Corridor Study Report for
Shopiere Road

Beloit, Wisconsin

Final Report

Prepared for:

Stateline Area Transportation Study

Prepared by:

AECOM

December 2024

Table of Contents

List of Appendices

List of Figures

List of Tables

Executive Summary

The Shopiere Road corridor study evaluates traffic operations, safety, roadway access, and multimodal accommodations within the City of Beloit, Wisconsin. This report documents the methodologies, findings, and recommended mitigation strategies to improve traffic safety and facilitate acceptable traffic operations at key locations in the study area for existing-year (Year 2024) and future-year (Year 2049) conditions. A review of the existing roadway and intersection geometrics was performed to identify substandard elements along the corridor. Crash data was obtained and analyzed at study intersections and crash commonalities were identified. Traffic operations analysis was performed at key intersections along Shopiere Road to evaluate current and projected traffic conditions along the project corridor.

Alternatives for the Shopiere Road corridor were developed based on deficiencies found in the following categories: geometric site reviews of the study area, safety evaluation of the Shopiere Road corridor and the study intersections, and intersection operations analysis for the existing-year and Year 2049 horizon year. Locations with several alternatives were evaluated based on the aforementioned categories and a preferred alternative was selected based on those results
The following describes recommendations for the Shopiere Road corridor and key intersections:

Shopiere Road (Prairie Avenue to Inman Parkway)

- It is recommended that the Shopiere Road cross-section be updated to provide a three-lane cross-section (two travel lanes and a TWLTL) from Prairie Avenue to south of Inman Parkway. This alternative improves both safety and mobility as the TWLTL will allow left-turning vehicles to store and complete their turning movement to and from Shopiere Road. The three-lane cross-section will also reduce travel speeds as motorists will not have the ability to use multiple travel lanes to maneuver around slower-moving traffic; rather, traffic must use a single travel lane which can restrict speed variances, particularly faster travel speeds, since vehicle passing is prohibited. This improvement can be accommodated within the existing roadway cross-section and right of way, minimizing construction costs and right of way acquisition.

- It is recommended that multimodal accommodations, such as sidewalks, multi-use paths, and cycle tracks, be implemented along Shopiere Road. Providing these elements will enhance bike/ped accommodations along the corridor and provide a vital connection between northeast Beloit and the downtown area. While it is likely that right of way may be needed in several locations to construct these improvements, it is anticipated to be approximately five to ten feet wide for the length of a parcel and no buildings are anticipated to be impacted by these improvements.

- It is recommended that other treatments be implemented to inform motorists of the speed limit in their area. Elements such as roadway pavement markings and speed feedback signs will help reinforce the regulatory speed limit expected by motorists. These features would be particularly helpful in areas such as residential neighborhoods and near the OLA church and school campus.

Shopiere Road, Prairie Avenue / Bayless Avenue / Moccasin Trail intersection ("Triangle")

- In the short-term, it is recommended that the Triangle intersection be modified with access restrictions and a realignment of Moccasin Trail (Alternative 1d). These access restrictions will improve safety by eliminating non-intersection turning movements within the physical and functional intersection area which improves driver expectations. Removing access to Bayless Avenue and realigning Moccasin Trail increases the intersection spacing from Prairie Avenue and Shopiere Road intersection, improving traffic operations and vehicle storage capabilities without interference from closely spaced upstream intersections.

- In the long-term, it is recommended that the intersection control be upgraded to a roundabout (Alternative 2). Roundabouts improve traffic safety by eliminating head-on and angle crashes as well as reduces travel speeds due to the roundabout design. The peanut-style roundabout shown for Alternative 2 requires significant right of way to implement; therefore, the roundabout design should be considered as land uses and parcels change or develop in the future.

Shopiere Road, Cranston Road intersection

- The recommended three-lane cross-section of Shopiere Road will improve the existing geometric concerns of trapping lanes, driveway access, and left turn visibility at the intersection. The realignment of the travel lanes and the reconfiguration of the roadway cross-section will allow for these deficiencies to be addressed without additional right of way or widening of the roadway cross-section.

- It is recommended that traffic signal clearance intervals be examined with the lane configuration change for adherence by motorists.

Shopiere Road, Hart Road intersection

- In the short-term, it is recommended that no intersection control or geometric changes be made to the intersection as the recommended three-lane cross-section will help Hart Road traffic enter the intersection in a safer manner.

- In the long-term, consideration should be given to restrict or eliminate this intersection once Inman Parkway is extended. With the roadway extension, it is likely that traffic currently using Hart Road will divert to Inman Parkway, significantly reducing the demand for this approach. Restricting or eliminating this intersection would remove an intersection along a horizontal curve, further improving traffic safety in this area.

Shopiere Road, Inman Parkway intersection

- In the short-term, it is recommended to convert the existing side-road stop intersection control to an all-way stop control (Alternative 1). This improvement will improve traffic safety for Inman Parkway motorists as they will be able to enter the intersection while Shopiere Road is under stop-sign control. In addition, travel speeds in the intersection area will be reduced due to the stop-control provision for all intersection approaches.

- In the long-term, both a traffic signal and roundabout are viable alternatives for implementation. Both intersection control strategies help improve traffic operations and traffic safety when compared to the existing side-road stop control. In addition, both alternatives can be constructed in a manner that limits the impacts if the proposed Inman Parkway extension occurs. However, since it is unknown when this roadway extension will take place, a preferred intersection control is not necessary at this time.

Shopiere Road, I-39/90 northbound interchange ramp

- In the short-term, it is recommended that no geometric or intersection control improvements be made to the intersection. While the exit ramp operates at LOS E during the weekday morning peak hour, the number of vehicles traveling through the intersection do not meet warrants for any intersection control upgrades. In addition, the anticipated queues do not impact traffic operations at the interchange diverge area.

- In the long-term, it is recommended that the intersection be converted to a roundabout to accommodate anticipated growth and increasing traffic volumes at this location. The roundabout design will promote slower travel speeds through the intersection and will not require multiple travel or turn lanes to implement.

Other recommendations

In addition to the recommendations previously discussed, there are other locations in the study area that would benefit from improvements, but the improvement is more systemic (e.g., reviewing traffic signal phasing / timing) or the improvement does not have a comparable alternative to evaluate against it. The following describes other recommendations to improve safety, mobility, access, and multimodal accommodations along the Shopiere Road corridor:

- It is recommended that crosswalk pavement markings be monitored and refreshed to maintain their visibility for motorists and bicyclists/pedestrians.

- It is recommended that access management strategies along Shopiere Road be implemented as land uses change and parcels become developed. This improvement will allow for safe and efficient traffic operations along Shopiere Road and help identify locations for proper access driveway design.

- It is recommended that traffic signal equipment is reviewed for improved visibility and clarity for motorists. Examples of this include inspecting and adding backplates (or retroreflective backplates) to each signal head, checking the placement of overhead signal heads over each through or turn lane, and examining the placement of each signal head to ensure that motorists can clearly see them without obstruction. In addition, traffic signal timing plans should be reviewed to determine appropriate green times, clearance intervals, and other phasing parameters for safe, efficient travel through the intersection.

- It is recommended that right of way be preserved along Shopiere Road from Inman Parkway to I-39 / 90 to accommodate any roadway widening, such as a left-turn lane, which may be needed to accommodate development of parcels in this area.

1 Introduction

Shopiere Road is a vital, minor arterial in the City of Beloit as it connects residents, commuters, and freight from Henry Avenue and eastern sections of the city with the I-39/90 freeway corridor. Within the study area, Shopiere Road travels through several distinct environments and its roadway features reflect these surroundings. From Calumet Avenue to Cranston Road, Shopiere Road is a two-lane undivided roadway that is a main north-south route for several residential neighborhoods. From Cranston Road to I-39/90, Shopiere Road is primarily a four-lane undivided roadway with minimal direct access to residential neighborhoods and industrial properties.
The Shopiere Road corridor provides some multimodal accommodations such as sidewalks and crosswalks, but these elements are disjointed and do not connect across the entire corridor, creating continuity issues for its users. Shopiere Road provides limited opportunities for bicyclists and pedestrians to cross safely and comfortably – particularly north of Cranston Road as there are no bicycle or pedestrian facilities along Shopiere Road north of Cranston Road other than unmarked shoulders from Murphy Woods Road to I-39/90. In addition, Transit Routes 2, 3, and 4 utilize portions of Shopiere Road and have a transfer station near the western portion of the study corridor at the Piggly Wiggly supermarket.

1.1 Study Purpose

The purpose of this corridor study is to provide recommendations that the City of Beloit, Rock County, and Stateline Area Transportation Study (SLATS MPO), in coordination with the Wisconsin Department of Transportation (WisDOT) can incorporate into a roadway design project for construction. In addition, intersection recommendations can be developed into a Highway Safety Improvement Program (HSIP) funding application to address identified safety issues along the corridor. The goals of this study are listed below:

- Evaluation of traffic safety, traffic operations, access, and multimodal accommodations
- Recommend improvements to the corridor to optimize safety and mobility while balancing access and multimodal needs

1.2 Study Area

The Shopiere Road corridor study area runs from Prairie Avenue to the I-39/90 northbound interchange ramp terminals. Key intersections within the study area include the following:

- Prairie Avenue
- Bayliss Avenue
- Moccasin Trail
- Cranston Road
- Murphy Woods Road
- Creek Road
- Hart Road
- Inman Parkway (CTH BT)
- I-39/90 southbound ramps
- I-39/90 northbound ramps

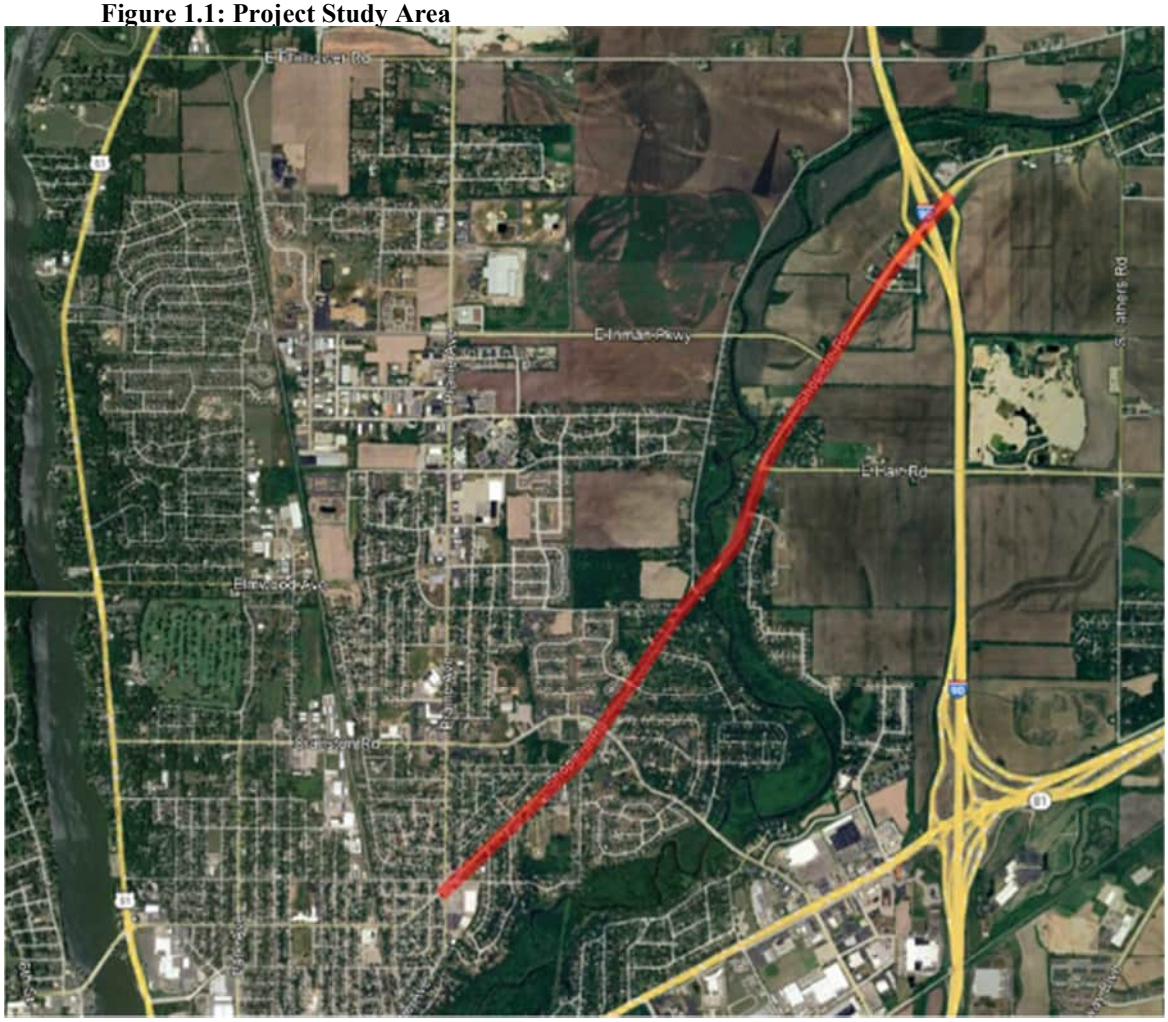
The general study area limits are illustrated in **Figure 1.1.**

1.3 Study Approach

This study was completed utilizing industry accepted publications such as the Institute of Transportation Engineers (ITE) *Trip Generation Manual,* WisDOT's *Facilities Development Manual* (FDM), AASHTO's *Policy of Geometric Design of Highways and Streets,* and FHWA's *Manual on Uniform Traffic Control Devices* (MUTCD). These design standards aid in determining substandard components within the existing roadway and helped develop alternatives to address the concerns.

Additionally, the City and SLATS MPO requested public input during the project to engage the public, local stakeholders, and policy makers help confirm problem locations, identify needs and desires for consideration, and provide feedback about potential alternatives within the study area. Three public information meetings (PIMs) are planned to be held throughout the project to allow attendees to provide direct feedback on existing concerns, proposed alternatives, and the preferred alternative.

Figure 1.1: Project Study Area



Source: Google

2 Existing Area Conditions

2.1 Roadway Transportation System

Descriptions of major area roadways within the study area are summarized below. Roadway and intersection characteristics are illustrated in **Figure 2.1.**

Shopiere Road

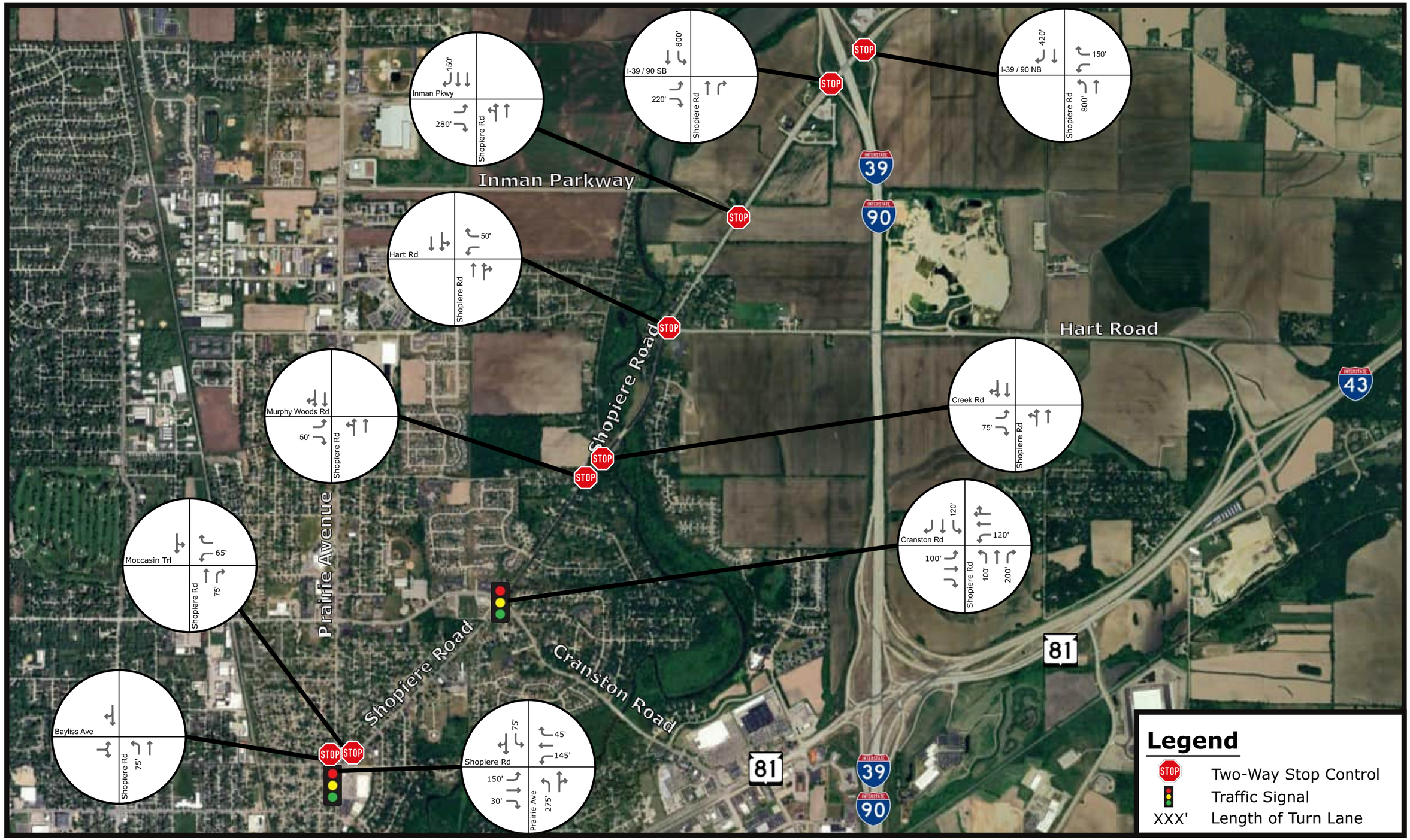
Shopiere Road is a minor arterial that runs at a northeast/southwest diagonal and connects the Henry Avenue and eastern areas of Beloit, through the Town of Turtle, to I-39/90. For purposes of this study, Shopiere Road will be referred as a north-south roadway. From Prairie Avenue to Cranston Road, Shopiere Road is a two-lane undivided roadway; from Cranston Road to I-39/90, the roadway expands to primarily a four-lane undivided section. The roadway cross-section width (including curb and gutter) along Shopiere Road varies, as illustrated below:

- Prairie Avenue to Cranston Road: 44 feet pavement width (two, 12-foot travel lanes with 10-foot parking lanes on each side)
- Cranston Road to Murphy Woods Road: 40 feet pavement width (four, 10-foot travel lanes)
- Murphy Woods Road to north of Inman Parkway: 60 feet pavement width (four, 12-foot travel lanes with 6-foot shoulders on each side)
- North of Inman Parkway to I-39/90: 96 feet pavement width (four, 12-foot travel lanes, 10-foot shoulders on each side, and a 28-foot raised median between the travel lanes)

Two signalized intersections are located along the Shopiere Road study area: Prairie Avenue and Cranston Road. All other side-street intersections are stop-controlled with Shopiere Road functioning as the "major" (i.e., non-stopping) roadway. Exclusive turn lanes are provided along Shopiere Road at Prairie Avenue, Moccasin Trail, Cranston Road, Inman Parkway, and the I-39/90 interchange ramps. The posted speed limit along Shopiere Road varies across the corridor: 25 miles per hour from Prairie Avenue to south of Cranston Road, 35 miles per hour from south of Cranston Road to north of Hart Road, and 45 miles per hour from north of Hart Road to I-39/90. Other than unmarked shoulders north of Murphy Woods Road, bicycle accommodations are not present along Shopiere Road while sidewalks are present at the following locations:

- Prairie Avenue / Moccasin Trail / Bayless Avenue (referred as the "Triangle" intersection) – sidewalks are generally present on both sides of the roadway
- The south side of Shopiere Road from the Triangle to Schuster Drive
- At the Cranston Road intersection, sidewalks are present along both sides of Cranston Road and the west side of the Shopiere Road northbound approach

Beloit Transit Route 2 runs along Shopiere Road south of Prairie Avenue while Routes 3 and 4 run north of Prairie Avenue to Cranston Road. The Piggly Wiggly Transfer Point is located in the southeast quadrant of the Prairie Avenue intersection, connecting Transit Routes 2, 3, 4, and 6. August 2023 traffic counts along Shopiere Road indicate a daily traffic volume of 7,900 vehicles per day (vpd) north of Moccasin Trail; 8,100 vpd north of Cranston Road; 6,400 vpd north of Creek Road; 7,000 vpd north of Inman Parkway; and 1,600 vpd north of I-39/90.



Existing Intersection Characteristics

Figure 2.1

Shopiere Road Corridor Study

Prairie Avenue

Prairie Avenue is a north-south principal arterial that connects Beloit to Janesville and serves many neighborhoods, businesses, and farms within and between the two communities. Prairie Avenue is a two-lane undivided roadway with on street parking north of Shopiere Road. At its signalized intersection with Shopiere Road, exclusive left turn and shared through/right-turn lanes are provided. Sidewalks are present on the west side of Prairie Avenue and on street parking is permitted on both sides of Prairie Avenue outside the Shopiere Road intersection area. Beloit Transit Route 4 runs north of Shopiere Road while Routes 2 and 6 run south of Shopiere Road. Prairie Avenue has a posted speed limit of 25 miles per hour south of Shopiere Road and 30 miles per hour north of Shopiere Road.

Cranston Road

Cranston Road is an east-west principal arterial roadway that connects US 51 to WIS 81 and serves as a vital east-west route in the City of Beloit. West of Shopiere Road, Cranston Road is a four-lane undivided roadway; east of Shopiere Road, Cranston Road transitions to a two-lane roadway with painted median. At its signalized intersection with Shopiere Road, exclusive left-turn and right-turn lanes are provided on Cranston Road. Sidewalks are provided on both sides of Cranston Road and an off-street multi-use path is present on the south side of Cranston Road, east of Shopiere Road. Beloit Transit Route 3 runs along Cranston Road east of Shopiere Road while Route 4 runs west of Shopiere Road. Parking is prohibited along Cranston Road and the roadway has a posted speed limit of 35 mph.

Inman Parkway

Inman Parkway, also known as Rock County Trunk Highway BT, is an east-west, two-lane, minor arterial that connects US 51 to County Trunk Highway S / Shopiere Road and provides an east-west connection on the northern parts of the city and town. At its unsignalized intersection with County Trunk Highway S / Shopiere Road, exclusive left-turn and right-turn lanes are provided on BT and all movements from Inman Parkway are under stop control. No exclusive left-turn lanes are provided on County Trunk Highway S. Bicycle and pedestrian accommodations are not present along Inman Parkway near Shopiere Road, and the roadway has a posted speed limit of 45 miles per hour.

Murphy Woods Road

Murphy Woods Road is an east-west, two-lane collector roadway that provides a connection from residential areas to north-south arterials in the city. At its unsignalized intersection with Shopiere Road, the wide intersection approach on Murphy Woods Road allows motorists to create de facto left-turn and right-turn lanes. All movements from Murphy Woods Road are under stop-sign control. No multimodal accommodations are present along Murphy Woods Road and the roadway has a posted speed limit of 25 miles per hour.

Creek Road

Creek Road is a north-south, two-lane collector roadway that generally parallels Shopiere Road and provides access to residential areas in northeast Beloit. At its unsignalized intersection with Shopiere Road, the wide intersection approach on Creek Road allows motorists to create de facto left-turn and right-turn lanes. All movements from Creek Road are under stop-sign control. No multimodal accommodations are present along Creek Road and the roadway has a posted speed limit of 25 miles per hour.

Hart Road

Hart Road is an east-west, two-lane collector roadway that connects Shopiere Road to the I-43 ramps. At its unsignalized intersection with Shopiere Road, exclusive left-turn and right-turn lanes are provided on Hart Road and all movements from Hart Road and under stop-sign control. No multimodal accommodations are provided along Hart Road and the roadway has a posted speed limit of 40 miles per hour.

Bayliss Avenue and Moccasin Trail

Bayliss Avenue and Moccasin Trial are east-west local streets that serve residential neighborhoods. Bayliss Avenue runs west of Prairie Avenue while Moccasin Trail runs east of Shopiere Road. At its intersection with Prairie Avenue, Bayliss Avenue does not provide exclusive turn lanes and all movement are under stop-sign control. At its intersection with Shopiere Road, Moccasin Trail provides exclusive left-turn and right-turn lanes, and all movements are under stop-sign control. On-street parking is provided on both sides of both roadways. Bayliss Avenue provides sidewalks on both sides of the roadway; however, Moccasin Trail does not provide any multimodal accommodations.

I-39/90 Interchange Ramps

Interstate highway 39/90 is a north-south, six-lane freeway that connects numerous major metropolitan areas in the Midwest. I-39/90 has a local, diamond-style interchange with Shopiere Road. Exclusive left-turn and right-turn lanes are provided on the exit ramps; all left-turn movements at both ramps and right-turn movements from the northbound exit ramp are under stop-sign control. The right-turn movement from the southbound exit ramp is a free-flow movement that becomes the outside through lane from southbound Shopiere Road.

2.2 Area Land Uses

For much of the study area, Shopiere Road travels through residential neighborhoods and land uses that support them. Several local retail parcels are located near the Triangle intersection such as Walgreens, Planet Fitness, a Piggly Wiggly supermarket, and several gas stations. North of Hart Road, Shopiere Road transitions to agricultural and vacant properties and a light industrial area near the I-39/90 interchange.

2.3 Planned Roadway Improvement Projects

One roadway improvement project that is planned within the Shopiere Road study area is the easterly extension of Inman Parkway. While this project has not been designed or programmed for construction, it is important to note this planned extension in the existing conditions as it may address roadway and intersection issues that currently existing along the corridor. This extension is described below:

- Inman Parkway / County Trunk Highway BT is proposed to be extended from its current terminus at Shopiere Road easterly to Winchester Drive on the City's east side near the I-43 and I-39/90 system interchange. This extension will provide a more direct connection between the City's north side and the Milwaukee Road corridor. The Inman Parkway intersections with Shopiere Road and Hart Road will be improved to accommodate traffic volumes at these locations.

2.4 Data Collection Plan

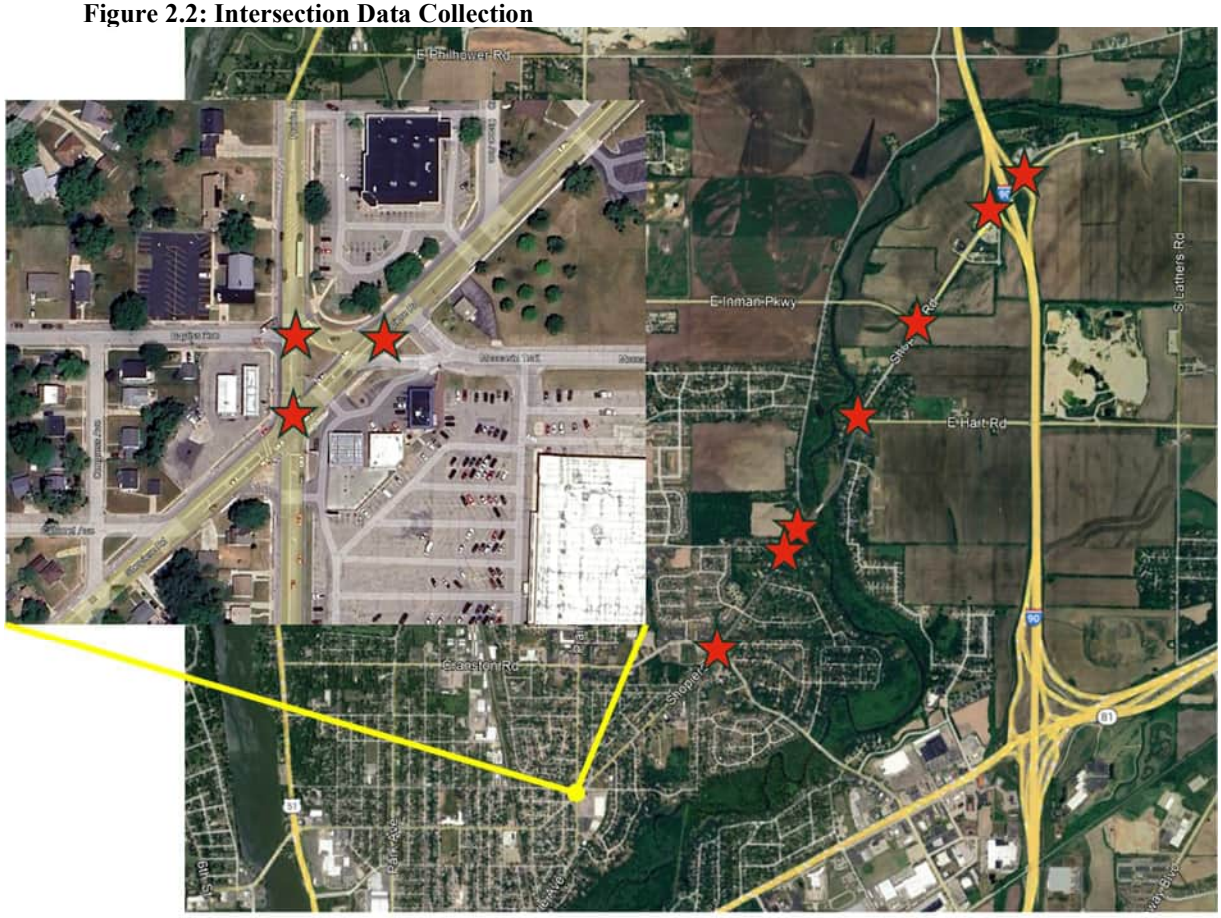
Data collection efforts focused on gathering and organizing a variety of information related to the study area. A field review of the study area was performed to gather intersection and roadway geometrics, multimodal facilities, and surrounding land uses. Traffic signal phasing and timing information within the study area was provided by the City of Beloit. Intersection turning movement counts were gathered to understand traffic operations during peak traffic periods within the study area.

Key intersections evaluated in this study were identified during the project scoping process. It was determined that intersection data collection would be conducted at the following locations:

- Shopiere Road and Prairie Avenue
- Shopiere Road and Moccasin Trail
- Prairie Avenue and Bayliss Avenue
- Shopiere Road and Cranston Road
- Shopiere Road and Murphy Woods Road
- Shopiere Road and Creek Road
- Shopiere Road and Hart Road
- Shopiere Road and Inman Parkway (CTH BT)
- Shopiere Road and I-39/90 SB ramps
- Shopiere Road and I-39/90 NB ramps

Key roadway and intersection locations are shown in **Figure 2.2**.

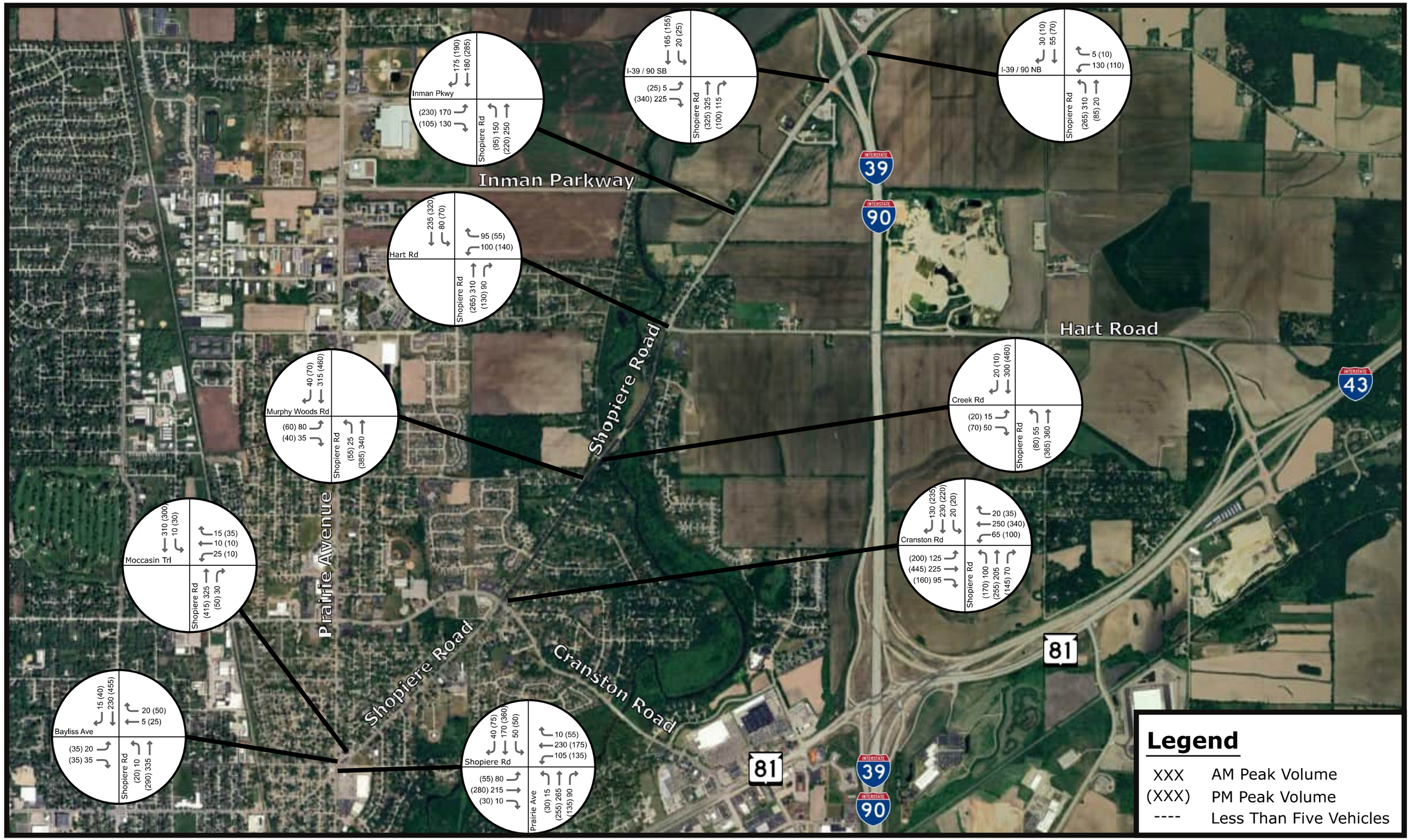
Figure 2.2: Intersection Data Collection



Source: Google

2.5 Peak Hour Turning Movement Counts

Weekday turning movement counts were collected at the above-mentioned intersections in May 2024 from 6:00 a.m. to 8:00 p.m. The counts, collected by AECOM, used video-based data collection technology. It was determined that the morning peak hour of the study area occurred from 7:15 a.m. to 8:15 a.m. and the afternoon peak hour occurred from 3:45 p.m. to 4:45 p.m. The peak-hour turning movement counts were reviewed for imbalances as counts were conducted over several days; volumes were adjusted, as needed, to provide a more balanced traffic volume data set. The existing peak hour turning movement volumes are illustrated in **Figure 2.3** while intersection turning movement count summaries for each location are provided in **Appendix A**.



Year 2024 Intersection Peak Hour Volumes

Figure 2.3

Shopiere Road Corridor Study

3 Corridor Safety Analysis

The existing roadway and intersection geometrics were reviewed to determine whether design standards and multimodal accommodations are met. Roadway and intersection crash data on Shopiere Road for Years 2019 through 2023 was obtained from WisDOT for review. This review investigated for crash commonalities and trends through the project corridor. The following section summarize the processes and results for the safety analysis.

3.1 Geometric Review

Roadway and intersection geometry along the corridor was reviewed and compared to national (AASHTO) and state (WisDOT Facilities Development Manual) standards. These standards provide information on recommended cross section elements, horizontal and vertical profile, site distance and intersection spacing. The following locations raise potential concerns to be considered for future improvements.

Shopiere Road Corridor

Access Density

The residential areas along the southern and central parts of the Shopiere Road study area provide numerous access points to the roadway for public streets, private driveways, and businesses. The northern portion of the study area becomes more rural with fewer access points provided. An access review of the corridor study area found that Shopiere Road has 148 total access points over 3.4 miles, equating to a corridor access density of approximately 43.5 access points per mile. From Prairie Avenue to Cranston Road, the more urban portion of the corridor, the access density is 50.8 access points per mile. This equates to one access point for every 100 to 120 feet. This access density falls in line with standard guidance of access density for urban arterial roadways.

Travel Speeds

Shopiere Road from Cranston Road to the I-39/90 ramps (approximately 2.13 miles) is an undivided 4-lane roadway where the speed limit changes from 35 mph to 45 mph approximately 530 feet north of Inman Parkway as the corridor transitions from urban to rural areas. Since the geometry does not change, the roadway environment is likely not conducive for motorists to follow the 35 mph speed limit. A spot speed study was conducted in July 2024 along Shopiere Road at Rachel Terrace to understand existing travel speeds within the 35-mph speed zone. A summary of this speed study is provided in **Table 3.1**.

Table 3.1: Shopiere Road Travel Speeds, at Rachel Terrace

Direction	Posted Speed (mph)	50th Percentile (mph)	85th Percentile (mph)	10-mph Pace	Percent Over 45 mph
Northbound	35	41.1	45.6	37 to 46	21.8%
Southbound	35	39.8	43.7	35 to 44	13.4%
Both directions	**35**	**40.3**	**45.1**	**35 to 44**	**17.3%**

The results of the spot speed study indicate that the majority of northbound and southbound vehicles are traveling faster than the posted speed limit, as shown by the 50th percentile speed (the speed in which half of observed motorists travel at or below) is above the posted speed limit and the pace (the 10-mph interval in which the majority of observed motorists travel) is at and above the posted speed limit. This is anticipated given the wide roadway cross-section, relatively low traffic volume characteristics, and low-density surrounding environment indicative of a higher-speed roadway. It should be noted that the 85th percentile speed, a statistic that is commonly used to describe the upper limit of reasonable speeds of a roadway segment and is often used to set speed limits, is approximately eight to ten mph higher than the posted speed limit, meaning that the posted speed limit of 35 mph is not reflective of the speed that most drivers travel in this area, which is approximately 45 mph; moreover, the percentage of "super-speeders", or those traveling more than ten mph above the speed limit, is approximately 17 percent, or one in six observed vehicles. This reinforces the condition that motorists are comfortable traveling at faster travel speeds than the posted speed limit. These speeds are concerning for all roadway users: the faster speeds can create difficulties for motorists evaluating gaps at intersections, while bicyclists and pedestrians typically feel stressed traveling along or near these speeds. With Shopiere Road located through residential neighborhoods, this condition should be addressed.

Shopiere Road from Cranston Road to Prairie Avenue is an undivided two-lane roadway with intermittent street parking where the speed limit changes from 35 mph to 25 mph approximately 150 feet north of Chippewa Trail. Since the geometry does not change, the roadway environment may not be conducive for motorists to follow the 25 mph speed limit and may travel in a similar manner to what was observed from the spot speed study.

Skewed Intersections

Numerous skewed intersections are present along Shopiere Road. Skewed intersections occur when streets intersect at angles other than ninety degrees; while minor intersection skew may not affect safety and mobility, more significant intersection skew can create complex gap assessment situations for pedestrians, bicyclists, and motorists. Skewed intersections can also lead to increased crossing distances for pedestrians and bicyclists, higher speed turning movements by vehicles, and potentially impact sight distances. WisDOT FDM 11-25-2.8 states that intersection skews within 70 to 110 degrees are considered acceptable for intersection design. The following locations were identified as having skewed intersections, with their approximately intersection skew angle provided:

- Prairie Avenue, 45 degrees
- Crane Avenue, 45 degrees
- Vail Terrace, 45 degrees
- Schuster Drive, 45 degrees

Horizontal Curve Sight Distance
Intersection sight distance and stopping sight distance concerns may occur at horizontal curves when the roadway alignment and external obstructions (e.g., buildings/structures, vegetation, utility poles, signposts, etc.) block the view of vehicles from seeing approaching hazards. This condition typically increases crash risk due to a motorist's inability to safely react to an approaching hazard or an increase in improper gap assessment. The following intersections were identified as having a potential sight distance issue due to horizontal roadway alignment and/or other external factors:

- Murphy Woods Road
- Creek Road
- Rachel Terrace
- Hart Road
- Inman Parkway

Triangle Intersection (Shopiere Road, Prairie Avenue, Moccasin Trail, Bayliss Avenue)

Shopiere Road, Prairie Avenue, Moccasin Trail, and Bayliss Avenue converge near the southern portion of the study limits shown in **Figure 3.1**. Shopiere Road and Prairie Avenue is signal controlled while Bayliss Avenue and Moccasin Trail are stop-controlled, T-intersections. Within the physical intersection area (the space confined within the corners of the intersection), there are five driveways for the adjacent gas stations. Having driveways within the physical intersection area typically creates mobility and safety issues as numerous turning movements can occur over a very short distance and motorists are unable to inform others what specific turning movement they are about to perform. Additional business and residential driveways are present in the intersection's functional area, which is the area leading up to an intersection where motorists need to make decisions regarding turning, stopping, accelerating, exiting, merging, and weaving. This condition, too, typically creates mobility and safety issues as motorists cannot properly tell others what specific turning movements they are performing.
Observed traffic operations at the Shopiere Road and Prairie Avenue indicate that southbound motorists on Prairie Avenue waiting at Shopiere Road can block the Bayliss Avenue intersection. Southbound vehicles on Prairie Avenue may leave a gap at Bayliss Avenue to allow turning traffic to and from Bayliss Avenue to access Prairie Avenue. However, this condition increases safety risk as vehicles from Bayliss Avenue enter the physical intersection to see if it clear to continue under the assumption that stopped and approaching motorists will slow or stop for them. This is shown in **Figure 3.2**.

Figure 3.1: Shopiere Road/ Prairie Avenue/ Bayliss Avenue/ Moccasin Trail ("Triangle") Intersection

Figure 3.2: Southbound Prairie Avenue at Shopiere Road

As shown in **Figure 3.3**, the southbound right-turn lane from Shopiere Road to Prairie Avenue is marked as right-turn only to northbound Prairie Avenue. However, vehicles were frequently observed to use this lane as a connection to westbound Bayliss Avenue, as shown in

Figure 3.4. This situation increases crash risk as motorists are performing unexpecting turning movements which Prairie Avenue motorists are not anticipating; in addition, motorists waiting to continue westbound on Bayliss Avenue may create unexpected congestion in the right-turn lane.

Figure 3.3: Shopiere Road Right Turn Slip Lane to NB Prairie Avenue

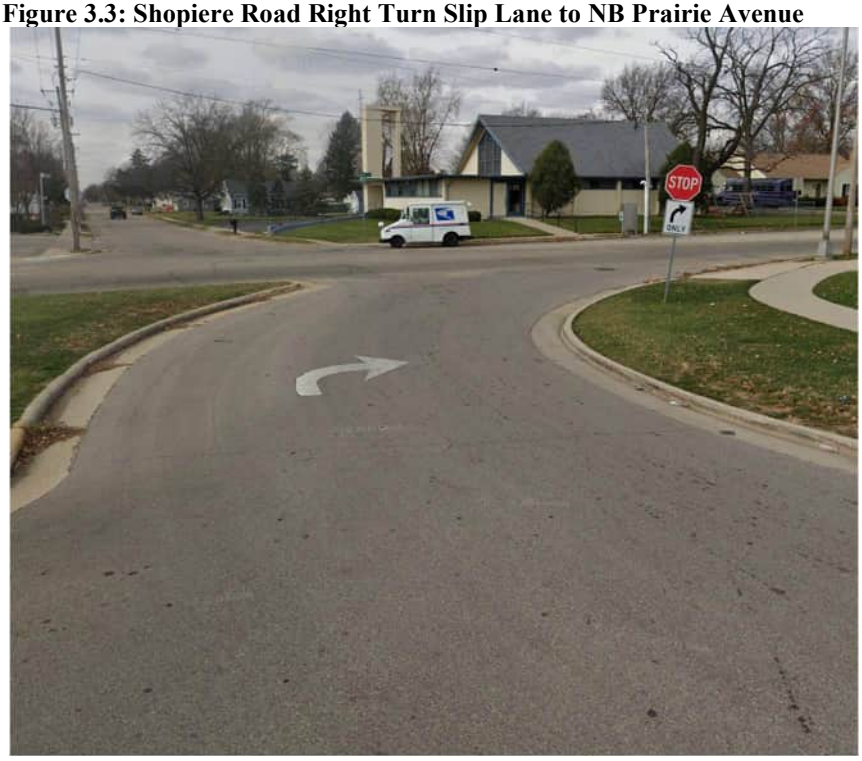


Figure 3.4: Shopiere Road Right Turn Slip Lane Illegal Through Movement to Bayliss Avenue

Cranston Road intersection

The intersection of Shopiere Road with Cranston Road provides right-turn trapping lanes on the southbound and eastbound approaches as well as a left-turn trapping lane on the westbound approach. The trapping lanes at the Shopiere Road and Cranston Road intersection are shown in **Figure 3.5**. A trapping lane is a geometric and operational condition where a travel lane becomes an exclusive turn lane, "trapping" the driver that wishes to continue through the intersection and forces them to make potentially sudden lane shifts and/or speed changes to merge into the through lane. This increases the crash risk for sideswipe and rear-end crashes due to these sudden lane changes.

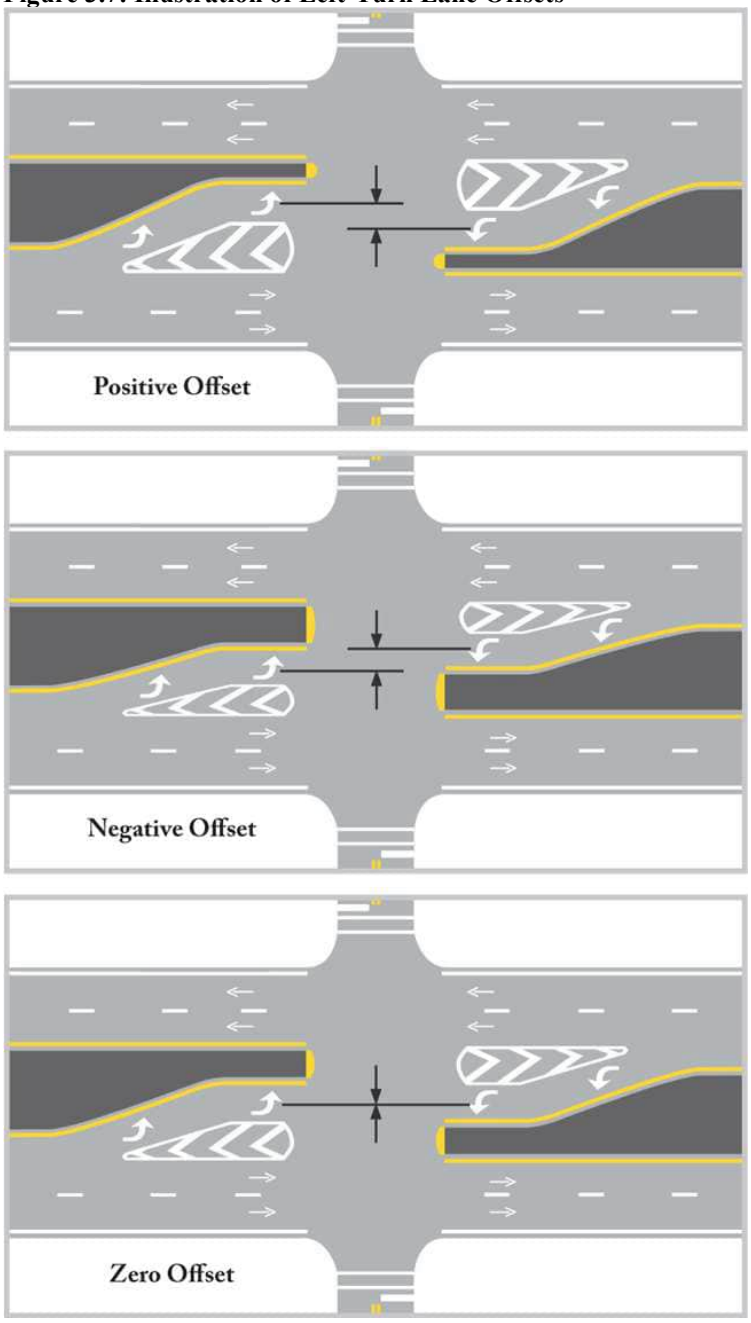
Figure 3.5: Location of Shopiere Road and Cranston Road Trapping Lanes

A driveway to Casey's gas station is located on Shopiere Road approximately 360 feet south of Cranston Road. The location of this driveway is within a lane merge for southbound Shopiere Road as shown in **Figure 3.6**. This situation may create driver expectancy issues as southbound motorists may travel in the outside through lane to access the driveway when it may be anticipated that traffic is merging to continue southbound on Shopiere Road.

Figure 3.6: Casey's Gas Station Driveway Location

Both sets of opposing left-turn lanes at Shopiere Road and Cranston Road do not provide positive left-turn lane offset for motorists. Opposing left-turn lanes at intersections are aligned with positive, negative, or zero offset, as shown in **Figure 3.7.** Intersections with negative left-turn lane offset can result in opposing left-turning vehicles blocking the vision of each other. This condition can increase left-turn crash risk. Intersections with zero offset can still have left-turning vehicles block the vision of opposing traffic, but typically not to the extent or frequency of a negative left-turn lane offset.

Figure 3.7: Illustration of Left-Turn Lane Offsets



I-39/90 Southbound Ramps

The outside through lane on Shopiere Road northbound becomes a trapping right-turn lane for the I-39/90 southbound entrance ramp. As discussed earlier in this chapter, this condition can lead to sudden vehicle movements to avoid being stuck in the right-turn lane. This condition is shown in **Figure 3.8**.

Figure 3.8: Northbound Shopiere Road at I-39/90 Southbound Ramps

3.2 Multimodal Accommodations Review

A review of existing infrastructure for bicyclists and pedestrians, such as sidewalks, bike lanes, and bike paths, was performed to understand their current state. This evaluation included the physical state of the surface, associated pavement markings or other infrastructure, wayfinding or guidance elements, and connectivity.

Pedestrian Accommodations

Sidewalks are present along the following sections of Shopiere Road:

- Triangle intersection – sidewalks are generally present on both sides of Shopiere Road
- The south side of Shopiere Road form the Triangle to Schuster Drive
- At the Cranston Road intersection, sidewalks are present along both sides of Cranston Road and the west side of the Shopiere Road northbound approach

The lack of continuous sidewalks along Shopiere Road, let alone any sidewalks north of Cranston Road, creates discontinuity for pedestrians and may force pedestrians to walk along the shoulders or traveled way of Shopiere Road, creating significant crash risk concerns given the travel speeds along Shopiere Road.

Pedestrian crossings were found not compliant with the Americans with Disabilities Act (ADA) requirements of appropriate curb ramp design at intersections and driveways across the entire corridor. An example of this is shown in **Figure 3.9** where the driveway crossing lacks any ramp connections.

Figure 3.9: Sidewalk Crossing on Shopiere Road at Prairie Avenue

Marked crosswalks crossing Shopiere Road are only provided at the south approach of Prairie Avenue and at Cranston Road; this is likely due to a lack of east-west sidewalk connections along many side-streets. The Triangle intersection has numerous retail uses that may attract pedestrian traffic; however, with only two marked crosswalks provided, pedestrians may travel using unmarked paths across Shopiere Road and Prairie Avenue. **Figure 3.10** shows an example of this unconventional pedestrian movement.

Figure 3.10: Pedestrian Crossing Prairie Avenue at Bayliss Avenue

Bicycle Accommodations

Marked bicycle accommodations (e.g., on-street bike lanes, multi-use paths) are not present on the Shopiere Road corridor. Existing roadway cross-section elements, such as parking lanes from Prairie Avenue to Cranston Road and paved shoulders from Hart Road to I-39/90, are provided and could be used as de facto bicycle accommodations. However, given the prevailing travel speeds of motorists and the lack of marked bicycle accommodations, it is likely that bicyclists feel uncomfortable using these features for travel.

3.3 Intersection Crash Statistics

WisDOT provided crash data (Years 2019 through 2023) for the extents of the Shopiere Road corridor. This data was reviewed for crash frequency, severity, and commonalities for key intersections and roadway segments throughout the study area. **Table 3.2** illustrates the injury type, total crashes, and intersection crash rate for each location.

As a general rule of thumb, locations with an intersection crash rate above 1.0 crashes per million entering vehicles (MEV) should be considered for further investigation and mitigation. From the table, one intersection (Cranston Road) has a crash rate above the 1.0 threshold while one intersection (Prairie Avenue / Bayliss Avenue) is just below the 1.0 crash rate threshold.

The following outlines historical crash data at the key study intersections and any crash trends or commonalities identified from the crash review.

Table 3.2: Intersection Crash Statistics

Intersection	Injury Type					Total Crashes	Crash Rate (MEV)
	K	A	B	C	O		
Prairie Avenue	0	1	2	2	18	23	0.80
Bayliss Avenue	0	0	1	3	12	16	**0.99**
Moccasin Way	0	0	0	0	6	6	0.33
Cranston Road	0	0	5	4	32	41	**1.39**
Murphy Woods Road	0	0	2	0	4	6	0.34
Creek Road	0	0	1	0	1	2	0.14
Hart Road	0	1	1	0	5	7	0.42
Inman Parkway	0	2	3	2	9	16	0.75
I-39/90 Southbound	0	0	0	0	4	4	0.24
I-39/90 Northbound	0	0	2	0	4	6	0.70

Crash data obtained from UW TOPS Lab for 2019 through 2023
K – fatal crash ; A – serious injury crash ; B – minor injury crash
C – possible injury crash ; O – property damage only crash
Crash rate – crashes per million entering vehicles (MEV)

Shopiere Road and Prairie Avenue

At the Prairie Avenue intersection, 23 intersection-related crashes were reported in the past five years. Of those 23 crashes, 13 were rear-end crashes, 7 were angle crashes, and 3 were head-on crashes. 9 of 13 rear-end crashes involved vehicles traveling on Shopiere Road. 5 of 7 angle crashes involved a left-turning vehicle being struck by a through vehicle. 8 of 23 crashes involved a driver over the age of 65. 11 of 23 crashes occurred between 2:00 p.m. and 6:00 p.m.
The majority of all crashes at this location (as well as Shopiere Road / Moccasin Trail and Prairie Avenue / Bayless Avenue) may be the result of having three roadway corridors intersect each other in a triangular pattern in which each intersection is less than 200 feet from the others. In addition, three driveways to a gas station and shopping center are located within the physical limits of these intersections while several more driveways and public streets are within the functional limit of these intersections. Having numerous intersections and driveways within a short distance increases crash risk in the area as motorists have many locations to enter and exit a roadway. This condition leads to motorists being unaware of other intentions, such as slowing or stopping to exit the traffic stream or perform a non-traditional traffic movement to travel through the area. This, in turn, increases the crash probability due to driver expectancy issues; as noted above, approximately one-third of the crashes involved motorists over the age of 65 who, typically, have slower reaction times and reduced gap assessment capabilities.

Shopiere Road and Moccasin Trail

At the Moccasin Trail intersection, six intersection-related crashes were reported in the past five years. Of those six crashes, three were angle crashes and three were rear-end crashes. 4 of 6 crashes involved a left-turning vehicle being struck. 3 of 6 crashes involved a driver over the age of 65. This intersection is part of the Shopiere Road and Prairie Avenue “triangle” intersection; possible crash factors identified at that location are applicable to this location.

Prairie Avenue and Bayless Avenue

At the Prairie Avenue and Bayless Avenue intersection, 16 intersection-related crashes were reported in the past five years. Of those 16 crashes, six were angle crashes, six were rear-end crashes, two were single-vehicle crashes, one was a sideswipe crash, and one was a head-on crash. 5 of 16 crashes involved a driver over the age of 65. 7 of 16 crashes were identified as a hit-and-run crash. This intersection is part of the Shopiere Road and Prairie Avenue "triangle" intersection; possible crash factors identified at that location are applicable to this location.

Shopiere Road and Cranston Road

At the Cranston Road intersection, 41 intersection-related crashes were reported in the past five years. Of those 41 crashes, 15 were angle crashes, 11 were rear-end crashes, 7 were sideswipe crashes, 4 were single-vehicle crashes, and 4 were head-on crashes. 10 of 41 crashes occurred during wet or snow-covered roadway conditions. 10 of 41 crashes involved a teenage driver while 9 of 41 crashes involved a driver over the age of 65. 18 of 41 crashes occurred between 2:00 p.m. and 6:00 p.m. Five of the 11 rear-end crashes involved westbound vehicles while 3 involved southbound vehicles, 2 involved eastbound vehicles, and 1 involved northbound vehicles. Seven of 15 angle crashes involved a left-turning vehicle being struck by a through vehicle (four of the seven were westbound left-turning vehicles). Three of seven sideswipe crashes involved westbound-traveling vehicles.

All four intersection approach legs have "trapping lane" situations where a through lane becomes an exclusive turn lane at the intersection. This condition increases crash risk due to sudden lane changes or stopping/slowing as motorists attempt to merge into a through lane. All left-turn lanes have a negative or zero left-turn lane offset which can block the vision of left-turning motorists of approaching vehicles in the opposite lanes. This condition can increase crash risk for left-turning traffic as they are unaware of approaching vehicles as they complete their turn movement. It is also possible that traffic signal timing elements at this location may not adequately accommodate higher-volume traffic movements and motorists may use the clearance intervals to enter and travel through the intersection. This can increase crash risk by creating driver expectancy issues at the intersection.

Shopiere Road and Murphy Woods Road

At the Murphy Woods Road intersection, six intersection-related crashes were reported in the past five years. Of those six crashes, three were single-vehicle crashes, two were angle crashes, and one was a rear-end crash. Three of six crashes involved a teenage driver. Four of six crashes involved vehicles traveling southbound.

Shopiere Road and Creek Road

At the Creek Road intersection, two intersection-related crashes were reported in the past five years; one was an angle crash, and one was a rear-end crash. No other significant crash trends or commonalities were identified.

Shopiere Road and Hart Road

At the Hart Road intersection, seven intersection-related crashes were reported in the past five years. Three crashes were single-vehicle crashes, three crashes were angle crashes, and one crash was a rear-end crash. An A-type (serious) injury crash occurred at this intersection, but the reporting officer cited aggressive driving and an impaired motorist played a factor in the crash.

Shopiere Road and Inman Parkway

At the Inman Parkway intersection, 16 intersection-related crashes were reported in the past five years. Nine crashes were angle crashes, four were rear-end crashes, and three were single-vehicle crashes. Nine of 16 crashes occurred during a five-hour period that coincides with traditional commuter time periods (6:00 a.m. to 9:00 a.m. and 4:00 p.m. to 6:00 p.m.). Six of 9 angle crashes involved a left-turning vehicle from Inman Parkway being struck. Two A-type (serious) injury crashes occurred at this location: one was the result of a single-vehicle leaving the roadway and striking the ditch (it should be noted that this crash was flagged for aggressive driving and impaired driver), while the other was a left-turning vehicle was struck by a through vehicle. The intersection is a T-intersection with the Inman Parkway approach under stop-sign control. Shopiere Road provides four travel lanes with no median or physical separation of the travel lanes. Left-turning motorists likely have difficulty entering the Shopiere Road traffic stream as they must assess gaps for northbound and southbound traffic before entering the intersection. This condition be especially challenging for trucks and larger vehicles due to their length and acceleration characteristics. In addition, a southbound right-turn lane is provided on Shopiere Road; it is possible that the vision of motorists on Inman Parkway may be blocked by right-turning vehicles (especially large trucks) as they are assessing gaps for oncoming southbound motorists. This condition may also contribute to the high frequency of left-turn crashes.

Shopiere Road and I-39/90 Southbound Ramps

At the I-39/90 southbound interchange ramp termini intersection, four intersection-related crashes were reported in the past five years. All four crashes were single-vehicle crashes. For three crashes, the motorist traveling on the exit ramp left the roadway and struck an object while one other crash was a vehicle fire.

Shopiere Road and I-39/90 Northbound Ramps

At the I-39/90 northbound interchange ramp termini intersection, six intersection-related crashes were reported in the past five years. Four of six crashes were single-vehicle crashes and two were angle crashes. Both angle crashes involved a westbound through vehicle striking a left-turning vehicle. Two of four single-vehicle crashes cited speed as a factor in the crash.

4 Pavement and Traffic Signal Inventory

An investigation of the existing roadway pavement and traffic signal equipment was performed along Shopiere Road. This analysis will provide a preliminary evaluation of the roadway pavement condition and traffic signal equipment to determine if any deficiencies are present.

4.1 Roadway Pavement Evaluation

Shopiere Road has an asphalt pavement roadway surface throughout the entirety of the study area. From Prairie Avenue to Inman Parkway, concrete curb and gutter is provided; from Inman Parkway to I-39/90, ten-foot asphalt and gravel shoulders are present. The current roadway surface was installed over several time periods including Years 2007, 2008, 2015, 2018, and 2024. An inventory of the existing pavement condition was performed by visually inspecting the roadway and driving over the roadway surface. In addition, WisDOT's Wisconsin Local Roads (WISLR) database was reviewed to obtain its PASER score. PASER scores indicates the current condition of the roadway pavement and are calculated based on surface type, identified distress, distress severity levels, rutting, and faulting. PASER scores range from one to ten, with ten representing a new roadway surface and one representing a completely failed pavement. The PASER scores for Shopiere Road are as follows:

- Shopiere Road from Prairie Avenue to Inman Parkway – 7
- Shopiere Road from Inman Parkway to I-39/90 – 8

PASER scores of 7 indicate the roadway is in "good" condition and may be showing minimal traffic wear, such as longitudinal cracks. PASER scores of 8 indicate the roadway is in "very good" condition. Pavements with these scores are typically treated with maintenance efforts, such as sealcoating and crack filling. These scores fall in line with a visual review of the roadway as the asphalt pavement provided a smooth ride with minimal faulting or cracking of the roadway surface.

4.2 Traffic Signal Inventory

Two traffic signal installations currently exist along Shopiere Road: Cranston Road and Prairie Avenue. The following describes an inventory of the equipment at each traffic signal location.

Cranston Road

Traffic signals and poles at this location are in good condition; while the traffic signals are operating properly, some signal heads are missing the backplate (see image). Backplates help distinguish the signal head from its background (e.g., sunlight). Consideration should be made to add backplates where necessary as well as install retroreflective backplates to enhance the visibility and noticeability of the signals.

Intersection observations indicated a green signal phase occurring with no cars approaching, increasing the delay for vehicles stopped at other approaches. In addition, the long clearance interval (yellow + all red) may increase the probability of red-light running and "beating the yellow" by motorists. Therefore, consideration should be given to review the traffic signal timing plans at this intersection to determine appropriate phase and clearance interval parameters.

Crosswalks and pedestrian equipment are provided on all intersection approaches. Consideration should be given to provide pedestrian accommodations such as a sidewalk along Shopiere Road.

Shopiere Road at Cranston Road, Looking Northeast

Prairie Avenue

Traffic signals and poles at this location are in good condition; while the traffic signals are operating properly, one signal head is missing the backplate (see image). Backplates help distinguish the signal head from its background (e.g., sunlight). Consideration should be made to add backplates where necessary as well as install retroreflective backplates to enhance the visibility and noticeability of the signals.

Crosswalks and pedestrian signal equipment are provided on the northbound approaches of Shopiere Road and Prairie Avenue. It is recommended that the crosswalks have countdown timers to inform pedestrians how much time remains for the pedestrian phase before the traffic signal phasing changes.

Prairie Road at Shopiere Road, Looking North

5 Traffic Operations Analysis

To determine how traffic operates under existing conditions, an operational analysis was conducted for intersections identified in **Section 2.4** using methodologies published in the *Highway Capacity Manual* (HCM). The HCM module in the traffic operations software package, Synchro12, was used to document the results of the traffic operations analysis. Operational analysis results identify a Level of Service (LOS), which is intended to depict the quality of traffic flow through an intersection. Signalized and unsignalized intersections are given a ranking from LOS A through LOS F as a function of the average control delay as presented in **Table 5.1** for signalized intersections and **Table 5.2** for unsignalized and intersections. For urban arterials such as Shopiere Road, the minimum acceptable LOS is LOS D.

Table 5.1. Level of Service (LOS) Criteria, Signalized Intersections

LOS Designation	Average Control Delay/Vehicle (seconds)	Description
A	≤ 10.0	Very low vehicle delays, free flow, signal progression extremely favorable, most vehicles arrive during given signal phase.
B	10.1 to 20.0	Good signal progression, more vehicles stop and experience higher delays than for LOS A.
C	20.1 to 35.0	Stable flow, fair signal progression, significant number of vehicles stop at signals.
D	35.1 to 55.0	Congestion noticeable, longer delays and unfavorable signal progression, many vehicles stop at signals.
E	55.1 to 80.0	Limit of acceptable delay, unstable flow, poor signal progression, traffic near roadway capacity, frequent cycle failures.
F	> 80.0	Unacceptable delays, extremely unstable flow and congestion, traffic exceeds roadway capacity, stop-and-go conditions

Table 5.2. Level of Service (LOS) Criteria, Unsignalized Intersections

LOS Designation	Average Control Delay/Vehicle (seconds)	Description
A	≤ 10.0	No delays at intersections with continuous flow of traffic. Uncongested operations: high frequency of long gaps available for all left and right turning traffic. No observable queues.
B	10.1 to 15.0	Same as LOS A
C	15.1 to 25.0	Moderate delays at intersections with satisfactory to good traffic flow. Light congestion; infrequent backups on critical approaches.
D	25.1 to 35.0	Increased probability of delays along every approach. Significant congestion on critical approaches, but intersection functional. No standing long lines formed.
E	35.1 to 50.0	Heavy traffic flow condition. Heavy delays probable. No available gaps for cross-street traffic or main street turning traffic. Limited stable traffic flow.
F	> 50.0	Unstable traffic flow. Heavy congestion. Traffic moves in forced flow condition. Average delays greater than one minute highly probable. Total breakdown.

SOURCE: *Highway Capacity Manual, HCM2010*, Transportation Research Board, 2010.

5.1 Existing Conditions

To determine how traffic currently operates in the study area, an operational analysis was conducted for the weekday morning and afternoon peak hours at the key intersections. Existing geometrics, traffic controls, and peak hour traffic volumes for the key intersections are shown in Figure 2.1 and Figure 2.3. Level of service and queueing results for each turning movement at the analyzed intersections are shown in **Table 5.3** for the weekday AM peak hour and **Table 5.4** for the weekday PM peak hour. The traffic operations output files are in **Appendix B.**

The Shopiere Road roadway alignment runs southwest-to-northeast in the study area. For the following tables, Shopiere Road is identified as a northbound / southbound roadway except for the Prairie Avenue intersection where Shopiere Road is identified as eastbound / westbound.

Table 5.3. Traffic Operations Analysis, Existing Conditions, Weekday AM Peak Hour

Intersection	Overall		By Approach	Eastbound			Westbound			Northbound			Southbound		
	Delay (s)	LOS		EBL	EBT	EBR	WBL	WBT	WBR	NBL	NBT	NBR	SBL	SBT	SBR
Shopiere Road & Prairie Avenue	14.8	B	Lane Configuration	1	1	1	1	1	1	1	1>	-	1	1>	-
			Volume	80	215	10	105	230	10	15	265	90	50	170	40
			Delay (s)	11.0	16.3	0.0	12.2	18.1	0.0	13.5	14.5	-	18.6	11.9	-
			LOS	B	B	A	B	B	A	B	B	-	B	B	-
			V/C Ratio	0.21	0.54	0.00	0.27	0.67	0.00	0.04	0.70	-	0.20	0.41	-
			95% Queue (ft)									-			-
Prairie Avenue & Bayliss Avenue	1.6	A	Lane Configuration	-	<1>	-	-	1>	-	1	1	-	-	1>	-
			Volume	20	-	35	-	5	20	10	335	-	-	230	15
			Delay (s)	-	12.5	-	-	11.8	-	7.8	0.0	-	-	0.0	-
			LOS	-	B	-	-	B	-	A	A	-	-	A	-
			V/C Ratio	-	0.11	-	-	0.05	-	0.01	0.00	-	-	0.00	-
			95% Queue (ft)	-	10	-	-	5	-	0	0	-	-	0	-
Shopiere Road & Moccasin Trail	1.1	A	Lane Configuration	-	-	-	-	<1	1	-	1	1	-	<1	-
			Volume	-	-	-	25	10	15	-	325	30	10	310	-
			Delay (s)	-	-	-	-	16.0	10.6	-	0.0	-	-	8.1	-
			LOS	-	-	-	-	C	B	-	A	-	-	A	-
			V/C Ratio	-	-	-	-	0.11	0.03	-	0.00	-	-	0.01	-
			95% Queue (ft)	-	-	-	-	10	5	-	0	-	-	0	-
Shopiere Road & Cranston Road	18.8	B	Lane Configuration	1	1	1	1	2>	-	1	1	1	1	1	1
			Volume	125	225	95	65	250	20	100	205	70	20	230	130
			Delay (s)	14.7	23.7	18.6	15.0	19.7	-	14.0	19.4	16.6	13.0	19.7	16.7
			LOS	B	C	B	B	B	-	B	B	B	B	B	B
			V/C Ratio	0.32	0.67	0.21	0.21	0.42	-	0.28	0.54	0.14	0.06	0.57	0.24
			95% Queue (ft)						-						
Shopiere Road & Murphy Woods Road	2.3	A	Lane Configuration	1	-	1	-	-	-	-	<2	-	-	2>	-
			Volume	80	-	35	-	-	-	25	340	-	-	315	40
			Delay (s)	16.8	-	9.7	-	-	-	-	8.2	-	-	0.0	-
			LOS	C	-	A	-	-	-	-	A	-	-	A	-
			V/C Ratio	0.05	-	0.05	-	-	-	-	0.03	-	-	0.00	-
			95% Queue (ft)	25	-	5	-	-	-	-	5	-	-	0	-
Shopiere Road & Creek Road	1.6	A	Lane Configuration	1	-	1	-	-	-	-	<2	-	-	2>	-
			Volume	15	-	50	-	-	-	55	360	-	-	300	20
			Delay (s)	15.5	-	9.7	-	-	-	-	8.2	-	-	0.0	-
			LOS	C	-	A	-	-	-	-	A	-	-	A	-
			V/C Ratio	0.05	-	0.07	-	-	-	-	0.05	-	-	0.00	-
			95% Queue (ft)	5	-	5	-	-	-	-	5	-	-	0	-
Shopiere Road & Hart Road	4.6	A	Lane Configuration	-	-	-	1	-	1	-	2>	-	-	<2	-
			Volume	-	-	-	100	-	95	-	310	90	80	235	-
			Delay (s)	-	-	-	23.8	-	10.7	-	0.0	-	-	8.7	-
			LOS	-	-	-	C	-	B	-	A	-	-	A	-
			V/C Ratio	-	-	-	0.38	-	0.15	-	0.00	-	-	0.09	-
			95% Queue (ft)	-	-	-	45	-	15	-	0	-	-	10	-
Shopiere Road & Inman Parkway	8.1	A	Lane Configuration	1	-	1	-	-	-	-	<2	-	-	2	1
			Volume	170	-	130	-	-	-	150	250	-	-	180	175
			Delay (s)	34.3	-	9.7	-	-	-	-	8.7	-	-	0.0	0.0
			LOS	D	-	A	-	-	-	-	A	-	-	A	A
			V/C Ratio	0.62	-	0.16	-	-	-	-	0.15	-	-	0.00	0.00
			95% Queue (ft)	100	-	15	-	-	-	-	15	-	-	0	0
Shopiere Road & I-39/90 SB Ramps	0.4	A	Lane Configuration	1	-	1	-	-	-	-	1	1	1	1	-
			Volume	5	-	225	-	-	-	-	325	115	20	165	-
			Delay (s)	13.2	-	0.0	-	-	-	-	0.0	0.0	8.3	0.0	-
			LOS	B	-	A	-	-	-	-	A	A	A	A	-
			V/C Ratio	0.01	-	0.00	-	-	-	-	0.00	0.00	0.02	0.00	-
			95% Queue (ft)	5	-	0	-	-	-	-	0	0	5	0	-
Shopiere Road & I-39/90 NB Ramps	14.9	B	Lane Configuration	-	-	-	1	-	1	1	1	-	-	1	1
			Volume	-	-	-	130	-	5	310	20	-	-	55	30
			Delay (s)	-	-	-	43.4	-	8.6	8.1	0.0	-	-	0.0	0.0
			LOS	-	-	-	E	-	A	A	A	-	-	A	A
			V/C Ratio	-	-	-	0.64	-	0.01	0.24	0.00	-	-	0.00	0.00
			95% Queue (ft)	-	-	-	100	-	5	25	0	-	-	0	0

NOTE: Shopiere Road is shown as northbound / southbound except for Prairie Avenue intersection, where it is eastbound / westbound

Table 5.4. Traffic Operations Analysis, Existing Conditions, Weekday PM Peak Hour

Intersection	Overall		By Approach	Eastbound			Westbound			Northbound			Southbound		
	Delay (s)	LOS		EBL	EBT	EBR	WBL	WBT	WBR	NBL	NBT	NBR	SBL	SBT	SBR
Shopiere Road & Prairie Avenue	16.0	B	Lane Configuration	1	1	1	1	1	1	1	1>	-	1	1>	-
			Volume	55	280	30	135	175	55	30	255	135	50	360	75
			Delay (s)	11.6	20.2	0.0	13.1	16.2	0.0	19.7	14.5	-	19.1	15.3	-
			LOS	B	C	A	B	B	A	B	B	-	B	B	-
			V/C Ratio	0.12	0.69	0.00	0.37	0.42	0.00	0.12	0.68	-	0.18	0.74	-
			95% Queue (ft)									-			-
Prairie Avenue & Bayliss Avenue	2.8	A	Lane Configuration	-	<1>	-	-	1>	-	1	1	-	-	1>	-
			Volume	35	-	35	-	25	50	20	290	-	-	455	40
			Delay (s)	-	20.4	-	-	14.4	-	8.6	0.0	-	-	0.0	-
			LOS	-	C	-	-	B	-	A	A	-	-	A	-
			V/C Ratio	-	0.25	-	-	0.18	-	0.02	0.00	-	-	0.00	-
			95% Queue (ft)	-	25	-	-	15	-	5	0	-	-	0	-
Shopiere Road & Moccasin Trail	1.1	A	Lane Configuration	-	-	-	-	<1	1	-	1	1	-	<1	-
			Volume	-	-	-	10	10	35	-	415	50	30	300	-
			Delay (s)	-	-	-	-	16.4	11.1	-	0.0	-	-	8.3	-
			LOS	-	-	-	-	C	B	-	A	-	-	A	-
			V/C Ratio	-	-	-	-	0.06	0.06	-	0.00	-	-	0.03	-
			95% Queue (ft)	-	-	-	-	5	5	-	0	-	-	5	-
Shopiere Road & Cranston Road	23.6	C	Lane Configuration	1	1	1	1	2>	-	1	1	1	1	1	1
			Volume	200	445	160	100	340	35	170	255	145	20	220	235
			Delay (s)	15.1	29.6	18.1	18.1	20.9	-	19.8	24.8	21.7	19.2	28.8	27.2
			LOS	B	C	B	B	C	-	B	C	C	B	C	C
			V/C Ratio	0.44	0.82	0.22	0.37	0.40	-	0.47	0.60	0.26	0.06	0.63	0.50
			95% Queue (ft)						-						
Shopiere Road & Murphy Woods Road	2.2	A	Lane Configuration	1	-	1	-	-	-	-	<2	-	-	2>	-
			Volume	60	-	40	-	-	-	55	385	-	-	460	70
			Delay (s)	21.2	-	10.3	-	-	-	-	8.8	-	-	0.0	-
			LOS	C	-	B	-	-	-	-	A	-	-	A	-
			V/C Ratio	0.22	-	0.06	-	-	-	-	0.06	-	-	0.00	-
			95% Queue (ft)	20	-	5	-	-	-	-	5	-	-	0	-
Shopiere Road & Creek Road	2.0	A	Lane Configuration	1	-	1	-	-	-	-	<2	-	-	2>	-
			Volume	20	-	70	-	-	-	80	365	-	-	460	10
			Delay (s)	19.3	-	10.3	-	-	-	-	8.7	-	-	0.0	-
			LOS	C	-	B	-	-	-	-	A	-	-	A	-
			V/C Ratio	0.08	-	0.10	-	-	-	-	0.08	-	-	0.00	-
			95% Queue (ft)	5	-	10	-	-	-	-	10	-	-	0	-
Shopiere Road & Hart Road	4.6	A	Lane Configuration	-	-	-	1	-	1	-	2>	-	-	<2	-
			Volume	-	-	-	140	-	55	-	265	130	70	320	-
			Delay (s)	-	-	-	23.0	-	10.0	-	0.0	-	-	8.4	-
			LOS	-	-	-	C	-	B	-	A	-	-	A	-
			V/C Ratio	-	-	-	0.44	-	0.08	-	0.00	-	-	0.07	-
			95% Queue (ft)	-	-	-	55	-	5	-	0	-	-	5	-
Shopiere Road & Inman Parkway	7.7	A	Lane Configuration	1	-	1	-	-	-	-	<2	-	-	2	1
			Volume	230	-	105	-	-	-	95	220	-	-	285	190
			Delay (s)	29.0	-	9.7	-	-	-	-	8.8	-	-	0.0	0.0
			LOS	D	-	A	-	-	-	-	A	-	-	A	A
			V/C Ratio	0.63	-	0.13	-	-	-	-	0.09	-	-	0.00	0.00
			95% Queue (ft)	105	-	10	-	-	-	-	10	-	-	0	0
Shopiere Road & I-39/90 SB Ramps	0.9	A	Lane Configuration	1	-	1	-	-	-	-	1	1	1	1	-
			Volume	25	-	340	-	-	-	-	325	100	25	155	-
			Delay (s)	13.3	-	0.0	-	-	-	-	0.0	0.0	8.1	0.0	-
			LOS	B	-	A	-	-	-	-	A	A	A	A	-
			V/C Ratio	0.06	-	0.00	-	-	-	-	0.00	0.00	0.02	0.00	-
			95% Queue (ft)	5	-	0	-	-	-	-	0	0	5	0	-
Shopiere Road & I-39/90 NB Ramps	8.3	A	Lane Configuration	-	-	-	1	-	1	1	1	-	-	1	1
			Volume	-	-	-	110	-	10	265	85	-	-	70	10
			Delay (s)	-	-	-	22.0	-	8.8	7.9	0.0	-	-	0.0	0.0
			LOS	-	-	-	C	-	A	A	A	-	-	A	A
			V/C Ratio	-	-	-	0.64	-	0.01	0.24	0.00	-	-	0.00	0.00
			95% Queue (ft)	-	-	-	40	-	5	20	0	-	-	0	0

NOTE: Shopiere Road is shown as northbound / southbound except for Prairie Avenue intersection, where it is eastbound / westbound

The results of the existing-year traffic operations analysis indicate that all intersections currently operate at adequate levels of service (LOS D or better) with the exception of Shopiere Road and I-39/90 northbound ramps. During the weekday afternoon peak hour, movements from the interchange exit ramp can experience longer delays due to infrequent gaps in the Shopiere Road traffic stream not adequately allowing traffic to enter the intersection. This is not an uncommon situation, especially when high-volume movements along arterials such as Shopiere Road intersect side streets under stop-sign control. As traffic volumes increase at this location, consideration should be given to identify geometric improvements that will mitigate these deficiencies at this location.

5.2 Year 2049 Conditions, No Build

To determine if the existing roadway system will accommodate Year 2049 traffic volumes, a peak hour operations analysis was conducted that evaluated the existing intersection geometry, lane configuration, and control with forecasted Year 2049 peak hour volumes. Analysis outputs are illustrated in **Table 5.5** (weekday morning peak hour) and **Table 5.6** (weekday afternoon peak hour). Traffic operations output files for this scenario are provided in **Appendix C.**

The Year 2049 traffic volumes were projected using the following methodologies:

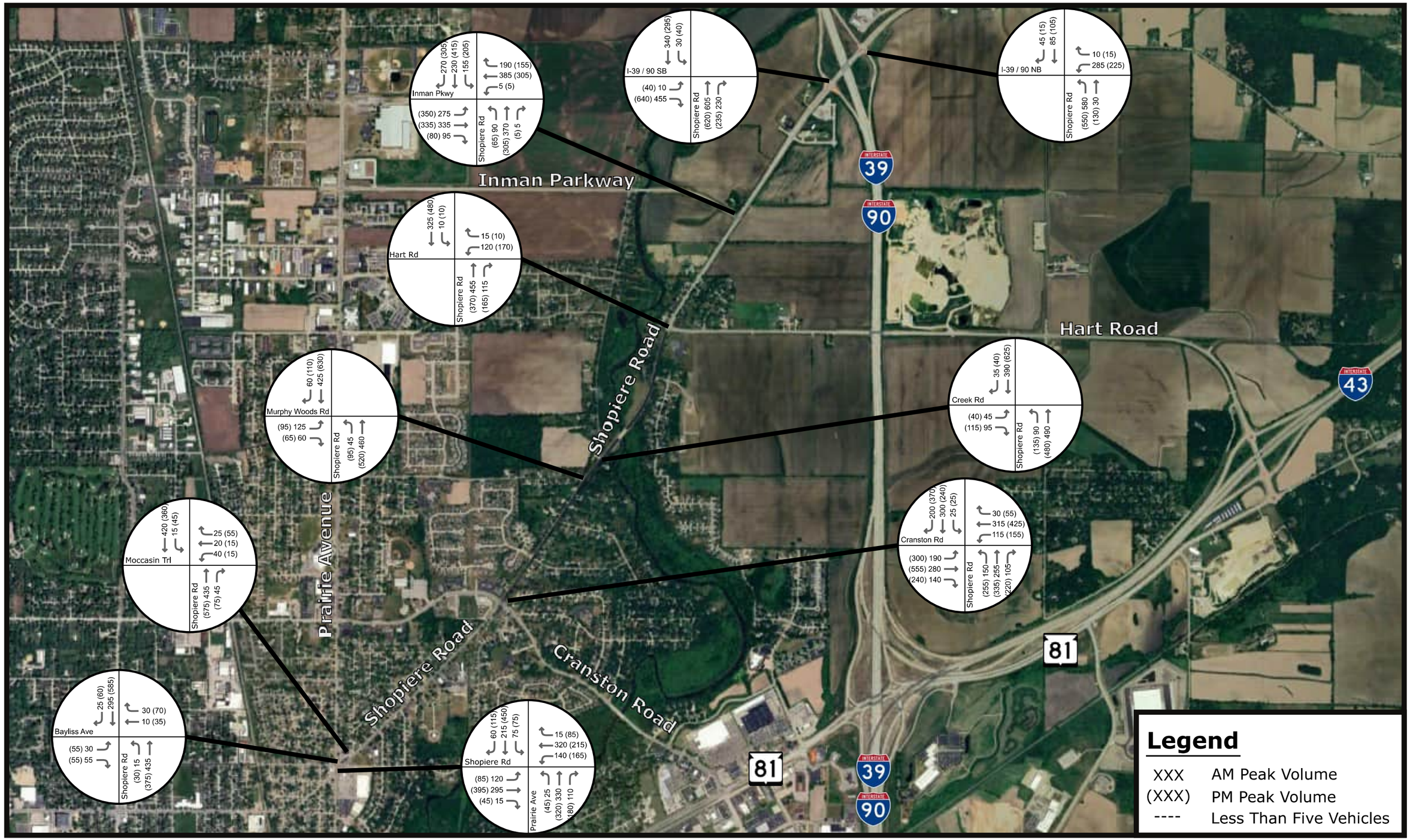
- Past traffic count data along Shopiere Road was reviewed to determine historical growth trends. This review indicated that, on average, daily traffic volumes along Shopiere Road grew approximately two percent per year. This average growth rate was applied to the Year 2024 intersection turning movement counts collected for this study to project Year 2049 traffic conditions.
    - This yearly growth rate considers elements such as population growth, transportation network improvements, and new local and regional developments not specifically identified in this study
    - Through movements along Prairie Avenue and Cranston Road were increased by one percent per year, as determined from previous studies for these roadways
- Peak-hour traffic for planned / proposed developments were developed using trip generation rates published in the ITE *Trip Generation Manual.* The following developments were included in the traffic projections:
    - At the time of this study, Stainless Tanks and Equipment was building a new, 350,000 square-foot manufacturing facility. This development is located on the east side of Shopiere Road, south of the I-39/90 interchange. Access to this site will be provided from Shopiere Road.
    - A 92-unit, single-family residential neighborhood is proposed for development. This site is generally bounded by Creek Road to the east and Murphy Woods Road to the south and will have access to both roadways upon full buildout.

- The proposed extension of Inman Parkway from Shopiere Road to Winchester Drive, as discussed in Chapter 3.3. This improvement was assumed for completion before the Year 2049 horizon-year and will adjust traffic patterns along Shopiere Road, so it was included in the no-build evaluation.

The peak-hour traffic projections for the planned / proposed developments helped create a volume data set used to evaluate the existing geometrics and intersection control. The Year 2049 peak-hour intersection turning movement counts are illustrated in Error! Reference source not found.. It should be noted that the Inman Parkway extension was assumed as part of the no-build analysis due to its likely implementation before the horizon-year. This includes a new intersection leg at the Shopiere Road intersection and a new intersection at Hart Road. The following illustrates the assumed intersection control and lane configuration at each intersection:

- Shopiere Road and Inman Parkway
  - North approach: shared left/through, through, right
  - South approach: shared left/through, shared through right
  - East approach: left, through, right (stop-controlled)
  - West approach: left, through, right (stop-controlled)

- Inman Parkway and Hart Road
  - North approach: left, through, right (stop-controlled)
  - South approach: left, through, right (stop-controlled)
  - East approach: left, through, right (stop-controlled)
  - West approach: left, through, right (stop-controlled)



Year 2049 Intersection Peak Hour Volumes

Figure 5.1

Shopiere Road Corridor Study

Table 5.5. Traffic Operations Analysis, Year 2049 No-Build Conditions, Weekday AM Peak Hour

Intersection	Overall		By Approach	Eastbound			Westbound			Northbound			Southbound		
	Delay (s)	LOS		EBL	EBT	EBR	WBL	WBT	WBR	NBL	NBT	NBR	SBL	SBT	SBR
Shopiere Road & Prairie Avenue	19.8	B	Lane Configuration	1	1	1	1	1	1	1	1>	-	1	1>	-
			Volume	120	295	15	140	320	15	25	330	110	75	215	60
			Delay (s)	14.4	15.8	0.0	16.3	25.8	0.0	17.8	17.9	-	26.9	14.4	-
			LOS	B	B	A	B	C	A	B	B	-	C	B	-
			V/C Ratio	0.38	0.71	0.00	0.43	0.81	0.00	0.07	0.75	-	0.36	0.46	-
			95% Queue (ft)	60	200	0	75	230	0	15	250	-	55	140	-
Prairie Avenue & Bayliss Avenue	2.3	A	Lane Configuration	-	<1>	-	-	1>	-	1	1	-	-	1>	-
			Volume	30	-	55	-	10	25	15	435	-	-	295	25
			Delay (s)	-	16.0	-	-	14.1	-	8.0	0.0	-	-	0.0	-
			LOS	-	C	-	-	B	-	A	A	-	-	A	-
			V/C Ratio	-	0.22	-	-	0.10	-	0.01	0.00	-	-	0.00	-
			95% Queue (ft)	-	20	-	-	10	-	0	0	-	-	0	-
Shopiere Road & Moccasin Trail	1.7	A	Lane Configuration	-	-	-	-	<1	1	-	1	1	-	<1	-
			Volume	-	-	-	40	15	25	-	435	45	15	420	-
			Delay (s)	-	-	-	-	23.6	11.8	-	0.0	-	-	8.4	-
			LOS	-	-	-	-	C	B	-	A	-	-	A	-
			V/C Ratio	-	-	-	-	0.24	0.05	-	0.00	-	-	0.12	-
			95% Queue (ft)	-	-	-	-	25	5	-	0	-	-	0	-
Shopiere Road & Cranston Road	25.0	C	Lane Configuration	1	1	1	1	2>	-	1	1	1	1	1	1
			Volume	190	280	140	115	315	30	150	255	105	25	300	200
			Delay (s)	18.8	28.4	21.8	19.9	26.4	-	17.7	21.3	18.1	16.0	27.5	21.8
			LOS	B	C	C	B	C	-	B	C	B	B	C	C
			V/C Ratio	0.52	0.75	0.28	0.40	0.58	-	0.49	0.56	0.17	0.08	0.75	0.38
			95% Queue (ft)	115	220	60	70	130	-	85	170	40	15	225	85
Shopiere Road & Murphy Woods Road	4.6	A	Lane Configuration	1	-	1	-	-	-	-	<2	-	-	2>	-
			Volume	125	-	60	-	-	-	45	460	-	-	425	60
			Delay (s)	33.6	-	10.5	-	-	-	-	8.8	-	-	0.0	-
			LOS	D	-	B	-	-	-	-	A	-	-	A	-
			V/C Ratio	0.54	-	0.10	-	-	-	-	0.05	-	-	0.00	-
			95% Queue (ft)	75	-	10	-	-	-	-	5	-	-	0	-
Shopiere Road & Creek Road	2.9	A	Lane Configuration	1	-	1	-	-	-	-	<2	-	-	2>	-
			Volume	45	-	95	-	-	-	90	490	-	-	390	35
			Delay (s)	25.0	-	10.5	-	-	-	-	8.7	-	-	0.0	-
			LOS	D	-	B	-	-	-	-	A	-	-	A	-
			V/C Ratio	0.22	-	0.14	-	-	-	-	0.10	-	-	0.00	-
			95% Queue (ft)	20	-	15	-	-	-	-	10	-	-	0	-
Shopiere Road & Hart Road	3.4	A	Lane Configuration	-	-	-	1	-	1	-	2>	-	-	<2	-
			Volume	-	-	-	120	-	15	-	455	115	10	325	-
			Delay (s)	-	-	-	27.2	-	10.8	-	0.0	-	-	9.0	-
			LOS	-	-	-	D	-	B	-	A	-	-	A	-
			V/C Ratio	-	-	-	0.46	-	0.03	-	0.00	-	-	0.01	-
			95% Queue (ft)	-	-	-	60	-	5	-	0	-	-	5	-
Shopiere Road & Inman Parkway	600.0	F	Lane Configuration	1	1	1	1	1	1	-	<2>	-	-	<2	1
			Volume	275	335	95	5	385	190	90	370	5	155	230	270
			Delay (s)	999.0	999.0	9.7	53.0	999.0	11.1	-	9.1	-	-	8.7	0.0
			LOS	F	F	A	F	F	B	-	A	-	-	A	A
			V/C Ratio	4.50	2.80	0.12	0.07	4.90	0.26	-	0.10	-	-	0.15	0.00
			95% Queue (ft)	825	825	10	5	1125	25	-	10	-	-	15	0
Shopiere Road & I-39/90 SB Ramps	0.4	A	Lane Configuration	1	-	1	-	-	-	-	1	1	1	1	-
			Volume	10	-	455	-	-	-	-	605	230	30	340	-
			Delay (s)	23.7	-	0.0	-	-	-	-	0.0	0.0	9.5	0.0	-
			LOS	C	-	A	-	-	-	-	A	A	A	A	-
			V/C Ratio	0.06	-	0.00	-	-	-	-	0.00	0.00	0.04	0.00	-
			95% Queue (ft)	5	-	0	-	-	-	-	0	0	5	0	-
Shopiere Road & I-39/90 NB Ramps	578.0	F	Lane Configuration	-	-	-	1	-	1	1	1	-	-	1	1
			Volume	-	-	-	285	-	10	580	30	-	-	85	45
			Delay (s)	-	-	-	999.0	-	8.7	9.5	0.0	-	-	0.0	0.0
			LOS	-	-	-	F	-	A	A	A	-	-	A	A
			V/C Ratio	-	-	-	5.30	-	0.01	0.46	0.00	-	-	0.00	0.00
			95% Queue (ft)	-	-	-	950	-	5	65	0	-	-	0	0
Inman Parkway & Hart Road	22.9	C	Lane Configuration	1	1	1	1	1	1	1	1	1	1	1	1
			Volume	5	135	5	30	155	285	5	290	20	255	235	5
			Delay (s)	12.5	17.1	11.2	12.2	16.0	22.8	11.8	31.2	10.9	26.0	20.8	10.2
			LOS	B	C	B	B	C	C	B	D	B	D	C	B
			V/C Ratio	0.01	0.37	0.01	0.08	0.38	0.65	0.01	0.73	0.05	0.65	0.57	0.01
			95% Queue (ft)	0	45	0	10	45	115	0	150	5	115	85	5

NOTE: Shopiere Road is shown as northbound / southbound except for Prairie Avenue intersection, where it is eastbound / westbound

Table 5.6. Traffic Operations Analysis, Year 2049 No-Build Conditions, Weekday PM Peak Hour

Intersection	Overall		By Approach	Eastbound			Westbound			Northbound			Southbound		
	Delay (s)	LOS		EBL	EBT	EBR	WBL	WBT	WBR	NBL	NBT	NBR	SBL	SBT	SBR
Shopiere Road & Prairie Avenue	26.3	C	Lane Configuration	1	1	1	1	1	1	1	1>	-	1	1>	-
			Volume	85	395	45	165	215	85	45	320	180	75	450	115
			Delay (s)	17.0	35.4	0.0	21.0	23.0	0.0	33.1	21.6	-	31.3	27.1	-
			LOS	B	D	A	C	C	A	C	C	-	C	C	-
			V/C Ratio	0.21	0.87	0.00	0.58	0.45	0.00	0.26	0.75	-	0.36	0.83	-
			95% Queue (ft)	50	330	0	105	155	0	40	320	-	65	400	-
Prairie Avenue & Bayliss Avenue	6.6	A	Lane Configuration	-	<1>	-	-	1>	-	1	1	-	-	1>	-
			Volume	55	-	55	-	35	70	30	375	-	-	585	60
			Delay (s)	-	54.2	-	-	20.2	-	9.2	0.0	-	-	0.0	-
			LOS	-	F	-	-	C	-	A	A	-	-	A	-
			V/C Ratio	-	0.65	-	-	0.33	-	0.04	0.00	-	-	0.00	-
			95% Queue (ft)	-	95	-	-	35	-	5	0	-	-	0	-
Shopiere Road & Moccasin Trail	1.5	A	Lane Configuration	-	-	-	-	<1	1	-	1	1	-	<1	-
			Volume	-	-	-	15	15	55	-	575	75	45	360	-
			Delay (s)	-	-	-	-	22.6	13.0	-	0.0	-	-	8.8	-
			LOS	-	-	-	-	C	B	-	A	-	-	A	-
			V/C Ratio	-	-	-	-	0.13	0.11	-	0.00	-	-	0.05	-
			95% Queue (ft)	-	-	-	-	10	10	-	0	-	-	5	-
Shopiere Road & Cranston Road	37.5	D	Lane Configuration	1	1	1	1	2>	-	1	1	1	1	1	1
			Volume	300	555	240	155	425	55	255	335	220	25	240	370
			Delay (s)	21.0	71.7	23.9	27.5	30.5	-	24.6	30.2	25.0	25.5	36.8	41.2
			LOS	C	E	C	C	C	-	C	C	C	C	D	D
			V/C Ratio	0.69	1.01	0.33	0.68	0.57	-	0.68	0.66	0.32	0.09	0.68	0.78
			95% Queue (ft)	200	650	115	120	210	-	190	280	110	25	230	230
Shopiere Road & Murphy Woods Road	5.5	A	Lane Configuration	1	-	1	-	-	-	-	<2	-	-	2>	-
			Volume	95	-	65	-	-	-	95	520	-	-	630	110
			Delay (s)	63.9	-	11.7	-	-	-	-	9.9	-	-	0.0	-
			LOS	F	-	B	-	-	-	-	A	-	-	A	-
			V/C Ratio	0.65	-	0.11	-	-	-	-	0.12	-	-	0.00	-
			95% Queue (ft)	90	-	10	-	-	-	-	10	-	-	0	-
Shopiere Road & Creek Road	3.4	A	Lane Configuration	1	-	1	-	-	-	-	<2	-	-	2>	-
			Volume	40	-	115	-	-	-	135	480	-	-	625	40
			Delay (s)	40.9	-	11.9	-	-	-	-	9.8	-	-	0.0	-
			LOS	E	-	B	-	-	-	-	A	-	-	A	-
			V/C Ratio	0.30	-	0.19	-	-	-	-	0.16	-	-	0.00	-
			95% Queue (ft)	30	-	20	-	-	-	-	15	-	-	0	-
Shopiere Road & Hart Road	4.4	A	Lane Configuration	-	-	-	1	-	1	-	2>	-	-	<2	-
			Volume	-	-	-	170	-	10	-	370	165	10	480	-
			Delay (s)	-	-	-	29.5	-	10.2	-	0.0	-	-	8.7	-
			LOS	-	-	-	D	-	B	-	A	-	-	A	-
			V/C Ratio	-	-	-	0.57	-	0.02	-	0.00	-	-	0.01	-
			95% Queue (ft)	-	-	-	85	-	5	-	0	-	-	5	-
Shopiere Road & Inman Parkway	700.0	F	Lane Configuration	1	1	1	1	1	1	-	<2>	-	-	<2	1
			Volume	350	335	80	5	305	155	65	305	5	205	415	305
			Delay (s)	999.0	999.0	10.1	57.0	999.0	10.2	-	9.6	-	-	8.6	1.0
			LOS	F	F	B	F	F	B	-	A	-	-	A	A
			V/C Ratio	5.90	3.40	0.11	0.07	4.90	0.20	-	0.08	-	-	0.18	0.00
			95% Queue (ft)	1030	900	10	5	910	20	-	10	-	-	15	0
Shopiere Road & I-39/90 SB Ramps	1.1	A	Lane Configuration	1	-	1	-	-	-	-	1	1	1	1	-
			Volume	40	-	640	-	-	-	-	620	235	40	295	-
			Delay (s)	25.3	-	0.0	-	-	-	-	0.0	0.0	9.3	0.0	-
			LOS	D	-	A	-	-	-	-	A	A	A	A	-
			V/C Ratio	0.20	-	0.00	-	-	-	-	0.00	0.00	0.05	0.00	-
			95% Queue (ft)	20	-	0	-	-	-	-	0	0	5	0	-
Shopiere Road & I-39/90 NB Ramps	163.8	F	Lane Configuration	-	-	-	1	-	1	1	1	-	-	1	1
			Volume	-	-	-	225	-	15	550	130	-	-	105	15
			Delay (s)	-	-	-	735.0	-	9.1	8.9	0.0	-	-	0.0	0.0
			LOS	-	-	-	F	-	A	A	A	-	-	A	A
			V/C Ratio	-	-	-	2.40	-	0.02	0.38	0.00	-	-	0.00	0.00
			95% Queue (ft)	-	-	-	530	-	5	45	0	-	-	0	0
Inman Parkway & Hart Road	21.4	C	Lane Configuration	1	1	1	1	1	1	1	1	1	1	1	1
			Volume	5	165	5	40	170	215	5	245	30	255	285	5
			Delay (s)	12.5	17.1	11.2	12.2	16.0	22.8	11.8	31.2	10.9	26.0	20.8	10.2
			LOS	B	C	B	B	C	C	B	D	B	D	C	B
			V/C Ratio	0.01	0.44	0.01	0.11	0.43	0.49	0.01	0.63	0.07	0.65	0.68	0.01
			95% Queue (ft)	0	55	0	10	55	65	0	105	5	110	125	0

NOTE: Shopiere Road is shown as northbound / southbound except for Prairie Avenue intersection, where it is eastbound / westbound

The results of the future-year no-build traffic operations analysis indicate that several intersections and movements area anticipated to experience deficiencies during peak traffic periods. These locations are discussed below:

- Prairie Avenue and Bayliss Avenue. Movements from the side-street (Bayliss Avenue) may experience longer delays due to infrequent gaps in the Prairie Avenue traffic stream not adequately allowing traffic to enter the intersection. This is not an uncommon situation, especially when high-volume movements along arterials such as Prairie Avenue intersect side streets under stop-sign control.

- Shopiere Road and Cranston Road. The eastbound through movement is anticipated to operate at LOS E during the weekday afternoon peak hour. This is likely due to a high amount of traffic projected for this movement not being adequately accommodated by the allocation of green time at the traffic signal. This results in higher delays and longer queues for this approach.

- Shopiere Road and Murphy Woods Road: Movements from the side-street (Murphy Woods Road) may experience longer delays due to infrequent gaps in the Shopiere Road traffic stream not adequately allowing traffic to enter the intersection. This is not an uncommon situation, especially when high-volume movements along arterials such as Prairie Avenue intersect side streets under stop-sign control.

- Shopiere Road and Creek Road: Movements from the side-street (Creek Road) may experience longer delays due to infrequent gaps in the Shopiere Road traffic stream not adequately allowing traffic to enter the intersection. This is not an uncommon situation, especially when high-volume movements along arterials such as Prairie Avenue intersect side streets under stop-sign control.

- Shopiere Road and Inman Parkway: Movements from the side-street (Inman Parkway) may experience longer delays due to infrequent gaps in the Shopiere Road traffic stream not adequately allowing traffic to enter the intersection. With the extension of Inman Parkway, it is likely that an intersection control change will occur to accommodate traffic volumes at this location.

- Shopiere Road and I-39/90 northbound ramps: Movements from the interchange ramp will continue to experience longer delays due to their inability to enter the intersection.

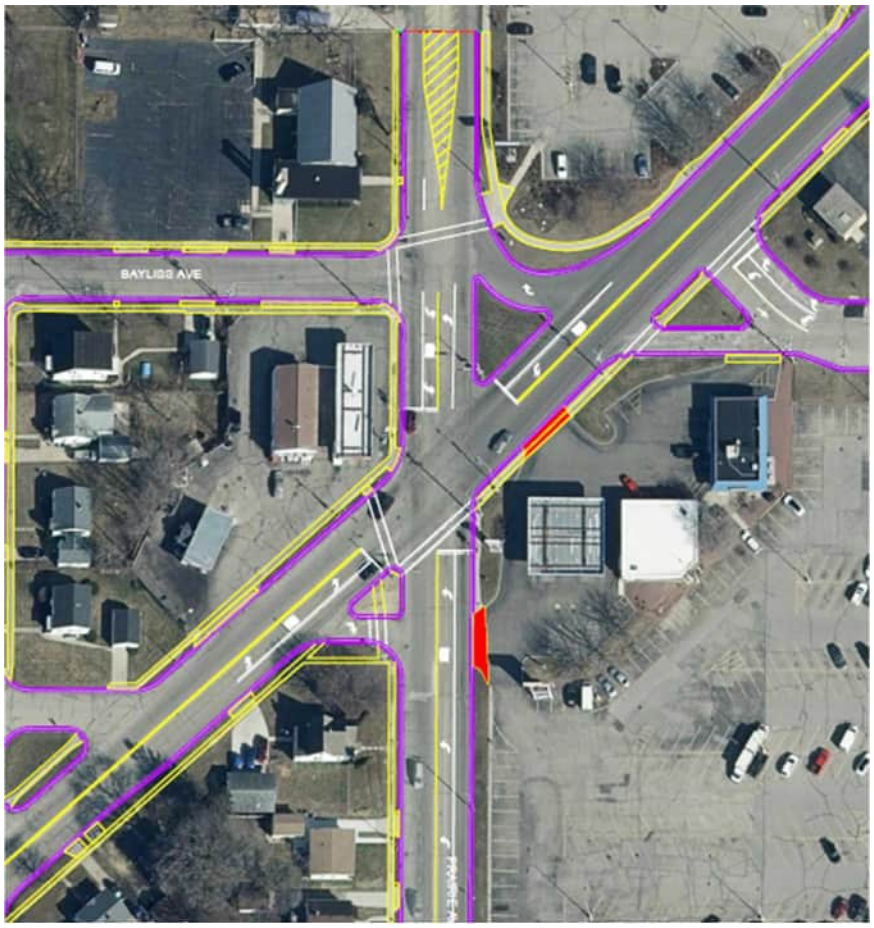
6 Alternatives Evaluation

Chapter 3 highlighted geometric deficiencies and crash patterns in the study area that could create safety issues. These items include higher travel speeds along Shopiere Road, intersection layout at various intersections, and a lack of continuous bicycle and pedestrian facilities. Chapter 5 indicated that several intersections currently, and are anticipated to, experience operational deficiencies during peak-hour traffic periods. Therefore, alternatives were developed that address these issues while maintaining favorable safety, mobility, access, and multimodal accommodations. These alternatives, and their evaluation, are provided below. The Shopiere Road corridor was broken into several sections based on the existing road layout and surrounding land characteristics, and multiple typical section alternatives were created for each segment. These locations are detailed below from South to North.

6.1 Triangle Intersection (Shopiere Road, Prairie Avenue, Moccasin Trail, Bayliss Avenue)

The unique geometry of the Triangle intersection has led to numerous operational and safety concerns documented earlier in this report. Four options were developed to reduce access near the intersection to improve safety, driver expectations, and operations. Each option is incremental and further reduces access from the prior option.

6.1.1 Alternative 1a: Driveway Removal



Description:
This concept closes two driveways to the Mobil gas station in the southeast corner of the intersection. These driveways are within the physical and functional areas of the intersection and have the potential to lead to driver confusion and complex vehicle movements. If only one driveway can be closed, the northern driveway is preferred as it is in the physical intersection.

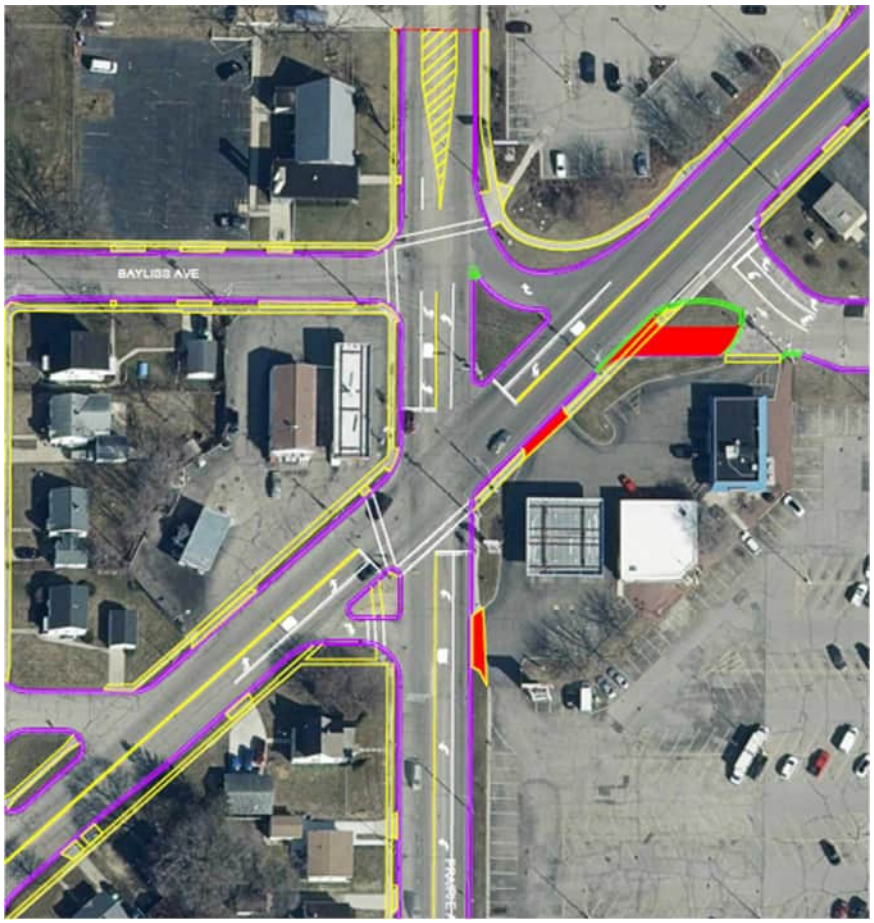
Potential Benefits of Alternative:

- Improves intersection safety by removing driveways located in the physical and functional areas of the Prairie Avenue intersection
- Minimal construction costs to implement
- No right of way impacts are anticipated for this improvement
- Delivery/fuel trucks accessing the Mobil gas station will be able to maneuver the site

Potential Detriments of Alternative:

- Patrons of the Mobil gas station will need to access the business from Moccasin Trail to the north or from the parking lot driveway to the south
- Alternative does not address deficiencies in area such as intersection skew, closely-spaced intersections, or multi-modal accommodations

6.1.2 Alternative 1b: Moccasin Trail Slip Lane Removal



Description:
This alternative builds from Alternative 1a by closing the driveways to the Mobil gas station in the southeast corner of the intersection as well as the northbound right turn slip lane from Shopiere Road to Moccasin Trail. If only one driveway can be closed, the northern driveway is preferred as it is in the physical intersection

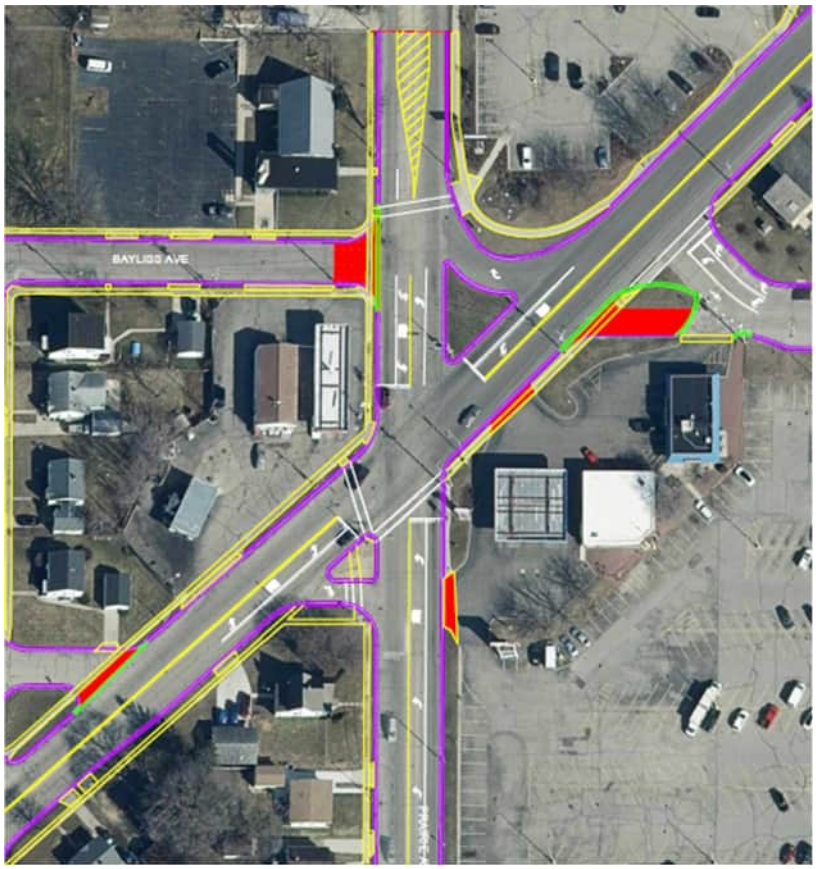
Potential Benefits of Alternative:

- Improves intersection safety by removing driveways located in the physical and functional areas of the Prairie Avenue intersection
- Reduces travel speeds for right-turning traffic from northbound Shopiere Road to Moccasin Trail as these movements must turn at a full intersection instead of slip lane
- No right of way impacts are anticipated for this improvement
- Delivery/fuel trucks accessing the Mobil gas station will be able to maneuver the site

Potential Detriments of Alternative:

- Patrons of the Mobil gas station will need to access the business from Moccasin Trail to the north or from the parking lot driveway to the south
- Alternative does not address deficiencies in area such as intersection skew, closely-spaced intersections, or multi-modal accommodations
- Improving Moccasin Trail converts two shorter crosswalks into one longer crosswalk

6.1.3 Alternative 1c: Bayliss Avenue and Calumet Avenue Removal



Description:
This concept closes the driveways to the Mobil gas station in the southeast corner of the intersection, the northbound right turn slip lane from Shopiere Road to Moccasin Trail, and connections to Bayliss Avenue and Calumet Avenue. If only one driveway can be closed, the northern driveway is preferred as it is in the physical intersection

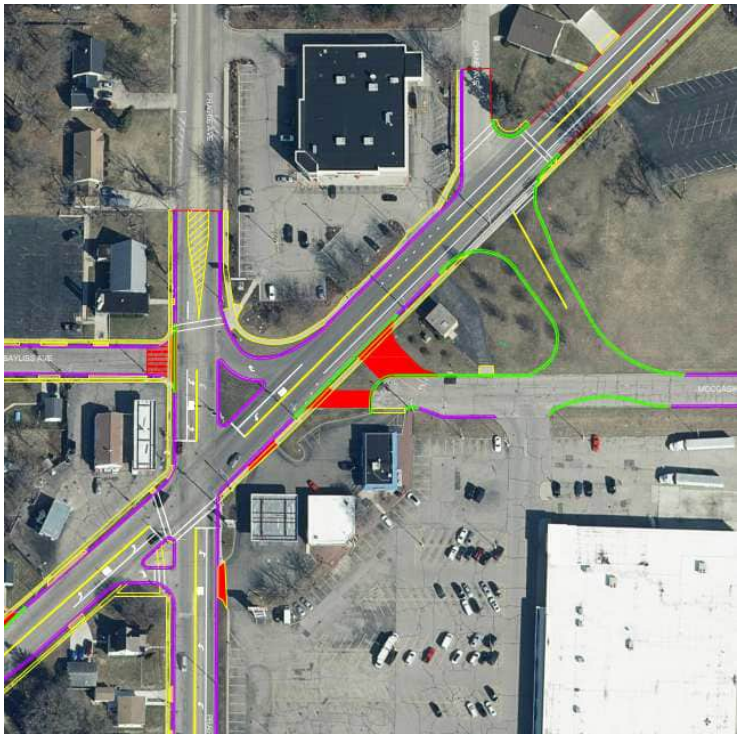
Potential Benefits of Concept:

- Improves intersection safety by removing driveways and closely-spaced roadways located in the physical and functional areas of the Prairie Avenue intersection
- Reduces travel speeds for right-turning traffic from northbound Shopiere Road to Moccasin Trail as these movements must turn at a full intersection instead of slip lane
- No right of way impacts are anticipated for this improvement
- Eliminates cut-through traffic of motorists using the Shopiere Road southbound right-turn lane to get to Bayliss Avenue westbound
- Operations and queues along Prairie Avenue southbound are improved as motorists do not need to leave a gap to access Bayliss Avenue
- Pedestrian crossing of Bayliss Avenue significantly improved by no longer conflicting with vehicles
- Resolves close intersection spacing on Shopiere Road with Calumet Avenue and Congress Avenue intersections
- Delivery/fuel trucks accessing the Mobil gas station will be able to maneuver the site

Potential Detriments of Concept:

- Patrons of the Mobil gas station will need to access the business from Moccasin Trail to the north or from the parking lot driveway to the south
- Vehicle access to the church in the northwest quadrant of Prairie Avenue and Bayliss Avenue diverted to using Shopiere Road to Congress Avenue to Bayliss Avenue.
- Vehicle access to the existing Citgo gas station in the northwest quadrant of Shopiere Road and Prairie Avenue no longer has indirect access to Prairie Avenue via Bayliss Avenue
- Improving Moccasin Trail converts two shorter crosswalks into one longer crosswalk
- Alternative does not address deficiencies in area such as intersection skew, closely-spaced intersections, or multi-modal accommodations

6.1.4 Alternative 1d: Moccasin Trail Realignment



Description:
This concept builds on Alternative 1c but moves the Moccasin Trail intersection north along Shopiere Road to approximately align with Crane Avenue. If only one driveway can be closed, the northern driveway is preferred as it is in the physical intersection

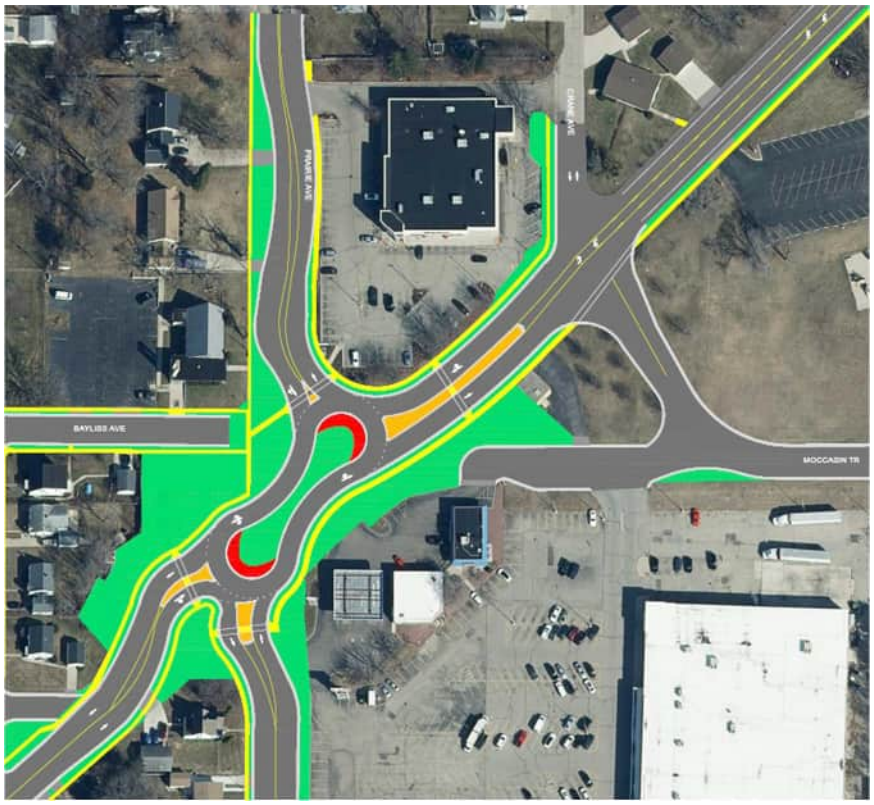
Potential Benefits of Concept:

- Improves intersection safety by removing driveways and closely-spaced roadways located in the physical and functional areas of the Prairie Avenue intersection
- Reduces travel speeds for right-turning traffic from northbound Shopiere Road to Moccasin Trail as these movements must turn at a full intersection instead of slip lane
- No right of way impacts are anticipated for this improvement
- Eliminates cut-through traffic of motorists using the Shopiere Road southbound right-turn lane to get to Bayliss Avenue westbound
- Crosswalks on the northeast side of Moccasin Trail and on Prairie Avenue will improve multimodal connectivity in this area.
- Operations and queues along Prairie Avenue southbound are improved as motorists do not need to leave a gap to access Bayliss Avenue
- Pedestrian crossing of Bayliss Avenue significantly improved by no longer conflicting with vehicles
- Resolves close intersection spacing on Shopiere Road with Calumet Avenue and Congress Avenue intersections
- Improves intersection spacing and driver expectations by increasing the distance of Moccasin Trail to Prairie Avenue
- Delivery/fuel trucks accessing the Mobil gas station will be able to maneuver the site

Potential Detriments of Concept:

- Patrons of the Mobil gas station will need to access the business from Moccasin Trail to the north or from the parking lot driveway to the south
- Vehicle access to the church in the northwest quadrant of Prairie Avenue and Bayliss Avenue diverted to using Shopiere Road to Congress Avenue to Bayliss Avenue
- Vehicle access to the existing Citgo gas station in the northwest quadrant of Shopiere Road and Prairie Avenue no longer has indirect access to Prairie Avenue via Bayliss Avenue
- Improving Moccasin Trail converts two shorter crosswalks into one longer crosswalk
- Alternative does not address deficiencies in area such as intersection skew, closely-spaced intersections, or multi-modal accommodations

6.1.5 Alternative 2: Peanut-Style Roundabout



Description:
This concept converts the Triangle Intersection signal into a 4-legged, peanut-style roundabout with Moccasin Trail relocated, Bayliss Avenue disconnected, and driveways to the Mobil gas station disconnected.

Potential Benefits of Concept:

- Resolves potential safety issues regarding driveways in the functional area of the Prairie Avenue intersection
- Reduces travel speeds through intersection area due to presence of roundabouts
- Improves pedestrian crossing in the area due to crosswalks on all approaches, two stage crossings, and reduced vehicle speeds
- Improves traffic safety and traffic operations by removing access to Bayliss Avenue
- Improves intersection spacing and driver expectations by increasing the distance of Moccasin Trail to Prairie Avenue.
- Delivery/fuel trucks accessing the Mobil gas station will be able to maneuver the site

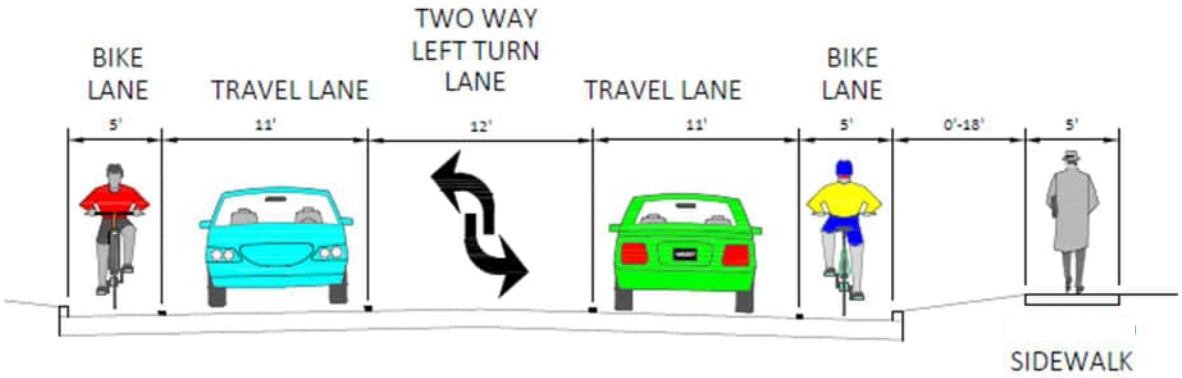
Potential Detriments of Concept:

- Most impact to businesses adjacent to the intersection
- Right of way (and possible parcel) acquisition necessary for existing Citgo site on the west side of the intersection
- Most expensive alternative for implementation
- Peanut roundabout is not traditional design for motorists to navigate
- May be difficult for trucks to turn at closely-spaced roundabout legs such as Shopiere Road southbound to Prairie Avenue northbound and Shopiere Road northbound to Prairie Avenue southbound.
- Patrons of the Mobil gas station will need to access the business from Moccasin Trail to the north or from the parking lot driveway to the south
- Vehicle access to the church in the northwest quadrant of Prairie Avenue and Bayliss Avenue diverted to using Shopiere Road to Congress Avenue to Bayliss Avenue
- Potential impacts to transit routes reaching the Piggly Wiggly Transfer Point

6.2 Moccasin Trail to Schuster Drive

This section of the study area currently has one northbound and one southbound vehicle lane with parking lanes on both sides of the road. The segment has several intersections and residential driveways on both sides of the road. There is a sidewalk on the east side of the road but no facilities on the west side. There are no dedicated bicycle facilities in the section.

6.2.1 Alternative 1a: Three-lane cross-section



Description:
This concept modifies the existing typical section by adding a two-way, left-turn lane that separates the existing travel lanes and on-street bike lanes. To do so, the existing parking lanes would be removed.

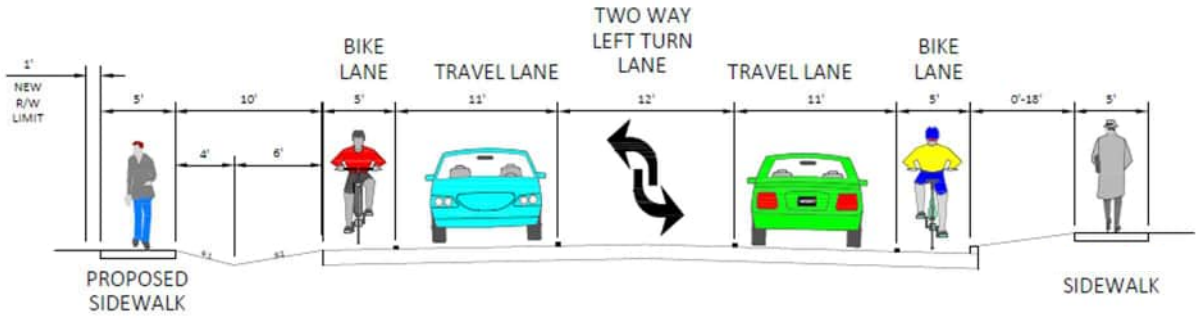
Potential Benefits of Concept:

- Improves safety for left-turning vehicles by creating a refuge area for turning vehicles to wait for gaps in oncoming traffic
- May reduce travel speeds by reallocating under-utilized parking lanes as travel lanes
- Provides multimodal connectivity for bicyclists due to addition of bike lanes
- Can be implemented without impacts to roadway cross-section or right of way
- Minimal construction costs for implementation

Potential Detriments of Concept:

- Eliminates existing on-street parking spaces, including ones near Our Lady of Assumption (OLA) church and school as well as Arrowhead Pointe Apartments
    - Parallel on-street parking near OLA could be shifted to the existing terrace but the number of spaces provided would be limited due to existing utility poles and trees that are currently present in the terrace section
- Does not address lack of pedestrian sidewalk along west side of roadway

6.2.2 *Alternative 1b: Three-lane cross-section with addition of sidewalk*



Description:
This concept builds from Alternative 1a but proposes to add a sidewalk to the west side of the roadway.

Potential Benefits of Concept:
- Improves safety for left-turning vehicles by creating a refuge area for turning vehicles to wait for gaps in oncoming traffic
- May reduce travel speeds by reallocating under-utilized parking lanes as travel lanes
- Provides multimodal connectivity due to addition of bike lanes and sidewalk
- Can be implemented without impacts to roadway cross-section

Potential Detriments of Concept:
- Eliminates existing on-street parking spaces, including ones near Our Lady of Assumption church and school as well as Arrowhead Pointe Apartments
    - Parallel on-street parking near OLA could be shifted to the existing terrace but the number of spaces provided would be limited due to existing utility poles and trees that are currently present in the terrace section
- Right of way needed to create western sidewalk.

6.2.3 *Our Lady of the Assumption and Arrowhead Pointe sites*

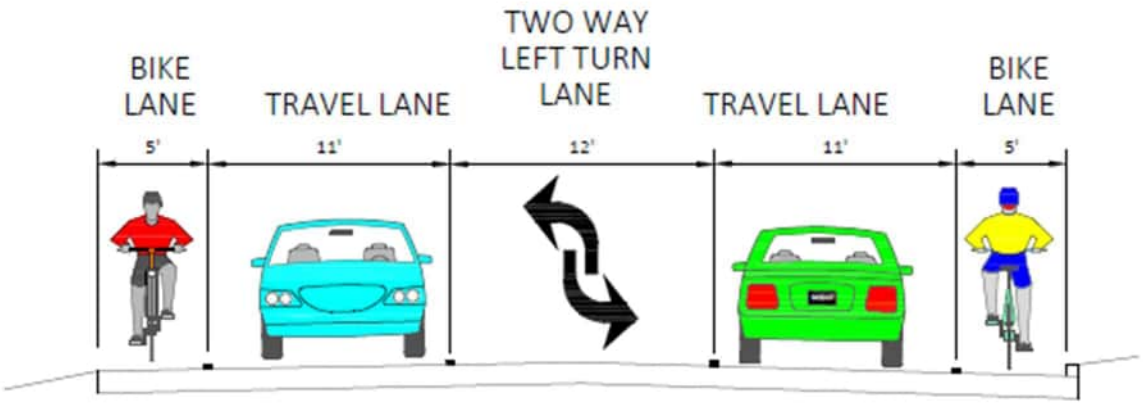
Shopiere Lane currently provides on-street parking in this corridor section that is used by two developments: Our Lady of the Assumption (OLA) church and school, and Arrowhead Pointe residential apartments. The alternatives developed for this section would remove the on-street parking that could potentially shift on-street parking elsewhere. Potential solutions to this condition include the following:
- Provide on-street parking along Shopiere Road at OLA and Arrowhead Pointe in the existing terrace
    - Existing utility poles and trees that are currently present in the terrace section would limit the number of spaces that could be provided.
- Provide on-street parking along the east side of Arrowhead Drive at the apartment building
    - Existing trees and the close proximity to Shopiere Road may limit the number of parking spaces that could be provided.

- Leave the current cross-section in-place along short sections of Shopiere Road (Arrowhead Drive to Monroe Avenue and/or OLA driveway to Vail Terrace) to provide on-street parking.
    - This would provide inconsistencies for the motorist as the TWLTL would appear and disappear over a one-quarter mile distance.
    - The on-street bicycle lanes may be eliminated, depending on the parking layout.

6.3 Schuster Drive to Cranston Road

This section of the study area currently has one northbound and one southbound vehicle lane with parking lanes on both sides of the road. The parking lanes are removed near Cranston Road to accommodate exclusive turn lanes at the intersection. The segment has multiple driveways to businesses and residential properties. The only pedestrian facilities are a short stretch of sidewalk on the west side of the road extending between Cranston Road and the business driveway to Casey's gas station. There are no dedicated bicycle facilities in the section.

6.3.1 Alternative 1a: Three-lane cross-section

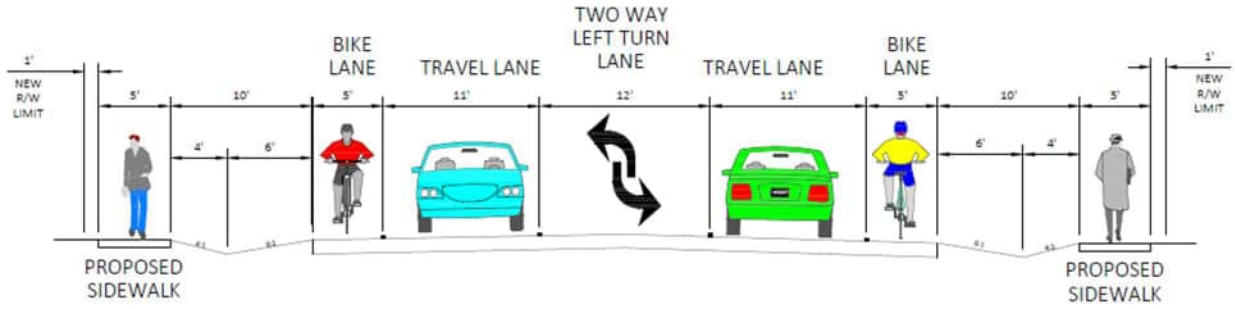


Description:
This concept modifies the existing typical section by adding a two-way, left-turn lane that separates the existing travel lanes and on-street bike lanes. To do so, the existing parking lanes would be removed.

Potential Benefits of Concept:
- Improves safety for left-turning vehicles by creating a refuge area for turning vehicles to wait for gaps in oncoming traffic
- May reduce travel speeds by reallocating under-utilized parking lanes as travel lanes
- Provides multimodal connectivity for bicyclists due to addition of bike lanes
- Can be implemented without impacts to roadway cross-section or right of way
- Minimal construction costs for implementation

Potential Detriments of Concept:
- Eliminates existing on-street parking spaces
- Does not address lack of pedestrian sidewalk along the roadway
- Maintains rural cross-section (i.e., no curb and gutter added)

6.3.2 *Alternative 1b: Three-lane cross-section with addition of sidewalk*



Description:
This concept builds from Alternative 1a but proposes to add sidewalks to both sides of the roadway.

Potential Benefits of Concept:

- Improves safety for left-turning vehicles by creating a refuge area for turning vehicles to wait for gaps in oncoming traffic
- May reduce travel speeds by reallocating under-utilized parking lanes as travel lanes
- Provides multimodal connectivity for bicyclists and pedestrians
- Can be implemented without impacts to roadway cross-section

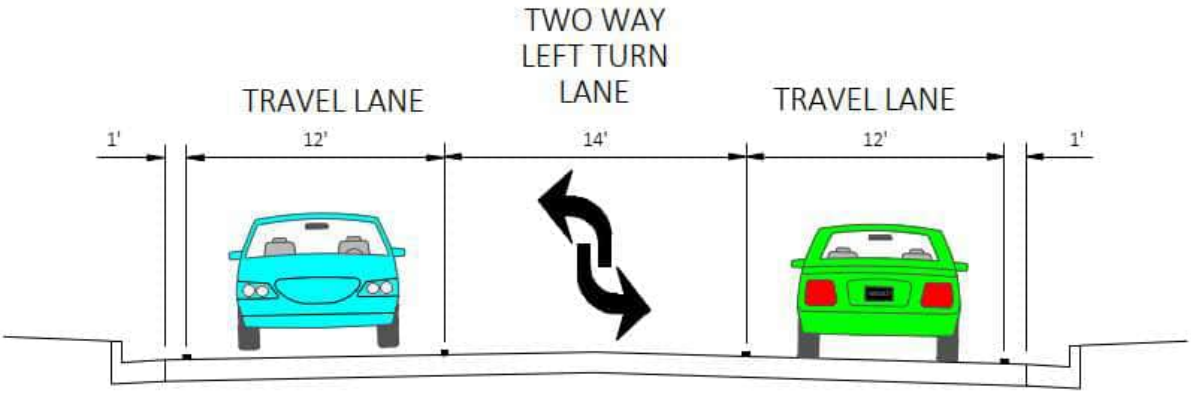
Potential Detriments of Concept:

- Eliminates existing on-street parking spaces
- Right of way is needed to create sidewalks
- Maintains rural cross-section (i.e., no curb and gutter added)

6.4 Cranston Road to Murphy Woods Road

This section of Shopiere Road currently has two northbound and two southbound vehicle lanes. The segment has multiple intersections and driveways. There are no pedestrian or bicycle facilities in this section.

6.4.1 Alternative 1a: Three-lane cross section



Description:
This concept modifies the existing typical section by adding a two-way, left-turn lane that separates the existing travel lanes and on-street bike lanes. To do so, the number of travel lanes along Shopiere Road would be reduced from four lanes to two lanes.

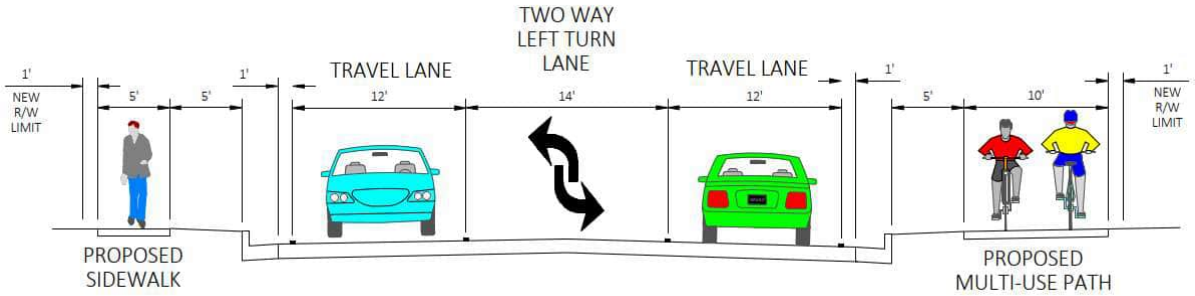
Potential Benefits of Concept:

- Improves safety for left-turning vehicles by creating a refuge area for turning vehicles to wait for gaps in oncoming traffic
- Reduces travel speeds by reducing number of travel lanes in each direction from two lanes to one lane; motorists must legally follow each other and cannot pass
- Can be implemented without impacts to roadway cross-section or right of way
- Minimal construction costs for implementation

Potential Detriments of Concept:

- Does not address lack of multimodal accommodations in the area

6.4.2 *Alternative 1b: Three-lane cross section with addition of bike/ped facilities*



Description:
This concept builds from Alternative 1a but proposes to add a sidewalk and multi-use path to the roadway cross-section.

Potential Benefits of Concept:

- Improves safety for left-turning vehicles by creating a refuge area for turning vehicles to wait for gaps in oncoming traffic
- May reduce travel speeds by reallocating under-utilized parking lanes as travel lanes
- Provides multimodal connectivity for bicyclists and pedestrians
- Can be implemented without impacts to roadway cross-section

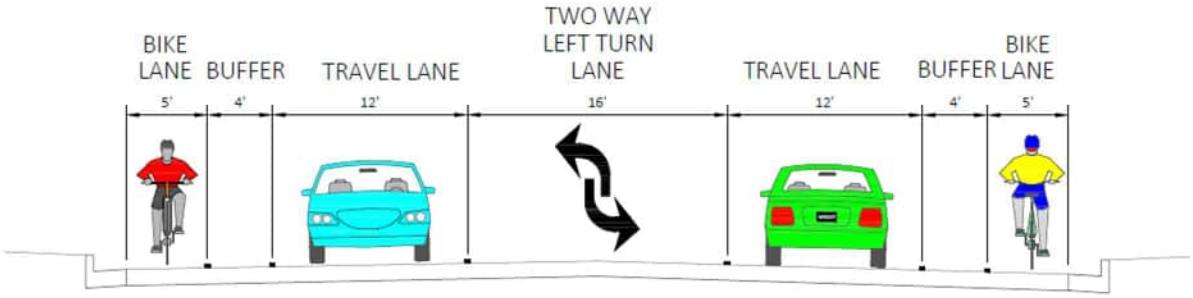
Potential Detriments of Concept:

- Right of way is needed to create sidewalk and multi-use path

6.5 Murphy Woods Road through Hart Road

This section of the study area currently has two northbound and two southbound vehicle lanes. The segment has multiple intersections and driveways. There are no bicycle or pedestrian facilities in this section. The terminus of this section would be just past the residential neighborhood north of Hart Road, approximately one-quarter mile north of Hart Road and approximately 1,000 feet south of Inman Parkway.

6.5.1 Alternative 1a: Three-lane cross section



Description:
This concept modifies the existing typical section by adding a two-way, left-turn lane that separates the existing travel lanes and on-street bike lanes. To do so, the number of travel lanes on Shopiere Road would be reduced from four lanes to two lanes. Also, due to the wide cross-section, a four-foot buffer separating the on-street bike lanes from the travel lanes would be provided.

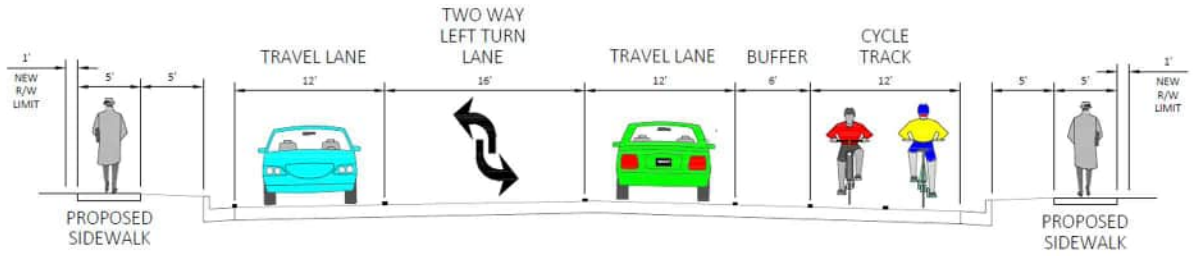
Potential Benefits of Concept:

- Improves safety for left-turning vehicles by creating a refuge area for turning vehicles to wait for gaps in oncoming traffic
- Reduces travel speeds by reducing number of travel lanes in each direction from two lanes to one lane; motorists must legally follow each other and cannot pass
- Can be implemented without impacts to roadway cross-section or right of way
- Minimal construction costs for implementation

Potential Detriments of Concept:

- Does not address lack of pedestrian facilities in this section

6.5.2 *Alternative 1a: Three-lane cross section with addition of bike/ped facilities*



Description:
This concept builds from Alternative 1a but proposes to add sidewalks on both sides of Shopiere Road and an on-street cycle track for bicyclists.

Potential Benefits of Concept:

- Improves safety for left-turning vehicles by creating a refuge area for turning vehicles to wait for gaps in oncoming traffic
- Reduces travel speeds by reducing number of travel lanes in each direction from two lanes to one lane; motorists must legally follow each other and cannot pass
- Promotes multimodal connectivity by providing bicycle and pedestrian facilities
- Can be implemented without impacts to roadway cross-section

Potential Detriments of Concept:

- Right of way needed to construct sidewalks

6.6 Inman Parkway Intersection

The Inman Parkway (County BT) intersection is anticipated to operate at poor levels of service by Year 2049 as the existing lane configurations and intersection control cannot accommodate forecasted traffic volumes. In addition, the existing intersection geometry and increased truck traffic creates intersection safety concerns.

6.6.1 Alternative 1: All-way stop control

Description:
This alternative would install stop signs to all intersection approaches, requiring all vehicles to stop before entering the intersection. No geometric changes would be made with this alternative.

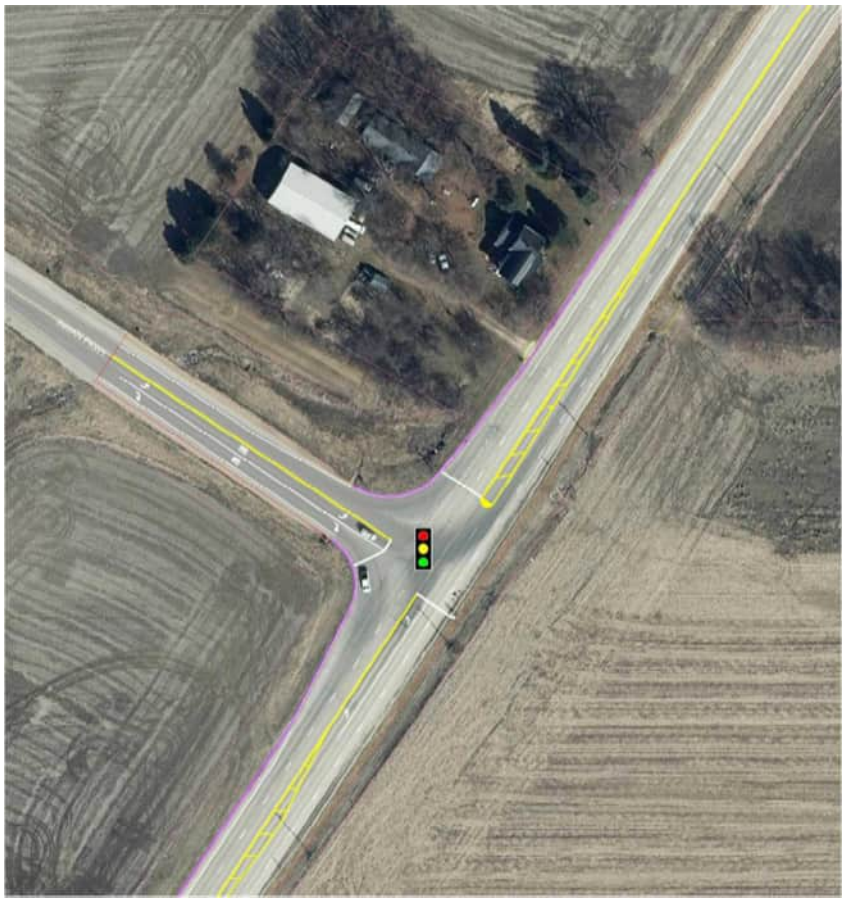
Potential Benefits of Concept:

- Improves safety for Inman Parkway traffic by requiring all vehicles to stop before entering intersection
- Lowers traffic speeds through intersection as vehicles are required to stop
- May assist lowering traffic speeds along Shopiere Road as this intersection control serves as a transition from rural, high-speed sections near I-39/90 and the approaching urban/suburban, lower-speed sections
- No impacts to roadway cross-section or right of way needed to implement
- Minimal construction costs

Potential Detriments of Concept:

- Not a long-term solution as increased traffic volumes will create longer delays and queues
- Short-term safety concerns as Shopiere Road traffic transitions from a free-flow movement to a stop-controlled movement and may not see/adhere to the stop signs

6.6.2 Alternative 2: Traffic Signal



Description:
This alternative would upgrade the intersection control from stop-control to traffic signals. The south (northbound) approach would be widened to provide an exclusive left-turn lane and two through lanes for travel. No other geometric changes were assumed for this alternative.

Potential Benefits of Concept:

- Improves traffic operations by allocating green time to all movements
- Improves traffic safety for Inman Parkway traffic by permitting green time for their movements
- Can be built to accommodate potential Inman Parkway extension with minimal sunk cost

Potential Detriments of Concept:

- May increase rear-end crashes along Shopiere Road due to interrupted traffic flow during red signal phase.
- Increased cost to build signal infrastructure and right of way acquisition.
- On-going signal maintenance and re-timing costs.

It should be noted that traffic volumes collected at this intersection do not meet minimum thresholds, as published in the Manual of Uniform Traffic Control Devices (MUTCD), for traffic signal consideration.

6.6.3 Alternative 3: Roundabout

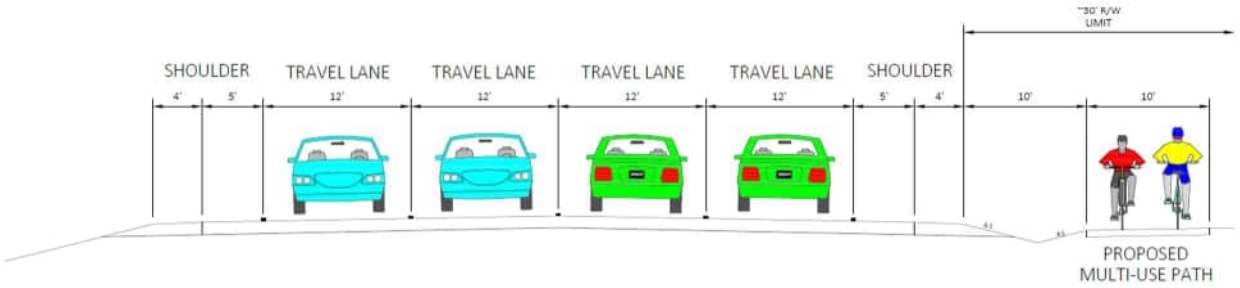
Description:
This alternative would upgrade the intersection control from stop-control to a roundabout. The Shopiere Road approaches would provide two approach lanes while the Inman Parkway approach would provide one approach lane.

Potential Benefits of Concept:
- Improves traffic safety by eliminating head-on and right-angle crashes at the intersection
- Reduces travel speeds approaching and through intersection area due to circulatory lanes
- Can serve as a transition area between differing cross-sections of Shopiere Road
- Can be built to accommodate potential Inman Parkway extension with minimal sunk cost

Potential Detriments of Concept:
- Requires right of way acquisition
- Most expensive alternative to implement

6.7 Inman Parkway to I-39 / 90

6.7.1 Alternative 1: Provide multi-use path



Description:
This alternative maintains the existing roadway cross-section of four travel lanes but adds a multi-use path for bicyclists and pedestrians.

Potential Benefits of Concept:

- Improves bicycle and pedestrian safety by providing dedicated facilities away from roadway
- Improves multimodal connectivity from the City of Beloit to rural Rock County

Potential Detriments of Concept:

- Right of way needed to construct the multi-use path

6.8 IH-39/90 northbound ramp terminus

The I-39/90 northbound ramp terminus currently, and is anticipated to, operate at poor levels of service during peak traffic periods. Specifically, left-turning movements from the I-39/90 exit ramp have difficulty finding gaps in the Shopiere Road traffic stream (particularly, the high number of left-turning vehicles from Shopiere Road to the I-39/90 entrance ramp).

6.8.1 Alternative 1: Traffic Signal

Description:
This alternative would upgrade the existing side-road stop control with traffic signals.

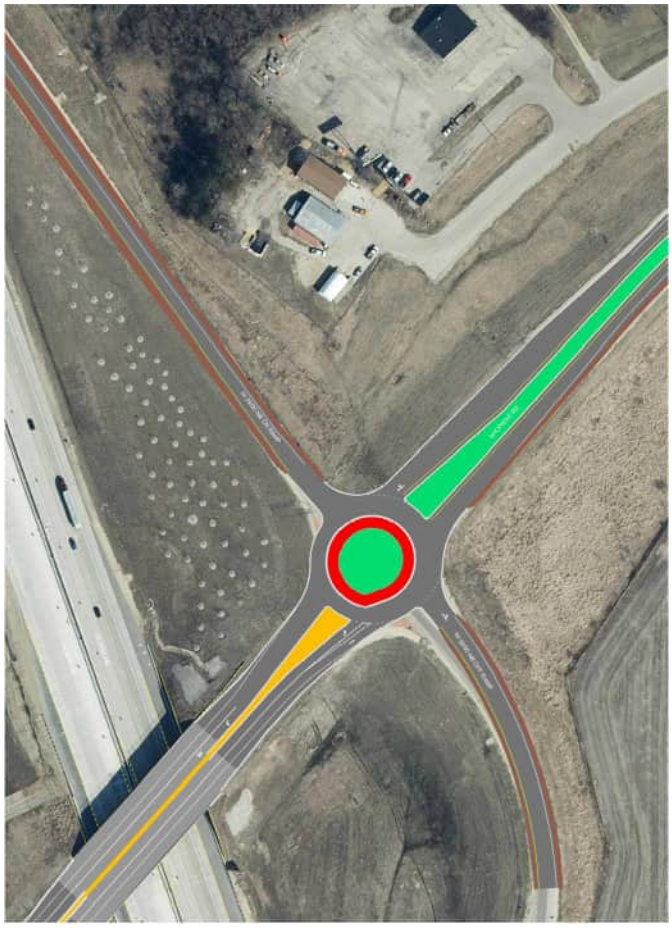
Potential Benefits of Concept:

- Improves safety for ramp traffic as protected green time will be allotted for their movement through the intersection
- No changes to the roadway cross-section or right of way needed for implementation
- Minimal construction costs

Potential Detriments of Concept:

- Existing and future traffic volumes do not meet minimum volume warrants for traffic signal consideration, per WisDOT and MUTCD

6.8.2 *Alternative 2: Roundabout*



Description:
This intersection converts the stop approach to a roundabout to increase the northbound left turn movements and slow the vehicle traffic along Shopiere Road.

Potential Benefits of Concept:

- Slows vehicles as Shopiere Road transitions to have more access north of this intersection.
- Improves left turn from IH-39/90 off ramp to southwest Shopiere Road

Potential Detriments of Concept:

- Truck traffic impacts from navigating roundabout to travel southwest towards Beloit.

7 Recommendations

Alternatives for the Shopiere Road corridor were developed based on deficiencies found in the following categories: geometric site reviews of the study area, safety evaluation of the Shopiere Road corridor and the study intersections, and intersection operations analysis for the existing-year and Year 2049 horizon year. Locations with several alternatives were evaluated based on the aforementioned categories and a preferred alternative was selected based on those results
The following describes recommendations for the Shopiere Road corridor and key intersections:

Shopiere Road (Prairie Avenue to Inman Parkway)

- It is recommended that the Shopiere Road cross-section be updated to provide a three-lane cross-section (two travel lanes and a TWLTL) from Prairie Avenue to south of Inman Parkway. This alternative improves both safety and mobility as the TWLTL will allow left-turning vehicles to store and complete their turning movement to and from Shopiere Road. The three-lane cross-section will also reduce travel speeds as motorists will not have the ability to use multiple travel lanes to maneuver around slower-moving traffic; rather, traffic must use a single travel lane which can restrict speed variances, particularly faster travel speeds, since vehicle passing is prohibited. This improvement can be accommodated within the existing roadway cross-section and right of way, minimizing construction costs and right of way acquisition.

- It is recommended that multimodal accommodations, such as sidewalks, multi-use paths, and cycle tracks, be implemented along Shopiere Road. Providing these elements will enhance bike/ped accommodations along the corridor and provide a vital connection between northeast Beloit and the downtown area. While it is likely that right of way may be needed in several locations to construct these improvements, it is anticipated to be approximately five to ten feet wide for the length of a parcel and no buildings are anticipated to be impacted by these improvements.

- It is recommended that other treatments be implemented to inform motorists of the speed limit in their area. Elements such as roadway pavement markings and speed feedback signs will help reinforce the regulatory speed limit expected by motorists. These features would be particularly helpful in areas such as residential neighborhoods and near the OLA church and school campus.

Shopiere Road, Prairie Avenue / Bayless Avenue / Moccasin Trail intersection ("Triangle")

- In the short-term, it is recommended that the Triangle intersection be modified with access restrictions and a realignment of Moccasin Trail (Alternative 1d). These access restrictions will improve safety by eliminating non-intersection turning movements within the physical and functional intersection area which improves driver expectations. Removing access to Bayless Avenue and realigning Moccasin Trail increases the intersection spacing from Prairie Avenue and Shopiere Road intersection, improving traffic operations and vehicle storage capabilities without interference from closely-spaced upstream intersections.

- In the long-term, it is recommended that the intersection control be upgraded to a roundabout (Alternative 2). Roundabouts improve traffic safety by eliminating head-on and angle crashes as well as reduces travel speeds due to the roundabout design. The peanut-style roundabout shown for Alternative 2 requires significant right of way to implement; therefore, the roundabout design should be considered as land uses and parcels change or develop in the future, a preferred intersection control is not necessary at this time.

Shopiere Road, Cranston Road intersection

- The recommended three-lane cross-section of Shopiere Road will improve the existing geometric concerns of trapping lanes, driveway access, and left turn visibility at the intersection. The realignment of the travel lanes and the reconfiguration of the roadway cross-section will allow for these deficiencies to be addressed without additional right of way or widening of the roadway cross-section.

- It is recommended that traffic signal clearance intervals be examined with the lane configuration change for adherence by motorists.

Shopiere Road, Hart Road intersection

- In the short-term, it is recommended that no intersection control or geometric changes be made to the intersection as the recommended three-lane cross-section will help Hart Road traffic enter the intersection in a safer manner.

- In the long-term, consideration should be given to restrict or eliminate this intersection once Inman Parkway is extended. With the roadway extension, it is likely that traffic currently using Hart Road will divert to Inman Parkway, significantly reducing the demand for this approach. Restricting or eliminating this intersection would remove an intersection along a horizontal curve, further improving traffic safety in this area.

Shopiere Road, Inman Parkway intersection

In the short-term, it is recommended to convert the existing side-road stop intersection control to an all-way stop control (Alternative 1). This improvement will improve traffic safety for Inman Parkway motorists as they will be able to enter the intersection while Shopiere Road is under stop-sign control. In addition, travel speeds in the intersection area will be reduced due to the stop-control provision for all intersection approaches.

- In the long-term, both a traffic signal and roundabout are viable alternatives for implementation. Both intersection control strategies help improve traffic operations and traffic safety when compared to the existing side-road stop control. In addition, both alternatives can be constructed in a manner that limits the impacts if the proposed Inman Parkway extension occurs. However, since it is unknown when this roadway extension will take place

Shopiere Road, I-39/90 northbound interchange ramp

- In the short-term, it is recommended that no geometric or intersection control improvements be made to the intersection. While the exit ramp operates at LOS E during the weekday morning peak hour, the number of vehicles traveling through the intersection do not meet warrants for any intersection control upgrades. In addition, the anticipated queues do not impact traffic operations at the interchange diverge area.
- In the long-term, it is recommended that the intersection be converted to a roundabout to accommodate anticipated growth and increasing traffic volumes at this location. The roundabout design will promote slower travel speeds through the intersection and will not require multiple travel or turn lanes to implement.

Other recommendations

In addition to the recommendations previously discussed, there are other locations in the study area that would benefit from improvements, but the improvement is more systemic (e.g., reviewing traffic signal phasing / timing) or the improvement does not have a comparable alternative to evaluate against it. The following describes other recommendations to improve safety, mobility, access, and multimodal accommodations along the Shopiere Road corridor:

- It is recommended that crosswalk pavement markings be monitored and refreshed to maintain their visibility for motorists and bicyclists/pedestrians.

- It is recommended that access management strategies along Shopiere Road be implemented as land uses change and parcels become developed. This improvement will allow for safe and efficient traffic operations along Shopiere Road and help identify locations for proper access driveway design.

- It is recommended that traffic signal equipment is reviewed for improved visibility and clarity for motorists. Examples of this include inspecting and adding backplates (or retroreflective backplates) to each signal head, checking the placement of overhead signal heads over each through or turn lane, and examining the placement of each signal head to ensure that motorists can clearly see them without obstruction. In addition, traffic signal timing plans should be reviewed to determine appropriate green times, clearance intervals, and other phasing parameters for safe, efficient travel through the intersection.

- It is recommended that right of way be preserved along Shopiere Road from Inman Parkway to I-39 / 90 to accommodate any roadway widening, such as a left-turn lane, which may be needed to accommodate development of parcels in this area.

8 Appendix

Appendix A: Intersection Turning Movement Counts
Appendix B: Existing-Year (Year 2024) Traffic Operations Analysis Worksheets
Appendix C: Future-Year (Year 2049) Traffic Operations Analysis Worksheets

Appendix A: Intersection Turning Movement Counts

Intersection Traffic Volume Report

Count Basics	Version 2011.J3		Page 1 of 11
Start Date:	Tuesday, May 14, 2024	Weekday	Schools in Session
Total Number of Hours Counted: 6		Non-Holiday	No Special Events

Base Information, Observed (6) Hour and Estimated (24) Hour Volume Summaries

Intersection of: Prairie Ave and Shopiere Rd

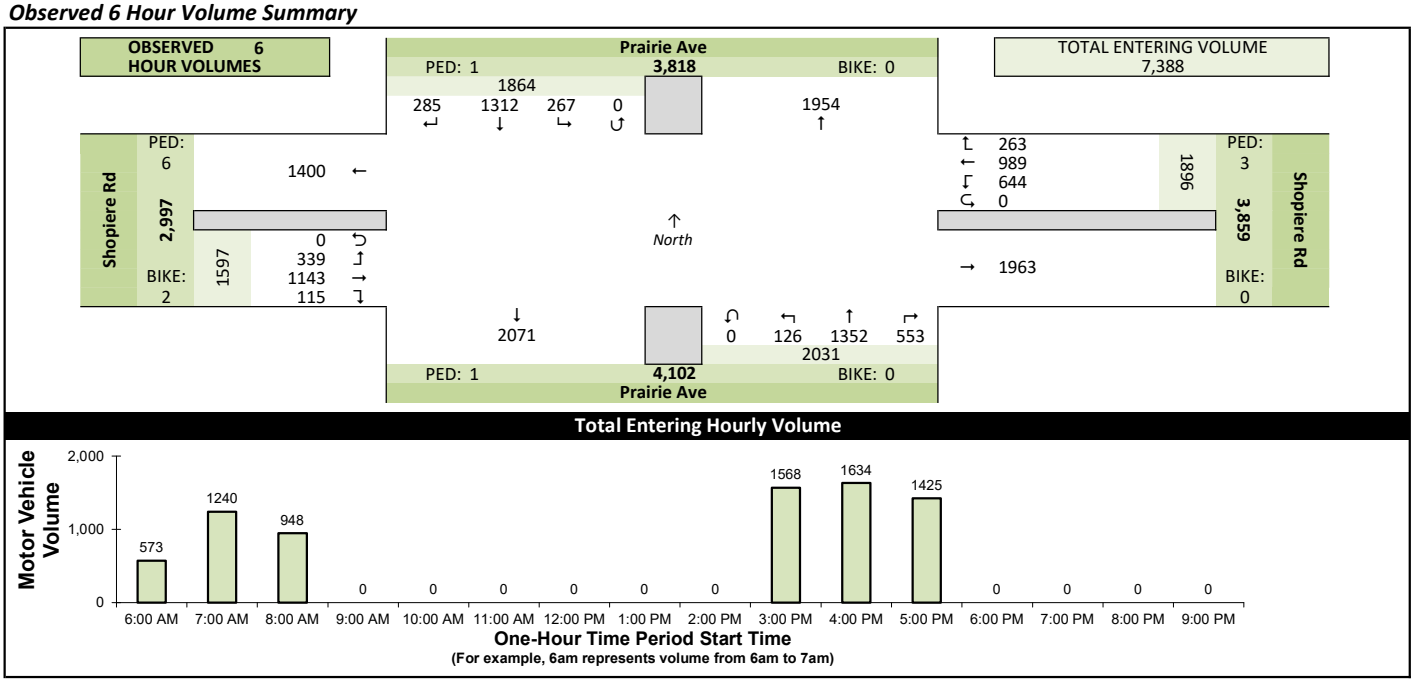
Site Information

Municipality	City of Beloit		
County	Rock	WisDOT Region	SE
Traffic Control	Traffic Signal		
Roadway Names		North Direction	↑
North Leg	Prairie Ave		
East Leg	Shopiere Rd		
South Leg	Prairie Ave		
West Leg	Shopiere Rd		
Special Considerations			
Schools	In Session		
Holidays	None		
Special Events	None		
Special Pedestrians Observed			
Pre-school children	None		
Elementry school age children	None		
Visually impaired (white cane/helper dog)	None		
Elderly/disabled (except wheelchairs)	None		
Wheelchairs/electric scooters	None		
Other (describe)	None	None	

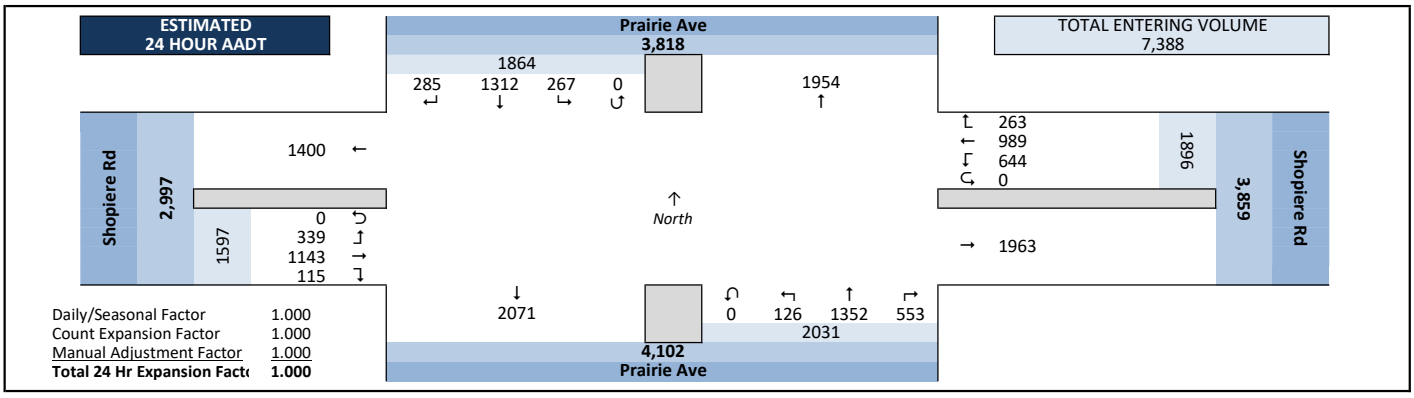
Count Information

Hrs Counted:	6:00 AM - 9:00 AM and 3:00 PM to 6:00 PM				
Count Dates				Weather	
AM Peak Period	Tuesday, May 14, 2024			Clear & Dry	
Midday Peak Period	Tuesday, May 14, 2024			Clear & Dry	
PM Peak Period	Tuesday, May 14, 2024			Clear & Dry	
Calculated Peak Hours					
AM	7:15-8:15am	MD		PM	3:45-4:45pm
Peak Hours Selected for Analysis					
AM	7:15-8:15am	MD		PM	3:45-4:45pm
Daily/Seasonal Adjustment Group	(2) Urban Arterials & Collectors				
Count Expansion Group	(4) Rural Arterials & Collectors				
Daily/Seasonal Adjustment Factor	1.000	Count Expansion Factor	1.000		
Company Name	AECOM			Manual Adj.	1.000
Observers	AM Peak Period	MioVision			
	Midday Peak Period	MioVision			
	PM Peak Period	MioVision			
Comments					

Observed 6 Hour Volume Summary



Estimated 24 Hour AADT



Intersection Traffic Volume Report

Count Basics		*Page 3 of 11*
Start Date: Tuesday, May 14, 2024	Weekday	Schools in Session
Total Number of Hours Counted: 6	Non-Holiday	No Special Events

Peak Hour Volume Summary

Prairie Ave and Shopiere Rd

All Motor Vehicles

Peak Hour Volumes, Truck Percentages, and PHFs

Tuesday, May 14, 2024		From North					From East					From South					From West					
	AM Peak Hour	Prairie Ave					Shopiere Rd					Prairie Ave					Shopiere Rd					
	Start Time	Right	Thru	Left	U-Tn	Total	Right	Thru	Left	U-Tn	Total	Right	Thru	Left	U-Tn	Total	Right	Thru	Left	U-Tn	Total	Totals
AM Peak Hour	7:15 AM	5	35	12	0	52	3	59	17	0	79	20	61	3	0	84	1	44	9	0	54	269
	7:30 AM	7	55	12	0	74	7	70	23	0	100	28	78	6	0	112	2	64	17	0	83	369
	7:45 AM	17	43	11	0	71	10	53	33	0	96	29	70	5	0	104	6	66	25	0	97	368
	8:00 AM	13	41	18	0	72	2	45	28	0	75	16	53	2	0	71	2	44	24	0	70	288
	Peak Hour Volume	42	174	53	0	269	22	227	101	0	350	93	262	16	0	371	11	218	75	0	304	1294
	Rounded Hourly Volume	40	175	55	0	270	20	225	100	0	345	95	260	15	0	370	10	220	75	0	305	1290
	% Single Unit Trucks	0.0	1.7	3.8	0.0	1.9	9.1	1.3	5.9	0.0	3.1	2.2	0.0	6.2	0.0	0.8	0.0	3.2	2.7	0.0	3.0	2.2
	% Heavy Trucks	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	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 (Total)	0.0	1.7	3.8	0.0	1.9	9.1	1.3	5.9	0.0	3.1	2.2	0.0	6.2	0.0	0.8	0.0	3.2	2.7	0.0	3.0	2.2
	Peak Hour Factor (PHF)	0.62	0.79	0.74	0.00	0.91	0.55	0.81	0.77	0.00	0.87	0.80	0.84	0.67	0.00	0.83	0.46	0.83	0.75	0.00	0.78	0.88

N/A		From North					From East					From South					From West					
	MD Peak Hour	Prairie Ave					Shopiere Rd					Prairie Ave					Shopiere Rd					
	Start Time	Right	Thru	Left	U-Tn	Total	Right	Thru	Left	U-Tn	Total	Right	Thru	Left	U-Tn	Total	Right	Thru	Left	U-Tn	Total	Totals
Midday (MD) Peak Hour	12:00 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
	12:15 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
	12:30 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
	12:45 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
	Peak Hour Volume	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
	Rounded Hourly Volume	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
	% Single Unit Trucks	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
	% Heavy Trucks	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	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 (Total)	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
	Peak Hour Factor (PHF)	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00

Tuesday, May 14, 2024		From North					From East					From South					From West					
	PM Peak Hour	Prairie Ave					Shopiere Rd					Prairie Ave					Shopiere Rd					
	Start Time	Right	Thru	Left	U-Tn	Total	Right	Thru	Left	U-Tn	Total	Right	Thru	Left	U-Tn	Total	Right	Thru	Left	U-Tn	Total	Totals
PM Peak Hour	3:45 PM	21	77	11	0	109	14	44	33	0	91	39	73	5	0	117	10	61	24	0	95	412
	4:00 PM	18	115	11	0	144	18	47	36	0	101	35	67	7	0	109	5	72	11	0	88	442
	4:15 PM	18	80	14	0	112	24	49	38	0	111	27	63	8	0	98	10	68	14	0	92	413
	4:30 PM	18	85	15	0	118	14	40	32	0	86	35	55	10	0	100	4	80	6	0	90	394
	Peak Hour Volume	75	357	51	0	483	70	180	139	0	389	136	258	30	0	424	29	281	55	0	365	1661
	Rounded Hourly Volume	75	355	50	0	480	70	180	140	0	390	135	260	30	0	425	30	280	55	0	365	1660
	% Single Unit Trucks	1.3	1.4	2.0	0.0	1.4	2.9	1.7	2.2	0.0	2.1	0.0	1.6	3.3	0.0	1.2	0.0	0.4	5.5	0.0	1.1	1.4
	% Heavy Trucks	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	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 (Total)	1.3	1.4	2.0	0.0	1.4	2.9	1.7	2.2	0.0	2.1	0.0	1.6	3.3	0.0	1.2	0.0	0.4	5.5	0.0	1.1	1.4
	Peak Hour Factor (PHF)	0.89	0.78	0.85	0.00	0.84	0.73	0.92	0.91	0.00	0.88	0.87	0.88	0.75	0.00	0.91	0.72	0.88	0.57	0.00	0.96	0.94

Peak Hour Pedestrian and Bicyclist Volumes

Pedestrians and Bicyclists		Crossing North Approach			Crossing East Approach			Crossing South Approach			Crossing West Approach			Total Ped & Bike Volume
		Prairie Ave			Shopiere Rd			Prairie Ave			Shopiere Rd			
	15-Minute Start Time	Pedestrian	Bicyclist	Total	Pedestrian	Bicyclist	Total	Pedestrian	Bicyclist	Total	Pedestrian	Bicyclist	Total	
AM	7:15 AM	0	0	0	0	0	0	0	0	0	1	0	1	1
	7:30 AM	0	0	0	0	0	0	0	0	0	0	0	0	0
	7:45 AM	0	0	0	0	0	0	0	0	0	0	0	0	0
	8:00 AM	0	0	0	0	0	0	0	0	0	0	0	0	0
	Total	0	0	0	0	0	0	0	0	0	1	0	1	1
MD	12:00 PM	0	0	0	0	0	0	0	0	0	0	0	0	0
	12:15 PM	0	0	0	0	0	0	0	0	0	0	0	0	0
	12:30 PM	0	0	0	0	0	0	0	0	0	0	0	0	0
	12:45 PM	0	0	0	0	0	0	0	0	0	0	0	0	0
	Total	0	0	0	0	0	0	0	0	0	0	0	0	0
PM	3:45 PM	0	0	0	1	0	1	0	0	0	0	1	1	2
	4:00 PM	0	0	0	0	0	0	0	0	0	4	0	4	4
	4:15 PM	0	0	0	0	0	0	0	0	0	0	1	1	1
	4:30 PM	0	0	0	0	0	0	0	0	0	1	0	1	1
	Total	0	0	0	1	0	1	0	0	0	5	2	7	8

Intersection Traffic Volume Report

Count Basics		*Page 5 of 11*
Start Date: Tuesday, May 14, 2024	Weekday	Schools in Session
Total Number of Hours Counted: 6	Non-Holiday	No Special Events

15-Minute Motor Vehicle Data

All Motor Vehicles

Prairie Ave and Shopiere Rd

15-Minute Motor Vehicle Data

15-Minute Time Period		From North (↓) Prairie Ave					From East (←) Shopiere Rd					From South (↑) Prairie Ave					From West (→) Shopiere Rd					15-Min	Hourly	
Start Time		Right	Thru	Left	U-Tn	Total	Right	Thru	Left	U-Tn	Total	Right	Thru	Left	U-Tn	Total	Right	Thru	Left	U-Tn	Total	Totals	Sum	PHF
AM Peak Period	6:00 AM	5	20	10	0	35	5	8	4	0	17	13	15	2	0	30	2	22	8	0	32	114	573	0.83
	6:15 AM	0	13	3	0	16	4	16	17	0	37	9	26	4	0	39	3	22	6	0	31	123	693	0.74
	6:30 AM	8	22	4	0	34	7	23	12	0	42	15	33	1	0	49	2	39	7	0	48	173	839	0.78
	6:45 AM	5	19	9	0	33	8	17	21	0	46	13	42	0	0	55	0	23	6	0	29	163	1035	0.70
	7:00 AM	12	34	12	0	58	11	37	18	0	66	15	52	6	0	73	1	33	3	0	37	234	1240	0.84
	7:15 AM	5	35	12	0	52	3	59	17	0	79	20	61	3	0	84	1	44	9	0	54	269	1294	0.88
	7:30 AM	7	55	12	0	74	7	70	23	0	100	28	78	6	0	112	2	64	17	0	83	369	1275	0.86
	7:45 AM	17	43	11	0	71	10	53	33	0	96	29	70	5	0	104	6	66	25	0	97	368	1123	0.76
	8:00 AM	13	41	18	0	72	2	45	28	0	75	16	53	2	0	71	2	44	24	0	70	288	948	0.82
	8:15 AM	20	47	9	0	76	9	39	9	0	57	12	61	3	0	76	1	21	19	0	41	250		
	8:30 AM	9	37	11	0	57	11	23	22	0	56	9	49	5	0	63	3	30	8	0	41	217		
	8:45 AM	4	31	12	0	47	5	34	14	0	53	17	35	2	0	54	2	20	17	0	39	193		
	9:00 AM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
	9:15 AM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
	9:30 AM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
	9:45 AM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
Midday Peak Period	10:00 AM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
	10:15 AM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
	10:30 AM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
	10:45 AM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
	11:00 AM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
	11:15 AM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
	11:30 AM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
	11:45 AM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
	12:00 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
	12:15 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
	12:30 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
	12:45 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
	1:00 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
	1:15 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
	1:30 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
	1:45 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
PM Peak Period	2:00 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
	2:15 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
	2:30 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
	2:45 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
	3:00 PM	14	78	11	0	103	14	47	48	0	109	23	81	8	0	112	8	53	16	0	77	401	1568	0.95
	3:15 PM	17	71	11	0	99	14	55	29	0	98	26	70	8	0	104	9	38	21	0	68	369	1609	0.91
	3:30 PM	12	66	9	0	87	12	45	33	0	90	31	57	6	0	94	6	86	23	0	115	386	1653	0.93
	3:45 PM	21	77	11	0	109	14	44	33	0	91	39	73	5	0	117	10	61	24	0	95	412	1661	0.94
	4:00 PM	18	115	11	0	144	18	47	36	0	101	35	67	7	0	109	5	72	11	0	88	442	1634	0.92
	4:15 PM	18	80	14	0	112	24	49	38	0	111	27	63	8	0	98	10	68	14	0	92	413	1574	0.95
	4:30 PM	18	85	15	0	118	14	40	32	0	86	35	55	10	0	100	4	80	6	0	90	394	1555	0.99
	4:45 PM	15	77	9	0	101	12	45	34	0	91	41	65	4	0	110	4	65	14	0	83	385	1520	0.96
	5:00 PM	4	81	15	0	100	13	55	36	0	104	22	69	10	0	101	8	54	15	0	77	382	1425	0.90
	5:15 PM	25	74	10	0	109	14	52	39	0	105	27	57	10	0	94	9	55	22	0	86	394		
	5:30 PM	10	59	14	0	83	20	52	35	0	107	29	71	5	0	105	6	46	12	0	64	359		
	5:45 PM	8	52	14	0	74	12	34	33	0	79	22	49	6	0	77	11	37	12	0	60	290		
	6:00 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
	6:15 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
	6:30 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
	6:45 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
	7:00 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
	7:15 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
	7:30 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
	7:45 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
	8:00 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
	8:15 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
	8:30 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
	8:45 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
	9:00 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
	9:15 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
	9:30 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
	9:45 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
Totals		285	1312	267	0	1864	263	989	644	0	1896	553	1352	126	0	2031	115	1143	339	0	1597	7388		

Peak Hour All Vehicle Volume Summary

Hourly Time Period		From North (↓) Prairie Ave					From East (←) Shopiere Rd					From South (↑) Prairie Ave					From West (→) Shopiere Rd					Total Hourly	
Start Time		Right	Thru	Left	U-Tn	Total	Right	Thru	Left	U-Tn	Total	Right	Thru	Left	U-Tn	Total	Right	Thru	Left	U-Tn	Total	Volume	PHF
AM	7:15 AM	42	174	53	0	269	22	227	101	0	350	93	262	16	0	371	11	218	75	0	304	1294	0.88
MD	12:00 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
PM	3:45 PM	75	357	51	0	483	70	180	139	0	389	136	258	30	0	424	29	281	55	0	365	1661	0.94

Intersection Traffic Volume Report

Count Basics			*Page 9 of 11*
Start Date:	Tuesday, May 14, 2024	Weekday	Schools in Session
Total Number of Hours Counted: 6		Non-Holiday	No Special Events

15-Minute Heavy Vehicle Data

Heavy Vehicles (Single-Unit Trucks, Buses & Semi-Trucks)

Prairie Ave and Shopiere Rd

15-Minute Heavy Vehicle Data

15-Minute Time Period	Start Time	From North (↓) Prairie Ave					From East (←) Shopiere Rd					From South (↑) Prairie Ave					From West (→) Shopiere Rd					15-Min Totals	Hourly Sum
		Right	Thru	Left	U-Tn	Total	Right	Thru	Left	U-Tn	Total	Right	Thru	Left	U-Tn	Total	Right	Thru	Left	U-Tn	Total		
AM Peak Period	6:00 AM	1	0	1	0	2	0	0	0	0	0	0	0	1	0	1	0	0	0	0	0	3	26
	6:15 AM	0	0	0	0	0	0	0	0	0	0	0	3	1	0	4	0	0	0	0	0	4	31
	6:30 AM	1	2	0	0	3	1	1	2	0	4	0	0	1	0	1	0	1	0	0	1	9	32
	6:45 AM	1	0	0	0	1	1	1	1	0	3	1	3	0	0	4	0	1	1	0	2	10	32
	7:00 AM	1	0	0	0	1	2	0	1	0	3	0	0	1	0	1	0	2	1	0	3	8	28
	7:15 AM	0	0	2	0	2	0	1	0	0	1	0	0	0	0	0	0	1	1	0	2	5	28
	7:30 AM	0	0	0	0	0	1	1	4	0	6	1	0	1	0	2	0	1	0	0	1	9	39
	7:45 AM	0	0	0	0	0	1	0	1	0	2	0	0	0	0	0	0	3	1	0	4	6	41
	8:00 AM	0	3	0	0	3	0	1	1	0	2	1	0	0	0	1	0	2	0	0	2	8	44
	8:15 AM	1	7	0	0	8	2	0	1	0	3	0	2	1	0	3	0	0	2	0	2	16	
	8:30 AM	0	5	0	0	5	1	1	2	0	4	0	0	1	0	1	0	1	0	0	1	11	
	8:45 AM	0	1	0	0	1	0	2	0	0	2	1	3	0	0	4	0	1	1	0	2	9	
	9:00 AM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
	9:15 AM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
	9:30 AM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
	9:45 AM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
Midday Peak Period	10:00 AM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
	10:15 AM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
	10:30 AM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
	10:45 AM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
	11:00 AM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
	11:15 AM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
	11:30 AM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
	11:45 AM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
	12:00 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
	12:15 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
	12:30 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
	12:45 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
	1:00 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
	1:15 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
	1:30 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
	1:45 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
PM Peak Period	2:00 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
	2:15 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
	2:30 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
	2:45 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
	3:00 PM	0	0	1	0	1	1	2	2	0	5	0	2	1	0	3	0	3	0	0	3	12	37
	3:15 PM	0	0	0	0	0	0	1	1	0	2	1	1	0	0	2	0	1	1	0	2	6	32
	3:30 PM	0	0	1	0	1	1	0	3	0	4	0	5	1	0	6	0	2	1	0	3	14	31
	3:45 PM	0	1	0	0	1	0	0	0	0	0	0	2	0	0	2	0	0	2	0	2	5	24
	4:00 PM	1	1	1	0	3	0	1	1	0	2	0	1	0	0	1	0	1	0	0	1	7	22
	4:15 PM	0	0	0	0	0	1	2	0	0	3	0	0	1	0	1	0	0	1	0	1	5	20
	4:30 PM	0	3	0	0	3	1	0	2	0	3	0	1	0	0	1	0	0	0	0	0	7	17
	4:45 PM	0	0	0	0	0	0	0	1	0	1	0	0	1	0	1	0	0	1	0	1	3	16
	5:00 PM	0	0	0	0	0	1	1	1	0	3	0	1	1	0	2	0	0	0	0	0	5	15
	5:15 PM	0	0	0	0	0	0	0	0	0	0	0	1	0	0	1	0	1	0	0	1	2	
	5:30 PM	1	0	1	0	2	0	1	2	0	3	0	0	0	0	0	1	0	0	0	1	6	
	5:45 PM	0	1	0	0	1	0	0	0	0	0	0	0	1	0	1	0	0	0	0	0	2	
	6:00 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
	6:15 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
	6:30 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
	6:45 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
	7:00 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
	7:15 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
	7:30 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
	7:45 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
	8:00 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
	8:15 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
	8:30 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
	8:45 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
	9:00 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
	9:15 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
	9:30 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
	9:45 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
Totals		7	24	7	0	38	14	16	26	0	56	5	25	13	0	43	1	21	13	0	35	172	

Peak Hour Heavy Vehicle Volume Summary

Hourly Time Period	Start Time	From North (↓) Prairie Ave					From East (←) Shopiere Rd					From South (↑) Prairie Ave					From West (→) Shopiere Rd					Total Hourly Volume
		Right	Thru	Left	U-Tn	Total	Right	Thru	Left	U-Tn	Total	Right	Thru	Left	U-Tn	Total	Right	Thru	Left	U-Tn	Total	
AM	7:15 AM	0	3	2	0	5	2	3	6	0	11	2	0	1	0	3	0	7	2	0	9	28
MD	12:00 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
PM	3:45 PM	1	5	1	0	7	2	3	3	0	8	0	4	1	0	5	0	1	3	0	4	24

Intersection Traffic Volume Report

Count Basics	Version 2011.J3		Page 1 of 11
Start Date:	Tuesday, May 14, 2024	Weekday	Schools in Session
Total Number of Hours Counted: 3		Non-Holiday	No Special Events

Base Information, Observed (3) Hour and Estimated (24) Hour Volume Summaries

Intersection of: Prairie Ave and Bayliss Ave

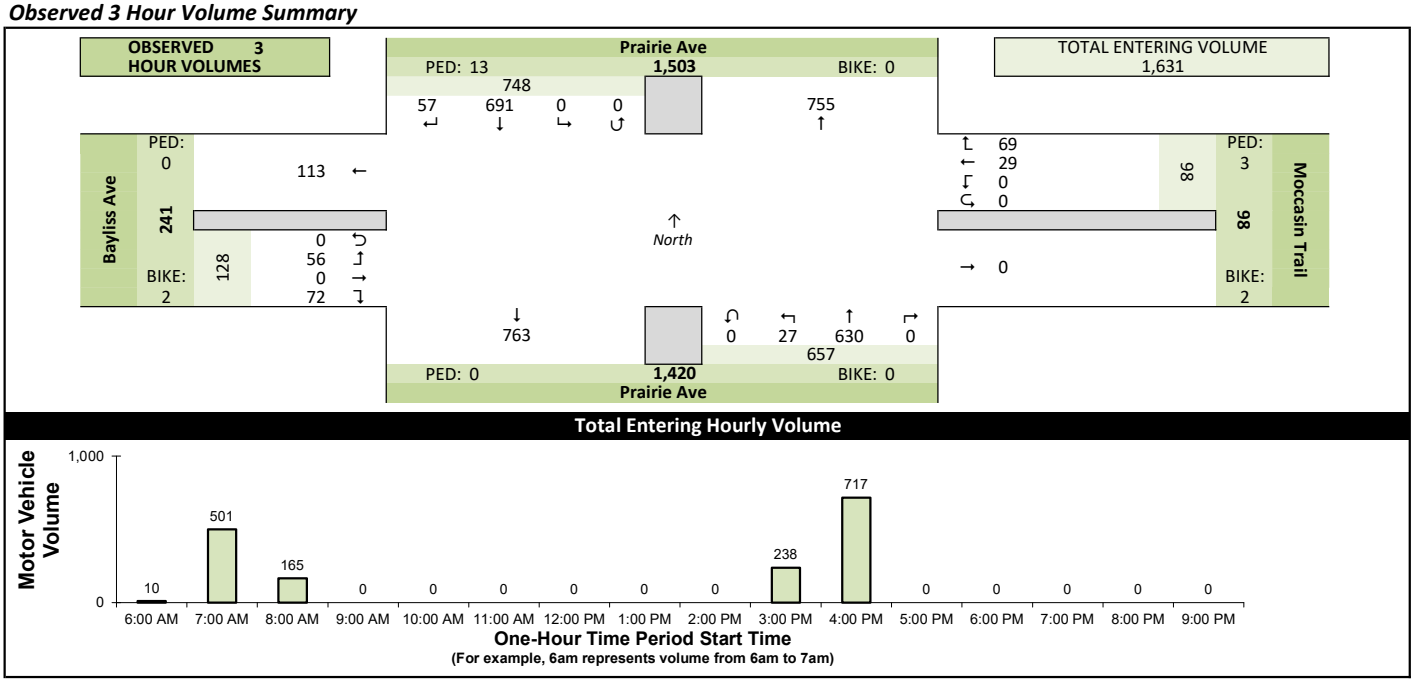
Site Information

Municipality	City of Beloit		
County	Rock	WisDOT Region	SE
Traffic Control	Traffic Signal		
Roadway Names		North Direction	↑
North Leg	Prairie Ave		
East Leg	Moccasin Trail		
South Leg	Prairie Ave		
West Leg	Bayliss Ave		
Special Considerations			
Schools	In Session		
Holidays	None		
Special Events	None		
Special Pedestrians Observed			
Pre-school children	None		
Elementry school age children	None		
Visually impaired (white cane/helper dog)	None		
Elderly/disabled (except wheelchairs)	None		
Wheelchairs/electric scooters	None		
Other (describe)	None	None	

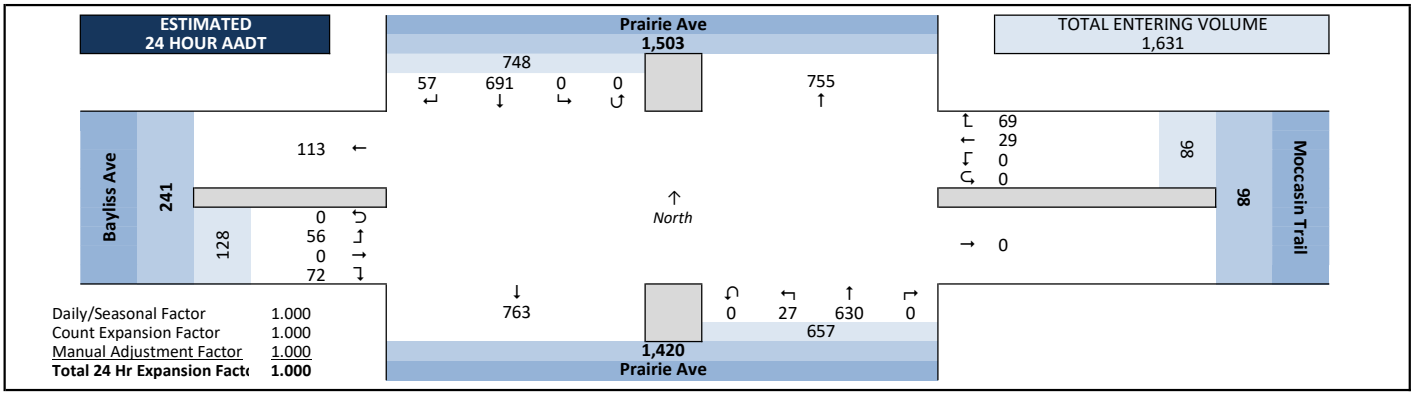
Count Information

Hrs Counted:	6:00 AM - 9:00 AM and 3:00 PM to 6:00 PM				
Count Dates				Weather	
AM Peak Period	Tuesday, May 14, 2024			Clear & Dry	
Midday Peak Period	Tuesday, May 14, 2024			Clear & Dry	
PM Peak Period	Tuesday, May 14, 2024			Clear & Dry	
Calculated Peak Hours					
AM	7:15-8:15am	MD		PM	3:45-4:45pm
Peak Hours Selected for Analysis					
AM	7:15-8:15am	MD		PM	3:45-4:45pm
Daily/Seasonal Adjustment Group	(2) Urban Arterials & Collectors				
Count Expansion Group	(4) Rural Arterials & Collectors				
Daily/Seasonal Adjustment Factor	1.000	Count Expansion Factor	1.000		
Company Name	AECOM			Manual Adj.	1.000
Observers	AM Peak Period	MioVision			
	Midday Peak Period	MioVision			
	PM Peak Period	MioVision			
Comments					

Observed 3 Hour Volume Summary



Estimated 24 Hour AADT



Intersection Traffic Volume Report

Count Basics		*Page 3 of 11*
Start Date: Tuesday, May 14, 2024	Weekday	Schools in Session
Total Number of Hours Counted: 3	Non-Holiday	No Special Events

Peak Hour Volume Summary

Prairie Ave and Bayliss Ave

All Motor Vehicles

Peak Hour Volumes, Truck Percentages, and PHFs

Tuesday, May 14, 2024		From North					From East					From South					From West					
	AM Peak Hour	Prairie Ave					Moccasin Trail					Prairie Ave					Bayliss Ave					
	Start Time	Right	Thru	Left	U-Tn	Total	Right	Thru	Left	U-Tn	Total	Right	Thru	Left	U-Tn	Total	Right	Thru	Left	U-Tn	Total	Totals
AM Peak Hour	7:15 AM	4	43	0	0	47	2	1	0	0	3	0	79	2	0	81	8	0	4	0	12	143
	7:30 AM	5	62	0	0	67	5	0	0	0	5	0	84	3	0	87	10	0	5	0	15	174
	7:45 AM	2	62	0	0	64	8	3	0	0	11	0	95	1	0	96	7	0	6	0	13	184
	8:00 AM	5	62	0	0	67	4	0	0	0	4	0	80	1	0	81	9	0	4	0	13	165
	Peak Hour Volume	16	229	0	0	245	19	4	0	0	23	0	338	7	0	345	34	0	19	0	53	666
	Rounded Hourly Volume	15	230	0	0	245	20	5	0	0	25	0	340	5	0	345	35	0	20	0	55	670
	% Single Unit Trucks	6.2	1.7	0.0	0.0	2.0	10.5	0.0	0.0	0.0	8.7	0.0	1.2	0.0	0.0	1.2	2.9	0.0	0.0	0.0	1.9	1.8
	% Heavy Trucks	0.0	0.0	0.0	0.0	0.0	5.3	25.0	0.0	0.0	8.7	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.3
	% Trucks (Total)	6.2	1.7	0.0	0.0	2.0	15.8	25.0	0.0	0.0	17.4	0.0	1.2	0.0	0.0	1.2	2.9	0.0	0.0	0.0	1.9	2.1
	Peak Hour Factor (PHF)	0.80	0.92	0.00	0.00	0.91	0.59	0.33	0.00	0.00	0.52	0.00	0.89	0.58	0.00	0.90	0.85	0.00	0.79	0.00	0.88	0.90

N/A		From North					From East					From South					From West					
	MD Peak Hour	Prairie Ave					Moccasin Trail					Prairie Ave					Bayliss Ave					
	Start Time	Right	Thru	Left	U-Tn	Total	Right	Thru	Left	U-Tn	Total	Right	Thru	Left	U-Tn	Total	Right	Thru	Left	U-Tn	Total	Totals
Midday (MD) Peak Hour	12:00 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
	12:15 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
	12:30 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
	12:45 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
	Peak Hour Volume	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
	Rounded Hourly Volume	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
	% Single Unit Trucks	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
	% Heavy Trucks	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	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 (Total)	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
	Peak Hour Factor (PHF)	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00

Tuesday, May 14, 2024		From North					From East					From South					From West					
	PM Peak Hour	Prairie Ave					Moccasin Trail					Prairie Ave					Bayliss Ave					
	Start Time	Right	Thru	Left	U-Tn	Total	Right	Thru	Left	U-Tn	Total	Right	Thru	Left	U-Tn	Total	Right	Thru	Left	U-Tn	Total	Totals
PM Peak Hour	3:45 PM	4	98	0	0	102	9	8	0	0	17	0	88	5	0	93	14	0	12	0	26	238
	4:00 PM	9	138	0	0	147	11	9	0	0	20	0	68	5	0	73	6	0	13	0	19	259
	4:15 PM	17	109	0	0	126	18	5	0	0	23	0	72	6	0	78	10	0	5	0	15	242
	4:30 PM	10	114	0	0	124	11	3	0	0	14	0	60	4	0	64	7	0	7	0	14	216
	Peak Hour Volume	40	459	0	0	499	49	25	0	0	74	0	288	20	0	308	37	0	37	0	74	955
	Rounded Hourly Volume	40	460	0	0	500	50	25	0	0	75	0	290	20	0	310	35	0	35	0	70	955
	% Single Unit Trucks	2.5	0.7	0.0	0.0	0.8	2.0	0.0	0.0	0.0	1.4	0.0	1.4	0.0	0.0	1.3	2.7	0.0	0.0	0.0	1.4	1.0
	% Heavy Trucks	2.5	0.7	0.0	0.0	0.8	4.1	0.0	0.0	0.0	2.7	0.0	0.7	0.0	0.0	0.6	2.7	0.0	0.0	0.0	1.4	0.9
	% Trucks (Total)	5.0	1.3	0.0	0.0	1.6	6.1	0.0	0.0	0.0	4.1	0.0	2.1	0.0	0.0	1.9	5.4	0.0	0.0	0.0	2.7	2.0
	Peak Hour Factor (PHF)	0.59	0.83	0.00	0.00	0.85	0.68	0.69	0.00	0.00	0.80	0.00	0.82	0.83	0.00	0.83	0.66	0.00	0.71	0.00	0.71	0.92

Peak Hour Pedestrian and Bicyclist Volumes

Pedestrians and Bicyclists		Crossing North Approach			Crossing East Approach			Crossing South Approach			Crossing West Approach			Total Ped & Bike Volume
		Prairie Ave			Moccasin Trail			Prairie Ave			Bayliss Ave			
	15-Minute Start Time	Pedestrian	Bicyclist	Total	Pedestrian	Bicyclist	Total	Pedestrian	Bicyclist	Total	Pedestrian	Bicyclist	Total	
AM	7:15 AM	1	0	1	0	0	0	0	0	0	0	0	0	1
	7:30 AM	0	0	0	0	0	0	0	0	0	0	0	0	0
	7:45 AM	0	0	0	0	0	0	0	0	0	0	0	0	0
	8:00 AM	0	0	0	0	0	0	0	0	0	0	0	0	0
	Total	1	0	1	0	0	0	0	0	0	0	0	0	1
MD	12:00 PM	0	0	0	0	0	0	0	0	0	0	0	0	0
	12:15 PM	0	0	0	0	0	0	0	0	0	0	0	0	0
	12:30 PM	0	0	0	0	0	0	0	0	0	0	0	0	0
	12:45 PM	0	0	0	0	0	0	0	0	0	0	0	0	0
	Total	0	0	0	0	0	0	0	0	0	0	0	0	0
PM	3:45 PM	1	0	1	2	2	4	0	0	0	0	0	0	5
	4:00 PM	9	0	9	1	0	1	0	0	0	0	0	0	10
	4:15 PM	2	0	2	0	0	0	0	0	0	0	1	1	3
	4:30 PM	0	0	0	0	0	0	0	0	0	0	1	1	1
	Total	12	0	12	3	2	5	0	0	0	0	2	2	19

Intersection Traffic Volume Report

Count Basics		*Page 5 of 11*
Start Date: Tuesday, May 14, 2024	Weekday	Schools in Session
Total Number of Hours Counted: 3	Non-Holiday	No Special Events

15-Minute Motor Vehicle Data

All Motor Vehicles

Prairie Ave and Bayliss Ave

15-Minute Motor Vehicle Data

15-Minute Time Period	Start Time	From North (↓) Prairie Ave					From East (←) Moccasin Trail					From South (↑) Prairie Ave					From West (→) Bayliss Ave					15-Min Totals	Hourly Sum	PHF
		Right	Thru	Left	U-Tn	Total	Right	Thru	Left	U-Tn	Total	Right	Thru	Left	U-Tn	Total	Right	Thru	Left	U-Tn	Total			
AM Peak Period	6:00 AM	0	1	0	0	1	0	0	0	0	0	0	2	0	0	2	0	0	0	0	0	3	10	0.83
	6:15 AM	0	0	0	0	0	1	0	0	0	1	0	0	0	0	0	0	0	0	0	0	1		
	6:30 AM	1	0	0	0	1	0	0	0	0	0	0	1	0	0	1	1	0	0	0	1	3		
	6:45 AM	0	2	0	0	2	0	0	0	0	0	0	1	0	0	1	0	0	0	0	0	3		
	7:00 AM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
	7:15 AM	4	43	0	0	47	2	1	0	0	3	0	79	2	0	81	8	0	4	0	12	143	666	0.90
	7:30 AM	5	62	0	0	67	5	0	0	0	5	0	84	3	0	87	10	0	5	0	15	174		
	7:45 AM	2	62	0	0	64	8	3	0	0	11	0	95	1	0	96	7	0	6	0	13	184		
	8:00 AM	5	62	0	0	67	4	0	0	0	4	0	80	1	0	81	9	0	4	0	13	165		
	8:15 AM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
	8:30 AM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
	8:45 AM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
	9:00 AM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
	9:15 AM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
	9:30 AM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
	9:45 AM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
Midday Peak Period	10:00 AM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
	10:15 AM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
	10:30 AM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
	10:45 AM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
	11:00 AM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
	11:15 AM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
	11:30 AM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
	11:45 AM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
	12:00 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
	12:15 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
	12:30 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
	12:45 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
	1:00 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
	1:15 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
	1:30 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
	1:45 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
PM Peak Period	2:00 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
	2:15 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
	2:30 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
	2:45 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
	3:00 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
	3:15 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
	3:30 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
	3:45 PM	4	98	0	0	102	9	8	0	0	17	0	88	5	0	93	14	0	12	0	26	238	955	0.92
	4:00 PM	9	138	0	0	147	11	9	0	0	20	0	68	5	0	73	6	0	13	0	19	259		
	4:15 PM	17	109	0	0	126	18	5	0	0	23	0	72	6	0	78	10	0	5	0	15	242		
	4:30 PM	10	114	0	0	124	11	3	0	0	14	0	60	4	0	64	7	0	7	0	14	216		
	4:45 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
	5:00 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
	5:15 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
	5:30 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
	5:45 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
	6:00 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
	6:15 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
	6:30 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
	6:45 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
	7:00 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
	7:15 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
	7:30 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
	7:45 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
	8:00 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
	8:15 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
	8:30 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
	8:45 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
	9:00 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
	9:15 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
	9:30 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
	9:45 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
Totals		57	691	0	0	748	69	29	0	0	98	0	630	27	0	657	72	0	56	0	128	1631		

Peak Hour All Vehicle Volume Summary

Hourly Time Period	Start Time	From North (↓) Prairie Ave					From East (←) Moccasin Trail					From South (↑) Prairie Ave					From West (→) Bayliss Ave					Total Hourly Volume	PHF
		Right	Thru	Left	U-Tn	Total	Right	Thru	Left	U-Tn	Total	Right	Thru	Left	U-Tn	Total	Right	Thru	Left	U-Tn	Total		
AM	7:15 AM	16	229	0	0	245	19	4	0	0	23	0	338	7	0	345	34	0	19	0	53	666	0.90
MD	12:00 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
PM	3:45 PM	40	459	0	0	499	49	25	0	0	74	0	288	20	0	308	37	0	37	0	74	955	0.92

Intersection Traffic Volume Report

Count Basics			*Page 9 of 11*
Start Date:	Tuesday, May 14, 2024	Weekday	Schools in Session
Total Number of Hours Counted: 3		Non-Holiday	No Special Events

15-Minute Heavy Vehicle Data

Heavy Vehicles (Single-Unit Trucks, Buses & Semi-Trucks)

Prairie Ave and Bayliss Ave

15-Minute Heavy Vehicle Data

15-Minute Time Period	Start Time	From North (↓) Prairie Ave					From East (←) Moccasin Trail					From South (↑) Prairie Ave					From West (→) Bayliss Ave					15-Min Totals	Hourly Sum
		Right	Thru	Left	U-Tn	Total	Right	Thru	Left	U-Tn	Total	Right	Thru	Left	U-Tn	Total	Right	Thru	Left	U-Tn	Total		
AM Peak Period	6:00 AM	0	1	0	0	1	0	0	0	0	0	0	2	0	0	2	0	0	0	0	0	3	10
	6:15 AM	0	0	0	0	0	1	0	0	0	1	0	0	0	0	0	0	0	0	0	0	1	
	6:30 AM	1	0	0	0	1	0	0	0	0	0	0	1	0	0	1	1	0	0	0	1	3	
	6:45 AM	0	2	0	0	2	0	0	0	0	0	0	1	0	0	1	0	0	0	0	0	3	
	7:00 AM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
	7:15 AM	1	1	0	0	2	0	0	0	0	0	0	2	0	0	2	1	0	0	0	1	5	14
	7:30 AM	0	0	0	0	0	1	0	0	0	1	0	1	0	0	1	0	0	0	0	0	2	
	7:45 AM	0	0	0	0	0	1	1	0	0	2	0	1	0	0	1	0	0	0	0	0	3	
	8:00 AM	0	3	0	0	3	1	0	0	0	1	0	0	0	0	0	0	0	0	0	0	4	
	8:15 AM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
	8:30 AM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
	8:45 AM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
	9:00 AM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
	9:15 AM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
	9:30 AM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
	9:45 AM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
Midday Peak Period	10:00 AM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
	10:15 AM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
	10:30 AM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
	10:45 AM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
	11:00 AM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
	11:15 AM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
	11:30 AM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
	11:45 AM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
	12:00 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
	12:15 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
	12:30 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
	12:45 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
	1:00 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
	1:15 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
	1:30 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
	1:45 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
PM Peak Period	2:00 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
	2:15 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
	2:30 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
	2:45 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
	3:00 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
	3:15 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
	3:30 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
	3:45 PM	0	2	0	0	2	0	0	0	0	0	0	3	0	0	3	1	0	0	0	1	6	19
	4:00 PM	0	1	0	0	1	1	0	0	0	1	0	0	0	0	0	0	0	0	0	0	2	
	4:15 PM	2	0	0	0	2	1	0	0	0	1	0	2	0	0	2	1	0	0	0	1	6	
	4:30 PM	0	3	0	0	3	1	0	0	0	1	0	1	0	0	1	0	0	0	0	0	5	
	4:45 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
	5:00 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
	5:15 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
	5:30 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
	5:45 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
	6:00 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
	6:15 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
	6:30 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
	6:45 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
	7:00 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
	7:15 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
	7:30 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
	7:45 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
	8:00 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
	8:15 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
	8:30 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
	8:45 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
	9:00 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
	9:15 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
	9:30 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
	9:45 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
Totals		4	13	0	0	17	7	1	0	0	8	0	14	0	0	14	4	0	0	0	4	43	

Peak Hour Heavy Vehicle Volume Summary

Hourly Time Period	Start Time	From North (↓) Prairie Ave					From East (←) Moccasin Trail					From South (↑) Prairie Ave					From West (→) Bayliss Ave					Total Hourly Volume
		Right	Thru	Left	U-Tn	Total	Right	Thru	Left	U-Tn	Total	Right	Thru	Left	U-Tn	Total	Right	Thru	Left	U-Tn	Total	
AM	7:15 AM	1	4	0	0	5	3	1	0	0	4	0	4	0	0	4	1	0	0	0	1	14
MD	12:00 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
PM	3:45 PM	2	6	0	0	8	3	0	0	0	3	0	6	0	0	6	2	0	0	0	2	19

Intersection Traffic Volume Report

Count Basics	Version 2011.J3		Page 1 of 11
Start Date:	Tuesday, May 14, 2024	Weekday	Schools in Session
Total Number of Hours Counted: 6		Non-Holiday	No Special Events

Base Information, Observed (6) Hour and Estimated (24) Hour Volume Summaries

Intersection of: Shopiere Rd and Moccasin Trail

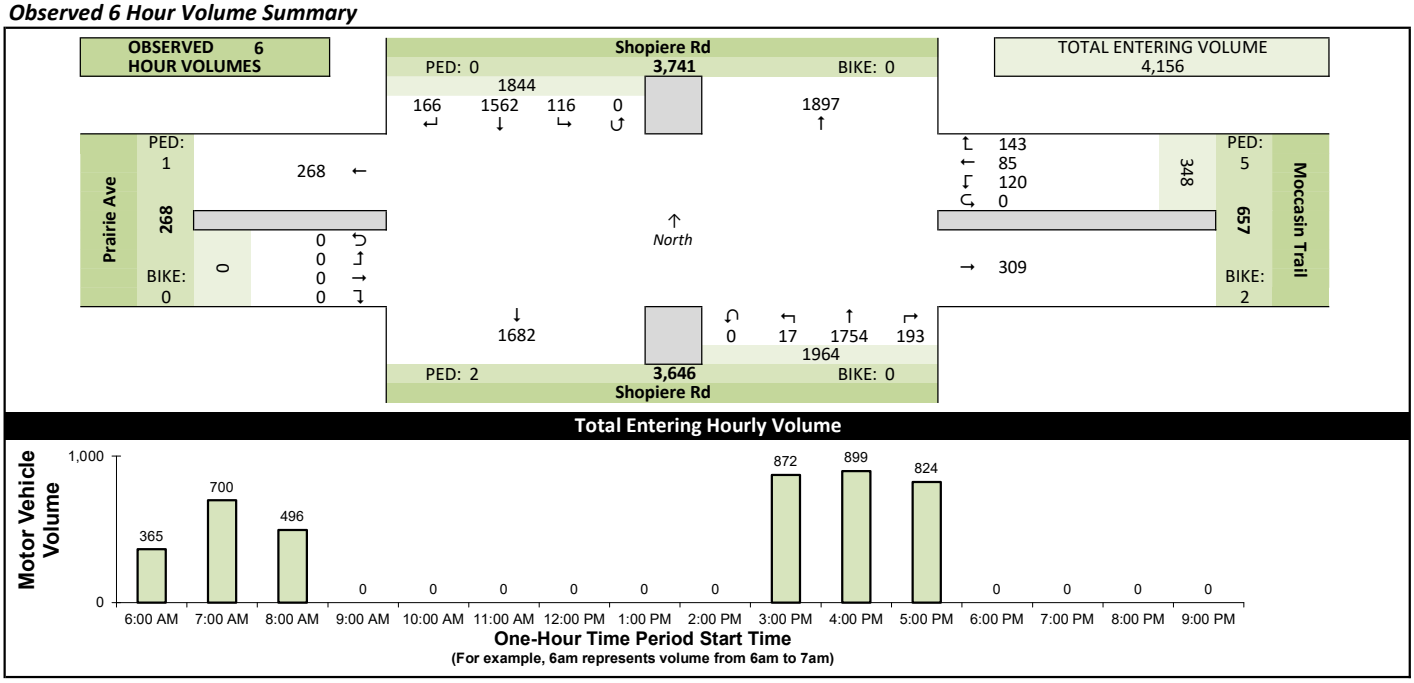
Site Information

Municipality	City of Beloit		
County	Rock	WisDOT Region	SE
Traffic Control	Partial Stop Control		
Roadway Names		North Direction	↑
North Leg	Shopiere Rd		
East Leg	Moccasin Trail		
South Leg	Shopiere Rd		
West Leg	Prairie Ave		
Special Considerations			
Schools	In Session		
Holidays	None		
Special Events	None		
Special Pedestrians Observed			
Pre-school children	None		
Elementry school age children	None		
Visually impaired (white cane/helper dog)	None		
Elderly/disabled (except wheelchairs)	None		
Wheelchairs/electric scooters	None		
Other (describe)	None	None	

Count Information

Hrs Counted:	6:00 AM - 9:00 AM and 3:00 PM to 6:00 PM				
Count Dates				Weather	
AM Peak Period	Tuesday, May 14, 2024			Clear & Dry	
Midday Peak Period	Tuesday, May 14, 2024			Clear & Dry	
PM Peak Period	Tuesday, May 14, 2024			Clear & Dry	
Calculated Peak Hours					
AM	7:15-8:15am	MD		PM	3:45-4:45pm
Peak Hours Selected for Analysis					
AM	7:15-8:15am	MD		PM	3:45-4:45pm
Daily/Seasonal Adjustment Group	(2) Urban Arterials & Collectors				
Count Expansion Group	(4) Rural Arterials & Collectors				
Daily/Seasonal Adjustment Factor	1.000	Count Expansion Factor	1.000		
Company Name	AECOM			Manual Adj.	1.000
Observers	AM Peak Period	MioVision			
	Midday Peak Period	MioVision			
	PM Peak Period	MioVision			
Comments					

Observed 6 Hour Volume Summary



Estimated 24 Hour AADT

Intersection Traffic Volume Report

Count Basics		*Page 3 of 11*
Start Date: Tuesday, May 14, 2024	Weekday	Schools in Session
Total Number of Hours Counted: 6	Non-Holiday	No Special Events

Peak Hour Volume Summary

Shopiere Rd and Moccasin Trail

All Motor Vehicles

Peak Hour Volumes, Truck Percentages, and PHFs

Tuesday, May 14, 2024		From North					From East					From South					From West					
	AM Peak Hour	Shopiere Rd					Moccasin Trail					Shopiere Rd					Prairie Ave					
	Start Time	Right	Thru	Left	U-Tn	Total	Right	Thru	Left	U-Tn	Total	Right	Thru	Left	U-Tn	Total	Right	Thru	Left	U-Tn	Total	Totals
AM Peak Hour	7:15 AM	1	74	2	0	77	3	1	8	0	12	5	65	0	0	70	0	0	0	0	0	159
	7:30 AM	2	91	2	0	95	2	4	9	0	15	4	92	0	0	96	0	0	0	0	0	206
	7:45 AM	6	79	1	0	86	4	3	6	0	13	10	96	1	0	107	0	0	0	0	0	206
	8:00 AM	2	66	6	0	74	5	2	3	0	10	10	70	0	0	80	0	0	0	0	0	164
	Peak Hour Volume	11	310	11	0	332	14	10	26	0	50	29	323	1	0	353	0	0	0	0	0	735
	Rounded Hourly Volume	10	310	10	0	330	15	10	25	0	50	30	325	0	0	355	0	0	0	0	0	735
	% Single Unit Trucks	9.1	2.9	0.0	0.0	3.0	28.6	20.0	0.0	0.0	12.0	6.9	2.2	0.0	0.0	2.5	0.0	0.0	0.0	0.0	0.0	3.4
	% Heavy Trucks	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	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 (Total)	9.1	2.9	0.0	0.0	3.0	28.6	20.0	0.0	0.0	12.0	6.9	2.2	0.0	0.0	2.5	0.0	0.0	0.0	0.0	0.0	3.4
	Peak Hour Factor (PHF)	0.46	0.85	0.46	0.00	0.87	0.70	0.62	0.72	0.00	0.83	0.72	0.84	0.25	0.00	0.82	0.00	0.00	0.00	0.00	0.00	0.89

N/A		From North					From East					From South					From West					
	MD Peak Hour	Shopiere Rd					Moccasin Trail					Shopiere Rd					Prairie Ave					
	Start Time	Right	Thru	Left	U-Tn	Total	Right	Thru	Left	U-Tn	Total	Right	Thru	Left	U-Tn	Total	Right	Thru	Left	U-Tn	Total	Totals
Midday (MD) Peak Hour	12:00 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
	12:15 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
	12:30 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
	12:45 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
	Peak Hour Volume	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
	Rounded Hourly Volume	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
	% Single Unit Trucks	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
	% Heavy Trucks	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	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 (Total)	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
	Peak Hour Factor (PHF)	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00

Tuesday, May 14, 2024		From North					From East					From South					From West					
	PM Peak Hour	Shopiere Rd					Moccasin Trail					Shopiere Rd					Prairie Ave					
	Start Time	Right	Thru	Left	U-Tn	Total	Right	Thru	Left	U-Tn	Total	Right	Thru	Left	U-Tn	Total	Right	Thru	Left	U-Tn	Total	Totals
PM Peak Hour	3:45 PM	13	80	5	0	98	8	3	3	0	14	16	97	1	0	114	0	0	0	0	0	226
	4:00 PM	19	72	7	0	98	6	2	3	0	11	12	103	1	0	116	0	0	0	0	0	225
	4:15 PM	13	76	11	0	100	12	4	1	0	17	8	102	0	0	110	0	0	0	0	0	227
	4:30 PM	9	70	8	0	87	9	2	3	0	14	12	115	3	0	130	0	0	0	0	0	231
	Peak Hour Volume	54	298	31	0	383	35	11	10	0	56	48	417	5	0	470	0	0	0	0	0	909
	Rounded Hourly Volume	55	300	30	0	385	35	10	10	0	55	50	415	5	0	470	0	0	0	0	0	910
	% Single Unit Trucks	0.0	2.3	3.2	0.0	2.1	2.9	9.1	0.0	0.0	3.6	2.1	0.2	0.0	0.0	0.4	0.0	0.0	0.0	0.0	0.0	1.3
	% Heavy Trucks	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	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 (Total)	0.0	2.3	3.2	0.0	2.1	2.9	9.1	0.0	0.0	3.6	2.1	0.2	0.0	0.0	0.4	0.0	0.0	0.0	0.0	0.0	1.3
	Peak Hour Factor (PHF)	0.71	0.93	0.70	0.00	0.96	0.73	0.69	0.83	0.00	0.82	0.75	0.91	0.42	0.00	0.90	0.00	0.00	0.00	0.00	0.00	0.98

Peak Hour Pedestrian and Bicyclist Volumes

Pedestrians and Bicyclists		Crossing North Approach			Crossing East Approach			Crossing South Approach			Crossing West Approach			Total Ped & Bike Volume
		Shopiere Rd			Moccasin Trail			Shopiere Rd			Prairie Ave			
	15-Minute Start Time	Pedestrian	Bicyclist	Total	Pedestrian	Bicyclist	Total	Pedestrian	Bicyclist	Total	Pedestrian	Bicyclist	Total	
AM	7:15 AM	0	0	0	0	0	0	0	0	0	0	0	0	0
	7:30 AM	0	0	0	0	0	0	0	0	0	0	0	0	0
	7:45 AM	0	0	0	0	0	0	0	0	0	0	0	0	0
	8:00 AM	0	0	0	0	0	0	0	0	0	0	0	0	0
	Total	0	0	0	0	0	0	0	0	0	0	0	0	0
MD	12:00 PM	0	0	0	0	0	0	0	0	0	0	0	0	0
	12:15 PM	0	0	0	0	0	0	0	0	0	0	0	0	0
	12:30 PM	0	0	0	0	0	0	0	0	0	0	0	0	0
	12:45 PM	0	0	0	0	0	0	0	0	0	0	0	0	0
	Total	0	0	0	0	0	0	0	0	0	0	0	0	0
PM	3:45 PM	0	0	0	0	0	0	1	0	1	0	0	0	1
	4:00 PM	0	0	0	0	0	0	0	0	0	0	0	0	0
	4:15 PM	0	0	0	0	0	0	0	0	0	0	0	0	0
	4:30 PM	0	0	0	0	0	0	0	0	0	0	0	0	0
	Total	0	0	0	0	0	0	1	0	1	0	0	0	1

Intersection Traffic Volume Report

Count Basics		*Page 5 of 11*
Start Date: Tuesday, May 14, 2024	Weekday	Schools in Session
Total Number of Hours Counted: 6	Non-Holiday	No Special Events

15-Minute Motor Vehicle Data

All Motor Vehicles

Shopiere Rd and Moccasin Trail

15-Minute Motor Vehicle Data

15-Minute Time Period	Start Time	From North (↓) Shopiere Rd					From East (←) Moccasin Trail					From South (↑) Shopiere Rd					From West (→) Prairie Ave					15-Min Totals	Hourly Sum	PHF
		Right	Thru	Left	U-Tn	Total	Right	Thru	Left	U-Tn	Total	Right	Thru	Left	U-Tn	Total	Right	Thru	Left	U-Tn	Total			
AM Peak Period	6:00 AM	3	9	4	0	16	5	1	3	0	9	4	44	1	0	49	0	0	0	0	0	74	365	0.81
	6:15 AM	1	36	3	0	40	6	2	2	0	10	0	35	1	0	36	0	0	0	0	0	86	420	0.81
	6:30 AM	3	37	0	0	40	10	2	3	0	15	1	55	1	0	57	0	0	0	0	0	112	493	0.78
	6:45 AM	4	37	1	0	42	0	3	0	0	3	4	43	1	0	48	0	0	0	0	0	93	587	0.71
	7:00 AM	3	54	1	0	58	1	5	5	0	11	7	53	0	0	60	0	0	0	0	0	129	700	0.85
	7:15 AM	1	74	2	0	77	3	1	8	0	12	5	65	0	0	70	0	0	0	0	0	159	735	0.89
	7:30 AM	2	91	2	0	95	2	4	9	0	15	4	92	0	0	96	0	0	0	0	0	206	684	0.83
	7:45 AM	6	79	1	0	86	4	3	6	0	13	10	96	1	0	107	0	0	0	0	0	206	595	0.72
	8:00 AM	2	66	6	0	74	5	2	3	0	10	10	70	0	0	80	0	0	0	0	0	164	496	0.76
	8:15 AM	7	52	1	0	60	3	2	1	0	6	3	38	1	0	42	0	0	0	0	0	108		
	8:30 AM	3	44	4	0	51	4	8	2	0	14	6	46	0	0	52	0	0	0	0	0	117		
	8:45 AM	2	40	2	0	44	4	3	6	0	13	8	42	0	0	50	0	0	0	0	0	107		
	9:00 AM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
	9:15 AM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
	9:30 AM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
	9:45 AM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
Midday Peak Period	10:00 AM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
	10:15 AM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
	10:30 AM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
	10:45 AM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
	11:00 AM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
	11:15 AM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
	11:30 AM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
	11:45 AM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
	12:00 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
	12:15 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
	12:30 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
	12:45 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
	1:00 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
	1:15 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
	1:30 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
	1:45 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
PM Peak Period	2:00 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
	2:15 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
	2:30 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
	2:45 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
	3:00 PM	7	92	10	0	109	5	6	12	0	23	8	84	2	0	94	0	0	0	0	0	226	872	0.95
	3:15 PM	8	83	4	0	95	7	6	6	0	19	6	70	1	0	77	0	0	0	0	0	191	871	0.95
	3:30 PM	7	71	7	0	85	5	4	8	0	17	19	108	0	0	127	0	0	0	0	0	229	907	0.99
	3:45 PM	13	80	5	0	98	8	3	3	0	14	16	97	1	0	114	0	0	0	0	0	226	909	0.98
	4:00 PM	19	72	7	0	98	6	2	3	0	11	12	103	1	0	116	0	0	0	0	0	225	899	0.97
	4:15 PM	13	76	11	0	100	12	4	1	0	17	8	102	0	0	110	0	0	0	0	0	227	890	0.96
	4:30 PM	9	70	8	0	87	9	2	3	0	14	12	115	3	0	130	0	0	0	0	0	231	878	0.95
	4:45 PM	10	70	9	0	89	10	4	4	0	18	9	100	0	0	109	0	0	0	0	0	216	872	0.97
	5:00 PM	10	92	11	0	113	5	2	7	0	14	12	76	1	0	89	0	0	0	0	0	216	824	0.92
	5:15 PM	10	90	5	0	105	10	4	6	0	20	10	79	1	0	90	0	0	0	0	0	215		
	5:30 PM	15	85	6	0	106	11	6	12	0	29	7	83	0	0	90	0	0	0	0	0	225		
	5:45 PM	8	62	6	0	76	8	6	7	0	21	12	58	1	0	71	0	0	0	0	0	168		
	6:00 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
	6:15 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
	6:30 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
	6:45 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
	7:00 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
	7:15 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
	7:30 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
	7:45 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
	8:00 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
	8:15 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
	8:30 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
	8:45 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
	9:00 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
	9:15 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
	9:30 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
	9:45 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
Totals		166	1562	116	0	1844	143	85	120	0	348	193	1754	17	0	1964	0	0	0	0	0	4156		

Peak Hour All Vehicle Volume Summary

Hourly Time Period	Start Time	From North (↓) Shopiere Rd					From East (←) Moccasin Trail					From South (↑) Shopiere Rd					From West (→) Prairie Ave					Total Hourly Volume	PHF
		Right	Thru	Left	U-Tn	Total	Right	Thru	Left	U-Tn	Total	Right	Thru	Left	U-Tn	Total	Right	Thru	Left	U-Tn	Total		
AM	7:15 AM	11	310	11	0	332	14	10	26	0	50	29	323	1	0	353	0	0	0	0	0	735	0.89
MD	12:00 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
PM	3:45 PM	54	298	31	0	383	35	11	10	0	56	48	417	5	0	470	0	0	0	0	0	909	0.98

Intersection Traffic Volume Report

Count Basics			*Page 9 of 11*
Start Date:	Tuesday, May 14, 2024	Weekday	Schools in Session
Total Number of Hours Counted: 6		Non-Holiday	No Special Events

15-Minute Heavy Vehicle Data

Heavy Vehicles (Single-Unit Trucks, Buses & Semi-Trucks)

Shopiere Rd and Moccasin Trail

15-Minute Heavy Vehicle Data

15-Minute Time Period Start Time		From North (↓) Shopiere Rd					From East (←) Moccasin Trail					From South (↑) Shopiere Rd					From West (→) Prairie Ave					15-Min Totals	Hourly Sum
		Right	Thru	Left	U-Tn	Total	Right	Thru	Left	U-Tn	Total	Right	Thru	Left	U-Tn	Total	Right	Thru	Left	U-Tn	Total		
AM Peak Period	6:00 AM	0	0	0	0	0	0	1	0	0	1	1	0	0	0	1	0	0	0	0	0	2	13
	6:15 AM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	15
	6:30 AM	0	3	0	0	3	1	1	0	0	2	0	1	0	0	1	0	0	0	0	0	6	21
	6:45 AM	0	2	0	0	2	0	1	0	0	1	0	2	0	0	2	0	0	0	0	0	5	24
	7:00 AM	1	1	0	0	2	0	0	0	0	0	0	2	0	0	2	0	0	0	0	0	4	23
	7:15 AM	0	2	0	0	2	2	0	0	0	2	1	1	0	0	2	0	0	0	0	0	6	25
	7:30 AM	0	5	0	0	5	1	1	0	0	2	0	2	0	0	2	0	0	0	0	0	9	21
	7:45 AM	1	0	0	0	1	0	1	0	0	1	1	1	0	0	2	0	0	0	0	0	4	19
	8:00 AM	0	2	0	0	2	1	0	0	0	1	0	3	0	0	3	0	0	0	0	0	6	18
	8:15 AM	1	0	0	0	1	0	1	0	0	1	0	0	0	0	0	0	0	0	0	0	2	
	8:30 AM	0	3	1	0	4	1	1	0	0	2	0	1	0	0	1	0	0	0	0	0	7	
	8:45 AM	0	1	0	0	1	0	0	0	0	0	0	2	0	0	2	0	0	0	0	0	3	
	9:00 AM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
	9:15 AM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
	9:30 AM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
	9:45 AM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
Midday Peak Period	10:00 AM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
	10:15 AM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
	10:30 AM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
	10:45 AM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
	11:00 AM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
	11:15 AM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
	11:30 AM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
	11:45 AM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
	12:00 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
	12:15 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
	12:30 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
	12:45 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
	1:00 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
	1:15 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
	1:30 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
	1:45 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
PM Peak Period	2:00 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
	2:15 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
	2:30 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
	2:45 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
	3:00 PM	0	4	0	0	4	0	2	0	0	2	1	2	0	0	3	0	0	0	0	0	9	23
	3:15 PM	0	2	0	0	2	0	0	0	0	0	0	2	0	0	2	0	0	0	0	0	4	19
	3:30 PM	0	4	0	0	4	1	1	0	0	2	0	3	0	0	3	0	0	0	0	0	9	17
	3:45 PM	0	1	0	0	1	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	1	12
	4:00 PM	0	2	1	0	3	0	0	0	0	0	1	1	0	0	2	0	0	0	0	0	5	12
	4:15 PM	0	2	0	0	2	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	2	10
	4:30 PM	0	2	0	0	2	1	1	0	0	2	0	0	0	0	0	0	0	0	0	0	4	8
	4:45 PM	0	0	0	0	0	0	0	1	0	1	0	0	0	0	0	0	0	0	0	0	1	11
	5:00 PM	0	2	0	0	2	0	0	0	0	0	0	1	0	0	1	0	0	0	0	0	3	11
	5:15 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
	5:30 PM	0	3	0	0	3	2	0	1	0	3	0	1	0	0	1	0	0	0	0	0	7	
	5:45 PM	0	0	0	0	0	1	0	0	0	1	0	0	0	0	0	0	0	0	0	0	1	
	6:00 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
	6:15 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
	6:30 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
	6:45 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
	7:00 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
	7:15 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
	7:30 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
	7:45 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
	8:00 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
	8:15 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
	8:30 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
	8:45 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
	9:00 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
	9:15 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
	9:30 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
	9:45 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
Totals		3	41	2	0	46	11	11	2	0	24	5	25	0	0	30	0	0	0	0	0	100	

Peak Hour Heavy Vehicle Volume Summary

Hourly Time Period Start Time		From North (↓) Shopiere Rd					From East (←) Moccasin Trail					From South (↑) Shopiere Rd					From West (→) Prairie Ave					Total Hourly Volume
		Right	Thru	Left	U-Tn	Total	Right	Thru	Left	U-Tn	Total	Right	Thru	Left	U-Tn	Total	Right	Thru	Left	U-Tn	Total	
AM	7:15 AM	1	9	0	0	10	4	2	0	0	6	2	7	0	0	9	0	0	0	0	0	25
MD	12:00 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
PM	3:45 PM	0	7	1	0	8	1	1	0	0	2	1	1	0	0	2	0	0	0	0	0	12

Intersection Traffic Volume Report

Count Basics	Version 2011.J3		Page 1 of 11
Start Date:	Thursday, May 16, 2024	Weekday	Schools in Session
Total Number of Hours Counted: 6		Non-Holiday	No Special Events

Base Information, Observed (6) Hour and Estimated (24) Hour Volume Summaries

Intersection of: Shopiere Rd and Cranston Rd

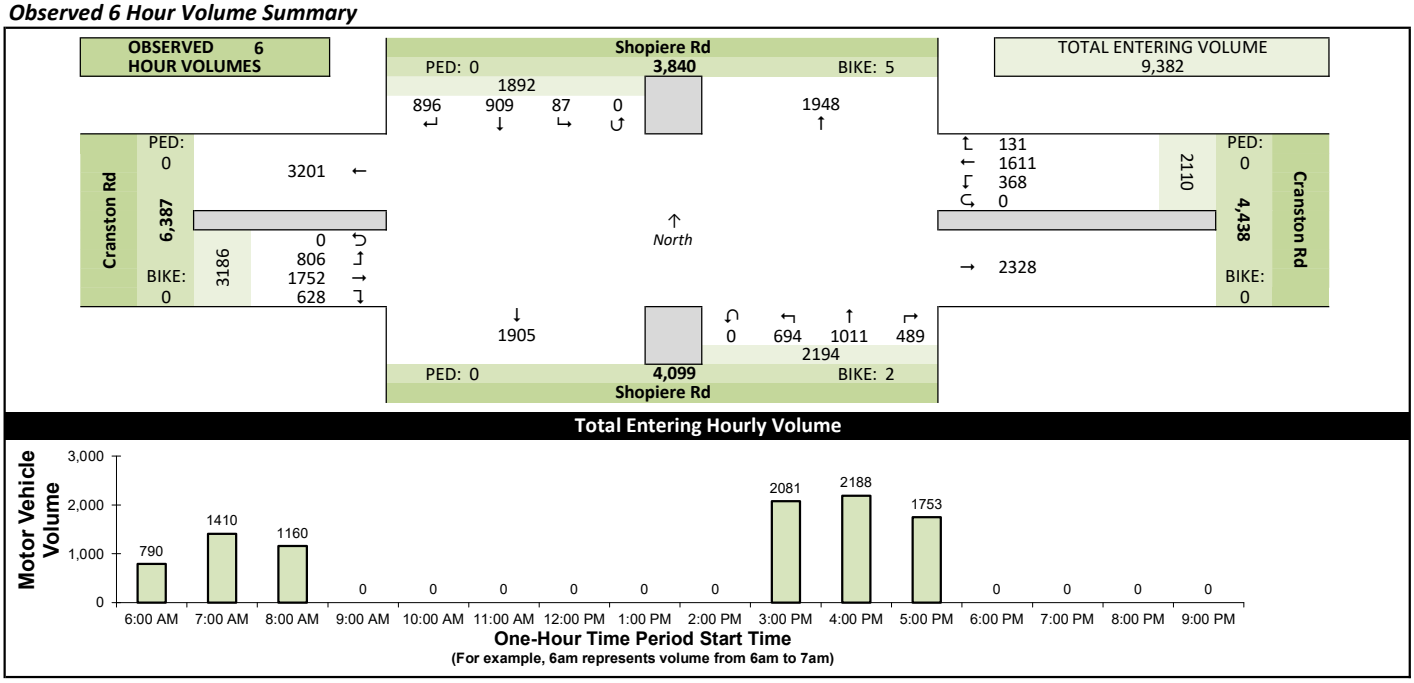
Site Information

Municipality	City of Beloit		
County	Rock	WisDOT Region	SE
Traffic Control	Traffic Signal		
Roadway Names		North Direction	↑
North Leg	Shopiere Rd		
East Leg	Cranston Rd		
South Leg	Shopiere Rd		
West Leg	Cranston Rd		
Special Considerations			
Schools	In Session		
Holidays	None		
Special Events	None		
Special Pedestrians Observed			
Pre-school children	None		
Elementry school age children	None		
Visually impaired (white cane/helper dog)	None		
Elderly/disabled (except wheelchairs)	None		
Wheelchairs/electric scooters	None		
Other (describe)	None	None	

Count Information

Hrs Counted:	6:00 AM - 9:00 AM and 3:00 PM to 6:00 PM				
Count Dates				Weather	
AM Peak Period	Thursday, May 16, 2024			Clear & Dry	
Midday Peak Period	Thursday, May 16, 2024			Clear & Dry	
PM Peak Period	Thursday, May 16, 2024			Clear & Dry	
Calculated Peak Hours					
AM	7:15-8:15am	MD		PM	3:45-4:45pm
Peak Hours Selected for Analysis					
AM	7:15-8:15am	MD		PM	3:45-4:45pm
Daily/Seasonal Adjustment Group	(2) Urban Arterials & Collectors				
Count Expansion Group	(4) Rural Arterials & Collectors				
Daily/Seasonal Adjustment Factor	1.000	Count Expansion Factor	1.000		
Company Name	AECOM			Manual Adj.	1.000
Observers	AM Peak Period	MioVision			
	Midday Peak Period	MioVision			
	PM Peak Period	MioVision			
Comments					

Observed 6 Hour Volume Summary



Estimated 24 Hour AADT

Intersection Traffic Volume Report

Count Basics		*Page 3 of 11*
Start Date: Thursday, May 16, 2024	Weekday	Schools in Session
Total Number of Hours Counted: 6	Non-Holiday	No Special Events

Peak Hour Volume Summary

Shopiere Rd and Cranston Rd

All Motor Vehicles

Peak Hour Volumes, Truck Percentages, and PHFs

Thursday, May 16, 2024		From North					From East					From South					From West					
	AM Peak Hour	Shopiere Rd					Cranston Rd					Shopiere Rd					Cranston Rd					
	Start Time	Right	Thru	Left	U-Tn	Total	Right	Thru	Left	U-Tn	Total	Right	Thru	Left	U-Tn	Total	Right	Thru	Left	U-Tn	Total	Totals
AM Peak Hour	7:15 AM	24	37	5	0	66	4	56	23	0	83	21	49	21	0	91	28	60	23	0	111	351
	7:30 AM	23	49	2	0	74	5	66	11	0	82	20	53	27	0	100	25	56	32	0	113	369
	7:45 AM	55	42	8	0	105	10	68	14	0	92	21	47	30	0	98	29	52	41	0	122	417
	8:00 AM	29	37	3	0	69	3	58	16	0	77	10	36	24	0	70	11	57	28	0	96	312
	Peak Hour Volume	131	165	18	0	314	22	248	64	0	334	72	185	102	0	359	93	225	124	0	442	1449
	Rounded Hourly Volume	130	165	20	0	315	20	250	65	0	335	70	185	100	0	355	95	225	125	0	445	1450
	% Single Unit Trucks	2.3	3.0	5.6	0.0	2.9	9.1	2.8	3.1	0.0	3.3	2.8	3.2	3.9	0.0	3.3	1.1	3.1	1.6	0.0	2.3	2.9
	% Heavy Trucks	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	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 (Total)	2.3	3.0	5.6	0.0	2.9	9.1	2.8	3.1	0.0	3.3	2.8	3.2	3.9	0.0	3.3	1.1	3.1	1.6	0.0	2.3	2.9
	Peak Hour Factor (PHF)	0.60	0.84	0.56	0.00	0.75	0.55	0.91	0.70	0.00	0.91	0.86	0.87	0.85	0.00	0.90	0.80	0.94	0.76	0.00	0.91	0.87

N/A		From North					From East					From South					From West					
	MD Peak Hour	Shopiere Rd					Cranston Rd					Shopiere Rd					Cranston Rd					
	Start Time	Right	Thru	Left	U-Tn	Total	Right	Thru	Left	U-Tn	Total	Right	Thru	Left	U-Tn	Total	Right	Thru	Left	U-Tn	Total	Totals
Midday (MD) Peak Hour	12:00 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
	12:15 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
	12:30 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
	12:45 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
	Peak Hour Volume	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
	Rounded Hourly Volume	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
	% Single Unit Trucks	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
	% Heavy Trucks	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	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 (Total)	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
	Peak Hour Factor (PHF)	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00

Thursday, May 16, 2024		From North					From East					From South					From West					
	PM Peak Hour	Shopiere Rd					Cranston Rd					Shopiere Rd					Cranston Rd					
	Start Time	Right	Thru	Left	U-Tn	Total	Right	Thru	Left	U-Tn	Total	Right	Thru	Left	U-Tn	Total	Right	Thru	Left	U-Tn	Total	Totals
PM Peak Hour	3:45 PM	61	51	4	0	116	5	83	14	0	102	46	89	40	0	175	34	101	39	0	174	567
	4:00 PM	57	57	4	0	118	10	92	29	0	131	34	58	41	0	133	50	106	61	0	217	599
	4:15 PM	49	41	7	0	97	11	80	29	0	120	35	43	37	0	115	34	128	56	0	218	550
	4:30 PM	47	48	4	0	99	10	84	25	0	119	29	63	50	0	142	43	109	44	0	196	556
	Peak Hour Volume	214	197	19	0	430	36	339	97	0	472	144	253	168	0	565	161	444	200	0	805	2272
	Rounded Hourly Volume	215	195	20	0	430	35	340	95	0	470	145	255	170	0	570	160	445	200	0	805	2275
	% Single Unit Trucks	1.9	0.0	0.0	0.0	0.9	5.6	0.6	1.0	0.0	1.1	0.0	2.4	0.6	0.0	1.2	1.9	1.4	1.0	0.0	1.4	1.2
	% Heavy Trucks	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	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 (Total)	1.9	0.0	0.0	0.0	0.9	5.6	0.6	1.0	0.0	1.1	0.0	2.4	0.6	0.0	1.2	1.9	1.4	1.0	0.0	1.4	1.2
	Peak Hour Factor (PHF)	0.88	0.86	0.68	0.00	0.91	0.82	0.92	0.84	0.00	0.90	0.78	0.71	0.84	0.00	0.81	0.80	0.87	0.82	0.00	0.92	0.95

Peak Hour Pedestrian and Bicyclist Volumes

Pedestrians and Bicyclists		Crossing North Approach			Crossing East Approach			Crossing South Approach			Crossing West Approach			Total Ped & Bike Volume
		Shopiere Rd			Cranston Rd			Shopiere Rd			Cranston Rd			
	15-Minute Start Time	Pedestrian	Bicyclist	Total	Pedestrian	Bicyclist	Total	Pedestrian	Bicyclist	Total	Pedestrian	Bicyclist	Total	
AM	7:15 AM	0	0	0	0	0	0	0	0	0	0	0	0	0
	7:30 AM	0	0	0	0	0	0	0	0	0	0	0	0	0
	7:45 AM	0	0	0	0	0	0	0	0	0	0	0	0	0
	8:00 AM	0	0	0	0	0	0	0	0	0	0	0	0	0
	Total	0	0	0	0	0	0	0	0	0	0	0	0	0
MD	12:00 PM	0	0	0	0	0	0	0	0	0	0	0	0	0
	12:15 PM	0	0	0	0	0	0	0	0	0	0	0	0	0
	12:30 PM	0	0	0	0	0	0	0	0	0	0	0	0	0
	12:45 PM	0	0	0	0	0	0	0	0	0	0	0	0	0
	Total	0	0	0	0	0	0	0	0	0	0	0	0	0
PM	3:45 PM	0	0	0	0	0	0	0	0	0	0	0	0	0
	4:00 PM	0	1	1	0	0	0	0	0	0	0	0	0	1
	4:15 PM	0	0	0	0	0	0	0	0	0	0	0	0	0
	4:30 PM	0	1	1	0	0	0	0	0	0	0	0	0	1
	Total	0	2	2	0	0	0	0	0	0	0	0	0	2

Intersection Traffic Volume Report

Count Basics		*Page 5 of 11*
Start Date: Thursday, May 16, 2024	Weekday	Schools in Session
Total Number of Hours Counted: 6	Non-Holiday	No Special Events

15-Minute Motor Vehicle Data

All Motor Vehicles

Shopiere Rd and Cranston Rd

15-Minute Motor Vehicle Data

15-Minute Time Period		From North (↓) Shopiere Rd					From East (←) Cranston Rd					From South (↑) Shopiere Rd					From West (→) Cranston Rd					15-Min	Hourly	
Start Time		Right	Thru	Left	U-Tn	Total	Right	Thru	Left	U-Tn	Total	Right	Thru	Left	U-Tn	Total	Right	Thru	Left	U-Tn	Total	Totals	Sum	PHF
AM Peak Period	6:00 AM	18	24	0	0	42	2	28	12	0	42	8	15	10	0	33	11	27	10	0	48	165	790	0.80
	6:15 AM	13	32	1	0	46	0	41	5	0	46	9	15	10	0	34	9	27	12	0	48	174	898	0.82
	6:30 AM	24	24	0	0	48	5	30	9	0	44	8	25	16	0	49	8	34	20	0	62	203	1075	0.77
	6:45 AM	22	23	1	0	46	4	53	18	0	75	13	23	19	0	55	14	46	12	0	72	248	1241	0.84
	7:00 AM	19	35	2	0	56	2	36	9	0	47	17	43	23	0	83	18	36	33	0	87	273	1410	0.85
	7:15 AM	24	37	5	0	66	4	56	23	0	83	21	49	21	0	91	28	60	23	0	111	351	1449	0.87
	7:30 AM	23	49	2	0	74	5	66	11	0	82	20	53	27	0	100	25	56	32	0	113	369	1389	0.83
	7:45 AM	55	42	8	0	105	10	68	14	0	92	21	47	30	0	98	29	52	41	0	122	417	1312	0.79
	8:00 AM	29	37	3	0	69	3	58	16	0	77	10	36	24	0	70	11	57	28	0	96	312	1160	0.93
	8:15 AM	35	20	3	0	58	2	60	8	0	70	7	33	23	0	63	14	67	19	0	100	291		
	8:30 AM	29	32	2	0	63	5	54	12	0	71	7	32	24	0	63	11	63	21	0	95	292		
	8:45 AM	26	24	2	0	52	3	51	14	0	68	17	25	21	0	63	18	46	18	0	82	265		
	9:00 AM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
	9:15 AM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
	9:30 AM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
	9:45 AM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
Midday Peak Period	10:00 AM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
	10:15 AM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
	10:30 AM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
	10:45 AM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
	11:00 AM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
	11:15 AM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
	11:30 AM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
	11:45 AM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
	12:00 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
	12:15 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
	12:30 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
	12:45 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
	1:00 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
	1:15 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
	1:30 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
	1:45 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
PM Peak Period	2:00 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
	2:15 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
	2:30 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
	2:45 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
	3:00 PM	43	62	6	0	111	8	82	18	0	108	24	40	37	0	101	37	97	57	0	191	511	2081	0.92
	3:15 PM	44	42	2	0	88	6	87	19	0	112	20	60	37	0	117	36	101	45	0	182	499	2169	0.91
	3:30 PM	52	50	8	0	110	7	89	14	0	110	27	47	49	0	123	36	100	25	0	161	504	2220	0.93
	3:45 PM	61	51	4	0	116	5	83	14	0	102	46	89	40	0	175	34	101	39	0	174	567	2272	0.95
	4:00 PM	57	57	4	0	118	10	92	29	0	131	34	58	41	0	133	50	106	61	0	217	599	2188	0.91
	4:15 PM	49	41	7	0	97	11	80	29	0	120	35	43	37	0	115	34	128	56	0	218	550	2057	0.92
	4:30 PM	47	48	4	0	99	10	84	25	0	119	29	63	50	0	142	43	109	44	0	196	556	1950	0.88
	4:45 PM	46	35	4	0	85	6	92	14	0	112	23	49	37	0	109	41	96	40	0	177	483	1839	0.95
	5:00 PM	45	39	5	0	89	7	97	16	0	120	19	42	27	0	88	35	98	38	0	171	468	1753	0.94
	5:15 PM	41	45	1	0	87	8	81	10	0	99	30	44	33	0	107	28	87	35	0	150	443		
	5:30 PM	58	36	8	0	102	5	68	19	0	92	21	33	34	0	88	33	82	48	0	163	445		
	5:45 PM	36	24	5	0	65	3	75	10	0	88	23	47	24	0	94	25	76	49	0	150	397		
	6:00 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
	6:15 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
	6:30 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
	6:45 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
	7:00 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
	7:15 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
	7:30 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
	7:45 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
	8:00 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
	8:15 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
	8:30 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
	8:45 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
	9:00 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
	9:15 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
	9:30 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
	9:45 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
Totals		896	909	87	0	1892	131	1611	368	0	2110	489	1011	694	0	2194	628	1752	806	0	3186	9382		

Peak Hour All Vehicle Volume Summary

Hourly Time Period		From North (↓) Shopiere Rd					From East (←) Cranston Rd					From South (↑) Shopiere Rd					From West (→) Cranston Rd					Total Hourly	
Start Time		Right	Thru	Left	U-Tn	Total	Right	Thru	Left	U-Tn	Total	Right	Thru	Left	U-Tn	Total	Right	Thru	Left	U-Tn	Total	Volume	PHF
AM	7:15 AM	131	165	18	0	314	22	248	64	0	334	72	185	102	0	359	93	225	124	0	442	1449	0.87
MD	12:00 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
PM	3:45 PM	214	197	19	0	430	36	339	97	0	472	144	253	168	0	565	161	444	200	0	805	2272	0.95

Intersection Traffic Volume Report

Count Basics			*Page 9 of 11*
Start Date:	Thursday, May 16, 2024	Weekday	Schools in Session
Total Number of Hours Counted: 6		Non-Holiday	No Special Events

15-Minute Heavy Vehicle Data

Heavy Vehicles (Single-Unit Trucks, Buses & Semi-Trucks)

Shopiere Rd and Cranston Rd

15-Minute Heavy Vehicle Data

15-Minute Time Period		From North (↓) Shopiere Rd					From East (←) Cranston Rd					From South (↑) Shopiere Rd					From West (→) Cranston Rd					15-Min	Hourly
	Start Time	Right	Thru	Left	U-Tn	Total	Right	Thru	Left	U-Tn	Total	Right	Thru	Left	U-Tn	Total	Right	Thru	Left	U-Tn	Total	Totals	Sum
AM Peak Period	6:00 AM	0	1	0	0	1	0	0	0	0	0	1	0	0	0	1	0	0	0	0	0	2	27
	6:15 AM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	2	1	0	3	3	35
	6:30 AM	1	0	0	0	1	1	0	0	0	1	0	1	0	0	1	1	2	2	0	5	8	43
	6:45 AM	0	1	1	0	2	0	3	1	0	4	0	3	0	0	3	0	4	1	0	5	14	41
	7:00 AM	3	0	0	0	3	2	1	0	0	3	1	1	0	0	2	2	0	0	0	2	10	35
	7:15 AM	1	1	1	0	3	0	1	0	0	1	1	0	1	0	2	0	4	1	0	5	11	42
	7:30 AM	1	2	0	0	3	1	1	1	0	3	0	0	0	0	0	0	0	0	0	0	6	43
	7:45 AM	0	0	0	0	0	0	1	0	0	1	0	4	1	0	5	1	1	0	0	2	8	50
	8:00 AM	1	2	0	0	3	1	4	1	0	6	1	2	2	0	5	0	2	1	0	3	17	56
	8:15 AM	1	1	0	0	2	0	3	0	0	3	0	1	1	0	2	0	4	1	0	5	12	
	8:30 AM	1	1	0	0	2	1	2	1	0	4	1	1	0	0	2	3	2	0	0	5	13	
	8:45 AM	0	1	1	0	2	0	2	4	0	6	0	1	0	0	1	2	3	0	0	5	14	
	9:00 AM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
	9:15 AM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
	9:30 AM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
	9:45 AM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
Midday Peak Period	10:00 AM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
	10:15 AM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
	10:30 AM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
	10:45 AM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
	11:00 AM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
	11:15 AM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
	11:30 AM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
	11:45 AM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
	12:00 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
	12:15 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
	12:30 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
	12:45 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
	1:00 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
	1:15 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
	1:30 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
	1:45 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
PM Peak Period	2:00 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
	2:15 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
	2:30 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
	2:45 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
	3:00 PM	0	1	0	0	1	1	1	0	0	2	0	0	0	0	0	0	2	1	0	3	6	39
	3:15 PM	1	3	0	0	4	1	3	1	0	5	1	0	0	0	1	1	1	1	0	3	13	41
	3:30 PM	2	0	1	0	3	1	2	0	0	3	1	0	0	0	1	2	3	0	0	5	12	34
	3:45 PM	1	0	0	0	1	0	2	1	0	3	0	0	0	0	0	0	4	0	0	4	8	27
	4:00 PM	2	0	0	0	2	1	0	0	0	1	0	1	1	0	2	2	0	1	0	3	8	24
	4:15 PM	1	0	0	0	1	0	0	0	0	0	0	3	0	0	3	1	1	0	0	2	6	22
	4:30 PM	0	0	0	0	0	1	0	0	0	1	0	2	0	0	2	0	1	1	0	2	5	19
	4:45 PM	1	1	0	0	2	0	1	0	0	1	0	0	0	0	0	1	1	0	0	2	5	19
	5:00 PM	0	0	0	0	0	1	0	1	0	2	0	2	0	0	2	0	2	0	0	2	6	17
	5:15 PM	1	0	0	0	1	0	1	0	0	1	0	0	1	0	1	0	0	0	0	0	3	
	5:30 PM	2	1	0	0	3	1	0	0	0	1	0	0	0	0	0	0	0	1	0	1	5	
	5:45 PM	0	0	0	0	0	0	1	0	0	1	0	0	0	0	0	1	1	0	0	2	3	
	6:00 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
	6:15 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
	6:30 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
	6:45 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
	7:00 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
	7:15 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
	7:30 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
	7:45 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
	8:00 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
	8:15 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
	8:30 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
	8:45 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
	9:00 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
	9:15 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
	9:30 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
	9:45 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
Totals		20	16	4	0	40	13	29	11	0	53	7	22	7	0	36	17	40	12	0	69	198	

Peak Hour Heavy Vehicle Volume Summary

Hourly Time Period		From North (↓) Shopiere Rd					From East (←) Cranston Rd					From South (↑) Shopiere Rd					From West (→) Cranston Rd					Total Hourly
	Start Time	Right	Thru	Left	U-Tn	Total	Right	Thru	Left	U-Tn	Total	Right	Thru	Left	U-Tn	Total	Right	Thru	Left	U-Tn	Total	Volume
AM	7:15 AM	3	5	1	0	9	2	7	2	0	11	2	6	4	0	12	1	7	2	0	10	42
MD	12:00 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
PM	3:45 PM	4	0	0	0	4	2	2	1	0	5	0	6	1	0	7	3	6	2	0	11	27

Intersection Traffic Volume Report

Count Basics	Version 2011.J3		Page 1 of 11
Start Date:	Thursday, May 16, 2024	Weekday	Schools in Session
Total Number of Hours Counted: 6.25		Non-Holiday	No Special Events

Base Information, Observed (6.25) Hour and Estimated (24) Hour Volume Summaries

Intersection of: Shopiere Rd and Murphy Woods Rd

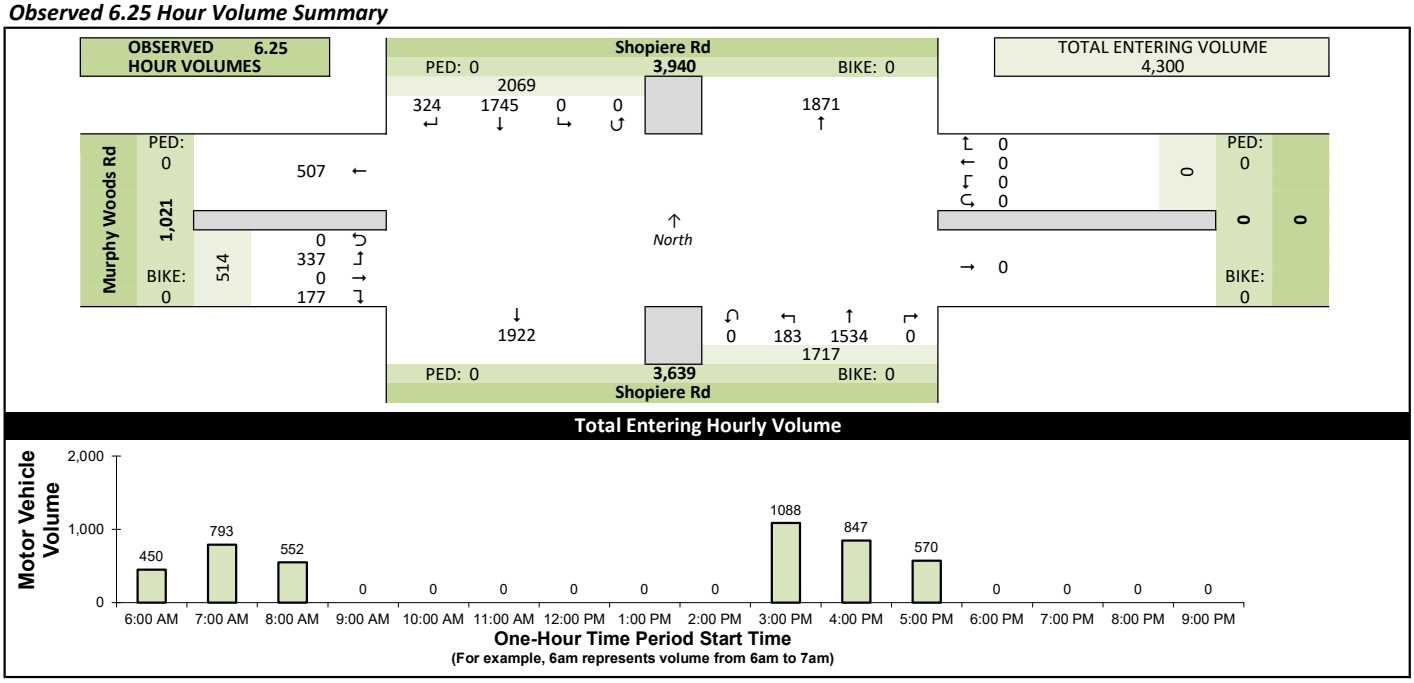
Site Information

Municipality	City of Beloit		
County	Rock	WisDOT Region	SE
Traffic Control	Partial Stop Control		
Roadway Names		North Direction	↑
North Leg	Shopiere Rd		
East Leg			
South Leg	Shopiere Rd		
West Leg	Murphy Woods Rd		
Special Considerations			
Schools	In Session		
Holidays	None		
Special Events	None		
Special Pedestrians Observed			
Pre-school children	None		
Elementry school age children	None		
Visually impaired (white cane/helper dog)	None		
Elderly/disabled (except wheelchairs)	None		
Wheelchairs/electric scooters	None		
Other (describe)	None	None	

Count Information

Hrs Counted:	6:00 AM - 9:00 AM and 3:00 PM to 6:00 PM				
Count Dates				Weather	
AM Peak Period	Thursday, May 16, 2024			Clear & Dry	
Midday Peak Period	Thursday, May 16, 2024			Clear & Dry	
PM Peak Period	Thursday, May 16, 2024			Clear & Dry	
Calculated Peak Hours					
AM	7:15-8:15am	MD		PM	2:45-3:45pm
Peak Hours Selected for Analysis					
AM	7:15-8:15am	MD		PM	3:45-4:45pm
Daily/Seasonal Adjustment Group	(2) Urban Arterials & Collectors				
Count Expansion Group	(4) Rural Arterials & Collectors				
Daily/Seasonal Adjustment Factor	1.000	Count Expansion Factor	1.000		
Company Name	AECOM			Manual Adj.	1.000
Observers	AM Peak Period	MioVision			
	Midday Peak Period	MioVision			
	PM Peak Period	MioVision			
Comments					

Observed 6.25 Hour Volume Summary



Estimated 24 Hour AADT

Intersection Traffic Volume Report

Count Basics		*Page 3 of 11*
Start Date: Thursday, May 16, 2024	Weekday	Schools in Session
Total Number of Hours Counted: 6.25	Non-Holiday	No Special Events

Peak Hour Volume Summary

Shopiere Rd and Murphy Woods Rd

All Motor Vehicles

Peak Hour Volumes, Truck Percentages, and PHFs

Thursday, May 16, 2024		From North					From East					From South					From West					
	AM Peak Hour	Shopiere Rd					0					Shopiere Rd					Murphy Woods Rd					
	Start Time	Right	Thru	Left	U-Tn	Total	Right	Thru	Left	U-Tn	Total	Right	Thru	Left	U-Tn	Total	Right	Thru	Left	U-Tn	Total	Totals
AM Peak Hour	7:15 AM	5	76	0	0	81	0	0	0	0	0	0	88	4	0	92	9	0	20	0	29	202
	7:30 AM	14	80	0	0	94	0	0	0	0	0	0	93	5	0	98	10	0	26	0	36	228
	7:45 AM	9	81	0	0	90	0	0	0	0	0	0	82	8	0	90	8	0	17	0	25	205
	8:00 AM	12	59	0	0	71	0	0	0	0	0	0	62	8	0	70	7	0	14	0	21	162
	Peak Hour Volume	40	296	0	0	336	0	0	0	0	0	0	325	25	0	350	34	0	77	0	111	797
	Rounded Hourly Volume	40	295	0	0	335	0	0	0	0	0	0	325	25	0	350	35	0	75	0	110	795
	% Single Unit Trucks	2.5	3.7	0.0	0.0	3.6	0.0	0.0	0.0	0.0	0.0	0.0	2.8	4.0	0.0	2.9	2.9	0.0	1.3	0.0	1.8	3.0
	% Heavy Trucks	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	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 (Total)	2.5	3.7	0.0	0.0	3.6	0.0	0.0	0.0	0.0	0.0	0.0	2.8	4.0	0.0	2.9	2.9	0.0	1.3	0.0	1.8	3.0
	Peak Hour Factor (PHF)	0.71	0.91	0.00	0.00	0.89	0.00	0.00	0.00	0.00	0.00	0.00	0.87	0.78	0.00	0.89	0.85	0.00	0.74	0.00	0.77	0.87

N/A		From North					From East					From South					From West					
	MD Peak Hour	Shopiere Rd					0					Shopiere Rd					Murphy Woods Rd					
	Start Time	Right	Thru	Left	U-Tn	Total	Right	Thru	Left	U-Tn	Total	Right	Thru	Left	U-Tn	Total	Right	Thru	Left	U-Tn	Total	Totals
Midday (MD) Peak Hour	12:00 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
	12:15 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
	12:30 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
	12:45 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
	Peak Hour Volume	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
	Rounded Hourly Volume	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
	% Single Unit Trucks	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
	% Heavy Trucks	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	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 (Total)	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
	Peak Hour Factor (PHF)	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00

Thursday, May 16, 2024		From North					From East					From South					From West					
	PM Peak Hour	Shopiere Rd					0					Shopiere Rd					Murphy Woods Rd					
	Start Time	Right	Thru	Left	U-Tn	Total	Right	Thru	Left	U-Tn	Total	Right	Thru	Left	U-Tn	Total	Right	Thru	Left	U-Tn	Total	Totals
PM Peak Hour	3:45 PM	23	104	0	0	127	0	0	0	0	0	0	73	11	0	84	10	0	19	0	29	240
	4:00 PM	24	90	0	0	114	0	0	0	0	0	0	81	9	0	90	9	0	12	0	21	225
	4:15 PM	24	87	0	0	111	0	0	0	0	0	0	69	11	0	80	10	0	21	0	31	222
	4:30 PM	21	91	0	0	112	0	0	0	0	0	0	73	14	0	87	6	0	10	0	16	215
	Peak Hour Volume	92	372	0	0	464	0	0	0	0	0	0	296	45	0	341	35	0	62	0	97	902
	Rounded Hourly Volume	90	370	0	0	460	0	0	0	0	0	0	295	45	0	340	35	0	60	0	95	895
	% Single Unit Trucks	0.0	0.8	0.0	0.0	0.6	0.0	0.0	0.0	0.0	0.0	0.0	1.0	0.0	0.0	0.9	2.9	0.0	0.0	0.0	1.0	0.8
	% Heavy Trucks	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	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 (Total)	0.0	0.8	0.0	0.0	0.6	0.0	0.0	0.0	0.0	0.0	0.0	1.0	0.0	0.0	0.9	2.9	0.0	0.0	0.0	1.0	0.8
	Peak Hour Factor (PHF)	0.96	0.89	0.00	0.00	0.91	0.00	0.00	0.00	0.00	0.00	0.00	0.91	0.80	0.00	0.95	0.87	0.00	0.74	0.00	0.78	0.94

Peak Hour Pedestrian and Bicyclist Volumes

Pedestrians and Bicyclists		Crossing North Approach			Crossing East Approach			Crossing South Approach			Crossing West Approach			Total Ped & Bike Volume
		Shopiere Rd			0			Shopiere Rd			Murphy Woods Rd			
	15-Minute Start Time	Pedestrian	Bicyclist	Total	Pedestrian	Bicyclist	Total	Pedestrian	Bicyclist	Total	Pedestrian	Bicyclist	Total	
AM	7:15 AM	0	0	0	0	0	0	0	0	0	0	0	0	0
	7:30 AM	0	0	0	0	0	0	0	0	0	0	0	0	0
	7:45 AM	0	0	0	0	0	0	0	0	0	0	0	0	0
	8:00 AM	0	0	0	0	0	0	0	0	0	0	0	0	0
	Total	0	0	0	0	0	0	0	0	0	0	0	0	0
MD	12:00 PM	0	0	0	0	0	0	0	0	0	0	0	0	0
	12:15 PM	0	0	0	0	0	0	0	0	0	0	0	0	0
	12:30 PM	0	0	0	0	0	0	0	0	0	0	0	0	0
	12:45 PM	0	0	0	0	0	0	0	0	0	0	0	0	0
	Total	0	0	0	0	0	0	0	0	0	0	0	0	0
PM	3:45 PM	0	0	0	0	0	0	0	0	0	0	0	0	0
	4:00 PM	0	0	0	0	0	0	0	0	0	0	0	0	0
	4:15 PM	0	0	0	0	0	0	0	0	0	0	0	0	0
	4:30 PM	0	0	0	0	0	0	0	0	0	0	0	0	0
	Total	0	0	0	0	0	0	0	0	0	0	0	0	0

Intersection Traffic Volume Report

Count Basics		*Page 5 of 11*
Start Date: Thursday, May 16, 2024	Weekday	Schools in Session
Total Number of Hours Counted: 6.25	Non-Holiday	No Special Events

15-Minute Motor Vehicle Data

All Motor Vehicles

Shopiere Rd and Murphy Woods Rd

15-Minute Motor Vehicle Data

15-Minute Time Period		From North (↓) Shopiere Rd					From East (←) 0					From South (↑) Shopiere Rd					From West (→) Murphy Woods Rd					15-Min	Hourly	
	Start Time	Right	Thru	Left	U-Tn	Total	Right	Thru	Left	U-Tn	Total	Right	Thru	Left	U-Tn	Total	Right	Thru	Left	U-Tn	Total	Totals	Sum	PHF
AM Peak Period	6:00 AM	6	26	0	0	32	0	0	0	0	0	0	51	4	0	55	8	0	11	0	19	106	450	0.87
	6:15 AM	6	27	0	0	33	0	0	0	0	0	0	51	1	0	52	8	0	8	0	16	101	502	0.79
	6:30 AM	8	40	0	0	48	0	0	0	0	0	0	44	3	0	47	4	0	15	0	19	114	603	0.75
	6:45 AM	7	45	0	0	52	0	0	0	0	0	0	52	3	0	55	9	0	13	0	22	129	717	0.79
	7:00 AM	8	62	0	0	70	0	0	0	0	0	0	52	6	0	58	6	0	24	0	30	158	793	0.87
	7:15 AM	5	76	0	0	81	0	0	0	0	0	0	88	4	0	92	9	0	20	0	29	202	797	0.87
	7:30 AM	14	80	0	0	94	0	0	0	0	0	0	93	5	0	98	10	0	26	0	36	228	717	0.79
	7:45 AM	9	81	0	0	90	0	0	0	0	0	0	82	8	0	90	8	0	17	0	25	205	622	0.76
	8:00 AM	12	59	0	0	71	0	0	0	0	0	0	62	8	0	70	7	0	14	0	21	162	552	0.85
	8:15 AM	10	57	0	0	67	0	0	0	0	0	0	38	3	0	41	4	0	10	0	14	122		
	8:30 AM	5	53	0	0	58	0	0	0	0	0	0	56	5	0	61	4	0	10	0	14	133		
	8:45 AM	15	56	0	0	71	0	0	0	0	0	0	46	4	0	50	5	0	9	0	14	135		
	9:00 AM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
	9:15 AM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
	9:30 AM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
	9:45 AM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
Midday Peak Period	10:00 AM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
	10:15 AM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
	10:30 AM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
	10:45 AM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
	11:00 AM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
	11:15 AM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
	11:30 AM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
	11:45 AM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
	12:00 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
	12:15 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
	12:30 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
	12:45 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
	1:00 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
	1:15 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
	1:30 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
	1:45 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
PM Peak Period	2:00 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
	2:15 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
	2:30 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
	2:45 PM	22	165	0	0	187	0	0	0	0	0	0	87	10	0	97	14	0	4	0	18	302	1150	0.95
	3:00 PM	20	120	0	0	140	0	0	0	0	0	0	106	15	0	121	14	0	20	0	34	295	1088	0.92
	3:15 PM	20	113	0	0	133	0	0	0	0	0	0	97	9	0	106	9	0	20	0	29	268	1018	0.89
	3:30 PM	15	134	0	0	149	0	0	0	0	0	0	94	21	0	115	4	0	17	0	21	285	972	0.85
	3:45 PM	23	104	0	0	127	0	0	0	0	0	0	73	11	0	84	10	0	19	0	29	240	902	0.94
	4:00 PM	24	90	0	0	114	0	0	0	0	0	0	81	9	0	90	9	0	12	0	21	225	847	0.94
	4:15 PM	24	87	0	0	111	0	0	0	0	0	0	69	11	0	80	10	0	21	0	31	222	760	0.86
	4:30 PM	21	91	0	0	112	0	0	0	0	0	0	73	14	0	87	6	0	10	0	16	215	694	0.81
	4:45 PM	16	86	0	0	102	0	0	0	0	0	0	49	8	0	57	8	0	18	0	26	185	618	0.84
	5:00 PM	10	58	0	0	68	0	0	0	0	0	0	51	9	0	60	7	0	3	0	10	138	570	0.91
	5:15 PM	16	77	0	0	93	0	0	0	0	0	0	45	7	0	52	7	0	4	0	11	156		
	5:30 PM	16	54	0	0	70	0	0	0	0	0	0	48	8	0	56	6	0	7	0	13	139		
	5:45 PM	14	69	0	0	83	0	0	0	0	0	0	33	7	0	40	5	0	9	0	14	137		
	6:00 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
	6:15 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
	6:30 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
	6:45 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
	7:00 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
	7:15 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
	7:30 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
	7:45 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
	8:00 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
	8:15 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
	8:30 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
	8:45 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
	9:00 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
	9:15 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
	9:30 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
	9:45 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
Totals		346	1910	0	0	2256	0	0	0	0	0	0	1621	193	0	1814	191	0	341	0	532	4602		

Peak Hour All Vehicle Volume Summary

Hourly Time Period		From North (↓) Shopiere Rd					From East (←) 0					From South (↑) Shopiere Rd					From West (→) Murphy Woods Rd					Total Hourly	
	Start Time	Right	Thru	Left	U-Tn	Total	Right	Thru	Left	U-Tn	Total	Right	Thru	Left	U-Tn	Total	Right	Thru	Left	U-Tn	Total	Volume	PHF
AM	7:15 AM	40	296	0	0	336	0	0	0	0	0	0	325	25	0	350	34	0	77	0	111	797	0.87
MD	12:00 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
PM	3:45 PM	92	372	0	0	464	0	0	0	0	0	0	296	45	0	341	35	0	62	0	97	902	0.94

Intersection Traffic Volume Report

Count Basics			*Page 9 of 11*
Start Date:	Thursday, May 16, 2024	Weekday	Schools in Session
Total Number of Hours Counted: 6.25		Non-Holiday	No Special Events

15-Minute Heavy Vehicle Data

Heavy Vehicles (Single-Unit Trucks, Buses & Semi-Trucks)

Shopiere Rd and Murphy Woods Rd

15-Minute Heavy Vehicle Data

	15-Minute Time Period	From North (↓) Shopiere Rd					From East (←) 0					From South (↑) Shopiere Rd					From West (→) Murphy Woods Rd					15-Min	Hourly
	Start Time	Right	Thru	Left	U-Tn	Total	Right	Thru	Left	U-Tn	Total	Right	Thru	Left	U-Tn	Total	Right	Thru	Left	U-Tn	Total	Totals	Sum
AM Peak Period	6:00 AM	0	1	0	0	1	0	0	0	0	0	0	1	0	0	1	0	0	0	0	0	2	10
	6:15 AM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	1	0	1	1	15
	6:30 AM	0	1	0	0	1	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	1	18
	6:45 AM	0	2	0	0	2	0	0	0	0	0	0	3	0	0	3	0	0	1	0	1	6	22
	7:00 AM	1	3	0	0	4	0	0	0	0	0	0	2	0	0	2	1	0	0	0	1	7	22
	7:15 AM	0	1	0	0	1	0	0	0	0	0	0	2	0	0	2	1	0	0	0	1	4	24
	7:30 AM	1	0	0	0	1	0	0	0	0	0	0	2	1	0	3	0	0	1	0	1	5	23
	7:45 AM	0	5	0	0	5	0	0	0	0	0	0	1	0	0	1	0	0	0	0	0	6	26
	8:00 AM	0	5	0	0	5	0	0	0	0	0	0	4	0	0	4	0	0	0	0	0	9	26
	8:15 AM	0	2	0	0	2	0	0	0	0	0	0	1	0	0	1	0	0	0	0	0	3	
	8:30 AM	0	3	0	0	3	0	0	0	0	0	0	4	1	0	5	0	0	0	0	0	8	
	8:45 AM	0	1	0	0	1	0	0	0	0	0	0	5	0	0	5	0	0	0	0	0	6	
	9:00 AM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
	9:15 AM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
	9:30 AM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
	9:45 AM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
Midday Peak Period	10:00 AM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
	10:15 AM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
	10:30 AM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
	10:45 AM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
	11:00 AM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
	11:15 AM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
	11:30 AM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
	11:45 AM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
	12:00 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
	12:15 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
	12:30 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
	12:45 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
	1:00 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
	1:15 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
	1:30 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
	1:45 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
PM Peak Period	2:00 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
	2:15 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
	2:30 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
	2:45 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	13
	3:00 PM	0	2	0	0	2	0	0	0	0	0	0	2	0	0	2	0	0	0	0	0	4	15
	3:15 PM	0	4	0	0	4	0	0	0	0	0	0	1	0	0	1	0	0	0	0	0	5	15
	3:30 PM	0	1	0	0	1	0	0	0	0	0	0	3	0	0	3	0	0	0	0	0	4	11
	3:45 PM	0	0	0	0	0	0	0	0	0	0	0	2	0	0	2	0	0	0	0	0	2	7
	4:00 PM	0	3	0	0	3	0	0	0	0	0	0	1	0	0	1	0	0	0	0	0	4	9
	4:15 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	1	0	0	0	1	1	6
	4:30 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	6
	4:45 PM	1	1	0	0	2	0	0	0	0	0	0	1	0	0	1	0	0	1	0	1	4	7
	5:00 PM	0	0	0	0	0	0	0	0	0	0	0	1	0	0	1	0	0	0	0	0	1	3
	5:15 PM	0	1	0	0	1	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	1	
	5:30 PM	0	0	0	0	0	0	0	0	0	0	0	1	0	0	1	0	0	0	0	0	1	
	5:45 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
	6:00 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
	6:15 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
	6:30 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
	6:45 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
	7:00 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
	7:15 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
	7:30 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
	7:45 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
	8:00 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
	8:15 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
	8:30 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
	8:45 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
	9:00 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
	9:15 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
	9:30 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
	9:45 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
Totals		3	36	0	0	39	0	0	0	0	0	0	37	2	0	39	3	0	4	0	7	85	

Peak Hour Heavy Vehicle Volume Summary

	Hourly Time Period	From North (↓) Shopiere Rd					From East (←) 0					From South (↑) Shopiere Rd					From West (→) Murphy Woods Rd					Total Hourly
	Start Time	Right	Thru	Left	U-Tn	Total	Right	Thru	Left	U-Tn	Total	Right	Thru	Left	U-Tn	Total	Right	Thru	Left	U-Tn	Total	Volume
AM	7:15 AM	1	11	0	0	12	0	0	0	0	0	0	9	1	0	10	1	0	1	0	2	24
MD	12:00 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
PM	3:45 PM	0	3	0	0	3	0	0	0	0	0	0	3	0	0	3	1	0	0	0	1	7

Intersection Traffic Volume Report

Count Basics	Version 2011.J3		Page 1 of 11
Start Date:	Thursday, May 16, 2024	Weekday	Schools in Session
Total Number of Hours Counted: 6		Non-Holiday	No Special Events

Base Information, Observed (6) Hour and Estimated (24) Hour Volume Summaries

Intersection of: Shopiere Rd and Creek Rd

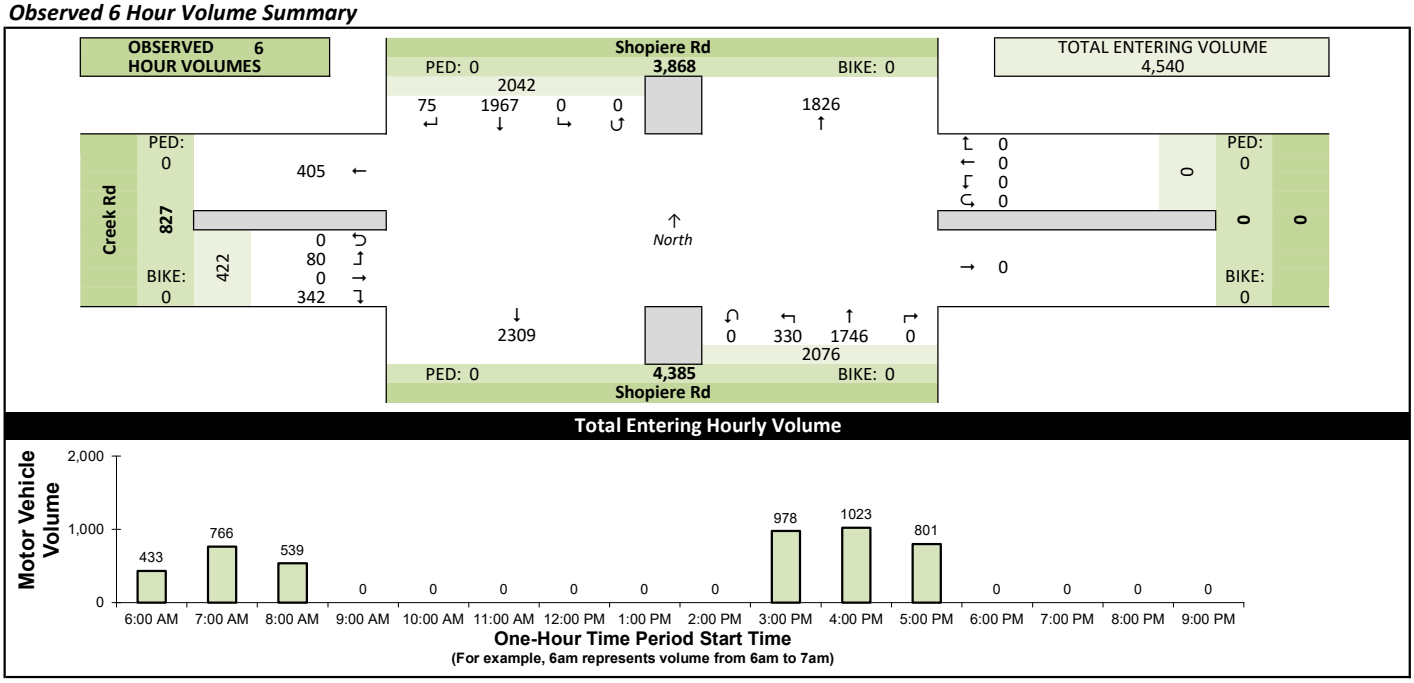
Site Information

Municipality	City of Beloit		
County	Rock	WisDOT Region	SE
Traffic Control	Traffic Signal		
Roadway Names		North Direction	↑
North Leg	Shopiere Rd		
East Leg			
South Leg	Shopiere Rd		
West Leg	Creek Rd		
Special Considerations			
Schools	In Session		
Holidays	None		
Special Events	None		
Special Pedestrians Observed			
Pre-school children	None		
Elementry school age children	None		
Visually impaired (white cane/helper dog)	None		
Elderly/disabled (except wheelchairs)	None		
Wheelchairs/electric scooters	None		
Other (describe)	None	None	

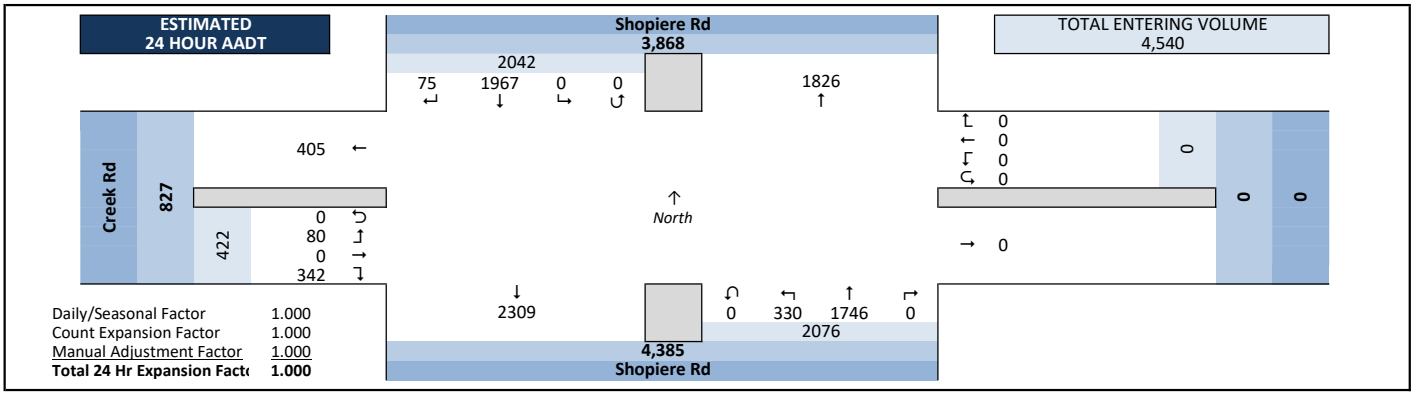
Count Information

Hrs Counted:	6:00 AM - 9:00 AM and 3:00 PM to 6:00 PM				
Count Dates				Weather	
AM Peak Period	Thursday, May 16, 2024			Clear & Dry	
Midday Peak Period	Thursday, May 16, 2024			Clear & Dry	
PM Peak Period	Thursday, May 16, 2024			Clear & Dry	
Calculated Peak Hours					
AM	7:15-8:15am	MD		PM	3:45-4:45pm
Peak Hours Selected for Analysis					
AM	7:15-8:15am	MD		PM	3:45-4:45pm
Daily/Seasonal Adjustment Group	(2) Urban Arterials & Collectors				
Count Expansion Group	(4) Rural Arterials & Collectors				
Daily/Seasonal Adjustment Factor	1.000		Count Expansion Factor	1.000	
Company Name	AECOM			Manual Adj.	1.000
Observers	AM Peak Period	MioVision			
	Midday Peak Period	MioVision			
	PM Peak Period	MioVision			
Comments					

Observed 6 Hour Volume Summary



Estimated 24 Hour AADT



Intersection Traffic Volume Report

Count Basics		*Page 3 of 11*
Start Date: Thursday, May 16, 2024	Weekday	Schools in Session
Total Number of Hours Counted: 6	Non-Holiday	No Special Events

Peak Hour Volume Summary

Shopiere Rd and Creek Rd

All Motor Vehicles

Peak Hour Volumes, Truck Percentages, and PHFs

Thursday, May 16, 2024		From North					From East					From South					From West					
	AM Peak Hour	Shopiere Rd					0					Shopiere Rd					Creek Rd					
	Start Time	Right	Thru	Left	U-Tn	Total	Right	Thru	Left	U-Tn	Total	Right	Thru	Left	U-Tn	Total	Right	Thru	Left	U-Tn	Total	Totals
AM Peak Hour	7:15 AM	4	65	0	0	69	0	0	0	0	0	0	102	10	0	112	15	0	7	0	22	203
	7:30 AM	1	84	0	0	85	0	0	0	0	0	0	104	17	0	121	10	0	3	0	13	219
	7:45 AM	7	76	0	0	83	0	0	0	0	0	0	83	17	0	100	14	0	4	0	18	201
	8:00 AM	6	58	0	0	64	0	0	0	0	0	0	66	9	0	75	13	0	0	0	13	152
	Peak Hour Volume	18	283	0	0	301	0	0	0	0	0	0	355	53	0	408	52	0	14	0	66	775
	Rounded Hourly Volume	20	285	0	0	305	0	0	0	0	0	0	355	55	0	410	50	0	15	0	65	780
	% Single Unit Trucks	0.0	4.2	0.0	0.0	4.0	0.0	0.0	0.0	0.0	0.0	0.0	3.1	0.0	0.0	2.7	0.0	0.0	0.0	0.0	0.0	3.0
	% Heavy Trucks	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	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 (Total)	0.0	4.2	0.0	0.0	4.0	0.0	0.0	0.0	0.0	0.0	0.0	3.1	0.0	0.0	2.7	0.0	0.0	0.0	0.0	0.0	3.0
	Peak Hour Factor (PHF)	0.64	0.84	0.00	0.00	0.89	0.00	0.00	0.00	0.00	0.00	0.00	0.85	0.78	0.00	0.84	0.87	0.00	0.50	0.00	0.75	0.88

N/A		From North					From East					From South					From West					
	MD Peak Hour	Shopiere Rd					0					Shopiere Rd					Creek Rd					
	Start Time	Right	Thru	Left	U-Tn	Total	Right	Thru	Left	U-Tn	Total	Right	Thru	Left	U-Tn	Total	Right	Thru	Left	U-Tn	Total	Totals
Midday (MD) Peak Hour	12:00 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
	12:15 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
	12:30 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
	12:45 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
	Peak Hour Volume	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
	Rounded Hourly Volume	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
	% Single Unit Trucks	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
	% Heavy Trucks	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	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 (Total)	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
	Peak Hour Factor (PHF)	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00

Thursday, May 16, 2024		From North					From East					From South					From West					
	PM Peak Hour	Shopiere Rd					0					Shopiere Rd					Creek Rd					
	Start Time	Right	Thru	Left	U-Tn	Total	Right	Thru	Left	U-Tn	Total	Right	Thru	Left	U-Tn	Total	Right	Thru	Left	U-Tn	Total	Totals
PM Peak Hour	3:45 PM	2	169	0	0	171	0	0	0	0	0	0	72	18	0	90	20	0	5	0	25	286
	4:00 PM	4	128	0	0	132	0	0	0	0	0	0	102	22	0	124	10	0	6	0	16	272
	4:15 PM	2	115	0	0	117	0	0	0	0	0	0	96	22	0	118	17	0	5	0	22	257
	4:30 PM	3	125	0	0	128	0	0	0	0	0	0	95	19	0	114	25	0	5	0	30	272
	Peak Hour Volume	11	537	0	0	548	0	0	0	0	0	0	365	81	0	446	72	0	21	0	93	1087
	Rounded Hourly Volume	10	535	0	0	545	0	0	0	0	0	0	365	80	0	445	70	0	20	0	90	1080
	% Single Unit Trucks	0.0	1.3	0.0	0.0	1.3	0.0	0.0	0.0	0.0	0.0	0.0	1.1	0.0	0.0	0.9	1.4	0.0	0.0	0.0	1.1	1.1
	% Heavy Trucks	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	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 (Total)	0.0	1.3	0.0	0.0	1.3	0.0	0.0	0.0	0.0	0.0	0.0	1.1	0.0	0.0	0.9	1.4	0.0	0.0	0.0	1.1	1.1
	Peak Hour Factor (PHF)	0.69	0.79	0.00	0.00	0.80	0.00	0.00	0.00	0.00	0.00	0.00	0.89	0.92	0.00	0.90	0.72	0.00	0.87	0.00	0.77	0.95

Peak Hour Pedestrian and Bicyclist Volumes

Pedestrians and Bicyclists		Crossing North Approach			Crossing East Approach			Crossing South Approach			Crossing West Approach			Total Ped & Bike Volume
		Shopiere Rd			0			Shopiere Rd			Creek Rd			
	15-Minute Start Time	Pedestrian	Bicyclist	Total	Pedestrian	Bicyclist	Total	Pedestrian	Bicyclist	Total	Pedestrian	Bicyclist	Total	
AM	7:15 AM	0	0	0	0	0	0	0	0	0	0	0	0	0
	7:30 AM	0	0	0	0	0	0	0	0	0	0	0	0	0
	7:45 AM	0	0	0	0	0	0	0	0	0	0	0	0	0
	8:00 AM	0	0	0	0	0	0	0	0	0	0	0	0	0
	Total	0	0	0	0	0	0	0	0	0	0	0	0	0
MD	12:00 PM	0	0	0	0	0	0	0	0	0	0	0	0	0
	12:15 PM	0	0	0	0	0	0	0	0	0	0	0	0	0
	12:30 PM	0	0	0	0	0	0	0	0	0	0	0	0	0
	12:45 PM	0	0	0	0	0	0	0	0	0	0	0	0	0
	Total	0	0	0	0	0	0	0	0	0	0	0	0	0
PM	3:45 PM	0	0	0	0	0	0	0	0	0	0	0	0	0
	4:00 PM	0	0	0	0	0	0	0	0	0	0	0	0	0
	4:15 PM	0	0	0	0	0	0	0	0	0	0	0	0	0
	4:30 PM	0	0	0	0	0	0	0	0	0	0	0	0	0
	Total	0	0	0	0	0	0	0	0	0	0	0	0	0

Intersection Traffic Volume Report

Count Basics		*Page 5 of 11*
Start Date: Thursday, May 16, 2024	Weekday	Schools in Session
Total Number of Hours Counted: 6	Non-Holiday	No Special Events

15-Minute Motor Vehicle Data

All Motor Vehicles

Shopiere Rd and Creek Rd

15-Minute Motor Vehicle Data

15-Minute Time Period		From North (↓) Shopiere Rd					From East (←) 0					From South (↑) Shopiere Rd					From West (→) Creek Rd					15-Min	Hourly	
Start Time		Right	Thru	Left	U-Tn	Total	Right	Thru	Left	U-Tn	Total	Right	Thru	Left	U-Tn	Total	Right	Thru	Left	U-Tn	Total	Totals	Sum	PHF
AM Peak Period	6:00 AM	2	27	0	0	29	0	0	0	0	0	0	57	5	0	62	4	0	1	0	5	96	433	0.86
	6:15 AM	2	32	0	0	34	0	0	0	0	0	0	53	6	0	59	2	0	0	0	2	95	480	0.84
	6:30 AM	2	38	0	0	40	0	0	0	0	0	0	56	5	0	61	10	0	5	0	15	116	588	0.72
	6:45 AM	6	46	0	0	52	0	0	0	0	0	0	59	7	0	66	7	0	1	0	8	126	691	0.79
	7:00 AM	2	58	0	0	60	0	0	0	0	0	0	62	11	0	73	9	0	1	0	10	143	766	0.87
	7:15 AM	4	65	0	0	69	0	0	0	0	0	0	102	10	0	112	15	0	7	0	22	203	775	0.88
	7:30 AM	1	84	0	0	85	0	0	0	0	0	0	104	17	0	121	10	0	3	0	13	219	701	0.80
	7:45 AM	7	76	0	0	83	0	0	0	0	0	0	83	17	0	100	14	0	4	0	18	201	606	0.75
	8:00 AM	6	58	0	0	64	0	0	0	0	0	0	66	9	0	75	13	0	0	0	13	152	539	0.89
	8:15 AM	9	55	0	0	64	0	0	0	0	0	0	38	12	0	50	12	0	3	0	15	129		
	8:30 AM	1	44	0	0	45	0	0	0	0	0	0	55	10	0	65	13	0	1	0	14	124		
	8:45 AM	2	61	0	0	63	0	0	0	0	0	0	46	11	0	57	11	0	3	0	14	134		
	9:00 AM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
	9:15 AM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
	9:30 AM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
	9:45 AM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
Midday Peak Period	10:00 AM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
	10:15 AM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
	10:30 AM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
	10:45 AM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
	11:00 AM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
	11:15 AM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
	11:30 AM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
	11:45 AM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
	12:00 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
	12:15 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
	12:30 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
	12:45 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
	1:00 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
	1:15 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
	1:30 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
	1:45 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
PM Peak Period	2:00 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
	2:15 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
	2:30 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
	2:45 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
	3:00 PM	5	94	0	0	99	0	0	0	0	0	0	87	24	0	111	24	0	3	0	27	237	978	0.85
	3:15 PM	0	102	0	0	102	0	0	0	0	0	0	80	14	0	94	22	0	5	0	27	223	1013	0.89
	3:30 PM	1	105	0	0	106	0	0	0	0	0	0	81	14	0	95	25	0	6	0	31	232	1047	0.92
	3:45 PM	2	169	0	0	171	0	0	0	0	0	0	72	18	0	90	20	0	5	0	25	286	1087	0.95
	4:00 PM	4	128	0	0	132	0	0	0	0	0	0	102	22	0	124	10	0	6	0	16	272	1023	0.94
	4:15 PM	2	115	0	0	117	0	0	0	0	0	0	96	22	0	118	17	0	5	0	22	257	968	0.89
	4:30 PM	3	125	0	0	128	0	0	0	0	0	0	95	19	0	114	25	0	5	0	30	272	922	0.85
	4:45 PM	0	106	0	0	106	0	0	0	0	0	0	79	16	0	95	18	0	3	0	21	222	848	0.95
	5:00 PM	3	99	0	0	102	0	0	0	0	0	0	76	17	0	93	16	0	6	0	22	217	801	0.92
	5:15 PM	4	99	0	0	103	0	0	0	0	0	0	80	12	0	92	13	0	3	0	16	211		
	5:30 PM	3	97	0	0	100	0	0	0	0	0	0	68	14	0	82	13	0	3	0	16	198		
	5:45 PM	4	84	0	0	88	0	0	0	0	0	0	49	18	0	67	19	0	1	0	20	175		
	6:00 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
	6:15 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
	6:30 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
	6:45 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
	7:00 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
	7:15 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
	7:30 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
	7:45 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
	8:00 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
	8:15 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
	8:30 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
	8:45 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
	9:00 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
	9:15 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
	9:30 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
	9:45 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
Totals		75	1967	0	0	2042	0	0	0	0	0	0	1746	330	0	2076	342	0	80	0	422	4540		

Peak Hour All Vehicle Volume Summary

Hourly Time Period		From North (↓) Shopiere Rd					From East (←) 0					From South (↑) Shopiere Rd					From West (→) Creek Rd					Total Hourly	
Start Time		Right	Thru	Left	U-Tn	Total	Right	Thru	Left	U-Tn	Total	Right	Thru	Left	U-Tn	Total	Right	Thru	Left	U-Tn	Total	Volume	PHF
AM	7:15 AM	18	283	0	0	301	0	0	0	0	0	0	355	53	0	408	52	0	14	0	66	775	0.88
MD	12:00 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
PM	3:45 PM	11	537	0	0	548	0	0	0	0	0	0	365	81	0	446	72	0	21	0	93	1087	0.95

Intersection Traffic Volume Report

Count Basics			*Page 9 of 11*
Start Date:	Thursday, May 16, 2024	Weekday	Schools in Session
Total Number of Hours Counted: 6		Non-Holiday	No Special Events

15-Minute Heavy Vehicle Data

Heavy Vehicles (Single-Unit Trucks, Buses & Semi-Trucks)

Shopiere Rd and Creek Rd

15-Minute Heavy Vehicle Data

15-Minute Time Period Start Time		From North (↓) Shopiere Rd					From East (←) 0					From South (↑) Shopiere Rd					From West (→) Creek Rd					15-Min Totals	Hourly Sum
		Right	Thru	Left	U-Tn	Total	Right	Thru	Left	U-Tn	Total	Right	Thru	Left	U-Tn	Total	Right	Thru	Left	U-Tn	Total		
AM Peak Period	6:00 AM	0	1	0	0	1	0	0	0	0	0	0	1	0	0	1	0	0	0	0	0	2	9
	6:15 AM	0	0	0	0	0	0	0	0	0	0	0	1	0	0	1	0	0	0	0	0	1	13
	6:30 AM	0	1	0	0	1	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	1	15
	6:45 AM	0	2	0	0	2	0	0	0	0	0	0	3	0	0	3	0	0	0	0	0	5	19
	7:00 AM	0	4	0	0	4	0	0	0	0	0	0	2	0	0	2	0	0	0	0	0	6	20
	7:15 AM	0	1	0	0	1	0	0	0	0	0	0	2	0	0	2	0	0	0	0	0	3	23
	7:30 AM	0	1	0	0	1	0	0	0	0	0	0	4	0	0	4	0	0	0	0	0	5	23
	7:45 AM	0	5	0	0	5	0	0	0	0	0	0	1	0	0	1	0	0	0	0	0	6	24
	8:00 AM	0	5	0	0	5	0	0	0	0	0	0	4	0	0	4	0	0	0	0	0	9	23
	8:15 AM	0	2	0	0	2	0	0	0	0	0	0	1	0	0	1	0	0	0	0	0	3	
	8:30 AM	0	3	0	0	3	0	0	0	0	0	0	3	0	0	3	0	0	0	0	0	6	
	8:45 AM	0	1	0	0	1	0	0	0	0	0	0	3	1	0	4	0	0	0	0	0	5	
	9:00 AM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
	9:15 AM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
	9:30 AM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
	9:45 AM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
Midday Peak Period	10:00 AM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
	10:15 AM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
	10:30 AM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
	10:45 AM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
	11:00 AM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
	11:15 AM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
	11:30 AM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
	11:45 AM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
	12:00 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
	12:15 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
	12:30 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
	12:45 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
	1:00 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
	1:15 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
	1:30 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
	1:45 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
PM Peak Period	2:00 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
	2:15 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
	2:30 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
	2:45 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
	3:00 PM	1	1	0	0	2	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	2	12
	3:15 PM	0	2	0	0	2	0	0	0	0	0	0	3	0	0	3	0	0	0	0	0	5	14
	3:30 PM	0	0	0	0	0	0	0	0	0	0	0	4	0	0	4	0	0	0	0	0	4	14
	3:45 PM	0	1	0	0	1	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	1	12
	4:00 PM	0	2	0	0	2	0	0	0	0	0	0	2	0	0	2	0	0	0	0	0	4	14
	4:15 PM	0	4	0	0	4	0	0	0	0	0	0	1	0	0	1	0	0	0	0	0	5	13
	4:30 PM	0	0	0	0	0	0	0	0	0	0	0	1	0	0	1	1	0	0	0	1	2	8
	4:45 PM	0	0	0	0	0	0	0	0	0	0	0	2	1	0	3	0	0	0	0	0	3	6
	5:00 PM	0	2	0	0	2	0	0	0	0	0	0	1	0	0	1	0	0	0	0	0	3	7
	5:15 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
	5:30 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
	5:45 PM	0	1	0	0	1	0	0	0	0	0	0	2	1	0	3	0	0	0	0	0	4	
	6:00 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
	6:15 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
	6:30 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
	6:45 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
	7:00 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
	7:15 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
	7:30 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
	7:45 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
	8:00 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
	8:15 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
	8:30 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
	8:45 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
	9:00 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
	9:15 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
	9:30 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
	9:45 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
Totals		1	39	0	0	40	0	0	0	0	0	0	41	3	0	44	1	0	0	0	1	85	

Peak Hour Heavy Vehicle Volume Summary

Hourly Time Period Start Time		From North (↓) Shopiere Rd					From East (←) 0					From South (↑) Shopiere Rd					From West (→) Creek Rd					Total Hourly Volume
		Right	Thru	Left	U-Tn	Total	Right	Thru	Left	U-Tn	Total	Right	Thru	Left	U-Tn	Total	Right	Thru	Left	U-Tn	Total	
AM	7:15 AM	0	12	0	0	12	0	0	0	0	0	0	11	0	0	11	0	0	0	0	0	23
MD	12:00 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
PM	3:45 PM	0	7	0	0	7	0	0	0	0	0	0	4	0	0	4	1	0	0	0	1	12

Intersection Traffic Volume Report

Count Basics	Version 2011.J3		Page 1 of 11
Start Date:	Thursday, May 23, 2024	Weekday	Schools in Session
Total Number of Hours Counted: 14		Non-Holiday	No Special Events

Base Information, Observed (14) Hour and Estimated (24) Hour Volume Summaries

Intersection of: Shopiere Rd and Hart Rd

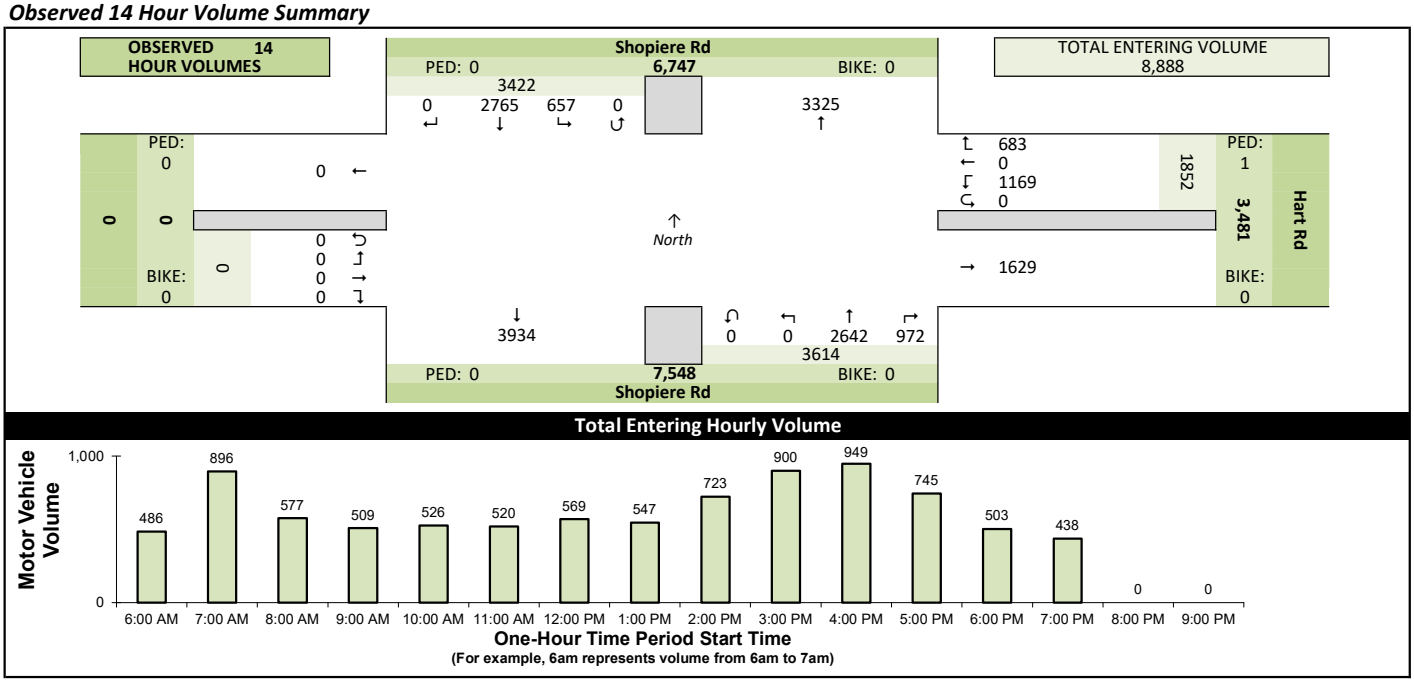
Site Information

Municipality	City of Beloit		
County	Rock	WisDOT Region	SE
Traffic Control	Traffic Signal		
Roadway Names		North Direction	↑
North Leg	Shopiere Rd		
East Leg	Hart Rd		
South Leg	Shopiere Rd		
West Leg			
Special Considerations			
Schools	In Session		
Holidays	None		
Special Events	None		
Special Pedestrians Observed			
Pre-school children	None		
Elementry school age children	None		
Visually impaired (white cane/helper dog)	None		
Elderly/disabled (except wheelchairs)	None		
Wheelchairs/electric scooters	None		
Other (describe)	None	None	

Count Information

Hrs Counted:	6:00 AM - 9:00 AM and 3:00 PM to 6:00 PM				
Count Dates				Weather	
AM Peak Period	Thursday, May 23, 2024			Clear & Dry	
Midday Peak Period	Thursday, May 23, 2024			Clear & Dry	
PM Peak Period	Thursday, May 23, 2024			Clear & Dry	
Calculated Peak Hours					
AM	7:15-8:15am	MD	12:00-1:00pm	PM	3:30-4:30pm
Peak Hours Selected for Analysis					
AM	7:15-8:15am	MD	12:00-1:00pm	PM	3:45-4:45pm
Daily/Seasonal Adjustment Group	(2) Urban Arterials & Collectors				
Count Expansion Group	(4) Rural Arterials & Collectors				
Daily/Seasonal Adjustment Factor	1.000		Count Expansion Factor	1.000	
Company Name	AECOM			Manual Adj.	1.000
Observers: AM Peak Period	MioVision				
Midday Peak Period	MioVision				
PM Peak Period	MioVision				
Comments					

Observed 14 Hour Volume Summary



Estimated 24 Hour AADT

Intersection Traffic Volume Report

Count Basics		*Page 3 of 11*
Start Date: Thursday, May 23, 2024	Weekday	Schools in Session
Total Number of Hours Counted: 14	Non-Holiday	No Special Events

Peak Hour Volume Summary

Shopiere Rd and Hart Rd

All Motor Vehicles

Peak Hour Volumes, Truck Percentages, and PHFs

Thursday, May 23, 2024		From North (↓)					From East (←)					From South (↑)					From West (→)					
	AM Peak Hour	Shopiere Rd					Hart Rd					Shopiere Rd					0					
	Start Time	Right	Thru	Left	U-Tn	Total	Right	Thru	Left	U-Tn	Total	Right	Thru	Left	U-Tn	Total	Right	Thru	Left	U-Tn	Total	Totals
AM Peak Hour	7:15 AM	0	58	21	0	79	31	0	26	0	57	24	87	0	0	111	0	0	0	0	0	247
	7:30 AM	0	66	16	0	82	26	0	32	0	58	28	91	0	0	119	0	0	0	0	0	259
	7:45 AM	0	69	26	0	95	19	0	21	0	40	17	75	0	0	92	0	0	0	0	0	227
	8:00 AM	0	40	15	0	55	17	0	19	0	36	19	54	0	0	73	0	0	0	0	0	164
	Peak Hour Volume	0	233	78	0	311	93	0	98	0	191	88	307	0	0	395	0	0	0	0	0	897
	Rounded Hourly Volume	0	235	80	0	315	95	0	100	0	195	90	305	0	0	395	0	0	0	0	0	905
	% Single Unit Trucks	0.0	2.6	17.9	0.0	6.4	23.7	0.0	2.0	0.0	12.6	0.0	2.0	0.0	0.0	1.5	0.0	0.0	0.0	0.0	0.0	5.6
	% Heavy Trucks	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	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 (Total)	0.0	2.6	17.9	0.0	6.4	23.7	0.0	2.0	0.0	12.6	0.0	2.0	0.0	0.0	1.5	0.0	0.0	0.0	0.0	0.0	5.6
	Peak Hour Factor (PHF)	0.00	0.84	0.75	0.00	0.82	0.75	0.00	0.77	0.00	0.82	0.79	0.84	0.00	0.00	0.83	0.00	0.00	0.00	0.00	0.00	0.87

Thursday, May 23, 2024		From North (↓)					From East (←)					From South (↑)					From West (→)					
	MD Peak Hour	Shopiere Rd					Hart Rd					Shopiere Rd					0					
	Start Time	Right	Thru	Left	U-Tn	Total	Right	Thru	Left	U-Tn	Total	Right	Thru	Left	U-Tn	Total	Right	Thru	Left	U-Tn	Total	Totals
Midday (MD) Peak Hour	12:00 PM	0	53	6	0	59	6	0	19	0	25	18	38	0	0	56	0	0	0	0	0	140
	12:15 PM	0	51	10	0	61	12	0	17	0	29	21	39	0	0	60	0	0	0	0	0	150
	12:30 PM	0	28	13	0	41	7	0	18	0	25	14	46	0	0	60	0	0	0	0	0	126
	12:45 PM	0	51	13	0	64	12	0	16	0	28	18	43	0	0	61	0	0	0	0	0	153
	Peak Hour Volume	0	183	42	0	225	37	0	70	0	107	71	166	0	0	237	0	0	0	0	0	569
	Rounded Hourly Volume	0	185	40	0	225	35	0	70	0	105	70	165	0	0	235	0	0	0	0	0	565
	% Single Unit Trucks	0.0	2.7	28.6	0.0	7.6	18.9	0.0	1.4	0.0	7.5	4.2	3.6	0.0	0.0	3.8	0.0	0.0	0.0	0.0	0.0	6.0
	% Heavy Trucks	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	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 (Total)	0.0	2.7	28.6	0.0	7.6	18.9	0.0	1.4	0.0	7.5	4.2	3.6	0.0	0.0	3.8	0.0	0.0	0.0	0.0	0.0	6.0
	Peak Hour Factor (PHF)	0.00	0.86	0.81	0.00	0.88	0.77	0.00	0.92	0.00	0.92	0.85	0.90	0.00	0.00	0.97	0.00	0.00	0.00	0.00	0.00	0.93

Thursday, May 23, 2024		From North (↓)					From East (←)					From South (↑)					From West (→)					
	PM Peak Hour	Shopiere Rd					Hart Rd					Shopiere Rd					0					
	Start Time	Right	Thru	Left	U-Tn	Total	Right	Thru	Left	U-Tn	Total	Right	Thru	Left	U-Tn	Total	Right	Thru	Left	U-Tn	Total	Totals
PM Peak Hour	3:45 PM	0	97	16	0	113	19	0	51	0	70	25	56	0	0	81	0	0	0	0	0	264
	4:00 PM	0	80	21	0	101	11	0	37	0	48	35	81	0	0	116	0	0	0	0	0	265
	4:15 PM	0	76	18	0	94	8	0	28	0	36	35	70	0	0	105	0	0	0	0	0	235
	4:30 PM	0	63	15	0	78	15	0	23	0	38	35	56	0	0	91	0	0	0	0	0	207
	Peak Hour Volume	0	316	70	0	386	53	0	139	0	192	130	263	0	0	393	0	0	0	0	0	971
	Rounded Hourly Volume	0	315	70	0	385	55	0	140	0	195	130	265	0	0	395	0	0	0	0	0	975
	% Single Unit Trucks	0.0	1.3	4.3	0.0	1.8	7.5	0.0	2.2	0.0	3.6	2.3	1.1	0.0	0.0	1.5	0.0	0.0	0.0	0.0	0.0	2.1
	% Heavy Trucks	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	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 (Total)	0.0	1.3	4.3	0.0	1.8	7.5	0.0	2.2	0.0	3.6	2.3	1.1	0.0	0.0	1.5	0.0	0.0	0.0	0.0	0.0	2.1
	Peak Hour Factor (PHF)	0.00	0.81	0.83	0.00	0.85	0.70	0.00	0.68	0.00	0.69	0.93	0.81	0.00	0.00	0.85	0.00	0.00	0.00	0.00	0.00	0.92

Peak Hour Pedestrian and Bicyclist Volumes

Pedestrians and Bicyclists		Crossing North Approach			Crossing East Approach			Crossing South Approach			Crossing West Approach			Total Ped & Bike Volume
		Shopiere Rd			Hart Rd			Shopiere Rd			0			
	15-Minute Start Time	Pedestrian	Bicyclist	Total	Pedestrian	Bicyclist	Total	Pedestrian	Bicyclist	Total	Pedestrian	Bicyclist	Total	
AM	7:15 AM	0	0	0	0	0	0	0	0	0	0	0	0	0
	7:30 AM	0	0	0	0	0	0	0	0	0	0	0	0	0
	7:45 AM	0	0	0	0	0	0	0	0	0	0	0	0	0
	8:00 AM	0	0	0	0	0	0	0	0	0	0	0	0	0
	Total	0	0	0	0	0	0	0	0	0	0	0	0	0
MD	12:00 PM	0	0	0	0	0	0	0	0	0	0	0	0	0
	12:15 PM	0	0	0	0	0	0	0	0	0	0	0	0	0
	12:30 PM	0	0	0	0	0	0	0	0	0	0	0	0	0
	12:45 PM	0	0	0	0	0	0	0	0	0	0	0	0	0
	Total	0	0	0	0	0	0	0	0	0	0	0	0	0
PM	3:45 PM	0	0	0	0	0	0	0	0	0	0	0	0	0
	4:00 PM	0	0	0	0	0	0	0	0	0	0	0	0	0
	4:15 PM	0	0	0	0	0	0	0	0	0	0	0	0	0
	4:30 PM	0	0	0	0	0	0	0	0	0	0	0	0	0
	Total	0	0	0	0	0	0	0	0	0	0	0	0	0

Intersection Traffic Volume Report

Count Basics		*Page 5 of 11*
Start Date: Thursday, May 23, 2024	Weekday	Schools in Session
Total Number of Hours Counted: 14	Non-Holiday	No Special Events

15-Minute Motor Vehicle Data

All Motor Vehicles

Shopiere Rd and Hart Rd

15-Minute Motor Vehicle Data

15-Minute Time Period		From North (↓) Shopiere Rd					From East (←) Hart Rd					From South (↑) Shopiere Rd					From West (→) 0					15-Min	Hourly	
	Start Time	Right	Thru	Left	U-Tn	Total	Right	Thru	Left	U-Tn	Total	Right	Thru	Left	U-Tn	Total	Right	Thru	Left	U-Tn	Total	Totals	Sum	PHF
AM Peak Period	6:00 AM	0	12	5	0	17	11	0	8	0	19	14	44	0	0	58	0	0	0	0	0	94	486	0.82
	6:15 AM	0	21	7	0	28	18	0	10	0	28	11	42	0	0	53	0	0	0	0	0	109	555	0.85
	6:30 AM	0	24	10	0	34	12	0	14	0	26	28	46	0	0	74	0	0	0	0	0	134	693	0.70
	6:45 AM	0	41	18	0	59	18	0	16	0	34	19	37	0	0	56	0	0	0	0	0	149	818	0.79
	7:00 AM	0	41	5	0	46	18	0	31	0	49	14	54	0	0	68	0	0	0	0	0	163	896	0.86
	7:15 AM	0	58	21	0	79	31	0	26	0	57	24	87	0	0	111	0	0	0	0	0	247	897	0.87
	7:30 AM	0	66	16	0	82	26	0	32	0	58	28	91	0	0	119	0	0	0	0	0	259	805	0.78
	7:45 AM	0	69	26	0	95	19	0	21	0	40	17	75	0	0	92	0	0	0	0	0	227	685	0.75
	8:00 AM	0	40	15	0	55	17	0	19	0	36	19	54	0	0	73	0	0	0	0	0	164	577	0.88
	8:15 AM	0	42	10	0	52	19	0	26	0	45	24	34	0	0	58	0	0	0	0	0	155	550	0.89
	8:30 AM	0	39	11	0	50	16	0	19	0	35	14	40	0	0	54	0	0	0	0	0	139	517	0.93
	8:45 AM	0	32	7	0	39	18	0	25	0	43	9	28	0	0	37	0	0	0	0	0	119	491	0.90
	9:00 AM	0	33	12	0	45	20	0	23	0	43	11	38	0	0	49	0	0	0	0	0	137	509	0.93
	9:15 AM	0	27	5	0	32	11	0	19	0	30	14	46	0	0	60	0	0	0	0	0	122	503	0.92
	9:30 AM	0	25	7	0	32	10	0	18	0	28	17	36	0	0	53	0	0	0	0	0	113	514	0.94
	9:45 AM	0	34	9	0	43	10	0	18	0	28	14	52	0	0	66	0	0	0	0	0	137	539	0.98
Midday Peak Period	10:00 AM	0	36	7	0	43	13	0	21	0	34	15	39	0	0	54	0	0	0	0	0	131	526	0.95
	10:15 AM	0	43	14	0	57	11	0	13	0	24	16	36	0	0	52	0	0	0	0	0	133	518	0.94
	10:30 AM	0	35	11	0	46	9	0	18	0	27	8	57	0	0	65	0	0	0	0	0	138	528	0.92
	10:45 AM	0	34	12	0	46	9	0	14	0	23	16	39	0	0	55	0	0	0	0	0	124	515	0.90
	11:00 AM	0	41	11	0	52	13	0	16	0	29	13	29	0	0	42	0	0	0	0	0	123	520	0.91
	11:15 AM	0	45	7	0	52	14	0	23	0	37	16	38	0	0	54	0	0	0	0	0	143	537	0.94
	11:30 AM	0	41	7	0	48	8	0	17	0	25	10	42	0	0	52	0	0	0	0	0	125	544	0.91
	11:45 AM	0	38	10	0	48	17	0	8	0	25	16	40	0	0	56	0	0	0	0	0	129	545	0.91
	12:00 PM	0	53	6	0	59	6	0	19	0	25	18	38	0	0	56	0	0	0	0	0	140	569	0.93
	12:15 PM	0	51	10	0	61	12	0	17	0	29	21	39	0	0	60	0	0	0	0	0	150	562	0.92
	12:30 PM	0	28	13	0	41	7	0	18	0	25	14	46	0	0	60	0	0	0	0	0	126	542	0.89
	12:45 PM	0	51	13	0	64	12	0	16	0	28	18	43	0	0	61	0	0	0	0	0	153	566	0.92
	1:00 PM	0	34	13	0	47	7	0	22	0	29	10	47	0	0	57	0	0	0	0	0	133	547	0.91
	1:15 PM	0	35	12	0	47	6	0	11	0	17	15	51	0	0	66	0	0	0	0	0	130	586	0.85
	1:30 PM	0	39	16	0	55	10	0	19	0	29	13	53	0	0	66	0	0	0	0	0	150	628	0.91
	1:45 PM	0	40	6	0	46	8	0	19	0	27	18	43	0	0	61	0	0	0	0	0	134	656	0.92
PM Peak Period	2:00 PM	0	49	10	0	59	11	0	27	0	38	22	53	0	0	75	0	0	0	0	0	172	723	0.90
	2:15 PM	0	55	10	0	65	10	0	30	0	40	14	53	0	0	67	0	0	0	0	0	172	760	0.91
	2:30 PM	0	70	7	0	77	15	0	22	0	37	14	50	0	0	64	0	0	0	0	0	178	781	0.93
	2:45 PM	0	82	18	0	100	12	0	19	0	31	24	46	0	0	70	0	0	0	0	0	201	837	0.89
	3:00 PM	0	69	20	0	89	13	0	25	0	38	24	58	0	0	82	0	0	0	0	0	209	900	0.85
	3:15 PM	0	74	15	0	89	14	0	18	0	32	21	51	0	0	72	0	0	0	0	0	193	956	0.90
	3:30 PM	0	81	28	0	109	11	0	23	0	34	22	69	0	0	91	0	0	0	0	0	234	998	0.94
	3:45 PM	0	97	16	0	113	19	0	51	0	70	25	56	0	0	81	0	0	0	0	0	264	971	0.92
	4:00 PM	0	80	21	0	101	11	0	37	0	48	35	81	0	0	116	0	0	0	0	0	265	949	0.90
	4:15 PM	0	76	18	0	94	8	0	28	0	36	35	70	0	0	105	0	0	0	0	0	235	892	0.92
	4:30 PM	0	63	15	0	78	15	0	23	0	38	35	56	0	0	91	0	0	0	0	0	207	871	0.90
	4:45 PM	0	78	19	0	97	16	0	29	0	45	29	71	0	0	100	0	0	0	0	0	242	832	0.86
	5:00 PM	0	66	11	0	77	9	0	31	0	40	23	68	0	0	91	0	0	0	0	0	208	745	0.87
	5:15 PM	0	79	11	0	90	13	0	36	0	49	21	54	0	0	75	0	0	0	0	0	214	668	0.78
	5:30 PM	0	50	15	0	65	15	0	30	0	45	19	39	0	0	58	0	0	0	0	0	168	566	0.84
	5:45 PM	0	56	12	0	68	10	0	20	0	30	19	38	0	0	57	0	0	0	0	0	155	522	0.84
	6:00 PM	0	55	11	0	66	9	0	19	0	28	12	25	0	0	37	0	0	0	0	0	131	503	0.92
	6:15 PM	0	40	4	0	44	6	0	22	0	28	10	30	0	0	40	0	0	0	0	0	112	487	0.90
	6:30 PM	0	46	11	0	57	4	0	19	0	23	12	32	0	0	44	0	0	0	0	0	124	494	0.91
	6:45 PM	0	60	9	0	69	7	0	19	0	26	11	30	0	0	41	0	0	0	0	0	136	484	0.89
	7:00 PM	0	55	9	0	64	6	0	9	0	15	6	30	0	0	36	0	0	0	0	0	115	438	0.92
	7:15 PM	0	56	7	0	63	5	0	15	0	20	10	26	0	0	36	0	0	0	0	0	119		
	7:30 PM	0	40	6	0	46	8	0	13	0	21	7	40	0	0	47	0	0	0	0	0	114		
	7:45 PM	0	40	2	0	42	0	0	8	0	8	8	32	0	0	40	0	0	0	0	0	90		
	8:00 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
	8:15 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
	8:30 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
	8:45 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
	9:00 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
	9:15 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
	9:30 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
	9:45 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
Totals		0	2765	657	0	3422	683	0	1169	0	1852	972	2642	0	0	3614	0	0	0	0	0	8888		

Peak Hour All Vehicle Volume Summary

Hourly Time Period		From North (↓) Shopiere Rd					From East (←) Hart Rd					From South (↑) Shopiere Rd					From West (→) 0					Total Hourly	
	Start Time	Right	Thru	Left	U-Tn	Total	Right	Thru	Left	U-Tn	Total	Right	Thru	Left	U-Tn	Total	Right	Thru	Left	U-Tn	Total	Volume	PHF
AM	7:15 AM	0	233	78	0	311	93	0	98	0	191	88	307	0	0	395	0	0	0	0	0	897	0.87
MD	12:00 PM	0	183	42	0	225	37	0	70	0	107	71	166	0	0	237	0	0	0	0	0	569	0.93
PM	3:45 PM	0	316	70	0	386	53	0	139	0	192	130	263	0	0	393	0	0	0	0	0	971	0.92

Intersection Traffic Volume Report

Count Basics			*Page 9 of 11*
Start Date:	Thursday, May 23, 2024	Weekday	Schools in Session
Total Number of Hours Counted: 14		Non-Holiday	No Special Events

15-Minute Heavy Vehicle Data

Heavy Vehicles (Single-Unit Trucks, Buses & Semi-Trucks)

Shopiere Rd and Hart Rd

15-Minute Heavy Vehicle Data

	15-Minute Time Period	From North (↓) Shopiere Rd					From East (←) Hart Rd					From South (↑) Shopiere Rd					From West (→) 0					15-Min	Hourly
	Start Time	Right	Thru	Left	U-Tn	Total	Right	Thru	Left	U-Tn	Total	Right	Thru	Left	U-Tn	Total	Right	Thru	Left	U-Tn	Total	Totals	Sum
AM Peak Period	6:00 AM	0	0	1	0	1	2	0	0	0	2	0	0	0	0	0	0	0	0	0	0	3	27
	6:15 AM	0	0	0	0	0	2	0	0	0	2	0	0	0	0	0	0	0	0	0	0	2	32
	6:30 AM	0	0	3	0	3	2	0	0	0	2	0	0	0	0	0	0	0	0	0	0	5	41
	6:45 AM	0	1	9	0	10	3	0	1	0	4	1	2	0	0	3	0	0	0	0	0	17	46
	7:00 AM	0	1	2	0	3	2	0	0	0	2	2	1	0	0	3	0	0	0	0	0	8	43
	7:15 AM	0	1	3	0	4	6	0	0	0	6	0	1	0	0	1	0	0	0	0	0	11	50
	7:30 AM	0	2	2	0	4	3	0	0	0	3	0	3	0	0	3	0	0	0	0	0	10	56
	7:45 AM	0	0	5	0	5	5	0	2	0	7	0	2	0	0	2	0	0	0	0	0	14	65
	8:00 AM	0	3	4	0	7	8	0	0	0	8	0	0	0	0	0	0	0	0	0	0	15	63
	8:15 AM	0	2	5	0	7	4	0	1	0	5	2	3	0	0	5	0	0	0	0	0	17	64
	8:30 AM	0	5	3	0	8	7	0	3	0	10	1	0	0	0	1	0	0	0	0	0	19	66
	8:45 AM	0	1	3	0	4	6	0	0	0	6	1	1	0	0	2	0	0	0	0	0	12	52
	9:00 AM	0	3	3	0	6	3	0	2	0	5	0	5	0	0	5	0	0	0	0	0	16	52
	9:15 AM	0	6	2	0	8	6	0	1	0	7	2	2	0	0	4	0	0	0	0	0	19	53
	9:30 AM	0	1	0	0	1	4	0	0	0	4	0	0	0	0	0	0	0	0	0	0	5	48
	9:45 AM	0	0	1	0	1	4	0	3	0	7	1	3	0	0	4	0	0	0	0	0	12	54
Midday Peak Period	10:00 AM	0	4	0	0	4	5	0	4	0	9	0	4	0	0	4	0	0	0	0	0	17	56
	10:15 AM	0	2	8	0	10	2	0	0	0	2	0	2	0	0	2	0	0	0	0	0	14	49
	10:30 AM	0	1	4	0	5	3	0	0	0	3	0	3	0	0	3	0	0	0	0	0	11	47
	10:45 AM	0	2	7	0	9	4	0	0	0	4	0	1	0	0	1	0	0	0	0	0	14	44
	11:00 AM	0	2	3	0	5	2	0	1	0	3	1	1	0	0	2	0	0	0	0	0	10	43
	11:15 AM	0	1	1	0	2	8	0	2	0	10	0	0	0	0	0	0	0	0	0	0	12	36
	11:30 AM	0	2	0	0	2	3	0	2	0	5	1	0	0	0	1	0	0	0	0	0	8	32
	11:45 AM	0	2	3	0	5	6	0	1	0	7	0	1	0	0	1	0	0	0	0	0	13	35
	12:00 PM	0	1	0	0	1	2	0	0	0	2	0	0	0	0	0	0	0	0	0	0	3	34
	12:15 PM	0	1	4	0	5	1	0	0	0	1	0	2	0	0	2	0	0	0	0	0	8	44
	12:30 PM	0	2	3	0	5	2	0	0	0	2	1	3	0	0	4	0	0	0	0	0	11	47
	12:45 PM	0	1	5	0	6	2	0	1	0	3	2	1	0	0	3	0	0	0	0	0	12	45
	1:00 PM	0	1	7	0	8	0	0	2	0	2	1	2	0	0	3	0	0	0	0	0	13	41
	1:15 PM	0	0	4	0	4	5	0	1	0	6	0	1	0	0	1	0	0	0	0	0	11	40
	1:30 PM	0	1	5	0	6	2	0	0	0	2	1	0	0	0	1	0	0	0	0	0	9	37
	1:45 PM	0	1	1	0	2	4	0	0	0	4	0	2	0	0	2	0	0	0	0	0	8	35
PM Peak Period	2:00 PM	0	2	5	0	7	2	0	1	0	3	1	1	0	0	2	0	0	0	0	0	12	32
	2:15 PM	0	1	0	0	1	1	0	5	0	6	1	0	0	0	1	0	0	0	0	0	8	21
	2:30 PM	0	0	1	0	1	4	0	1	0	5	0	1	0	0	1	0	0	0	0	0	7	19
	2:45 PM	0	0	2	0	2	1	0	0	0	1	2	0	0	0	2	0	0	0	0	0	5	19
	3:00 PM	0	0	0	0	0	0	0	0	0	0	0	1	0	0	1	0	0	0	0	0	1	18
	3:15 PM	0	1	1	0	2	2	0	0	0	2	0	2	0	0	2	0	0	0	0	0	6	26
	3:30 PM	0	0	2	0	2	0	0	1	0	1	1	3	0	0	4	0	0	0	0	0	7	23
	3:45 PM	0	2	0	0	2	0	0	1	0	1	1	0	0	0	1	0	0	0	0	0	4	20
	4:00 PM	0	1	1	0	2	2	0	2	0	4	1	2	0	0	3	0	0	0	0	0	9	18
	4:15 PM	0	0	1	0	1	1	0	0	0	1	1	0	0	0	1	0	0	0	0	0	3	11
	4:30 PM	0	1	1	0	2	1	0	0	0	1	0	1	0	0	1	0	0	0	0	0	4	11
	4:45 PM	0	0	0	0	0	1	0	1	0	2	0	0	0	0	0	0	0	0	0	0	2	7
	5:00 PM	0	1	0	0	1	0	0	0	0	0	0	1	0	0	1	0	0	0	0	0	2	5
	5:15 PM	0	0	1	0	1	0	0	1	0	1	0	1	0	0	1	0	0	0	0	0	3	6
	5:30 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	4
	5:45 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	6
	6:00 PM	0	2	0	0	2	0	0	0	0	0	0	1	0	0	1	0	0	0	0	0	3	7
	6:15 PM	0	0	0	0	0	0	0	1	0	1	0	0	0	0	0	0	0	0	0	0	1	9
	6:30 PM	0	0	0	0	0	0	0	1	0	1	0	1	0	0	1	0	0	0	0	0	2	11
	6:45 PM	0	0	1	0	1	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	1	12
	7:00 PM	0	1	1	0	2	3	0	0	0	3	0	0	0	0	0	0	0	0	0	0	5	12
	7:15 PM	0	2	0	0	2	0	0	0	0	0	1	0	0	0	1	0	0	0	0	0	3	
	7:30 PM	0	0	1	0	1	0	0	0	0	0	1	1	0	0	2	0	0	0	0	0	3	
	7:45 PM	0	0	0	0	0	0	0	0	0	0	0	1	0	0	1	0	0	0	0	0	1	
	8:00 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
	8:15 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
	8:30 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
	8:45 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
	9:00 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
	9:15 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
	9:30 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
	9:45 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
Totals		0	64	119	0	183	136	0	42	0	178	27	63	0	0	90	0	0	0	0	0	451	

Peak Hour Heavy Vehicle Volume Summary

	Hourly Time Period	From North (↓) Shopiere Rd					From East (←) Hart Rd					From South (↑) Shopiere Rd					From West (→) 0					Total Hourly
	Start Time	Right	Thru	Left	U-Tn	Total	Right	Thru	Left	U-Tn	Total	Right	Thru	Left	U-Tn	Total	Right	Thru	Left	U-Tn	Total	Volume
AM	7:15 AM	0	6	14	0	20	22	0	2	0	24	0	6	0	0	6	0	0	0	0	0	50
MD	12:00 PM	0	5	12	0	17	7	0	1	0	8	3	6	0	0	9	0	0	0	0	0	34
PM	3:45 PM	0	4	3	0	7	4	0	3	0	7	3	3	0	0	6	0	0	0	0	0	20

Intersection Traffic Volume Report

Count Basics	Version 2011.J3		Page 1 of 11
Start Date:	Thursday, May 23, 2024	Weekday	Schools in Session
Total Number of Hours Counted: 14		Non-Holiday	No Special Events

Base Information, Observed (14) Hour and Estimated (24) Hour Volume Summaries

Intersection of: Shopiere Rd and Inman Parkway

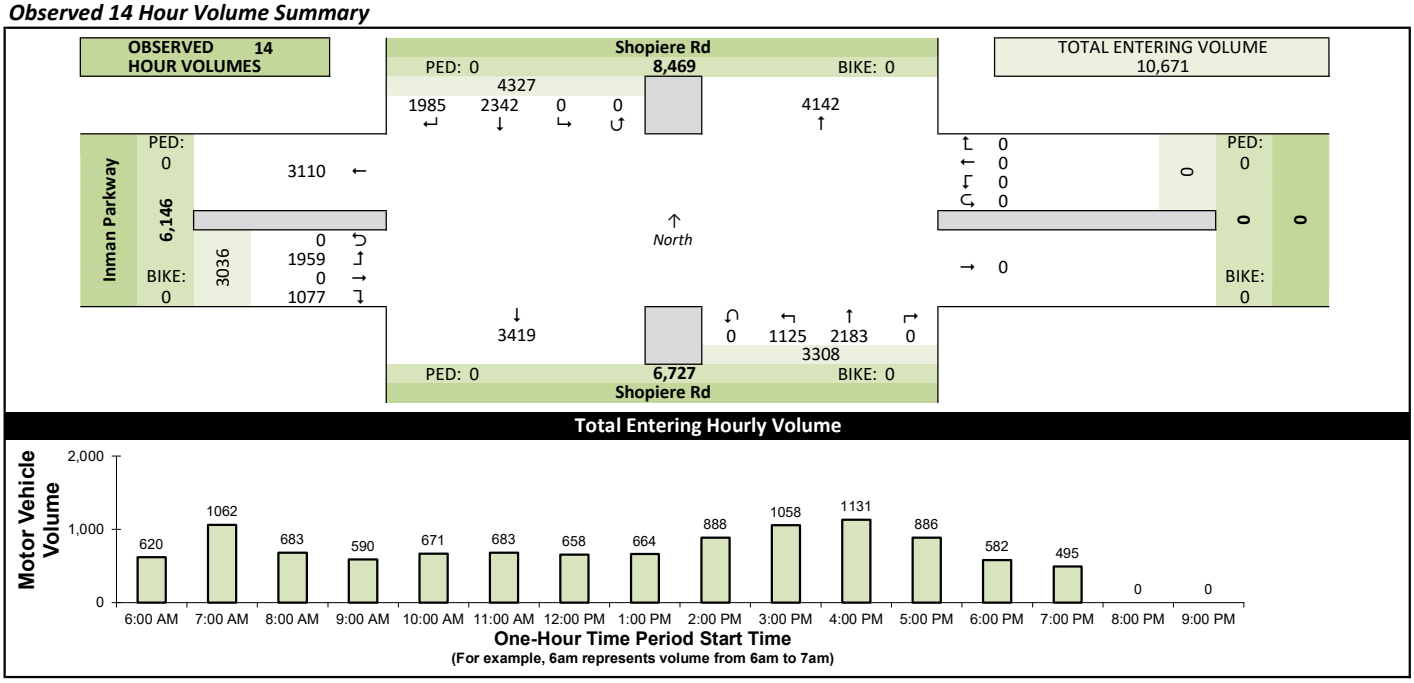
Site Information

Municipality	City of Beloit		
County	Rock	WisDOT Region	SE
Traffic Control	Partial Stop Control		
Roadway Names		North Direction	↑
North Leg	Shopiere Rd		
East Leg			
South Leg	Shopiere Rd		
West Leg	Inman Parkway		
Special Considerations			
Schools	In Session		
Holidays	None		
Special Events	None		
Special Pedestrians Observed			
Pre-school children	None		
Elementry school age children	None		
Visually impaired (white cane/helper dog)	None		
Elderly/disabled (except wheelchairs)	None		
Wheelchairs/electric scooters	None		
Other (describe)	None		

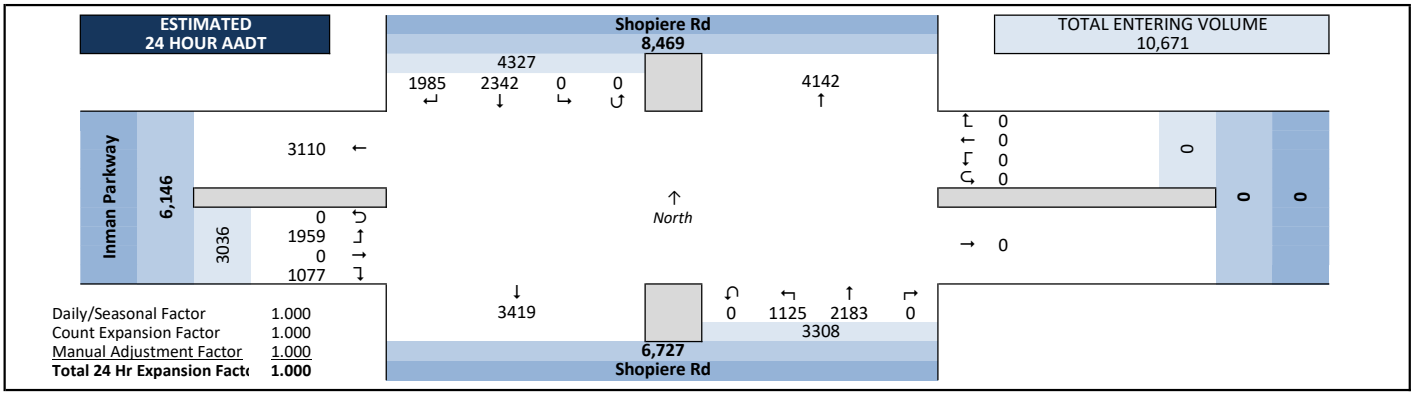
Count Information

Hrs Counted:	6:00 AM - 9:00 AM and 3:00 PM to 6:00 PM				
Count Dates				Weather	
AM Peak Period	Thursday, May 23, 2024			Clear & Dry	
Midday Peak Period	Thursday, May 23, 2024			Clear & Dry	
PM Peak Period	Thursday, May 23, 2024			Clear & Dry	
Calculated Peak Hours					
AM	7:00-8:00am	MD	11:30-12:30am	PM	3:30-4:30pm
Peak Hours Selected for Analysis					
AM	7:15-8:15am	MD	11:30-12:30am	PM	3:45-4:45pm
Daily/Seasonal Adjustment Group	(2) Urban Arterials & Collectors				
Count Expansion Group	(4) Rural Arterials & Collectors				
Daily/Seasonal Adjustment Factor	1.000		Count Expansion Factor	1.000	
Company Name	AECOM			Manual Adj.	1.000
Observers	AM Peak Period	MioVision			
	Midday Peak Period	MioVision			
	PM Peak Period	MioVision			
Comments					

Observed 14 Hour Volume Summary



Estimated 24 Hour AADT



Intersection Traffic Volume Report

Count Basics			*Page 3 of 11*
Start Date:	Thursday, May 23, 2024	Weekday	Schools in Session
Total Number of Hours Counted: 14		Non-Holiday	No Special Events

Peak Hour Volume Summary

Shopiere Rd and Inman Parkway

All Motor Vehicles

Peak Hour Volumes, Truck Percentages, and PHFs

Thursday, May 23, 2024		From North					From East					From South					From West					
	AM Peak Hour	Shopiere Rd					0					Shopiere Rd					Inman Parkway					
	Start Time	Right	Thru	Left	U-Tn	Total	Right	Thru	Left	U-Tn	Total	Right	Thru	Left	U-Tn	Total	Right	Thru	Left	U-Tn	Total	Totals
AM Peak Hour	7:15 AM	44	51	0	0	95	0	0	0	0	0	0	65	54	0	119	31	0	40	0	71	285
	7:30 AM	49	54	0	0	103	0	0	0	0	0	0	76	41	0	117	29	0	47	0	76	296
	7:45 AM	54	48	0	0	102	0	0	0	0	0	0	60	34	0	94	47	0	43	0	90	286
	8:00 AM	25	30	0	0	55	0	0	0	0	0	0	50	21	0	71	26	0	37	0	63	189
	Peak Hour Volume	172	183	0	0	355	0	0	0	0	0	0	251	150	0	401	133	0	167	0	300	1056
	Rounded Hourly Volume	170	185	0	0	355	0	0	0	0	0	0	250	150	0	400	135	0	165	0	300	1055
	% Single Unit Trucks	7.6	1.6	0.0	0.0	4.5	0.0	0.0	0.0	0.0	0.0	0.0	0.8	12.7	0.0	5.2	12.8	0.0	9.0	0.0	10.7	6.5
	% Heavy Trucks	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	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 (Total)	7.6	1.6	0.0	0.0	4.5	0.0	0.0	0.0	0.0	0.0	0.0	0.8	12.7	0.0	5.2	12.8	0.0	9.0	0.0	10.7	6.5
	Peak Hour Factor (PHF)	0.80	0.85	0.00	0.00	0.86	0.00	0.00	0.00	0.00	0.00	0.00	0.83	0.69	0.00	0.84	0.71	0.00	0.89	0.00	0.83	0.89

Thursday, May 23, 2024		From North					From East					From South					From West					
	MD Peak Hour	Shopiere Rd					0					Shopiere Rd					Inman Parkway					
	Start Time	Right	Thru	Left	U-Tn	Total	Right	Thru	Left	U-Tn	Total	Right	Thru	Left	U-Tn	Total	Right	Thru	Left	U-Tn	Total	Totals
Midday (MD) Peak Hour	11:30 AM	30	37	0	0	67	0	0	0	0	0	0	37	15	0	52	9	0	37	0	46	165
	11:45 AM	49	34	0	0	83	0	0	0	0	0	0	30	26	0	56	15	0	35	0	50	189
	12:00 PM	41	36	0	0	77	0	0	0	0	0	0	28	13	0	41	16	0	33	0	49	167
	12:15 PM	30	41	0	0	71	0	0	0	0	0	0	34	16	0	50	18	0	28	0	46	167
	Peak Hour Volume	150	148	0	0	298	0	0	0	0	0	0	129	70	0	199	58	0	133	0	191	688
	Rounded Hourly Volume	150	150	0	0	300	0	0	0	0	0	0	130	70	0	200	60	0	135	0	195	695
	% Single Unit Trucks	20.0	3.4	0.0	0.0	11.7	0.0	0.0	0.0	0.0	0.0	0.0	1.6	21.4	0.0	8.5	13.8	0.0	6.0	0.0	8.4	9.9
	% Heavy Trucks	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	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 (Total)	20.0	3.4	0.0	0.0	11.7	0.0	0.0	0.0	0.0	0.0	0.0	1.6	21.4	0.0	8.5	13.8	0.0	6.0	0.0	8.4	9.9
	Peak Hour Factor (PHF)	0.77	0.90	0.00	0.00	0.90	0.00	0.00	0.00	0.00	0.00	0.00	0.87	0.67	0.00	0.89	0.81	0.00	0.90	0.00	0.95	0.91

Thursday, May 23, 2024		From North					From East					From South					From West					
	PM Peak Hour	Shopiere Rd					0					Shopiere Rd					Inman Parkway					
	Start Time	Right	Thru	Left	U-Tn	Total	Right	Thru	Left	U-Tn	Total	Right	Thru	Left	U-Tn	Total	Right	Thru	Left	U-Tn	Total	Totals
PM Peak Hour	3:45 PM	37	79	0	0	116	0	0	0	0	0	0	53	27	0	80	31	0	61	0	92	288
	4:00 PM	45	74	0	0	119	0	0	0	0	0	0	70	22	0	92	29	0	54	0	83	294
	4:15 PM	52	71	0	0	123	0	0	0	0	0	0	54	22	0	76	27	0	53	0	80	279
	4:30 PM	54	64	0	0	118	0	0	0	0	0	0	44	26	0	70	20	0	59	0	79	267
	Peak Hour Volume	188	288	0	0	476	0	0	0	0	0	0	221	97	0	318	107	0	227	0	334	1128
	Rounded Hourly Volume	190	290	0	0	480	0	0	0	0	0	0	220	95	0	315	105	0	225	0	330	1125
	% Single Unit Trucks	7.4	1.7	0.0	0.0	4.0	0.0	0.0	0.0	0.0	0.0	0.0	0.9	6.2	0.0	2.5	2.8	0.0	3.5	0.0	3.3	3.4
	% Heavy Trucks	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	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 (Total)	7.4	1.7	0.0	0.0	4.0	0.0	0.0	0.0	0.0	0.0	0.0	0.9	6.2	0.0	2.5	2.8	0.0	3.5	0.0	3.3	3.4
	Peak Hour Factor (PHF)	0.87	0.91	0.00	0.00	0.97	0.00	0.00	0.00	0.00	0.00	0.00	0.79	0.90	0.00	0.86	0.86	0.00	0.93	0.00	0.91	0.96

Peak Hour Pedestrian and Bicyclist Volumes

Pedestrians and Bicyclists		Crossing North Approach			Crossing East Approach			Crossing South Approach			Crossing West Approach			Total Ped & Bike Volume
		Shopiere Rd			0			Shopiere Rd			Inman Parkway			
	15-Minute Start Time	Pedestrian	Bicyclist	Total	Pedestrian	Bicyclist	Total	Pedestrian	Bicyclist	Total	Pedestrian	Bicyclist	Total	
AM	7:15 AM	0	0	0	0	0	0	0	0	0	0	0	0	0
	7:30 AM	0	0	0	0	0	0	0	0	0	0	0	0	0
	7:45 AM	0	0	0	0	0	0	0	0	0	0	0	0	0
	8:00 AM	0	0	0	0	0	0	0	0	0	0	0	0	0
	Total	0	0	0	0	0	0	0	0	0	0	0	0	0
MD	11:30 AM	0	0	0	0	0	0	0	0	0	0	0	0	0
	11:45 AM	0	0	0	0	0	0	0	0	0	0	0	0	0
	12:00 PM	0	0	0	0	0	0	0	0	0	0	0	0	0
	12:15 PM	0	0	0	0	0	0	0	0	0	0	0	0	0
	Total	0	0	0	0	0	0	0	0	0	0	0	0	0
PM	3:45 PM	0	0	0	0	0	0	0	0	0	0	0	0	0
	4:00 PM	0	0	0	0	0	0	0	0	0	0	0	0	0
	4:15 PM	0	0	0	0	0	0	0	0	0	0	0	0	0
	4:30 PM	0	0	0	0	0	0	0	0	0	0	0	0	0
	Total	0	0	0	0	0	0	0	0	0	0	0	0	0

Intersection Traffic Volume Report

Count Basics		*Page 5 of 11*
Start Date: Thursday, May 23, 2024	Weekday	Schools in Session
Total Number of Hours Counted: 14	Non-Holiday	No Special Events

15-Minute Motor Vehicle Data

All Motor Vehicles

Shopiere Rd and Inman Parkway

15-Minute Motor Vehicle Data

15-Minute Time Period		From North (↓) Shopiere Rd					From East (←) 0					From South (↑) Shopiere Rd					From West (→) Inman Parkway					15-Min	Hourly	
	Start Time	Right	Thru	Left	U-Tn	Total	Right	Thru	Left	U-Tn	Total	Right	Thru	Left	U-Tn	Total	Right	Thru	Left	U-Tn	Total	Totals	Sum	PHF
AM Peak Period	6:00 AM	20	9	0	0	29	0	0	0	0	0	0	44	14	0	58	6	0	31	0	37	124	620	0.87
	6:15 AM	28	20	0	0	48	0	0	0	0	0	0	41	21	0	62	10	0	37	0	47	157	691	0.89
	6:30 AM	41	22	0	0	63	0	0	0	0	0	0	41	15	0	56	15	0	27	0	42	161	819	0.72
	6:45 AM	40	36	0	0	76	0	0	0	0	0	0	38	21	0	59	17	0	26	0	43	178	954	0.81
	7:00 AM	29	34	0	0	63	0	0	0	0	0	0	50	24	0	74	12	0	46	0	58	195	1062	0.90
	7:15 AM	44	51	0	0	95	0	0	0	0	0	0	65	54	0	119	31	0	40	0	71	285	1056	0.89
	7:30 AM	49	54	0	0	103	0	0	0	0	0	0	76	41	0	117	29	0	47	0	76	296	943	0.80
	7:45 AM	54	48	0	0	102	0	0	0	0	0	0	60	34	0	94	47	0	43	0	90	286	819	0.72
	8:00 AM	25	30	0	0	55	0	0	0	0	0	0	50	21	0	71	26	0	37	0	63	189	683	0.90
	8:15 AM	37	26	0	0	63	0	0	0	0	0	0	34	20	0	54	22	0	33	0	55	172	651	0.95
	8:30 AM	33	32	0	0	65	0	0	0	0	0	0	28	26	0	54	19	0	34	0	53	172	631	0.92
	8:45 AM	32	30	0	0	62	0	0	0	0	0	0	28	21	0	49	9	0	30	0	39	150	592	0.94
	9:00 AM	25	26	0	0	51	0	0	0	0	0	0	32	23	0	55	16	0	35	0	51	157	590	0.94
	9:15 AM	23	19	0	0	42	0	0	0	0	0	0	39	19	0	58	16	0	36	0	52	152	598	0.91
	9:30 AM	26	23	0	0	49	0	0	0	0	0	0	32	14	0	46	15	0	23	0	38	133	612	0.92
	9:45 AM	22	22	0	0	44	0	0	0	0	0	0	38	23	0	61	16	0	27	0	43	148	668	0.88
Midday Peak Period	10:00 AM	33	27	0	0	60	0	0	0	0	0	0	33	18	0	51	18	0	36	0	54	165	671	0.89
	10:15 AM	29	33	0	0	62	0	0	0	0	0	0	29	17	0	46	20	0	38	0	58	166	672	0.89
	10:30 AM	35	28	0	0	63	0	0	0	0	0	0	42	23	0	65	16	0	45	0	61	189	669	0.88
	10:45 AM	27	28	0	0	55	0	0	0	0	0	0	33	15	0	48	17	0	31	0	48	151	645	0.97
	11:00 AM	30	32	0	0	62	0	0	0	0	0	0	25	13	0	38	18	0	48	0	66	166	683	0.90
	11:15 AM	26	38	0	0	64	0	0	0	0	0	0	33	22	0	55	15	0	29	0	44	163	684	0.90
	11:30 AM	30	37	0	0	67	0	0	0	0	0	0	37	15	0	52	9	0	37	0	46	165	688	0.91
	11:45 AM	49	34	0	0	83	0	0	0	0	0	0	30	26	0	56	15	0	35	0	50	189	673	0.89
	12:00 PM	41	36	0	0	77	0	0	0	0	0	0	28	13	0	41	16	0	33	0	49	167	658	0.95
	12:15 PM	30	41	0	0	71	0	0	0	0	0	0	34	16	0	50	18	0	28	0	46	167	661	0.95
	12:30 PM	36	23	0	0	59	0	0	0	0	0	0	41	10	0	51	17	0	23	0	40	150	639	0.92
	12:45 PM	29	39	0	0	68	0	0	0	0	0	0	35	19	0	54	26	0	26	0	52	174	685	0.87
	1:00 PM	31	32	0	0	63	0	0	0	0	0	0	37	17	0	54	17	0	36	0	53	170	664	0.85
	1:15 PM	23	31	0	0	54	0	0	0	0	0	0	43	11	0	54	15	0	22	0	37	145	680	0.87
	1:30 PM	31	32	0	0	63	0	0	0	0	0	0	52	14	0	66	26	0	41	0	67	196	756	0.86
	1:45 PM	35	36	0	0	71	0	0	0	0	0	0	36	17	0	53	6	0	23	0	29	153	793	0.85
PM Peak Period	2:00 PM	40	41	0	0	81	0	0	0	0	0	0	47	17	0	64	17	0	24	0	41	186	888	0.90
	2:15 PM	56	51	0	0	107	0	0	0	0	0	0	39	22	0	61	19	0	34	0	53	221	943	0.95
	2:30 PM	42	63	0	0	105	0	0	0	0	0	0	37	30	0	67	17	0	44	0	61	233	966	0.97
	2:45 PM	49	61	0	0	110	0	0	0	0	0	0	33	27	0	60	35	0	43	0	78	248	1018	0.89
	3:00 PM	42	61	0	0	103	0	0	0	0	0	0	47	21	0	68	27	0	43	0	70	241	1058	0.92
	3:15 PM	51	69	0	0	120	0	0	0	0	0	0	37	23	0	60	19	0	45	0	64	244	1111	0.94
	3:30 PM	43	67	0	0	110	0	0	0	0	0	0	60	20	0	80	41	0	54	0	95	285	1146	0.97
	3:45 PM	37	79	0	0	116	0	0	0	0	0	0	53	27	0	80	31	0	61	0	92	288	1128	0.96
	4:00 PM	45	74	0	0	119	0	0	0	0	0	0	70	22	0	92	29	0	54	0	83	294	1131	0.96
	4:15 PM	52	71	0	0	123	0	0	0	0	0	0	54	22	0	76	27	0	53	0	80	279	1085	0.93
	4:30 PM	54	64	0	0	118	0	0	0	0	0	0	44	26	0	70	20	0	59	0	79	267	1041	0.89
	4:45 PM	56	70	0	0	126	0	0	0	0	0	0	54	32	0	86	28	0	51	0	79	291	991	0.85
	5:00 PM	42	63	0	0	105	0	0	0	0	0	0	50	21	0	71	23	0	49	0	72	248	886	0.89
	5:15 PM	41	69	0	0	110	0	0	0	0	0	0	45	23	0	68	20	0	37	0	57	235	796	0.85
	5:30 PM	52	45	0	0	97	0	0	0	0	0	0	35	19	0	54	19	0	47	0	66	217	685	0.79
	5:45 PM	41	52	0	0	93	0	0	0	0	0	0	31	17	0	48	18	0	27	0	45	186	617	0.83
	6:00 PM	34	47	0	0	81	0	0	0	0	0	0	23	12	0	35	14	0	28	0	42	158	582	0.92
	6:15 PM	28	40	0	0	68	0	0	0	0	0	0	21	9	0	30	9	0	17	0	26	124	566	0.94
	6:30 PM	28	39	0	0	67	0	0	0	0	0	0	29	8	0	37	18	0	27	0	45	149	571	0.95
	6:45 PM	25	50	0	0	75	0	0	0	0	0	0	20	16	0	36	17	0	23	0	40	151	548	0.91
	7:00 PM	30	45	0	0	75	0	0	0	0	0	0	25	11	0	36	17	0	14	0	31	142	495	0.87
	7:15 PM	20	44	0	0	64	0	0	0	0	0	0	15	15	0	30	18	0	17	0	35	129		
	7:30 PM	21	35	0	0	56	0	0	0	0	0	0	29	20	0	49	8	0	13	0	21	126		
	7:45 PM	13	33	0	0	46	0	0	0	0	0	0	21	8	0	29	11	0	12	0	23	98		
	8:00 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
	8:15 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
	8:30 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
	8:45 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
	9:00 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
	9:15 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
	9:30 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
	9:45 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
Totals		1985	2342	0	0	4327	0	0	0	0	0	0	2183	1125	0	3308	1077	0	1959	0	3036	10671		

Peak Hour All Vehicle Volume Summary

Hourly Time Period		From North (↓) Shopiere Rd					From East (←) 0					From South (↑) Shopiere Rd					From West (→) Inman Parkway					Total Hourly	
	Start Time	Right	Thru	Left	U-Tn	Total	Right	Thru	Left	U-Tn	Total	Right	Thru	Left	U-Tn	Total	Right	Thru	Left	U-Tn	Total	Volume	PHF
AM	7:15 AM	172	183	0	0	355	0	0	0	0	0	0	251	150	0	401	133	0	167	0	300	1056	0.89
MD	11:30 AM	150	148	0	0	298	0	0	0	0	0	0	129	70	0	199	58	0	133	0	191	688	0.91
PM	3:45 PM	188	288	0	0	476	0	0	0	0	0	0	221	97	0	318	107	0	227	0	334	1128	0.96

Intersection Traffic Volume Report

Count Basics			*Page 9 of 11*
Start Date:	Thursday, May 23, 2024	Weekday	Schools in Session
Total Number of Hours Counted: 14		Non-Holiday	No Special Events

15-Minute Heavy Vehicle Data

Shopiere Rd and Inman Parkway

15-Minute Heavy Vehicle Data

	15-Minute	From North					From East					From South					From West						
	Time Period	Shopiere Rd					0					Shopiere Rd					Inman Parkway					15-Min	Hourly
	Start Time	Right	Thru	Left	U-Tn	Total	Right	Thru	Left	U-Tn	Total	Right	Thru	Left	U-Tn	Total	Right	Thru	Left	U-Tn	Total	Totals	Sum
AM Peak Period	6:00 AM	5	0	0	0	5	0	0	0	0	0	0	0	1	0	1	1	0	3	0	4	10	55
	6:15 AM	8	0	0	0	8	0	0	0	0	0	0	0	3	0	3	0	0	2	0	2	13	56
	6:30 AM	5	0	0	0	5	0	0	0	0	0	0	1	0	0	1	3	0	2	0	5	11	56
	6:45 AM	2	1	0	0	3	0	0	0	0	0	0	2	5	0	7	9	0	2	0	11	21	58
	7:00 AM	3	1	0	0	4	0	0	0	0	0	0	1	2	0	3	2	0	2	0	4	11	59
	7:15 AM	3	0	0	0	3	0	0	0	0	0	0	0	3	0	3	4	0	3	0	7	13	69
	7:30 AM	0	3	0	0	3	0	0	0	0	0	0	0	4	0	4	2	0	4	0	6	13	76
	7:45 AM	7	0	0	0	7	0	0	0	0	0	0	1	5	0	6	5	0	4	0	9	22	88
	8:00 AM	3	0	0	0	3	0	0	0	0	0	0	1	7	0	8	6	0	4	0	10	21	84
	8:15 AM	5	2	0	0	7	0	0	0	0	0	0	3	3	0	6	5	0	2	0	7	20	89
	8:30 AM	3	4	0	0	7	0	0	0	0	0	0	0	8	0	8	4	0	6	0	10	25	94
	8:45 AM	5	0	0	0	5	0	0	0	0	0	0	0	8	0	8	3	0	2	0	5	18	86
	9:00 AM	9	2	0	0	11	0	0	0	0	0	0	4	4	0	8	3	0	4	0	7	26	80
	9:15 AM	4	3	0	0	7	0	0	0	0	0	0	2	6	0	8	5	0	5	0	10	25	75
	9:30 AM	7	1	0	0	8	0	0	0	0	0	0	1	4	0	5	2	0	2	0	4	17	69
	9:45 AM	2	0	0	0	2	0	0	0	0	0	0	2	5	0	7	0	0	3	0	3	12	78
Midday Peak Period	10:00 AM	6	1	0	0	7	0	0	0	0	0	0	4	5	0	9	2	0	3	0	5	21	91
	10:15 AM	4	2	0	0	6	0	0	0	0	0	0	1	3	0	4	7	0	2	0	9	19	91
	10:30 AM	12	1	0	0	13	0	0	0	0	0	0	2	4	0	6	3	0	4	0	7	26	95
	10:45 AM	6	2	0	0	8	0	0	0	0	0	0	0	5	0	5	7	0	5	0	12	25	86
	11:00 AM	10	1	0	0	11	0	0	0	0	0	0	0	2	0	2	3	0	5	0	8	21	89
	11:15 AM	7	1	0	0	8	0	0	0	0	0	0	0	6	0	6	1	0	8	0	9	23	79
	11:30 AM	7	2	0	0	9	0	0	0	0	0	0	0	5	0	5	0	0	3	0	3	17	68
	11:45 AM	14	2	0	0	16	0	0	0	0	0	0	0	7	0	7	3	0	2	0	5	28	68
	12:00 PM	5	1	0	0	6	0	0	0	0	0	0	0	2	0	2	1	0	2	0	3	11	54
	12:15 PM	4	0	0	0	4	0	0	0	0	0	0	2	1	0	3	4	0	1	0	5	12	57
	12:30 PM	8	2	0	0	10	0	0	0	0	0	0	3	2	0	5	2	0	0	0	2	17	55
	12:45 PM	2	0	0	0	2	0	0	0	0	0	0	1	2	0	3	5	0	4	0	9	14	54
	1:00 PM	4	1	0	0	5	0	0	0	0	0	0	2	1	0	3	6	0	0	0	6	14	60
	1:15 PM	1	0	0	0	1	0	0	0	0	0	0	0	3	0	3	5	0	1	0	6	10	67
	1:30 PM	3	1	0	0	4	0	0	0	0	0	0	0	4	0	4	4	0	4	0	8	16	66
	1:45 PM	5	2	0	0	7	0	0	0	0	0	0	2	5	0	7	1	0	5	0	6	20	63
PM Peak Period	2:00 PM	8	2	0	0	10	0	0	0	0	0	0	0	3	0	3	5	0	3	0	8	21	51
	2:15 PM	5	1	0	0	6	0	0	0	0	0	0	0	1	0	1	0	0	2	0	2	9	38
	2:30 PM	3	1	0	0	4	0	0	0	0	0	0	1	5	0	6	0	0	3	0	3	13	41
	2:45 PM	3	0	0	0	3	0	0	0	0	0	0	0	1	0	1	2	0	2	0	4	8	39
	3:00 PM	4	0	0	0	4	0	0	0	0	0	0	1	0	0	1	0	0	3	0	3	8	43
	3:15 PM	6	1	0	0	7	0	0	0	0	0	0	0	4	0	4	1	0	0	0	1	12	43
	3:30 PM	6	0	0	0	6	0	0	0	0	0	0	1	0	0	1	1	0	3	0	4	11	42
	3:45 PM	4	2	0	0	6	0	0	0	0	0	0	0	0	0	0	1	0	5	0	6	12	38
	4:00 PM	1	2	0	0	3	0	0	0	0	0	0	0	4	0	4	0	0	1	0	1	8	37
	4:15 PM	6	0	0	0	6	0	0	0	0	0	0	1	1	0	2	2	0	1	0	3	11	33
	4:30 PM	3	1	0	0	4	0	0	0	0	0	0	1	1	0	2	0	0	1	0	1	7	27
	4:45 PM	4	0	0	0	4	0	0	0	0	0	0	0	1	0	1	0	0	6	0	6	11	22
	5:00 PM	1	1	0	0	2	0	0	0	0	0	0	1	0	0	1	0	0	1	0	1	4	13
	5:15 PM	2	0	0	0	2	0	0	0	0	0	0	0	0	0	0	1	0	2	0	3	5	14
	5:30 PM	2	0	0	0	2	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	2	11
	5:45 PM	2	0	0	0	2	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	2	10
	6:00 PM	1	2	0	0	3	0	0	0	0	0	0	1	0	0	1	0	0	1	0	1	5	9
	6:15 PM	2	0	0	0	2	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	2	11
	6:30 PM	0	0	0	0	0	0	0	0	0	0	0	1	0	0	1	0	0	0	0	0	1	12
	6:45 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	1	0	0	0	1	1	15
	7:00 PM	1	1	0	0	2	0	0	0	0	0	0	0	3	0	3	1	0	1	0	2	7	15
	7:15 PM	0	1	0	0	1	0	0	0	0	0	0	0	0	0	0	2	0	0	0	2	3	
	7:30 PM	1	0	0	0	1	0	0	0	0	0	0	1	0	0	1	0	0	2	0	2	4	
	7:45 PM	0	0	0	0	0	0	0	0	0	0	0	1	0	0	1	0	0	0	0	0	1	
	8:00 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
	8:15 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
	8:30 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
	8:45 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
	9:00 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
	9:15 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
	9:30 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
	9:45 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
Totals		234	51	0	0	285	0	0	0	0	0	0	45	149	0	194	125	0	136	0	261	740	

Peak Hour Heavy Vehicle Volume Summary

	Hourly	From North					From East					From South					From West					Total
	Time Period	Shopiere Rd					0					Shopiere Rd					Inman Parkway					Hourly
	Start Time	Right	Thru	Left	U-Tn	Total	Right	Thru	Left	U-Tn	Total	Right	Thru	Left	U-Tn	Total	Right	Thru	Left	U-Tn	Total	Volume
AM	7:15 AM	13	3	0	0	16	0	0	0	0	0	0	2	19	0	21	17	0	15	0	32	69
MD	11:30 AM	30	5	0	0	35	0	0	0	0	0	0	2	15	0	17	8	0	8	0	16	68
PM	3:45 PM	14	5	0	0	19	0	0	0	0	0	0	2	6	0	8	3	0	8	0	11	38

Intersection Traffic Volume Report

Count Basics	Version 2011.J3		Page 1 of 11
Start Date:	Tuesday, May 21, 2024	Weekday	Schools in Session
Total Number of Hours Counted: 6		Non-Holiday	No Special Events

Base Information, Observed (6) Hour and Estimated (24) Hour Volume Summaries

Intersection of: I-3990 SB Off-Ramp and Shopiere Rd

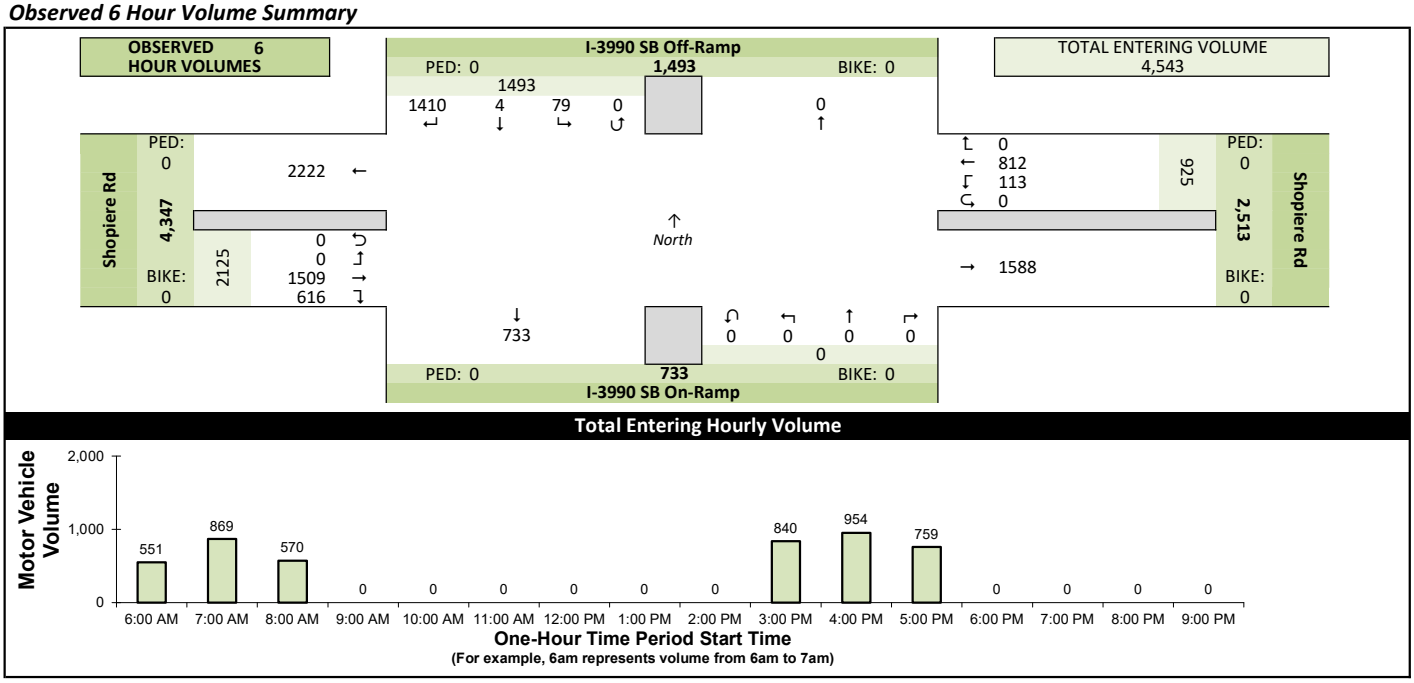
Site Information

Municipality	City of Beloit		
County	Rock	WisDOT Region	SE
Traffic Control	Partial Stop Control		
Roadway Names		North Direction	↑
North Leg	I-3990 SB Off-Ramp		
East Leg	Shopiere Rd		
South Leg	I-3990 SB On-Ramp		
West Leg	Shopiere Rd		
Special Considerations			
Schools	In Session		
Holidays	None		
Special Events	None		
Special Pedestrians Observed			
Pre-school children	None		
Elementry school age children	None		
Visually impaired (white cane/helper dog)	None		
Elderly/disabled (except wheelchairs)	None		
Wheelchairs/electric scooters	None		
Other (describe)	None	None	

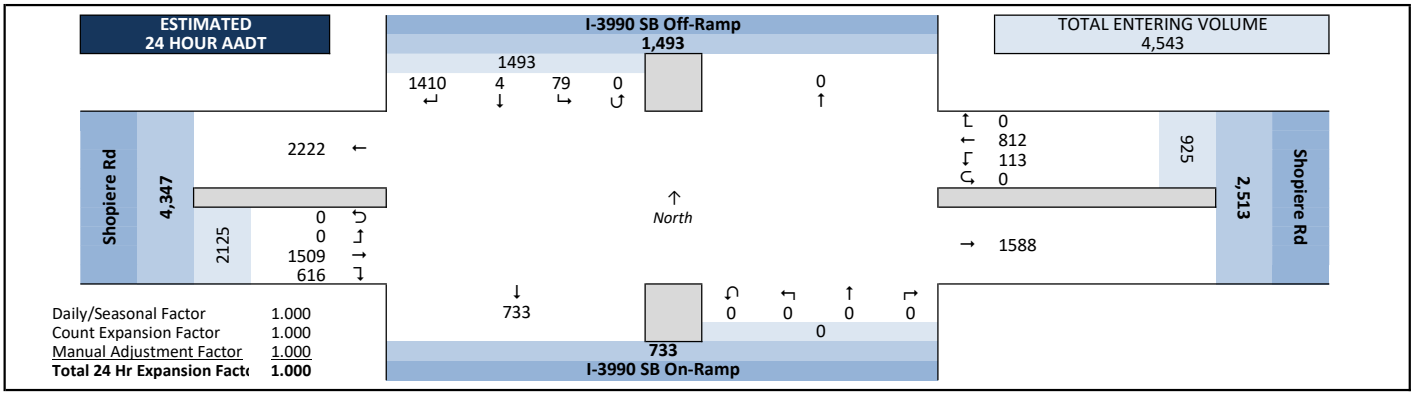
Count Information

Hrs Counted:	6:00 AM - 9:00 AM and 3:00 PM to 6:00 PM				
Count Dates				Weather	
AM Peak Period	Tuesday, May 21, 2024			Clear & Dry	
Midday Peak Period	Tuesday, May 21, 2024			Clear & Dry	
PM Peak Period	Tuesday, May 21, 2024			Clear & Dry	
Calculated Peak Hours					
AM	7:00-8:00am	MD		PM	4:15-5:15pm
Peak Hours Selected for Analysis					
AM	7:15-8:15am	MD		PM	3:45-4:45pm
Daily/Seasonal Adjustment Group	(2) Urban Arterials & Collectors				
Count Expansion Group	(4) Rural Arterials & Collectors				
Daily/Seasonal Adjustment Factor	1.000	Count Expansion Factor	1.000		
Company Name	AECOM			Manual Adj.	1.000
Observers	AM Peak Period	MioVision			
	Midday Peak Period	MioVision			
	PM Peak Period	MioVision			
Comments					

Observed 6 Hour Volume Summary



Estimated 24 Hour AADT



Intersection Traffic Volume Report

Count Basics		*Page 3 of 11*
Start Date: Tuesday, May 21, 2024	Weekday	Schools in Session
Total Number of Hours Counted: 6	Non-Holiday	No Special Events

Peak Hour Volume Summary

I-3990 SB Off-Ramp and Shopiere Rd

All Motor Vehicles

Peak Hour Volumes, Truck Percentages, and PHFs

Tuesday, May 21, 2024		From North					From East					From South					From West					
	AM Peak Hour	I-3990 SB Off-Ramp					Shopiere Rd					I-3990 SB On-Ramp					Shopiere Rd					
	Start Time	Right	Thru	Left	U-Tn	Total	Right	Thru	Left	U-Tn	Total	Right	Thru	Left	U-Tn	Total	Right	Thru	Left	U-Tn	Total	Totals
AM Peak Hour	7:15 AM	68	1	4	0	73	0	44	7	0	51	0	0	0	0	0	33	94	0	0	127	251
	7:30 AM	62	1	2	0	65	0	54	5	0	59	0	0	0	0	0	27	94	0	0	121	245
	7:45 AM	62	0	3	0	65	0	45	1	0	46	0	0	0	0	0	28	75	0	0	103	214
	8:00 AM	33	0	1	0	34	0	26	6	0	32	0	0	0	0	0	29	55	0	0	84	150
	Peak Hour Volume	225	2	10	0	237	0	169	19	0	188	0	0	0	0	0	117	318	0	0	435	860
	Rounded Hourly Volume	225	0	10	0	235	0	170	20	0	190	0	0	0	0	0	115	320	0	0	435	860
	% Single Unit Trucks	3.1	50.0	0.0	0.0	3.4	0.0	14.2	21.1	0.0	14.9	0.0	0.0	0.0	0.0	0.0	11.1	0.6	0.0	0.0	3.4	5.9
	% Heavy Trucks	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	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 (Total)	3.1	50.0	0.0	0.0	3.4	0.0	14.2	21.1	0.0	14.9	0.0	0.0	0.0	0.0	0.0	11.1	0.6	0.0	0.0	3.4	5.9
	Peak Hour Factor (PHF)	0.83	0.50	0.62	0.00	0.81	0.00	0.78	0.68	0.00	0.80	0.00	0.00	0.00	0.00	0.00	0.89	0.85	0.00	0.00	0.86	0.86

N/A		From North					From East					From South					From West					
	MD Peak Hour	I-3990 SB Off-Ramp					Shopiere Rd					I-3990 SB On-Ramp					Shopiere Rd					
	Start Time	Right	Thru	Left	U-Tn	Total	Right	Thru	Left	U-Tn	Total	Right	Thru	Left	U-Tn	Total	Right	Thru	Left	U-Tn	Total	Totals
Midday (MD) Peak Hour	12:00 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
	12:15 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
	12:30 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
	12:45 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
	Peak Hour Volume	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
	Rounded Hourly Volume	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
	% Single Unit Trucks	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
	% Heavy Trucks	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	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 (Total)	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
	Peak Hour Factor (PHF)	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00

Tuesday, May 21, 2024		From North					From East					From South					From West					
	PM Peak Hour	I-3990 SB Off-Ramp					Shopiere Rd					I-3990 SB On-Ramp					Shopiere Rd					
	Start Time	Right	Thru	Left	U-Tn	Total	Right	Thru	Left	U-Tn	Total	Right	Thru	Left	U-Tn	Total	Right	Thru	Left	U-Tn	Total	Totals
PM Peak Hour	3:45 PM	83	0	7	0	90	0	39	8	0	47	0	0	0	0	0	27	80	0	0	107	244
	4:00 PM	79	0	6	0	85	0	35	7	0	42	0	0	0	0	0	19	65	0	0	84	211
	4:15 PM	100	1	5	0	106	0	41	5	0	46	0	0	0	0	0	22	91	0	0	113	265
	4:30 PM	75	0	6	0	81	0	38	5	0	43	0	0	0	0	0	30	85	0	0	115	239
	Peak Hour Volume	337	1	24	0	362	0	153	25	0	178	0	0	0	0	0	98	321	0	0	419	959
	Rounded Hourly Volume	335	0	25	0	360	0	155	25	0	180	0	0	0	0	0	100	320	0	0	420	960
	% Single Unit Trucks	0.3	0.0	0.0	0.0	0.3	0.0	6.5	0.0	0.0	5.6	0.0	0.0	0.0	0.0	0.0	8.2	1.6	0.0	0.0	3.1	2.5
	% Heavy Trucks	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	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 (Total)	0.3	0.0	0.0	0.0	0.3	0.0	6.5	0.0	0.0	5.6	0.0	0.0	0.0	0.0	0.0	8.2	1.6	0.0	0.0	3.1	2.5
	Peak Hour Factor (PHF)	0.84	0.25	0.86	0.00	0.85	0.00	0.93	0.78	0.00	0.95	0.00	0.00	0.00	0.00	0.00	0.82	0.88	0.00	0.00	0.91	0.90

Peak Hour Pedestrian and Bicyclist Volumes

Pedestrians and Bicyclists		Crossing North Approach			Crossing East Approach			Crossing South Approach			Crossing West Approach			Total Ped & Bike Volume
		I-3990 SB Off-Ramp			Shopiere Rd			I-3990 SB On-Ramp			Shopiere Rd			
	15-Minute Start Time	Pedestrian	Bicyclist	Total	Pedestrian	Bicyclist	Total	Pedestrian	Bicyclist	Total	Pedestrian	Bicyclist	Total	
AM	7:15 AM	0	0	0	0	0	0	0	0	0	0	0	0	0
	7:30 AM	0	0	0	0	0	0	0	0	0	0	0	0	0
	7:45 AM	0	0	0	0	0	0	0	0	0	0	0	0	0
	8:00 AM	0	0	0	0	0	0	0	0	0	0	0	0	0
	Total	0	0	0	0	0	0	0	0	0	0	0	0	0
MD	12:00 PM	0	0	0	0	0	0	0	0	0	0	0	0	0
	12:15 PM	0	0	0	0	0	0	0	0	0	0	0	0	0
	12:30 PM	0	0	0	0	0	0	0	0	0	0	0	0	0
	12:45 PM	0	0	0	0	0	0	0	0	0	0	0	0	0
	Total	0	0	0	0	0	0	0	0	0	0	0	0	0
PM	3:45 PM	0	0	0	0	0	0	0	0	0	0	0	0	0
	4:00 PM	0	0	0	0	0	0	0	0	0	0	0	0	0
	4:15 PM	0	0	0	0	0	0	0	0	0	0	0	0	0
	4:30 PM	0	0	0	0	0	0	0	0	0	0	0	0	0
	Total	0	0	0	0	0	0	0	0	0	0	0	0	0

Intersection Traffic Volume Report

Count Basics		*Page 5 of 11*
Start Date: Tuesday, May 21, 2024	Weekday	Schools in Session
Total Number of Hours Counted: 6	Non-Holiday	No Special Events

15-Minute Motor Vehicle Data

All Motor Vehicles

I-3990 SB Off-Ramp and Shopiere Rd

15-Minute Motor Vehicle Data

15-Minute Time Period		From North (↓) I-3990 SB Off-Ramp					From East (←) Shopiere Rd					From South (↑) I-3990 SB On-Ramp					From West (→) Shopiere Rd					15-Min	Hourly	
	Start Time	Right	Thru	Left	U-Tn	Total	Right	Thru	Left	U-Tn	Total	Right	Thru	Left	U-Tn	Total	Right	Thru	Left	U-Tn	Total	Totals	Sum	PHF
AM Peak Period	6:00 AM	22	0	0	0	22	0	21	2	0	23	0	0	0	0	0	20	53	0	0	73	118	551	0.89
	6:15 AM	38	0	2	0	40	0	17	3	0	20	0	0	0	0	0	27	50	0	0	77	137	592	0.93
	6:30 AM	29	0	0	0	29	0	37	6	0	43	0	0	0	0	0	15	54	0	0	69	141	706	0.70
	6:45 AM	40	0	0	0	40	0	26	7	0	33	0	0	0	0	0	23	59	0	0	82	155	810	0.81
	7:00 AM	43	0	1	0	44	0	31	5	0	36	0	0	0	0	0	26	53	0	0	79	159	869	0.87
	7:15 AM	68	1	4	0	73	0	44	7	0	51	0	0	0	0	0	33	94	0	0	127	251	860	0.86
	7:30 AM	62	1	2	0	65	0	54	5	0	59	0	0	0	0	0	27	94	0	0	121	245	738	0.75
	7:45 AM	62	0	3	0	65	0	45	1	0	46	0	0	0	0	0	28	75	0	0	103	214	656	0.77
	8:00 AM	33	0	1	0	34	0	26	6	0	32	0	0	0	0	0	29	55	0	0	84	150	570	0.87
	8:15 AM	31	0	1	0	32	0	28	1	0	29	0	0	0	0	0	22	46	0	0	68	129		
	8:30 AM	45	1	2	0	48	0	28	6	0	34	0	0	0	0	0	22	59	0	0	81	163		
	8:45 AM	30	0	0	0	30	0	24	6	0	30	0	0	0	0	0	28	40	0	0	68	128		
	9:00 AM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
	9:15 AM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
	9:30 AM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
	9:45 AM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
Midday Peak Period	10:00 AM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
	10:15 AM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
	10:30 AM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
	10:45 AM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
	11:00 AM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
	11:15 AM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
	11:30 AM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
	11:45 AM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
	12:00 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
	12:15 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
	12:30 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
	12:45 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
	1:00 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
	1:15 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
	1:30 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
	1:45 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
PM Peak Period	2:00 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
	2:15 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
	2:30 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
	2:45 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
	3:00 PM	63	0	3	0	66	0	34	4	0	38	0	0	0	0	0	28	72	0	0	100	204	840	0.86
	3:15 PM	68	0	4	0	72	0	25	0	0	25	0	0	0	0	0	21	62	0	0	83	180	847	0.87
	3:30 PM	68	0	9	0	77	0	35	5	0	40	0	0	0	0	0	25	70	0	0	95	212	932	0.88
	3:45 PM	83	0	7	0	90	0	39	8	0	47	0	0	0	0	0	27	80	0	0	107	244	959	0.90
	4:00 PM	79	0	6	0	85	0	35	7	0	42	0	0	0	0	0	19	65	0	0	84	211	954	0.90
	4:15 PM	100	1	5	0	106	0	41	5	0	46	0	0	0	0	0	22	91	0	0	113	265	987	0.93
	4:30 PM	75	0	6	0	81	0	38	5	0	43	0	0	0	0	0	30	85	0	0	115	239	933	0.96
	4:45 PM	76	0	10	0	86	0	52	7	0	59	0	0	0	0	0	25	69	0	0	94	239	876	0.90
	5:00 PM	85	0	4	0	89	0	51	7	0	58	0	0	0	0	0	30	67	0	0	97	244	759	0.78
	5:15 PM	94	0	6	0	100	0	26	4	0	30	0	0	0	0	0	36	45	0	0	81	211		
	5:30 PM	68	0	1	0	69	0	34	3	0	37	0	0	0	0	0	39	37	0	0	76	182		
	5:45 PM	48	0	2	0	50	0	21	3	0	24	0	0	0	0	0	14	34	0	0	48	122		
	6:00 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
	6:15 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
	6:30 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
	6:45 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
	7:00 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
	7:15 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
	7:30 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
	7:45 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
	8:00 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
	8:15 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
	8:30 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
	8:45 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
	9:00 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
	9:15 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
	9:30 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
	9:45 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
Totals		1410	4	79	0	1493	0	812	113	0	925	0	0	0	0	0	616	1509	0	0	2125	4543		

Peak Hour All Vehicle Volume Summary

Hourly Time Period		From North (↓) I-3990 SB Off-Ramp					From East (←) Shopiere Rd					From South (↑) I-3990 SB On-Ramp					From West (→) Shopiere Rd					Total Hourly	
	Start Time	Right	Thru	Left	U-Tn	Total	Right	Thru	Left	U-Tn	Total	Right	Thru	Left	U-Tn	Total	Right	Thru	Left	U-Tn	Total	Volume	PHF
AM	7:15 AM	225	2	10	0	237	0	169	19	0	188	0	0	0	0	0	117	318	0	0	435	860	0.86
MD	12:00 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
PM	3:45 PM	337	1	24	0	362	0	153	25	0	178	0	0	0	0	0	98	321	0	0	419	959	0.90

Intersection Traffic Volume Report

Count Basics			*Page 9 of 11*
Start Date:	Tuesday, May 21, 2024	Weekday	Schools in Session
Total Number of Hours Counted: 6		Non-Holiday	No Special Events

15-Minute Heavy Vehicle Data

Heavy Vehicles (Single-Unit Trucks, Buses & Semi-Trucks)

I-3990 SB Off-Ramp and Shopiere Rd

15-Minute Heavy Vehicle Data

	15-Minute Time Period	From North (↓) I-3990 SB Off-Ramp					From East (←) Shopiere Rd					From South (↑) I-3990 SB On-Ramp					From West (→) Shopiere Rd					15-Min	Hourly
	Start Time	Right	Thru	Left	U-Tn	Total	Right	Thru	Left	U-Tn	Total	Right	Thru	Left	U-Tn	Total	Right	Thru	Left	U-Tn	Total	Totals	Sum
AM Peak Period	6:00 AM	0	0	0	0	0	0	1	2	0	3	0	0	0	0	0	6	1	0	0	7	10	33
	6:15 AM	2	0	0	0	2	0	0	0	0	0	0	0	0	0	0	6	0	0	0	6	8	31
	6:30 AM	0	0	0	0	0	0	4	1	0	5	0	0	0	0	0	3	0	0	0	3	8	42
	6:45 AM	2	0	0	0	2	0	3	0	0	3	0	0	0	0	0	2	0	0	0	2	7	46
	7:00 AM	1	0	0	0	1	0	5	0	0	5	0	0	0	0	0	2	0	0	0	2	8	49
	7:15 AM	3	1	0	0	4	0	6	3	0	9	0	0	0	0	0	5	1	0	0	6	19	51
	7:30 AM	3	0	0	0	3	0	7	1	0	8	0	0	0	0	0	1	0	0	0	1	12	46
	7:45 AM	0	0	0	0	0	0	7	0	0	7	0	0	0	0	0	3	0	0	0	3	10	57
	8:00 AM	1	0	0	0	1	0	4	0	0	4	0	0	0	0	0	4	1	0	0	5	10	57
	8:15 AM	0	0	0	0	0	0	9	1	0	10	0	0	0	0	0	2	2	0	0	4	14	
	8:30 AM	8	1	0	0	9	0	8	1	0	9	0	0	0	0	0	4	1	0	0	5	23	
	8:45 AM	1	0	0	0	1	0	3	0	0	3	0	0	0	0	0	6	0	0	0	6	10	
	9:00 AM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
	9:15 AM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
	9:30 AM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
	9:45 AM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
Midday Peak Period	10:00 AM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
	10:15 AM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
	10:30 AM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
	10:45 AM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
	11:00 AM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
	11:15 AM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
	11:30 AM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
	11:45 AM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
	12:00 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
	12:15 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
	12:30 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
	12:45 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
	1:00 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
	1:15 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
	1:30 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
	1:45 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
PM Peak Period	2:00 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
	2:15 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
	2:30 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
	2:45 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
	3:00 PM	4	0	0	0	4	0	3	1	0	4	0	0	0	0	0	0	1	0	0	1	9	41
	3:15 PM	0	0	0	0	0	0	5	0	0	5	0	0	0	0	0	3	0	0	0	3	8	33
	3:30 PM	2	0	0	0	2	0	7	1	0	8	0	0	0	0	0	0	1	0	0	1	11	31
	3:45 PM	0	0	0	0	0	0	7	0	0	7	0	0	0	0	0	5	1	0	0	6	13	24
	4:00 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	1	0	0	1	1	19
	4:15 PM	1	0	0	0	1	0	1	0	0	1	0	0	0	0	0	1	3	0	0	4	6	21
	4:30 PM	0	0	0	0	0	0	2	0	0	2	0	0	0	0	0	2	0	0	0	2	4	16
	4:45 PM	0	0	0	0	0	0	4	0	0	4	0	0	0	0	0	2	2	0	0	4	8	16
	5:00 PM	0	0	0	0	0	0	2	0	0	2	0	0	0	0	0	1	0	0	0	1	3	13
	5:15 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	1	0	0	1	1	
	5:30 PM	1	0	0	0	1	0	1	0	0	1	0	0	0	0	0	2	0	0	0	2	4	
	5:45 PM	0	0	0	0	0	0	1	0	0	1	0	0	0	0	0	3	1	0	0	4	5	
	6:00 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
	6:15 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
	6:30 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
	6:45 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
	7:00 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
	7:15 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
	7:30 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
	7:45 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
	8:00 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
	8:15 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
	8:30 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
	8:45 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
	9:00 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
	9:15 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
	9:30 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
	9:45 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
Totals		29	2	0	0	31	0	90	11	0	101	0	0	0	0	0	63	17	0	0	80	212	

Peak Hour Heavy Vehicle Volume Summary

	Hourly Time Period	From North (↓) I-3990 SB Off-Ramp					From East (←) Shopiere Rd					From South (↑) I-3990 SB On-Ramp					From West (→) Shopiere Rd					Total Hourly
	Start Time	Right	Thru	Left	U-Tn	Total	Right	Thru	Left	U-Tn	Total	Right	Thru	Left	U-Tn	Total	Right	Thru	Left	U-Tn	Total	Volume
AM	7:15 AM	7	1	0	0	8	0	24	4	0	28	0	0	0	0	0	13	2	0	0	15	51
MD	12:00 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
PM	3:45 PM	1	0	0	0	1	0	10	0	0	10	0	0	0	0	0	8	5	0	0	13	24

Intersection Traffic Volume Report

Count Basics	Version 2011.J3		Page 1 of 11
Start Date:	Tuesday, May 21, 2024	Weekday	Schools in Session
Total Number of Hours Counted: 6		Non-Holiday	No Special Events

Base Information, Observed (6) Hour and Estimated (24) Hour Volume Summaries

Intersection of: I-3990 NB On-Ramp and Shopiere Rd

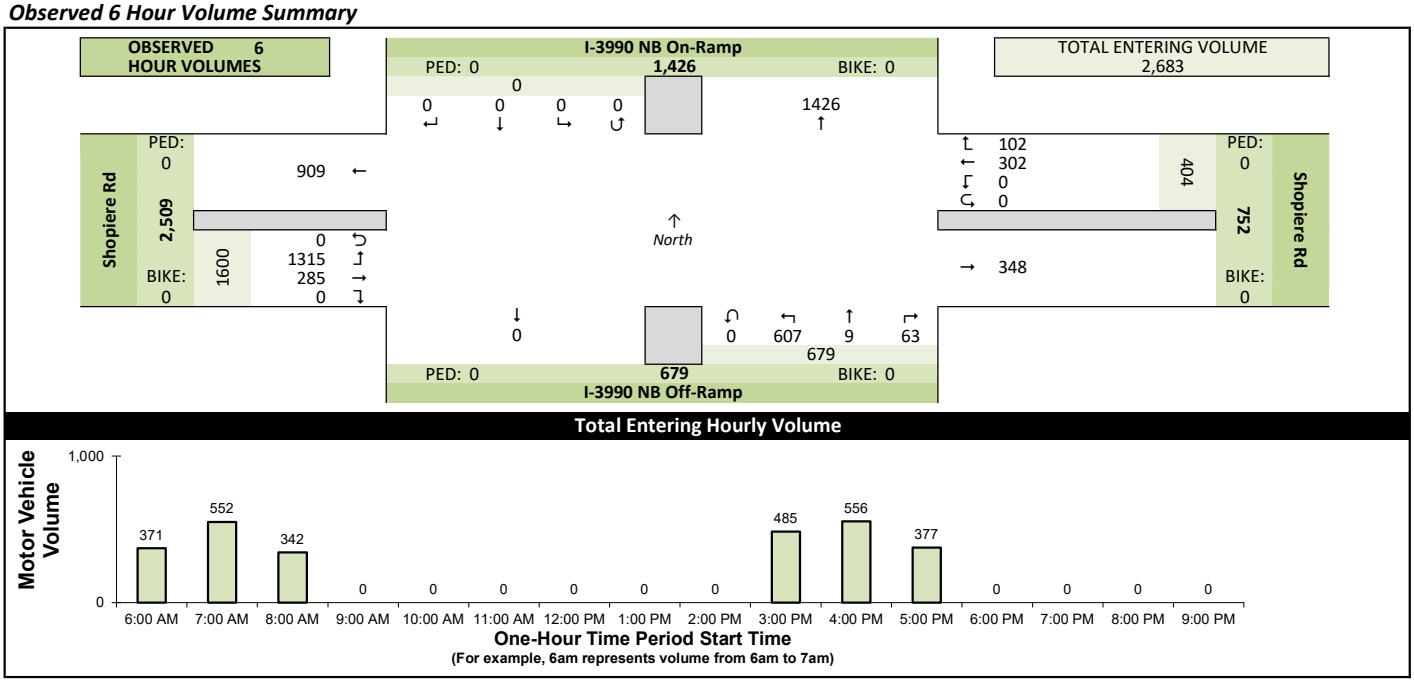
Site Information

Municipality	City of Beloit		
County	Rock	WisDOT Region	SE
Traffic Control	Traffic Signal		
Roadway Names		North Direction	↑
North Leg	I-3990 NB On-Ramp		
East Leg	Shopiere Rd		
South Leg	I-3990 NB Off-Ramp		
West Leg	Shopiere Rd		
Special Considerations			
Schools	In Session		
Holidays	None		
Special Events	None		
Special Pedestrians Observed			
Pre-school children	None		
Elementry school age children	None		
Visually impaired (white cane/helper dog)	None		
Elderly/disabled (except wheelchairs)	None		
Wheelchairs/electric scooters	None		
Other (describe)	None	None	

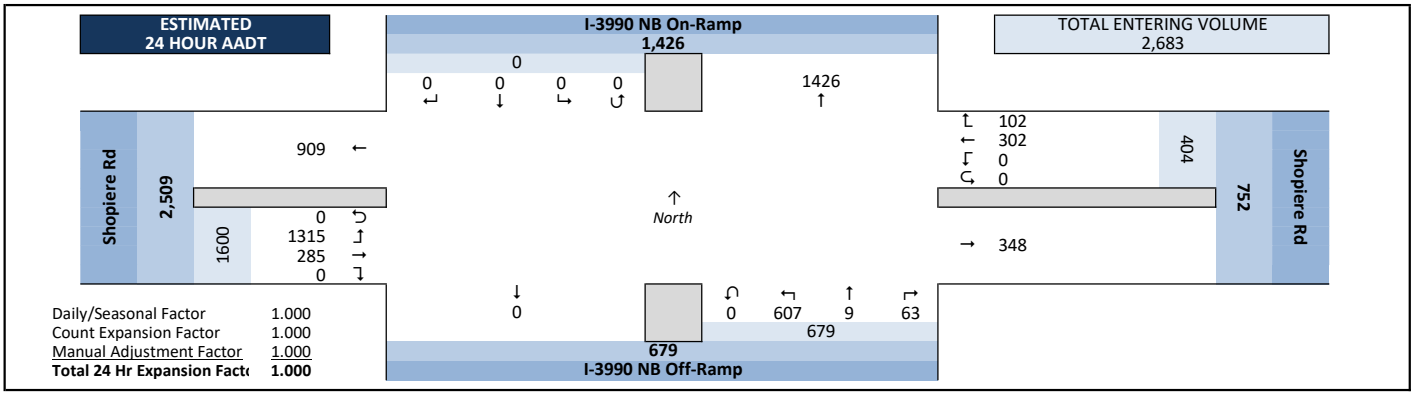
Count Information

Hrs Counted:	6:00 AM - 9:00 AM and 3:00 PM to 6:00 PM				
Count Dates				Weather	
AM Peak Period	Tuesday, May 21, 2024			Clear & Dry	
Midday Peak Period	Tuesday, May 21, 2024			Clear & Dry	
PM Peak Period	Tuesday, May 21, 2024			Clear & Dry	
Calculated Peak Hours					
AM	7:00-8:00am	MD		PM	4:15-5:15pm
Peak Hours Selected for Analysis					
AM	7:15-8:15am	MD		PM	3:45-4:45pm
Daily/Seasonal Adjustment Group	(2) Urban Arterials & Collectors				
Count Expansion Group	(4) Rural Arterials & Collectors				
Daily/Seasonal Adjustment Factor	1.000	Count Expansion Factor	1.000		
Company Name	AECOM			Manual Adj.	1.000
Observers	AM Peak Period	MioVision			
	Midday Peak Period	MioVision			
	PM Peak Period	MioVision			
Comments					

Observed 6 Hour Volume Summary



Estimated 24 Hour AADT



Intersection Traffic Volume Report

Count Basics		*Page 3 of 11*
Start Date: Tuesday, May 21, 2024	Weekday	Schools in Session
Total Number of Hours Counted: 6	Non-Holiday	No Special Events

Peak Hour Volume Summary

I-3990 NB On-Ramp and Shopiere Rd

All Motor Vehicles

Peak Hour Volumes, Truck Percentages, and PHFs

Tuesday, May 21, 2024		From North					From East					From South					From West					
	AM Peak Hour	I-3990 NB On-Ramp					Shopiere Rd					I-3990 NB Off-Ramp					Shopiere Rd					
	Start Time	Right	Thru	Left	U-Tn	Total	Right	Thru	Left	U-Tn	Total	Right	Thru	Left	U-Tn	Total	Right	Thru	Left	U-Tn	Total	Totals
AM Peak Hour	7:15 AM	0	0	0	0	0	12	18	0	0	30	3	1	29	0	33	0	9	88	0	97	160
	7:30 AM	0	0	0	0	0	5	16	0	0	21	0	0	41	0	41	0	3	98	0	101	163
	7:45 AM	0	0	0	0	0	6	10	0	0	16	2	0	37	0	39	0	9	73	0	82	137
	8:00 AM	0	0	0	0	0	4	8	0	0	12	1	0	22	0	23	0	1	54	0	55	90
	Peak Hour Volume	0	0	0	0	0	27	52	0	0	79	6	1	129	0	136	0	22	313	0	335	550
	Rounded Hourly Volume	0	0	0	0	0	25	50	0	0	75	5	0	130	0	135	0	20	315	0	335	545
	% Single Unit Trucks	0.0	0.0	0.0	0.0	0.0	3.7	1.9	0.0	0.0	2.5	0.0	100.0	20.9	0.0	20.6	0.0	0.0	0.3	0.0	0.3	5.6
	% Heavy Trucks	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	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 (Total)	0.0	0.0	0.0	0.0	0.0	3.7	1.9	0.0	0.0	2.5	0.0	100.0	20.9	0.0	20.6	0.0	0.0	0.3	0.0	0.3	5.6
	Peak Hour Factor (PHF)	0.00	0.00	0.00	0.00	0.00	0.56	0.72	0.00	0.00	0.66	0.50	0.25	0.79	0.00	0.83	0.00	0.61	0.80	0.00	0.83	0.84

N/A		From North					From East					From South					From West					
	MD Peak Hour	I-3990 NB On-Ramp					Shopiere Rd					I-3990 NB Off-Ramp					Shopiere Rd					
	Start Time	Right	Thru	Left	U-Tn	Total	Right	Thru	Left	U-Tn	Total	Right	Thru	Left	U-Tn	Total	Right	Thru	Left	U-Tn	Total	Totals
Midday (MD) Peak Hour	12:00 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
	12:15 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
	12:30 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
	12:45 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
	Peak Hour Volume	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
	Rounded Hourly Volume	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
	% Single Unit Trucks	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
	% Heavy Trucks	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	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 (Total)	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
	Peak Hour Factor (PHF)	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00

Tuesday, May 21, 2024		From North					From East					From South					From West					
	PM Peak Hour	I-3990 NB On-Ramp					Shopiere Rd					I-3990 NB Off-Ramp					Shopiere Rd					
	Start Time	Right	Thru	Left	U-Tn	Total	Right	Thru	Left	U-Tn	Total	Right	Thru	Left	U-Tn	Total	Right	Thru	Left	U-Tn	Total	Totals
PM Peak Hour	3:45 PM	0	0	0	0	0	2	21	0	0	23	3	1	27	0	31	0	24	62	0	86	140
	4:00 PM	0	0	0	0	0	6	17	0	0	23	3	0	26	0	29	0	17	59	0	76	128
	4:15 PM	0	0	0	0	0	0	13	0	0	13	3	0	29	0	32	0	22	73	0	95	140
	4:30 PM	0	0	0	0	0	3	19	0	0	22	2	0	26	0	28	0	21	70	0	91	141
	Peak Hour Volume	0	0	0	0	0	11	70	0	0	81	11	1	108	0	120	0	84	264	0	348	549
	Rounded Hourly Volume	0	0	0	0	0	10	70	0	0	80	10	0	110	0	120	0	85	265	0	350	550
	% Single Unit Trucks	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	7.4	0.0	6.7	0.0	0.0	1.5	0.0	1.1	2.2
	% Heavy Trucks	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	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 (Total)	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	7.4	0.0	6.7	0.0	0.0	1.5	0.0	1.1	2.2
	Peak Hour Factor (PHF)	0.00	0.00	0.00	0.00	0.00	0.46	0.83	0.00	0.00	0.88	0.92	0.25	0.93	0.00	0.94	0.00	0.87	0.90	0.00	0.92	0.97

Peak Hour Pedestrian and Bicyclist Volumes

Pedestrians and Bicyclists		Crossing North Approach			Crossing East Approach			Crossing South Approach			Crossing West Approach			Total Ped & Bike Volume
		I-3990 NB On-Ramp			Shopiere Rd			I-3990 NB Off-Ramp			Shopiere Rd			
	15-Minute Start Time	Pedestrian	Bicyclist	Total	Pedestrian	Bicyclist	Total	Pedestrian	Bicyclist	Total	Pedestrian	Bicyclist	Total	
AM	7:15 AM	0	0	0	0	0	0	0	0	0	0	0	0	0
	7:30 AM	0	0	0	0	0	0	0	0	0	0	0	0	0
	7:45 AM	0	0	0	0	0	0	0	0	0	0	0	0	0
	8:00 AM	0	0	0	0	0	0	0	0	0	0	0	0	0
	Total	0	0	0	0	0	0	0	0	0	0	0	0	0
MD	12:00 PM	0	0	0	0	0	0	0	0	0	0	0	0	0
	12:15 PM	0	0	0	0	0	0	0	0	0	0	0	0	0
	12:30 PM	0	0	0	0	0	0	0	0	0	0	0	0	0
	12:45 PM	0	0	0	0	0	0	0	0	0	0	0	0	0
	Total	0	0	0	0	0	0	0	0	0	0	0	0	0
PM	3:45 PM	0	0	0	0	0	0	0	0	0	0	0	0	0
	4:00 PM	0	0	0	0	0	0	0	0	0	0	0	0	0
	4:15 PM	0	0	0	0	0	0	0	0	0	0	0	0	0
	4:30 PM	0	0	0	0	0	0	0	0	0	0	0	0	0
	Total	0	0	0	0	0	0	0	0	0	0	0	0	0

Intersection Traffic Volume Report

Count Basics		*Page 5 of 11*
Start Date: Tuesday, May 21, 2024	Weekday	Schools in Session
Total Number of Hours Counted: 6	Non-Holiday	No Special Events

15-Minute Motor Vehicle Data

All Motor Vehicles

I-3990 NB On-Ramp and Shopiere Rd

15-Minute Motor Vehicle Data

15-Minute Time Period		From North (↓) I-3990 NB On-Ramp					From East (←) Shopiere Rd					From South (↑) I-3990 NB Off-Ramp					From West (→) Shopiere Rd					15-Min	Hourly	
Start Time		Right	Thru	Left	U-Tn	Total	Right	Thru	Left	U-Tn	Total	Right	Thru	Left	U-Tn	Total	Right	Thru	Left	U-Tn	Total	Totals	Sum	PHF
AM Peak Period	6:00 AM	0	0	0	0	0	6	4	0	0	10	0	0	18	0	18	0	2	50	0	52	80	371	0.85
	6:15 AM	0	0	0	0	0	4	9	0	0	13	0	1	12	0	13	0	4	50	0	54	80	383	0.88
	6:30 AM	0	0	0	0	0	7	14	0	0	21	2	2	30	0	34	0	5	49	0	54	109	463	0.72
	6:45 AM	0	0	0	0	0	6	12	0	0	18	0	1	21	0	22	0	4	58	0	62	102	517	0.79
	7:00 AM	0	0	0	0	0	4	12	0	0	16	2	0	20	0	22	0	3	51	0	54	92	552	0.85
	7:15 AM	0	0	0	0	0	12	18	0	0	30	3	1	29	0	33	0	9	88	0	97	160	550	0.84
	7:30 AM	0	0	0	0	0	5	16	0	0	21	0	0	41	0	41	0	3	98	0	101	163	471	0.72
	7:45 AM	0	0	0	0	0	6	10	0	0	16	2	0	37	0	39	0	9	73	0	82	137	405	0.74
	8:00 AM	0	0	0	0	0	4	8	0	0	12	1	0	22	0	23	0	1	54	0	55	90	342	0.88
	8:15 AM	0	0	0	0	0	4	8	0	0	12	0	0	21	0	21	0	7	41	0	48	81		
	8:30 AM	0	0	0	0	0	4	12	0	0	16	1	1	21	0	23	0	14	44	0	58	97		
	8:45 AM	0	0	0	0	0	2	11	0	0	13	0	1	20	0	21	0	8	32	0	40	74		
	9:00 AM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
	9:15 AM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
	9:30 AM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
	9:45 AM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
Midday Peak Period	10:00 AM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
	10:15 AM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
	10:30 AM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
	10:45 AM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
	11:00 AM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
	11:15 AM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
	11:30 AM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
	11:45 AM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
	12:00 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
	12:15 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
	12:30 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
	12:45 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
	1:00 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
	1:15 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
	1:30 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
	1:45 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
PM Peak Period	2:00 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
	2:15 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
	2:30 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
	2:45 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
	3:00 PM	0	0	0	0	0	2	6	0	0	8	3	0	32	0	35	0	20	55	0	75	118	485	0.87
	3:15 PM	0	0	0	0	0	1	11	0	0	12	6	0	13	0	19	0	16	50	0	66	97	495	0.88
	3:30 PM	0	0	0	0	0	7	13	0	0	20	5	0	26	0	31	0	21	58	0	79	130	538	0.96
	3:45 PM	0	0	0	0	0	2	21	0	0	23	3	1	27	0	31	0	24	62	0	86	140	549	0.97
	4:00 PM	0	0	0	0	0	6	17	0	0	23	3	0	26	0	29	0	17	59	0	76	128	556	0.95
	4:15 PM	0	0	0	0	0	0	13	0	0	13	3	0	29	0	32	0	22	73	0	95	140	560	0.95
	4:30 PM	0	0	0	0	0	3	19	0	0	22	2	0	26	0	28	0	21	70	0	91	141	511	0.87
	4:45 PM	0	0	0	0	0	3	11	0	0	14	6	1	46	0	53	0	23	57	0	80	147	453	0.77
	5:00 PM	0	0	0	0	0	4	19	0	0	23	2	0	39	0	41	0	21	47	0	68	132	377	0.71
	5:15 PM	0	0	0	0	0	3	14	0	0	17	5	0	17	0	22	0	16	36	0	52	91		
	5:30 PM	0	0	0	0	0	3	14	0	0	17	6	0	22	0	28	0	8	30	0	38	83		
	5:45 PM	0	0	0	0	0	4	10	0	0	14	8	0	12	0	20	0	7	30	0	37	71		
	6:00 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
	6:15 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
	6:30 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
	6:45 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
	7:00 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
	7:15 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
	7:30 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
	7:45 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
	8:00 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
	8:15 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
	8:30 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
	8:45 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
	9:00 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
	9:15 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
	9:30 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
	9:45 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
Totals		0	0	0	0	0	102	302	0	0	404	63	9	607	0	679	0	285	1315	0	1600	2683		

Peak Hour All Vehicle Volume Summary

Hourly Time Period		From North (↓) I-3990 NB On-Ramp					From East (←) Shopiere Rd					From South (↑) I-3990 NB Off-Ramp					From West (→) Shopiere Rd					Total Hourly	
Start Time		Right	Thru	Left	U-Tn	Total	Right	Thru	Left	U-Tn	Total	Right	Thru	Left	U-Tn	Total	Right	Thru	Left	U-Tn	Total	Volume	PHF
AM	7:15 AM	0	0	0	0	0	27	52	0	0	79	6	1	129	0	136	0	22	313	0	335	550	0.84
MD	12:00 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
PM	3:45 PM	0	0	0	0	0	11	70	0	0	81	11	1	108	0	120	0	84	264	0	348	549	0.97

Intersection Traffic Volume Report

Count Basics			*Page 9 of 11*
Start Date:	Tuesday, May 21, 2024	Weekday	Schools in Session
Total Number of Hours Counted: 6		Non-Holiday	No Special Events

15-Minute Heavy Vehicle Data

I-3990 NB On-Ramp and Shopiere Rd

15-Minute Heavy Vehicle Data

	15-Minute Time Period	From North (↓) I-3990 NB On-Ramp					From East (←) Shopiere Rd					From South (↑) I-3990 NB Off-Ramp					From West (→) Shopiere Rd					15-Min	Hourly
	Start Time	Right	Thru	Left	U-Tn	Total	Right	Thru	Left	U-Tn	Total	Right	Thru	Left	U-Tn	Total	Right	Thru	Left	U-Tn	Total	Totals	Sum
AM Peak Period	6:00 AM	0	0	0	0	0	1	0	0	0	1	0	0	4	0	4	0	0	1	0	1	6	16
	6:15 AM	0	0	0	0	0	0	0	0	0	0	0	0	1	0	1	0	0	0	0	0	1	15
	6:30 AM	0	0	0	0	0	0	0	0	0	0	0	1	4	0	5	0	0	0	0	0	5	25
	6:45 AM	0	0	0	0	0	0	0	0	0	0	0	1	3	0	4	0	0	0	0	0	4	28
	7:00 AM	0	0	0	0	0	0	0	0	0	0	0	0	5	0	5	0	0	0	0	0	5	32
	7:15 AM	0	0	0	0	0	0	1	0	0	1	0	1	8	0	9	0	0	1	0	1	11	31
	7:30 AM	0	0	0	0	0	0	0	0	0	0	0	0	8	0	8	0	0	0	0	0	8	30
	7:45 AM	0	0	0	0	0	1	0	0	0	1	0	0	7	0	7	0	0	0	0	0	8	35
	8:00 AM	0	0	0	0	0	0	0	0	0	0	0	0	4	0	4	0	0	0	0	0	4	29
	8:15 AM	0	0	0	0	0	0	0	0	0	0	0	0	9	0	9	0	0	1	0	1	10	
	8:30 AM	0	0	0	0	0	0	0	0	0	0	0	0	10	0	10	0	3	0	0	3	13	
	8:45 AM	0	0	0	0	0	0	0	0	0	0	0	0	2	0	2	0	0	0	0	0	2	
	9:00 AM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
	9:15 AM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
	9:30 AM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
	9:45 AM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
Midday Peak Period	10:00 AM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
	10:15 AM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
	10:30 AM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
	10:45 AM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
	11:00 AM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
	11:15 AM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
	11:30 AM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
	11:45 AM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
	12:00 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
	12:15 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
	12:30 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
	12:45 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
	1:00 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
	1:15 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
	1:30 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
	1:45 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
PM Peak Period	2:00 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
	2:15 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
	2:30 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
	2:45 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
	3:00 PM	0	0	0	0	0	0	0	0	0	0	0	0	4	0	4	0	1	1	0	2	6	27
	3:15 PM	0	0	0	0	0	0	0	0	0	0	0	0	5	0	5	0	0	0	0	0	5	22
	3:30 PM	0	0	0	0	0	0	2	0	0	2	0	0	5	0	5	0	0	1	0	1	8	20
	3:45 PM	0	0	0	0	0	0	0	0	0	0	0	0	7	0	7	0	0	1	0	1	8	12
	4:00 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	1	0	1	1	8
	4:15 PM	0	0	0	0	0	0	0	0	0	0	0	0	1	0	1	0	0	2	0	2	3	9
	4:30 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	7
	4:45 PM	0	0	0	0	0	0	0	0	0	0	0	0	3	0	3	0	0	1	0	1	4	8
	5:00 PM	0	0	0	0	0	0	0	0	0	0	0	0	2	0	2	0	0	0	0	0	2	6
	5:15 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	1	0	0	1	1	
	5:30 PM	0	0	0	0	0	0	0	0	0	0	0	0	1	0	1	0	0	0	0	0	1	
	5:45 PM	0	0	0	0	0	0	0	0	0	0	0	0	1	0	1	0	0	1	0	1	2	
	6:00 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
	6:15 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
	6:30 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
	6:45 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
	7:00 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
	7:15 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
	7:30 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
	7:45 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
	8:00 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
	8:15 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
	8:30 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
	8:45 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
	9:00 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
	9:15 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
	9:30 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
	9:45 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
Totals		0	0	0	0	0	2	3	0	0	5	0	3	94	0	97	0	5	11	0	16	118	

Peak Hour Heavy Vehicle Volume Summary

	Hourly Time Period	From North (↓) I-3990 NB On-Ramp					From East (←) Shopiere Rd					From South (↑) I-3990 NB Off-Ramp					From West (→) Shopiere Rd					Total Hourly
	Start Time	Right	Thru	Left	U-Tn	Total	Right	Thru	Left	U-Tn	Total	Right	Thru	Left	U-Tn	Total	Right	Thru	Left	U-Tn	Total	Volume
AM	7:15 AM	0	0	0	0	0	1	1	0	0	2	0	1	27	0	28	0	0	1	0	1	31
MD	12:00 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
PM	3:45 PM	0	0	0	0	0	0	0	0	0	0	0	0	8	0	8	0	0	4	0	4	12

Appendix B: Existing-Year (Year 2024) Traffic Operations Analysis Worksheets

HCM 7th Signalized Intersection Summary
100: Shopiere Road & Prairie Avenue

07/30/2024

Movement	NBL	NBT	NBR	SBL	SBT	SBR	NEL	NET	NER	SWL	SWT	SWR
Lane Configurations												
Traffic Volume (veh/h)	15	265	90	50	170	40	80	215	10	105	230	0
Future Volume (veh/h)	15	265	90	50	170	40	80	215	10	105	230	0
Initial Q (Qb), veh	0	0	0	0	0	0	0	0	0	0	0	0
Lane Width Adj.	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00
Ped-Bike Adj(A_pbT)	1.00		1.00	1.00		1.00	1.00		1.00	1.00		1.00
Parking Bus, Adj	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00
Work Zone On Approach		No			No			No			No	
Adj Sat Flow, veh/h/ln	1723	1723	1723	1723	1723	1723	1709	1709	1709	1709	1709	0
Adj Flow Rate, veh/h	17	301	102	57	193	45	91	244	0	119	261	0
Peak Hour Factor	0.88	0.88	0.88	0.88	0.88	0.88	0.88	0.88	0.88	0.88	0.88	0.88
Percent Heavy Veh, %	2	2	2	2	2	2	3	3	3	3	3	0
Cap, veh/h	408	427	145	280	469	109	442	448		440	389	0
Arrive On Green	0.35	0.35	0.35	0.35	0.35	0.35	0.12	0.26	0.00	0.09	0.23	0.00
Sat Flow, veh/h	1052	1231	417	904	1351	315	1628	1709	1448	1628	1709	0
Grp Volume(v), veh/h	17	0	403	57	0	238	91	244	0	119	261	0
Grp Sat Flow(s),veh/h/ln	1052	0	1648	904	0	1666	1628	1709	1448	1628	1709	0
Q Serve(g_s), s	0.6	0.0	9.7	2.7	0.0	5.0	1.8	5.6	0.0	2.5	6.4	0.0
Cycle Q Clear(g_c), s	5.6	0.0	9.7	12.3	0.0	5.0	1.8	5.6	0.0	2.5	6.4	0.0
Prop In Lane	1.00		0.25	1.00		0.19	1.00		1.00	1.00		0.00
Lane Grp Cap(c), veh/h	408	0	572	280	0	578	442	448		440	389	0
V/C Ratio(X)	0.04	0.00	0.70	0.20	0.00	0.41	0.21	0.54		0.27	0.67	0.00
Avail Cap(c_a), veh/h	962	0	1440	559	0	1092	781	1120		835	1120	0
HCM Platoon Ratio	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00
Upstream Filter(I)	1.00	0.00	1.00	1.00	0.00	1.00	1.00	1.00	0.00	1.00	1.00	0.00
Uniform Delay (d), s/veh	13.5	0.0	12.9	18.3	0.0	11.4	10.8	14.5	0.0	11.9	16.1	0.0
Incr Delay (d2), s/veh	0.0	0.0	1.6	0.4	0.0	0.5	0.2	1.8	0.0	0.3	2.0	0.0
Initial Q Delay(d3), s/veh	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
%ile BackOfQ(95%),veh/ln	0.2	0.0	5.9	1.0	0.0	2.9	1.0	3.8	0.0	1.5	4.4	0.0
Unsig. Movement Delay, s/veh												
LnGrp Delay(d), s/veh	13.5	0.0	14.5	18.6	0.0	11.9	11.0	16.3	0.0	12.2	18.1	0.0
LnGrp LOS	B		B	B		B	B	B		B	B	
Approach Vol, veh/h		420			295			335			380	
Approach Delay, s/veh		14.5			13.2			14.9			16.3	
Approach LOS		B			B			B			B	

Timer - Assigned Phs		2	3	4		6	7	8				
Phs Duration (G+Y+Rc), s		20.9	9.5	15.4		20.9	7.9	17.0				
Change Period (Y+Rc), s		5.0	4.0	5.0		5.0	4.0	5.0				
Max Green Setting (Gmax), s		30.0	15.0	30.0		40.0	15.0	30.0				
Max Q Clear Time (g_c+I1), s		14.3	3.8	8.4		11.7	4.5	7.6				
Green Ext Time (p_c), s		1.5	0.1	1.5		3.0	0.2	2.3				

Intersection Summary	
HCM 7th Control Delay, s/veh	14.8
HCM 7th LOS	B

Notes

Unsignalized Delay for [NER] is excluded from calculations of the approach delay and intersection delay.

Intersection	
Int Delay, s/veh	1.6

Movement	EBL	EBT	EBR	WBL	WBT	WBR	NBL	NBT	NBR	SBL	SBT	SBR
Lane Configurations												
Traffic Vol, veh/h	20	0	35	0	5	20	10	335	0	0	230	15
Future Vol, veh/h	20	0	35	0	5	20	10	335	0	0	230	15
Conflicting Peds, #/hr	0	0	0	0	0	0	0	0	0	0	0	0
Sign Control	Stop	Stop	Stop	Stop	Stop	Stop	Free	Free	Free	Free	Free	Free
RT Channelized	-	-	None	-	-	None	-	-	None	-	-	None
Storage Length	-	-	-	-	-	-	0	-	-	-	-	-
Veh in Median Storage, #	-	0	-	-	0	-	-	0	-	-	0	-
Grade, %	-	0	-	-	0	-	-	0	-	-	0	-
Peak Hour Factor	90	90	90	90	90	90	90	90	90	90	90	90
Heavy Vehicles, %	2	2	2	17	17	17	2	2	2	2	2	2
Mvmt Flow	22	0	39	0	6	22	11	372	0	0	256	17

Major/Minor	Minor2			Minor1			Major1			Major2		
Conflicting Flow All	661	658	264	-	667	372	272	0	-	-	-	0
Stage 1	264	264	-	-	394	-	-	-	-	-	-	-
Stage 2	397	394	-	-	272	-	-	-	-	-	-	-
Critical Hdwy	7.12	6.52	6.22	-	6.67	6.37	4.12	-	-	-	-	-
Critical Hdwy Stg 1	6.12	5.52	-	-	5.67	-	-	-	-	-	-	-
Critical Hdwy Stg 2	6.12	5.52	-	-	5.67	-	-	-	-	-	-	-
Follow-up Hdwy	3.518	4.018	3.318	-	4.153	3.453	2.218	-	-	-	-	-
Pot Cap-1 Maneuver	376	384	775	0	361	642	1291	-	0	0	-	-
Stage 1	741	690	-	0	580	-	-	-	0	0	-	-
Stage 2	628	605	-	0	658	-	-	-	0	0	-	-
Platoon blocked, %								-			-	-
Mov Cap-1 Maneuver	354	381	775	-	358	642	1291	-	-	-	-	-
Mov Cap-2 Maneuver	354	381	-	-	358	-	-	-	-	-	-	-
Stage 1	741	690	-	-	575	-	-	-	-	-	-	-
Stage 2	596	600	-	-	658	-	-	-	-	-	-	-

Approach	EB	WB	NB	SB
HCM Control Delay, s/v	12.5	11.84	0.23	0
HCM LOS	B	B		

Minor Lane/Major Mvmt	NBL	NBT	EBLn1	WBLn1	SBT	SBR
Capacity (veh/h)	1291	-	541	554	-	-
HCM Lane V/C Ratio	0.009	-	0.113	0.05	-	-
HCM Control Delay (s/veh)	7.8	-	12.5	11.8	-	-
HCM Lane LOS	A	-	B	B	-	-
HCM 95th %tile Q(veh)	0	-	0.4	0.2	-	-

Intersection	
Int Delay, s/veh	1.1

Movement	EBL	EBT	EBR	WBL	WBT	WBR	NBL	NBT	NBR	SBL	SBT	SBR
Lane Configurations												
Traffic Vol, veh/h	0	0	0	25	10	15	0	325	30	10	310	10
Future Vol, veh/h	0	0	0	25	10	15	0	325	30	10	310	10
Conflicting Peds, #/hr	0	0	0	0	0	0	0	0	0	0	0	0
Sign Control	Stop	Stop	Stop	Stop	Stop	Stop	Free	Free	Free	Free	Free	Free
RT Channelized	-	-	None	-	-	None	-	-	Yield	-	-	None
Storage Length	-	-	-	-	-	0	-	-	80	-	-	-
Veh in Median Storage, #	-	0	-	-	0	-	-	0	-	-	0	-
Grade, %	-	0	-	-	0	-	-	0	-	-	0	-
Peak Hour Factor	92	92	92	89	89	89	89	89	89	89	89	89
Heavy Vehicles, %	2	2	2	12	12	12	3	3	3	3	3	3
Mvmt Flow	0	0	0	28	11	17	0	365	34	11	348	11

Major/Minor	Minor1			Major1			Major2		
Conflicting Flow All	736	747	365	-	0	0	365	0	0
Stage 1	365	365	-	-	-	-	-	-	-
Stage 2	371	382	-	-	-	-	-	-	-
Critical Hdwy	6.52	6.62	6.32	-	-	-	4.13	-	-
Critical Hdwy Stg 1	5.52	5.62	-	-	-	-	-	-	-
Critical Hdwy Stg 2	5.52	5.62	-	-	-	-	-	-	-
Follow-up Hdwy	3.608	4.108	3.408	-	-	-	2.227	-	-
Pot Cap-1 Maneuver	372	330	658	0	-	-	1188	-	-
Stage 1	681	606	-	0	-	-	-	-	-
Stage 2	677	596	-	0	-	-	-	-	-
Platoon blocked, %					-	-		-	-
Mov Cap-1 Maneuver	368	0	658	-	-	-	1188	-	-
Mov Cap-2 Maneuver	368	0	-	-	-	-	-	-	-
Stage 1	681	0	-	-	-	-	-	-	-
Stage 2	669	0	-	-	-	-	-	-	-

Approach	WB	NB	SB
HCM Control Delay, s/v	14.36	0	0.24
HCM LOS	B		

Minor Lane/Major Mvmt	NBT	NBR	WBLn1	WBLn2	SBL	SBT	SBR
Capacity (veh/h)	-	-	368	658	54	-	-
HCM Lane V/C Ratio	-	-	0.107	0.026	0.009	-	-
HCM Control Delay (s/veh)	-	-	16	10.6	8.1	0	-
HCM Lane LOS	-	-	C	B	A	A	-
HCM 95th %tile Q(veh)	-	-	0.4	0.1	0	-	-

Movement	EBL	EBT	EBR	WBL	WBT	WBR	NBL	NBT	NBR	SBL	SBT	SBR
Lane Configurations												
Traffic Volume (veh/h)	125	225	95	65	250	20	100	205	70	20	230	130
Future Volume (veh/h)	125	225	95	65	250	20	100	205	70	20	230	130
Initial Q (Qb), veh	0	0	0	0	0	0	0	0	0	0	0	0
Lane Width Adj.	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00
Ped-Bike Adj(A_pbT)	1.00		1.00	1.00		1.00	1.00		1.00	1.00		1.00
Parking Bus, Adj	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00
Work Zone On Approach		No			No			No			No	
Adj Sat Flow, veh/h/ln	1762	1762	1723	1748	1748	1856	1748	1748	1709	1748	1748	1709
Adj Flow Rate, veh/h	144	259	68	75	287	23	115	236	50	23	264	93
Peak Hour Factor	0.87	0.87	0.87	0.87	0.87	0.87	0.87	0.87	0.87	0.87	0.87	0.87
Percent Heavy Veh, %	2	2	2	3	3	3	3	3	3	3	3	3
Cap, veh/h	445	384	318	357	682	54	407	436	361	411	466	386
Arrive On Green	0.11	0.22	0.22	0.09	0.22	0.22	0.09	0.25	0.25	0.09	0.27	0.27
Sat Flow, veh/h	1678	1762	1460	1665	3116	248	1665	1748	1448	1665	1748	1448
Grp Volume(v), veh/h	144	259	68	75	152	158	115	236	50	23	264	93
Grp Sat Flow(s),veh/h/ln	1678	1762	1460	1665	1661	1703	1665	1748	1448	1665	1748	1448
Q Serve(g_s), s	3.6	7.6	2.2	1.8	4.4	4.5	2.8	6.6	1.5	0.5	7.3	2.8
Cycle Q Clear(g_c), s	3.6	7.6	2.2	1.8	4.4	4.5	2.8	6.6	1.5	0.5	7.3	2.8
Prop In Lane	1.00		1.00	1.00		0.15	1.00		1.00	1.00		1.00
Lane Grp Cap(c), veh/h	445	384	318	357	364	373	407	436	361	411	466	386
V/C Ratio(X)	0.32	0.67	0.21	0.21	0.42	0.42	0.28	0.54	0.14	0.06	0.57	0.24
Avail Cap(c_a), veh/h	1162	939	778	1097	885	908	1175	931	772	1150	931	772
HCM Platoon Ratio	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00
Upstream Filter(I)	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00
Uniform Delay (d), s/veh	14.3	20.2	18.1	14.7	18.9	18.9	13.6	18.3	16.4	12.9	17.8	16.2
Incr Delay (d2), s/veh	0.4	3.5	0.6	0.3	0.8	0.8	0.4	1.0	0.2	0.1	1.9	0.5
Initial Q Delay(d3), s/veh	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
%ile BackOfQ(95%),veh/ln	2.2	5.7	1.3	1.1	2.9	3.0	1.7	4.5	0.8	0.3	5.1	1.6
Unsig. Movement Delay, s/veh												
LnGrp Delay(d), s/veh	14.7	23.7	18.6	15.0	19.7	19.7	14.0	19.4	16.6	13.0	19.7	16.7
LnGrp LOS	B	C	B	B	B	B	B	B	B	B	B	B
Approach Vol, veh/h		471			385			401			380	
Approach Delay, s/veh		20.2			18.8			17.5			18.6	
Approach LOS		C			B			B			B	

Timer - Assigned Phs	1	2	3	4	5	6	7	8
Phs Duration (G+Y+Rc), s	10.0	17.3	9.0	20.0	9.9	17.3	10.0	19.0
Change Period (Y+Rc), s	5.0	5.0	4.0	5.0	4.0	5.0	5.0	5.0
Max Green Setting (Gmax), s	30.0	30.0	31.0	30.0	30.0	30.0	30.0	30.0
Max Q Clear Time (g_c+I1), s	3.8	9.6	4.8	9.3	5.6	6.5	2.5	8.6
Green Ext Time (p_c), s	0.2	2.7	0.3	2.9	0.4	1.7	0.0	1.4

Intersection Summary	
HCM 7th Control Delay, s/veh	18.8
HCM 7th LOS	B

Intersection	
Int Delay, s/veh	2.3

Movement	EBL	EBR	NBL	NBT	SBT	SBR
Lane Configurations						
Traffic Vol, veh/h	80	35	25	340	315	40
Future Vol, veh/h	80	35	25	340	315	40
Conflicting Peds, #/hr	0	0	0	0	0	0
Sign Control	Stop	Stop	Free	Free	Free	Free
RT Channelized	-	None	-	None	-	None
Storage Length	0	50	-	-	-	-
Veh in Median Storage, #	0	-	-	0	0	-
Grade, %	0	-	-	0	0	-
Peak Hour Factor	87	87	87	87	87	87
Heavy Vehicles, %	2	2	3	3	4	4
Mvmt Flow	92	40	29	391	362	46

Major/Minor	Minor2		Major1		Major2	
Conflicting Flow All	638	204	408	0	-	0
Stage 1	385	-	-	-	-	-
Stage 2	253	-	-	-	-	-
Critical Hdwy	6.84	6.94	4.16	-	-	-
Critical Hdwy Stg 1	5.84	-	-	-	-	-
Critical Hdwy Stg 2	5.84	-	-	-	-	-
Follow-up Hdwy	3.52	3.32	2.23	-	-	-
Pot Cap-1 Maneuver	409	803	1140	-	-	-
Stage 1	657	-	-	-	-	-
Stage 2	766	-	-	-	-	-
Platoon blocked, %				-	-	-
Mov Cap-1 Maneuver	398	803	1140	-	-	-
Mov Cap-2 Maneuver	398	-	-	-	-	-
Stage 1	639	-	-	-	-	-
Stage 2	766	-	-	-	-	-

Approach	EB	NB	SB
HCM Control Delay, s/v	14.62	0.75	0
HCM LOS	B		

Minor Lane/Major Mvmt	NBL	NBT	EBLn1	EBLn2	SBT	SBR
Capacity (veh/h)	247	-	398	803	-	-
HCM Lane V/C Ratio	0.025	-	0.231	0.05	-	-
HCM Control Delay (s/veh)	8.2	0.2	16.8	9.7	-	-
HCM Lane LOS	A	A	C	A	-	-
HCM 95th %tile Q(veh)	0.1	-	0.9	0.2	-	-

Intersection	
Int Delay, s/veh	1.6

Movement	EBL	EBR	NBL	NBT	SBT	SBR
Lane Configurations						
Traffic Vol, veh/h	15	50	55	360	300	20
Future Vol, veh/h	15	50	55	360	300	20
Conflicting Peds, #/hr	0	0	0	0	0	0
Sign Control	Stop	Stop	Free	Free	Free	Free
RT Channelized	-	None	-	None	-	None
Storage Length	0	75	-	-	-	-
Veh in Median Storage, #	0	-	-	0	0	-
Grade, %	0	-	-	0	0	-
Peak Hour Factor	88	88	88	88	88	88
Heavy Vehicles, %	2	2	3	3	4	4
Mvmt Flow	17	57	63	409	341	23

Major/Minor	Minor2		Major1		Major2	
Conflicting Flow All	682	182	364	0	-	0
Stage 1	352	-	-	-	-	-
Stage 2	330	-	-	-	-	-
Critical Hdwy	6.84	6.94	4.16	-	-	-
Critical Hdwy Stg 1	5.84	-	-	-	-	-
Critical Hdwy Stg 2	5.84	-	-	-	-	-
Follow-up Hdwy	3.52	3.32	2.23	-	-	-
Pot Cap-1 Maneuver	384	830	1184	-	-	-
Stage 1	683	-	-	-	-	-
Stage 2	701	-	-	-	-	-
Platoon blocked, %				-	-	-
Mov Cap-1 Maneuver	361	830	1184	-	-	-
Mov Cap-2 Maneuver	361	-	-	-	-	-
Stage 1	642	-	-	-	-	-
Stage 2	701	-	-	-	-	-

Approach	EB	NB	SB
HCM Control Delay, s/v	11	1.41	0
HCM LOS	B		

Minor Lane/Major Mvmt	NBL	NBT	EBLn1	EBLn2	SBT	SBR
Capacity (veh/h)	477	-	361	830	-	-
HCM Lane V/C Ratio	0.053	-	0.047	0.068	-	-
HCM Control Delay (s/veh)	8.2	0.4	15.5	9.7	-	-
HCM Lane LOS	A	A	C	A	-	-
HCM 95th %tile Q(veh)	0.2	-	0.1	0.2	-	-

Intersection	
Int Delay, s/veh	4.6

Movement	WBL	WBR	NBT	NBR	SBL	SBT
Lane Configurations						
Traffic Vol, veh/h	100	95	310	90	80	235
Future Vol, veh/h	100	95	310	90	80	235
Conflicting Peds, #/hr	0	0	0	0	0	0
Sign Control	Stop	Stop	Free	Free	Free	Free
RT Channelized	-	Stop	-	None	-	None
Storage Length	0	400	-	-	-	-
Veh in Median Storage, #	0	-	0	-	-	0
Grade, %	0	-	0	-	-	0
Peak Hour Factor	87	87	87	87	87	87
Heavy Vehicles, %	13	13	2	2	6	6
Mvmt Flow	115	109	356	103	92	270

Major/Minor	Minor1		Major1		Major2	
Conflicting Flow All	727	230	0	0	460	0
Stage 1	408	-	-	-	-	-
Stage 2	319	-	-	-	-	-
Critical Hdwy	7.06	7.16	-	-	4.22	-
Critical Hdwy Stg 1	6.06	-	-	-	-	-
Critical Hdwy Stg 2	6.06	-	-	-	-	-
Follow-up Hdwy	3.63	3.43	-	-	2.26	-
Pot Cap-1 Maneuver	336	740	-	-	1070	-
Stage 1	609	-	-	-	-	-
Stage 2	678	-	-	-	-	-
Platoon blocked, %			-	-		-
Mov Cap-1 Maneuver	305	740	-	-	1070	-
Mov Cap-2 Maneuver	305	-	-	-	-	-
Stage 1	609	-	-	-	-	-
Stage 2	615	-	-	-	-	-

Approach	WB	NB	SB
HCM Control Delay, s/v	17.4	0	2.56
HCM LOS	C		

Minor Lane/Major Mvmt	NBT	NBR	WBLn1	WBLn2	SBL	SBT
Capacity (veh/h)	-	-	305	740	914	-
HCM Lane V/C Ratio	-	-	0.377	0.148	0.086	-
HCM Control Delay (s/veh)	-	-	23.8	10.7	8.7	0.5
HCM Lane LOS	-	-	C	B	A	A
HCM 95th %tile Q(veh)	-	-	1.7	0.5	0.3	-

Intersection	
Int Delay, s/veh	8.1

Movement	EBL	EBR	NBL	NBT	SBT	SBR
Lane Configurations						
Traffic Vol, veh/h	170	130	150	250	180	175
Future Vol, veh/h	170	130	150	250	180	175
Conflicting Peds, #/hr	0	0	0	0	0	0
Sign Control	Stop	Stop	Free	Free	Free	Free
RT Channelized	-	None	-	None	-	None
Storage Length	0	280	-	-	-	150
Veh in Median Storage, #	0	-	-	0	0	-
Grade, %	0	-	-	0	0	-
Peak Hour Factor	89	89	89	89	89	89
Heavy Vehicles, %	11	11	5	5	5	5
Mvmt Flow	191	146	169	281	202	197

Major/Minor	Minor2		Major1		Major2	
Conflicting Flow All	680	101	399	0	-	0
Stage 1	202	-	-	-	-	-
Stage 2	478	-	-	-	-	-
Critical Hdwy	7.02	7.12	4.2	-	-	-
Critical Hdwy Stg 1	6.02	-	-	-	-	-
Critical Hdwy Stg 2	6.02	-	-	-	-	-
Follow-up Hdwy	3.61	3.41	2.25	-	-	-
Pot Cap-1 Maneuver	365	906	1135	-	-	-
Stage 1	786	-	-	-	-	-
Stage 2	565	-	-	-	-	-
Platoon blocked, %				-	-	-
Mov Cap-1 Maneuver	307	906	1135	-	-	-
Mov Cap-2 Maneuver	307	-	-	-	-	-
Stage 1	659	-	-	-	-	-
Stage 2	565	-	-	-	-	-

Approach	EB	NB	SB
HCM Control Delay, s/v	23.67	3.67	0
HCM LOS	C		

Minor Lane/Major Mvmt	NBL	NBT	EBLn1	EBLn2	SBT	SBR
Capacity (veh/h)	1047	-	307	906	-	-
HCM Lane V/C Ratio	0.148	-	0.623	0.161	-	-
HCM Control Delay (s/veh)	8.7	0.6	34.3	9.7	-	-
HCM Lane LOS	A	A	D	A	-	-
HCM 95th %tile Q(veh)	0.5	-	3.9	0.6	-	-

Intersection	
Int Delay, s/veh	0.4

Movement	EBL	EBT	EBR	WBL	WBT	WBR	NBL	NBT	NBR	SBL	SBT	SBR
Lane Configurations												
Traffic Vol, veh/h	5	0	225	0	0	0	0	325	115	20	165	0
Future Vol, veh/h	5	0	225	0	0	0	0	325	115	20	165	0
Conflicting Peds, #/hr	0	0	0	0	0	0	0	0	0	0	0	0
Sign Control	Stop	Stop	Stop	Stop	Stop	Stop	Free	Free	Free	Free	Free	Free
RT Channelized	-	-	Free	-	-	None	-	-	Yield	-	-	None
Storage Length	0	-	220	-	-	-	-	-	0	800	-	-
Veh in Median Storage, #	-	0	-	-	0	-	-	0	-	-	0	-
Grade, %	-	0	-	-	0	-	-	0	-	-	0	-
Peak Hour Factor	86	86	86	92	92	92	86	86	86	86	86	86
Heavy Vehicles, %	3	3	3	2	2	2	3	3	3	15	15	15
Mvmt Flow	6	0	262	0	0	0	0	378	134	23	192	0

Major/Minor	Minor2			Major1			Major2		
Conflicting Flow All	616	-	-	-	0	0	378	0	0
Stage 1	238	-	-	-	-	-	-	-	-
Stage 2	378	-	-	-	-	-	-	-	-
Critical Hdwy	6.43	-	-	-	-	-	4.25	-	-
Critical Hdwy Stg 1	5.43	-	-	-	-	-	-	-	-
Critical Hdwy Stg 2	5.43	-	-	-	-	-	-	-	-
Follow-up Hdwy	3.527	-	-	-	-	-	2.335	-	-
Pot Cap-1 Maneuver	452	0	0	0	-	-	1113	-	0
Stage 1	799	0	0	0	-	-	-	-	0
Stage 2	691	0	0	0	-	-	-	-	0
Platoon blocked, %					-	-		-	
Mov Cap-1 Maneuver	443	0	-	-	-	-	1113	-	-
Mov Cap-2 Maneuver	443	0	-	-	-	-	-	-	-
Stage 1	799	0	-	-	-	-	-	-	-
Stage 2	676	0	-	-	-	-	-	-	-

Approach	EB	NB	SB
HCM Control Delay, s/v	13.24	0	0.9
HCM LOS	B		

Minor Lane/Major Mvmt	NBT	NBR	EBLn1	EBLn2	SBL	SBT
Capacity (veh/h)	-	-	443	-	1113	-
HCM Lane V/C Ratio	-	-	0.013	-	0.021	-
HCM Control Delay (s/veh)	-	-	13.2	0	8.3	-
HCM Lane LOS	-	-	B	A	A	-
HCM 95th %tile Q(veh)	-	-	0	-	0.1	-

Intersection	
Int Delay, s/veh	14.9

Movement	EBL	EBT	EBR	WBL	WBT	WBR	NBL	NBT	NBR	SBL	SBT	SBR
Lane Configurations												
Traffic Vol, veh/h	0	0	0	130	0	5	310	20	0	0	55	30
Future Vol, veh/h	0	0	0	130	0	5	310	20	0	0	55	30
Conflicting Peds, #/hr	0	0	0	0	0	0	0	0	0	0	0	0
Sign Control	Stop	Stop	Stop	Stop	Stop	Stop	Free	Free	Free	Free	Free	Free
RT Channelized	-	-	None	-	-	Stop	-	-	None	-	-	Yield
Storage Length	-	-	-	0	-	150	800	-	-	-	-	420
Veh in Median Storage, #	-	0	-	-	0	-	-	0	-	-	0	-
Grade, %	-	0	-	-	0	-	-	0	-	-	0	-
Peak Hour Factor	84	84	84	84	84	84	84	84	84	84	84	84
Heavy Vehicles, %	2	2	2	21	21	21	2	2	2	3	3	3
Mvmt Flow	0	0	0	155	0	6	369	24	0	0	65	36

Major/Minor	Minor1			Major1			Major2			
Conflicting Flow All	827	-	24	65	0	-	-	-	0	
Stage 1	762	-	-	-	-	-	-	-	-	
Stage 2	65	-	-	-	-	-	-	-	-	
Critical Hdwy	6.61	-	6.41	4.12	-	-	-	-	-	
Critical Hdwy Stg 1	5.61	-	-	-	-	-	-	-	-	
Critical Hdwy Stg 2	5.61	-	-	-	-	-	-	-	-	
Follow-up Hdwy	3.689	-	3.489	2.218	-	-	-	-	-	
Pot Cap-1 Maneuver	317	0	1000	1536	-	0	0	-	-	
Stage 1	429	0	-	-	-	0	0	-	-	
Stage 2	911	0	-	-	-	0	0	-	-	
Platoon blocked, %					-			-	-	
Mov Cap-1 Maneuver	241	0	1000	1536	-	-	-	-	-	
Mov Cap-2 Maneuver	241	0	-	-	-	-	-	-	-	
Stage 1	326	0	-	-	-	-	-	-	-	
Stage 2	911	0	-	-	-	-	-	-	-	

Approach	WB	NB	SB
HCM Control Delay, s/v	42.16	7.59	0
HCM LOS	E		

Minor Lane/Major Mvmt	NBL	NBT	WBLn1	WBLn2	SBT	SBR
Capacity (veh/h)	1536	-	241	1000	-	-
HCM Lane V/C Ratio	0.24	-	0.643	0.006	-	-
HCM Control Delay (s/veh)	8.1	-	43.4	8.6	-	-
HCM Lane LOS	A	-	E	A	-	-
HCM 95th %tile Q(veh)	0.9	-	3.9	0	-	-

HCM 7th Signalized Intersection Summary
100: Shopiere Road & Prairie Avenue

07/30/2024

Movement	NBL	NBT	NBR	SBL	SBT	SBR	NEL	NET	NER	SWL	SWT	SWR
Lane Configurations												
Traffic Volume (veh/h)	30	255	135	50	360	75	55	280	30	135	175	0
Future Volume (veh/h)	30	255	135	50	360	75	55	280	30	135	175	0
Initial Q (Qb), veh	0	0	0	0	0	0	0	0	0	0	0	0
Lane Width Adj.	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00
Ped-Bike Adj(A_pbT)	1.00		1.00	1.00		1.00	1.00		1.00	1.00		1.00
Parking Bus, Adj	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00
Work Zone On Approach		No			No			No			No	
Adj Sat Flow, veh/h/ln	1723	1723	1723	1723	1723	1723	1723	1723	1723	1723	1723	0
Adj Flow Rate, veh/h	32	271	144	53	383	80	59	298	0	144	186	0
Peak Hour Factor	0.94	0.94	0.94	0.94	0.94	0.94	0.94	0.94	0.94	0.94	0.94	0.94
Percent Heavy Veh, %	2	2	2	2	2	2	2	2	2	2	2	0
Cap, veh/h	260	397	211	287	518	108	474	435		392	442	0
Arrive On Green	0.38	0.38	0.38	0.38	0.38	0.38	0.09	0.25	0.00	0.09	0.26	0.00
Sat Flow, veh/h	856	1059	563	895	1382	289	1641	1723	1460	1641	1723	0
Grp Volume(v), veh/h	32	0	415	53	0	463	59	298	0	144	186	0
Grp Sat Flow(s),veh/h/ln	856	0	1621	895	0	1671	1641	1723	1460	1641	1723	0
Q Serve(g_s), s	1.7	0.0	10.8	2.7	0.0	12.0	1.2	7.8	0.0	3.2	4.5	0.0
Cycle Q Clear(g_c), s	13.7	0.0	10.8	13.4	0.0	12.0	1.2	7.8	0.0	3.2	4.5	0.0
Prop In Lane	1.00		0.35	1.00		0.17	1.00		1.00	1.00		0.00
Lane Grp Cap(c), veh/h	260	0	608	287	0	627	474	435		392	442	0
V/C Ratio(X)	0.12	0.00	0.68	0.18	0.00	0.74	0.12	0.69		0.37	0.42	0.00
Avail Cap(c_a), veh/h	621	0	1294	487	0	1000	818	1031		730	1031	0
HCM Platoon Ratio	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00
Upstream Filter(I)	1.00	0.00	1.00	1.00	0.00	1.00	1.00	1.00	0.00	1.00	1.00	0.00
Uniform Delay (d), s/veh	19.5	0.0	13.2	18.8	0.0	13.5	11.5	16.9	0.0	12.5	15.5	0.0
Incr Delay (d2), s/veh	0.2	0.0	1.4	0.3	0.0	1.7	0.1	3.3	0.0	0.6	0.6	0.0
Initial Q Delay(d3), s/veh	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
%ile BackOfQ(95%),veh/ln	0.6	0.0	6.5	1.0	0.0	7.5	0.7	5.7	0.0	1.9	3.0	0.0
Unsig. Movement Delay, s/veh												
LnGrp Delay(d), s/veh	19.7	0.0	14.5	19.1	0.0	15.3	11.6	20.2	0.0	13.1	16.2	0.0
LnGrp LOS	B		B	B		B	B	C		B	B	
Approach Vol, veh/h		447			516			357			330	
Approach Delay, s/veh		14.9			15.7			18.8			14.8	
Approach LOS		B			B			B			B	

Timer - Assigned Phs	2	3	4	6	7	8
Phs Duration (G+Y+Rc), s	23.8	8.5	17.9	23.8	8.7	17.7
Change Period (Y+Rc), s	5.0	4.0	5.0	5.0	4.0	5.0
Max Green Setting (Gmax), s	30.0	15.0	30.0	40.0	15.0	30.0
Max Q Clear Time (g_c+I1), s	15.4	3.2	6.5	15.7	5.2	9.8
Green Ext Time (p_c), s	3.0	0.1	1.1	3.1	0.2	2.8

Intersection Summary	
HCM 7th Control Delay, s/veh	16.0
HCM 7th LOS	B

Notes

Unsignalized Delay for [NER] is excluded from calculations of the approach delay and intersection delay.

Intersection	
Int Delay, s/veh	2.8

Movement	EBL	EBT	EBR	WBL	WBT	WBR	NBL	NBT	NBR	SBL	SBT	SBR
Lane Configurations												
Traffic Vol, veh/h	35	0	35	0	25	50	20	290	0	0	455	40
Future Vol, veh/h	35	0	35	0	25	50	20	290	0	0	455	40
Conflicting Peds, #/hr	0	0	0	0	0	0	0	0	0	0	0	0
Sign Control	Stop	Stop	Stop	Stop	Stop	Stop	Free	Free	Free	Free	Free	Free
RT Channelized	-	-	None	-	-	None	-	-	None	-	-	None
Storage Length	-	-	-	-	-	-	0	-	-	-	-	-
Veh in Median Storage, #	-	0	-	-	0	-	-	0	-	-	0	-
Grade, %	-	0	-	-	0	-	-	0	-	-	0	-
Peak Hour Factor	92	92	92	92	92	92	92	92	92	92	92	92
Heavy Vehicles, %	3	3	3	4	4	4	2	2	2	2	2	2
Mvmt Flow	38	0	38	0	27	54	22	315	0	0	495	43

Major/Minor	Minor2			Minor1			Major1			Major2		
Conflicting Flow All	889	875	516	-	897	315	538	0	-	-	-	0
Stage 1	516	516	-	-	359	-	-	-	-	-	-	-
Stage 2	372	359	-	-	538	-	-	-	-	-	-	-
Critical Hdwy	7.13	6.53	6.23	-	6.54	6.24	4.12	-	-	-	-	-
Critical Hdwy Stg 1	6.13	5.53	-	-	5.54	-	-	-	-	-	-	-
Critical Hdwy Stg 2	6.13	5.53	-	-	5.54	-	-	-	-	-	-	-
Follow-up Hdwy	3.527	4.027	3.327	-	4.036	3.336	2.218	-	-	-	-	-
Pot Cap-1 Maneuver	263	287	557	0	277	721	1030	-	0	0	-	-
Stage 1	540	532	-	0	624	-	-	-	0	0	-	-
Stage 2	646	626	-	0	519	-	-	-	0	0	-	-
Platoon blocked, %								-			-	-
Mov Cap-1 Maneuver	215	281	557	-	271	721	1030	-	-	-	-	-
Mov Cap-2 Maneuver	215	281	-	-	271	-	-	-	-	-	-	-
Stage 1	540	532	-	-	611	-	-	-	-	-	-	-
Stage 2	559	612	-	-	519	-	-	-	-	-	-	-

Approach	EB	WB	NB	SB
HCM Control Delay, s/v	20.36	14.39	0.55	0
HCM LOS	C	B		

Minor Lane/Major Mvmt	NBL	NBT	EBLn1	WBLn1	SBT	SBR
Capacity (veh/h)	1030	-	310	464	-	-
HCM Lane V/C Ratio	0.021	-	0.246	0.176	-	-
HCM Control Delay (s/veh)	8.6	-	20.4	14.4	-	-
HCM Lane LOS	A	-	C	B	-	-
HCM 95th %tile Q(veh)	0.1	-	0.9	0.6	-	-

Intersection	
Int Delay, s/veh	1.1

Movement	EBL	EBT	EBR	WBL	WBT	WBR	NBL	NBT	NBR	SBL	SBT	SBR
Lane Configurations												
Traffic Vol, veh/h	0	0	0	10	10	35	5	415	50	30	300	55
Future Vol, veh/h	0	0	0	10	10	35	5	415	50	30	300	55
Conflicting Peds, #/hr	0	0	0	0	0	0	0	0	0	0	0	0
Sign Control	Stop	Stop	Stop	Stop	Stop	Stop	Free	Free	Free	Free	Free	Free
RT Channelized	-	-	None	-	-	None	-	-	Yield	-	-	None
Storage Length	-	-	-	-	-	0	-	-	80	-	-	-
Veh in Median Storage, #	-	0	-	-	0	-	-	0	-	-	0	-
Grade, %	-	0	-	-	0	-	-	0	-	-	0	-
Peak Hour Factor	92	92	92	98	98	98	98	98	98	98	98	98
Heavy Vehicles, %	2	2	2	4	4	4	2	2	2	2	2	2
Mvmt Flow	0	0	0	10	10	36	5	423	51	31	306	56

Major/Minor	Minor1			Major1			Major2		
Conflicting Flow All	801	857	423	362	0	0	423	0	0
Stage 1	434	434	-	-	-	-	-	-	-
Stage 2	367	423	-	-	-	-	-	-	-
Critical Hdwy	6.44	6.54	6.24	4.12	-	-	4.12	-	-
Critical Hdwy Stg 1	5.44	5.54	-	-	-	-	-	-	-
Critical Hdwy Stg 2	5.44	5.54	-	-	-	-	-	-	-
Follow-up Hdwy	3.536	4.036	3.336	2.218	-	-	2.218	-	-
Pot Cap-1 Maneuver	351	293	626	1196	-	-	1136	-	-
Stage 1	649	578	-	-	-	-	-	-	-
Stage 2	696	584	-	-	-	-	-	-	-
Platoon blocked, %					-	-		-	-
Mov Cap-1 Maneuver	337	0	626	1196	-	-	1136	-	-
Mov Cap-2 Maneuver	337	0	-	-	-	-	-	-	-
Stage 1	645	0	-	-	-	-	-	-	-
Stage 2	672	0	-	-	-	-	-	-	-

Approach	WB	NB	SB
HCM Control Delay, s/v	13.01	0.09	0.64
HCM LOS	B		

Minor Lane/Major Mvmt	NBL	NBT	NBR	WBLn1	WBLn2	SBL	SBT	SBR
Capacity (veh/h)	1196	-	-	337	626	136	-	-
HCM Lane V/C Ratio	0.004	-	-	0.061	0.057	0.027	-	-
HCM Control Delay (s/veh)	8	-	-	16.4	11.1	8.3	0	-
HCM Lane LOS	A	-	-	C	B	A	A	-
HCM 95th %tile Q(veh)	0	-	-	0.2	0.2	0.1	-	-

Movement	EBL	EBT	EBR	WBL	WBT	WBR	NBL	NBT	NBR	SBL	SBT	SBR
Lane Configurations												
Traffic Volume (veh/h)	200	445	160	100	340	35	170	255	145	20	220	235
Future Volume (veh/h)	200	445	160	100	340	35	170	255	145	20	220	235
Initial Q (Qb), veh	0	0	0	0	0	0	0	0	0	0	0	0
Lane Width Adj.	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00
Ped-Bike Adj(A_pbT)	1.00		1.00	1.00		1.00	1.00		1.00	1.00		1.00
Parking Bus, Adj	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00
Work Zone On Approach		No			No			No			No	
Adj Sat Flow, veh/h/ln	1762	1762	1723	1762	1762	1870	1762	1762	1723	1762	1762	1723
Adj Flow Rate, veh/h	211	468	104	105	358	37	179	268	95	21	232	153
Peak Hour Factor	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95
Percent Heavy Veh, %	2	2	2	2	2	2	2	2	2	2	2	2
Cap, veh/h	485	570	472	286	892	92	377	448	371	333	369	306
Arrive On Green	0.12	0.32	0.32	0.07	0.29	0.29	0.11	0.25	0.25	0.07	0.21	0.21
Sat Flow, veh/h	1678	1762	1460	1678	3065	315	1678	1762	1460	1678	1762	1460
Grp Volume(v), veh/h	211	468	104	105	195	200	179	268	95	21	232	153
Grp Sat Flow(s),veh/h/ln	1678	1762	1460	1678	1674	1705	1678	1762	1460	1678	1762	1460
Q Serve(g_s), s	6.0	17.5	3.7	3.0	6.7	6.8	5.8	9.6	3.7	0.7	8.6	6.6
Cycle Q Clear(g_c), s	6.0	17.5	3.7	3.0	6.7	6.8	5.8	9.6	3.7	0.7	8.6	6.6
Prop In Lane	1.00		1.00	1.00		0.18	1.00		1.00	1.00		1.00
Lane Grp Cap(c), veh/h	485	570	472	286	487	497	377	448	371	333	369	306
V/C Ratio(X)	0.44	0.82	0.22	0.37	0.40	0.40	0.47	0.60	0.26	0.06	0.63	0.50
Avail Cap(c_a), veh/h	986	738	611	865	701	714	887	738	611	918	738	611
HCM Platoon Ratio	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00
Upstream Filter(I)	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00
Uniform Delay (d), s/veh	14.5	22.3	17.7	17.3	20.4	20.4	18.8	23.5	21.3	19.2	25.8	25.0
Incr Delay (d2), s/veh	0.6	7.2	0.4	0.8	0.5	0.5	0.9	1.3	0.4	0.1	3.0	2.2
Initial Q Delay(d3), s/veh	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
%ile BackOfQ(95%),veh/ln	3.8	12.3	2.2	2.0	4.5	4.6	3.9	7.0	2.2	0.4	6.6	4.2
Unsig. Movement Delay, s/veh												
LnGrp Delay(d), s/veh	15.1	29.6	18.1	18.1	20.9	20.9	19.8	24.8	21.7	19.2	28.8	27.2
LnGrp LOS	B	C	B	B	C	C	B	C	C	B	C	C
Approach Vol, veh/h		783			500			542			406	
Approach Delay, s/veh		24.1			20.3			22.6			27.7	
Approach LOS		C			C			C			C	

Timer - Assigned Phs	1	2	3	4	5	6	7	8
Phs Duration (G+Y+Rc), s	10.3	28.2	13.2	20.0	12.6	25.9	10.0	23.2
Change Period (Y+Rc), s	5.0	5.0	5.0	5.0	4.0	5.0	5.0	5.0
Max Green Setting (Gmax), s	30.0	30.0	30.0	30.0	30.0	30.0	30.0	30.0
Max Q Clear Time (g_c+I1), s	5.0	19.5	7.8	10.6	8.0	8.8	2.7	11.6
Green Ext Time (p_c), s	0.2	3.6	0.5	2.9	0.6	2.2	0.0	1.7

Intersection Summary	
HCM 7th Control Delay, s/veh	23.6
HCM 7th LOS	C

Intersection	
Int Delay, s/veh	2.2

Movement	EBL	EBR	NBL	NBT	SBT	SBR
Lane Configurations						
Traffic Vol, veh/h	60	40	55	385	460	70
Future Vol, veh/h	60	40	55	385	460	70
Conflicting Peds, #/hr	0	0	0	0	0	0
Sign Control	Stop	Stop	Free	Free	Free	Free
RT Channelized	-	None	-	None	-	None
Storage Length	0	50	-	-	-	-
Veh in Median Storage, #	0	-	-	0	0	-
Grade, %	0	-	-	0	0	-
Peak Hour Factor	95	95	95	95	95	95
Heavy Vehicles, %	2	2	2	2	2	2
Mvmt Flow	63	42	58	405	484	74

Major/Minor	Minor2		Major1		Major2	
Conflicting Flow All	839	279	558	0	-	0
Stage 1	521	-	-	-	-	-
Stage 2	318	-	-	-	-	-
Critical Hdwy	6.84	6.94	4.14	-	-	-
Critical Hdwy Stg 1	5.84	-	-	-	-	-
Critical Hdwy Stg 2	5.84	-	-	-	-	-
Follow-up Hdwy	3.52	3.32	2.22	-	-	-
Pot Cap-1 Maneuver	304	718	1009	-	-	-
Stage 1	561	-	-	-	-	-
Stage 2	710	-	-	-	-	-
Platoon blocked, %				-	-	-
Mov Cap-1 Maneuver	285	718	1009	-	-	-
Mov Cap-2 Maneuver	285	-	-	-	-	-
Stage 1	524	-	-	-	-	-
Stage 2	710	-	-	-	-	-

Approach	EB	NB	SB
HCM Control Delay, s/v	16.86	1.48	0
HCM LOS	C		

Minor Lane/Major Mvmt	NBL	NBT	EBLn1	EBLn2	SBT	SBR
Capacity (veh/h)	450	-	285	718	-	-
HCM Lane V/C Ratio	0.057	-	0.222	0.059	-	-
HCM Control Delay (s/veh)	8.8	0.4	21.2	10.3	-	-
HCM Lane LOS	A	A	C	B	-	-
HCM 95th %tile Q(veh)	0.2	-	0.8	0.2	-	-

Intersection	
Int Delay, s/veh	2

Movement	EBL	EBR	NBL	NBT	SBT	SBR
Lane Configurations						
Traffic Vol, veh/h	20	70	80	365	460	10
Future Vol, veh/h	20	70	80	365	460	10
Conflicting Peds, #/hr	0	0	0	0	0	0
Sign Control	Stop	Stop	Free	Free	Free	Free
RT Channelized	-	None	-	None	-	None
Storage Length	0	75	-	-	-	-
Veh in Median Storage, #	0	-	-	0	0	-
Grade, %	0	-	-	0	0	-
Peak Hour Factor	95	95	95	95	95	95
Heavy Vehicles, %	2	2	2	2	2	2
Mvmt Flow	21	74	84	384	484	11

Major/Minor	Minor2		Major1		Major2	
Conflicting Flow All	850	247	495	0	-	0
Stage 1	489	-	-	-	-	-
Stage 2	361	-	-	-	-	-
Critical Hdwy	6.84	6.94	4.14	-	-	-
Critical Hdwy Stg 1	5.84	-	-	-	-	-
Critical Hdwy Stg 2	5.84	-	-	-	-	-
Follow-up Hdwy	3.52	3.32	2.22	-	-	-
Pot Cap-1 Maneuver	300	753	1065	-	-	-
Stage 1	582	-	-	-	-	-
Stage 2	676	-	-	-	-	-
Platoon blocked, %				-	-	-
Mov Cap-1 Maneuver	273	753	1065	-	-	-
Mov Cap-2 Maneuver	273	-	-	-	-	-
Stage 1	530	-	-	-	-	-
Stage 2	676	-	-	-	-	-

Approach	EB	NB	SB
HCM Control Delay, s/v	12.3	2	0
HCM LOS	B		

Minor Lane/Major Mvmt	NBL	NBT	EBLn1	EBLn2	SBT	SBR
Capacity (veh/h)	647	-	273	753	-	-
HCM Lane V/C Ratio	0.079	-	0.077	0.098	-	-
HCM Control Delay (s/veh)	8.7	0.5	19.3	10.3	-	-
HCM Lane LOS	A	A	C	B	-	-
HCM 95th %tile Q(veh)	0.3	-	0.2	0.3	-	-

Intersection	
Int Delay, s/veh	4.6

Movement	WBL	WBR	NBT	NBR	SBL	SBT
Lane Configurations						
Traffic Vol, veh/h	140	55	265	130	70	320
Future Vol, veh/h	140	55	265	130	70	320
Conflicting Peds, #/hr	0	0	0	0	0	0
Sign Control	Stop	Stop	Free	Free	Free	Free
RT Channelized	-	Stop	-	None	-	None
Storage Length	0	400	-	-	-	-
Veh in Median Storage, #	0	-	0	-	-	0
Grade, %	0	-	0	-	-	0
Peak Hour Factor	92	92	92	92	92	92
Heavy Vehicles, %	4	4	2	2	2	2
Mvmt Flow	152	60	288	141	76	348

Major/Minor	Minor1		Major1		Major2	
Conflicting Flow All	685	215	0	0	429	0
Stage 1	359	-	-	-	-	-
Stage 2	326	-	-	-	-	-
Critical Hdwy	6.88	6.98	-	-	4.14	-
Critical Hdwy Stg 1	5.88	-	-	-	-	-
Critical Hdwy Stg 2	5.88	-	-	-	-	-
Follow-up Hdwy	3.54	3.34	-	-	2.22	-
Pot Cap-1 Maneuver	378	784	-	-	1127	-
Stage 1	672	-	-	-	-	-
Stage 2	698	-	-	-	-	-
Platoon blocked, %			-	-		-
Mov Cap-1 Maneuver	349	784	-	-	1127	-
Mov Cap-2 Maneuver	349	-	-	-	-	-
Stage 1	672	-	-	-	-	-
Stage 2	646	-	-	-	-	-

Approach	WB	NB	SB
HCM Control Delay, s/v	19.34	0	1.87
HCM LOS	C		

Minor Lane/Major Mvmt	NBT	NBR	WBLn1	WBLn2	SBL	SBT
Capacity (veh/h)	-	-	349	784	646	-
HCM Lane V/C Ratio	-	-	0.436	0.076	0.068	-
HCM Control Delay (s/veh)	-	-	23	10	8.4	0.4
HCM Lane LOS	-	-	C	A	A	A
HCM 95th %tile Q(veh)	-	-	2.1	0.2	0.2	-

Intersection	
Int Delay, s/veh	7.7

Movement	EBL	EBR	NBL	NBT	SBT	SBR
Lane Configurations						
Traffic Vol, veh/h	230	105	95	220	285	190
Future Vol, veh/h	230	105	95	220	285	190
Conflicting Peds, #/hr	0	0	0	0	0	0
Sign Control	Stop	Stop	Free	Free	Free	Free
RT Channelized	-	None	-	None	-	None
Storage Length	0	280	-	-	-	150
Veh in Median Storage, #	0	-	-	0	0	-
Grade, %	0	-	-	0	0	-
Peak Hour Factor	96	96	96	96	96	96
Heavy Vehicles, %	3	3	3	3	4	4
Mvmt Flow	240	109	99	229	297	198

Major/Minor	Minor2		Major1		Major2	
Conflicting Flow All	609	148	495	0	-	0
Stage 1	297	-	-	-	-	-
Stage 2	313	-	-	-	-	-
Critical Hdwy	6.86	6.96	4.16	-	-	-
Critical Hdwy Stg 1	5.86	-	-	-	-	-
Critical Hdwy Stg 2	5.86	-	-	-	-	-
Follow-up Hdwy	3.53	3.33	2.23	-	-	-
Pot Cap-1 Maneuver	424	868	1058	-	-	-
Stage 1	725	-	-	-	-	-
Stage 2	712	-	-	-	-	-
Platoon blocked, %				-	-	-
Mov Cap-1 Maneuver	382	868	1058	-	-	-
Mov Cap-2 Maneuver	382	-	-	-	-	-
Stage 1	653	-	-	-	-	-
Stage 2	712	-	-	-	-	-

Approach	EB	NB	SB
HCM Control Delay, s/v	22.99	2.97	0
HCM LOS	C		

Minor Lane/Major Mvmt	NBL	NBT	EBLn1	EBLn2	SBT	SBR
Capacity (veh/h)	991	-	382	868	-	-
HCM Lane V/C Ratio	0.094	-	0.628	0.126	-	-
HCM Control Delay (s/veh)	8.8	0.5	29	9.7	-	-
HCM Lane LOS	A	A	D	A	-	-
HCM 95th %tile Q(veh)	0.3	-	4.1	0.4	-	-

Intersection	
Int Delay, s/veh	0.9

Movement	EBL	EBT	EBR	WBL	WBT	WBR	NBL	NBT	NBR	SBL	SBT	SBR
Lane Configurations												
Traffic Vol, veh/h	25	0	340	0	0	0	0	325	100	25	155	0
Future Vol, veh/h	25	0	340	0	0	0	0	325	100	25	155	0
Conflicting Peds, #/hr	0	0	0	0	0	0	0	0	0	0	0	0
Sign Control	Stop	Stop	Stop	Stop	Stop	Stop	Free	Free	Free	Free	Free	Free
RT Channelized	-	-	Free	-	-	None	-	-	Yield	-	-	None
Storage Length	0	-	220	-	-	-	-	-	0	800	-	-
Veh in Median Storage, #	-	0	-	-	0	-	-	0	-	-	0	-
Grade, %	-	0	-	-	0	-	-	0	-	-	0	-
Peak Hour Factor	90	90	90	92	92	92	90	90	90	90	90	90
Heavy Vehicles, %	2	2	2	2	2	2	3	3	3	6	6	6
Mvmt Flow	28	0	378	0	0	0	0	361	111	28	172	0

Major/Minor	Minor2			Major1			Major2		
Conflicting Flow All	589	-	-	-	0	0	361	0	0
Stage 1	228	-	-	-	-	-	-	-	-
Stage 2	361	-	-	-	-	-	-	-	-
Critical Hdwy	6.42	-	-	-	-	-	4.16	-	-
Critical Hdwy Stg 1	5.42	-	-	-	-	-	-	-	-
Critical Hdwy Stg 2	5.42	-	-	-	-	-	-	-	-
Follow-up Hdwy	3.518	-	-	-	-	-	2.254	-	-
Pot Cap-1 Maneuver	471	0	0	0	-	-	1176	-	0
Stage 1	810	0	0	0	-	-	-	-	0
Stage 2	705	0	0	0	-	-	-	-	0
Platoon blocked, %					-	-		-	
Mov Cap-1 Maneuver	460	0	-	-	-	-	1176	-	-
Mov Cap-2 Maneuver	460	0	-	-	-	-	-	-	-
Stage 1	810	0	-	-	-	-	-	-	-
Stage 2	688	0	-	-	-	-	-	-	-

Approach	EB	NB	SB
HCM Control Delay, s/v	13.33	0	1.13
HCM LOS	B		

Minor Lane/Major Mvmt	NBT	NBR	EBLn1	EBLn2	SBL	SBT
Capacity (veh/h)	-	-	460	-	1176	-
HCM Lane V/C Ratio	-	-	0.06	-	0.024	-
HCM Control Delay (s/veh)	-	-	13.3	0	8.1	-
HCM Lane LOS	-	-	B	A	A	-
HCM 95th %tile Q(veh)	-	-	0.2	-	0.1	-

Intersection	
Int Delay, s/veh	8.3

Movement	EBL	EBT	EBR	WBL	WBT	WBR	NBL	NBT	NBR	SBL	SBT	SBR
Lane Configurations												
Traffic Vol, veh/h	0	0	0	110	0	10	265	85	0	0	70	10
Future Vol, veh/h	0	0	0	110	0	10	265	85	0	0	70	10
Conflicting Peds, #/hr	0	0	0	0	0	0	0	0	0	0	0	0
Sign Control	Stop	Stop	Stop	Stop	Stop	Stop	Free	Free	Free	Free	Free	Free
RT Channelized	-	-	None	-	-	Stop	-	-	None	-	-	Yield
Storage Length	-	-	-	0	-	150	800	-	-	-	-	420
Veh in Median Storage, #	-	0	-	-	0	-	-	0	-	-	0	-
Grade, %	-	0	-	-	0	-	-	0	-	-	0	-
Peak Hour Factor	97	97	97	97	97	97	97	97	97	97	97	97
Heavy Vehicles, %	2	2	2	7	7	7	2	2	2	2	2	2
Mvmt Flow	0	0	0	113	0	10	273	88	0	0	72	10

Major/Minor	Minor1			Major1			Major2			
Conflicting Flow All	706	-	88	72	0	-	-	-	0	
Stage 1	634	-	-	-	-	-	-	-	-	
Stage 2	72	-	-	-	-	-	-	-	-	
Critical Hdwy	6.47	-	6.27	4.12	-	-	-	-	-	
Critical Hdwy Stg 1	5.47	-	-	-	-	-	-	-	-	
Critical Hdwy Stg 2	5.47	-	-	-	-	-	-	-	-	
Follow-up Hdwy	3.563	-	3.363	2.218	-	-	-	-	-	
Pot Cap-1 Maneuver	395	0	957	1528	-	0	0	-	-	
Stage 1	519	0	-	-	-	0	0	-	-	
Stage 2	938	0	-	-	-	0	0	-	-	
Platoon blocked, %					-			-	-	
Mov Cap-1 Maneuver	324	0	957	1528	-	-	-	-	-	
Mov Cap-2 Maneuver	324	0	-	-	-	-	-	-	-	
Stage 1	426	0	-	-	-	-	-	-	-	
Stage 2	938	0	-	-	-	-	-	-	-	

Approach	WB	NB	SB
HCM Control Delay, s/v	20.87	5.96	0
HCM LOS	C		

Minor Lane/Major Mvmt	NBL	NBT	WBLn1	WBLn2	SBT	SBR
Capacity (veh/h)	1528	-	324	957	-	-
HCM Lane V/C Ratio	0.179	-	0.35	0.011	-	-
HCM Control Delay (s/veh)	7.9	-	22	8.8	-	-
HCM Lane LOS	A	-	C	A	-	-
HCM 95th %tile Q(veh)	0.7	-	1.5	0	-	-

Appendix C: Future-Year (Year 2049) Traffic Operations Analysis Worksheets

HCM 7th Signalized Intersection Summary
100: Shopiere Road & Prairie Avenue

07/30/2024

Movement	NBL	NBT	NBR	SBL	SBT	SBR	NEL	NET	NER	SWL	SWT	SWR
Lane Configurations												
Traffic Volume (veh/h)	25	330	110	75	215	60	120	295	15	140	320	0
Future Volume (veh/h)	25	330	110	75	215	60	120	295	15	140	320	0
Initial Q (Qb), veh	0	0	0	0	0	0	0	0	0	0	0	0
Lane Width Adj.	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00
Ped-Bike Adj(A_pbT)	1.00		1.00	1.00		1.00	1.00		1.00	1.00		1.00
Parking Bus, Adj	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00
Work Zone On Approach		No			No			No			No	
Adj Sat Flow, veh/h/ln	1723	1723	1723	1723	1723	1723	1709	1709	1709	1709	1709	0
Adj Flow Rate, veh/h	28	375	125	85	244	68	136	335	0	159	364	0
Peak Hour Factor	0.88	0.88	0.88	0.88	0.88	0.88	0.88	0.88	0.88	0.88	0.88	0.88
Percent Heavy Veh, %	2	2	2	2	2	2	3	3	3	3	3	0
Cap, veh/h	376	501	167	234	526	146	356	474		369	448	0
Arrive On Green	0.41	0.41	0.41	0.41	0.41	0.41	0.11	0.28	0.00	0.10	0.26	0.00
Sat Flow, veh/h	983	1236	412	827	1296	361	1628	1709	1448	1628	1709	0
Grp Volume(v), veh/h	28	0	500	85	0	312	136	335	0	159	364	0
Grp Sat Flow(s),veh/h/ln	983	0	1649	827	0	1658	1628	1709	1448	1628	1709	0
Q Serve(g_s), s	1.4	0.0	16.6	6.3	0.0	8.8	3.6	11.3	0.0	4.4	12.8	0.0
Cycle Q Clear(g_c), s	10.2	0.0	16.6	22.8	0.0	8.8	3.6	11.3	0.0	4.4	12.8	0.0
Prop In Lane	1.00		0.25	1.00		0.22	1.00		1.00	1.00		0.00
Lane Grp Cap(c), veh/h	376	0	668	234	0	672	356	474		369	448	0
V/C Ratio(X)	0.07	0.00	0.75	0.36	0.00	0.46	0.38	0.71		0.43	0.81	0.00
Avail Cap(c_a), veh/h	591	0	1030	286	0	777	552	801		591	801	0
HCM Platoon Ratio	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00
Upstream Filter(I)	1.00	0.00	1.00	1.00	0.00	1.00	1.00	1.00	0.00	1.00	1.00	0.00
Uniform Delay (d), s/veh	17.7	0.0	16.2	26.0	0.0	13.9	15.1	20.8	0.0	15.5	22.1	0.0
Incr Delay (d2), s/veh	0.1	0.0	1.7	0.9	0.0	0.5	0.7	1.9	0.0	0.8	3.6	0.0
Initial Q Delay(d3), s/veh	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
%ile BackOfQ(95%),veh/ln	0.6	0.0	10.0	2.2	0.0	5.6	2.4	8.0	0.0	2.9	9.1	0.0
Unsig. Movement Delay, s/veh												
LnGrp Delay(d), s/veh	17.8	0.0	17.9	26.9	0.0	14.4	15.8	22.7	0.0	16.3	25.8	0.0
LnGrp LOS	B		B	C		B	B	C		B	C	
Approach Vol, veh/h		528			397			471			523	
Approach Delay, s/veh		17.9			17.1			20.7			22.9	
Approach LOS		B			B			C			C	

Timer - Assigned Phs	2	3	4	6	7	8
Phs Duration (G+Y+Rc), s	30.9	11.3	21.8	30.9	10.3	22.8
Change Period (Y+Rc), s	5.0	4.0	5.0	5.0	4.0	5.0
Max Green Setting (Gmax), s	30.0	15.0	30.0	40.0	15.0	30.0
Max Q Clear Time (g_c+I1), s	24.8	5.6	14.8	18.6	6.4	13.3
Green Ext Time (p_c), s	1.1	0.2	2.0	3.7	0.3	1.9

Intersection Summary	
HCM 7th Control Delay, s/veh	19.8
HCM 7th LOS	B

Notes

Unsignalized Delay for [NER] is excluded from calculations of the approach delay and intersection delay.

Intersection	
Int Delay, s/veh	2.3

Movement	EBL	EBT	EBR	WBL	WBT	WBR	NBL	NBT	NBR	SBL	SBT	SBR
Lane Configurations												
Traffic Vol, veh/h	30	0	55	0	10	30	15	435	0	0	295	25
Future Vol, veh/h	30	0	55	0	10	30	15	435	0	0	295	25
Conflicting Peds, #/hr	0	0	0	0	0	0	0	0	0	0	0	0
Sign Control	Stop	Stop	Stop	Stop	Stop	Stop	Free	Free	Free	Free	Free	Free
RT Channelized	-	-	None	-	-	None	-	-	None	-	-	None
Storage Length	-	-	-	-	-	-	0	-	-	-	-	-
Veh in Median Storage, #	-	0	-	-	0	-	-	0	-	-	0	-
Grade, %	-	0	-	-	0	-	-	0	-	-	0	-
Peak Hour Factor	90	90	90	90	90	90	90	90	90	90	90	90
Heavy Vehicles, %	2	2	2	17	17	17	2	2	2	2	2	2
Mvmt Flow	33	0	61	0	11	33	17	483	0	0	328	28

Major/Minor	Minor2			Minor1			Major1			Major2		
Conflicting Flow All	864	858	342	-	872	483	356	0	-	-	-	0
Stage 1	342	342	-	-	517	-	-	-	-	-	-	-
Stage 2	522	517	-	-	356	-	-	-	-	-	-	-
Critical Hdwy	7.12	6.52	6.22	-	6.67	6.37	4.12	-	-	-	-	-
Critical Hdwy Stg 1	6.12	5.52	-	-	5.67	-	-	-	-	-	-	-
Critical Hdwy Stg 2	6.12	5.52	-	-	5.67	-	-	-	-	-	-	-
Follow-up Hdwy	3.518	4.018	3.318	-	4.153	3.453	2.218	-	-	-	-	-
Pot Cap-1 Maneuver	274	294	701	0	273	554	1203	-	0	0	-	-
Stage 1	673	638	-	0	510	-	-	-	0	0	-	-
Stage 2	538	534	-	0	604	-	-	-	0	0	-	-
Platoon blocked, %								-			-	-
Mov Cap-1 Maneuver	244	290	701	-	269	554	1203	-	-	-	-	-
Mov Cap-2 Maneuver	244	290	-	-	269	-	-	-	-	-	-	-
Stage 1	673	638	-	-	503	-	-	-	-	-	-	-
Stage 2	487	526	-	-	604	-	-	-	-	-	-	-

Approach	EB	WB	NB	SB
HCM Control Delay, s/v	15.97	14.14	0.27	0
HCM LOS	C	B		

Minor Lane/Major Mvmt	NBL	NBT	EBLn1	WBLn1	SBT	SBR
Capacity (veh/h)	1203	-	422	438	-	-
HCM Lane V/C Ratio	0.014	-	0.224	0.101	-	-
HCM Control Delay (s/veh)	8	-	16	14.1	-	-
HCM Lane LOS	A	-	C	B	-	-
HCM 95th %tile Q(veh)	0	-	0.8	0.3	-	-

Intersection	
Int Delay, s/veh	1.8

Movement	EBL	EBT	EBR	WBL	WBT	WBR	NBL	NBT	NBR	SBL	SBT	SBR
Lane Configurations												
Traffic Vol, veh/h	0	0	0	40	20	25	0	435	45	15	420	15
Future Vol, veh/h	0	0	0	40	20	25	0	435	45	15	420	15
Conflicting Peds, #/hr	0	0	0	0	0	0	0	0	0	0	0	0
Sign Control	Stop	Stop	Stop	Stop	Stop	Stop	Free	Free	Free	Free	Free	Free
RT Channelized	-	-	None	-	-	None	-	-	Yield	-	-	None
Storage Length	-	-	-	-	-	0	-	-	80	-	-	-
Veh in Median Storage, #	-	0	-	-	0	-	-	0	-	-	0	-
Grade, %	-	0	-	-	0	-	-	0	-	-	0	-
Peak Hour Factor	92	92	92	89	89	89	89	89	89	89	89	89
Heavy Vehicles, %	2	2	2	12	12	12	3	3	3	3	3	3
Mvmt Flow	0	0	0	45	22	28	0	489	51	17	472	17

Major/Minor	Minor1			Major1			Major2		
Conflicting Flow All	994	1011	489	-	0	0	489	0	0
Stage 1	489	489	-	-	-	-	-	-	-
Stage 2	506	522	-	-	-	-	-	-	-
Critical Hdwy	6.52	6.62	6.32	-	-	-	4.13	-	-
Critical Hdwy Stg 1	5.52	5.62	-	-	-	-	-	-	-
Critical Hdwy Stg 2	5.52	5.62	-	-	-	-	-	-	-
Follow-up Hdwy	3.608	4.108	3.408	-	-	-	2.227	-	-
Pot Cap-1 Maneuver	260	230	559	0	-	-	1069	-	-
Stage 1	596	533	-	0	-	-	-	-	-
Stage 2	586	515	-	0	-	-	-	-	-
Platoon blocked, %					-	-		-	-
Mov Cap-1 Maneuver	255	0	559	-	-	-	1069	-	-
Mov Cap-2 Maneuver	255	0	-	-	-	-	-	-	-
Stage 1	596	0	-	-	-	-	-	-	-
Stage 2	573	0	-	-	-	-	-	-	-

Approach	WB	NB	SB
HCM Control Delay, s/v	20.51	0	0.28
HCM LOS	C		

Minor Lane/Major Mvmt	NBT	NBR	WBLn1	WBLn2	SBL	SBT	SBR
Capacity (veh/h)	-	-	255	559	60	-	-
HCM Lane V/C Ratio	-	-	0.265	0.05	0.016	-	-
HCM Control Delay (s/veh)	-	-	24.2	11.8	8.4	0	-
HCM Lane LOS	-	-	C	B	A	A	-
HCM 95th %tile Q(veh)	-	-	1	0.2	0	-	-

Movement	EBL	EBT	EBR	WBL	WBT	WBR	NBL	NBT	NBR	SBL	SBT	SBR
Lane Configurations												
Traffic Volume (veh/h)	190	280	140	115	315	30	150	255	105	25	300	200
Future Volume (veh/h)	190	280	140	115	315	30	150	255	105	25	300	200
Initial Q (Qb), veh	0	0	0	0	0	0	0	0	0	0	0	0
Lane Width Adj.	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00
Ped-Bike Adj(A_pbT)	1.00		1.00	1.00		1.00	1.00		1.00	1.00		1.00
Parking Bus, Adj	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00
Work Zone On Approach		No			No			No			No	
Adj Sat Flow, veh/h/ln	1762	1762	1723	1748	1748	1856	1748	1748	1709	1748	1748	1709
Adj Flow Rate, veh/h	218	322	100	132	362	34	172	293	75	29	345	143
Peak Hour Factor	0.87	0.87	0.87	0.87	0.87	0.87	0.87	0.87	0.87	0.87	0.87	0.87
Percent Heavy Veh, %	2	2	2	3	3	3	3	3	3	3	3	3
Cap, veh/h	422	431	357	330	623	58	353	522	432	374	460	381
Arrive On Green	0.14	0.24	0.24	0.09	0.20	0.20	0.11	0.30	0.30	0.07	0.26	0.26
Sat Flow, veh/h	1678	1762	1460	1665	3070	287	1665	1748	1448	1665	1748	1448
Grp Volume(v), veh/h	218	322	100	132	195	201	172	293	75	29	345	143
Grp Sat Flow(s),veh/h/ln	1678	1762	1460	1665	1661	1696	1665	1748	1448	1665	1748	1448
Q Serve(g_s), s	6.8	11.6	3.8	4.2	7.3	7.4	5.0	9.7	2.6	0.8	12.5	5.6
Cycle Q Clear(g_c), s	6.8	11.6	3.8	4.2	7.3	7.4	5.0	9.7	2.6	0.8	12.5	5.6
Prop In Lane	1.00		1.00	1.00		0.17	1.00		1.00	1.00		1.00
Lane Grp Cap(c), veh/h	422	431	357	330	337	344	353	522	432	374	460	381
V/C Ratio(X)	0.52	0.75	0.28	0.40	0.58	0.58	0.49	0.56	0.17	0.08	0.75	0.38
Avail Cap(c_a), veh/h	924	767	635	897	723	738	898	761	630	978	761	630
HCM Platoon Ratio	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00
Upstream Filter(I)	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00
Uniform Delay (d), s/veh	17.8	24.1	21.1	19.1	24.8	24.8	16.6	20.4	17.9	15.9	23.3	20.8
Incr Delay (d2), s/veh	1.0	4.4	0.7	0.8	1.6	1.6	1.0	1.0	0.2	0.1	4.2	1.0
Initial Q Delay(d3), s/veh	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
%ile BackOfQ(95%),veh/ln	4.5	8.7	2.3	2.8	5.1	5.3	3.3	6.8	1.5	0.5	9.0	3.3
Unsig. Movement Delay, s/veh												
LnGrp Delay(d), s/veh	18.8	28.4	21.8	19.9	26.4	26.4	17.7	21.3	18.1	16.0	27.5	21.8
LnGrp LOS	B	C	C	B	C	C	B	C	B	B	C	C
Approach Vol, veh/h		640			528			540			517	
Approach Delay, s/veh		24.1			24.8			19.7			25.3	
Approach LOS		C			C			B			C	

Timer - Assigned Phs	1	2	3	4	5	6	7	8
Phs Duration (G+Y+Rc), s	11.5	21.9	12.4	23.1	14.4	19.0	10.0	25.6
Change Period (Y+Rc), s	5.0	5.0	5.0	5.0	5.0	5.0	5.0	5.0
Max Green Setting (Gmax), s	30.0	30.0	30.0	30.0	30.0	30.0	30.0	30.0
Max Q Clear Time (g_c+I1), s	6.2	13.6	7.0	14.5	8.8	9.4	2.8	11.7
Green Ext Time (p_c), s	0.3	3.2	0.4	3.6	0.6	2.2	0.0	1.8

Intersection Summary	
HCM 7th Control Delay, s/veh	23.5
HCM 7th LOS	C

Intersection	
Int Delay, s/veh	4.6

Movement	EBL	EBR	NBL	NBT	SBT	SBR
Lane Configurations						
Traffic Vol, veh/h	125	60	45	460	425	60
Future Vol, veh/h	125	60	45	460	425	60
Conflicting Peds, #/hr	0	0	0	0	0	0
Sign Control	Stop	Stop	Free	Free	Free	Free
RT Channelized	-	None	-	None	-	None
Storage Length	0	50	-	-	-	-
Veh in Median Storage, #	0	-	-	0	0	-
Grade, %	0	-	-	0	0	-
Peak Hour Factor	87	87	87	87	87	87
Heavy Vehicles, %	2	2	3	3	4	4
Mvmt Flow	144	69	52	529	489	69

Major/Minor	Minor2		Major1		Major2	
Conflicting Flow All	891	279	557	0	-	0
Stage 1	523	-	-	-	-	-
Stage 2	368	-	-	-	-	-
Critical Hdwy	6.84	6.94	4.16	-	-	-
Critical Hdwy Stg 1	5.84	-	-	-	-	-
Critical Hdwy Stg 2	5.84	-	-	-	-	-
Follow-up Hdwy	3.52	3.32	2.23	-	-	-
Pot Cap-1 Maneuver	282	718	1002	-	-	-
Stage 1	559	-	-	-	-	-
Stage 2	670	-	-	-	-	-
Platoon blocked, %				-	-	-
Mov Cap-1 Maneuver	265	718	1002	-	-	-
Mov Cap-2 Maneuver	265	-	-	-	-	-
Stage 1	525	-	-	-	-	-
Stage 2	670	-	-	-	-	-

Approach	EB	NB	SB
HCM Control Delay, s/v	26.12	1.19	0
HCM LOS	D		

Minor Lane/Major Mvmt	NBL	NBT	EBLn1	EBLn2	SBT	SBR
Capacity (veh/h)	321	-	265	718	-	-
HCM Lane V/C Ratio	0.052	-	0.542	0.096	-	-
HCM Control Delay (s/veh)	8.8	0.4	33.6	10.5	-	-
HCM Lane LOS	A	A	D	B	-	-
HCM 95th %tile Q(veh)	0.2	-	3	0.3	-	-

Intersection	
Int Delay, s/veh	2.9

Movement	EBL	EBR	NBL	NBT	SBT	SBR
Lane Configurations						
Traffic Vol, veh/h	45	95	90	490	390	35
Future Vol, veh/h	45	95	90	490	390	35
Conflicting Peds, #/hr	0	0	0	0	0	0
Sign Control	Stop	Stop	Free	Free	Free	Free
RT Channelized	-	None	-	None	-	None
Storage Length	0	75	-	-	-	-
Veh in Median Storage, #	0	-	-	0	0	-
Grade, %	0	-	-	0	0	-
Peak Hour Factor	88	88	88	88	88	88
Heavy Vehicles, %	2	2	3	3	4	4
Mvmt Flow	51	108	102	557	443	40

Major/Minor	Minor2		Major1		Major2	
Conflicting Flow All	946	241	483	0	-	0
Stage 1	463	-	-	-	-	-
Stage 2	483	-	-	-	-	-
Critical Hdwy	6.84	6.94	4.16	-	-	-
Critical Hdwy Stg 1	5.84	-	-	-	-	-
Critical Hdwy Stg 2	5.84	-	-	-	-	-
Follow-up Hdwy	3.52	3.32	2.23	-	-	-
Pot Cap-1 Maneuver	260	759	1069	-	-	-
Stage 1	600	-	-	-	-	-
Stage 2	586	-	-	-	-	-
Platoon blocked, %				-	-	-
Mov Cap-1 Maneuver	230	759	1069	-	-	-
Mov Cap-2 Maneuver	230	-	-	-	-	-
Stage 1	532	-	-	-	-	-
Stage 2	586	-	-	-	-	-

Approach	EB	NB	SB
HCM Control Delay, s/v	15.19	1.96	0
HCM LOS	C		

Minor Lane/Major Mvmt	NBL	NBT	EBLn1	EBLn2	SBT	SBR
Capacity (veh/h)	559	-	230	759	-	-
HCM Lane V/C Ratio	0.096	-	0.222	0.142	-	-
HCM Control Delay (s/veh)	8.7	0.7	25	10.5	-	-
HCM Lane LOS	A	A	D	B	-	-
HCM 95th %tile Q(veh)	0.3	-	0.8	0.5	-	-

Intersection	
Int Delay, s/veh	3.4

Movement	WBL	WBR	NBT	NBR	SBL	SBT
Lane Configurations						
Traffic Vol, veh/h	120	15	455	115	10	325
Future Vol, veh/h	120	15	455	115	10	325
Conflicting Peds, #/hr	0	0	0	0	0	0
Sign Control	Stop	Stop	Free	Free	Free	Free
RT Channelized	-	Stop	-	None	-	None
Storage Length	0	400	-	-	-	-
Veh in Median Storage, #	0	-	0	-	-	0
Grade, %	0	-	0	-	-	0
Peak Hour Factor	87	87	87	87	87	87
Heavy Vehicles, %	13	13	2	2	6	6
Mvmt Flow	138	17	523	132	11	374

Major/Minor	Minor1		Major1		Major2	
Conflicting Flow All	799	328	0	0	655	0
Stage 1	589	-	-	-	-	-
Stage 2	210	-	-	-	-	-
Critical Hdwy	7.06	7.16	-	-	4.22	-
Critical Hdwy Stg 1	6.06	-	-	-	-	-
Critical Hdwy Stg 2	6.06	-	-	-	-	-
Follow-up Hdwy	3.63	3.43	-	-	2.26	-
Pot Cap-1 Maneuver	301	637	-	-	901	-
Stage 1	488	-	-	-	-	-
Stage 2	773	-	-	-	-	-
Platoon blocked, %			-	-		-
Mov Cap-1 Maneuver	297	637	-	-	901	-
Mov Cap-2 Maneuver	297	-	-	-	-	-
Stage 1	488	-	-	-	-	-
Stage 2	762	-	-	-	-	-

Approach	WB	NB	SB
HCM Control Delay, s/v	25.37	0	0.39
HCM LOS	D		

Minor Lane/Major Mvmt	NBT	NBR	WBLn1	WBLn2	SBL	SBT
Capacity (veh/h)	-	-	297	637	107	-
HCM Lane V/C Ratio	-	-	0.464	0.027	0.013	-
HCM Control Delay (s/veh)	-	-	27.2	10.8	9	0.1
HCM Lane LOS	-	-	D	B	A	A
HCM 95th %tile Q(veh)	-	-	2.3	0.1	0	-

Intersection	
Int Delay, s/veh	612.9

Movement	EBL	EBT	EBR	WBL	WBT	WBR	NBL	NBT	NBR	SBL	SBT	SBR
Lane Configurations												
Traffic Vol, veh/h	275	335	95	5	385	190	90	370	5	155	230	270
Future Vol, veh/h	275	335	95	5	385	190	90	370	5	155	230	270
Conflicting Peds, #/hr	0	0	0	0	0	0	0	0	0	0	0	0
Sign Control	Stop	Stop	Stop	Stop	Stop	Stop	Free	Free	Free	Free	Free	Free
RT Channelized	-	-	None	-	-	None	-	-	None	-	-	None
Storage Length	200	-	280	100	-	200	-	-	-	-	-	150
Veh in Median Storage, #	-	0	-	-	0	-	-	0	-	-	0	-
Grade, %	-	0	-	-	0	-	-	0	-	-	0	-
Peak Hour Factor	89	92	89	92	92	92	89	89	92	92	89	89
Heavy Vehicles, %	11	2	11	2	2	2	5	5	2	2	5	5
Mvmt Flow	309	364	107	5	418	207	101	416	5	168	258	303

Major/Minor	Minor2			Minor1			Major1			Major2		
Conflicting Flow All	1215	1219	129	1269	1519	211	562	0	0	421	0	0
Stage 1	595	595	-	621	621	-	-	-	-	-	-	-
Stage 2	619	623	-	648	899	-	-	-	-	-	-	-
Critical Hdwy	7.72	6.54	7.12	7.54	6.54	6.94	4.2	-	-	4.14	-	-
Critical Hdwy Stg 1	6.72	5.54	-	6.54	5.54	-	-	-	-	-	-	-
Critical Hdwy Stg 2	6.72	5.54	-	6.54	5.54	-	-	-	-	-	-	-
Follow-up Hdwy	3.61	4.02	3.41	3.52	4.02	3.32	2.25	-	-	2.22	-	-
Pot Cap-1 Maneuver	~ 127	~ 179	869	125	~ 118	795	985	-	-	1134	-	-
Stage 1	436	490	-	442	478	-	-	-	-	-	-	-
Stage 2	421	476	-	425	~ 356	-	-	-	-	-	-	-
Platoon blocked, %								-	-		-	-
Mov Cap-1 Maneuver	~ 68	~ 130	869	80	~ 85	795	985	-	-	1134	-	-
Mov Cap-2 Maneuver	~ 68	~ 130	-	80	~ 85	-	-	-	-	-	-	-
Stage 1	358	402	-	390	422	-	-	-	-	-	-	-
Stage 2	~ 2	421	-	29	~ 292	-	-	-	-	-	-	-

Approach	EB	WB	NB	SB
HCM Control Delay, s/veh	$ 1090.41	$ 1235.57	2.32	2.25
HCM LOS	F	F		

Minor Lane/Major Mvmt	NBL	NBT	NBR	EBLn1	EBLn2	EBLn3	WBLn1	WBLn2	WBLn3	SBL	SBT	SBR
Capacity (veh/h)	685	-	-	68	130	869	80	85	795	1053	-	-
HCM Lane V/C Ratio	0.103	-	-	4.516	2.805	0.123	0.068	4.903	0.26	0.149	-	-
HCM Control Delay (s/veh)	9.1	0.7	$ 1704.8	$ 885.9	9.7	53.3	$ 1855.2	11.1	8.7	0.7	-	
HCM Lane LOS	A	A	-	F	F	A	F	F	B	A	A	-
HCM 95th %tile Q(veh)	0.3	-	-	33.5	33.4	0.4	0.2	45.1	1	0.5	-	-

Notes			
~: Volume exceeds capacity	$: Delay exceeds 300s	+: Computation Not Defined	*: All major volume in platoon

Intersection	
Int Delay, s/veh	0.4

Movement	EBL	EBT	EBR	WBL	WBT	WBR	NBL	NBT	NBR	SBL	SBT	SBR
Lane Configurations												
Traffic Vol, veh/h	10	0	455	0	0	0	0	605	230	30	340	0
Future Vol, veh/h	10	0	455	0	0	0	0	605	230	30	340	0
Conflicting Peds, #/hr	0	0	0	0	0	0	0	0	0	0	0	0
Sign Control	Stop	Stop	Stop	Stop	Stop	Stop	Free	Free	Free	Free	Free	Free
RT Channelized	-	-	Free	-	-	None	-	-	Yield	-	-	None
Storage Length	0	-	220	-	-	-	-	-	0	800	-	-
Veh in Median Storage, #	-	0	-	-	0	-	-	0	-	-	0	-
Grade, %	-	0	-	-	0	-	-	0	-	-	0	-
Peak Hour Factor	86	86	86	92	92	92	86	86	86	86	86	86
Heavy Vehicles, %	3	3	3	2	2	2	3	3	3	15	15	15
Mvmt Flow	12	0	529	0	0	0	0	703	267	35	395	0

Major/Minor	Minor2			Major1			Major2		
Conflicting Flow All	1169	-	-	-	0	0	703	0	0
Stage 1	465	-	-	-	-	-	-	-	-
Stage 2	703	-	-	-	-	-	-	-	-
Critical Hdwy	6.43	-	-	-	-	-	4.25	-	-
Critical Hdwy Stg 1	5.43	-	-	-	-	-	-	-	-
Critical Hdwy Stg 2	5.43	-	-	-	-	-	-	-	-
Follow-up Hdwy	3.527	-	-	-	-	-	2.335	-	-
Pot Cap-1 Maneuver	213	0	0	0	-	-	837	-	0
Stage 1	630	0	0	0	-	-	-	-	0
Stage 2	489	0	0	0	-	-	-	-	0
Platoon blocked, %					-	-		-	
Mov Cap-1 Maneuver	204	0	-	-	-	-	837	-	-
Mov Cap-2 Maneuver	204	0	-	-	-	-	-	-	-
Stage 1	630	0	-	-	-	-	-	-	-
Stage 2	468	0	-	-	-	-	-	-	-

Approach	EB	NB	SB
HCM Control Delay, s/v	23.74	0	0.77
HCM LOS	C		

Minor Lane/Major Mvmt	NBT	NBR	EBLn1	EBLn2	SBL	SBT
Capacity (veh/h)	-	-	204	-	837	-
HCM Lane V/C Ratio	-	-	0.057	-	0.042	-
HCM Control Delay (s/veh)	-	-	23.7	0	9.5	-
HCM Lane LOS	-	-	C	A	A	-
HCM 95th %tile Q(veh)	-	-	0.2	-	0.1	-

Intersection	
Int Delay, s/veh	577.5

Movement	EBL	EBT	EBR	WBL	WBT	WBR	NBL	NBT	NBR	SBL	SBT	SBR
Lane Configurations												
Traffic Vol, veh/h	0	0	0	285	0	10	580	30	0	0	85	45
Future Vol, veh/h	0	0	0	285	0	10	580	30	0	0	85	45
Conflicting Peds, #/hr	0	0	0	0	0	0	0	0	0	0	0	0
Sign Control	Stop	Stop	Stop	Stop	Stop	Stop	Free	Free	Free	Free	Free	Free
RT Channelized	-	-	None	-	-	Stop	-	-	None	-	-	Yield
Storage Length	-	-	-	0	-	150	800	-	-	-	-	420
Veh in Median Storage, #	-	0	-	-	0	-	-	0	-	-	0	-
Grade, %	-	0	-	-	0	-	-	0	-	-	0	-
Peak Hour Factor	84	84	84	84	84	84	84	84	84	84	84	84
Heavy Vehicles, %	2	2	2	21	21	21	2	2	2	3	3	3
Mvmt Flow	0	0	0	339	0	12	690	36	0	0	101	54

Major/Minor	Minor1			Major1			Major2			
Conflicting Flow All	1518	-	36	101	0	-	-	-	0	
Stage 1	1417	-	-	-	-	-	-	-	-	
Stage 2	101	-	-	-	-	-	-	-	-	
Critical Hdwy	6.61	-	6.41	4.12	-	-	-	-	-	
Critical Hdwy Stg 1	5.61	-	-	-	-	-	-	-	-	
Critical Hdwy Stg 2	5.61	-	-	-	-	-	-	-	-	
Follow-up Hdwy	3.689	-	3.489	2.218	-	-	-	-	-	
Pot Cap-1 Maneuver	~ 119	0	985	1491	-	0	0	-	-	
Stage 1	~ 203	0	-	-	-	0	0	-	-	
Stage 2	877	0	-	-	-	0	0	-	-	
Platoon blocked, %					-			-	-	
Mov Cap-1 Maneuver	~ 64	0	985	1491	-	-	-	-	-	
Mov Cap-2 Maneuver	~ 64	0	-	-	-	-	-	-	-	
Stage 1	~ 109	0	-	-	-	-	-	-	-	
Stage 2	877	0	-	-	-	-	-	-	-	

Approach	WB	NB	SB
HCM Control Delay, s/v	$ 2007.53	9.01	0
HCM LOS	F		

Minor Lane/Major Mvmt	NBL	NBT	WBLn1	WBLn2	SBT	SBR
Capacity (veh/h)	1491	-	64	985	-	-
HCM Lane V/C Ratio	0.463	-	5.331	0.012	-	-
HCM Control Delay (s/veh)	9.5	-	$ 2077.7	8.7	-	-
HCM Lane LOS	A	-	F	A	-	-
HCM 95th %tile Q(veh)	2.5	-	37.8	0	-	-

Notes			
~: Volume exceeds capacity	$: Delay exceeds 300s	+: Computation Not Defined	*: All major volume in platoon

Intersection	
Intersection Delay, s/veh	22.9
Intersection LOS	C

Movement	EBL	EBT	EBR	WBL	WBT	WBR	NBL	NBT	NBR	SBL	SBT	SBR
Lane Configurations												
Traffic Vol, veh/h	5	135	5	30	155	285	5	290	20	255	235	5
Future Vol, veh/h	5	135	5	30	155	285	5	290	20	255	235	5
Peak Hour Factor	0.92	0.92	0.92	0.92	0.92	0.92	0.92	0.92	0.92	0.92	0.92	0.92
Heavy Vehicles, %	2	2	2	2	2	2	2	2	2	2	2	2
Mvmt Flow	5	147	5	33	168	310	5	315	22	277	255	5
Number of Lanes	1	1	1	1	1	1	1	1	1	1	1	1

Approach	EB	WB	NB	SB
Opposing Approach	WB	EB	SB	NB
Opposing Lanes	3	3	3	3
Conflicting Approach Left	SB	NB	EB	WB
Conflicting Lanes Left	3	3	3	3
Conflicting Approach Right	NB	SB	WB	EB
Conflicting Lanes Right	3	3	3	3
HCM Control Delay, s/veh	16.7	19.9	29.6	23.4
HCM LOS	C	C	D	C

Lane	NBLn1	NBLn2	NBLn3	EBLn1	EBLn2	EBLn3	WBLn1	WBLn2	WBLn3	SBLn1	SBLn2
Vol Left, %	100%	0%	0%	100%	0%	0%	100%	0%	0%	100%	0%
Vol Thru, %	0%	100%	0%	0%	100%	0%	0%	100%	0%	0%	100%
Vol Right, %	0%	0%	100%	0%	0%	100%	0%	0%	100%	0%	0%
Sign Control	Stop	Stop	Stop	Stop	Stop	Stop	Stop	Stop	Stop	Stop	Stop
Traffic Vol by Lane	5	290	20	5	135	5	30	155	285	255	235
LT Vol	5	0	0	5	0	0	30	0	0	255	0
Through Vol	0	290	0	0	135	0	0	155	0	0	235
RT Vol	0	0	20	0	0	5	0	0	285	0	0
Lane Flow Rate	5	315	22	5	147	5	33	168	310	277	255
Geometry Grp	6	6	6	6	6	6	6	6	6	6	6
Degree of Util (X)	0.013	0.734	0.046	0.015	0.372	0.013	0.078	0.382	0.642	0.653	0.566
Departure Headway (Hd)	8.884	8.384	7.684	9.631	9.131	8.431	8.664	8.164	7.464	8.48	7.98
Convergence, Y/N	Yes	Yes	Yes	Yes	Yes	Yes	Yes	Yes	Yes	Yes	Yes
Cap	401	429	463	374	396	427	412	438	480	424	450
Service Time	6.679	6.179	5.479	7.331	6.831	6.131	6.452	5.952	5.252	6.27	5.77
HCM Lane V/C Ratio	0.012	0.734	0.048	0.013	0.371	0.012	0.08	0.384	0.646	0.653	0.567
HCM Control Delay, s/veh	11.8	31.2	10.9	12.5	17.1	11.2	12.2	16	22.8	26	20.8
HCM Lane LOS	B	D	B	B	C	B	B	C	C	D	C
HCM 95th-tile Q	0	5.9	0.1	0	1.7	0	0.3	1.8	4.5	4.5	3.4

HCM 7th Signalized Intersection Summary
100: Shopiere Road & Prairie Avenue

07/30/2024

Movement	NBL	NBT	NBR	SBL	SBT	SBR	NEL	NET	NER	SWL	SWT	SWR
Lane Configurations												
Traffic Volume (veh/h)	45	320	180	75	450	115	85	395	45	165	215	0
Future Volume (veh/h)	45	320	180	75	450	115	85	395	45	165	215	0
Initial Q (Qb), veh	0	0	0	0	0	0	0	0	0	0	0	0
Lane Width Adj.	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00
Ped-Bike Adj(A_pbT)	1.00		1.00	1.00		1.00	1.00		1.00	1.00		1.00
Parking Bus, Adj	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00
Work Zone On Approach		No			No			No			No	
Adj Sat Flow, veh/h/ln	1723	1723	1723	1723	1723	1723	1723	1723	1723	1723	1723	0
Adj Flow Rate, veh/h	48	340	191	80	479	122	90	420	0	176	229	0
Peak Hour Factor	0.94	0.94	0.94	0.94	0.94	0.94	0.94	0.94	0.94	0.94	0.94	0.94
Percent Heavy Veh, %	2	2	2	2	2	2	2	2	2	2	2	0
Cap, veh/h	182	453	255	223	580	148	435	485		303	508	0
Arrive On Green	0.44	0.44	0.44	0.44	0.44	0.44	0.09	0.28	0.00	0.10	0.29	0.00
Sat Flow, veh/h	753	1036	582	804	1325	337	1641	1723	1460	1641	1723	0
Grp Volume(v), veh/h	48	0	531	80	0	601	90	420	0	176	229	0
Grp Sat Flow(s),veh/h/ln	753	0	1618	804	0	1662	1641	1723	1460	1641	1723	0
Q Serve(g_s), s	4.7	0.0	21.4	7.2	0.0	24.8	2.9	18.1	0.0	5.8	8.4	0.0
Cycle Q Clear(g_c), s	29.5	0.0	21.4	28.6	0.0	24.8	2.9	18.1	0.0	5.8	8.4	0.0
Prop In Lane	1.00		0.36	1.00		0.20	1.00		1.00	1.00		0.00
Lane Grp Cap(c), veh/h	182	0	708	223	0	728	435	485		303	508	0
V/C Ratio(X)	0.26	0.00	0.75	0.36	0.00	0.83	0.21	0.87		0.58	0.45	0.00
Avail Cap(c_a), veh/h	239	0	830	223	0	728	606	663		453	663	0
HCM Platoon Ratio	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00
Upstream Filter(I)	1.00	0.00	1.00	1.00	0.00	1.00	1.00	1.00	0.00	1.00	1.00	0.00
Uniform Delay (d), s/veh	32.3	0.0	18.3	30.3	0.0	19.3	16.8	26.6	0.0	19.2	22.4	0.0
Incr Delay (d2), s/veh	0.8	0.0	3.2	1.0	0.0	7.8	0.2	8.8	0.0	1.8	0.6	0.0
Initial Q Delay(d3), s/veh	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
%ile BackOfQ(95%),veh/ln	1.6	0.0	12.8	2.6	0.0	15.9	1.9	13.1	0.0	4.1	6.1	0.0
Unsig. Movement Delay, s/veh												
LnGrp Delay(d), s/veh	33.1	0.0	21.6	31.3	0.0	27.1	17.0	35.4	0.0	21.0	23.0	0.0
LnGrp LOS	C		C	C		C	B	D		C	C	
Approach Vol, veh/h		579			681			510			405	
Approach Delay, s/veh		22.5			27.6			32.2			22.1	
Approach LOS		C			C			C			C	

Timer - Assigned Phs	2	3	4	6	7	8
Phs Duration (G+Y+Rc), s	39.1	10.9	28.0	39.1	11.9	27.0
Change Period (Y+Rc), s	5.0	4.0	5.0	5.0	4.0	5.0
Max Green Setting (Gmax), s	30.0	15.0	30.0	40.0	15.0	30.0
Max Q Clear Time (g_c+I1), s	30.6	4.9	10.4	31.5	7.8	20.1
Green Ext Time (p_c), s	0.0	0.1	1.3	2.6	0.3	1.9

Intersection Summary	
HCM 7th Control Delay, s/veh	26.3
HCM 7th LOS	C

Notes

Unsignalized Delay for [NER] is excluded from calculations of the approach delay and intersection delay.

Intersection	
Int Delay, s/veh	6.6

Movement	EBL	EBT	EBR	WBL	WBT	WBR	NBL	NBT	NBR	SBL	SBT	SBR
Lane Configurations												
Traffic Vol, veh/h	55	0	55	0	35	70	30	375	0	0	585	60
Future Vol, veh/h	55	0	55	0	35	70	30	375	0	0	585	60
Conflicting Peds, #/hr	0	0	0	0	0	0	0	0	0	0	0	0
Sign Control	Stop	Stop	Stop	Stop	Stop	Stop	Free	Free	Free	Free	Free	Free
RT Channelized	-	-	None	-	-	None	-	-	None	-	-	None
Storage Length	-	-	-	-	-	-	0	-	-	-	-	-
Veh in Median Storage, #	-	0	-	-	0	-	-	0	-	-	0	-
Grade, %	-	0	-	-	0	-	-	0	-	-	0	-
Peak Hour Factor	92	92	92	92	92	92	92	92	92	92	92	92
Heavy Vehicles, %	3	3	3	4	4	4	2	2	2	2	2	2
Mvmt Flow	60	0	60	0	38	76	33	408	0	0	636	65

Major/Minor	Minor2			Minor1			Major1			Major2		
Conflicting Flow All	1160	1141	668	-	1174	408	701	0	-	-	-	0
Stage 1	668	668	-	-	473	-	-	-	-	-	-	-
Stage 2	492	473	-	-	701	-	-	-	-	-	-	-
Critical Hdwy	7.13	6.53	6.23	-	6.54	6.24	4.12	-	-	-	-	-
Critical Hdwy Stg 1	6.13	5.53	-	-	5.54	-	-	-	-	-	-	-
Critical Hdwy Stg 2	6.13	5.53	-	-	5.54	-	-	-	-	-	-	-
Follow-up Hdwy	3.527	4.027	3.327	-	4.036	3.336	2.218	-	-	-	-	-
Pot Cap-1 Maneuver	172	200	456	0	190	639	896	-	0	0	-	-
Stage 1	446	455	-	0	555	-	-	-	0	0	-	-
Stage 2	557	557	-	0	438	-	-	-	0	0	-	-
Platoon blocked, %								-			-	-
Mov Cap-1 Maneuver	116	192	456	-	183	639	896	-	-	-	-	-
Mov Cap-2 Maneuver	116	192	-	-	183	-	-	-	-	-	-	-
Stage 1	446	455	-	-	535	-	-	-	-	-	-	-
Stage 2	439	537	-	-	438	-	-	-	-	-	-	-

Approach	EB	WB	NB	SB
HCM Control Delay, s/v	54.17	20.22	0.68	0
HCM LOS	F	C		

Minor Lane/Major Mvmt	NBL	NBT	EBLn1	WBLn1	SBT	SBR
Capacity (veh/h)	896	-	185	349	-	-
HCM Lane V/C Ratio	0.036	-	0.645	0.327	-	-
HCM Control Delay (s/veh)	9.2	-	54.2	20.2	-	-
HCM Lane LOS	A	-	F	C	-	-
HCM 95th %tile Q(veh)	0.1	-	3.7	1.4	-	-

Intersection	
Int Delay, s/veh	1.5

Movement	EBL	EBT	EBR	WBL	WBT	WBR	NBL	NBT	NBR	SBL	SBT	SBR
Lane Configurations												
Traffic Vol, veh/h	0	0	0	15	15	55	0	575	75	45	360	85
Future Vol, veh/h	0	0	0	15	15	55	0	575	75	45	360	85
Conflicting Peds, #/hr	0	0	0	0	0	0	0	0	0	0	0	0
Sign Control	Stop	Stop	Stop	Stop	Stop	Stop	Free	Free	Free	Free	Free	Free
RT Channelized	-	-	None	-	-	None	-	-	Yield	-	-	None
Storage Length	-	-	-	-	-	0	-	-	80	-	-	-
Veh in Median Storage, #	-	0	-	-	0	-	-	0	-	-	0	-
Grade, %	-	0	-	-	0	-	-	0	-	-	0	-
Peak Hour Factor	92	92	92	98	98	98	98	98	98	98	98	98
Heavy Vehicles, %	2	2	2	4	4	4	2	2	2	2	2	2
Mvmt Flow	0	0	0	15	15	56	0	587	77	46	367	87

Major/Minor	Minor1			Major1			Major2		
Conflicting Flow All	1046	1133	587	-	0	0	587	0	0
Stage 1	587	587	-	-	-	-	-	-	-
Stage 2	459	546	-	-	-	-	-	-	-
Critical Hdwy	6.44	6.54	6.24	-	-	-	4.12	-	-
Critical Hdwy Stg 1	5.44	5.54	-	-	-	-	-	-	-
Critical Hdwy Stg 2	5.44	5.54	-	-	-	-	-	-	-
Follow-up Hdwy	3.536	4.036	3.336	-	-	-	2.218	-	-
Pot Cap-1 Maneuver	251	201	506	0	-	-	988	-	-
Stage 1	552	493	-	0	-	-	-	-	-
Stage 2	632	515	-	0	-	-	-	-	-
Platoon blocked, %					-	-		-	-
Mov Cap-1 Maneuver	235	0	506	-	-	-	988	-	-
Mov Cap-2 Maneuver	235	0	-	-	-	-	-	-	-
Stage 1	552	0	-	-	-	-	-	-	-
Stage 2	592	0	-	-	-	-	-	-	-

Approach	WB	NB	SB
HCM Control Delay, s/v	16.39	0	0.81
HCM LOS	C		

Minor Lane/Major Mvmt	NBT	NBR	WBLn1	WBLn2	SBL	SBT	SBR
Capacity (veh/h)	-	-	235	506	159	-	-
HCM Lane V/C Ratio	-	-	0.13	0.111	0.046	-	-
HCM Control Delay (s/veh)	-	-	22.6	13	8.8	0	-
HCM Lane LOS	-	-	C	B	A	A	-
HCM 95th %tile Q(veh)	-	-	0.4	0.4	0.1	-	-

Movement	EBL	EBT	EBR	WBL	WBT	WBR	NBL	NBT	NBR	SBL	SBT	SBR
Lane Configurations												
Traffic Volume (veh/h)	300	555	240	155	425	55	255	335	220	25	240	370
Future Volume (veh/h)	300	555	240	155	425	55	255	335	220	25	240	370
Initial Q (Qb), veh	0	0	0	0	0	0	0	0	0	0	0	0
Lane Width Adj.	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00
Ped-Bike Adj(A_pbT)	1.00		1.00	1.00		1.00	1.00		1.00	1.00		1.00
Parking Bus, Adj	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00
Work Zone On Approach		No			No			No			No	
Adj Sat Flow, veh/h/ln	1762	1762	1723	1762	1762	1870	1762	1762	1723	1762	1762	1723
Adj Flow Rate, veh/h	316	584	157	163	447	58	268	353	144	26	253	241
Peak Hour Factor	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95
Percent Heavy Veh, %	2	2	2	2	2	2	2	2	2	2	2	2
Cap, veh/h	458	576	478	238	783	101	394	537	445	281	374	310
Arrive On Green	0.16	0.33	0.33	0.10	0.26	0.26	0.15	0.30	0.30	0.05	0.21	0.21
Sat Flow, veh/h	1678	1762	1460	1678	2982	385	1678	1762	1460	1678	1762	1460
Grp Volume(v), veh/h	316	584	157	163	250	255	268	353	144	26	253	241
Grp Sat Flow(s),veh/h/ln	1678	1762	1460	1678	1674	1693	1678	1762	1460	1678	1762	1460
Q Serve(g_s), s	11.8	30.0	7.4	6.3	11.9	12.0	10.8	16.0	7.0	1.1	12.1	14.3
Cycle Q Clear(g_c), s	11.8	30.0	7.4	6.3	11.9	12.0	10.8	16.0	7.0	1.1	12.1	14.3
Prop In Lane	1.00		1.00	1.00		0.23	1.00		1.00	1.00		1.00
Lane Grp Cap(c), veh/h	458	576	478	238	440	445	394	537	445	281	374	310
V/C Ratio(X)	0.69	1.01	0.33	0.68	0.57	0.57	0.68	0.66	0.32	0.09	0.68	0.78
Avail Cap(c_a), veh/h	739	576	478	628	548	554	696	576	478	738	576	478
HCM Platoon Ratio	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00
Upstream Filter(I)	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00
Uniform Delay (d), s/veh	19.2	30.9	23.3	24.1	29.3	29.4	22.5	27.7	24.6	25.3	33.2	34.1
Incr Delay (d2), s/veh	1.9	40.8	0.7	3.4	1.2	1.2	2.1	2.5	0.4	0.1	3.6	7.1
Initial Q Delay(d3), s/veh	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
%ile BackOfQ(95%),veh/ln	8.0	25.9	4.6	4.7	8.3	8.5	7.6	11.1	4.3	0.8	9.2	9.3
Unsig. Movement Delay, s/veh												
LnGrp Delay(d), s/veh	21.0	71.7	23.9	27.5	30.5	30.5	24.6	30.2	25.0	25.5	36.8	41.2
LnGrp LOS	C	F	C	C	C	C	C	C	C	C	D	D
Approach Vol, veh/h		1057			668			765			520	
Approach Delay, s/veh		49.4			29.8			27.2			38.3	
Approach LOS		D			C			C			D	

Timer - Assigned Phs	1	2	3	4	5	6	7	8
Phs Duration (G+Y+Rc), s	13.7	35.0	18.5	24.5	19.7	29.1	10.0	33.0
Change Period (Y+Rc), s	5.0	5.0	5.0	5.0	5.0	5.0	5.0	5.0
Max Green Setting (Gmax), s	30.0	30.0	30.0	30.0	30.0	30.0	30.0	30.0
Max Q Clear Time (g_c+I1), s	8.3	32.0	12.8	16.3	13.8	14.0	3.1	18.0
Green Ext Time (p_c), s	0.4	0.0	0.7	3.2	0.8	2.6	0.0	2.0

Intersection Summary	
HCM 7th Control Delay, s/veh	37.5
HCM 7th LOS	D

Intersection	
Int Delay, s/veh	5.5

Movement	EBL	EBR	NBL	NBT	SBT	SBR
Lane Configurations						
Traffic Vol, veh/h	95	65	95	520	630	110
Future Vol, veh/h	95	65	95	520	630	110
Conflicting Peds, #/hr	0	0	0	0	0	0
Sign Control	Stop	Stop	Free	Free	Free	Free
RT Channelized	-	None	-	None	-	None
Storage Length	0	50	-	-	-	-
Veh in Median Storage, #	0	-	-	0	0	-
Grade, %	0	-	-	0	0	-
Peak Hour Factor	95	95	95	95	95	95
Heavy Vehicles, %	2	2	2	2	2	2
Mvmt Flow	100	68	100	547	663	116

Major/Minor	Minor2		Major1		Major2	
Conflicting Flow All	1195	389	779	0	-	0
Stage 1	721	-	-	-	-	-
Stage 2	474	-	-	-	-	-
Critical Hdwy	6.84	6.94	4.14	-	-	-
Critical Hdwy Stg 1	5.84	-	-	-	-	-
Critical Hdwy Stg 2	5.84	-	-	-	-	-
Follow-up Hdwy	3.52	3.32	2.22	-	-	-
Pot Cap-1 Maneuver	179	609	834	-	-	-
Stage 1	442	-	-	-	-	-
Stage 2	593	-	-	-	-	-
Platoon blocked, %				-	-	-
Mov Cap-1 Maneuver	154	609	834	-	-	-
Mov Cap-2 Maneuver	154	-	-	-	-	-
Stage 1	380	-	-	-	-	-
Stage 2	593	-	-	-	-	-

Approach	EB	NB	SB
HCM Control Delay, s/v	42.69	2.4	0
HCM LOS	E		

Minor Lane/Major Mvmt	NBL	NBT	EBLn1	EBLn2	SBT	SBR
Capacity (veh/h)	556	-	154	609	-	-
HCM Lane V/C Ratio	0.12	-	0.65	0.112	-	-
HCM Control Delay (s/veh)	9.9	1	63.9	11.7	-	-
HCM Lane LOS	A	A	F	B	-	-
HCM 95th %tile Q(veh)	0.4	-	3.6	0.4	-	-

Intersection	
Int Delay, s/veh	3.4

Movement	EBL	EBR	NBL	NBT	SBT	SBR
Lane Configurations						
Traffic Vol, veh/h	40	115	135	480	625	40
Future Vol, veh/h	40	115	135	480	625	40
Conflicting Peds, #/hr	0	0	0	0	0	0
Sign Control	Stop	Stop	Free	Free	Free	Free
RT Channelized	-	None	-	None	-	None
Storage Length	0	75	-	-	-	-
Veh in Median Storage, #	0	-	-	0	0	-
Grade, %	0	-	-	0	0	-
Peak Hour Factor	95	95	95	95	95	95
Heavy Vehicles, %	2	2	2	2	2	2
Mvmt Flow	42	121	142	505	658	42

Major/Minor	Minor2		Major1		Major2	
Conflicting Flow All	1216	350	700	0	-	0
Stage 1	679	-	-	-	-	-
Stage 2	537	-	-	-	-	-
Critical Hdwy	6.84	6.94	4.14	-	-	-
Critical Hdwy Stg 1	5.84	-	-	-	-	-
Critical Hdwy Stg 2	5.84	-	-	-	-	-
Follow-up Hdwy	3.52	3.32	2.22	-	-	-
Pot Cap-1 Maneuver	174	646	893	-	-	-
Stage 1	465	-	-	-	-	-
Stage 2	550	-	-	-	-	-
Platoon blocked, %				-	-	-
Mov Cap-1 Maneuver	141	646	893	-	-	-
Mov Cap-2 Maneuver	141	-	-	-	-	-
Stage 1	379	-	-	-	-	-
Stage 2	550	-	-	-	-	-

Approach	EB	NB	SB
HCM Control Delay, s/v	19.35	3.06	0
HCM LOS	C		

Minor Lane/Major Mvmt	NBL	NBT	EBLn1	EBLn2	SBT	SBR
Capacity (veh/h)	767	-	141	646	-	-
HCM Lane V/C Ratio	0.159	-	0.298	0.187	-	-
HCM Control Delay (s/veh)	9.8	1.2	40.9	11.9	-	-
HCM Lane LOS	A	A	E	B	-	-
HCM 95th %tile Q(veh)	0.6	-	1.2	0.7	-	-

Intersection	
Int Delay, s/veh	4.4

Movement	WBL	WBR	NBT	NBR	SBL	SBT
Lane Configurations						
Traffic Vol, veh/h	170	10	370	165	10	480
Future Vol, veh/h	170	10	370	165	10	480
Conflicting Peds, #/hr	0	0	0	0	0	0
Sign Control	Stop	Stop	Free	Free	Free	Free
RT Channelized	-	Stop	-	None	-	None
Storage Length	0	400	-	-	-	-
Veh in Median Storage, #	0	-	0	-	-	0
Grade, %	0	-	0	-	-	0
Peak Hour Factor	92	92	92	92	92	92
Heavy Vehicles, %	4	4	2	2	2	2
Mvmt Flow	185	11	402	179	11	522

Major/Minor	Minor1		Major1		Major2	
Conflicting Flow All	774	291	0	0	582	0
Stage 1	492	-	-	-	-	-
Stage 2	283	-	-	-	-	-
Critical Hdwy	6.88	6.98	-	-	4.14	-
Critical Hdwy Stg 1	5.88	-	-	-	-	-
Critical Hdwy Stg 2	5.88	-	-	-	-	-
Follow-up Hdwy	3.54	3.34	-	-	2.22	-
Pot Cap-1 Maneuver	331	700	-	-	989	-
Stage 1	574	-	-	-	-	-
Stage 2	734	-	-	-	-	-
Platoon blocked, %			-	-		-
Mov Cap-1 Maneuver	326	700	-	-	989	-
Mov Cap-2 Maneuver	326	-	-	-	-	-
Stage 1	574	-	-	-	-	-
Stage 2	725	-	-	-	-	-

Approach	WB	NB	SB
HCM Control Delay, s/v	28.41	0	0.28
HCM LOS	D		

Minor Lane/Major Mvmt	NBT	NBR	WBLn1	WBLn2	SBL	SBT
Capacity (veh/h)	-	-	326	700	73	-
HCM Lane V/C Ratio	-	-	0.566	0.016	0.011	-
HCM Control Delay (s/veh)	-	-	29.5	10.2	8.7	0.1
HCM Lane LOS	-	-	D	B	A	A
HCM 95th %tile Q(veh)	-	-	3.3	0	0	-

Intersection	
Int Delay, s/veh	708.3

Movement	EBL	EBT	EBR	WBL	WBT	WBR	NBL	NBT	NBR	SBL	SBT	SBR
Lane Configurations												
Traffic Vol, veh/h	350	335	80	5	305	155	65	305	5	205	415	305
Future Vol, veh/h	350	335	80	5	305	155	65	305	5	205	415	305
Conflicting Peds, #/hr	0	0	0	0	0	0	0	0	0	0	0	0
Sign Control	Stop	Stop	Stop	Stop	Stop	Stop	Free	Free	Free	Free	Free	Free
RT Channelized	-	-	None	-	-	None	-	-	None	-	-	None
Storage Length	200	-	280	100	-	200	-	-	-	-	-	150
Veh in Median Storage, #	-	0	-	-	0	-	-	0	-	-	0	-
Grade, %	-	0	-	-	0	-	-	0	-	-	0	-
Peak Hour Factor	96	92	96	92	92	92	96	96	92	92	96	96
Heavy Vehicles, %	3	2	3	2	2	2	3	3	2	2	4	4
Mvmt Flow	365	364	83	5	332	168	68	318	5	223	432	318

Major/Minor	Minor2			Minor1			Major1			Major2		
Conflicting Flow All	1338	1337	216	1300	1651	162	750	0	0	323	0	0
Stage 1	878	878	-	456	456	-	-	-	-	-	-	-
Stage 2	460	459	-	844	1196	-	-	-	-	-	-	-
Critical Hdwy	7.56	6.54	6.96	7.54	6.54	6.94	4.16	-	-	4.14	-	-
Critical Hdwy Stg 1	6.56	5.54	-	6.54	5.54	-	-	-	-	-	-	-
Critical Hdwy Stg 2	6.56	5.54	-	6.54	5.54	-	-	-	-	-	-	-
Follow-up Hdwy	3.53	4.02	3.33	3.52	4.02	3.32	2.23	-	-	2.22	-	-
Pot Cap-1 Maneuver	~ 110	~ 152	785	119	~ 98	855	848	-	-	1233	-	-
Stage 1	~ 307	~ 364	-	554	567	-	-	-	-	-	-	-
Stage 2	548	565	-	324	~ 258	-	-	-	-	-	-	-
Platoon blocked, %								-	-		-	-
Mov Cap-1 Maneuver	~ 62	~ 106	785	74	~ 68	855	848	-	-	1233	-	-
Mov Cap-2 Maneuver	~ 62	~ 106	-	74	~ 68	-	-	-	-	-	-	-
Stage 1	~ 235	~ 279	-	505	517	-	-	-	-	-	-	-
Stage 2	~ 144	515	-	-	~ 198	-	-	-	-	-	-	-

Approach	EB	WB	NB	SB
HCM Control Delay, s/veh	$ 1574.48	$ 1221.57	2.15	2.4
HCM LOS	F	F		

Minor Lane/Major Mvmt	NBL	NBT	NBR	EBLn1	EBLn2	EBLn3	WBLn1	WBLn2	WBLn3	SBL	SBT	SBR
Capacity (veh/h)	609	-	-	62	106	785	74	68	855	1085	-	-
HCM Lane V/C Ratio	0.08	-	-	5.888	3.423	0.106	0.073	4.854	0.197	0.181	-	-
HCM Control Delay (s/veh)	9.6	0.6	$ 2330.8	$ 1175.2	10.1	57.3	$ 1856.2	10.2	8.6	1	-	
HCM Lane LOS	A	A	-	F	F	B	F	F	B	A	A	-
HCM 95th %tile Q(veh)	0.3	-	-	41.2	36	0.4	0.2	36.3	0.7	0.7	-	-

Notes			
~: Volume exceeds capacity	$: Delay exceeds 300s	+: Computation Not Defined	*: All major volume in platoon

Intersection	
Int Delay, s/veh	1.1

Movement	EBL	EBT	EBR	WBL	WBT	WBR	NBL	NBT	NBR	SBL	SBT	SBR
Lane Configurations												
Traffic Vol, veh/h	40	0	640	0	0	0	0	620	235	40	295	0
Future Vol, veh/h	40	0	640	0	0	0	0	620	235	40	295	0
Conflicting Peds, #/hr	0	0	0	0	0	0	0	0	0	0	0	0
Sign Control	Stop	Stop	Stop	Stop	Stop	Stop	Free	Free	Free	Free	Free	Free
RT Channelized	-	-	Free	-	-	None	-	-	Yield	-	-	None
Storage Length	0	-	220	-	-	-	-	-	520	800	-	-
Veh in Median Storage, #	-	0	-	-	0	-	-	0	-	-	0	-
Grade, %	-	0	-	-	0	-	-	0	-	-	0	-
Peak Hour Factor	90	90	90	92	92	92	90	90	90	90	90	90
Heavy Vehicles, %	2	2	2	2	2	2	3	3	3	6	6	6
Mvmt Flow	44	0	711	0	0	0	0	689	261	44	328	0

Major/Minor	Minor2			Major1			Major2		
Conflicting Flow All	1106	-	-	-	0	0	689	0	0
Stage 1	417	-	-	-	-	-	-	-	-
Stage 2	689	-	-	-	-	-	-	-	-
Critical Hdwy	6.42	-	-	-	-	-	4.16	-	-
Critical Hdwy Stg 1	5.42	-	-	-	-	-	-	-	-
Critical Hdwy Stg 2	5.42	-	-	-	-	-	-	-	-
Follow-up Hdwy	3.518	-	-	-	-	-	2.254	-	-
Pot Cap-1 Maneuver	233	0	0	0	-	-	887	-	0
Stage 1	665	0	0	0	-	-	-	-	0
Stage 2	498	0	0	0	-	-	-	-	0
Platoon blocked, %					-	-		-	
Mov Cap-1 Maneuver	221	0	-	-	-	-	887	-	-
Mov Cap-2 Maneuver	221	0	-	-	-	-	-	-	-
Stage 1	665	0	-	-	-	-	-	-	-
Stage 2	473	0	-	-	-	-	-	-	-

Approach	EB	NB	SB
HCM Control Delay, s/v	25.3	0	1.11
HCM LOS	D		

Minor Lane/Major Mvmt	NBT	NBR	EBLn1	EBLn2	SBL	SBT
Capacity (veh/h)	-	-	221	-	887	-
HCM Lane V/C Ratio	-	-	0.201	-	0.05	-
HCM Control Delay (s/veh)	-	-	25.3	0	9.3	-
HCM Lane LOS	-	-	D	A	A	-
HCM 95th %tile Q(veh)	-	-	0.7	-	0.2	-

Intersection	
Int Delay, s/veh	163.8

Movement	EBL	EBT	EBR	WBL	WBT	WBR	NBL	NBT	NBR	SBL	SBT	SBR
Lane Configurations												
Traffic Vol, veh/h	0	0	0	225	0	15	550	130	0	0	105	15
Future Vol, veh/h	0	0	0	225	0	15	550	130	0	0	105	15
Conflicting Peds, #/hr	0	0	0	0	0	0	0	0	0	0	0	0
Sign Control	Stop	Stop	Stop	Stop	Stop	Stop	Free	Free	Free	Free	Free	Free
RT Channelized	-	-	None	-	-	Stop	-	-	None	-	-	Yield
Storage Length	-	-	-	0	-	150	800	-	-	-	-	420
Veh in Median Storage, #	-	0	-	-	0	-	-	0	-	-	0	-
Grade, %	-	0	-	-	0	-	-	0	-	-	0	-
Peak Hour Factor	97	97	97	97	97	97	97	97	97	97	97	97
Heavy Vehicles, %	2	2	2	7	7	7	2	2	2	2	2	2
Mvmt Flow	0	0	0	232	0	15	567	134	0	0	108	15

Major/Minor	Minor1			Major1			Major2			
Conflicting Flow All	1376	-	134	108	0	-	-	-	0	
Stage 1	1268	-	-	-	-	-	-	-	-	
Stage 2	108	-	-	-	-	-	-	-	-	
Critical Hdwy	6.47	-	6.27	4.12	-	-	-	-	-	
Critical Hdwy Stg 1	5.47	-	-	-	-	-	-	-	-	
Critical Hdwy Stg 2	5.47	-	-	-	-	-	-	-	-	
Follow-up Hdwy	3.563	-	3.363	2.218	-	-	-	-	-	
Pot Cap-1 Maneuver	~ 156	0	902	1482	-	0	0	-	-	
Stage 1	258	0	-	-	-	0	0	-	-	
Stage 2	904	0	-	-	-	0	0	-	-	
Platoon blocked, %					-			-	-	
Mov Cap-1 Maneuver	~ 96	0	902	1482	-	-	-	-	-	
Mov Cap-2 Maneuver	~ 96	0	-	-	-	-	-	-	-	
Stage 1	~ 159	0	-	-	-	-	-	-	-	
Stage 2	904	0	-	-	-	-	-	-	-	

Approach	WB	NB	SB
HCM Control Delay, s/v	$ 689.52	7.22	0
HCM LOS	F		

Minor Lane/Major Mvmt	NBL	NBT	WBLn1	WBLn2	SBT	SBR
Capacity (veh/h)	1482	-	96	902	-	-
HCM Lane V/C Ratio	0.383	-	2.409	0.017	-	-
HCM Control Delay (s/veh)	8.9	-	$ 734.9	9.1	-	-
HCM Lane LOS	A	-	F	A	-	-
HCM 95th %tile Q(veh)	1.8	-	21.1	0.1	-	-

Notes			
~: Volume exceeds capacity	$: Delay exceeds 300s	+: Computation Not Defined	*: All major volume in platoon

Intersection	
Intersection Delay, s/veh	21.4
Intersection LOS	C

Movement	EBL	EBT	EBR	WBL	WBT	WBR	NBL	NBT	NBR	SBL	SBT	SBR
Lane Configurations												
Traffic Vol, veh/h	5	165	5	40	170	215	5	245	30	255	285	5
Future Vol, veh/h	5	165	5	40	170	215	5	245	30	255	285	5
Peak Hour Factor	0.92	0.92	0.92	0.92	0.92	0.92	0.92	0.92	0.92	0.92	0.92	0.92
Heavy Vehicles, %	2	2	2	2	2	2	2	2	2	2	2	2
Mvmt Flow	5	179	5	43	185	234	5	266	33	277	310	5
Number of Lanes	1	1	1	1	1	1	1	1	1	1	1	1

Approach	EB	WB	NB	SB
Opposing Approach	WB	EB	SB	NB
Opposing Lanes	3	3	3	3
Conflicting Approach Left	SB	NB	EB	WB
Conflicting Lanes Left	3	3	3	3
Conflicting Approach Right	NB	SB	WB	EB
Conflicting Lanes Right	3	3	3	3
HCM Control Delay, s/veh	18.2	16.8	23	25.3
HCM LOS	C	C	C	D

Lane	NBLn1	NBLn2	NBLn3	EBLn1	EBLn2	EBLn3	WBLn1	WBLn2	WBLn3	SBLn1	SBLn2
Vol Left, %	100%	0%	0%	100%	0%	0%	100%	0%	0%	100%	0%
Vol Thru, %	0%	100%	0%	0%	100%	0%	0%	100%	0%	0%	100%
Vol Right, %	0%	0%	100%	0%	0%	100%	0%	0%	100%	0%	0%
Sign Control	Stop	Stop	Stop	Stop	Stop	Stop	Stop	Stop	Stop	Stop	Stop
Traffic Vol by Lane	5	245	30	5	165	5	40	170	215	255	285
LT Vol	5	0	0	5	0	0	40	0	0	255	0
Through Vol	0	245	0	0	165	0	0	170	0	0	285
RT Vol	0	0	30	0	0	5	0	0	215	0	0
Lane Flow Rate	5	266	33	5	179	5	43	185	234	277	310
Geometry Grp	6	6	6	6	6	6	6	6	6	6	6
Degree of Util (X)	0.014	0.628	0.071	0.014	0.443	0.012	0.106	0.424	0.49	0.644	0.676
Departure Headway (Hd)	8.992	8.492	7.792	9.392	8.892	8.192	8.751	8.251	7.551	8.36	7.86
Convergence, Y/N	Yes	Yes	Yes	Yes	Yes	Yes	Yes	Yes	Yes	Yes	Yes
Cap	397	423	458	379	404	434	408	434	474	430	458
Service Time	6.78	6.28	5.58	7.19	6.69	5.99	6.533	6.033	5.333	6.14	5.64
HCM Lane V/C Ratio	0.013	0.629	0.072	0.013	0.443	0.012	0.105	0.426	0.494	0.644	0.677
HCM Control Delay, s/veh	11.9	24.7	11.2	12.3	18.6	11.1	12.6	17	17.4	25.2	25.7
HCM Lane LOS	B	C	B	B	C	B	B	C	C	D	D
HCM 95th-tile Q	0	4.2	0.2	0	2.2	0	0.4	2.1	2.6	4.4	4.9