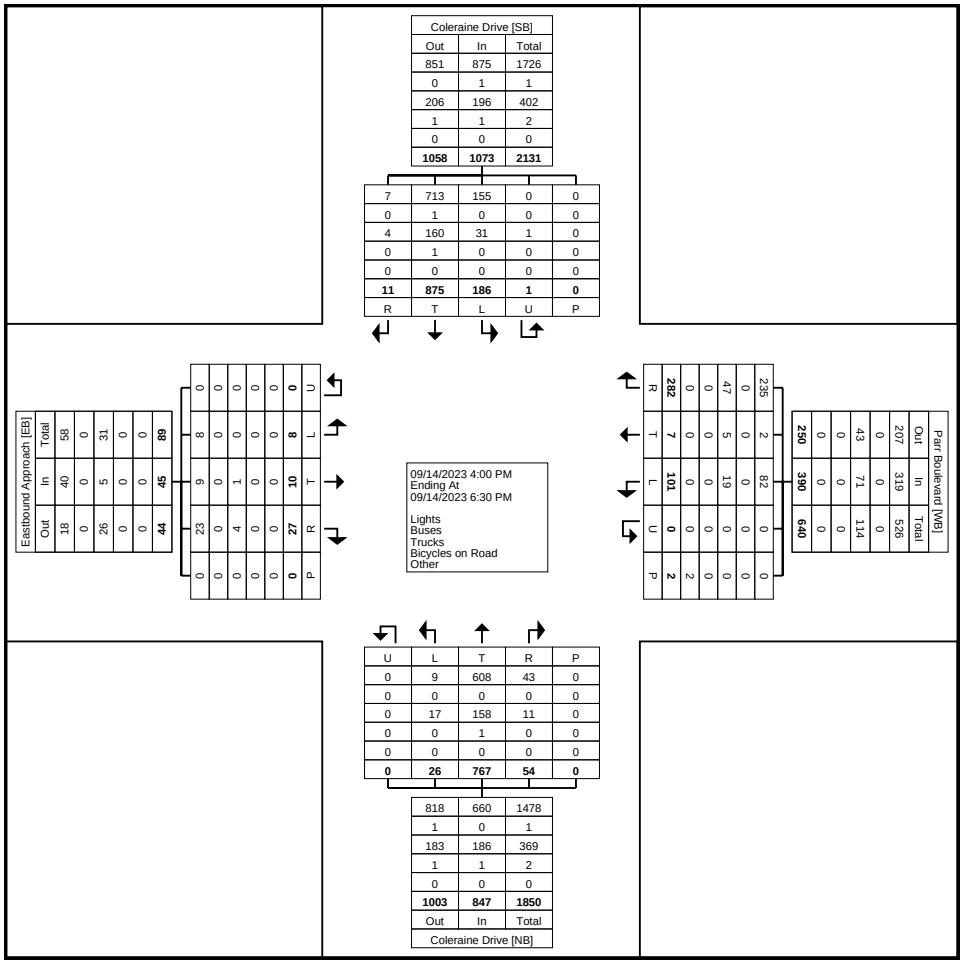
Turning Movement Data

Start Time	Coleraine Drive Southbound						Parr Boulevard Westbound						Coleraine Drive Northbound						Eastbound Approach Eastbound						Int. Total
	Right	Thru	Left	U-Turn	Peds	App. Total	Right	Thru	Left	U-Turn	Peds	App. Total	Right	Thru	Left	U-Turn	Peds	App. Total	Right	Thru	Left	U-Turn	Peds	App. Total	
4:00 PM	0	96	18	0	0	114	33	0	13	0	0	46	5	62	5	0	0	72	3	2	2	0	0	7	239
4:15 PM	1	59	18	0	0	78	31	0	11	0	0	42	3	48	2	0	0	53	2	2	0	0	0	4	177
4:30 PM	2	72	11	0	0	85	23	0	12	0	0	35	5	62	0	0	0	67	4	0	1	0	0	5	192
4:45 PM	1	76	8	0	0	85	26	1	6	0	0	33	5	44	3	0	0	52	1	0	1	0	0	2	172
Hourly Total	4	303	55	0	0	362	113	1	42	0	0	156	18	216	10	0	0	244	10	4	4	0	0	18	780
5:00 PM	1	70	13	0	0	84	45	0	20	0	0	65	12	60	3	0	0	75	3	2	0	0	0	5	229
5:15 PM	2	77	10	1	0	90	29	1	11	0	2	41	4	47	0	0	0	51	1	1	1	0	0	3	185
5:30 PM	1	126	27	0	0	154	21	3	6	0	0	30	4	90	4	0	0	98	3	2	1	0	0	6	288
5:45 PM	1	75	10	0	0	86	23	1	5	0	0	29	5	135	2	0	0	142	7	1	0	0	0	8	265
Hourly Total	5	348	60	1	0	414	118	5	42	0	2	165	25	332	9	0	0	366	14	6	2	0	0	22	967
6:00 PM	2	152	53	0	0	207	20	0	9	0	0	29	8	110	2	0	0	120	1	0	2	0	0	3	359
6:15 PM	0	72	18	0	0	90	31	1	8	0	0	40	3	109	5	0	0	117	2	0	0	0	0	2	249
Grand Total	11	875	186	1	0	1073	282	7	101	0	2	390	54	767	26	0	0	847	27	10	8	0	0	45	2355
Approach %	1.0	81.5	17.3	0.1	-	-	72.3	1.8	25.9	0.0	-	-	6.4	90.6	3.1	0.0	-	-	60.0	22.2	17.8	0.0	-	-	-
Total %	0.5	37.2	7.9	0.0	-	45.6	12.0	0.3	4.3	0.0	-	16.6	2.3	32.6	1.1	0.0	-	36.0	1.1	0.4	0.3	0.0	-	1.9	-
Lights	7	713	155	0	-	875	235	2	82	0	-	319	43	608	9	0	-	660	23	9	8	0	-	40	1894
% Lights	63.6	81.5	83.3	0.0	-	81.5	83.3	28.6	81.2	-	-	81.8	79.6	79.3	34.6	-	-	77.9	85.2	90.0	100.0	-	-	88.9	80.4
Buses	0	1	0	0	-	1	0	0	0	0	-	0	0	0	0	0	-	0	0	0	0	0	-	0	1
% Buses	0.0	0.1	0.0	0.0	-	0.1	0.0	0.0	0.0	-	-	0.0	0.0	0.0	0.0	-	-	0.0	0.0	0.0	0.0	-	-	0.0	0.0
Trucks	4	160	31	1	-	196	47	5	19	0	-	71	11	158	17	0	-	186	4	1	0	0	-	5	458
% Trucks	36.4	18.3	16.7	100.0	-	18.3	16.7	71.4	18.8	-	-	18.2	20.4	20.6	65.4	-	-	22.0	14.8	10.0	0.0	-	-	11.1	19.4
Bicycles on Road	0	1	0	0	-	1	0	0	0	0	-	0	0	1	0	0	-	1	0	0	0	0	-	0	2
% Bicycles on Road	0.0	0.1	0.0	0.0	-	0.1	0.0	0.0	0.0	-	-	0.0	0.0	0.1	0.0	-	-	0.1	0.0	0.0	0.0	-	-	0.0	0.1
Bicycles on Crosswalk	-	-	-	-	0	-	-	-	-	-	0	-	-	-	-	-	0	-	-	-	-	-	0	-	-
% Bicycles on Crosswalk	-	-	-	-	-	-	-	-	-	-	0.0	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Pedestrians	-	-	-	-	0	-	-	-	-	-	2	-	-	-	-	-	0	-	-	-	-	-	0	-	-
% Pedestrians	-	-	-	-	-	-	-	-	-	-	100.0	-	-	-	-	-	-	-	-	-	-	-	-	-	-

LEA Consulting Ltd.
625 Cochrane Drive

Markam, Ontario, Canada L3R 9R9
905-470-0015 x240 idinsmore@lea.ca

Count Name: 24085_Coleraine Dr & Parr Blvd-PM
Site Code: 24085
Start Date: 09/14/2023



Turning Movement Data Plot

LEA Consulting Ltd.
625 Cochrane Drive

Markam, Ontario, Canada L3R 9R9
905-470-0015 x240 idinsmore@lea.ca

Count Name: 24085_Coleraine Dr & Parr Blvd-PM
Site Code: 24085
Start Date: 09/14/2023

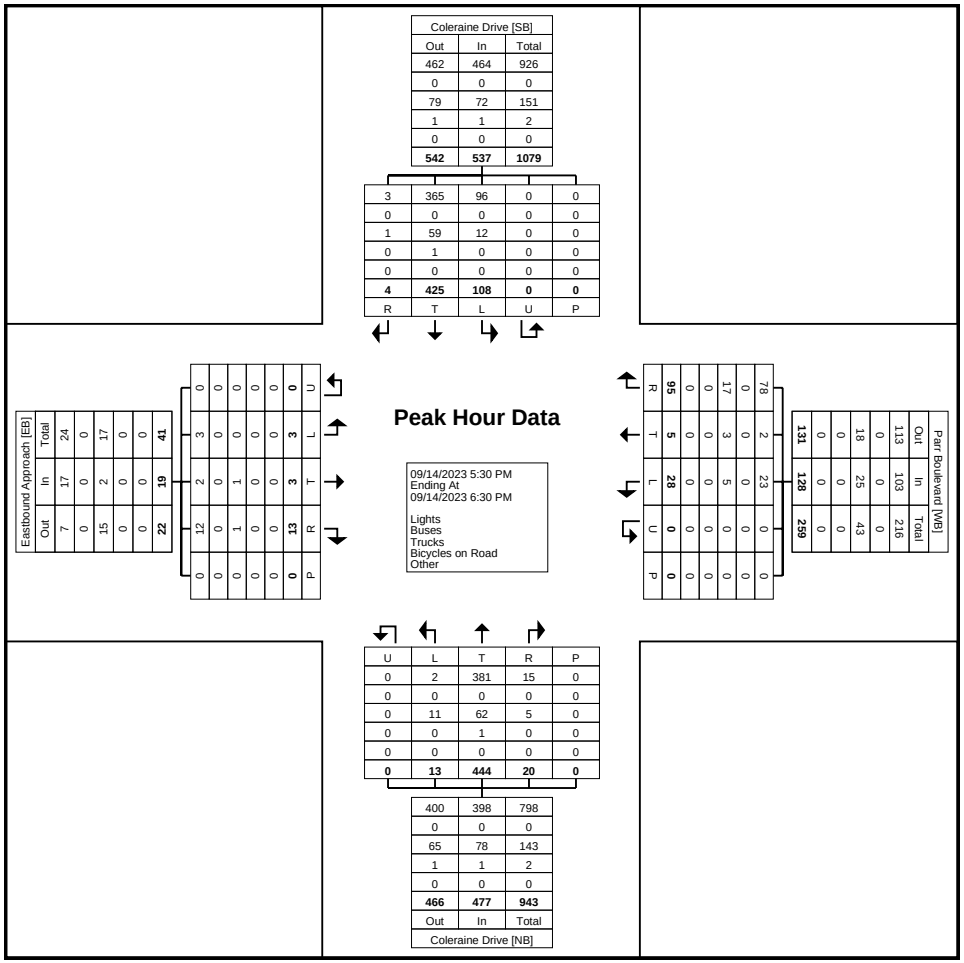
Turning Movement Peak Hour Data (5:30 PM)

Start Time	Coleraine Drive Southbound						Parr Boulevard Westbound						Coleraine Drive Northbound						Eastbound Approach Eastbound						Int. Total
	Right	Thru	Left	U-Turn	Peds	App. Total	Right	Thru	Left	U-Turn	Peds	App. Total	Right	Thru	Left	U-Turn	Peds	App. Total	Right	Thru	Left	U-Turn	Peds	App. Total	
5:30 PM	1	126	27	0	0	154	21	3	6	0	0	30	4	90	4	0	0	98	3	2	1	0	0	6	288
5:45 PM	1	75	10	0	0	86	23	1	5	0	0	29	5	135	2	0	0	142	7	1	0	0	0	8	265
6:00 PM	2	152	53	0	0	207	20	0	9	0	0	29	8	110	2	0	0	120	1	0	2	0	0	3	359
6:15 PM	0	72	18	0	0	90	31	1	8	0	0	40	3	109	5	0	0	117	2	0	0	0	0	2	249
Total	4	425	108	0	0	537	95	5	28	0	0	128	20	444	13	0	0	477	13	3	3	0	0	19	1161
Approach %	0.7	79.1	20.1	0.0	-	-	74.2	3.9	21.9	0.0	-	-	4.2	93.1	2.7	0.0	-	-	68.4	15.8	15.8	0.0	-	-	-
Total %	0.3	36.6	9.3	0.0	-	46.3	8.2	0.4	2.4	0.0	-	11.0	1.7	38.2	1.1	0.0	-	41.1	1.1	0.3	0.3	0.0	-	1.6	-
PHF	0.500	0.699	0.509	0.000	-	0.649	0.766	0.417	0.778	0.000	-	0.800	0.625	0.822	0.650	0.000	-	0.840	0.464	0.375	0.375	0.000	-	0.594	0.808
Lights	3	365	96	0	-	464	78	2	23	0	-	103	15	381	2	0	-	398	12	2	3	0	-	17	982
% Lights	75.0	85.9	88.9	-	-	86.4	82.1	40.0	82.1	-	-	80.5	75.0	85.8	15.4	-	-	83.4	92.3	66.7	100.0	-	-	89.5	84.6
Buses	0	0	0	0	-	0	0	0	0	0	-	0	0	0	0	0	-	0	0	0	0	0	-	0	0
% Buses	0.0	0.0	0.0	-	-	0.0	0.0	0.0	0.0	-	-	0.0	0.0	0.0	0.0	-	-	0.0	0.0	0.0	0.0	-	-	0.0	0.0
Trucks	1	59	12	0	-	72	17	3	5	0	-	25	5	62	11	0	-	78	1	1	0	0	-	2	177
% Trucks	25.0	13.9	11.1	-	-	13.4	17.9	60.0	17.9	-	-	19.5	25.0	14.0	84.6	-	-	16.4	7.7	33.3	0.0	-	-	10.5	15.2
Bicycles on Road	0	1	0	0	-	1	0	0	0	0	-	0	0	1	0	0	-	1	0	0	0	0	-	0	2
% Bicycles on Road	0.0	0.2	0.0	-	-	0.2	0.0	0.0	0.0	-	-	0.0	0.0	0.2	0.0	-	-	0.2	0.0	0.0	0.0	-	-	0.0	0.2
Bicycles on Crosswalk	-	-	-	-	0	-	-	-	-	-	0	-	-	-	-	-	0	-	-	-	-	-	0	-	-
% Bicycles on Crosswalk	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Pedestrians	-	-	-	-	0	-	-	-	-	-	0	-	-	-	-	-	0	-	-	-	-	-	0	-	-
% Pedestrians	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-

LEA Consulting Ltd.
625 Cochrane Drive

Markam, Ontario, Canada L3R 9R9
905-470-0015 x240 idinsmore@lea.ca

Count Name: 24085_Coleraine Dr & Parr Blvd-PM
Site Code: 24085
Start Date: 09/14/2023



Turning Movement Peak Hour Data Plot (5:30 PM)

LEA Consulting Ltd.
625 Cochrane Drive

Markam, Ontario, Canada L3R 9R9
905-470-0015 x240 idinsmore@lea.ca

Count Name: 24085_Coleraine Dr & Parr Blvd-SAT
Site Code: 24085
Start Date: 09/16/2023

Turning Movement Data

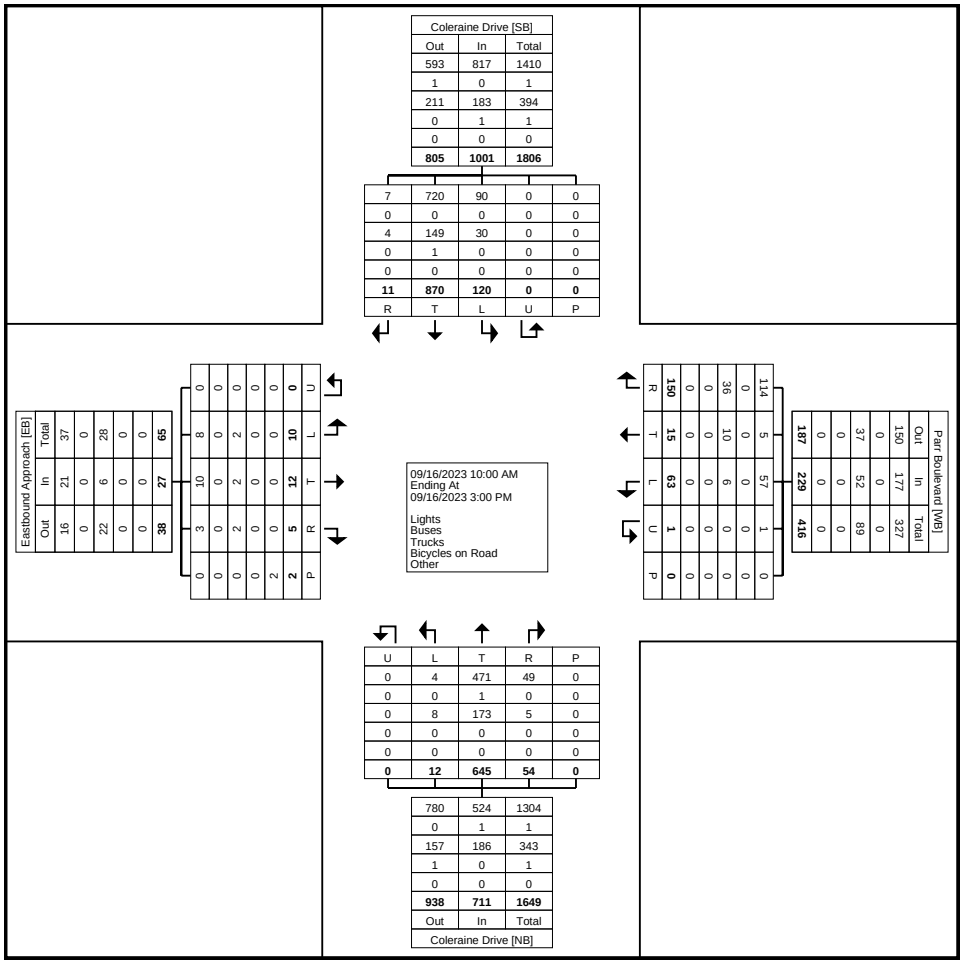
Start Time	Coleraine Drive Southbound						Parr Boulevard Westbound						Coleraine Drive Northbound						Eastbound Approach Eastbound						Int. Total
	Right	Thru	Left	U-Turn	Peds	App. Total	Right	Thru	Left	U-Turn	Peds	App. Total	Right	Thru	Left	U-Turn	Peds	App. Total	Right	Thru	Left	U-Turn	Peds	App. Total	
10:00 AM	0	47	13	0	0	60	5	0	1	0	0	6	5	26	0	0	0	31	0	0	0	0	0	0	97
10:15 AM	0	45	6	0	0	51	4	1	1	0	0	6	1	27	0	0	0	28	0	0	0	0	1	0	85
10:30 AM	0	31	11	0	0	42	6	2	1	0	0	9	3	39	0	0	0	42	1	1	0	0	1	2	95
10:45 AM	0	38	4	0	0	42	13	2	2	0	0	17	2	26	2	0	0	30	0	1	0	0	0	1	90
Hourly Total	0	161	34	0	0	195	28	5	5	0	0	38	11	118	2	0	0	131	1	2	0	0	2	3	367
11:00 AM	2	42	5	0	0	49	4	1	2	0	0	7	2	21	1	0	0	24	1	1	0	0	0	2	82
11:15 AM	1	37	5	0	0	43	10	1	5	0	0	16	2	33	1	0	0	36	0	0	2	0	0	2	97
11:30 AM	0	41	5	0	0	46	12	3	2	0	0	17	5	29	0	0	0	34	0	3	0	0	0	3	100
11:45 AM	2	35	9	0	0	46	9	2	7	0	0	18	6	30	0	0	0	36	1	1	0	0	0	2	102
Hourly Total	5	155	24	0	0	184	35	7	16	0	0	58	15	113	2	0	0	130	2	5	2	0	0	9	381
12:00 PM	1	37	7	0	0	45	8	0	3	1	0	12	4	52	0	0	0	56	0	0	0	0	0	0	113
12:15 PM	2	47	4	0	0	53	4	0	6	0	0	10	8	25	1	0	0	34	0	1	1	0	0	2	99
12:30 PM	0	44	6	0	0	50	8	0	2	0	0	10	1	32	2	0	0	35	0	1	0	0	0	1	96
12:45 PM	0	39	0	0	0	39	6	1	3	0	0	10	2	38	1	0	0	41	0	0	0	0	0	0	90
Hourly Total	3	167	17	0	0	187	26	1	14	1	0	42	15	147	4	0	0	166	0	2	1	0	0	3	398
1:00 PM	0	53	11	0	0	64	10	0	5	0	0	15	2	35	2	0	0	39	0	0	2	0	0	2	120
1:15 PM	0	41	3	0	0	44	9	0	0	0	0	9	1	26	0	0	0	27	1	0	2	0	0	3	83
1:30 PM	1	50	3	0	0	54	8	1	5	0	0	14	3	36	1	0	0	40	0	0	2	0	0	2	110
1:45 PM	0	54	6	0	0	60	7	0	3	0	0	10	4	31	0	0	0	35	0	0	0	0	0	0	105
Hourly Total	1	198	23	0	0	222	34	1	13	0	0	48	10	128	3	0	0	141	1	0	6	0	0	7	418
2:00 PM	1	41	2	0	0	44	10	0	5	0	0	15	1	31	0	0	0	32	0	0	1	0	0	1	92
2:15 PM	0	47	8	0	0	55	7	1	7	0	0	15	1	32	1	0	0	34	0	1	0	0	0	1	105
2:30 PM	1	66	6	0	0	73	4	0	2	0	0	6	0	37	0	0	0	37	1	0	0	0	0	1	117
2:45 PM	0	35	6	0	0	41	6	0	1	0	0	7	1	39	0	0	0	40	0	2	0	0	0	2	90
Hourly Total	2	189	22	0	0	213	27	1	15	0	0	43	3	139	1	0	0	143	1	3	1	0	0	5	404
Grand Total	11	870	120	0	0	1001	150	15	63	1	0	229	54	645	12	0	0	711	5	12	10	0	2	27	1968
Approach %	1.1	86.9	12.0	0.0	-	-	65.5	6.6	27.5	0.4	-	-	7.6	90.7	1.7	0.0	-	-	18.5	44.4	37.0	0.0	-	-	-
Total %	0.6	44.2	6.1	0.0	-	50.9	7.6	0.8	3.2	0.1	-	11.6	2.7	32.8	0.6	0.0	-	36.1	0.3	0.6	0.5	0.0	-	1.4	-
Lights	7	720	90	0	-	817	114	5	57	1	-	177	49	471	4	0	-	524	3	10	8	0	-	21	1539
% Lights	63.6	82.8	75.0	-	-	81.6	76.0	33.3	90.5	100.0	-	77.3	90.7	73.0	33.3	-	-	73.7	60.0	83.3	80.0	-	-	77.8	78.2
Buses	0	0	0	0	-	0	0	0	0	0	-	0	0	1	0	0	-	1	0	0	0	0	-	0	1
% Buses	0.0	0.0	0.0	-	-	0.0	0.0	0.0	0.0	0.0	-	0.0	0.0	0.2	0.0	-	-	0.1	0.0	0.0	0.0	-	-	0.0	0.1
Trucks	4	149	30	0	-	183	36	10	6	0	-	52	5	173	8	0	-	186	2	2	2	0	-	6	427
% Trucks	36.4	17.1	25.0	-	-	18.3	24.0	66.7	9.5	0.0	-	22.7	9.3	26.8	66.7	-	-	26.2	40.0	16.7	20.0	-	-	22.2	21.7
Bicycles on Road	0	1	0	0	-	1	0	0	0	0	-	0	0	0	0	0	-	0	0	0	0	0	-	0	1

% Bicycles on Road	0.0	0.1	0.0	-	-	0.1	0.0	0.0	0.0	0.0	-	0.0	0.0	0.0	0.0	-	-	0.0	0.0	0.0	0.0	-	-	0.0	0.1
Bicycles on Crosswalk	-	-	-	-	0	-	-	-	-	-	0	-	-	-	-	-	0	-	-	-	-	-	0	-	-
% Bicycles on Crosswalk	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	0.0	-	-
Pedestrians	-	-	-	-	0	-	-	-	-	-	0	-	-	-	-	-	0	-	-	-	-	-	2	-	-
% Pedestrians	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	100.0	-	-

LEA Consulting Ltd.
625 Cochrane Drive

Markam, Ontario, Canada L3R 9R9
905-470-0015 x240 idinsmore@lea.ca

Count Name: 24085_Coleraine Dr & Parr Blvd-SAT
Site Code: 24085
Start Date: 09/16/2023



Turning Movement Data Plot

LEA Consulting Ltd.
625 Cochrane Drive

Markam, Ontario, Canada L3R 9R9
905-470-0015 x240 idinsmore@lea.ca

Count Name: 24085_Coleraine Dr & Parr Blvd-SAT
Site Code: 24085
Start Date: 09/16/2023

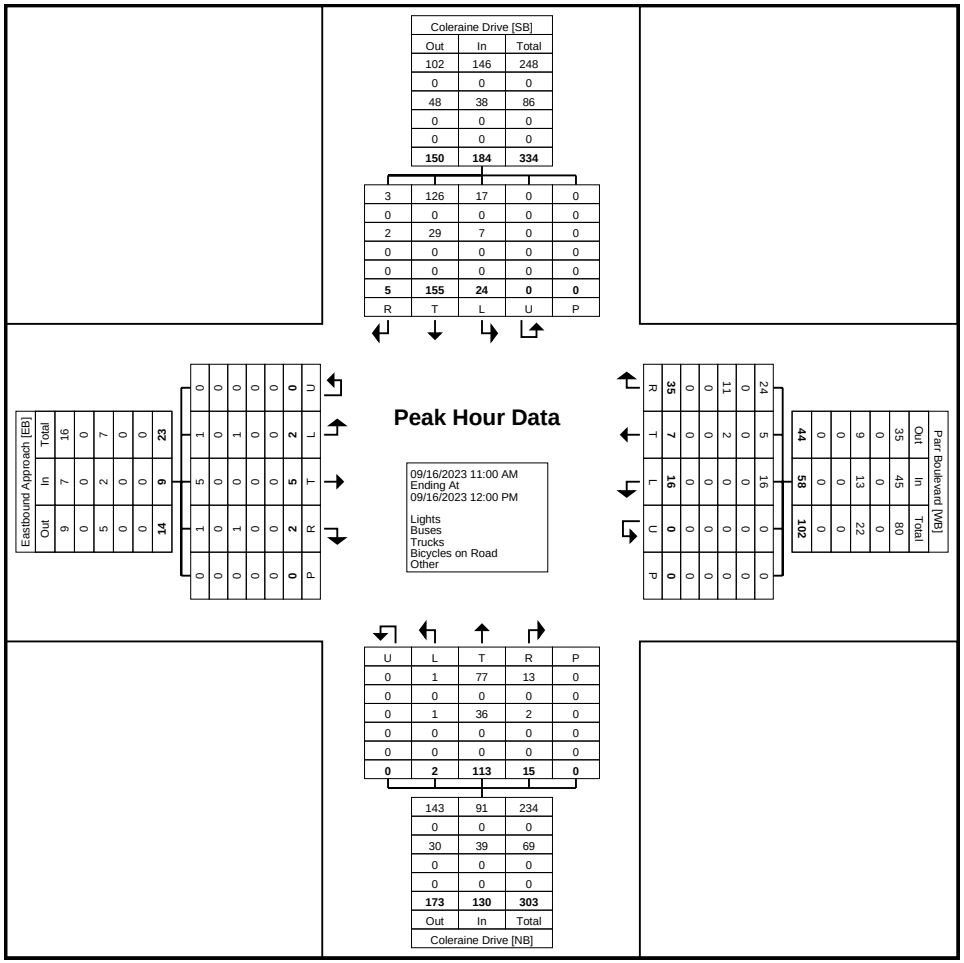
Turning Movement Peak Hour Data (11:00 AM)

Start Time	Coleraine Drive Southbound						Parr Boulevard Westbound						Coleraine Drive Northbound						Eastbound Approach Eastbound						Int. Total
	Right	Thru	Left	U-Turn	Peds	App. Total	Right	Thru	Left	U-Turn	Peds	App. Total	Right	Thru	Left	U-Turn	Peds	App. Total	Right	Thru	Left	U-Turn	Peds	App. Total	
11:00 AM	2	42	5	0	0	49	4	1	2	0	0	7	2	21	1	0	0	24	1	1	0	0	0	2	82
11:15 AM	1	37	5	0	0	43	10	1	5	0	0	16	2	33	1	0	0	36	0	0	2	0	0	2	97
11:30 AM	0	41	5	0	0	46	12	3	2	0	0	17	5	29	0	0	0	34	0	3	0	0	0	3	100
11:45 AM	2	35	9	0	0	46	9	2	7	0	0	18	6	30	0	0	0	36	1	1	0	0	0	2	102
Total	5	155	24	0	0	184	35	7	16	0	0	58	15	113	2	0	0	130	2	5	2	0	0	9	381
Approach %	2.7	84.2	13.0	0.0	-	-	60.3	12.1	27.6	0.0	-	-	11.5	86.9	1.5	0.0	-	-	22.2	55.6	22.2	0.0	-	-	-
Total %	1.3	40.7	6.3	0.0	-	48.3	9.2	1.8	4.2	0.0	-	15.2	3.9	29.7	0.5	0.0	-	34.1	0.5	1.3	0.5	0.0	-	2.4	-
PHF	0.625	0.923	0.667	0.000	-	0.939	0.729	0.583	0.571	0.000	-	0.806	0.625	0.856	0.500	0.000	-	0.903	0.500	0.417	0.250	0.000	-	0.750	0.934
Lights	3	126	17	0	-	146	24	5	16	0	-	45	13	77	1	0	-	91	1	5	1	0	-	7	289
% Lights	60.0	81.3	70.8	-	-	79.3	68.6	71.4	100.0	-	-	77.6	86.7	68.1	50.0	-	-	70.0	50.0	100.0	50.0	-	-	77.8	75.9
Buses	0	0	0	0	-	0	0	0	0	0	-	0	0	0	0	0	-	0	0	0	0	0	-	0	0
% Buses	0.0	0.0	0.0	-	-	0.0	0.0	0.0	0.0	-	-	0.0	0.0	0.0	0.0	-	-	0.0	0.0	0.0	0.0	-	-	0.0	0.0
Trucks	2	29	7	0	-	38	11	2	0	0	-	13	2	36	1	0	-	39	1	0	1	0	-	2	92
% Trucks	40.0	18.7	29.2	-	-	20.7	31.4	28.6	0.0	-	-	22.4	13.3	31.9	50.0	-	-	30.0	50.0	0.0	50.0	-	-	22.2	24.1
Bicycles on Road	0	0	0	0	-	0	0	0	0	0	-	0	0	0	0	0	-	0	0	0	0	0	-	0	0
% Bicycles on Road	0.0	0.0	0.0	-	-	0.0	0.0	0.0	0.0	-	-	0.0	0.0	0.0	0.0	-	-	0.0	0.0	0.0	0.0	-	-	0.0	0.0
Bicycles on Crosswalk	-	-	-	-	0	-	-	-	-	-	0	-	-	-	-	-	0	-	-	-	-	-	0	-	-
% Bicycles on Crosswalk	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Pedestrians	-	-	-	-	0	-	-	-	-	-	0	-	-	-	-	-	0	-	-	-	-	-	0	-	-
% Pedestrians	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-

LEA Consulting Ltd.
625 Cochrane Drive

Markam, Ontario, Canada L3R 9R9
905-470-0015 x240 idinsmore@lea.ca

Count Name: 24085_Coleraine Dr & Parr Blvd-SAT
Site Code: 24085
Start Date: 09/16/2023



Turning Movement Peak Hour Data Plot (11:00 AM)

LEA Consulting Ltd.
625 Cochrane Drive

Markam, Ontario, Canada L3R 9R9
905-470-0015 x240 idinsmore@lea.ca

Count Name: 24085_Coleraine Dr & Parr Blvd-SAT
Site Code: 24085
Start Date: 09/16/2023

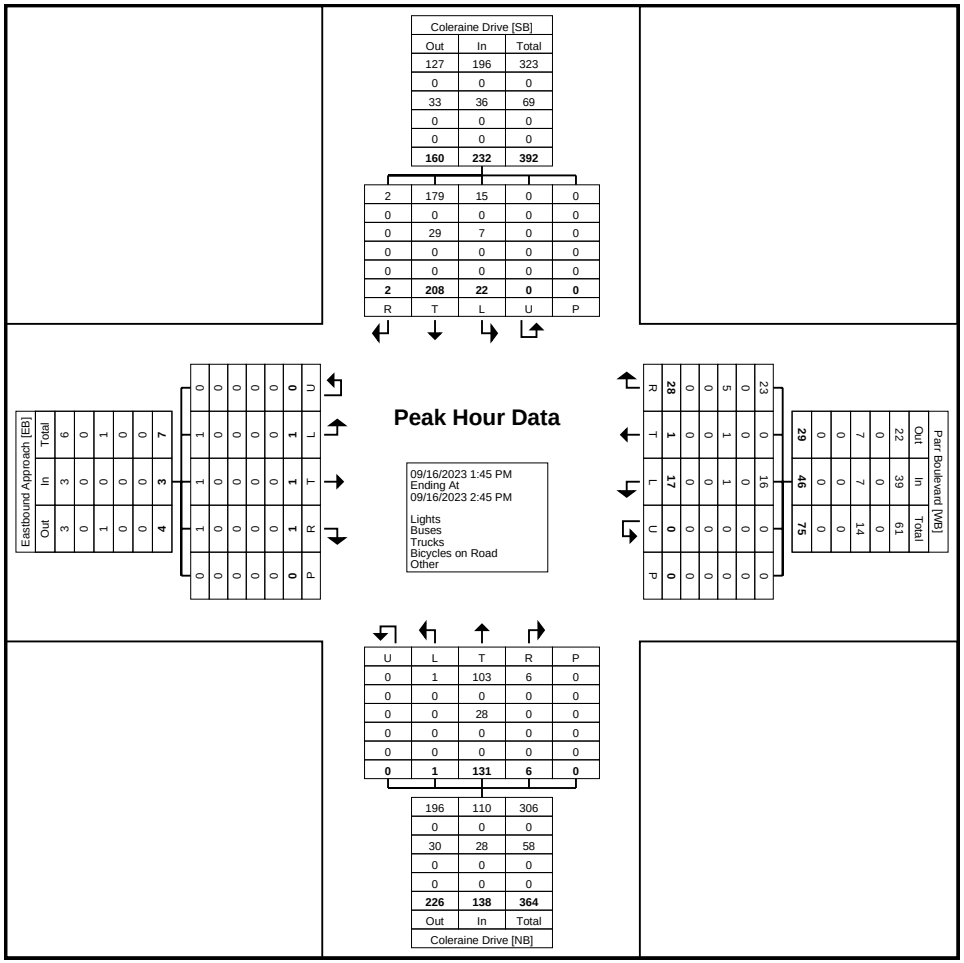
Turning Movement Peak Hour Data (1:45 PM)

Start Time	Coleraine Drive Southbound						Parr Boulevard Westbound						Coleraine Drive Northbound						Eastbound Approach Eastbound						Int. Total
	Right	Thru	Left	U-Turn	Peds	App. Total	Right	Thru	Left	U-Turn	Peds	App. Total	Right	Thru	Left	U-Turn	Peds	App. Total	Right	Thru	Left	U-Turn	Peds	App. Total	
1:45 PM	0	54	6	0	0	60	7	0	3	0	0	10	4	31	0	0	0	35	0	0	0	0	0	0	105
2:00 PM	1	41	2	0	0	44	10	0	5	0	0	15	1	31	0	0	0	32	0	0	1	0	0	1	92
2:15 PM	0	47	8	0	0	55	7	1	7	0	0	15	1	32	1	0	0	34	0	1	0	0	0	1	105
2:30 PM	1	66	6	0	0	73	4	0	2	0	0	6	0	37	0	0	0	37	1	0	0	0	0	1	117
Total	2	208	22	0	0	232	28	1	17	0	0	46	6	131	1	0	0	138	1	1	1	0	0	3	419
Approach %	0.9	89.7	9.5	0.0	-	-	60.9	2.2	37.0	0.0	-	-	4.3	94.9	0.7	0.0	-	-	33.3	33.3	33.3	0.0	-	-	-
Total %	0.5	49.6	5.3	0.0	-	55.4	6.7	0.2	4.1	0.0	-	11.0	1.4	31.3	0.2	0.0	-	32.9	0.2	0.2	0.2	0.0	-	0.7	-
PHF	0.500	0.788	0.688	0.000	-	0.795	0.700	0.250	0.607	0.000	-	0.767	0.375	0.885	0.250	0.000	-	0.932	0.250	0.250	0.250	0.000	-	0.750	0.895
Lights	2	179	15	0	-	196	23	0	16	0	-	39	6	103	1	0	-	110	1	1	1	0	-	3	348
% Lights	100.0	86.1	68.2	-	-	84.5	82.1	0.0	94.1	-	-	84.8	100.0	78.6	100.0	-	-	79.7	100.0	100.0	100.0	-	-	100.0	83.1
Buses	0	0	0	0	-	0	0	0	0	0	-	0	0	0	0	0	-	0	0	0	0	0	-	0	0
% Buses	0.0	0.0	0.0	-	-	0.0	0.0	0.0	0.0	-	-	0.0	0.0	0.0	0.0	-	-	0.0	0.0	0.0	0.0	-	-	0.0	0.0
Trucks	0	29	7	0	-	36	5	1	1	0	-	7	0	28	0	0	-	28	0	0	0	0	-	0	71
% Trucks	0.0	13.9	31.8	-	-	15.5	17.9	100.0	5.9	-	-	15.2	0.0	21.4	0.0	-	-	20.3	0.0	0.0	0.0	-	-	0.0	16.9
Bicycles on Road	0	0	0	0	-	0	0	0	0	0	-	0	0	0	0	0	-	0	0	0	0	0	-	0	0
% Bicycles on Road	0.0	0.0	0.0	-	-	0.0	0.0	0.0	0.0	-	-	0.0	0.0	0.0	0.0	-	-	0.0	0.0	0.0	0.0	-	-	0.0	0.0
Bicycles on Crosswalk	-	-	-	-	0	-	-	-	-	-	0	-	-	-	-	-	0	-	-	-	-	-	0	-	-
% Bicycles on Crosswalk	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Pedestrians	-	-	-	-	0	-	-	-	-	-	0	-	-	-	-	-	0	-	-	-	-	-	0	-	-
% Pedestrians	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-

LEA Consulting Ltd.
625 Cochrane Drive

Markam, Ontario, Canada L3R 9R9
905-470-0015 x240 idinsmore@lea.ca

Count Name: 24085_Coleraine Dr & Parr Blvd-SAT
Site Code: 24085
Start Date: 09/16/2023



Turning Movement Peak Hour Data Plot (1:45 PM)

LEA Consulting Ltd.
625 Cochrane Drive

Markam, Ontario, Canada L3R 9R9
905-470-0015 x240 idinsmore@lea.ca

Count Name: 24085_Simpson Rd & Parr Blvd-AM
Site Code: 24085
Start Date: 09/14/2023

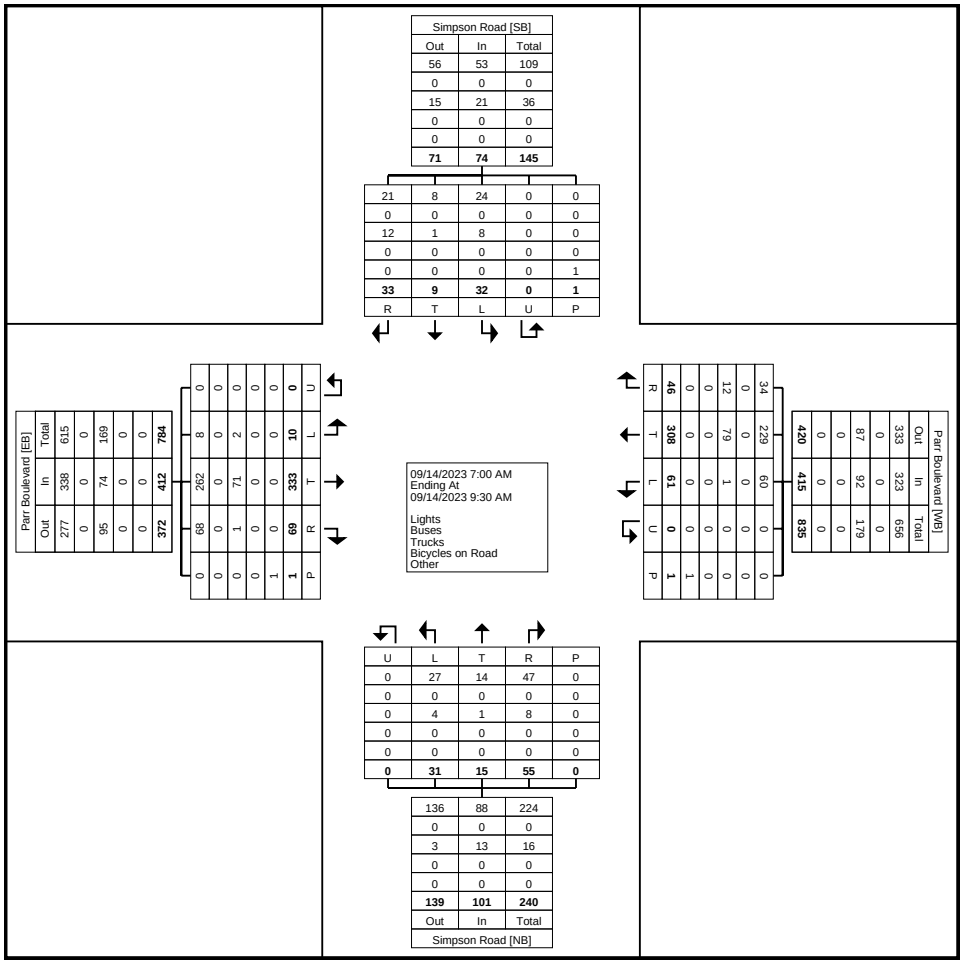
Turning Movement Data

Start Time	Simpson Road Southbound						Parr Boulevard Westbound						Simpson Road Northbound						Parr Boulevard Eastbound						Int. Total
	Right	Thru	Left	U-Turn	Peds	App. Total	Right	Thru	Left	U-Turn	Peds	App. Total	Right	Thru	Left	U-Turn	Peds	App. Total	Right	Thru	Left	U-Turn	Peds	App. Total	
7:00 AM	3	1	2	0	0	6	4	37	1	0	1	42	1	0	1	0	0	2	3	27	1	0	0	31	81
7:15 AM	4	0	1	0	0	5	4	47	2	0	0	53	0	2	0	0	0	2	3	14	1	0	0	18	78
7:30 AM	4	0	1	0	0	5	2	34	1	0	0	37	1	0	1	0	0	2	4	39	0	0	1	43	87
7:45 AM	3	2	3	0	0	8	2	25	8	0	0	35	2	2	3	0	0	7	5	37	1	0	0	43	93
Hourly Total	14	3	7	0	0	24	12	143	12	0	1	167	4	4	5	0	0	13	15	117	3	0	1	135	339
8:00 AM	3	1	3	0	0	7	5	16	6	0	0	27	0	1	2	0	0	3	11	39	1	0	0	51	88
8:15 AM	5	1	3	0	0	9	4	30	11	0	0	45	4	2	3	0	0	9	17	37	1	0	0	55	118
8:30 AM	4	2	2	0	1	8	3	30	16	0	0	49	27	6	12	0	0	45	10	33	1	0	0	44	146
8:45 AM	1	1	6	0	0	8	7	35	3	0	0	45	10	1	5	0	0	16	9	36	2	0	0	47	116
Hourly Total	13	5	14	0	1	32	19	111	36	0	0	166	41	10	22	0	0	73	47	145	5	0	0	197	468
9:00 AM	2	1	5	0	0	8	7	31	11	0	0	49	6	0	1	0	0	7	5	36	0	0	0	41	105
9:15 AM	4	0	6	0	0	10	8	23	2	0	0	33	4	1	3	0	0	8	2	35	2	0	0	39	90
Grand Total	33	9	32	0	1	74	46	308	61	0	1	415	55	15	31	0	0	101	69	333	10	0	1	412	1002
Approach %	44.6	12.2	43.2	0.0	-	-	11.1	74.2	14.7	0.0	-	-	54.5	14.9	30.7	0.0	-	-	16.7	80.8	2.4	0.0	-	-	-
Total %	3.3	0.9	3.2	0.0	-	7.4	4.6	30.7	6.1	0.0	-	41.4	5.5	1.5	3.1	0.0	-	10.1	6.9	33.2	1.0	0.0	-	41.1	-
Lights	21	8	24	0	-	53	34	229	60	0	-	323	47	14	27	0	-	88	68	262	8	0	-	338	802
% Lights	63.6	88.9	75.0	-	-	71.6	73.9	74.4	98.4	-	-	77.8	85.5	93.3	87.1	-	-	87.1	98.6	78.7	80.0	-	-	82.0	80.0
Buses	0	0	0	0	-	0	0	0	0	0	-	0	0	0	0	0	-	0	0	0	0	0	-	0	0
% Buses	0.0	0.0	0.0	-	-	0.0	0.0	0.0	0.0	-	-	0.0	0.0	0.0	0.0	-	-	0.0	0.0	0.0	0.0	-	-	0.0	0.0
Trucks	12	1	8	0	-	21	12	79	1	0	-	92	8	1	4	0	-	13	1	71	2	0	-	74	200
% Trucks	36.4	11.1	25.0	-	-	28.4	26.1	25.6	1.6	-	-	22.2	14.5	6.7	12.9	-	-	12.9	1.4	21.3	20.0	-	-	18.0	20.0
Bicycles on Road	0	0	0	0	-	0	0	0	0	0	-	0	0	0	0	0	-	0	0	0	0	0	-	0	0
% Bicycles on Road	0.0	0.0	0.0	-	-	0.0	0.0	0.0	0.0	-	-	0.0	0.0	0.0	0.0	-	-	0.0	0.0	0.0	0.0	-	-	0.0	0.0
Bicycles on Crosswalk	-	-	-	-	0	-	-	-	-	-	0	-	-	-	-	-	0	-	-	-	-	-	0	-	-
% Bicycles on Crosswalk	-	-	-	-	0.0	-	-	-	-	-	0.0	-	-	-	-	-	-	-	-	-	-	-	0.0	-	-
Pedestrians	-	-	-	-	1	-	-	-	-	-	1	-	-	-	-	-	0	-	-	-	-	-	1	-	-
% Pedestrians	-	-	-	-	100.0	-	-	-	-	-	100.0	-	-	-	-	-	-	-	-	-	-	-	100.0	-	-

LEA Consulting Ltd.
625 Cochrane Drive

Markam, Ontario, Canada L3R 9R9
905-470-0015 x240 idinsmore@lea.ca

Count Name: 24085_Simpson Rd & Parr Blvd-AM
Site Code: 24085
Start Date: 09/14/2023



Turning Movement Data Plot

LEA Consulting Ltd.
625 Cochrane Drive

Markam, Ontario, Canada L3R 9R9
905-470-0015 x240 idinsmore@lea.ca

Count Name: 24085_Simpson Rd & Parr Blvd-AM
Site Code: 24085
Start Date: 09/14/2023

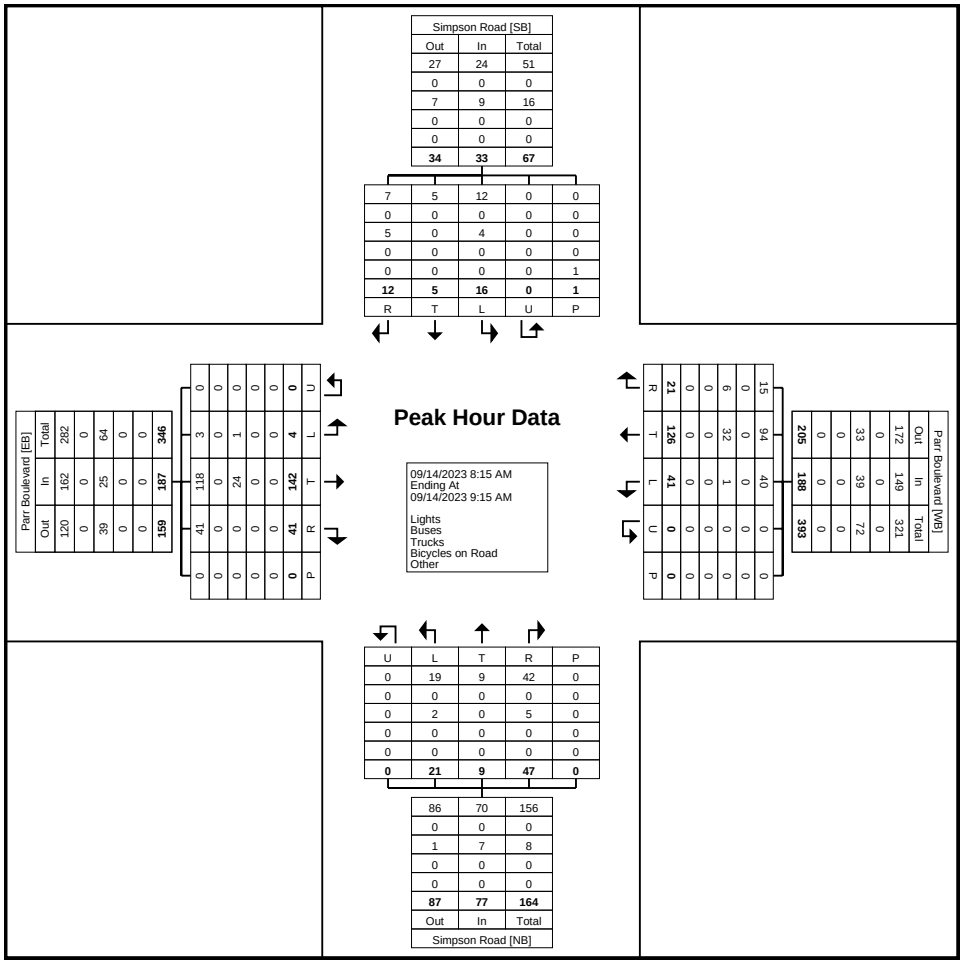
Turning Movement Peak Hour Data (8:15 AM)

Start Time	Simpson Road Southbound						Parr Boulevard Westbound						Simpson Road Northbound						Parr Boulevard Eastbound						Int. Total
	Right	Thru	Left	U-Turn	Peds	App. Total	Right	Thru	Left	U-Turn	Peds	App. Total	Right	Thru	Left	U-Turn	Peds	App. Total	Right	Thru	Left	U-Turn	Peds	App. Total	
8:15 AM	5	1	3	0	0	9	4	30	11	0	0	45	4	2	3	0	0	9	17	37	1	0	0	55	118
8:30 AM	4	2	2	0	1	8	3	30	16	0	0	49	27	6	12	0	0	45	10	33	1	0	0	44	146
8:45 AM	1	1	6	0	0	8	7	35	3	0	0	45	10	1	5	0	0	16	9	36	2	0	0	47	116
9:00 AM	2	1	5	0	0	8	7	31	11	0	0	49	6	0	1	0	0	7	5	36	0	0	0	41	105
Total	12	5	16	0	1	33	21	126	41	0	0	188	47	9	21	0	0	77	41	142	4	0	0	187	485
Approach %	36.4	15.2	48.5	0.0	-	-	11.2	67.0	21.8	0.0	-	-	61.0	11.7	27.3	0.0	-	-	21.9	75.9	2.1	0.0	-	-	-
Total %	2.5	1.0	3.3	0.0	-	6.8	4.3	26.0	8.5	0.0	-	38.8	9.7	1.9	4.3	0.0	-	15.9	8.5	29.3	0.8	0.0	-	38.6	-
PHF	0.600	0.625	0.667	0.000	-	0.917	0.750	0.900	0.641	0.000	-	0.959	0.435	0.375	0.438	0.000	-	0.428	0.603	0.959	0.500	0.000	-	0.850	0.830
Lights	7	5	12	0	-	24	15	94	40	0	-	149	42	9	19	0	-	70	41	118	3	0	-	162	405
% Lights	58.3	100.0	75.0	-	-	72.7	71.4	74.6	97.6	-	-	79.3	89.4	100.0	90.5	-	-	90.9	100.0	83.1	75.0	-	-	86.6	83.5
Buses	0	0	0	0	-	0	0	0	0	0	-	0	0	0	0	0	-	0	0	0	0	0	-	0	0
% Buses	0.0	0.0	0.0	-	-	0.0	0.0	0.0	0.0	-	-	0.0	0.0	0.0	0.0	-	-	0.0	0.0	0.0	0.0	-	-	0.0	0.0
Trucks	5	0	4	0	-	9	6	32	1	0	-	39	5	0	2	0	-	7	0	24	1	0	-	25	80
% Trucks	41.7	0.0	25.0	-	-	27.3	28.6	25.4	2.4	-	-	20.7	10.6	0.0	9.5	-	-	9.1	0.0	16.9	25.0	-	-	13.4	16.5
Bicycles on Road	0	0	0	0	-	0	0	0	0	0	-	0	0	0	0	0	-	0	0	0	0	0	-	0	0
% Bicycles on Road	0.0	0.0	0.0	-	-	0.0	0.0	0.0	0.0	-	-	0.0	0.0	0.0	0.0	-	-	0.0	0.0	0.0	0.0	-	-	0.0	0.0
Bicycles on Crosswalk	-	-	-	-	0	-	-	-	-	-	0	-	-	-	-	-	0	-	-	-	-	-	0	-	-
% Bicycles on Crosswalk	-	-	-	-	0.0	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Pedestrians	-	-	-	-	1	-	-	-	-	-	0	-	-	-	-	-	0	-	-	-	-	-	0	-	-
% Pedestrians	-	-	-	-	100.0	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-

LEA Consulting Ltd.
625 Cochrane Drive

Markam, Ontario, Canada L3R 9R9
905-470-0015 x240 idinsmore@lea.ca

Count Name: 24085_Simpson Rd & Parr Blvd-AM
Site Code: 24085
Start Date: 09/14/2023



Turning Movement Peak Hour Data Plot (8:15 AM)

LEA Consulting Ltd.
625 Cochrane Drive

Markam, Ontario, Canada L3R 9R9
905-470-0015 x240 idinsmore@lea.ca

Count Name: 24085_Simpson Rd & Parr Blvd-PM
Site Code: 24085
Start Date: 09/14/2023

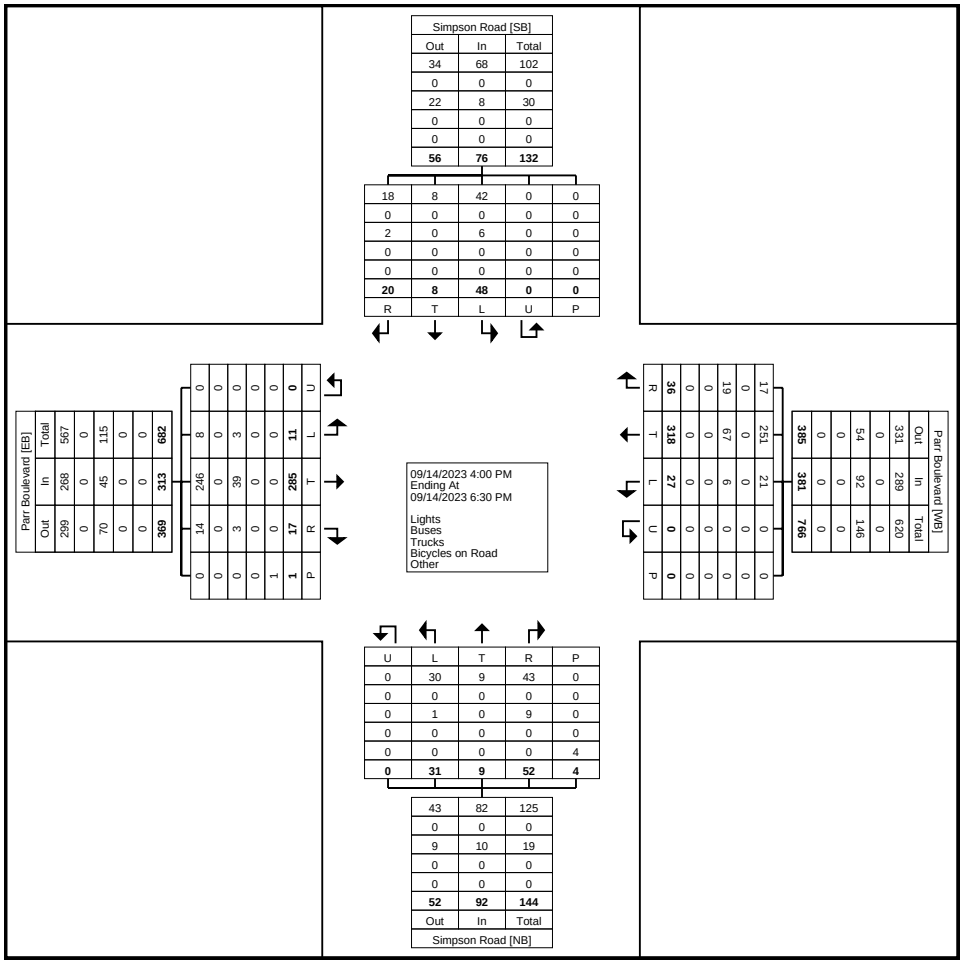
Turning Movement Data

Start Time	Simpson Road Southbound						Parr Boulevard Westbound						Simpson Road Northbound						Parr Boulevard Eastbound						Int. Total
	Right	Thru	Left	U-Turn	Peds	App. Total	Right	Thru	Left	U-Turn	Peds	App. Total	Right	Thru	Left	U-Turn	Peds	App. Total	Right	Thru	Left	U-Turn	Peds	App. Total	
4:00 PM	2	2	6	0	0	10	5	38	2	0	0	45	10	2	2	0	2	14	3	35	1	0	1	39	108
4:15 PM	2	3	5	0	0	10	1	31	7	0	0	39	9	0	2	0	0	11	0	25	0	0	0	25	85
4:30 PM	0	2	1	0	0	3	5	30	4	0	0	39	12	3	5	0	0	20	0	23	2	0	0	25	87
4:45 PM	2	1	6	0	0	9	4	30	2	0	0	36	3	2	1	0	0	6	1	17	1	0	0	19	70
Hourly Total	6	8	18	0	0	32	15	129	15	0	0	159	34	7	10	0	2	51	4	100	4	0	1	108	350
5:00 PM	3	0	6	0	0	9	2	45	1	0	0	48	9	2	12	0	0	23	4	30	2	0	0	36	116
5:15 PM	2	0	3	0	0	5	5	34	4	0	0	43	1	0	1	0	0	2	1	20	1	0	0	22	72
5:30 PM	2	0	9	0	0	11	4	24	0	0	0	28	4	0	3	0	0	7	2	40	2	0	0	44	90
5:45 PM	1	0	3	0	0	4	4	29	3	0	0	36	1	0	2	0	0	3	2	13	1	0	0	16	59
Hourly Total	8	0	21	0	0	29	15	132	8	0	0	155	15	2	18	0	0	35	9	103	6	0	0	118	337
6:00 PM	4	0	5	0	0	9	2	27	3	0	0	32	2	0	2	0	2	4	2	64	1	0	0	67	112
6:15 PM	2	0	4	0	0	6	4	30	1	0	0	35	1	0	1	0	0	2	2	18	0	0	0	20	63
Grand Total	20	8	48	0	0	76	36	318	27	0	0	381	52	9	31	0	4	92	17	285	11	0	1	313	862
Approach %	26.3	10.5	63.2	0.0	-	-	9.4	83.5	7.1	0.0	-	-	56.5	9.8	33.7	0.0	-	-	5.4	91.1	3.5	0.0	-	-	-
Total %	2.3	0.9	5.6	0.0	-	8.8	4.2	36.9	3.1	0.0	-	44.2	6.0	1.0	3.6	0.0	-	10.7	2.0	33.1	1.3	0.0	-	36.3	-
Lights	18	8	42	0	-	68	17	251	21	0	-	289	43	9	30	0	-	82	14	246	8	0	-	268	707
% Lights	90.0	100.0	87.5	-	-	89.5	47.2	78.9	77.8	-	-	75.9	82.7	100.0	96.8	-	-	89.1	82.4	86.3	72.7	-	-	85.6	82.0
Buses	0	0	0	0	-	0	0	0	0	0	-	0	0	0	0	0	-	0	0	0	0	0	-	0	0
% Buses	0.0	0.0	0.0	-	-	0.0	0.0	0.0	0.0	-	-	0.0	0.0	0.0	0.0	-	-	0.0	0.0	0.0	0.0	-	-	0.0	0.0
Trucks	2	0	6	0	-	8	19	67	6	0	-	92	9	0	1	0	-	10	3	39	3	0	-	45	155
% Trucks	10.0	0.0	12.5	-	-	10.5	52.8	21.1	22.2	-	-	24.1	17.3	0.0	3.2	-	-	10.9	17.6	13.7	27.3	-	-	14.4	18.0
Bicycles on Road	0	0	0	0	-	0	0	0	0	0	-	0	0	0	0	0	-	0	0	0	0	0	-	0	0
% Bicycles on Road	0.0	0.0	0.0	-	-	0.0	0.0	0.0	0.0	-	-	0.0	0.0	0.0	0.0	-	-	0.0	0.0	0.0	0.0	-	-	0.0	0.0
Bicycles on Crosswalk	-	-	-	-	0	-	-	-	-	-	0	-	-	-	-	-	0	-	-	-	-	-	0	-	-
% Bicycles on Crosswalk	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	0.0	-	-	-	-	-	0.0	-	-
Pedestrians	-	-	-	-	0	-	-	-	-	-	0	-	-	-	-	-	4	-	-	-	-	-	1	-	-
% Pedestrians	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	100.0	-	-	-	-	-	100.0	-	-

LEA Consulting Ltd.
625 Cochrane Drive

Markam, Ontario, Canada L3R 9R9
905-470-0015 x240 idinsmore@lea.ca

Count Name: 24085_Simpson Rd & Parr Blvd-PM
Site Code: 24085
Start Date: 09/14/2023



Turning Movement Data Plot

LEA Consulting Ltd.
625 Cochrane Drive

Markam, Ontario, Canada L3R 9R9
905-470-0015 x240 idinsmore@lea.ca

Count Name: 24085_Simpson Rd & Parr Blvd-PM
Site Code: 24085
Start Date: 09/14/2023

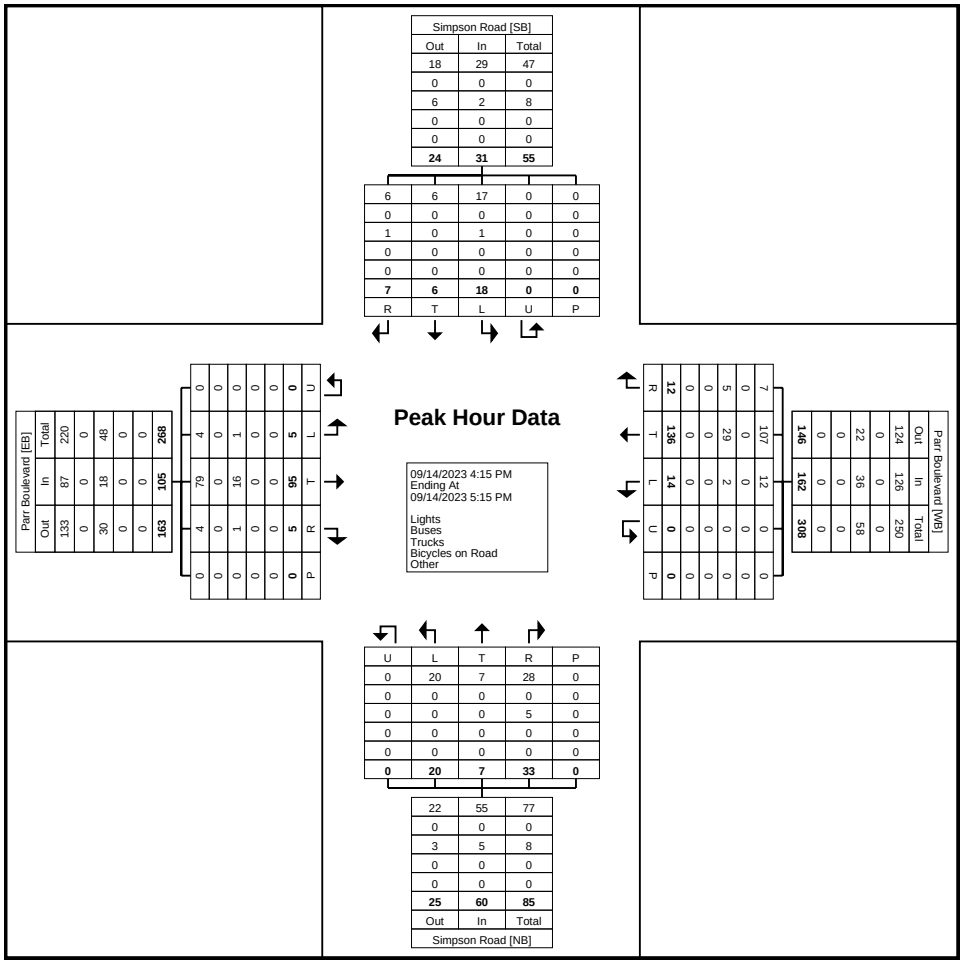
Turning Movement Peak Hour Data (4:15 PM)

Start Time	Simpson Road Southbound						Parr Boulevard Westbound						Simpson Road Northbound						Parr Boulevard Eastbound						
	Right	Thru	Left	U-Turn	Peds	App. Total	Right	Thru	Left	U-Turn	Peds	App. Total	Right	Thru	Left	U-Turn	Peds	App. Total	Right	Thru	Left	U-Turn	Peds	App. Total	Int. Total
4:15 PM	2	3	5	0	0	10	1	31	7	0	0	39	9	0	2	0	0	11	0	25	0	0	0	25	85
4:30 PM	0	2	1	0	0	3	5	30	4	0	0	39	12	3	5	0	0	20	0	23	2	0	0	25	87
4:45 PM	2	1	6	0	0	9	4	30	2	0	0	36	3	2	1	0	0	6	1	17	1	0	0	19	70
5:00 PM	3	0	6	0	0	9	2	45	1	0	0	48	9	2	12	0	0	23	4	30	2	0	0	36	116
Total	7	6	18	0	0	31	12	136	14	0	0	162	33	7	20	0	0	60	5	95	5	0	0	105	358
Approach %	22.6	19.4	58.1	0.0	-	-	7.4	84.0	8.6	0.0	-	-	55.0	11.7	33.3	0.0	-	-	4.8	90.5	4.8	0.0	-	-	-
Total %	2.0	1.7	5.0	0.0	-	8.7	3.4	38.0	3.9	0.0	-	45.3	9.2	2.0	5.6	0.0	-	16.8	1.4	26.5	1.4	0.0	-	29.3	-
PHF	0.583	0.500	0.750	0.000	-	0.775	0.600	0.756	0.500	0.000	-	0.844	0.688	0.583	0.417	0.000	-	0.652	0.313	0.792	0.625	0.000	-	0.729	0.772
Lights	6	6	17	0	-	29	7	107	12	0	-	126	28	7	20	0	-	55	4	79	4	0	-	87	297
% Lights	85.7	100.0	94.4	-	-	93.5	58.3	78.7	85.7	-	-	77.8	84.8	100.0	100.0	-	-	91.7	80.0	83.2	80.0	-	-	82.9	83.0
Buses	0	0	0	0	-	0	0	0	0	0	-	0	0	0	0	0	-	0	0	0	0	0	-	0	0
% Buses	0.0	0.0	0.0	-	-	0.0	0.0	0.0	0.0	-	-	0.0	0.0	0.0	0.0	-	-	0.0	0.0	0.0	0.0	-	-	0.0	0.0
Trucks	1	0	1	0	-	2	5	29	2	0	-	36	5	0	0	0	-	5	1	16	1	0	-	18	61
% Trucks	14.3	0.0	5.6	-	-	6.5	41.7	21.3	14.3	-	-	22.2	15.2	0.0	0.0	-	-	8.3	20.0	16.8	20.0	-	-	17.1	17.0
Bicycles on Road	0	0	0	0	-	0	0	0	0	0	-	0	0	0	0	0	-	0	0	0	0	0	-	0	0
% Bicycles on Road	0.0	0.0	0.0	-	-	0.0	0.0	0.0	0.0	-	-	0.0	0.0	0.0	0.0	-	-	0.0	0.0	0.0	0.0	-	-	0.0	0.0
Bicycles on Crosswalk	-	-	-	-	0	-	-	-	-	-	0	-	-	-	-	-	0	-	-	-	-	-	0	-	-
% Bicycles on Crosswalk	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Pedestrians	-	-	-	-	0	-	-	-	-	-	0	-	-	-	-	-	0	-	-	-	-	-	0	-	-
% Pedestrians	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-

LEA Consulting Ltd.
625 Cochrane Drive

Markam, Ontario, Canada L3R 9R9
905-470-0015 x240 idinsmore@lea.ca

Count Name: 24085_Simpson Rd & Parr Blvd-PM
Site Code: 24085
Start Date: 09/14/2023



Turning Movement Peak Hour Data Plot (4:15 PM)

LEA Consulting Ltd.
625 Cochrane Drive

Markam, Ontario, Canada L3R 9R9
905-470-0015 x240 idinsmore@lea.ca

Count Name: 24085_Simpson Rd & Parr Blvd-SAT
Site Code: 24085
Start Date: 09/16/2023

Turning Movement Data

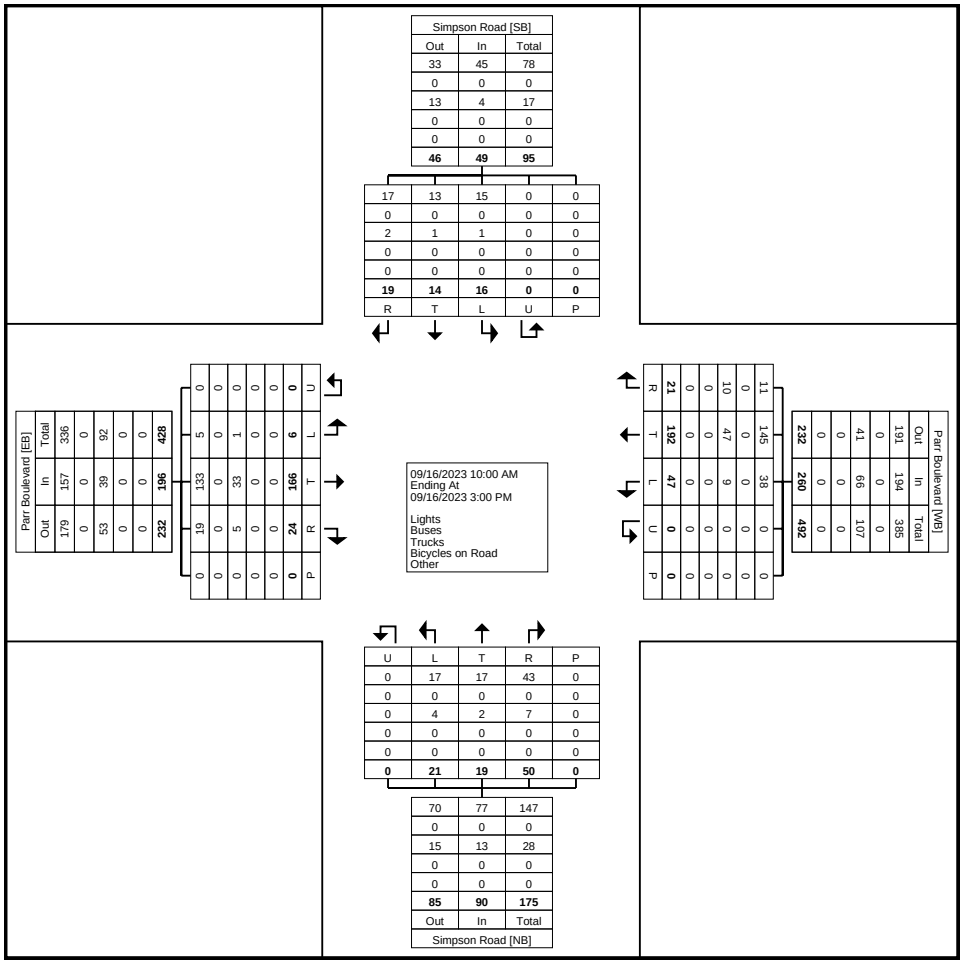
Start Time	Simpson Road Southbound						Parr Boulevard Westbound						Simpson Road Northbound						Parr Boulevard Eastbound						Int. Total
	Right	Thru	Left	U-Turn	Peds	App. Total	Right	Thru	Left	U-Turn	Peds	App. Total	Right	Thru	Left	U-Turn	Peds	App. Total	Right	Thru	Left	U-Turn	Peds	App. Total	
10:00 AM	1	1	2	0	0	4	0	4	1	0	0	5	5	0	0	0	0	5	3	16	2	0	0	21	35
10:15 AM	1	1	1	0	0	3	0	7	5	0	0	12	2	3	0	0	0	5	2	6	0	0	0	8	28
10:30 AM	1	1	2	0	0	4	3	5	3	0	0	11	2	1	1	0	0	4	1	14	0	0	0	15	34
10:45 AM	0	1	1	0	0	2	3	13	2	0	0	18	3	1	4	0	0	8	1	7	0	0	0	8	36
Hourly Total	3	4	6	0	0	13	6	29	11	0	0	46	12	5	5	0	0	22	7	43	2	0	0	52	133
11:00 AM	0	0	0	0	0	0	1	7	4	0	0	12	3	2	0	0	0	5	1	7	1	0	0	9	26
11:15 AM	2	0	0	0	0	2	1	14	4	0	0	19	2	0	3	0	0	5	0	7	0	0	0	7	33
11:30 AM	0	0	0	0	0	0	1	13	4	0	0	18	3	1	2	0	0	6	2	11	1	0	0	14	38
11:45 AM	1	1	0	0	0	2	2	15	1	0	0	18	3	0	2	0	0	5	2	13	1	0	0	16	41
Hourly Total	3	1	0	0	0	4	5	49	13	0	0	67	11	3	7	0	0	21	5	38	3	0	0	46	138
12:00 PM	2	0	0	0	0	2	1	9	3	0	0	13	2	1	1	0	0	4	3	9	0	0	0	12	31
12:15 PM	1	3	1	0	0	5	1	9	2	0	0	12	3	3	3	0	0	9	3	9	1	0	0	13	39
12:30 PM	0	2	1	0	0	3	0	9	4	0	0	13	7	1	0	0	0	8	3	6	0	0	0	9	33
12:45 PM	0	0	1	0	0	1	2	10	5	0	0	17	2	1	0	0	0	3	0	3	0	0	0	3	24
Hourly Total	3	5	3	0	0	11	4	37	14	0	0	55	14	6	4	0	0	24	9	27	1	0	0	37	127
1:00 PM	1	1	0	0	0	2	0	15	2	0	0	17	4	1	0	0	0	5	1	12	0	0	0	13	37
1:15 PM	1	1	0	0	0	2	1	10	3	0	0	14	1	0	0	0	0	1	0	4	0	0	0	4	21
1:30 PM	2	0	0	0	0	2	1	9	1	0	0	11	2	3	1	0	0	6	0	6	0	0	0	6	25
1:45 PM	1	0	3	0	0	4	1	9	0	0	0	10	1	0	1	0	0	2	1	9	0	0	0	10	26
Hourly Total	5	2	3	0	0	10	3	43	6	0	0	52	8	4	2	0	0	14	2	31	0	0	0	33	109
2:00 PM	2	1	1	0	0	4	1	11	1	0	0	13	1	1	1	0	0	3	0	4	0	0	0	4	24
2:15 PM	1	1	1	0	0	3	1	11	1	0	0	13	2	0	2	0	0	4	0	10	0	0	0	10	30
2:30 PM	1	0	2	0	0	3	0	5	1	0	0	6	0	0	0	0	0	0	0	6	0	0	0	6	15
2:45 PM	1	0	0	0	0	1	1	7	0	0	0	8	2	0	0	0	0	2	1	7	0	0	0	8	19
Hourly Total	5	2	4	0	0	11	3	34	3	0	0	40	5	1	3	0	0	9	1	27	0	0	0	28	88
Grand Total	19	14	16	0	0	49	21	192	47	0	0	260	50	19	21	0	0	90	24	166	6	0	0	196	595
Approach %	38.8	28.6	32.7	0.0	-	-	8.1	73.8	18.1	0.0	-	-	55.6	21.1	23.3	0.0	-	-	12.2	84.7	3.1	0.0	-	-	-
Total %	3.2	2.4	2.7	0.0	-	8.2	3.5	32.3	7.9	0.0	-	43.7	8.4	3.2	3.5	0.0	-	15.1	4.0	27.9	1.0	0.0	-	32.9	-
Lights	17	13	15	0	-	45	11	145	38	0	-	194	43	17	17	0	-	77	19	133	5	0	-	157	473
% Lights	89.5	92.9	93.8	-	-	91.8	52.4	75.5	80.9	-	-	74.6	86.0	89.5	81.0	-	-	85.6	79.2	80.1	83.3	-	-	80.1	79.5
Buses	0	0	0	0	-	0	0	0	0	0	-	0	0	0	0	0	-	0	0	0	0	0	-	0	0
% Buses	0.0	0.0	0.0	-	-	0.0	0.0	0.0	0.0	-	-	0.0	0.0	0.0	0.0	-	-	0.0	0.0	0.0	0.0	-	-	0.0	0.0
Trucks	2	1	1	0	-	4	10	47	9	0	-	66	7	2	4	0	-	13	5	33	1	0	-	39	122
% Trucks	10.5	7.1	6.3	-	-	8.2	47.6	24.5	19.1	-	-	25.4	14.0	10.5	19.0	-	-	14.4	20.8	19.9	16.7	-	-	19.9	20.5
Bicycles on Road	0	0	0	0	-	0	0	0	0	0	-	0	0	0	0	0	-	0	0	0	0	0	-	0	0

% Bicycles on Road	0.0	0.0	0.0	-	-	0.0	0.0	0.0	0.0	-	-	0.0	0.0	0.0	0.0	-	-	0.0	0.0	0.0	0.0	-	-	0.0	0.0
Bicycles on Crosswalk	-	-	-	-	0	-	-	-	-	-	0	-	-	-	-	-	0	-	-	-	-	-	0	-	-
% Bicycles on Crosswalk	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Pedestrians	-	-	-	-	0	-	-	-	-	-	0	-	-	-	-	-	0	-	-	-	-	-	0	-	-
% Pedestrians	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-

LEA Consulting Ltd.
625 Cochrane Drive

Markam, Ontario, Canada L3R 9R9
905-470-0015 x240 idinsmore@lea.ca

Count Name: 24085_Simpson Rd & Parr Blvd-SAT
Site Code: 24085
Start Date: 09/16/2023



Turning Movement Data Plot

LEA Consulting Ltd.
625 Cochrane Drive

Markam, Ontario, Canada L3R 9R9
905-470-0015 x240 idinsmore@lea.ca

Count Name: 24085_Simpson Rd & Parr Blvd-SAT
Site Code: 24085
Start Date: 09/16/2023

Turning Movement Peak Hour Data (11:00 AM)

Start Time	Simpson Road Southbound						Parr Boulevard Westbound						Simpson Road Northbound						Parr Boulevard Eastbound						Int. Total
	Right	Thru	Left	U-Turn	Peds	App. Total	Right	Thru	Left	U-Turn	Peds	App. Total	Right	Thru	Left	U-Turn	Peds	App. Total	Right	Thru	Left	U-Turn	Peds	App. Total	
11:00 AM	0	0	0	0	0	0	1	7	4	0	0	12	3	2	0	0	0	5	1	7	1	0	0	9	26
11:15 AM	2	0	0	0	0	2	1	14	4	0	0	19	2	0	3	0	0	5	0	7	0	0	0	7	33
11:30 AM	0	0	0	0	0	0	1	13	4	0	0	18	3	1	2	0	0	6	2	11	1	0	0	14	38
11:45 AM	1	1	0	0	0	2	2	15	1	0	0	18	3	0	2	0	0	5	2	13	1	0	0	16	41
Total	3	1	0	0	0	4	5	49	13	0	0	67	11	3	7	0	0	21	5	38	3	0	0	46	138
Approach %	75.0	25.0	0.0	0.0	-	-	7.5	73.1	19.4	0.0	-	-	52.4	14.3	33.3	0.0	-	-	10.9	82.6	6.5	0.0	-	-	-
Total %	2.2	0.7	0.0	0.0	-	2.9	3.6	35.5	9.4	0.0	-	48.6	8.0	2.2	5.1	0.0	-	15.2	3.6	27.5	2.2	0.0	-	33.3	-
PHF	0.375	0.250	0.000	0.000	-	0.500	0.625	0.817	0.813	0.000	-	0.882	0.917	0.375	0.583	0.000	-	0.875	0.625	0.731	0.750	0.000	-	0.719	0.841
Lights	3	1	0	0	-	4	4	34	11	0	-	49	10	3	7	0	-	20	5	30	2	0	-	37	110
% Lights	100.0	100.0	-	-	-	100.0	80.0	69.4	84.6	-	-	73.1	90.9	100.0	100.0	-	-	95.2	100.0	78.9	66.7	-	-	80.4	79.7
Buses	0	0	0	0	-	0	0	0	0	0	-	0	0	0	0	0	-	0	0	0	0	0	-	0	0
% Buses	0.0	0.0	-	-	-	0.0	0.0	0.0	0.0	-	-	0.0	0.0	0.0	0.0	-	-	0.0	0.0	0.0	0.0	-	-	0.0	0.0
Trucks	0	0	0	0	-	0	1	15	2	0	-	18	1	0	0	0	-	1	0	8	1	0	-	9	28
% Trucks	0.0	0.0	-	-	-	0.0	20.0	30.6	15.4	-	-	26.9	9.1	0.0	0.0	-	-	4.8	0.0	21.1	33.3	-	-	19.6	20.3
Bicycles on Road	0	0	0	0	-	0	0	0	0	0	-	0	0	0	0	0	-	0	0	0	0	0	-	0	0
% Bicycles on Road	0.0	0.0	-	-	-	0.0	0.0	0.0	0.0	-	-	0.0	0.0	0.0	0.0	-	-	0.0	0.0	0.0	0.0	-	-	0.0	0.0
Bicycles on Crosswalk	-	-	-	-	0	-	-	-	-	-	0	-	-	-	-	-	0	-	-	-	-	-	0	-	-
% Bicycles on Crosswalk	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Pedestrians	-	-	-	-	0	-	-	-	-	-	0	-	-	-	-	-	0	-	-	-	-	-	0	-	-
% Pedestrians	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-

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625 Cochrane Drive

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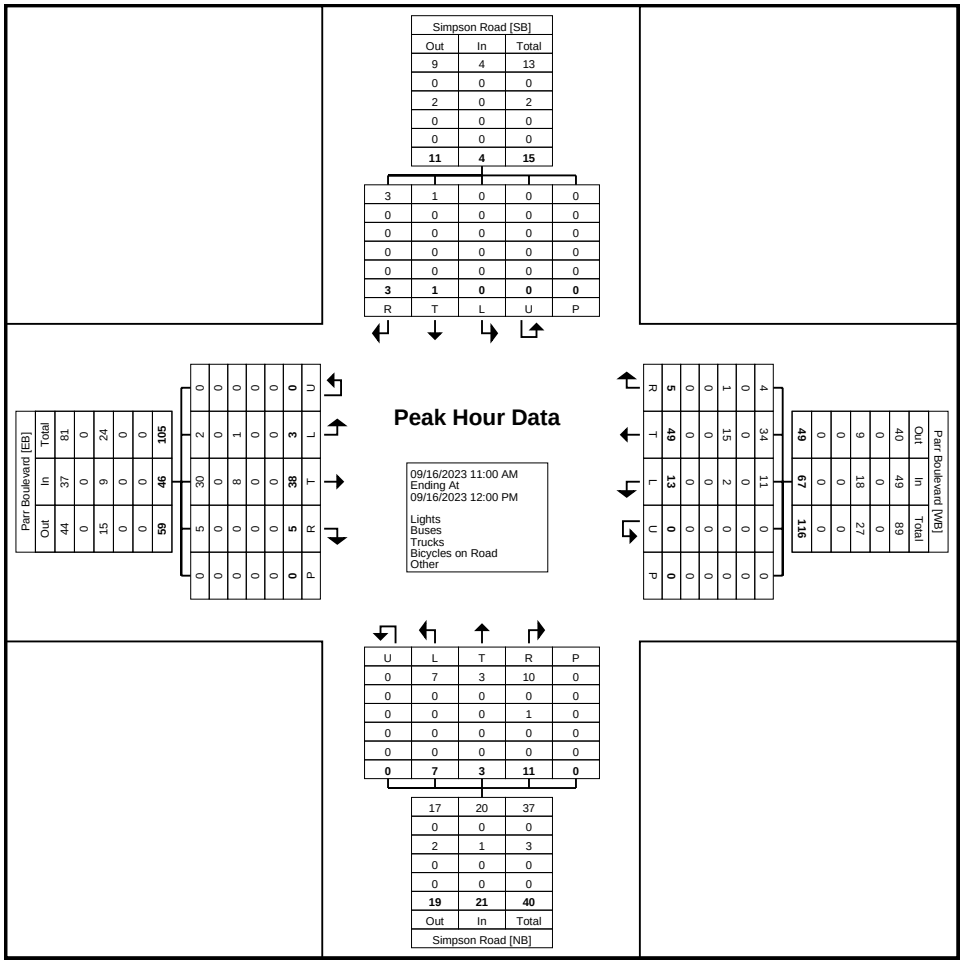
Site Code: 24085
Start Date: 09/16/2023



Turning Movement Peak Hour Data Plot (11:00 AM)

LEA Consulting Ltd.
625 Cochrane Drive

Markam, Ontario, Canada L3R 9R9
905-470-0015 x240 idinsmore@lea.ca

Count Name: 24085_Simpson Rd & Parr Blvd-SAT
Site Code: 24085
Start Date: 09/16/2023

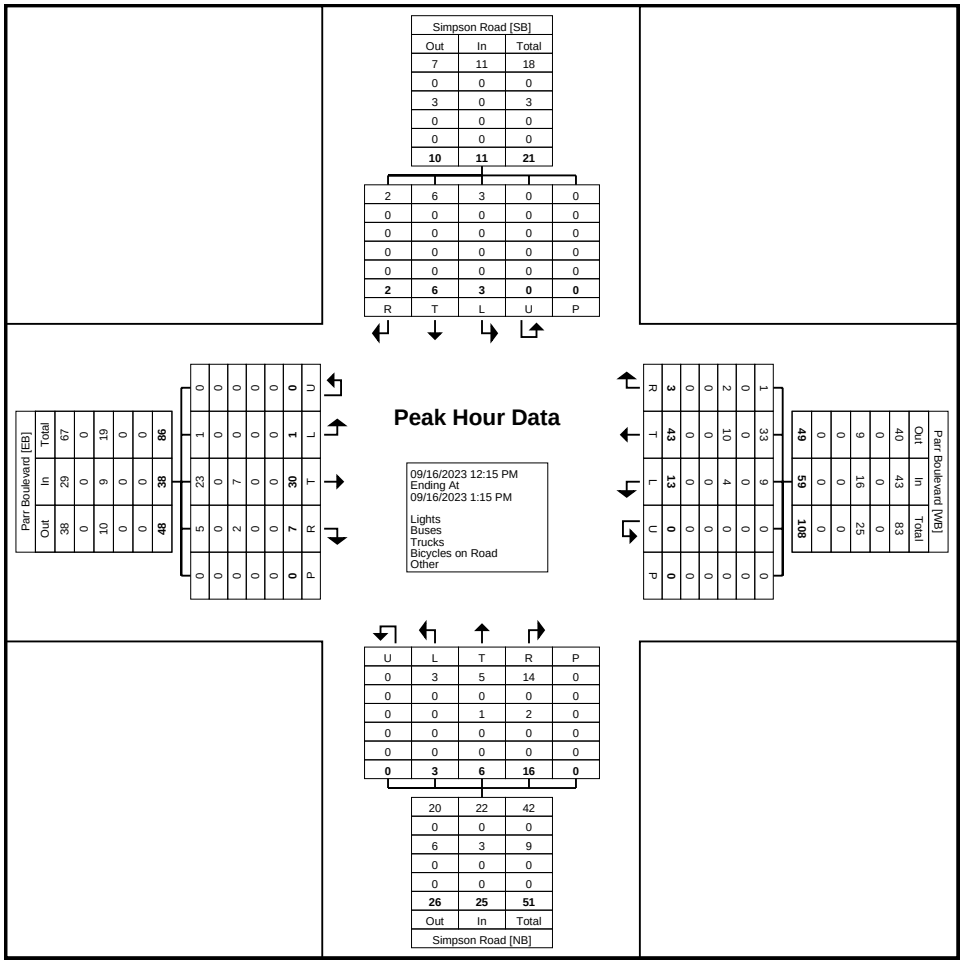
Turning Movement Peak Hour Data (12:15 PM)

Start Time	Simpson Road Southbound						Parr Boulevard Westbound						Simpson Road Northbound						Parr Boulevard Eastbound						
	Right	Thru	Left	U-Turn	Peds	App. Total	Right	Thru	Left	U-Turn	Peds	App. Total	Right	Thru	Left	U-Turn	Peds	App. Total	Right	Thru	Left	U-Turn	Peds	App. Total	Int. Total
12:15 PM	1	3	1	0	0	5	1	9	2	0	0	12	3	3	3	0	0	9	3	9	1	0	0	13	39
12:30 PM	0	2	1	0	0	3	0	9	4	0	0	13	7	1	0	0	0	8	3	6	0	0	0	9	33
12:45 PM	0	0	1	0	0	1	2	10	5	0	0	17	2	1	0	0	0	3	0	3	0	0	0	3	24
1:00 PM	1	1	0	0	0	2	0	15	2	0	0	17	4	1	0	0	0	5	1	12	0	0	0	13	37
Total	2	6	3	0	0	11	3	43	13	0	0	59	16	6	3	0	0	25	7	30	1	0	0	38	133
Approach %	18.2	54.5	27.3	0.0	-	-	5.1	72.9	22.0	0.0	-	-	64.0	24.0	12.0	0.0	-	-	18.4	78.9	2.6	0.0	-	-	-
Total %	1.5	4.5	2.3	0.0	-	8.3	2.3	32.3	9.8	0.0	-	44.4	12.0	4.5	2.3	0.0	-	18.8	5.3	22.6	0.8	0.0	-	28.6	-
PHF	0.500	0.500	0.750	0.000	-	0.550	0.375	0.717	0.650	0.000	-	0.868	0.571	0.500	0.250	0.000	-	0.694	0.583	0.625	0.250	0.000	-	0.731	0.853
Lights	2	6	3	0	-	11	1	33	9	0	-	43	14	5	3	0	-	22	5	23	1	0	-	29	105
% Lights	100.0	100.0	100.0	-	-	100.0	33.3	76.7	69.2	-	-	72.9	87.5	83.3	100.0	-	-	88.0	71.4	76.7	100.0	-	-	76.3	78.9
Buses	0	0	0	0	-	0	0	0	0	0	-	0	0	0	0	0	-	0	0	0	0	0	-	0	0
% Buses	0.0	0.0	0.0	-	-	0.0	0.0	0.0	0.0	-	-	0.0	0.0	0.0	0.0	-	-	0.0	0.0	0.0	0.0	-	-	0.0	0.0
Trucks	0	0	0	0	-	0	2	10	4	0	-	16	2	1	0	0	-	3	2	7	0	0	-	9	28
% Trucks	0.0	0.0	0.0	-	-	0.0	66.7	23.3	30.8	-	-	27.1	12.5	16.7	0.0	-	-	12.0	28.6	23.3	0.0	-	-	23.7	21.1
Bicycles on Road	0	0	0	0	-	0	0	0	0	0	-	0	0	0	0	0	-	0	0	0	0	0	-	0	0
% Bicycles on Road	0.0	0.0	0.0	-	-	0.0	0.0	0.0	0.0	-	-	0.0	0.0	0.0	0.0	-	-	0.0	0.0	0.0	0.0	-	-	0.0	0.0
Bicycles on Crosswalk	-	-	-	-	0	-	-	-	-	-	0	-	-	-	-	-	0	-	-	-	-	-	0	-	-
% Bicycles on Crosswalk	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Pedestrians	-	-	-	-	0	-	-	-	-	-	0	-	-	-	-	-	0	-	-	-	-	-	0	-	-
% Pedestrians	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-

LEA Consulting Ltd.
625 Cochrane Drive

Markam, Ontario, Canada L3R 9R9
905-470-0015 x240 idinsmore@lea.ca

Count Name: 24085_Simpson Rd & Parr Blvd-SAT
Site Code: 24085
Start Date: 09/16/2023



Turning Movement Peak Hour Data Plot (12:15 PM)

LEA Consulting Ltd.
625 Cochrane Drive

Markam, Ontario, Canada L3R 9R9
905-470-0015 x240 idinsmore@lea.ca

Count Name: 24085_Hwy 50 & Parr Blvd-AM
Site Code: 24085
Start Date: 09/14/2023

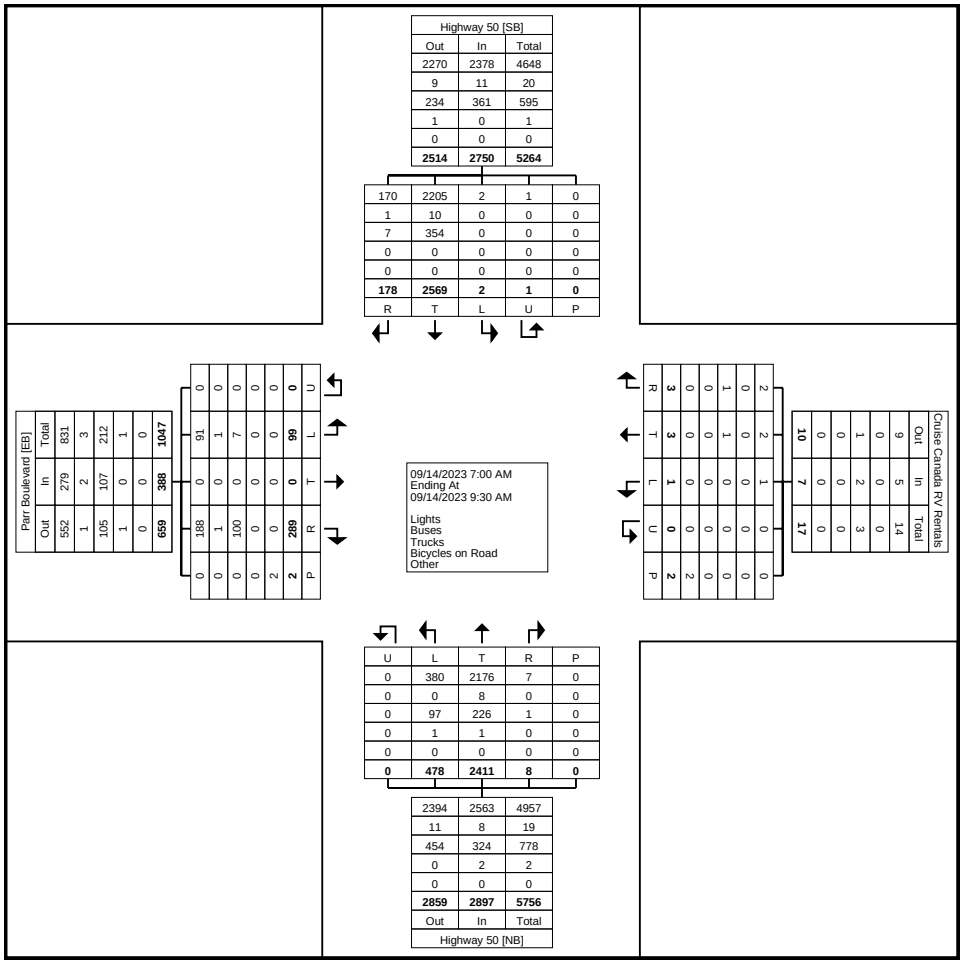
Turning Movement Data

Start Time	Highway 50 Southbound						Cruise Canada RV Rentals Westbound						Highway 50 Northbound						Parr Boulevard Eastbound						Int. Total
	Right	Thru	Left	U-Turn	Peds	App. Total	Right	Thru	Left	U-Turn	Peds	App. Total	Right	Thru	Left	U-Turn	Peds	App. Total	Right	Thru	Left	U-Turn	Peds	App. Total	
7:00 AM	9	290	0	1	0	300	0	0	0	0	0	0	0	254	47	0	0	301	33	0	8	0	0	41	642
7:15 AM	10	285	0	0	0	295	0	0	0	0	0	0	0	246	61	0	0	307	18	0	1	0	0	19	621
7:30 AM	10	296	0	0	0	306	0	0	0	0	0	0	0	231	44	0	0	275	25	0	8	0	0	33	614
7:45 AM	15	247	0	0	0	262	0	0	1	0	2	1	2	283	47	0	0	332	26	0	10	0	1	36	631
Hourly Total	44	1118	0	1	0	1163	0	0	1	0	2	1	2	1014	199	0	0	1215	102	0	27	0	1	129	2508
8:00 AM	21	277	0	0	0	298	0	0	0	0	0	0	0	253	34	0	0	287	23	0	8	0	0	31	616
8:15 AM	21	239	0	0	0	260	0	1	0	0	0	1	2	236	49	0	0	287	20	0	10	0	0	30	578
8:30 AM	20	255	0	0	0	275	0	1	0	0	0	1	2	256	61	0	0	319	46	0	18	0	1	64	659
8:45 AM	28	225	1	0	0	254	2	1	0	0	0	3	1	213	58	0	0	272	49	0	11	0	0	60	589
Hourly Total	90	996	1	0	0	1087	2	3	0	0	0	5	5	958	202	0	0	1165	138	0	47	0	1	185	2442
9:00 AM	30	250	1	0	0	281	1	0	0	0	0	1	0	242	44	0	0	286	19	0	12	0	0	31	599
9:15 AM	14	205	0	0	0	219	0	0	0	0	0	0	1	197	33	0	0	231	30	0	13	0	0	43	493
Grand Total	178	2569	2	1	0	2750	3	3	1	0	2	7	8	2411	478	0	0	2897	289	0	99	0	2	388	6042
Approach %	6.5	93.4	0.1	0.0	-	-	42.9	42.9	14.3	0.0	-	-	0.3	83.2	16.5	0.0	-	-	74.5	0.0	25.5	0.0	-	-	-
Total %	2.9	42.5	0.0	0.0	-	45.5	0.0	0.0	0.0	0.0	-	0.1	0.1	39.9	7.9	0.0	-	47.9	4.8	0.0	1.6	0.0	-	6.4	-
Lights	170	2205	2	1	-	2378	2	2	1	0	-	5	7	2176	380	0	-	2563	188	0	91	0	-	279	5225
% Lights	95.5	85.8	100.0	100.0	-	86.5	66.7	66.7	100.0	-	-	71.4	87.5	90.3	79.5	-	-	88.5	65.1	-	91.9	-	-	71.9	86.5
Buses	1	10	0	0	-	11	0	0	0	0	-	0	0	8	0	0	-	8	1	0	1	0	-	2	21
% Buses	0.6	0.4	0.0	0.0	-	0.4	0.0	0.0	0.0	-	-	0.0	0.0	0.3	0.0	-	-	0.3	0.3	-	1.0	-	-	0.5	0.3
Trucks	7	354	0	0	-	361	1	1	0	0	-	2	1	226	97	0	-	324	100	0	7	0	-	107	794
% Trucks	3.9	13.8	0.0	0.0	-	13.1	33.3	33.3	0.0	-	-	28.6	12.5	9.4	20.3	-	-	11.2	34.6	-	7.1	-	-	27.6	13.1
Bicycles on Road	0	0	0	0	-	0	0	0	0	0	-	0	0	1	1	0	-	2	0	0	0	0	-	0	2
% Bicycles on Road	0.0	0.0	0.0	0.0	-	0.0	0.0	0.0	0.0	-	-	0.0	0.0	0.0	0.2	-	-	0.1	0.0	-	0.0	-	-	0.0	0.0
Bicycles on Crosswalk	-	-	-	-	0	-	-	-	-	-	0	-	-	-	-	-	0	-	-	-	-	-	0	-	-
% Bicycles on Crosswalk	-	-	-	-	-	-	-	-	-	-	0.0	-	-	-	-	-	-	-	-	-	-	-	0.0	-	-
Pedestrians	-	-	-	-	0	-	-	-	-	-	2	-	-	-	-	-	0	-	-	-	-	-	2	-	-
% Pedestrians	-	-	-	-	-	-	-	-	-	-	100.0	-	-	-	-	-	-	-	-	-	-	-	100.0	-	-

LEA Consulting Ltd.
625 Cochrane Drive

Markam, Ontario, Canada L3R 9R9
905-470-0015 x240 idinsmore@lea.ca

Count Name: 24085_Hwy 50 & Parr Blvd-AM
Site Code: 24085
Start Date: 09/14/2023



Turning Movement Data Plot

LEA Consulting Ltd.
625 Cochrane Drive

Markam, Ontario, Canada L3R 9R9
905-470-0015 x240 idinsmore@lea.ca

Count Name: 24085_Hwy 50 & Parr Blvd-AM
Site Code: 24085
Start Date: 09/14/2023

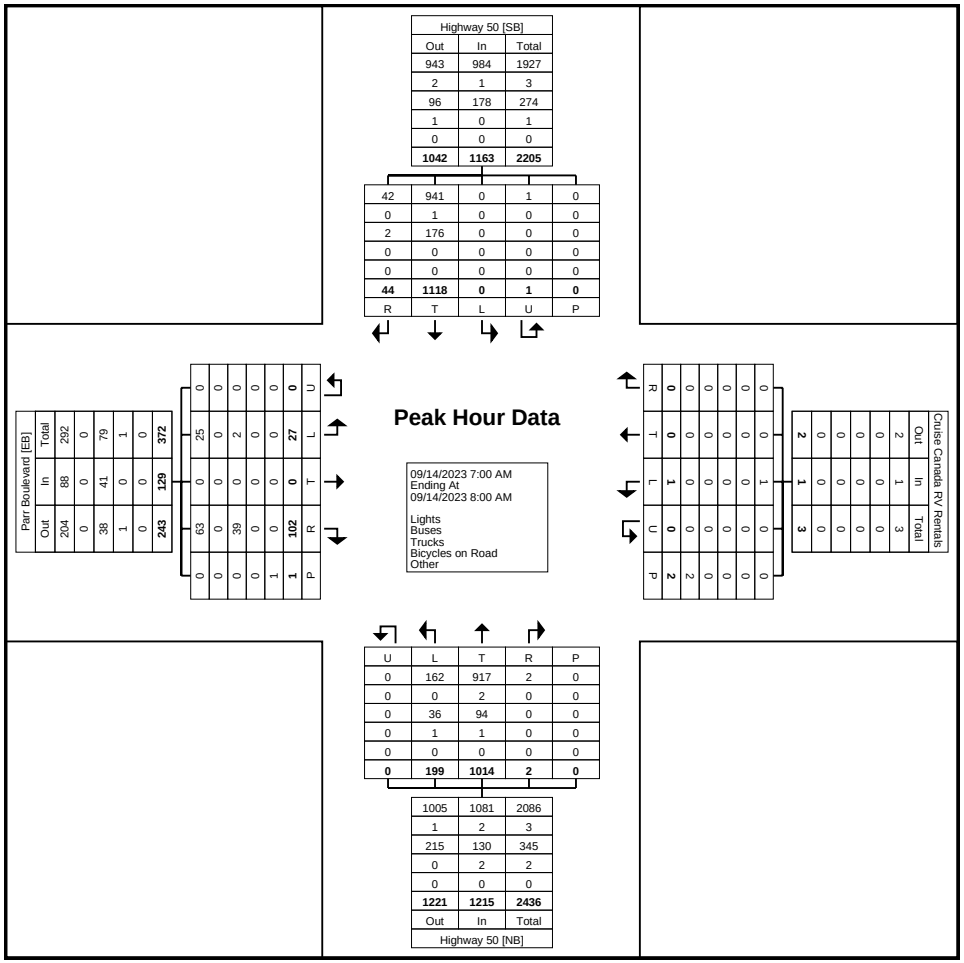
Turning Movement Peak Hour Data (7:00 AM)

Start Time	Highway 50 Southbound						Cruise Canada RV Rentals Westbound						Highway 50 Northbound						Parr Boulevard Eastbound						Int. Total
	Right	Thru	Left	U-Turn	Peds	App. Total	Right	Thru	Left	U-Turn	Peds	App. Total	Right	Thru	Left	U-Turn	Peds	App. Total	Right	Thru	Left	U-Turn	Peds	App. Total	
7:00 AM	9	290	0	1	0	300	0	0	0	0	0	0	0	254	47	0	0	301	33	0	8	0	0	41	642
7:15 AM	10	285	0	0	0	295	0	0	0	0	0	0	0	246	61	0	0	307	18	0	1	0	0	19	621
7:30 AM	10	296	0	0	0	306	0	0	0	0	0	0	0	231	44	0	0	275	25	0	8	0	0	33	614
7:45 AM	15	247	0	0	0	262	0	0	1	0	2	1	2	283	47	0	0	332	26	0	10	0	1	36	631
Total	44	1118	0	1	0	1163	0	0	1	0	2	1	2	1014	199	0	0	1215	102	0	27	0	1	129	2508
Approach %	3.8	96.1	0.0	0.1	-	-	0.0	0.0	100.0	0.0	-	-	0.2	83.5	16.4	0.0	-	-	79.1	0.0	20.9	0.0	-	-	-
Total %	1.8	44.6	0.0	0.0	-	46.4	0.0	0.0	0.0	0.0	-	0.0	0.1	40.4	7.9	0.0	-	48.4	4.1	0.0	1.1	0.0	-	5.1	-
PHF	0.733	0.944	0.000	0.250	-	0.950	0.000	0.000	0.250	0.000	-	0.250	0.250	0.896	0.816	0.000	-	0.915	0.773	0.000	0.675	0.000	-	0.787	0.977
Lights	42	941	0	1	-	984	0	0	1	0	-	1	2	917	162	0	-	1081	63	0	25	0	-	88	2154
% Lights	95.5	84.2	-	100.0	-	84.6	-	-	100.0	-	-	100.0	100.0	90.4	81.4	-	-	89.0	61.8	-	92.6	-	-	68.2	85.9
Buses	0	1	0	0	-	1	0	0	0	0	-	0	0	2	0	0	-	2	0	0	0	0	-	0	3
% Buses	0.0	0.1	-	0.0	-	0.1	-	-	0.0	-	-	0.0	0.0	0.2	0.0	-	-	0.2	0.0	-	0.0	-	-	0.0	0.1
Trucks	2	176	0	0	-	178	0	0	0	0	-	0	0	94	36	0	-	130	39	0	2	0	-	41	349
% Trucks	4.5	15.7	-	0.0	-	15.3	-	-	0.0	-	-	0.0	0.0	9.3	18.1	-	-	10.7	38.2	-	7.4	-	-	31.8	13.9
Bicycles on Road	0	0	0	0	-	0	0	0	0	0	-	0	0	1	1	0	-	2	0	0	0	0	-	0	2
% Bicycles on Road	0.0	0.0	-	0.0	-	0.0	-	-	0.0	-	-	0.0	0.0	0.1	0.5	-	-	0.2	0.0	-	0.0	-	-	0.0	0.1
Bicycles on Crosswalk	-	-	-	-	0	-	-	-	-	-	0	-	-	-	-	-	0	-	-	-	-	-	0	-	-
% Bicycles on Crosswalk	-	-	-	-	-	-	-	-	-	-	0.0	-	-	-	-	-	-	-	-	-	-	-	0.0	-	-
Pedestrians	-	-	-	-	0	-	-	-	-	-	2	-	-	-	-	-	0	-	-	-	-	-	1	-	-
% Pedestrians	-	-	-	-	-	-	-	-	-	-	100.0	-	-	-	-	-	-	-	-	-	-	-	100.0	-	-

LEA Consulting Ltd.
625 Cochrane Drive

Markam, Ontario, Canada L3R 9R9
905-470-0015 x240 idinsmore@lea.ca

Count Name: 24085_Hwy 50 & Parr Blvd-AM
Site Code: 24085
Start Date: 09/14/2023



Turning Movement Peak Hour Data Plot (7:00 AM)

LEA Consulting Ltd.
625 Cochrane Drive

Markam, Ontario, Canada L3R 9R9
905-470-0015 x240 idinsmore@lea.ca

Count Name: 24085_Hwy 50 & Parr Blvd-PM
Site Code: 24085
Start Date: 09/14/2023

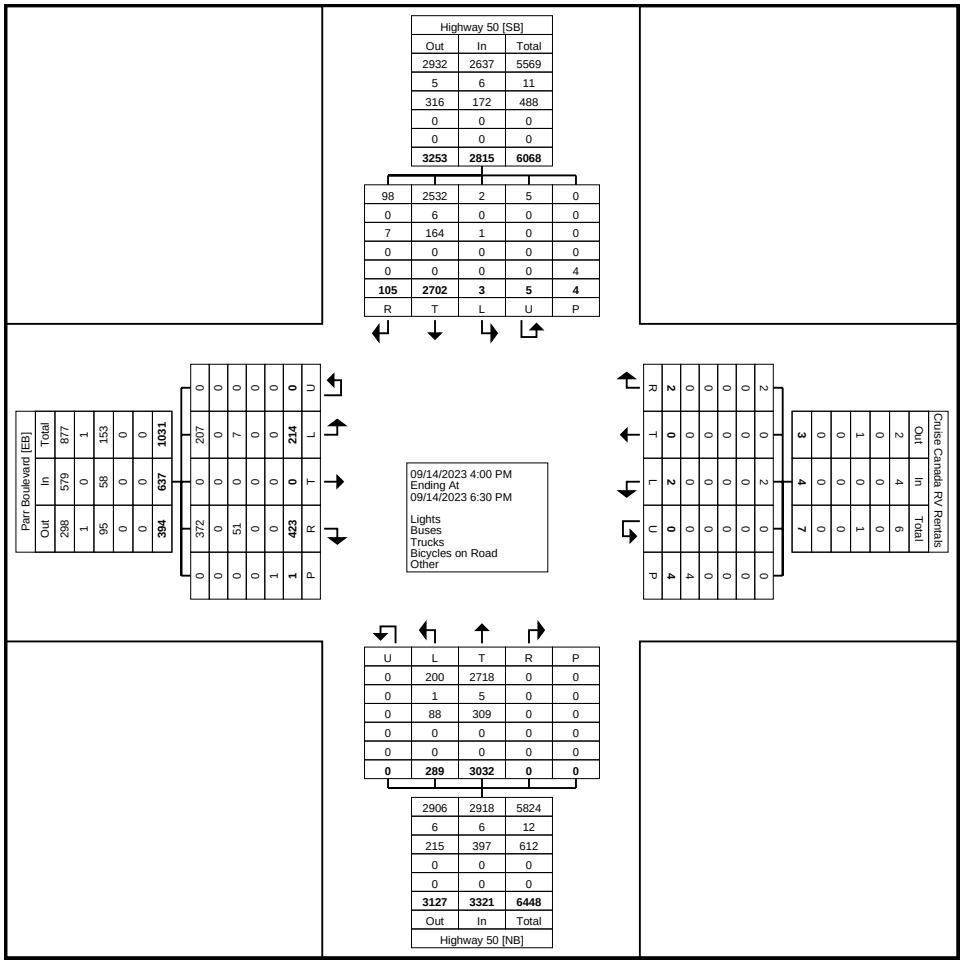
Turning Movement Data

Start Time	Highway 50 Southbound						Cruise Canada RV Rentals Westbound						Highway 50 Northbound						Parr Boulevard Eastbound						Int. Total
	Right	Thru	Left	U-Turn	Peds	App. Total	Right	Thru	Left	U-Turn	Peds	App. Total	Right	Thru	Left	U-Turn	Peds	App. Total	Right	Thru	Left	U-Turn	Peds	App. Total	
4:00 PM	8	305	1	0	1	314	0	0	0	0	0	0	0	316	31	0	0	347	51	0	35	0	0	86	747
4:15 PM	13	254	0	1	0	268	0	0	1	0	0	1	0	328	29	0	0	357	32	0	23	0	0	55	681
4:30 PM	16	292	0	0	0	308	0	0	0	0	0	0	0	300	23	0	0	323	50	0	17	0	0	67	698
4:45 PM	11	243	1	0	1	255	1	0	0	0	0	1	0	289	29	0	0	318	32	0	20	0	0	52	626
Hourly Total	48	1094	2	1	2	1145	1	0	1	0	0	2	0	1233	112	0	0	1345	165	0	95	0	0	260	2752
5:00 PM	11	332	0	0	1	343	0	0	0	0	0	0	0	300	31	0	0	331	56	0	48	0	1	104	778
5:15 PM	7	244	0	2	0	253	0	0	0	0	0	0	0	255	33	0	0	288	32	0	16	0	0	48	589
5:30 PM	7	287	1	0	1	295	1	0	1	0	2	2	0	310	24	0	0	334	49	0	22	0	0	71	702
5:45 PM	11	247	0	0	0	258	0	0	0	0	0	0	0	345	36	0	0	381	27	0	10	0	0	37	676
Hourly Total	36	1110	1	2	2	1149	1	0	1	0	2	2	0	1210	124	0	0	1334	164	0	96	0	1	260	2745
6:00 PM	13	266	0	2	0	281	0	0	0	0	2	0	0	299	24	0	0	323	66	0	19	0	0	85	689
6:15 PM	8	232	0	0	0	240	0	0	0	0	0	0	0	290	29	0	0	319	28	0	4	0	0	32	591
Grand Total	105	2702	3	5	4	2815	2	0	2	0	4	4	0	3032	289	0	0	3321	423	0	214	0	1	637	6777
Approach %	3.7	96.0	0.1	0.2	-	-	50.0	0.0	50.0	0.0	-	-	0.0	91.3	8.7	0.0	-	-	66.4	0.0	33.6	0.0	-	-	-
Total %	1.5	39.9	0.0	0.1	-	41.5	0.0	0.0	0.0	0.0	-	0.1	0.0	44.7	4.3	0.0	-	49.0	6.2	0.0	3.2	0.0	-	9.4	-
Lights	98	2532	2	5	-	2637	2	0	2	0	-	4	0	2718	200	0	-	2918	372	0	207	0	-	579	6138
% Lights	93.3	93.7	66.7	100.0	-	93.7	100.0	-	100.0	-	-	100.0	-	89.6	69.2	-	-	87.9	87.9	-	96.7	-	-	90.9	90.6
Buses	0	6	0	0	-	6	0	0	0	0	-	0	0	5	1	0	-	6	0	0	0	0	-	0	12
% Buses	0.0	0.2	0.0	0.0	-	0.2	0.0	-	0.0	-	-	0.0	-	0.2	0.3	-	-	0.2	0.0	-	0.0	-	-	0.0	0.2
Trucks	7	164	1	0	-	172	0	0	0	0	-	0	0	309	88	0	-	397	51	0	7	0	-	58	627
% Trucks	6.7	6.1	33.3	0.0	-	6.1	0.0	-	0.0	-	-	0.0	-	10.2	30.4	-	-	12.0	12.1	-	3.3	-	-	9.1	9.3
Bicycles on Road	0	0	0	0	-	0	0	0	0	0	-	0	0	0	0	0	-	0	0	0	0	0	-	0	0
% Bicycles on Road	0.0	0.0	0.0	0.0	-	0.0	0.0	-	0.0	-	-	0.0	-	0.0	0.0	-	-	0.0	0.0	-	0.0	-	-	0.0	0.0
Bicycles on Crosswalk	-	-	-	-	0	-	-	-	-	-	0	-	-	-	-	-	0	-	-	-	-	-	0	-	-
% Bicycles on Crosswalk	-	-	-	-	0.0	-	-	-	-	-	0.0	-	-	-	-	-	-	-	-	-	-	-	0.0	-	-
Pedestrians	-	-	-	-	4	-	-	-	-	-	4	-	-	-	-	-	0	-	-	-	-	-	1	-	-
% Pedestrians	-	-	-	-	100.0	-	-	-	-	-	100.0	-	-	-	-	-	-	-	-	-	-	-	100.0	-	-

LEA Consulting Ltd.
625 Cochrane Drive

Markam, Ontario, Canada L3R 9R9
905-470-0015 x240 idinsmore@lea.ca

Count Name: 24085_Hwy 50 & Parr Blvd-PM
Site Code: 24085
Start Date: 09/14/2023



Turning Movement Data Plot

LEA Consulting Ltd.
625 Cochrane Drive

Markam, Ontario, Canada L3R 9R9
905-470-0015 x240 idinsmore@lea.ca

Count Name: 24085_Hwy 50 & Parr Blvd-PM
Site Code: 24085
Start Date: 09/14/2023

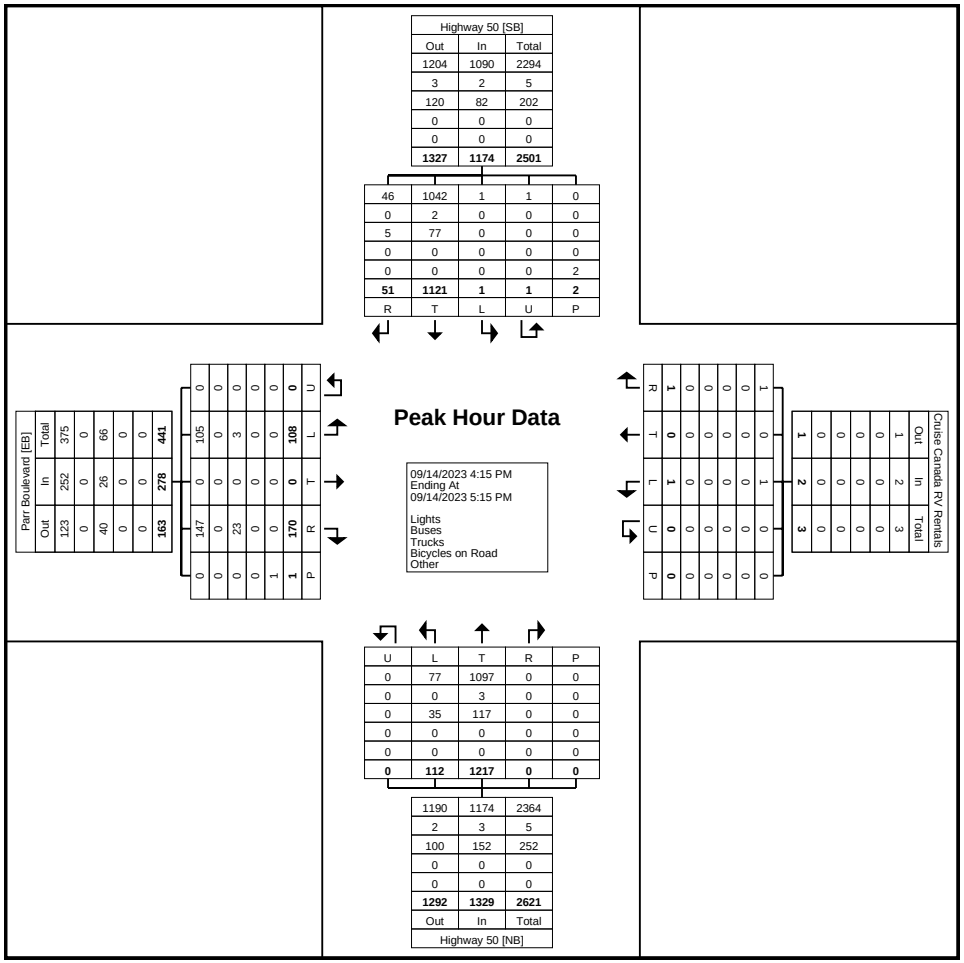
Turning Movement Peak Hour Data (4:15 PM)

Start Time	Highway 50 Southbound						Cruise Canada RV Rentals Westbound						Highway 50 Northbound						Parr Boulevard Eastbound						Int. Total
	Right	Thru	Left	U-Turn	Peds	App. Total	Right	Thru	Left	U-Turn	Peds	App. Total	Right	Thru	Left	U-Turn	Peds	App. Total	Right	Thru	Left	U-Turn	Peds	App. Total	
4:15 PM	13	254	0	1	0	268	0	0	1	0	0	1	0	328	29	0	0	357	32	0	23	0	0	55	681
4:30 PM	16	292	0	0	0	308	0	0	0	0	0	0	0	300	23	0	0	323	50	0	17	0	0	67	698
4:45 PM	11	243	1	0	1	255	1	0	0	0	0	1	0	289	29	0	0	318	32	0	20	0	0	52	626
5:00 PM	11	332	0	0	1	343	0	0	0	0	0	0	0	300	31	0	0	331	56	0	48	0	1	104	778
Total	51	1121	1	1	2	1174	1	0	1	0	0	2	0	1217	112	0	0	1329	170	0	108	0	1	278	2783
Approach %	4.3	95.5	0.1	0.1	-	-	50.0	0.0	50.0	0.0	-	-	0.0	91.6	8.4	0.0	-	-	61.2	0.0	38.8	0.0	-	-	-
Total %	1.8	40.3	0.0	0.0	-	42.2	0.0	0.0	0.0	0.0	-	0.1	0.0	43.7	4.0	0.0	-	47.8	6.1	0.0	3.9	0.0	-	10.0	-
PHF	0.797	0.844	0.250	0.250	-	0.856	0.250	0.000	0.250	0.000	-	0.500	0.000	0.928	0.903	0.000	-	0.931	0.759	0.000	0.563	0.000	-	0.668	0.894
Lights	46	1042	1	1	-	1090	1	0	1	0	-	2	0	1097	77	0	-	1174	147	0	105	0	-	252	2518
% Lights	90.2	93.0	100.0	100.0	-	92.8	100.0	-	100.0	-	-	100.0	-	90.1	68.8	-	-	88.3	86.5	-	97.2	-	-	90.6	90.5
Buses	0	2	0	0	-	2	0	0	0	0	-	0	0	3	0	0	-	3	0	0	0	0	-	0	5
% Buses	0.0	0.2	0.0	0.0	-	0.2	0.0	-	0.0	-	-	0.0	-	0.2	0.0	-	-	0.2	0.0	-	0.0	-	-	0.0	0.2
Trucks	5	77	0	0	-	82	0	0	0	0	-	0	0	117	35	0	-	152	23	0	3	0	-	26	260
% Trucks	9.8	6.9	0.0	0.0	-	7.0	0.0	-	0.0	-	-	0.0	-	9.6	31.3	-	-	11.4	13.5	-	2.8	-	-	9.4	9.3
Bicycles on Road	0	0	0	0	-	0	0	0	0	0	-	0	0	0	0	0	-	0	0	0	0	0	-	0	0
% Bicycles on Road	0.0	0.0	0.0	0.0	-	0.0	0.0	-	0.0	-	-	0.0	-	0.0	0.0	-	-	0.0	0.0	-	0.0	-	-	0.0	0.0
Bicycles on Crosswalk	-	-	-	-	0	-	-	-	-	-	0	-	-	-	-	-	0	-	-	-	-	-	0	-	-
% Bicycles on Crosswalk	-	-	-	-	0.0	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	0.0	-	-
Pedestrians	-	-	-	-	2	-	-	-	-	-	0	-	-	-	-	-	0	-	-	-	-	-	1	-	-
% Pedestrians	-	-	-	-	100.0	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	100.0	-	-

LEA Consulting Ltd.
625 Cochrane Drive

Markam, Ontario, Canada L3R 9R9
905-470-0015 x240 idinsmore@lea.ca

Count Name: 24085_Hwy 50 & Parr Blvd-PM
Site Code: 24085
Start Date: 09/14/2023



Turning Movement Peak Hour Data Plot (4:15 PM)

LEA Consulting Ltd.
625 Cochrane Drive

Markam, Ontario, Canada L3R 9R9
905-470-0015 x240 idinsmore@lea.ca

Count Name: 24085_Hwy 50 & Parr Blvd-SAT
Site Code: 24085
Start Date: 09/16/2023

Turning Movement Data

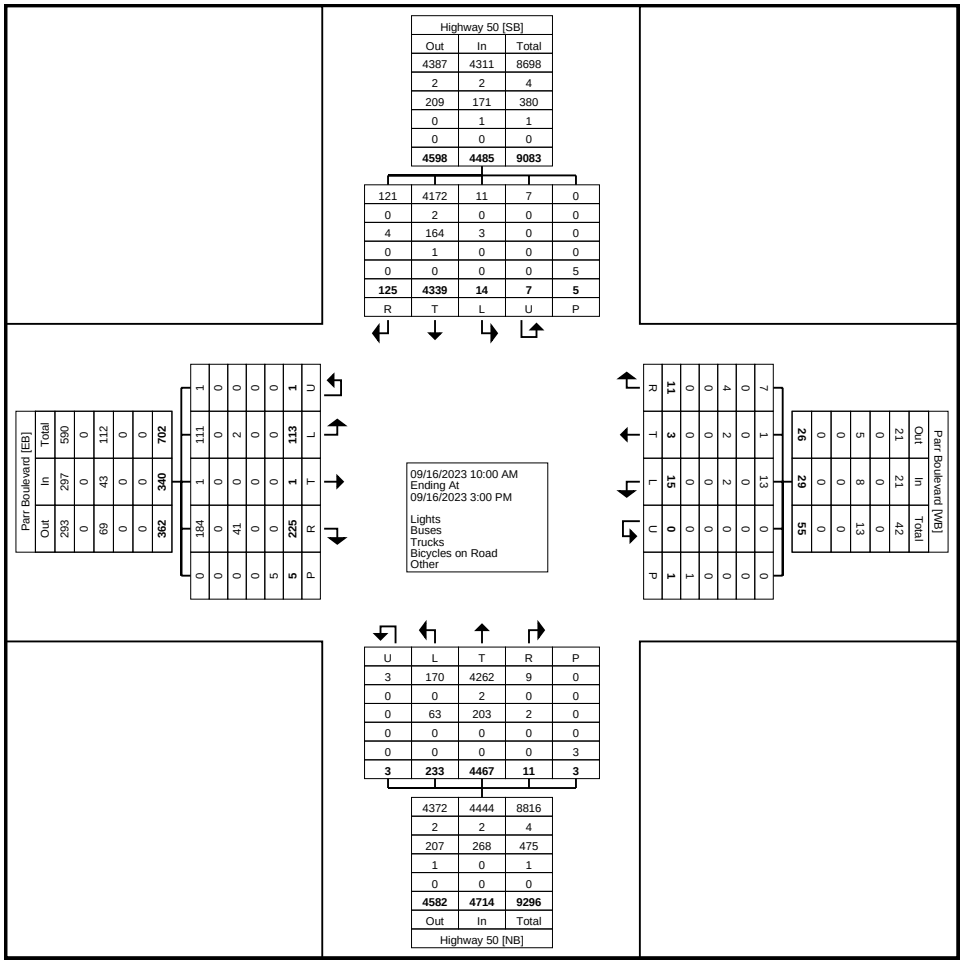
Start Time	Highway 50 Southbound						Parr Boulevard Westbound						Highway 50 Northbound						Parr Boulevard Eastbound						Int. Total
	Right	Thru	Left	U-Turn	Peds	App. Total	Right	Thru	Left	U-Turn	Peds	App. Total	Right	Thru	Left	U-Turn	Peds	App. Total	Right	Thru	Left	U-Turn	Peds	App. Total	
10:00 AM	7	184	0	0	0	191	1	0	0	0	0	1	0	186	4	0	0	190	19	0	8	1	0	28	410
10:15 AM	6	181	0	0	0	187	1	0	1	0	0	2	4	209	15	0	0	228	9	0	8	0	0	17	434
10:30 AM	5	228	0	2	2	235	0	0	1	0	0	1	0	200	12	0	0	212	14	0	5	0	0	19	467
10:45 AM	8	229	1	0	0	238	0	0	1	0	0	1	1	204	15	0	0	220	12	0	4	0	0	16	475
Hourly Total	26	822	1	2	2	851	2	0	3	0	0	5	5	799	46	0	0	850	54	0	25	1	0	80	1786
11:00 AM	7	181	0	0	0	188	0	0	0	0	0	0	1	209	12	0	0	222	12	0	4	0	0	16	426
11:15 AM	10	222	1	0	0	233	1	0	1	0	0	2	0	178	17	0	0	195	10	0	8	0	0	18	448
11:30 AM	12	201	0	0	2	213	0	0	1	0	0	1	0	241	11	0	0	252	10	0	9	0	0	19	485
11:45 AM	9	192	0	1	0	202	0	0	0	0	0	0	0	204	17	1	0	222	11	0	3	0	0	14	438
Hourly Total	38	796	1	1	2	836	1	0	2	0	0	3	1	832	57	1	0	891	43	0	24	0	0	67	1797
12:00 PM	7	247	0	1	0	255	1	1	0	0	0	2	0	213	15	0	0	228	11	0	6	0	0	17	502
12:15 PM	4	227	2	1	0	234	0	0	0	0	0	0	0	229	9	0	0	238	11	1	5	0	0	17	489
12:30 PM	5	252	0	0	0	257	0	0	1	0	0	1	0	214	11	0	0	225	12	0	9	0	1	21	504
12:45 PM	4	185	0	1	0	190	0	0	1	0	0	1	1	243	15	0	0	259	9	0	4	0	0	13	463
Hourly Total	20	911	2	3	0	936	1	1	2	0	0	4	1	899	50	0	0	950	43	1	24	0	1	68	1958
1:00 PM	8	223	0	0	0	231	1	0	0	0	0	1	0	232	14	0	0	246	15	0	6	0	0	21	499
1:15 PM	5	208	3	0	0	216	1	0	1	0	0	2	0	279	12	0	0	291	9	0	2	0	0	11	520
1:30 PM	7	237	0	0	0	244	2	0	2	0	0	4	2	223	9	0	0	234	11	0	6	0	0	17	499
1:45 PM	3	187	1	0	0	191	1	0	1	0	0	2	2	234	10	0	3	246	9	0	7	0	3	16	455
Hourly Total	23	855	4	0	0	882	5	0	4	0	0	9	4	968	45	0	3	1017	44	0	21	0	3	65	1973
2:00 PM	7	244	2	0	0	253	1	0	2	0	0	3	0	254	12	1	0	267	7	0	6	0	0	13	536
2:15 PM	4	251	2	1	1	258	1	0	0	0	1	1	0	240	10	1	0	251	14	0	7	0	0	21	531
2:30 PM	4	231	1	0	0	236	0	1	2	0	0	3	0	229	6	0	0	235	11	0	3	0	0	14	488
2:45 PM	3	229	1	0	0	233	0	1	0	0	0	1	0	246	7	0	0	253	9	0	3	0	1	12	499
Hourly Total	18	955	6	1	1	980	2	2	4	0	1	8	0	969	35	2	0	1006	41	0	19	0	1	60	2054
Grand Total	125	4339	14	7	5	4485	11	3	15	0	1	29	11	4467	233	3	3	4714	225	1	113	1	5	340	9568
Approach %	2.8	96.7	0.3	0.2	-	-	37.9	10.3	51.7	0.0	-	-	0.2	94.8	4.9	0.1	-	-	66.2	0.3	33.2	0.3	-	-	-
Total %	1.3	45.3	0.1	0.1	-	46.9	0.1	0.0	0.2	0.0	-	0.3	0.1	46.7	2.4	0.0	-	49.3	2.4	0.0	1.2	0.0	-	3.6	-
Lights	121	4172	11	7	-	4311	7	1	13	0	-	21	9	4262	170	3	-	4444	184	1	111	1	-	297	9073
% Lights	96.8	96.2	78.6	100.0	-	96.1	63.6	33.3	86.7	-	-	72.4	81.8	95.4	73.0	100.0	-	94.3	81.8	100.0	98.2	100.0	-	87.4	94.8
Buses	0	2	0	0	-	2	0	0	0	0	-	0	0	2	0	0	-	2	0	0	0	0	-	0	4
% Buses	0.0	0.0	0.0	0.0	-	0.0	0.0	0.0	0.0	-	-	0.0	0.0	0.0	0.0	0.0	-	0.0	0.0	0.0	0.0	0.0	-	0.0	0.0
Trucks	4	164	3	0	-	171	4	2	2	0	-	8	2	203	63	0	-	268	41	0	2	0	-	43	490
% Trucks	3.2	3.8	21.4	0.0	-	3.8	36.4	66.7	13.3	-	-	27.6	18.2	4.5	27.0	0.0	-	5.7	18.2	0.0	1.8	0.0	-	12.6	5.1
Bicycles on Road	0	1	0	0	-	1	0	0	0	0	-	0	0	0	0	0	-	0	0	0	0	0	-	0	1

% Bicycles on Road	0.0	0.0	0.0	0.0	-	0.0	0.0	0.0	0.0	-	-	0.0	0.0	0.0	0.0	0.0	-	0.0	0.0	0.0	0.0	0.0	-	0.0	0.0
Bicycles on Crosswalk	-	-	-	-	0	-	-	-	-	-	0	-	-	-	-	-	0	-	-	-	-	-	0	-	-
% Bicycles on Crosswalk	-	-	-	-	0.0	-	-	-	-	-	0.0	-	-	-	-	-	0.0	-	-	-	-	-	0.0	-	-
Pedestrians	-	-	-	-	5	-	-	-	-	-	1	-	-	-	-	-	3	-	-	-	-	-	5	-	-
% Pedestrians	-	-	-	-	100.0	-	-	-	-	-	100.0	-	-	-	-	-	100.0	-	-	-	-	-	100.0	-	-

LEA Consulting Ltd.
625 Cochrane Drive

Markam, Ontario, Canada L3R 9R9
905-470-0015 x240 idinsmore@lea.ca

Count Name: 24085_Hwy 50 & Parr Blvd-SAT
Site Code: 24085
Start Date: 09/16/2023



Turning Movement Data Plot

LEA Consulting Ltd.
625 Cochrane Drive

Markam, Ontario, Canada L3R 9R9
905-470-0015 x240 idinsmore@lea.ca

Count Name: 24085_Hwy 50 & Parr Blvd-SAT
Site Code: 24085
Start Date: 09/16/2023

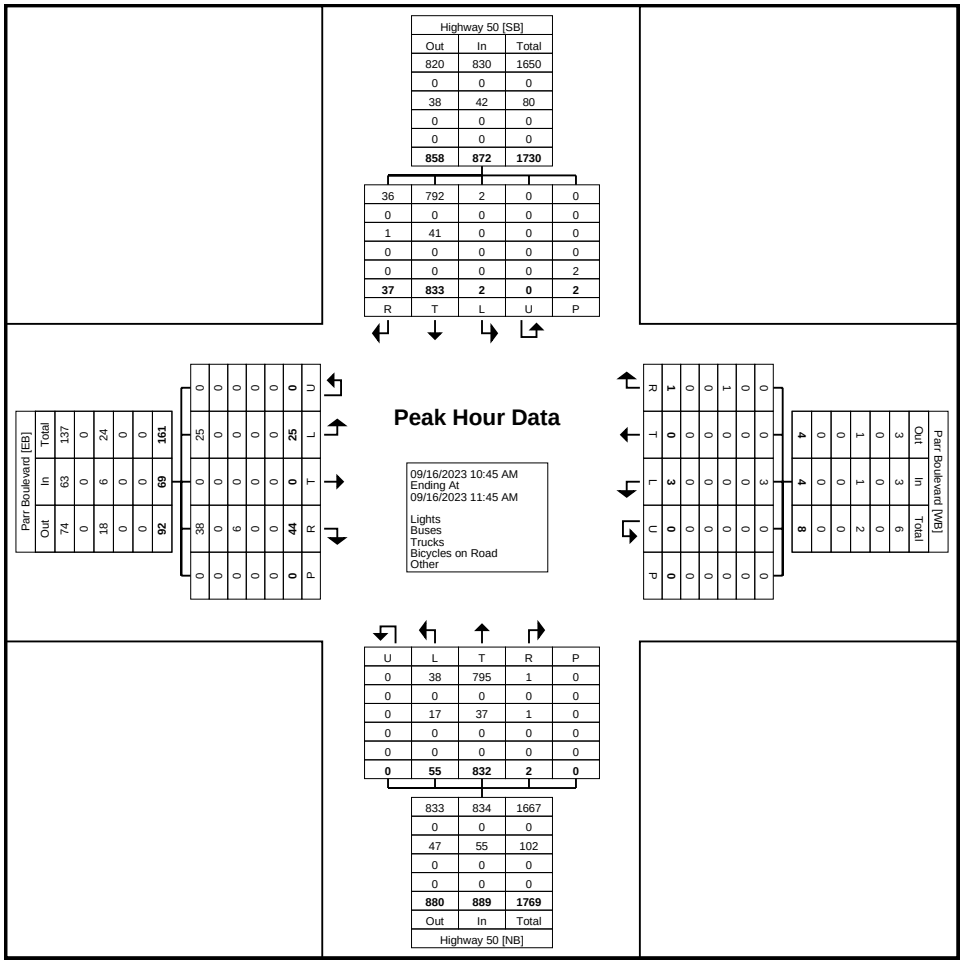
Turning Movement Peak Hour Data (10:45 AM)

Start Time	Highway 50 Southbound						Parr Boulevard Westbound						Highway 50 Northbound						Parr Boulevard Eastbound						Int. Total
	Right	Thru	Left	U-Turn	Peds	App. Total	Right	Thru	Left	U-Turn	Peds	App. Total	Right	Thru	Left	U-Turn	Peds	App. Total	Right	Thru	Left	U-Turn	Peds	App. Total	
10:45 AM	8	229	1	0	0	238	0	0	1	0	0	1	1	204	15	0	0	220	12	0	4	0	0	16	475
11:00 AM	7	181	0	0	0	188	0	0	0	0	0	0	1	209	12	0	0	222	12	0	4	0	0	16	426
11:15 AM	10	222	1	0	0	233	1	0	1	0	0	2	0	178	17	0	0	195	10	0	8	0	0	18	448
11:30 AM	12	201	0	0	2	213	0	0	1	0	0	1	0	241	11	0	0	252	10	0	9	0	0	19	485
Total	37	833	2	0	2	872	1	0	3	0	0	4	2	832	55	0	0	889	44	0	25	0	0	69	1834
Approach %	4.2	95.5	0.2	0.0	-	-	25.0	0.0	75.0	0.0	-	-	0.2	93.6	6.2	0.0	-	-	63.8	0.0	36.2	0.0	-	-	-
Total %	2.0	45.4	0.1	0.0	-	47.5	0.1	0.0	0.2	0.0	-	0.2	0.1	45.4	3.0	0.0	-	48.5	2.4	0.0	1.4	0.0	-	3.8	-
PHF	0.771	0.909	0.500	0.000	-	0.916	0.250	0.000	0.750	0.000	-	0.500	0.500	0.863	0.809	0.000	-	0.882	0.917	0.000	0.694	0.000	-	0.908	0.945
Lights	36	792	2	0	-	830	0	0	3	0	-	3	1	795	38	0	-	834	38	0	25	0	-	63	1730
% Lights	97.3	95.1	100.0	-	-	95.2	0.0	-	100.0	-	-	75.0	50.0	95.6	69.1	-	-	93.8	86.4	-	100.0	-	-	91.3	94.3
Buses	0	0	0	0	-	0	0	0	0	0	-	0	0	0	0	0	-	0	0	0	0	0	-	0	0
% Buses	0.0	0.0	0.0	-	-	0.0	0.0	-	0.0	-	-	0.0	0.0	0.0	0.0	-	-	0.0	0.0	-	0.0	-	-	0.0	0.0
Trucks	1	41	0	0	-	42	1	0	0	0	-	1	1	37	17	0	-	55	6	0	0	0	-	6	104
% Trucks	2.7	4.9	0.0	-	-	4.8	100.0	-	0.0	-	-	25.0	50.0	4.4	30.9	-	-	6.2	13.6	-	0.0	-	-	8.7	5.7
Bicycles on Road	0	0	0	0	-	0	0	0	0	0	-	0	0	0	0	0	-	0	0	0	0	0	-	0	0
% Bicycles on Road	0.0	0.0	0.0	-	-	0.0	0.0	-	0.0	-	-	0.0	0.0	0.0	0.0	-	-	0.0	0.0	-	0.0	-	-	0.0	0.0
Bicycles on Crosswalk	-	-	-	-	0	-	-	-	-	-	0	-	-	-	-	-	0	-	-	-	-	-	0	-	-
% Bicycles on Crosswalk	-	-	-	-	0.0	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Pedestrians	-	-	-	-	2	-	-	-	-	-	0	-	-	-	-	-	0	-	-	-	-	-	0	-	-
% Pedestrians	-	-	-	-	100.0	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-

LEA Consulting Ltd.
625 Cochrane Drive

Markam, Ontario, Canada L3R 9R9
905-470-0015 x240 idinsmore@lea.ca

Count Name: 24085_Hwy 50 & Parr Blvd-SAT
Site Code: 24085
Start Date: 09/16/2023



Turning Movement Peak Hour Data Plot (10:45 AM)

LEA Consulting Ltd.
625 Cochrane Drive

Markam, Ontario, Canada L3R 9R9
905-470-0015 x240 idinsmore@lea.ca

Count Name: 24085_Hwy 50 & Parr Blvd-SAT
Site Code: 24085
Start Date: 09/16/2023

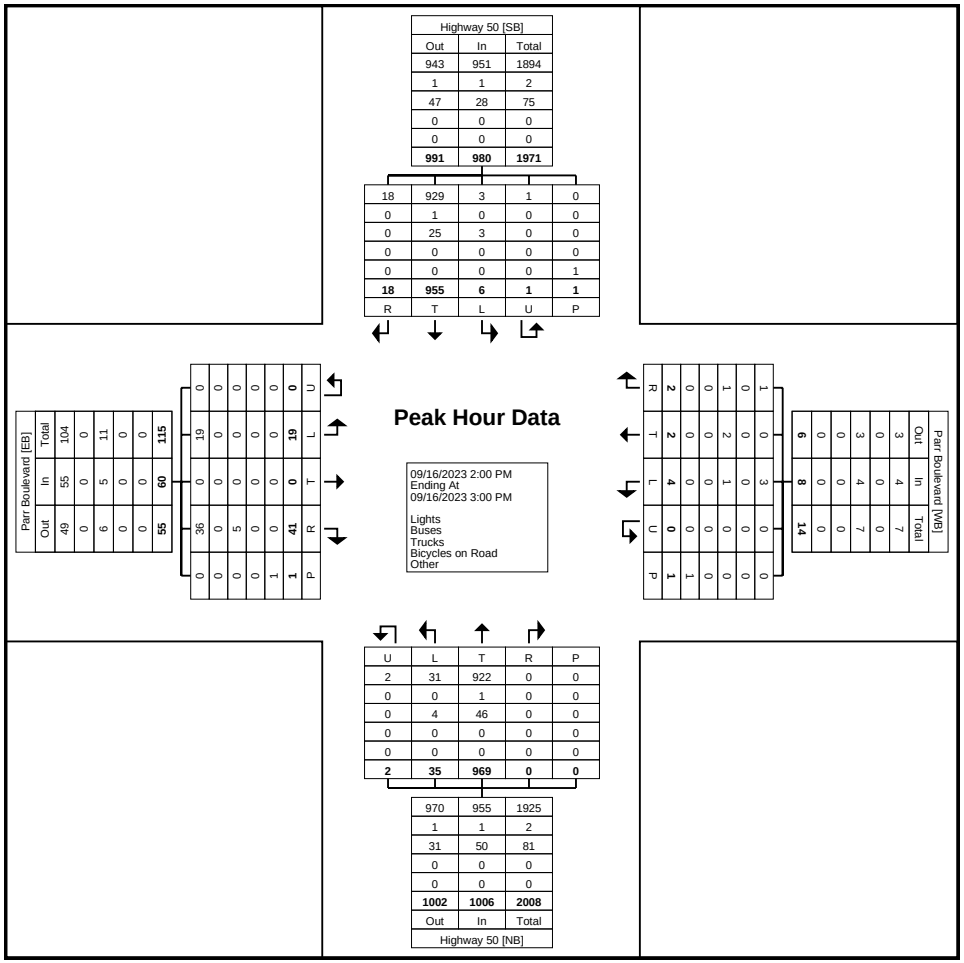
Turning Movement Peak Hour Data (2:00 PM)

Start Time	Highway 50 Southbound						Parr Boulevard Westbound						Highway 50 Northbound						Parr Boulevard Eastbound						Int. Total
	Right	Thru	Left	U-Turn	Peds	App. Total	Right	Thru	Left	U-Turn	Peds	App. Total	Right	Thru	Left	U-Turn	Peds	App. Total	Right	Thru	Left	U-Turn	Peds	App. Total	
2:00 PM	7	244	2	0	0	253	1	0	2	0	0	3	0	254	12	1	0	267	7	0	6	0	0	13	536
2:15 PM	4	251	2	1	1	258	1	0	0	0	1	1	0	240	10	1	0	251	14	0	7	0	0	21	531
2:30 PM	4	231	1	0	0	236	0	1	2	0	0	3	0	229	6	0	0	235	11	0	3	0	0	14	488
2:45 PM	3	229	1	0	0	233	0	1	0	0	0	1	0	246	7	0	0	253	9	0	3	0	1	12	499
Total	18	955	6	1	1	980	2	2	4	0	1	8	0	969	35	2	0	1006	41	0	19	0	1	60	2054
Approach %	1.8	97.4	0.6	0.1	-	-	25.0	25.0	50.0	0.0	-	-	0.0	96.3	3.5	0.2	-	-	68.3	0.0	31.7	0.0	-	-	-
Total %	0.9	46.5	0.3	0.0	-	47.7	0.1	0.1	0.2	0.0	-	0.4	0.0	47.2	1.7	0.1	-	49.0	2.0	0.0	0.9	0.0	-	2.9	-
PHF	0.643	0.951	0.750	0.250	-	0.950	0.500	0.500	0.500	0.000	-	0.667	0.000	0.954	0.729	0.500	-	0.942	0.732	0.000	0.679	0.000	-	0.714	0.958
Lights	18	929	3	1	-	951	1	0	3	0	-	4	0	922	31	2	-	955	36	0	19	0	-	55	1965
% Lights	100.0	97.3	50.0	100.0	-	97.0	50.0	0.0	75.0	-	-	50.0	-	95.1	88.6	100.0	-	94.9	87.8	-	100.0	-	-	91.7	95.7
Buses	0	1	0	0	-	1	0	0	0	0	-	0	0	1	0	0	-	1	0	0	0	0	-	0	2
% Buses	0.0	0.1	0.0	0.0	-	0.1	0.0	0.0	0.0	-	-	0.0	-	0.1	0.0	0.0	-	0.1	0.0	-	0.0	-	-	0.0	0.1
Trucks	0	25	3	0	-	28	1	2	1	0	-	4	0	46	4	0	-	50	5	0	0	0	-	5	87
% Trucks	0.0	2.6	50.0	0.0	-	2.9	50.0	100.0	25.0	-	-	50.0	-	4.7	11.4	0.0	-	5.0	12.2	-	0.0	-	-	8.3	4.2
Bicycles on Road	0	0	0	0	-	0	0	0	0	0	-	0	0	0	0	0	-	0	0	0	0	0	-	0	0
% Bicycles on Road	0.0	0.0	0.0	0.0	-	0.0	0.0	0.0	0.0	-	-	0.0	-	0.0	0.0	0.0	-	0.0	0.0	-	0.0	-	-	0.0	0.0
Bicycles on Crosswalk	-	-	-	-	0	-	-	-	-	-	0	-	-	-	-	-	0	-	-	-	-	-	0	-	-
% Bicycles on Crosswalk	-	-	-	-	0.0	-	-	-	-	-	0.0	-	-	-	-	-	-	-	-	-	-	-	0.0	-	-
Pedestrians	-	-	-	-	1	-	-	-	-	-	1	-	-	-	-	-	0	-	-	-	-	-	1	-	-
% Pedestrians	-	-	-	-	100.0	-	-	-	-	-	100.0	-	-	-	-	-	-	-	-	-	-	-	100.0	-	-

LEA Consulting Ltd.
625 Cochrane Drive

Markam, Ontario, Canada L3R 9R9
905-470-0015 x240 idinsmore@lea.ca

Count Name: 24085_Hwy 50 & Parr Blvd-SAT
Site Code: 24085
Start Date: 09/16/2023



Turning Movement Peak Hour Data Plot (2:00 PM)

LEA Consulting Ltd.
625 Cochrane Drive

Markam, Ontario, Canada L3R 9R9
905-470-0015 x240 idinsmore@lea.ca

Count Name: 24085_Hwy 50 & Mayfield Rd-AM
Site Code: 24085
Start Date: 09/14/2023

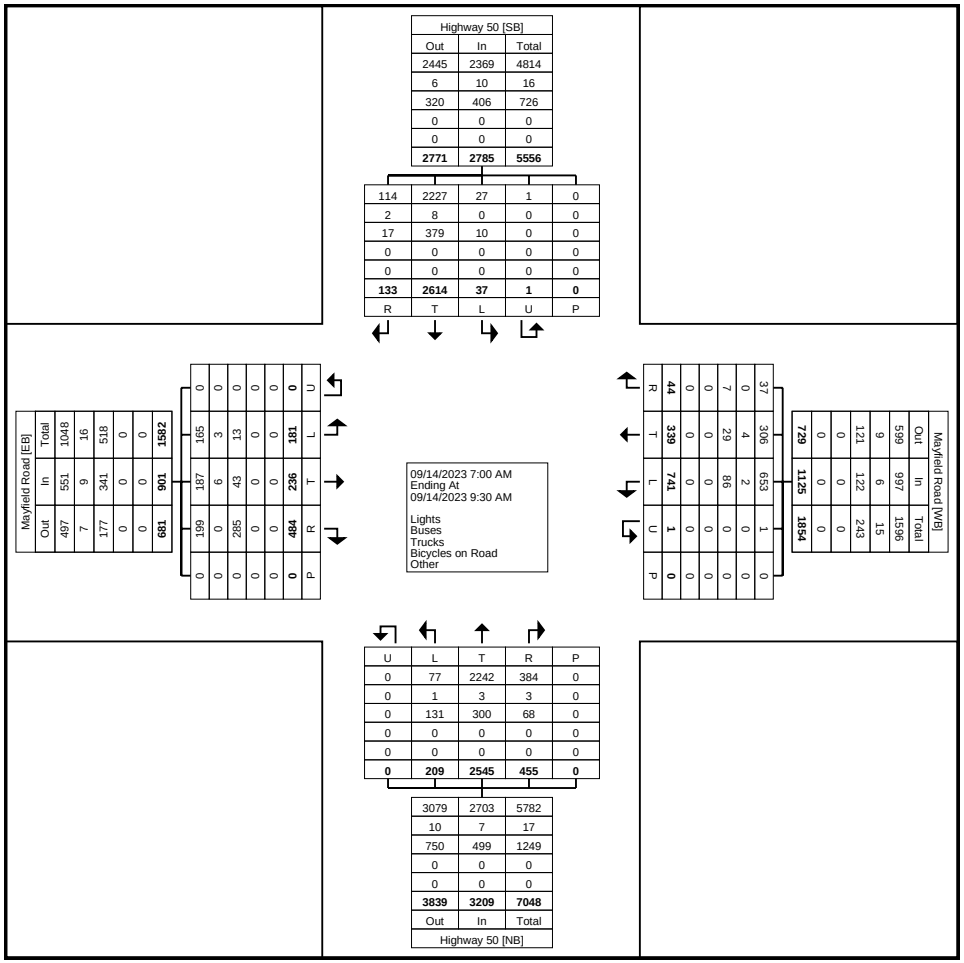
Turning Movement Data

Start Time	Highway 50 Southbound						Mayfield Road Westbound						Highway 50 Northbound						Mayfield Road Eastbound						Int. Total
	Right	Thru	Left	U-Turn	Peds	App. Total	Right	Thru	Left	U-Turn	Peds	App. Total	Right	Thru	Left	U-Turn	Peds	App. Total	Right	Thru	Left	U-Turn	Peds	App. Total	
7:00 AM	10	270	4	0	0	284	1	28	72	0	0	101	42	279	19	0	0	340	53	23	12	0	0	88	813
7:15 AM	19	273	4	0	0	296	1	36	70	0	0	107	40	266	25	0	0	331	54	20	17	0	0	91	825
7:30 AM	15	276	4	0	0	295	2	46	84	0	0	132	33	241	15	0	0	289	51	27	14	0	0	92	808
7:45 AM	20	268	10	0	0	298	8	30	72	0	0	110	50	278	24	0	0	352	44	23	18	0	0	85	845
Hourly Total	64	1087	22	0	0	1173	12	140	298	0	0	450	165	1064	83	0	0	1312	202	93	61	0	0	356	3291
8:00 AM	8	251	2	0	0	261	1	55	85	0	0	141	44	257	19	0	0	320	48	15	15	0	0	78	800
8:15 AM	9	280	1	0	0	290	4	39	76	0	0	119	42	249	18	0	0	309	48	30	23	0	0	101	819
8:30 AM	13	281	2	0	0	296	7	33	76	0	0	116	54	298	20	0	0	372	45	18	17	0	0	80	864
8:45 AM	13	227	3	0	0	243	11	34	82	1	0	128	54	230	19	0	0	303	38	40	26	0	0	104	778
Hourly Total	43	1039	8	0	0	1090	23	161	319	1	0	504	194	1034	76	0	0	1304	179	103	81	0	0	363	3261
9:00 AM	12	259	4	1	0	276	5	22	64	0	0	91	54	247	23	0	0	324	51	20	23	0	0	94	785
9:15 AM	14	229	3	0	0	246	4	16	60	0	0	80	42	200	27	0	0	269	52	20	16	0	0	88	683
Grand Total	133	2614	37	1	0	2785	44	339	741	1	0	1125	455	2545	209	0	0	3209	484	236	181	0	0	901	8020
Approach %	4.8	93.9	1.3	0.0	-	-	3.9	30.1	65.9	0.1	-	-	14.2	79.3	6.5	0.0	-	-	53.7	26.2	20.1	0.0	-	-	-
Total %	1.7	32.6	0.5	0.0	-	34.7	0.5	4.2	9.2	0.0	-	14.0	5.7	31.7	2.6	0.0	-	40.0	6.0	2.9	2.3	0.0	-	11.2	-
Lights	114	2227	27	1	-	2369	37	306	653	1	-	997	384	2242	77	0	-	2703	199	187	165	0	-	551	6620
% Lights	85.7	85.2	73.0	100.0	-	85.1	84.1	90.3	88.1	100.0	-	88.6	84.4	88.1	36.8	-	-	84.2	41.1	79.2	91.2	-	-	61.2	82.5
Buses	2	8	0	0	-	10	0	4	2	0	-	6	3	3	1	0	-	7	0	6	3	0	-	9	32
% Buses	1.5	0.3	0.0	0.0	-	0.4	0.0	1.2	0.3	0.0	-	0.5	0.7	0.1	0.5	-	-	0.2	0.0	2.5	1.7	-	-	1.0	0.4
Trucks	17	379	10	0	-	406	7	29	86	0	-	122	68	300	131	0	-	499	285	43	13	0	-	341	1368
% Trucks	12.8	14.5	27.0	0.0	-	14.6	15.9	8.6	11.6	0.0	-	10.8	14.9	11.8	62.7	-	-	15.6	58.9	18.2	7.2	-	-	37.8	17.1
Bicycles on Road	0	0	0	0	-	0	0	0	0	0	-	0	0	0	0	0	-	0	0	0	0	0	-	0	0
% Bicycles on Road	0.0	0.0	0.0	0.0	-	0.0	0.0	0.0	0.0	0.0	-	0.0	0.0	0.0	0.0	-	-	0.0	0.0	0.0	0.0	-	-	0.0	0.0
Bicycles on Crosswalk	-	-	-	-	0	-	-	-	-	-	0	-	-	-	-	-	0	-	-	-	-	-	0	-	-
% Bicycles on Crosswalk	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Pedestrians	-	-	-	-	0	-	-	-	-	-	0	-	-	-	-	-	0	-	-	-	-	-	0	-	-
% Pedestrians	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-

LEA Consulting Ltd.
625 Cochrane Drive

Markam, Ontario, Canada L3R 9R9
905-470-0015 x240 idinsmore@lea.ca

Count Name: 24085_Hwy 50 & Mayfield Rd-AM
Site Code: 24085
Start Date: 09/14/2023



Turning Movement Data Plot

LEA Consulting Ltd.
625 Cochrane Drive

Markam, Ontario, Canada L3R 9R9
905-470-0015 x240 idinsmore@lea.ca

Count Name: 24085_Hwy 50 & Mayfield Rd-AM
Site Code: 24085
Start Date: 09/14/2023

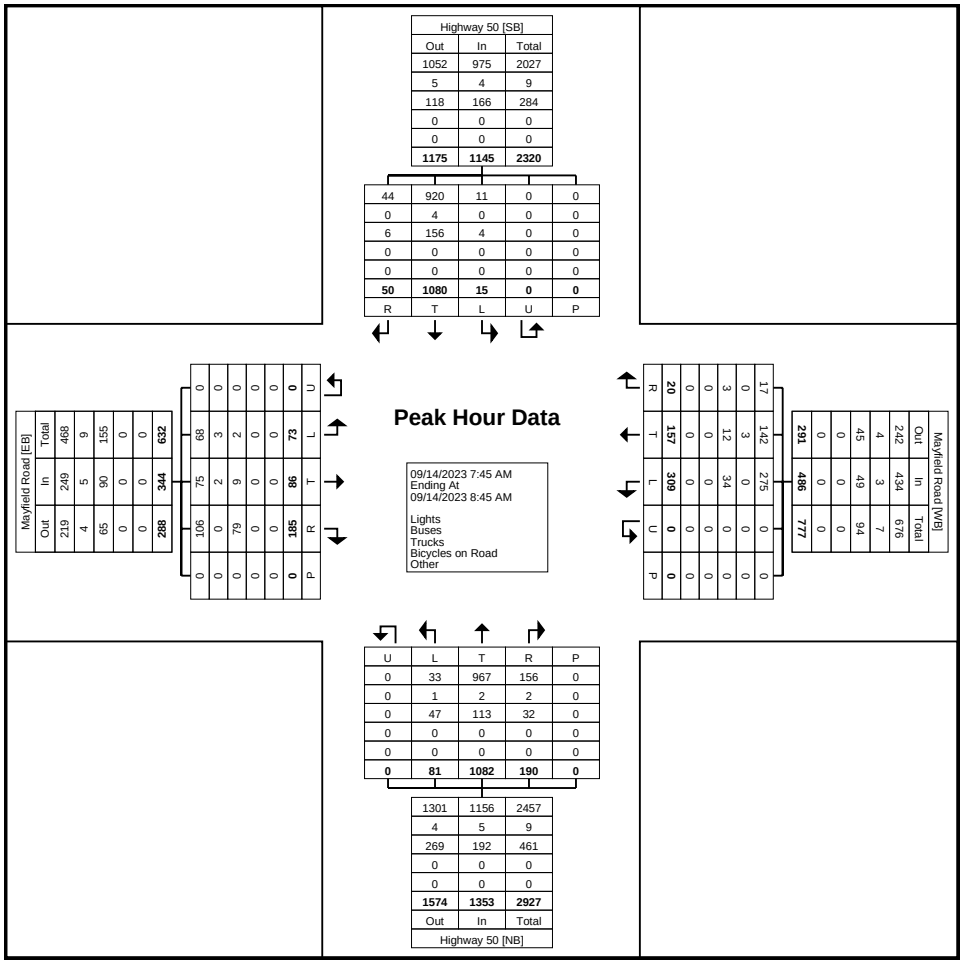
Turning Movement Peak Hour Data (7:45 AM)

Start Time	Highway 50 Southbound						Mayfield Road Westbound						Highway 50 Northbound						Mayfield Road Eastbound						Int. Total
	Right	Thru	Left	U-Turn	Peds	App. Total	Right	Thru	Left	U-Turn	Peds	App. Total	Right	Thru	Left	U-Turn	Peds	App. Total	Right	Thru	Left	U-Turn	Peds	App. Total	
7:45 AM	20	268	10	0	0	298	8	30	72	0	0	110	50	278	24	0	0	352	44	23	18	0	0	85	845
8:00 AM	8	251	2	0	0	261	1	55	85	0	0	141	44	257	19	0	0	320	48	15	15	0	0	78	800
8:15 AM	9	280	1	0	0	290	4	39	76	0	0	119	42	249	18	0	0	309	48	30	23	0	0	101	819
8:30 AM	13	281	2	0	0	296	7	33	76	0	0	116	54	298	20	0	0	372	45	18	17	0	0	80	864
Total	50	1080	15	0	0	1145	20	157	309	0	0	486	190	1082	81	0	0	1353	185	86	73	0	0	344	3328
Approach %	4.4	94.3	1.3	0.0	-	-	4.1	32.3	63.6	0.0	-	-	14.0	80.0	6.0	0.0	-	-	53.8	25.0	21.2	0.0	-	-	-
Total %	1.5	32.5	0.5	0.0	-	34.4	0.6	4.7	9.3	0.0	-	14.6	5.7	32.5	2.4	0.0	-	40.7	5.6	2.6	2.2	0.0	-	10.3	-
PHF	0.625	0.961	0.375	0.000	-	0.961	0.625	0.714	0.909	0.000	-	0.862	0.880	0.908	0.844	0.000	-	0.909	0.964	0.717	0.793	0.000	-	0.851	0.963
Lights	44	920	11	0	-	975	17	142	275	0	-	434	156	967	33	0	-	1156	106	75	68	0	-	249	2814
% Lights	88.0	85.2	73.3	-	-	85.2	85.0	90.4	89.0	-	-	89.3	82.1	89.4	40.7	-	-	85.4	57.3	87.2	93.2	-	-	72.4	84.6
Buses	0	4	0	0	-	4	0	3	0	0	-	3	2	2	1	0	-	5	0	2	3	0	-	5	17
% Buses	0.0	0.4	0.0	-	-	0.3	0.0	1.9	0.0	-	-	0.6	1.1	0.2	1.2	-	-	0.4	0.0	2.3	4.1	-	-	1.5	0.5
Trucks	6	156	4	0	-	166	3	12	34	0	-	49	32	113	47	0	-	192	79	9	2	0	-	90	497
% Trucks	12.0	14.4	26.7	-	-	14.5	15.0	7.6	11.0	-	-	10.1	16.8	10.4	58.0	-	-	14.2	42.7	10.5	2.7	-	-	26.2	14.9
Bicycles on Road	0	0	0	0	-	0	0	0	0	0	-	0	0	0	0	0	-	0	0	0	0	0	-	0	0
% Bicycles on Road	0.0	0.0	0.0	-	-	0.0	0.0	0.0	0.0	-	-	0.0	0.0	0.0	0.0	-	-	0.0	0.0	0.0	0.0	-	-	0.0	0.0
Bicycles on Crosswalk	-	-	-	-	0	-	-	-	-	-	0	-	-	-	-	-	0	-	-	-	-	-	0	-	-
% Bicycles on Crosswalk	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Pedestrians	-	-	-	-	0	-	-	-	-	-	0	-	-	-	-	-	0	-	-	-	-	-	0	-	-
% Pedestrians	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-

LEA Consulting Ltd.
625 Cochrane Drive

Markam, Ontario, Canada L3R 9R9
905-470-0015 x240 idinsmore@lea.ca

Count Name: 24085_Hwy 50 & Mayfield Rd-AM
Site Code: 24085
Start Date: 09/14/2023



Turning Movement Peak Hour Data Plot (7:45 AM)

LEA Consulting Ltd.
625 Cochrane Drive

Markam, Ontario, Canada L3R 9R9
905-470-0015 x240 idinsmore@lea.ca

Count Name: 24085_Hwy 50 & Mayfield Rd-PM
Site Code: 24085
Start Date: 09/14/2023

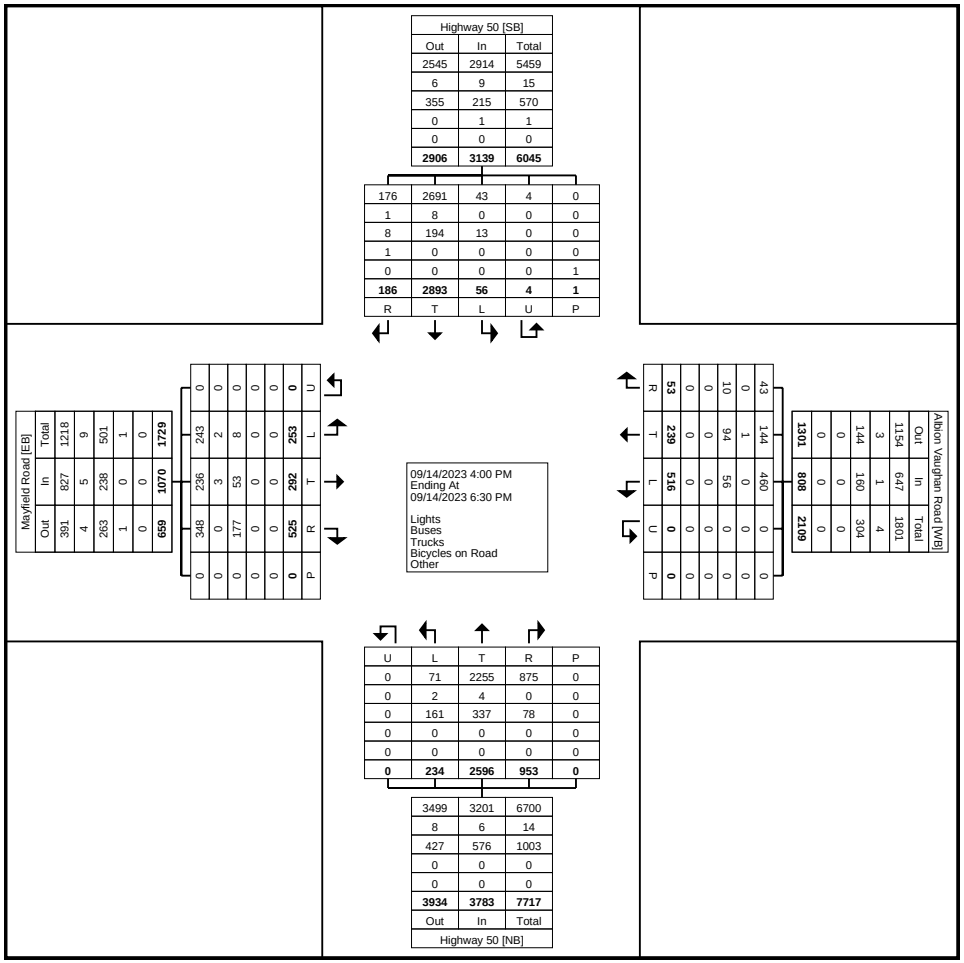
Turning Movement Data

Start Time	Highway 50 Southbound						Albion Vaughan Road Westbound						Highway 50 Northbound						Mayfield Road Eastbound						Int. Total
	Right	Thru	Left	U-Turn	Peds	App. Total	Right	Thru	Left	U-Turn	Peds	App. Total	Right	Thru	Left	U-Turn	Peds	App. Total	Right	Thru	Left	U-Turn	Peds	App. Total	
4:00 PM	24	292	7	0	0	323	6	30	53	0	0	89	89	240	24	0	0	353	54	36	38	0	0	128	893
4:15 PM	19	302	6	0	0	327	9	13	48	0	0	70	112	303	20	0	0	435	34	23	26	0	0	83	915
4:30 PM	19	272	7	3	0	301	5	31	55	0	0	91	93	238	33	0	0	364	53	40	25	0	0	118	874
4:45 PM	19	287	6	0	1	312	5	29	49	0	0	83	101	198	20	0	0	319	61	31	29	0	0	121	835
Hourly Total	81	1153	26	3	1	1263	25	103	205	0	0	333	395	979	97	0	0	1471	202	130	118	0	0	450	3517
5:00 PM	19	321	5	0	0	345	7	29	57	0	0	93	83	274	27	0	0	384	43	22	22	0	0	87	909
5:15 PM	13	300	5	0	0	318	4	23	61	0	0	88	97	232	24	0	0	353	49	35	30	0	0	114	873
5:30 PM	22	306	5	1	0	334	3	31	60	0	0	94	90	264	20	0	0	374	55	36	21	0	0	112	914
5:45 PM	14	280	10	0	0	304	6	22	41	0	0	69	126	329	25	0	0	480	50	27	25	0	0	102	955
Hourly Total	68	1207	25	1	0	1301	20	105	219	0	0	344	396	1099	96	0	0	1591	197	120	98	0	0	415	3651
6:00 PM	22	259	0	0	0	281	5	21	52	0	0	78	85	255	22	0	0	362	64	21	29	0	0	114	835
6:15 PM	15	274	5	0	0	294	3	10	40	0	0	53	77	263	19	0	0	359	62	21	8	0	0	91	797
Grand Total	186	2893	56	4	1	3139	53	239	516	0	0	808	953	2596	234	0	0	3783	525	292	253	0	0	1070	8800
Approach %	5.9	92.2	1.8	0.1	-	-	6.6	29.6	63.9	0.0	-	-	25.2	68.6	6.2	0.0	-	-	49.1	27.3	23.6	0.0	-	-	-
Total %	2.1	32.9	0.6	0.0	-	35.7	0.6	2.7	5.9	0.0	-	9.2	10.8	29.5	2.7	0.0	-	43.0	6.0	3.3	2.9	0.0	-	12.2	-
Lights	176	2691	43	4	-	2914	43	144	460	0	-	647	875	2255	71	0	-	3201	348	236	243	0	-	827	7589
% Lights	94.6	93.0	76.8	100.0	-	92.8	81.1	60.3	89.1	-	-	80.1	91.8	86.9	30.3	-	-	84.6	66.3	80.8	96.0	-	-	77.3	86.2
Buses	1	8	0	0	-	9	0	1	0	0	-	1	0	4	2	0	-	6	0	3	2	0	-	5	21
% Buses	0.5	0.3	0.0	0.0	-	0.3	0.0	0.4	0.0	-	-	0.1	0.0	0.2	0.9	-	-	0.2	0.0	1.0	0.8	-	-	0.5	0.2
Trucks	8	194	13	0	-	215	10	94	56	0	-	160	78	337	161	0	-	576	177	53	8	0	-	238	1189
% Trucks	4.3	6.7	23.2	0.0	-	6.8	18.9	39.3	10.9	-	-	19.8	8.2	13.0	68.8	-	-	15.2	33.7	18.2	3.2	-	-	22.2	13.5
Bicycles on Road	1	0	0	0	-	1	0	0	0	0	-	0	0	0	0	0	-	0	0	0	0	0	-	0	1
% Bicycles on Road	0.5	0.0	0.0	0.0	-	0.0	0.0	0.0	0.0	-	-	0.0	0.0	0.0	0.0	-	-	0.0	0.0	0.0	0.0	-	-	0.0	0.0
Bicycles on Crosswalk	-	-	-	-	0	-	-	-	-	-	0	-	-	-	-	-	0	-	-	-	-	-	0	-	-
% Bicycles on Crosswalk	-	-	-	-	0.0	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Pedestrians	-	-	-	-	1	-	-	-	-	-	0	-	-	-	-	-	0	-	-	-	-	-	0	-	-
% Pedestrians	-	-	-	-	100.0	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-

LEA Consulting Ltd.
625 Cochrane Drive

Markam, Ontario, Canada L3R 9R9
905-470-0015 x240 idinsmore@lea.ca

Count Name: 24085_Hwy 50 & Mayfield Rd-PM
Site Code: 24085
Start Date: 09/14/2023



Turning Movement Data Plot

LEA Consulting Ltd.
625 Cochrane Drive

Markam, Ontario, Canada L3R 9R9
905-470-0015 x240 idinsmore@lea.ca

Count Name: 24085_Hwy 50 & Mayfield Rd-PM
Site Code: 24085
Start Date: 09/14/2023

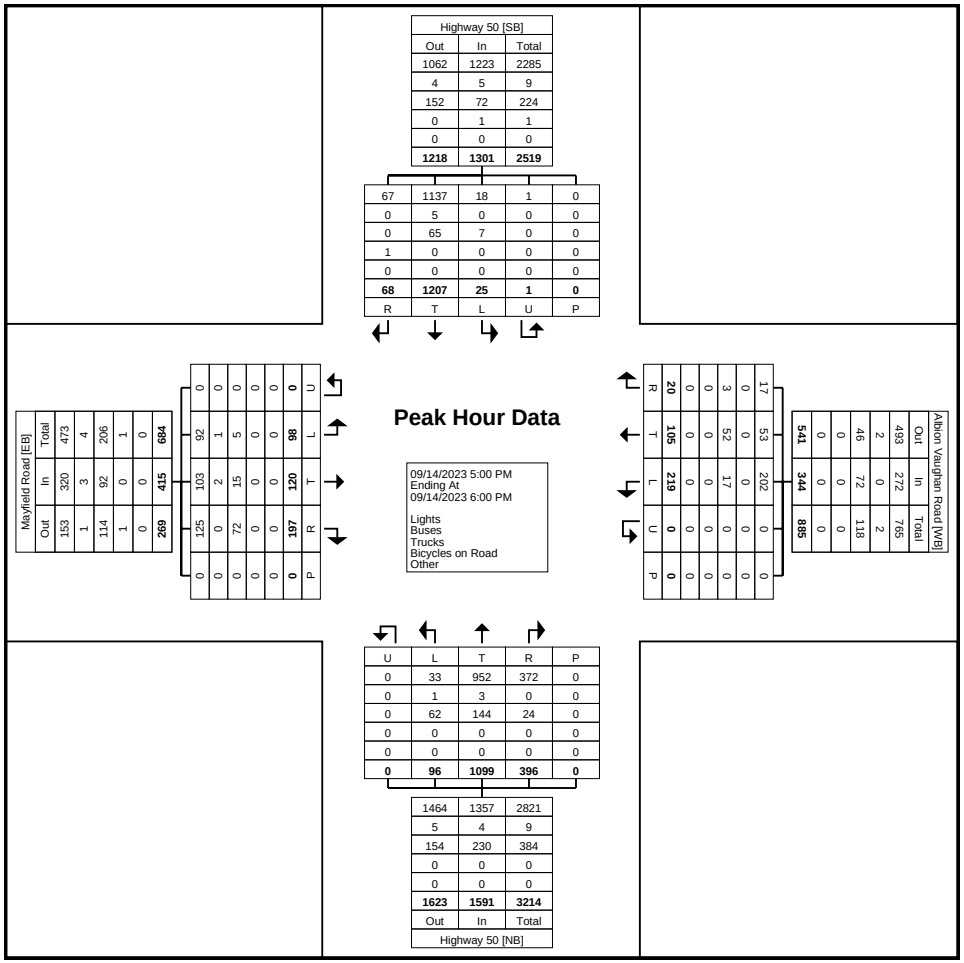
Turning Movement Peak Hour Data (5:00 PM)

Start Time	Highway 50 Southbound						Albion Vaughan Road Westbound						Highway 50 Northbound						Mayfield Road Eastbound						Int. Total
	Right	Thru	Left	U-Turn	Peds	App. Total	Right	Thru	Left	U-Turn	Peds	App. Total	Right	Thru	Left	U-Turn	Peds	App. Total	Right	Thru	Left	U-Turn	Peds	App. Total	
5:00 PM	19	321	5	0	0	345	7	29	57	0	0	93	83	274	27	0	0	384	43	22	22	0	0	87	909
5:15 PM	13	300	5	0	0	318	4	23	61	0	0	88	97	232	24	0	0	353	49	35	30	0	0	114	873
5:30 PM	22	306	5	1	0	334	3	31	60	0	0	94	90	264	20	0	0	374	55	36	21	0	0	112	914
5:45 PM	14	280	10	0	0	304	6	22	41	0	0	69	126	329	25	0	0	480	50	27	25	0	0	102	955
Total	68	1207	25	1	0	1301	20	105	219	0	0	344	396	1099	96	0	0	1591	197	120	98	0	0	415	3651
Approach %	5.2	92.8	1.9	0.1	-	-	5.8	30.5	63.7	0.0	-	-	24.9	69.1	6.0	0.0	-	-	47.5	28.9	23.6	0.0	-	-	-
Total %	1.9	33.1	0.7	0.0	-	35.6	0.5	2.9	6.0	0.0	-	9.4	10.8	30.1	2.6	0.0	-	43.6	5.4	3.3	2.7	0.0	-	11.4	-
PHF	0.773	0.940	0.625	0.250	-	0.943	0.714	0.847	0.898	0.000	-	0.915	0.786	0.835	0.889	0.000	-	0.829	0.895	0.833	0.817	0.000	-	0.910	0.956
Lights	67	1137	18	1	-	1223	17	53	202	0	-	272	372	952	33	0	-	1357	125	103	92	0	-	320	3172
% Lights	98.5	94.2	72.0	100.0	-	94.0	85.0	50.5	92.2	-	-	79.1	93.9	86.6	34.4	-	-	85.3	63.5	85.8	93.9	-	-	77.1	86.9
Buses	0	5	0	0	-	5	0	0	0	0	-	0	0	3	1	0	-	4	0	2	1	0	-	3	12
% Buses	0.0	0.4	0.0	0.0	-	0.4	0.0	0.0	0.0	-	-	0.0	0.0	0.3	1.0	-	-	0.3	0.0	1.7	1.0	-	-	0.7	0.3
Trucks	0	65	7	0	-	72	3	52	17	0	-	72	24	144	62	0	-	230	72	15	5	0	-	92	466
% Trucks	0.0	5.4	28.0	0.0	-	5.5	15.0	49.5	7.8	-	-	20.9	6.1	13.1	64.6	-	-	14.5	36.5	12.5	5.1	-	-	22.2	12.8
Bicycles on Road	1	0	0	0	-	1	0	0	0	0	-	0	0	0	0	0	-	0	0	0	0	0	-	0	1
% Bicycles on Road	1.5	0.0	0.0	0.0	-	0.1	0.0	0.0	0.0	-	-	0.0	0.0	0.0	0.0	-	-	0.0	0.0	0.0	0.0	-	-	0.0	0.0
Bicycles on Crosswalk	-	-	-	-	0	-	-	-	-	-	0	-	-	-	-	-	0	-	-	-	-	-	0	-	-
% Bicycles on Crosswalk	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Pedestrians	-	-	-	-	0	-	-	-	-	-	0	-	-	-	-	-	0	-	-	-	-	-	0	-	-
% Pedestrians	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-

LEA Consulting Ltd.
625 Cochrane Drive

Markam, Ontario, Canada L3R 9R9
905-470-0015 x240 idinsmore@lea.ca

Count Name: 24085_Hwy 50 & Mayfield Rd-PM
Site Code: 24085
Start Date: 09/14/2023



Turning Movement Peak Hour Data Plot (5:00 PM)

LEA Consulting Ltd.
625 Cochrane Drive

Markam, Ontario, Canada L3R 9R9
905-470-0015 x240 idinsmore@lea.ca

Count Name: 24085_Hwy 50 & Mayfield Rd-SAT
Site Code: 24085
Start Date: 09/16/2023

Turning Movement Data

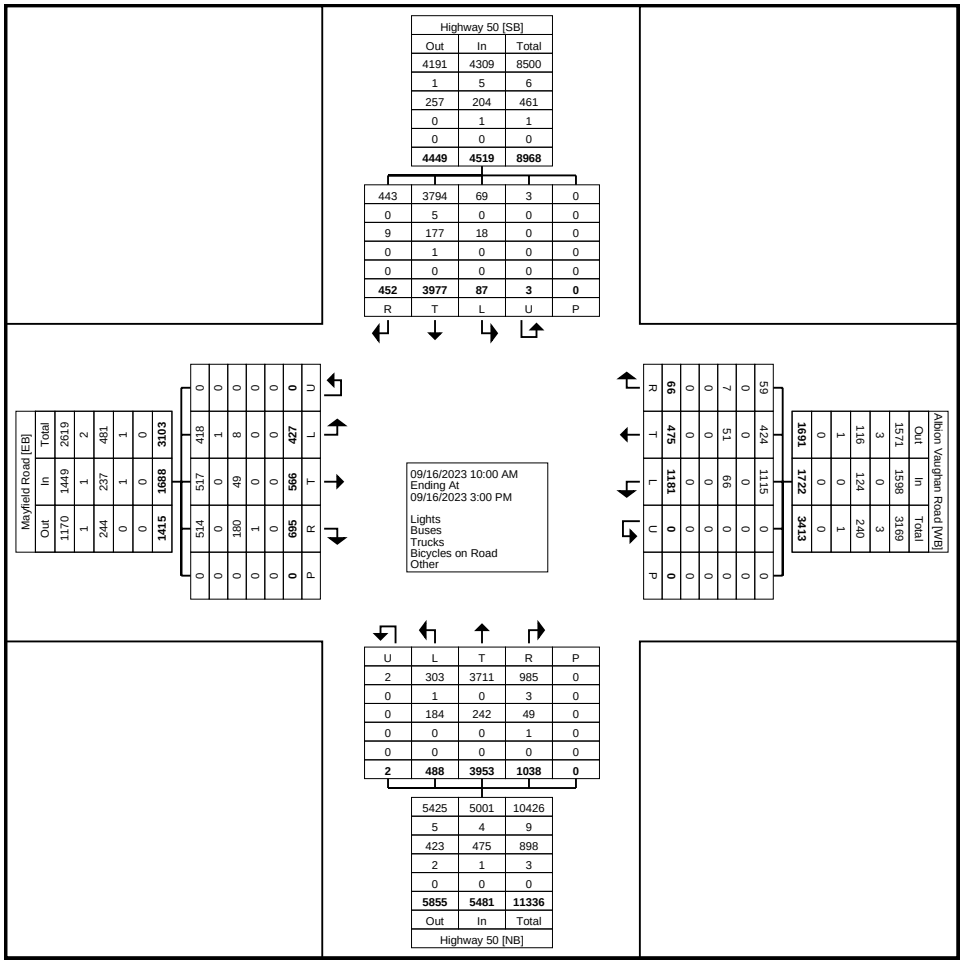
Start Time	Highway 50 Southbound						Albion Vaughan Road Westbound						Highway 50 Northbound						Mayfield Road Eastbound						Int. Total
	Right	Thru	Left	U-Turn	Peds	App. Total	Right	Thru	Left	U-Turn	Peds	App. Total	Right	Thru	Left	U-Turn	Peds	App. Total	Right	Thru	Left	U-Turn	Peds	App. Total	
10:00 AM	11	171	4	0	0	186	3	18	79	0	0	100	53	149	22	0	0	224	26	30	24	0	0	80	590
10:15 AM	15	179	1	0	0	195	4	22	56	0	0	82	49	182	22	0	0	253	40	29	24	0	0	93	623
10:30 AM	22	198	3	1	0	224	2	24	65	0	0	91	42	189	36	0	0	267	36	23	15	0	0	74	656
10:45 AM	21	240	4	0	0	265	2	16	58	0	0	76	36	187	20	1	0	244	35	35	18	0	0	88	673
Hourly Total	69	788	12	1	0	870	11	80	258	0	0	349	180	707	100	1	0	988	137	117	81	0	0	335	2542
11:00 AM	18	167	2	0	0	187	4	22	66	0	0	92	43	173	15	0	0	231	34	29	23	0	0	86	596
11:15 AM	19	189	7	0	0	215	1	18	64	0	0	83	47	159	25	0	0	231	25	24	24	0	0	73	602
11:30 AM	21	187	3	0	0	211	5	20	56	0	0	81	41	203	21	0	0	265	36	33	19	0	0	88	645
11:45 AM	19	178	7	0	0	204	6	16	46	0	0	68	37	195	26	0	0	258	27	22	16	0	0	65	595
Hourly Total	77	721	19	0	0	817	16	76	232	0	0	324	168	730	87	0	0	985	122	108	82	0	0	312	2438
12:00 PM	29	206	5	0	0	240	7	32	61	0	0	100	49	186	33	0	0	268	38	34	22	0	0	94	702
12:15 PM	26	213	5	0	0	244	4	23	64	0	0	91	50	195	15	0	0	260	43	37	26	0	0	106	701
12:30 PM	33	237	5	0	0	275	3	22	52	0	0	77	52	195	29	0	0	276	34	21	15	0	0	70	698
12:45 PM	23	156	3	0	0	182	3	17	51	0	0	71	67	217	22	0	0	306	42	17	20	0	0	79	638
Hourly Total	111	812	18	0	0	941	17	94	228	0	0	339	218	793	99	0	0	1110	157	109	83	0	0	349	2739
1:00 PM	28	201	5	0	0	234	1	26	50	0	0	77	58	214	23	0	0	295	36	33	22	0	0	91	697
1:15 PM	18	212	8	0	0	238	1	16	62	0	0	79	66	249	23	0	0	338	28	18	24	0	0	70	725
1:30 PM	23	194	6	0	0	223	6	26	71	0	0	103	56	191	24	1	0	272	39	37	25	0	0	101	699
1:45 PM	25	169	5	0	0	199	4	38	59	0	0	101	61	204	31	0	0	296	37	26	20	0	0	83	679
Hourly Total	94	776	24	0	0	894	12	106	242	0	0	360	241	858	101	1	0	1201	140	114	91	0	0	345	2800
2:00 PM	24	208	3	0	0	235	2	33	59	0	0	94	60	238	17	0	0	315	37	41	24	0	0	102	746
2:15 PM	29	239	3	1	0	272	1	28	67	0	0	96	55	215	26	0	0	296	40	30	23	0	0	93	757
2:30 PM	24	218	3	1	0	246	5	29	41	0	0	75	60	192	31	0	0	283	26	24	24	0	0	74	678
2:45 PM	24	215	5	0	0	244	2	29	54	0	0	85	56	220	27	0	0	303	36	23	19	0	0	78	710
Hourly Total	101	880	14	2	0	997	10	119	221	0	0	350	231	865	101	0	0	1197	139	118	90	0	0	347	2891
Grand Total	452	3977	87	3	0	4519	66	475	1181	0	0	1722	1038	3953	488	2	0	5481	695	566	427	0	0	1688	13410
Approach %	10.0	88.0	1.9	0.1	-	-	3.8	27.6	68.6	0.0	-	-	18.9	72.1	8.9	0.0	-	-	41.2	33.5	25.3	0.0	-	-	-
Total %	3.4	29.7	0.6	0.0	-	33.7	0.5	3.5	8.8	0.0	-	12.8	7.7	29.5	3.6	0.0	-	40.9	5.2	4.2	3.2	0.0	-	12.6	-
Lights	443	3794	69	3	-	4309	59	424	1115	0	-	1598	985	3711	303	2	-	5001	514	517	418	0	-	1449	12357
% Lights	98.0	95.4	79.3	100.0	-	95.4	89.4	89.3	94.4	-	-	92.8	94.9	93.9	62.1	100.0	-	91.2	74.0	91.3	97.9	-	-	85.8	92.1
Buses	0	5	0	0	-	5	0	0	0	0	-	0	3	0	1	0	-	4	0	0	1	0	-	1	10
% Buses	0.0	0.1	0.0	0.0	-	0.1	0.0	0.0	0.0	-	-	0.0	0.3	0.0	0.2	0.0	-	0.1	0.0	0.0	0.2	-	-	0.1	0.1
Trucks	9	177	18	0	-	204	7	51	66	0	-	124	49	242	184	0	-	475	180	49	8	0	-	237	1040
% Trucks	2.0	4.5	20.7	0.0	-	4.5	10.6	10.7	5.6	-	-	7.2	4.7	6.1	37.7	0.0	-	8.7	25.9	8.7	1.9	-	-	14.0	7.8
Bicycles on Road	0	1	0	0	-	1	0	0	0	0	-	0	1	0	0	0	-	1	1	0	0	0	-	1	3

% Bicycles on Road	0.0	0.0	0.0	0.0	-	0.0	0.0	0.0	0.0	-	-	0.0	0.1	0.0	0.0	0.0	-	0.0	0.1	0.0	0.0	-	-	0.1	0.0
Bicycles on Crosswalk	-	-	-	-	0	-	-	-	-	-	0	-	-	-	-	-	0	-	-	-	-	-	0	-	-
% Bicycles on Crosswalk	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Pedestrians	-	-	-	-	0	-	-	-	-	-	0	-	-	-	-	-	0	-	-	-	-	-	0	-	-
% Pedestrians	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-

LEA Consulting Ltd.
625 Cochrane Drive

Markam, Ontario, Canada L3R 9R9
905-470-0015 x240 idinsmore@lea.ca

Count Name: 24085_Hwy 50 & Mayfield Rd-SAT
Site Code: 24085
Start Date: 09/16/2023



Turning Movement Data Plot

LEA Consulting Ltd.
625 Cochrane Drive

Markam, Ontario, Canada L3R 9R9
905-470-0015 x240 idinsmore@lea.ca

Count Name: 24085_Hwy 50 & Mayfield Rd-SAT
Site Code: 24085
Start Date: 09/16/2023

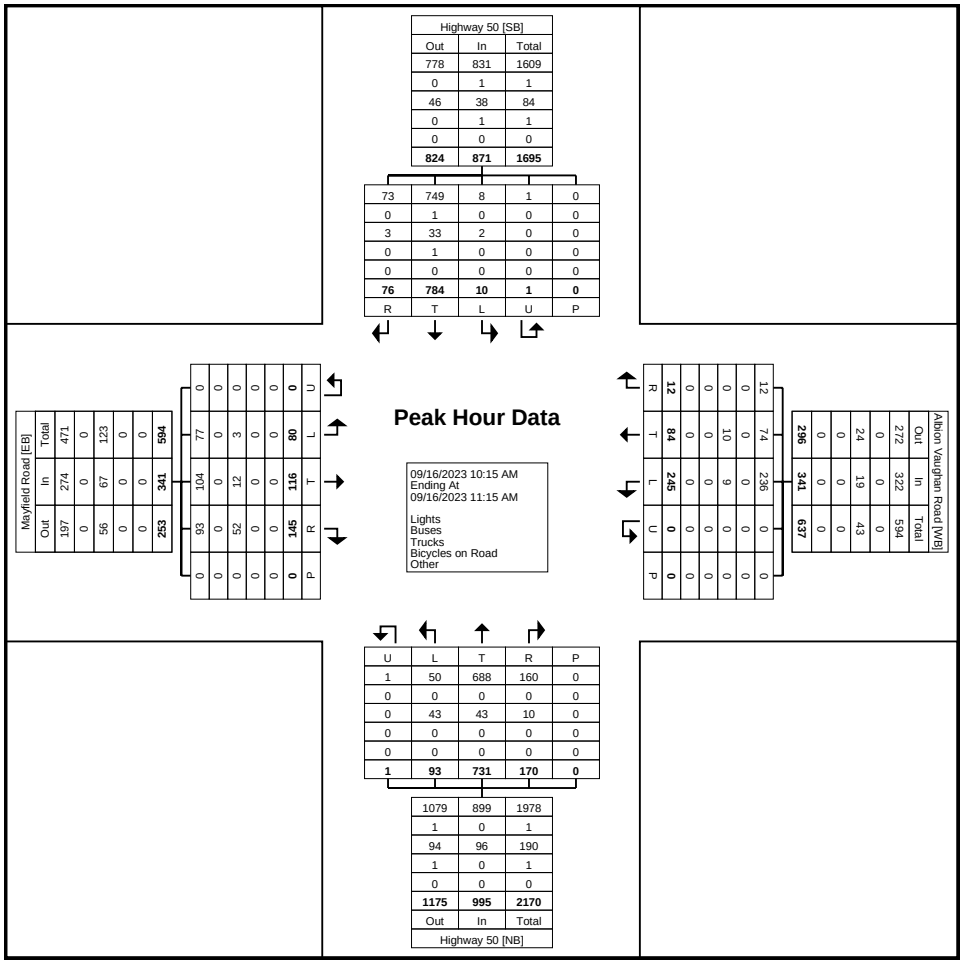
Turning Movement Peak Hour Data (10:15 AM)

Start Time	Highway 50 Southbound						Albion Vaughan Road Westbound						Highway 50 Northbound						Mayfield Road Eastbound						Int. Total
	Right	Thru	Left	U-Turn	Peds	App. Total	Right	Thru	Left	U-Turn	Peds	App. Total	Right	Thru	Left	U-Turn	Peds	App. Total	Right	Thru	Left	U-Turn	Peds	App. Total	
10:15 AM	15	179	1	0	0	195	4	22	56	0	0	82	49	182	22	0	0	253	40	29	24	0	0	93	623
10:30 AM	22	198	3	1	0	224	2	24	65	0	0	91	42	189	36	0	0	267	36	23	15	0	0	74	656
10:45 AM	21	240	4	0	0	265	2	16	58	0	0	76	36	187	20	1	0	244	35	35	18	0	0	88	673
11:00 AM	18	167	2	0	0	187	4	22	66	0	0	92	43	173	15	0	0	231	34	29	23	0	0	86	596
Total	76	784	10	1	0	871	12	84	245	0	0	341	170	731	93	1	0	995	145	116	80	0	0	341	2548
Approach %	8.7	90.0	1.1	0.1	-	-	3.5	24.6	71.8	0.0	-	-	17.1	73.5	9.3	0.1	-	-	42.5	34.0	23.5	0.0	-	-	-
Total %	3.0	30.8	0.4	0.0	-	34.2	0.5	3.3	9.6	0.0	-	13.4	6.7	28.7	3.6	0.0	-	39.1	5.7	4.6	3.1	0.0	-	13.4	-
PHF	0.864	0.817	0.625	0.250	-	0.822	0.750	0.875	0.928	0.000	-	0.927	0.867	0.967	0.646	0.250	-	0.932	0.906	0.829	0.833	0.000	-	0.917	0.947
Lights	73	749	8	1	-	831	12	74	236	0	-	322	160	688	50	1	-	899	93	104	77	0	-	274	2326
% Lights	96.1	95.5	80.0	100.0	-	95.4	100.0	88.1	96.3	-	-	94.4	94.1	94.1	53.8	100.0	-	90.4	64.1	89.7	96.3	-	-	80.4	91.3
Buses	0	1	0	0	-	1	0	0	0	0	-	0	0	0	0	0	-	0	0	0	0	0	-	0	1
% Buses	0.0	0.1	0.0	0.0	-	0.1	0.0	0.0	0.0	-	-	0.0	0.0	0.0	0.0	0.0	-	0.0	0.0	0.0	0.0	-	-	0.0	0.0
Trucks	3	33	2	0	-	38	0	10	9	0	-	19	10	43	43	0	-	96	52	12	3	0	-	67	220
% Trucks	3.9	4.2	20.0	0.0	-	4.4	0.0	11.9	3.7	-	-	5.6	5.9	5.9	46.2	0.0	-	9.6	35.9	10.3	3.8	-	-	19.6	8.6
Bicycles on Road	0	1	0	0	-	1	0	0	0	0	-	0	0	0	0	0	-	0	0	0	0	0	-	0	1
% Bicycles on Road	0.0	0.1	0.0	0.0	-	0.1	0.0	0.0	0.0	-	-	0.0	0.0	0.0	0.0	0.0	-	0.0	0.0	0.0	0.0	-	-	0.0	0.0
Bicycles on Crosswalk	-	-	-	-	0	-	-	-	-	-	0	-	-	-	-	-	0	-	-	-	-	-	0	-	-
% Bicycles on Crosswalk	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Pedestrians	-	-	-	-	0	-	-	-	-	-	0	-	-	-	-	-	0	-	-	-	-	-	0	-	-
% Pedestrians	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-

LEA Consulting Ltd.
625 Cochrane Drive

Markam, Ontario, Canada L3R 9R9
905-470-0015 x240 idinsmore@lea.ca

Count Name: 24085_Hwy 50 & Mayfield Rd-SAT
Site Code: 24085
Start Date: 09/16/2023



Turning Movement Peak Hour Data Plot (10:15 AM)

LEA Consulting Ltd.
625 Cochrane Drive

Markam, Ontario, Canada L3R 9R9
905-470-0015 x240 idinsmore@lea.ca

Count Name: 24085_Hwy 50 & Mayfield Rd-SAT
Site Code: 24085
Start Date: 09/16/2023

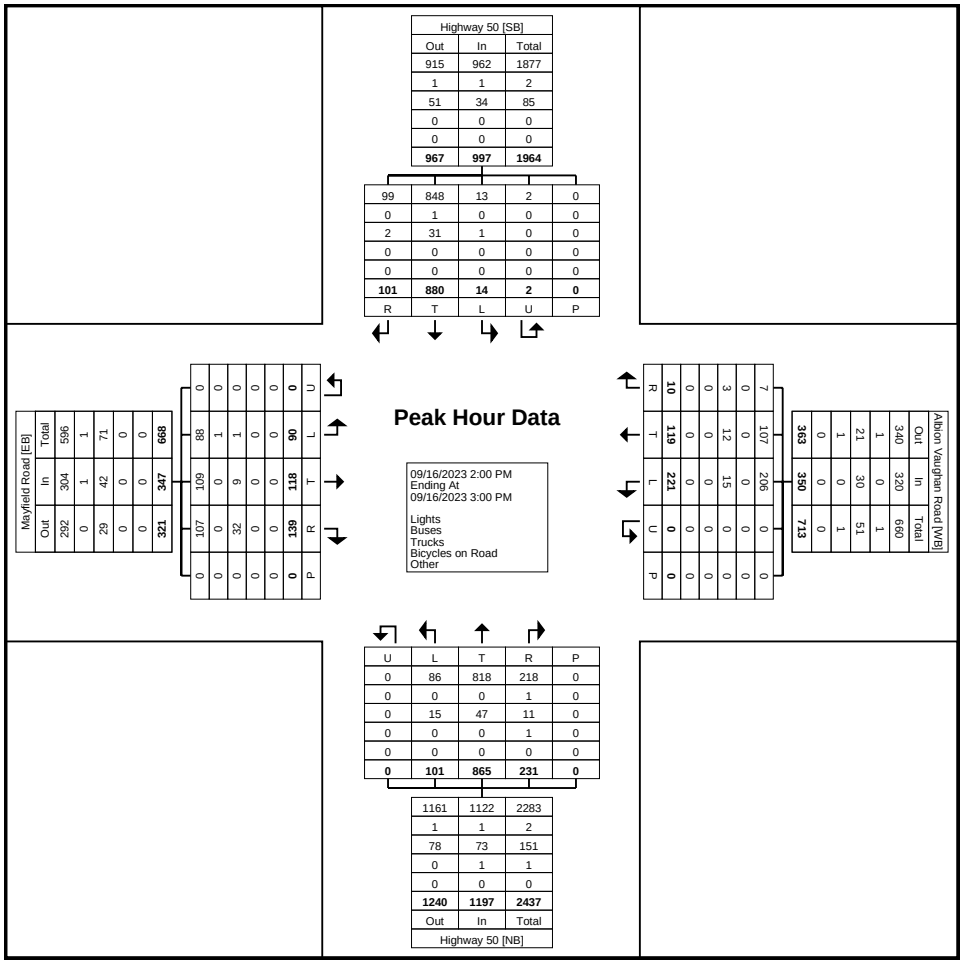
Turning Movement Peak Hour Data (2:00 PM)

Start Time	Highway 50 Southbound						Albion Vaughan Road Westbound						Highway 50 Northbound						Mayfield Road Eastbound						Int. Total
	Right	Thru	Left	U-Turn	Peds	App. Total	Right	Thru	Left	U-Turn	Peds	App. Total	Right	Thru	Left	U-Turn	Peds	App. Total	Right	Thru	Left	U-Turn	Peds	App. Total	
2:00 PM	24	208	3	0	0	235	2	33	59	0	0	94	60	238	17	0	0	315	37	41	24	0	0	102	746
2:15 PM	29	239	3	1	0	272	1	28	67	0	0	96	55	215	26	0	0	296	40	30	23	0	0	93	757
2:30 PM	24	218	3	1	0	246	5	29	41	0	0	75	60	192	31	0	0	283	26	24	24	0	0	74	678
2:45 PM	24	215	5	0	0	244	2	29	54	0	0	85	56	220	27	0	0	303	36	23	19	0	0	78	710
Total	101	880	14	2	0	997	10	119	221	0	0	350	231	865	101	0	0	1197	139	118	90	0	0	347	2891
Approach %	10.1	88.3	1.4	0.2	-	-	2.9	34.0	63.1	0.0	-	-	19.3	72.3	8.4	0.0	-	-	40.1	34.0	25.9	0.0	-	-	-
Total %	3.5	30.4	0.5	0.1	-	34.5	0.3	4.1	7.6	0.0	-	12.1	8.0	29.9	3.5	0.0	-	41.4	4.8	4.1	3.1	0.0	-	12.0	-
PHF	0.871	0.921	0.700	0.500	-	0.916	0.500	0.902	0.825	0.000	-	0.911	0.963	0.909	0.815	0.000	-	0.950	0.869	0.720	0.938	0.000	-	0.850	0.955
Lights	99	848	13	2	-	962	7	107	206	0	-	320	218	818	86	0	-	1122	107	109	88	0	-	304	2708
% Lights	98.0	96.4	92.9	100.0	-	96.5	70.0	89.9	93.2	-	-	91.4	94.4	94.6	85.1	-	-	93.7	77.0	92.4	97.8	-	-	87.6	93.7
Buses	0	1	0	0	-	1	0	0	0	0	-	0	1	0	0	0	-	1	0	0	1	0	-	1	3
% Buses	0.0	0.1	0.0	0.0	-	0.1	0.0	0.0	0.0	-	-	0.0	0.4	0.0	0.0	-	-	0.1	0.0	0.0	1.1	-	-	0.3	0.1
Trucks	2	31	1	0	-	34	3	12	15	0	-	30	11	47	15	0	-	73	32	9	1	0	-	42	179
% Trucks	2.0	3.5	7.1	0.0	-	3.4	30.0	10.1	6.8	-	-	8.6	4.8	5.4	14.9	-	-	6.1	23.0	7.6	1.1	-	-	12.1	6.2
Bicycles on Road	0	0	0	0	-	0	0	0	0	0	-	0	1	0	0	0	-	1	0	0	0	0	-	0	1
% Bicycles on Road	0.0	0.0	0.0	0.0	-	0.0	0.0	0.0	0.0	-	-	0.0	0.4	0.0	0.0	-	-	0.1	0.0	0.0	0.0	-	-	0.0	0.0
Bicycles on Crosswalk	-	-	-	-	0	-	-	-	-	-	0	-	-	-	-	-	0	-	-	-	-	-	0	-	-
% Bicycles on Crosswalk	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Pedestrians	-	-	-	-	0	-	-	-	-	-	0	-	-	-	-	-	0	-	-	-	-	-	0	-	-
% Pedestrians	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-

LEA Consulting Ltd.
625 Cochrane Drive

Markam, Ontario, Canada L3R 9R9
905-470-0015 x240 idinsmore@lea.ca

Count Name: 24085_Hwy 50 & Mayfield Rd-SAT
Site Code: 24085
Start Date: 09/16/2023



Turning Movement Peak Hour Data Plot (2:00 PM)

LEA Consulting Ltd.

625 Cochrane Drive, 5th Floor
Markham, ON L3R 9R9

Project No.: 24085
Intersection: Site Access & Mayfield Rd
Weather: Clear
Surveyor(s): ID

File Name : Site Access & Mayfield Rd-AM
Site Code : 24085
Start Date : 2023-09-14
Page No : 1

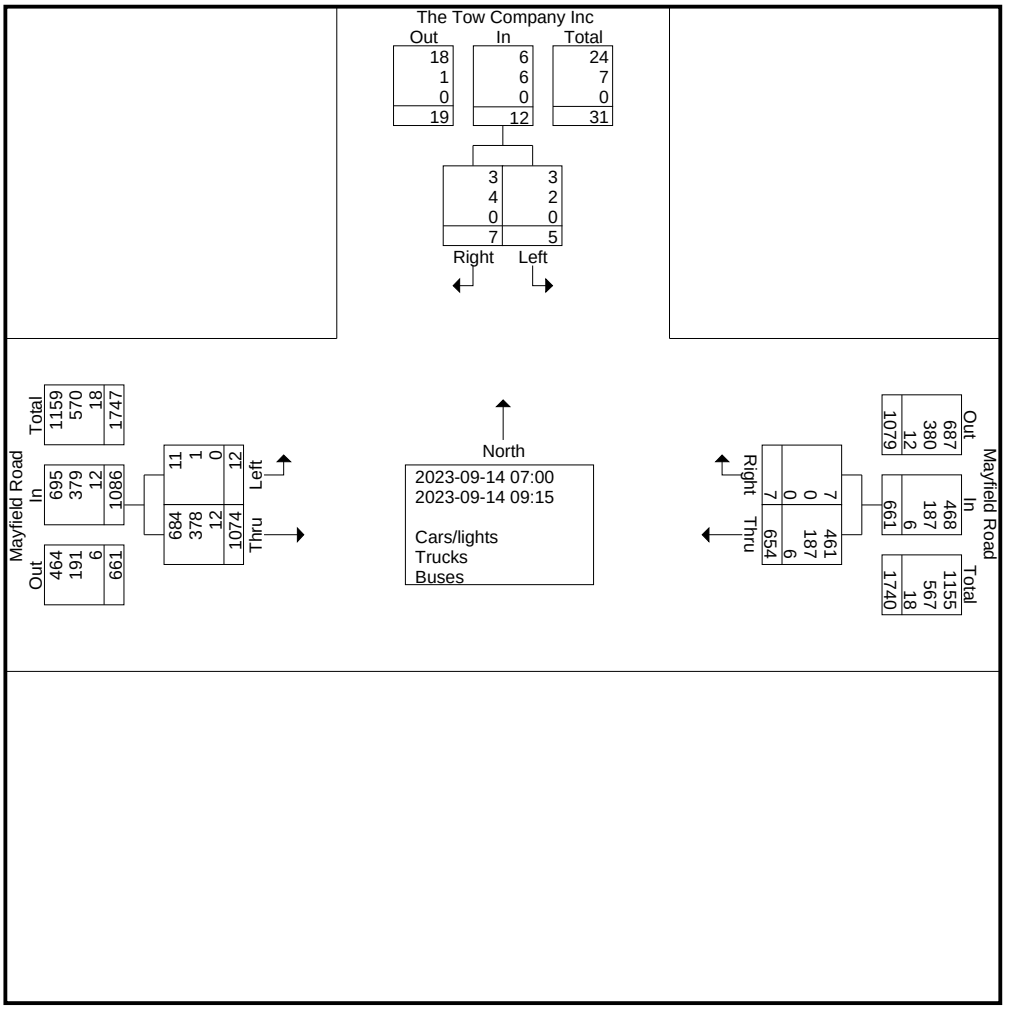
Groups Printed- Cars/lights - Trucks - Buses

	The Tow Company Inc Southbound				Mayfield Road Westbound				Mayfield Road Eastbound						
Start Time	Left	Right	Peds	App. Total	Thru	Right	Peds	App. Total	Left	Thru	Peds	App. Total	Exclu. Total	Inclu. Total	Int. Total
07:00	0	1	[0]	1	64	0	[0]	64	0	125	[0]	125	0	190	190
07:15	1	0	[0]	1	72	1	[0]	73	0	104	[0]	104	0	178	178
07:30	0	0	[0]	0	67	0	[0]	67	0	101	[0]	101	0	168	168
07:45	0	1	[0]	1	73	0	[0]	73	1	108	[0]	109	0	183	183
Total	1	2	[0]	3	276	1	[0]	277	1	438	[0]	439	0	719	719
08:00	1	0	[0]	1	74	0	[0]	74	2	99	[0]	101	0	176	176
08:15	0	0	[0]	0	63	1	[0]	64	0	121	[0]	121	0	185	185
08:30	1	0	[0]	1	59	0	[0]	59	3	101	[0]	104	0	164	164
08:45	0	2	[0]	2	65	1	[0]	66	3	119	[0]	122	0	190	190
Total	2	2	[0]	4	261	2	[0]	263	8	440	[0]	448	0	715	715
09:00	1	2	[0]	3	63	1	[0]	64	1	95	[0]	96	0	163	163
09:15	1	1	[0]	2	54	3	[0]	57	2	101	[0]	103	0	162	162
Grand Total	5	7	[0]	12	654	7	[0]	661	12	1074	[0]	1086	0	1759	1759
Apprch %	41.7	58.3			98.9	1.1			1.1	98.9					
Total %	0.3	0.4		0.7	37.2	0.4		37.6	0.7	61.1		61.7	0	100	
Cars/lights	3	3		6	461	7		468	11	684		695	0	0	1169
% Cars/lights	60	42.9	0	50	70.5	100	0	70.8	91.7	63.7	0	64	0	0	66.5
Trucks	2	4		6	187	0		187	1	378		379	0	0	572
% Trucks	40	57.1	0	50	28.6	0	0	28.3	8.3	35.2	0	34.9	0	0	32.5
Buses	0	0		0	6	0		6	0	12		12	0	0	18
% Buses	0	0	0	0	0.9	0	0	0.9	0	1.1	0	1.1	0	0	1

LEA Consulting Ltd.

625 Cochrane Drive, 5th Floor
Markham, ON L3R 9R9

File Name : Site Access & Mayfield Rd-AM
Site Code : 24085
Start Date : 2023-09-14
Page No : 2

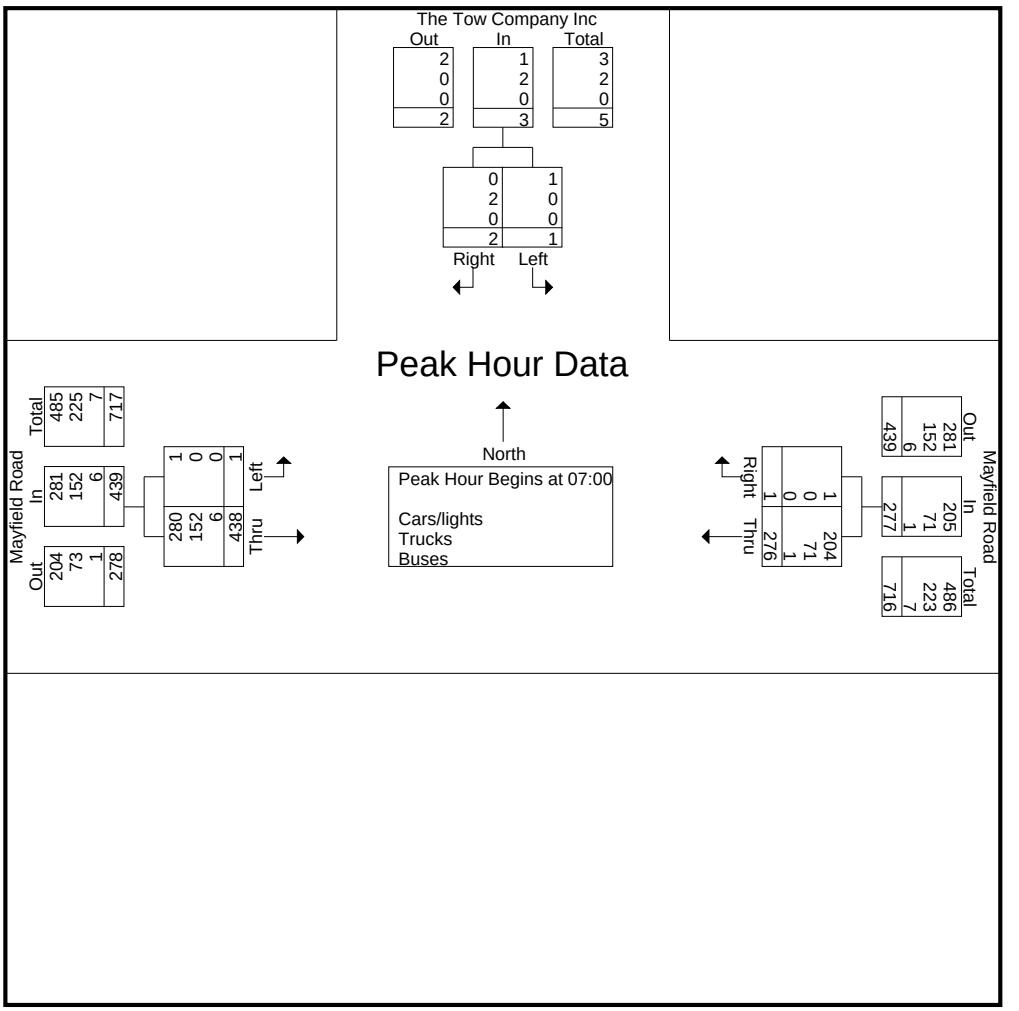


LEA Consulting Ltd.

625 Cochrane Drive, 5th Floor
Markham, ON L3R 9R9

File Name : Site Access & Mayfield Rd-AM
Site Code : 24085
Start Date : 2023-09-14
Page No : 3

	The Tow Company Inc Southbound			Mayfield Road Westbound			Mayfield Road Eastbound			
Start Time	Left	Right	App. Total	Thru	Right	App. Total	Left	Thru	App. Total	Int. Total
Peak Hour Analysis From 07:00 to 09:15 - Peak 1 of 1										
Peak Hour for Entire Intersection Begins at 07:00										
07:00	0	**1**	**1**	64	0	64	0	**125**	**125**	**190**
07:15	**1**	0	1	72	**1**	**73**	0	104	104	178
07:30	0	0	0	67	0	67	0	101	101	168
07:45	0	1	1	**73**	0	73	**1**	108	109	183
Total Volume	1	2	3	276	1	277	1	438	439	719
% App. Total	33.3	66.7		99.6	0.4		0.2	99.8		
PHF	.250	.500	.750	.945	.250	.949	.250	.876	.878	.946
Cars/lights	1	0	1	204	1	205	1	280	281	487
% Cars/lights	100	0	33.3	73.9	100	74.0	100	63.9	64.0	67.7
Trucks	0	2	2	71	0	71	0	152	152	225
% Trucks	0	100	66.7	25.7	0	25.6	0	34.7	34.6	31.3
Buses	0	0	0	1	0	1	0	6	6	7
% Buses	0	0	0	0.4	0	0.4	0	1.4	1.4	1.0



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Project No.: 24085
Intersection: Site Access & Mayfield Rd
Weather: Clear
Surveyor(s): ID

File Name : Site Access & Mayfield Rd-PM
Site Code : 24085
Start Date : 2023-09-14
Page No : 1

Groups Printed- Cars/lights - Trucks - Buses

	The Tow Company Inc Southbound				Mayfield Road Westbound				Mayfield Road Eastbound						
Start Time	Left	Right	Peds	App. Total	Thru	Right	Peds	App. Total	Left	Thru	Peds	App. Total	Exclu. Total	Inclu. Total	Int. Total
16:00	2	0	[0]	2	85	0	[0]	85	1	109	[0]	110	0	197	197
16:15	2	1	[0]	3	61	1	[0]	62	2	112	[0]	114	0	179	179
16:30	1	0	[0]	1	96	2	[0]	98	0	113	[0]	113	0	212	212
16:45	0	3	[0]	3	80	1	[0]	81	0	110	[0]	110	0	194	194
Total	5	4	[0]	9	322	4	[0]	326	3	444	[0]	447	0	782	782
17:00	0	3	[0]	3	80	1	[0]	81	0	98	[0]	98	0	182	182
17:15	1	1	[0]	2	76	1	[0]	77	0	122	[0]	122	0	201	201
17:30	1	1	[0]	2	73	1	[0]	74	2	127	[0]	129	0	205	205
17:45	0	1	[0]	1	71	0	[0]	71	2	99	[0]	101	0	173	173
Total	2	6	[0]	8	300	3	[0]	303	4	446	[0]	450	0	761	761
18:00	2	2	[0]	4	62	2	[0]	64	0	120	[0]	120	0	188	188
18:15	4	1	[0]	5	52	0	[0]	52	1	95	[0]	96	0	153	153
Grand Total	13	13	[0]	26	736	9	[0]	745	8	1105	[0]	1113	0	1884	1884
Apprch %	50	50			98.8	1.2			0.7	99.3					
Total %	0.7	0.7		1.4	39.1	0.5		39.5	0.4	58.7		59.1	0	100	
Cars/lights	9	10		19	477	5		482	5	882		887	0	0	1388
% Cars/lights	69.2	76.9	0	73.1	64.8	55.6	0	64.7	62.5	79.8	0	79.7	0	0	73.7
Trucks	4	3		7	257	4		261	3	221		224	0	0	492
% Trucks	30.8	23.1	0	26.9	34.9	44.4	0	35	37.5	20	0	20.1	0	0	26.1
Buses	0	0		0	2	0		2	0	2		2	0	0	4
% Buses	0	0	0	0	0.3	0	0	0.3	0	0.2	0	0.2	0	0	0.2

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File Name : Site Access & Mayfield Rd-PM
Site Code : 24085
Start Date : 2023-09-14
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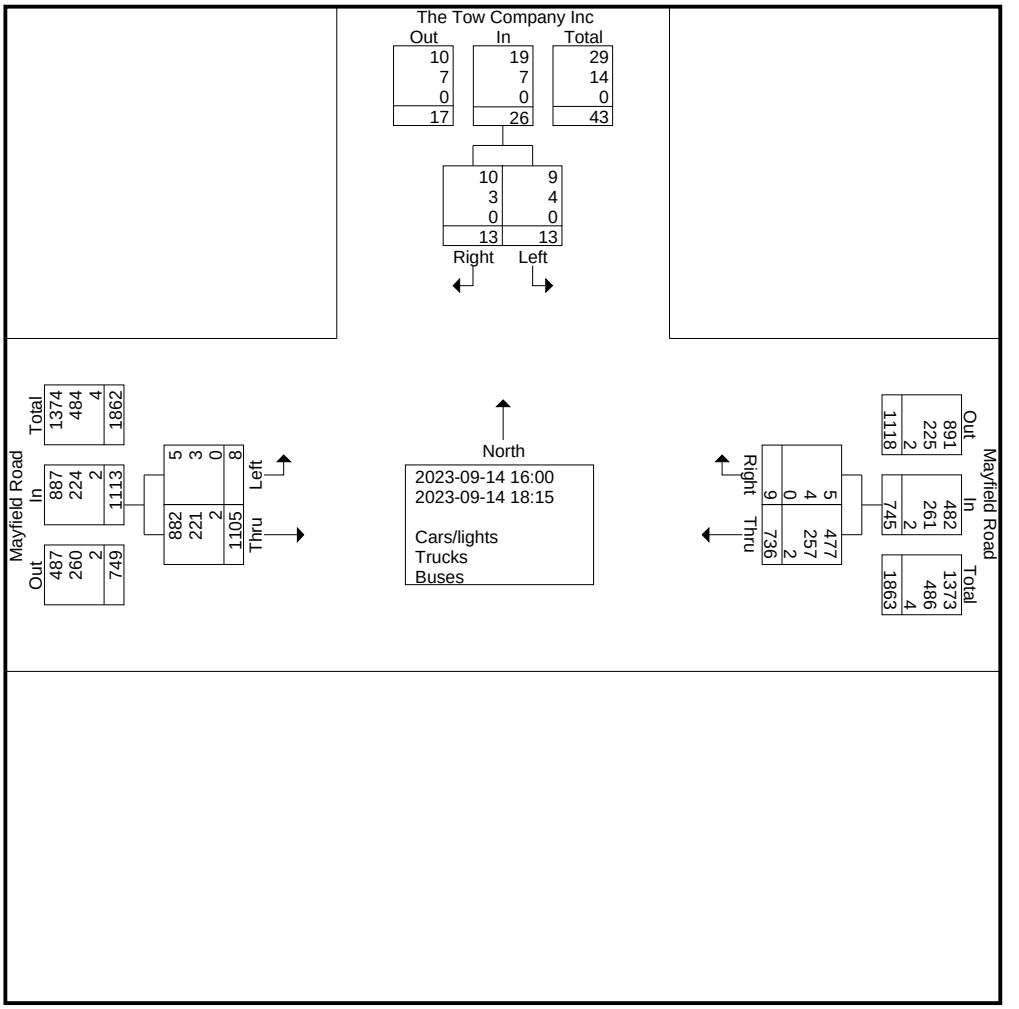

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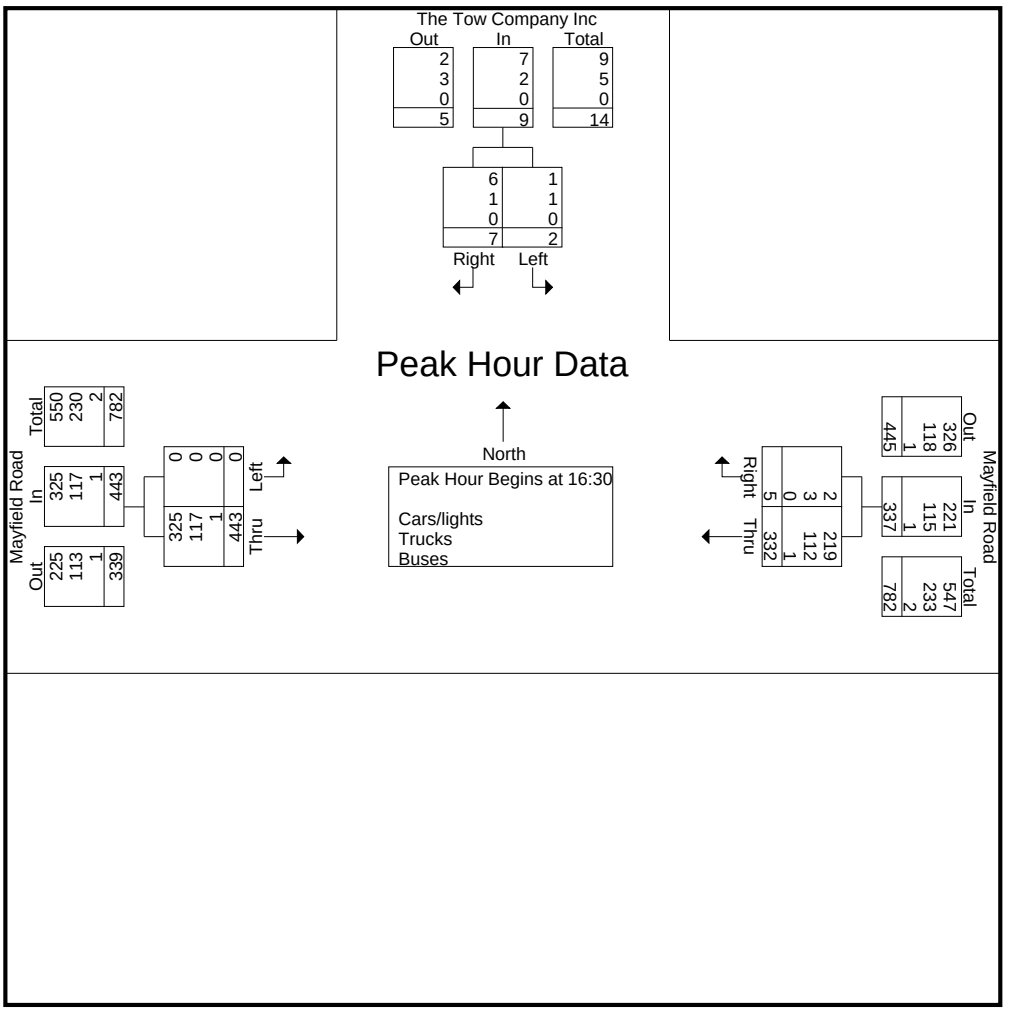
File Name : Site Access & Mayfield Rd-PM
Site Code : 24085
Start Date : 2023-09-14
Page No : 3

	The Tow Company Inc Southbound			Mayfield Road Westbound			Mayfield Road Eastbound			
Start Time	Left	Right	App. Total	Thru	Right	App. Total	Left	Thru	App. Total	Int. Total
Peak Hour Analysis From 16:00 to 18:15 - Peak 1 of 1										
Peak Hour for Entire Intersection Begins at 16:30										
16:30	**1**	0	1	**96**	**2**	**98**	0	113	113	**212**
16:45	0	**3**	**3**	80	1	81	0	110	110	194
17:00	0	3	3	80	1	81	0	98	98	182
17:15	1	1	2	76	1	77	0	**122**	**122**	201
Total Volume	2	7	9	332	5	337	0	443	443	789
% App. Total	22.2	77.8		98.5	1.5		0	100		
PHF	.500	.583	.750	.865	.625	.860	.000	.908	.908	.930
Cars/lights	1	6	7	219	2	221	0	325	325	553
% Cars/lights	50.0	85.7	77.8	66.0	40.0	65.6	0	73.4	73.4	70.1
Trucks	1	1	2	112	3	115	0	117	117	234
% Trucks	50.0	14.3	22.2	33.7	60.0	34.1	0	26.4	26.4	29.7
Buses	0	0	0	1	0	1	0	1	1	2
% Buses	0	0	0	0.3	0	0.3	0	0.2	0.2	0.3



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Project No.: 24085
Intersection: Site Access & Mayfield Rd
Weather: Clear
Surveyor(s): ID

File Name : Site Access & Mayfield Rd-SAT
Site Code : 24085
Start Date : 2023-09-16
Page No : 1

Groups Printed- Cars/lights - Trucks - Buses

	The Tow Company Inc Southbound				Mayfield Road Westbound				Mayfield Road Eastbound						
Start Time	Left	Right	Peds	App. Total	Thru	Right	Peds	App. Total	Left	Thru	Peds	App. Total	Exclu. Total	Inclu. Total	Int. Total
10:00	0	0	[0]	0	14	0	[0]	14	0	15	[0]	15	0	29	29
10:15	0	0	[0]	0	48	3	[0]	51	1	93	[0]	94	0	145	145
10:30	0	1	[0]	1	67	0	[0]	67	0	85	[0]	85	0	153	153
10:45	0	0	[0]	0	78	0	[0]	78	1	74	[0]	75	0	153	153
Total	0	1	[0]	1	207	3	[0]	210	2	267	[0]	269	0	480	480
11:00	0	0	[0]	0	60	0	[0]	60	2	84	[0]	86	0	146	146
11:15	1	1	[0]	2	54	2	[0]	56	3	88	[0]	91	0	149	149
11:30	2	1	[0]	3	68	1	[0]	69	1	73	[0]	74	0	146	146
11:45	1	4	[0]	5	58	1	[0]	59	0	94	[0]	94	0	158	158
Total	4	6	[0]	10	240	4	[0]	244	6	339	[0]	345	0	599	599
12:00	0	3	[0]	3	73	1	[0]	74	3	77	[0]	80	0	157	157
12:15	0	0	[0]	0	94	0	[0]	94	0	104	[0]	104	0	198	198
12:30	0	0	[0]	0	76	1	[0]	77	1	84	[0]	85	0	162	162
12:45	4	3	[0]	7	72	2	[0]	74	1	69	[0]	70	0	151	151
Total	4	6	[0]	10	315	4	[0]	319	5	334	[0]	339	0	668	668
13:00	1	1	[0]	2	57	1	[0]	58	2	84	[0]	86	0	146	146
13:15	3	0	[0]	3	91	1	[0]	92	1	83	[0]	84	0	179	179
13:30	0	1	[0]	1	57	1	[0]	58	1	87	[0]	88	0	147	147
13:45	0	0	[0]	0	73	2	[0]	75	2	88	[0]	90	0	165	165
Total	4	2	[0]	6	278	5	[0]	283	6	342	[0]	348	0	637	637
14:00	2	1	[0]	3	85	0	[0]	85	2	94	[0]	96	0	184	184
14:15	1	1	[0]	2	69	1	[0]	70	1	95	[0]	96	0	168	168
14:30	0	0	[0]	0	82	1	[0]	83	0	102	[0]	102	0	185	185
14:45	0	0	[0]	0	93	0	[0]	93	0	70	[0]	70	0	163	163
Total	3	2	[0]	5	329	2	[0]	331	3	361	[0]	364	0	700	700
Grand Total	15	17	[0]	32	1369	18	[0]	1387	22	1643	[0]	1665	0	3084	3084
Apprch %	46.9	53.1			98.7	1.3			1.3	98.7					
Total %	0.5	0.6		1	44.4	0.6		45	0.7	53.3		54	0	100	
Cars/lights	13	11		24	1132	12		1144	17	1418		1435	0	0	2603
% Cars/lights	86.7	64.7	0	75	82.7	66.7	0	82.5	77.3	86.3	0	86.2	0	0	84.4
Trucks	2	6		8	236	6		242	5	224		229	0	0	479
% Trucks	13.3	35.3	0	25	17.2	33.3	0	17.4	22.7	13.6	0	13.8	0	0	15.5
Buses	0	0		0	1	0		1	0	1		1	0	0	2
% Buses	0	0	0	0	0.1	0	0	0.1	0	0.1	0	0.1	0	0	0.1

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File Name : Site Access & Mayfield Rd-SAT
Site Code : 24085
Start Date : 2023-09-16
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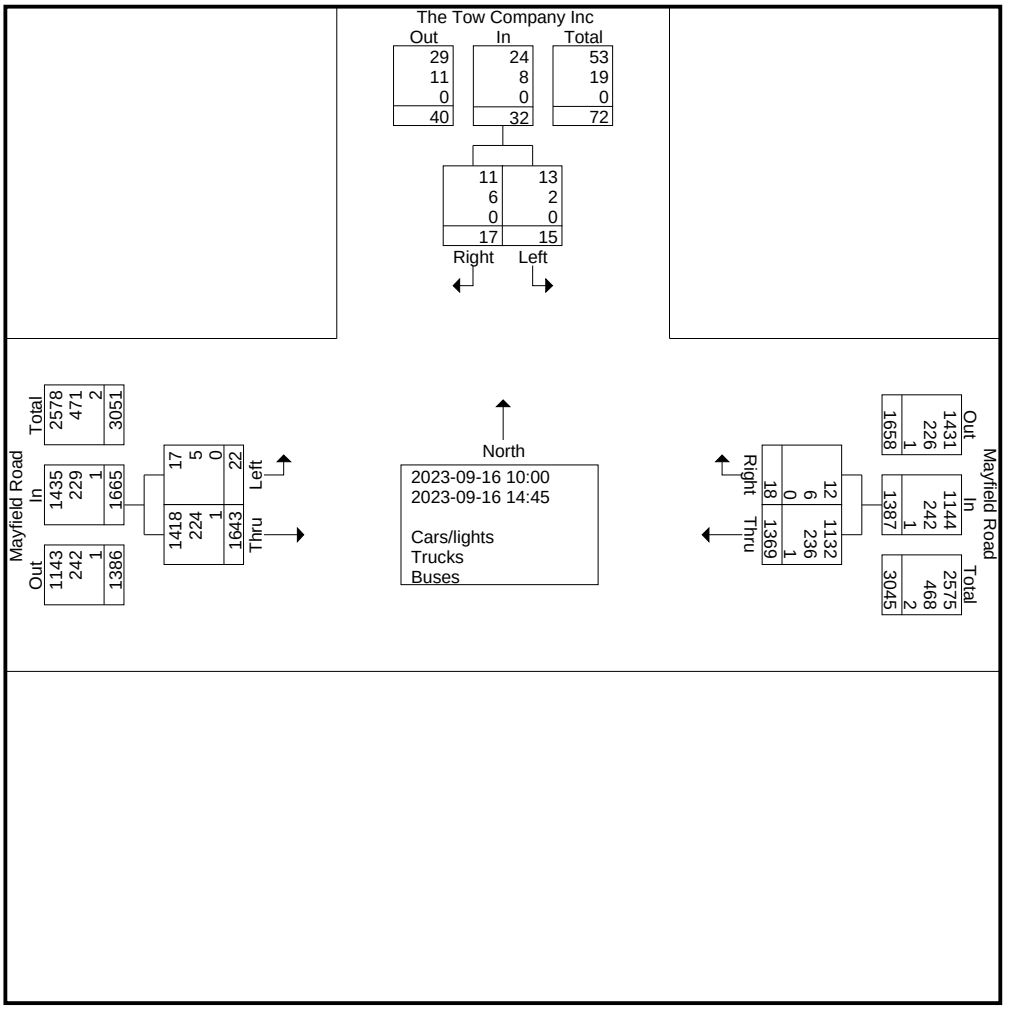

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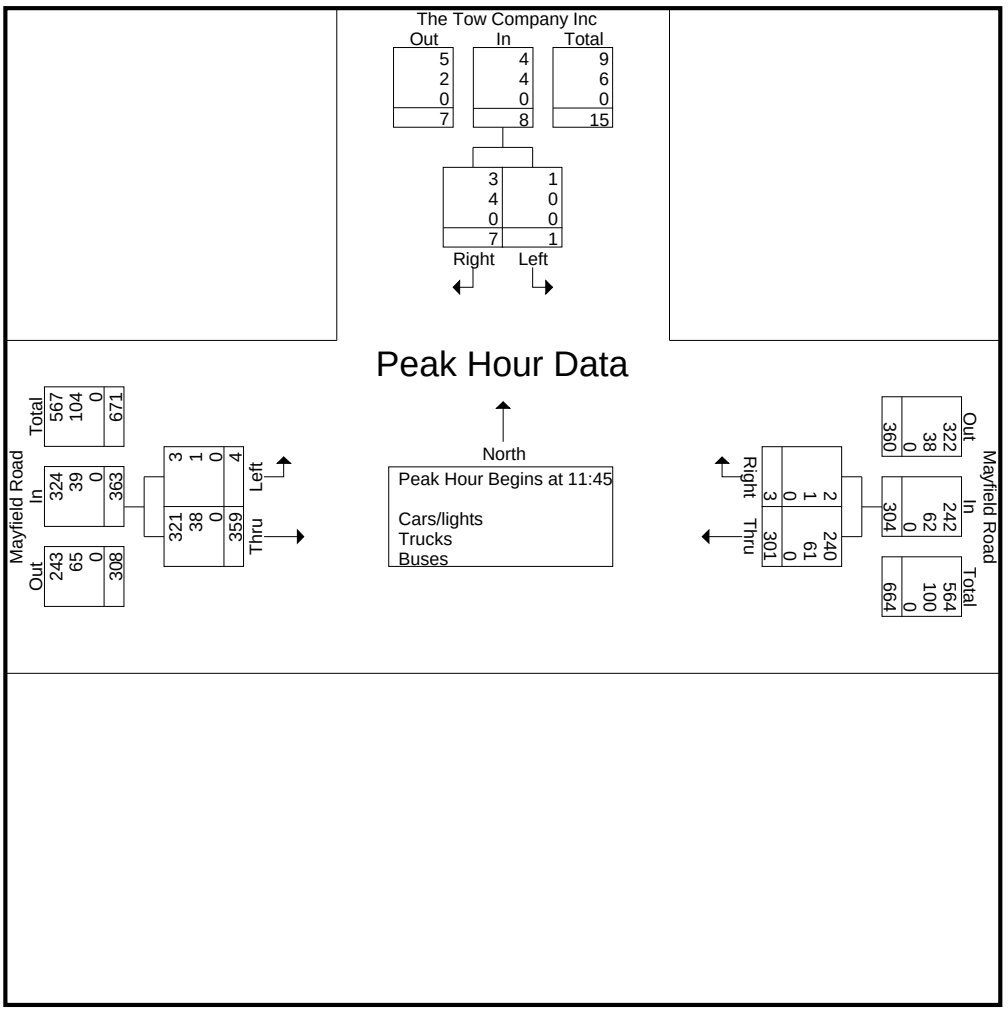
File Name : Site Access & Mayfield Rd-SAT
Site Code : 24085
Start Date : 2023-09-16
Page No : 3

	The Tow Company Inc Southbound			Mayfield Road Westbound			Mayfield Road Eastbound			
Start Time	Left	Right	App. Total	Thru	Right	App. Total	Left	Thru	App. Total	Int. Total
Peak Hour Analysis From 10:00 to 13:45 - Peak 1 of 1										
Peak Hour for Entire Intersection Begins at 11:45										
11:45	**1**	**4**	**5**	58	**1**	59	0	94	94	158
12:00	0	3	3	73	1	74	**3**	77	80	157
12:15	0	0	0	**94**	0	**94**	0	**104**	**104**	**198**
12:30	0	0	0	76	1	77	1	84	85	162
Total Volume	1	7	8	301	3	304	4	359	363	675
% App. Total	12.5	87.5		99	1		1.1	98.9		
PHF	.250	.438	.400	.801	.750	.809	.333	.863	.873	.852
Cars/lights	1	3	4	240	2	242	3	321	324	570
% Cars/lights	100	42.9	50.0	79.7	66.7	79.6	75.0	89.4	89.3	84.4
Trucks	0	4	4	61	1	62	1	38	39	105
% Trucks	0	57.1	50.0	20.3	33.3	20.4	25.0	10.6	10.7	15.6
Buses	0	0	0	0	0	0	0	0	0	0
% Buses	0	0	0	0	0	0	0	0	0	0



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Project No.: 24085
Intersection: Coleraine Dr & Site Access
Weather: Clear
Surveyor(s): ID

File Name : Coleraine Dr & Site Access-AM
Site Code : 24085
Start Date : 2023-09-14
Page No : 1

Groups Printed- Cars/lights - Trucks - Buses

	Coleraine Drive Southbound				Babbar Transport Bolton Yard Westbound				Coleraine Drive Northbound						
Start Time	Left	Thru	Peds	App. Total	Left	Right	Peds	App. Total	Thru	Right	Peds	App. Total	Exclu. Total	Inclu. Total	Int. Total
07:00	0	122	[0]	122	0	0	[0]	0	128	0	[0]	128	0	250	250
07:15	0	71	[0]	71	0	0	[0]	0	139	0	[0]	139	0	210	210
07:30	0	75	[0]	75	0	0	[0]	0	81	0	[0]	81	0	156	156
07:45	0	75	[0]	75	0	0	[0]	0	103	0	[0]	103	0	178	178
Total	0	343	[0]	343	0	0	[0]	0	451	0	[0]	451	0	794	794
08:00	0	72	[0]	72	0	0	[0]	0	102	2	[0]	104	0	176	176
08:15	1	62	[0]	63	0	0	[0]	0	87	0	[0]	87	0	150	150
08:30	0	71	[0]	71	0	0	[0]	0	74	0	[0]	74	0	145	145
08:45	0	66	[0]	66	0	0	[0]	0	85	0	[0]	85	0	151	151
Total	1	271	[0]	272	0	0	[0]	0	348	2	[0]	350	0	622	622
09:00	0	54	[0]	54	0	0	[0]	0	96	0	[0]	96	0	150	150
09:15	0	69	[0]	69	0	0	[0]	0	48	0	[0]	48	0	117	117
Grand Total	1	737	[0]	738	0	0	[0]	0	943	2	[0]	945	0	1683	1683
Apprch %	0.1	99.9			0	0			99.8	0.2					
Total %	0.1	43.8		43.9	0	0		0	56	0.1		56.1	0	100	
Cars/lights	1	454		455	0	0		0	801	2		803	0	0	1258
% Cars/lights	100	61.6	0	61.7	0	0	0	0	84.9	100	0	85	0	0	74.7
Trucks	0	283		283	0	0		0	142	0		142	0	0	425
% Trucks	0	38.4	0	38.3	0	0	0	0	15.1	0	0	15	0	0	25.3
Buses	0	0		0	0	0		0	0	0		0	0	0	0
% Buses	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0

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File Name : Coleraine Dr & Site Access-AM
Site Code : 24085
Start Date : 2023-09-14
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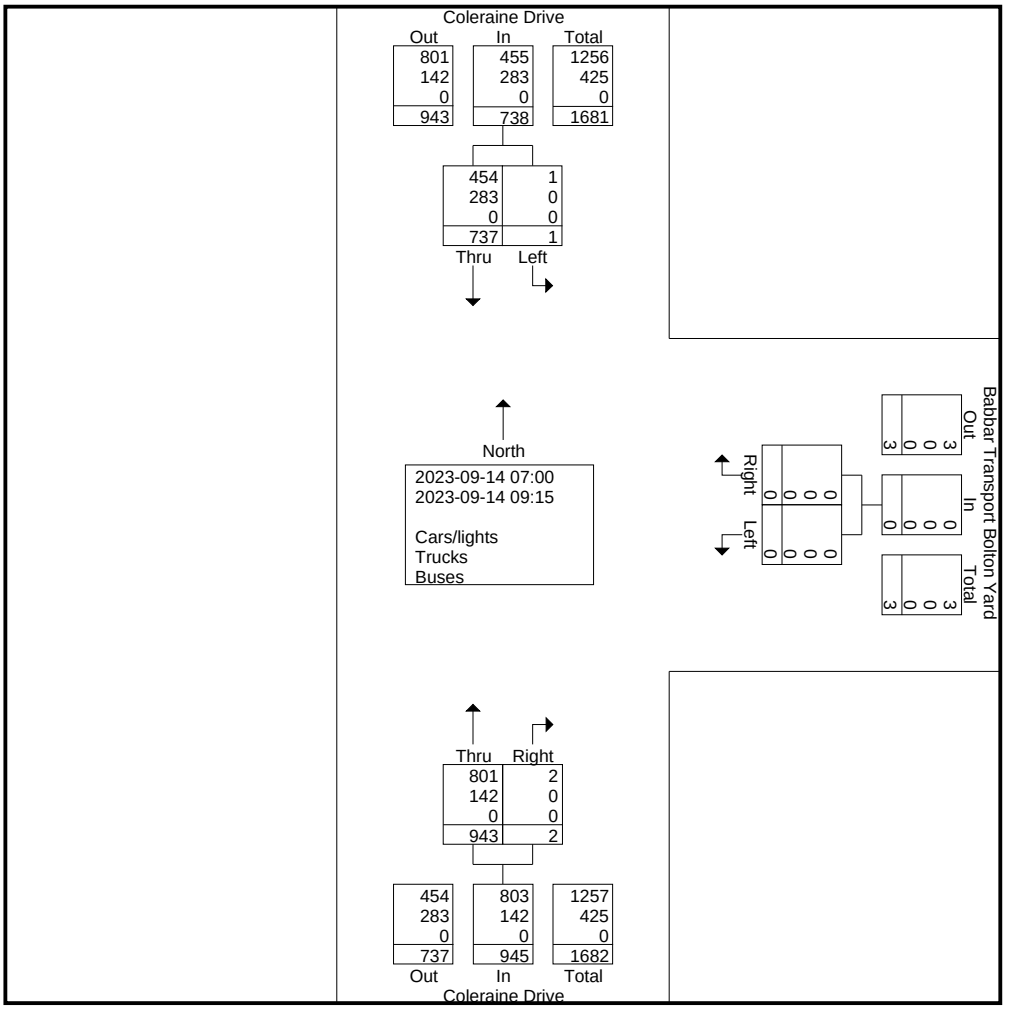

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625 Cochrane Drive, 5th Floor
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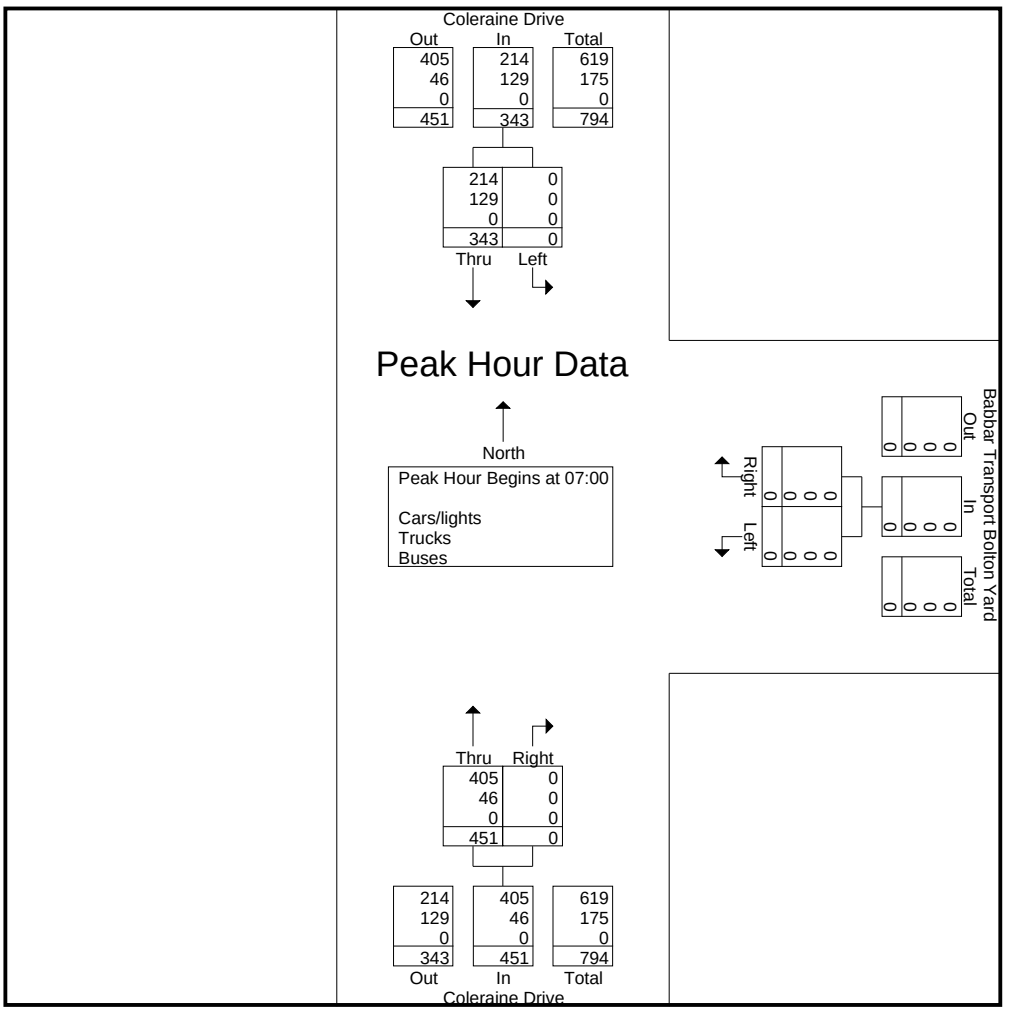
File Name : Coleraine Dr & Site Access-AM
Site Code : 24085
Start Date : 2023-09-14
Page No : 3

	Coleraine Drive Southbound			Babbar Transport Bolton Yard Westbound			Coleraine Drive Northbound			
Start Time	Left	Thru	App. Total	Left	Right	App. Total	Thru	Right	App. Total	Int. Total
Peak Hour Analysis From 07:00 to 09:15 - Peak 1 of 1										
Peak Hour for Entire Intersection Begins at 07:00										
07:00	0	**122**	**122**	0	0	0	128	0	128	**250**
07:15	0	71	71	0	0	0	**139**	0	**139**	210
07:30	0	75	75	0	0	0	81	0	81	156
07:45	0	75	75	0	0	0	103	0	103	178
Total Volume	0	343	343	0	0	0	451	0	451	794
% App. Total	0	100		0	0		100	0		
PHF	.000	.703	.703	.000	.000	.000	.811	.000	.811	.794
Cars/lights	0	214	214	0	0	0	405	0	405	619
% Cars/lights	0	62.4	62.4	0	0	0	89.8	0	89.8	78.0
Trucks	0	129	129	0	0	0	46	0	46	175
% Trucks	0	37.6	37.6	0	0	0	10.2	0	10.2	22.0
Buses	0	0	0	0	0	0	0	0	0	0
% Buses	0	0	0	0	0	0	0	0	0	0



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Markham, ON L3R 9R9

Project No.: 24085
Intersection: Coleraine Dr & Site Access
Weather: Clear
Surveyor(s): ID

File Name : Coleraine Dr & Site Access-PM
Site Code : 24085
Start Date : 2023-09-14
Page No : 1

Groups Printed- Cars/lights - Trucks - Buses

	Coleraine Drive Southbound				Babbar Transport Bolton Yard Westbound				Coleraine Drive Northbound						
Start Time	Left	Thru	Peds	App. Total	Left	Right	Peds	App. Total	Thru	Right	Peds	App. Total	Exclu. Total	Inclu. Total	Int. Total
16:00	2	87	[0]	89	1	0	[0]	1	63	1	[0]	64	0	154	154
16:15	0	75	[0]	75	0	0	[0]	0	58	2	[0]	60	0	135	135
16:30	0	88	[0]	88	0	0	[0]	0	60	2	[0]	62	0	150	150
16:45	2	80	[0]	82	1	0	[0]	1	62	2	[0]	64	0	147	147
Total	4	330	[0]	334	2	0	[0]	2	243	7	[0]	250	0	586	586
17:00	0	100	[0]	100	3	0	[0]	3	74	1	[0]	75	0	178	178
17:15	0	95	[0]	95	0	0	[0]	0	63	0	[0]	63	0	158	158
17:30	0	134	[0]	134	0	0	[0]	0	93	0	[0]	93	0	227	227
17:45	0	82	[0]	82	0	0	[0]	0	153	0	[0]	153	0	235	235
Total	0	411	[0]	411	3	0	[0]	3	383	1	[0]	384	0	798	798
18:00	0	145	[0]	145	0	0	[0]	0	107	1	[0]	108	0	253	253
18:15	0	109	[0]	109	0	0	[0]	0	106	0	[0]	106	0	215	215
Grand Total	4	995	[0]	999	5	0	[0]	5	839	9	[0]	848	0	1852	1852
Apprch %	0.4	99.6			100	0			98.9	1.1					
Total %	0.2	53.7		53.9	0.3	0		0.3	45.3	0.5		45.8	0	100	
Cars/lights	3	837		840	3	0		3	590	6		596	0	0	1439
% Cars/lights	75	84.1	0	84.1	60	0	0	60	70.3	66.7	0	70.3	0	0	77.7
Trucks	1	158		159	2	0		2	249	3		252	0	0	413
% Trucks	25	15.9	0	15.9	40	0	0	40	29.7	33.3	0	29.7	0	0	22.3
Buses	0	0		0	0	0		0	0	0		0	0	0	0
% Buses	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0

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File Name : Coleraine Dr & Site Access-PM
Site Code : 24085
Start Date : 2023-09-14
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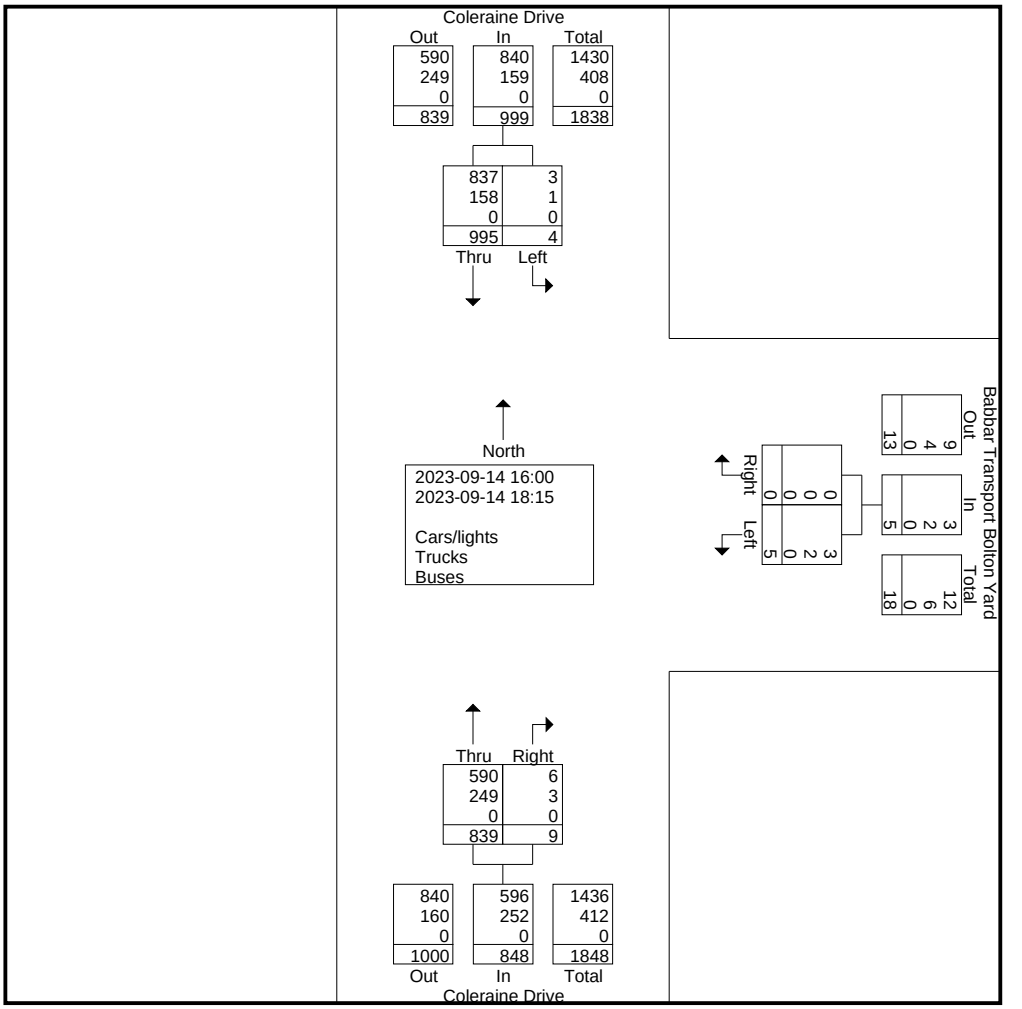

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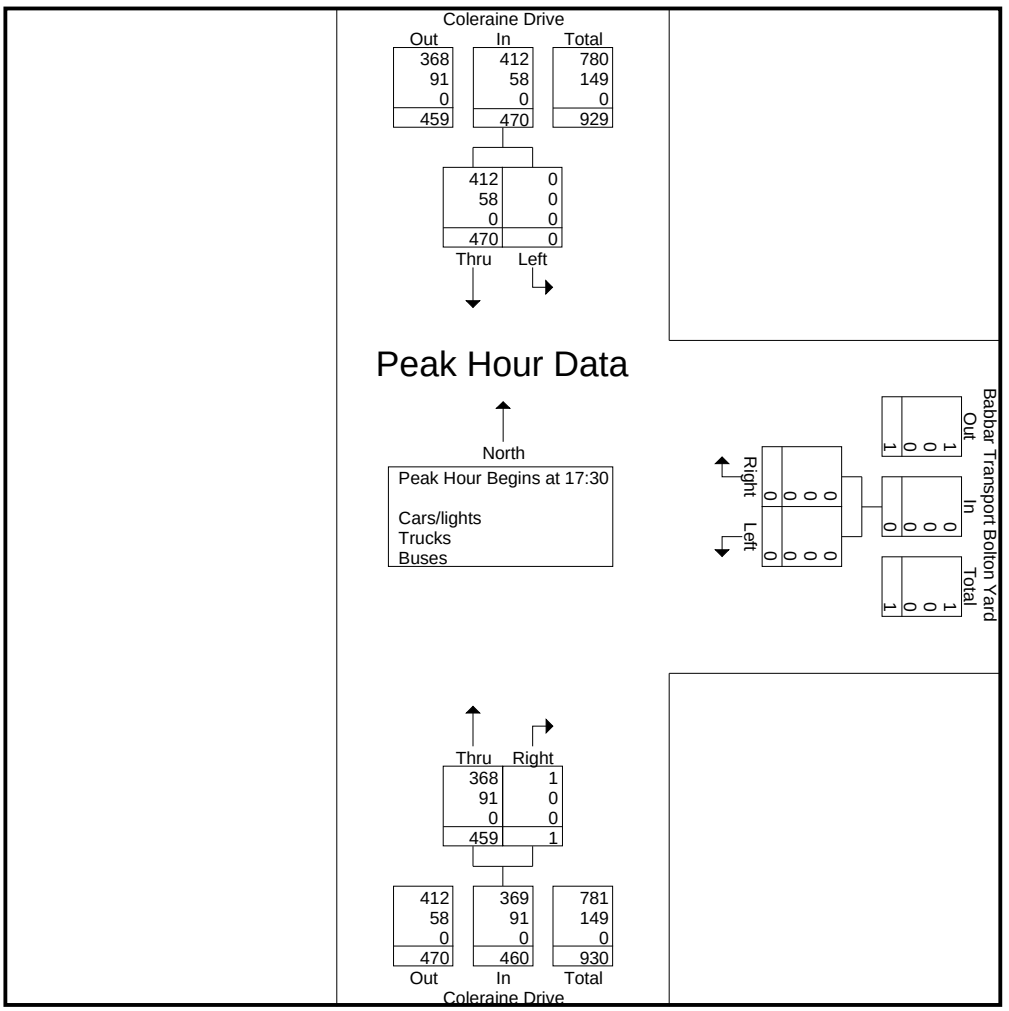
625 Cochrane Drive, 5th Floor
Markham, ON L3R 9R9

File Name : Coleraine Dr & Site Access-PM
Site Code : 24085
Start Date : 2023-09-14
Page No : 3

	Coleraine Drive Southbound			Babbar Transport Bolton Yard Westbound			Coleraine Drive Northbound			
Start Time	Left	Thru	App. Total	Left	Right	App. Total	Thru	Right	App. Total	Int. Total
Peak Hour Analysis From 16:00 to 18:15 - Peak 1 of 1										
Peak Hour for Entire Intersection Begins at 17:30										
17:30	0	134	134	0	0	0	93	0	93	227
17:45	0	82	82	0	0	0	**153**	0	**153**	235
18:00	0	**145**	**145**	0	0	0	107	**1**	108	**253**
18:15	0	109	109	0	0	0	106	0	106	215
Total Volume	0	470	470	0	0	0	459	1	460	930
% App. Total	0	100		0	0		99.8	0.2		
PHF	.000	.810	.810	.000	.000	.000	.750	.250	.752	.919
Cars/lights	0	412	412	0	0	0	368	1	369	781
% Cars/lights	0	87.7	87.7	0	0	0	80.2	100	80.2	84.0
Trucks	0	58	58	0	0	0	91	0	91	149
% Trucks	0	12.3	12.3	0	0	0	19.8	0	19.8	16.0
Buses	0	0	0	0	0	0	0	0	0	0
% Buses	0	0	0	0	0	0	0	0	0	0



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Project No.: 24085
Intersection: Coleraine Dr & Site Access
Weather: Clear
Surveyor(s): ID

File Name : Coleraine Dr & Site Access-SAT
Site Code : 24085
Start Date : 2023-09-16
Page No : 1

Groups Printed- Cars/lights - Trucks - Buses

	Coleraine Drive Southbound				Babbar Transport Bolton Yard Westbound				Coleraine Drive Northbound						
Start Time	Left	Thru	Peds	App. Total	Left	Right	Peds	App. Total	Thru	Right	Peds	App. Total	Exclu. Total	Inclu. Total	Int. Total
10:00	0	57	[0]	57	0	0	[0]	0	35	0	[0]	35	0	92	92
10:15	0	48	[0]	48	0	0	[0]	0	31	0	[0]	31	0	79	79
10:30	0	34	[0]	34	0	0	[0]	0	40	0	[0]	40	0	74	74
10:45	0	43	[0]	43	0	0	[0]	0	22	0	[0]	22	0	65	65
Total	0	182	[0]	182	0	0	[0]	0	128	0	[0]	128	0	310	310
11:00	0	44	[0]	44	0	0	[0]	0	34	0	[0]	34	0	78	78
11:15	0	46	[0]	46	1	0	[0]	1	32	1	[0]	33	0	80	80
11:30	0	46	[0]	46	0	0	[0]	0	35	0	[0]	35	0	81	81
11:45	0	35	[0]	35	0	0	[0]	0	30	0	[0]	30	0	65	65
Total	0	171	[0]	171	1	0	[0]	1	131	1	[0]	132	0	304	304
12:00	0	39	[0]	39	0	0	[0]	0	56	0	[0]	56	0	95	95
12:15	0	48	[0]	48	0	0	[0]	0	35	0	[0]	35	0	83	83
12:30	0	52	[0]	52	0	0	[0]	0	44	0	[0]	44	0	96	96
12:45	0	40	[0]	40	0	0	[0]	0	43	0	[0]	43	0	83	83
Total	0	179	[0]	179	0	0	[0]	0	178	0	[0]	178	0	357	357
13:00	0	63	[0]	63	0	0	[0]	0	42	0	[0]	42	0	105	105
13:15	0	42	[0]	42	0	0	[0]	0	28	0	[0]	28	0	70	70
13:30	0	60	[0]	60	0	0	[0]	0	40	0	[0]	40	0	100	100
13:45	1	56	[0]	57	0	0	[0]	0	44	2	[0]	46	0	103	103
Total	1	221	[0]	222	0	0	[0]	0	154	2	[0]	156	0	378	378
14:00	0	50	[0]	50	1	0	[0]	1	35	1	[0]	36	0	87	87
14:15	0	61	[0]	61	0	0	[0]	0	43	0	[0]	43	0	104	104
14:30	0	75	[0]	75	0	0	[0]	0	37	0	[0]	37	0	112	112
14:45	0	41	[0]	41	0	0	[0]	0	42	0	[0]	42	0	83	83
Total	0	227	[0]	227	1	0	[0]	1	157	1	[0]	158	0	386	386
Grand Total	1	980	[0]	981	2	0	[0]	2	748	4	[0]	752	0	1735	1735
Apprch %	0.1	99.9			100	0			99.5	0.5					
Total %	0.1	56.5		56.5	0.1	0		0.1	43.1	0.2		43.3	0	100	
Cars/lights	1	816		817	1	0		1	528	2		530	0	0	1348
% Cars/lights	100	83.3	0	83.3	50	0	0	50	70.6	50	0	70.5	0	0	77.7
Trucks	0	164		164	1	0		1	220	2		222	0	0	387
% Trucks	0	16.7	0	16.7	50	0	0	50	29.4	50	0	29.5	0	0	22.3
Buses	0	0		0	0	0		0	0	0		0	0	0	0
% Buses	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0

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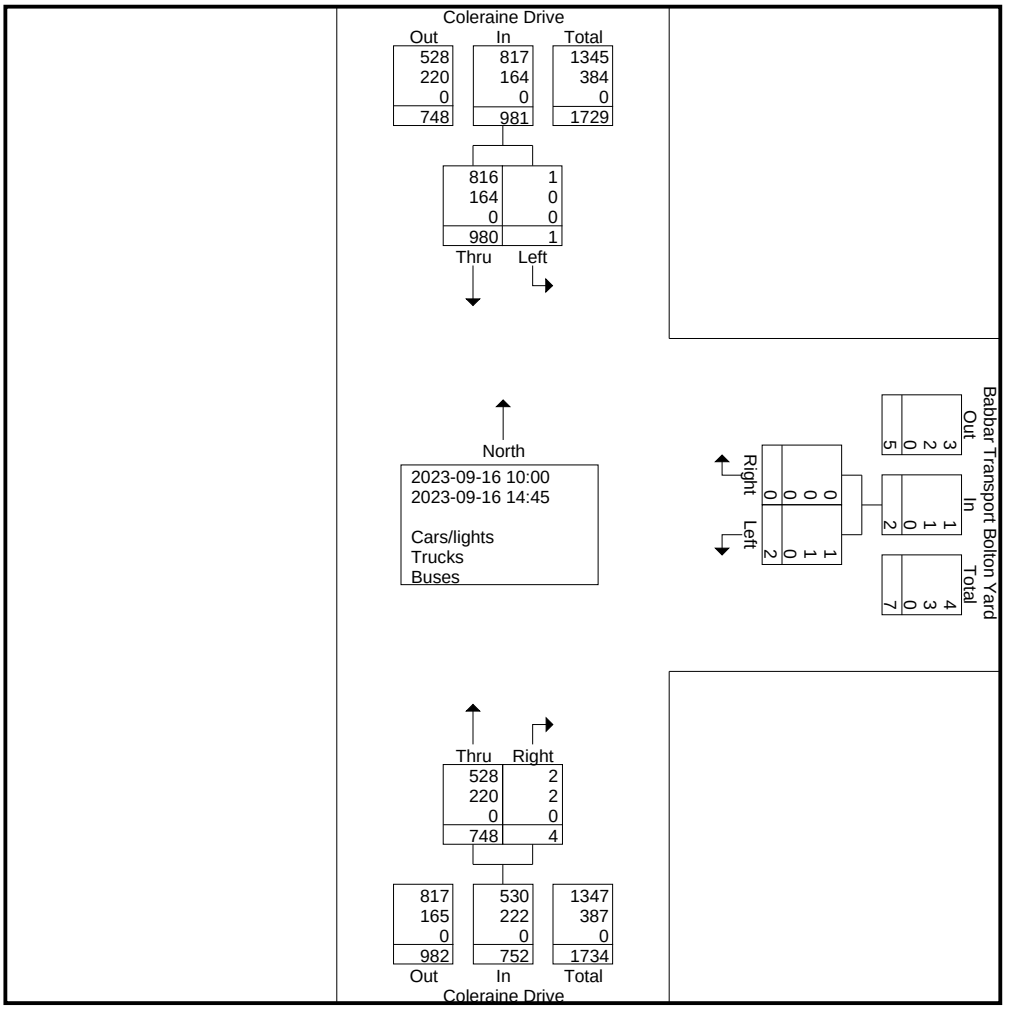
File Name : Coleraine Dr & Site Access-SAT
Site Code : 24085
Start Date : 2023-09-16
Page No : 2



LEA Consulting Ltd.

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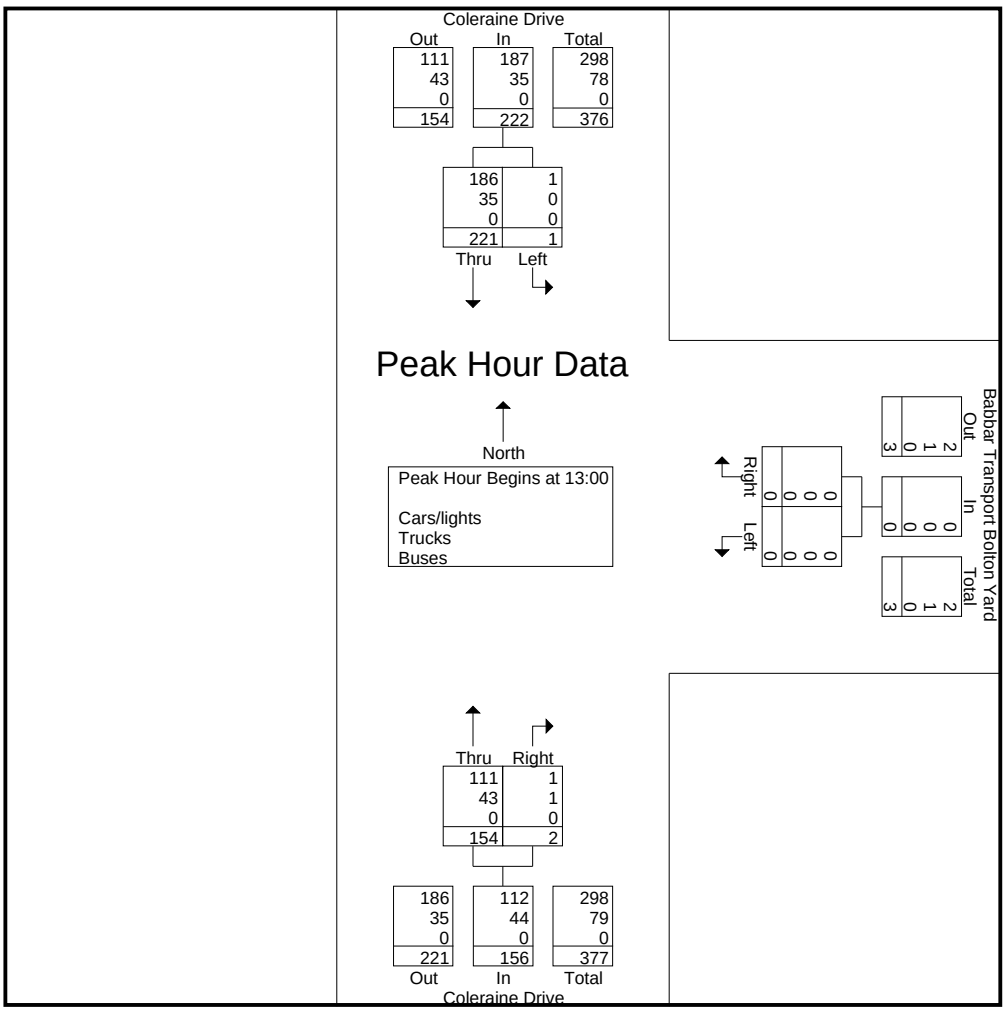
Markham, ON L3R 9R9

File Name : Coleraine Dr & Site Access-SAT
Site Code : 24085
Start Date : 2023-09-16
Page No : 3

	Coleraine Drive Southbound			Babbar Transport Bolton Yard Westbound			Coleraine Drive Northbound			
Start Time	Left	Thru	App. Total	Left	Right	App. Total	Thru	Right	App. Total	Int. Total
Peak Hour Analysis From 10:00 to 13:45 - Peak 1 of 1										
Peak Hour for Entire Intersection Begins at 13:00										
13:00	0	**63**	**63**	0	0	0	42	0	42	**105**
13:15	0	42	42	0	0	0	28	0	28	70
13:30	0	60	60	0	0	0	40	0	40	100
13:45	**1**	56	57	0	0	0	**44**	**2**	**46**	103
Total Volume	1	221	222	0	0	0	154	2	156	378
% App. Total	0.5	99.5		0	0		98.7	1.3		
PHF	.250	.877	.881	.000	.000	.000	.875	.250	.848	.900
Cars/lights	1	186	187	0	0	0	111	1	112	299
% Cars/lights	100	84.2	84.2	0	0	0	72.1	50.0	71.8	79.1
Trucks	0	35	35	0	0	0	43	1	44	79
% Trucks	0	15.8	15.8	0	0	0	27.9	50.0	28.2	20.9
Buses	0	0	0	0	0	0	0	0	0	0
% Buses	0	0	0	0	0	0	0	0	0	0



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APPENDIX C

Background Developments

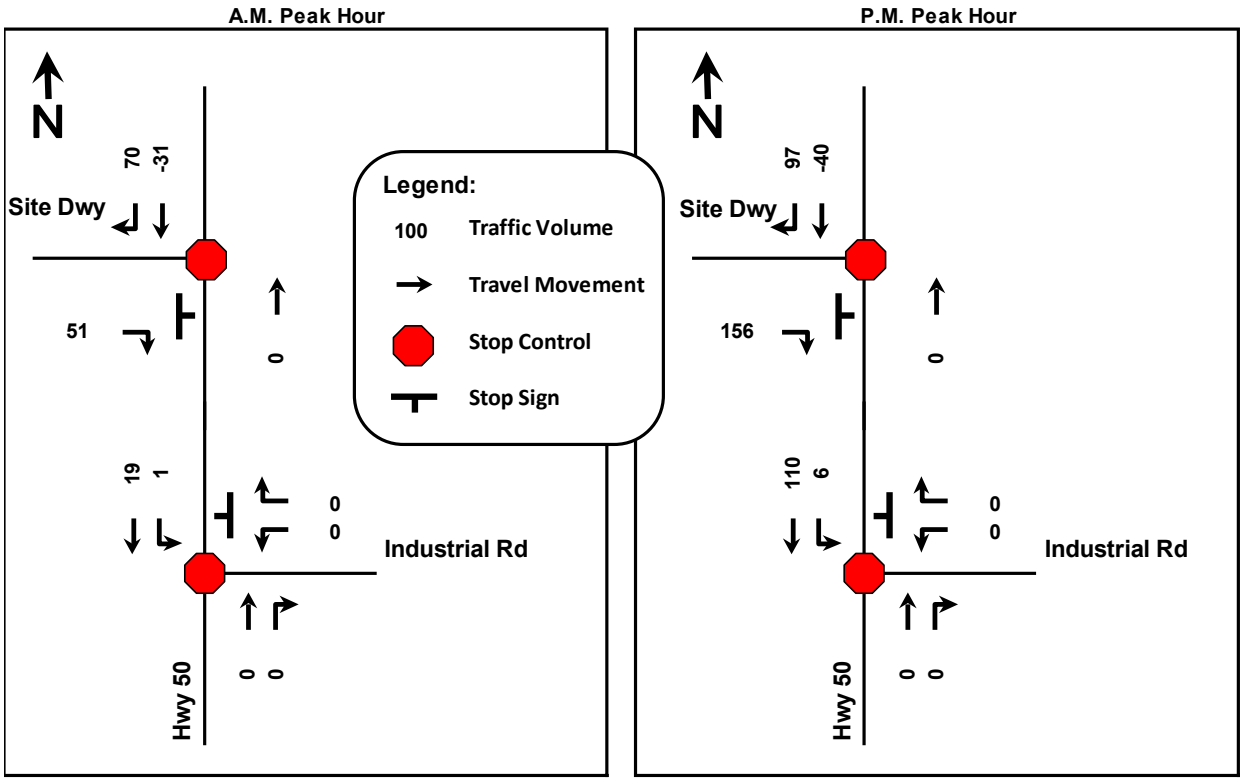
Table 5-1 Trip Generation Summary

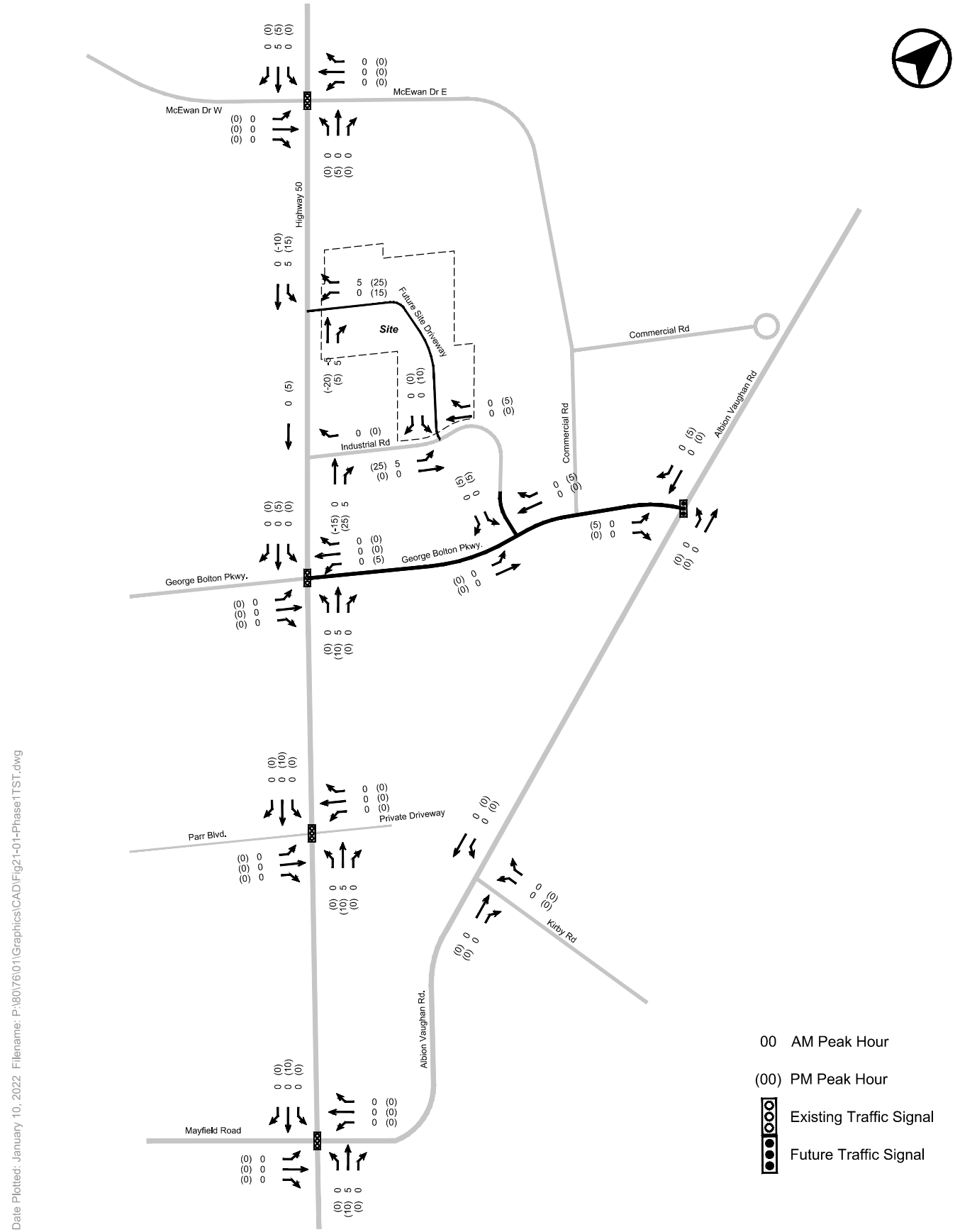
Land Use	Size	Weekday A.M. Peak Hour			Weekday P.M. Peak Hour		
		In	Out	Total	In	Out	Total
Gasoline Station with Convenience Market and Car Wash	8 Positions	43	42	**85**	53	54	**107**
Auto Body Shop / Shopping Center	278.7 m^2 / 3,000 s.f.	12	7	**19**	30	32	**62**
Office	460.7 m^2 / 4960 s.f.	15	2	**17**	14	70	**84**
Pass-by Trips		31	31	**62**	40	40	**80**
Primary New Trips		**39**	**20**	**59**	**57**	**116**	**173**

In order to analyze the future total conditions, the estimated new peak hour vehicular trips summarized in Table 5-1 were assigned to the site driveways and study intersections. The directional route distribution of site generated traffic was based on the access configuration.

Based on the abovementioned trip distribution the estimated new trips associated with the proposed development summarized in Table 5-1 were assigned at the site driveways and study intersections accordingly. The total new assigned peak hour site generated traffic volumes with pass-by reduction are shown in **Figure 5-1**.

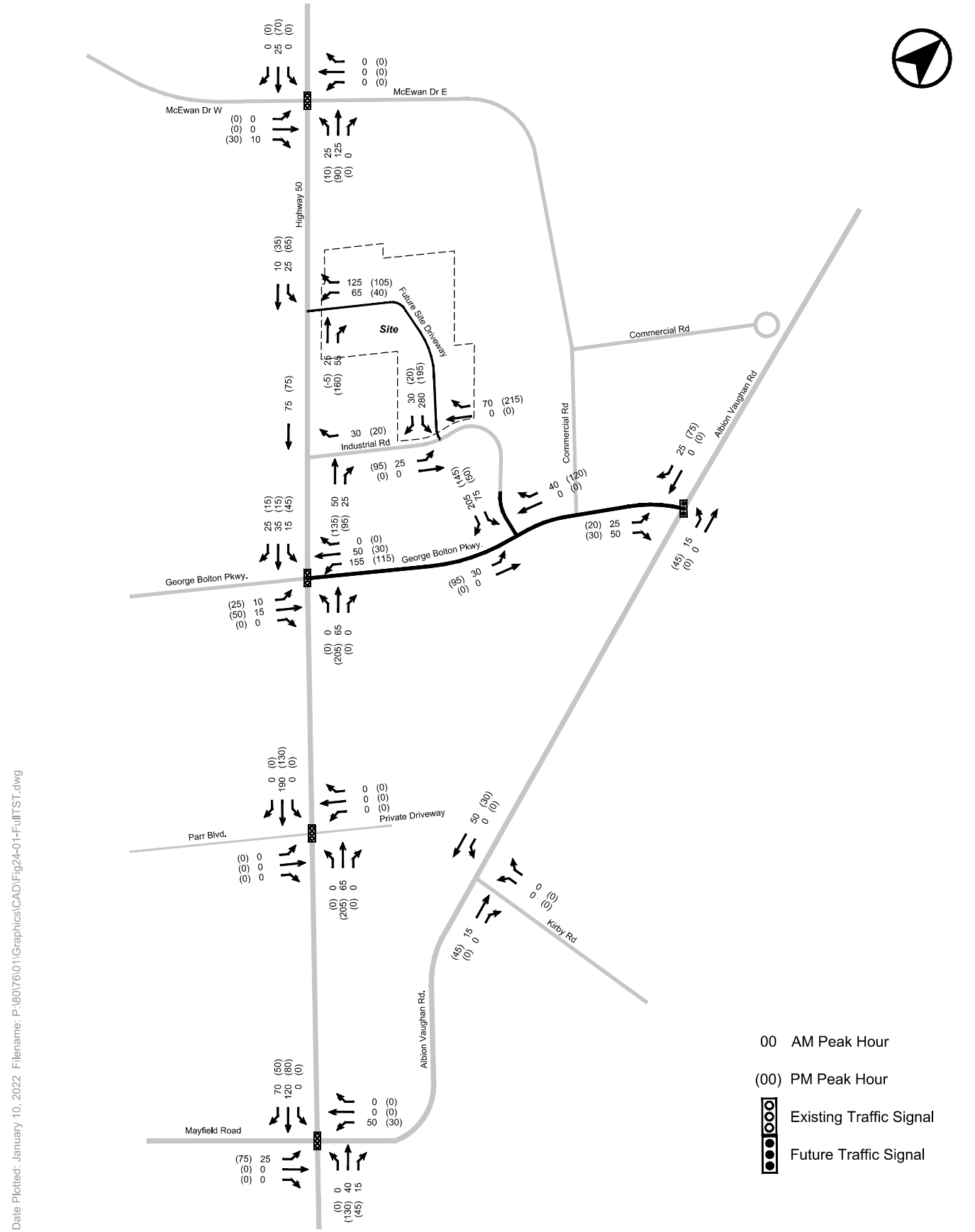
Figure 5-1 Total Peak Hour Proposed Site Development Related Trips





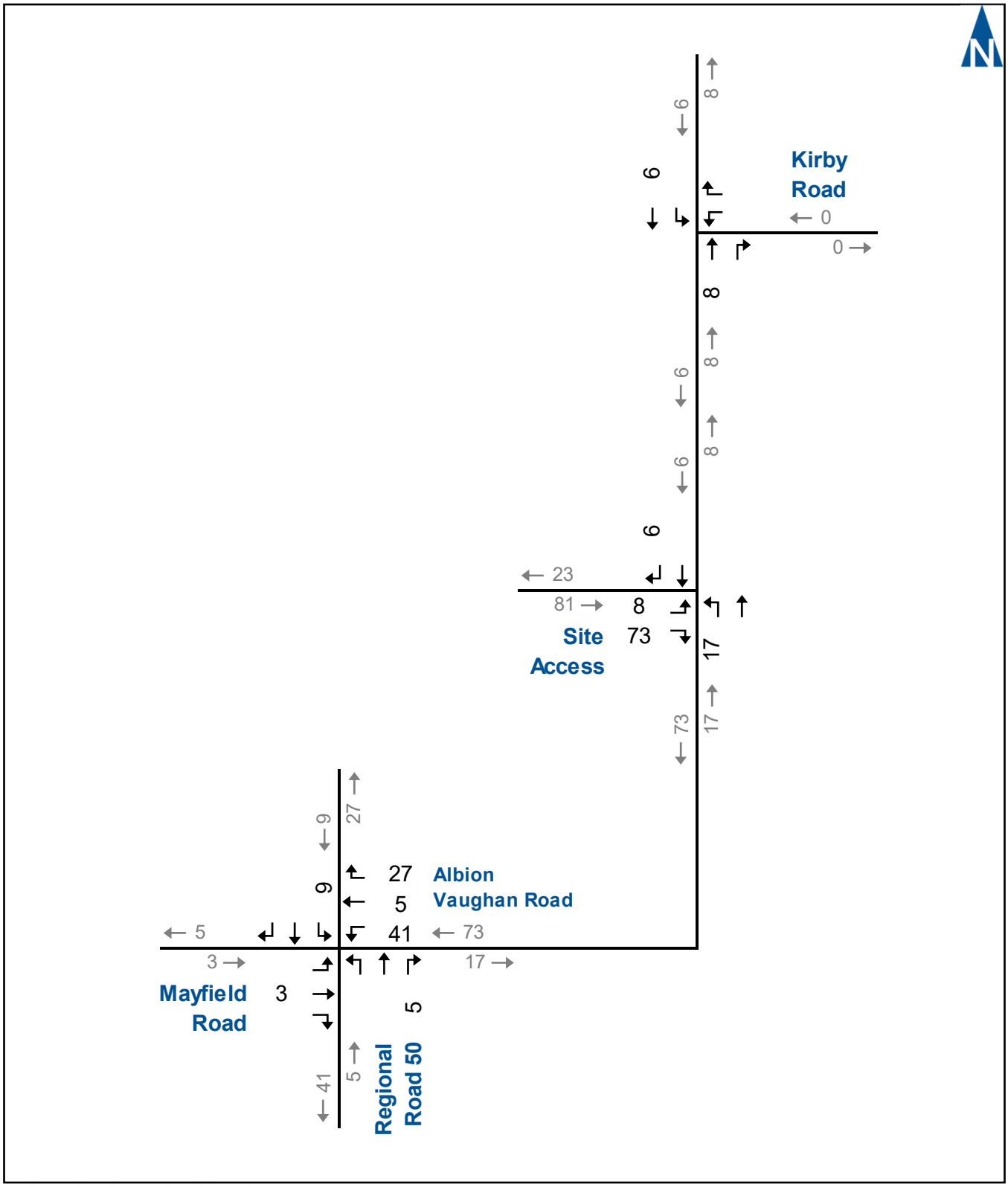
Date Plotted: January 10, 2022 Filename: P:\8076\01\Graphics\CAD\Fig21-01-Phase1TST.dwg

FIGURE 21 PHASE 1 TOTAL SITE TRAFFIC VOLUMES

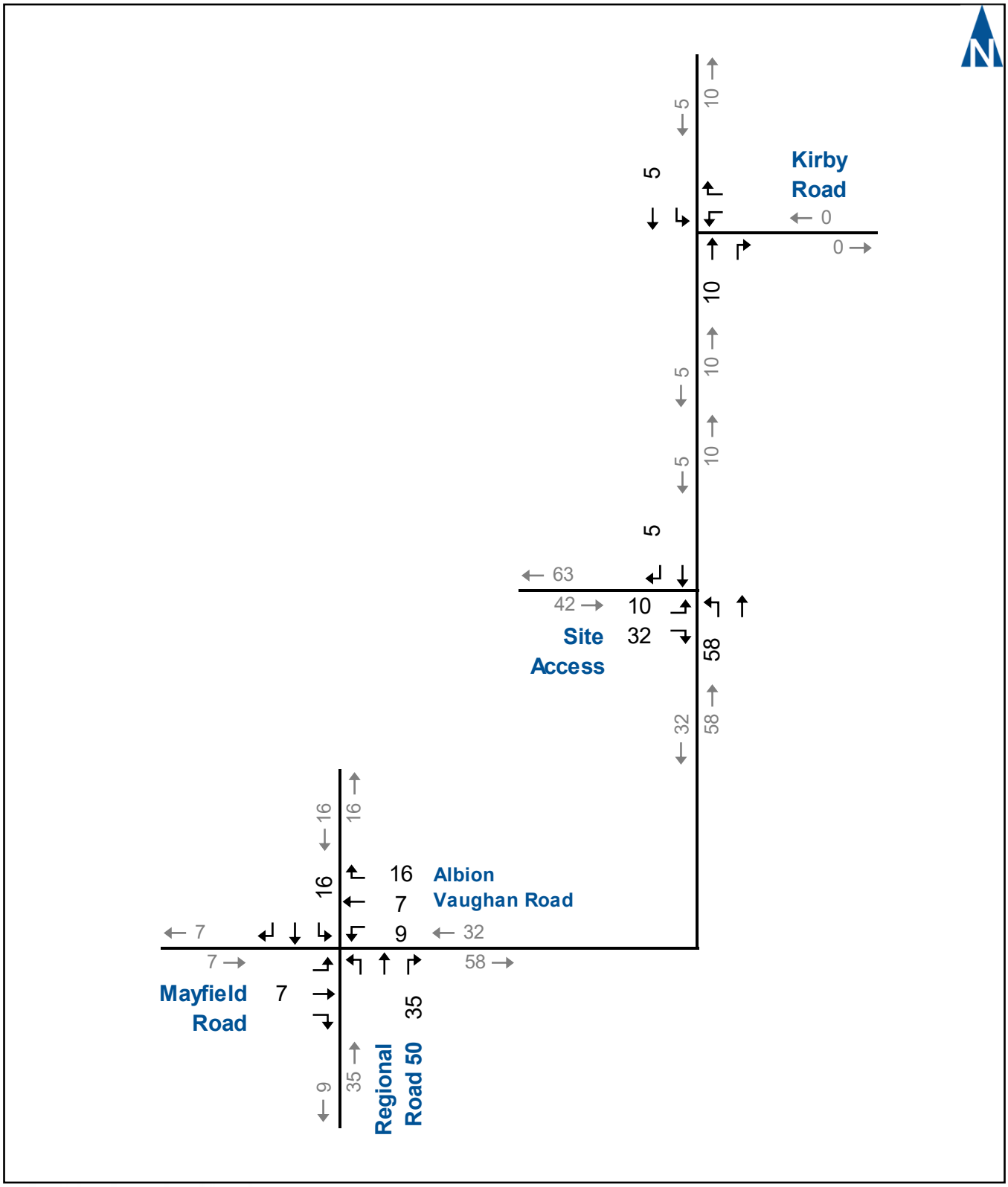


Date Plotted: January 10, 2022 Filename: P:\8076\01\Graphics\CAD\Fig24-01-FullTST.dwg

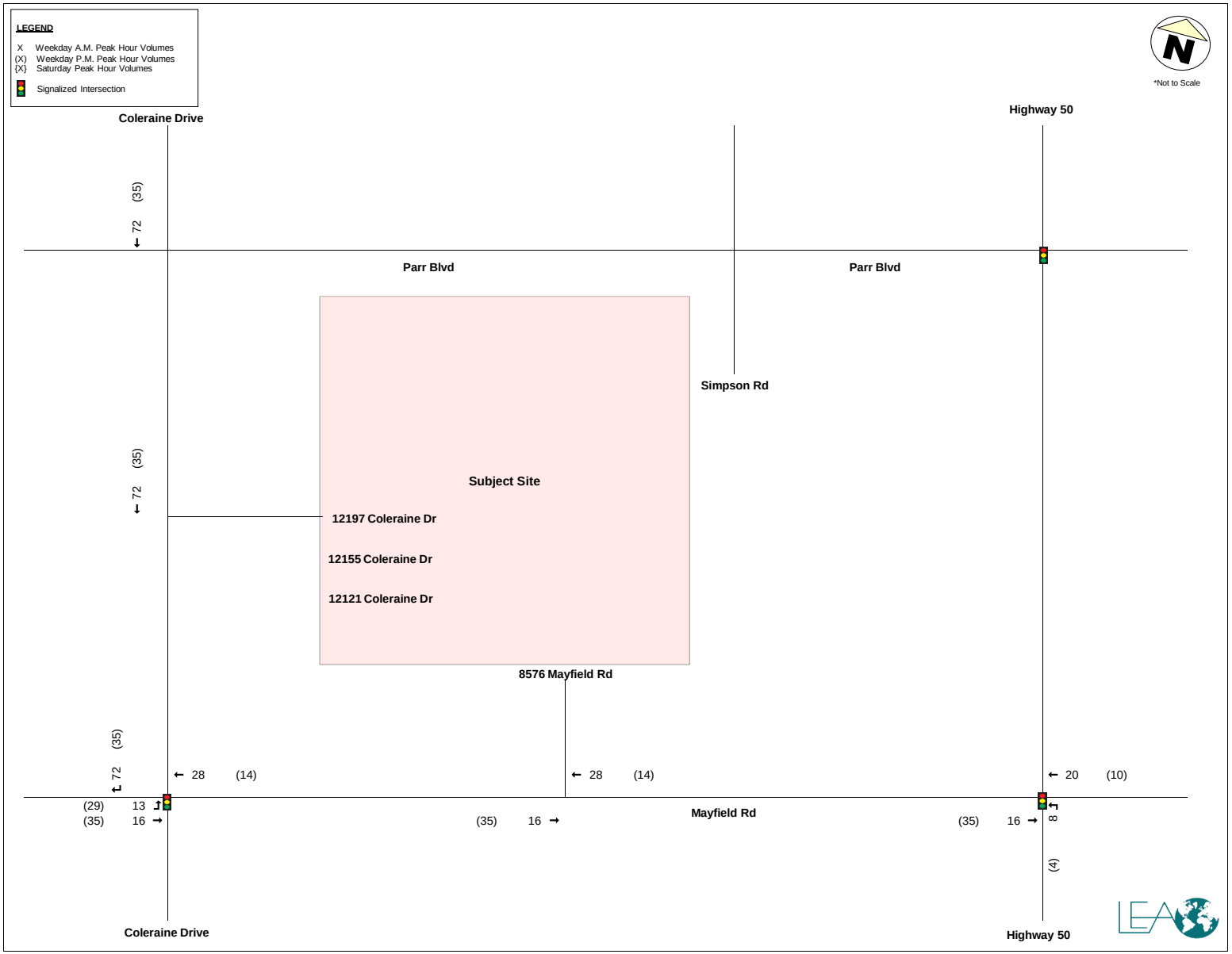
FIGURE 24 FULL BUILD-OUT TOTAL SITE TRAFFIC VOLUMES



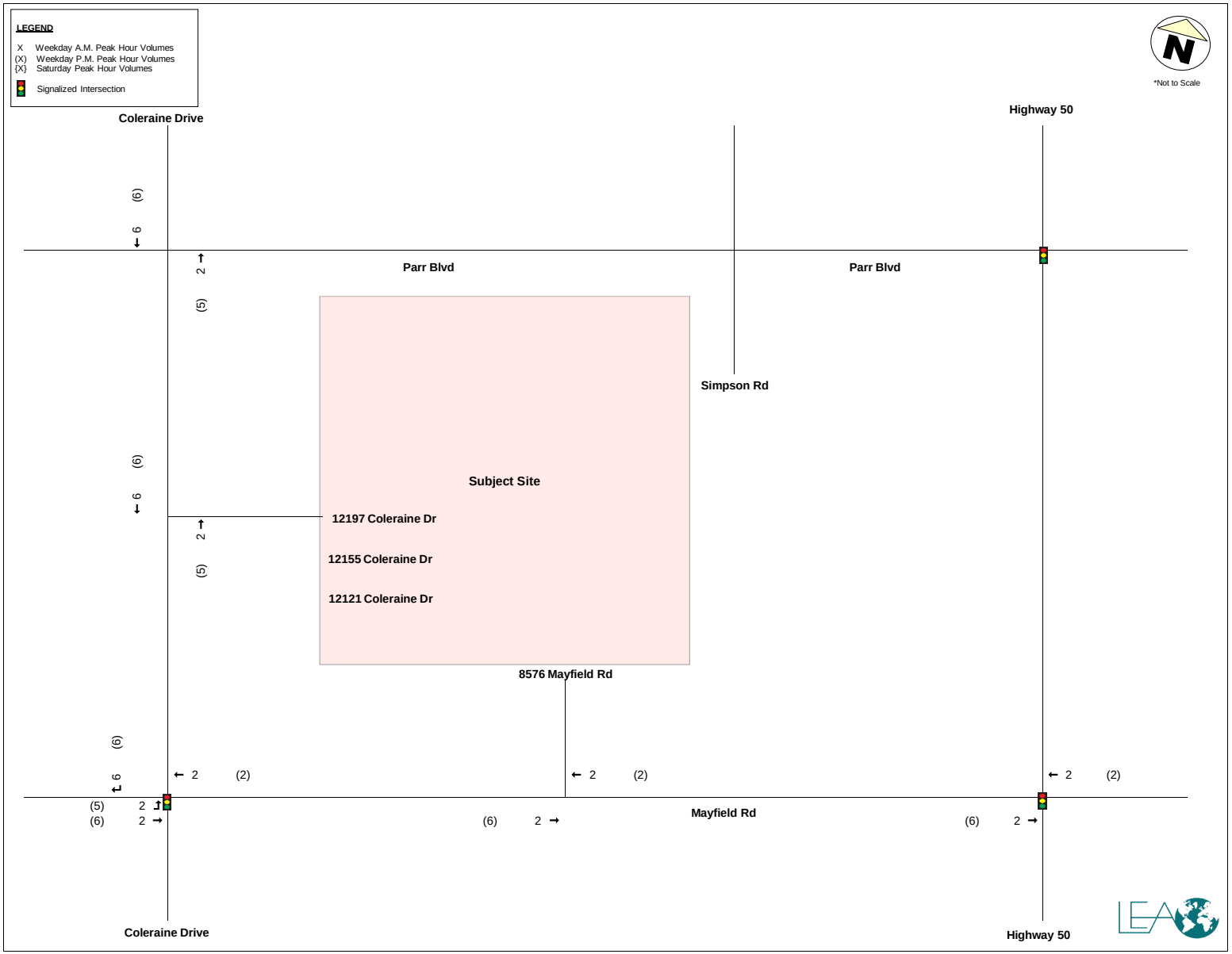
Site Traffic Volumes
AM Peak Hour



Site Traffic Volumes
PM Peak Hour



Triangle Lands Auto Trips



Triangle Lands Truck Trips

Table 5-3: Trip Distribution

Direction From/ To	Expected Route	Industrial Weekday AM/PM	
		In	Out
North	Albion Vaughn Road	8%	9%
	Coleraine Drive	14%	11%
	Highway 50	-	4%
	Humber Station Road	3%	-
South	Clarkway Drive	18%	22%
	Highway 50	3%	4%
East	Healey Road	6%	3%
West	Healey Road	13%	16%
	Mayfield Road	35%	31%
	Total	100%	100%

The site-generated traffic volumes for the weekday AM and PM peak hours under the 2028, 2033, and 2043 horizon years are illustrated in **Figure 5-1** to **Figure 5-6**.

Figure 5-1: Total Site-Generated Auto Peak Hour Traffic Volumes (Phase 1 - 2028)

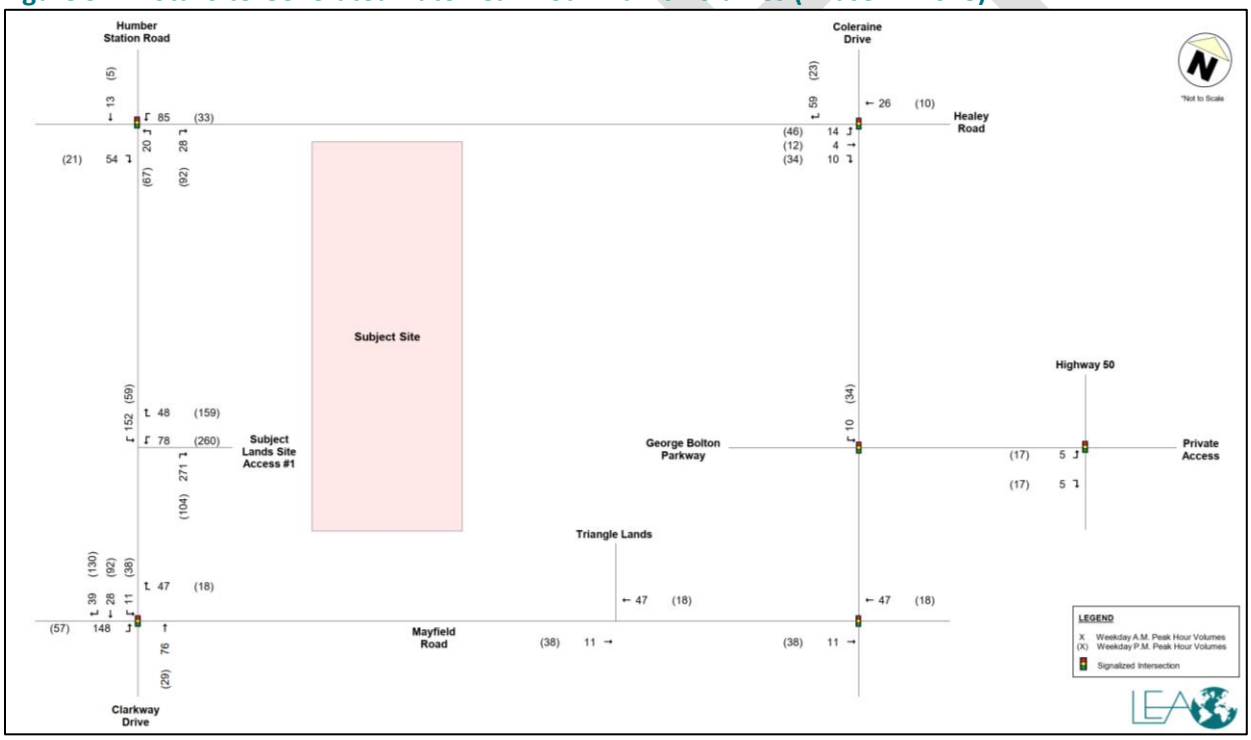


Figure 5-2: Total Site-Generated Truck Peak Hour Traffic Volumes (Phase 1 - 2028)

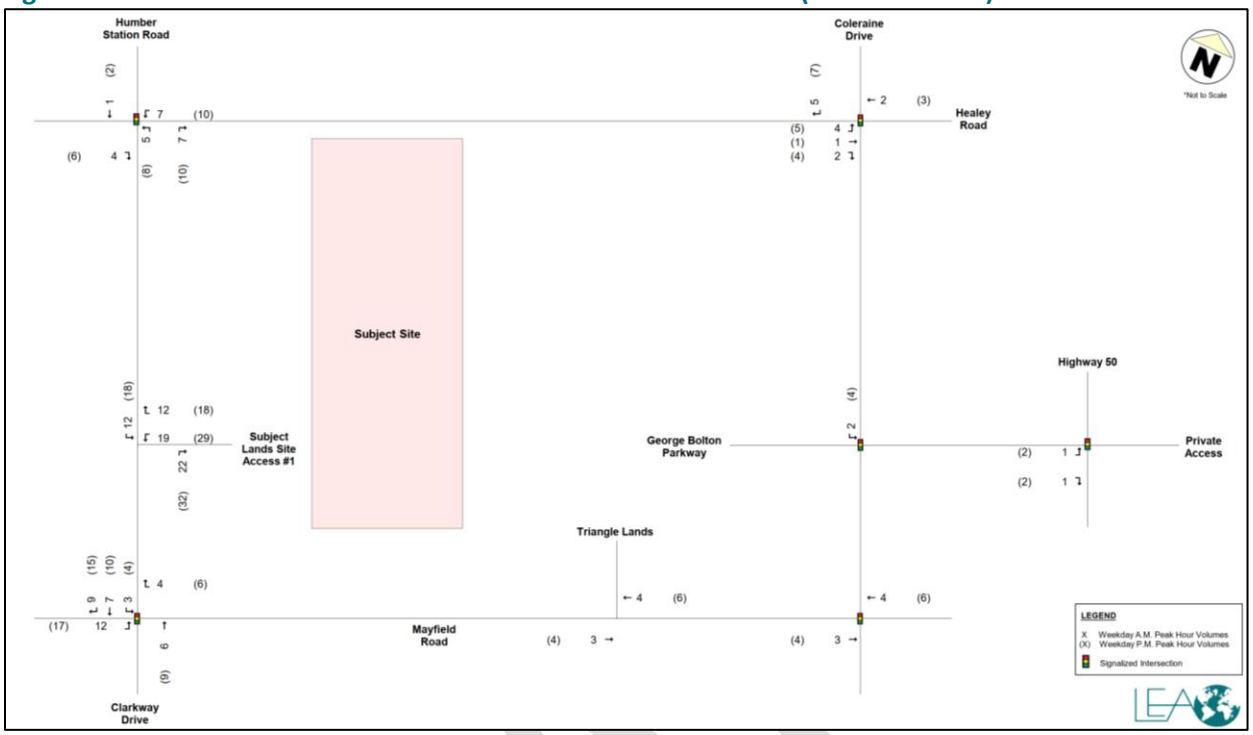


Figure 5-3: Total Site-Generated Auto Peak Hour Traffic Volumes (Full Buildout - 2033)

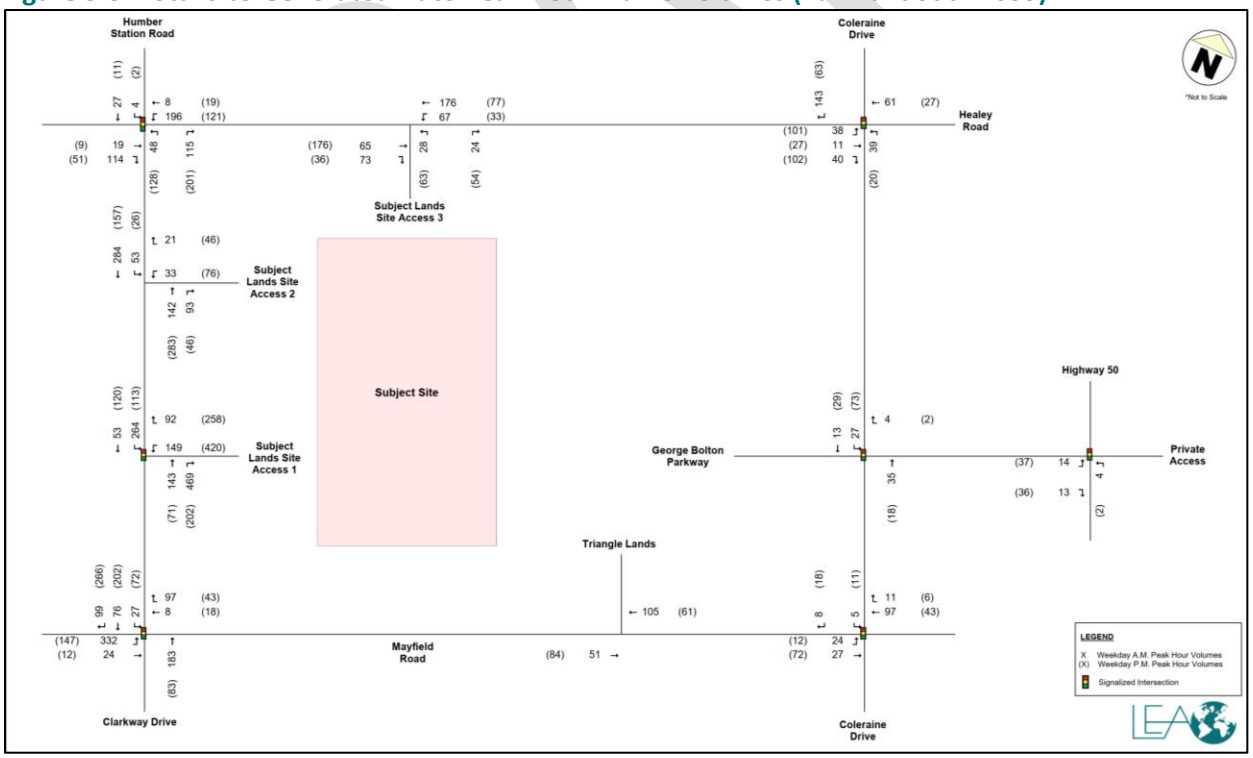
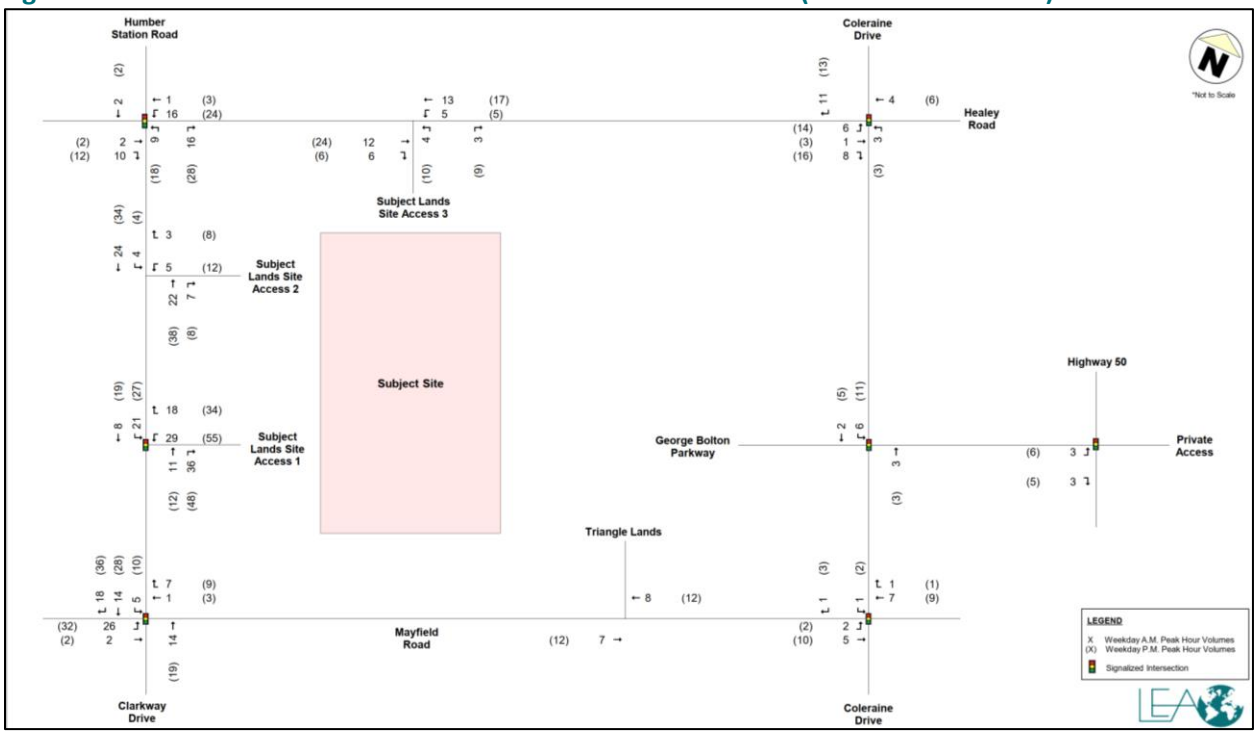


Figure 5-4: Total Site-Generated Truck Peak Hour Traffic Volumes (Full Buildout - 2033)



APPENDIX D

Detailed TTS Calculations

Work AM IN PM Out

AM IN

Thu Aug 03 2023 16:40:31 GMT-0400 (Eastern Daylight Time) - Run Time: 2888ms

Cross Tabulation Query Form - Trip - 2016 v1.1

Row: 2006 GTA zone of origin - gta06_orig
Column: 2006 GTA zone of destination - gta06_dest

RowG:
ColG (5191):
TSIG:

Filters:
Start time of trip - start_time in 0600-1000
and
Trip purpose of destinatio F
and
Primary travel mode of trip M P T

Trip 2016
Table:

	1
51	25
72	43
131	12
138	21
160	21
163	34
173	24
178	23
191	16
196	11
222	12
223	17
235	13
260	15
281	7
286	6
328	13
360	26
366	52
371	32
378	25
392	20
396	10
395	8
396	8
413	18
433	17
458	27
491	20
496	15
542	14
568	16
1180	21
2016	22
2017	13
2020	21
2022	31
2023	53
2025	30
2027	13
2032	32
2132	16
2201	22
2216	33
2258	18
2427	16
2434	45
2958	14
2932	31
2959	18
2997	22
2998	27
3.002.118	118
3010	16
3.105.134	134
3156	53
3.153.215	215
3.186.111	111 Caledon 1332
3190	67
3.192.258	258
3.193.205	205
3191	96
3197	9
3199	50
3137	97
3138	39
3351	53
3352	50
3360	7
3362	12
3363	77
3364	85
3367	42
3372	34
3373	13
3374	24
3375	41
3379	63
3.380.135	135
3399	59
3419	38
3431	12
3436	51
3442	14
3447	30
3449	14
3456	14
3466	18
3468	27
3485	36
3515	23
3516	26
3517	46
3.518.149	149
3519	16
3602	35
3603	18
3606	6
3607	27
3615	18
3617	14
3628	58
3638	7
3644	10
3645	22
3649	7
3660	48
3671	19
3675	23
3681	12
3686	43
3688	8
3714	15
3877	41
4091	32
4110	69
4123	23
4139	55
4160	15
4175	6
8403	45
8409	13
8415	42
8526	14
8.993.107	107
8598	21
8592	56
8582	14
8593	68
8589	56
8595	33
8596	68
8597	24
8642	18
8.993.123	123
	5129

Thu Aug 03 2023 16:41:14 GMT-0400 (Eastern Daylight Time) - Run Time: 2716ms

Cross Tabulation Query Form - Trip - 2016 v1.1

Row: Planning district of origin - pd_orig
Column: 2006 GTA zone of destination - gta06_dest

RowG:
ColG (5191):
TSIG:

Filters:
Start time of trip - start_time in 0600-1000
and
Trip purpose of t F
and
Primary travel mo M P T

Trip 2016
Table:

Inbound Direction

	1		Route 1	Route 2	Route 3	Route 4	Route 5	Route 1	Route 2	Route 3	Route 4	Route 5
PD 1 of Toronto	68	1%	Hwy 50 S	Mayfield Rd W				1%	1%			
PD 2 of Toronto	12	0%	Hwy 50 S	Mayfield Rd W				0%	0%			
PD 3 of Toronto	123	2%	Hwy 50 S					2%				
PD 4 of Toronto	40	1%	Hwy 50 S					1%				
PD 5 of Toronto	17	1%	Hwy 50 S					1%				
PD 6 of Toronto	35	1%	Hwy 50 S					1%				
PD 7 of Toronto	6	0%	Hwy 50 S					0%				
PD 8 of Toronto	13	0%	Hwy 50 S	Mayfield Rd W				0%	0%			
PD 9 of Toronto	153	3%	Hwy 50 S					3%				
PD 10 of Toronto	44	1%	Hwy 50 S					1%				
PD 11 of Toronto	44	1%	Hwy 50 S					1%				
PD 12 of Toronto	20	1%	Hwy 50 S					1%				
PD 13 of Toronto	15	0%	Hwy 50 S					0%				
PD 14 of Toronto	14	0%	Hwy 50 S					0%				
PD 15 of Toronto	16	1%	Hwy 50 S					1%				
Oshawa	21	1%	Hwy 50 S					1%				
Georgina	27	1%			Albion N					1%		
Aurora	14	0%			Albion N					0%		
Richmond Hill	74	1%	Hwy 50 S					1%				
Markham	61	1%	Hwy 50 S	Mayfield Rd W				1%	1%			
King	71	1%	Hwy 50 S		Albion N			1%		1%		
Vaughan	230	2%	Hwy 50 S	Mayfield Rd W				2%	2%			
3.002.118	118	2%				Coleraine N					2%	
3010	16	1%		Mayfield Rd W		Coleraine N					1%	
3.105.134	134	3%				Coleraine N					3%	
3156	53	1%				Coleraine N					1%	
3.153.215	215	4%				Coleraine N					4%	
3.186.111	111	2%				Coleraine N					2%	
3190	67	1%			Albion N		Hwy 50 N			1%		1%
3.192.258	258	2%			Albion N	Coleraine N	Hwy 50 N			2%	2%	2%
3.193.205	205	1%			Albion N	Coleraine N	Hwy 50 N			1%	1%	1%
3191	96	2%				Coleraine N					2%	
3197	9	0%				Coleraine N					0%	
3199	50	1%			Albion N	Coleraine N				1%	1%	
Brampton	1344	26%		Mayfield Rd W					26%			
Mississauga	433	4%	Hwy 50 S	Mayfield Rd W				4%	4%			
Halton Hills	77	1%		Mayfield Rd W		Coleraine N					1%	
Milton	91	1%	Hwy 50 S	Mayfield Rd W				1%	1%			
Burlington	32	1%	Hwy 50 S	Mayfield Rd W				1%	1%			
Orangeville	58	1%				Coleraine N					1%	
Barrie	14	0%			Albion N					0%		
Innisfil	54	1%			Albion N					1%		
New Tecumseth	370	4%			Albion N	Coleraine N				4%	4%	
Adjala-Tosoront	163	2%			Albion N	Coleraine N				2%	2%	
Mono	42	1%				Coleraine N					1%	
	5128							23%	35%	12%	26%	4%
								100%				

Direction	Route	Dist
N	Coleraine Dr	26%
	Albion Vaughan Rd	12%
	Highway 50	4%
S	Highway 50	23%
W	Mayfield Rd	35%
		100%

PM OUT

Thu Aug 03 2023 16:40:45 GMT-0400 (Eastern Daylight Time) - Run Time: 2286ms

Cross Tabulation Query Form - Trip - 2016 v1.1

Row: 2006 GTA zone of destination - gta06_dest
Column: 2006 GTA zone of origin - gta06_orig

RowG:
ColG (5191):
TSIG:

Filters:
Start time of trip - start_time in 1500-1900
and
Trip purpose of origin - pu F
and

Thu Aug 03 2023 16:46:53 GMT-0400 (Eastern Daylight Time) - Run Time: 2481ms

Cross Tabulation Query Form - Trip - 2016 v1.1

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Column: 2006 GTA zone of origin - gta06_orig

RowG:
ColG (5191):
TSIG:

Filters:
Start time of trip - start_time in 1500-1900
and
Trip purpose F
and

Primary travel mode of trip	M	P	T
Trip 2016			
Table:			

	1
72	43
88	20
131	12
149	21
154	17
160	21
163	47
173	24
178	23
223	17
238	25
241	15
281	7
339	13
343	26
346	52
371	17
374	7
376	25
392	20
394	10
396	8
398	8
401	40
413	17
438	27
548	14
838	38
1180	21
2035	15
2114	11
2017	13
2030	21
2033	53
2034	30
2037	13
2052	32
2058	13
2072	12
2098	24
2132	16
2133	18
2141	22
2145	33
2437	16
2456	45
2536	14
2852	31
2740	28
3039	44
3,188,153	153
3156	53
3,193,241	241
3,188,111	111
3,190,178	178
3191	14
3,192,239	239
3,193,241	241
3196	67
3197	16
3198	83
3037	65
3038	39
3345	77
3352	29
3357	12
3360	7
3367	42
3368	19
3,371,156	104
3372	34
3373	13
3374	24
3375	41
3379	63
3,380,166	165
3386	59
3397	14
3419	38
3430	18
3436	51
3442	14
3447	61
3448	14
3456	14
3466	18
3468	27
3485	36
3515	23
3516	26
3517	46
3,518,129	129
3519	16
3603	18
3606	6
3607	27
3615	18
3617	14
3629	58
3638	7
3644	10
3666	48
3670	6
3671	19
3678	23
3686	28
3688	8
3714	15
3716	21
3876	12
4030	19
4094	32
4110	86
4123	23
4139	55
4140	15
4173	12
4175	6
6034	42
8,402,105	105
8403	13
8404	13
8405	13
8415	42
8523	12
8529	14
8,563,107	107
8538	21
8541	56
8542	14
8563	17
8585	45
8590	22
8595	33
8596	68
8597	24
8640	17
8663	68
	5205

Primary travel mode of trip	M	P	T
Trip 2016			
Table:			

Outbound Direction

	1	Route 1	Route 2	Route 3	Route 4	Route 5	Route 1	Route 2	Route 3	Route 4	Route 5
PD 1 of Tote	63	0.005 Hwy 50 S	Mayfield Rd W				1%	1%			
PD 2 of Tote	12	0 Hwy 50 S					0%				
PD 3 of Tote	153	0.015 Hwy 50 S	Mayfield Rd W				2%	2%			
PD 5 of Tote	42	0.005 Hwy 50 S	Mayfield Rd W				1%	1%			
PD 6 of Tote	22	0 Hwy 50 S	Mayfield Rd W				0%	0%			
PD 9 of Tote	13	0 Hwy 50 S	Mayfield Rd W				0%	0%			
PD 9 of Tote	146	0.03 Hwy 50 S					3%				
PD 10 of Toti	66	0.01 Hwy 50 S					1%				
PD 11 of Toti	44	0.005 Hwy 50 S	Mayfield Rd W				1%	1%			
PD 14 of Toti	14	0 Hwy 50 S	Mayfield Rd W				0%	0%			
PD 16 of Toti	38	0.005 Hwy 50 S	Mayfield Rd W				1%	1%			
Oshawa	21	0 Hwy 50 S	Mayfield Rd W	Albion N			0%	0%	0%		
East Gwillimi	28	0.005		Albion N	Coleraine N				1%	1%	
Aurora	14	0 Hwy 50 S		Albion N			0%		0%		
Richmond Hi	56	0.01 Hwy 50 S					1%				
Markham	61	0.005 Hwy 50 S	Mayfield Rd W				1%	1%			
King	31	0.005		Albion N	Coleraine N				1%	1%	
Vaughan	271	0.05 Hwy 50 S					5%				
3039	44	0.005	Mayfield Rd W		Coleraine N			1%		1%	
3,188,153	153	0.03			Coleraine N					3%	
3156	53	0.01			Coleraine N					1%	
3,193,241	241	0.05			Coleraine N					5%	
3,188,111	111	0.02			Coleraine N					2%	
3,190,178	178	0.03			Coleraine N					3%	
3191	14	0			Coleraine N					0%	
3,192,239	239	0.025			Coleraine N	Hwy 50 N				3%	3%
3,193,241	241	0.025			Coleraine N	Hwy 50 N				3%	3%
3196	67	0.01			Coleraine N					1%	
3197	16	0			Coleraine N					0%	
3198	83	0.01		Albion N	Coleraine N				1%	1%	
Brampton	1335	0.26	Mayfield Rd W					26%			
Mississauga	339	0.03 Hwy 50 S	Mayfield Rd W				3%	3%			
Halton Hills	88	0.01	Mayfield Rd W		Coleraine N			1%		1%	
Milton	109	0.01 Hwy 50 S	Mayfield Rd W				1%	1%			
Oakville	19	0 Hwy 50 S	Mayfield Rd W				0%	0%			
Burlington	32	0.005 Hwy 50 S	Mayfield Rd W				1%	1%			
Glenorby	42	0.005 Hwy 50 S	Mayfield Rd W				1%	1%			
Orangeville	144	0.03			Coleraine N					3%	
Barrie	27	0.01		Albion N					1%		
Innisfil	76	0.005 Hwy 50 S		Albion N			1%		1%		
Bradford-We	17	0		Albion N	Coleraine N				0%	0%	
New Tecumi	246	0.05			Coleraine N					5%	
Adjala-Tosor	152	0.03			Coleraine N					3%	
Mono	42	0.01			Coleraine N					1%	
	5203						19%	36%	4%	36%	5%
							100%				

Direction	Route	Dist
N	Albion Vaughn Rd	4%
	Coleraine Drive	36%
	Highway 50	5%
S	Highway 50	19%
W	Mayfield Rd	36%
		100%

APPENDIX E

LOS Definitions

LEVELS OF SERVICE FOR SIGNALIZED INTERSECTIONS: METHODOLOGY

Signalized intersection analyses contained in this report were carried out using methodology described in the ***Highway Capacity Manual,*** *2000 update*, by the Transportation Research Board and implemented using Synchro 11 software.

Analyses of signalized intersections compare the volume of traffic passing through an intersection with the capacity of each of the intersection's approaches. Volumes can be either observed or estimated whereas an intersection's capacity is a function of its geometry, the number of lanes per approach, speeds, signal timing, and other considerations. The level of service is evaluated in terms of the average control delay (seconds) per vehicle, which is a measure of driver discomfort, frustration, fuel consumption, and lost travel time. Delay is a complex measure and is calculated as a function of a number of variables, including the quality of progression, the cycle length, the green ratio, and the v/c ratio for the lane group in question.

The criteria for each level of service are given below.

Level of Service	Features	Control Delay (sec/veh)
A	Very low control delay. Occurs when signal progression (i.e. coordination) is extremely favorable and most vehicles arrive during the green phase. Most vehicles do not have to stop.	0.0 – 10.0
B	Occurs with good progression, short cycle length, or both. More vehicles stop than with LOS A.	10.1 – 20.0
C	Occurs with fair progression, longer cycle length, or both. Individual cycle failures may begin to appear. The number of vehicles stopping is significant at this level, though many still pass through the intersection without stopping.	20.0 – 35.0
D	The influence of congestion becomes more noticeable. Longer delays may result from some combination of unfavorable progression, long cycle lengths, or high v/c ratios. Many vehicles have to stop. Individual cycle failures are noticeable (i.e. some vehicles require more than one cycle to make it through the intersection).	35.0 – 55.0
E	Considered by many agencies to be the limit of acceptable delay. High delay values generally indicate poor progression, long cycle lengths, and high v/c ratios. Individual cycle failures are frequent occurrences.	55.0- 80.0
F	Considered to be unacceptable to most drivers and often occurs with oversaturation. It may also occur at high v/c ratios below 1.0 with many individual cycle failures.	80.1 +

LEVELS OF SERVICE FOR UNSIGNALIZED INTERSECTIONS: METHODOLOGY

Unsignalized intersection analyses contained in this report were carried out using methodology described in the ***Highway Capacity Manual*** *(2000 edition)* by the Transportation Research Board and implemented using the Synchro 11 software.

Analyses of unsignalized intersections compare observed or estimated traffic volumes with the capacity of each of the intersection's approaches. The analysis derives an estimation of queue lengths and the resulting delays experienced by vehicles from the time they join a queue to the moment they cross the stop bar at the intersection. Queuing and delays at unsignalized approaches are a function of the volumes of all other conflicting movements and the characteristics of the intersection. Traffic volumes can be either observed or estimated while an intersection's capacity is a function of its geometry, lane configurations, speeds, and other operational considerations. The resulting statistic is termed "average total delay" for each approach and is measured in seconds per vehicle. The delay can then be assigned a letter grade, which provides a simple qualitative assessment of the Level of Service for any unsignalized intersection.

The Level of Service grading for unsignalized intersections is more sensitive than that used for signalized analyses: delays are more onerous at unsignalized intersections as drivers must remain attentive while waiting for acceptable conditions to complete their movement. As a result, the thresholds between grades are lower for unsignalized analyses.

Level of Service	Features	Average Total Delay (sec/veh)
A	Almost no delay occurs. Approaches appear clear and turns are made easily.	0.0 – 10.0
B	Short delays are experienced. Drivers find their movement becoming more restricted.	10.1 – 15.0
C	Longer delays occur. Operation of both the minor and major streets are generally stable but movements from the minor street become more difficult. This level is often used for urban intersection design standards.	15.1 – 25.0
D	Motorists encounter increasing traffic restrictions and substantial delays. Delays on the major street occur as turning traffic interferes with the flow of traffic. Traffic flows are approaching the capacity of the intersection.	25.1 - 35.0
E	At level "E", capacity is reached. There are long queues of vehicles waiting upstream for the approach to clear. Delays to vehicles reach frustrating levels.	35.1- 50.0
F	Intersection saturation occurs as vehicle demand has exceeded the capacity. Drivers will often accept less than ideal gap opportunities; safety is compromised.	50.1 +

APPENDIX F

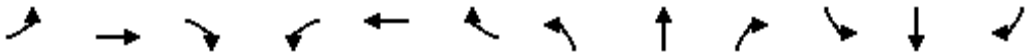
Existing Intersection Capacity Analysis

Lane Group	EBL	EBT	WBL	WBT	NBL	NBT	SBL	SBT
Lane Configurations								
Traffic Volume (vph)	310	267	39	197	23	299	64	347
Future Volume (vph)	310	267	39	197	23	299	64	347
Lane Group Flow (vph)	310	299	39	226	23	330	64	512
Turn Type	pm+pt	NA	Perm	NA	Perm	NA	pm+pt	NA
Protected Phases	5	2		6		4	3	8
Permitted Phases	2		6		4		8	
Detector Phase	5	2	6	6	4	4	3	8
Switch Phase								
Minimum Initial (s)	5.0	12.0	12.0	12.0	12.0	12.0	5.0	12.0
Minimum Split (s)	9.5	37.0	37.0	37.0	37.0	37.0	12.5	37.0
Total Split (s)	15.0	80.0	65.0	65.0	32.0	32.0	18.0	50.0
Total Split (%)	11.5%	61.5%	50.0%	50.0%	24.6%	24.6%	13.8%	38.5%
Yellow Time (s)	3.0	4.6	4.6	4.6	4.2	4.2	3.0	4.2
All-Red Time (s)	0.0	2.4	2.4	2.4	2.8	2.8	0.0	2.8
Lost Time Adjust (s)	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
Total Lost Time (s)	3.0	7.0	7.0	7.0	7.0	7.0	3.0	7.0
Lead/Lag	Lead		Lag	Lag	Lag	Lag	Lead	
Lead-Lag Optimize?								
Recall Mode	None	C-Max	C-Max	C-Max	None	None	None	None
v/c Ratio	0.41	0.15	0.08	0.15	0.19	0.67	0.42	0.64
Control Delay	11.0	9.4	20.0	17.4	52.7	58.6	42.9	41.5
Queue Delay	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
Total Delay	11.0	9.4	20.0	17.4	52.7	58.6	42.9	41.5
Queue Length 50th (m)	31.1	14.7	5.4	15.6	5.6	44.4	13.3	56.5
Queue Length 95th (m)	54.6	25.0	13.5	26.3	14.4	58.8	24.3	70.0
Internal Link Dist (m)		209.3		209.6		564.3		579.6
Turn Bay Length (m)	100.0		85.0		105.0		145.0	
Base Capacity (vph)	754	1957	493	1464	160	671	169	1075
Starvation Cap Reductn	0	0	0	0	0	0	0	0
Spillback Cap Reductn	0	0	0	0	0	0	0	0
Storage Cap Reductn	0	0	0	0	0	0	0	0
Reduced v/c Ratio	0.41	0.15	0.08	0.15	0.14	0.49	0.38	0.48

Intersection Summary

Cycle Length: 130
Actuated Cycle Length: 130
Offset: 92 (71%), Referenced to phase 2:EBTL and 6:WBTL, Start of Green
Natural Cycle: 100
Control Type: Actuated-Coordinated

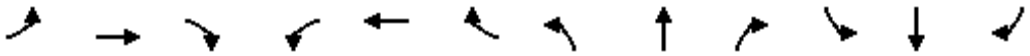
Splits and Phases: 1: Coleraine Dr & Mayfield Rd



Movement	EBL	EBT	EBR	WBL	WBT	WBR	NBL	NBT	NBR	SBL	SBT	SBR
Lane Configurations												
Traffic Volume (vph)	310	267	32	39	197	29	23	299	31	64	347	165
Future Volume (vph)	310	267	32	39	197	29	23	299	31	64	347	165
Ideal Flow (vphpl)	1900	1900	1900	1900	1900	1900	1900	1900	1900	1900	1900	1900
Lane Width	3.5	3.7	3.5	3.5	3.7	3.5	3.5	3.7	3.5	3.5	3.7	3.5
Total Lost time (s)	3.0	7.0		7.0	7.0		7.0	7.0		3.0	7.0	
Lane Util. Factor	1.00	0.95		1.00	0.95		1.00	0.95		1.00	0.95	
Frt	1.00	0.98		1.00	0.98		1.00	0.99		1.00	0.95	
Flt Protected	0.95	1.00		0.95	1.00		0.95	1.00		0.95	1.00	
Satd. Flow (prot)	1623	2986		1580	2796		1716	3462		986	3117	
Flt Permitted	0.58	1.00		0.57	1.00		0.46	1.00		0.35	1.00	
Satd. Flow (perm)	999	2986		947	2796		837	3462		361	3117	
Peak-hour factor, PHF	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00
Adj. Flow (vph)	310	267	32	39	197	29	23	299	31	64	347	165
RTOR Reduction (vph)	0	6	0	0	8	0	0	6	0	0	50	0
Lane Group Flow (vph)	310	293	0	39	218	0	23	324	0	64	462	0
Heavy Vehicles (%)	10%	22%	6%	13%	21%	76%	4%	3%	13%	81%	5%	25%
Turn Type	pm+pt	NA		Perm	NA		Perm	NA		pm+pt	NA	
Protected Phases	5	2			6			4		3	8	
Permitted Phases	2			6			4			8		
Actuated Green, G (s)	84.4	84.4		67.2	67.2		18.4	18.4		31.6	31.6	
Effective Green, g (s)	84.4	84.4		67.2	67.2		18.4	18.4		31.6	31.6	
Actuated g/C Ratio	0.65	0.65		0.52	0.52		0.14	0.14		0.24	0.24	
Clearance Time (s)	3.0	7.0		7.0	7.0		7.0	7.0		3.0	7.0	
Vehicle Extension (s)	3.0	3.0		3.0	3.0		3.0	3.0		3.0	3.0	
Lane Grp Cap (vph)	716	1938		489	1445		118	490		136	757	
v/s Ratio Prot	c0.05	0.10			0.08			0.09		0.04	c0.15	
v/s Ratio Perm	c0.23			0.04			0.03			0.08		
v/c Ratio	0.43	0.15		0.08	0.15		0.19	0.66		0.47	0.61	
Uniform Delay, d1	9.9	8.9		15.8	16.5		49.3	52.8		40.1	43.7	
Progression Factor	1.00	1.00		1.00	1.00		1.00	1.00		1.00	1.00	
Incremental Delay, d2	0.4	0.2		0.3	0.2		0.8	3.3		2.6	1.5	
Delay (s)	10.4	9.0		16.1	16.7		50.1	56.2		42.7	45.2	
Level of Service	B	A		B	B		D	E		D	D	
Approach Delay (s)		9.7			16.6			55.8			44.9	
Approach LOS		A			B			E			D	

Intersection Summary			
HCM 2000 Control Delay	31.0	HCM 2000 Level of Service	C
HCM 2000 Volume to Capacity ratio	0.51		
Actuated Cycle Length (s)	130.0	Sum of lost time (s)	20.0
Intersection Capacity Utilization	72.9%	ICU Level of Service	C
Analysis Period (min)	15		

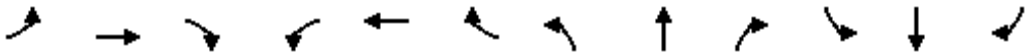
c Critical Lane Group



Movement	EBL	EBT	EBR	WBL	WBT	WBR	NBL	NBT	NBR	SBL	SBT	SBR
Lane Configurations												
Traffic Volume (veh/h)	1	1	1	32	11	119	11	570	51	86	497	5
Future Volume (Veh/h)	1	1	1	32	11	119	11	570	51	86	497	5
Sign Control		Stop			Stop			Free			Free	
Grade		0%			0%			0%			0%	
Peak Hour Factor	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00
Hourly flow rate (vph)	1	1	1	32	11	119	11	570	51	86	497	5
Pedestrians												
Lane Width (m)												
Walking Speed (m/s)												
Percent Blockage												
Right turn flare (veh)												
Median type								TWLTL			None	
Median storage veh)								2				
Upstream signal (m)												
pX, platoon unblocked												
vC, conflicting volume	1103	1314	251	1040	1292	310	502			621		
vC1, stage 1 conf vol	672	672		618	618							
vC2, stage 2 conf vol	432	643		422	674							
vCu, unblocked vol	1103	1314	251	1040	1292	310	502			621		
tC, single (s)	7.5	6.5	6.9	7.9	6.7	7.5	4.6			4.6		
tC, 2 stage (s)	6.5	5.5		6.9	5.7							
tF (s)	3.5	4.0	3.3	3.7	4.1	3.6	2.5			2.4		
p0 queue free %	100	100	100	90	96	80	99			90		
cM capacity (veh/h)	278	302	755	327	311	607	902			826		

Direction, Lane #	EB 1	EB 2	WB 1	WB 2	NB 1	NB 2	NB 3	SB 1	SB 2	SB 3
Volume Total	1	2	32	130	11	380	241	86	331	171
Volume Left	1	0	32	0	11	0	0	86	0	0
Volume Right	0	1	0	119	0	0	51	0	0	5
cSH	278	432	327	562	902	1700	1700	826	1700	1700
Volume to Capacity	0.00	0.00	0.10	0.23	0.01	0.22	0.14	0.10	0.19	0.10
Queue Length 95th (m)	0.1	0.1	2.6	7.1	0.3	0.0	0.0	2.8	0.0	0.0
Control Delay (s)	18.0	13.4	17.2	13.3	9.0	0.0	0.0	9.9	0.0	0.0
Lane LOS	C	B	C	B	A			A		
Approach Delay (s)	14.9		14.1		0.2			1.4		
Approach LOS	B		B							

Intersection Summary				
Average Delay	2.4			
Intersection Capacity Utilization	40.6%	ICU Level of Service		A
Analysis Period (min)	15			



Movement	EBL	EBT	EBR	WBL	WBT	WBR	NBL	NBT	NBR	SBL	SBT	SBR
Lane Configurations												
Traffic Volume (veh/h)	3	117	15	12	143	12	5	4	4	7	3	14
Future Volume (Veh/h)	3	117	15	12	143	12	5	4	4	7	3	14
Sign Control		Free			Free			Stop			Stop	
Grade		0%			0%			0%			0%	
Peak Hour Factor	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00
Hourly flow rate (vph)	3	117	15	12	143	12	5	4	4	7	3	14
Pedestrians											1	
Lane Width (m)											3.7	
Walking Speed (m/s)											1.2	
Percent Blockage											0	
Right turn flare (veh)												
Median type		None			None							
Median storage veh)												
Upstream signal (m)												
pX, platoon unblocked												
vC, conflicting volume	156			132			319	310	124	310	312	150
vC1, stage 1 conf vol												
vC2, stage 2 conf vol												
vCu, unblocked vol	156			132			319	310	124	310	312	150
tC, single (s)	4.1			4.1			7.5	6.8	6.7	7.5	6.8	6.6
tC, 2 stage (s)												
tF (s)	2.2			2.2			3.9	4.2	3.8	3.9	4.3	3.6
p0 queue free %	100			99			99	99	100	99	99	98
cM capacity (veh/h)	1435			1466			550	562	812	558	549	814

Direction, Lane #	EB 1	WB 1	NB 1	SB 1
Volume Total	135	167	13	24
Volume Left	3	12	5	7
Volume Right	15	12	4	14
cSH	1435	1466	615	682
Volume to Capacity	0.00	0.01	0.02	0.04
Queue Length 95th (m)	0.1	0.2	0.5	0.9
Control Delay (s)	0.2	0.6	11.0	10.5
Lane LOS	A	A	B	B
Approach Delay (s)	0.2	0.6	11.0	10.5
Approach LOS			B	B

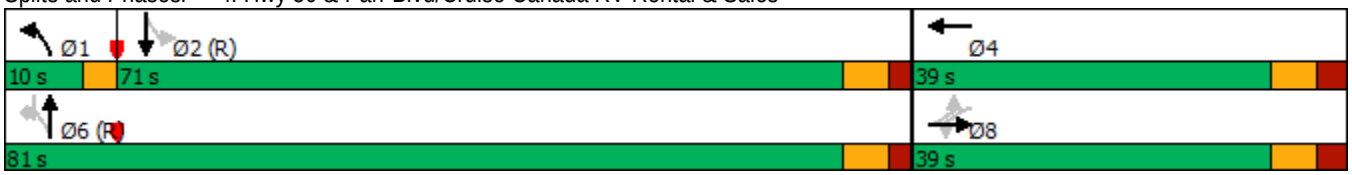
Intersection Summary				
Average Delay	1.5			
Intersection Capacity Utilization	24.4%	ICU Level of Service	A	
Analysis Period (min)	15			

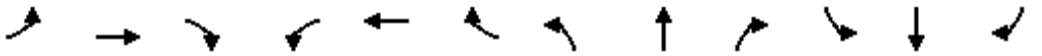
Lane Group	EBL	EBT	WBL	WBT	NBL	NBT	SBT	SBR
Lane Configurations								
Traffic Volume (vph)	27	0	1	0	199	1014	1118	44
Future Volume (vph)	27	0	1	0	199	1014	1118	44
Lane Group Flow (vph)	27	102	0	1	199	1016	1118	44
Turn Type	Perm	NA	D.Pm	NA	pm+pt	NA	NA	custom
Protected Phases		8		4	1	6	2	
Permitted Phases	8		8		6			6
Detector Phase	8	8	8	4	1	6	2	6
Switch Phase								
Minimum Initial (s)	8.0	8.0	8.0	8.0	5.0	12.0	12.0	12.0
Minimum Split (s)	33.9	33.9	33.9	33.9	9.5	30.1	30.1	30.1
Total Split (s)	39.0	39.0	39.0	39.0	10.0	81.0	71.0	81.0
Total Split (%)	32.5%	32.5%	32.5%	32.5%	8.3%	67.5%	59.2%	67.5%
Yellow Time (s)	4.0	4.0	4.0	4.0	3.0	4.0	4.0	4.0
All-Red Time (s)	2.9	2.9	2.9	2.9	0.0	2.1	2.1	2.1
Lost Time Adjust (s)	0.0	0.0		0.0	0.0	0.0	0.0	0.0
Total Lost Time (s)	6.9	6.9		6.9	3.0	6.1	6.1	6.1
Lead/Lag					Lead		Lag	
Lead-Lag Optimize?								
Recall Mode	None	None	None	None	None	C-Max	C-Max	C-Max
v/c Ratio	0.28	0.42		0.01	0.51	0.37	0.50	0.04
Control Delay	59.4	5.8		50.0	6.5	3.4	9.5	1.0
Queue Delay	0.0	0.0		0.0	0.0	0.0	0.0	0.0
Total Delay	59.4	5.8		50.0	6.5	3.4	9.5	1.0
Queue Length 50th (m)	6.5	0.0		0.2	6.1	25.6	56.3	0.3
Queue Length 95th (m)	16.1	1.4		2.1	12.2	38.2	89.2	2.5
Internal Link Dist (m)		828.8		20.9		732.4	332.3	
Turn Bay Length (m)	80.0				35.0			20.0
Base Capacity (vph)	355	439		354	390	2738	2219	1222
Starvation Cap Reductn	0	0		0	0	0	0	0
Spillback Cap Reductn	0	0		0	0	0	0	0
Storage Cap Reductn	0	0		0	0	0	0	0
Reduced v/c Ratio	0.08	0.23		0.00	0.51	0.37	0.50	0.04

Intersection Summary

Cycle Length: 120
Actuated Cycle Length: 120
Offset: 8 (7%), Referenced to phase 2:SBTL and 6:NBTL, Start of Green
Natural Cycle: 90
Control Type: Actuated-Coordinated

Splits and Phases: 4: Hwy 50 & Parr Blvd/Cruise Canada RV Rental & Sales





Movement	EBL	EBT	EBR	WBL	WBT	WBR	NBL	NBT	NBR	SBL	SBT	SBR
Lane Configurations												
Traffic Volume (vph)	27	0	102	1	0	0	199	1014	2	0	1118	44
Future Volume (vph)	27	0	102	1	0	0	199	1014	2	0	1118	44
Ideal Flow (vphpl)	1900	1900	1900	1900	1900	1900	1900	1900	1900	1900	1900	1900
Lane Width	3.5	3.7	3.5	3.5	3.7	3.5	3.5	3.7	3.5	3.5	3.7	3.5
Total Lost time (s)	6.9	6.9			6.9		3.0	6.1			6.1	6.1
Lane Util. Factor	1.00	1.00			1.00		1.00	0.95			0.95	1.00
Frpb, ped/bikes	1.00	1.00			1.00		1.00	1.00			1.00	0.98
Flpb, ped/bikes	1.00	1.00			1.00		1.00	1.00			1.00	1.00
Frt	1.00	0.85			1.00		1.00	1.00			1.00	0.85
Flt Protected	0.95	1.00			0.95		0.95	1.00			1.00	1.00
Satd. Flow (prot)	1668	1183			1825		1513	3348			3147	1487
Flt Permitted	0.76	1.00			0.69		0.21	1.00			1.00	1.00
Satd. Flow (perm)	1330	1183			1328		340	3348			3147	1487
Peak-hour factor, PHF	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00
Adj. Flow (vph)	27	0	102	1	0	0	199	1014	2	0	1118	44
RTOR Reduction (vph)	0	94	0	0	0	0	0	0	0	0	0	6
Lane Group Flow (vph)	27	8	0	0	1	0	199	1016	0	0	1118	38
Confl. Peds. (#/hr)							1		2	2		1
Confl. Bikes (#/hr)									1			
Heavy Vehicles (%)	7%	0%	38%	0%	0%	0%	18%	9%	0%	0%	16%	5%
Turn Type	Perm	NA		D.Pm	NA		pm+pt	NA		Perm	NA	custom
Protected Phases		8			4		1	6			2	
Permitted Phases	8			8			6			2		6
Actuated Green, G (s)	8.9	8.9			8.9		98.1	98.1			84.6	98.1
Effective Green, g (s)	8.9	8.9			8.9		98.1	98.1			84.6	98.1
Actuated g/C Ratio	0.07	0.07			0.07		0.82	0.82			0.70	0.82
Clearance Time (s)	6.9	6.9			6.9		3.0	6.1			6.1	6.1
Vehicle Extension (s)	3.0	3.0			3.0		3.0	3.0			3.0	3.0
Lane Grp Cap (vph)	98	87			98		380	2736			2218	1215
v/s Ratio Prot		0.01					c0.05	0.30			0.36	
v/s Ratio Perm	c0.02				0.00		c0.38					0.03
v/c Ratio	0.28	0.09			0.01		0.52	0.37			0.50	0.03
Uniform Delay, d1	52.5	51.8			51.5		3.9	2.9			8.1	2.1
Progression Factor	1.00	1.00			1.00		1.00	1.00			1.00	1.00
Incremental Delay, d2	1.5	0.4			0.0		1.3	0.4			0.8	0.0
Delay (s)	54.0	52.2			51.5		5.2	3.3			8.9	2.1
Level of Service	D	D			D		A	A			A	A
Approach Delay (s)		52.6			51.5			3.6			8.7	
Approach LOS		D			D			A			A	

Intersection Summary			
HCM 2000 Control Delay	8.5	HCM 2000 Level of Service	A
HCM 2000 Volume to Capacity ratio	0.51		
Actuated Cycle Length (s)	120.0	Sum of lost time (s)	16.0
Intersection Capacity Utilization	62.8%	ICU Level of Service	B
Analysis Period (min)	15		

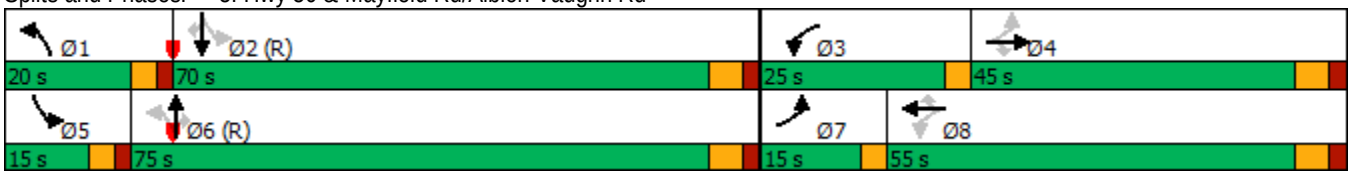
c Critical Lane Group

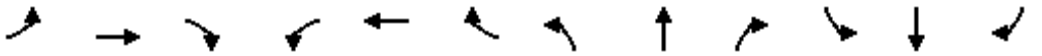
Lane Group	EBL	EBT	EBR	WBL	WBT	WBR	NBL	NBT	NBR	SBL	SBT	SBR
Lane Configurations												
Traffic Volume (vph)	61	93	202	298	140	12	83	1064	165	22	1087	64
Future Volume (vph)	61	93	202	298	140	12	83	1064	165	22	1087	64
Lane Group Flow (vph)	61	93	202	298	140	12	83	1064	165	22	1087	64
Turn Type	pm+pt	NA	Perm	pm+pt	NA	Perm	pm+pt	NA	Perm	pm+pt	NA	Perm
Protected Phases	7	4		3	8		1	6		5	2	
Permitted Phases	4		4	8		8	6		6	2		2
Detector Phase	7	4	4	3	8	8	1	6	6	5	2	2
Switch Phase												
Minimum Initial (s)	5.0	12.0	12.0	10.0	12.0	12.0	10.0	20.0	20.0	10.0	20.0	20.0
Minimum Split (s)	9.5	43.5	43.5	14.5	43.5	43.5	15.0	41.3	41.3	15.0	41.3	41.3
Total Split (s)	15.0	45.0	45.0	25.0	55.0	55.0	20.0	75.0	75.0	15.0	70.0	70.0
Total Split (%)	9.4%	28.1%	28.1%	15.6%	34.4%	34.4%	12.5%	46.9%	46.9%	9.4%	43.8%	43.8%
Yellow Time (s)	3.0	4.0	4.0	3.0	4.0	4.0	3.0	4.2	4.2	3.0	4.2	4.2
All-Red Time (s)	0.0	2.5	2.5	0.0	2.5	2.5	2.0	2.1	2.1	2.0	2.1	2.1
Lost Time Adjust (s)	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
Total Lost Time (s)	3.0	6.5	6.5	3.0	6.5	6.5	5.0	6.3	6.3	5.0	6.3	6.3
Lead/Lag	Lead	Lag	Lag	Lead	Lag	Lag	Lead	Lag	Lag	Lead	Lag	Lag
Lead-Lag Optimize?												
Recall Mode	None	None	None	None	None	None	None	C-Max	C-Max	None	C-Max	C-Max
v/c Ratio	0.25	0.60	0.77	0.84	0.40	0.04	0.41	0.54	0.19	0.08	0.64	0.08
Control Delay	44.4	83.6	30.5	72.1	60.4	0.2	16.9	21.8	5.0	11.5	28.4	1.2
Queue Delay	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
Total Delay	44.4	83.6	30.5	72.1	60.4	0.2	16.9	21.8	5.0	11.5	28.4	1.2
Queue Length 50th (m)	15.5	30.6	6.0	89.6	42.7	0.0	9.2	114.5	4.3	2.3	122.2	0.0
Queue Length 95th (m)	26.1	48.0	36.6	114.4	62.1	0.0	19.9	157.9	18.2	6.9	186.7	2.5
Internal Link Dist (m)		330.4			656.8			717.1			732.4	
Turn Bay Length (m)	60.0		50.0	50.0		50.0	100.0		85.0	35.0		120.0
Base Capacity (vph)	271	352	369	354	544	467	222	1979	889	275	1703	837
Starvation Cap Reductn	0	0	0	0	0	0	0	0	0	0	0	0
Spillback Cap Reductn	0	0	0	0	0	0	0	0	0	0	0	0
Storage Cap Reductn	0	0	0	0	0	0	0	0	0	0	0	0
Reduced v/c Ratio	0.23	0.26	0.55	0.84	0.26	0.03	0.37	0.54	0.19	0.08	0.64	0.08

Intersection Summary

Cycle Length: 160
Actuated Cycle Length: 160
Offset: 27 (17%), Referenced to phase 2:SBTL and 6:NBTL, Start of Green
Natural Cycle: 115
Control Type: Actuated-Coordinated

Splits and Phases: 5: Hwy 50 & Mayfield Rd/Albion Vaughn Rd

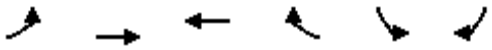




Movement	EBL	EBT	EBR	WBL	WBT	WBR	NBL	NBT	NBR	SBL	SBT	SBR
Lane Configurations												
Traffic Volume (vph)	61	93	202	298	140	12	83	1064	165	22	1087	64
Future Volume (vph)	61	93	202	298	140	12	83	1064	165	22	1087	64
Ideal Flow (vphpl)	1900	1900	1900	1900	1900	1900	1900	1900	1900	1900	1900	1900
Lane Width	3.5	3.7	3.5	3.5	3.7	3.5	3.5	3.7	3.5	3.5	3.7	3.5
Total Lost time (s)	3.0	6.5	6.5	3.0	6.5	6.5	5.0	6.3	6.3	5.0	6.3	6.3
Lane Util. Factor	1.00	1.00	1.00	1.00	1.00	1.00	1.00	0.95	1.00	1.00	0.95	1.00
Frt	1.00	1.00	0.85	1.00	1.00	0.85	1.00	1.00	0.85	1.00	1.00	0.85
Flt Protected	0.95	1.00	1.00	0.95	1.00	1.00	0.95	1.00	1.00	0.95	1.00	1.00
Satd. Flow (prot)	1653	1466	956	1594	1795	1365	1116	3288	1389	1451	3093	1439
Flt Permitted	0.67	1.00	1.00	0.55	1.00	1.00	0.17	1.00	1.00	0.22	1.00	1.00
Satd. Flow (perm)	1162	1466	956	924	1795	1365	201	3288	1389	329	3093	1439
Peak-hour factor, PHF	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00
Adj. Flow (vph)	61	93	202	298	140	12	83	1064	165	22	1087	64
RTOR Reduction (vph)	0	0	163	0	0	10	0	0	56	0	0	29
Lane Group Flow (vph)	61	93	39	298	140	2	83	1064	109	22	1087	35
Heavy Vehicles (%)	8%	31%	67%	12%	7%	17%	60%	11%	15%	23%	18%	11%
Turn Type	pm+pt	NA	Perm	pm+pt	NA	Perm	pm+pt	NA	Perm	pm+pt	NA	Perm
Protected Phases	7	4		3	8		1	6		5	2	
Permitted Phases	4		4	8		8	6		6	2		2
Actuated Green, G (s)	25.7	17.4	17.4	42.4	31.1	31.1	104.8	93.8	93.8	93.6	87.6	87.6
Effective Green, g (s)	25.7	17.4	17.4	42.4	31.1	31.1	104.8	93.8	93.8	93.6	87.6	87.6
Actuated g/C Ratio	0.16	0.11	0.11	0.26	0.19	0.19	0.65	0.59	0.59	0.58	0.55	0.55
Clearance Time (s)	3.0	6.5	6.5	3.0	6.5	6.5	5.0	6.3	6.3	5.0	6.3	6.3
Vehicle Extension (s)	3.0	3.0	3.0	3.0	3.0	3.0	3.0	3.0	3.0	3.0	3.0	3.0
Lane Grp Cap (vph)	212	159	103	336	348	265	201	1927	814	234	1693	787
v/s Ratio Prot	0.01	0.06		c0.12	0.08		c0.03	c0.32		0.00	c0.35	
v/s Ratio Perm	0.03		0.04	c0.11		0.00	0.24		0.08	0.05		0.02
v/c Ratio	0.29	0.58	0.38	0.89	0.40	0.01	0.41	0.55	0.13	0.09	0.64	0.04
Uniform Delay, d1	58.5	67.9	66.3	54.2	56.3	52.0	14.8	20.3	14.9	15.0	25.3	16.8
Progression Factor	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00
Incremental Delay, d2	0.8	5.4	2.3	23.3	0.8	0.0	1.4	1.1	0.3	0.2	1.9	0.1
Delay (s)	59.3	73.3	68.6	77.5	57.1	52.0	16.2	21.4	15.2	15.2	27.1	16.9
Level of Service	E	E	E	E	E	D	B	C	B	B	C	B
Approach Delay (s)		68.2			70.5			20.3			26.4	
Approach LOS		E			E			C			C	

Intersection Summary			
HCM 2000 Control Delay	34.5	HCM 2000 Level of Service	C
HCM 2000 Volume to Capacity ratio	0.71		
Actuated Cycle Length (s)	160.0	Sum of lost time (s)	20.8
Intersection Capacity Utilization	83.1%	ICU Level of Service	E
Analysis Period (min)	15		

c Critical Lane Group



Movement	EBL	EBT	WBT	WBR	SBL	SBR
Lane Configurations						
Traffic Volume (veh/h)	1	361	263	1	1	2
Future Volume (Veh/h)	1	361	263	1	1	2
Sign Control		Free	Free		Stop	
Grade		0%	0%		0%	
Peak Hour Factor	1.00	1.00	1.00	1.00	1.00	1.00
Hourly flow rate (vph)	1	361	263	1	1	2
Pedestrians						
Lane Width (m)						
Walking Speed (m/s)						
Percent Blockage						
Right turn flare (veh)						
Median type		None	None			
Median storage veh)						
Upstream signal (m)		233				
pX, platoon unblocked					0.95	
vC, conflicting volume	264				626	264
vC1, stage 1 conf vol						
vC2, stage 2 conf vol						
vCu, unblocked vol	264				580	264
tC, single (s)	4.1				6.4	7.2
tC, 2 stage (s)						
tF (s)	2.2				3.5	4.2
p0 queue free %	100				100	100
cM capacity (veh/h)	1312				455	588

Direction, Lane #	EB 1	WB 1	SB 1
Volume Total	362	264	3
Volume Left	1	0	1
Volume Right	0	1	2
cSH	1312	1700	536
Volume to Capacity	0.00	0.16	0.01
Queue Length 95th (m)	0.0	0.0	0.1
Control Delay (s)	0.0	0.0	11.8
Lane LOS	A		B
Approach Delay (s)	0.0	0.0	11.8
Approach LOS			B

Intersection Summary			
Average Delay		0.1	
Intersection Capacity Utilization		29.8%	ICU Level of Service
Analysis Period (min)		15	

Movement	WBL	WBR	NBT	NBR	SBL	SBT
Lane Configurations						
Traffic Volume (veh/h)	0	0	617	0	0	539
Future Volume (Veh/h)	0	0	617	0	0	539
Sign Control	Stop		Free			Free
Grade	0%		0%			0%
Peak Hour Factor	1.00	1.00	1.00	1.00	1.00	1.00
Hourly flow rate (vph)	0	0	617	0	0	539
Pedestrians						
Lane Width (m)						
Walking Speed (m/s)						
Percent Blockage						
Right turn flare (veh)						
Median type			TWLTL			TWLTL
Median storage veh)			2			2
Upstream signal (m)						
pX, platoon unblocked						
vC, conflicting volume	886	308			617	
vC1, stage 1 conf vol	617					
vC2, stage 2 conf vol	270					
vCu, unblocked vol	886	308			617	
tC, single (s)	6.8	6.9			4.1	
tC, 2 stage (s)	5.8					
tF (s)	3.5	3.3			2.2	
p0 queue free %	100	100			100	
cM capacity (veh/h)	467	693			973	

Direction, Lane #	WB 1	NB 1	NB 2	SB 1	SB 2
Volume Total	0	411	206	180	359
Volume Left	0	0	0	0	0
Volume Right	0	0	0	0	0
cSH	1700	1700	1700	973	1700
Volume to Capacity	0.00	0.24	0.12	0.00	0.21
Queue Length 95th (m)	0.0	0.0	0.0	0.0	0.0
Control Delay (s)	0.0	0.0	0.0	0.0	0.0
Lane LOS	A				
Approach Delay (s)	0.0	0.0		0.0	
Approach LOS	A				

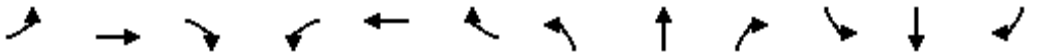
Intersection Summary			
Average Delay	0.0		
Intersection Capacity Utilization	20.4%	ICU Level of Service	A
Analysis Period (min)	15		

Lane Group	EBL	EBT	WBL	WBT	NBL	NBT	SBL	SBT
Lane Configurations								
Traffic Volume (vph)	265	248	26	256	26	510	86	478
Future Volume (vph)	265	248	26	256	26	510	86	478
Lane Group Flow (vph)	265	283	26	333	26	541	86	857
Turn Type	pm+pt	NA	Perm	NA	Perm	NA	pm+pt	NA
Protected Phases	5	2		6		4	3	8
Permitted Phases	2		6		4		8	
Detector Phase	5	2	6	6	4	4	3	8
Switch Phase								
Minimum Initial (s)	5.0	12.0	12.0	12.0	12.0	12.0	5.0	12.0
Minimum Split (s)	9.5	37.0	37.0	37.0	37.0	37.0	12.5	37.0
Total Split (s)	12.0	80.0	68.0	68.0	36.0	36.0	14.0	50.0
Total Split (%)	9.2%	61.5%	52.3%	52.3%	27.7%	27.7%	10.8%	38.5%
Yellow Time (s)	3.0	4.6	4.6	4.6	4.2	4.2	3.0	4.2
All-Red Time (s)	0.0	2.4	2.4	2.4	2.8	2.8	0.0	2.8
Lost Time Adjust (s)	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
Total Lost Time (s)	3.0	7.0	7.0	7.0	7.0	7.0	3.0	7.0
Lead/Lag	Lead		Lag	Lag	Lag	Lag	Lead	
Lead-Lag Optimize?								
Recall Mode	None	C-Max	C-Max	C-Max	None	None	None	None
v/c Ratio	0.46	0.14	0.06	0.25	0.44	0.81	0.51	0.80
Control Delay	14.8	11.3	19.3	17.8	69.8	60.0	41.8	40.2
Queue Delay	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
Total Delay	14.8	11.3	19.3	17.8	69.8	60.0	41.8	40.2
Queue Length 50th (m)	30.9	15.8	3.8	24.2	6.3	73.4	16.6	91.5
Queue Length 95th (m)	50.7	24.6	9.5	34.9	16.7	91.2	28.7	112.1
Internal Link Dist (m)		209.3		209.6		564.3		579.6
Turn Bay Length (m)	100.0		85.0		105.0		145.0	
Base Capacity (vph)	572	1976	464	1351	69	782	175	1192
Starvation Cap Reductn	0	0	0	0	0	0	0	0
Spillback Cap Reductn	0	0	0	0	0	0	0	0
Storage Cap Reductn	0	0	0	0	0	0	0	0
Reduced v/c Ratio	0.46	0.14	0.06	0.25	0.38	0.69	0.49	0.72

Intersection Summary

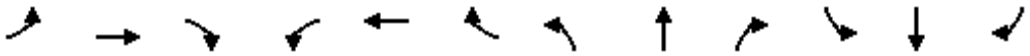
Cycle Length: 130
Actuated Cycle Length: 130
Offset: 116 (89%), Referenced to phase 2:EBTL and 6:WBTL, Start of Green
Natural Cycle: 100
Control Type: Actuated-Coordinated

Splits and Phases: 1: Coleraine Dr & Mayfield Rd



Movement	EBL	EBT	EBR	WBL	WBT	WBR	NBL	NBT	NBR	SBL	SBT	SBR
Lane Configurations												
Traffic Volume (vph)	265	248	35	26	256	77	26	510	31	86	478	379
Future Volume (vph)	265	248	35	26	256	77	26	510	31	86	478	379
Ideal Flow (vphpl)	1900	1900	1900	1900	1900	1900	1900	1900	1900	1900	1900	1900
Lane Width	3.5	3.7	3.5	3.5	3.7	3.5	3.5	3.7	3.5	3.5	3.7	3.5
Total Lost time (s)	3.0	7.0		7.0	7.0		7.0	7.0		3.0	7.0	
Lane Util. Factor	1.00	0.95		1.00	0.95		1.00	0.95		1.00	0.95	
Frpb, ped/bikes	1.00	1.00		1.00	1.00		1.00	1.00		1.00	1.00	
Flpb, ped/bikes	1.00	1.00		1.00	1.00		1.00	1.00		1.00	1.00	
Frt	1.00	0.98		1.00	0.97		1.00	0.99		1.00	0.93	
Flt Protected	0.95	1.00		0.95	1.00		0.95	1.00		0.95	1.00	
Satd. Flow (prot)	1475	3271		1552	2702		1594	3495		1322	3270	
Flt Permitted	0.53	1.00		0.58	1.00		0.19	1.00		0.19	1.00	
Satd. Flow (perm)	816	3271		945	2702		310	3495		270	3270	
Peak-hour factor, PHF	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00
Adj. Flow (vph)	265	248	35	26	256	77	26	510	31	86	478	379
RTOR Reduction (vph)	0	8	0	0	21	0	0	3	0	0	117	0
Lane Group Flow (vph)	265	275	0	26	312	0	26	538	0	86	740	0
Confl. Peds. (#/hr)									1	1		
Heavy Vehicles (%)	21%	10%	6%	15%	17%	75%	12%	3%	10%	35%	2%	7%
Turn Type	pm+pt	NA		Perm	NA		Perm	NA		pm+pt	NA	
Protected Phases	5	2			6			4		3	8	
Permitted Phases	2			6			4			8		
Actuated Green, G (s)	78.3	78.3		64.1	64.1		24.7	24.7		37.7	37.7	
Effective Green, g (s)	78.3	78.3		64.1	64.1		24.7	24.7		37.7	37.7	
Actuated g/C Ratio	0.60	0.60		0.49	0.49		0.19	0.19		0.29	0.29	
Clearance Time (s)	3.0	7.0		7.0	7.0		7.0	7.0		3.0	7.0	
Vehicle Extension (s)	3.0	3.0		3.0	3.0		3.0	3.0		3.0	3.0	
Lane Grp Cap (vph)	548	1970		465	1332		58	664		159	948	
v/s Ratio Prot	c0.04	0.08			0.12			0.15		0.04	c0.23	
v/s Ratio Perm	c0.25			0.03			0.08			0.12		
v/c Ratio	0.48	0.14		0.06	0.23		0.45	0.81		0.54	0.78	
Uniform Delay, d1	12.6	11.2		17.2	18.9		46.6	50.4		36.2	42.4	
Progression Factor	1.00	1.00		1.00	1.00		1.00	1.00		1.00	1.00	
Incremental Delay, d2	0.7	0.1		0.2	0.4		5.4	7.2		3.7	4.2	
Delay (s)	13.3	11.4		17.4	19.3		52.0	57.6		39.9	46.6	
Level of Service	B	B		B	B		D	E		D	D	
Approach Delay (s)		12.3			19.2			57.4			46.0	
Approach LOS		B			B			E			D	

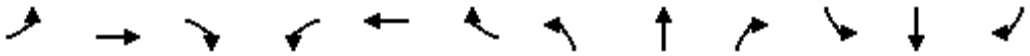
Intersection Summary			
HCM 2000 Control Delay	37.0	HCM 2000 Level of Service	D
HCM 2000 Volume to Capacity ratio	0.61		
Actuated Cycle Length (s)	130.0	Sum of lost time (s)	20.0
Intersection Capacity Utilization	80.9%	ICU Level of Service	D
Analysis Period (min)	15		
c Critical Lane Group			



Movement	EBL	EBT	EBR	WBL	WBT	WBR	NBL	NBT	NBR	SBL	SBT	SBR
Lane Configurations												
Traffic Volume (veh/h)	3	3	13	28	5	95	13	805	20	108	868	4
Future Volume (Veh/h)	3	3	13	28	5	95	13	805	20	108	868	4
Sign Control		Stop			Stop			Free			Free	
Grade		0%			0%			0%			0%	
Peak Hour Factor	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00
Hourly flow rate (vph)	3	3	13	28	5	95	13	805	20	108	868	4
Pedestrians												
Lane Width (m)												
Walking Speed (m/s)												
Percent Blockage												
Right turn flare (veh)												
Median type								TWLTL			None	
Median storage veh)								2				
Upstream signal (m)												
pX, platoon unblocked												
vC, conflicting volume	1612	1937	436	1506	1929	412	872			825		
vC1, stage 1 conf vol	1086	1086		841	841							
vC2, stage 2 conf vol	526	851		664	1088							
vCu, unblocked vol	1612	1937	436	1506	1929	412	872			825		
tC, single (s)	7.5	7.2	7.1	7.9	7.7	7.3	5.8			4.3		
tC, 2 stage (s)	6.5	6.2		6.9	6.7							
tF (s)	3.5	4.3	3.4	3.7	4.6	3.5	3.1			2.3		
p0 queue free %	98	98	98	87	96	83	97			86		
cM capacity (veh/h)	167	139	552	209	128	546	410			746		

Direction, Lane #	EB 1	EB 2	WB 1	WB 2	NB 1	NB 2	NB 3	SB 1	SB 2	SB 3
Volume Total	3	16	28	100	13	537	288	108	579	293
Volume Left	3	0	28	0	13	0	0	108	0	0
Volume Right	0	13	0	95	0	0	20	0	0	4
cSH	167	355	209	470	410	1700	1700	746	1700	1700
Volume to Capacity	0.02	0.05	0.13	0.21	0.03	0.32	0.17	0.14	0.34	0.17
Queue Length 95th (m)	0.4	1.1	3.6	6.4	0.8	0.0	0.0	4.0	0.0	0.0
Control Delay (s)	26.9	15.6	24.8	14.7	14.1	0.0	0.0	10.6	0.0	0.0
Lane LOS	D	C	C	B	B			B		
Approach Delay (s)	17.4		16.9		0.2			1.2		
Approach LOS	C		C							

Intersection Summary				
Average Delay	2.0			
Intersection Capacity Utilization	47.1%	ICU Level of Service	A	
Analysis Period (min)	15			



Movement	EBL	EBT	EBR	WBL	WBT	WBR	NBL	NBT	NBR	SBL	SBT	SBR
Lane Configurations												
Traffic Volume (veh/h)	4	135	8	7	110	14	8	0	8	21	0	9
Future Volume (Veh/h)	4	135	8	7	110	14	8	0	8	21	0	9
Sign Control		Free			Free			Stop			Stop	
Grade		0%			0%			0%			0%	
Peak Hour Factor	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00
Hourly flow rate (vph)	4	135	8	7	110	14	8	0	8	21	0	9
Pedestrians												
Lane Width (m)												
Walking Speed (m/s)												
Percent Blockage												
Right turn flare (veh)												
Median type		None			None							
Median storage veh)												
Upstream signal (m)												
pX, platoon unblocked												
vC, conflicting volume	124			143			287	285	139	286	282	117
vC1, stage 1 conf vol												
vC2, stage 2 conf vol												
vCu, unblocked vol	124			143			287	285	139	286	282	117
tC, single (s)	4.3			4.4			7.2	6.5	6.5	7.2	6.5	6.3
tC, 2 stage (s)												
tF (s)	2.4			2.5			3.6	4.0	3.5	3.6	4.0	3.4
p0 queue free %	100			99			99	100	99	97	100	99
cM capacity (veh/h)	1332			1290			633	622	852	640	625	911

Direction, Lane #	EB 1	WB 1	NB 1	SB 1
Volume Total	147	131	16	30
Volume Left	4	7	8	21
Volume Right	8	14	8	9
cSH	1332	1290	726	703
Volume to Capacity	0.00	0.01	0.02	0.04
Queue Length 95th (m)	0.1	0.1	0.5	1.1
Control Delay (s)	0.2	0.5	10.1	10.3
Lane LOS	A	A	B	B
Approach Delay (s)	0.2	0.5	10.1	10.3
Approach LOS			B	B

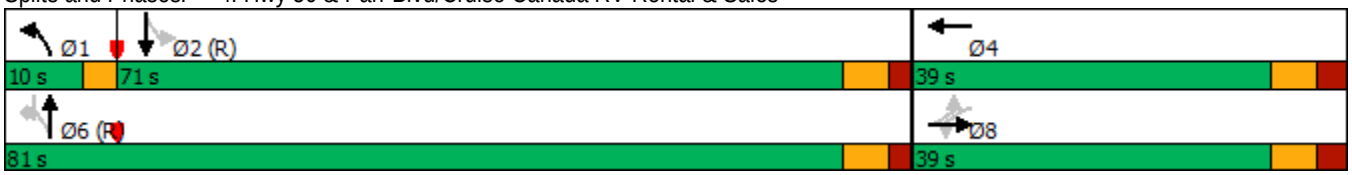
Intersection Summary				
Average Delay	1.7			
Intersection Capacity Utilization	19.9%	ICU Level of Service	A	
Analysis Period (min)	15			

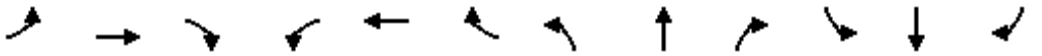
Lane Group	EBL	EBT	WBL	WBT	NBL	NBT	SBL	SBT	SBR
Lane Configurations									
Traffic Volume (vph)	55	0	1	0	113	1244	1	1032	39
Future Volume (vph)	55	0	1	0	113	1244	1	1032	39
Lane Group Flow (vph)	55	170	0	2	113	1244	1	1032	39
Turn Type	Perm	NA	D.Pm	NA	pm+pt	NA	Perm	NA	custom
Protected Phases		8		4	1	6		2	
Permitted Phases	8		8		6		2		6
Detector Phase	8	8	8	4	1	6	2	2	6
Switch Phase									
Minimum Initial (s)	8.0	8.0	8.0	8.0	5.0	12.0	12.0	12.0	12.0
Minimum Split (s)	33.9	33.9	33.9	33.9	9.5	30.1	30.1	30.1	30.1
Total Split (s)	39.0	39.0	39.0	39.0	10.0	81.0	71.0	71.0	81.0
Total Split (%)	32.5%	32.5%	32.5%	32.5%	8.3%	67.5%	59.2%	59.2%	67.5%
Yellow Time (s)	4.0	4.0	4.0	4.0	3.0	4.0	4.0	4.0	4.0
All-Red Time (s)	2.9	2.9	2.9	2.9	0.0	2.1	2.1	2.1	2.1
Lost Time Adjust (s)	0.0	0.0		0.0	0.0	0.0	0.0	0.0	0.0
Total Lost Time (s)	6.9	6.9		6.9	3.0	6.1	6.1	6.1	6.1
Lead/Lag					Lead		Lag	Lag	
Lead-Lag Optimize?									
Recall Mode	None	None	None	None	None	C-Max	C-Max	C-Max	C-Max
v/c Ratio	0.46	0.57		0.01	0.32	0.47	0.00	0.42	0.03
Control Delay	63.2	13.4		0.0	4.5	4.7	6.0	7.9	1.2
Queue Delay	0.0	0.0		0.0	0.0	0.0	0.0	0.0	0.0
Total Delay	63.2	13.4		0.0	4.5	4.7	6.0	7.9	1.2
Queue Length 50th (m)	13.2	0.0		0.0	3.9	40.5	0.1	47.2	0.2
Queue Length 95th (m)	26.4	17.2		0.0	9.1	63.0	0.7	72.2	2.6
Internal Link Dist (m)		828.8		20.9		732.4		332.3	
Turn Bay Length (m)	80.0				35.0		25.0		20.0
Base Capacity (vph)	361	531		371	359	2637	302	2486	1199
Starvation Cap Reductn	0	0		0	0	0	0	0	0
Spillback Cap Reductn	0	0		0	0	0	0	0	0
Storage Cap Reductn	0	0		0	0	0	0	0	0
Reduced v/c Ratio	0.15	0.32		0.01	0.31	0.47	0.00	0.42	0.03

Intersection Summary

Cycle Length: 120
Actuated Cycle Length: 120
Offset: 3 (3%), Referenced to phase 2:SBTL and 6:NBTL, Start of Green
Natural Cycle: 75
Control Type: Actuated-Coordinated

Splits and Phases: 4: Hwy 50 & Parr Blvd/Cruise Canada RV Rental & Sales





Movement	EBL	EBT	EBR	WBL	WBT	WBR	NBL	NBT	NBR	SBL	SBT	SBR
Lane Configurations												
Traffic Volume (vph)	55	0	170	1	0	1	113	1244	0	1	1032	39
Future Volume (vph)	55	0	170	1	0	1	113	1244	0	1	1032	39
Ideal Flow (vphpl)	1900	1900	1900	1900	1900	1900	1900	1900	1900	1900	1900	1900
Lane Width	3.5	3.7	3.5	3.5	3.7	3.5	3.5	3.7	3.5	3.5	3.7	3.5
Total Lost time (s)	6.9	6.9			6.9		3.0	6.1		6.1	6.1	6.1
Lane Util. Factor	1.00	1.00			1.00		1.00	0.95		1.00	0.95	1.00
Frpb, ped/bikes	1.00	1.00			0.99		1.00	1.00		1.00	1.00	0.98
Flpb, ped/bikes	1.00	1.00			1.00		1.00	1.00		1.00	1.00	1.00
Frt	1.00	0.85			0.93		1.00	1.00		1.00	1.00	0.85
Flt Protected	0.95	1.00			0.98		0.95	1.00		0.95	1.00	1.00
Satd. Flow (prot)	1695	1484			1735		1394	3288		1785	3476	1487
Flt Permitted	0.76	1.00			0.70		0.24	1.00		0.22	1.00	1.00
Satd. Flow (perm)	1350	1484			1239		354	3288		422	3476	1487
Peak-hour factor, PHF	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00
Adj. Flow (vph)	55	0	170	1	0	1	113	1244	0	1	1032	39
RTOR Reduction (vph)	0	155	0	0	2	0	0	0	0	0	0	7
Lane Group Flow (vph)	55	15	0	0	0	0	113	1244	0	1	1032	32
Confl. Peds. (#/hr)	2					2	1					1
Heavy Vehicles (%)	5%	0%	10%	0%	0%	0%	28%	11%	0%	0%	5%	5%
Turn Type	Perm	NA		D.Pm	NA		pm+pt	NA		Perm	NA	custom
Protected Phases		8			4		1	6			2	
Permitted Phases	8			8			6			2		6
Actuated Green, G (s)	10.7	10.7			10.7		96.3	96.3		85.9	85.9	96.3
Effective Green, g (s)	10.7	10.7			10.7		96.3	96.3		85.9	85.9	96.3
Actuated g/C Ratio	0.09	0.09			0.09		0.80	0.80		0.72	0.72	0.80
Clearance Time (s)	6.9	6.9			6.9		3.0	6.1		6.1	6.1	6.1
Vehicle Extension (s)	3.0	3.0			3.0		3.0	3.0		3.0	3.0	3.0
Lane Grp Cap (vph)	120	132			110		348	2638		302	2488	1193
v/s Ratio Prot		0.01					0.02	c0.38			0.30	
v/s Ratio Perm	c0.04				0.00		0.24			0.00		0.02
v/c Ratio	0.46	0.11			0.00		0.32	0.47		0.00	0.41	0.03
Uniform Delay, d1	51.9	50.3			49.8		3.3	3.8		4.9	6.9	2.4
Progression Factor	1.00	1.00			1.00		1.00	1.00		1.00	1.00	1.00
Incremental Delay, d2	2.8	0.4			0.0		0.5	0.6		0.0	0.5	0.0
Delay (s)	54.7	50.7			49.8		3.9	4.4		4.9	7.4	2.4
Level of Service	D	D			D		A	A		A	A	A
Approach Delay (s)		51.7			49.8			4.3			7.2	
Approach LOS		D			D			A			A	

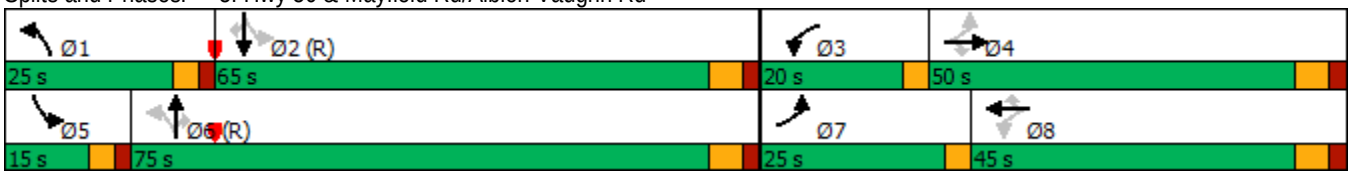
Intersection Summary			
HCM 2000 Control Delay	9.5	HCM 2000 Level of Service	A
HCM 2000 Volume to Capacity ratio	0.48		
Actuated Cycle Length (s)	120.0	Sum of lost time (s)	16.0
Intersection Capacity Utilization	70.8%	ICU Level of Service	C
Analysis Period (min)	15		
c Critical Lane Group			

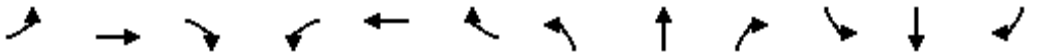
Lane Group	EBL	EBT	EBR	WBL	WBT	WBR	NBL	NBT	NBR	SBL	SBT	SBR
Lane Configurations												
Traffic Volume (vph)	83	105	231	193	84	17	86	1111	378	20	1119	73
Future Volume (vph)	83	105	231	193	84	17	86	1111	378	20	1119	73
Lane Group Flow (vph)	83	105	231	193	84	17	86	1111	378	20	1119	73
Turn Type	pm+pt	NA	Perm	pm+pt	NA	Perm	pm+pt	NA	Perm	pm+pt	NA	Perm
Protected Phases	7	4		3	8		1	6		5	2	
Permitted Phases	4		4	8		8	6		6	2		2
Detector Phase	7	4	4	3	8	8	1	6	6	5	2	2
Switch Phase												
Minimum Initial (s)	5.0	12.0	12.0	10.0	12.0	12.0	10.0	20.0	20.0	10.0	20.0	20.0
Minimum Split (s)	9.5	43.5	43.5	14.5	43.5	43.5	15.0	41.3	41.3	15.0	41.3	41.3
Total Split (s)	25.0	50.0	50.0	20.0	45.0	45.0	25.0	75.0	75.0	15.0	65.0	65.0
Total Split (%)	15.6%	31.3%	31.3%	12.5%	28.1%	28.1%	15.6%	46.9%	46.9%	9.4%	40.6%	40.6%
Yellow Time (s)	3.0	4.0	4.0	3.0	4.0	4.0	3.0	4.2	4.2	3.0	4.2	4.2
All-Red Time (s)	0.0	2.5	2.5	0.0	2.5	2.5	2.0	2.1	2.1	2.0	2.1	2.1
Lost Time Adjust (s)	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
Total Lost Time (s)	3.0	6.5	6.5	3.0	6.5	6.5	5.0	6.3	6.3	5.0	6.3	6.3
Lead/Lag	Lead	Lag	Lag	Lead	Lag	Lag	Lead	Lag	Lag	Lead	Lag	Lag
Lead-Lag Optimize?												
Recall Mode	None	None	None	None	None	None	None	C-Max	C-Max	None	C-Max	C-Max
v/c Ratio	0.30	0.62	0.70	0.69	0.49	0.06	0.40	0.54	0.36	0.07	0.57	0.08
Control Delay	50.2	84.9	18.9	65.6	74.7	0.4	13.8	18.3	4.5	9.1	24.0	0.2
Queue Delay	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
Total Delay	50.2	84.9	18.9	65.6	74.7	0.4	13.8	18.3	4.5	9.1	24.0	0.2
Queue Length 50th (m)	22.3	34.5	0.0	56.3	26.6	0.0	8.5	113.2	11.0	1.8	118.1	0.0
Queue Length 95th (m)	36.8	54.7	28.9	79.4	45.7	0.0	16.9	147.3	31.5	5.4	170.4	0.0
Internal Link Dist (m)		330.4			656.8			717.1			732.4	
Turn Bay Length (m)	60.0		50.0	50.0		50.0	100.0		85.0	35.0		120.0
Base Capacity (vph)	379	470	512	281	318	398	245	2061	1057	282	1970	950
Starvation Cap Reductn	0	0	0	0	0	0	0	0	0	0	0	0
Spillback Cap Reductn	0	0	0	0	0	0	0	0	0	0	0	0
Storage Cap Reductn	0	0	0	0	0	0	0	0	0	0	0	0
Reduced v/c Ratio	0.22	0.22	0.45	0.69	0.26	0.04	0.35	0.54	0.36	0.07	0.57	0.08

Intersection Summary

Cycle Length: 160
Actuated Cycle Length: 160
Offset: 72 (45%), Referenced to phase 2:SBTL and 6:NBTL, Start of Green
Natural Cycle: 115
Control Type: Actuated-Coordinated

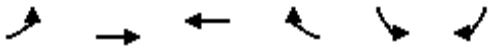
Splits and Phases: 5: Hwy 50 & Mayfield Rd/Albion Vaughn Rd





Movement	EBL	EBT	EBR	WBL	WBT	WBR	NBL	NBT	NBR	SBL	SBT	SBR
Lane Configurations												
Traffic Volume (vph)	83	105	231	193	84	17	86	1111	378	20	1119	73
Future Volume (vph)	83	105	231	193	84	17	86	1111	378	20	1119	73
Ideal Flow (vphpl)	1900	1900	1900	1900	1900	1900	1900	1900	1900	1900	1900	1900
Lane Width	3.5	3.7	3.5	3.5	3.7	3.5	3.5	3.7	3.5	3.5	3.7	3.5
Total Lost time (s)	3.0	6.5	6.5	3.0	6.5	6.5	5.0	6.3	6.3	5.0	6.3	6.3
Lane Util. Factor	1.00	1.00	1.00	1.00	1.00	1.00	1.00	0.95	1.00	1.00	0.95	1.00
Frpb, ped/bikes	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	0.98
Flpb, ped/bikes	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00
Frt	1.00	1.00	0.85	1.00	1.00	0.85	1.00	1.00	0.85	1.00	1.00	0.85
Flt Protected	0.95	1.00	1.00	0.95	1.00	1.00	0.95	1.00	1.00	0.95	1.00	1.00
Satd. Flow (prot)	1767	1731	1268	1608	1325	1238	1056	3202	1479	1428	3411	1549
Flt Permitted	0.70	1.00	1.00	0.49	1.00	1.00	0.17	1.00	1.00	0.22	1.00	1.00
Satd. Flow (perm)	1307	1731	1268	825	1325	1238	191	3202	1479	329	3411	1549
Peak-hour factor, PHF	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00
Adj. Flow (vph)	83	105	231	193	84	17	86	1111	378	20	1119	73
RTOR Reduction (vph)	0	0	208	0	0	15	0	0	109	0	0	31
Lane Group Flow (vph)	83	105	23	193	84	2	86	1111	269	20	1119	42
Confl. Bikes (#/hr)												1
Heavy Vehicles (%)	1%	11%	26%	11%	45%	29%	69%	14%	8%	25%	7%	1%
Turn Type	pm+pt	NA	Perm	pm+pt	NA	Perm	pm+pt	NA	Perm	pm+pt	NA	Perm
Protected Phases	7	4		3	8		1	6		5	2	
Permitted Phases	4		4	8		8	6		6	2		2
Actuated Green, G (s)	27.0	15.6	15.6	35.2	20.8	20.8	112.0	101.0	101.0	98.4	92.4	92.4
Effective Green, g (s)	27.0	15.6	15.6	35.2	20.8	20.8	112.0	101.0	101.0	98.4	92.4	92.4
Actuated g/C Ratio	0.17	0.10	0.10	0.22	0.13	0.13	0.70	0.63	0.63	0.62	0.58	0.58
Clearance Time (s)	3.0	6.5	6.5	3.0	6.5	6.5	5.0	6.3	6.3	5.0	6.3	6.3
Vehicle Extension (s)	3.0	3.0	3.0	3.0	3.0	3.0	3.0	3.0	3.0	3.0	3.0	3.0
Lane Grp Cap (vph)	253	168	123	262	172	160	212	2021	933	243	1969	894
v/s Ratio Prot	0.02	0.06		c0.08	0.06		c0.04	c0.35		0.00	c0.33	
v/s Ratio Perm	0.03		0.02	c0.09		0.00	0.25		0.18	0.05		0.03
v/c Ratio	0.33	0.62	0.18	0.74	0.49	0.01	0.41	0.55	0.29	0.08	0.57	0.05
Uniform Delay, d1	58.0	69.4	66.3	55.5	64.7	60.7	12.3	16.7	13.3	12.6	21.3	14.7
Progression Factor	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00
Incremental Delay, d2	0.8	7.1	0.7	10.3	2.2	0.0	1.3	1.1	0.8	0.1	1.2	0.1
Delay (s)	58.8	76.5	67.1	65.8	66.8	60.7	13.6	17.7	14.1	12.8	22.5	14.8
Level of Service	E	E	E	E	E	E	B	B	B	B	C	B
Approach Delay (s)		67.8			65.8			16.6			21.8	
Approach LOS		E			E			B			C	

Intersection Summary			
HCM 2000 Control Delay	28.7	HCM 2000 Level of Service	C
HCM 2000 Volume to Capacity ratio	0.61		
Actuated Cycle Length (s)	160.0	Sum of lost time (s)	20.8
Intersection Capacity Utilization	71.5%	ICU Level of Service	C
Analysis Period (min)	15		
c Critical Lane Group			



Movement	EBL	EBT	WBT	WBR	SBL	SBR
Lane Configurations						
Traffic Volume (veh/h)	5	360	354	3	7	5
Future Volume (Veh/h)	5	360	354	3	7	5
Sign Control		Free	Free		Stop	
Grade		0%	0%		0%	
Peak Hour Factor	1.00	1.00	1.00	1.00	1.00	1.00
Hourly flow rate (vph)	5	360	354	3	7	5
Pedestrians						
Lane Width (m)						
Walking Speed (m/s)						
Percent Blockage						
Right turn flare (veh)						
Median type		None	None			
Median storage veh)						
Upstream signal (m)		233				
pX, platoon unblocked					0.93	
vC, conflicting volume	357				726	356
vC1, stage 1 conf vol						
vC2, stage 2 conf vol						
vCu, unblocked vol	357				671	356
tC, single (s)	4.7				6.7	6.4
tC, 2 stage (s)						
tF (s)	2.7				3.8	3.5
p0 queue free %	99				98	99
cM capacity (veh/h)	941				356	650

Direction, Lane #	EB 1	WB 1	SB 1
Volume Total	365	357	12
Volume Left	5	0	7
Volume Right	0	3	5
cSH	941	1700	438
Volume to Capacity	0.01	0.21	0.03
Queue Length 95th (m)	0.1	0.0	0.7
Control Delay (s)	0.2	0.0	13.4
Lane LOS	A		B
Approach Delay (s)	0.2	0.0	13.4
Approach LOS			B

Intersection Summary			
Average Delay	0.3		
Intersection Capacity Utilization	32.9%	ICU Level of Service	A
Analysis Period (min)	15		

Movement	WBL	WBR	NBT	NBR	SBL	SBT
Lane Configurations						
Traffic Volume (veh/h)	0	0	820	1	0	913
Future Volume (Veh/h)	0	0	820	1	0	913
Sign Control	Stop		Free			Free
Grade	0%		0%			0%
Peak Hour Factor	1.00	1.00	1.00	1.00	1.00	1.00
Hourly flow rate (vph)	0	0	820	1	0	913
Pedestrians						
Lane Width (m)						
Walking Speed (m/s)						
Percent Blockage						
Right turn flare (veh)						
Median type			TWLTL			TWLTL
Median storage veh)			2			2
Upstream signal (m)						
pX, platoon unblocked						
vC, conflicting volume	1277	410			821	
vC1, stage 1 conf vol	820					
vC2, stage 2 conf vol	456					
vCu, unblocked vol	1277	410			821	
tC, single (s)	6.8	6.9			4.1	
tC, 2 stage (s)	5.8					
tF (s)	3.5	3.3			2.2	
p0 queue free %	100	100			100	
cM capacity (veh/h)	353	596			817	

Direction, Lane #	WB 1	NB 1	NB 2	SB 1	SB 2
Volume Total	0	547	274	304	609
Volume Left	0	0	0	0	0
Volume Right	0	0	1	0	0
cSH	1700	1700	1700	817	1700
Volume to Capacity	0.00	0.32	0.16	0.00	0.36
Queue Length 95th (m)	0.0	0.0	0.0	0.0	0.0
Control Delay (s)	0.0	0.0	0.0	0.0	0.0
Lane LOS	A				
Approach Delay (s)	0.0	0.0		0.0	
Approach LOS	A				

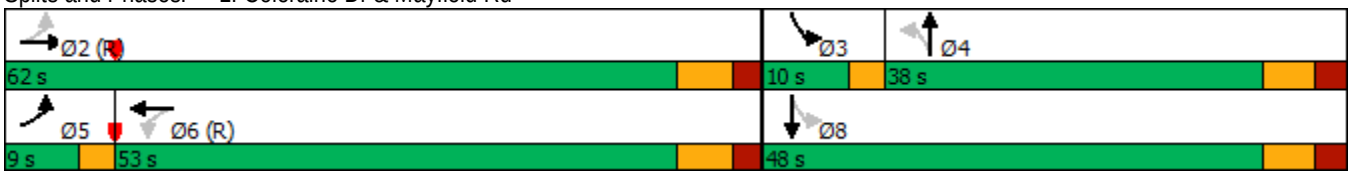
Intersection Summary			
Average Delay	0.0		
Intersection Capacity Utilization	28.6%	ICU Level of Service	A
Analysis Period (min)	15		

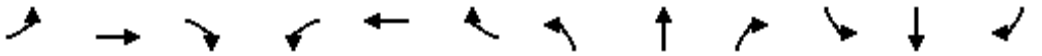
Lane Group	EBL	EBT	WBL	WBT	NBL	NBT	SBL	SBT
Lane Configurations								
Traffic Volume (vph)	99	274	2	273	6	11	90	0
Future Volume (vph)	99	274	2	273	6	11	90	0
Lane Group Flow (vph)	99	275	2	333	6	11	90	149
Turn Type	pm+pt	NA	Perm	NA	Perm	NA	pm+pt	NA
Protected Phases	5	2		6		4	3	8
Permitted Phases	2		6		4		8	
Detector Phase	5	2	6	6	4	4	3	8
Switch Phase								
Minimum Initial (s)	5.0	12.0	12.0	12.0	12.0	12.0	5.0	12.0
Minimum Split (s)	9.5	37.0	37.0	37.0	37.0	37.0	12.5	37.0
Total Split (s)	9.0	62.0	53.0	53.0	38.0	38.0	10.0	48.0
Total Split (%)	8.2%	56.4%	48.2%	48.2%	34.5%	34.5%	9.1%	43.6%
Yellow Time (s)	3.0	4.6	4.6	4.6	4.2	4.2	3.0	4.2
All-Red Time (s)	0.0	2.4	2.4	2.4	2.8	2.8	0.0	2.8
Lost Time Adjust (s)	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
Total Lost Time (s)	3.0	7.0	7.0	7.0	7.0	7.0	3.0	7.0
Lead/Lag	Lead		Lag	Lag	Lag	Lag	Lead	
Lead-Lag Optimize?								
Recall Mode	None	C-Max	C-Max	C-Max	None	None	None	None
v/c Ratio	0.15	0.11	0.01	0.16	0.04	0.03	0.42	0.17
Control Delay	4.5	5.1	10.5	8.6	44.8	44.1	44.2	0.4
Queue Delay	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
Total Delay	4.5	5.1	10.5	8.6	44.8	44.1	44.2	0.4
Queue Length 50th (m)	3.8	7.0	0.1	11.7	1.2	1.2	18.7	0.0
Queue Length 95th (m)	11.4	15.3	1.4	24.4	5.4	4.1	31.3	0.0
Internal Link Dist (m)		209.3		209.6		564.3		579.6
Turn Bay Length (m)	100.0		85.0		105.0		145.0	
Base Capacity (vph)	675	2455	346	2058	348	1028	214	1420
Starvation Cap Reductn	0	0	0	0	0	0	0	0
Spillback Cap Reductn	0	0	0	0	0	0	0	0
Storage Cap Reductn	0	0	0	0	0	0	0	0
Reduced v/c Ratio	0.15	0.11	0.01	0.16	0.02	0.01	0.42	0.10

Intersection Summary

Cycle Length: 110
Actuated Cycle Length: 110
Offset: 48 (44%), Referenced to phase 2:EBTL and 6:WBTL, Start of Green
Natural Cycle: 100
Control Type: Actuated-Coordinated

Splits and Phases: 1: Coleraine Dr & Mayfield Rd

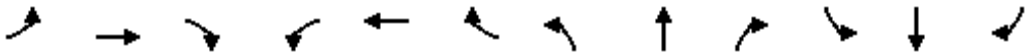




Movement	EBL	EBT	EBR	WBL	WBT	WBR	NBL	NBT	NBR	SBL	SBT	SBR
Lane Configurations												
Traffic Volume (vph)	99	274	1	2	273	60	6	11	0	90	0	149
Future Volume (vph)	99	274	1	2	273	60	6	11	0	90	0	149
Ideal Flow (vphpl)	1900	1900	1900	1900	1900	1900	1900	1900	1900	1900	1900	1900
Lane Width	3.5	3.7	3.5	3.5	3.7	3.5	3.5	3.7	3.5	3.5	3.7	3.5
Total Lost time (s)	3.0	7.0		7.0	7.0		7.0	7.0		3.0	7.0	
Lane Util. Factor	1.00	0.95		1.00	0.95		1.00	0.95		1.00	0.95	
Frt	1.00	1.00		1.00	0.97		1.00	1.00		1.00	0.85	
Flt Protected	0.95	1.00		0.95	1.00		0.95	1.00		0.95	1.00	
Satd. Flow (prot)	1487	3379		892	3241		1785	3650		1487	2900	
Flt Permitted	0.53	1.00		0.58	1.00		0.66	1.00		0.53	1.00	
Satd. Flow (perm)	825	3379		547	3241		1235	3650		829	2900	
Peak-hour factor, PHF	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00
Adj. Flow (vph)	99	274	1	2	273	60	6	11	0	90	0	149
RTOR Reduction (vph)	0	0	0	0	12	0	0	0	0	0	123	0
Lane Group Flow (vph)	99	275	0	2	321	0	6	11	0	90	26	0
Heavy Vehicles (%)	20%	8%	0%	100%	4%	35%	0%	0%	0%	20%	0%	7%
Turn Type	pm+pt	NA		Perm	NA		Perm	NA		pm+pt	NA	
Protected Phases	5	2			6			4		3	8	
Permitted Phases	2			6			4			8		
Actuated Green, G (s)	76.6	76.6		66.1	66.1		7.2	7.2		19.4	19.4	
Effective Green, g (s)	76.6	76.6		66.1	66.1		7.2	7.2		19.4	19.4	
Actuated g/C Ratio	0.70	0.70		0.60	0.60		0.07	0.07		0.18	0.18	
Clearance Time (s)	3.0	7.0		7.0	7.0		7.0	7.0		3.0	7.0	
Vehicle Extension (s)	3.0	3.0		3.0	3.0		3.0	3.0		3.0	3.0	
Lane Grp Cap (vph)	619	2353		328	1947		80	238		201	511	
v/s Ratio Prot	c0.01	0.08			0.10			0.00		c0.04	0.01	
v/s Ratio Perm	c0.10			0.00			0.00			c0.04		
v/c Ratio	0.16	0.12		0.01	0.17		0.07	0.05		0.45	0.05	
Uniform Delay, d1	5.5	5.5		8.8	9.7		48.3	48.2		39.8	37.7	
Progression Factor	1.00	1.00		1.00	1.00		1.00	1.00		1.00	1.00	
Incremental Delay, d2	0.1	0.1		0.0	0.2		0.4	0.1		1.6	0.0	
Delay (s)	5.6	5.6		8.8	9.9		48.7	48.3		41.3	37.7	
Level of Service	A	A		A	A		D	D		D	D	
Approach Delay (s)		5.6			9.9			48.4			39.1	
Approach LOS		A			A			D			D	

Intersection Summary			
HCM 2000 Control Delay	16.1	HCM 2000 Level of Service	B
HCM 2000 Volume to Capacity ratio	0.23		
Actuated Cycle Length (s)	110.0	Sum of lost time (s)	20.0
Intersection Capacity Utilization	49.2%	ICU Level of Service	A
Analysis Period (min)	15		

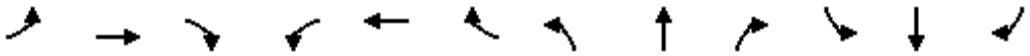
c Critical Lane Group



Movement	EBL	EBT	EBR	WBL	WBT	WBR	NBL	NBT	NBR	SBL	SBT	SBR
Lane Configurations												
Traffic Volume (veh/h)	1	3	1	15	1	27	1	139	3	22	189	2
Future Volume (Veh/h)	1	3	1	15	1	27	1	139	3	22	189	2
Sign Control		Stop			Stop			Free			Free	
Grade		0%			0%			0%			0%	
Peak Hour Factor	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00
Hourly flow rate (vph)	1	3	1	15	1	27	1	139	3	22	189	2
Pedestrians												
Lane Width (m)												
Walking Speed (m/s)												
Percent Blockage												
Right turn flare (veh)												
Median type								TWLTL			None	
Median storage veh)								2				
Upstream signal (m)												
pX, platoon unblocked												
vC, conflicting volume	333	378	96	284	378	71	191			142		
vC1, stage 1 conf vol	234	234		142	142							
vC2, stage 2 conf vol	99	144		141	235							
vCu, unblocked vol	333	378	96	284	378	71	191			142		
tC, single (s)	7.5	6.5	6.9	7.6	8.5	7.3	4.1			4.5		
tC, 2 stage (s)	6.5	5.5		6.6	7.5							
tF (s)	3.5	4.0	3.3	3.6	5.0	3.5	2.2			2.4		
p0 queue free %	100	100	100	98	100	97	100			98		
cM capacity (veh/h)	694	650	949	738	470	925	1395			1329		

Direction, Lane #	EB 1	EB 2	WB 1	WB 2	NB 1	NB 2	NB 3	SB 1	SB 2	SB 3
Volume Total	1	4	15	28	1	93	49	22	126	65
Volume Left	1	0	15	0	1	0	0	22	0	0
Volume Right	0	1	0	27	0	0	3	0	0	2
cSH	694	706	738	894	1395	1700	1700	1329	1700	1700
Volume to Capacity	0.00	0.01	0.02	0.03	0.00	0.05	0.03	0.02	0.07	0.04
Queue Length 95th (m)	0.0	0.1	0.5	0.8	0.0	0.0	0.0	0.4	0.0	0.0
Control Delay (s)	10.2	10.1	10.0	9.2	7.6	0.0	0.0	7.8	0.0	0.0
Lane LOS	B	B	A	A	A			A		
Approach Delay (s)	10.1		9.4		0.1			0.8		
Approach LOS	B		A							

Intersection Summary				
Average Delay	1.6			
Intersection Capacity Utilization	26.1%	ICU Level of Service	A	
Analysis Period (min)	15			



Movement	EBL	EBT	EBR	WBL	WBT	WBR	NBL	NBT	NBR	SBL	SBT	SBR
Lane Configurations												
Traffic Volume (veh/h)	0	27	1	3	34	3	3	1	5	4	2	5
Future Volume (Veh/h)	0	27	1	3	34	3	3	1	5	4	2	5
Sign Control		Free			Free			Stop			Stop	
Grade		0%			0%			0%			0%	
Peak Hour Factor	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00
Hourly flow rate (vph)	0	27	1	3	34	3	3	1	5	4	2	5
Pedestrians												
Lane Width (m)												
Walking Speed (m/s)												
Percent Blockage												
Right turn flare (veh)												
Median type		None			None							
Median storage veh)												
Upstream signal (m)												
pX, platoon unblocked												
vC, conflicting volume	37			28			75	70	28	74	70	36
vC1, stage 1 conf vol												
vC2, stage 2 conf vol												
vCu, unblocked vol	37			28			75	70	28	74	70	36
tC, single (s)	4.1			4.1			7.4	6.5	6.4	7.1	7.0	6.2
tC, 2 stage (s)												
tF (s)	2.2			2.2			3.8	4.0	3.5	3.5	4.5	3.3
p0 queue free %	100			100			100	100	99	100	100	100
cM capacity (veh/h)	1587			1599			838	822	998	914	736	1043

Direction, Lane #	EB 1	WB 1	NB 1	SB 1
Volume Total	28	40	9	11
Volume Left	0	3	3	4
Volume Right	1	3	5	5
cSH	1587	1599	918	925
Volume to Capacity	0.00	0.00	0.01	0.01
Queue Length 95th (m)	0.0	0.0	0.2	0.3
Control Delay (s)	0.0	0.6	9.0	8.9
Lane LOS		A	A	A
Approach Delay (s)	0.0	0.6	9.0	8.9
Approach LOS			A	A

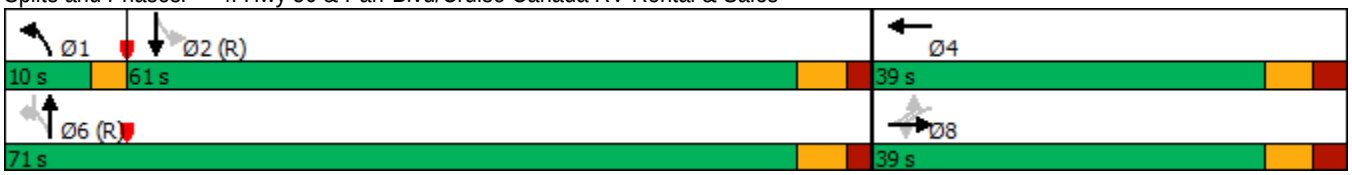
Intersection Summary				
Average Delay	2.3			
Intersection Capacity Utilization	14.5%	ICU Level of Service	A	
Analysis Period (min)	15			

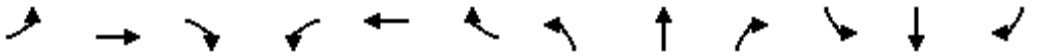
Lane Group	EBL	EBT	WBL	WBT	NBL	NBT	SBL	SBT	SBR
Lane Configurations									
Traffic Volume (vph)	19	0	4	2	35	969	6	955	18
Future Volume (vph)	19	0	4	2	35	969	6	955	18
Lane Group Flow (vph)	19	41	0	8	35	969	6	955	18
Turn Type	Perm	NA	D.Pm	NA	pm+pt	NA	Perm	NA	custom
Protected Phases		8		4	1	6		2	
Permitted Phases	8		8		6		2		6
Detector Phase	8	8	8	4	1	6	2	2	6
Switch Phase									
Minimum Initial (s)	8.0	8.0	8.0	8.0	5.0	12.0	12.0	12.0	12.0
Minimum Split (s)	33.9	33.9	33.9	33.9	9.5	30.1	30.1	30.1	30.1
Total Split (s)	39.0	39.0	39.0	39.0	10.0	71.0	61.0	61.0	71.0
Total Split (%)	35.5%	35.5%	35.5%	35.5%	9.1%	64.5%	55.5%	55.5%	64.5%
Yellow Time (s)	4.0	4.0	4.0	4.0	3.0	4.0	4.0	4.0	4.0
All-Red Time (s)	2.9	2.9	2.9	2.9	0.0	2.1	2.1	2.1	2.1
Lost Time Adjust (s)	0.0	0.0		0.0	0.0	0.0	0.0	0.0	0.0
Total Lost Time (s)	6.9	6.9		6.9	3.0	6.1	6.1	6.1	6.1
Lead/Lag					Lead		Lag	Lag	
Lead-Lag Optimize?									
Recall Mode	None	None	None	None	None	C-Max	C-Max	C-Max	C-Max
v/c Ratio	0.18	0.14		0.10	0.08	0.33	0.02	0.34	0.01
Control Delay	52.6	1.0		44.8	1.9	2.8	4.7	4.9	0.2
Queue Delay	0.0	0.0		0.0	0.0	0.0	0.0	0.0	0.0
Total Delay	52.6	1.0		44.8	1.9	2.8	4.7	4.9	0.2
Queue Length 50th (m)	4.1	0.0		1.3	0.9	23.6	0.3	36.3	0.0
Queue Length 95th (m)	12.2	0.0		6.5	2.6	32.3	1.6	49.5	0.5
Internal Link Dist (m)		828.8		20.9		732.4		332.3	
Turn Bay Length (m)	80.0				35.0		25.0		20.0
Base Capacity (vph)	411	566		296	473	2936	295	2817	1325
Starvation Cap Reductn	0	0		0	0	0	0	0	0
Spillback Cap Reductn	0	0		0	0	0	0	0	0
Storage Cap Reductn	0	0		0	0	0	0	0	0
Reduced v/c Ratio	0.05	0.07		0.03	0.07	0.33	0.02	0.34	0.01

Intersection Summary

Cycle Length: 110
Actuated Cycle Length: 110
Offset: 105 (95%), Referenced to phase 2:SBTL and 6:NBTL, Start of Green
Natural Cycle: 75
Control Type: Actuated-Coordinated

Splits and Phases: 4: Hwy 50 & Parr Blvd/Cruise Canada RV Rental & Sales





Movement	EBL	EBT	EBR	WBL	WBT	WBR	NBL	NBT	NBR	SBL	SBT	SBR
Lane Configurations												
Traffic Volume (vph)	19	0	41	4	2	2	35	969	0	6	955	18
Future Volume (vph)	19	0	41	4	2	2	35	969	0	6	955	18
Ideal Flow (vphpl)	1900	1900	1900	1900	1900	1900	1900	1900	1900	1900	1900	1900
Lane Width	3.5	3.7	3.5	3.5	3.7	3.5	3.5	3.7	3.5	3.5	3.7	3.5
Total Lost time (s)	6.9	6.9			6.9		3.0	6.1		6.1	6.1	6.1
Lane Util. Factor	1.00	1.00			1.00		1.00	0.95		1.00	0.95	1.00
Frpb, ped/bikes	1.00	1.00			1.00		1.00	1.00		1.00	1.00	0.98
Flpb, ped/bikes	1.00	1.00			1.00		1.00	1.00		1.00	1.00	1.00
Frt	1.00	0.85			0.97		1.00	1.00		1.00	1.00	0.85
Flt Protected	0.95	1.00			0.98		0.95	1.00		0.95	1.00	1.00
Satd. Flow (prot)	1783	1458			1203		1608	3476		1189	3544	1562
Flt Permitted	0.75	1.00			0.82		0.28	1.00		0.30	1.00	1.00
Satd. Flow (perm)	1412	1458			1012		465	3476		370	3544	1562
Peak-hour factor, PHF	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00
Adj. Flow (vph)	19	0	41	4	2	2	35	969	0	6	955	18
RTOR Reduction (vph)	0	39	0	0	2	0	0	0	0	0	0	3
Lane Group Flow (vph)	19	2	0	0	6	0	35	969	0	6	955	15
Confl. Peds. (#/hr)	1					1	1		1	1		1
Heavy Vehicles (%)	0%	0%	12%	25%	100%	50%	11%	5%	0%	50%	3%	0%
Turn Type	Perm	NA		D.Pm	NA		pm+pt	NA		Perm	NA	custom
Protected Phases		8			4		1	6			2	
Permitted Phases	8			8			6			2		6
Actuated Green, G (s)	6.7	6.7			6.7		90.3	90.3		83.6	83.6	90.3
Effective Green, g (s)	6.7	6.7			6.7		90.3	90.3		83.6	83.6	90.3
Actuated g/C Ratio	0.06	0.06			0.06		0.82	0.82		0.76	0.76	0.82
Clearance Time (s)	6.9	6.9			6.9		3.0	6.1		6.1	6.1	6.1
Vehicle Extension (s)	3.0	3.0			3.0		3.0	3.0		3.0	3.0	3.0
Lane Grp Cap (vph)	86	88			61		420	2853		281	2693	1282
v/s Ratio Prot		0.00					0.00	c0.28			c0.27	
v/s Ratio Perm	c0.01				0.01		0.07			0.02		0.01
v/c Ratio	0.22	0.03			0.10		0.08	0.34		0.02	0.35	0.01
Uniform Delay, d1	49.2	48.6			48.8		2.1	2.4		3.2	4.3	1.8
Progression Factor	1.02	1.00			1.00		1.00	1.00		1.00	1.00	1.00
Incremental Delay, d2	1.3	0.1			0.7		0.1	0.3		0.1	0.4	0.0
Delay (s)	51.4	48.7			49.5		2.1	2.8		3.4	4.7	1.8
Level of Service	D	D			D		A	A		A	A	A
Approach Delay (s)		49.6			49.5			2.7			4.6	
Approach LOS		D			D			A			A	

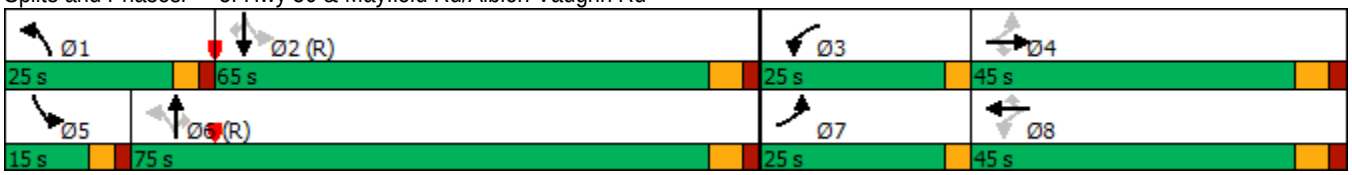
Intersection Summary			
HCM 2000 Control Delay	5.2	HCM 2000 Level of Service	A
HCM 2000 Volume to Capacity ratio	0.35		
Actuated Cycle Length (s)	110.0	Sum of lost time (s)	16.0
Intersection Capacity Utilization	47.1%	ICU Level of Service	A
Analysis Period (min)	15		
c Critical Lane Group			

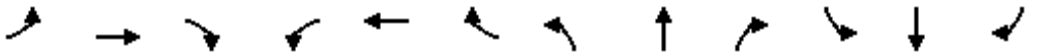
Lane Group	EBL	EBT	EBR	WBL	WBT	WBR	NBL	NBT	NBR	SBL	SBT	SBR
Lane Configurations												
Traffic Volume (vph)	90	118	139	221	119	10	101	865	231	14	880	101
Future Volume (vph)	90	118	139	221	119	10	101	865	231	14	880	101
Lane Group Flow (vph)	90	118	139	221	119	10	101	865	231	14	880	101
Turn Type	pm+pt	NA	Perm	pm+pt	NA	Perm	pm+pt	NA	Perm	pm+pt	NA	Perm
Protected Phases	7	4		3	8		1	6		5	2	
Permitted Phases	4		4	8		8	6		6	2		2
Detector Phase	7	4	4	3	8	8	1	6	6	5	2	2
Switch Phase												
Minimum Initial (s)	5.0	12.0	12.0	10.0	12.0	12.0	10.0	20.0	20.0	10.0	20.0	20.0
Minimum Split (s)	9.5	43.5	43.5	14.5	43.5	43.5	15.0	41.3	41.3	15.0	41.3	41.3
Total Split (s)	25.0	45.0	45.0	25.0	45.0	45.0	25.0	75.0	75.0	15.0	65.0	65.0
Total Split (%)	15.6%	28.1%	28.1%	15.6%	28.1%	28.1%	15.6%	46.9%	46.9%	9.4%	40.6%	40.6%
Yellow Time (s)	3.0	4.0	4.0	3.0	4.0	4.0	3.0	4.2	4.2	3.0	4.2	4.2
All-Red Time (s)	0.0	2.5	2.5	0.0	2.5	2.5	2.0	2.1	2.1	2.0	2.1	2.1
Lost Time Adjust (s)	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
Total Lost Time (s)	3.0	6.5	6.5	3.0	6.5	6.5	5.0	6.3	6.3	5.0	6.3	6.3
Lead/Lag	Lead	Lag	Lag	Lead	Lag	Lag	Lead	Lag	Lag	Lead	Lag	Lag
Lead-Lag Optimize?												
Recall Mode	None	None	None	None	None	None	None	C-Max	C-Max	None	C-Max	C-Max
v/c Ratio	0.32	0.65	0.54	0.67	0.43	0.03	0.29	0.39	0.23	0.03	0.44	0.11
Control Delay	46.8	85.1	17.2	58.8	65.4	0.2	12.0	16.7	2.5	10.2	21.1	2.6
Queue Delay	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
Total Delay	46.8	85.1	17.2	58.8	65.4	0.2	12.0	16.7	2.5	10.2	21.1	2.6
Queue Length 50th (m)	23.1	38.8	0.0	62.0	36.3	0.0	11.2	64.4	0.0	1.5	86.3	0.0
Queue Length 95th (m)	37.3	59.9	21.9	85.3	57.5	0.0	20.9	110.4	13.6	4.7	116.1	8.0
Internal Link Dist (m)		330.4			656.8			717.1			732.4	
Turn Bay Length (m)	60.0		50.0	50.0		50.0	100.0		85.0	35.0		120.0
Base Capacity (vph)	392	428	417	335	420	380	417	2197	1026	407	2010	944
Starvation Cap Reductn	0	0	0	0	0	0	0	0	0	0	0	0
Spillback Cap Reductn	0	0	0	0	0	0	0	0	0	0	0	0
Storage Cap Reductn	0	0	0	0	0	0	0	0	0	0	0	0
Reduced v/c Ratio	0.23	0.28	0.33	0.66	0.28	0.03	0.24	0.39	0.23	0.03	0.44	0.11

Intersection Summary

Cycle Length: 160
Actuated Cycle Length: 160
Offset: 7 (4%), Referenced to phase 2:SBTL and 6:NBTL, Start of Green
Natural Cycle: 115
Control Type: Actuated-Coordinated

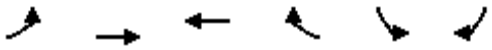
Splits and Phases: 5: Hwy 50 & Mayfield Rd/Albion Vaughn Rd





Movement	EBL	EBT	EBR	WBL	WBT	WBR	NBL	NBT	NBR	SBL	SBT	SBR
Lane Configurations												
Traffic Volume (vph)	90	118	139	221	119	10	101	865	231	14	880	101
Future Volume (vph)	90	118	139	221	119	10	101	865	231	14	880	101
Ideal Flow (vphpl)	1900	1900	1900	1900	1900	1900	1900	1900	1900	1900	1900	1900
Lane Width	3.5	3.7	3.5	3.5	3.7	3.5	3.5	3.7	3.5	3.5	3.7	3.5
Total Lost time (s)	3.0	6.5	6.5	3.0	6.5	6.5	5.0	6.3	6.3	5.0	6.3	6.3
Lane Util. Factor	1.00	1.00	1.00	1.00	1.00	1.00	1.00	0.95	1.00	1.00	0.95	1.00
Frpb, ped/bikes	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	0.98	1.00	1.00	1.00
Flpb, ped/bikes	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00
Frt	1.00	1.00	0.85	1.00	1.00	0.85	1.00	1.00	0.85	1.00	1.00	0.85
Flt Protected	0.95	1.00	1.00	0.95	1.00	1.00	0.95	1.00	1.00	0.95	1.00	1.00
Satd. Flow (prot)	1750	1779	1298	1668	1746	1229	1552	3476	1490	1668	3510	1566
Flt Permitted	0.68	1.00	1.00	0.45	1.00	1.00	0.25	1.00	1.00	0.30	1.00	1.00
Satd. Flow (perm)	1254	1779	1298	791	1746	1229	405	3476	1490	524	3510	1566
Peak-hour factor, PHF	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00
Adj. Flow (vph)	90	118	139	221	119	10	101	865	231	14	880	101
RTOR Reduction (vph)	0	0	125	0	0	8	0	0	89	0	0	43
Lane Group Flow (vph)	90	118	14	221	119	2	101	865	142	14	880	58
Confl. Bikes (#/hr)									1			
Heavy Vehicles (%)	2%	8%	23%	7%	10%	30%	15%	5%	5%	7%	4%	2%
Turn Type	pm+pt	NA	Perm	pm+pt	NA	Perm	pm+pt	NA	Perm	pm+pt	NA	Perm
Protected Phases	7	4		3	8		1	6		5	2	
Permitted Phases	4		4	8		8	6		6	2		2
Actuated Green, G (s)	28.1	16.4	16.4	40.1	25.4	25.4	107.1	98.1	98.1	95.6	91.6	91.6
Effective Green, g (s)	28.1	16.4	16.4	40.1	25.4	25.4	107.1	98.1	98.1	95.6	91.6	91.6
Actuated g/C Ratio	0.18	0.10	0.10	0.25	0.16	0.16	0.67	0.61	0.61	0.60	0.57	0.57
Clearance Time (s)	3.0	6.5	6.5	3.0	6.5	6.5	5.0	6.3	6.3	5.0	6.3	6.3
Vehicle Extension (s)	3.0	3.0	3.0	3.0	3.0	3.0	3.0	3.0	3.0	3.0	3.0	3.0
Lane Grp Cap (vph)	256	182	133	311	277	195	346	2131	913	341	2009	896
v/s Ratio Prot	0.03	0.07		c0.09	0.07		c0.02	c0.25		0.00	c0.25	
v/s Ratio Perm	0.04		0.01	c0.09		0.00	0.18		0.10	0.02		0.04
v/c Ratio	0.35	0.65	0.11	0.71	0.43	0.01	0.29	0.41	0.16	0.04	0.44	0.06
Uniform Delay, d1	57.3	69.0	65.2	52.0	60.8	56.7	11.3	15.9	13.2	13.3	19.5	15.2
Progression Factor	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00
Incremental Delay, d2	0.8	7.7	0.4	7.4	1.1	0.0	0.5	0.6	0.4	0.0	0.7	0.1
Delay (s)	58.2	76.7	65.5	59.4	61.8	56.7	11.8	16.5	13.6	13.3	20.2	15.3
Level of Service	E	E	E	E	E	E	B	B	B	B	C	B
Approach Delay (s)		67.4			60.1			15.6			19.6	
Approach LOS		E			E			B			B	

Intersection Summary			
HCM 2000 Control Delay	28.6	HCM 2000 Level of Service	C
HCM 2000 Volume to Capacity ratio	0.52		
Actuated Cycle Length (s)	160.0	Sum of lost time (s)	20.8
Intersection Capacity Utilization	66.4%	ICU Level of Service	C
Analysis Period (min)	15		
c Critical Lane Group			



Movement	EBL	EBT	WBT	WBR	SBL	SBR
Lane Configurations						
Traffic Volume (veh/h)	3	361	333	2	3	2
Future Volume (Veh/h)	3	361	333	2	3	2
Sign Control		Free	Free		Stop	
Grade		0%	0%		0%	
Peak Hour Factor	1.00	1.00	1.00	1.00	1.00	1.00
Hourly flow rate (vph)	3	361	333	2	3	2
Pedestrians						
Lane Width (m)						
Walking Speed (m/s)						
Percent Blockage						
Right turn flare (veh)						
Median type		None	None			
Median storage veh)						
Upstream signal (m)		233				
pX, platoon unblocked					0.93	
vC, conflicting volume	335				701	334
vC1, stage 1 conf vol						
vC2, stage 2 conf vol						
vCu, unblocked vol	335				644	334
tC, single (s)	4.4				6.7	6.2
tC, 2 stage (s)						
tF (s)	2.5				3.8	3.3
p0 queue free %	100				99	100
cM capacity (veh/h)	1070				365	712

Direction, Lane #	EB 1	WB 1	SB 1
Volume Total	364	335	5
Volume Left	3	0	3
Volume Right	0	2	2
cSH	1070	1700	453
Volume to Capacity	0.00	0.20	0.01
Queue Length 95th (m)	0.1	0.0	0.3
Control Delay (s)	0.1	0.0	13.0
Lane LOS	A		B
Approach Delay (s)	0.1	0.0	13.0
Approach LOS			B

Intersection Summary			
Average Delay	0.1		
Intersection Capacity Utilization	31.4%	ICU Level of Service	A
Analysis Period (min)	15		

Movement	WBL	WBR	NBT	NBR	SBL	SBT
Lane Configurations						
Traffic Volume (veh/h)	1	0	157	1	0	227
Future Volume (Veh/h)	1	0	157	1	0	227
Sign Control	Stop		Free			Free
Grade	0%		0%			0%
Peak Hour Factor	1.00	1.00	1.00	1.00	1.00	1.00
Hourly flow rate (vph)	1	0	157	1	0	227
Pedestrians						
Lane Width (m)						
Walking Speed (m/s)						
Percent Blockage						
Right turn flare (veh)						
Median type			TWLTL			TWLTL
Median storage veh)			2			2
Upstream signal (m)						
pX, platoon unblocked						
vC, conflicting volume	271	79			158	
vC1, stage 1 conf vol	158					
vC2, stage 2 conf vol	114					
vCu, unblocked vol	271	79			158	
tC, single (s)	8.8	6.9			4.1	
tC, 2 stage (s)	7.8					
tF (s)	4.5	3.3			2.2	
p0 queue free %	100	100			100	
cM capacity (veh/h)	578	972			1434	

Direction, Lane #	WB 1	NB 1	NB 2	SB 1	SB 2
Volume Total	1	105	53	76	151
Volume Left	1	0	0	0	0
Volume Right	0	0	1	0	0
cSH	578	1700	1700	1434	1700
Volume to Capacity	0.00	0.06	0.03	0.00	0.09
Queue Length 95th (m)	0.0	0.0	0.0	0.0	0.0
Control Delay (s)	11.2	0.0	0.0	0.0	0.0
Lane LOS	B				
Approach Delay (s)	11.2	0.0		0.0	
Approach LOS	B				

Intersection Summary			
Average Delay	0.0		
Intersection Capacity Utilization	16.3%	ICU Level of Service	A
Analysis Period (min)	15		

APPENDIX G

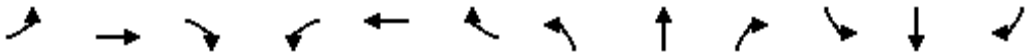
2028 & 2033 Future Background Intersection Capacity Analysis

Lane Group	EBL	EBT	WBL	WBT	NBL	NBT	SBL	SBT
Lane Configurations								
Traffic Volume (vph)	333	309	39	293	23	307	64	356
Future Volume (vph)	333	309	39	293	23	307	64	356
Lane Group Flow (vph)	333	341	39	322	23	338	64	603
Turn Type	pm+pt	NA	Perm	NA	Perm	NA	pm+pt	NA
Protected Phases	5	2		6		4	3	8
Permitted Phases	2		6		4		8	
Detector Phase	5	2	6	6	4	4	3	8
Switch Phase								
Minimum Initial (s)	5.0	12.0	12.0	12.0	12.0	12.0	5.0	12.0
Minimum Split (s)	9.5	37.0	37.0	37.0	37.0	37.0	12.5	37.0
Total Split (s)	15.0	80.0	65.0	65.0	32.0	32.0	18.0	50.0
Total Split (%)	11.5%	61.5%	50.0%	50.0%	24.6%	24.6%	13.8%	38.5%
Yellow Time (s)	3.0	4.6	4.6	4.6	4.2	4.2	3.0	4.2
All-Red Time (s)	0.0	2.4	2.4	2.4	2.8	2.8	0.0	2.8
Lost Time Adjust (s)	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
Total Lost Time (s)	3.0	7.0	7.0	7.0	7.0	7.0	3.0	7.0
Lead/Lag	Lead		Lag	Lag	Lag	Lag	Lead	
Lead-Lag Optimize?								
Recall Mode	None	C-Max	C-Max	C-Max	None	None	None	None
v/c Ratio	0.48	0.17	0.08	0.21	0.22	0.67	0.42	0.71
Control Delay	12.0	9.8	20.3	18.8	53.8	58.4	42.8	37.8
Queue Delay	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
Total Delay	12.0	9.8	20.3	18.8	53.8	58.4	42.8	37.8
Queue Length 50th (m)	34.2	17.5	5.5	24.5	5.6	45.5	13.3	59.6
Queue Length 95th (m)	59.7	28.8	13.6	37.7	14.5	60.1	24.2	74.5
Internal Link Dist (m)		689.8		209.6		564.3		579.6
Turn Bay Length (m)	100.0		85.0		105.0		145.0	
Base Capacity (vph)	703	1964	469	1534	140	671	168	1120
Starvation Cap Reductn	0	0	0	0	0	0	0	0
Spillback Cap Reductn	0	0	0	0	0	0	0	0
Storage Cap Reductn	0	0	0	0	0	0	0	0
Reduced v/c Ratio	0.47	0.17	0.08	0.21	0.16	0.50	0.38	0.54

Intersection Summary

Cycle Length: 130
Actuated Cycle Length: 130
Offset: 92 (71%), Referenced to phase 2:EBTL and 6:WBTL, Start of Green
Natural Cycle: 100
Control Type: Actuated-Coordinated

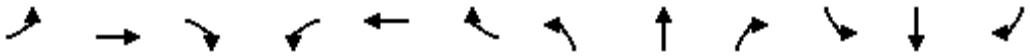
Splits and Phases: 1: Coleraine Dr & Mayfield Rd



Movement	EBL	EBT	EBR	WBL	WBT	WBR	NBL	NBT	NBR	SBL	SBT	SBR
Lane Configurations												
Traffic Volume (vph)	333	309	32	39	293	29	23	307	31	64	356	247
Future Volume (vph)	333	309	32	39	293	29	23	307	31	64	356	247
Ideal Flow (vphpl)	1900	1900	1900	1900	1900	1900	1900	1900	1900	1900	1900	1900
Lane Width	3.5	3.7	3.5	3.5	3.7	3.5	3.5	3.7	3.5	3.5	3.7	3.5
Total Lost time (s)	3.0	7.0		7.0	7.0		7.0	7.0		3.0	7.0	
Lane Util. Factor	1.00	0.95		1.00	0.95		1.00	0.95		1.00	0.95	
Frt	1.00	0.99		1.00	0.99		1.00	0.99		1.00	0.94	
Flt Protected	0.95	1.00		0.95	1.00		0.95	1.00		0.95	1.00	
Satd. Flow (prot)	1623	3009		1580	2966		1716	3464		986	3094	
Flt Permitted	0.53	1.00		0.55	1.00		0.41	1.00		0.34	1.00	
Satd. Flow (perm)	910	3009		909	2966		733	3464		354	3094	
Peak-hour factor, PHF	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00
Adj. Flow (vph)	333	309	32	39	293	29	23	307	31	64	356	247
RTOR Reduction (vph)	0	5	0	0	5	0	0	6	0	0	109	0
Lane Group Flow (vph)	333	336	0	39	317	0	23	332	0	64	494	0
Heavy Vehicles (%)	10%	21%	6%	13%	16%	76%	4%	3%	13%	81%	5%	19%
Turn Type	pm+pt	NA		Perm	NA		Perm	NA		pm+pt	NA	
Protected Phases	5	2			6			4		3	8	
Permitted Phases	2			6			4			8		
Actuated Green, G (s)	84.1	84.1		66.5	66.5		18.7	18.7		31.9	31.9	
Effective Green, g (s)	84.1	84.1		66.5	66.5		18.7	18.7		31.9	31.9	
Actuated g/C Ratio	0.65	0.65		0.51	0.51		0.14	0.14		0.25	0.25	
Clearance Time (s)	3.0	7.0		7.0	7.0		7.0	7.0		3.0	7.0	
Vehicle Extension (s)	3.0	3.0		3.0	3.0		3.0	3.0		3.0	3.0	
Lane Grp Cap (vph)	668	1946		464	1517		105	498		136	759	
v/s Ratio Prot	c0.06	0.11			0.11			0.10		0.04	c0.16	
v/s Ratio Perm	c0.27			0.04			0.03			0.08		
v/c Ratio	0.50	0.17		0.08	0.21		0.22	0.67		0.47	0.65	
Uniform Delay, d1	10.2	9.1		16.2	17.4		49.2	52.7		39.9	44.1	
Progression Factor	1.00	1.00		1.00	1.00		1.00	1.00		1.00	1.00	
Incremental Delay, d2	0.6	0.2		0.4	0.3		1.1	3.4		2.6	2.0	
Delay (s)	10.8	9.3		16.6	17.7		50.2	56.1		42.4	46.1	
Level of Service	B	A		B	B		D	E		D	D	
Approach Delay (s)		10.1			17.6			55.7			45.7	
Approach LOS		B			B			E			D	

Intersection Summary			
HCM 2000 Control Delay	30.9	HCM 2000 Level of Service	C
HCM 2000 Volume to Capacity ratio	0.57		
Actuated Cycle Length (s)	130.0	Sum of lost time (s)	20.0
Intersection Capacity Utilization	77.0%	ICU Level of Service	D
Analysis Period (min)	15		

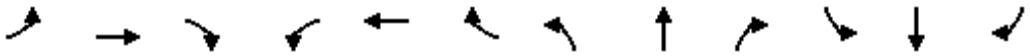
c Critical Lane Group



Movement	EBL	EBT	EBR	WBL	WBT	WBR	NBL	NBT	NBR	SBL	SBT	SBR
Lane Configurations												
Traffic Volume (veh/h)	1	1	1	32	11	119	11	586	51	86	588	5
Future Volume (Veh/h)	1	1	1	32	11	119	11	586	51	86	588	5
Sign Control		Stop			Stop			Free			Free	
Grade		0%			0%			0%			0%	
Peak Hour Factor	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00
Hourly flow rate (vph)	1	1	1	32	11	119	11	586	51	86	588	5
Pedestrians												
Lane Width (m)												
Walking Speed (m/s)												
Percent Blockage												
Right turn flare (veh)												
Median type								TWLTL			None	
Median storage veh)								2				
Upstream signal (m)												
pX, platoon unblocked												
vC, conflicting volume	1202	1422	296	1101	1398	318	593			637		
vC1, stage 1 conf vol	762	762		634	634							
vC2, stage 2 conf vol	440	659		468	765							
vCu, unblocked vol	1202	1422	296	1101	1398	318	593			637		
tC, single (s)	7.5	6.5	6.9	7.9	6.7	7.5	4.6			4.6		
tC, 2 stage (s)	6.5	5.5		6.9	5.7							
tF (s)	3.5	4.0	3.3	3.7	4.1	3.6	2.5			2.4		
p0 queue free %	100	100	100	90	96	80	99			89		
cM capacity (veh/h)	255	282	706	310	286	599	826			813		

Direction, Lane #	EB 1	EB 2	WB 1	WB 2	NB 1	NB 2	NB 3	SB 1	SB 2	SB 3
Volume Total	1	2	32	130	11	391	246	86	392	201
Volume Left	1	0	32	0	11	0	0	86	0	0
Volume Right	0	1	0	119	0	0	51	0	0	5
cSH	255	403	310	548	826	1700	1700	813	1700	1700
Volume to Capacity	0.00	0.00	0.10	0.24	0.01	0.23	0.14	0.11	0.23	0.12
Queue Length 95th (m)	0.1	0.1	2.7	7.3	0.3	0.0	0.0	2.8	0.0	0.0
Control Delay (s)	19.2	14.0	17.9	13.6	9.4	0.0	0.0	9.9	0.0	0.0
Lane LOS	C	B	C	B	A			A		
Approach Delay (s)	15.7		14.5		0.2			1.3		
Approach LOS	C		B							

Intersection Summary				
Average Delay	2.2			
Intersection Capacity Utilization	41.0%	ICU Level of Service		A
Analysis Period (min)	15			



Movement	EBL	EBT	EBR	WBL	WBT	WBR	NBL	NBT	NBR	SBL	SBT	SBR
Lane Configurations												
Traffic Volume (veh/h)	3	117	15	12	143	12	5	4	4	7	3	14
Future Volume (Veh/h)	3	117	15	12	143	12	5	4	4	7	3	14
Sign Control		Free			Free			Stop			Stop	
Grade		0%			0%			0%			0%	
Peak Hour Factor	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00
Hourly flow rate (vph)	3	117	15	12	143	12	5	4	4	7	3	14
Pedestrians											1	
Lane Width (m)											3.7	
Walking Speed (m/s)											1.2	
Percent Blockage											0	
Right turn flare (veh)												
Median type		None			None							
Median storage veh)												
Upstream signal (m)												
pX, platoon unblocked												
vC, conflicting volume	156			132			319	310	124	310	312	150
vC1, stage 1 conf vol												
vC2, stage 2 conf vol												
vCu, unblocked vol	156			132			319	310	124	310	312	150
tC, single (s)	4.1			4.1			7.5	6.8	6.7	7.5	6.8	6.6
tC, 2 stage (s)												
tF (s)	2.2			2.2			3.9	4.2	3.8	3.9	4.3	3.6
p0 queue free %	100			99			99	99	100	99	99	98
cM capacity (veh/h)	1435			1466			550	562	812	558	549	814

Direction, Lane #	EB 1	WB 1	NB 1	SB 1
Volume Total	135	167	13	24
Volume Left	3	12	5	7
Volume Right	15	12	4	14
cSH	1435	1466	615	682
Volume to Capacity	0.00	0.01	0.02	0.04
Queue Length 95th (m)	0.1	0.2	0.5	0.9
Control Delay (s)	0.2	0.6	11.0	10.5
Lane LOS	A	A	B	B
Approach Delay (s)	0.2	0.6	11.0	10.5
Approach LOS			B	B

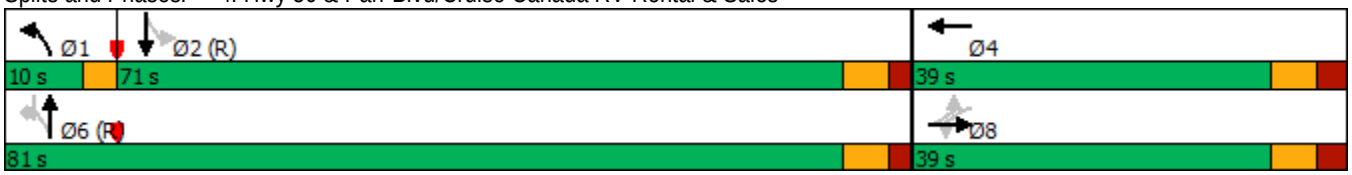
Intersection Summary				
Average Delay	1.5			
Intersection Capacity Utilization	24.4%	ICU Level of Service	A	
Analysis Period (min)	15			

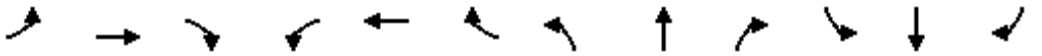
Lane Group	EBL	EBT	WBL	WBT	NBL	NBT	SBT	SBR
Lane Configurations								
Traffic Volume (vph)	27	0	1	0	199	1067	1180	44
Future Volume (vph)	27	0	1	0	199	1067	1180	44
Lane Group Flow (vph)	27	102	0	1	199	1069	1180	44
Turn Type	Perm	NA	D.Pm	NA	pm+pt	NA	NA	custom
Protected Phases		8		4	1	6	2	
Permitted Phases	8		8		6			6
Detector Phase	8	8	8	4	1	6	2	6
Switch Phase								
Minimum Initial (s)	8.0	8.0	8.0	8.0	5.0	12.0	12.0	12.0
Minimum Split (s)	33.9	33.9	33.9	33.9	9.5	30.1	30.1	30.1
Total Split (s)	39.0	39.0	39.0	39.0	10.0	81.0	71.0	81.0
Total Split (%)	32.5%	32.5%	32.5%	32.5%	8.3%	67.5%	59.2%	67.5%
Yellow Time (s)	4.0	4.0	4.0	4.0	3.0	4.0	4.0	4.0
All-Red Time (s)	2.9	2.9	2.9	2.9	0.0	2.1	2.1	2.1
Lost Time Adjust (s)	0.0	0.0		0.0	0.0	0.0	0.0	0.0
Total Lost Time (s)	6.9	6.9		6.9	3.0	6.1	6.1	6.1
Lead/Lag					Lead		Lag	
Lead-Lag Optimize?								
Recall Mode	None	None	None	None	None	C-Max	C-Max	C-Max
v/c Ratio	0.28	0.44		0.01	0.53	0.39	0.54	0.04
Control Delay	59.4	7.2		50.0	6.9	3.5	10.5	1.0
Queue Delay	0.0	0.0		0.0	0.0	0.0	0.0	0.0
Total Delay	59.4	7.2		50.0	6.9	3.5	10.5	1.0
Queue Length 50th (m)	6.5	0.0		0.2	6.1	27.5	63.2	0.3
Queue Length 95th (m)	16.1	3.5		2.1	12.2	41.0	100.3	2.5
Internal Link Dist (m)		828.8		20.9		732.4	332.3	
Turn Bay Length (m)	80.0				35.0			20.0
Base Capacity (vph)	355	432		354	379	2738	2205	1222
Starvation Cap Reductn	0	0		0	0	0	0	0
Spillback Cap Reductn	0	0		0	0	0	0	0
Storage Cap Reductn	0	0		0	0	0	0	0
Reduced v/c Ratio	0.08	0.24		0.00	0.53	0.39	0.54	0.04

Intersection Summary

Cycle Length: 120
Actuated Cycle Length: 120
Offset: 8 (7%), Referenced to phase 2:SBTL and 6:NBTL, Start of Green
Natural Cycle: 90
Control Type: Actuated-Coordinated

Splits and Phases: 4: Hwy 50 & Parr Blvd/Cruise Canada RV Rental & Sales





Movement	EBL	EBT	EBR	WBL	WBT	WBR	NBL	NBT	NBR	SBL	SBT	SBR
Lane Configurations												
Traffic Volume (vph)	27	0	102	1	0	0	199	1067	2	0	1180	44
Future Volume (vph)	27	0	102	1	0	0	199	1067	2	0	1180	44
Ideal Flow (vphpl)	1900	1900	1900	1900	1900	1900	1900	1900	1900	1900	1900	1900
Lane Width	3.5	3.7	3.5	3.5	3.7	3.5	3.5	3.7	3.5	3.5	3.7	3.5
Total Lost time (s)	6.9	6.9			6.9		3.0	6.1			6.1	6.1
Lane Util. Factor	1.00	1.00			1.00		1.00	0.95			0.95	1.00
Frpb, ped/bikes	1.00	1.00			1.00		1.00	1.00			1.00	0.98
Flpb, ped/bikes	1.00	1.00			1.00		1.00	1.00			1.00	1.00
Frt	1.00	0.85			1.00		1.00	1.00			1.00	0.85
Flt Protected	0.95	1.00			0.95		0.95	1.00			1.00	1.00
Satd. Flow (prot)	1668	1183			1825		1513	3348			3174	1487
Flt Permitted	0.76	1.00			0.69		0.19	1.00			1.00	1.00
Satd. Flow (perm)	1330	1183			1328		310	3348			3174	1487
Peak-hour factor, PHF	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00
Adj. Flow (vph)	27	0	102	1	0	0	199	1067	2	0	1180	44
RTOR Reduction (vph)	0	94	0	0	0	0	0	0	0	0	0	6
Lane Group Flow (vph)	27	8	0	0	1	0	199	1069	0	0	1180	38
Confl. Peds. (#/hr)							1		2	2		1
Confl. Bikes (#/hr)									1			
Heavy Vehicles (%)	7%	0%	38%	0%	0%	0%	18%	9%	0%	0%	15%	5%
Turn Type	Perm	NA		D.Pm	NA		pm+pt	NA		Perm	NA	custom
Protected Phases		8			4		1	6			2	
Permitted Phases	8			8			6			2		6
Actuated Green, G (s)	8.9	8.9			8.9		98.1	98.1			83.4	98.1
Effective Green, g (s)	8.9	8.9			8.9		98.1	98.1			83.4	98.1
Actuated g/C Ratio	0.07	0.07			0.07		0.82	0.82			0.70	0.82
Clearance Time (s)	6.9	6.9			6.9		3.0	6.1			6.1	6.1
Vehicle Extension (s)	3.0	3.0			3.0		3.0	3.0			3.0	3.0
Lane Grp Cap (vph)	98	87			98		370	2736			2205	1215
v/s Ratio Prot		0.01					c0.05	0.32			0.37	
v/s Ratio Perm	c0.02				0.00		c0.39					0.03
v/c Ratio	0.28	0.09			0.01		0.54	0.39			0.54	0.03
Uniform Delay, d1	52.5	51.8			51.5		4.6	2.9			8.9	2.1
Progression Factor	1.00	1.00			1.00		1.00	1.00			1.00	1.00
Incremental Delay, d2	1.5	0.4			0.0		1.5	0.4			0.9	0.0
Delay (s)	54.0	52.2			51.5		6.1	3.4			9.8	2.1
Level of Service	D	D			D		A	A			A	A
Approach Delay (s)		52.6			51.5			3.8			9.5	
Approach LOS		D			D			A			A	

Intersection Summary			
HCM 2000 Control Delay	8.9	HCM 2000 Level of Service	A
HCM 2000 Volume to Capacity ratio	0.53		
Actuated Cycle Length (s)	120.0	Sum of lost time (s)	16.0
Intersection Capacity Utilization	64.5%	ICU Level of Service	C
Analysis Period (min)	15		

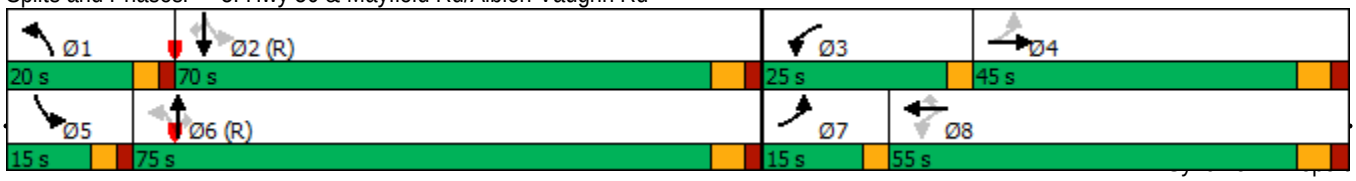
c Critical Lane Group

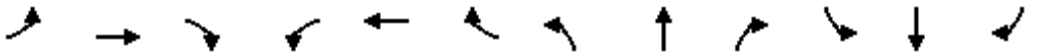
Lane Group	EBL	EBT	WBL	WBT	WBR	NBL	NBT	NBR	SBL	SBT	SBR
Lane Configurations											
Traffic Volume (vph)	63	130	354	213	39	103	1091	170	31	1139	64
Future Volume (vph)	63	130	354	213	39	103	1091	170	31	1139	64
Lane Group Flow (vph)	63	337	354	213	39	103	1091	170	31	1139	64
Turn Type	pm+pt	NA	pm+pt	NA	Perm	pm+pt	NA	Perm	pm+pt	NA	Perm
Protected Phases	7	4	3	8		1	6		5	2	
Permitted Phases	4		8		8	6		6	2		2
Detector Phase	7	4	3	8	8	1	6	6	5	2	2
Switch Phase											
Minimum Initial (s)	5.0	12.0	10.0	12.0	12.0	10.0	20.0	20.0	10.0	20.0	20.0
Minimum Split (s)	9.5	43.5	14.5	43.5	43.5	15.0	41.3	41.3	15.0	41.3	41.3
Total Split (s)	15.0	45.0	25.0	55.0	55.0	20.0	75.0	75.0	15.0	70.0	70.0
Total Split (%)	9.4%	28.1%	15.6%	34.4%	34.4%	12.5%	46.9%	46.9%	9.4%	43.8%	43.8%
Yellow Time (s)	3.0	4.0	3.0	4.0	4.0	3.0	4.2	4.2	3.0	4.2	4.2
All-Red Time (s)	0.0	2.5	0.0	2.5	2.5	2.0	2.1	2.1	2.0	2.1	2.1
Lost Time Adjust (s)	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
Total Lost Time (s)	3.0	6.5	3.0	6.5	6.5	5.0	6.3	6.3	5.0	6.3	6.3
Lead/Lag	Lead	Lag	Lead	Lag	Lag	Lead	Lag	Lag	Lead	Lag	Lag
Lead-Lag Optimize?											
Recall Mode	None	None	None	None	None	None	C-Max	C-Max	None	C-Max	C-Max
v/c Ratio	0.25	0.84	1.21	0.57	0.10	0.50	0.58	0.20	0.12	0.70	0.08
Control Delay	42.7	54.8	163.0	63.8	0.6	20.0	25.3	5.6	12.9	33.4	1.3
Queue Delay	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
Total Delay	42.7	54.8	163.0	63.8	0.6	20.0	25.3	5.6	12.9	33.4	1.3
Queue Length 50th (m)	15.6	32.1	~119.5	66.3	0.0	12.3	124.8	5.1	3.5	145.2	0.0
Queue Length 95th (m)	26.5	49.1	#170.7	91.2	0.5	24.4	166.7	19.6	9.0	212.7	2.7
Internal Link Dist (m)		330.4		656.8			717.1			732.4	
Turn Bay Length (m)	60.0		50.0		50.0	100.0		85.0	35.0		120.0
Base Capacity (vph)	276	649	293	544	514	223	1875	857	266	1622	801
Starvation Cap Reductn	0	0	0	0	0	0	0	0	0	0	0
Spillback Cap Reductn	0	0	0	0	0	0	0	0	0	0	0
Storage Cap Reductn	0	0	0	0	0	0	0	0	0	0	0
Reduced v/c Ratio	0.23	0.52	1.21	0.39	0.08	0.46	0.58	0.20	0.12	0.70	0.08

Intersection Summary

Cycle Length: 160
Actuated Cycle Length: 160
Offset: 27 (17%), Referenced to phase 2:SBTL and 6:NBTL, Start of Green
Natural Cycle: 125
Control Type: Actuated-Coordinated
~ Volume exceeds capacity, queue is theoretically infinite.
Queue shown is maximum after two cycles.
95th percentile volume exceeds capacity, queue may be longer.
Queue shown is maximum after two cycles.

Splits and Phases: 5: Hwy 50 & Mayfield Rd/Albion Vaughn Rd

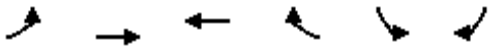




Movement	EBL	EBT	EBR	WBL	WBT	WBR	NBL	NBT	NBR	SBL	SBT	SBR
Lane Configurations												
Traffic Volume (vph)	63	130	207	354	213	39	103	1091	170	31	1139	64
Future Volume (vph)	63	130	207	354	213	39	103	1091	170	31	1139	64
Ideal Flow (vphpl)	1900	1900	1900	1900	1900	1900	1900	1900	1900	1900	1900	1900
Lane Width	3.5	3.7	3.5	3.5	3.7	3.5	3.5	3.7	3.5	3.5	3.7	3.5
Total Lost time (s)	3.0	6.5		3.0	6.5	6.5	5.0	6.3	6.3	5.0	6.3	6.3
Lane Util. Factor	1.00	0.95		1.00	1.00	1.00	1.00	0.95	1.00	1.00	0.95	1.00
Frt	1.00	0.91		1.00	1.00	0.85	1.00	1.00	0.85	1.00	1.00	0.85
Flt Protected	0.95	1.00		0.95	1.00	1.00	0.95	1.00	1.00	0.95	1.00	1.00
Satd. Flow (prot)	1653	2201		1623	1795	1521	1190	3288	1401	1539	3093	1439
Flt Permitted	0.62	1.00		0.26	1.00	1.00	0.15	1.00	1.00	0.20	1.00	1.00
Satd. Flow (perm)	1087	2201		443	1795	1521	182	3288	1401	321	3093	1439
Peak-hour factor, PHF	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00
Adj. Flow (vph)	63	130	207	354	213	39	103	1091	170	31	1139	64
RTOR Reduction (vph)	0	139	0	0	0	31	0	0	60	0	0	31
Lane Group Flow (vph)	63	198	0	354	213	8	103	1091	110	31	1139	33
Heavy Vehicles (%)	8%	26%	66%	10%	7%	5%	50%	11%	14%	16%	18%	11%
Turn Type	pm+pt	NA		pm+pt	NA	Perm	pm+pt	NA	Perm	pm+pt	NA	Perm
Protected Phases	7	4		3	8		1	6		5	2	
Permitted Phases	4			8		8	6		6	2		2
Actuated Green, G (s)	27.8	19.5		44.5	33.2	33.2	102.7	89.7	89.7	91.4	83.4	83.4
Effective Green, g (s)	27.8	19.5		44.5	33.2	33.2	102.7	89.7	89.7	91.4	83.4	83.4
Actuated g/C Ratio	0.17	0.12		0.28	0.21	0.21	0.64	0.56	0.56	0.57	0.52	0.52
Clearance Time (s)	3.0	6.5		3.0	6.5	6.5	5.0	6.3	6.3	5.0	6.3	6.3
Vehicle Extension (s)	3.0	3.0		3.0	3.0	3.0	3.0	3.0	3.0	3.0	3.0	3.0
Lane Grp Cap (vph)	218	268		285	372	315	206	1843	785	244	1612	750
v/s Ratio Prot	0.01	0.09		c0.17	0.12		c0.04	c0.33		0.01	c0.37	
v/s Ratio Perm	0.04			c0.17		0.01	0.28		0.08	0.07		0.02
v/c Ratio	0.29	0.74		1.24	0.57	0.03	0.50	0.59	0.14	0.13	0.71	0.04
Uniform Delay, d1	56.8	67.8		52.6	57.0	50.5	17.6	23.1	16.8	16.4	29.0	18.8
Progression Factor	1.00	1.00		1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00
Incremental Delay, d2	0.7	10.2		135.1	2.1	0.0	1.9	1.4	0.4	0.2	2.6	0.1
Delay (s)	57.5	78.0		187.7	59.1	50.5	19.5	24.5	17.1	16.6	31.7	18.9
Level of Service	E	E		F	E	D	B	C	B	B	C	B
Approach Delay (s)		74.8			133.7			23.2			30.6	
Approach LOS		E			F			C			C	

Intersection Summary			
HCM 2000 Control Delay	50.1	HCM 2000 Level of Service	D
HCM 2000 Volume to Capacity ratio	0.87		
Actuated Cycle Length (s)	160.0	Sum of lost time (s)	20.8
Intersection Capacity Utilization	87.9%	ICU Level of Service	E
Analysis Period (min)	15		

c Critical Lane Group



Movement	EBL	EBT	WBT	WBR	SBL	SBR
Lane Configurations						
Traffic Volume (veh/h)	1	403	359	1	1	2
Future Volume (Veh/h)	1	403	359	1	1	2
Sign Control		Free	Free		Stop	
Grade		0%	0%		0%	
Peak Hour Factor	1.00	1.00	1.00	1.00	1.00	1.00
Hourly flow rate (vph)	1	403	359	1	1	2
Pedestrians						
Lane Width (m)						
Walking Speed (m/s)						
Percent Blockage						
Right turn flare (veh)						
Median type		None	None			
Median storage veh)						
Upstream signal (m)		233				
pX, platoon unblocked					0.98	
vC, conflicting volume	360				563	180
vC1, stage 1 conf vol						
vC2, stage 2 conf vol						
vCu, unblocked vol	360				523	180
tC, single (s)	4.1				6.8	8.9
tC, 2 stage (s)						
tF (s)	2.2				3.5	4.3
p0 queue free %	100				100	100
cM capacity (veh/h)	1210				480	596

Direction, Lane #	EB 1	EB 2	EB 3	WB 1	WB 2	SB 1
Volume Total	1	202	202	239	121	3
Volume Left	1	0	0	0	0	1
Volume Right	0	0	0	0	1	2
cSH	1210	1700	1700	1700	1700	552
Volume to Capacity	0.00	0.12	0.12	0.14	0.07	0.01
Queue Length 95th (m)	0.0	0.0	0.0	0.0	0.0	0.1
Control Delay (s)	8.0	0.0	0.0	0.0	0.0	11.6
Lane LOS	A					B
Approach Delay (s)	0.0			0.0		11.6
Approach LOS						B

Intersection Summary			
Average Delay	0.1		
Intersection Capacity Utilization	21.1%	ICU Level of Service	A
Analysis Period (min)	15		

Movement	WBL	WBR	NBT	NBR	SBL	SBT
Lane Configurations						
Traffic Volume (veh/h)	0	0	635	0	0	631
Future Volume (Veh/h)	0	0	635	0	0	631
Sign Control	Stop		Free			Free
Grade	0%		0%			0%
Peak Hour Factor	1.00	1.00	1.00	1.00	1.00	1.00
Hourly flow rate (vph)	0	0	635	0	0	631
Pedestrians						
Lane Width (m)						
Walking Speed (m/s)						
Percent Blockage						
Right turn flare (veh)						
Median type			TWLTL			TWLTL
Median storage veh)			2			2
Upstream signal (m)						
pX, platoon unblocked						
vC, conflicting volume	950	318			635	
vC1, stage 1 conf vol	635					
vC2, stage 2 conf vol	316					
vCu, unblocked vol	950	318			635	
tC, single (s)	6.8	6.9			4.1	
tC, 2 stage (s)	5.8					
tF (s)	3.5	3.3			2.2	
p0 queue free %	100	100			100	
cM capacity (veh/h)	450	684			958	

Direction, Lane #	WB 1	NB 1	NB 2	SB 1	SB 2
Volume Total	0	423	212	210	421
Volume Left	0	0	0	0	0
Volume Right	0	0	0	0	0
cSH	1700	1700	1700	958	1700
Volume to Capacity	0.00	0.25	0.12	0.00	0.25
Queue Length 95th (m)	0.0	0.0	0.0	0.0	0.0
Control Delay (s)	0.0	0.0	0.0	0.0	0.0
Lane LOS	A				
Approach Delay (s)	0.0	0.0		0.0	
Approach LOS	A				

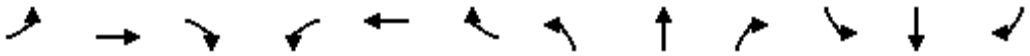
Intersection Summary			
Average Delay	0.0		
Intersection Capacity Utilization	20.9%	ICU Level of Service	A
Analysis Period (min)	15		

Lane Group	EBL	EBT	WBL	WBT	NBL	NBT	SBL	SBT
Lane Configurations								
Traffic Volume (vph)	333	309	39	293	23	307	64	356
Future Volume (vph)	333	309	39	293	23	307	64	356
Lane Group Flow (vph)	333	341	39	322	23	338	64	603
Turn Type	pm+pt	NA	Perm	NA	Perm	NA	pm+pt	NA
Protected Phases	5	2		6		4	3	8
Permitted Phases	2		6		4		8	
Detector Phase	5	2	6	6	4	4	3	8
Switch Phase								
Minimum Initial (s)	5.0	12.0	12.0	12.0	12.0	12.0	5.0	12.0
Minimum Split (s)	9.5	37.0	37.0	37.0	37.0	37.0	12.5	37.0
Total Split (s)	15.0	80.0	65.0	65.0	32.0	32.0	18.0	50.0
Total Split (%)	11.5%	61.5%	50.0%	50.0%	24.6%	24.6%	13.8%	38.5%
Yellow Time (s)	3.0	4.6	4.6	4.6	4.2	4.2	3.0	4.2
All-Red Time (s)	0.0	2.4	2.4	2.4	2.8	2.8	0.0	2.8
Lost Time Adjust (s)	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
Total Lost Time (s)	3.0	7.0	7.0	7.0	7.0	7.0	3.0	7.0
Lead/Lag	Lead		Lag	Lag	Lag	Lag	Lead	
Lead-Lag Optimize?								
Recall Mode	None	C-Max	C-Max	C-Max	None	None	None	None
v/c Ratio	0.48	0.17	0.08	0.21	0.22	0.67	0.42	0.71
Control Delay	12.0	9.8	20.3	18.8	53.8	58.4	42.8	37.8
Queue Delay	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
Total Delay	12.0	9.8	20.3	18.8	53.8	58.4	42.8	37.8
Queue Length 50th (m)	34.2	17.5	5.5	24.5	5.6	45.5	13.3	59.6
Queue Length 95th (m)	59.7	28.8	13.6	37.7	14.5	60.1	24.2	74.5
Internal Link Dist (m)		689.8		209.6		564.3		579.6
Turn Bay Length (m)	100.0		85.0		105.0		145.0	
Base Capacity (vph)	703	1964	469	1534	140	671	168	1120
Starvation Cap Reductn	0	0	0	0	0	0	0	0
Spillback Cap Reductn	0	0	0	0	0	0	0	0
Storage Cap Reductn	0	0	0	0	0	0	0	0
Reduced v/c Ratio	0.47	0.17	0.08	0.21	0.16	0.50	0.38	0.54

Intersection Summary

Cycle Length: 130
Actuated Cycle Length: 130
Offset: 92 (71%), Referenced to phase 2:EBTL and 6:WBTL, Start of Green
Natural Cycle: 100
Control Type: Actuated-Coordinated

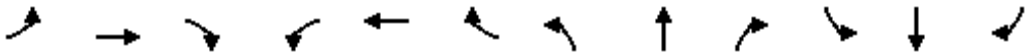
Splits and Phases: 1: Coleraine Dr & Mayfield Rd



Movement	EBL	EBT	EBR	WBL	WBT	WBR	NBL	NBT	NBR	SBL	SBT	SBR
Lane Configurations												
Traffic Volume (vph)	333	309	32	39	293	29	23	307	31	64	356	247
Future Volume (vph)	333	309	32	39	293	29	23	307	31	64	356	247
Ideal Flow (vphpl)	1900	1900	1900	1900	1900	1900	1900	1900	1900	1900	1900	1900
Lane Width	3.5	3.7	3.5	3.5	3.7	3.5	3.5	3.7	3.5	3.5	3.7	3.5
Total Lost time (s)	3.0	7.0		7.0	7.0		7.0	7.0		3.0	7.0	
Lane Util. Factor	1.00	0.95		1.00	0.95		1.00	0.95		1.00	0.95	
Frt	1.00	0.99		1.00	0.99		1.00	0.99		1.00	0.94	
Flt Protected	0.95	1.00		0.95	1.00		0.95	1.00		0.95	1.00	
Satd. Flow (prot)	1623	3009		1580	2966		1716	3464		986	3094	
Flt Permitted	0.53	1.00		0.55	1.00		0.41	1.00		0.34	1.00	
Satd. Flow (perm)	910	3009		909	2966		733	3464		354	3094	
Peak-hour factor, PHF	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00
Adj. Flow (vph)	333	309	32	39	293	29	23	307	31	64	356	247
RTOR Reduction (vph)	0	5	0	0	5	0	0	6	0	0	109	0
Lane Group Flow (vph)	333	336	0	39	317	0	23	332	0	64	494	0
Heavy Vehicles (%)	10%	21%	6%	13%	16%	76%	4%	3%	13%	81%	5%	19%
Turn Type	pm+pt	NA		Perm	NA		Perm	NA		pm+pt	NA	
Protected Phases	5	2			6			4		3	8	
Permitted Phases	2			6			4			8		
Actuated Green, G (s)	84.1	84.1		66.5	66.5		18.7	18.7		31.9	31.9	
Effective Green, g (s)	84.1	84.1		66.5	66.5		18.7	18.7		31.9	31.9	
Actuated g/C Ratio	0.65	0.65		0.51	0.51		0.14	0.14		0.25	0.25	
Clearance Time (s)	3.0	7.0		7.0	7.0		7.0	7.0		3.0	7.0	
Vehicle Extension (s)	3.0	3.0		3.0	3.0		3.0	3.0		3.0	3.0	
Lane Grp Cap (vph)	668	1946		464	1517		105	498		136	759	
v/s Ratio Prot	c0.06	0.11			0.11			0.10		0.04	c0.16	
v/s Ratio Perm	c0.27			0.04			0.03			0.08		
v/c Ratio	0.50	0.17		0.08	0.21		0.22	0.67		0.47	0.65	
Uniform Delay, d1	10.2	9.1		16.2	17.4		49.2	52.7		39.9	44.1	
Progression Factor	1.00	1.00		1.00	1.00		1.00	1.00		1.00	1.00	
Incremental Delay, d2	0.6	0.2		0.4	0.3		1.1	3.4		2.6	2.0	
Delay (s)	10.8	9.3		16.6	17.7		50.2	56.1		42.4	46.1	
Level of Service	B	A		B	B		D	E		D	D	
Approach Delay (s)		10.1			17.6			55.7			45.7	
Approach LOS		B			B			E			D	

Intersection Summary			
HCM 2000 Control Delay	30.9	HCM 2000 Level of Service	C
HCM 2000 Volume to Capacity ratio	0.57		
Actuated Cycle Length (s)	130.0	Sum of lost time (s)	20.0
Intersection Capacity Utilization	77.0%	ICU Level of Service	D
Analysis Period (min)	15		

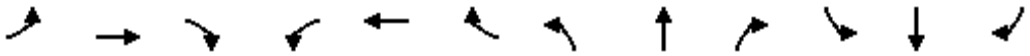
c Critical Lane Group



Movement	EBL	EBT	EBR	WBL	WBT	WBR	NBL	NBT	NBR	SBL	SBT	SBR
Lane Configurations												
Traffic Volume (veh/h)	1	1	1	32	11	119	11	586	51	86	588	5
Future Volume (Veh/h)	1	1	1	32	11	119	11	586	51	86	588	5
Sign Control		Stop			Stop			Free			Free	
Grade		0%			0%			0%			0%	
Peak Hour Factor	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00
Hourly flow rate (vph)	1	1	1	32	11	119	11	586	51	86	588	5
Pedestrians												
Lane Width (m)												
Walking Speed (m/s)												
Percent Blockage												
Right turn flare (veh)												
Median type								TWLTL			None	
Median storage veh)								2				
Upstream signal (m)												
pX, platoon unblocked												
vC, conflicting volume	1202	1422	296	1101	1398	318	593			637		
vC1, stage 1 conf vol	762	762		634	634							
vC2, stage 2 conf vol	440	659		468	765							
vCu, unblocked vol	1202	1422	296	1101	1398	318	593			637		
tC, single (s)	7.5	6.5	6.9	7.9	6.7	7.5	4.6			4.6		
tC, 2 stage (s)	6.5	5.5		6.9	5.7							
tF (s)	3.5	4.0	3.3	3.7	4.1	3.6	2.5			2.4		
p0 queue free %	100	100	100	90	96	80	99			89		
cM capacity (veh/h)	255	282	706	310	286	599	826			813		

Direction, Lane #	EB 1	EB 2	WB 1	WB 2	NB 1	NB 2	NB 3	SB 1	SB 2	SB 3
Volume Total	1	2	32	130	11	391	246	86	392	201
Volume Left	1	0	32	0	11	0	0	86	0	0
Volume Right	0	1	0	119	0	0	51	0	0	5
cSH	255	403	310	548	826	1700	1700	813	1700	1700
Volume to Capacity	0.00	0.00	0.10	0.24	0.01	0.23	0.14	0.11	0.23	0.12
Queue Length 95th (m)	0.1	0.1	2.7	7.3	0.3	0.0	0.0	2.8	0.0	0.0
Control Delay (s)	19.2	14.0	17.9	13.6	9.4	0.0	0.0	9.9	0.0	0.0
Lane LOS	C	B	C	B	A			A		
Approach Delay (s)	15.7		14.5		0.2			1.3		
Approach LOS	C		B							

Intersection Summary				
Average Delay	2.2			
Intersection Capacity Utilization	41.0%	ICU Level of Service		A
Analysis Period (min)	15			



Movement	EBL	EBT	EBR	WBL	WBT	WBR	NBL	NBT	NBR	SBL	SBT	SBR
Lane Configurations												
Traffic Volume (veh/h)	3	117	15	12	143	12	5	4	4	7	3	14
Future Volume (Veh/h)	3	117	15	12	143	12	5	4	4	7	3	14
Sign Control		Free			Free			Stop			Stop	
Grade		0%			0%			0%			0%	
Peak Hour Factor	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00
Hourly flow rate (vph)	3	117	15	12	143	12	5	4	4	7	3	14
Pedestrians											1	
Lane Width (m)											3.7	
Walking Speed (m/s)											1.2	
Percent Blockage											0	
Right turn flare (veh)												
Median type		None			None							
Median storage veh)												
Upstream signal (m)												
pX, platoon unblocked												
vC, conflicting volume	156			132			319	310	124	310	312	150
vC1, stage 1 conf vol												
vC2, stage 2 conf vol												
vCu, unblocked vol	156			132			319	310	124	310	312	150
tC, single (s)	4.1			4.1			7.5	6.8	6.7	7.5	6.8	6.6
tC, 2 stage (s)												
tF (s)	2.2			2.2			3.9	4.2	3.8	3.9	4.3	3.6
p0 queue free %	100			99			99	99	100	99	99	98
cM capacity (veh/h)	1435			1466			550	562	812	558	549	814

Direction, Lane #	EB 1	WB 1	NB 1	SB 1
Volume Total	135	167	13	24
Volume Left	3	12	5	7
Volume Right	15	12	4	14
cSH	1435	1466	615	682
Volume to Capacity	0.00	0.01	0.02	0.04
Queue Length 95th (m)	0.1	0.2	0.5	0.9
Control Delay (s)	0.2	0.6	11.0	10.5
Lane LOS	A	A	B	B
Approach Delay (s)	0.2	0.6	11.0	10.5
Approach LOS			B	B

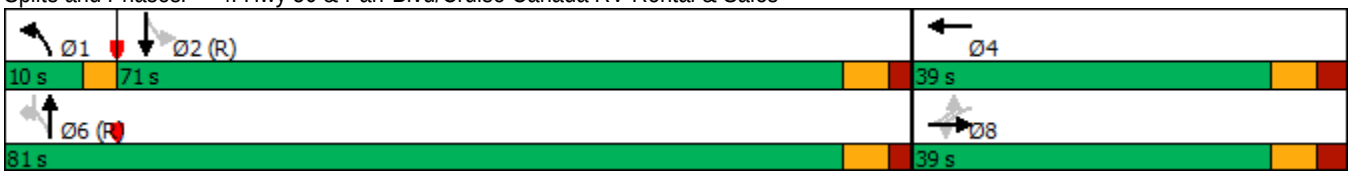
Intersection Summary				
Average Delay	1.5			
Intersection Capacity Utilization	24.4%	ICU Level of Service	A	
Analysis Period (min)	15			

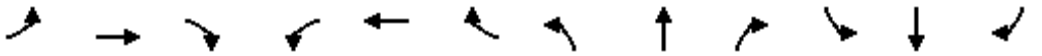
Lane Group	EBL	EBT	WBL	WBT	NBL	NBT	SBT	SBR
Lane Configurations								
Traffic Volume (vph)	27	0	1	0	199	1067	1180	44
Future Volume (vph)	27	0	1	0	199	1067	1180	44
Lane Group Flow (vph)	27	102	0	1	199	1069	1180	44
Turn Type	Perm	NA	D.Pm	NA	pm+pt	NA	NA	custom
Protected Phases		8		4	1	6	2	
Permitted Phases	8		8		6			6
Detector Phase	8	8	8	4	1	6	2	6
Switch Phase								
Minimum Initial (s)	8.0	8.0	8.0	8.0	5.0	12.0	12.0	12.0
Minimum Split (s)	33.9	33.9	33.9	33.9	9.5	30.1	30.1	30.1
Total Split (s)	39.0	39.0	39.0	39.0	10.0	81.0	71.0	81.0
Total Split (%)	32.5%	32.5%	32.5%	32.5%	8.3%	67.5%	59.2%	67.5%
Yellow Time (s)	4.0	4.0	4.0	4.0	3.0	4.0	4.0	4.0
All-Red Time (s)	2.9	2.9	2.9	2.9	0.0	2.1	2.1	2.1
Lost Time Adjust (s)	0.0	0.0		0.0	0.0	0.0	0.0	0.0
Total Lost Time (s)	6.9	6.9		6.9	3.0	6.1	6.1	6.1
Lead/Lag					Lead		Lag	
Lead-Lag Optimize?								
Recall Mode	None	None	None	None	None	C-Max	C-Max	C-Max
v/c Ratio	0.28	0.44		0.01	0.53	0.39	0.54	0.04
Control Delay	59.4	7.2		50.0	6.9	3.5	10.5	1.0
Queue Delay	0.0	0.0		0.0	0.0	0.0	0.0	0.0
Total Delay	59.4	7.2		50.0	6.9	3.5	10.5	1.0
Queue Length 50th (m)	6.5	0.0		0.2	6.1	27.5	63.2	0.3
Queue Length 95th (m)	16.1	3.5		2.1	12.2	41.0	100.3	2.5
Internal Link Dist (m)		828.8		20.9		732.4	332.3	
Turn Bay Length (m)	80.0				35.0			20.0
Base Capacity (vph)	355	432		354	379	2738	2205	1222
Starvation Cap Reductn	0	0		0	0	0	0	0
Spillback Cap Reductn	0	0		0	0	0	0	0
Storage Cap Reductn	0	0		0	0	0	0	0
Reduced v/c Ratio	0.08	0.24		0.00	0.53	0.39	0.54	0.04

Intersection Summary

Cycle Length: 120
Actuated Cycle Length: 120
Offset: 8 (7%), Referenced to phase 2:SBTL and 6:NBTL, Start of Green
Natural Cycle: 90
Control Type: Actuated-Coordinated

Splits and Phases: 4: Hwy 50 & Parr Blvd/Cruise Canada RV Rental & Sales





Movement	EBL	EBT	EBR	WBL	WBT	WBR	NBL	NBT	NBR	SBL	SBT	SBR
Lane Configurations												
Traffic Volume (vph)	27	0	102	1	0	0	199	1067	2	0	1180	44
Future Volume (vph)	27	0	102	1	0	0	199	1067	2	0	1180	44
Ideal Flow (vphpl)	1900	1900	1900	1900	1900	1900	1900	1900	1900	1900	1900	1900
Lane Width	3.5	3.7	3.5	3.5	3.7	3.5	3.5	3.7	3.5	3.5	3.7	3.5
Total Lost time (s)	6.9	6.9			6.9		3.0	6.1			6.1	6.1
Lane Util. Factor	1.00	1.00			1.00		1.00	0.95			0.95	1.00
Frpb, ped/bikes	1.00	1.00			1.00		1.00	1.00			1.00	0.98
Flpb, ped/bikes	1.00	1.00			1.00		1.00	1.00			1.00	1.00
Frt	1.00	0.85			1.00		1.00	1.00			1.00	0.85
Flt Protected	0.95	1.00			0.95		0.95	1.00			1.00	1.00
Satd. Flow (prot)	1668	1183			1825		1513	3348			3174	1487
Flt Permitted	0.76	1.00			0.69		0.19	1.00			1.00	1.00
Satd. Flow (perm)	1330	1183			1328		310	3348			3174	1487
Peak-hour factor, PHF	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00
Adj. Flow (vph)	27	0	102	1	0	0	199	1067	2	0	1180	44
RTOR Reduction (vph)	0	94	0	0	0	0	0	0	0	0	0	6
Lane Group Flow (vph)	27	8	0	0	1	0	199	1069	0	0	1180	38
Confl. Peds. (#/hr)							1		2	2		1
Confl. Bikes (#/hr)									1			
Heavy Vehicles (%)	7%	0%	38%	0%	0%	0%	18%	9%	0%	0%	15%	5%
Turn Type	Perm	NA		D.Pm	NA		pm+pt	NA		Perm	NA	custom
Protected Phases		8			4		1	6			2	
Permitted Phases	8			8			6			2		6
Actuated Green, G (s)	8.9	8.9			8.9		98.1	98.1			83.4	98.1
Effective Green, g (s)	8.9	8.9			8.9		98.1	98.1			83.4	98.1
Actuated g/C Ratio	0.07	0.07			0.07		0.82	0.82			0.70	0.82
Clearance Time (s)	6.9	6.9			6.9		3.0	6.1			6.1	6.1
Vehicle Extension (s)	3.0	3.0			3.0		3.0	3.0			3.0	3.0
Lane Grp Cap (vph)	98	87			98		370	2736			2205	1215
v/s Ratio Prot		0.01					c0.05	0.32			0.37	
v/s Ratio Perm	c0.02				0.00		c0.39					0.03
v/c Ratio	0.28	0.09			0.01		0.54	0.39			0.54	0.03
Uniform Delay, d1	52.5	51.8			51.5		4.6	2.9			8.9	2.1
Progression Factor	1.00	1.00			1.00		1.00	1.00			1.00	1.00
Incremental Delay, d2	1.5	0.4			0.0		1.5	0.4			0.9	0.0
Delay (s)	54.0	52.2			51.5		6.1	3.4			9.8	2.1
Level of Service	D	D			D		A	A			A	A
Approach Delay (s)		52.6			51.5			3.8			9.5	
Approach LOS		D			D			A			A	

Intersection Summary			
HCM 2000 Control Delay	8.9	HCM 2000 Level of Service	A
HCM 2000 Volume to Capacity ratio	0.53		
Actuated Cycle Length (s)	120.0	Sum of lost time (s)	16.0
Intersection Capacity Utilization	64.5%	ICU Level of Service	C
Analysis Period (min)	15		

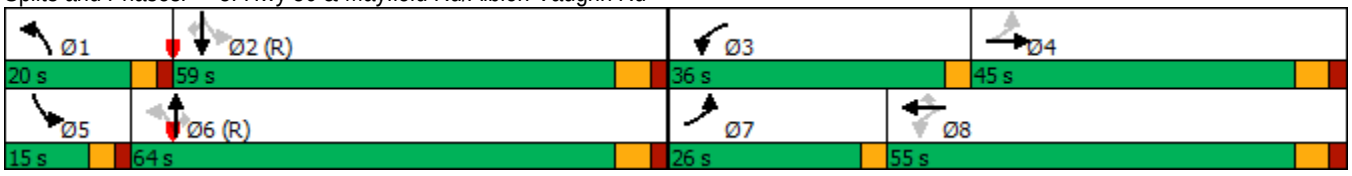
c Critical Lane Group

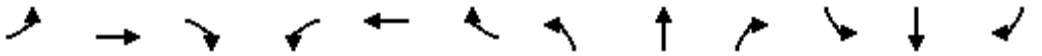
Lane Group	EBL	EBT	WBL	WBT	WBR	NBL	NBT	NBR	SBL	SBT	SBR
Lane Configurations											
Traffic Volume (vph)	63	130	354	213	39	103	1091	170	31	1139	64
Future Volume (vph)	63	130	354	213	39	103	1091	170	31	1139	64
Lane Group Flow (vph)	63	337	354	213	39	103	1091	170	31	1139	64
Turn Type	pm+pt	NA	pm+pt	NA	Perm	pm+pt	NA	Perm	pm+pt	NA	Perm
Protected Phases	7	4	3	8		1	6		5	2	
Permitted Phases	4		8		8	6		6	2		2
Detector Phase	7	4	3	8	8	1	6	6	5	2	2
Switch Phase											
Minimum Initial (s)	5.0	12.0	10.0	12.0	12.0	10.0	20.0	20.0	10.0	20.0	20.0
Minimum Split (s)	9.5	43.5	14.5	43.5	43.5	15.0	41.3	41.3	15.0	41.3	41.3
Total Split (s)	26.0	45.0	36.0	55.0	55.0	20.0	64.0	64.0	15.0	59.0	59.0
Total Split (%)	16.3%	28.1%	22.5%	34.4%	34.4%	12.5%	40.0%	40.0%	9.4%	36.9%	36.9%
Yellow Time (s)	3.0	4.0	3.0	4.0	4.0	3.0	4.2	4.2	3.0	4.2	4.2
All-Red Time (s)	0.0	2.5	0.0	2.5	2.5	2.0	2.1	2.1	2.0	2.1	2.1
Lost Time Adjust (s)	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
Total Lost Time (s)	3.0	6.5	3.0	6.5	6.5	5.0	6.3	6.3	5.0	6.3	6.3
Lead/Lag	Lead	Lag	Lead	Lag	Lag	Lead	Lag	Lag	Lead	Lag	Lag
Lead-Lag Optimize?											
Recall Mode	None	None	None	None	None	None	C-Max	C-Max	None	C-Max	C-Max
v/c Ratio	0.27	0.84	0.94	0.47	0.09	0.54	0.63	0.22	0.13	0.79	0.09
Control Delay	38.8	49.8	77.7	53.8	0.4	27.0	31.4	8.5	16.8	42.1	1.7
Queue Delay	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
Total Delay	38.8	49.8	77.7	53.8	0.4	27.0	31.4	8.5	16.8	42.1	1.7
Queue Length 50th (m)	14.4	27.1	99.3	61.7	0.0	14.3	140.6	8.3	4.0	167.0	0.0
Queue Length 95th (m)	24.2	44.4	#144.5	84.8	0.5	30.6	185.9	25.7	10.3	#253.8	3.0
Internal Link Dist (m)		330.4		656.8			717.1			732.4	
Turn Bay Length (m)	60.0		50.0		50.0	100.0		85.0	35.0		120.0
Base Capacity (vph)	375	671	387	544	514	203	1720	790	237	1446	725
Starvation Cap Reductn	0	0	0	0	0	0	0	0	0	0	0
Spillback Cap Reductn	0	0	0	0	0	0	0	0	0	0	0
Storage Cap Reductn	0	0	0	0	0	0	0	0	0	0	0
Reduced v/c Ratio	0.17	0.50	0.91	0.39	0.08	0.51	0.63	0.22	0.13	0.79	0.09

Intersection Summary

Cycle Length: 160
Actuated Cycle Length: 160
Offset: 27 (17%), Referenced to phase 2:SBTL and 6:NBTL, Start of Green
Natural Cycle: 125
Control Type: Actuated-Coordinated
95th percentile volume exceeds capacity, queue may be longer.
Queue shown is maximum after two cycles.

Splits and Phases: 5: Hwy 50 & Mayfield Rd/Albion Vaughn Rd

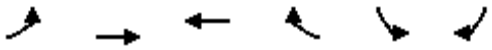




Movement	EBL	EBT	EBR	WBL	WBT	WBR	NBL	NBT	NBR	SBL	SBT	SBR
Lane Configurations												
Traffic Volume (vph)	63	130	207	354	213	39	103	1091	170	31	1139	64
Future Volume (vph)	63	130	207	354	213	39	103	1091	170	31	1139	64
Ideal Flow (vphpl)	1900	1900	1900	1900	1900	1900	1900	1900	1900	1900	1900	1900
Lane Width	3.5	3.7	3.5	3.5	3.7	3.5	3.5	3.7	3.5	3.5	3.7	3.5
Total Lost time (s)	3.0	6.5		3.0	6.5	6.5	5.0	6.3	6.3	5.0	6.3	6.3
Lane Util. Factor	1.00	0.95		1.00	1.00	1.00	1.00	0.95	1.00	1.00	0.95	1.00
Frt	1.00	0.91		1.00	1.00	0.85	1.00	1.00	0.85	1.00	1.00	0.85
Flt Protected	0.95	1.00		0.95	1.00	1.00	0.95	1.00	1.00	0.95	1.00	1.00
Satd. Flow (prot)	1653	2201		1623	1795	1521	1190	3288	1401	1539	3093	1439
Flt Permitted	0.62	1.00		0.22	1.00	1.00	0.12	1.00	1.00	0.18	1.00	1.00
Satd. Flow (perm)	1087	2201		382	1795	1521	149	3288	1401	297	3093	1439
Peak-hour factor, PHF	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00
Adj. Flow (vph)	63	130	207	354	213	39	103	1091	170	31	1139	64
RTOR Reduction (vph)	0	167	0	0	0	29	0	0	59	0	0	34
Lane Group Flow (vph)	63	170	0	354	213	10	103	1091	111	31	1139	30
Heavy Vehicles (%)	8%	26%	66%	10%	7%	5%	50%	11%	14%	16%	18%	11%
Turn Type	pm+pt	NA		pm+pt	NA	Perm	pm+pt	NA	Perm	pm+pt	NA	Perm
Protected Phases	7	4		3	8		1	6		5	2	
Permitted Phases	4			8		8	6		6	2		2
Actuated Green, G (s)	25.6	17.4		52.1	40.9	40.9	95.1	82.1	82.1	82.2	74.2	74.2
Effective Green, g (s)	25.6	17.4		52.1	40.9	40.9	95.1	82.1	82.1	82.2	74.2	74.2
Actuated g/C Ratio	0.16	0.11		0.33	0.26	0.26	0.59	0.51	0.51	0.51	0.46	0.46
Clearance Time (s)	3.0	6.5		3.0	6.5	6.5	5.0	6.3	6.3	5.0	6.3	6.3
Vehicle Extension (s)	3.0	3.0		3.0	3.0	3.0	3.0	3.0	3.0	3.0	3.0	3.0
Lane Grp Cap (vph)	202	239		370	458	388	192	1687	718	214	1434	667
v/s Ratio Prot	0.02	0.08		c0.19	0.12		c0.05	c0.33		0.01	c0.37	
v/s Ratio Perm	0.03			c0.12		0.01	0.27		0.08	0.07		0.02
v/c Ratio	0.31	0.71		0.96	0.47	0.03	0.54	0.65	0.15	0.14	0.79	0.04
Uniform Delay, d1	58.7	68.9		47.3	50.3	44.6	22.5	28.4	20.6	21.0	36.4	23.5
Progression Factor	1.00	1.00		1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00
Incremental Delay, d2	0.9	9.6		35.2	0.7	0.0	2.9	1.9	0.5	0.3	4.6	0.1
Delay (s)	59.6	78.5		82.5	51.1	44.6	25.3	30.3	21.1	21.3	41.0	23.6
Level of Service	E	E		F	D	D	C	C	C	C	D	C
Approach Delay (s)		75.5			69.0			28.8			39.6	
Approach LOS		E			E			C			D	

Intersection Summary			
HCM 2000 Control Delay	44.5	HCM 2000 Level of Service	D
HCM 2000 Volume to Capacity ratio	0.84		
Actuated Cycle Length (s)	160.0	Sum of lost time (s)	20.8
Intersection Capacity Utilization	87.9%	ICU Level of Service	E
Analysis Period (min)	15		

c Critical Lane Group



Movement	EBL	EBT	WBT	WBR	SBL	SBR
Lane Configurations						
Traffic Volume (veh/h)	1	403	359	1	1	2
Future Volume (Veh/h)	1	403	359	1	1	2
Sign Control		Free	Free		Stop	
Grade		0%	0%		0%	
Peak Hour Factor	1.00	1.00	1.00	1.00	1.00	1.00
Hourly flow rate (vph)	1	403	359	1	1	2
Pedestrians						
Lane Width (m)						
Walking Speed (m/s)						
Percent Blockage						
Right turn flare (veh)						
Median type		None	None			
Median storage veh)						
Upstream signal (m)		233				
pX, platoon unblocked					0.98	
vC, conflicting volume	360				563	180
vC1, stage 1 conf vol						
vC2, stage 2 conf vol						
vCu, unblocked vol	360				523	180
tC, single (s)	4.1				6.8	8.9
tC, 2 stage (s)						
tF (s)	2.2				3.5	4.3
p0 queue free %	100				100	100
cM capacity (veh/h)	1210				480	596

Direction, Lane #	EB 1	EB 2	EB 3	WB 1	WB 2	SB 1
Volume Total	1	202	202	239	121	3
Volume Left	1	0	0	0	0	1
Volume Right	0	0	0	0	1	2
cSH	1210	1700	1700	1700	1700	552
Volume to Capacity	0.00	0.12	0.12	0.14	0.07	0.01
Queue Length 95th (m)	0.0	0.0	0.0	0.0	0.0	0.1
Control Delay (s)	8.0	0.0	0.0	0.0	0.0	11.6
Lane LOS	A					B
Approach Delay (s)	0.0			0.0		11.6
Approach LOS						B

Intersection Summary			
Average Delay	0.1		
Intersection Capacity Utilization	21.1%	ICU Level of Service	A
Analysis Period (min)	15		

Movement	WBL	WBR	NBT	NBR	SBL	SBT
Lane Configurations						
Traffic Volume (veh/h)	0	0	635	0	0	631
Future Volume (Veh/h)	0	0	635	0	0	631
Sign Control	Stop		Free			Free
Grade	0%		0%			0%
Peak Hour Factor	1.00	1.00	1.00	1.00	1.00	1.00
Hourly flow rate (vph)	0	0	635	0	0	631
Pedestrians						
Lane Width (m)						
Walking Speed (m/s)						
Percent Blockage						
Right turn flare (veh)						
Median type			TWLTL			TWLTL
Median storage veh)			2			2
Upstream signal (m)						
pX, platoon unblocked						
vC, conflicting volume	950	318			635	
vC1, stage 1 conf vol	635					
vC2, stage 2 conf vol	316					
vCu, unblocked vol	950	318			635	
tC, single (s)	6.8	6.9			4.1	
tC, 2 stage (s)	5.8					
tF (s)	3.5	3.3			2.2	
p0 queue free %	100	100			100	
cM capacity (veh/h)	450	684			958	

Direction, Lane #	WB 1	NB 1	NB 2	SB 1	SB 2
Volume Total	0	423	212	210	421
Volume Left	0	0	0	0	0
Volume Right	0	0	0	0	0
cSH	1700	1700	1700	958	1700
Volume to Capacity	0.00	0.25	0.12	0.00	0.25
Queue Length 95th (m)	0.0	0.0	0.0	0.0	0.0
Control Delay (s)	0.0	0.0	0.0	0.0	0.0
Lane LOS	A				
Approach Delay (s)	0.0	0.0		0.0	
Approach LOS	A				

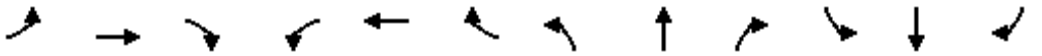
Intersection Summary			
Average Delay	0.0		
Intersection Capacity Utilization	20.9%	ICU Level of Service	A
Analysis Period (min)	15		

Lane Group	EBL	EBT	WBL	WBT	NBL	NBT	SBL	SBT
Lane Configurations								
Traffic Volume (vph)	306	344	26	316	26	523	86	490
Future Volume (vph)	306	344	26	316	26	523	86	490
Lane Group Flow (vph)	306	379	26	393	26	554	86	920
Turn Type	pm+pt	NA	Perm	NA	Perm	NA	pm+pt	NA
Protected Phases	5	2		6		4	3	8
Permitted Phases	2		6		4		8	
Detector Phase	5	2	6	6	4	4	3	8
Switch Phase								
Minimum Initial (s)	5.0	12.0	12.0	12.0	12.0	12.0	5.0	12.0
Minimum Split (s)	9.5	37.0	37.0	37.0	37.0	37.0	12.5	37.0
Total Split (s)	12.0	80.0	68.0	68.0	36.0	36.0	14.0	50.0
Total Split (%)	9.2%	61.5%	52.3%	52.3%	27.7%	27.7%	10.8%	38.5%
Yellow Time (s)	3.0	4.6	4.6	4.6	4.2	4.2	3.0	4.2
All-Red Time (s)	0.0	2.4	2.4	2.4	2.8	2.8	0.0	2.8
Lost Time Adjust (s)	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
Total Lost Time (s)	3.0	7.0	7.0	7.0	7.0	7.0	3.0	7.0
Lead/Lag	Lead		Lag	Lag	Lag	Lag	Lead	
Lead-Lag Optimize?								
Recall Mode	None	C-Max	C-Max	C-Max	None	None	None	None
v/c Ratio	0.57	0.19	0.06	0.29	0.51	0.82	0.52	0.85
Control Delay	17.5	12.3	19.5	19.4	80.4	60.1	41.9	42.5
Queue Delay	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
Total Delay	17.5	12.3	19.5	19.4	80.4	60.1	41.9	42.5
Queue Length 50th (m)	37.4	22.9	3.8	30.7	6.3	75.1	16.5	99.8
Queue Length 95th (m)	59.4	33.5	9.5	42.8	#18.6	93.6	28.7	122.4
Internal Link Dist (m)		689.8		209.6		564.3		579.6
Turn Bay Length (m)	100.0		85.0		105.0		145.0	
Base Capacity (vph)	541	1972	419	1369	59	783	173	1198
Starvation Cap Reductn	0	0	0	0	0	0	0	0
Spillback Cap Reductn	0	0	0	0	0	0	0	0
Storage Cap Reductn	0	0	0	0	0	0	0	0
Reduced v/c Ratio	0.57	0.19	0.06	0.29	0.44	0.71	0.50	0.77

Intersection Summary

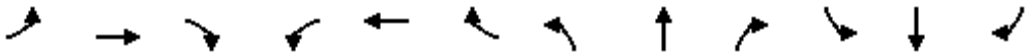
Cycle Length: 130
Actuated Cycle Length: 130
Offset: 116 (89%), Referenced to phase 2:EBTL and 6:WBTL, Start of Green
Natural Cycle: 100
Control Type: Actuated-Coordinated
95th percentile volume exceeds capacity, queue may be longer.
Queue shown is maximum after two cycles.

Splits and Phases: 1: Coleraine Dr & Mayfield Rd



Movement	EBL	EBT	EBR	WBL	WBT	WBR	NBL	NBT	NBR	SBL	SBT	SBR
Lane Configurations												
Traffic Volume (vph)	306	344	35	26	316	77	26	523	31	86	490	430
Future Volume (vph)	306	344	35	26	316	77	26	523	31	86	490	430
Ideal Flow (vphpl)	1900	1900	1900	1900	1900	1900	1900	1900	1900	1900	1900	1900
Lane Width	3.5	3.7	3.5	3.5	3.7	3.5	3.5	3.7	3.5	3.5	3.7	3.5
Total Lost time (s)	3.0	7.0		7.0	7.0		7.0	7.0		3.0	7.0	
Lane Util. Factor	1.00	0.95		1.00	0.95		1.00	0.95		1.00	0.95	
Frpb, ped/bikes	1.00	1.00		1.00	1.00		1.00	1.00		1.00	1.00	
Flpb, ped/bikes	1.00	1.00		1.00	1.00		1.00	1.00		1.00	1.00	
Frt	1.00	0.99		1.00	0.97		1.00	0.99		1.00	0.93	
Flt Protected	0.95	1.00		0.95	1.00		0.95	1.00		0.95	1.00	
Satd. Flow (prot)	1487	3283		1552	2777		1594	3498		1322	3253	
Flt Permitted	0.48	1.00		0.53	1.00		0.16	1.00		0.19	1.00	
Satd. Flow (perm)	757	3283		861	2777		267	3498		260	3253	
Peak-hour factor, PHF	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00
Adj. Flow (vph)	306	344	35	26	316	77	26	523	31	86	490	430
RTOR Reduction (vph)	0	5	0	0	16	0	0	3	0	0	129	0
Lane Group Flow (vph)	306	374	0	26	377	0	26	551	0	86	791	0
Confl. Peds. (#/hr)									1	1		
Heavy Vehicles (%)	20%	10%	6%	15%	16%	75%	12%	3%	10%	35%	2%	7%
Turn Type	pm+pt	NA		Perm	NA		Perm	NA		pm+pt	NA	
Protected Phases	5	2			6			4		3	8	
Permitted Phases	2			6			4			8		
Actuated Green, G (s)	77.9	77.9		63.3	63.3		25.1	25.1		38.1	38.1	
Effective Green, g (s)	77.9	77.9		63.3	63.3		25.1	25.1		38.1	38.1	
Actuated g/C Ratio	0.60	0.60		0.49	0.49		0.19	0.19		0.29	0.29	
Clearance Time (s)	3.0	7.0		7.0	7.0		7.0	7.0		3.0	7.0	
Vehicle Extension (s)	3.0	3.0		3.0	3.0		3.0	3.0		3.0	3.0	
Lane Grp Cap (vph)	518	1967		419	1352		51	675		157	953	
v/s Ratio Prot	c0.05	0.11			0.14			0.16		0.04	c0.24	
v/s Ratio Perm	c0.30			0.03			0.10			0.12		
v/c Ratio	0.59	0.19		0.06	0.28		0.51	0.82		0.55	0.83	
Uniform Delay, d1	13.8	11.8		17.6	19.8		46.9	50.2		35.9	42.9	
Progression Factor	1.00	1.00		1.00	1.00		1.00	1.00		1.00	1.00	
Incremental Delay, d2	1.8	0.2		0.3	0.5		7.8	7.5		3.9	6.2	
Delay (s)	15.6	12.0		17.9	20.3		54.7	57.8		39.8	49.2	
Level of Service	B	B		B	C		D	E		D	D	
Approach Delay (s)		13.6			20.2			57.6			48.4	
Approach LOS		B			C			E			D	

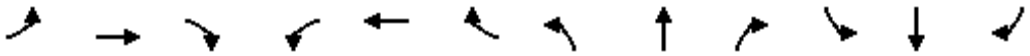
Intersection Summary			
HCM 2000 Control Delay	37.1	HCM 2000 Level of Service	D
HCM 2000 Volume to Capacity ratio	0.70		
Actuated Cycle Length (s)	130.0	Sum of lost time (s)	20.0
Intersection Capacity Utilization	86.3%	ICU Level of Service	E
Analysis Period (min)	15		
c Critical Lane Group			



Movement	EBL	EBT	EBR	WBL	WBT	WBR	NBL	NBT	NBR	SBL	SBT	SBR
Lane Configurations												
Traffic Volume (veh/h)	3	3	13	28	5	95	13	830	20	108	931	4
Future Volume (Veh/h)	3	3	13	28	5	95	13	830	20	108	931	4
Sign Control		Stop			Stop			Free			Free	
Grade		0%			0%			0%			0%	
Peak Hour Factor	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00
Hourly flow rate (vph)	3	3	13	28	5	95	13	830	20	108	931	4
Pedestrians												
Lane Width (m)												
Walking Speed (m/s)												
Percent Blockage												
Right turn flare (veh)												
Median type								TWLTL			None	
Median storage veh)								2				
Upstream signal (m)												
pX, platoon unblocked												
vC, conflicting volume	1688	2025	468	1562	2017	425	935			850		
vC1, stage 1 conf vol	1149	1149		866	866							
vC2, stage 2 conf vol	538	876		696	1151							
vCu, unblocked vol	1688	2025	468	1562	2017	425	935			850		
tC, single (s)	7.5	7.2	7.1	7.9	7.7	7.3	5.8			4.3		
tC, 2 stage (s)	6.5	6.2		6.9	6.7							
tF (s)	3.5	4.3	3.4	3.7	4.6	3.5	3.1			2.3		
p0 queue free %	98	98	98	86	96	82	97			85		
cM capacity (veh/h)	154	129	526	199	118	535	379			729		

Direction, Lane #	EB 1	EB 2	WB 1	WB 2	NB 1	NB 2	NB 3	SB 1	SB 2	SB 3
Volume Total	3	16	28	100	13	553	297	108	621	314
Volume Left	3	0	28	0	13	0	0	108	0	0
Volume Right	0	13	0	95	0	0	20	0	0	4
cSH	154	334	199	455	379	1700	1700	729	1700	1700
Volume to Capacity	0.02	0.05	0.14	0.22	0.03	0.33	0.17	0.15	0.37	0.18
Queue Length 95th (m)	0.5	1.2	3.9	6.6	0.9	0.0	0.0	4.1	0.0	0.0
Control Delay (s)	28.8	16.3	26.1	15.1	14.8	0.0	0.0	10.8	0.0	0.0
Lane LOS	D	C	D	C	B			B		
Approach Delay (s)	18.3		17.5		0.2			1.1		
Approach LOS	C		C							

Intersection Summary				
Average Delay	1.9			
Intersection Capacity Utilization	47.8%	ICU Level of Service		A
Analysis Period (min)	15			



Movement	EBL	EBT	EBR	WBL	WBT	WBR	NBL	NBT	NBR	SBL	SBT	SBR
Lane Configurations												
Traffic Volume (veh/h)	4	135	8	7	110	14	8	0	8	21	0	9
Future Volume (Veh/h)	4	135	8	7	110	14	8	0	8	21	0	9
Sign Control		Free			Free			Stop			Stop	
Grade		0%			0%			0%			0%	
Peak Hour Factor	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00
Hourly flow rate (vph)	4	135	8	7	110	14	8	0	8	21	0	9
Pedestrians												
Lane Width (m)												
Walking Speed (m/s)												
Percent Blockage												
Right turn flare (veh)												
Median type		None			None							
Median storage veh)												
Upstream signal (m)												
pX, platoon unblocked												
vC, conflicting volume	124			143			287	285	139	286	282	117
vC1, stage 1 conf vol												
vC2, stage 2 conf vol												
vCu, unblocked vol	124			143			287	285	139	286	282	117
tC, single (s)	4.3			4.4			7.2	6.5	6.5	7.2	6.5	6.3
tC, 2 stage (s)												
tF (s)	2.4			2.5			3.6	4.0	3.5	3.6	4.0	3.4
p0 queue free %	100			99			99	100	99	97	100	99
cM capacity (veh/h)	1332			1290			633	622	852	640	625	911

Direction, Lane #	EB 1	WB 1	NB 1	SB 1
Volume Total	147	131	16	30
Volume Left	4	7	8	21
Volume Right	8	14	8	9
cSH	1332	1290	726	703
Volume to Capacity	0.00	0.01	0.02	0.04
Queue Length 95th (m)	0.1	0.1	0.5	1.1
Control Delay (s)	0.2	0.5	10.1	10.3
Lane LOS	A	A	B	B
Approach Delay (s)	0.2	0.5	10.1	10.3
Approach LOS			B	B

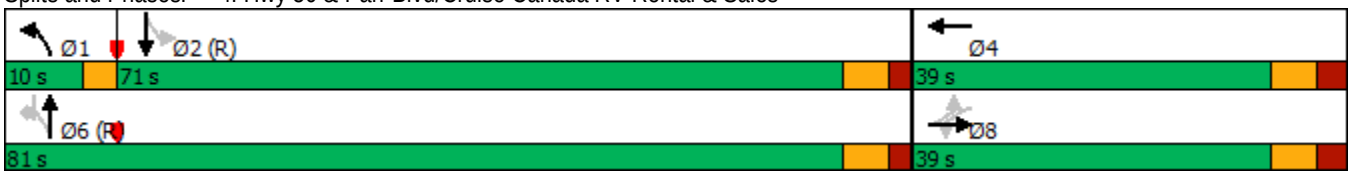
Intersection Summary				
Average Delay	1.7			
Intersection Capacity Utilization	19.9%	ICU Level of Service	A	
Analysis Period (min)	15			

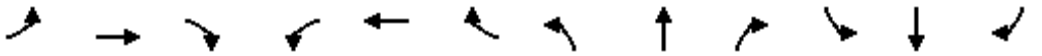
Lane Group	EBL	EBT	WBL	WBT	NBL	NBT	SBL	SBT	SBR
Lane Configurations									
Traffic Volume (vph)	55	0	1	0	113	1291	1	1193	39
Future Volume (vph)	55	0	1	0	113	1291	1	1193	39
Lane Group Flow (vph)	55	170	0	2	113	1291	1	1193	39
Turn Type	Perm	NA	D.Pm	NA	pm+pt	NA	Perm	NA	custom
Protected Phases		8		4	1	6		2	
Permitted Phases	8		8		6		2		6
Detector Phase	8	8	8	4	1	6	2	2	6
Switch Phase									
Minimum Initial (s)	8.0	8.0	8.0	8.0	5.0	12.0	12.0	12.0	12.0
Minimum Split (s)	33.9	33.9	33.9	33.9	9.5	30.1	30.1	30.1	30.1
Total Split (s)	39.0	39.0	39.0	39.0	10.0	81.0	71.0	71.0	81.0
Total Split (%)	32.5%	32.5%	32.5%	32.5%	8.3%	67.5%	59.2%	59.2%	67.5%
Yellow Time (s)	4.0	4.0	4.0	4.0	3.0	4.0	4.0	4.0	4.0
All-Red Time (s)	2.9	2.9	2.9	2.9	0.0	2.1	2.1	2.1	2.1
Lost Time Adjust (s)	0.0	0.0		0.0	0.0	0.0	0.0	0.0	0.0
Total Lost Time (s)	6.9	6.9		6.9	3.0	6.1	6.1	6.1	6.1
Lead/Lag					Lead		Lag	Lag	
Lead-Lag Optimize?									
Recall Mode	None	None	None	None	None	C-Max	C-Max	C-Max	C-Max
v/c Ratio	0.46	0.62		0.01	0.37	0.49	0.00	0.48	0.03
Control Delay	63.2	19.9		0.0	5.6	4.8	6.0	8.6	1.2
Queue Delay	0.0	0.0		0.0	0.0	0.0	0.0	0.0	0.0
Total Delay	63.2	19.9		0.0	5.6	4.8	6.0	8.6	1.2
Queue Length 50th (m)	13.2	3.0		0.0	3.9	42.7	0.1	58.5	0.2
Queue Length 95th (m)	26.4	24.4		0.0	9.1	66.4	0.7	89.1	2.6
Internal Link Dist (m)		828.8		20.9		732.4		332.3	
Turn Bay Length (m)	80.0				35.0		25.0		20.0
Base Capacity (vph)	361	511		371	309	2661	287	2486	1199
Starvation Cap Reductn	0	0		0	0	0	0	0	0
Spillback Cap Reductn	0	0		0	0	0	0	0	0
Storage Cap Reductn	0	0		0	0	0	0	0	0
Reduced v/c Ratio	0.15	0.33		0.01	0.37	0.49	0.00	0.48	0.03

Intersection Summary

Cycle Length: 120
Actuated Cycle Length: 120
Offset: 3 (3%), Referenced to phase 2:SBTL and 6:NBTL, Start of Green
Natural Cycle: 80
Control Type: Actuated-Coordinated

Splits and Phases: 4: Hwy 50 & Parr Blvd/Cruise Canada RV Rental & Sales





Movement	EBL	EBT	EBR	WBL	WBT	WBR	NBL	NBT	NBR	SBL	SBT	SBR
Lane Configurations												
Traffic Volume (vph)	55	0	170	1	0	1	113	1291	0	1	1193	39
Future Volume (vph)	55	0	170	1	0	1	113	1291	0	1	1193	39
Ideal Flow (vphpl)	1900	1900	1900	1900	1900	1900	1900	1900	1900	1900	1900	1900
Lane Width	3.5	3.7	3.5	3.5	3.7	3.5	3.5	3.7	3.5	3.5	3.7	3.5
Total Lost time (s)	6.9	6.9			6.9		3.0	6.1		6.1	6.1	6.1
Lane Util. Factor	1.00	1.00			1.00		1.00	0.95		1.00	0.95	1.00
Frpb, ped/bikes	1.00	1.00			0.99		1.00	1.00		1.00	1.00	0.98
Flpb, ped/bikes	1.00	1.00			1.00		1.00	1.00		1.00	1.00	1.00
Frt	1.00	0.85			0.93		1.00	1.00		1.00	1.00	0.85
Flt Protected	0.95	1.00			0.98		0.95	1.00		0.95	1.00	1.00
Satd. Flow (prot)	1695	1484			1735		1394	3318		1785	3476	1487
Flt Permitted	0.76	1.00			0.70		0.20	1.00		0.21	1.00	1.00
Satd. Flow (perm)	1350	1484			1239		288	3318		402	3476	1487
Peak-hour factor, PHF	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00
Adj. Flow (vph)	55	0	170	1	0	1	113	1291	0	1	1193	39
RTOR Reduction (vph)	0	143	0	0	2	0	0	0	0	0	0	7
Lane Group Flow (vph)	55	27	0	0	0	0	113	1291	0	1	1193	32
Confl. Peds. (#/hr)	2					2	1					1
Heavy Vehicles (%)	5%	0%	10%	0%	0%	0%	28%	10%	0%	0%	5%	5%
Turn Type	Perm	NA		D.Pm	NA		pm+pt	NA		Perm	NA	custom
Protected Phases		8			4		1	6			2	
Permitted Phases	8			8			6			2		6
Actuated Green, G (s)	10.7	10.7			10.7		96.3	96.3		85.9	85.9	96.3
Effective Green, g (s)	10.7	10.7			10.7		96.3	96.3		85.9	85.9	96.3
Actuated g/C Ratio	0.09	0.09			0.09		0.80	0.80		0.72	0.72	0.80
Clearance Time (s)	6.9	6.9			6.9		3.0	6.1		6.1	6.1	6.1
Vehicle Extension (s)	3.0	3.0			3.0		3.0	3.0		3.0	3.0	3.0
Lane Grp Cap (vph)	120	132			110		299	2662		287	2488	1193
v/s Ratio Prot		0.02					0.02	c0.39			0.34	
v/s Ratio Perm	c0.04				0.00		0.28			0.00		0.02
v/c Ratio	0.46	0.20			0.00		0.38	0.48		0.00	0.48	0.03
Uniform Delay, d1	51.9	50.7			49.8		4.0	3.8		4.9	7.4	2.4
Progression Factor	1.00	1.00			1.00		1.00	1.00		1.00	1.00	1.00
Incremental Delay, d2	2.8	0.8			0.0		0.8	0.6		0.0	0.7	0.0
Delay (s)	54.7	51.5			49.8		4.8	4.5		4.9	8.0	2.4
Level of Service	D	D			D		A	A		A	A	A
Approach Delay (s)		52.3			49.8			4.5			7.9	
Approach LOS		D			D			A			A	

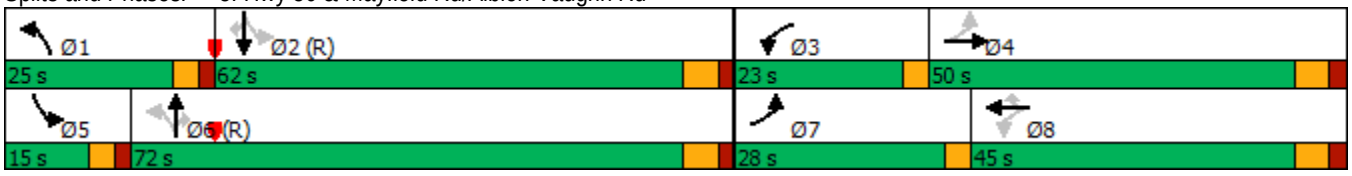
Intersection Summary			
HCM 2000 Control Delay	9.7	HCM 2000 Level of Service	A
HCM 2000 Volume to Capacity ratio	0.50		
Actuated Cycle Length (s)	120.0	Sum of lost time (s)	16.0
Intersection Capacity Utilization	72.1%	ICU Level of Service	C
Analysis Period (min)	15		
c Critical Lane Group			

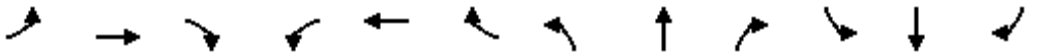
Lane Group	EBL	EBT	WBL	WBT	WBR	NBL	NBT	NBR	SBL	SBT	SBR
Lane Configurations											
Traffic Volume (vph)	85	198	212	126	33	95	1139	413	36	1266	73
Future Volume (vph)	85	198	212	126	33	95	1139	413	36	1266	73
Lane Group Flow (vph)	85	435	212	126	33	95	1139	413	36	1266	73
Turn Type	pm+pt	NA	pm+pt	NA	Perm	pm+pt	NA	Perm	pm+pt	NA	Perm
Protected Phases	7	4	3	8		1	6		5	2	
Permitted Phases	4		8		8	6		6	2		2
Detector Phase	7	4	3	8	8	1	6	6	5	2	2
Switch Phase											
Minimum Initial (s)	5.0	12.0	10.0	12.0	12.0	10.0	20.0	20.0	10.0	20.0	20.0
Minimum Split (s)	9.5	43.5	14.5	43.5	43.5	15.0	41.3	41.3	15.0	41.3	41.3
Total Split (s)	28.0	50.0	23.0	45.0	45.0	25.0	72.0	72.0	15.0	62.0	62.0
Total Split (%)	17.5%	31.3%	14.4%	28.1%	28.1%	15.6%	45.0%	45.0%	9.4%	38.8%	38.8%
Yellow Time (s)	3.0	4.0	3.0	4.0	4.0	3.0	4.2	4.2	3.0	4.2	4.2
All-Red Time (s)	0.0	2.5	0.0	2.5	2.5	2.0	2.1	2.1	2.0	2.1	2.1
Lost Time Adjust (s)	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
Total Lost Time (s)	3.0	6.5	3.0	6.5	6.5	5.0	6.3	6.3	5.0	6.3	6.3
Lead/Lag	Lead	Lag	Lead	Lag	Lag	Lead	Lag	Lag	Lead	Lag	Lag
Lead-Lag Optimize?											
Recall Mode	None	None	None	None	None	None	C-Max	C-Max	None	C-Max	C-Max
v/c Ratio	0.27	0.83	0.87	0.50	0.09	0.54	0.61	0.42	0.14	0.70	0.08
Control Delay	43.4	51.8	78.2	65.8	0.5	25.1	25.8	6.8	13.0	33.0	0.2
Queue Delay	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
Total Delay	43.4	51.8	78.2	65.8	0.5	25.1	25.8	6.8	13.0	33.0	0.2
Queue Length 50th (m)	21.3	44.0	58.0	38.4	0.0	11.3	134.8	16.7	4.0	163.4	0.0
Queue Length 95th (m)	33.8	62.0	#88.6	59.8	0.0	27.0	177.7	45.6	9.9	234.0	0.0
Internal Link Dist (m)		330.4		656.8			717.1			732.4	
Turn Bay Length (m)	60.0		50.0		50.0	100.0		85.0	35.0		120.0
Base Capacity (vph)	442	904	250	340	434	210	1853	992	263	1815	885
Starvation Cap Reductn	0	0	0	0	0	0	0	0	0	0	0
Spillback Cap Reductn	0	0	0	0	0	0	0	0	0	0	0
Storage Cap Reductn	0	0	0	0	0	0	0	0	0	0	0
Reduced v/c Ratio	0.19	0.48	0.85	0.37	0.08	0.45	0.61	0.42	0.14	0.70	0.08

Intersection Summary

Cycle Length: 160
Actuated Cycle Length: 160
Offset: 72 (45%), Referenced to phase 2:SBTL and 6:NBTL, Start of Green
Natural Cycle: 125
Control Type: Actuated-Coordinated
95th percentile volume exceeds capacity, queue may be longer.
Queue shown is maximum after two cycles.

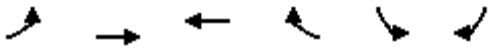
Splits and Phases: 5: Hwy 50 & Mayfield Rd/Albion Vaughn Rd





Movement	EBL	EBT	EBR	WBL	WBT	WBR	NBL	NBT	NBR	SBL	SBT	SBR
Lane Configurations												
Traffic Volume (vph)	85	198	237	212	126	33	95	1139	413	36	1266	73
Future Volume (vph)	85	198	237	212	126	33	95	1139	413	36	1266	73
Ideal Flow (vphpl)	1900	1900	1900	1900	1900	1900	1900	1900	1900	1900	1900	1900
Lane Width	3.5	3.7	3.5	3.5	3.7	3.5	3.5	3.7	3.5	3.5	3.7	3.5
Total Lost time (s)	3.0	6.5		3.0	6.5	6.5	5.0	6.3	6.3	5.0	6.3	6.3
Lane Util. Factor	1.00	0.95		1.00	1.00	1.00	1.00	0.95	1.00	1.00	0.95	1.00
Frpb, ped/bikes	1.00	1.00		1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	0.99
Flpb, ped/bikes	1.00	1.00		1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00
Frt	1.00	0.92		1.00	1.00	0.85	1.00	1.00	0.85	1.00	1.00	0.85
Flt Protected	0.95	1.00		0.95	1.00	1.00	0.95	1.00	1.00	0.95	1.00	1.00
Satd. Flow (prot)	1767	2825		1623	1413	1389	1095	3202	1493	1566	3444	1562
Flt Permitted	0.68	1.00		0.17	1.00	1.00	0.11	1.00	1.00	0.19	1.00	1.00
Satd. Flow (perm)	1258	2825		292	1413	1389	131	3202	1493	311	3444	1562
Peak-hour factor, PHF	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00
Adj. Flow (vph)	85	198	237	212	126	33	95	1139	413	36	1266	73
RTOR Reduction (vph)	0	164	0	0	0	27	0	0	131	0	0	34
Lane Group Flow (vph)	85	271	0	212	126	6	95	1139	282	36	1266	39
Confl. Bikes (#/hr)												1
Heavy Vehicles (%)	1%	11%	25%	10%	36%	15%	63%	14%	7%	14%	6%	1%
Turn Type	pm+pt	NA		pm+pt	NA	Perm	pm+pt	NA	Perm	pm+pt	NA	Perm
Protected Phases	7	4		3	8		1	6		5	2	
Permitted Phases	4			8		8	6		6	2		2
Actuated Green, G (s)	31.5	20.4		42.6	28.5	28.5	104.6	91.6	91.6	92.4	84.4	84.4
Effective Green, g (s)	31.5	20.4		42.6	28.5	28.5	104.6	91.6	91.6	92.4	84.4	84.4
Actuated g/C Ratio	0.20	0.13		0.27	0.18	0.18	0.65	0.57	0.57	0.58	0.53	0.53
Clearance Time (s)	3.0	6.5		3.0	6.5	6.5	5.0	6.3	6.3	5.0	6.3	6.3
Vehicle Extension (s)	3.0	3.0		3.0	3.0	3.0	3.0	3.0	3.0	3.0	3.0	3.0
Lane Grp Cap (vph)	282	360		237	251	247	177	1833	854	242	1816	823
v/s Ratio Prot	0.02	0.10		c0.11	0.09		c0.05	c0.36		0.01	c0.37	
v/s Ratio Perm	0.04			c0.13		0.00	0.30		0.19	0.08		0.02
v/c Ratio	0.30	0.75		0.89	0.50	0.02	0.54	0.62	0.33	0.15	0.70	0.05
Uniform Delay, d1	54.2	67.4		50.7	59.3	54.3	19.8	22.7	18.0	16.1	28.2	18.3
Progression Factor	1.00	1.00		1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00
Incremental Delay, d2	0.6	8.6		31.8	1.6	0.0	3.1	1.6	1.0	0.3	2.2	0.1
Delay (s)	54.8	76.0		82.4	60.9	54.3	22.9	24.3	19.1	16.4	30.5	18.4
Level of Service	D	E		F	E	D	C	C	B	B	C	B
Approach Delay (s)		72.5			72.6			22.9			29.5	
Approach LOS		E			E			C			C	

Intersection Summary			
HCM 2000 Control Delay	36.5	HCM 2000 Level of Service	D
HCM 2000 Volume to Capacity ratio	0.75		
Actuated Cycle Length (s)	160.0	Sum of lost time (s)	20.8
Intersection Capacity Utilization	86.3%	ICU Level of Service	E
Analysis Period (min)	15		
c Critical Lane Group			



Movement	EBL	EBT	WBT	WBR	SBL	SBR
Lane Configurations						
Traffic Volume (veh/h)	5	456	414	3	7	5
Future Volume (Veh/h)	5	456	414	3	7	5
Sign Control		Free	Free		Stop	
Grade		0%	0%		0%	
Peak Hour Factor	1.00	1.00	1.00	1.00	1.00	1.00
Hourly flow rate (vph)	5	456	414	3	7	5
Pedestrians						
Lane Width (m)						
Walking Speed (m/s)						
Percent Blockage						
Right turn flare (veh)						
Median type		None	None			
Median storage veh)						
Upstream signal (m)		233				
pX, platoon unblocked					0.97	
vC, conflicting volume	417				654	208
vC1, stage 1 conf vol						
vC2, stage 2 conf vol						
vCu, unblocked vol	417				576	208
tC, single (s)	5.3				7.4	7.3
tC, 2 stage (s)						
tF (s)	2.8				3.8	3.5
p0 queue free %	99				98	99
cM capacity (veh/h)	815				374	745

Direction, Lane #	EB 1	EB 2	EB 3	WB 1	WB 2	SB 1
Volume Total	5	228	228	276	141	12
Volume Left	5	0	0	0	0	7
Volume Right	0	0	0	0	3	5
cSH	815	1700	1700	1700	1700	472
Volume to Capacity	0.01	0.13	0.13	0.16	0.08	0.03
Queue Length 95th (m)	0.1	0.0	0.0	0.0	0.0	0.6
Control Delay (s)	9.4	0.0	0.0	0.0	0.0	12.8
Lane LOS	A					B
Approach Delay (s)	0.1			0.0		12.8
Approach LOS						B

Intersection Summary			
Average Delay	0.2		
Intersection Capacity Utilization	22.6%	ICU Level of Service	A
Analysis Period (min)	15		

Movement	WBL	WBR	NBT	NBR	SBL	SBT
Lane Configurations						
Traffic Volume (veh/h)	0	0	846	1	0	977
Future Volume (Veh/h)	0	0	846	1	0	977
Sign Control	Stop		Free			Free
Grade	0%		0%			0%
Peak Hour Factor	1.00	1.00	1.00	1.00	1.00	1.00
Hourly flow rate (vph)	0	0	846	1	0	977
Pedestrians						
Lane Width (m)						
Walking Speed (m/s)						
Percent Blockage						
Right turn flare (veh)						
Median type			TWLTL			TWLTL
Median storage veh)			2			2
Upstream signal (m)						
pX, platoon unblocked						
vC, conflicting volume	1335	424			847	
vC1, stage 1 conf vol	846					
vC2, stage 2 conf vol	488					
vCu, unblocked vol	1335	424			847	
tC, single (s)	6.8	6.9			4.1	
tC, 2 stage (s)	5.8					
tF (s)	3.5	3.3			2.2	
p0 queue free %	100	100			100	
cM capacity (veh/h)	340	585			799	

Direction, Lane #	WB 1	NB 1	NB 2	SB 1	SB 2
Volume Total	0	564	283	326	651
Volume Left	0	0	0	0	0
Volume Right	0	0	1	0	0
cSH	1700	1700	1700	799	1700
Volume to Capacity	0.00	0.33	0.17	0.00	0.38
Queue Length 95th (m)	0.0	0.0	0.0	0.0	0.0
Control Delay (s)	0.0	0.0	0.0	0.0	0.0
Lane LOS	A				
Approach Delay (s)	0.0	0.0		0.0	
Approach LOS	A				

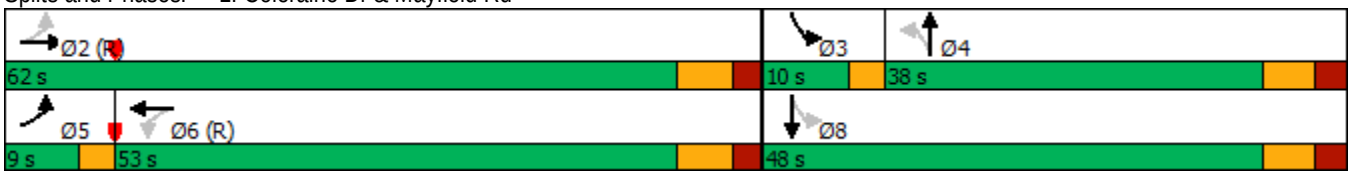
Intersection Summary			
Average Delay	0.0		
Intersection Capacity Utilization	30.3%	ICU Level of Service	A
Analysis Period (min)	15		

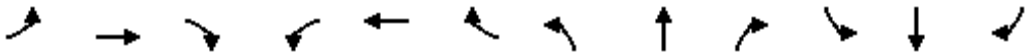
Lane Group	EBL	EBT	WBL	WBT	NBL	NBT	SBL	SBT
Lane Configurations								
Traffic Volume (vph)	101	281	2	287	6	11	90	0
Future Volume (vph)	101	281	2	287	6	11	90	0
Lane Group Flow (vph)	101	282	2	347	6	11	90	153
Turn Type	pm+pt	NA	Perm	NA	Perm	NA	pm+pt	NA
Protected Phases	5	2		6		4	3	8
Permitted Phases	2		6		4		8	
Detector Phase	5	2	6	6	4	4	3	8
Switch Phase								
Minimum Initial (s)	5.0	12.0	12.0	12.0	12.0	12.0	5.0	12.0
Minimum Split (s)	9.5	37.0	37.0	37.0	37.0	37.0	12.5	37.0
Total Split (s)	9.0	62.0	53.0	53.0	38.0	38.0	10.0	48.0
Total Split (%)	8.2%	56.4%	48.2%	48.2%	34.5%	34.5%	9.1%	43.6%
Yellow Time (s)	3.0	4.6	4.6	4.6	4.2	4.2	3.0	4.2
All-Red Time (s)	0.0	2.4	2.4	2.4	2.8	2.8	0.0	2.8
Lost Time Adjust (s)	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
Total Lost Time (s)	3.0	7.0	7.0	7.0	7.0	7.0	3.0	7.0
Lead/Lag	Lead		Lag	Lag	Lag	Lag	Lead	
Lead-Lag Optimize?								
Recall Mode	None	C-Max	C-Max	C-Max	None	None	None	None
v/c Ratio	0.15	0.11	0.01	0.17	0.04	0.03	0.42	0.18
Control Delay	4.5	5.1	10.5	8.8	44.8	44.1	44.2	0.4
Queue Delay	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
Total Delay	4.5	5.1	10.5	8.8	44.8	44.1	44.2	0.4
Queue Length 50th (m)	3.9	7.2	0.1	12.4	1.2	1.2	18.7	0.0
Queue Length 95th (m)	11.5	15.7	1.4	25.5	5.4	4.1	31.3	0.0
Internal Link Dist (m)		689.8		209.6		564.3		579.6
Turn Bay Length (m)	100.0		85.0		105.0		145.0	
Base Capacity (vph)	667	2479	343	2078	346	1028	214	1409
Starvation Cap Reductn	0	0	0	0	0	0	0	0
Spillback Cap Reductn	0	0	0	0	0	0	0	0
Storage Cap Reductn	0	0	0	0	0	0	0	0
Reduced v/c Ratio	0.15	0.11	0.01	0.17	0.02	0.01	0.42	0.11

Intersection Summary

Cycle Length: 110
Actuated Cycle Length: 110
Offset: 48 (44%), Referenced to phase 2:EBTL and 6:WBTL, Start of Green
Natural Cycle: 100
Control Type: Actuated-Coordinated

Splits and Phases: 1: Coleraine Dr & Mayfield Rd

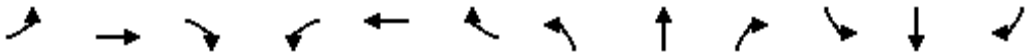




Movement	EBL	EBT	EBR	WBL	WBT	WBR	NBL	NBT	NBR	SBL	SBT	SBR
Lane Configurations												
Traffic Volume (vph)	101	281	1	2	287	60	6	11	0	90	0	153
Future Volume (vph)	101	281	1	2	287	60	6	11	0	90	0	153
Ideal Flow (vphpl)	1900	1900	1900	1900	1900	1900	1900	1900	1900	1900	1900	1900
Lane Width	3.5	3.7	3.5	3.5	3.7	3.5	3.5	3.7	3.5	3.5	3.7	3.5
Total Lost time (s)	3.0	7.0		7.0	7.0		7.0	7.0		3.0	7.0	
Lane Util. Factor	1.00	0.95		1.00	0.95		1.00	0.95		1.00	0.95	
Frt	1.00	1.00		1.00	0.97		1.00	1.00		1.00	0.85	
Flt Protected	0.95	1.00		0.95	1.00		0.95	1.00		0.95	1.00	
Satd. Flow (prot)	1487	3410		892	3276		1785	3650		1487	2900	
Flt Permitted	0.52	1.00		0.58	1.00		0.65	1.00		0.53	1.00	
Satd. Flow (perm)	814	3410		544	3276		1231	3650		829	2900	
Peak-hour factor, PHF	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00
Adj. Flow (vph)	101	281	1	2	287	60	6	11	0	90	0	153
RTOR Reduction (vph)	0	0	0	0	11	0	0	0	0	0	126	0
Lane Group Flow (vph)	101	282	0	2	336	0	6	11	0	90	27	0
Heavy Vehicles (%)	20%	7%	0%	100%	3%	35%	0%	0%	0%	20%	0%	7%
Turn Type	pm+pt	NA		Perm	NA		Perm	NA		pm+pt	NA	
Protected Phases	5	2			6			4		3	8	
Permitted Phases	2			6			4			8		
Actuated Green, G (s)	76.6	76.6		66.0	66.0		7.2	7.2		19.4	19.4	
Effective Green, g (s)	76.6	76.6		66.0	66.0		7.2	7.2		19.4	19.4	
Actuated g/C Ratio	0.70	0.70		0.60	0.60		0.07	0.07		0.18	0.18	
Clearance Time (s)	3.0	7.0		7.0	7.0		7.0	7.0		3.0	7.0	
Vehicle Extension (s)	3.0	3.0		3.0	3.0		3.0	3.0		3.0	3.0	
Lane Grp Cap (vph)	613	2374		326	1965		80	238		201	511	
v/s Ratio Prot	c0.01	0.08			c0.10			0.00		c0.04	0.01	
v/s Ratio Perm	0.10			0.00			0.00			c0.04		
v/c Ratio	0.16	0.12		0.01	0.17		0.07	0.05		0.45	0.05	
Uniform Delay, d1	5.5	5.5		8.8	9.8		48.3	48.2		39.8	37.7	
Progression Factor	1.00	1.00		1.00	1.00		1.00	1.00		1.00	1.00	
Incremental Delay, d2	0.1	0.1		0.0	0.2		0.4	0.1		1.6	0.0	
Delay (s)	5.6	5.6		8.9	10.0		48.7	48.3		41.3	37.7	
Level of Service	A	A		A	A		D	D		D	D	
Approach Delay (s)		5.6			10.0			48.4			39.1	
Approach LOS		A			A			D			D	

Intersection Summary			
HCM 2000 Control Delay	16.1	HCM 2000 Level of Service	B
HCM 2000 Volume to Capacity ratio	0.24		
Actuated Cycle Length (s)	110.0	Sum of lost time (s)	20.0
Intersection Capacity Utilization	49.2%	ICU Level of Service	A
Analysis Period (min)	15		

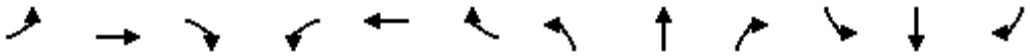
c Critical Lane Group



Movement	EBL	EBT	EBR	WBL	WBT	WBR	NBL	NBT	NBR	SBL	SBT	SBR
Lane Configurations												
Traffic Volume (veh/h)	1	3	1	15	1	27	1	143	3	22	194	2
Future Volume (Veh/h)	1	3	1	15	1	27	1	143	3	22	194	2
Sign Control		Stop			Stop			Free			Free	
Grade		0%			0%			0%			0%	
Peak Hour Factor	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00
Hourly flow rate (vph)	1	3	1	15	1	27	1	143	3	22	194	2
Pedestrians												
Lane Width (m)												
Walking Speed (m/s)												
Percent Blockage												
Right turn flare (veh)												
Median type								TWLTL			None	
Median storage veh)								2				
Upstream signal (m)												
pX, platoon unblocked												
vC, conflicting volume	340	387	98	290	386	73	196			146		
vC1, stage 1 conf vol	239	239		146	146							
vC2, stage 2 conf vol	101	148		144	240							
vCu, unblocked vol	340	387	98	290	386	73	196			146		
tC, single (s)	7.5	6.5	6.9	7.6	8.5	7.3	4.1			4.5		
tC, 2 stage (s)	6.5	5.5		6.6	7.5							
tF (s)	3.5	4.0	3.3	3.6	5.0	3.5	2.2			2.4		
p0 queue free %	100	100	100	98	100	97	100			98		
cM capacity (veh/h)	689	646	945	733	466	922	1389			1324		

Direction, Lane #	EB 1	EB 2	WB 1	WB 2	NB 1	NB 2	NB 3	SB 1	SB 2	SB 3
Volume Total	1	4	15	28	1	95	51	22	129	67
Volume Left	1	0	15	0	1	0	0	22	0	0
Volume Right	0	1	0	27	0	0	3	0	0	2
cSH	689	702	733	891	1389	1700	1700	1324	1700	1700
Volume to Capacity	0.00	0.01	0.02	0.03	0.00	0.06	0.03	0.02	0.08	0.04
Queue Length 95th (m)	0.0	0.1	0.5	0.8	0.0	0.0	0.0	0.4	0.0	0.0
Control Delay (s)	10.2	10.2	10.0	9.2	7.6	0.0	0.0	7.8	0.0	0.0
Lane LOS	B	B	B	A	A			A		
Approach Delay (s)	10.2		9.5		0.1			0.8		
Approach LOS	B		A							

Intersection Summary					
Average Delay	1.5				
Intersection Capacity Utilization	26.3%	ICU Level of Service		A	
Analysis Period (min)	15				



Movement	EBL	EBT	EBR	WBL	WBT	WBR	NBL	NBT	NBR	SBL	SBT	SBR
Lane Configurations												
Traffic Volume (veh/h)	0	27	1	3	34	3	3	1	5	4	2	5
Future Volume (Veh/h)	0	27	1	3	34	3	3	1	5	4	2	5
Sign Control		Free			Free			Stop			Stop	
Grade		0%			0%			0%			0%	
Peak Hour Factor	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00
Hourly flow rate (vph)	0	27	1	3	34	3	3	1	5	4	2	5
Pedestrians												
Lane Width (m)												
Walking Speed (m/s)												
Percent Blockage												
Right turn flare (veh)												
Median type		None			None							
Median storage veh)												
Upstream signal (m)												
pX, platoon unblocked												
vC, conflicting volume	37			28			75	70	28	74	70	36
vC1, stage 1 conf vol												
vC2, stage 2 conf vol												
vCu, unblocked vol	37			28			75	70	28	74	70	36
tC, single (s)	4.1			4.1			7.4	6.5	6.4	7.1	7.0	6.2
tC, 2 stage (s)												
tF (s)	2.2			2.2			3.8	4.0	3.5	3.5	4.5	3.3
p0 queue free %	100			100			100	100	99	100	100	100
cM capacity (veh/h)	1587			1599			838	822	998	914	736	1043

Direction, Lane #	EB 1	WB 1	NB 1	SB 1
Volume Total	28	40	9	11
Volume Left	0	3	3	4
Volume Right	1	3	5	5
cSH	1587	1599	918	925
Volume to Capacity	0.00	0.00	0.01	0.01
Queue Length 95th (m)	0.0	0.0	0.2	0.3
Control Delay (s)	0.0	0.6	9.0	8.9
Lane LOS		A	A	A
Approach Delay (s)	0.0	0.6	9.0	8.9
Approach LOS			A	A

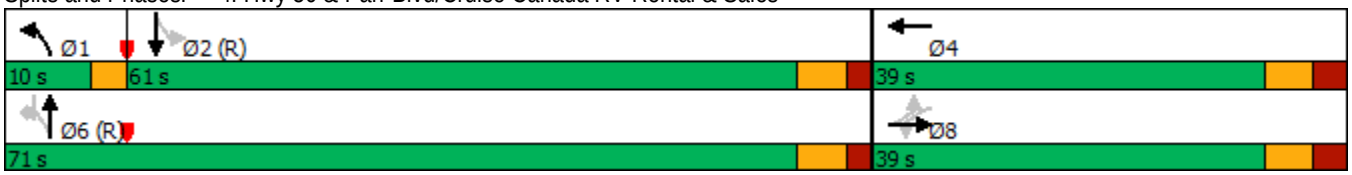
Intersection Summary			
Average Delay	2.3		
Intersection Capacity Utilization	14.5%	ICU Level of Service	A
Analysis Period (min)	15		

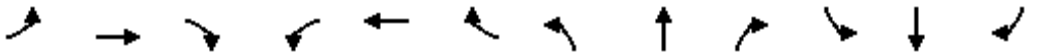
Lane Group	EBL	EBT	WBL	WBT	NBL	NBT	SBL	SBT	SBR
Lane Configurations									
Traffic Volume (vph)	19	0	4	2	35	993	6	979	18
Future Volume (vph)	19	0	4	2	35	993	6	979	18
Lane Group Flow (vph)	19	41	0	8	35	993	6	979	18
Turn Type	Perm	NA	D.Pm	NA	pm+pt	NA	Perm	NA	custom
Protected Phases		8		4	1	6		2	
Permitted Phases	8		8		6		2		6
Detector Phase	8	8	8	4	1	6	2	2	6
Switch Phase									
Minimum Initial (s)	8.0	8.0	8.0	8.0	5.0	12.0	12.0	12.0	12.0
Minimum Split (s)	33.9	33.9	33.9	33.9	9.5	30.1	30.1	30.1	30.1
Total Split (s)	39.0	39.0	39.0	39.0	10.0	71.0	61.0	61.0	71.0
Total Split (%)	35.5%	35.5%	35.5%	35.5%	9.1%	64.5%	55.5%	55.5%	64.5%
Yellow Time (s)	4.0	4.0	4.0	4.0	3.0	4.0	4.0	4.0	4.0
All-Red Time (s)	2.9	2.9	2.9	2.9	0.0	2.1	2.1	2.1	2.1
Lost Time Adjust (s)	0.0	0.0		0.0	0.0	0.0	0.0	0.0	0.0
Total Lost Time (s)	6.9	6.9		6.9	3.0	6.1	6.1	6.1	6.1
Lead/Lag					Lead		Lag	Lag	
Lead-Lag Optimize?									
Recall Mode	None	None	None	None	None	C-Max	C-Max	C-Max	C-Max
v/c Ratio	0.18	0.14		0.10	0.08	0.34	0.02	0.35	0.01
Control Delay	52.1	1.0		44.8	1.9	2.9	4.7	4.9	0.2
Queue Delay	0.0	0.0		0.0	0.0	0.0	0.0	0.0	0.0
Total Delay	52.1	1.0		44.8	1.9	2.9	4.7	4.9	0.2
Queue Length 50th (m)	4.1	0.0		1.3	0.9	24.4	0.3	37.7	0.0
Queue Length 95th (m)	12.2	0.0		6.5	2.6	33.4	1.6	51.1	0.5
Internal Link Dist (m)		828.8		20.9		732.4		332.3	
Turn Bay Length (m)	80.0				35.0		25.0		20.0
Base Capacity (vph)	411	562		296	463	2936	287	2817	1325
Starvation Cap Reductn	0	0		0	0	0	0	0	0
Spillback Cap Reductn	0	0		0	0	0	0	0	0
Storage Cap Reductn	0	0		0	0	0	0	0	0
Reduced v/c Ratio	0.05	0.07		0.03	0.08	0.34	0.02	0.35	0.01

Intersection Summary

Cycle Length: 110
Actuated Cycle Length: 110
Offset: 105 (95%), Referenced to phase 2:SBTL and 6:NBTL, Start of Green
Natural Cycle: 75
Control Type: Actuated-Coordinated

Splits and Phases: 4: Hwy 50 & Parr Blvd/Cruise Canada RV Rental & Sales





Movement	EBL	EBT	EBR	WBL	WBT	WBR	NBL	NBT	NBR	SBL	SBT	SBR
Lane Configurations												
Traffic Volume (vph)	19	0	41	4	2	2	35	993	0	6	979	18
Future Volume (vph)	19	0	41	4	2	2	35	993	0	6	979	18
Ideal Flow (vphpl)	1900	1900	1900	1900	1900	1900	1900	1900	1900	1900	1900	1900
Lane Width	3.5	3.7	3.5	3.5	3.7	3.5	3.5	3.7	3.5	3.5	3.7	3.5
Total Lost time (s)	6.9	6.9			6.9		3.0	6.1		6.1	6.1	6.1
Lane Util. Factor	1.00	1.00			1.00		1.00	0.95		1.00	0.95	1.00
Frpb, ped/bikes	1.00	1.00			1.00		1.00	1.00		1.00	1.00	0.98
Flpb, ped/bikes	1.00	1.00			1.00		1.00	1.00		1.00	1.00	1.00
Frt	1.00	0.85			0.97		1.00	1.00		1.00	1.00	0.85
Flt Protected	0.95	1.00			0.98		0.95	1.00		0.95	1.00	1.00
Satd. Flow (prot)	1783	1458			1203		1608	3476		1189	3544	1562
Flt Permitted	0.75	1.00			0.82		0.27	1.00		0.29	1.00	1.00
Satd. Flow (perm)	1412	1458			1012		452	3476		361	3544	1562
Peak-hour factor, PHF	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00
Adj. Flow (vph)	19	0	41	4	2	2	35	993	0	6	979	18
RTOR Reduction (vph)	0	39	0	0	2	0	0	0	0	0	0	3
Lane Group Flow (vph)	19	2	0	0	6	0	35	993	0	6	979	15
Confl. Peds. (#/hr)	1					1	1		1	1		1
Heavy Vehicles (%)	0%	0%	12%	25%	100%	50%	11%	5%	0%	50%	3%	0%
Turn Type	Perm	NA		D.Pm	NA		pm+pt	NA		Perm	NA	custom
Protected Phases		8			4		1	6			2	
Permitted Phases	8			8			6			2		6
Actuated Green, G (s)	6.7	6.7			6.7		90.3	90.3		83.6	83.6	90.3
Effective Green, g (s)	6.7	6.7			6.7		90.3	90.3		83.6	83.6	90.3
Actuated g/C Ratio	0.06	0.06			0.06		0.82	0.82		0.76	0.76	0.82
Clearance Time (s)	6.9	6.9			6.9		3.0	6.1		6.1	6.1	6.1
Vehicle Extension (s)	3.0	3.0			3.0		3.0	3.0		3.0	3.0	3.0
Lane Grp Cap (vph)	86	88			61		409	2853		274	2693	1282
v/s Ratio Prot		0.00					0.00	c0.29			c0.28	
v/s Ratio Perm	c0.01				0.01		0.07			0.02		0.01
v/c Ratio	0.22	0.03			0.10		0.09	0.35		0.02	0.36	0.01
Uniform Delay, d1	49.2	48.6			48.8		2.1	2.5		3.2	4.4	1.8
Progression Factor	1.01	1.00			1.00		1.00	1.00		1.00	1.00	1.00
Incremental Delay, d2	1.3	0.1			0.7		0.1	0.3		0.1	0.4	0.0
Delay (s)	51.0	48.7			49.5		2.2	2.8		3.4	4.8	1.8
Level of Service	D	D			D		A	A		A	A	A
Approach Delay (s)		49.4			49.5			2.8			4.7	
Approach LOS		D			D			A			A	

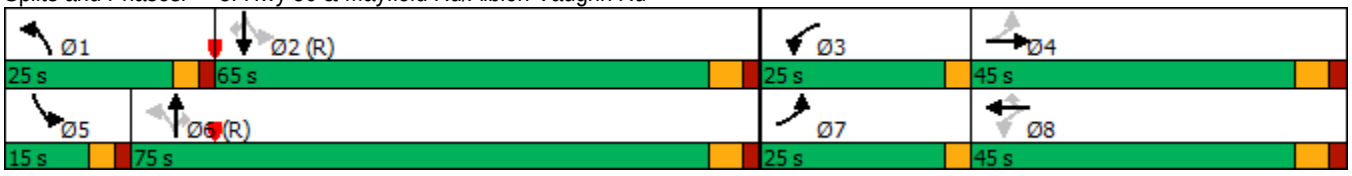
Intersection Summary			
HCM 2000 Control Delay	5.2	HCM 2000 Level of Service	A
HCM 2000 Volume to Capacity ratio	0.35		
Actuated Cycle Length (s)	110.0	Sum of lost time (s)	16.0
Intersection Capacity Utilization	47.1%	ICU Level of Service	A
Analysis Period (min)	15		
c Critical Lane Group			

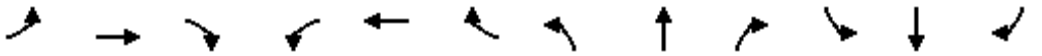
Lane Group	EBL	EBT	WBL	WBT	WBR	NBL	NBT	NBR	SBL	SBT	SBR
Lane Configurations											
Traffic Volume (vph)	92	121	232	125	10	101	887	231	14	902	101
Future Volume (vph)	92	121	232	125	10	101	887	231	14	902	101
Lane Group Flow (vph)	92	264	232	125	10	101	887	231	14	902	101
Turn Type	pm+pt	NA	pm+pt	NA	Perm	pm+pt	NA	Perm	pm+pt	NA	Perm
Protected Phases	7	4	3	8		1	6		5	2	
Permitted Phases	4		8		8	6		6	2		2
Detector Phase	7	4	3	8	8	1	6	6	5	2	2
Switch Phase											
Minimum Initial (s)	5.0	12.0	10.0	12.0	12.0	10.0	20.0	20.0	10.0	20.0	20.0
Minimum Split (s)	9.5	43.5	14.5	43.5	43.5	15.0	41.3	41.3	15.0	41.3	41.3
Total Split (s)	25.0	45.0	25.0	45.0	45.0	25.0	75.0	75.0	15.0	65.0	65.0
Total Split (%)	15.6%	28.1%	15.6%	28.1%	28.1%	15.6%	46.9%	46.9%	9.4%	40.6%	40.6%
Yellow Time (s)	3.0	4.0	3.0	4.0	4.0	3.0	4.2	4.2	3.0	4.2	4.2
All-Red Time (s)	0.0	2.5	0.0	2.5	2.5	2.0	2.1	2.1	2.0	2.1	2.1
Lost Time Adjust (s)	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
Total Lost Time (s)	3.0	6.5	3.0	6.5	6.5	5.0	6.3	6.3	5.0	6.3	6.3
Lead/Lag	Lead	Lag	Lead	Lag	Lag	Lead	Lag	Lag	Lead	Lag	Lag
Lead-Lag Optimize?											
Recall Mode	None	None	None	None	None	None	C-Max	C-Max	None	C-Max	C-Max
v/c Ratio	0.35	0.69	0.82	0.51	0.04	0.29	0.39	0.22	0.03	0.44	0.10
Control Delay	49.8	41.8	73.7	71.1	0.3	10.9	15.4	2.5	8.9	19.6	2.3
Queue Delay	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
Total Delay	49.8	41.8	73.7	71.1	0.3	10.9	15.4	2.5	8.9	19.6	2.3
Queue Length 50th (m)	24.5	20.9	67.7	39.4	0.0	10.3	61.4	0.4	1.4	83.9	0.0
Queue Length 95th (m)	39.2	36.6	#95.9	62.0	0.0	19.4	107.7	13.5	4.3	112.5	7.5
Internal Link Dist (m)		330.4		656.8			717.1			732.4	
Turn Bay Length (m)	60.0		50.0		50.0	100.0		85.0	35.0		120.0
Base Capacity (vph)	372	809	291	420	380	421	2247	1051	410	2064	967
Starvation Cap Reductn	0	0	0	0	0	0	0	0	0	0	0
Spillback Cap Reductn	0	0	0	0	0	0	0	0	0	0	0
Storage Cap Reductn	0	0	0	0	0	0	0	0	0	0	0
Reduced v/c Ratio	0.25	0.33	0.80	0.30	0.03	0.24	0.39	0.22	0.03	0.44	0.10

Intersection Summary

Cycle Length: 160
Actuated Cycle Length: 160
Offset: 7 (4%), Referenced to phase 2:SBTL and 6:NBTL, Start of Green
Natural Cycle: 115
Control Type: Actuated-Coordinated
95th percentile volume exceeds capacity, queue may be longer.
Queue shown is maximum after two cycles.

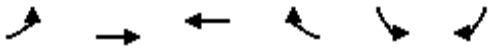
Splits and Phases: 5: Hwy 50 & Mayfield Rd/Albion Vaughn Rd





Movement	EBL	EBT	EBR	WBL	WBT	WBR	NBL	NBT	NBR	SBL	SBT	SBR
Lane Configurations												
Traffic Volume (vph)	92	121	143	232	125	10	101	887	231	14	902	101
Future Volume (vph)	92	121	143	232	125	10	101	887	231	14	902	101
Ideal Flow (vphpl)	1900	1900	1900	1900	1900	1900	1900	1900	1900	1900	1900	1900
Lane Width	3.5	3.7	3.5	3.5	3.7	3.5	3.5	3.7	3.5	3.5	3.7	3.5
Total Lost time (s)	3.0	6.5		3.0	6.5	6.5	5.0	6.3	6.3	5.0	6.3	6.3
Lane Util. Factor	1.00	0.95		1.00	1.00	1.00	1.00	0.95	1.00	1.00	0.95	1.00
Frpb, ped/bikes	1.00	1.00		1.00	1.00	1.00	1.00	1.00	0.99	1.00	1.00	1.00
Flpb, ped/bikes	1.00	1.00		1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00
Frt	1.00	0.92		1.00	1.00	0.85	1.00	1.00	0.85	1.00	1.00	0.85
Flt Protected	0.95	1.00		0.95	1.00	1.00	0.95	1.00	1.00	0.95	1.00	1.00
Satd. Flow (prot)	1750	2913		1684	1746	1229	1552	3476	1502	1668	3510	1566
Flt Permitted	0.68	1.00		0.28	1.00	1.00	0.24	1.00	1.00	0.29	1.00	1.00
Satd. Flow (perm)	1247	2913		501	1746	1229	400	3476	1502	514	3510	1566
Peak-hour factor, PHF	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00
Adj. Flow (vph)	92	121	143	232	125	10	101	887	231	14	902	101
RTOR Reduction (vph)	0	131	0	0	0	9	0	0	84	0	0	42
Lane Group Flow (vph)	92	133	0	232	125	1	101	887	147	14	902	59
Confl. Bikes (#/hr)									1			
Heavy Vehicles (%)	2%	7%	22%	6%	10%	30%	15%	5%	5%	7%	4%	2%
Turn Type	pm+pt	NA		pm+pt	NA	Perm	pm+pt	NA	Perm	pm+pt	NA	Perm
Protected Phases	7	4		3	8		1	6		5	2	
Permitted Phases	4			8		8	6		6	2		2
Actuated Green, G (s)	25.8	13.8		37.7	22.7	22.7	109.5	100.5	100.5	98.1	94.1	94.1
Effective Green, g (s)	25.8	13.8		37.7	22.7	22.7	109.5	100.5	100.5	98.1	94.1	94.1
Actuated g/C Ratio	0.16	0.09		0.24	0.14	0.14	0.68	0.63	0.63	0.61	0.59	0.59
Clearance Time (s)	3.0	6.5		3.0	6.5	6.5	5.0	6.3	6.3	5.0	6.3	6.3
Vehicle Extension (s)	3.0	3.0		3.0	3.0	3.0	3.0	3.0	3.0	3.0	3.0	3.0
Lane Grp Cap (vph)	238	251		272	247	174	348	2183	943	343	2064	921
v/s Ratio Prot	0.03	0.05		c0.11	0.07		c0.02	c0.26		0.00	c0.26	
v/s Ratio Perm	0.03			c0.09		0.00	0.18		0.10	0.02		0.04
v/c Ratio	0.39	0.53		0.85	0.51	0.01	0.29	0.41	0.16	0.04	0.44	0.06
Uniform Delay, d1	59.4	70.0		54.5	63.5	59.0	10.5	14.9	12.3	12.3	18.3	14.1
Progression Factor	1.00	1.00		1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00
Incremental Delay, d2	1.0	2.2		21.9	1.6	0.0	0.5	0.6	0.4	0.0	0.7	0.1
Delay (s)	60.4	72.2		76.4	65.1	59.0	10.9	15.4	12.6	12.3	18.9	14.2
Level of Service	E	E		E	E	E	B	B	B	B	B	B
Approach Delay (s)		69.1			72.1			14.5			18.4	
Approach LOS		E			E			B			B	

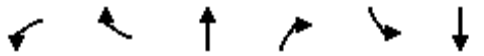
Intersection Summary			
HCM 2000 Control Delay	29.6	HCM 2000 Level of Service	C
HCM 2000 Volume to Capacity ratio	0.55		
Actuated Cycle Length (s)	160.0	Sum of lost time (s)	20.8
Intersection Capacity Utilization	74.3%	ICU Level of Service	D
Analysis Period (min)	15		
c Critical Lane Group			



Movement	EBL	EBT	WBT	WBR	SBL	SBR
Lane Configurations						
Traffic Volume (veh/h)	3	370	350	2	3	2
Future Volume (Veh/h)	3	370	350	2	3	2
Sign Control		Free	Free		Stop	
Grade		0%	0%		0%	
Peak Hour Factor	1.00	1.00	1.00	1.00	1.00	1.00
Hourly flow rate (vph)	3	370	350	2	3	2
Pedestrians						
Lane Width (m)						
Walking Speed (m/s)						
Percent Blockage						
Right turn flare (veh)						
Median type		None	None			
Median storage veh)						
Upstream signal (m)		233				
pX, platoon unblocked					1.00	
vC, conflicting volume	352				542	176
vC1, stage 1 conf vol						
vC2, stage 2 conf vol						
vCu, unblocked vol	352				537	176
tC, single (s)	4.8				7.5	6.9
tC, 2 stage (s)						
tF (s)	2.5				3.8	3.3
p0 queue free %	100				99	100
cM capacity (veh/h)	1008				404	843

Direction, Lane #	EB 1	EB 2	EB 3	WB 1	WB 2	SB 1
Volume Total	3	185	185	233	119	5
Volume Left	3	0	0	0	0	3
Volume Right	0	0	0	0	2	2
cSH	1008	1700	1700	1700	1700	510
Volume to Capacity	0.00	0.11	0.11	0.14	0.07	0.01
Queue Length 95th (m)	0.1	0.0	0.0	0.0	0.0	0.2
Control Delay (s)	8.6	0.0	0.0	0.0	0.0	12.1
Lane LOS	A					B
Approach Delay (s)	0.1			0.0		12.1
Approach LOS						B

Intersection Summary			
Average Delay	0.1		
Intersection Capacity Utilization	20.2%	ICU Level of Service	A
Analysis Period (min)	15		



Movement	WBL	WBR	NBT	NBR	SBL	SBT
Lane Configurations						
Traffic Volume (veh/h)	1	0	161	1	0	233
Future Volume (Veh/h)	1	0	161	1	0	233
Sign Control	Stop		Free			Free
Grade	0%		0%			0%
Peak Hour Factor	1.00	1.00	1.00	1.00	1.00	1.00
Hourly flow rate (vph)	1	0	161	1	0	233
Pedestrians						
Lane Width (m)						
Walking Speed (m/s)						
Percent Blockage						
Right turn flare (veh)						
Median type			TWLTL			TWLTL
Median storage veh)			2			2
Upstream signal (m)						
pX, platoon unblocked						
vC, conflicting volume	278	81			162	
vC1, stage 1 conf vol	162					
vC2, stage 2 conf vol	116					
vCu, unblocked vol	278	81			162	
tC, single (s)	8.8	6.9			4.1	
tC, 2 stage (s)	7.8					
tF (s)	4.5	3.3			2.2	
p0 queue free %	100	100			100	
cM capacity (veh/h)	573	969			1429	

Direction, Lane #	WB 1	NB 1	NB 2	SB 1	SB 2
Volume Total	1	107	55	78	155
Volume Left	1	0	0	0	0
Volume Right	0	0	1	0	0
cSH	573	1700	1700	1429	1700
Volume to Capacity	0.00	0.06	0.03	0.00	0.09
Queue Length 95th (m)	0.0	0.0	0.0	0.0	0.0
Control Delay (s)	11.3	0.0	0.0	0.0	0.0
Lane LOS	B				
Approach Delay (s)	11.3	0.0		0.0	
Approach LOS	B				

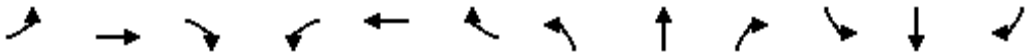
Intersection Summary			
Average Delay	0.0		
Intersection Capacity Utilization	16.4%	ICU Level of Service	A
Analysis Period (min)	15		

Lane Group	EBL	EBT	WBL	WBT	NBL	NBT	SBL	SBT
Lane Configurations								
Traffic Volume (vph)	367	338	39	357	23	314	70	365
Future Volume (vph)	367	338	39	357	23	314	70	365
Lane Group Flow (vph)	367	370	39	398	23	345	70	625
Turn Type	pm+pt	NA	Perm	NA	Perm	NA	pm+pt	NA
Protected Phases	5	2		6		4	3	8
Permitted Phases	2		6		4		8	
Detector Phase	5	2	6	6	4	4	3	8
Switch Phase								
Minimum Initial (s)	5.0	12.0	12.0	12.0	12.0	12.0	5.0	12.0
Minimum Split (s)	9.5	37.0	37.0	37.0	37.0	37.0	12.5	37.0
Total Split (s)	15.0	80.0	65.0	65.0	32.0	32.0	18.0	50.0
Total Split (%)	11.5%	61.5%	50.0%	50.0%	24.6%	24.6%	13.8%	38.5%
Yellow Time (s)	3.0	4.6	4.6	4.6	4.2	4.2	3.0	4.2
All-Red Time (s)	0.0	2.4	2.4	2.4	2.8	2.8	0.0	2.8
Lost Time Adjust (s)	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
Total Lost Time (s)	3.0	7.0	7.0	7.0	7.0	7.0	3.0	7.0
Lead/Lag	Lead		Lag	Lag	Lag	Lag	Lead	
Lead-Lag Optimize?								
Recall Mode	None	C-Max	C-Max	C-Max	None	None	None	None
v/c Ratio	0.56	0.19	0.09	0.26	0.23	0.67	0.44	0.72
Control Delay	13.8	10.2	20.7	19.7	54.2	58.2	43.0	38.1
Queue Delay	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
Total Delay	13.8	10.2	20.7	19.7	54.2	58.2	43.0	38.1
Queue Length 50th (m)	39.3	19.6	5.7	32.2	5.6	46.5	14.5	62.3
Queue Length 95th (m)	67.2	31.7	13.6	46.5	14.5	61.1	25.9	77.6
Internal Link Dist (m)		689.8		209.6		684.9		579.6
Turn Bay Length (m)	100.0		85.0		105.0		145.0	
Base Capacity (vph)	659	1951	449	1549	133	672	174	1120
Starvation Cap Reductn	0	0	0	0	0	0	0	0
Spillback Cap Reductn	0	0	0	0	0	0	0	0
Storage Cap Reductn	0	0	0	0	0	0	0	0
Reduced v/c Ratio	0.56	0.19	0.09	0.26	0.17	0.51	0.40	0.56

Intersection Summary

Cycle Length: 130
Actuated Cycle Length: 130
Offset: 92 (71%), Referenced to phase 2:EBTL and 6:WBTL, Start of Green
Natural Cycle: 100
Control Type: Actuated-Coordinated

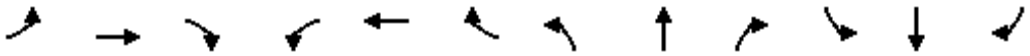
Splits and Phases: 1: Coleraine Dr & Mayfield Rd



Movement	EBL	EBT	EBR	WBL	WBT	WBR	NBL	NBT	NBR	SBL	SBT	SBR
Lane Configurations												
Traffic Volume (vph)	367	338	32	39	357	41	23	314	31	70	365	260
Future Volume (vph)	367	338	32	39	357	41	23	314	31	70	365	260
Ideal Flow (vphpl)	1900	1900	1900	1900	1900	1900	1900	1900	1900	1900	1900	1900
Lane Width	3.5	3.7	3.5	3.5	3.7	3.5	3.5	3.7	3.5	3.5	3.7	3.5
Total Lost time (s)	3.0	7.0		7.0	7.0		7.0	7.0		3.0	7.0	
Lane Util. Factor	1.00	0.95		1.00	0.95		1.00	0.95		1.00	0.95	
Frt	1.00	0.99		1.00	0.98		1.00	0.99		1.00	0.94	
Flt Protected	0.95	1.00		0.95	1.00		0.95	1.00		0.95	1.00	
Satd. Flow (prot)	1638	3010		1580	3037		1716	3466		1014	3088	
Flt Permitted	0.48	1.00		0.53	1.00		0.38	1.00		0.34	1.00	
Satd. Flow (perm)	833	3010		884	3037		694	3466		359	3088	
Peak-hour factor, PHF	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00
Adj. Flow (vph)	367	338	32	39	357	41	23	314	31	70	365	260
RTOR Reduction (vph)	0	4	0	0	6	0	0	6	0	0	110	0
Lane Group Flow (vph)	367	366	0	39	392	0	23	339	0	70	515	0
Heavy Vehicles (%)	9%	21%	6%	13%	14%	56%	4%	3%	13%	76%	5%	19%
Turn Type	pm+pt	NA		Perm	NA		Perm	NA		pm+pt	NA	
Protected Phases	5	2			6			4		3	8	
Permitted Phases	2			6			4			8		
Actuated Green, G (s)	83.5	83.5		65.4	65.4		19.1	19.1		32.5	32.5	
Effective Green, g (s)	83.5	83.5		65.4	65.4		19.1	19.1		32.5	32.5	
Actuated g/C Ratio	0.64	0.64		0.50	0.50		0.15	0.15		0.25	0.25	
Clearance Time (s)	3.0	7.0		7.0	7.0		7.0	7.0		3.0	7.0	
Vehicle Extension (s)	3.0	3.0		3.0	3.0		3.0	3.0		3.0	3.0	
Lane Grp Cap (vph)	628	1933		444	1527		101	509		142	772	
v/s Ratio Prot	c0.07	0.12			0.13			0.10		0.04	c0.17	
v/s Ratio Perm	c0.31			0.04			0.03			0.08		
v/c Ratio	0.58	0.19		0.09	0.26		0.23	0.67		0.49	0.67	
Uniform Delay, d1	10.9	9.5		16.8	18.4		48.9	52.4		39.6	43.9	
Progression Factor	1.00	1.00		1.00	1.00		1.00	1.00		1.00	1.00	
Incremental Delay, d2	1.4	0.2		0.4	0.4		1.2	3.3		2.7	2.2	
Delay (s)	12.2	9.7		17.2	18.8		50.1	55.7		42.3	46.1	
Level of Service	B	A		B	B		D	E		D	D	
Approach Delay (s)		11.0			18.7			55.4			45.7	
Approach LOS		B			B			E			D	

Intersection Summary			
HCM 2000 Control Delay	30.6	HCM 2000 Level of Service	C
HCM 2000 Volume to Capacity ratio	0.64		
Actuated Cycle Length (s)	130.0	Sum of lost time (s)	20.0
Intersection Capacity Utilization	80.8%	ICU Level of Service	D
Analysis Period (min)	15		

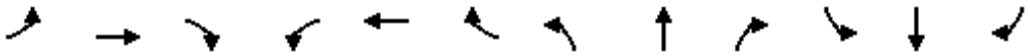
c Critical Lane Group



Movement	EBL	EBT	EBR	WBL	WBT	WBR	NBL	NBT	NBR	SBL	SBT	SBR
Lane Configurations												
Traffic Volume (veh/h)	1	1	1	32	11	119	11	639	51	86	615	5
Future Volume (Veh/h)	1	1	1	32	11	119	11	639	51	86	615	5
Sign Control		Stop			Stop			Free			Free	
Grade		0%			0%			0%			0%	
Peak Hour Factor	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00
Hourly flow rate (vph)	1	1	1	32	11	119	11	639	51	86	615	5
Pedestrians												
Lane Width (m)												
Walking Speed (m/s)												
Percent Blockage												
Right turn flare (veh)												
Median type								TWLTL			None	
Median storage veh)								2				
Upstream signal (m)												
pX, platoon unblocked												
vC, conflicting volume	1256	1502	310	1168	1478	345	620			690		
vC1, stage 1 conf vol	790	790		686	686							
vC2, stage 2 conf vol	466	712		481	792							
vCu, unblocked vol	1256	1502	310	1168	1478	345	620			690		
tC, single (s)	7.5	6.5	6.9	7.9	6.7	7.5	4.6			4.6		
tC, 2 stage (s)	6.5	5.5		6.9	5.7							
tF (s)	3.5	4.0	3.3	3.7	4.1	3.6	2.5			2.4		
p0 queue free %	100	100	100	89	96	79	99			89		
cM capacity (veh/h)	240	265	692	291	271	574	805			773		

Direction, Lane #	EB 1	EB 2	WB 1	WB 2	NB 1	NB 2	NB 3	SB 1	SB 2	SB 3
Volume Total	1	2	32	130	11	426	264	86	410	210
Volume Left	1	0	32	0	11	0	0	86	0	0
Volume Right	0	1	0	119	0	0	51	0	0	5
cSH	240	383	291	524	805	1700	1700	773	1700	1700
Volume to Capacity	0.00	0.01	0.11	0.25	0.01	0.25	0.16	0.11	0.24	0.12
Queue Length 95th (m)	0.1	0.1	2.9	7.8	0.3	0.0	0.0	3.0	0.0	0.0
Control Delay (s)	20.0	14.4	18.9	14.1	9.5	0.0	0.0	10.2	0.0	0.0
Lane LOS	C	B	C	B	A			B		
Approach Delay (s)	16.3		15.1		0.1			1.2		
Approach LOS	C		C							

Intersection Summary					
Average Delay	2.2				
Intersection Capacity Utilization	42.5%	ICU Level of Service		A	
Analysis Period (min)	15				



Movement	EBL	EBT	EBR	WBL	WBT	WBR	NBL	NBT	NBR	SBL	SBT	SBR
Lane Configurations												
Traffic Volume (veh/h)	3	117	15	12	143	12	5	4	4	7	3	14
Future Volume (Veh/h)	3	117	15	12	143	12	5	4	4	7	3	14
Sign Control		Free			Free			Stop			Stop	
Grade		0%			0%			0%			0%	
Peak Hour Factor	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00
Hourly flow rate (vph)	3	117	15	12	143	12	5	4	4	7	3	14
Pedestrians											1	
Lane Width (m)											3.7	
Walking Speed (m/s)											1.2	
Percent Blockage											0	
Right turn flare (veh)												
Median type		None			None							
Median storage veh)												
Upstream signal (m)												
pX, platoon unblocked												
vC, conflicting volume	156			132			319	310	124	310	312	150
vC1, stage 1 conf vol												
vC2, stage 2 conf vol												
vCu, unblocked vol	156			132			319	310	124	310	312	150
tC, single (s)	4.1			4.1			7.5	6.8	6.7	7.5	6.8	6.6
tC, 2 stage (s)												
tF (s)	2.2			2.2			3.9	4.2	3.8	3.9	4.3	3.6
p0 queue free %	100			99			99	99	100	99	99	98
cM capacity (veh/h)	1435			1466			550	562	812	558	549	814

Direction, Lane #	EB 1	WB 1	NB 1	SB 1
Volume Total	135	167	13	24
Volume Left	3	12	5	7
Volume Right	15	12	4	14
cSH	1435	1466	615	682
Volume to Capacity	0.00	0.01	0.02	0.04
Queue Length 95th (m)	0.1	0.2	0.5	0.9
Control Delay (s)	0.2	0.6	11.0	10.5
Lane LOS	A	A	B	B
Approach Delay (s)	0.2	0.6	11.0	10.5
Approach LOS			B	B

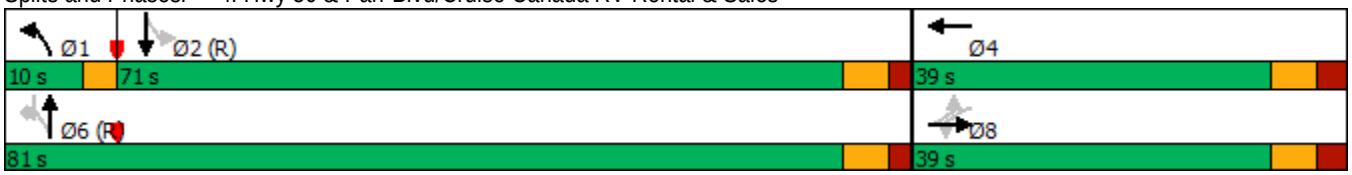
Intersection Summary				
Average Delay	1.5			
Intersection Capacity Utilization	24.4%	ICU Level of Service	A	
Analysis Period (min)	15			

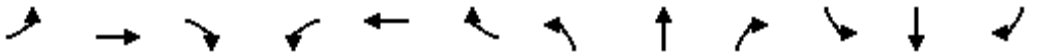
Lane Group	EBL	EBT	WBL	WBT	NBL	NBT	SBT	SBR
Lane Configurations								
Traffic Volume (vph)	27	0	1	0	199	1102	1219	44
Future Volume (vph)	27	0	1	0	199	1102	1219	44
Lane Group Flow (vph)	27	102	0	1	199	1104	1219	44
Turn Type	Perm	NA	D.Pm	NA	pm+pt	NA	NA	custom
Protected Phases		8		4	1	6	2	
Permitted Phases	8		8		6			6
Detector Phase	8	8	8	4	1	6	2	6
Switch Phase								
Minimum Initial (s)	8.0	8.0	8.0	8.0	5.0	12.0	12.0	12.0
Minimum Split (s)	33.9	33.9	33.9	33.9	9.5	30.1	30.1	30.1
Total Split (s)	39.0	39.0	39.0	39.0	10.0	81.0	71.0	81.0
Total Split (%)	32.5%	32.5%	32.5%	32.5%	8.3%	67.5%	59.2%	67.5%
Yellow Time (s)	4.0	4.0	4.0	4.0	3.0	4.0	4.0	4.0
All-Red Time (s)	2.9	2.9	2.9	2.9	0.0	2.1	2.1	2.1
Lost Time Adjust (s)	0.0	0.0		0.0	0.0	0.0	0.0	0.0
Total Lost Time (s)	6.9	6.9		6.9	3.0	6.1	6.1	6.1
Lead/Lag					Lead		Lag	
Lead-Lag Optimize?								
Recall Mode	None	None	None	None	None	C-Max	C-Max	C-Max
v/c Ratio	0.28	0.45		0.01	0.53	0.40	0.56	0.04
Control Delay	59.4	8.0		50.0	7.4	3.5	11.4	1.0
Queue Delay	0.0	0.0		0.0	0.0	0.0	0.0	0.0
Total Delay	59.4	8.0		50.0	7.4	3.5	11.4	1.0
Queue Length 50th (m)	6.5	0.0		0.2	6.1	29.0	69.9	0.3
Queue Length 95th (m)	16.1	4.7		2.1	12.8	42.8	108.0	2.5
Internal Link Dist (m)		828.8		20.9		520.2	332.3	
Turn Bay Length (m)	80.0				35.0			20.0
Base Capacity (vph)	355	429		354	376	2738	2174	1222
Starvation Cap Reductn	0	0		0	0	0	0	0
Spillback Cap Reductn	0	0		0	0	0	0	0
Storage Cap Reductn	0	0		0	0	0	0	0
Reduced v/c Ratio	0.08	0.24		0.00	0.53	0.40	0.56	0.04

Intersection Summary

Cycle Length: 120
Actuated Cycle Length: 120
Offset: 8 (7%), Referenced to phase 2:SBTL and 6:NBTL, Start of Green
Natural Cycle: 90
Control Type: Actuated-Coordinated

Splits and Phases: 4: Hwy 50 & Parr Blvd/Cruise Canada RV Rental & Sales





Movement	EBL	EBT	EBR	WBL	WBT	WBR	NBL	NBT	NBR	SBL	SBT	SBR
Lane Configurations												
Traffic Volume (vph)	27	0	102	1	0	0	199	1102	2	0	1219	44
Future Volume (vph)	27	0	102	1	0	0	199	1102	2	0	1219	44
Ideal Flow (vphpl)	1900	1900	1900	1900	1900	1900	1900	1900	1900	1900	1900	1900
Lane Width	3.5	3.7	3.5	3.5	3.7	3.5	3.5	3.7	3.5	3.5	3.7	3.5
Total Lost time (s)	6.9	6.9			6.9		3.0	6.1			6.1	6.1
Lane Util. Factor	1.00	1.00			1.00		1.00	0.95			0.95	1.00
Frpb, ped/bikes	1.00	1.00			1.00		1.00	1.00			1.00	0.98
Flpb, ped/bikes	1.00	1.00			1.00		1.00	1.00			1.00	1.00
Frt	1.00	0.85			1.00		1.00	1.00			1.00	0.85
Flt Protected	0.95	1.00			0.95		0.95	1.00			1.00	1.00
Satd. Flow (prot)	1668	1183			1825		1513	3348			3174	1487
Flt Permitted	0.76	1.00			0.69		0.18	1.00			1.00	1.00
Satd. Flow (perm)	1330	1183			1328		290	3348			3174	1487
Peak-hour factor, PHF	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00
Adj. Flow (vph)	27	0	102	1	0	0	199	1102	2	0	1219	44
RTOR Reduction (vph)	0	94	0	0	0	0	0	0	0	0	0	6
Lane Group Flow (vph)	27	8	0	0	1	0	199	1104	0	0	1219	38
Confl. Peds. (#/hr)							1		2	2		1
Confl. Bikes (#/hr)									1			
Heavy Vehicles (%)	7%	0%	38%	0%	0%	0%	18%	9%	0%	0%	15%	5%
Turn Type	Perm	NA		D.Pm	NA		pm+pt	NA		Perm	NA	custom
Protected Phases		8			4		1	6			2	
Permitted Phases	8			8			6			2		6
Actuated Green, G (s)	8.9	8.9			8.9		98.1	98.1			82.2	98.1
Effective Green, g (s)	8.9	8.9			8.9		98.1	98.1			82.2	98.1
Actuated g/C Ratio	0.07	0.07			0.07		0.82	0.82			0.69	0.82
Clearance Time (s)	6.9	6.9			6.9		3.0	6.1			6.1	6.1
Vehicle Extension (s)	3.0	3.0			3.0		3.0	3.0			3.0	3.0
Lane Grp Cap (vph)	98	87			98		368	2736			2174	1215
v/s Ratio Prot		0.01					c0.06	0.33			c0.38	
v/s Ratio Perm	c0.02				0.00		0.38					0.03
v/c Ratio	0.28	0.09			0.01		0.54	0.40			0.56	0.03
Uniform Delay, d1	52.5	51.8			51.5		5.2	3.0			9.7	2.1
Progression Factor	1.00	1.00			1.00		1.00	1.00			1.00	1.00
Incremental Delay, d2	1.5	0.4			0.0		1.6	0.4			1.1	0.0
Delay (s)	54.0	52.2			51.5		6.8	3.4			10.7	2.1
Level of Service	D	D			D		A	A			B	A
Approach Delay (s)		52.6			51.5			3.9			10.4	
Approach LOS		D			D			A			B	

Intersection Summary			
HCM 2000 Control Delay	9.3	HCM 2000 Level of Service	A
HCM 2000 Volume to Capacity ratio	0.53		
Actuated Cycle Length (s)	120.0	Sum of lost time (s)	16.0
Intersection Capacity Utilization	65.6%	ICU Level of Service	C
Analysis Period (min)	15		

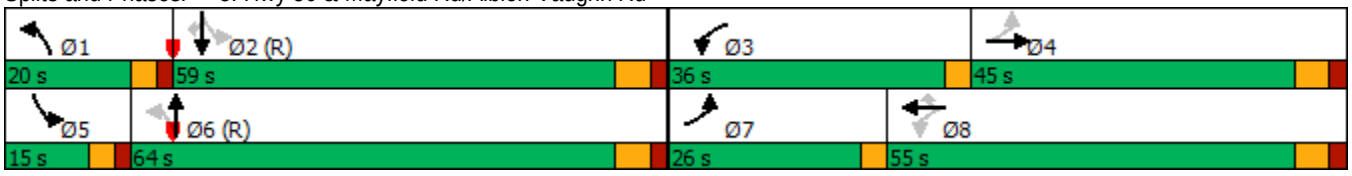
c Critical Lane Group

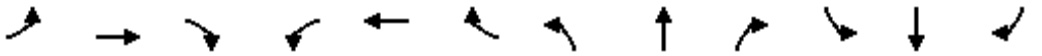
Lane Group	EBL	EBT	WBL	WBT	WBR	NBL	NBT	SBL	SBT	SBR
Lane Configurations										
Traffic Volume (vph)	64	161	370	271	39	118	1127	31	1178	64
Future Volume (vph)	64	161	370	271	39	118	1127	31	1178	64
Lane Group Flow (vph)	64	373	370	271	39	118	1297	31	1178	64
Turn Type	pm+pt	NA	pm+pt	NA	Perm	pm+pt	NA	pm+pt	NA	Perm
Protected Phases	7	4	3	8		1	6	5	2	
Permitted Phases	4		8		8	6		2		2
Detector Phase	7	4	3	8	8	1	6	5	2	2
Switch Phase										
Minimum Initial (s)	5.0	12.0	10.0	12.0	12.0	10.0	20.0	10.0	20.0	20.0
Minimum Split (s)	9.5	43.5	14.5	43.5	43.5	15.0	41.3	15.0	41.3	41.3
Total Split (s)	26.0	45.0	36.0	55.0	55.0	20.0	64.0	15.0	59.0	59.0
Total Split (%)	16.3%	28.1%	22.5%	34.4%	34.4%	12.5%	40.0%	9.4%	36.9%	36.9%
Yellow Time (s)	3.0	4.0	3.0	4.0	4.0	3.0	4.2	3.0	4.2	4.2
All-Red Time (s)	0.0	2.5	0.0	2.5	2.5	2.0	2.1	2.0	2.1	2.1
Lost Time Adjust (s)	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
Total Lost Time (s)	3.0	6.5	3.0	6.5	6.5	5.0	6.3	5.0	6.3	6.3
Lead/Lag	Lead	Lag	Lead	Lag	Lag	Lead	Lag	Lead	Lag	Lag
Lead-Lag Optimize?										
Recall Mode	None	None	None	None	None	None	C-Max	None	C-Max	C-Max
v/c Ratio	0.26	0.86	0.96	0.55	0.08	0.62	0.55	0.15	0.86	0.09
Control Delay	36.6	53.8	81.0	54.1	0.3	37.7	29.7	18.8	48.5	1.8
Queue Delay	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
Total Delay	36.6	53.8	81.0	54.1	0.3	37.7	29.7	18.8	48.5	1.8
Queue Length 50th (m)	14.1	34.7	101.7	79.0	0.0	17.6	111.1	4.3	186.6	0.0
Queue Length 95th (m)	23.3	52.5	#152.9	104.8	0.5	43.0	141.3	10.8	#283.0	3.2
Internal Link Dist (m)		330.4		656.8			717.1		188.2	
Turn Bay Length (m)	60.0		50.0		50.0	100.0		35.0		120.0
Base Capacity (vph)	385	681	392	545	515	200	2338	213	1375	689
Starvation Cap Reductn	0	0	0	0	0	0	0	0	0	0
Spillback Cap Reductn	0	0	0	0	0	0	0	0	0	0
Storage Cap Reductn	0	0	0	0	0	0	0	0	0	0
Reduced v/c Ratio	0.17	0.55	0.94	0.50	0.08	0.59	0.55	0.15	0.86	0.09

Intersection Summary

Cycle Length: 160
Actuated Cycle Length: 160
Offset: 27 (17%), Referenced to phase 2:SBTL and 6:NBTL, Start of Green
Natural Cycle: 125
Control Type: Actuated-Coordinated
95th percentile volume exceeds capacity, queue may be longer.
Queue shown is maximum after two cycles.

Splits and Phases: 5: Hwy 50 & Mayfield Rd/Albion Vaughn Rd

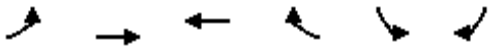




Movement	EBL	EBT	EBR	WBL	WBT	WBR	NBL	NBT	NBR	SBL	SBT	SBR
Lane Configurations												
Traffic Volume (vph)	64	161	212	370	271	39	118	1127	170	31	1178	64
Future Volume (vph)	64	161	212	370	271	39	118	1127	170	31	1178	64
Ideal Flow (vphpl)	1900	1900	1900	1900	1900	1900	1900	1900	1900	1900	1900	1900
Lane Width	3.5	3.7	3.5	3.5	3.7	3.5	3.5	3.7	3.5	3.5	3.7	3.5
Total Lost time (s)	3.0	6.5		3.0	6.5	6.5	5.0	6.3		5.0	6.3	6.3
Lane Util. Factor	1.00	0.95		1.00	1.00	1.00	1.00	0.91		1.00	0.95	1.00
Frt	1.00	0.91		1.00	1.00	0.85	1.00	0.98		1.00	1.00	0.85
Flt Protected	0.95	1.00		0.95	1.00	1.00	0.95	1.00		0.95	1.00	1.00
Satd. Flow (prot)	1653	2262		1623	1795	1521	1240	4616		1539	3120	1439
Flt Permitted	0.59	1.00		0.22	1.00	1.00	0.09	1.00		0.16	1.00	1.00
Satd. Flow (perm)	1031	2262		369	1795	1521	121	4616		263	3120	1439
Peak-hour factor, PHF	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00
Adj. Flow (vph)	64	161	212	370	271	39	118	1127	170	31	1178	64
RTOR Reduction (vph)	0	158	0	0	0	28	0	10	0	0	0	36
Lane Group Flow (vph)	64	215	0	370	271	11	118	1287	0	31	1178	28
Heavy Vehicles (%)	8%	26%	64%	10%	7%	5%	44%	11%	14%	16%	17%	11%
Turn Type	pm+pt	NA		pm+pt	NA	Perm	pm+pt	NA		pm+pt	NA	Perm
Protected Phases	7	4		3	8		1	6		5	2	
Permitted Phases	4			8		8	6			2		2
Actuated Green, G (s)	28.1	20.0		55.0	43.9	43.9	92.2	79.2		78.0	70.0	70.0
Effective Green, g (s)	28.1	20.0		55.0	43.9	43.9	92.2	79.2		78.0	70.0	70.0
Actuated g/C Ratio	0.18	0.12		0.34	0.27	0.27	0.58	0.50		0.49	0.44	0.44
Clearance Time (s)	3.0	6.5		3.0	6.5	6.5	5.0	6.3		5.0	6.3	6.3
Vehicle Extension (s)	3.0	3.0		3.0	3.0	3.0	3.0	3.0		3.0	3.0	3.0
Lane Grp Cap (vph)	212	282		377	492	417	190	2284		192	1365	629
v/s Ratio Prot	0.02	0.09		c0.20	0.15		c0.07	0.28		0.01	c0.38	
v/s Ratio Perm	0.04			c0.14		0.01	0.29			0.07		0.02
v/c Ratio	0.30	0.76		0.98	0.55	0.03	0.62	0.56		0.16	0.86	0.04
Uniform Delay, d1	56.6	67.7		45.7	49.6	42.4	26.5	28.3		22.1	40.7	25.8
Progression Factor	1.00	1.00		1.00	1.00	1.00	1.00	1.00		1.00	1.00	1.00
Incremental Delay, d2	0.8	11.5		41.2	1.3	0.0	6.2	1.0		0.4	7.4	0.1
Delay (s)	57.4	79.2		86.9	51.0	42.4	32.7	29.3		22.5	48.1	25.9
Level of Service	E	E		F	D	D	C	C		C	D	C
Approach Delay (s)		76.0			70.0			29.6			46.3	
Approach LOS		E			E			C			D	

Intersection Summary			
HCM 2000 Control Delay	47.7	HCM 2000 Level of Service	D
HCM 2000 Volume to Capacity ratio	0.90		
Actuated Cycle Length (s)	160.0	Sum of lost time (s)	20.8
Intersection Capacity Utilization	90.8%	ICU Level of Service	E
Analysis Period (min)	15		

c Critical Lane Group



Movement	EBL	EBT	WBT	WBR	SBL	SBR
Lane Configurations						
Traffic Volume (veh/h)	1	438	435	1	1	2
Future Volume (Veh/h)	1	438	435	1	1	2
Sign Control		Free	Free		Stop	
Grade		0%	0%		0%	
Peak Hour Factor	1.00	1.00	1.00	1.00	1.00	1.00
Hourly flow rate (vph)	1	438	435	1	1	2
Pedestrians						
Lane Width (m)						
Walking Speed (m/s)						
Percent Blockage						
Right turn flare (veh)						
Median type		None	None			
Median storage veh)						
Upstream signal (m)		233				
pX, platoon unblocked					0.98	
vC, conflicting volume	436				656	218
vC1, stage 1 conf vol						
vC2, stage 2 conf vol						
vCu, unblocked vol	436				601	218
tC, single (s)	4.1				6.8	8.9
tC, 2 stage (s)						
tF (s)	2.2				3.5	4.3
p0 queue free %	100				100	100
cM capacity (veh/h)	1134				426	555

Direction, Lane #	EB 1	EB 2	EB 3	WB 1	WB 2	SB 1	SB 2
Volume Total	1	219	219	290	146	1	2
Volume Left	1	0	0	0	0	1	0
Volume Right	0	0	0	0	1	0	2
cSH	1134	1700	1700	1700	1700	426	555
Volume to Capacity	0.00	0.13	0.13	0.17	0.09	0.00	0.00
Queue Length 95th (m)	0.0	0.0	0.0	0.0	0.0	0.1	0.1
Control Delay (s)	8.2	0.0	0.0	0.0	0.0	13.5	11.5
Lane LOS	A					B	B
Approach Delay (s)	0.0			0.0		12.2	
Approach LOS						B	

Intersection Summary			
Average Delay	0.1		
Intersection Capacity Utilization	22.1%	ICU Level of Service	A
Analysis Period (min)	15		

Movement	WBL	WBR	NBT	NBR	SBL	SBT
Lane Configurations						
Traffic Volume (veh/h)	0	0	689	0	0	660
Future Volume (Veh/h)	0	0	689	0	0	660
Sign Control	Stop		Free			Free
Grade	0%		0%			0%
Peak Hour Factor	1.00	1.00	1.00	1.00	1.00	1.00
Hourly flow rate (vph)	0	0	689	0	0	660
Pedestrians						
Lane Width (m)						
Walking Speed (m/s)						
Percent Blockage						
Right turn flare (veh)						
Median type			TWLTL			TWLTL
Median storage veh)			2			2
Upstream signal (m)						
pX, platoon unblocked						
vC, conflicting volume	1019	344			689	
vC1, stage 1 conf vol	689					
vC2, stage 2 conf vol	330					
vCu, unblocked vol	1019	344			689	
tC, single (s)	6.8	6.9			4.1	
tC, 2 stage (s)	5.8					
tF (s)	3.5	3.3			2.2	
p0 queue free %	100	100			100	
cM capacity (veh/h)	423	657			915	

Direction, Lane #	WB 1	NB 1	NB 2	SB 1	SB 2
Volume Total	0	459	230	220	440
Volume Left	0	0	0	0	0
Volume Right	0	0	0	0	0
cSH	1700	1700	1700	915	1700
Volume to Capacity	0.00	0.27	0.14	0.00	0.26
Queue Length 95th (m)	0.0	0.0	0.0	0.0	0.0
Control Delay (s)	0.0	0.0	0.0	0.0	0.0
Lane LOS	A				
Approach Delay (s)	0.0	0.0		0.0	
Approach LOS	A				

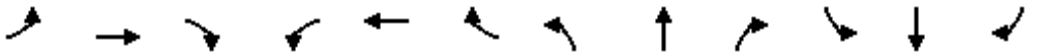
Intersection Summary			
Average Delay	0.0		
Intersection Capacity Utilization	22.4%	ICU Level of Service	A
Analysis Period (min)	15		

Lane Group	EBL	EBT	WBL	WBT	NBL	NBT	SBL	SBT
Lane Configurations								
Traffic Volume (vph)	327	387	26	358	26	536	99	502
Future Volume (vph)	327	387	26	358	26	536	99	502
Lane Group Flow (vph)	327	422	26	442	26	567	99	962
Turn Type	pm+pt	NA	Perm	NA	Perm	NA	pm+pt	NA
Protected Phases	5	2		6		4	3	8
Permitted Phases	2		6		4		8	
Detector Phase	5	2	6	6	4	4	3	8
Switch Phase								
Minimum Initial (s)	5.0	12.0	12.0	12.0	12.0	12.0	5.0	12.0
Minimum Split (s)	9.5	37.0	37.0	37.0	37.0	37.0	12.5	37.0
Total Split (s)	12.0	80.0	68.0	68.0	36.0	36.0	14.0	50.0
Total Split (%)	9.2%	61.5%	52.3%	52.3%	27.7%	27.7%	10.8%	38.5%
Yellow Time (s)	3.0	4.6	4.6	4.6	4.2	4.2	3.0	4.2
All-Red Time (s)	0.0	2.4	2.4	2.4	2.8	2.8	0.0	2.8
Lost Time Adjust (s)	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
Total Lost Time (s)	3.0	7.0	7.0	7.0	7.0	7.0	3.0	7.0
Lead/Lag	Lead		Lag	Lag	Lag	Lag	Lead	
Lead-Lag Optimize?								
Recall Mode	None	C-Max	C-Max	C-Max	None	None	None	None
v/c Ratio	0.64	0.21	0.07	0.32	0.51	0.82	0.58	0.88
Control Delay	20.5	12.8	19.7	20.3	80.2	60.0	44.3	44.2
Queue Delay	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
Total Delay	20.5	12.8	19.7	20.3	80.2	60.0	44.3	44.2
Queue Length 50th (m)	41.0	26.2	3.8	35.8	6.3	77.0	19.0	106.2
Queue Length 95th (m)	64.3	37.5	9.6	48.7	#18.9	95.9	32.6	130.1
Internal Link Dist (m)		689.8		209.6		684.9		579.6
Turn Bay Length (m)	100.0		85.0		105.0		145.0	
Base Capacity (vph)	513	1974	399	1379	58	783	177	1195
Starvation Cap Reductn	0	0	0	0	0	0	0	0
Spillback Cap Reductn	0	0	0	0	0	0	0	0
Storage Cap Reductn	0	0	0	0	0	0	0	0
Reduced v/c Ratio	0.64	0.21	0.07	0.32	0.45	0.72	0.56	0.81

Intersection Summary

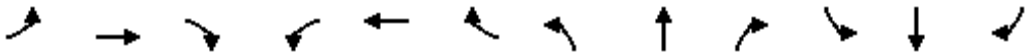
Cycle Length: 130
Actuated Cycle Length: 130
Offset: 116 (89%), Referenced to phase 2:EBTL and 6:WBTL, Start of Green
Natural Cycle: 100
Control Type: Actuated-Coordinated
95th percentile volume exceeds capacity, queue may be longer.
Queue shown is maximum after two cycles.

Splits and Phases: 1: Coleraine Dr & Mayfield Rd



Movement	EBL	EBT	EBR	WBL	WBT	WBR	NBL	NBT	NBR	SBL	SBT	SBR
Lane Configurations												
Traffic Volume (vph)	327	387	35	26	358	84	26	536	31	99	502	460
Future Volume (vph)	327	387	35	26	358	84	26	536	31	99	502	460
Ideal Flow (vphpl)	1900	1900	1900	1900	1900	1900	1900	1900	1900	1900	1900	1900
Lane Width	3.5	3.7	3.5	3.5	3.7	3.5	3.5	3.7	3.5	3.5	3.7	3.5
Total Lost time (s)	3.0	7.0		7.0	7.0		7.0	7.0		3.0	7.0	
Lane Util. Factor	1.00	0.95		1.00	0.95		1.00	0.95		1.00	0.95	
Frpb, ped/bikes	1.00	1.00		1.00	1.00		1.00	1.00		1.00	1.00	
Flpb, ped/bikes	1.00	1.00		1.00	1.00		1.00	1.00		1.00	1.00	
Frt	1.00	0.99		1.00	0.97		1.00	0.99		1.00	0.93	
Flt Protected	0.95	1.00		0.95	1.00		0.95	1.00		0.95	1.00	
Satd. Flow (prot)	1500	3315		1552	2827		1594	3499		1352	3231	
Flt Permitted	0.45	1.00		0.51	1.00		0.16	1.00		0.18	1.00	
Satd. Flow (perm)	712	3315		826	2827		263	3499		257	3231	
Peak-hour factor, PHF	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00
Adj. Flow (vph)	327	387	35	26	358	84	26	536	31	99	502	460
RTOR Reduction (vph)	0	5	0	0	15	0	0	3	0	0	133	0
Lane Group Flow (vph)	327	417	0	26	427	0	26	564	0	99	829	0
Confl. Peds. (#/hr)									1	1		
Heavy Vehicles (%)	19%	9%	6%	15%	15%	70%	12%	3%	10%	32%	2%	8%
Turn Type	pm+pt	NA		Perm	NA		Perm	NA		pm+pt	NA	
Protected Phases	5	2			6			4		3	8	
Permitted Phases	2			6			4			8		
Actuated Green, G (s)	77.2	77.2		62.8	62.8		25.5	25.5		38.8	38.8	
Effective Green, g (s)	77.2	77.2		62.8	62.8		25.5	25.5		38.8	38.8	
Actuated g/C Ratio	0.59	0.59		0.48	0.48		0.20	0.20		0.30	0.30	
Clearance Time (s)	3.0	7.0		7.0	7.0		7.0	7.0		3.0	7.0	
Vehicle Extension (s)	3.0	3.0		3.0	3.0		3.0	3.0		3.0	3.0	
Lane Grp Cap (vph)	491	1968		399	1365		51	686		163	964	
v/s Ratio Prot	c0.06	0.13			0.15			0.16		0.05	c0.26	
v/s Ratio Perm	c0.34			0.03			0.10			0.13		
v/c Ratio	0.67	0.21		0.07	0.31		0.51	0.82		0.61	0.86	
Uniform Delay, d1	15.1	12.3		17.9	20.5		46.7	50.1		35.8	43.0	
Progression Factor	1.00	1.00		1.00	1.00		1.00	1.00		1.00	1.00	
Incremental Delay, d2	3.4	0.2		0.3	0.6		7.8	7.8		6.3	7.7	
Delay (s)	18.5	12.5		18.2	21.1		54.5	57.9		42.1	50.8	
Level of Service	B	B		B	C		D	E		D	D	
Approach Delay (s)		15.1			20.9			57.8			50.0	
Approach LOS		B			C			E			D	

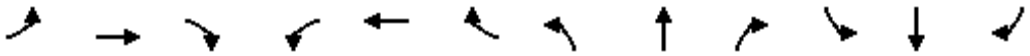
Intersection Summary			
HCM 2000 Control Delay	37.8	HCM 2000 Level of Service	D
HCM 2000 Volume to Capacity ratio	0.77		
Actuated Cycle Length (s)	130.0	Sum of lost time (s)	20.0
Intersection Capacity Utilization	90.2%	ICU Level of Service	E
Analysis Period (min)	15		
c Critical Lane Group			



Movement	EBL	EBT	EBR	WBL	WBT	WBR	NBL	NBT	NBR	SBL	SBT	SBR
Lane Configurations												
Traffic Volume (veh/h)	3	3	13	28	5	95	13	872	20	108	987	4
Future Volume (Veh/h)	3	3	13	28	5	95	13	872	20	108	987	4
Sign Control		Stop			Stop			Free			Free	
Grade		0%			0%			0%			0%	
Peak Hour Factor	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00
Hourly flow rate (vph)	3	3	13	28	5	95	13	872	20	108	987	4
Pedestrians												
Lane Width (m)												
Walking Speed (m/s)												
Percent Blockage												
Right turn flare (veh)												
Median type								TWLTL			None	
Median storage veh)								2				
Upstream signal (m)												
pX, platoon unblocked												
vC, conflicting volume	1764	2123	496	1632	2115	446	991			892		
vC1, stage 1 conf vol	1205	1205		908	908							
vC2, stage 2 conf vol	560	918		724	1207							
vCu, unblocked vol	1764	2123	496	1632	2115	446	991			892		
tC, single (s)	7.5	7.2	7.1	7.9	7.7	7.3	5.8			4.3		
tC, 2 stage (s)	6.5	6.2		6.9	6.7							
tF (s)	3.5	4.3	3.4	3.7	4.6	3.5	3.1			2.3		
p0 queue free %	98	97	97	85	95	82	96			85		
cM capacity (veh/h)	142	118	504	186	108	518	353			702		

Direction, Lane #	EB 1	EB 2	WB 1	WB 2	NB 1	NB 2	NB 3	SB 1	SB 2	SB 3
Volume Total	3	16	28	100	13	581	311	108	658	333
Volume Left	3	0	28	0	13	0	0	108	0	0
Volume Right	0	13	0	95	0	0	20	0	0	4
cSH	142	313	186	435	353	1700	1700	702	1700	1700
Volume to Capacity	0.02	0.05	0.15	0.23	0.04	0.34	0.18	0.15	0.39	0.20
Queue Length 95th (m)	0.5	1.3	4.1	7.0	0.9	0.0	0.0	4.3	0.0	0.0
Control Delay (s)	30.9	17.1	27.7	15.7	15.6	0.0	0.0	11.1	0.0	0.0
Lane LOS	D	C	D	C	C			B		
Approach Delay (s)	19.3		18.4		0.2			1.1		
Approach LOS	C		C							

Intersection Summary				
Average Delay	1.9			
Intersection Capacity Utilization	49.0%	ICU Level of Service	A	
Analysis Period (min)	15			



Movement	EBL	EBT	EBR	WBL	WBT	WBR	NBL	NBT	NBR	SBL	SBT	SBR
Lane Configurations												
Traffic Volume (veh/h)	4	135	8	7	110	14	8	0	8	21	0	9
Future Volume (Veh/h)	4	135	8	7	110	14	8	0	8	21	0	9
Sign Control		Free			Free			Stop			Stop	
Grade		0%			0%			0%			0%	
Peak Hour Factor	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00
Hourly flow rate (vph)	4	135	8	7	110	14	8	0	8	21	0	9
Pedestrians												
Lane Width (m)												
Walking Speed (m/s)												
Percent Blockage												
Right turn flare (veh)												
Median type		None			None							
Median storage veh)												
Upstream signal (m)												
pX, platoon unblocked												
vC, conflicting volume	124			143			287	285	139	286	282	117
vC1, stage 1 conf vol												
vC2, stage 2 conf vol												
vCu, unblocked vol	124			143			287	285	139	286	282	117
tC, single (s)	4.3			4.4			7.2	6.5	6.5	7.2	6.5	6.3
tC, 2 stage (s)												
tF (s)	2.4			2.5			3.6	4.0	3.5	3.6	4.0	3.4
p0 queue free %	100			99			99	100	99	97	100	99
cM capacity (veh/h)	1332			1290			633	622	852	640	625	911

Direction, Lane #	EB 1	WB 1	NB 1	SB 1
Volume Total	147	131	16	30
Volume Left	4	7	8	21
Volume Right	8	14	8	9
cSH	1332	1290	726	703
Volume to Capacity	0.00	0.01	0.02	0.04
Queue Length 95th (m)	0.1	0.1	0.5	1.1
Control Delay (s)	0.2	0.5	10.1	10.3
Lane LOS	A	A	B	B
Approach Delay (s)	0.2	0.5	10.1	10.3
Approach LOS			B	B

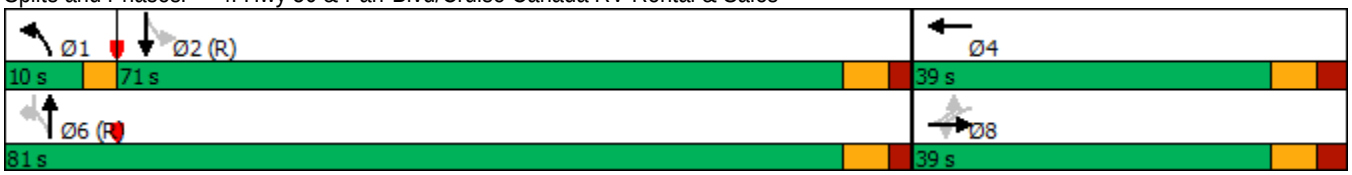
Intersection Summary				
Average Delay	1.7			
Intersection Capacity Utilization	19.9%	ICU Level of Service	A	
Analysis Period (min)	15			

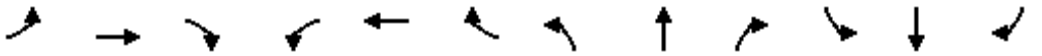
Lane Group	EBL	EBT	WBL	WBT	NBL	NBT	SBL	SBT	SBR
Lane Configurations									
Traffic Volume (vph)	55	0	1	0	113	1336	1	1262	39
Future Volume (vph)	55	0	1	0	113	1336	1	1262	39
Lane Group Flow (vph)	55	170	0	2	113	1336	1	1262	39
Turn Type	Perm	NA	D.Pm	NA	pm+pt	NA	Perm	NA	custom
Protected Phases		8		4	1	6		2	
Permitted Phases	8		8		6		2		6
Detector Phase	8	8	8	4	1	6	2	2	6
Switch Phase									
Minimum Initial (s)	8.0	8.0	8.0	8.0	5.0	12.0	12.0	12.0	12.0
Minimum Split (s)	33.9	33.9	33.9	33.9	9.5	30.1	30.1	30.1	30.1
Total Split (s)	39.0	39.0	39.0	39.0	10.0	81.0	71.0	71.0	81.0
Total Split (%)	32.5%	32.5%	32.5%	32.5%	8.3%	67.5%	59.2%	59.2%	67.5%
Yellow Time (s)	4.0	4.0	4.0	4.0	3.0	4.0	4.0	4.0	4.0
All-Red Time (s)	2.9	2.9	2.9	2.9	0.0	2.1	2.1	2.1	2.1
Lost Time Adjust (s)	0.0	0.0		0.0	0.0	0.0	0.0	0.0	0.0
Total Lost Time (s)	6.9	6.9		6.9	3.0	6.1	6.1	6.1	6.1
Lead/Lag					Lead		Lag	Lag	
Lead-Lag Optimize?									
Recall Mode	None	None	None	None	None	C-Max	C-Max	C-Max	C-Max
v/c Ratio	0.45	0.63		0.01	0.39	0.50	0.00	0.51	0.03
Control Delay	62.6	22.1		0.0	6.2	5.0	7.0	9.3	1.2
Queue Delay	0.0	0.0		0.0	0.0	0.0	0.0	0.0	0.0
Total Delay	62.6	22.1		0.0	6.2	5.0	7.0	9.3	1.2
Queue Length 50th (m)	13.2	4.9		0.0	3.9	45.4	0.1	63.6	0.2
Queue Length 95th (m)	26.2	26.5		0.0	9.4	71.9	0.8	102.5	2.7
Internal Link Dist (m)		828.8		20.9		520.2		332.3	
Turn Bay Length (m)	80.0				35.0		25.0		20.0
Base Capacity (vph)	361	506		380	291	2658	274	2474	1198
Starvation Cap Reductn	0	0		0	0	0	0	0	0
Spillback Cap Reductn	0	0		0	0	0	0	0	0
Storage Cap Reductn	0	0		0	0	0	0	0	0
Reduced v/c Ratio	0.15	0.34		0.01	0.39	0.50	0.00	0.51	0.03

Intersection Summary

Cycle Length: 120
Actuated Cycle Length: 120
Offset: 3 (3%), Referenced to phase 2:SBTL and 6:NBTL, Start of Green
Natural Cycle: 80
Control Type: Actuated-Coordinated

Splits and Phases: 4: Hwy 50 & Parr Blvd/Cruise Canada RV Rental & Sales





Movement	EBL	EBT	EBR	WBL	WBT	WBR	NBL	NBT	NBR	SBL	SBT	SBR
Lane Configurations												
Traffic Volume (vph)	55	0	170	1	0	1	113	1336	0	1	1262	39
Future Volume (vph)	55	0	170	1	0	1	113	1336	0	1	1262	39
Ideal Flow (vphpl)	1900	1900	1900	1900	1900	1900	1900	1900	1900	1900	1900	1900
Lane Width	3.5	3.7	3.5	3.5	3.7	3.5	3.5	3.7	3.5	3.5	3.7	3.5
Total Lost time (s)	6.9	6.9			6.9		3.0	6.1		6.1	6.1	6.1
Lane Util. Factor	1.00	1.00			1.00		1.00	0.95		1.00	0.95	1.00
Frpb, ped/bikes	1.00	1.00			0.99		1.00	1.00		1.00	1.00	0.98
Flpb, ped/bikes	1.00	1.00			1.00		1.00	1.00		1.00	1.00	1.00
Frt	1.00	0.85			0.93		1.00	1.00		1.00	1.00	0.85
Flt Protected	0.95	1.00			0.98		0.95	1.00		0.95	1.00	1.00
Satd. Flow (prot)	1695	1484			1735		1394	3318		1785	3476	1487
Flt Permitted	0.76	1.00			0.72		0.18	1.00		0.20	1.00	1.00
Satd. Flow (perm)	1350	1484			1273		261	3318		385	3476	1487
Peak-hour factor, PHF	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00
Adj. Flow (vph)	55	0	170	1	0	1	113	1336	0	1	1262	39
RTOR Reduction (vph)	0	135	0	0	2	0	0	0	0	0	0	7
Lane Group Flow (vph)	55	35	0	0	0	0	113	1336	0	1	1262	32
Confl. Peds. (#/hr)	2					2	1					1
Heavy Vehicles (%)	5%	0%	10%	0%	0%	0%	28%	10%	0%	0%	5%	5%
Turn Type	Perm	NA		D.Pm	NA		pm+pt	NA		Perm	NA	custom
Protected Phases		8			4		1	6			2	
Permitted Phases	8			8			6			2		6
Actuated Green, G (s)	10.9	10.9			10.9		96.1	96.1		85.4	85.4	96.1
Effective Green, g (s)	10.9	10.9			10.9		96.1	96.1		85.4	85.4	96.1
Actuated g/C Ratio	0.09	0.09			0.09		0.80	0.80		0.71	0.71	0.80
Clearance Time (s)	6.9	6.9			6.9		3.0	6.1		6.1	6.1	6.1
Vehicle Extension (s)	3.0	3.0			3.0		3.0	3.0		3.0	3.0	3.0
Lane Grp Cap (vph)	122	134			115		281	2657		273	2473	1190
v/s Ratio Prot		0.02					0.03	c0.40			0.36	
v/s Ratio Perm	c0.04				0.00		0.30			0.00		0.02
v/c Ratio	0.45	0.26			0.00		0.40	0.50		0.00	0.51	0.03
Uniform Delay, d1	51.7	50.8			49.6		4.5	4.0		5.0	7.8	2.4
Progression Factor	1.00	1.00			1.00		1.00	1.00		1.00	1.00	1.00
Incremental Delay, d2	2.6	1.0			0.0		0.9	0.7		0.0	0.8	0.0
Delay (s)	54.3	51.8			49.6		5.4	4.7		5.0	8.6	2.5
Level of Service	D	D			D		A	A		A	A	A
Approach Delay (s)		52.4			49.6			4.7			8.4	
Approach LOS		D			D			A			A	

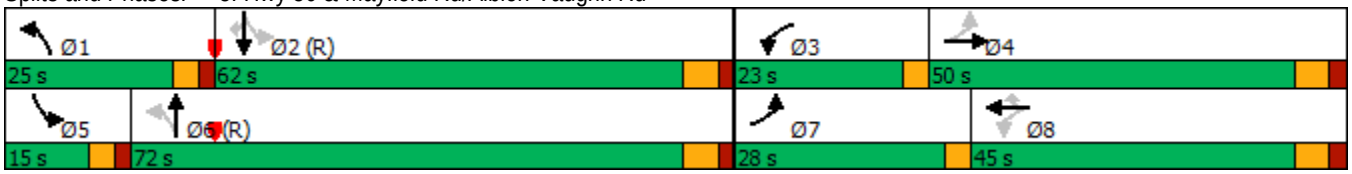
Intersection Summary			
HCM 2000 Control Delay	10.0	HCM 2000 Level of Service	A
HCM 2000 Volume to Capacity ratio	0.51		
Actuated Cycle Length (s)	120.0	Sum of lost time (s)	16.0
Intersection Capacity Utilization	73.4%	ICU Level of Service	D
Analysis Period (min)	15		
c Critical Lane Group			

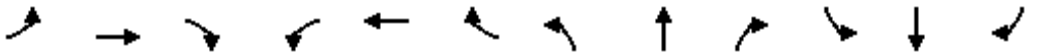
Lane Group	EBL	EBT	WBL	WBT	WBR	NBL	NBT	SBL	SBT	SBR
Lane Configurations										
Traffic Volume (vph)	87	249	222	158	33	103	1180	36	1337	73
Future Volume (vph)	87	249	222	158	33	103	1180	36	1337	73
Lane Group Flow (vph)	87	492	222	158	33	103	1593	36	1337	73
Turn Type	pm+pt	NA	pm+pt	NA	Perm	pm+pt	NA	pm+pt	NA	Perm
Protected Phases	7	4	3	8		1	6	5	2	
Permitted Phases	4		8		8	6		2		2
Detector Phase	7	4	3	8	8	1	6	5	2	2
Switch Phase										
Minimum Initial (s)	5.0	12.0	10.0	12.0	12.0	10.0	20.0	10.0	20.0	20.0
Minimum Split (s)	9.5	43.5	14.5	43.5	43.5	15.0	41.3	15.0	41.3	41.3
Total Split (s)	28.0	50.0	23.0	45.0	45.0	25.0	72.0	15.0	62.0	62.0
Total Split (%)	17.5%	31.3%	14.4%	28.1%	28.1%	15.6%	45.0%	9.4%	38.8%	38.8%
Yellow Time (s)	3.0	4.0	3.0	4.0	4.0	3.0	4.2	3.0	4.2	4.2
All-Red Time (s)	0.0	2.5	0.0	2.5	2.5	2.0	2.1	2.0	2.1	2.1
Lost Time Adjust (s)	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
Total Lost Time (s)	3.0	6.5	3.0	6.5	6.5	5.0	6.3	5.0	6.3	6.3
Lead/Lag	Lead	Lag	Lead	Lag	Lag	Lead	Lag	Lead	Lag	Lag
Lead-Lag Optimize?										
Recall Mode	None	None	None	None	None	None	C-Max	None	C-Max	C-Max
v/c Ratio	0.26	0.84	0.90	0.51	0.08	0.64	0.64	0.19	0.79	0.09
Control Delay	39.5	57.9	78.9	61.3	0.4	42.6	27.1	16.5	39.5	0.2
Queue Delay	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
Total Delay	39.5	57.9	78.9	61.3	0.4	42.6	27.1	16.5	39.5	0.2
Queue Length 50th (m)	20.8	60.3	58.4	47.1	0.0	15.2	134.0	4.4	192.7	0.0
Queue Length 95th (m)	32.9	78.2	#95.3	69.7	0.0	38.7	167.9	10.8	#288.5	0.0
Internal Link Dist (m)		330.4		656.8			717.1		188.2	
Turn Bay Length (m)	60.0		50.0		50.0	100.0		35.0		120.0
Base Capacity (vph)	475	894	253	356	435	193	2506	186	1693	835
Starvation Cap Reductn	0	0	0	0	0	0	0	0	0	0
Spillback Cap Reductn	0	0	0	0	0	0	0	0	0	0
Storage Cap Reductn	0	0	0	0	0	0	0	0	0	0
Reduced v/c Ratio	0.18	0.55	0.88	0.44	0.08	0.53	0.64	0.19	0.79	0.09

Intersection Summary

Cycle Length: 160
Actuated Cycle Length: 160
Offset: 72 (45%), Referenced to phase 2:SBTL and 6:NBTL, Start of Green
Natural Cycle: 125
Control Type: Actuated-Coordinated
95th percentile volume exceeds capacity, queue may be longer.
Queue shown is maximum after two cycles.

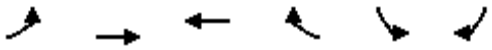
Splits and Phases: 5: Hwy 50 & Mayfield Rd/Albion Vaughn Rd





Movement	EBL	EBT	EBR	WBL	WBT	WBR	NBL	NBT	NBR	SBL	SBT	SBR
Lane Configurations												
Traffic Volume (vph)	87	249	243	222	158	33	103	1180	413	36	1337	73
Future Volume (vph)	87	249	243	222	158	33	103	1180	413	36	1337	73
Ideal Flow (vphpl)	1900	1900	1900	1900	1900	1900	1900	1900	1900	1900	1900	1900
Lane Width	3.5	3.7	3.5	3.5	3.7	3.5	3.5	3.7	3.5	3.5	3.7	3.5
Total Lost time (s)	3.0	6.5		3.0	6.5	6.5	5.0	6.3		5.0	6.3	6.3
Lane Util. Factor	1.00	0.95		1.00	1.00	1.00	1.00	0.91		1.00	0.95	1.00
Frpb, ped/bikes	1.00	1.00		1.00	1.00	1.00	1.00	1.00		1.00	1.00	0.99
Flpb, ped/bikes	1.00	1.00		1.00	1.00	1.00	1.00	1.00		1.00	1.00	1.00
Frt	1.00	0.93		1.00	1.00	0.85	1.00	0.96		1.00	1.00	0.85
Flt Protected	0.95	1.00		0.95	1.00	1.00	0.95	1.00		0.95	1.00	1.00
Satd. Flow (prot)	1767	2879		1623	1478	1389	1123	4523		1566	3444	1562
Flt Permitted	0.66	1.00		0.15	1.00	1.00	0.08	1.00		0.11	1.00	1.00
Satd. Flow (perm)	1222	2879		261	1478	1389	95	4523		177	3444	1562
Peak-hour factor, PHF	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00
Adj. Flow (vph)	87	249	243	222	158	33	103	1180	413	36	1337	73
RTOR Reduction (vph)	0	129	0	0	0	26	0	31	0	0	0	37
Lane Group Flow (vph)	87	363	0	222	158	7	103	1562	0	36	1337	36
Confl. Bikes (#/hr)												1
Heavy Vehicles (%)	1%	10%	25%	10%	30%	15%	59%	13%	7%	14%	6%	1%
Turn Type	pm+pt	NA		pm+pt	NA	Perm	pm+pt	NA		pm+pt	NA	Perm
Protected Phases	7	4		3	8		1	6		5	2	
Permitted Phases	4			8		8	6			2		2
Actuated Green, G (s)	36.3	25.3		47.6	33.6	33.6	99.6	86.6		86.7	78.7	78.7
Effective Green, g (s)	36.3	25.3		47.6	33.6	33.6	99.6	86.6		86.7	78.7	78.7
Actuated g/C Ratio	0.23	0.16		0.30	0.21	0.21	0.62	0.54		0.54	0.49	0.49
Clearance Time (s)	3.0	6.5		3.0	6.5	6.5	5.0	6.3		5.0	6.3	6.3
Vehicle Extension (s)	3.0	3.0		3.0	3.0	3.0	3.0	3.0		3.0	3.0	3.0
Lane Grp Cap (vph)	314	455		241	310	291	161	2448		165	1694	768
v/s Ratio Prot	0.02	0.13		c0.11	0.11		c0.06	0.35		0.01	c0.39	
v/s Ratio Perm	0.04			c0.16		0.00	0.33			0.11		0.02
v/c Ratio	0.28	0.80		0.92	0.51	0.02	0.64	0.64		0.22	0.79	0.05
Uniform Delay, d1	50.3	64.9		47.3	55.9	50.2	29.4	25.7		18.8	33.8	21.1
Progression Factor	1.00	1.00		1.00	1.00	1.00	1.00	1.00		1.00	1.00	1.00
Incremental Delay, d2	0.5	9.4		37.2	1.3	0.0	8.1	1.3		0.7	3.8	0.1
Delay (s)	50.8	74.3		84.5	57.2	50.2	37.4	27.0		19.5	37.6	21.3
Level of Service	D	E		F	E	D	D	C		B	D	C
Approach Delay (s)		70.8			71.3			27.6			36.3	
Approach LOS		E			E			C			D	

Intersection Summary			
HCM 2000 Control Delay	41.1	HCM 2000 Level of Service	D
HCM 2000 Volume to Capacity ratio	0.83		
Actuated Cycle Length (s)	160.0	Sum of lost time (s)	20.8
Intersection Capacity Utilization	90.4%	ICU Level of Service	E
Analysis Period (min)	15		
c Critical Lane Group			



Movement	EBL	EBT	WBT	WBR	SBL	SBR
Lane Configurations						
Traffic Volume (veh/h)	5	512	463	3	7	5
Future Volume (Veh/h)	5	512	463	3	7	5
Sign Control		Free	Free		Stop	
Grade		0%	0%		0%	
Peak Hour Factor	1.00	1.00	1.00	1.00	1.00	1.00
Hourly flow rate (vph)	5	512	463	3	7	5
Pedestrians						
Lane Width (m)						
Walking Speed (m/s)						
Percent Blockage						
Right turn flare (veh)						
Median type		None	None			
Median storage veh)						
Upstream signal (m)		233				
pX, platoon unblocked					0.96	
vC, conflicting volume	466				730	233
vC1, stage 1 conf vol						
vC2, stage 2 conf vol						
vCu, unblocked vol	466				632	233
tC, single (s)	5.3				7.4	7.3
tC, 2 stage (s)						
tF (s)	2.8				3.8	3.5
p0 queue free %	99				98	99
cM capacity (veh/h)	772				339	717

Direction, Lane #	EB 1	EB 2	EB 3	WB 1	WB 2	SB 1	SB 2
Volume Total	5	256	256	309	157	7	5
Volume Left	5	0	0	0	0	7	0
Volume Right	0	0	0	0	3	0	5
cSH	772	1700	1700	1700	1700	339	717
Volume to Capacity	0.01	0.15	0.15	0.18	0.09	0.02	0.01
Queue Length 95th (m)	0.2	0.0	0.0	0.0	0.0	0.5	0.2
Control Delay (s)	9.7	0.0	0.0	0.0	0.0	15.8	10.1
Lane LOS	A					C	B
Approach Delay (s)	0.1			0.0		13.4	
Approach LOS						B	

Intersection Summary			
Average Delay	0.2		
Intersection Capacity Utilization	24.2%	ICU Level of Service	A
Analysis Period (min)	15		

Movement	WBL	WBR	NBT	NBR	SBL	SBT
Lane Configurations						
Traffic Volume (veh/h)	0	0	888	1	0	1035
Future Volume (Veh/h)	0	0	888	1	0	1035
Sign Control	Stop		Free			Free
Grade	0%		0%			0%
Peak Hour Factor	1.00	1.00	1.00	1.00	1.00	1.00
Hourly flow rate (vph)	0	0	888	1	0	1035
Pedestrians						
Lane Width (m)						
Walking Speed (m/s)						
Percent Blockage						
Right turn flare (veh)						
Median type			TWLTL			TWLTL
Median storage veh)			2			2
Upstream signal (m)						
pX, platoon unblocked						
vC, conflicting volume	1406	444			889	
vC1, stage 1 conf vol	888					
vC2, stage 2 conf vol	518					
vCu, unblocked vol	1406	444			889	
tC, single (s)	6.8	6.9			4.1	
tC, 2 stage (s)	5.8					
tF (s)	3.5	3.3			2.2	
p0 queue free %	100	100			100	
cM capacity (veh/h)	322	567			771	

Direction, Lane #	WB 1	NB 1	NB 2	SB 1	SB 2
Volume Total	0	592	297	345	690
Volume Left	0	0	0	0	0
Volume Right	0	0	1	0	0
cSH	1700	1700	1700	771	1700
Volume to Capacity	0.00	0.35	0.17	0.00	0.41
Queue Length 95th (m)	0.0	0.0	0.0	0.0	0.0
Control Delay (s)	0.0	0.0	0.0	0.0	0.0
Lane LOS	A				
Approach Delay (s)	0.0	0.0		0.0	
Approach LOS	A				

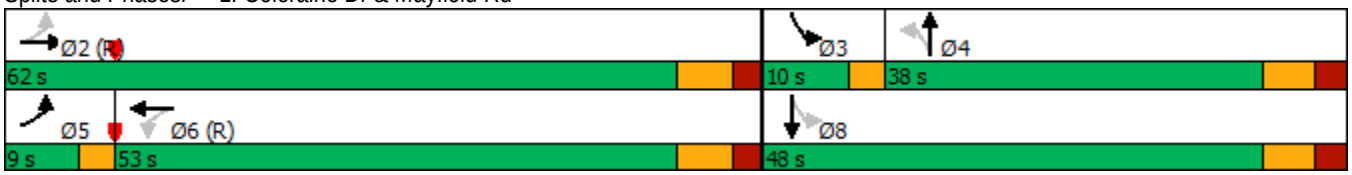
Intersection Summary			
Average Delay	0.0		
Intersection Capacity Utilization	31.9%	ICU Level of Service	A
Analysis Period (min)	15		

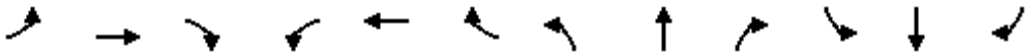
Lane Group	EBL	EBT	WBL	WBT	NBL	NBT	SBL	SBT
Lane Configurations								
Traffic Volume (vph)	104	288	2	302	6	12	90	0
Future Volume (vph)	104	288	2	302	6	12	90	0
Lane Group Flow (vph)	104	289	2	362	6	12	90	157
Turn Type	pm+pt	NA	Perm	NA	Perm	NA	pm+pt	NA
Protected Phases	5	2		6		4	3	8
Permitted Phases	2		6		4		8	
Detector Phase	5	2	6	6	4	4	3	8
Switch Phase								
Minimum Initial (s)	5.0	12.0	12.0	12.0	12.0	12.0	5.0	12.0
Minimum Split (s)	9.5	37.0	37.0	37.0	37.0	37.0	12.5	37.0
Total Split (s)	9.0	62.0	53.0	53.0	38.0	38.0	10.0	48.0
Total Split (%)	8.2%	56.4%	48.2%	48.2%	34.5%	34.5%	9.1%	43.6%
Yellow Time (s)	3.0	4.6	4.6	4.6	4.2	4.2	3.0	4.2
All-Red Time (s)	0.0	2.4	2.4	2.4	2.8	2.8	0.0	2.8
Lost Time Adjust (s)	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
Total Lost Time (s)	3.0	7.0	7.0	7.0	7.0	7.0	3.0	7.0
Lead/Lag	Lead		Lag	Lag	Lag	Lag	Lead	
Lead-Lag Optimize?								
Recall Mode	None	C-Max	C-Max	C-Max	None	None	None	None
v/c Ratio	0.16	0.12	0.01	0.17	0.05	0.03	0.42	0.18
Control Delay	4.6	5.1	10.5	8.9	45.0	44.1	44.2	0.5
Queue Delay	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
Total Delay	4.6	5.1	10.5	8.9	45.0	44.1	44.2	0.5
Queue Length 50th (m)	4.0	7.4	0.1	13.2	1.2	1.3	18.7	0.0
Queue Length 95th (m)	11.8	16.1	1.4	26.8	5.4	4.4	31.3	0.0
Internal Link Dist (m)		689.8		209.6		684.9		579.6
Turn Bay Length (m)	100.0		85.0		105.0		145.0	
Base Capacity (vph)	665	2479	340	2082	345	1028	214	1398
Starvation Cap Reductn	0	0	0	0	0	0	0	0
Spillback Cap Reductn	0	0	0	0	0	0	0	0
Storage Cap Reductn	0	0	0	0	0	0	0	0
Reduced v/c Ratio	0.16	0.12	0.01	0.17	0.02	0.01	0.42	0.11

Intersection Summary

Cycle Length: 110
Actuated Cycle Length: 110
Offset: 48 (44%), Referenced to phase 2:EBTL and 6:WBTL, Start of Green
Natural Cycle: 100
Control Type: Actuated-Coordinated

Splits and Phases: 1: Coleraine Dr & Mayfield Rd

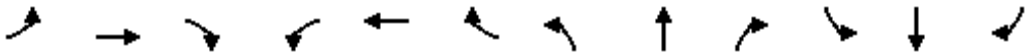




Movement	EBL	EBT	EBR	WBL	WBT	WBR	NBL	NBT	NBR	SBL	SBT	SBR
Lane Configurations												
Traffic Volume (vph)	104	288	1	2	302	60	6	12	0	90	0	157
Future Volume (vph)	104	288	1	2	302	60	6	12	0	90	0	157
Ideal Flow (vphpl)	1900	1900	1900	1900	1900	1900	1900	1900	1900	1900	1900	1900
Lane Width	3.5	3.7	3.5	3.5	3.7	3.5	3.5	3.7	3.5	3.5	3.7	3.5
Total Lost time (s)	3.0	7.0		7.0	7.0		7.0	7.0		3.0	7.0	
Lane Util. Factor	1.00	0.95		1.00	0.95		1.00	0.95		1.00	0.95	
Frt	1.00	1.00		1.00	0.98		1.00	1.00		1.00	0.85	
Flt Protected	0.95	1.00		0.95	1.00		0.95	1.00		0.95	1.00	
Satd. Flow (prot)	1500	3410		892	3286		1785	3650		1487	2900	
Flt Permitted	0.51	1.00		0.57	1.00		0.65	1.00		0.53	1.00	
Satd. Flow (perm)	809	3410		540	3286		1226	3650		828	2900	
Peak-hour factor, PHF	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00
Adj. Flow (vph)	104	288	1	2	302	60	6	12	0	90	0	157
RTOR Reduction (vph)	0	0	0	0	10	0	0	0	0	0	129	0
Lane Group Flow (vph)	104	289	0	2	352	0	6	12	0	90	28	0
Heavy Vehicles (%)	19%	7%	0%	100%	3%	35%	0%	0%	0%	20%	0%	7%
Turn Type	pm+pt	NA		Perm	NA		Perm	NA		pm+pt	NA	
Protected Phases	5	2			6			4		3	8	
Permitted Phases	2			6			4			8		
Actuated Green, G (s)	76.6	76.6		66.0	66.0		7.2	7.2		19.4	19.4	
Effective Green, g (s)	76.6	76.6		66.0	66.0		7.2	7.2		19.4	19.4	
Actuated g/C Ratio	0.70	0.70		0.60	0.60		0.07	0.07		0.18	0.18	
Clearance Time (s)	3.0	7.0		7.0	7.0		7.0	7.0		3.0	7.0	
Vehicle Extension (s)	3.0	3.0		3.0	3.0		3.0	3.0		3.0	3.0	
Lane Grp Cap (vph)	611	2374		324	1971		80	238		201	511	
v/s Ratio Prot	c0.01	0.08			c0.11			0.00		c0.04	0.01	
v/s Ratio Perm	0.11			0.00			0.00			c0.04		
v/c Ratio	0.17	0.12		0.01	0.18		0.07	0.05		0.45	0.05	
Uniform Delay, d1	5.5	5.5		8.8	9.9		48.3	48.2		39.8	37.7	
Progression Factor	1.00	1.00		1.00	1.00		1.00	1.00		1.00	1.00	
Incremental Delay, d2	0.1	0.1		0.0	0.2		0.4	0.1		1.6	0.0	
Delay (s)	5.6	5.6		8.9	10.1		48.7	48.3		41.3	37.7	
Level of Service	A	A		A	B		D	D		D	D	
Approach Delay (s)		5.6			10.0			48.4			39.0	
Approach LOS		A			B			D			D	

Intersection Summary			
HCM 2000 Control Delay	16.0	HCM 2000 Level of Service	B
HCM 2000 Volume to Capacity ratio	0.24		
Actuated Cycle Length (s)	110.0	Sum of lost time (s)	20.0
Intersection Capacity Utilization	49.2%	ICU Level of Service	A
Analysis Period (min)	15		

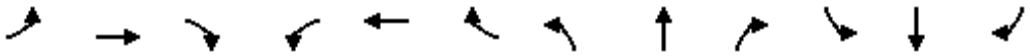
c Critical Lane Group



Movement	EBL	EBT	EBR	WBL	WBT	WBR	NBL	NBT	NBR	SBL	SBT	SBR
Lane Configurations												
Traffic Volume (veh/h)	1	3	1	15	1	27	1	146	3	22	199	2
Future Volume (Veh/h)	1	3	1	15	1	27	1	146	3	22	199	2
Sign Control		Stop			Stop			Free			Free	
Grade		0%			0%			0%			0%	
Peak Hour Factor	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00
Hourly flow rate (vph)	1	3	1	15	1	27	1	146	3	22	199	2
Pedestrians												
Lane Width (m)												
Walking Speed (m/s)												
Percent Blockage												
Right turn flare (veh)												
Median type								TWLTL			None	
Median storage veh)								2				
Upstream signal (m)												
pX, platoon unblocked												
vC, conflicting volume	346	395	100	296	394	74	201			149		
vC1, stage 1 conf vol	244	244		150	150							
vC2, stage 2 conf vol	102	151		146	245							
vCu, unblocked vol	346	395	100	296	394	74	201			149		
tC, single (s)	7.5	6.5	6.9	7.6	8.5	7.3	4.1			4.5		
tC, 2 stage (s)	6.5	5.5		6.6	7.5							
tF (s)	3.5	4.0	3.3	3.6	5.0	3.5	2.2			2.4		
p0 queue free %	100	100	100	98	100	97	100			98		
cM capacity (veh/h)	684	642	942	729	462	920	1383			1321		

Direction, Lane #	EB 1	EB 2	WB 1	WB 2	NB 1	NB 2	NB 3	SB 1	SB 2	SB 3
Volume Total	1	4	15	28	1	97	52	22	133	68
Volume Left	1	0	15	0	1	0	0	22	0	0
Volume Right	0	1	0	27	0	0	3	0	0	2
cSH	684	698	729	888	1383	1700	1700	1321	1700	1700
Volume to Capacity	0.00	0.01	0.02	0.03	0.00	0.06	0.03	0.02	0.08	0.04
Queue Length 95th (m)	0.0	0.1	0.5	0.8	0.0	0.0	0.0	0.4	0.0	0.0
Control Delay (s)	10.3	10.2	10.0	9.2	7.6	0.0	0.0	7.8	0.0	0.0
Lane LOS	B	B	B	A	A			A		
Approach Delay (s)	10.2		9.5		0.1			0.8		
Approach LOS	B		A							

Intersection Summary				
Average Delay	1.5			
Intersection Capacity Utilization	26.4%	ICU Level of Service		A
Analysis Period (min)	15			



Movement	EBL	EBT	EBR	WBL	WBT	WBR	NBL	NBT	NBR	SBL	SBT	SBR
Lane Configurations												
Traffic Volume (veh/h)	0	27	1	3	34	3	3	1	5	4	2	5
Future Volume (Veh/h)	0	27	1	3	34	3	3	1	5	4	2	5
Sign Control		Free			Free			Stop			Stop	
Grade		0%			0%			0%			0%	
Peak Hour Factor	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00
Hourly flow rate (vph)	0	27	1	3	34	3	3	1	5	4	2	5
Pedestrians												
Lane Width (m)												
Walking Speed (m/s)												
Percent Blockage												
Right turn flare (veh)												
Median type		None			None							
Median storage veh)												
Upstream signal (m)												
pX, platoon unblocked												
vC, conflicting volume	37			28			75	70	28	74	70	36
vC1, stage 1 conf vol												
vC2, stage 2 conf vol												
vCu, unblocked vol	37			28			75	70	28	74	70	36
tC, single (s)	4.1			4.1			7.4	6.5	6.4	7.1	7.0	6.2
tC, 2 stage (s)												
tF (s)	2.2			2.2			3.8	4.0	3.5	3.5	4.5	3.3
p0 queue free %	100			100			100	100	99	100	100	100
cM capacity (veh/h)	1587			1599			838	822	998	914	736	1043

Direction, Lane #	EB 1	WB 1	NB 1	SB 1
Volume Total	28	40	9	11
Volume Left	0	3	3	4
Volume Right	1	3	5	5
cSH	1587	1599	918	925
Volume to Capacity	0.00	0.00	0.01	0.01
Queue Length 95th (m)	0.0	0.0	0.2	0.3
Control Delay (s)	0.0	0.6	9.0	8.9
Lane LOS		A	A	A
Approach Delay (s)	0.0	0.6	9.0	8.9
Approach LOS			A	A

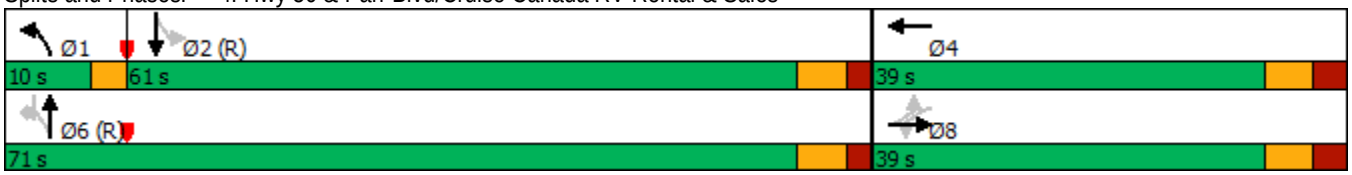
Intersection Summary				
Average Delay	2.3			
Intersection Capacity Utilization	14.5%	ICU Level of Service	A	
Analysis Period (min)	15			

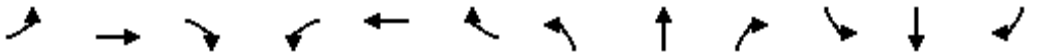
Lane Group	EBL	EBT	WBL	WBT	NBL	NBT	SBL	SBT	SBR
Lane Configurations									
Traffic Volume (vph)	19	0	4	2	35	1019	6	1004	18
Future Volume (vph)	19	0	4	2	35	1019	6	1004	18
Lane Group Flow (vph)	19	41	0	8	35	1019	6	1004	18
Turn Type	Perm	NA	D.Pm	NA	pm+pt	NA	Perm	NA	custom
Protected Phases		8		4	1	6		2	
Permitted Phases	8		8		6		2		6
Detector Phase	8	8	8	4	1	6	2	2	6
Switch Phase									
Minimum Initial (s)	8.0	8.0	8.0	8.0	5.0	12.0	12.0	12.0	12.0
Minimum Split (s)	33.9	33.9	33.9	33.9	9.5	30.1	30.1	30.1	30.1
Total Split (s)	39.0	39.0	39.0	39.0	10.0	71.0	61.0	61.0	71.0
Total Split (%)	35.5%	35.5%	35.5%	35.5%	9.1%	64.5%	55.5%	55.5%	64.5%
Yellow Time (s)	4.0	4.0	4.0	4.0	3.0	4.0	4.0	4.0	4.0
All-Red Time (s)	2.9	2.9	2.9	2.9	0.0	2.1	2.1	2.1	2.1
Lost Time Adjust (s)	0.0	0.0		0.0	0.0	0.0	0.0	0.0	0.0
Total Lost Time (s)	6.9	6.9		6.9	3.0	6.1	6.1	6.1	6.1
Lead/Lag					Lead		Lag	Lag	
Lead-Lag Optimize?									
Recall Mode	None	None	None	None	None	C-Max	C-Max	C-Max	C-Max
v/c Ratio	0.18	0.14		0.10	0.08	0.35	0.02	0.36	0.01
Control Delay	52.5	1.1		44.8	2.0	2.9	4.7	5.0	0.2
Queue Delay	0.0	0.0		0.0	0.0	0.0	0.0	0.0	0.0
Total Delay	52.5	1.1		44.8	2.0	2.9	4.7	5.0	0.2
Queue Length 50th (m)	4.1	0.0		1.3	0.9	25.3	0.3	39.0	0.0
Queue Length 95th (m)	12.2	0.0		6.5	2.6	34.6	1.6	53.0	0.5
Internal Link Dist (m)		828.8		20.9		520.2		332.3	
Turn Bay Length (m)	80.0				35.0		25.0		20.0
Base Capacity (vph)	411	559		296	453	2936	279	2817	1325
Starvation Cap Reductn	0	0		0	0	0	0	0	0
Spillback Cap Reductn	0	0		0	0	0	0	0	0
Storage Cap Reductn	0	0		0	0	0	0	0	0
Reduced v/c Ratio	0.05	0.07		0.03	0.08	0.35	0.02	0.36	0.01

Intersection Summary

Cycle Length: 110
Actuated Cycle Length: 110
Offset: 105 (95%), Referenced to phase 2:SBTL and 6:NBTL, Start of Green
Natural Cycle: 75
Control Type: Actuated-Coordinated

Splits and Phases: 4: Hwy 50 & Parr Blvd/Cruise Canada RV Rental & Sales





Movement	EBL	EBT	EBR	WBL	WBT	WBR	NBL	NBT	NBR	SBL	SBT	SBR
Lane Configurations												
Traffic Volume (vph)	19	0	41	4	2	2	35	1019	0	6	1004	18
Future Volume (vph)	19	0	41	4	2	2	35	1019	0	6	1004	18
Ideal Flow (vphpl)	1900	1900	1900	1900	1900	1900	1900	1900	1900	1900	1900	1900
Lane Width	3.5	3.7	3.5	3.5	3.7	3.5	3.5	3.7	3.5	3.5	3.7	3.5
Total Lost time (s)	6.9	6.9			6.9		3.0	6.1		6.1	6.1	6.1
Lane Util. Factor	1.00	1.00			1.00		1.00	0.95		1.00	0.95	1.00
Frpb, ped/bikes	1.00	1.00			1.00		1.00	1.00		1.00	1.00	0.98
Flpb, ped/bikes	1.00	1.00			1.00		1.00	1.00		1.00	1.00	1.00
Frt	1.00	0.85			0.97		1.00	1.00		1.00	1.00	0.85
Flt Protected	0.95	1.00			0.98		0.95	1.00		0.95	1.00	1.00
Satd. Flow (prot)	1783	1458			1203		1608	3476		1189	3544	1562
Flt Permitted	0.75	1.00			0.82		0.26	1.00		0.28	1.00	1.00
Satd. Flow (perm)	1412	1458			1012		439	3476		352	3544	1562
Peak-hour factor, PHF	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00
Adj. Flow (vph)	19	0	41	4	2	2	35	1019	0	6	1004	18
RTOR Reduction (vph)	0	39	0	0	2	0	0	0	0	0	0	3
Lane Group Flow (vph)	19	2	0	0	6	0	35	1019	0	6	1004	15
Confl. Peds. (#/hr)	1					1	1		1	1		1
Heavy Vehicles (%)	0%	0%	12%	25%	100%	50%	11%	5%	0%	50%	3%	0%
Turn Type	Perm	NA		D.Pm	NA		pm+pt	NA		Perm	NA	custom
Protected Phases		8			4		1	6			2	
Permitted Phases	8			8			6			2		6
Actuated Green, G (s)	6.7	6.7			6.7		90.3	90.3		83.6	83.6	90.3
Effective Green, g (s)	6.7	6.7			6.7		90.3	90.3		83.6	83.6	90.3
Actuated g/C Ratio	0.06	0.06			0.06		0.82	0.82		0.76	0.76	0.82
Clearance Time (s)	6.9	6.9			6.9		3.0	6.1		6.1	6.1	6.1
Vehicle Extension (s)	3.0	3.0			3.0		3.0	3.0		3.0	3.0	3.0
Lane Grp Cap (vph)	86	88			61		399	2853		267	2693	1282
v/s Ratio Prot		0.00					0.00	c0.29			c0.28	
v/s Ratio Perm	c0.01				0.01		0.07			0.02		0.01
v/c Ratio	0.22	0.03			0.10		0.09	0.36		0.02	0.37	0.01
Uniform Delay, d1	49.2	48.6			48.8		2.1	2.5		3.2	4.4	1.8
Progression Factor	1.02	1.00			1.00		1.00	1.00		1.00	1.00	1.00
Incremental Delay, d2	1.3	0.1			0.7		0.1	0.4		0.2	0.4	0.0
Delay (s)	51.4	48.7			49.5		2.2	2.8		3.4	4.8	1.8
Level of Service	D	D			D		A	A		A	A	A
Approach Delay (s)		49.6			49.5			2.8			4.8	
Approach LOS		D			D			A			A	

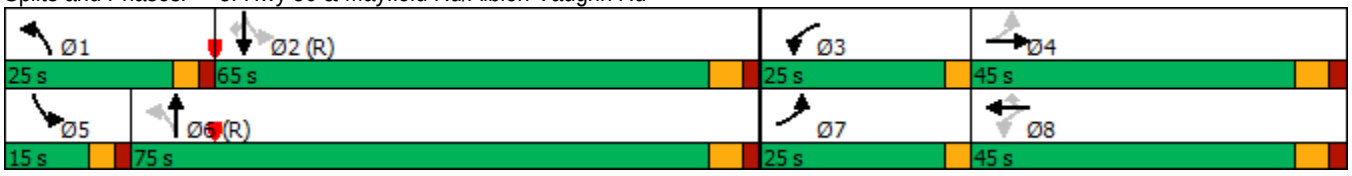
Intersection Summary			
HCM 2000 Control Delay	5.2	HCM 2000 Level of Service	A
HCM 2000 Volume to Capacity ratio	0.36		
Actuated Cycle Length (s)	110.0	Sum of lost time (s)	16.0
Intersection Capacity Utilization	47.1%	ICU Level of Service	A
Analysis Period (min)	15		
c Critical Lane Group			

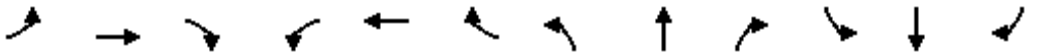
Lane Group	EBL	EBT	WBL	WBT	WBR	NBL	NBT	SBL	SBT	SBR
Lane Configurations										
Traffic Volume (vph)	95	124	244	131	10	101	909	14	925	101
Future Volume (vph)	95	124	244	131	10	101	909	14	925	101
Lane Group Flow (vph)	95	270	244	131	10	101	1140	14	925	101
Turn Type	pm+pt	NA	pm+pt	NA	Perm	pm+pt	NA	pm+pt	NA	Perm
Protected Phases	7	4	3	8		1	6	5	2	
Permitted Phases	4		8		8	6		2		2
Detector Phase	7	4	3	8	8	1	6	5	2	2
Switch Phase										
Minimum Initial (s)	5.0	12.0	10.0	12.0	12.0	10.0	20.0	10.0	20.0	20.0
Minimum Split (s)	9.5	43.5	14.5	43.5	43.5	15.0	41.3	15.0	41.3	41.3
Total Split (s)	25.0	45.0	25.0	45.0	45.0	25.0	75.0	15.0	65.0	65.0
Total Split (%)	15.6%	28.1%	15.6%	28.1%	28.1%	15.6%	46.9%	9.4%	40.6%	40.6%
Yellow Time (s)	3.0	4.0	3.0	4.0	4.0	3.0	4.2	3.0	4.2	4.2
All-Red Time (s)	0.0	2.5	0.0	2.5	2.5	2.0	2.1	2.0	2.1	2.1
Lost Time Adjust (s)	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
Total Lost Time (s)	3.0	6.5	3.0	6.5	6.5	5.0	6.3	5.0	6.3	6.3
Lead/Lag	Lead	Lag	Lead	Lag	Lag	Lead	Lag	Lead	Lag	Lag
Lead-Lag Optimize?										
Recall Mode	None	None	None	None	None	None	C-Max	None	C-Max	C-Max
v/c Ratio	0.35	0.70	0.86	0.52	0.04	0.30	0.36	0.04	0.45	0.10
Control Delay	49.7	42.0	78.3	71.5	0.3	11.2	14.1	9.1	20.0	2.3
Queue Delay	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
Total Delay	49.7	42.0	78.3	71.5	0.3	11.2	14.1	9.1	20.0	2.3
Queue Length 50th (m)	25.2	21.5	71.7	41.4	0.0	10.3	51.2	1.4	86.8	0.0
Queue Length 95th (m)	40.2	37.2	#106.8	64.5	0.0	19.5	86.7	4.3	116.6	7.6
Internal Link Dist (m)		330.4		656.8			717.1		188.2	
Turn Bay Length (m)	60.0		50.0		50.0	100.0		35.0		120.0
Base Capacity (vph)	373	812	290	423	380	411	3131	336	2074	963
Starvation Cap Reductn	0	0	0	0	0	0	0	0	0	0
Spillback Cap Reductn	0	0	0	0	0	0	0	0	0	0
Storage Cap Reductn	0	0	0	0	0	0	0	0	0	0
Reduced v/c Ratio	0.25	0.33	0.84	0.31	0.03	0.25	0.36	0.04	0.45	0.10

Intersection Summary

Cycle Length: 160
Actuated Cycle Length: 160
Offset: 7 (4%), Referenced to phase 2:SBTL and 6:NBTL, Start of Green
Natural Cycle: 115
Control Type: Actuated-Coordinated
95th percentile volume exceeds capacity, queue may be longer.
Queue shown is maximum after two cycles.

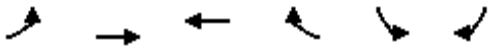
Splits and Phases: 5: Hwy 50 & Mayfield Rd/Albion Vaughn Rd





Movement	EBL	EBT	EBR	WBL	WBT	WBR	NBL	NBT	NBR	SBL	SBT	SBR
Lane Configurations												
Traffic Volume (vph)	95	124	146	244	131	10	101	909	231	14	925	101
Future Volume (vph)	95	124	146	244	131	10	101	909	231	14	925	101
Ideal Flow (vphpl)	1900	1900	1900	1900	1900	1900	1900	1900	1900	1900	1900	1900
Lane Width	3.5	3.7	3.5	3.5	3.7	3.5	3.5	3.7	3.5	3.5	3.7	3.5
Total Lost time (s)	3.0	6.5		3.0	6.5	6.5	5.0	6.3		5.0	6.3	6.3
Lane Util. Factor	1.00	0.95		1.00	1.00	1.00	1.00	0.91		1.00	0.95	1.00
Frpb, ped/bikes	1.00	1.00		1.00	1.00	1.00	1.00	1.00		1.00	1.00	1.00
Flpb, ped/bikes	1.00	1.00		1.00	1.00	1.00	1.00	1.00		1.00	1.00	1.00
Frt	1.00	0.92		1.00	1.00	0.85	1.00	0.97		1.00	1.00	0.85
Flt Protected	0.95	1.00		0.95	1.00	1.00	0.95	1.00		0.95	1.00	1.00
Satd. Flow (prot)	1750	2914		1684	1762	1229	1552	4831		1668	3544	1566
Flt Permitted	0.67	1.00		0.27	1.00	1.00	0.24	1.00		0.22	1.00	1.00
Satd. Flow (perm)	1240	2914		484	1762	1229	385	4831		392	3544	1566
Peak-hour factor, PHF	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00
Adj. Flow (vph)	95	124	146	244	131	10	101	909	231	14	925	101
RTOR Reduction (vph)	0	133	0	0	0	9	0	18	0	0	0	42
Lane Group Flow (vph)	95	137	0	244	131	1	101	1122	0	14	925	59
Confl. Bikes (#/hr)									1			
Heavy Vehicles (%)	2%	7%	22%	6%	9%	30%	15%	5%	5%	7%	3%	2%
Turn Type	pm+pt	NA		pm+pt	NA	Perm	pm+pt	NA		pm+pt	NA	Perm
Protected Phases	7	4		3	8		1	6		5	2	
Permitted Phases	4			8		8	6			2		2
Actuated Green, G (s)	26.1	13.9		38.1	22.9	22.9	109.1	100.1		97.7	93.7	93.7
Effective Green, g (s)	26.1	13.9		38.1	22.9	22.9	109.1	100.1		97.7	93.7	93.7
Actuated g/C Ratio	0.16	0.09		0.24	0.14	0.14	0.68	0.63		0.61	0.59	0.59
Clearance Time (s)	3.0	6.5		3.0	6.5	6.5	5.0	6.3		5.0	6.3	6.3
Vehicle Extension (s)	3.0	3.0		3.0	3.0	3.0	3.0	3.0		3.0	3.0	3.0
Lane Grp Cap (vph)	241	253		274	252	175	338	3022		271	2075	917
v/s Ratio Prot	0.03	0.05		c0.12	0.07		c0.02	c0.23		0.00	c0.26	
v/s Ratio Perm	0.03			c0.09		0.00	0.18			0.03		0.04
v/c Ratio	0.39	0.54		0.89	0.52	0.01	0.30	0.37		0.05	0.45	0.06
Uniform Delay, d1	59.2	70.0		54.6	63.5	58.8	10.8	14.6		12.3	18.6	14.3
Progression Factor	1.00	1.00		1.00	1.00	1.00	1.00	1.00		1.00	1.00	1.00
Incremental Delay, d2	1.1	2.3		28.1	1.8	0.0	0.5	0.4		0.1	0.7	0.1
Delay (s)	60.3	72.3		82.7	65.3	58.8	11.3	15.0		12.4	19.3	14.4
Level of Service	E	E		F	E	E	B	B		B	B	B
Approach Delay (s)		69.2			76.1			14.7			18.7	
Approach LOS		E			E			B			B	

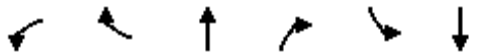
Intersection Summary			
HCM 2000 Control Delay	30.4	HCM 2000 Level of Service	C
HCM 2000 Volume to Capacity ratio	0.57		
Actuated Cycle Length (s)	160.0	Sum of lost time (s)	20.8
Intersection Capacity Utilization	75.6%	ICU Level of Service	D
Analysis Period (min)	15		
c Critical Lane Group			



Movement	EBL	EBT	WBT	WBR	SBL	SBR
Lane Configurations						
Traffic Volume (veh/h)	3	379	368	2	3	2
Future Volume (Veh/h)	3	379	368	2	3	2
Sign Control		Free	Free		Stop	
Grade		0%	0%		0%	
Peak Hour Factor	1.00	1.00	1.00	1.00	1.00	1.00
Hourly flow rate (vph)	3	379	368	2	3	2
Pedestrians						
Lane Width (m)						
Walking Speed (m/s)						
Percent Blockage						
Right turn flare (veh)						
Median type		None	None			
Median storage veh)						
Upstream signal (m)		233				
pX, platoon unblocked					1.00	
vC, conflicting volume	370				564	185
vC1, stage 1 conf vol						
vC2, stage 2 conf vol						
vCu, unblocked vol	370				556	185
tC, single (s)	4.8				7.5	6.9
tC, 2 stage (s)						
tF (s)	2.5				3.8	3.3
p0 queue free %	100				99	100
cM capacity (veh/h)	991				391	832

Direction, Lane #	EB 1	EB 2	EB 3	WB 1	WB 2	SB 1	SB 2
Volume Total	3	190	190	245	125	3	2
Volume Left	3	0	0	0	0	3	0
Volume Right	0	0	0	0	2	0	2
cSH	991	1700	1700	1700	1700	391	832
Volume to Capacity	0.00	0.11	0.11	0.14	0.07	0.01	0.00
Queue Length 95th (m)	0.1	0.0	0.0	0.0	0.0	0.2	0.1
Control Delay (s)	8.6	0.0	0.0	0.0	0.0	14.3	9.3
Lane LOS	A					B	A
Approach Delay (s)	0.1			0.0		12.3	
Approach LOS						B	

Intersection Summary			
Average Delay	0.1		
Intersection Capacity Utilization	20.5%	ICU Level of Service	A
Analysis Period (min)	15		



Movement	WBL	WBR	NBT	NBR	SBL	SBT
Lane Configurations						
Traffic Volume (veh/h)	1	0	165	1	0	239
Future Volume (Veh/h)	1	0	165	1	0	239
Sign Control	Stop		Free			Free
Grade	0%		0%			0%
Peak Hour Factor	1.00	1.00	1.00	1.00	1.00	1.00
Hourly flow rate (vph)	1	0	165	1	0	239
Pedestrians						
Lane Width (m)						
Walking Speed (m/s)						
Percent Blockage						
Right turn flare (veh)						
Median type			TWLTL			TWLTL
Median storage veh)			2			2
Upstream signal (m)						
pX, platoon unblocked						
vC, conflicting volume	285	83			166	
vC1, stage 1 conf vol	166					
vC2, stage 2 conf vol	120					
vCu, unblocked vol	285	83			166	
tC, single (s)	8.8	6.9			4.1	
tC, 2 stage (s)	7.8					
tF (s)	4.5	3.3			2.2	
p0 queue free %	100	100			100	
cM capacity (veh/h)	569	966			1424	

Direction, Lane #	WB 1	NB 1	NB 2	SB 1	SB 2
Volume Total	1	110	56	80	159
Volume Left	1	0	0	0	0
Volume Right	0	0	1	0	0
cSH	569	1700	1700	1424	1700
Volume to Capacity	0.00	0.06	0.03	0.00	0.09
Queue Length 95th (m)	0.0	0.0	0.0	0.0	0.0
Control Delay (s)	11.3	0.0	0.0	0.0	0.0
Lane LOS	B				
Approach Delay (s)	11.3	0.0		0.0	
Approach LOS	B				

Intersection Summary			
Average Delay	0.0		
Intersection Capacity Utilization	16.6%	ICU Level of Service	A
Analysis Period (min)	15		

APPENDIX H

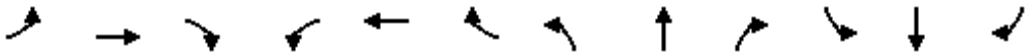
2028 & 2033 Future Total Intersection Capacity Analysis

Lane Group	EBL	EBT	WBL	WBT	NBL	NBT	SBL	SBT
Lane Configurations								
Traffic Volume (vph)	313	353	39	307	23	303	55	345
Future Volume (vph)	313	353	39	307	23	303	55	345
Lane Group Flow (vph)	313	385	39	334	23	334	55	569
Turn Type	pm+pt	NA	Perm	NA	Perm	NA	pm+pt	NA
Protected Phases	5	2		6		4	3	8
Permitted Phases	2		6		4		8	
Detector Phase	5	2	6	6	4	4	3	8
Switch Phase								
Minimum Initial (s)	5.0	12.0	12.0	12.0	12.0	12.0	5.0	12.0
Minimum Split (s)	9.5	37.0	37.0	37.0	37.0	37.0	12.5	37.0
Total Split (s)	15.0	80.0	65.0	65.0	32.0	32.0	18.0	50.0
Total Split (%)	11.5%	61.5%	50.0%	50.0%	24.6%	24.6%	13.8%	38.5%
Yellow Time (s)	3.0	4.6	4.6	4.6	4.2	4.2	3.0	4.2
All-Red Time (s)	0.0	2.4	2.4	2.4	2.8	2.8	0.0	2.8
Lost Time Adjust (s)	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
Total Lost Time (s)	3.0	7.0	7.0	7.0	7.0	7.0	3.0	7.0
Lead/Lag	Lead		Lag	Lag	Lag	Lag	Lead	
Lead-Lag Optimize?								
Recall Mode	None	C-Max	C-Max	C-Max	None	None	None	None
v/c Ratio	0.43	0.19	0.08	0.21	0.21	0.67	0.38	0.68
Control Delay	10.9	9.7	19.7	18.1	53.1	58.7	41.7	38.3
Queue Delay	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
Total Delay	10.9	9.7	19.7	18.1	53.1	58.7	41.7	38.3
Queue Length 50th (m)	30.4	19.7	5.2	24.5	5.6	45.0	11.5	57.4
Queue Length 95th (m)	54.6	32.7	13.6	39.3	14.4	59.5	21.3	71.1
Internal Link Dist (m)		689.8		209.6		564.3		579.6
Turn Bay Length (m)	100.0		85.0		105.0		145.0	
Base Capacity (vph)	733	2014	459	1578	152	671	166	1133
Starvation Cap Reductn	0	0	0	0	0	0	0	0
Spillback Cap Reductn	0	0	0	0	0	0	0	0
Storage Cap Reductn	0	0	0	0	0	0	0	0
Reduced v/c Ratio	0.43	0.19	0.08	0.21	0.15	0.50	0.33	0.50

Intersection Summary

Cycle Length: 130
Actuated Cycle Length: 130
Offset: 92 (71%), Referenced to phase 2:EBTL and 6:WBTL, Start of Green
Natural Cycle: 100
Control Type: Actuated-Coordinated

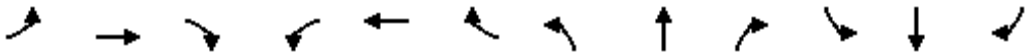
Splits and Phases: 1: Coleraine Dr & Mayfield Rd



Movement	EBL	EBT	EBR	WBL	WBT	WBR	NBL	NBT	NBR	SBL	SBT	SBR
Lane Configurations												
Traffic Volume (vph)	313	353	32	39	307	27	23	303	31	55	345	224
Future Volume (vph)	313	353	32	39	307	27	23	303	31	55	345	224
Ideal Flow (vphpl)	1900	1900	1900	1900	1900	1900	1900	1900	1900	1900	1900	1900
Lane Width	3.5	3.7	3.5	3.5	3.7	3.5	3.5	3.7	3.5	3.5	3.7	3.5
Total Lost time (s)	3.0	7.0		7.0	7.0		7.0	7.0		3.0	7.0	
Lane Util. Factor	1.00	0.95		1.00	0.95		1.00	0.95		1.00	0.95	
Frt	1.00	0.99		1.00	0.99		1.00	0.99		1.00	0.94	
Flt Protected	0.95	1.00		0.95	1.00		0.95	1.00		0.95	1.00	
Satd. Flow (prot)	1700	3057		1580	2980		1716	3463		981	3176	
Flt Permitted	0.53	1.00		0.52	1.00		0.44	1.00		0.34	1.00	
Satd. Flow (perm)	943	3057		871	2980		791	3463		355	3176	
Peak-hour factor, PHF	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00
Adj. Flow (vph)	313	353	32	39	307	27	23	303	31	55	345	224
RTOR Reduction (vph)	0	4	0	0	4	0	0	6	0	0	94	0
Lane Group Flow (vph)	313	381	0	39	330	0	23	328	0	55	475	0
Heavy Vehicles (%)	5%	19%	6%	13%	16%	78%	4%	3%	13%	82%	5%	13%
Turn Type	pm+pt	NA		Perm	NA		Perm	NA		pm+pt	NA	
Protected Phases	5	2			6			4		3	8	
Permitted Phases	2			6			4			8		
Actuated Green, G (s)	84.8	84.8		68.0	68.0		18.5	18.5		31.2	31.2	
Effective Green, g (s)	84.8	84.8		68.0	68.0		18.5	18.5		31.2	31.2	
Actuated g/C Ratio	0.65	0.65		0.52	0.52		0.14	0.14		0.24	0.24	
Clearance Time (s)	3.0	7.0		7.0	7.0		7.0	7.0		3.0	7.0	
Vehicle Extension (s)	3.0	3.0		3.0	3.0		3.0	3.0		3.0	3.0	
Lane Grp Cap (vph)	695	1994		455	1558		112	492		131	762	
v/s Ratio Prot	c0.05	0.12			0.11			0.09		0.03	c0.15	
v/s Ratio Perm	c0.25			0.04			0.03			0.07		
v/c Ratio	0.45	0.19		0.09	0.21		0.21	0.67		0.42	0.62	
Uniform Delay, d1	9.7	9.0		15.5	16.6		49.3	52.8		40.1	44.1	
Progression Factor	1.00	1.00		1.00	1.00		1.00	1.00		1.00	1.00	
Incremental Delay, d2	0.5	0.2		0.4	0.3		0.9	3.4		2.2	1.6	
Delay (s)	10.1	9.2		15.8	16.9		50.2	56.2		42.2	45.7	
Level of Service	B	A		B	B		D	E		D	D	
Approach Delay (s)		9.6			16.8			55.8			45.4	
Approach LOS		A			B			E			D	

Intersection Summary			
HCM 2000 Control Delay	29.9	HCM 2000 Level of Service	C
HCM 2000 Volume to Capacity ratio	0.52		
Actuated Cycle Length (s)	130.0	Sum of lost time (s)	20.0
Intersection Capacity Utilization	74.9%	ICU Level of Service	D
Analysis Period (min)	15		

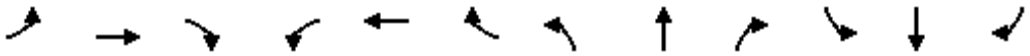
c Critical Lane Group



Movement	EBL	EBT	EBR	WBL	WBT	WBR	NBL	NBT	NBR	SBL	SBT	SBR
Lane Configurations												
Traffic Volume (veh/h)	1	1	1	32	11	135	11	581	51	120	582	5
Future Volume (Veh/h)	1	1	1	32	11	135	11	581	51	120	582	5
Sign Control		Stop			Stop			Free			Free	
Grade		0%			0%			0%			0%	
Peak Hour Factor	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00
Hourly flow rate (vph)	1	1	1	32	11	135	11	581	51	120	582	5
Pedestrians												
Lane Width (m)												
Walking Speed (m/s)												
Percent Blockage												
Right turn flare (veh)												
Median type								TWLTL			None	
Median storage veh)								2				
Upstream signal (m)												
pX, platoon unblocked												
vC, conflicting volume	1278	1478	294	1161	1456	316	587			632		
vC1, stage 1 conf vol	824	824		628	628							
vC2, stage 2 conf vol	453	654		532	827							
vCu, unblocked vol	1278	1478	294	1161	1456	316	587			632		
tC, single (s)	7.5	6.5	6.9	7.9	6.7	7.5	4.6			4.5		
tC, 2 stage (s)	6.5	5.5		6.9	5.7							
tF (s)	3.5	4.0	3.3	3.7	4.1	3.6	2.5			2.4		
p0 queue free %	100	100	100	89	96	78	99			86		
cM capacity (veh/h)	219	254	709	289	263	604	831			840		

Direction, Lane #	EB 1	EB 2	WB 1	WB 2	NB 1	NB 2	NB 3	SB 1	SB 2	SB 3
Volume Total	1	2	32	146	11	387	245	120	388	199
Volume Left	1	0	32	0	11	0	0	120	0	0
Volume Right	0	1	0	135	0	0	51	0	0	5
cSH	219	374	289	550	831	1700	1700	840	1700	1700
Volume to Capacity	0.00	0.01	0.11	0.27	0.01	0.23	0.14	0.14	0.23	0.12
Queue Length 95th (m)	0.1	0.1	3.0	8.5	0.3	0.0	0.0	4.0	0.0	0.0
Control Delay (s)	21.5	14.7	19.0	13.9	9.4	0.0	0.0	10.0	0.0	0.0
Lane LOS	C	B	C	B	A			A		
Approach Delay (s)	17.0		14.8		0.2			1.7		
Approach LOS	C		B							

Intersection Summary				
Average Delay	2.6			
Intersection Capacity Utilization	43.3%	ICU Level of Service		A
Analysis Period (min)	15			



Movement	EBL	EBT	EBR	WBL	WBT	WBR	NBL	NBT	NBR	SBL	SBT	SBR
Lane Configurations												
Traffic Volume (veh/h)	3	117	49	17	143	12	21	4	6	7	3	14
Future Volume (Veh/h)	3	117	49	17	143	12	21	4	6	7	3	14
Sign Control		Free			Free			Stop			Stop	
Grade		0%			0%			0%			0%	
Peak Hour Factor	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00
Hourly flow rate (vph)	3	117	49	17	143	12	21	4	6	7	3	14
Pedestrians											1	
Lane Width (m)											3.7	
Walking Speed (m/s)											1.2	
Percent Blockage											0	
Right turn flare (veh)												
Median type		None			None							
Median storage veh)												
Upstream signal (m)												
pX, platoon unblocked												
vC, conflicting volume	156			166			346	338	142	340	356	150
vC1, stage 1 conf vol												
vC2, stage 2 conf vol												
vCu, unblocked vol	156			166			346	338	142	340	356	150
tC, single (s)	4.1			4.1			7.3	6.8	6.5	7.5	6.8	6.6
tC, 2 stage (s)												
tF (s)	2.2			2.2			3.7	4.2	3.6	3.9	4.3	3.6
p0 queue free %	100			99			96	99	99	99	99	98
cM capacity (veh/h)	1435			1424			550	540	830	530	516	814

Direction, Lane #	EB 1	WB 1	NB 1	SB 1
Volume Total	169	172	31	24
Volume Left	3	17	21	7
Volume Right	49	12	6	14
cSH	1435	1424	587	663
Volume to Capacity	0.00	0.01	0.05	0.04
Queue Length 95th (m)	0.1	0.3	1.3	0.9
Control Delay (s)	0.2	0.8	11.5	10.6
Lane LOS	A	A	B	B
Approach Delay (s)	0.2	0.8	11.5	10.6
Approach LOS			B	B

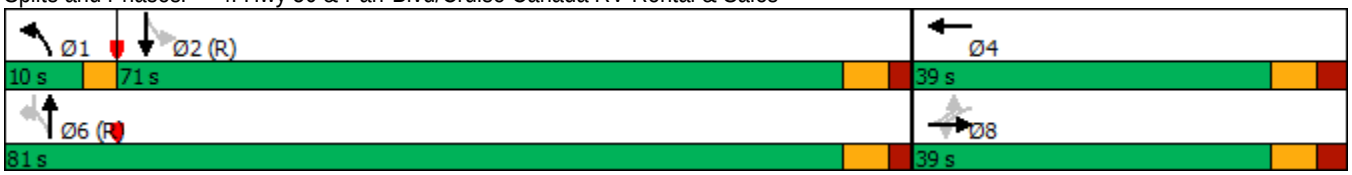
Intersection Summary				
Average Delay	2.0			
Intersection Capacity Utilization	28.2%	ICU Level of Service	A	
Analysis Period (min)	15			

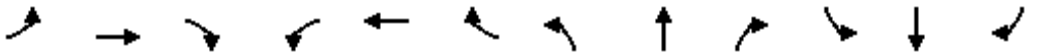
Lane Group	EBL	EBT	WBL	WBT	NBL	NBT	SBT	SBR
Lane Configurations								
Traffic Volume (vph)	29	0	1	0	199	1065	1180	49
Future Volume (vph)	29	0	1	0	199	1065	1180	49
Lane Group Flow (vph)	29	102	0	1	199	1067	1180	49
Turn Type	Perm	NA	D.Pm	NA	pm+pt	NA	NA	custom
Protected Phases		8		4	1	6	2	
Permitted Phases	8		8		6			6
Detector Phase	8	8	8	4	1	6	2	6
Switch Phase								
Minimum Initial (s)	8.0	8.0	8.0	8.0	5.0	12.0	12.0	12.0
Minimum Split (s)	33.9	33.9	33.9	33.9	9.5	30.1	30.1	30.1
Total Split (s)	39.0	39.0	39.0	39.0	10.0	81.0	71.0	81.0
Total Split (%)	32.5%	32.5%	32.5%	32.5%	8.3%	67.5%	59.2%	67.5%
Yellow Time (s)	4.0	4.0	4.0	4.0	3.0	4.0	4.0	4.0
All-Red Time (s)	2.9	2.9	2.9	2.9	0.0	2.1	2.1	2.1
Lost Time Adjust (s)	0.0	0.0		0.0	0.0	0.0	0.0	0.0
Total Lost Time (s)	6.9	6.9		6.9	3.0	6.1	6.1	6.1
Lead/Lag					Lead		Lag	
Lead-Lag Optimize?								
Recall Mode	None	None	None	None	None	C-Max	C-Max	C-Max
v/c Ratio	0.29	0.43		0.01	0.53	0.39	0.54	0.04
Control Delay	59.8	7.1		50.0	7.0	3.5	10.5	1.1
Queue Delay	0.0	0.0		0.0	0.0	0.0	0.0	0.0
Total Delay	59.8	7.1		50.0	7.0	3.5	10.5	1.1
Queue Length 50th (m)	7.0	0.0		0.2	6.1	27.5	63.2	0.5
Queue Length 95th (m)	16.9	3.5		2.1	12.4	41.6	101.2	2.8
Internal Link Dist (m)		828.8		20.9		732.4	332.3	
Turn Bay Length (m)	80.0				35.0			20.0
Base Capacity (vph)	355	432		354	378	2735	2203	1232
Starvation Cap Reductn	0	0		0	0	0	0	0
Spillback Cap Reductn	0	0		0	0	0	0	0
Storage Cap Reductn	0	0		0	0	0	0	0
Reduced v/c Ratio	0.08	0.24		0.00	0.53	0.39	0.54	0.04

Intersection Summary

Cycle Length: 120
Actuated Cycle Length: 120
Offset: 8 (7%), Referenced to phase 2:SBTL and 6:NBTL, Start of Green
Natural Cycle: 90
Control Type: Actuated-Coordinated

Splits and Phases: 4: Hwy 50 & Parr Blvd/Cruise Canada RV Rental & Sales





Movement	EBL	EBT	EBR	WBL	WBT	WBR	NBL	NBT	NBR	SBL	SBT	SBR
Lane Configurations												
Traffic Volume (vph)	29	0	102	1	0	0	199	1065	2	0	1180	49
Future Volume (vph)	29	0	102	1	0	0	199	1065	2	0	1180	49
Ideal Flow (vphpl)	1900	1900	1900	1900	1900	1900	1900	1900	1900	1900	1900	1900
Lane Width	3.5	3.7	3.5	3.5	3.7	3.5	3.5	3.7	3.5	3.5	3.7	3.5
Total Lost time (s)	6.9	6.9			6.9		3.0	6.1			6.1	6.1
Lane Util. Factor	1.00	1.00			1.00		1.00	0.95			0.95	1.00
Frpb, ped/bikes	1.00	1.00			1.00		1.00	1.00			1.00	0.98
Flpb, ped/bikes	1.00	1.00			1.00		1.00	1.00			1.00	1.00
Frt	1.00	0.85			1.00		1.00	1.00			1.00	0.85
Flt Protected	0.95	1.00			0.95		0.95	1.00			1.00	1.00
Satd. Flow (prot)	1668	1183			1825		1513	3348			3174	1501
Flt Permitted	0.76	1.00			0.69		0.19	1.00			1.00	1.00
Satd. Flow (perm)	1330	1183			1328		310	3348			3174	1501
Peak-hour factor, PHF	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00
Adj. Flow (vph)	29	0	102	1	0	0	199	1065	2	0	1180	49
RTOR Reduction (vph)	0	94	0	0	0	0	0	0	0	0	0	6
Lane Group Flow (vph)	29	8	0	0	1	0	199	1067	0	0	1180	43
Confl. Peds. (#/hr)							1		2	2		1
Confl. Bikes (#/hr)									1			
Heavy Vehicles (%)	7%	0%	38%	0%	0%	0%	18%	9%	0%	0%	15%	4%
Turn Type	Perm	NA		D.Pm	NA		pm+pt	NA		Perm	NA	custom
Protected Phases		8			4		1	6			2	
Permitted Phases	8			8			6			2		6
Actuated Green, G (s)	9.0	9.0			9.0		98.0	98.0			83.3	98.0
Effective Green, g (s)	9.0	9.0			9.0		98.0	98.0			83.3	98.0
Actuated g/C Ratio	0.08	0.08			0.08		0.82	0.82			0.69	0.82
Clearance Time (s)	6.9	6.9			6.9		3.0	6.1			6.1	6.1
Vehicle Extension (s)	3.0	3.0			3.0		3.0	3.0			3.0	3.0
Lane Grp Cap (vph)	99	88			99		370	2734			2203	1225
v/s Ratio Prot		0.01					c0.05	0.32			0.37	
v/s Ratio Perm	c0.02				0.00		c0.39					0.03
v/c Ratio	0.29	0.09			0.01		0.54	0.39			0.54	0.03
Uniform Delay, d1	52.5	51.7			51.4		4.6	3.0			8.9	2.1
Progression Factor	1.00	1.00			1.00		1.00	1.00			1.00	1.00
Incremental Delay, d2	1.6	0.4			0.0		1.5	0.4			0.9	0.1
Delay (s)	54.1	52.1			51.4		6.1	3.4			9.9	2.1
Level of Service	D	D			D		A	A			A	A
Approach Delay (s)		52.6			51.4			3.8			9.6	
Approach LOS		D			D			A			A	

Intersection Summary			
HCM 2000 Control Delay	9.0	HCM 2000 Level of Service	A
HCM 2000 Volume to Capacity ratio	0.53		
Actuated Cycle Length (s)	120.0	Sum of lost time (s)	16.0
Intersection Capacity Utilization	64.5%	ICU Level of Service	C
Analysis Period (min)	15		

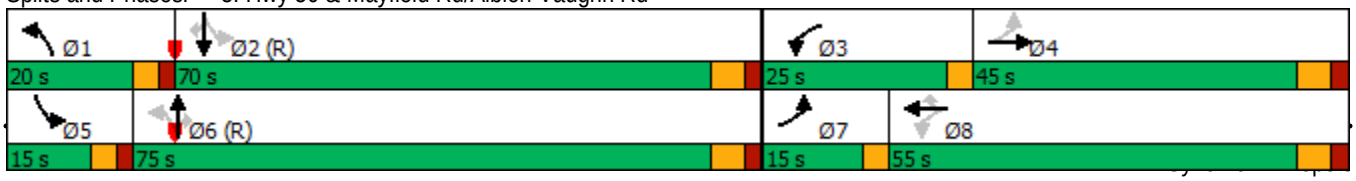
c Critical Lane Group

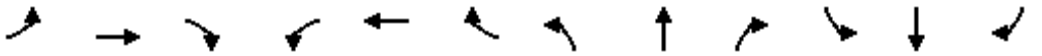
Lane Group	EBL	EBT	WBL	WBT	WBR	NBL	NBT	NBR	SBL	SBT	SBR
Lane Configurations											
Traffic Volume (vph)	61	130	354	225	39	132	1091	170	31	1139	64
Future Volume (vph)	61	130	354	225	39	132	1091	170	31	1139	64
Lane Group Flow (vph)	61	340	354	225	39	132	1091	170	31	1139	64
Turn Type	pm+pt	NA	pm+pt	NA	Perm	pm+pt	NA	Perm	pm+pt	NA	Perm
Protected Phases	7	4	3	8		1	6		5	2	
Permitted Phases	4		8		8	6		6	2		2
Detector Phase	7	4	3	8	8	1	6	6	5	2	2
Switch Phase											
Minimum Initial (s)	5.0	12.0	10.0	12.0	12.0	10.0	20.0	20.0	10.0	20.0	20.0
Minimum Split (s)	9.5	43.5	14.5	43.5	43.5	15.0	41.3	41.3	15.0	41.3	41.3
Total Split (s)	15.0	45.0	25.0	55.0	55.0	20.0	75.0	75.0	15.0	70.0	70.0
Total Split (%)	9.4%	28.1%	15.6%	34.4%	34.4%	12.5%	46.9%	46.9%	9.4%	43.8%	43.8%
Yellow Time (s)	3.0	4.0	3.0	4.0	4.0	3.0	4.2	4.2	3.0	4.2	4.2
All-Red Time (s)	0.0	2.5	0.0	2.5	2.5	2.0	2.1	2.1	2.0	2.1	2.1
Lost Time Adjust (s)	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
Total Lost Time (s)	3.0	6.5	3.0	6.5	6.5	5.0	6.3	6.3	5.0	6.3	6.3
Lead/Lag	Lead	Lag	Lead	Lag	Lag	Lead	Lag	Lag	Lead	Lag	Lag
Lead-Lag Optimize?											
Recall Mode	None	None	None	None	None	None	C-Max	C-Max	None	C-Max	C-Max
v/c Ratio	0.24	0.85	1.21	0.60	0.10	0.56	0.58	0.20	0.12	0.73	0.08
Control Delay	42.3	55.1	163.9	64.8	0.5	22.4	25.3	5.6	13.3	36.0	1.4
Queue Delay	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
Total Delay	42.3	55.1	163.9	64.8	0.5	22.4	25.3	5.6	13.3	36.0	1.4
Queue Length 50th (m)	15.0	32.7	~119.8	70.4	0.0	16.1	125.0	5.1	3.5	153.0	0.0
Queue Length 95th (m)	25.7	49.8	#171.5	96.5	0.5	33.3	166.7	19.6	9.0	220.0	2.8
Internal Link Dist (m)		330.4		656.8			717.1			732.4	
Turn Bay Length (m)	60.0		50.0		50.0	100.0		85.0	35.0		120.0
Base Capacity (vph)	283	654	293	544	514	245	1873	856	266	1568	778
Starvation Cap Reductn	0	0	0	0	0	0	0	0	0	0	0
Spillback Cap Reductn	0	0	0	0	0	0	0	0	0	0	0
Storage Cap Reductn	0	0	0	0	0	0	0	0	0	0	0
Reduced v/c Ratio	0.22	0.52	1.21	0.41	0.08	0.54	0.58	0.20	0.12	0.73	0.08

Intersection Summary

Cycle Length: 160
Actuated Cycle Length: 160
Offset: 27 (17%), Referenced to phase 2:SBTL and 6:NBTL, Start of Green
Natural Cycle: 125
Control Type: Actuated-Coordinated
~ Volume exceeds capacity, queue is theoretically infinite.
Queue shown is maximum after two cycles.
95th percentile volume exceeds capacity, queue may be longer.
Queue shown is maximum after two cycles.

Splits and Phases: 5: Hwy 50 & Mayfield Rd/Albion Vaughn Rd

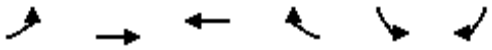




Movement	EBL	EBT	EBR	WBL	WBT	WBR	NBL	NBT	NBR	SBL	SBT	SBR
Lane Configurations												
Traffic Volume (vph)	61	130	210	354	225	39	132	1091	170	31	1139	64
Future Volume (vph)	61	130	210	354	225	39	132	1091	170	31	1139	64
Ideal Flow (vphpl)	1900	1900	1900	1900	1900	1900	1900	1900	1900	1900	1900	1900
Lane Width	3.5	3.7	3.5	3.5	3.7	3.5	3.5	3.7	3.5	3.5	3.7	3.5
Total Lost time (s)	3.0	6.5		3.0	6.5	6.5	5.0	6.3	6.3	5.0	6.3	6.3
Lane Util. Factor	1.00	0.95		1.00	1.00	1.00	1.00	0.95	1.00	1.00	0.95	1.00
Frt	1.00	0.91		1.00	1.00	0.85	1.00	1.00	0.85	1.00	1.00	0.85
Flt Protected	0.95	1.00		0.95	1.00	1.00	0.95	1.00	1.00	0.95	1.00	1.00
Satd. Flow (prot)	1700	2221		1623	1795	1521	1275	3288	1401	1539	3093	1439
Flt Permitted	0.62	1.00		0.26	1.00	1.00	0.14	1.00	1.00	0.20	1.00	1.00
Satd. Flow (perm)	1106	2221		438	1795	1521	185	3288	1401	331	3093	1439
Peak-hour factor, PHF	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00
Adj. Flow (vph)	61	130	210	354	225	39	132	1091	170	31	1139	64
RTOR Reduction (vph)	0	139	0	0	0	31	0	0	60	0	0	32
Lane Group Flow (vph)	61	201	0	354	225	8	132	1091	110	31	1139	32
Heavy Vehicles (%)	5%	25%	64%	10%	7%	5%	40%	11%	14%	16%	18%	11%
Turn Type	pm+pt	NA		pm+pt	NA	Perm	pm+pt	NA	Perm	pm+pt	NA	Perm
Protected Phases	7	4		3	8		1	6		5	2	
Permitted Phases	4			8		8	6		6	2		2
Actuated Green, G (s)	27.8	19.6		44.6	33.4	33.4	102.6	89.6	89.6	88.6	80.6	80.6
Effective Green, g (s)	27.8	19.6		44.6	33.4	33.4	102.6	89.6	89.6	88.6	80.6	80.6
Actuated g/C Ratio	0.17	0.12		0.28	0.21	0.21	0.64	0.56	0.56	0.55	0.50	0.50
Clearance Time (s)	3.0	6.5		3.0	6.5	6.5	5.0	6.3	6.3	5.0	6.3	6.3
Vehicle Extension (s)	3.0	3.0		3.0	3.0	3.0	3.0	3.0	3.0	3.0	3.0	3.0
Lane Grp Cap (vph)	222	272		285	374	317	234	1841	784	243	1558	724
v/s Ratio Prot	0.01	0.09		c0.17	0.13		c0.06	0.33		0.01	c0.37	
v/s Ratio Perm	0.03			c0.18		0.01	0.30		0.08	0.06		0.02
v/c Ratio	0.27	0.74		1.24	0.60	0.03	0.56	0.59	0.14	0.13	0.73	0.04
Uniform Delay, d1	56.6	67.7		52.5	57.3	50.4	19.1	23.2	16.8	17.3	31.2	20.2
Progression Factor	1.00	1.00		1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00
Incremental Delay, d2	0.7	10.3		135.1	2.7	0.0	3.1	1.4	0.4	0.2	3.1	0.1
Delay (s)	57.3	78.1		187.6	60.0	50.4	22.2	24.6	17.2	17.6	34.2	20.3
Level of Service	E	E		F	E	D	C	C	B	B	C	C
Approach Delay (s)		74.9			132.5			23.5			33.1	
Approach LOS		E			F			C			C	

Intersection Summary			
HCM 2000 Control Delay	50.9	HCM 2000 Level of Service	D
HCM 2000 Volume to Capacity ratio	0.89		
Actuated Cycle Length (s)	160.0	Sum of lost time (s)	20.8
Intersection Capacity Utilization	88.0%	ICU Level of Service	E
Analysis Period (min)	15		

c Critical Lane Group



Movement	EBL	EBT	WBT	WBR	SBL	SBR
Lane Configurations						
Traffic Volume (veh/h)	45	394	357	44	11	16
Future Volume (Veh/h)	45	394	357	44	11	16
Sign Control		Free	Free		Stop	
Grade		0%	0%		0%	
Peak Hour Factor	1.00	1.00	1.00	1.00	1.00	1.00
Hourly flow rate (vph)	45	394	357	44	11	16
Pedestrians						
Lane Width (m)						
Walking Speed (m/s)						
Percent Blockage						
Right turn flare (veh)						
Median type		None	None			
Median storage veh)						
Upstream signal (m)		233				
pX, platoon unblocked					0.99	
vC, conflicting volume	401				666	200
vC1, stage 1 conf vol						
vC2, stage 2 conf vol						
vCu, unblocked vol	401				633	200
tC, single (s)	4.2				7.3	7.3
tC, 2 stage (s)						
tF (s)	2.3				3.8	3.5
p0 queue free %	96				97	98
cM capacity (veh/h)	1119				340	757

Direction, Lane #	EB 1	EB 2	EB 3	WB 1	WB 2	SB 1	SB 2
Volume Total	45	197	197	238	163	11	16
Volume Left	45	0	0	0	0	11	0
Volume Right	0	0	0	0	44	0	16
cSH	1119	1700	1700	1700	1700	340	757
Volume to Capacity	0.04	0.12	0.12	0.14	0.10	0.03	0.02
Queue Length 95th (m)	1.0	0.0	0.0	0.0	0.0	0.8	0.5
Control Delay (s)	8.4	0.0	0.0	0.0	0.0	15.9	9.9
Lane LOS	A					C	A
Approach Delay (s)	0.9			0.0		12.3	
Approach LOS						B	

Intersection Summary			
Average Delay	0.8		
Intersection Capacity Utilization	27.9%	ICU Level of Service	A
Analysis Period (min)	15		

Movement	WBL	WBR	NBT	NBR	SBL	SBT
Lane Configurations						
Traffic Volume (veh/h)	0	0	630	0	0	625
Future Volume (Veh/h)	0	0	630	0	0	625
Sign Control	Stop		Free			Free
Grade	0%		0%			0%
Peak Hour Factor	1.00	1.00	1.00	1.00	1.00	1.00
Hourly flow rate (vph)	0	0	630	0	0	625
Pedestrians						
Lane Width (m)						
Walking Speed (m/s)						
Percent Blockage						
Right turn flare (veh)						
Median type			TWLTL			TWLTL
Median storage veh)			2			2
Upstream signal (m)						
pX, platoon unblocked						
vC, conflicting volume	942	315			630	
vC1, stage 1 conf vol	630					
vC2, stage 2 conf vol	312					
vCu, unblocked vol	942	315			630	
tC, single (s)	6.8	6.9			4.1	
tC, 2 stage (s)	5.8					
tF (s)	3.5	3.3			2.2	
p0 queue free %	100	100			100	
cM capacity (veh/h)	453	687			962	

Direction, Lane #	WB 1	NB 1	NB 2	SB 1	SB 2
Volume Total	0	420	210	208	417
Volume Left	0	0	0	0	0
Volume Right	0	0	0	0	0
cSH	1700	1700	1700	962	1700
Volume to Capacity	0.00	0.25	0.12	0.00	0.25
Queue Length 95th (m)	0.0	0.0	0.0	0.0	0.0
Control Delay (s)	0.0	0.0	0.0	0.0	0.0
Lane LOS	A				
Approach Delay (s)	0.0	0.0		0.0	
Approach LOS	A				

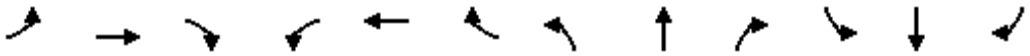
Intersection Summary			
Average Delay	0.0		
Intersection Capacity Utilization	20.7%	ICU Level of Service	A
Analysis Period (min)	15		

Lane Group	EBL	EBT	WBL	WBT	NBL	NBT	SBL	SBT
Lane Configurations								
Traffic Volume (vph)	313	353	39	307	23	303	55	345
Future Volume (vph)	313	353	39	307	23	303	55	345
Lane Group Flow (vph)	313	385	39	334	23	334	55	569
Turn Type	pm+pt	NA	Perm	NA	Perm	NA	pm+pt	NA
Protected Phases	5	2		6		4	3	8
Permitted Phases	2		6		4		8	
Detector Phase	5	2	6	6	4	4	3	8
Switch Phase								
Minimum Initial (s)	5.0	12.0	12.0	12.0	12.0	12.0	5.0	12.0
Minimum Split (s)	9.5	37.0	37.0	37.0	37.0	37.0	12.5	37.0
Total Split (s)	15.0	80.0	65.0	65.0	32.0	32.0	18.0	50.0
Total Split (%)	11.5%	61.5%	50.0%	50.0%	24.6%	24.6%	13.8%	38.5%
Yellow Time (s)	3.0	4.6	4.6	4.6	4.2	4.2	3.0	4.2
All-Red Time (s)	0.0	2.4	2.4	2.4	2.8	2.8	0.0	2.8
Lost Time Adjust (s)	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
Total Lost Time (s)	3.0	7.0	7.0	7.0	7.0	7.0	3.0	7.0
Lead/Lag	Lead		Lag	Lag	Lag	Lag	Lead	
Lead-Lag Optimize?								
Recall Mode	None	C-Max	C-Max	C-Max	None	None	None	None
v/c Ratio	0.43	0.19	0.08	0.21	0.21	0.67	0.38	0.68
Control Delay	10.9	9.7	19.7	18.1	53.1	58.7	41.7	38.3
Queue Delay	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
Total Delay	10.9	9.7	19.7	18.1	53.1	58.7	41.7	38.3
Queue Length 50th (m)	30.4	19.7	5.2	24.5	5.6	45.0	11.5	57.4
Queue Length 95th (m)	54.6	32.7	13.6	39.3	14.4	59.5	21.3	71.1
Internal Link Dist (m)		689.8		209.6		564.3		579.6
Turn Bay Length (m)	100.0		85.0		105.0		145.0	
Base Capacity (vph)	733	2014	459	1578	152	671	166	1133
Starvation Cap Reductn	0	0	0	0	0	0	0	0
Spillback Cap Reductn	0	0	0	0	0	0	0	0
Storage Cap Reductn	0	0	0	0	0	0	0	0
Reduced v/c Ratio	0.43	0.19	0.08	0.21	0.15	0.50	0.33	0.50

Intersection Summary

Cycle Length: 130
Actuated Cycle Length: 130
Offset: 92 (71%), Referenced to phase 2:EBTL and 6:WBTL, Start of Green
Natural Cycle: 100
Control Type: Actuated-Coordinated

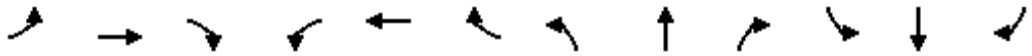
Splits and Phases: 1: Coleraine Dr & Mayfield Rd



Movement	EBL	EBT	EBR	WBL	WBT	WBR	NBL	NBT	NBR	SBL	SBT	SBR
Lane Configurations												
Traffic Volume (vph)	313	353	32	39	307	27	23	303	31	55	345	224
Future Volume (vph)	313	353	32	39	307	27	23	303	31	55	345	224
Ideal Flow (vphpl)	1900	1900	1900	1900	1900	1900	1900	1900	1900	1900	1900	1900
Lane Width	3.5	3.7	3.5	3.5	3.7	3.5	3.5	3.7	3.5	3.5	3.7	3.5
Total Lost time (s)	3.0	7.0		7.0	7.0		7.0	7.0		3.0	7.0	
Lane Util. Factor	1.00	0.95		1.00	0.95		1.00	0.95		1.00	0.95	
Frt	1.00	0.99		1.00	0.99		1.00	0.99		1.00	0.94	
Flt Protected	0.95	1.00		0.95	1.00		0.95	1.00		0.95	1.00	
Satd. Flow (prot)	1700	3057		1580	2980		1716	3463		981	3176	
Flt Permitted	0.53	1.00		0.52	1.00		0.44	1.00		0.34	1.00	
Satd. Flow (perm)	943	3057		871	2980		791	3463		355	3176	
Peak-hour factor, PHF	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00
Adj. Flow (vph)	313	353	32	39	307	27	23	303	31	55	345	224
RTOR Reduction (vph)	0	4	0	0	4	0	0	6	0	0	94	0
Lane Group Flow (vph)	313	381	0	39	330	0	23	328	0	55	475	0
Heavy Vehicles (%)	5%	19%	6%	13%	16%	78%	4%	3%	13%	82%	5%	13%
Turn Type	pm+pt	NA		Perm	NA		Perm	NA		pm+pt	NA	
Protected Phases	5	2			6			4		3	8	
Permitted Phases	2			6			4			8		
Actuated Green, G (s)	84.8	84.8		68.0	68.0		18.5	18.5		31.2	31.2	
Effective Green, g (s)	84.8	84.8		68.0	68.0		18.5	18.5		31.2	31.2	
Actuated g/C Ratio	0.65	0.65		0.52	0.52		0.14	0.14		0.24	0.24	
Clearance Time (s)	3.0	7.0		7.0	7.0		7.0	7.0		3.0	7.0	
Vehicle Extension (s)	3.0	3.0		3.0	3.0		3.0	3.0		3.0	3.0	
Lane Grp Cap (vph)	695	1994		455	1558		112	492		131	762	
v/s Ratio Prot	c0.05	0.12			0.11			0.09		0.03	c0.15	
v/s Ratio Perm	c0.25			0.04			0.03			0.07		
v/c Ratio	0.45	0.19		0.09	0.21		0.21	0.67		0.42	0.62	
Uniform Delay, d1	9.7	9.0		15.5	16.6		49.3	52.8		40.1	44.1	
Progression Factor	1.00	1.00		1.00	1.00		1.00	1.00		1.00	1.00	
Incremental Delay, d2	0.5	0.2		0.4	0.3		0.9	3.4		2.2	1.6	
Delay (s)	10.1	9.2		15.8	16.9		50.2	56.2		42.2	45.7	
Level of Service	B	A		B	B		D	E		D	D	
Approach Delay (s)		9.6			16.8			55.8			45.4	
Approach LOS		A			B			E			D	

Intersection Summary			
HCM 2000 Control Delay	29.9	HCM 2000 Level of Service	C
HCM 2000 Volume to Capacity ratio	0.52		
Actuated Cycle Length (s)	130.0	Sum of lost time (s)	20.0
Intersection Capacity Utilization	74.9%	ICU Level of Service	D
Analysis Period (min)	15		

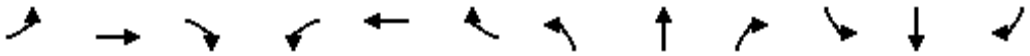
c Critical Lane Group



Movement	EBL	EBT	EBR	WBL	WBT	WBR	NBL	NBT	NBR	SBL	SBT	SBR
Lane Configurations												
Traffic Volume (veh/h)	1	1	1	32	11	135	11	581	51	120	582	5
Future Volume (Veh/h)	1	1	1	32	11	135	11	581	51	120	582	5
Sign Control		Stop			Stop			Free			Free	
Grade		0%			0%			0%			0%	
Peak Hour Factor	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00
Hourly flow rate (vph)	1	1	1	32	11	135	11	581	51	120	582	5
Pedestrians												
Lane Width (m)												
Walking Speed (m/s)												
Percent Blockage												
Right turn flare (veh)												
Median type								TWLTL			None	
Median storage veh)								2				
Upstream signal (m)												
pX, platoon unblocked												
vC, conflicting volume	1278	1478	294	1161	1456	316	587			632		
vC1, stage 1 conf vol	824	824		628	628							
vC2, stage 2 conf vol	453	654		532	827							
vCu, unblocked vol	1278	1478	294	1161	1456	316	587			632		
tC, single (s)	7.5	6.5	6.9	7.9	6.7	7.5	4.6			4.5		
tC, 2 stage (s)	6.5	5.5		6.9	5.7							
tF (s)	3.5	4.0	3.3	3.7	4.1	3.6	2.5			2.4		
p0 queue free %	100	100	100	89	96	78	99			86		
cM capacity (veh/h)	219	254	709	289	263	604	831			840		

Direction, Lane #	EB 1	EB 2	WB 1	WB 2	NB 1	NB 2	NB 3	SB 1	SB 2	SB 3
Volume Total	1	2	32	146	11	387	245	120	388	199
Volume Left	1	0	32	0	11	0	0	120	0	0
Volume Right	0	1	0	135	0	0	51	0	0	5
cSH	219	374	289	550	831	1700	1700	840	1700	1700
Volume to Capacity	0.00	0.01	0.11	0.27	0.01	0.23	0.14	0.14	0.23	0.12
Queue Length 95th (m)	0.1	0.1	3.0	8.5	0.3	0.0	0.0	4.0	0.0	0.0
Control Delay (s)	21.5	14.7	19.0	13.9	9.4	0.0	0.0	10.0	0.0	0.0
Lane LOS	C	B	C	B	A			A		
Approach Delay (s)	17.0		14.8		0.2			1.7		
Approach LOS	C		B							

Intersection Summary				
Average Delay	2.6			
Intersection Capacity Utilization	43.3%	ICU Level of Service		A
Analysis Period (min)	15			



Movement	EBL	EBT	EBR	WBL	WBT	WBR	NBL	NBT	NBR	SBL	SBT	SBR
Lane Configurations												
Traffic Volume (veh/h)	3	117	49	17	143	12	21	4	6	7	3	14
Future Volume (Veh/h)	3	117	49	17	143	12	21	4	6	7	3	14
Sign Control		Free			Free			Stop			Stop	
Grade		0%			0%			0%			0%	
Peak Hour Factor	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00
Hourly flow rate (vph)	3	117	49	17	143	12	21	4	6	7	3	14
Pedestrians											1	
Lane Width (m)											3.7	
Walking Speed (m/s)											1.2	
Percent Blockage											0	
Right turn flare (veh)												
Median type		None			None							
Median storage veh)												
Upstream signal (m)												
pX, platoon unblocked												
vC, conflicting volume	156			166			346	338	142	340	356	150
vC1, stage 1 conf vol												
vC2, stage 2 conf vol												
vCu, unblocked vol	156			166			346	338	142	340	356	150
tC, single (s)	4.1			4.1			7.3	6.8	6.5	7.5	6.8	6.6
tC, 2 stage (s)												
tF (s)	2.2			2.2			3.7	4.2	3.6	3.9	4.3	3.6
p0 queue free %	100			99			96	99	99	99	99	98
cM capacity (veh/h)	1435			1424			550	540	830	530	516	814

Direction, Lane #	EB 1	WB 1	NB 1	SB 1
Volume Total	169	172	31	24
Volume Left	3	17	21	7
Volume Right	49	12	6	14
cSH	1435	1424	587	663
Volume to Capacity	0.00	0.01	0.05	0.04
Queue Length 95th (m)	0.1	0.3	1.3	0.9
Control Delay (s)	0.2	0.8	11.5	10.6
Lane LOS	A	A	B	B
Approach Delay (s)	0.2	0.8	11.5	10.6
Approach LOS			B	B

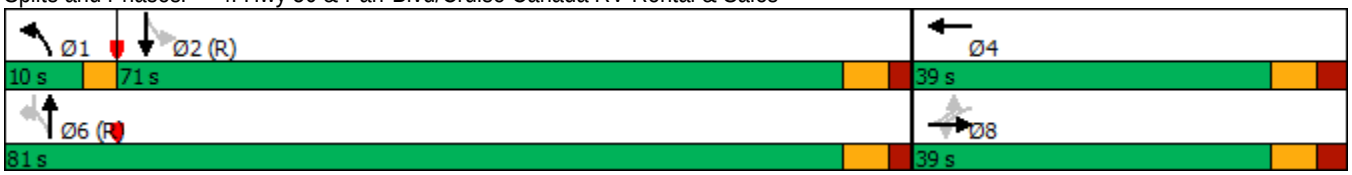
Intersection Summary				
Average Delay	2.0			
Intersection Capacity Utilization	28.2%	ICU Level of Service	A	
Analysis Period (min)	15			

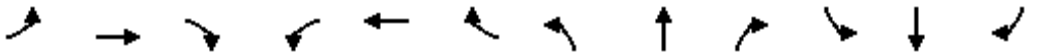
Lane Group	EBL	EBT	WBL	WBT	NBL	NBT	SBT	SBR
Lane Configurations								
Traffic Volume (vph)	29	0	1	0	199	1065	1180	49
Future Volume (vph)	29	0	1	0	199	1065	1180	49
Lane Group Flow (vph)	29	102	0	1	199	1067	1180	49
Turn Type	Perm	NA	D.Pm	NA	pm+pt	NA	NA	custom
Protected Phases		8		4	1	6	2	
Permitted Phases	8		8		6			6
Detector Phase	8	8	8	4	1	6	2	6
Switch Phase								
Minimum Initial (s)	8.0	8.0	8.0	8.0	5.0	12.0	12.0	12.0
Minimum Split (s)	33.9	33.9	33.9	33.9	9.5	30.1	30.1	30.1
Total Split (s)	39.0	39.0	39.0	39.0	10.0	81.0	71.0	81.0
Total Split (%)	32.5%	32.5%	32.5%	32.5%	8.3%	67.5%	59.2%	67.5%
Yellow Time (s)	4.0	4.0	4.0	4.0	3.0	4.0	4.0	4.0
All-Red Time (s)	2.9	2.9	2.9	2.9	0.0	2.1	2.1	2.1
Lost Time Adjust (s)	0.0	0.0		0.0	0.0	0.0	0.0	0.0
Total Lost Time (s)	6.9	6.9		6.9	3.0	6.1	6.1	6.1
Lead/Lag					Lead		Lag	
Lead-Lag Optimize?								
Recall Mode	None	None	None	None	None	C-Max	C-Max	C-Max
v/c Ratio	0.29	0.43		0.01	0.53	0.39	0.54	0.04
Control Delay	59.8	7.1		50.0	7.0	3.5	10.5	1.1
Queue Delay	0.0	0.0		0.0	0.0	0.0	0.0	0.0
Total Delay	59.8	7.1		50.0	7.0	3.5	10.5	1.1
Queue Length 50th (m)	7.0	0.0		0.2	6.1	27.5	63.2	0.5
Queue Length 95th (m)	16.9	3.5		2.1	12.4	41.6	101.2	2.8
Internal Link Dist (m)		828.8		20.9		732.4	332.3	
Turn Bay Length (m)	80.0				35.0			20.0
Base Capacity (vph)	355	432		354	378	2735	2203	1232
Starvation Cap Reductn	0	0		0	0	0	0	0
Spillback Cap Reductn	0	0		0	0	0	0	0
Storage Cap Reductn	0	0		0	0	0	0	0
Reduced v/c Ratio	0.08	0.24		0.00	0.53	0.39	0.54	0.04

Intersection Summary

Cycle Length: 120
Actuated Cycle Length: 120
Offset: 8 (7%), Referenced to phase 2:SBTL and 6:NBTL, Start of Green
Natural Cycle: 90
Control Type: Actuated-Coordinated

Splits and Phases: 4: Hwy 50 & Parr Blvd/Cruise Canada RV Rental & Sales





Movement	EBL	EBT	EBR	WBL	WBT	WBR	NBL	NBT	NBR	SBL	SBT	SBR
Lane Configurations												
Traffic Volume (vph)	29	0	102	1	0	0	199	1065	2	0	1180	49
Future Volume (vph)	29	0	102	1	0	0	199	1065	2	0	1180	49
Ideal Flow (vphpl)	1900	1900	1900	1900	1900	1900	1900	1900	1900	1900	1900	1900
Lane Width	3.5	3.7	3.5	3.5	3.7	3.5	3.5	3.7	3.5	3.5	3.7	3.5
Total Lost time (s)	6.9	6.9			6.9		3.0	6.1			6.1	6.1
Lane Util. Factor	1.00	1.00			1.00		1.00	0.95			0.95	1.00
Frpb, ped/bikes	1.00	1.00			1.00		1.00	1.00			1.00	0.98
Flpb, ped/bikes	1.00	1.00			1.00		1.00	1.00			1.00	1.00
Frt	1.00	0.85			1.00		1.00	1.00			1.00	0.85
Flt Protected	0.95	1.00			0.95		0.95	1.00			1.00	1.00
Satd. Flow (prot)	1668	1183			1825		1513	3348			3174	1501
Flt Permitted	0.76	1.00			0.69		0.19	1.00			1.00	1.00
Satd. Flow (perm)	1330	1183			1328		310	3348			3174	1501
Peak-hour factor, PHF	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00
Adj. Flow (vph)	29	0	102	1	0	0	199	1065	2	0	1180	49
RTOR Reduction (vph)	0	94	0	0	0	0	0	0	0	0	0	6
Lane Group Flow (vph)	29	8	0	0	1	0	199	1067	0	0	1180	43
Confl. Peds. (#/hr)							1		2	2		1
Confl. Bikes (#/hr)									1			
Heavy Vehicles (%)	7%	0%	38%	0%	0%	0%	18%	9%	0%	0%	15%	4%
Turn Type	Perm	NA		D.Pm	NA		pm+pt	NA		Perm	NA	custom
Protected Phases		8			4		1	6			2	
Permitted Phases	8			8			6			2		6
Actuated Green, G (s)	9.0	9.0			9.0		98.0	98.0			83.3	98.0
Effective Green, g (s)	9.0	9.0			9.0		98.0	98.0			83.3	98.0
Actuated g/C Ratio	0.08	0.08			0.08		0.82	0.82			0.69	0.82
Clearance Time (s)	6.9	6.9			6.9		3.0	6.1			6.1	6.1
Vehicle Extension (s)	3.0	3.0			3.0		3.0	3.0			3.0	3.0
Lane Grp Cap (vph)	99	88			99		370	2734			2203	1225
v/s Ratio Prot		0.01					c0.05	0.32			0.37	
v/s Ratio Perm	c0.02				0.00		c0.39					0.03
v/c Ratio	0.29	0.09			0.01		0.54	0.39			0.54	0.03
Uniform Delay, d1	52.5	51.7			51.4		4.6	3.0			8.9	2.1
Progression Factor	1.00	1.00			1.00		1.00	1.00			1.00	1.00
Incremental Delay, d2	1.6	0.4			0.0		1.5	0.4			0.9	0.1
Delay (s)	54.1	52.1			51.4		6.1	3.4			9.9	2.1
Level of Service	D	D			D		A	A			A	A
Approach Delay (s)		52.6			51.4			3.8			9.6	
Approach LOS		D			D			A			A	

Intersection Summary			
HCM 2000 Control Delay	9.0	HCM 2000 Level of Service	A
HCM 2000 Volume to Capacity ratio	0.53		
Actuated Cycle Length (s)	120.0	Sum of lost time (s)	16.0
Intersection Capacity Utilization	64.5%	ICU Level of Service	C
Analysis Period (min)	15		

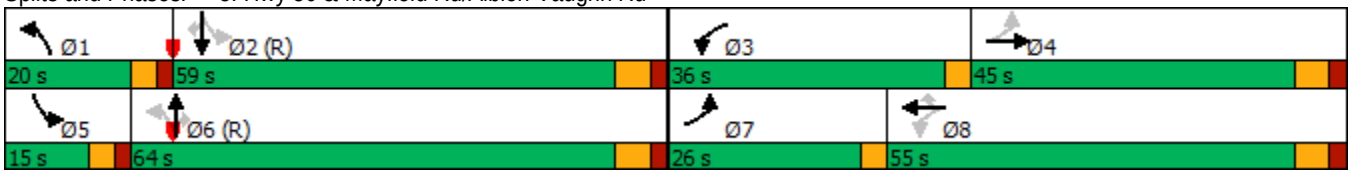
c Critical Lane Group

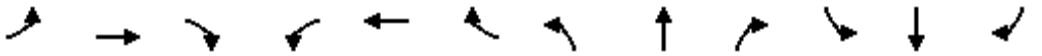
Lane Group	EBL	EBT	WBL	WBT	WBR	NBL	NBT	NBR	SBL	SBT	SBR
Lane Configurations											
Traffic Volume (vph)	61	130	354	225	39	132	1091	170	31	1139	64
Future Volume (vph)	61	130	354	225	39	132	1091	170	31	1139	64
Lane Group Flow (vph)	61	340	354	225	39	132	1091	170	31	1139	64
Turn Type	pm+pt	NA	pm+pt	NA	Perm	pm+pt	NA	Perm	pm+pt	NA	Perm
Protected Phases	7	4	3	8		1	6		5	2	
Permitted Phases	4		8		8	6		6	2		2
Detector Phase	7	4	3	8	8	1	6	6	5	2	2
Switch Phase											
Minimum Initial (s)	5.0	12.0	10.0	12.0	12.0	10.0	20.0	20.0	10.0	20.0	20.0
Minimum Split (s)	9.5	43.5	14.5	43.5	43.5	15.0	41.3	41.3	15.0	41.3	41.3
Total Split (s)	26.0	45.0	36.0	55.0	55.0	20.0	64.0	64.0	15.0	59.0	59.0
Total Split (%)	16.3%	28.1%	22.5%	34.4%	34.4%	12.5%	40.0%	40.0%	9.4%	36.9%	36.9%
Yellow Time (s)	3.0	4.0	3.0	4.0	4.0	3.0	4.2	4.2	3.0	4.2	4.2
All-Red Time (s)	0.0	2.5	0.0	2.5	2.5	2.0	2.1	2.1	2.0	2.1	2.1
Lost Time Adjust (s)	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
Total Lost Time (s)	3.0	6.5	3.0	6.5	6.5	5.0	6.3	6.3	5.0	6.3	6.3
Lead/Lag	Lead	Lag	Lead	Lag	Lag	Lead	Lag	Lag	Lead	Lag	Lag
Lead-Lag Optimize?											
Recall Mode	None	None	None	None	None	None	C-Max	C-Max	None	C-Max	C-Max
v/c Ratio	0.26	0.85	0.95	0.49	0.09	0.59	0.63	0.21	0.13	0.82	0.09
Control Delay	38.7	50.8	79.2	54.4	0.4	31.5	31.3	8.5	17.1	45.7	1.8
Queue Delay	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
Total Delay	38.7	50.8	79.2	54.4	0.4	31.5	31.3	8.5	17.1	45.7	1.8
Queue Length 50th (m)	13.9	27.6	99.4	65.6	0.0	18.7	140.4	8.3	4.0	175.5	0.0
Queue Length 95th (m)	23.5	45.2	#146.5	89.6	0.5	43.7	185.5	25.6	10.3	#263.1	3.1
Internal Link Dist (m)		330.4		656.8			717.1			732.4	
Turn Bay Length (m)	60.0		50.0		50.0	100.0		85.0	35.0		120.0
Base Capacity (vph)	384	676	385	544	514	228	1722	791	237	1387	700
Starvation Cap Reductn	0	0	0	0	0	0	0	0	0	0	0
Spillback Cap Reductn	0	0	0	0	0	0	0	0	0	0	0
Storage Cap Reductn	0	0	0	0	0	0	0	0	0	0	0
Reduced v/c Ratio	0.16	0.50	0.92	0.41	0.08	0.58	0.63	0.21	0.13	0.82	0.09

Intersection Summary

Cycle Length: 160
Actuated Cycle Length: 160
Offset: 27 (17%), Referenced to phase 2:SBTL and 6:NBTL, Start of Green
Natural Cycle: 125
Control Type: Actuated-Coordinated
95th percentile volume exceeds capacity, queue may be longer.
Queue shown is maximum after two cycles.

Splits and Phases: 5: Hwy 50 & Mayfield Rd/Albion Vaughn Rd

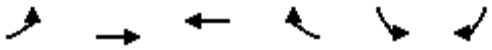




Movement	EBL	EBT	EBR	WBL	WBT	WBR	NBL	NBT	NBR	SBL	SBT	SBR
Lane Configurations												
Traffic Volume (vph)	61	130	210	354	225	39	132	1091	170	31	1139	64
Future Volume (vph)	61	130	210	354	225	39	132	1091	170	31	1139	64
Ideal Flow (vphpl)	1900	1900	1900	1900	1900	1900	1900	1900	1900	1900	1900	1900
Lane Width	3.5	3.7	3.5	3.5	3.7	3.5	3.5	3.7	3.5	3.5	3.7	3.5
Total Lost time (s)	3.0	6.5		3.0	6.5	6.5	5.0	6.3	6.3	5.0	6.3	6.3
Lane Util. Factor	1.00	0.95		1.00	1.00	1.00	1.00	0.95	1.00	1.00	0.95	1.00
Frt	1.00	0.91		1.00	1.00	0.85	1.00	1.00	0.85	1.00	1.00	0.85
Flt Protected	0.95	1.00		0.95	1.00	1.00	0.95	1.00	1.00	0.95	1.00	1.00
Satd. Flow (prot)	1700	2221		1623	1795	1521	1275	3288	1401	1539	3093	1439
Flt Permitted	0.62	1.00		0.22	1.00	1.00	0.11	1.00	1.00	0.19	1.00	1.00
Satd. Flow (perm)	1106	2221		371	1795	1521	146	3288	1401	310	3093	1439
Peak-hour factor, PHF	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00
Adj. Flow (vph)	61	130	210	354	225	39	132	1091	170	31	1139	64
RTOR Reduction (vph)	0	167	0	0	0	29	0	0	59	0	0	36
Lane Group Flow (vph)	61	173	0	354	225	10	132	1091	111	31	1139	28
Heavy Vehicles (%)	5%	25%	64%	10%	7%	5%	40%	11%	14%	16%	18%	11%
Turn Type	pm+pt	NA		pm+pt	NA	Perm	pm+pt	NA	Perm	pm+pt	NA	Perm
Protected Phases	7	4		3	8		1	6		5	2	
Permitted Phases	4			8		8	6		6	2		2
Actuated Green, G (s)	25.3	17.3		52.0	41.0	41.0	95.2	82.2	82.2	79.2	71.2	71.2
Effective Green, g (s)	25.3	17.3		52.0	41.0	41.0	95.2	82.2	82.2	79.2	71.2	71.2
Actuated g/C Ratio	0.16	0.11		0.32	0.26	0.26	0.60	0.51	0.51	0.50	0.45	0.45
Clearance Time (s)	3.0	6.5		3.0	6.5	6.5	5.0	6.3	6.3	5.0	6.3	6.3
Vehicle Extension (s)	3.0	3.0		3.0	3.0	3.0	3.0	3.0	3.0	3.0	3.0	3.0
Lane Grp Cap (vph)	204	240		368	459	389	220	1689	719	214	1376	640
v/s Ratio Prot	0.01	0.08		c0.19	0.13		c0.07	c0.33		0.01	c0.37	
v/s Ratio Perm	0.03			c0.12		0.01	0.29		0.08	0.06		0.02
v/c Ratio	0.30	0.72		0.96	0.49	0.03	0.60	0.65	0.15	0.14	0.83	0.04
Uniform Delay, d1	58.8	69.0		47.4	50.6	44.5	24.2	28.3	20.5	22.1	39.0	25.1
Progression Factor	1.00	1.00		1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00
Incremental Delay, d2	0.8	10.2		36.8	0.8	0.0	4.4	1.9	0.5	0.3	5.8	0.1
Delay (s)	59.6	79.2		84.1	51.4	44.6	28.6	30.2	21.0	22.4	44.9	25.3
Level of Service	E	E		F	D	D	C	C	C	C	D	C
Approach Delay (s)		76.3			69.7			28.9			43.3	
Approach LOS		E			E			C			D	

Intersection Summary			
HCM 2000 Control Delay	45.9	HCM 2000 Level of Service	D
HCM 2000 Volume to Capacity ratio	0.86		
Actuated Cycle Length (s)	160.0	Sum of lost time (s)	20.8
Intersection Capacity Utilization	88.0%	ICU Level of Service	E
Analysis Period (min)	15		

c Critical Lane Group



Movement	EBL	EBT	WBT	WBR	SBL	SBR
Lane Configurations						
Traffic Volume (veh/h)	45	394	357	44	11	16
Future Volume (Veh/h)	45	394	357	44	11	16
Sign Control		Free	Free		Stop	
Grade		0%	0%		0%	
Peak Hour Factor	1.00	1.00	1.00	1.00	1.00	1.00
Hourly flow rate (vph)	45	394	357	44	11	16
Pedestrians						
Lane Width (m)						
Walking Speed (m/s)						
Percent Blockage						
Right turn flare (veh)						
Median type		None	None			
Median storage veh)						
Upstream signal (m)		233				
pX, platoon unblocked					0.99	
vC, conflicting volume	401				666	200
vC1, stage 1 conf vol						
vC2, stage 2 conf vol						
vCu, unblocked vol	401				633	200
tC, single (s)	4.2				7.3	7.3
tC, 2 stage (s)						
tF (s)	2.3				3.8	3.5
p0 queue free %	96				97	98
cM capacity (veh/h)	1119				340	757

Direction, Lane #	EB 1	EB 2	EB 3	WB 1	WB 2	SB 1	SB 2
Volume Total	45	197	197	238	163	11	16
Volume Left	45	0	0	0	0	11	0
Volume Right	0	0	0	0	44	0	16
cSH	1119	1700	1700	1700	1700	340	757
Volume to Capacity	0.04	0.12	0.12	0.14	0.10	0.03	0.02
Queue Length 95th (m)	1.0	0.0	0.0	0.0	0.0	0.8	0.5
Control Delay (s)	8.4	0.0	0.0	0.0	0.0	15.9	9.9
Lane LOS	A					C	A
Approach Delay (s)	0.9			0.0		12.3	
Approach LOS						B	

Intersection Summary			
Average Delay	0.8		
Intersection Capacity Utilization	27.9%	ICU Level of Service	A
Analysis Period (min)	15		

Movement	WBL	WBR	NBT	NBR	SBL	SBT
Lane Configurations						
Traffic Volume (veh/h)	0	0	630	0	0	625
Future Volume (Veh/h)	0	0	630	0	0	625
Sign Control	Stop		Free			Free
Grade	0%		0%			0%
Peak Hour Factor	1.00	1.00	1.00	1.00	1.00	1.00
Hourly flow rate (vph)	0	0	630	0	0	625
Pedestrians						
Lane Width (m)						
Walking Speed (m/s)						
Percent Blockage						
Right turn flare (veh)						
Median type			TWLTL			TWLTL
Median storage veh)			2			2
Upstream signal (m)						
pX, platoon unblocked						
vC, conflicting volume	942	315			630	
vC1, stage 1 conf vol	630					
vC2, stage 2 conf vol	312					
vCu, unblocked vol	942	315			630	
tC, single (s)	6.8	6.9			4.1	
tC, 2 stage (s)	5.8					
tF (s)	3.5	3.3			2.2	
p0 queue free %	100	100			100	
cM capacity (veh/h)	453	687			962	

Direction, Lane #	WB 1	NB 1	NB 2	SB 1	SB 2
Volume Total	0	420	210	208	417
Volume Left	0	0	0	0	0
Volume Right	0	0	0	0	0
cSH	1700	1700	1700	962	1700
Volume to Capacity	0.00	0.25	0.12	0.00	0.25
Queue Length 95th (m)	0.0	0.0	0.0	0.0	0.0
Control Delay (s)	0.0	0.0	0.0	0.0	0.0
Lane LOS	A				
Approach Delay (s)	0.0	0.0		0.0	
Approach LOS	A				

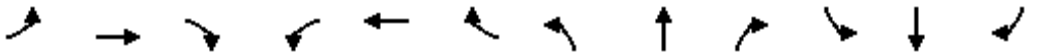
Intersection Summary			
Average Delay	0.0		
Intersection Capacity Utilization	20.7%	ICU Level of Service	A
Analysis Period (min)	15		

Lane Group	EBL	EBT	WBL	WBT	NBL	NBT	SBL	SBT
Lane Configurations								
Traffic Volume (vph)	281	361	26	359	26	511	81	477
Future Volume (vph)	281	361	26	359	26	511	81	477
Lane Group Flow (vph)	281	396	26	427	26	541	81	886
Turn Type	pm+pt	NA	Perm	NA	Perm	NA	pm+pt	NA
Protected Phases	5	2		6		4	3	8
Permitted Phases	2		6		4		8	
Detector Phase	5	2	6	6	4	4	3	8
Switch Phase								
Minimum Initial (s)	5.0	12.0	12.0	12.0	12.0	12.0	5.0	12.0
Minimum Split (s)	9.5	37.0	37.0	37.0	37.0	37.0	12.5	37.0
Total Split (s)	12.0	80.0	68.0	68.0	36.0	36.0	14.0	50.0
Total Split (%)	9.2%	61.5%	52.3%	52.3%	27.7%	27.7%	10.8%	38.5%
Yellow Time (s)	3.0	4.6	4.6	4.6	4.2	4.2	3.0	4.2
All-Red Time (s)	0.0	2.4	2.4	2.4	2.8	2.8	0.0	2.8
Lost Time Adjust (s)	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
Total Lost Time (s)	3.0	7.0	7.0	7.0	7.0	7.0	3.0	7.0
Lead/Lag	Lead		Lag	Lag	Lag	Lag	Lead	
Lead-Lag Optimize?								
Recall Mode	None	C-Max	C-Max	C-Max	None	None	None	None
v/c Ratio	0.51	0.20	0.06	0.30	0.51	0.76	0.47	0.83
Control Delay	15.6	12.1	19.4	19.6	80.3	56.4	39.6	41.5
Queue Delay	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
Total Delay	15.6	12.1	19.4	19.6	80.3	56.4	39.6	41.5
Queue Length 50th (m)	32.9	23.8	3.8	34.8	6.4	73.4	15.5	94.5
Queue Length 95th (m)	53.2	35.1	9.5	47.3	#19.2	91.1	27.4	115.7
Internal Link Dist (m)		689.8		209.6		564.3		579.6
Turn Bay Length (m)	100.0		85.0		105.0		145.0	
Base Capacity (vph)	550	1998	420	1433	57	783	182	1206
Starvation Cap Reductn	0	0	0	0	0	0	0	0
Spillback Cap Reductn	0	0	0	0	0	0	0	0
Storage Cap Reductn	0	0	0	0	0	0	0	0
Reduced v/c Ratio	0.51	0.20	0.06	0.30	0.46	0.69	0.45	0.73

Intersection Summary

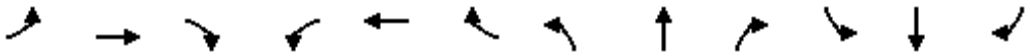
Cycle Length: 130
Actuated Cycle Length: 130
Offset: 116 (89%), Referenced to phase 2:EBTL and 6:WBTL, Start of Green
Natural Cycle: 100
Control Type: Actuated-Coordinated
95th percentile volume exceeds capacity, queue may be longer.
Queue shown is maximum after two cycles.

Splits and Phases: 1: Coleraine Dr & Mayfield Rd



Movement	EBL	EBT	EBR	WBL	WBT	WBR	NBL	NBT	NBR	SBL	SBT	SBR
Lane Configurations												
Traffic Volume (vph)	281	361	35	26	359	68	26	511	30	81	477	409
Future Volume (vph)	281	361	35	26	359	68	26	511	30	81	477	409
Ideal Flow (vphpl)	1900	1900	1900	1900	1900	1900	1900	1900	1900	1900	1900	1900
Lane Width	3.5	3.7	3.5	3.5	3.7	3.5	3.5	3.7	3.5	3.5	3.7	3.5
Total Lost time (s)	3.0	7.0		7.0	7.0		7.0	7.0		3.0	7.0	
Lane Util. Factor	1.00	0.95		1.00	0.95		1.00	0.95		1.00	0.95	
Frpb, ped/bikes	1.00	1.00		1.00	1.00		1.00	1.00		1.00	1.00	
Flpb, ped/bikes	1.00	1.00		1.00	1.00		1.00	1.00		1.00	1.00	
Frt	1.00	0.99		1.00	0.98		1.00	0.99		1.00	0.93	
Flt Protected	0.95	1.00		0.95	1.00		0.95	1.00		0.95	1.00	
Satd. Flow (prot)	1552	3285		1552	2857		1594	3499		1342	3286	
Flt Permitted	0.46	1.00		0.52	1.00		0.15	1.00		0.21	1.00	
Satd. Flow (perm)	756	3285		847	2857		256	3499		298	3286	
Peak-hour factor, PHF	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00
Adj. Flow (vph)	281	361	35	26	359	68	26	511	30	81	477	409
RTOR Reduction (vph)	0	5	0	0	12	0	0	3	0	0	126	0
Lane Group Flow (vph)	281	391	0	26	415	0	26	538	0	81	760	0
Confl. Peds. (#/hr)									1	1		
Heavy Vehicles (%)	15%	10%	6%	15%	15%	76%	12%	3%	10%	33%	2%	5%
Turn Type	pm+pt	NA		Perm	NA		Perm	NA		pm+pt	NA	
Protected Phases	5	2			6			4		3	8	
Permitted Phases	2			6			4			8		
Actuated Green, G (s)	78.3	78.3		64.1	64.1		26.2	26.2		37.7	37.7	
Effective Green, g (s)	78.3	78.3		64.1	64.1		26.2	26.2		37.7	37.7	
Actuated g/C Ratio	0.60	0.60		0.49	0.49		0.20	0.20		0.29	0.29	
Clearance Time (s)	3.0	7.0		7.0	7.0		7.0	7.0		3.0	7.0	
Vehicle Extension (s)	3.0	3.0		3.0	3.0		3.0	3.0		3.0	3.0	
Lane Grp Cap (vph)	523	1978		417	1408		51	705		154	952	
v/s Ratio Prot	c0.05	0.12			0.15			0.15		0.03	c0.23	
v/s Ratio Perm	c0.28			0.03			0.10			0.12		
v/c Ratio	0.54	0.20		0.06	0.29		0.51	0.76		0.53	0.80	
Uniform Delay, d1	12.8	11.7		17.2	19.5		46.2	49.0		35.9	42.6	
Progression Factor	1.00	1.00		1.00	1.00		1.00	1.00		1.00	1.00	
Incremental Delay, d2	1.1	0.2		0.3	0.5		7.8	4.9		3.2	4.7	
Delay (s)	13.9	11.9		17.5	20.1		54.0	53.9		39.2	47.4	
Level of Service	B	B		B	C		D	D		D	D	
Approach Delay (s)		12.7			19.9			53.9			46.7	
Approach LOS		B			B			D			D	

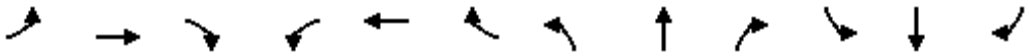
Intersection Summary			
HCM 2000 Control Delay	35.0	HCM 2000 Level of Service	D
HCM 2000 Volume to Capacity ratio	0.65		
Actuated Cycle Length (s)	130.0	Sum of lost time (s)	20.0
Intersection Capacity Utilization	84.8%	ICU Level of Service	E
Analysis Period (min)	15		
c Critical Lane Group			



Movement	EBL	EBT	EBR	WBL	WBT	WBR	NBL	NBT	NBR	SBL	SBT	SBR
Lane Configurations												
Traffic Volume (veh/h)	3	3	13	28	5	142	13	816	20	124	922	4
Future Volume (Veh/h)	3	3	13	28	5	142	13	816	20	124	922	4
Sign Control		Stop			Stop			Free			Free	
Grade		0%			0%			0%			0%	
Peak Hour Factor	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00
Hourly flow rate (vph)	3	3	13	28	5	142	13	816	20	124	922	4
Pedestrians												
Lane Width (m)												
Walking Speed (m/s)												
Percent Blockage												
Right turn flare (veh)												
Median type								TWLTL			None	
Median storage veh)								2				
Upstream signal (m)												
pX, platoon unblocked												
vC, conflicting volume	1750	2034	463	1576	2026	418	926			836		
vC1, stage 1 conf vol	1172	1172		852	852							
vC2, stage 2 conf vol	578	862		724	1174							
vCu, unblocked vol	1750	2034	463	1576	2026	418	926			836		
tC, single (s)	7.5	7.2	7.1	7.9	7.7	7.2	5.8			4.4		
tC, 2 stage (s)	6.5	6.2		6.9	6.7							
tF (s)	3.5	4.3	3.4	3.7	4.6	3.4	3.1			2.3		
p0 queue free %	98	98	98	86	96	74	97			83		
cM capacity (veh/h)	133	122	530	193	112	549	383			727		

Direction, Lane #	EB 1	EB 2	WB 1	WB 2	NB 1	NB 2	NB 3	SB 1	SB 2	SB 3
Volume Total	3	16	28	147	13	544	292	124	615	311
Volume Left	3	0	28	0	13	0	0	124	0	0
Volume Right	0	13	0	142	0	0	20	0	0	4
cSH	133	326	193	485	383	1700	1700	727	1700	1700
Volume to Capacity	0.02	0.05	0.14	0.30	0.03	0.32	0.17	0.17	0.36	0.18
Queue Length 95th (m)	0.6	1.2	4.0	10.1	0.8	0.0	0.0	4.9	0.0	0.0
Control Delay (s)	32.7	16.6	26.8	15.6	14.7	0.0	0.0	11.0	0.0	0.0
Lane LOS	D	C	D	C	B			B		
Approach Delay (s)	19.2		17.4		0.2			1.3		
Approach LOS	C		C							

Intersection Summary				
Average Delay	2.4			
Intersection Capacity Utilization	49.1%	ICU Level of Service		A
Analysis Period (min)	15			



Movement	EBL	EBT	EBR	WBL	WBT	WBR	NBL	NBT	NBR	SBL	SBT	SBR
Lane Configurations												
Traffic Volume (veh/h)	4	135	24	10	110	14	55	0	15	21	0	9
Future Volume (Veh/h)	4	135	24	10	110	14	55	0	15	21	0	9
Sign Control		Free			Free			Stop			Stop	
Grade		0%			0%			0%			0%	
Peak Hour Factor	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00
Hourly flow rate (vph)	4	135	24	10	110	14	55	0	15	21	0	9
Pedestrians												
Lane Width (m)												
Walking Speed (m/s)												
Percent Blockage												
Right turn flare (veh)												
Median type		None			None							
Median storage veh)												
Upstream signal (m)												
pX, platoon unblocked												
vC, conflicting volume	124			159			301	299	147	307	304	117
vC1, stage 1 conf vol												
vC2, stage 2 conf vol												
vCu, unblocked vol	124			159			301	299	147	307	304	117
tC, single (s)	4.3			4.4			7.2	6.5	6.4	7.2	6.5	6.3
tC, 2 stage (s)												
tF (s)	2.4			2.5			3.6	4.0	3.5	3.6	4.0	3.4
p0 queue free %	100			99			91	100	98	97	100	99
cM capacity (veh/h)	1332			1267			622	610	855	614	606	911

Direction, Lane #	EB 1	WB 1	NB 1	SB 1
Volume Total	163	134	70	30
Volume Left	4	10	55	21
Volume Right	24	14	15	9
cSH	1332	1267	661	680
Volume to Capacity	0.00	0.01	0.11	0.04
Queue Length 95th (m)	0.1	0.2	2.8	1.1
Control Delay (s)	0.2	0.6	11.1	10.5
Lane LOS	A	A	B	B
Approach Delay (s)	0.2	0.6	11.1	10.5
Approach LOS			B	B

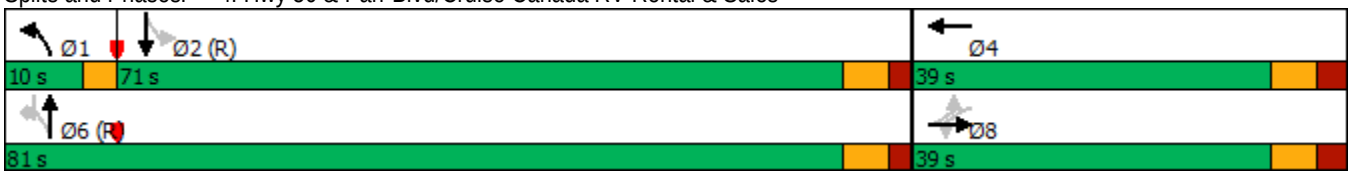
Intersection Summary				
Average Delay	3.1			
Intersection Capacity Utilization	23.0%	ICU Level of Service	A	
Analysis Period (min)	15			

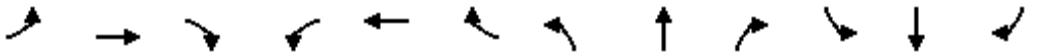
Lane Group	EBL	EBT	WBL	WBT	NBL	NBT	SBL	SBT	SBR
Lane Configurations									
Traffic Volume (vph)	62	0	1	0	113	1290	1	1190	42
Future Volume (vph)	62	0	1	0	113	1290	1	1190	42
Lane Group Flow (vph)	62	170	0	2	113	1290	1	1190	42
Turn Type	Perm	NA	D.Pm	NA	pm+pt	NA	Perm	NA	custom
Protected Phases		8		4	1	6		2	
Permitted Phases	8		8		6		2		6
Detector Phase	8	8	8	4	1	6	2	2	6
Switch Phase									
Minimum Initial (s)	8.0	8.0	8.0	8.0	5.0	12.0	12.0	12.0	12.0
Minimum Split (s)	33.9	33.9	33.9	33.9	9.5	30.1	30.1	30.1	30.1
Total Split (s)	39.0	39.0	39.0	39.0	10.0	81.0	71.0	71.0	81.0
Total Split (%)	32.5%	32.5%	32.5%	32.5%	8.3%	67.5%	59.2%	59.2%	67.5%
Yellow Time (s)	4.0	4.0	4.0	4.0	3.0	4.0	4.0	4.0	4.0
All-Red Time (s)	2.9	2.9	2.9	2.9	0.0	2.1	2.1	2.1	2.1
Lost Time Adjust (s)	0.0	0.0		0.0	0.0	0.0	0.0	0.0	0.0
Total Lost Time (s)	6.9	6.9		6.9	3.0	6.1	6.1	6.1	6.1
Lead/Lag					Lead		Lag	Lag	
Lead-Lag Optimize?									
Recall Mode	None	None	None	None	None	C-Max	C-Max	C-Max	C-Max
v/c Ratio	0.49	0.60		0.01	0.37	0.49	0.00	0.48	0.04
Control Delay	64.0	18.7		0.0	5.8	5.0	7.0	9.0	1.4
Queue Delay	0.0	0.0		0.0	0.0	0.0	0.0	0.0	0.0
Total Delay	64.0	18.7		0.0	5.8	5.0	7.0	9.0	1.4
Queue Length 50th (m)	14.9	2.8		0.0	4.1	44.3	0.1	59.7	0.3
Queue Length 95th (m)	28.8	23.9		0.0	9.6	69.1	0.7	91.4	2.9
Internal Link Dist (m)		828.8		20.9		732.4		332.3	
Turn Bay Length (m)	80.0				35.0		25.0		20.0
Base Capacity (vph)	357	512		397	307	2645	285	2467	1170
Starvation Cap Reductn	0	0		0	0	0	0	0	0
Spillback Cap Reductn	0	0		0	0	0	0	0	0
Storage Cap Reductn	0	0		0	0	0	0	0	0
Reduced v/c Ratio	0.17	0.33		0.01	0.37	0.49	0.00	0.48	0.04

Intersection Summary

Cycle Length: 120
Actuated Cycle Length: 120
Offset: 3 (3%), Referenced to phase 2:SBTL and 6:NBTL, Start of Green
Natural Cycle: 80
Control Type: Actuated-Coordinated

Splits and Phases: 4: Hwy 50 & Parr Blvd/Cruise Canada RV Rental & Sales





Movement	EBL	EBT	EBR	WBL	WBT	WBR	NBL	NBT	NBR	SBL	SBT	SBR
Lane Configurations												
Traffic Volume (vph)	62	0	170	1	0	1	113	1290	0	1	1190	42
Future Volume (vph)	62	0	170	1	0	1	113	1290	0	1	1190	42
Ideal Flow (vphpl)	1900	1900	1900	1900	1900	1900	1900	1900	1900	1900	1900	1900
Lane Width	3.5	3.7	3.5	3.5	3.7	3.5	3.5	3.7	3.5	3.5	3.7	3.5
Total Lost time (s)	6.9	6.9			6.9		3.0	6.1		6.1	6.1	6.1
Lane Util. Factor	1.00	1.00			1.00		1.00	0.95		1.00	0.95	1.00
Frpb, ped/bikes	1.00	1.00			0.99		1.00	1.00		1.00	1.00	0.98
Flpb, ped/bikes	1.00	1.00			1.00		1.00	1.00		1.00	1.00	1.00
Frt	1.00	0.85			0.93		1.00	1.00		1.00	1.00	0.85
Flt Protected	0.95	1.00			0.98		0.95	1.00		0.95	1.00	1.00
Satd. Flow (prot)	1679	1484			1735		1394	3318		1785	3476	1459
Flt Permitted	0.76	1.00			0.75		0.20	1.00		0.21	1.00	1.00
Satd. Flow (perm)	1337	1484			1338		287	3318		403	3476	1459
Peak-hour factor, PHF	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00
Adj. Flow (vph)	62	0	170	1	0	1	113	1290	0	1	1190	42
RTOR Reduction (vph)	0	143	0	0	2	0	0	0	0	0	0	7
Lane Group Flow (vph)	62	27	0	0	0	0	113	1290	0	1	1190	35
Confl. Peds. (#/hr)	2					2	1					1
Heavy Vehicles (%)	6%	0%	10%	0%	0%	0%	28%	10%	0%	0%	5%	7%
Turn Type	Perm	NA		D.Pm	NA		pm+pt	NA		Perm	NA	custom
Protected Phases		8			4		1	6			2	
Permitted Phases	8			8			6			2		6
Actuated Green, G (s)	11.3	11.3			11.3		95.7	95.7		85.2	85.2	95.7
Effective Green, g (s)	11.3	11.3			11.3		95.7	95.7		85.2	85.2	95.7
Actuated g/C Ratio	0.09	0.09			0.09		0.80	0.80		0.71	0.71	0.80
Clearance Time (s)	6.9	6.9			6.9		3.0	6.1		6.1	6.1	6.1
Vehicle Extension (s)	3.0	3.0			3.0		3.0	3.0		3.0	3.0	3.0
Lane Grp Cap (vph)	125	139			125		298	2646		286	2467	1163
v/s Ratio Prot		0.02					0.02	c0.39			0.34	
v/s Ratio Perm	c0.05				0.00		0.28			0.00		0.02
v/c Ratio	0.50	0.19			0.00		0.38	0.49		0.00	0.48	0.03
Uniform Delay, d1	51.6	50.1			49.2		4.2	4.0		5.1	7.7	2.5
Progression Factor	1.00	1.00			1.00		1.00	1.00		1.00	1.00	1.00
Incremental Delay, d2	3.1	0.7			0.0		0.8	0.6		0.0	0.7	0.0
Delay (s)	54.7	50.8			49.2		5.0	4.7		5.1	8.4	2.6
Level of Service	D	D			D		A	A		A	A	A
Approach Delay (s)		51.9			49.2			4.7			8.2	
Approach LOS		D			D			A			A	

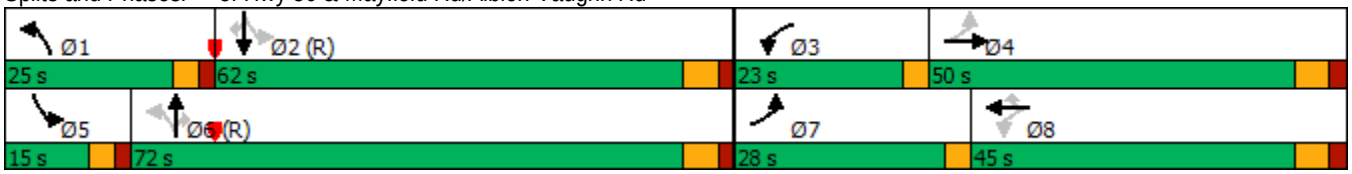
Intersection Summary			
HCM 2000 Control Delay	10.0	HCM 2000 Level of Service	B
HCM 2000 Volume to Capacity ratio	0.50		
Actuated Cycle Length (s)	120.0	Sum of lost time (s)	16.0
Intersection Capacity Utilization	72.1%	ICU Level of Service	C
Analysis Period (min)	15		
c Critical Lane Group			

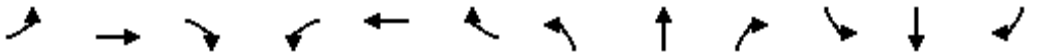
Lane Group	EBL	EBT	WBL	WBT	WBR	NBL	NBT	NBR	SBL	SBT	SBR
Lane Configurations											
Traffic Volume (vph)	84	202	212	126	33	108	1139	413	36	1266	70
Future Volume (vph)	84	202	212	126	33	108	1139	413	36	1266	70
Lane Group Flow (vph)	84	455	212	126	33	108	1139	413	36	1266	70
Turn Type	pm+pt	NA	pm+pt	NA	Perm	pm+pt	NA	Perm	pm+pt	NA	Perm
Protected Phases	7	4	3	8		1	6		5	2	
Permitted Phases	4		8		8	6		6	2		2
Detector Phase	7	4	3	8	8	1	6	6	5	2	2
Switch Phase											
Minimum Initial (s)	5.0	12.0	10.0	12.0	12.0	10.0	20.0	20.0	10.0	20.0	20.0
Minimum Split (s)	9.5	43.5	14.5	43.5	43.5	15.0	41.3	41.3	15.0	41.3	41.3
Total Split (s)	28.0	50.0	23.0	45.0	45.0	25.0	72.0	72.0	15.0	62.0	62.0
Total Split (%)	17.5%	31.3%	14.4%	28.1%	28.1%	15.6%	45.0%	45.0%	9.4%	38.8%	38.8%
Yellow Time (s)	3.0	4.0	3.0	4.0	4.0	3.0	4.2	4.2	3.0	4.2	4.2
All-Red Time (s)	0.0	2.5	0.0	2.5	2.5	2.0	2.1	2.1	2.0	2.1	2.1
Lost Time Adjust (s)	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
Total Lost Time (s)	3.0	6.5	3.0	6.5	6.5	5.0	6.3	6.3	5.0	6.3	6.3
Lead/Lag	Lead	Lag	Lead	Lag	Lag	Lead	Lag	Lag	Lead	Lag	Lag
Lead-Lag Optimize?											
Recall Mode	None	None	None	None	None	None	C-Max	C-Max	None	C-Max	C-Max
v/c Ratio	0.27	0.84	0.87	0.48	0.09	0.58	0.62	0.42	0.14	0.71	0.08
Control Delay	42.7	51.8	77.7	64.1	0.5	28.4	26.4	7.0	13.5	34.6	0.2
Queue Delay	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
Total Delay	42.7	51.8	77.7	64.1	0.5	28.4	26.4	7.0	13.5	34.6	0.2
Queue Length 50th (m)	20.9	46.5	57.6	38.1	0.0	13.2	136.2	16.9	4.1	168.0	0.0
Queue Length 95th (m)	33.3	64.5	#88.9	59.2	0.0	33.1	179.8	46.2	10.1	240.2	0.0
Internal Link Dist (m)		330.4		656.8			717.1			732.4	
Turn Bay Length (m)	60.0		50.0		50.0	100.0		85.0	35.0		120.0
Base Capacity (vph)	447	915	250	345	434	216	1839	987	260	1777	886
Starvation Cap Reductn	0	0	0	0	0	0	0	0	0	0	0
Spillback Cap Reductn	0	0	0	0	0	0	0	0	0	0	0
Storage Cap Reductn	0	0	0	0	0	0	0	0	0	0	0
Reduced v/c Ratio	0.19	0.50	0.85	0.37	0.08	0.50	0.62	0.42	0.14	0.71	0.08

Intersection Summary

Cycle Length: 160
Actuated Cycle Length: 160
Offset: 72 (45%), Referenced to phase 2:SBTL and 6:NBTL, Start of Green
Natural Cycle: 125
Control Type: Actuated-Coordinated
95th percentile volume exceeds capacity, queue may be longer.
Queue shown is maximum after two cycles.

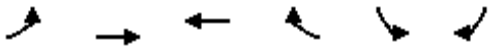
Splits and Phases: 5: Hwy 50 & Mayfield Rd/Albion Vaughn Rd





Movement	EBL	EBT	EBR	WBL	WBT	WBR	NBL	NBT	NBR	SBL	SBT	SBR
Lane Configurations												
Traffic Volume (vph)	84	202	253	212	126	33	108	1139	413	36	1266	70
Future Volume (vph)	84	202	253	212	126	33	108	1139	413	36	1266	70
Ideal Flow (vphpl)	1900	1900	1900	1900	1900	1900	1900	1900	1900	1900	1900	1900
Lane Width	3.5	3.7	3.5	3.5	3.7	3.5	3.5	3.7	3.5	3.5	3.7	3.5
Total Lost time (s)	3.0	6.5		3.0	6.5	6.5	5.0	6.3	6.3	5.0	6.3	6.3
Lane Util. Factor	1.00	0.95		1.00	1.00	1.00	1.00	0.95	1.00	1.00	0.95	1.00
Frpb, ped/bikes	1.00	1.00		1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	0.99
Flpb, ped/bikes	1.00	1.00		1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00
Frt	1.00	0.92		1.00	1.00	0.85	1.00	1.00	0.85	1.00	1.00	0.85
Flt Protected	0.95	1.00		0.95	1.00	1.00	0.95	1.00	1.00	0.95	1.00	1.00
Satd. Flow (prot)	1767	2843		1623	1434	1389	1137	3202	1493	1566	3444	1593
Flt Permitted	0.68	1.00		0.17	1.00	1.00	0.11	1.00	1.00	0.19	1.00	1.00
Satd. Flow (perm)	1258	2843		283	1434	1389	130	3202	1493	312	3444	1593
Peak-hour factor, PHF	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00
Adj. Flow (vph)	84	202	253	212	126	33	108	1139	413	36	1266	70
RTOR Reduction (vph)	0	169	0	0	0	27	0	0	132	0	0	34
Lane Group Flow (vph)	84	286	0	212	126	6	108	1139	281	36	1266	36
Confl. Bikes (#/hr)												1
Heavy Vehicles (%)	1%	11%	23%	10%	34%	15%	57%	14%	7%	14%	6%	-1%
Turn Type	pm+pt	NA		pm+pt	NA	Perm	pm+pt	NA	Perm	pm+pt	NA	Perm
Protected Phases	7	4		3	8		1	6		5	2	
Permitted Phases	4			8		8	6		6	2		2
Actuated Green, G (s)	32.1	21.1		43.3	29.3	29.3	103.9	90.9	90.9	90.6	82.6	82.6
Effective Green, g (s)	32.1	21.1		43.3	29.3	29.3	103.9	90.9	90.9	90.6	82.6	82.6
Actuated g/C Ratio	0.20	0.13		0.27	0.18	0.18	0.65	0.57	0.57	0.57	0.52	0.52
Clearance Time (s)	3.0	6.5		3.0	6.5	6.5	5.0	6.3	6.3	5.0	6.3	6.3
Vehicle Extension (s)	3.0	3.0		3.0	3.0	3.0	3.0	3.0	3.0	3.0	3.0	3.0
Lane Grp Cap (vph)	287	374		237	262	254	187	1819	848	239	1777	822
v/s Ratio Prot	0.02	0.10		c0.11	0.09		c0.06	c0.36		0.01	c0.37	
v/s Ratio Perm	0.04			c0.13		0.00	0.32		0.19	0.08		0.02
v/c Ratio	0.29	0.76		0.89	0.48	0.02	0.58	0.63	0.33	0.15	0.71	0.04
Uniform Delay, d1	53.7	67.0		50.2	58.5	53.6	21.2	23.2	18.4	16.8	29.6	19.2
Progression Factor	1.00	1.00		1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00
Incremental Delay, d2	0.6	9.0		31.8	1.4	0.0	4.3	1.6	1.0	0.3	2.5	0.1
Delay (s)	54.2	76.0		82.0	59.9	53.7	25.5	24.8	19.4	17.1	32.1	19.3
Level of Service	D	E		F	E	D	C	C	B	B	C	B
Approach Delay (s)		72.6			72.0			23.5			31.0	
Approach LOS		E			E			C			C	

Intersection Summary			
HCM 2000 Control Delay	37.4	HCM 2000 Level of Service	D
HCM 2000 Volume to Capacity ratio	0.77		
Actuated Cycle Length (s)	160.0	Sum of lost time (s)	20.8
Intersection Capacity Utilization	87.0%	ICU Level of Service	E
Analysis Period (min)	15		
c Critical Lane Group			



Movement	EBL	EBT	WBT	WBR	SBL	SBR
Lane Configurations						
Traffic Volume (veh/h)	20	452	406	21	30	47
Future Volume (Veh/h)	20	452	406	21	30	47
Sign Control		Free	Free		Stop	
Grade		0%	0%		0%	
Peak Hour Factor	1.00	1.00	1.00	1.00	1.00	1.00
Hourly flow rate (vph)	20	452	406	21	30	47
Pedestrians						
Lane Width (m)						
Walking Speed (m/s)						
Percent Blockage						
Right turn flare (veh)						
Median type		None	None			
Median storage veh)						
Upstream signal (m)		233				
pX, platoon unblocked					0.97	
vC, conflicting volume	427				682	214
vC1, stage 1 conf vol						
vC2, stage 2 conf vol						
vCu, unblocked vol	427				605	214
tC, single (s)	4.5				7.0	7.1
tC, 2 stage (s)						
tF (s)	2.4				3.6	3.4
p0 queue free %	98				92	94
cM capacity (veh/h)	1011				390	770

Direction, Lane #	EB 1	EB 2	EB 3	WB 1	WB 2	SB 1	SB 2
Volume Total	20	226	226	271	156	30	47
Volume Left	20	0	0	0	0	30	0
Volume Right	0	0	0	0	21	0	47
cSH	1011	1700	1700	1700	1700	390	770
Volume to Capacity	0.02	0.13	0.13	0.16	0.09	0.08	0.06
Queue Length 95th (m)	0.5	0.0	0.0	0.0	0.0	2.0	1.6
Control Delay (s)	8.6	0.0	0.0	0.0	0.0	15.0	10.0
Lane LOS	A					C	A
Approach Delay (s)	0.4			0.0		11.9	
Approach LOS						B	

Intersection Summary			
Average Delay	1.1		
Intersection Capacity Utilization	26.6%	ICU Level of Service	A
Analysis Period (min)	15		

Movement	WBL	WBR	NBT	NBR	SBL	SBT
Lane Configurations						
Traffic Volume (veh/h)	0	0	832	0	0	968
Future Volume (Veh/h)	0	0	832	0	0	968
Sign Control	Stop		Free			Free
Grade	0%		0%			0%
Peak Hour Factor	1.00	1.00	1.00	1.00	1.00	1.00
Hourly flow rate (vph)	0	0	832	0	0	968
Pedestrians						
Lane Width (m)						
Walking Speed (m/s)						
Percent Blockage						
Right turn flare (veh)						
Median type			TWLTL			TWLTL
Median storage veh)			2			2
Upstream signal (m)						
pX, platoon unblocked						
vC, conflicting volume	1316	416			832	
vC1, stage 1 conf vol	832					
vC2, stage 2 conf vol	484					
vCu, unblocked vol	1316	416			832	
tC, single (s)	6.8	6.9			4.1	
tC, 2 stage (s)	5.8					
tF (s)	3.5	3.3			2.2	
p0 queue free %	100	100			100	
cM capacity (veh/h)	345	591			809	

Direction, Lane #	WB 1	NB 1	NB 2	SB 1	SB 2
Volume Total	0	555	277	323	645
Volume Left	0	0	0	0	0
Volume Right	0	0	0	0	0
cSH	1700	1700	1700	809	1700
Volume to Capacity	0.00	0.33	0.16	0.00	0.38
Queue Length 95th (m)	0.0	0.0	0.0	0.0	0.0
Control Delay (s)	0.0	0.0	0.0	0.0	0.0
Lane LOS	A				
Approach Delay (s)	0.0	0.0		0.0	
Approach LOS	A				

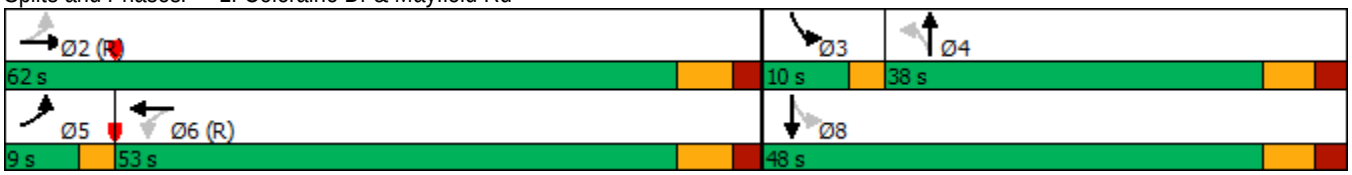
Intersection Summary			
Average Delay	0.0		
Intersection Capacity Utilization	30.1%	ICU Level of Service	A
Analysis Period (min)	15		

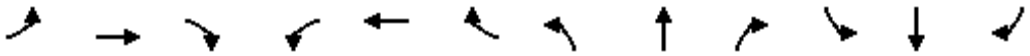
Lane Group	EBL	EBT	WBL	WBT	NBL	NBT	SBL	SBT
Lane Configurations								
Traffic Volume (vph)	88	298	2	332	6	11	83	0
Future Volume (vph)	88	298	2	332	6	11	83	0
Lane Group Flow (vph)	88	299	2	383	6	11	83	141
Turn Type	pm+pt	NA	Perm	NA	Perm	NA	pm+pt	NA
Protected Phases	5	2		6		4	3	8
Permitted Phases	2		6		4		8	
Detector Phase	5	2	6	6	4	4	3	8
Switch Phase								
Minimum Initial (s)	5.0	12.0	12.0	12.0	12.0	12.0	5.0	12.0
Minimum Split (s)	9.5	37.0	37.0	37.0	37.0	37.0	12.5	37.0
Total Split (s)	9.0	62.0	53.0	53.0	38.0	38.0	10.0	48.0
Total Split (%)	8.2%	56.4%	48.2%	48.2%	34.5%	34.5%	9.1%	43.6%
Yellow Time (s)	3.0	4.6	4.6	4.6	4.2	4.2	3.0	4.2
All-Red Time (s)	0.0	2.4	2.4	2.4	2.8	2.8	0.0	2.8
Lost Time Adjust (s)	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
Total Lost Time (s)	3.0	7.0	7.0	7.0	7.0	7.0	3.0	7.0
Lead/Lag	Lead		Lag	Lag	Lag	Lag	Lead	
Lead-Lag Optimize?								
Recall Mode	None	C-Max	C-Max	C-Max	None	None	None	None
v/c Ratio	0.13	0.12	0.01	0.18	0.04	0.03	0.38	0.17
Control Delay	4.5	5.2	10.0	8.6	44.8	44.1	42.8	0.4
Queue Delay	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
Total Delay	4.5	5.2	10.0	8.6	44.8	44.1	42.8	0.4
Queue Length 50th (m)	3.4	7.6	0.1	14.2	1.2	1.2	17.2	0.0
Queue Length 95th (m)	10.2	16.6	1.4	28.4	5.4	4.1	29.3	0.0
Internal Link Dist (m)		689.8		209.6		564.3		579.6
Turn Bay Length (m)	100.0		85.0		105.0		145.0	
Base Capacity (vph)	670	2455	347	2157	351	1028	217	1407
Starvation Cap Reductn	0	0	0	0	0	0	0	0
Spillback Cap Reductn	0	0	0	0	0	0	0	0
Storage Cap Reductn	0	0	0	0	0	0	0	0
Reduced v/c Ratio	0.13	0.12	0.01	0.18	0.02	0.01	0.38	0.10

Intersection Summary

Cycle Length: 110
Actuated Cycle Length: 110
Offset: 48 (44%), Referenced to phase 2:EBTL and 6:WBTL, Start of Green
Natural Cycle: 100
Control Type: Actuated-Coordinated

Splits and Phases: 1: Coleraine Dr & Mayfield Rd

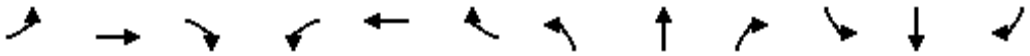




Movement	EBL	EBT	EBR	WBL	WBT	WBR	NBL	NBT	NBR	SBL	SBT	SBR
Lane Configurations												
Traffic Volume (vph)	88	298	1	2	332	51	6	11	0	83	0	141
Future Volume (vph)	88	298	1	2	332	51	6	11	0	83	0	141
Ideal Flow (vphpl)	1900	1900	1900	1900	1900	1900	1900	1900	1900	1900	1900	1900
Lane Width	3.5	3.7	3.5	3.5	3.7	3.5	3.5	3.7	3.5	3.5	3.7	3.5
Total Lost time (s)	3.0	7.0		7.0	7.0		7.0	7.0		3.0	7.0	
Lane Util. Factor	1.00	0.95		1.00	0.95		1.00	0.95		1.00	0.95	
Frt	1.00	1.00		1.00	0.98		1.00	1.00		1.00	0.85	
Flt Protected	0.95	1.00		0.95	1.00		0.95	1.00		0.95	1.00	
Satd. Flow (prot)	1539	3379		892	3308		1785	3650		1513	2983	
Flt Permitted	0.50	1.00		0.57	1.00		0.66	1.00		0.53	1.00	
Satd. Flow (perm)	814	3379		535	3308		1245	3650		843	2983	
Peak-hour factor, PHF	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00
Adj. Flow (vph)	88	298	1	2	332	51	6	11	0	83	0	141
RTOR Reduction (vph)	0	0	0	0	7	0	0	0	0	0	116	0
Lane Group Flow (vph)	88	299	0	2	376	0	6	11	0	83	25	0
Heavy Vehicles (%)	16%	8%	0%	100%	4%	35%	0%	0%	0%	18%	0%	4%
Turn Type	pm+pt	NA		Perm	NA		Perm	NA		pm+pt	NA	
Protected Phases	5	2			6			4		3	8	
Permitted Phases	2			6			4			8		
Actuated Green, G (s)	76.6	76.6		67.5	67.5		7.2	7.2		19.4	19.4	
Effective Green, g (s)	76.6	76.6		67.5	67.5		7.2	7.2		19.4	19.4	
Actuated g/C Ratio	0.70	0.70		0.61	0.61		0.07	0.07		0.18	0.18	
Clearance Time (s)	3.0	7.0		7.0	7.0		7.0	7.0		3.0	7.0	
Vehicle Extension (s)	3.0	3.0		3.0	3.0		3.0	3.0		3.0	3.0	
Lane Grp Cap (vph)	607	2353		328	2029		81	238		204	526	
v/s Ratio Prot	c0.01	0.09			c0.11			0.00		c0.03	0.01	
v/s Ratio Perm	0.09			0.00			0.00			c0.04		
v/c Ratio	0.14	0.13		0.01	0.19		0.07	0.05		0.41	0.05	
Uniform Delay, d1	5.4	5.6		8.2	9.3		48.3	48.2		39.5	37.6	
Progression Factor	1.00	1.00		1.00	1.00		1.00	1.00		1.00	1.00	
Incremental Delay, d2	0.1	0.1		0.0	0.2		0.4	0.1		1.3	0.0	
Delay (s)	5.5	5.7		8.3	9.5		48.7	48.3		40.8	37.7	
Level of Service	A	A		A	A		D	D		D	D	
Approach Delay (s)		5.6			9.5			48.4			38.8	
Approach LOS		A			A			D			D	

Intersection Summary			
HCM 2000 Control Delay	15.2	HCM 2000 Level of Service	B
HCM 2000 Volume to Capacity ratio	0.24		
Actuated Cycle Length (s)	110.0	Sum of lost time (s)	20.0
Intersection Capacity Utilization	48.8%	ICU Level of Service	A
Analysis Period (min)	15		

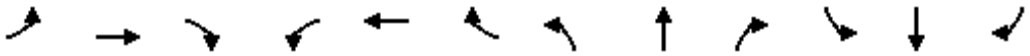
c Critical Lane Group



Movement	EBL	EBT	EBR	WBL	WBT	WBR	NBL	NBT	NBR	SBL	SBT	SBR
Lane Configurations												
Traffic Volume (veh/h)	1	3	1	15	1	74	1	134	3	38	187	2
Future Volume (Veh/h)	1	3	1	15	1	74	1	134	3	38	187	2
Sign Control		Stop			Stop			Free			Free	
Grade		0%			0%			0%			0%	
Peak Hour Factor	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00
Hourly flow rate (vph)	1	3	1	15	1	74	1	134	3	38	187	2
Pedestrians												
Lane Width (m)												
Walking Speed (m/s)												
Percent Blockage												
Right turn flare (veh)												
Median type								TWLTL			None	
Median storage veh)								2				
Upstream signal (m)												
pX, platoon unblocked												
vC, conflicting volume	408	403	94	310	402	68	189			137		
vC1, stage 1 conf vol	264	264		138	138							
vC2, stage 2 conf vol	144	139		172	265							
vCu, unblocked vol	408	403	94	310	402	68	189			137		
tC, single (s)	7.5	6.5	6.9	7.6	8.5	7.2	4.1			4.5		
tC, 2 stage (s)	6.5	5.5		6.6	7.5							
tF (s)	3.5	4.0	3.3	3.6	5.0	3.4	2.2			2.4		
p0 queue free %	100	100	100	98	100	92	100			97		
cM capacity (veh/h)	625	626	950	711	449	943	1397			1316		

Direction, Lane #	EB 1	EB 2	WB 1	WB 2	NB 1	NB 2	NB 3	SB 1	SB 2	SB 3
Volume Total	1	4	15	75	1	89	48	38	125	64
Volume Left	1	0	15	0	1	0	0	38	0	0
Volume Right	0	1	0	74	0	0	3	0	0	2
cSH	625	685	711	929	1397	1700	1700	1316	1700	1700
Volume to Capacity	0.00	0.01	0.02	0.08	0.00	0.05	0.03	0.03	0.07	0.04
Queue Length 95th (m)	0.0	0.1	0.5	2.1	0.0	0.0	0.0	0.7	0.0	0.0
Control Delay (s)	10.8	10.3	10.2	9.2	7.6	0.0	0.0	7.8	0.0	0.0
Lane LOS	B	B	B	A	A			A		
Approach Delay (s)	10.4		9.4		0.1			1.3		
Approach LOS	B		A							

Intersection Summary				
Average Delay	2.6			
Intersection Capacity Utilization	26.1%	ICU Level of Service		A
Analysis Period (min)	15			



Movement	EBL	EBT	EBR	WBL	WBT	WBR	NBL	NBT	NBR	SBL	SBT	SBR
Lane Configurations												
Traffic Volume (veh/h)	0	27	17	6	34	3	50	1	12	4	2	5
Future Volume (Veh/h)	0	27	17	6	34	3	50	1	12	4	2	5
Sign Control		Free			Free			Stop			Stop	
Grade		0%			0%			0%			0%	
Peak Hour Factor	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00
Hourly flow rate (vph)	0	27	17	6	34	3	50	1	12	4	2	5
Pedestrians												
Lane Width (m)												
Walking Speed (m/s)												
Percent Blockage												
Right turn flare (veh)												
Median type		None			None							
Median storage veh)												
Upstream signal (m)												
pX, platoon unblocked												
vC, conflicting volume	37			44			89	84	36	96	92	36
vC1, stage 1 conf vol												
vC2, stage 2 conf vol												
vCu, unblocked vol	37			44			89	84	36	96	92	36
tC, single (s)	4.1			4.3			7.2	6.5	6.4	7.1	7.0	6.2
tC, 2 stage (s)												
tF (s)	2.2			2.4			3.6	4.0	3.5	3.5	4.5	3.3
p0 queue free %	100			100			94	100	99	100	100	100
cM capacity (veh/h)	1587			1473			864	806	996	878	713	1043

Direction, Lane #	EB 1	WB 1	NB 1	SB 1
Volume Total	44	43	63	11
Volume Left	0	6	50	4
Volume Right	17	3	12	5
cSH	1587	1473	885	905
Volume to Capacity	0.00	0.00	0.07	0.01
Queue Length 95th (m)	0.0	0.1	1.8	0.3
Control Delay (s)	0.0	1.1	9.4	9.0
Lane LOS		A	A	A
Approach Delay (s)	0.0	1.1	9.4	9.0
Approach LOS			A	A

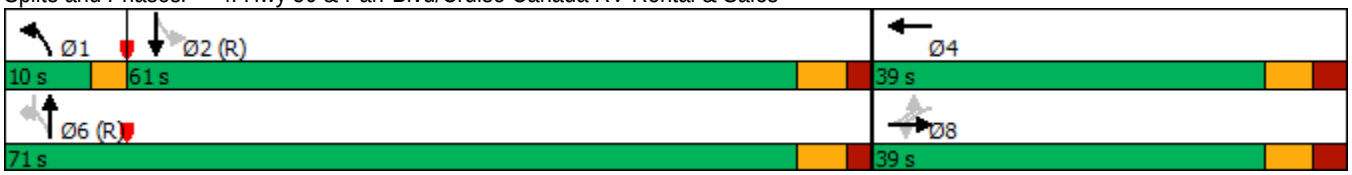
Intersection Summary				
Average Delay	4.6			
Intersection Capacity Utilization	20.8%	ICU Level of Service	A	
Analysis Period (min)	15			

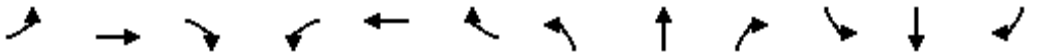
Lane Group	EBL	EBT	WBL	WBT	NBL	NBT	SBL	SBT	SBR
Lane Configurations									
Traffic Volume (vph)	26	0	4	2	35	991	6	975	21
Future Volume (vph)	26	0	4	2	35	991	6	975	21
Lane Group Flow (vph)	26	41	0	8	35	991	6	975	21
Turn Type	Perm	NA	D.Pm	NA	pm+pt	NA	Perm	NA	custom
Protected Phases		8		4	1	6		2	
Permitted Phases	8		8		6		2		6
Detector Phase	8	8	8	4	1	6	2	2	6
Switch Phase									
Minimum Initial (s)	8.0	8.0	8.0	8.0	5.0	12.0	12.0	12.0	12.0
Minimum Split (s)	33.9	33.9	33.9	33.9	9.5	30.1	30.1	30.1	30.1
Total Split (s)	39.0	39.0	39.0	39.0	10.0	71.0	61.0	61.0	71.0
Total Split (%)	35.5%	35.5%	35.5%	35.5%	9.1%	64.5%	55.5%	55.5%	64.5%
Yellow Time (s)	4.0	4.0	4.0	4.0	3.0	4.0	4.0	4.0	4.0
All-Red Time (s)	2.9	2.9	2.9	2.9	0.0	2.1	2.1	2.1	2.1
Lost Time Adjust (s)	0.0	0.0		0.0	0.0	0.0	0.0	0.0	0.0
Total Lost Time (s)	6.9	6.9		6.9	3.0	6.1	6.1	6.1	6.1
Lead/Lag					Lead		Lag	Lag	
Lead-Lag Optimize?									
Recall Mode	None	None	None	None	None	C-Max	C-Max	C-Max	C-Max
v/c Ratio	0.25	0.14		0.10	0.08	0.34	0.02	0.35	0.02
Control Delay	53.4	1.0		43.9	2.1	3.0	5.0	5.1	0.4
Queue Delay	0.0	0.0		0.0	0.0	0.0	0.0	0.0	0.0
Total Delay	53.4	1.0		43.9	2.1	3.0	5.0	5.1	0.4
Queue Length 50th (m)	5.7	0.0		1.3	0.9	24.4	0.3	37.4	0.0
Queue Length 95th (m)	14.7	0.0		6.4	2.8	35.6	1.7	53.2	0.8
Internal Link Dist (m)		828.8		20.9		732.4		332.3	
Turn Bay Length (m)	80.0				35.0		25.0		20.0
Base Capacity (vph)	395	563		296	462	2925	286	2805	1257
Starvation Cap Reductn	0	0		0	0	0	0	0	0
Spillback Cap Reductn	0	0		0	0	0	0	0	0
Storage Cap Reductn	0	0		0	0	0	0	0	0
Reduced v/c Ratio	0.07	0.07		0.03	0.08	0.34	0.02	0.35	0.02

Intersection Summary

Cycle Length: 110
Actuated Cycle Length: 110
Offset: 105 (95%), Referenced to phase 2:SBTL and 6:NBTL, Start of Green
Natural Cycle: 75
Control Type: Actuated-Coordinated

Splits and Phases: 4: Hwy 50 & Parr Blvd/Cruise Canada RV Rental & Sales





Movement	EBL	EBT	EBR	WBL	WBT	WBR	NBL	NBT	NBR	SBL	SBT	SBR
Lane Configurations												
Traffic Volume (vph)	26	0	41	4	2	2	35	991	0	6	975	21
Future Volume (vph)	26	0	41	4	2	2	35	991	0	6	975	21
Ideal Flow (vphpl)	1900	1900	1900	1900	1900	1900	1900	1900	1900	1900	1900	1900
Lane Width	3.5	3.7	3.5	3.5	3.7	3.5	3.5	3.7	3.5	3.5	3.7	3.5
Total Lost time (s)	6.9	6.9			6.9		3.0	6.1		6.1	6.1	6.1
Lane Util. Factor	1.00	1.00			1.00		1.00	0.95		1.00	0.95	1.00
Frpb, ped/bikes	1.00	1.00			1.00		1.00	1.00		1.00	1.00	0.98
Flpb, ped/bikes	1.00	1.00			1.00		1.00	1.00		1.00	1.00	1.00
Frt	1.00	0.85			0.97		1.00	1.00		1.00	1.00	0.85
Flt Protected	0.95	1.00			0.98		0.95	1.00		0.95	1.00	1.00
Satd. Flow (prot)	1714	1458			1203		1608	3476		1189	3544	1487
Flt Permitted	0.75	1.00			0.82		0.27	1.00		0.29	1.00	1.00
Satd. Flow (perm)	1358	1458			1012		454	3476		362	3544	1487
Peak-hour factor, PHF	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00
Adj. Flow (vph)	26	0	41	4	2	2	35	991	0	6	975	21
RTOR Reduction (vph)	0	38	0	0	2	0	0	0	0	0	0	4
Lane Group Flow (vph)	26	3	0	0	6	0	35	991	0	6	975	17
Confl. Peds. (#/hr)	1					1	1		1	1		1
Heavy Vehicles (%)	4%	0%	12%	25%	100%	50%	11%	5%	0%	50%	3%	5%
Turn Type	Perm	NA		D.Pm	NA		pm+pt	NA		Perm	NA	custom
Protected Phases		8			4		1	6			2	
Permitted Phases	8			8			6			2		6
Actuated Green, G (s)	7.0	7.0			7.0		90.0	90.0		83.3	83.3	90.0
Effective Green, g (s)	7.0	7.0			7.0		90.0	90.0		83.3	83.3	90.0
Actuated g/C Ratio	0.06	0.06			0.06		0.82	0.82		0.76	0.76	0.82
Clearance Time (s)	6.9	6.9			6.9		3.0	6.1		6.1	6.1	6.1
Vehicle Extension (s)	3.0	3.0			3.0		3.0	3.0		3.0	3.0	3.0
Lane Grp Cap (vph)	86	92			64		410	2844		274	2683	1216
v/s Ratio Prot		0.00					0.00	c0.29			c0.28	
v/s Ratio Perm	c0.02				0.01		0.07			0.02		0.01
v/c Ratio	0.30	0.03			0.10		0.09	0.35		0.02	0.36	0.01
Uniform Delay, d1	49.2	48.3			48.5		2.1	2.5		3.3	4.5	1.8
Progression Factor	1.01	1.00			1.00		1.00	1.00		1.00	1.00	1.00
Incremental Delay, d2	2.0	0.1			0.7		0.1	0.3		0.1	0.4	0.0
Delay (s)	51.4	48.4			49.2		2.2	2.9		3.4	4.9	1.9
Level of Service	D	D			D		A	A		A	A	A
Approach Delay (s)		49.6			49.2			2.9			4.8	
Approach LOS		D			D			A			A	

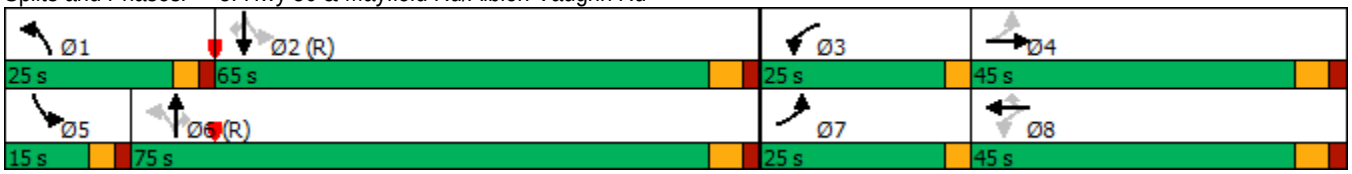
Intersection Summary			
HCM 2000 Control Delay	5.4	HCM 2000 Level of Service	A
HCM 2000 Volume to Capacity ratio	0.36		
Actuated Cycle Length (s)	110.0	Sum of lost time (s)	16.0
Intersection Capacity Utilization	47.1%	ICU Level of Service	A
Analysis Period (min)	15		
c Critical Lane Group			

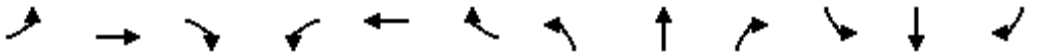
Lane Group	EBL	EBT	WBL	WBT	WBR	NBL	NBT	NBR	SBL	SBT	SBR
Lane Configurations											
Traffic Volume (vph)	90	125	232	129	10	111	887	231	14	902	97
Future Volume (vph)	90	125	232	129	10	111	887	231	14	902	97
Lane Group Flow (vph)	90	286	232	129	10	111	887	231	14	902	97
Turn Type	pm+pt	NA	pm+pt	NA	Perm	pm+pt	NA	Perm	pm+pt	NA	Perm
Protected Phases	7	4	3	8		1	6		5	2	
Permitted Phases	4		8		8	6		6	2		2
Detector Phase	7	4	3	8	8	1	6	6	5	2	2
Switch Phase											
Minimum Initial (s)	5.0	12.0	10.0	12.0	12.0	10.0	20.0	20.0	10.0	20.0	20.0
Minimum Split (s)	9.5	43.5	14.5	43.5	43.5	15.0	41.3	41.3	15.0	41.3	41.3
Total Split (s)	25.0	45.0	25.0	45.0	45.0	25.0	75.0	75.0	15.0	65.0	65.0
Total Split (%)	15.6%	28.1%	15.6%	28.1%	28.1%	15.6%	46.9%	46.9%	9.4%	40.6%	40.6%
Yellow Time (s)	3.0	4.0	3.0	4.0	4.0	3.0	4.2	4.2	3.0	4.2	4.2
All-Red Time (s)	0.0	2.5	0.0	2.5	2.5	2.0	2.1	2.1	2.0	2.1	2.1
Lost Time Adjust (s)	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
Total Lost Time (s)	3.0	6.5	3.0	6.5	6.5	5.0	6.3	6.3	5.0	6.3	6.3
Lead/Lag	Lead	Lag	Lead	Lag	Lag	Lead	Lag	Lag	Lead	Lag	Lag
Lead-Lag Optimize?											
Recall Mode	None	None	None	None	None	None	C-Max	C-Max	None	C-Max	C-Max
v/c Ratio	0.34	0.71	0.84	0.51	0.04	0.32	0.40	0.22	0.03	0.44	0.10
Control Delay	49.4	40.5	76.9	71.0	0.3	11.3	15.5	2.5	9.1	19.9	2.1
Queue Delay	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
Total Delay	49.4	40.5	76.9	71.0	0.3	11.3	15.5	2.5	9.1	19.9	2.1
Queue Length 50th (m)	23.8	21.6	67.6	40.7	0.0	11.4	61.7	0.4	1.4	84.2	0.0
Queue Length 95th (m)	38.5	37.7	#99.6	63.5	0.0	21.4	108.3	13.6	4.4	114.9	7.0
Internal Link Dist (m)		330.4		656.8			717.1			732.4	
Turn Bay Length (m)	60.0		50.0		50.0	100.0		85.0	35.0		120.0
Base Capacity (vph)	373	829	283	420	380	419	2244	1050	409	2054	971
Starvation Cap Reductn	0	0	0	0	0	0	0	0	0	0	0
Spillback Cap Reductn	0	0	0	0	0	0	0	0	0	0	0
Storage Cap Reductn	0	0	0	0	0	0	0	0	0	0	0
Reduced v/c Ratio	0.24	0.34	0.82	0.31	0.03	0.26	0.40	0.22	0.03	0.44	0.10

Intersection Summary

Cycle Length: 160
Actuated Cycle Length: 160
Offset: 7 (4%), Referenced to phase 2:SBTL and 6:NBTL, Start of Green
Natural Cycle: 115
Control Type: Actuated-Coordinated
95th percentile volume exceeds capacity, queue may be longer.
Queue shown is maximum after two cycles.

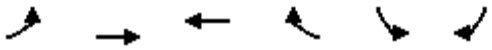
Splits and Phases: 5: Hwy 50 & Mayfield Rd/Albion Vaughn Rd





Movement	EBL	EBT	EBR	WBL	WBT	WBR	NBL	NBT	NBR	SBL	SBT	SBR
Lane Configurations												
Traffic Volume (vph)	90	125	161	232	129	10	111	887	231	14	902	97
Future Volume (vph)	90	125	161	232	129	10	111	887	231	14	902	97
Ideal Flow (vphpl)	1900	1900	1900	1900	1900	1900	1900	1900	1900	1900	1900	1900
Lane Width	3.5	3.7	3.5	3.5	3.7	3.5	3.5	3.7	3.5	3.5	3.7	3.5
Total Lost time (s)	3.0	6.5		3.0	6.5	6.5	5.0	6.3	6.3	5.0	6.3	6.3
Lane Util. Factor	1.00	0.95		1.00	1.00	1.00	1.00	0.95	1.00	1.00	0.95	1.00
Frpb, ped/bikes	1.00	1.00		1.00	1.00	1.00	1.00	1.00	0.99	1.00	1.00	1.00
Flpb, ped/bikes	1.00	1.00		1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00
Frt	1.00	0.92		1.00	1.00	0.85	1.00	1.00	0.85	1.00	1.00	0.85
Flt Protected	0.95	1.00		0.95	1.00	1.00	0.95	1.00	1.00	0.95	1.00	1.00
Satd. Flow (prot)	1750	2938		1684	1746	1229	1552	3476	1502	1668	3510	1581
Flt Permitted	0.67	1.00		0.24	1.00	1.00	0.24	1.00	1.00	0.29	1.00	1.00
Satd. Flow (perm)	1242	2938		431	1746	1229	399	3476	1502	515	3510	1581
Peak-hour factor, PHF	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00
Adj. Flow (vph)	90	125	161	232	129	10	111	887	231	14	902	97
RTOR Reduction (vph)	0	147	0	0	0	9	0	0	85	0	0	40
Lane Group Flow (vph)	90	139	0	232	129	1	111	887	146	14	902	57
Confl. Bikes (#/hr)									1			
Heavy Vehicles (%)	2%	7%	19%	6%	10%	30%	15%	5%	5%	7%	4%	1%
Turn Type	pm+pt	NA		pm+pt	NA	Perm	pm+pt	NA	Perm	pm+pt	NA	Perm
Protected Phases	7	4		3	8		1	6		5	2	
Permitted Phases	4			8		8	6		6	2		2
Actuated Green, G (s)	25.9	14.0		37.9	23.0	23.0	109.3	100.3	100.3	97.7	93.7	93.7
Effective Green, g (s)	25.9	14.0		37.9	23.0	23.0	109.3	100.3	100.3	97.7	93.7	93.7
Actuated g/C Ratio	0.16	0.09		0.24	0.14	0.14	0.68	0.63	0.63	0.61	0.59	0.59
Clearance Time (s)	3.0	6.5		3.0	6.5	6.5	5.0	6.3	6.3	5.0	6.3	6.3
Vehicle Extension (s)	3.0	3.0		3.0	3.0	3.0	3.0	3.0	3.0	3.0	3.0	3.0
Lane Grp Cap (vph)	238	257		265	250	176	348	2179	941	343	2055	925
v/s Ratio Prot	0.03	0.05		c0.11	0.07		c0.02	c0.26		0.00	c0.26	
v/s Ratio Perm	0.03			c0.09		0.00	0.20		0.10	0.02		0.04
v/c Ratio	0.38	0.54		0.88	0.52	0.01	0.32	0.41	0.16	0.04	0.44	0.06
Uniform Delay, d1	59.2	69.9		54.4	63.4	58.7	10.7	15.0	12.3	12.4	18.5	14.2
Progression Factor	1.00	1.00		1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00
Incremental Delay, d2	1.0	2.3		25.9	1.8	0.0	0.5	0.6	0.4	0.0	0.7	0.1
Delay (s)	60.3	72.2		80.3	65.1	58.7	11.2	15.5	12.7	12.5	19.2	14.4
Level of Service	E	E		F	E	E	B	B	B	B	B	B
Approach Delay (s)		69.4			74.4			14.6			18.6	
Approach LOS		E			E			B			B	

Intersection Summary			
HCM 2000 Control Delay	30.3	HCM 2000 Level of Service	C
HCM 2000 Volume to Capacity ratio	0.56		
Actuated Cycle Length (s)	160.0	Sum of lost time (s)	20.8
Intersection Capacity Utilization	74.3%	ICU Level of Service	D
Analysis Period (min)	15		
c Critical Lane Group			



Movement	EBL	EBT	WBT	WBR	SBL	SBR
Lane Configurations						
Traffic Volume (veh/h)	20	363	341	21	30	47
Future Volume (Veh/h)	20	363	341	21	30	47
Sign Control		Free	Free		Stop	
Grade		0%	0%		0%	
Peak Hour Factor	1.00	1.00	1.00	1.00	1.00	1.00
Hourly flow rate (vph)	20	363	341	21	30	47
Pedestrians						
Lane Width (m)						
Walking Speed (m/s)						
Percent Blockage						
Right turn flare (veh)						
Median type		None	None			
Median storage veh)						
Upstream signal (m)		233				
pX, platoon unblocked					1.00	
vC, conflicting volume	362				573	181
vC1, stage 1 conf vol						
vC2, stage 2 conf vol						
vCu, unblocked vol	362				570	181
tC, single (s)	4.5				7.0	7.1
tC, 2 stage (s)						
tF (s)	2.4				3.6	3.4
p0 queue free %	98				93	94
cM capacity (veh/h)	1074				425	809

Direction, Lane #	EB 1	EB 2	EB 3	WB 1	WB 2	SB 1	SB 2
Volume Total	20	182	182	227	135	30	47
Volume Left	20	0	0	0	0	30	0
Volume Right	0	0	0	0	21	0	47
cSH	1074	1700	1700	1700	1700	425	809
Volume to Capacity	0.02	0.11	0.11	0.13	0.08	0.07	0.06
Queue Length 95th (m)	0.5	0.0	0.0	0.0	0.0	1.8	1.5
Control Delay (s)	8.4	0.0	0.0	0.0	0.0	14.1	9.7
Lane LOS	A					B	A
Approach Delay (s)	0.4			0.0		11.4	
Approach LOS						B	

Intersection Summary			
Average Delay	1.3		
Intersection Capacity Utilization	26.6%	ICU Level of Service	A
Analysis Period (min)	15		

Movement	WBL	WBR	NBT	NBR	SBL	SBT
Lane Configurations						
Traffic Volume (veh/h)	0	0	152	0	0	226
Future Volume (Veh/h)	0	0	152	0	0	226
Sign Control	Stop		Free			Free
Grade	0%		0%			0%
Peak Hour Factor	1.00	1.00	1.00	1.00	1.00	1.00
Hourly flow rate (vph)	0	0	152	0	0	226
Pedestrians						
Lane Width (m)						
Walking Speed (m/s)						
Percent Blockage						
Right turn flare (veh)						
Median type			TWLTL			TWLTL
Median storage veh)			2			2
Upstream signal (m)						
pX, platoon unblocked						
vC, conflicting volume	265	76			152	
vC1, stage 1 conf vol	152					
vC2, stage 2 conf vol	113					
vCu, unblocked vol	265	76			152	
tC, single (s)	6.8	6.9			4.1	
tC, 2 stage (s)	5.8					
tF (s)	3.5	3.3			2.2	
p0 queue free %	100	100			100	
cM capacity (veh/h)	805	976			1441	

Direction, Lane #	WB 1	NB 1	NB 2	SB 1	SB 2
Volume Total	0	101	51	75	151
Volume Left	0	0	0	0	0
Volume Right	0	0	0	0	0
cSH	1700	1700	1700	1441	1700
Volume to Capacity	0.00	0.06	0.03	0.00	0.09
Queue Length 95th (m)	0.0	0.0	0.0	0.0	0.0
Control Delay (s)	0.0	0.0	0.0	0.0	0.0
Lane LOS	A				
Approach Delay (s)	0.0	0.0		0.0	
Approach LOS	A				

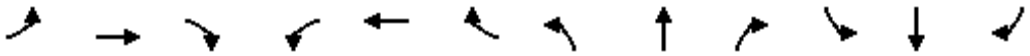
Intersection Summary			
Average Delay	0.0		
Intersection Capacity Utilization	9.6%	ICU Level of Service	A
Analysis Period (min)	15		

Lane Group	EBL	EBT	WBL	WBT	NBL	NBT	SBL	SBT
Lane Configurations								
Traffic Volume (vph)	347	382	39	371	23	310	61	354
Future Volume (vph)	347	382	39	371	23	310	61	354
Lane Group Flow (vph)	347	414	39	410	23	341	61	591
Turn Type	pm+pt	NA	Perm	NA	Perm	NA	pm+pt	NA
Protected Phases	5	2		6		4	3	8
Permitted Phases	2		6		4		8	
Detector Phase	5	2	6	6	4	4	3	8
Switch Phase								
Minimum Initial (s)	5.0	12.0	12.0	12.0	12.0	12.0	5.0	12.0
Minimum Split (s)	9.5	37.0	37.0	37.0	37.0	37.0	12.5	37.0
Total Split (s)	15.0	80.0	65.0	65.0	32.0	32.0	18.0	50.0
Total Split (%)	11.5%	61.5%	50.0%	50.0%	24.6%	24.6%	13.8%	38.5%
Yellow Time (s)	3.0	4.6	4.6	4.6	4.2	4.2	3.0	4.2
All-Red Time (s)	0.0	2.4	2.4	2.4	2.8	2.8	0.0	2.8
Lost Time Adjust (s)	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
Total Lost Time (s)	3.0	7.0	7.0	7.0	7.0	7.0	3.0	7.0
Lead/Lag	Lead		Lag	Lag	Lag	Lag	Lead	
Lead-Lag Optimize?								
Recall Mode	None	C-Max	C-Max	C-Max	None	None	None	None
v/c Ratio	0.51	0.20	0.09	0.25	0.21	0.68	0.40	0.69
Control Delay	12.4	10.0	20.4	19.1	53.4	58.6	41.7	38.0
Queue Delay	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
Total Delay	12.4	10.0	20.4	19.1	53.4	58.6	41.7	38.0
Queue Length 50th (m)	35.2	21.8	5.4	32.0	5.6	45.9	12.7	59.2
Queue Length 95th (m)	61.7	35.4	13.7	47.9	14.5	60.6	23.1	73.2
Internal Link Dist (m)		689.8		209.6		684.9		579.6
Turn Bay Length (m)	100.0		85.0		105.0		145.0	
Base Capacity (vph)	682	2033	438	1614	143	671	174	1137
Starvation Cap Reductn	0	0	0	0	0	0	0	0
Spillback Cap Reductn	0	0	0	0	0	0	0	0
Storage Cap Reductn	0	0	0	0	0	0	0	0
Reduced v/c Ratio	0.51	0.20	0.09	0.25	0.16	0.51	0.35	0.52

Intersection Summary

Cycle Length: 130
Actuated Cycle Length: 130
Offset: 92 (71%), Referenced to phase 2:EBTL and 6:WBTL, Start of Green
Natural Cycle: 100
Control Type: Actuated-Coordinated

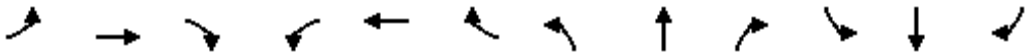
Splits and Phases: 1: Coleraine Dr & Mayfield Rd



Movement	EBL	EBT	EBR	WBL	WBT	WBR	NBL	NBT	NBR	SBL	SBT	SBR
Lane Configurations												
Traffic Volume (vph)	347	382	32	39	371	39	23	310	31	61	354	237
Future Volume (vph)	347	382	32	39	371	39	23	310	31	61	354	237
Ideal Flow (vphpl)	1900	1900	1900	1900	1900	1900	1900	1900	1900	1900	1900	1900
Lane Width	3.5	3.7	3.5	3.5	3.7	3.5	3.5	3.7	3.5	3.5	3.7	3.5
Total Lost time (s)	3.0	7.0		7.0	7.0		7.0	7.0		3.0	7.0	
Lane Util. Factor	1.00	0.95		1.00	0.95		1.00	0.95		1.00	0.95	
Frt	1.00	0.99		1.00	0.99		1.00	0.99		1.00	0.94	
Flt Protected	0.95	1.00		0.95	1.00		0.95	1.00		0.95	1.00	
Satd. Flow (prot)	1700	3106		1580	3102		1716	3465		1026	3170	
Flt Permitted	0.48	1.00		0.51	1.00		0.41	1.00		0.34	1.00	
Satd. Flow (perm)	854	3106		847	3102		749	3465		365	3170	
Peak-hour factor, PHF	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00
Adj. Flow (vph)	347	382	32	39	371	39	23	310	31	61	354	237
RTOR Reduction (vph)	0	4	0	0	5	0	0	6	0	0	101	0
Lane Group Flow (vph)	347	410	0	39	405	0	23	335	0	61	490	0
Heavy Vehicles (%)	5%	17%	6%	13%	12%	54%	4%	3%	13%	74%	5%	13%
Turn Type	pm+pt	NA		Perm	NA		Perm	NA		pm+pt	NA	
Protected Phases	5	2			6			4		3	8	
Permitted Phases	2			6			4			8		
Actuated Green, G (s)	84.3	84.3		66.7	66.7		18.8	18.8		31.7	31.7	
Effective Green, g (s)	84.3	84.3		66.7	66.7		18.8	18.8		31.7	31.7	
Actuated g/C Ratio	0.65	0.65		0.51	0.51		0.14	0.14		0.24	0.24	
Clearance Time (s)	3.0	7.0		7.0	7.0		7.0	7.0		3.0	7.0	
Vehicle Extension (s)	3.0	3.0		3.0	3.0		3.0	3.0		3.0	3.0	
Lane Grp Cap (vph)	648	2014		434	1591		108	501		139	772	
v/s Ratio Prot	c0.06	0.13			0.13			0.10		0.03	c0.15	
v/s Ratio Perm	c0.29			0.05			0.03			0.07		
v/c Ratio	0.54	0.20		0.09	0.25		0.21	0.67		0.44	0.64	
Uniform Delay, d1	10.2	9.3		16.2	17.7		49.1	52.7		39.8	44.0	
Progression Factor	1.00	1.00		1.00	1.00		1.00	1.00		1.00	1.00	
Incremental Delay, d2	0.9	0.2		0.4	0.4		1.0	3.4		2.2	1.7	
Delay (s)	11.1	9.5		16.6	18.1		50.1	56.0		42.0	45.7	
Level of Service	B	A		B	B		D	E		D	D	
Approach Delay (s)		10.2			18.0			55.6			45.4	
Approach LOS		B			B			E			D	

Intersection Summary			
HCM 2000 Control Delay	29.5	HCM 2000 Level of Service	C
HCM 2000 Volume to Capacity ratio	0.59		
Actuated Cycle Length (s)	130.0	Sum of lost time (s)	20.0
Intersection Capacity Utilization	78.9%	ICU Level of Service	D
Analysis Period (min)	15		

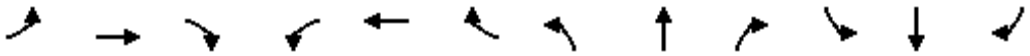
c Critical Lane Group



Movement	EBL	EBT	EBR	WBL	WBT	WBR	NBL	NBT	NBR	SBL	SBT	SBR
Lane Configurations												
Traffic Volume (veh/h)	1	1	1	32	11	135	11	634	51	120	609	5
Future Volume (Veh/h)	1	1	1	32	11	135	11	634	51	120	609	5
Sign Control		Stop			Stop			Free			Free	
Grade		0%			0%			0%			0%	
Peak Hour Factor	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00
Hourly flow rate (vph)	1	1	1	32	11	135	11	634	51	120	609	5
Pedestrians												
Lane Width (m)												
Walking Speed (m/s)												
Percent Blockage												
Right turn flare (veh)												
Median type								TWLTL			None	
Median storage veh)								2				
Upstream signal (m)												
pX, platoon unblocked												
vC, conflicting volume	1331	1558	307	1228	1536	342	614			685		
vC1, stage 1 conf vol	852	852		682	682							
vC2, stage 2 conf vol	480	707		546	854							
vCu, unblocked vol	1331	1558	307	1228	1536	342	614			685		
tC, single (s)	7.5	6.5	6.9	7.9	6.7	7.5	4.6			4.5		
tC, 2 stage (s)	6.5	5.5		6.9	5.7							
tF (s)	3.5	4.0	3.3	3.7	4.1	3.6	2.5			2.4		
p0 queue free %	100	100	100	88	96	77	99			85		
cM capacity (veh/h)	205	238	695	271	249	579	809			799		

Direction, Lane #	EB 1	EB 2	WB 1	WB 2	NB 1	NB 2	NB 3	SB 1	SB 2	SB 3
Volume Total	1	2	32	146	11	423	262	120	406	208
Volume Left	1	0	32	0	11	0	0	120	0	0
Volume Right	0	1	0	135	0	0	51	0	0	5
cSH	205	355	271	526	809	1700	1700	799	1700	1700
Volume to Capacity	0.00	0.01	0.12	0.28	0.01	0.25	0.15	0.15	0.24	0.12
Queue Length 95th (m)	0.1	0.1	3.2	9.0	0.3	0.0	0.0	4.2	0.0	0.0
Control Delay (s)	22.7	15.2	20.0	14.4	9.5	0.0	0.0	10.3	0.0	0.0
Lane LOS	C	C	C	B	A			B		
Approach Delay (s)	17.7		15.5		0.2			1.7		
Approach LOS	C		C							

Intersection Summary				
Average Delay	2.6			
Intersection Capacity Utilization	44.7%	ICU Level of Service		A
Analysis Period (min)	15			



Movement	EBL	EBT	EBR	WBL	WBT	WBR	NBL	NBT	NBR	SBL	SBT	SBR
Lane Configurations												
Traffic Volume (veh/h)	3	117	49	17	143	12	21	4	6	7	3	14
Future Volume (Veh/h)	3	117	49	17	143	12	21	4	6	7	3	14
Sign Control		Free			Free			Stop			Stop	
Grade		0%			0%			0%			0%	
Peak Hour Factor	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00
Hourly flow rate (vph)	3	117	49	17	143	12	21	4	6	7	3	14
Pedestrians											1	
Lane Width (m)											3.7	
Walking Speed (m/s)											1.2	
Percent Blockage											0	
Right turn flare (veh)												
Median type		None			None							
Median storage veh)												
Upstream signal (m)												
pX, platoon unblocked												
vC, conflicting volume	156			166			346	338	142	340	356	150
vC1, stage 1 conf vol												
vC2, stage 2 conf vol												
vCu, unblocked vol	156			166			346	338	142	340	356	150
tC, single (s)	4.1			4.1			7.3	6.8	6.5	7.5	6.8	6.6
tC, 2 stage (s)												
tF (s)	2.2			2.2			3.7	4.2	3.6	3.9	4.3	3.6
p0 queue free %	100			99			96	99	99	99	99	98
cM capacity (veh/h)	1435			1424			550	540	830	530	516	814

Direction, Lane #	EB 1	WB 1	NB 1	SB 1
Volume Total	169	172	31	24
Volume Left	3	17	21	7
Volume Right	49	12	6	14
cSH	1435	1424	587	663
Volume to Capacity	0.00	0.01	0.05	0.04
Queue Length 95th (m)	0.1	0.3	1.3	0.9
Control Delay (s)	0.2	0.8	11.5	10.6
Lane LOS	A	A	B	B
Approach Delay (s)	0.2	0.8	11.5	10.6
Approach LOS			B	B

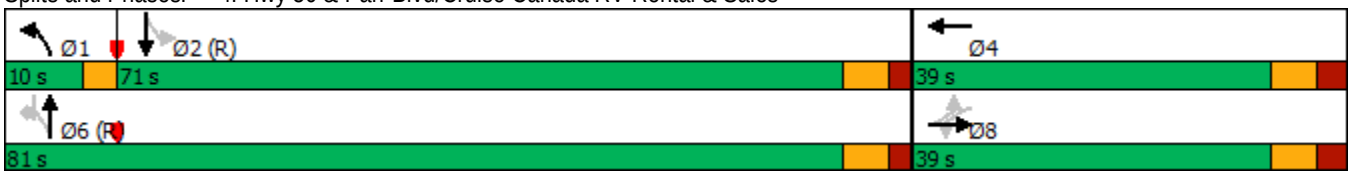
Intersection Summary				
Average Delay	2.0			
Intersection Capacity Utilization	28.2%	ICU Level of Service	A	
Analysis Period (min)	15			

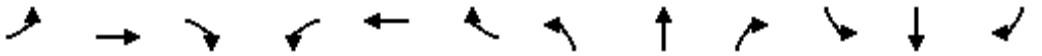
Lane Group	EBL	EBT	WBL	WBT	NBL	NBT	SBT	SBR
Lane Configurations								
Traffic Volume (vph)	29	0	1	0	199	1100	1219	49
Future Volume (vph)	29	0	1	0	199	1100	1219	49
Lane Group Flow (vph)	29	102	0	1	199	1102	1219	49
Turn Type	Perm	NA	D.Pm	NA	pm+pt	NA	NA	custom
Protected Phases		8		4	1	6	2	
Permitted Phases	8		8		6			6
Detector Phase	8	8	8	4	1	6	2	6
Switch Phase								
Minimum Initial (s)	8.0	8.0	8.0	8.0	5.0	12.0	12.0	12.0
Minimum Split (s)	33.9	33.9	33.9	33.9	9.5	30.1	30.1	30.1
Total Split (s)	39.0	39.0	39.0	39.0	10.0	81.0	71.0	81.0
Total Split (%)	32.5%	32.5%	32.5%	32.5%	8.3%	67.5%	59.2%	67.5%
Yellow Time (s)	4.0	4.0	4.0	4.0	3.0	4.0	4.0	4.0
All-Red Time (s)	2.9	2.9	2.9	2.9	0.0	2.1	2.1	2.1
Lost Time Adjust (s)	0.0	0.0		0.0	0.0	0.0	0.0	0.0
Total Lost Time (s)	6.9	6.9		6.9	3.0	6.1	6.1	6.1
Lead/Lag					Lead		Lag	
Lead-Lag Optimize?								
Recall Mode	None	None	None	None	None	C-Max	C-Max	C-Max
v/c Ratio	0.29	0.44		0.01	0.53	0.40	0.56	0.04
Control Delay	59.8	7.9		50.0	7.5	3.6	11.4	1.1
Queue Delay	0.0	0.0		0.0	0.0	0.0	0.0	0.0
Total Delay	59.8	7.9		50.0	7.5	3.6	11.4	1.1
Queue Length 50th (m)	7.0	0.0		0.2	6.1	28.7	69.9	0.5
Queue Length 95th (m)	16.9	4.6		2.1	13.1	43.5	108.7	2.8
Internal Link Dist (m)		828.8		20.9		520.2	332.3	
Turn Bay Length (m)	80.0				35.0			20.0
Base Capacity (vph)	355	429		354	376	2735	2172	1232
Starvation Cap Reductn	0	0		0	0	0	0	0
Spillback Cap Reductn	0	0		0	0	0	0	0
Storage Cap Reductn	0	0		0	0	0	0	0
Reduced v/c Ratio	0.08	0.24		0.00	0.53	0.40	0.56	0.04

Intersection Summary

Cycle Length: 120
Actuated Cycle Length: 120
Offset: 8 (7%), Referenced to phase 2:SBTL and 6:NBTL, Start of Green
Natural Cycle: 90
Control Type: Actuated-Coordinated

Splits and Phases: 4: Hwy 50 & Parr Blvd/Cruise Canada RV Rental & Sales





Movement	EBL	EBT	EBR	WBL	WBT	WBR	NBL	NBT	NBR	SBL	SBT	SBR
Lane Configurations												
Traffic Volume (vph)	29	0	102	1	0	0	199	1100	2	0	1219	49
Future Volume (vph)	29	0	102	1	0	0	199	1100	2	0	1219	49
Ideal Flow (vphpl)	1900	1900	1900	1900	1900	1900	1900	1900	1900	1900	1900	1900
Lane Width	3.5	3.7	3.5	3.5	3.7	3.5	3.5	3.7	3.5	3.5	3.7	3.5
Total Lost time (s)	6.9	6.9			6.9		3.0	6.1			6.1	6.1
Lane Util. Factor	1.00	1.00			1.00		1.00	0.95			0.95	1.00
Frpb, ped/bikes	1.00	1.00			1.00		1.00	1.00			1.00	0.98
Flpb, ped/bikes	1.00	1.00			1.00		1.00	1.00			1.00	1.00
Frt	1.00	0.85			1.00		1.00	1.00			1.00	0.85
Flt Protected	0.95	1.00			0.95		0.95	1.00			1.00	1.00
Satd. Flow (prot)	1668	1183			1825		1513	3348			3174	1501
Flt Permitted	0.76	1.00			0.69		0.18	1.00			1.00	1.00
Satd. Flow (perm)	1330	1183			1328		290	3348			3174	1501
Peak-hour factor, PHF	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00
Adj. Flow (vph)	29	0	102	1	0	0	199	1100	2	0	1219	49
RTOR Reduction (vph)	0	94	0	0	0	0	0	0	0	0	0	6
Lane Group Flow (vph)	29	8	0	0	1	0	199	1102	0	0	1219	43
Confl. Peds. (#/hr)							1		2	2		1
Confl. Bikes (#/hr)									1			
Heavy Vehicles (%)	7%	0%	38%	0%	0%	0%	18%	9%	0%	0%	15%	4%
Turn Type	Perm	NA		D.Pm	NA		pm+pt	NA		Perm	NA	custom
Protected Phases		8			4		1	6			2	
Permitted Phases	8			8			6			2		6
Actuated Green, G (s)	9.0	9.0			9.0		98.0	98.0			82.1	98.0
Effective Green, g (s)	9.0	9.0			9.0		98.0	98.0			82.1	98.0
Actuated g/C Ratio	0.08	0.08			0.08		0.82	0.82			0.68	0.82
Clearance Time (s)	6.9	6.9			6.9		3.0	6.1			6.1	6.1
Vehicle Extension (s)	3.0	3.0			3.0		3.0	3.0			3.0	3.0
Lane Grp Cap (vph)	99	88			99		368	2734			2171	1225
v/s Ratio Prot		0.01					c0.06	0.33			c0.38	
v/s Ratio Perm	c0.02				0.00		0.38					0.03
v/c Ratio	0.29	0.09			0.01		0.54	0.40			0.56	0.03
Uniform Delay, d1	52.5	51.7			51.4		5.2	3.0			9.7	2.1
Progression Factor	1.00	1.00			1.00		1.00	1.00			1.00	1.00
Incremental Delay, d2	1.6	0.4			0.0		1.6	0.4			1.1	0.1
Delay (s)	54.1	52.1			51.4		6.9	3.5			10.8	2.1
Level of Service	D	D			D		A	A			B	A
Approach Delay (s)		52.6			51.4			4.0			10.4	
Approach LOS		D			D			A			B	

Intersection Summary			
HCM 2000 Control Delay	9.4	HCM 2000 Level of Service	A
HCM 2000 Volume to Capacity ratio	0.54		
Actuated Cycle Length (s)	120.0	Sum of lost time (s)	16.0
Intersection Capacity Utilization	65.6%	ICU Level of Service	C
Analysis Period (min)	15		

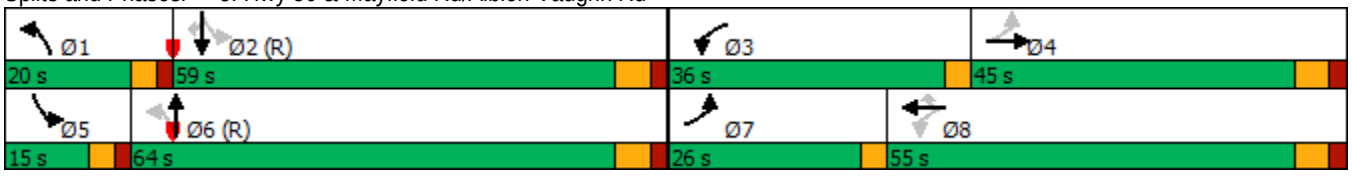
c Critical Lane Group

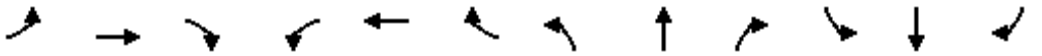
Lane Group	EBL	EBT	WBL	WBT	WBR	NBL	NBT	SBL	SBT	SBR
Lane Configurations										
Traffic Volume (vph)	62	161	370	283	39	147	1127	31	1178	64
Future Volume (vph)	62	161	370	283	39	147	1127	31	1178	64
Lane Group Flow (vph)	62	376	370	283	39	147	1297	31	1178	64
Turn Type	pm+pt	NA	pm+pt	NA	Perm	pm+pt	NA	pm+pt	NA	Perm
Protected Phases	7	4	3	8		1	6	5	2	
Permitted Phases	4		8		8	6		2		2
Detector Phase	7	4	3	8	8	1	6	5	2	2
Switch Phase										
Minimum Initial (s)	5.0	12.0	10.0	12.0	12.0	10.0	20.0	10.0	20.0	20.0
Minimum Split (s)	9.5	43.5	14.5	43.5	43.5	15.0	41.3	15.0	41.3	41.3
Total Split (s)	26.0	45.0	36.0	55.0	55.0	20.0	64.0	15.0	59.0	59.0
Total Split (%)	16.3%	28.1%	22.5%	34.4%	34.4%	12.5%	40.0%	9.4%	36.9%	36.9%
Yellow Time (s)	3.0	4.0	3.0	4.0	4.0	3.0	4.2	3.0	4.2	4.2
All-Red Time (s)	0.0	2.5	0.0	2.5	2.5	2.0	2.1	2.0	2.1	2.1
Lost Time Adjust (s)	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
Total Lost Time (s)	3.0	6.5	3.0	6.5	6.5	5.0	6.3	5.0	6.3	6.3
Lead/Lag	Lead	Lag	Lead	Lag	Lag	Lead	Lag	Lead	Lag	Lag
Lead-Lag Optimize?										
Recall Mode	None	None	None	None	None	None	C-Max	None	C-Max	C-Max
v/c Ratio	0.25	0.86	0.97	0.56	0.08	0.66	0.55	0.14	0.90	0.10
Control Delay	36.6	54.8	83.6	54.3	0.3	45.0	29.5	18.9	54.0	1.9
Queue Delay	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
Total Delay	36.6	54.8	83.6	54.3	0.3	45.0	29.5	18.9	54.0	1.9
Queue Length 50th (m)	13.7	35.5	103.1	82.8	0.0	28.6	110.6	4.3	195.7	0.0
Queue Length 95th (m)	22.9	53.0	#155.9	109.3	0.5	56.9	140.7	10.8	#287.3	3.2
Internal Link Dist (m)		330.4		656.8			717.1		188.2	
Turn Bay Length (m)	60.0		50.0		50.0	100.0		35.0		120.0
Base Capacity (vph)	393	693	389	560	515	225	2346	215	1309	661
Starvation Cap Reductn	0	0	0	0	0	0	0	0	0	0
Spillback Cap Reductn	0	0	0	0	0	0	0	0	0	0
Storage Cap Reductn	0	0	0	0	0	0	0	0	0	0
Reduced v/c Ratio	0.16	0.54	0.95	0.51	0.08	0.65	0.55	0.14	0.90	0.10

Intersection Summary

Cycle Length: 160
Actuated Cycle Length: 160
Offset: 27 (17%), Referenced to phase 2:SBTL and 6:NBTL, Start of Green
Natural Cycle: 125
Control Type: Actuated-Coordinated
95th percentile volume exceeds capacity, queue may be longer.
Queue shown is maximum after two cycles.

Splits and Phases: 5: Hwy 50 & Mayfield Rd/Albion Vaughn Rd

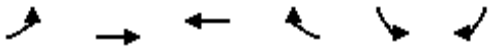




Movement	EBL	EBT	EBR	WBL	WBT	WBR	NBL	NBT	NBR	SBL	SBT	SBR
Lane Configurations												
Traffic Volume (vph)	62	161	215	370	283	39	147	1127	170	31	1178	64
Future Volume (vph)	62	161	215	370	283	39	147	1127	170	31	1178	64
Ideal Flow (vphpl)	1900	1900	1900	1900	1900	1900	1900	1900	1900	1900	1900	1900
Lane Width	3.5	3.7	3.5	3.5	3.7	3.5	3.5	3.7	3.5	3.5	3.7	3.5
Total Lost time (s)	3.0	6.5		3.0	6.5	6.5	5.0	6.3		5.0	6.3	6.3
Lane Util. Factor	1.00	0.95		1.00	1.00	1.00	1.00	0.91		1.00	0.95	1.00
Frt	1.00	0.91		1.00	1.00	0.85	1.00	0.98		1.00	1.00	0.85
Flt Protected	0.95	1.00		0.95	1.00	1.00	0.95	1.00		0.95	1.00	1.00
Satd. Flow (prot)	1700	2315		1623	1847	1521	1322	4616		1539	3120	1439
Flt Permitted	0.59	1.00		0.21	1.00	1.00	0.08	1.00		0.17	1.00	1.00
Satd. Flow (perm)	1049	2315		353	1847	1521	111	4616		278	3120	1439
Peak-hour factor, PHF	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00
Adj. Flow (vph)	62	161	215	370	283	39	147	1127	170	31	1178	64
RTOR Reduction (vph)	0	158	0	0	0	28	0	10	0	0	0	37
Lane Group Flow (vph)	62	218	0	370	283	11	147	1287	0	31	1178	27
Heavy Vehicles (%)	5%	19%	63%	10%	4%	5%	35%	11%	14%	16%	17%	11%
Turn Type	pm+pt	NA		pm+pt	NA	Perm	pm+pt	NA		pm+pt	NA	Perm
Protected Phases	7	4		3	8		1	6		5	2	
Permitted Phases	4			8		8	6			2		2
Actuated Green, G (s)	27.6	19.7		54.7	43.8	43.8	92.5	79.5		74.6	66.6	66.6
Effective Green, g (s)	27.6	19.7		54.7	43.8	43.8	92.5	79.5		74.6	66.6	66.6
Actuated g/C Ratio	0.17	0.12		0.34	0.27	0.27	0.58	0.50		0.47	0.42	0.42
Clearance Time (s)	3.0	6.5		3.0	6.5	6.5	5.0	6.3		5.0	6.3	6.3
Vehicle Extension (s)	3.0	3.0		3.0	3.0	3.0	3.0	3.0		3.0	3.0	3.0
Lane Grp Cap (vph)	213	285		374	505	416	222	2293		192	1298	598
v/s Ratio Prot	0.01	0.09		c0.20	0.15		c0.09	0.28		0.01	c0.38	
v/s Ratio Perm	0.04			c0.14		0.01	0.30			0.07		0.02
v/c Ratio	0.29	0.77		0.99	0.56	0.03	0.66	0.56		0.16	0.91	0.04
Uniform Delay, d1	56.9	67.9		46.8	49.8	42.5	36.4	28.1		23.6	43.8	27.8
Progression Factor	1.00	1.00		1.00	1.00	1.00	1.00	1.00		1.00	1.00	1.00
Incremental Delay, d2	0.8	11.6		43.2	1.4	0.0	7.2	1.0		0.4	10.8	0.1
Delay (s)	57.6	79.5		90.0	51.3	42.5	43.6	29.1		24.0	54.6	27.9
Level of Service	E	E		F	D	D	D	C		C	D	C
Approach Delay (s)		76.4			71.5			30.6			52.5	
Approach LOS		E			E			C			D	

Intersection Summary			
HCM 2000 Control Delay	50.4	HCM 2000 Level of Service	D
HCM 2000 Volume to Capacity ratio	0.92		
Actuated Cycle Length (s)	160.0	Sum of lost time (s)	20.8
Intersection Capacity Utilization	90.9%	ICU Level of Service	E
Analysis Period (min)	15		

c Critical Lane Group



Movement	EBL	EBT	WBT	WBR	SBL	SBR
Lane Configurations						
Traffic Volume (veh/h)	45	429	433	44	11	16
Future Volume (Veh/h)	45	429	433	44	11	16
Sign Control		Free	Free		Stop	
Grade		0%	0%		0%	
Peak Hour Factor	1.00	1.00	1.00	1.00	1.00	1.00
Hourly flow rate (vph)	45	429	433	44	11	16
Pedestrians						
Lane Width (m)						
Walking Speed (m/s)						
Percent Blockage						
Right turn flare (veh)						
Median type		None	None			
Median storage veh)						
Upstream signal (m)		233				
pX, platoon unblocked					0.98	
vC, conflicting volume	477				760	238
vC1, stage 1 conf vol						
vC2, stage 2 conf vol						
vCu, unblocked vol	477				709	238
tC, single (s)	4.2				7.3	7.3
tC, 2 stage (s)						
tF (s)	2.3				3.8	3.5
p0 queue free %	96				96	98
cM capacity (veh/h)	1047				298	713

Direction, Lane #	EB 1	EB 2	EB 3	WB 1	WB 2	SB 1	SB 2
Volume Total	45	214	214	289	188	11	16
Volume Left	45	0	0	0	0	11	0
Volume Right	0	0	0	0	44	0	16
cSH	1047	1700	1700	1700	1700	298	713
Volume to Capacity	0.04	0.13	0.13	0.17	0.11	0.04	0.02
Queue Length 95th (m)	1.1	0.0	0.0	0.0	0.0	0.9	0.6
Control Delay (s)	8.6	0.0	0.0	0.0	0.0	17.5	10.2
Lane LOS	A					C	B
Approach Delay (s)	0.8			0.0		13.2	
Approach LOS						B	

Intersection Summary			
Average Delay	0.8		
Intersection Capacity Utilization	30.0%	ICU Level of Service	A
Analysis Period (min)	15		

Movement	WBL	WBR	NBT	NBR	SBL	SBT
Lane Configurations						
Traffic Volume (veh/h)	0	0	684	0	0	654
Future Volume (Veh/h)	0	0	684	0	0	654
Sign Control	Stop		Free			Free
Grade	0%		0%			0%
Peak Hour Factor	1.00	1.00	1.00	1.00	1.00	1.00
Hourly flow rate (vph)	0	0	684	0	0	654
Pedestrians						
Lane Width (m)						
Walking Speed (m/s)						
Percent Blockage						
Right turn flare (veh)						
Median type			TWLTL			TWLTL
Median storage veh)			2			2
Upstream signal (m)						
pX, platoon unblocked						
vC, conflicting volume	1011	342			684	
vC1, stage 1 conf vol	684					
vC2, stage 2 conf vol	327					
vCu, unblocked vol	1011	342			684	
tC, single (s)	6.8	6.9			4.1	
tC, 2 stage (s)	5.8					
tF (s)	3.5	3.3			2.2	
p0 queue free %	100	100			100	
cM capacity (veh/h)	426	660			919	

Direction, Lane #	WB 1	NB 1	NB 2	SB 1	SB 2
Volume Total	0	456	228	218	436
Volume Left	0	0	0	0	0
Volume Right	0	0	0	0	0
cSH	1700	1700	1700	919	1700
Volume to Capacity	0.00	0.27	0.13	0.00	0.26
Queue Length 95th (m)	0.0	0.0	0.0	0.0	0.0
Control Delay (s)	0.0	0.0	0.0	0.0	0.0
Lane LOS	A				
Approach Delay (s)	0.0	0.0		0.0	
Approach LOS	A				

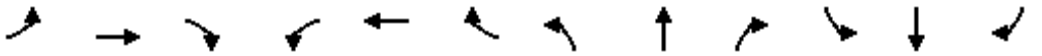
Intersection Summary			
Average Delay	0.0		
Intersection Capacity Utilization	22.2%	ICU Level of Service	A
Analysis Period (min)	15		

Lane Group	EBL	EBT	WBL	WBT	NBL	NBT	SBL	SBT
Lane Configurations								
Traffic Volume (vph)	302	404	26	401	26	524	94	489
Future Volume (vph)	302	404	26	401	26	524	94	489
Lane Group Flow (vph)	302	439	26	476	26	554	94	928
Turn Type	pm+pt	NA	Perm	NA	Perm	NA	pm+pt	NA
Protected Phases	5	2		6		4	3	8
Permitted Phases	2		6		4		8	
Detector Phase	5	2	6	6	4	4	3	8
Switch Phase								
Minimum Initial (s)	5.0	12.0	12.0	12.0	12.0	12.0	5.0	12.0
Minimum Split (s)	9.5	37.0	37.0	37.0	37.0	37.0	12.5	37.0
Total Split (s)	12.0	80.0	68.0	68.0	36.0	36.0	14.0	50.0
Total Split (%)	9.2%	61.5%	52.3%	52.3%	27.7%	27.7%	10.8%	38.5%
Yellow Time (s)	3.0	4.6	4.6	4.6	4.2	4.2	3.0	4.2
All-Red Time (s)	0.0	2.4	2.4	2.4	2.8	2.8	0.0	2.8
Lost Time Adjust (s)	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
Total Lost Time (s)	3.0	7.0	7.0	7.0	7.0	7.0	3.0	7.0
Lead/Lag	Lead		Lag	Lag	Lag	Lag	Lead	
Lead-Lag Optimize?								
Recall Mode	None	C-Max	C-Max	C-Max	None	None	None	None
v/c Ratio	0.58	0.22	0.07	0.33	0.51	0.82	0.54	0.85
Control Delay	17.8	12.7	19.6	20.6	80.4	60.1	42.2	41.9
Queue Delay	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
Total Delay	17.8	12.7	19.6	20.6	80.4	60.1	42.2	41.9
Queue Length 50th (m)	36.3	27.3	3.8	39.7	6.3	75.1	18.0	100.2
Queue Length 95th (m)	57.5	39.0	9.6	53.2	#18.6	93.6	31.0	122.8
Internal Link Dist (m)		689.8		209.6		684.9		579.6
Turn Bay Length (m)	100.0		85.0		105.0		145.0	
Base Capacity (vph)	521	2005	396	1448	59	783	182	1209
Starvation Cap Reductn	0	0	0	0	0	0	0	0
Spillback Cap Reductn	0	0	0	0	0	0	0	0
Storage Cap Reductn	0	0	0	0	0	0	0	0
Reduced v/c Ratio	0.58	0.22	0.07	0.33	0.44	0.71	0.52	0.77

Intersection Summary

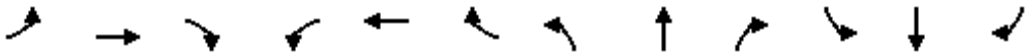
Cycle Length: 130
Actuated Cycle Length: 130
Offset: 116 (89%), Referenced to phase 2:EBTL and 6:WBTL, Start of Green
Natural Cycle: 100
Control Type: Actuated-Coordinated
95th percentile volume exceeds capacity, queue may be longer.
Queue shown is maximum after two cycles.

Splits and Phases: 1: Coleraine Dr & Mayfield Rd



Movement	EBL	EBT	EBR	WBL	WBT	WBR	NBL	NBT	NBR	SBL	SBT	SBR
Lane Configurations												
Traffic Volume (vph)	302	404	35	26	401	75	26	524	30	94	489	439
Future Volume (vph)	302	404	35	26	401	75	26	524	30	94	489	439
Ideal Flow (vphpl)	1900	1900	1900	1900	1900	1900	1900	1900	1900	1900	1900	1900
Lane Width	3.5	3.7	3.5	3.5	3.7	3.5	3.5	3.7	3.5	3.5	3.7	3.5
Total Lost time (s)	3.0	7.0		7.0	7.0		7.0	7.0		3.0	7.0	
Lane Util. Factor	1.00	0.95		1.00	0.95		1.00	0.95		1.00	0.95	
Frpb, ped/bikes	1.00	1.00		1.00	1.00		1.00	1.00		1.00	1.00	
Flpb, ped/bikes	1.00	1.00		1.00	1.00		1.00	1.00		1.00	1.00	
Frt	1.00	0.99		1.00	0.98		1.00	0.99		1.00	0.93	
Flt Protected	0.95	1.00		0.95	1.00		0.95	1.00		0.95	1.00	
Satd. Flow (prot)	1566	3344		1552	2946		1594	3500		1384	3279	
Flt Permitted	0.43	1.00		0.50	1.00		0.16	1.00		0.19	1.00	
Satd. Flow (perm)	710	3344		812	2946		267	3500		272	3279	
Peak-hour factor, PHF	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00
Adj. Flow (vph)	302	404	35	26	401	75	26	524	30	94	489	439
RTOR Reduction (vph)	0	4	0	0	11	0	0	3	0	0	132	0
Lane Group Flow (vph)	302	435	0	26	465	0	26	551	0	94	796	0
Confl. Peds. (#/hr)									1	1		
Heavy Vehicles (%)	14%	8%	6%	15%	12%	69%	12%	3%	10%	29%	2%	5%
Turn Type	pm+pt	NA		Perm	NA		Perm	NA		pm+pt	NA	
Protected Phases	5	2			6			4		3	8	
Permitted Phases	2			6			4			8		
Actuated Green, G (s)	77.8	77.8		63.5	63.5		25.1	25.1		38.2	38.2	
Effective Green, g (s)	77.8	77.8		63.5	63.5		25.1	25.1		38.2	38.2	
Actuated g/C Ratio	0.60	0.60		0.49	0.49		0.19	0.19		0.29	0.29	
Clearance Time (s)	3.0	7.0		7.0	7.0		7.0	7.0		3.0	7.0	
Vehicle Extension (s)	3.0	3.0		3.0	3.0		3.0	3.0		3.0	3.0	
Lane Grp Cap (vph)	499	2001		396	1439		51	675		166	963	
v/s Ratio Prot	c0.05	0.13			0.16			0.16		0.04	c0.24	
v/s Ratio Perm	c0.31			0.03			0.10			0.12		
v/c Ratio	0.61	0.22		0.07	0.32		0.51	0.82		0.57	0.83	
Uniform Delay, d1	13.7	12.0		17.6	20.2		46.9	50.2		36.0	42.8	
Progression Factor	1.00	1.00		1.00	1.00		1.00	1.00		1.00	1.00	
Incremental Delay, d2	2.1	0.2		0.3	0.6		7.8	7.5		4.4	5.9	
Delay (s)	15.8	12.3		17.9	20.8		54.7	57.8		40.3	48.7	
Level of Service	B	B		B	C		D	E		D	D	
Approach Delay (s)		13.7			20.6			57.6			47.9	
Approach LOS		B			C			E			D	

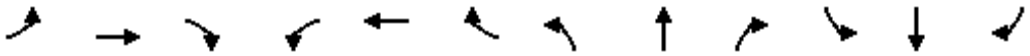
Intersection Summary			
HCM 2000 Control Delay	36.2	HCM 2000 Level of Service	D
HCM 2000 Volume to Capacity ratio	0.71		
Actuated Cycle Length (s)	130.0	Sum of lost time (s)	20.0
Intersection Capacity Utilization	88.7%	ICU Level of Service	E
Analysis Period (min)	15		
c Critical Lane Group			



Movement	EBL	EBT	EBR	WBL	WBT	WBR	NBL	NBT	NBR	SBL	SBT	SBR
Lane Configurations												
Traffic Volume (veh/h)	3	3	13	28	5	142	13	858	20	124	978	4
Future Volume (Veh/h)	3	3	13	28	5	142	13	858	20	124	978	4
Sign Control		Stop			Stop			Free			Free	
Grade		0%			0%			0%			0%	
Peak Hour Factor	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00
Hourly flow rate (vph)	3	3	13	28	5	142	13	858	20	124	978	4
Pedestrians												
Lane Width (m)												
Walking Speed (m/s)												
Percent Blockage												
Right turn flare (veh)												
Median type								TWLTL			None	
Median storage veh)								2				
Upstream signal (m)												
pX, platoon unblocked												
vC, conflicting volume	1828	2132	491	1646	2124	439	982			878		
vC1, stage 1 conf vol	1228	1228		894	894							
vC2, stage 2 conf vol	600	904		752	1230							
vCu, unblocked vol	1828	2132	491	1646	2124	439	982			878		
tC, single (s)	7.5	7.2	7.1	7.9	7.7	7.2	5.8			4.4		
tC, 2 stage (s)	6.5	6.2		6.9	6.7							
tF (s)	3.5	4.3	3.4	3.7	4.6	3.4	3.1			2.3		
p0 queue free %	98	97	97	85	95	73	96			82		
cM capacity (veh/h)	122	111	508	181	102	531	357			699		

Direction, Lane #	EB 1	EB 2	WB 1	WB 2	NB 1	NB 2	NB 3	SB 1	SB 2	SB 3
Volume Total	3	16	28	147	13	572	306	124	652	330
Volume Left	3	0	28	0	13	0	0	124	0	0
Volume Right	0	13	0	142	0	0	20	0	0	4
cSH	122	304	181	465	357	1700	1700	699	1700	1700
Volume to Capacity	0.02	0.05	0.15	0.32	0.04	0.34	0.18	0.18	0.38	0.19
Queue Length 95th (m)	0.6	1.3	4.3	10.7	0.9	0.0	0.0	5.1	0.0	0.0
Control Delay (s)	35.3	17.5	28.5	16.3	15.5	0.0	0.0	11.3	0.0	0.0
Lane LOS	E	C	D	C	C			B		
Approach Delay (s)	20.3		18.2		0.2			1.3		
Approach LOS	C		C							

Intersection Summary				
Average Delay	2.4			
Intersection Capacity Utilization	50.3%	ICU Level of Service	A	
Analysis Period (min)	15			



Movement	EBL	EBT	EBR	WBL	WBT	WBR	NBL	NBT	NBR	SBL	SBT	SBR
Lane Configurations												
Traffic Volume (veh/h)	4	135	24	10	110	14	55	0	15	21	0	9
Future Volume (Veh/h)	4	135	24	10	110	14	55	0	15	21	0	9
Sign Control		Free			Free			Stop			Stop	
Grade		0%			0%			0%			0%	
Peak Hour Factor	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00
Hourly flow rate (vph)	4	135	24	10	110	14	55	0	15	21	0	9
Pedestrians												
Lane Width (m)												
Walking Speed (m/s)												
Percent Blockage												
Right turn flare (veh)												
Median type		None			None							
Median storage veh)												
Upstream signal (m)												
pX, platoon unblocked												
vC, conflicting volume	124			159			301	299	147	307	304	117
vC1, stage 1 conf vol												
vC2, stage 2 conf vol												
vCu, unblocked vol	124			159			301	299	147	307	304	117
tC, single (s)	4.3			4.4			7.2	6.5	6.4	7.2	6.5	6.3
tC, 2 stage (s)												
tF (s)	2.4			2.5			3.6	4.0	3.5	3.6	4.0	3.4
p0 queue free %	100			99			91	100	98	97	100	99
cM capacity (veh/h)	1332			1267			622	610	855	614	606	911

Direction, Lane #	EB 1	WB 1	NB 1	SB 1
Volume Total	163	134	70	30
Volume Left	4	10	55	21
Volume Right	24	14	15	9
cSH	1332	1267	661	680
Volume to Capacity	0.00	0.01	0.11	0.04
Queue Length 95th (m)	0.1	0.2	2.8	1.1
Control Delay (s)	0.2	0.6	11.1	10.5
Lane LOS	A	A	B	B
Approach Delay (s)	0.2	0.6	11.1	10.5
Approach LOS			B	B

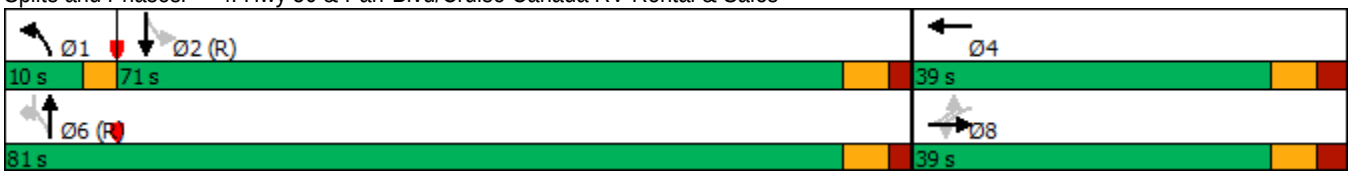
Intersection Summary				
Average Delay	3.1			
Intersection Capacity Utilization	23.0%	ICU Level of Service	A	
Analysis Period (min)	15			

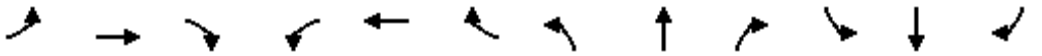
Lane Group	EBL	EBT	WBL	WBT	NBL	NBT	SBL	SBT	SBR
Lane Configurations									
Traffic Volume (vph)	62	0	1	0	113	1335	1	1259	42
Future Volume (vph)	62	0	1	0	113	1335	1	1259	42
Lane Group Flow (vph)	62	170	0	2	113	1335	1	1259	42
Turn Type	Perm	NA	D.Pm	NA	pm+pt	NA	Perm	NA	custom
Protected Phases		8		4	1	6		2	
Permitted Phases	8		8		6		2		6
Detector Phase	8	8	8	4	1	6	2	2	6
Switch Phase									
Minimum Initial (s)	8.0	8.0	8.0	8.0	5.0	12.0	12.0	12.0	12.0
Minimum Split (s)	33.9	33.9	33.9	33.9	9.5	30.1	30.1	30.1	30.1
Total Split (s)	39.0	39.0	39.0	39.0	10.0	81.0	71.0	71.0	81.0
Total Split (%)	32.5%	32.5%	32.5%	32.5%	8.3%	67.5%	59.2%	59.2%	67.5%
Yellow Time (s)	4.0	4.0	4.0	4.0	3.0	4.0	4.0	4.0	4.0
All-Red Time (s)	2.9	2.9	2.9	2.9	0.0	2.1	2.1	2.1	2.1
Lost Time Adjust (s)	0.0	0.0		0.0	0.0	0.0	0.0	0.0	0.0
Total Lost Time (s)	6.9	6.9		6.9	3.0	6.1	6.1	6.1	6.1
Lead/Lag					Lead		Lag	Lag	
Lead-Lag Optimize?									
Recall Mode	None	None	None	None	None	C-Max	C-Max	C-Max	C-Max
v/c Ratio	0.49	0.62		0.01	0.39	0.50	0.00	0.51	0.04
Control Delay	64.0	21.3		0.0	6.4	5.2	7.0	9.4	1.4
Queue Delay	0.0	0.0		0.0	0.0	0.0	0.0	0.0	0.0
Total Delay	64.0	21.3		0.0	6.4	5.2	7.0	9.4	1.4
Queue Length 50th (m)	14.9	4.9		0.0	4.1	46.7	0.1	64.8	0.3
Queue Length 95th (m)	28.8	26.4		0.0	9.6	73.0	0.8	102.1	2.9
Internal Link Dist (m)		828.8		20.9		520.2		332.3	
Turn Bay Length (m)	80.0				35.0		25.0		20.0
Base Capacity (vph)	357	506		397	290	2645	272	2484	1170
Starvation Cap Reductn	0	0		0	0	0	0	0	0
Spillback Cap Reductn	0	0		0	0	0	0	0	0
Storage Cap Reductn	0	0		0	0	0	0	0	0
Reduced v/c Ratio	0.17	0.34		0.01	0.39	0.50	0.00	0.51	0.04

Intersection Summary

Cycle Length: 120
Actuated Cycle Length: 120
Offset: 3 (3%), Referenced to phase 2:SBTL and 6:NBTL, Start of Green
Natural Cycle: 80
Control Type: Actuated-Coordinated

Splits and Phases: 4: Hwy 50 & Parr Blvd/Cruise Canada RV Rental & Sales





Movement	EBL	EBT	EBR	WBL	WBT	WBR	NBL	NBT	NBR	SBL	SBT	SBR
Lane Configurations												
Traffic Volume (vph)	62	0	170	1	0	1	113	1335	0	1	1259	42
Future Volume (vph)	62	0	170	1	0	1	113	1335	0	1	1259	42
Ideal Flow (vphpl)	1900	1900	1900	1900	1900	1900	1900	1900	1900	1900	1900	1900
Lane Width	3.5	3.7	3.5	3.5	3.7	3.5	3.5	3.7	3.5	3.5	3.7	3.5
Total Lost time (s)	6.9	6.9			6.9		3.0	6.1		6.1	6.1	6.1
Lane Util. Factor	1.00	1.00			1.00		1.00	0.95		1.00	0.95	1.00
Frpb, ped/bikes	1.00	1.00			0.99		1.00	1.00		1.00	1.00	0.98
Flpb, ped/bikes	1.00	1.00			1.00		1.00	1.00		1.00	1.00	1.00
Frt	1.00	0.85			0.93		1.00	1.00		1.00	1.00	0.85
Flt Protected	0.95	1.00			0.98		0.95	1.00		0.95	1.00	1.00
Satd. Flow (prot)	1679	1484			1735		1394	3318		1785	3510	1459
Flt Permitted	0.76	1.00			0.75		0.18	1.00		0.20	1.00	1.00
Satd. Flow (perm)	1337	1484			1338		261	3318		385	3510	1459
Peak-hour factor, PHF	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00
Adj. Flow (vph)	62	0	170	1	0	1	113	1335	0	1	1259	42
RTOR Reduction (vph)	0	135	0	0	2	0	0	0	0	0	0	7
Lane Group Flow (vph)	62	35	0	0	0	0	113	1335	0	1	1259	35
Confl. Peds. (#/hr)	2					2	1					1
Heavy Vehicles (%)	6%	0%	10%	0%	0%	0%	28%	10%	0%	0%	4%	7%
Turn Type	Perm	NA		D.Pm	NA		pm+pt	NA		Perm	NA	custom
Protected Phases		8			4		1	6			2	
Permitted Phases	8			8			6			2		6
Actuated Green, G (s)	11.3	11.3			11.3		95.7	95.7		85.0	85.0	95.7
Effective Green, g (s)	11.3	11.3			11.3		95.7	95.7		85.0	85.0	95.7
Actuated g/C Ratio	0.09	0.09			0.09		0.80	0.80		0.71	0.71	0.80
Clearance Time (s)	6.9	6.9			6.9		3.0	6.1		6.1	6.1	6.1
Vehicle Extension (s)	3.0	3.0			3.0		3.0	3.0		3.0	3.0	3.0
Lane Grp Cap (vph)	125	139			125		280	2646		272	2486	1163
v/s Ratio Prot		0.02					0.03	c0.40			0.36	
v/s Ratio Perm	c0.05				0.00		0.30			0.00		0.02
v/c Ratio	0.50	0.25			0.00		0.40	0.50		0.00	0.51	0.03
Uniform Delay, d1	51.6	50.4			49.2		4.6	4.1		5.1	8.0	2.5
Progression Factor	1.00	1.00			1.00		1.00	1.00		1.00	1.00	1.00
Incremental Delay, d2	3.1	1.0			0.0		1.0	0.7		0.0	0.7	0.0
Delay (s)	54.7	51.4			49.2		5.5	4.8		5.1	8.7	2.6
Level of Service	D	D			D		A	A		A	A	A
Approach Delay (s)		52.3			49.2			4.9			8.5	
Approach LOS		D			D			A			A	

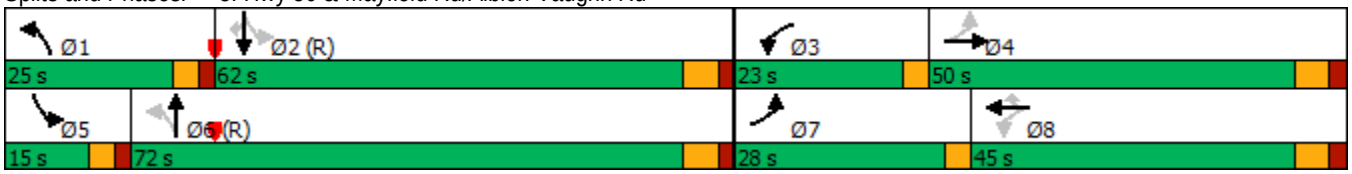
Intersection Summary			
HCM 2000 Control Delay	10.2	HCM 2000 Level of Service	B
HCM 2000 Volume to Capacity ratio	0.52		
Actuated Cycle Length (s)	120.0	Sum of lost time (s)	16.0
Intersection Capacity Utilization	73.3%	ICU Level of Service	D
Analysis Period (min)	15		
c Critical Lane Group			

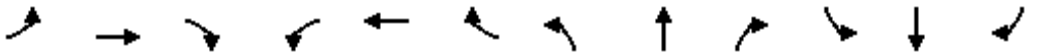
Lane Group	EBL	EBT	WBL	WBT	WBR	NBL	NBT	SBL	SBT	SBR
Lane Configurations										
Traffic Volume (vph)	86	253	222	158	33	116	1180	36	1337	70
Future Volume (vph)	86	253	222	158	33	116	1180	36	1337	70
Lane Group Flow (vph)	86	512	222	158	33	116	1593	36	1337	70
Turn Type	pm+pt	NA	pm+pt	NA	Perm	pm+pt	NA	pm+pt	NA	Perm
Protected Phases	7	4	3	8		1	6	5	2	
Permitted Phases	4		8		8	6		2		2
Detector Phase	7	4	3	8	8	1	6	5	2	2
Switch Phase										
Minimum Initial (s)	5.0	12.0	10.0	12.0	12.0	10.0	20.0	10.0	20.0	20.0
Minimum Split (s)	9.5	43.5	14.5	43.5	43.5	15.0	41.3	15.0	41.3	41.3
Total Split (s)	28.0	50.0	23.0	45.0	45.0	25.0	72.0	15.0	62.0	62.0
Total Split (%)	17.5%	31.3%	14.4%	28.1%	28.1%	15.6%	45.0%	9.4%	38.8%	38.8%
Yellow Time (s)	3.0	4.0	3.0	4.0	4.0	3.0	4.2	3.0	4.2	4.2
All-Red Time (s)	0.0	2.5	0.0	2.5	2.5	2.0	2.1	2.0	2.1	2.1
Lost Time Adjust (s)	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
Total Lost Time (s)	3.0	6.5	3.0	6.5	6.5	5.0	6.3	5.0	6.3	6.3
Lead/Lag	Lead	Lag	Lead	Lag	Lag	Lead	Lag	Lead	Lag	Lag
Lead-Lag Optimize?										
Recall Mode	None	None	None	None	None	None	C-Max	None	C-Max	C-Max
v/c Ratio	0.25	0.84	0.91	0.48	0.08	0.68	0.64	0.19	0.80	0.08
Control Delay	39.2	57.4	82.9	59.5	0.4	48.0	27.4	16.9	41.1	0.2
Queue Delay	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
Total Delay	39.2	57.4	82.9	59.5	0.4	48.0	27.4	16.9	41.1	0.2
Queue Length 50th (m)	20.5	62.5	58.1	46.6	0.0	20.5	134.9	4.5	197.2	0.0
Queue Length 95th (m)	32.2	80.6	#99.0	68.8	0.0	44.9	169.0	10.9	#295.2	0.0
Internal Link Dist (m)		330.4		656.8			717.1		188.2	
Turn Bay Length (m)	60.0		50.0		50.0	100.0		35.0		120.0
Base Capacity (vph)	478	913	249	374	436	199	2494	185	1661	837
Starvation Cap Reductn	0	0	0	0	0	0	0	0	0	0
Spillback Cap Reductn	0	0	0	0	0	0	0	0	0	0
Storage Cap Reductn	0	0	0	0	0	0	0	0	0	0
Reduced v/c Ratio	0.18	0.56	0.89	0.42	0.08	0.58	0.64	0.19	0.80	0.08

Intersection Summary

Cycle Length: 160
Actuated Cycle Length: 160
Offset: 72 (45%), Referenced to phase 2:SBTL and 6:NBTL, Start of Green
Natural Cycle: 125
Control Type: Actuated-Coordinated
95th percentile volume exceeds capacity, queue may be longer.
Queue shown is maximum after two cycles.

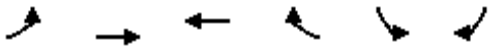
Splits and Phases: 5: Hwy 50 & Mayfield Rd/Albion Vaughn Rd





Movement	EBL	EBT	EBR	WBL	WBT	WBR	NBL	NBT	NBR	SBL	SBT	SBR
Lane Configurations												
Traffic Volume (vph)	86	253	259	222	158	33	116	1180	413	36	1337	70
Future Volume (vph)	86	253	259	222	158	33	116	1180	413	36	1337	70
Ideal Flow (vphpl)	1900	1900	1900	1900	1900	1900	1900	1900	1900	1900	1900	1900
Lane Width	3.5	3.7	3.5	3.5	3.7	3.5	3.5	3.7	3.5	3.5	3.7	3.5
Total Lost time (s)	3.0	6.5		3.0	6.5	6.5	5.0	6.3		5.0	6.3	6.3
Lane Util. Factor	1.00	0.95		1.00	1.00	1.00	1.00	0.91		1.00	0.95	1.00
Frpb, ped/bikes	1.00	1.00		1.00	1.00	1.00	1.00	1.00		1.00	1.00	0.99
Flpb, ped/bikes	1.00	1.00		1.00	1.00	1.00	1.00	1.00		1.00	1.00	1.00
Frt	1.00	0.92		1.00	1.00	0.85	1.00	0.96		1.00	1.00	0.85
Flt Protected	0.95	1.00		0.95	1.00	1.00	0.95	1.00		0.95	1.00	1.00
Satd. Flow (prot)	1767	2931		1623	1549	1389	1167	4523		1566	3444	1593
Flt Permitted	0.66	1.00		0.14	1.00	1.00	0.08	1.00		0.11	1.00	1.00
Satd. Flow (perm)	1222	2931		238	1549	1389	92	4523		179	3444	1593
Peak-hour factor, PHF	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00
Adj. Flow (vph)	86	253	259	222	158	33	116	1180	413	36	1337	70
RTOR Reduction (vph)	0	134	0	0	0	26	0	31	0	0	0	36
Lane Group Flow (vph)	86	378	0	222	158	7	116	1562	0	36	1337	34
Confl. Bikes (#/hr)												1
Heavy Vehicles (%)	1%	7%	23%	10%	24%	15%	53%	13%	7%	14%	6%	-1%
Turn Type	pm+pt	NA		pm+pt	NA	Perm	pm+pt	NA		pm+pt	NA	Perm
Protected Phases	7	4		3	8		1	6		5	2	
Permitted Phases	4			8		8	6			2		2
Actuated Green, G (s)	36.7	25.8		48.1	34.2	34.2	99.1	86.1		85.1	77.1	77.1
Effective Green, g (s)	36.7	25.8		48.1	34.2	34.2	99.1	86.1		85.1	77.1	77.1
Actuated g/C Ratio	0.23	0.16		0.30	0.21	0.21	0.62	0.54		0.53	0.48	0.48
Clearance Time (s)	3.0	6.5		3.0	6.5	6.5	5.0	6.3		5.0	6.3	6.3
Vehicle Extension (s)	3.0	3.0		3.0	3.0	3.0	3.0	3.0		3.0	3.0	3.0
Lane Grp Cap (vph)	317	472		238	331	296	171	2433		164	1659	767
v/s Ratio Prot	0.02	0.13		c0.11	0.10		c0.07	0.35		0.01	c0.39	
v/s Ratio Perm	0.04			c0.17		0.01	0.35			0.11		0.02
v/c Ratio	0.27	0.80		0.93	0.48	0.02	0.68	0.64		0.22	0.81	0.04
Uniform Delay, d1	49.9	64.6		47.1	55.1	49.7	34.9	26.1		19.4	35.1	21.9
Progression Factor	1.00	1.00		1.00	1.00	1.00	1.00	1.00		1.00	1.00	1.00
Incremental Delay, d2	0.5	9.4		40.1	1.1	0.0	10.2	1.3		0.7	4.3	0.1
Delay (s)	50.4	74.0		87.2	56.2	49.7	45.1	27.4		20.1	39.4	22.0
Level of Service	D	E		F	E	D	D	C		C	D	C
Approach Delay (s)		70.6			72.3			28.6			38.1	
Approach LOS		E			E			C			D	

Intersection Summary			
HCM 2000 Control Delay	42.3	HCM 2000 Level of Service	D
HCM 2000 Volume to Capacity ratio	0.85		
Actuated Cycle Length (s)	160.0	Sum of lost time (s)	20.8
Intersection Capacity Utilization	91.1%	ICU Level of Service	F
Analysis Period (min)	15		
c Critical Lane Group			



Movement	EBL	EBT	WBT	WBR	SBL	SBR
Lane Configurations						
Traffic Volume (veh/h)	20	508	455	21	30	47
Future Volume (Veh/h)	20	508	455	21	30	47
Sign Control		Free	Free		Stop	
Grade		0%	0%		0%	
Peak Hour Factor	1.00	1.00	1.00	1.00	1.00	1.00
Hourly flow rate (vph)	20	508	455	21	30	47
Pedestrians						
Lane Width (m)						
Walking Speed (m/s)						
Percent Blockage						
Right turn flare (veh)						
Median type		None	None			
Median storage veh)						
Upstream signal (m)		233				
pX, platoon unblocked					0.96	
vC, conflicting volume	476				760	238
vC1, stage 1 conf vol						
vC2, stage 2 conf vol						
vCu, unblocked vol	476				661	238
tC, single (s)	4.5				7.0	7.1
tC, 2 stage (s)						
tF (s)	2.4				3.6	3.4
p0 queue free %	98				92	94
cM capacity (veh/h)	966				354	742

Direction, Lane #	EB 1	EB 2	EB 3	WB 1	WB 2	SB 1	SB 2
Volume Total	20	254	254	303	173	30	47
Volume Left	20	0	0	0	0	30	0
Volume Right	0	0	0	0	21	0	47
cSH	966	1700	1700	1700	1700	354	742
Volume to Capacity	0.02	0.15	0.15	0.18	0.10	0.08	0.06
Queue Length 95th (m)	0.5	0.0	0.0	0.0	0.0	2.2	1.6
Control Delay (s)	8.8	0.0	0.0	0.0	0.0	16.1	10.2
Lane LOS	A					C	B
Approach Delay (s)	0.3			0.0		12.5	
Approach LOS						B	

Intersection Summary			
Average Delay	1.1		
Intersection Capacity Utilization	26.6%	ICU Level of Service	A
Analysis Period (min)	15		

Movement	WBL	WBR	NBT	NBR	SBL	SBT
Lane Configurations						
Traffic Volume (veh/h)	0	0	874	0	0	1026
Future Volume (Veh/h)	0	0	874	0	0	1026
Sign Control	Stop		Free			Free
Grade	0%		0%			0%
Peak Hour Factor	1.00	1.00	1.00	1.00	1.00	1.00
Hourly flow rate (vph)	0	0	874	0	0	1026
Pedestrians						
Lane Width (m)						
Walking Speed (m/s)						
Percent Blockage						
Right turn flare (veh)						
Median type			TWLTL			TWLTL
Median storage veh)			2			2
Upstream signal (m)						
pX, platoon unblocked						
vC, conflicting volume	1387	437			874	
vC1, stage 1 conf vol	874					
vC2, stage 2 conf vol	513					
vCu, unblocked vol	1387	437			874	
tC, single (s)	6.8	6.9			4.1	
tC, 2 stage (s)	5.8					
tF (s)	3.5	3.3			2.2	
p0 queue free %	100	100			100	
cM capacity (veh/h)	327	573			781	

Direction, Lane #	WB 1	NB 1	NB 2	SB 1	SB 2
Volume Total	0	583	291	342	684
Volume Left	0	0	0	0	0
Volume Right	0	0	0	0	0
cSH	1700	1700	1700	781	1700
Volume to Capacity	0.00	0.34	0.17	0.00	0.40
Queue Length 95th (m)	0.0	0.0	0.0	0.0	0.0
Control Delay (s)	0.0	0.0	0.0	0.0	0.0
Lane LOS	A				
Approach Delay (s)	0.0	0.0		0.0	
Approach LOS	A				

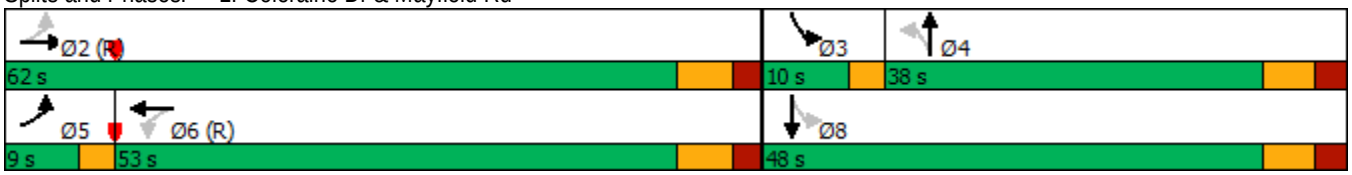
Intersection Summary			
Average Delay	0.0		
Intersection Capacity Utilization	31.7%	ICU Level of Service	A
Analysis Period (min)	15		

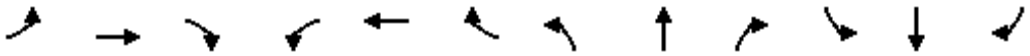
Lane Group	EBL	EBT	WBL	WBT	NBL	NBT	SBL	SBT
Lane Configurations								
Traffic Volume (vph)	91	305	2	347	6	12	83	0
Future Volume (vph)	91	305	2	347	6	12	83	0
Lane Group Flow (vph)	91	306	2	398	6	12	83	145
Turn Type	pm+pt	NA	Perm	NA	Perm	NA	pm+pt	NA
Protected Phases	5	2		6		4	3	8
Permitted Phases	2		6		4		8	
Detector Phase	5	2	6	6	4	4	3	8
Switch Phase								
Minimum Initial (s)	5.0	12.0	12.0	12.0	12.0	12.0	5.0	12.0
Minimum Split (s)	9.5	37.0	37.0	37.0	37.0	37.0	12.5	37.0
Total Split (s)	9.0	62.0	53.0	53.0	38.0	38.0	10.0	48.0
Total Split (%)	8.2%	56.4%	48.2%	48.2%	34.5%	34.5%	9.1%	43.6%
Yellow Time (s)	3.0	4.6	4.6	4.6	4.2	4.2	3.0	4.2
All-Red Time (s)	0.0	2.4	2.4	2.4	2.8	2.8	0.0	2.8
Lost Time Adjust (s)	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
Total Lost Time (s)	3.0	7.0	7.0	7.0	7.0	7.0	3.0	7.0
Lead/Lag	Lead		Lag	Lag	Lag	Lag	Lead	
Lead-Lag Optimize?								
Recall Mode	None	C-Max	C-Max	C-Max	None	None	None	None
v/c Ratio	0.14	0.12	0.01	0.18	0.04	0.03	0.38	0.18
Control Delay	4.5	5.2	10.0	8.7	44.8	44.1	42.8	0.5
Queue Delay	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
Total Delay	4.5	5.2	10.0	8.7	44.8	44.1	42.8	0.5
Queue Length 50th (m)	3.5	7.8	0.1	14.9	1.2	1.3	17.2	0.0
Queue Length 95th (m)	10.5	17.0	1.4	29.7	5.4	4.4	29.3	0.0
Internal Link Dist (m)		689.8		209.6		684.9		579.6
Turn Bay Length (m)	100.0		85.0		105.0		145.0	
Base Capacity (vph)	667	2458	345	2161	349	1028	217	1397
Starvation Cap Reductn	0	0	0	0	0	0	0	0
Spillback Cap Reductn	0	0	0	0	0	0	0	0
Storage Cap Reductn	0	0	0	0	0	0	0	0
Reduced v/c Ratio	0.14	0.12	0.01	0.18	0.02	0.01	0.38	0.10

Intersection Summary

Cycle Length: 110
Actuated Cycle Length: 110
Offset: 48 (44%), Referenced to phase 2:EBTL and 6:WBTL, Start of Green
Natural Cycle: 100
Control Type: Actuated-Coordinated

Splits and Phases: 1: Coleraine Dr & Mayfield Rd

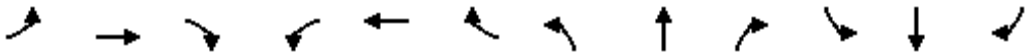




Movement	EBL	EBT	EBR	WBL	WBT	WBR	NBL	NBT	NBR	SBL	SBT	SBR
Lane Configurations												
Traffic Volume (vph)	91	305	1	2	347	51	6	12	0	83	0	145
Future Volume (vph)	91	305	1	2	347	51	6	12	0	83	0	145
Ideal Flow (vphpl)	1900	1900	1900	1900	1900	1900	1900	1900	1900	1900	1900	1900
Lane Width	3.5	3.7	3.5	3.5	3.7	3.5	3.5	3.7	3.5	3.5	3.7	3.5
Total Lost time (s)	3.0	7.0		7.0	7.0		7.0	7.0		3.0	7.0	
Lane Util. Factor	1.00	0.95		1.00	0.95		1.00	0.95		1.00	0.95	
Frt	1.00	1.00		1.00	0.98		1.00	1.00		1.00	0.85	
Flt Protected	0.95	1.00		0.95	1.00		0.95	1.00		0.95	1.00	
Satd. Flow (prot)	1552	3379		892	3316		1785	3650		1513	2983	
Flt Permitted	0.50	1.00		0.57	1.00		0.66	1.00		0.53	1.00	
Satd. Flow (perm)	809	3379		531	3316		1240	3650		842	2983	
Peak-hour factor, PHF	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00
Adj. Flow (vph)	91	305	1	2	347	51	6	12	0	83	0	145
RTOR Reduction (vph)	0	0	0	0	7	0	0	0	0	0	119	0
Lane Group Flow (vph)	91	306	0	2	391	0	6	12	0	83	26	0
Heavy Vehicles (%)	15%	8%	0%	100%	4%	35%	0%	0%	0%	18%	0%	4%
Turn Type	pm+pt	NA		Perm	NA		Perm	NA		pm+pt	NA	
Protected Phases	5	2			6			4		3	8	
Permitted Phases	2			6			4			8		
Actuated Green, G (s)	76.6	76.6		67.5	67.5		7.2	7.2		19.4	19.4	
Effective Green, g (s)	76.6	76.6		67.5	67.5		7.2	7.2		19.4	19.4	
Actuated g/C Ratio	0.70	0.70		0.61	0.61		0.07	0.07		0.18	0.18	
Clearance Time (s)	3.0	7.0		7.0	7.0		7.0	7.0		3.0	7.0	
Vehicle Extension (s)	3.0	3.0		3.0	3.0		3.0	3.0		3.0	3.0	
Lane Grp Cap (vph)	604	2353		325	2034		81	238		204	526	
v/s Ratio Prot	c0.01	0.09			c0.12			0.00		c0.03	0.01	
v/s Ratio Perm	0.10			0.00			0.00			c0.04		
v/c Ratio	0.15	0.13		0.01	0.19		0.07	0.05		0.41	0.05	
Uniform Delay, d1	5.4	5.6		8.2	9.3		48.3	48.2		39.5	37.6	
Progression Factor	1.00	1.00		1.00	1.00		1.00	1.00		1.00	1.00	
Incremental Delay, d2	0.1	0.1		0.0	0.2		0.4	0.1		1.3	0.0	
Delay (s)	5.5	5.7		8.3	9.5		48.7	48.3		40.8	37.7	
Level of Service	A	A		A	A		D	D		D	D	
Approach Delay (s)		5.7			9.5			48.4			38.8	
Approach LOS		A			A			D			D	

Intersection Summary			
HCM 2000 Control Delay	15.1	HCM 2000 Level of Service	B
HCM 2000 Volume to Capacity ratio	0.24		
Actuated Cycle Length (s)	110.0	Sum of lost time (s)	20.0
Intersection Capacity Utilization	48.8%	ICU Level of Service	A
Analysis Period (min)	15		

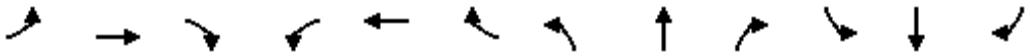
c Critical Lane Group



Movement	EBL	EBT	EBR	WBL	WBT	WBR	NBL	NBT	NBR	SBL	SBT	SBR
Lane Configurations												
Traffic Volume (veh/h)	1	3	1	15	1	74	1	137	3	38	192	2
Future Volume (Veh/h)	1	3	1	15	1	74	1	137	3	38	192	2
Sign Control		Stop			Stop			Free			Free	
Grade		0%			0%			0%			0%	
Peak Hour Factor	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00
Hourly flow rate (vph)	1	3	1	15	1	74	1	137	3	38	192	2
Pedestrians												
Lane Width (m)												
Walking Speed (m/s)												
Percent Blockage												
Right turn flare (veh)												
Median type								TWLTL			None	
Median storage veh)								2				
Upstream signal (m)												
pX, platoon unblocked												
vC, conflicting volume	414	411	97	315	410	70	194			140		
vC1, stage 1 conf vol	269	269		140	140							
vC2, stage 2 conf vol	145	142		174	270							
vCu, unblocked vol	414	411	97	315	410	70	194			140		
tC, single (s)	7.5	6.5	6.9	7.6	8.5	7.2	4.1			4.5		
tC, 2 stage (s)	6.5	5.5		6.6	7.5							
tF (s)	3.5	4.0	3.3	3.6	5.0	3.4	2.2			2.4		
p0 queue free %	100	100	100	98	100	92	100			97		
cM capacity (veh/h)	621	623	947	707	446	941	1391			1313		

Direction, Lane #	EB 1	EB 2	WB 1	WB 2	NB 1	NB 2	NB 3	SB 1	SB 2	SB 3
Volume Total	1	4	15	75	1	91	49	38	128	66
Volume Left	1	0	15	0	1	0	0	38	0	0
Volume Right	0	1	0	74	0	0	3	0	0	2
cSH	621	681	707	927	1391	1700	1700	1313	1700	1700
Volume to Capacity	0.00	0.01	0.02	0.08	0.00	0.05	0.03	0.03	0.08	0.04
Queue Length 95th (m)	0.0	0.1	0.5	2.1	0.0	0.0	0.0	0.7	0.0	0.0
Control Delay (s)	10.8	10.3	10.2	9.2	7.6	0.0	0.0	7.8	0.0	0.0
Lane LOS	B	B	B	A	A			A		
Approach Delay (s)	10.4		9.4		0.1			1.3		
Approach LOS	B		A							

Intersection Summary					
Average Delay	2.6				
Intersection Capacity Utilization	26.2%	ICU Level of Service		A	
Analysis Period (min)	15				



Movement	EBL	EBT	EBR	WBL	WBT	WBR	NBL	NBT	NBR	SBL	SBT	SBR
Lane Configurations												
Traffic Volume (veh/h)	0	27	17	6	34	3	50	1	12	4	2	5
Future Volume (Veh/h)	0	27	17	6	34	3	50	1	12	4	2	5
Sign Control		Free			Free			Stop			Stop	
Grade		0%			0%			0%			0%	
Peak Hour Factor	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00
Hourly flow rate (vph)	0	27	17	6	34	3	50	1	12	4	2	5
Pedestrians												
Lane Width (m)												
Walking Speed (m/s)												
Percent Blockage												
Right turn flare (veh)												
Median type		None			None							
Median storage veh)												
Upstream signal (m)												
pX, platoon unblocked												
vC, conflicting volume	37			44			89	84	36	96	92	36
vC1, stage 1 conf vol												
vC2, stage 2 conf vol												
vCu, unblocked vol	37			44			89	84	36	96	92	36
tC, single (s)	4.1			4.3			7.2	6.5	6.4	7.1	7.0	6.2
tC, 2 stage (s)												
tF (s)	2.2			2.4			3.6	4.0	3.5	3.5	4.5	3.3
p0 queue free %	100			100			94	100	99	100	100	100
cM capacity (veh/h)	1587			1473			864	806	996	878	713	1043

Direction, Lane #	EB 1	WB 1	NB 1	SB 1
Volume Total	44	43	63	11
Volume Left	0	6	50	4
Volume Right	17	3	12	5
cSH	1587	1473	885	905
Volume to Capacity	0.00	0.00	0.07	0.01
Queue Length 95th (m)	0.0	0.1	1.8	0.3
Control Delay (s)	0.0	1.1	9.4	9.0
Lane LOS		A	A	A
Approach Delay (s)	0.0	1.1	9.4	9.0
Approach LOS			A	A

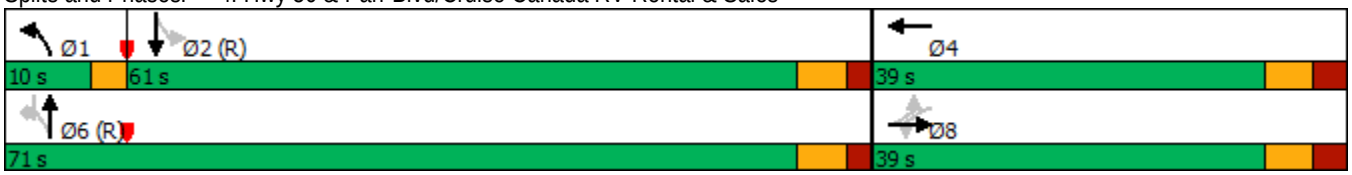
Intersection Summary				
Average Delay	4.6			
Intersection Capacity Utilization	20.8%	ICU Level of Service	A	
Analysis Period (min)	15			

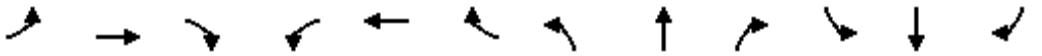
Lane Group	EBL	EBT	WBL	WBT	NBL	NBT	SBL	SBT	SBR
Lane Configurations									
Traffic Volume (vph)	26	0	4	2	35	1017	6	1000	21
Future Volume (vph)	26	0	4	2	35	1017	6	1000	21
Lane Group Flow (vph)	26	41	0	8	35	1017	6	1000	21
Turn Type	Perm	NA	D.Pm	NA	pm+pt	NA	Perm	NA	custom
Protected Phases		8		4	1	6		2	
Permitted Phases	8		8		6		2		6
Detector Phase	8	8	8	4	1	6	2	2	6
Switch Phase									
Minimum Initial (s)	8.0	8.0	8.0	8.0	5.0	12.0	12.0	12.0	12.0
Minimum Split (s)	33.9	33.9	33.9	33.9	9.5	30.1	30.1	30.1	30.1
Total Split (s)	39.0	39.0	39.0	39.0	10.0	71.0	61.0	61.0	71.0
Total Split (%)	35.5%	35.5%	35.5%	35.5%	9.1%	64.5%	55.5%	55.5%	64.5%
Yellow Time (s)	4.0	4.0	4.0	4.0	3.0	4.0	4.0	4.0	4.0
All-Red Time (s)	2.9	2.9	2.9	2.9	0.0	2.1	2.1	2.1	2.1
Lost Time Adjust (s)	0.0	0.0		0.0	0.0	0.0	0.0	0.0	0.0
Total Lost Time (s)	6.9	6.9		6.9	3.0	6.1	6.1	6.1	6.1
Lead/Lag					Lead		Lag	Lag	
Lead-Lag Optimize?									
Recall Mode	None	None	None	None	None	C-Max	C-Max	C-Max	C-Max
v/c Ratio	0.25	0.14		0.10	0.08	0.35	0.02	0.36	0.02
Control Delay	53.4	1.0		43.9	2.1	3.0	5.0	5.2	0.4
Queue Delay	0.0	0.0		0.0	0.0	0.0	0.0	0.0	0.0
Total Delay	53.4	1.0		43.9	2.1	3.0	5.0	5.2	0.4
Queue Length 50th (m)	5.7	0.0		1.3	0.9	25.2	0.3	38.8	0.0
Queue Length 95th (m)	14.7	0.0		6.4	2.8	36.7	1.7	55.1	0.8
Internal Link Dist (m)		828.8		20.9		520.2		332.3	
Turn Bay Length (m)	80.0				35.0		25.0		20.0
Base Capacity (vph)	395	560		296	451	2925	279	2805	1257
Starvation Cap Reductn	0	0		0	0	0	0	0	0
Spillback Cap Reductn	0	0		0	0	0	0	0	0
Storage Cap Reductn	0	0		0	0	0	0	0	0
Reduced v/c Ratio	0.07	0.07		0.03	0.08	0.35	0.02	0.36	0.02

Intersection Summary

Cycle Length: 110
Actuated Cycle Length: 110
Offset: 105 (95%), Referenced to phase 2:SBTL and 6:NBTL, Start of Green
Natural Cycle: 75
Control Type: Actuated-Coordinated

Splits and Phases: 4: Hwy 50 & Parr Blvd/Cruise Canada RV Rental & Sales





Movement	EBL	EBT	EBR	WBL	WBT	WBR	NBL	NBT	NBR	SBL	SBT	SBR
Lane Configurations												
Traffic Volume (vph)	26	0	41	4	2	2	35	1017	0	6	1000	21
Future Volume (vph)	26	0	41	4	2	2	35	1017	0	6	1000	21
Ideal Flow (vphpl)	1900	1900	1900	1900	1900	1900	1900	1900	1900	1900	1900	1900
Lane Width	3.5	3.7	3.5	3.5	3.7	3.5	3.5	3.7	3.5	3.5	3.7	3.5
Total Lost time (s)	6.9	6.9			6.9		3.0	6.1		6.1	6.1	6.1
Lane Util. Factor	1.00	1.00			1.00		1.00	0.95		1.00	0.95	1.00
Frpb, ped/bikes	1.00	1.00			1.00		1.00	1.00		1.00	1.00	0.98
Flpb, ped/bikes	1.00	1.00			1.00		1.00	1.00		1.00	1.00	1.00
Frt	1.00	0.85			0.97		1.00	1.00		1.00	1.00	0.85
Flt Protected	0.95	1.00			0.98		0.95	1.00		0.95	1.00	1.00
Satd. Flow (prot)	1714	1458			1203		1608	3476		1189	3544	1487
Flt Permitted	0.75	1.00			0.82		0.26	1.00		0.28	1.00	1.00
Satd. Flow (perm)	1358	1458			1012		440	3476		353	3544	1487
Peak-hour factor, PHF	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00
Adj. Flow (vph)	26	0	41	4	2	2	35	1017	0	6	1000	21
RTOR Reduction (vph)	0	38	0	0	2	0	0	0	0	0	0	4
Lane Group Flow (vph)	26	3	0	0	6	0	35	1017	0	6	1000	17
Confl. Peds. (#/hr)	1					1	1		1	1		1
Heavy Vehicles (%)	4%	0%	12%	25%	100%	50%	11%	5%	0%	50%	3%	5%
Turn Type	Perm	NA		D.Pm	NA		pm+pt	NA		Perm	NA	custom
Protected Phases		8			4		1	6			2	
Permitted Phases	8			8			6			2		6
Actuated Green, G (s)	7.0	7.0			7.0		90.0	90.0		83.3	83.3	90.0
Effective Green, g (s)	7.0	7.0			7.0		90.0	90.0		83.3	83.3	90.0
Actuated g/C Ratio	0.06	0.06			0.06		0.82	0.82		0.76	0.76	0.82
Clearance Time (s)	6.9	6.9			6.9		3.0	6.1		6.1	6.1	6.1
Vehicle Extension (s)	3.0	3.0			3.0		3.0	3.0		3.0	3.0	3.0
Lane Grp Cap (vph)	86	92			64		399	2844		267	2683	1216
v/s Ratio Prot		0.00					0.00	c0.29			c0.28	
v/s Ratio Perm	c0.02				0.01		0.07			0.02		0.01
v/c Ratio	0.30	0.03			0.10		0.09	0.36		0.02	0.37	0.01
Uniform Delay, d1	49.2	48.3			48.5		2.2	2.6		3.3	4.5	1.8
Progression Factor	1.01	1.00			1.00		1.00	1.00		1.00	1.00	1.00
Incremental Delay, d2	2.0	0.1			0.7		0.1	0.4		0.2	0.4	0.0
Delay (s)	51.4	48.4			49.2		2.3	2.9		3.5	4.9	1.9
Level of Service	D	D			D		A	A		A	A	A
Approach Delay (s)		49.6			49.2			2.9			4.8	
Approach LOS		D			D			A			A	

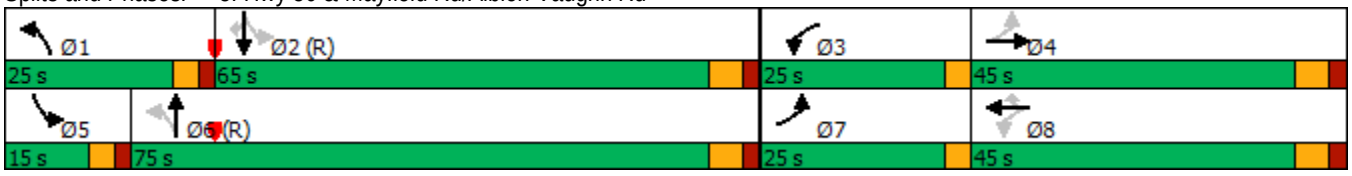
Intersection Summary			
HCM 2000 Control Delay	5.5	HCM 2000 Level of Service	A
HCM 2000 Volume to Capacity ratio	0.37		
Actuated Cycle Length (s)	110.0	Sum of lost time (s)	16.0
Intersection Capacity Utilization	47.1%	ICU Level of Service	A
Analysis Period (min)	15		
c Critical Lane Group			

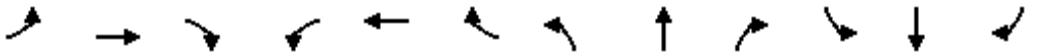
Lane Group	EBL	EBT	WBL	WBT	WBR	NBL	NBT	SBL	SBT	SBR
Lane Configurations										
Traffic Volume (vph)	93	128	244	135	10	111	909	14	925	97
Future Volume (vph)	93	128	244	135	10	111	909	14	925	97
Lane Group Flow (vph)	93	292	244	135	10	111	1140	14	925	97
Turn Type	pm+pt	NA	pm+pt	NA	Perm	pm+pt	NA	pm+pt	NA	Perm
Protected Phases	7	4	3	8		1	6	5	2	
Permitted Phases	4		8		8	6		2		2
Detector Phase	7	4	3	8	8	1	6	5	2	2
Switch Phase										
Minimum Initial (s)	5.0	12.0	10.0	12.0	12.0	10.0	20.0	10.0	20.0	20.0
Minimum Split (s)	9.5	43.5	14.5	43.5	43.5	15.0	41.3	15.0	41.3	41.3
Total Split (s)	25.0	45.0	25.0	45.0	45.0	25.0	75.0	15.0	65.0	65.0
Total Split (%)	15.6%	28.1%	15.6%	28.1%	28.1%	15.6%	46.9%	9.4%	40.6%	40.6%
Yellow Time (s)	3.0	4.0	3.0	4.0	4.0	3.0	4.2	3.0	4.2	4.2
All-Red Time (s)	0.0	2.5	0.0	2.5	2.5	2.0	2.1	2.0	2.1	2.1
Lost Time Adjust (s)	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
Total Lost Time (s)	3.0	6.5	3.0	6.5	6.5	5.0	6.3	5.0	6.3	6.3
Lead/Lag	Lead	Lag	Lead	Lag	Lag	Lead	Lag	Lead	Lag	Lag
Lead-Lag Optimize?										
Recall Mode	None	None	None	None	None	None	C-Max	None	C-Max	C-Max
v/c Ratio	0.35	0.71	0.88	0.53	0.04	0.33	0.36	0.04	0.45	0.10
Control Delay	49.4	40.7	82.5	71.7	0.3	11.6	14.2	9.2	20.4	2.2
Queue Delay	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
Total Delay	49.4	40.7	82.5	71.7	0.3	11.6	14.2	9.2	20.4	2.2
Queue Length 50th (m)	24.6	22.2	71.6	42.7	0.0	11.5	51.5	1.4	87.1	0.0
Queue Length 95th (m)	39.2	38.5	#102.1	66.1	0.0	21.5	87.3	4.4	119.8	7.1
Internal Link Dist (m)		330.4		656.8			717.1		188.2	
Turn Bay Length (m)	60.0		50.0		50.0	100.0		35.0		120.0
Base Capacity (vph)	375	831	282	420	380	410	3126	336	2062	967
Starvation Cap Reductn	0	0	0	0	0	0	0	0	0	0
Spillback Cap Reductn	0	0	0	0	0	0	0	0	0	0
Storage Cap Reductn	0	0	0	0	0	0	0	0	0	0
Reduced v/c Ratio	0.25	0.35	0.87	0.32	0.03	0.27	0.36	0.04	0.45	0.10

Intersection Summary

Cycle Length: 160
Actuated Cycle Length: 160
Offset: 7 (4%), Referenced to phase 2:SBTL and 6:NBTL, Start of Green
Natural Cycle: 115
Control Type: Actuated-Coordinated
95th percentile volume exceeds capacity, queue may be longer.
Queue shown is maximum after two cycles.

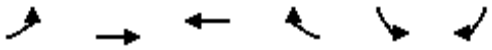
Splits and Phases: 5: Hwy 50 & Mayfield Rd/Albion Vaughn Rd





Movement	EBL	EBT	EBR	WBL	WBT	WBR	NBL	NBT	NBR	SBL	SBT	SBR
Lane Configurations												
Traffic Volume (vph)	93	128	164	244	135	10	111	909	231	14	925	97
Future Volume (vph)	93	128	164	244	135	10	111	909	231	14	925	97
Ideal Flow (vphpl)	1900	1900	1900	1900	1900	1900	1900	1900	1900	1900	1900	1900
Lane Width	3.5	3.7	3.5	3.5	3.7	3.5	3.5	3.7	3.5	3.5	3.7	3.5
Total Lost time (s)	3.0	6.5		3.0	6.5	6.5	5.0	6.3		5.0	6.3	6.3
Lane Util. Factor	1.00	0.95		1.00	1.00	1.00	1.00	0.91		1.00	0.95	1.00
Frpb, ped/bikes	1.00	1.00		1.00	1.00	1.00	1.00	1.00		1.00	1.00	1.00
Flpb, ped/bikes	1.00	1.00		1.00	1.00	1.00	1.00	1.00		1.00	1.00	1.00
Frt	1.00	0.92		1.00	1.00	0.85	1.00	0.97		1.00	1.00	0.85
Flt Protected	0.95	1.00		0.95	1.00	1.00	0.95	1.00		0.95	1.00	1.00
Satd. Flow (prot)	1750	2939		1684	1746	1229	1552	4831		1668	3544	1581
Flt Permitted	0.67	1.00		0.23	1.00	1.00	0.23	1.00		0.22	1.00	1.00
Satd. Flow (perm)	1235	2939		415	1746	1229	384	4831		394	3544	1581
Peak-hour factor, PHF	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00
Adj. Flow (vph)	93	128	164	244	135	10	111	909	231	14	925	97
RTOR Reduction (vph)	0	150	0	0	0	9	0	18	0	0	0	41
Lane Group Flow (vph)	93	142	0	244	135	1	111	1122	0	14	925	56
Confl. Bikes (#/hr)									1			
Heavy Vehicles (%)	2%	7%	19%	6%	10%	30%	15%	5%	5%	7%	3%	1%
Turn Type	pm+pt	NA		pm+pt	NA	Perm	pm+pt	NA		pm+pt	NA	Perm
Protected Phases	7	4		3	8		1	6		5	2	
Permitted Phases	4			8		8	6			2		2
Actuated Green, G (s)	26.2	14.1		38.3	23.2	23.2	108.9	99.9		97.1	93.1	93.1
Effective Green, g (s)	26.2	14.1		38.3	23.2	23.2	108.9	99.9		97.1	93.1	93.1
Actuated g/C Ratio	0.16	0.09		0.24	0.14	0.14	0.68	0.62		0.61	0.58	0.58
Clearance Time (s)	3.0	6.5		3.0	6.5	6.5	5.0	6.3		5.0	6.3	6.3
Vehicle Extension (s)	3.0	3.0		3.0	3.0	3.0	3.0	3.0		3.0	3.0	3.0
Lane Grp Cap (vph)	241	258		267	253	178	340	3016		270	2062	919
v/s Ratio Prot	0.03	0.05		c0.12	0.08		c0.02	0.23		0.00	c0.26	
v/s Ratio Perm	0.03			c0.10		0.00	0.20			0.03		0.04
v/c Ratio	0.39	0.55		0.91	0.53	0.01	0.33	0.37		0.05	0.45	0.06
Uniform Delay, d1	59.1	69.9		54.5	63.4	58.6	11.0	14.7		12.6	18.9	14.5
Progression Factor	1.00	1.00		1.00	1.00	1.00	1.00	1.00		1.00	1.00	1.00
Incremental Delay, d2	1.0	2.5		33.0	2.2	0.0	0.6	0.4		0.1	0.7	0.1
Delay (s)	60.1	72.5		87.6	65.5	58.6	11.6	15.1		12.6	19.6	14.6
Level of Service	E	E		F	E	E	B	B		B	B	B
Approach Delay (s)		69.5			79.2			14.7			19.1	
Approach LOS		E			E			B			B	

Intersection Summary			
HCM 2000 Control Delay	31.3	HCM 2000 Level of Service	C
HCM 2000 Volume to Capacity ratio	0.58		
Actuated Cycle Length (s)	160.0	Sum of lost time (s)	20.8
Intersection Capacity Utilization	75.6%	ICU Level of Service	D
Analysis Period (min)	15		
c Critical Lane Group			



Movement	EBL	EBT	WBT	WBR	SBL	SBR
Lane Configurations						
Traffic Volume (veh/h)	20	372	359	21	30	47
Future Volume (Veh/h)	20	372	359	21	30	47
Sign Control		Free	Free		Stop	
Grade		0%	0%		0%	
Peak Hour Factor	1.00	1.00	1.00	1.00	1.00	1.00
Hourly flow rate (vph)	20	372	359	21	30	47
Pedestrians						
Lane Width (m)						
Walking Speed (m/s)						
Percent Blockage						
Right turn flare (veh)						
Median type		None	None			
Median storage veh)						
Upstream signal (m)		233				
pX, platoon unblocked					1.00	
vC, conflicting volume	380				596	190
vC1, stage 1 conf vol						
vC2, stage 2 conf vol						
vCu, unblocked vol	380				589	190
tC, single (s)	4.5				7.0	7.1
tC, 2 stage (s)						
tF (s)	2.4				3.6	3.4
p0 queue free %	98				93	94
cM capacity (veh/h)	1056				412	798

Direction, Lane #	EB 1	EB 2	EB 3	WB 1	WB 2	SB 1	SB 2
Volume Total	20	186	186	239	141	30	47
Volume Left	20	0	0	0	0	30	0
Volume Right	0	0	0	0	21	0	47
cSH	1056	1700	1700	1700	1700	412	798
Volume to Capacity	0.02	0.11	0.11	0.14	0.08	0.07	0.06
Queue Length 95th (m)	0.5	0.0	0.0	0.0	0.0	1.9	1.5
Control Delay (s)	8.5	0.0	0.0	0.0	0.0	14.4	9.8
Lane LOS	A					B	A
Approach Delay (s)	0.4			0.0		11.6	
Approach LOS						B	

Intersection Summary			
Average Delay	1.3		
Intersection Capacity Utilization	26.6%	ICU Level of Service	A
Analysis Period (min)	15		

Movement	WBL	WBR	NBT	NBR	SBL	SBT
Lane Configurations						
Traffic Volume (veh/h)	0	0	156	0	0	232
Future Volume (Veh/h)	0	0	156	0	0	232
Sign Control	Stop		Free			Free
Grade	0%		0%			0%
Peak Hour Factor	1.00	1.00	1.00	1.00	1.00	1.00
Hourly flow rate (vph)	0	0	156	0	0	232
Pedestrians						
Lane Width (m)						
Walking Speed (m/s)						
Percent Blockage						
Right turn flare (veh)						
Median type			TWLTL			TWLTL
Median storage veh)			2			2
Upstream signal (m)						
pX, platoon unblocked						
vC, conflicting volume	272	78			156	
vC1, stage 1 conf vol	156					
vC2, stage 2 conf vol	116					
vCu, unblocked vol	272	78			156	
tC, single (s)	6.8	6.9			4.1	
tC, 2 stage (s)	5.8					
tF (s)	3.5	3.3			2.2	
p0 queue free %	100	100			100	
cM capacity (veh/h)	800	973			1436	

Direction, Lane #	WB 1	NB 1	NB 2	SB 1	SB 2
Volume Total	0	104	52	77	155
Volume Left	0	0	0	0	0
Volume Right	0	0	0	0	0
cSH	1700	1700	1700	1436	1700
Volume to Capacity	0.00	0.06	0.03	0.00	0.09
Queue Length 95th (m)	0.0	0.0	0.0	0.0	0.0
Control Delay (s)	0.0	0.0	0.0	0.0	0.0
Lane LOS	A				
Approach Delay (s)	0.0	0.0		0.0	
Approach LOS	A				

Intersection Summary			
Average Delay	0.0		
Intersection Capacity Utilization	9.7%	ICU Level of Service	A
Analysis Period (min)	15		

APPENDIX I

Left Turn Warrant Analysis

LEFT TURN WARRANT

INTERSECTION: Simpson Rd (Future) and Mayfield Rd

HORIZON / DESCRIPTION: Future Total (2028)

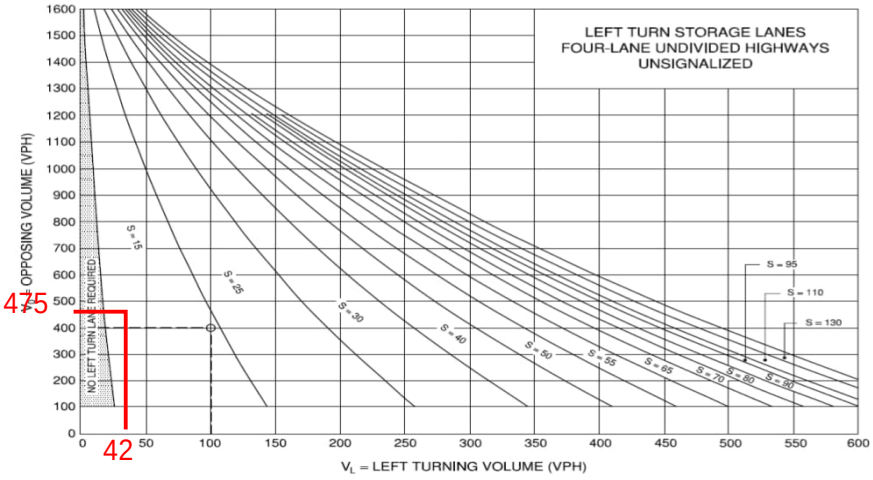
	Volumes	
	AM	PM
NBL		
NBT		
NBR		
SBL		
SBT		
SBR		
EBL	42	19
EBT	429	508
EBR	0	0
WBL	0	0
WBT	433	455
WBR	42	20

Major Direction: East-West

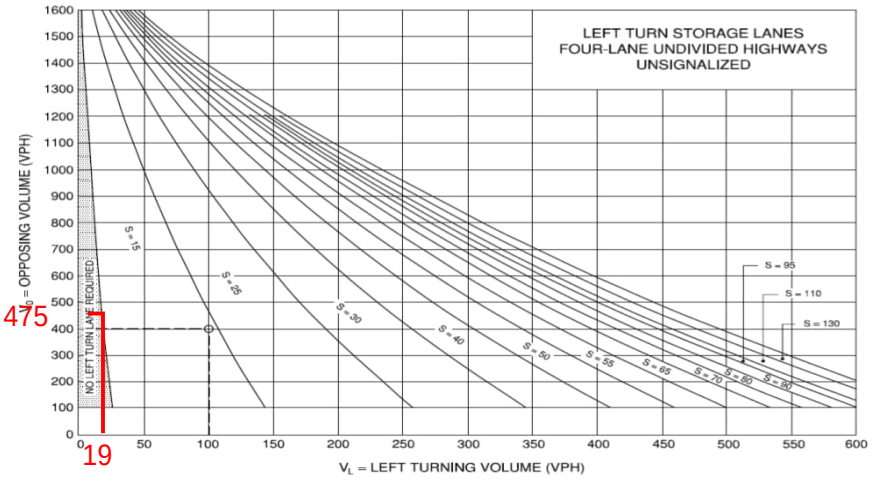
Turning Lane: Eastbound

Criteria / Value	AM	PM
Design Speed (km/h)	80	
Advance Volume (vph) (VA)	471	527
Left Turning Volume (vph) (VL)	42	19
% of Left Turning Volume	9%	4%
Opposing Volume (vph) (VO)	475	475
Warrant Met?	yes	no
Storage Lane (m)	n/a	n/a

AM



PM



Methodology from Appendix 9A of *MTO Design Supplement For TAC Geometric Design Guide (GDG) for Canadian Roads*