*Traffic Impact Study*

# Summertree-Alford Road Tract

Dekalb County, Georgia

*Report Prepared:*

August 2020

*Prepared for:*

Parkland Communities, Inc.

*Prepared by:*

Kimley-Horn and Associates, Inc.
11720 Amber Park Drive, Suite 600
Alpharetta, Georgia 30009
KHA Project #019380011

*Traffic Impact Study*

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8/20/2020

Kimley»Horn

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## 1.0 INTRODUCTION

This report presents the analysis of the anticipated traffic impacts associated with the *Summertree-Alford Road Tract* development, which is expected to be completed in 2026 (referred to herein as "build-out year"). This study evaluates the impact of constructing 140 single-family housing units. The approximately 40.9-acre site is located east of Alford Road and south of Stephenson Road in DeKalb County, Georgia.

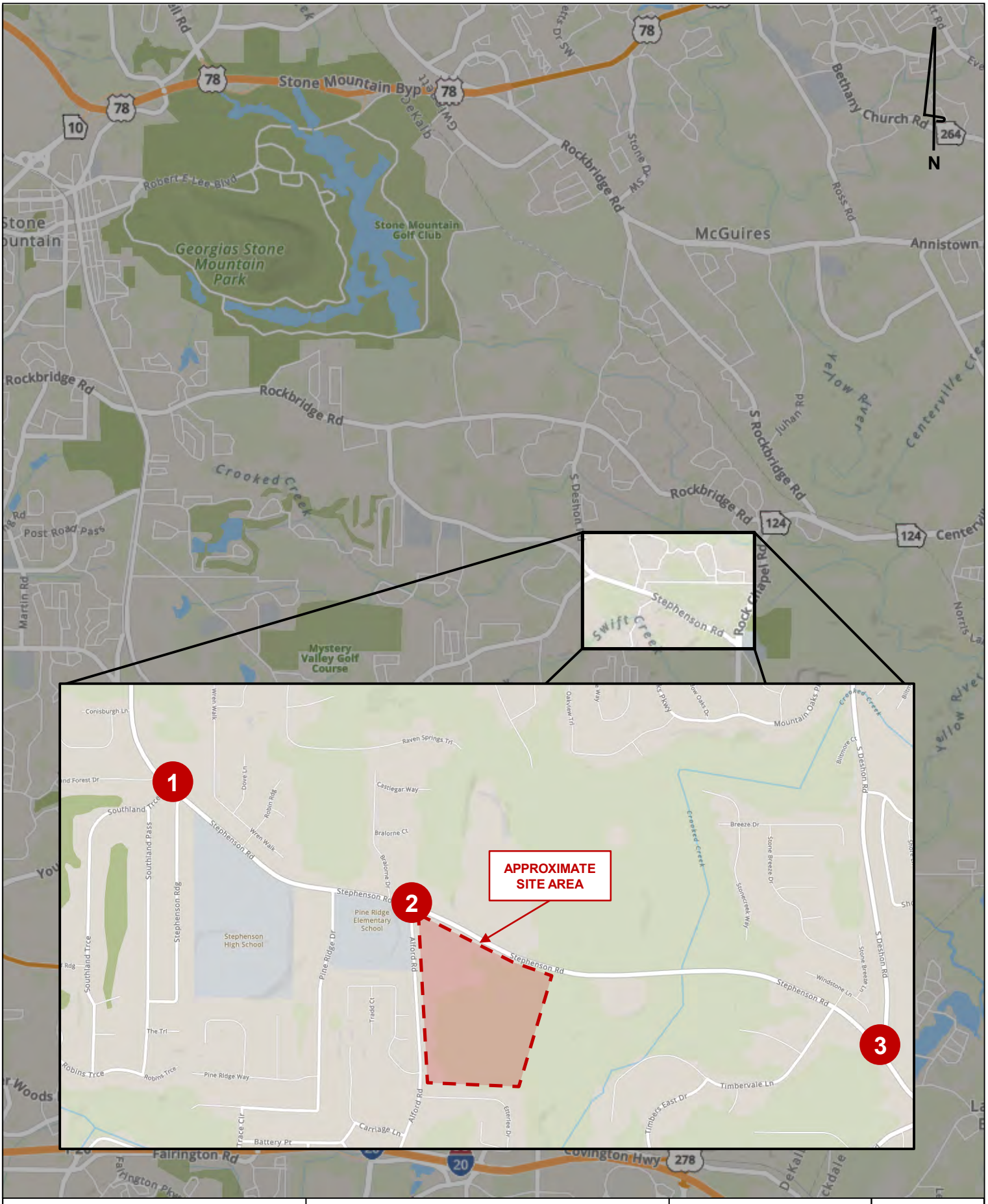
**Figure 1** provides a location map of the project site. **Figure 2** provides an aerial image that captures the project site and the study roadway network. A site plan is also included in **Appendix A**.

## 2.0 STUDY AREA DETERMINATION

The study area consists of the following existing intersections:

1. Stephenson Road at Southland Trace (Unsignalized)
2. Stephenson Road at Alford Road/Private Driveway (Unsignalized)
3. Stephenson Road at S Deshon Road W (Signalized)

For purposes of the traffic impact study, Stephenson Road is considered to have an east-west orientation. Southland Trace, S Deshon Road W, and all proposed site driveways are considered to have a north-south orientation.




| | | | |
|---|---|---|---|
| Kimley»Horn | **Summertree-Alford Road Tract Traffic Impact Study** | **Site Location Map** | **Figure 1** |
| | | | **Page 2** |


| | | | |
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# 3.0 EXISTING TRAFFIC CONDITIONS

## 3.1 ROADWAY CONDITIONS

The roadways within the study network have the following characteristics:

Stephenson Road is a two-lane, major collector roadway with a posted speed limit of 45 MPH in the vicinity of the study network. A center two-way left-turn lane (TWLTL) is present along the majority of the roadway segment. GDOT counts taken along Stephenson Road west of Alford Road indicate an annual average daily traffic (AADT) of approximately 7,660 vehicles per day in 2019. Kimley-Horn collected counts from August 2020 (no school traffic and COVID-19 impacts) indicate an average daily traffic (ADT) of 6,350 vehicles per day.

S Deshon Road W is a two-lane, major collector roadway with a posted speed limit of 45 MPH in the vicinity of the study network.

Alford Road and Southland Trace are two-lane, local roadways with posted speed limits of 25 MPH in the vicinity of the study network.

## 3.2 VEHICULAR VOLUMES

Vehicle peak hour turning movement counts were performed at all three (3) existing study intersections. 24-hour, bi-directional tube counts were collected along Stephenson Road west of Alford Road.

The peak hour turning movement counts and daily traffic counts were performed on Thursday, August 6, 2020. The AM and PM peak hours for each intersection are listed below in **Table 1**. The peak hour traffic counts were used to perform the analysis presented in this report.

**Table 1: Intersection Peak Hours**

| Intersection | AM Peak Hour | PM Peak Hour |
|---|---|---|
| 1. Stephenson Road at Southland Trace (Unsignalized) | 7:45 AM – 8:45 AM | 5:00 PM – 6:00 PM |
| 2. Stephenson Road at Alford Road (Unsignalized) | 7:00 AM – 8:00 AM | 5:00 PM – 6:00 PM |
| 3. Stephenson Road at S Deshon Road W (Signalized) | 8:00 AM – 9:00 AM | 5:00 PM – 6:00 PM |

The complete traffic count data is provided in **Appendix B.**

## 3.3 EXISTING VOLUME ADJUSTMENT

Due to COVID-19 and traffic counts being collected when schools were not in session, the existing turning movement counts were adjusted based on historical data and engineering judgement.

Average Daily Traffic (ADT) volumes and Annual Average Daily Traffic (AADT) volumes from GDOT's Traffic Analysis & Data Application (TADA) were used to compare typical traffic volumes in the vicinity of the project site to the ADT volumes collected by Kimley-Horn. After comparing the data, growth factors were determined for the AM and PM peak hours and applied to the existing turning movement counts to use in the analysis. The volume comparison is shown in tabular format in **Table 2** and graphically in **Figure 3**, **Figure 4**, and **Figure 5**.

**Table 2: Traffic Count Comparison and Adjustment Calculations**

| Count Station | Location | GDOT | | | | | Collected | | |
|---|---|---|---|---|---|---|---|---|---|
| | | 2019 AADT | ADT Date | ADT | AM Peak | PM Peak | 2020 ADT | AM Peak | PM Peak |
| 089-0458 | Stephenson Road (w/o Alford Road) | 7660 | Feb 2012 | 8249 | 835 | 768 | 6350 | 260 | 504 |
| 089-0461 | Stephenson Road (w/o SR 124) | 7470 | Jan 2017 | 7668 | 662 | 626 | 7573 | 329 | 630 |
| 089-0161 | SR 124 (n/o Asbury Road) | 36800 | Jan 2020 | 36385 | 2785 | 3273 | 30003 | 1510 | 2631 |

| Difference Calculations | | ADT | | | AM Peak | | | PM Peak | | |
|---|---|---|---|---|---|---|---|---|---|---|
| | | Vol | Percent | Factor | Vol | Percent | Factor | Vol | Percent | Factor |
| 089-0458 | Stephenson Road (w/o Alford Road) | -1,899 | -23% | 1.3 | -575 | -69% | 3.2 | -264 | -34% | 1.5 |
| 089-0461 | Stephenson Road (w/o SR 124) | -95 | -1% | 1.0 | -333 | -50% | 2.0 | 4 | 1% | 1.0 |
| 089-0161 | SR 124 (n/o Asbury Road) | -6,382 | -18% | 1.2 | -1,275 | -46% | 1.8 | -642 | -20% | 1.2 |

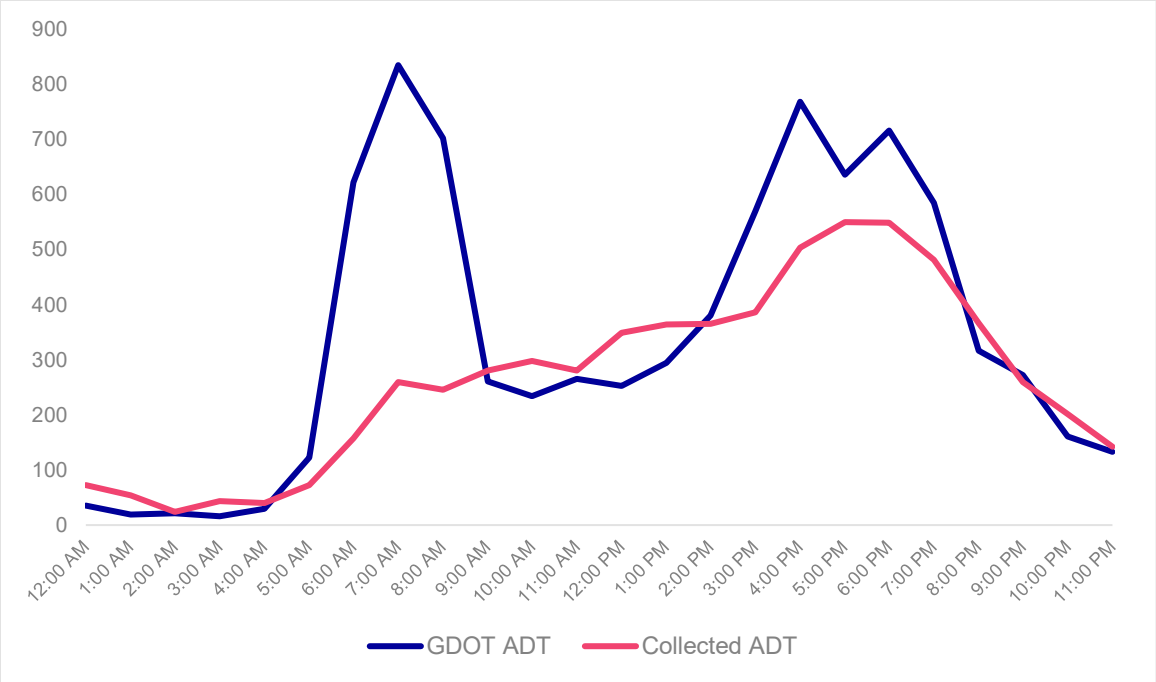



**Figure 3: ADT along Stephenson Road west of Alford Road**

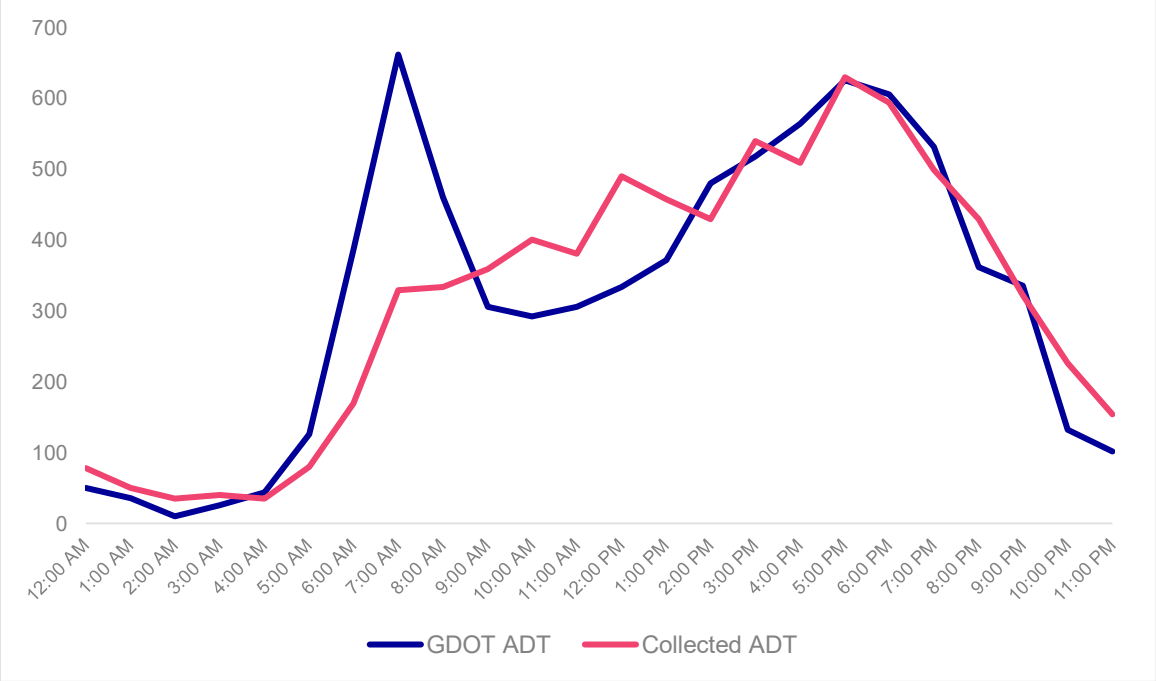


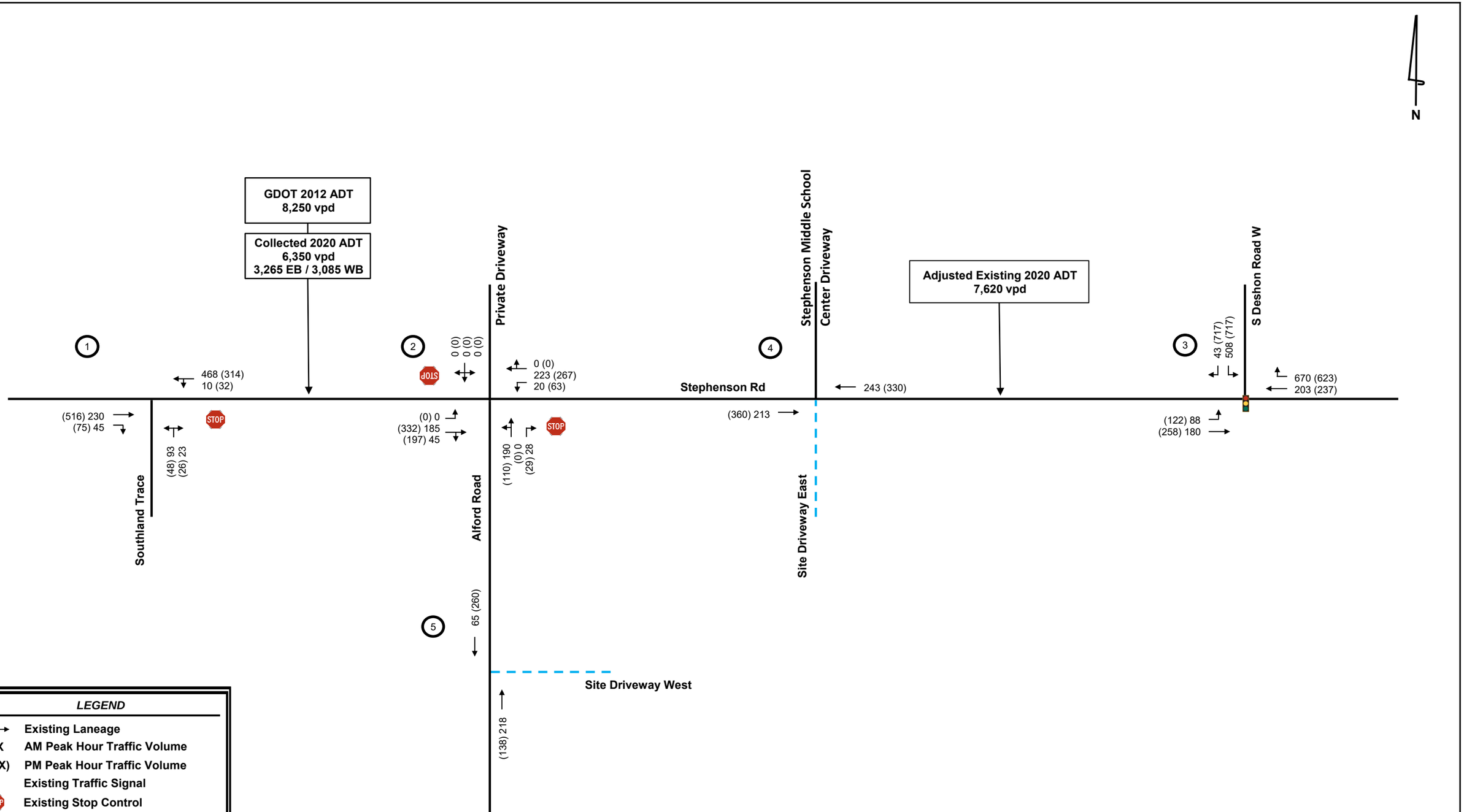

**Figure 4: ADT along Stephenson Road west of SR 124**


**Figure 5: ADT along SR 124 north of Asbury Road**

The figures above indicate that the collected AM peak volumes are currently much lower than historical volumes during the AM time period. However, the collected mid-day peak volumes are generally the same if not higher when compared to historical volumes during the mid-day time period. The collected PM peak volumes have the most variability when compared to the historical volumes during the PM time period. PM volumes along Stephenson Road are lower than historical volumes at the count station west of Alford Road and the same or higher at the count station west of SR 124. The collected PM peak volumes along SR 124 are lower than historical volumes during the PM time period.

Based on comparisons to historical data, a growth factor of 2.5 and 1.5 were used to adjust the existing AM and PM peak hour turning movement counts, respectively. The growth factors take into account schools not being in session and the potential impacts of COVID-19 to typical traffic patterns.

**Figure 6** illustrates the Existing 2020 adjusted peak hour traffic volumes at the study intersections as well as the existing roadway geometry (intersection layout).




*Note: School volumes are not know due to COVID. However, traffic volumes have been adjusted as described in Section 3.3.*

| | | | |
|---|---|---|---|
| Kimley»Horn | Summertree-Alford Road Tract<br>Traffic Impacty Study | Adjusted 2020 Traffic Conditions | Figure 6 |
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# 4.0 PROJECTED BACKGROUND (NON-PROJECT) TRAFFIC

Projected background (non-project) traffic is defined as the expected traffic on the roadway network in the future year(s) absent the *Summertree-Alford Road Tract* development. The adjusted Existing 2020 peak hour traffic volumes were increased by 1.0% per year for six (6) years to account for the expected background growth in traffic through year 2026 build-out of the project. **Figure 4** illustrates the Projected 2026 No-Build traffic volumes for the AM and PM peak hours.

## 4.1 FUTURE ROADWAY / INTERSECTION PROJECTS

ARC's Atlanta Region's Plan, GDOT Statewide TIP (STIP), and DeKalb County transportation projects were researched to identify any currently programmed transportation projects within the vicinity of the proposed development that may impact the study network during the analysis period. No programmed projects were identified.

# 5.0 PROJECT TRAFFIC

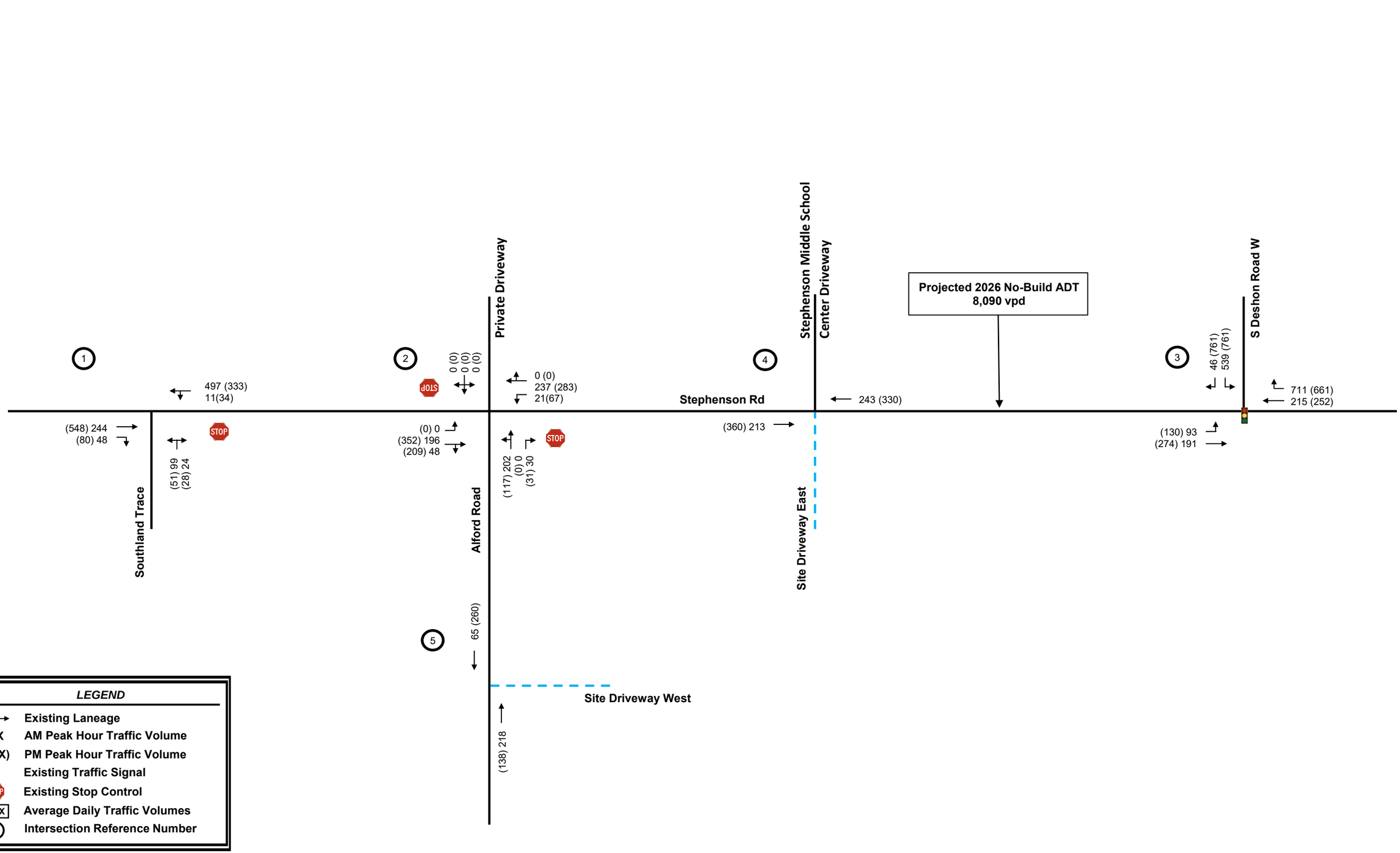
Project traffic used in this analysis is defined as the vehicle trips expected to be generated by the proposed development and the distribution and assignment of that traffic through the study roadway network. This traffic impact study evaluated the impacts of adding the new trips generated by the proposed *Summertree-Alford Road Tract* development.

## 5.1 PROJECT SITE ACCESS

Access to the site will be provided via two (2) site driveways, which are shown on the proposed site plan in **Appendix A**. A brief description of the site driveways are as follows:

- Site Driveway East– a proposed full-movement, side-street stop-controlled driveway with one (1) ingress lane entering the site and one (1) egress lane exiting the site. The driveway is proposed to align with the center driveway for Stephenson Middle School along Stephenson Road.
- Site Driveway West– a proposed full-movement, side-street stop-controlled driveway with one (1) ingress lane entering the site and one (1) egress lane exiting the site. The driveway is located along Alford Road approximately 500 feet south of the Stephenson Road.

The site driveways provide vehicular access to the entire development. Internal, public roadways throughout the site provide access to all residential units. Refer to the site plan in **Appendix A** for a visual representation of vehicular access and circulation throughout the proposed development.


N
Private Driveway
Stephenson Middle School
Center Driveway
Projected 2026 No-Build ADT
8,090 vpd
S Deshon Road W
1
2
3
4
5
497 (333)
11(34)
(548) 244
(80) 48
(51) 99
(28) 24
Southland Trace
STOP
0 (0)
0 (0)
0 (0)
0 (0)
237 (283)
21(67)
(0) 0
(352) 196
(209) 48
(117) 202
(0) 0
(31) 30
Alford Road
Stephenson Rd
243 (330)
(360) 213
Site Driveway East
46 (761)
539 (761)
711 (661)
215 (252)
(130) 93
(274) 191
65 (260)
(138) 218
Site Driveway West
LEGEND
Existing Laneage
XX AM Peak Hour Traffic Volume
(XX) PM Peak Hour Traffic Volume
Existing Traffic Signal
Existing Stop Control
XXX Average Daily Traffic Volumes
X Intersection Reference Number

## 5.2 TRIP GENERATION

Gross trips associated with the proposed development were estimated using the *Institute of Transportation Engineers' (ITE) Trip Generation Manual, 10th Edition, 2017,* using equations where available. Trip generation for the proposed development was calculated based upon the following land uses:

- Land Use 210: Single-Family Detached Housing

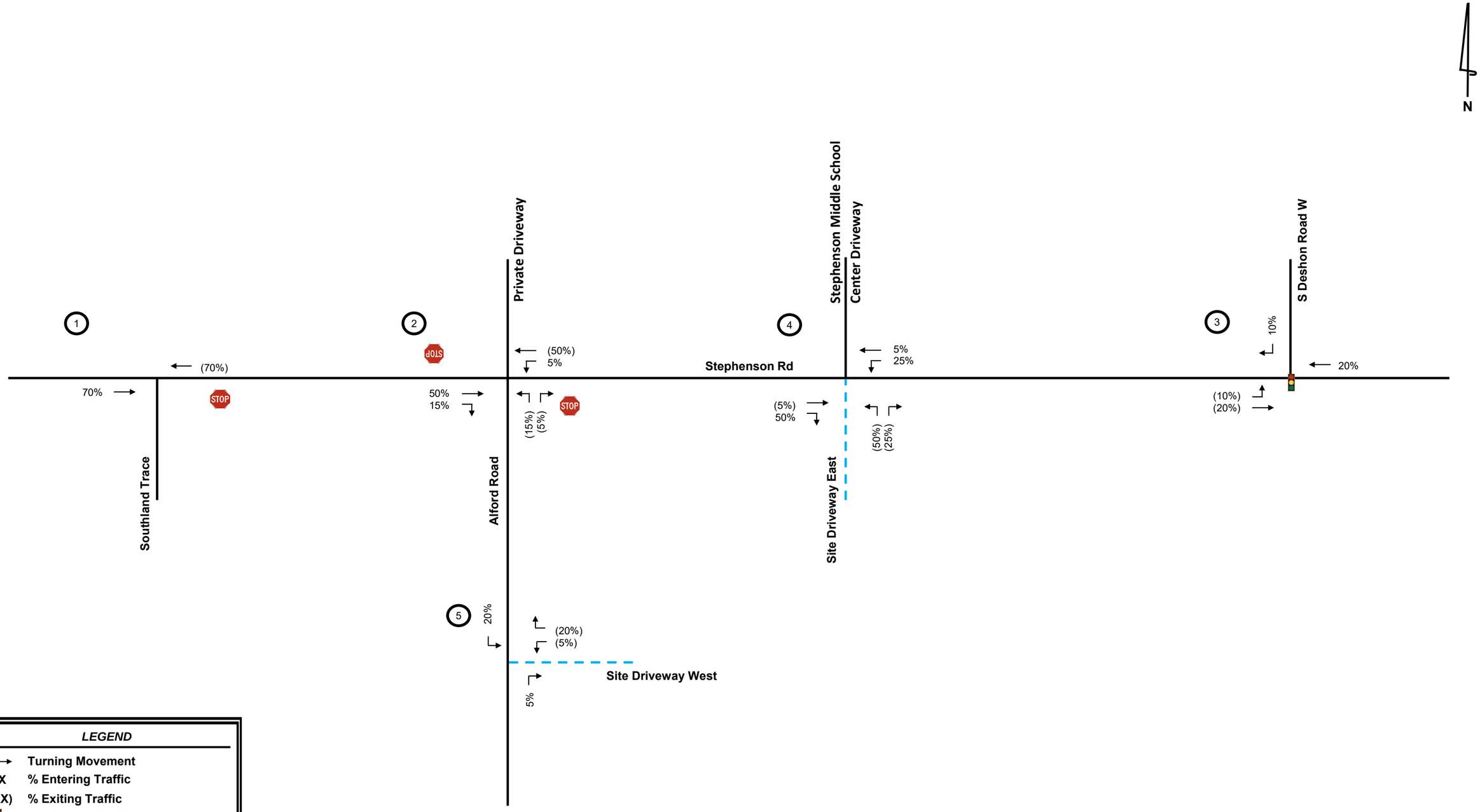
**Table 3** summarizes the anticipated net trip generation for the proposed development upon full build-out (2026). **Appendix C** provides the detailed trip generation worksheet for the proposed development.

**Table 3: Project Trip Generation Summary**

| ITE Code | Land Use | Density | Daily Traffic | | AM Peak Hour | | PM Peak Hour | |
|---|---|---|---|---|---|---|---|---|
| | | | Enter | Exit | Enter | Exit | Enter | Exit |
| 210 | Single-Family Housing | *140 units* | 709 | 709 | 26 | 78 | 88 | 52 |
| **Total New Trips** | | | **709** | **709** | **26** | **78** | **88** | **52** |

## 5.3 TRIP DISTRIBUTION AND ASSIGNMENT

The directional distribution and assignment of adding new trips (project trips) related to the proposed development was based on a review of land uses and population densities in the area, existing travel patterns in the area, and engineering judgement. A detailed trip distribution and assignment is shown in **Figure 5**. Based on trip generation from **Table 3** and the anticipated trip distribution, new project trips were assigned to the study roadway network. **Figure 6** illustrates the new project trips distributed throughout the study network. **Figure 7** illustrates the Projected 2026 Build traffic volumes for the AM and PM peak hours. **Appendix D** provides intersection volume worksheets for all study intersections.




| | | | |
|---|---|---|---|
| Kimley»Horn | Summertree-Alford Road Tract<br>Traffic Impacty Study | Trip Distribution and Assignment | Figure 8 |
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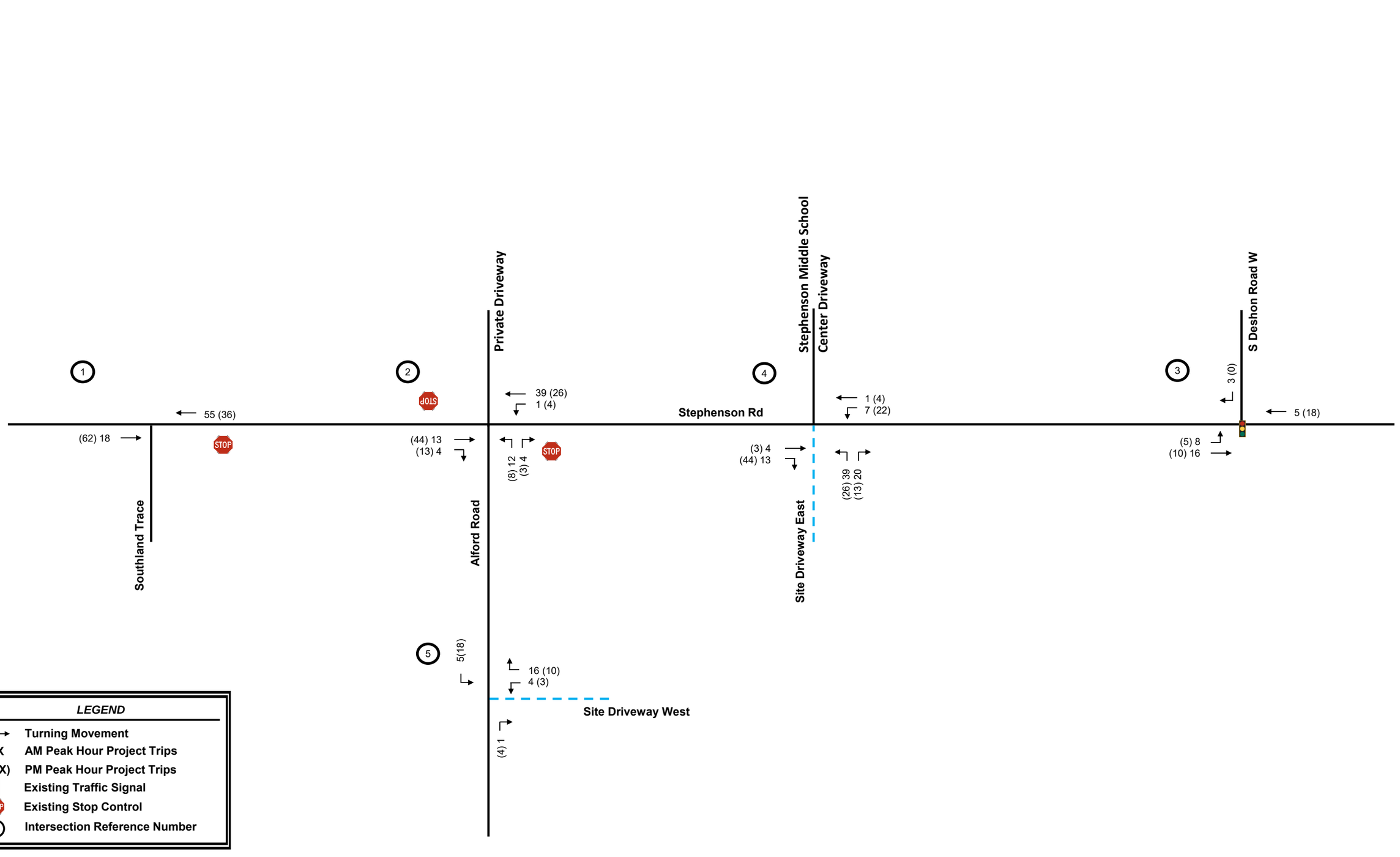


| | | | |
|---|---|---|---|
| Kimley»Horn | Summertree-Alford Road Tract<br>Traffic Impacty Study | Net New Project Trips | Figure 9 |
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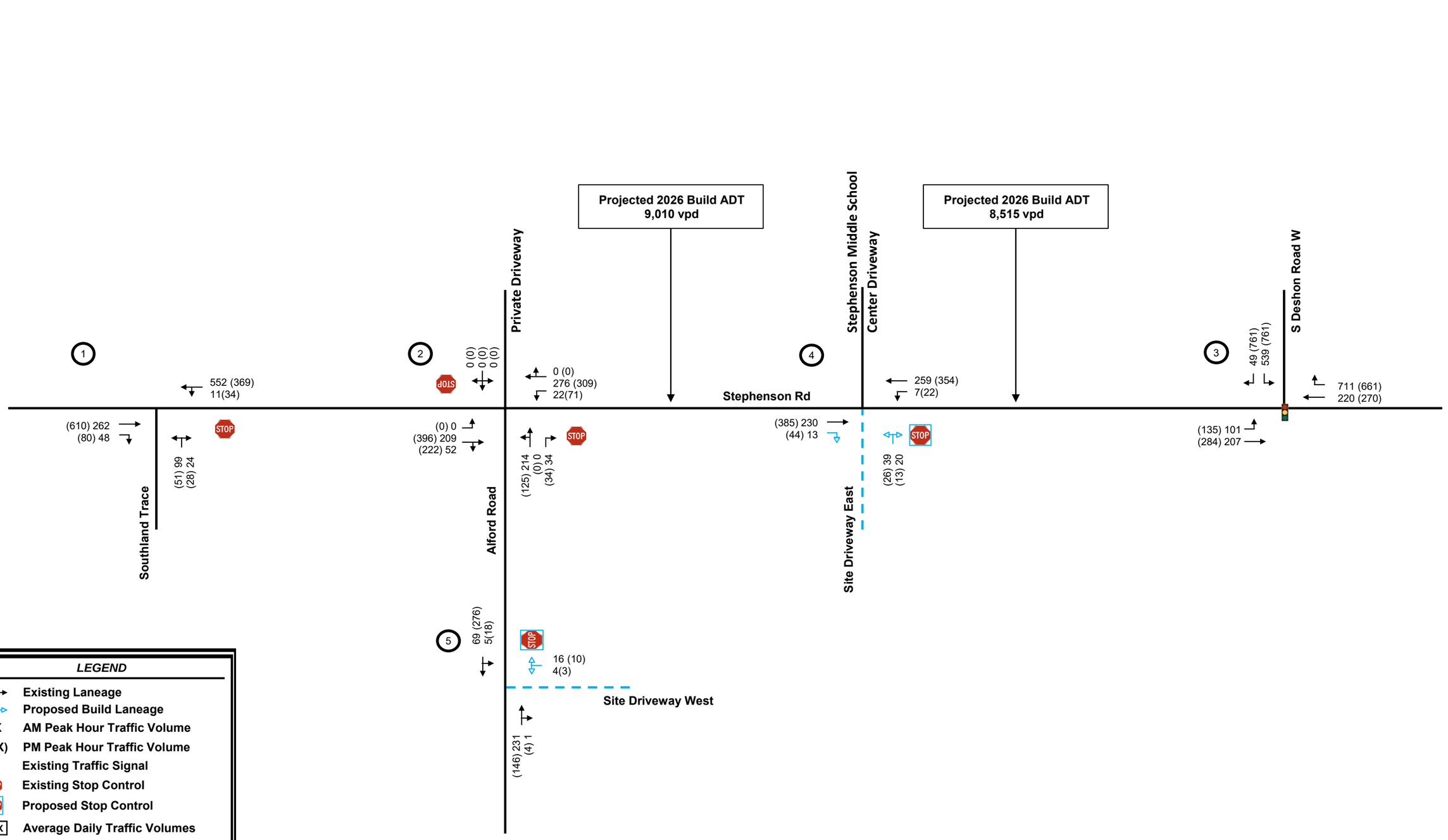

N
Projected 2026 Build ADT
9,010 vpd
Projected 2026 Build ADT
8,515 vpd
Private Driveway
Stephenson Middle School
Center Driveway
S Deshon Road W
Stephenson Rd
Southland Trace
Alford Road
Site Driveway East
Site Driveway West
1
2
3
4
5
552 (369)
11(34)
(610) 262
(80) 48
(51) 99
(28) 24
0 (0)
0 (0)
0 (0)
0 (0)
276 (309)
22(71)
(0) 0
(396) 209
(222) 52
(125) 214
(0) 0
(34) 34
69 (276)
5(18)
16 (10)
4(3)
(146) 231
(4) 1
259 (354)
7(22)
(385) 230
(44) 13
(26) 39
(13) 20
49 (761)
539 (761)
711 (661)
220 (270)
(135) 101
(284) 207
LEGEND
Existing Laneage
Proposed Build Laneage
XX AM Peak Hour Traffic Volume
(XX) PM Peak Hour Traffic Volume
Existing Traffic Signal
Existing Stop Control
Proposed Stop Control
XXX Average Daily Traffic Volumes
X Intersection Reference Number

## 6.0 LEVEL-OF-SERVICE ANALYSIS

Level-of-service (LOS) determinations were made for the weekday AM and PM peak hours for the study network intersections using *Synchro, Version 10.* The program uses methodologies contained in the *6th Edition Highway Capacity Manual* to determine the operating characteristics of an intersection. Capacity is defined as the maximum number of vehicles that can pass over a particular road segment or through a particular intersection within a specified period under prevailing roadway, traffic, and control conditions.

LOS is used to describe the operating characteristics of a road segment or intersection in relation to its capacity. LOS is defined as a qualitative measure that describes operational conditions and motorists' perceptions of a traffic stream. The *Highway Capacity Manual* defines six levels of service, LOS A through LOS F, with A being the best and F the worst.

LOS for signalized intersections are reported for this intersection as a whole. One or more movements at an intersection may experience a low LOS while the intersection as a whole may operate acceptably.

LOS for unsignalized intersections, with stop control on the minor streets only, are reported for the side-street approaches and major street left-turns. Low levels-of-service for side street approaches are not uncommon, as vehicles may experience delay turning onto a major roadway.

LOS analyses were performed for the AM and PM peak hours under adjusted Existing 2020 conditions, Projected 2026 No-Build conditions, and Projected 2026 Build conditions. The results of each analysis are summarized in **Table 4**. *Synchro* analysis reports are included in **Appendix E**.

| Table 4: Level-of-Service Summary<br>*LOS (Delay in Seconds)* | | | | | | | |
|---|---|---|---|---|---|---|---|
| **Intersection** | **Approach/ Movement** | **Adjusted Existing 2020** | | **Projected 2026 No-Build** | | **Projected 2026 Build** | |
| | | **AM Peak** | **PM Peak** | **AM Peak** | **PM Peak** | **AM Peak** | **PM Peak** |
| 1. Stephenson Road at Southland Trace (TWSC) | NB | C (19.3) | D (25.7) | C (21.3) | D (29.9) | C (24.4) | E (38.2) |
| | WBL | A (7.9) | A (9.4) | A (8.0) | A (9.6) | A (8.0) | A (9.9) |
| 2. Stephenson Road at Alford Road (TWSC) | NB | B (14.3) | C (18.6) | C (15.0) | C (20.2) | C (16.3) | C (23.4) |
| | WBL | A (7.9) | A (9.0) | A (8.0) | A (9.2) | A (7.9) | A (9.4) |
| 3. Stephenson Road at S Deshon Road W (Signalized) | Overall | C (21.3) | C (34.9) | C (22.8) | D (42.5) | C (23.4) | D (46.0) |
| 4. Stephenson Road at Site Driveway East (TWSC) | NB | | | | | B (11.1) | B (13.3) |
| | WBL | | | | | A (7.8) | A (8.4) |
| 5. Alford Road at Site Driveway West (TWSC) | WB | | | | | A (9.8) | A (9.8) |
| | SBL | | | | | A (7.7) | A (7.6) |

As shown in **Table 4**, the analyses indicate that all study intersections are projected to operate at an acceptable overall LOS during the AM and PM peak hours under adjusted Existing 2020 conditions, Projected 2026 No-Build conditions, and Projected 2026 Build conditions.

It should be noted that low levels-of-service for side street approaches are not uncommon, as vehicles may experience delay turning onto a major roadway.

## 7.0 ROADWAY SEGMENT CAPACITY ANALYSIS

Roadway segments can be rated for operational effectiveness in terms of LOS based on ADT. The LOS for a roadway segment follows the same pattern as intersection LOS with A being the best and F being the worst. The LOS of a roadway can vary depending on the prevailing roadway and traffic control conditions. GRTA's Generalized Annual Average Daily Volumes table was referenced to determine LOS based on ADT. The table can be found in **Appendix F**. For the purposes of this traffic impact study, Stephenson Road is assumed to be a non-state other signalized roadway with two lanes and left-turn lanes. **Table 5** summarizes the ADT volumes and LOS for the roadway segments.

**Table 5: Roadway Segment Capacity Summary**

| Roadway Segment | Volume, vehicles per day (LOS) | | |
|---|---|---|---|
| | **Adjusted Existing 2020 ADT** | **Projected 2026 No-Build ADT** | **Projected 2026 Build ADT** |
| Stephenson Road between Southland Trace and Site Location | 7,620 *(LOS D)* | 8,090 *(LOS D)* | 9,010 *(LOS D)* |
| Stephenson Road between Site Location and S Deshon Road W | 7,620 *(LOS D)* | 8,090 *(LOS D)* | 8,515 *(LOS D)* |

Currently, both segments along Stephenson Road operate at LOS D. Under Projected 2026 No-Build conditions, both roadway segments are projected to continue to operate at LOS D. Under Projected 2026 Build conditions, the daily project trips are anticipated to follow the same trip distribution as the peak hour trips as shown in **Figure 8**. With the addition of the daily project trips, the Projected 2026 Build ADT for both the Stephenson Road between Southland Trace and the site location roadway segment and the Stephenson Road between the site location and S Deshon Road W segment is projected to continue to operate at LOS D.

# 8.0 CONCLUSION

This traffic study evaluated the traffic impacts associated with the *Summertree-Alford Road Tract* development located east of Alford Road and south of Stephenson Road in DeKalb County, Georgia. The development, which is approximately 40.9-acres in size, will include 140 single-family housing units.

The study network, which consists of three (3) intersections, was analyzed for the weekday AM and PM peak hours under adjusted Existing 2020 conditions, Projected 2026 No-Build conditions (six years of background traffic growth), and Projected 2026 Build conditions (six years of background traffic growth plus traffic generated by the proposed *Summertree-Alford Road Tract* development).

All study intersections are expected to operate at an overall acceptable level-of-service under all future conditions. The roadway segments along Stephenson Road to the east and to the west of the development are currently operating at and projected to operate at LOS D under all existing and future scenarios.

## 8.1 RECOMMENDATIONS

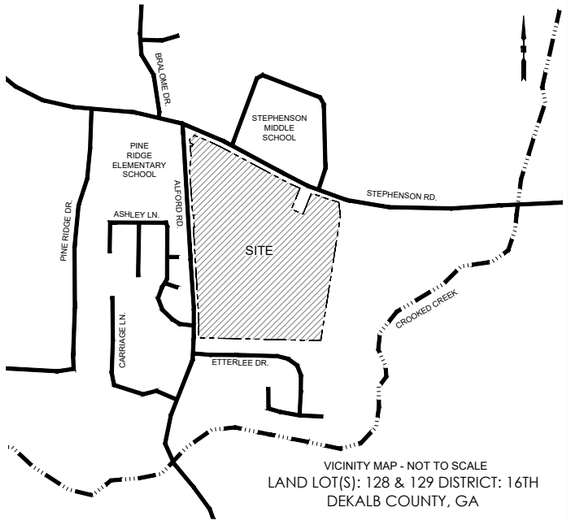
Based on the results of this traffic impact study, no off-site roadway improvements are recommended.

The following improvements are recommended to serve the proposed site:

- Stephenson Road at Site Driveway East (Intersection 4)
  - Along Stephenson Road, construct one (1) eastbound right turn lane.
  - On the site, construct a conventional stop-controlled driveway with one (1) ingress lane entering the site and one (1) egress lane exiting the site, per the site plan.
- Alford Road at Site Driveway West (Intersection 5)
  - On the site, construct a conventional stop-controlled driveway with one (1) ingress lane entering the site and one (1) egress lane exiting the site, per the site plan.

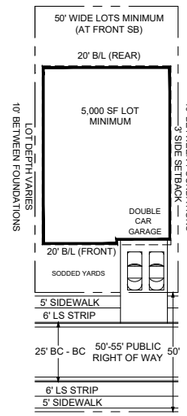
## APPENDIX A

# Site Plan




VICINITY MAP - NOT TO SCALE
LAND LOT(S): 128 & 129 DISTRICT: 16TH
DEKALB COUNTY, GA

**DRAFT**




**SINGLE FAMILY TYPICAL LOT DETAIL**

REQUESTED VARIANCES:
1. GRADED AND REPLANTED BUFFERS AS SHOWN.
2. GRADING CAN BE ALLOWED WITHIN THE 75' IMPERVIOUS STREAM SETBACK, BUT NOT THE 50' UNDISTURBED BUFFER.
3. CORNER HOMES TO HAVE A STREET SIDE SETBACK OF 10'.

PROPERTY OWNERS:
PID: 16 128 02 001 - KATHERINE LOUISE BROWN
PID: 16-128-02-003 - LOUIS E. BROWN, JR.
PID: 16-129-02-009 - SARA K. WARBINGTON, ETAL

SEWER NOTE:
SEWER WILL BE A GRAVITY LINE AND TIE INTO THE EXISTING SEWER MANHOLE ALONG ALONG ALFORD ROAD & ASHLEY LANE.

WATER NOTE:
EXISTING WATER LINE LOCATED ON STEPHENSON ROAD AND PROVIDED BY DEKALB COUNTY.

STREET LIGHT NOTE:
FIXTURES AND ILLUMINATION SHALL COMPLY WITH COUNTY STANDARDS.

TREE PRESERVATION NOTE: EITHER 120 INCHES (DBH) PER ACRE OR 25% OF EXISTING SIGNIFICANT TREES PER ACRE OF SUCH SIGNIFICANT TREES, WHICHEVER IS LESS, SHALL BE PRESERVED ON THE SITE.

= PROPOSED TREE SAVE LIMITS; LIMITS ARE SUBJECT TO CHANGES WITH FURTHER REVIEW OF GRADING AND TREE SURVEY DATA.

**A SMALL PORTION OF THIS PROPERTY IS LOCATED IN A FEMA FLOOD PLAIN AS PER FEMA MAP NO. 13089C0113J, DATED MAY 16, 2013**

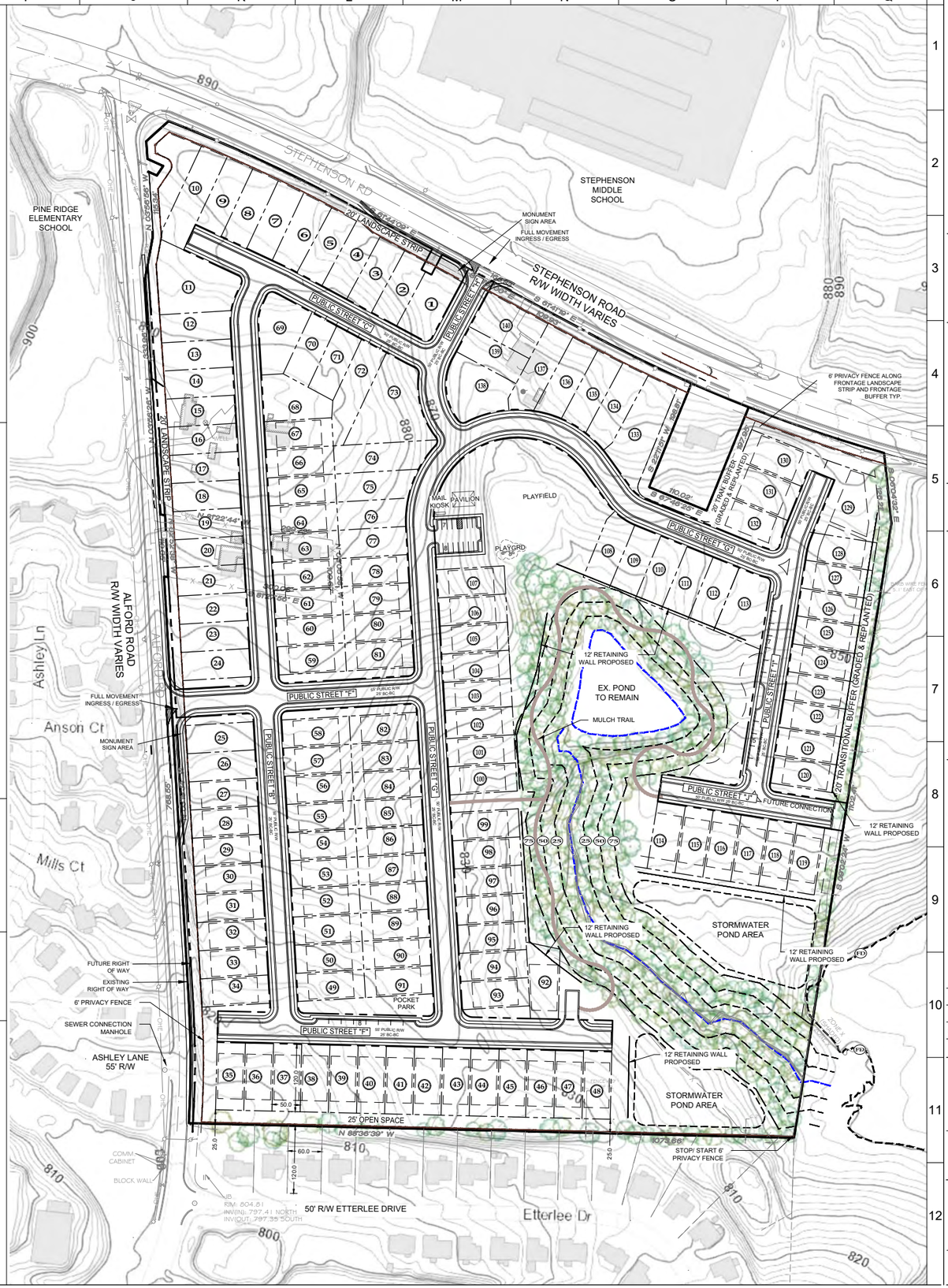
| | |
|---|---|
| GROSS ACRES: | 40.91 AC. (1,782,039 SQ. FT) |
| EXISTING ZONING: | R100 |
| PROPOSED ZONING: | RSM / DEKALB COUNTY |
| TOTAL UNITS: | 140 UNITS |
| TOTAL DENSITY: | 3.42 U/A |
| SINGLE FAMILY LOT WIDTH: | 50' TYPICAL |
| | |
| MIN. UNIT HEATED AREA: | 1,800 SF. (SINGLE FAMILY) |
| BUILDING SETBACKS | SINGLE FAMILY DETACHED |
| | FRONT: 20' (20' MIN DRIVEWAYS) |
| | REAR: 20' |
| | SIDE: 3' |
| BETWEEN FOUNDATIONS (SINGLE FAMILY): | 10' BETWEEN FOUNDATIONS |
| | |
| TRANSITIONAL BUFFER: | 20' (GRADED AND REPLANTED) |
| LANDSCAPE STRIP: | 20' (ALFORD RD AND STEPHENSON RD) |
| BUILDING HT. REQUIRED: | 35' MAX. (SINGLE FAM.) / 3 STORIES OR 45' MAX. (TOWNHOME) |
| PARKING REQUIRED: | 2.0 / UNIT FOR EACH DWELLING; 0.25 / UNIT FOR GUESTS |
| OPEN SPACE REQUIRED: | 20% OR 8.18 ACRES |
| OPEN SPACE PROVIDED: | 20.9% OR 8.55 ACRES |
| ENHANCED REQUIRED: | 10% OR 4.09 ACRES |
| ENHANCED PROVIDED: | 10% OR 4.09 ACRES |
| SIDEWALK PROVIDED ON SITE: | |
| MULCH TRAIL PROVIDED: | +/- 2,000 L.F. |
| LOT COVERAGE ALLOWED: | 80% (MAXIMUM PER LOT OR TOTAL PARCEL ACREAGE) |
| LOT COVERAGE PROVIDED: | |

| PARKING ANALYSIS | | | | | |
|---|---|---|---|---|---|
| LOT TYPE | GARAGE | DRIVEWAY | TOTAL PER HOUSE | TOTAL LOT | TOTAL SPACES |
| FRONT ENTRY | 2 | 2 | 4 | 140 | 560 |
| OFF STREET/ PARALLEL GUEST /AMENITY PARKING | | | | | 34 |
| TOTAL PARKING SPACES PROPOSED FOR RESIDENTIAL | | | | | 594 |

BOUNDARY SURVEY BY: McNALLY & PATRICK
1505 HWY. 29 SOUTH, LAWRENCEVILLE, GEORGIA 30044
PHONE: 770.963.8520

**DEVELOPED BY:**

PARKLAND COMMUNITIES

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770.225.4730 | www.aepll.com



SURVEYING BY:
McNALLY & PATRICK
PHONE: (770) 963-8520
CONTACT: LLOYD McNALLY JR.

DEVELOPER
PARKLAND COMMUNITIES
JIM JACOBI, 404.456.5562
JIM@PARKLANDCO.COM

# Site Concept Plan for STEPHENSON ROAD TRACT

800 ALFORD ROAD
L.L. 129 & 128 – DISTRICT 16TH
PARCEL # 16-128-02-001

| | |
|---|---|
| Orig. Issue | |
| Designed by | BW |
| Checked by | JJ |
| Project # | 19073 |

NORTH

SCALE: 1"= 100'
0 100

Rezoning Plan

8-21-2020

Plot Date: Friday, August 21, 2020 1:03:47 PM

File Location: e:\dropbox (aep)\01-civil projects\01\projects\stephenson\19073 - alford road\02-design\prelim\01-concept\19073 - alford road concept 10

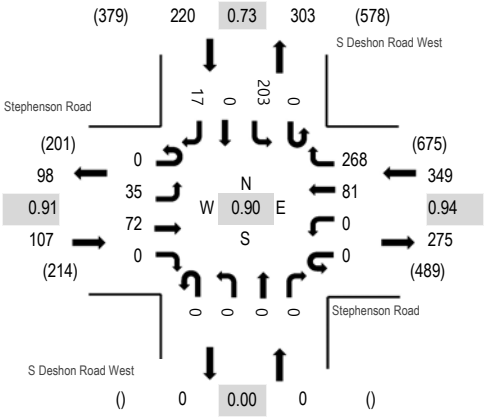
## APPENDIX B

# Traffic Count Data

ALL TRAFFIC DATA SERVICES
(303) 216-2439
www.alltrafficdata.net

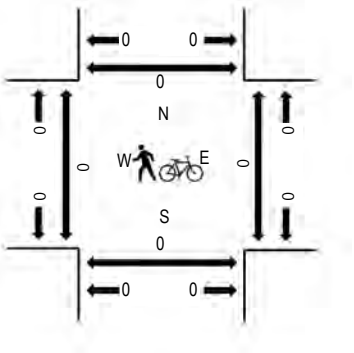
**Location:** 5 S Deshon Road West & Stephenson Road AM
**Date:** Thursday, August 6, 2020
**Peak Hour:** 08:00 AM - 09:00 AM
**Peak 15-Minutes:** 08:15 AM - 08:30 AM

## Peak Hour - Motorized Vehicles




Note: Total study counts contained in parentheses.

## Peak Hour - Pedestrians/Bicycles in Crosswalk




## Traffic Counts - Motorized Vehicles

| Interval Start Time | Stephenson Road Eastbound | | | | Stephenson Road Westbound | | | | S Deshon Road West Northbound | | | | S Deshon Road West Southbound | | | | | Rolling Hour | Pedestrian Crossings | | | |
|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|
| | U-Turn | Left | Thru | Right | U-Turn | Left | Thru | Right | U-Turn | Left | Thru | Right | U-Turn | Left | Thru | Right | Total | | West | East | South | North |
| 7:00 AM | 0 | 7 | 16 | 0 | 0 | 0 | 24 | 54 | 0 | 0 | 0 | 0 | 0 | 35 | 0 | 5 | 141 | 592 | 0 | 0 | 0 | 0 |
| 7:15 AM | 0 | 7 | 18 | 0 | 0 | 0 | 28 | 45 | 0 | 0 | 0 | 0 | 0 | 26 | 0 | 5 | 129 | 603 | 0 | 0 | 0 | 0 |
| 7:30 AM | 0 | 11 | 21 | 0 | 0 | 0 | 17 | 65 | 0 | 0 | 0 | 0 | 0 | 40 | 0 | 8 | 162 | 661 | 0 | 0 | 0 | 0 |
| 7:45 AM | 0 | 7 | 20 | 0 | 0 | 0 | 14 | 79 | 0 | 0 | 0 | 0 | 0 | 38 | 0 | 2 | 160 | 673 | 0 | 0 | 0 | 0 |
| 8:00 AM | 0 | 10 | 22 | 0 | 0 | 0 | 15 | 64 | 0 | 0 | 0 | 0 | 0 | 37 | 0 | 4 | 152 | 676 | 0 | 0 | 0 | 0 |
| 8:15 AM | 0 | 9 | 15 | 0 | 0 | 0 | 22 | 66 | 0 | 0 | 0 | 0 | 0 | 68 | 0 | 7 | 187 | | 0 | 0 | 0 | 0 |
| 8:30 AM | 0 | 11 | 18 | 0 | 0 | 0 | 24 | 67 | 0 | 0 | 0 | 0 | 0 | 52 | 0 | 2 | 174 | | 0 | 0 | 0 | 0 |
| 8:45 AM | 0 | 5 | 17 | 0 | 0 | 0 | 20 | 71 | 0 | 0 | 0 | 0 | 0 | 46 | 0 | 4 | 163 | | 0 | 0 | 0 | 0 |

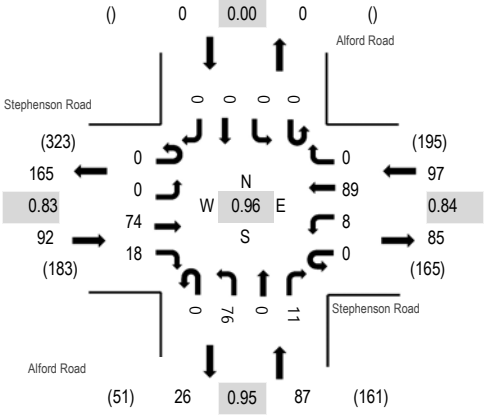
## Peak Rolling Hour Flow Rates

| Vehicle Type | Eastbound | | | | Westbound | | | | Northbound | | | | Southbound | | | | Total |
|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|
| | U-Turn | Left | Thru | Right | U-Turn | Left | Thru | Right | U-Turn | Left | Thru | Right | U-Turn | Left | Thru | Right | |
| Articulated Trucks | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 1 | 0 | 0 | 0 | 0 | 0 | 2 | 0 | 0 | 3 |
| Lights | 0 | 35 | 66 | 0 | 0 | 0 | 78 | 261 | 0 | 0 | 0 | 0 | 0 | 196 | 0 | 17 | 653 |
| Mediums | 0 | 0 | 6 | 0 | 0 | 0 | 3 | 6 | 0 | 0 | 0 | 0 | 0 | 5 | 0 | 0 | 20 |
| Total | 0 | 35 | 72 | 0 | 0 | 0 | 81 | 268 | 0 | 0 | 0 | 0 | 0 | 203 | 0 | 17 | 676 |

ALL TRAFFIC DATA SERVICES
(303) 216-2439
www.alltrafficdata.net

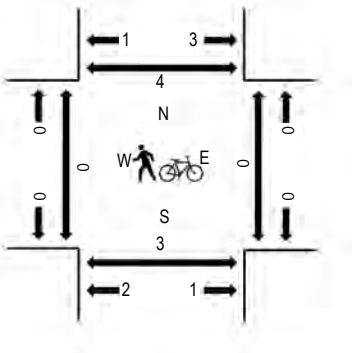
**Location:** 6 Alford Road & Stephenson Road AM
**Date:** Thursday, August 6, 2020
**Peak Hour:** 07:00 AM - 08:00 AM
**Peak 15-Minutes:** 07:15 AM - 07:30 AM

## Peak Hour - Motorized Vehicles




Note: Total study counts contained in parentheses.

## Peak Hour - Pedestrians/Bicycles in Crosswalk




## Traffic Counts - Motorized Vehicles

| Interval Start Time | Stephenson Road Eastbound | | | | Stephenson Road Westbound | | | | Alford Road Northbound | | | | Alford Road Southbound | | | | | Rolling Hour | Pedestrian Crossings | | | |
|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|
| | U-Turn | Left | Thru | Right | U-Turn | Left | Thru | Right | U-Turn | Left | Thru | Right | U-Turn | Left | Thru | Right | Total | | West | East | South | North |
| 7:00 AM | 0 | 0 | 10 | 7 | 0 | 2 | 28 | 0 | 0 | 18 | 0 | 4 | 0 | 0 | 0 | 0 | 69 | 276 | 0 | 0 | 0 | 1 |
| 7:15 AM | 0 | 0 | 18 | 5 | 0 | 0 | 27 | 0 | 0 | 18 | 0 | 4 | 0 | 0 | 0 | 0 | 72 | 276 | 0 | 0 | 0 | 2 |
| 7:30 AM | 0 | 0 | 20 | 1 | 0 | 5 | 18 | 0 | 0 | 20 | 0 | 3 | 0 | 0 | 0 | 0 | 67 | 265 | 0 | 0 | 2 | 0 |
| 7:45 AM | 0 | 0 | 26 | 5 | 0 | 1 | 16 | 0 | 0 | 20 | 0 | 0 | 0 | 0 | 0 | 0 | 68 | 273 | 0 | 0 | 1 | 1 |
| 8:00 AM | 0 | 0 | 22 | 5 | 0 | 2 | 18 | 0 | 0 | 19 | 0 | 3 | 0 | 0 | 0 | 0 | 69 | 263 | 0 | 0 | 4 | 2 |
| 8:15 AM | 0 | 0 | 15 | 3 | 0 | 1 | 28 | 0 | 0 | 13 | 0 | 1 | 0 | 0 | 0 | 0 | 61 | | 0 | 0 | 3 | 2 |
| 8:30 AM | 0 | 0 | 24 | 3 | 0 | 2 | 20 | 0 | 0 | 23 | 0 | 3 | 0 | 0 | 0 | 0 | 75 | | 0 | 0 | 0 | 0 |
| 8:45 AM | 0 | 0 | 11 | 8 | 0 | 1 | 26 | 0 | 0 | 11 | 0 | 1 | 0 | 0 | 0 | 0 | 58 | | 0 | 2 | 4 | 1 |

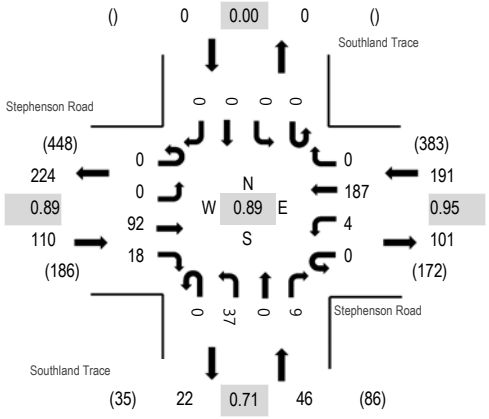
## Peak Rolling Hour Flow Rates

| Vehicle Type | Eastbound | | | | Westbound | | | | Northbound | | | | Southbound | | | | Total |
|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|
| | U-Turn | Left | Thru | Right | U-Turn | Left | Thru | Right | U-Turn | Left | Thru | Right | U-Turn | Left | Thru | Right | |
| Articulated Trucks | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| Lights | 0 | 0 | 72 | 18 | 0 | 7 | 88 | 0 | 0 | 74 | 0 | 11 | 0 | 0 | 0 | 0 | 270 |
| Mediums | 0 | 0 | 2 | 0 | 0 | 1 | 1 | 0 | 0 | 2 | 0 | 0 | 0 | 0 | 0 | 0 | 6 |
| Total | 0 | 0 | 74 | 18 | 0 | 8 | 89 | 0 | 0 | 76 | 0 | 11 | 0 | 0 | 0 | 0 | 276 |

ALL TRAFFIC DATA SERVICES
(303) 216-2439
www.alltrafficdata.net

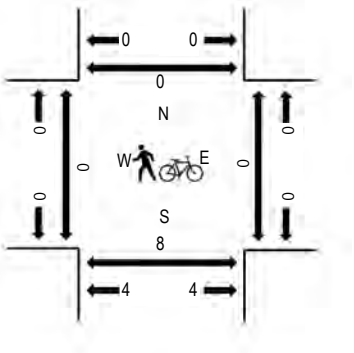
**Location:** 7 Southland Trace & Stephenson Road AM
**Date:** Thursday, August 6, 2020
**Peak Hour:** 07:45 AM - 08:45 AM
**Peak 15-Minutes:** 07:45 AM - 08:00 AM

## Peak Hour - Motorized Vehicles




Note: Total study counts contained in parentheses.

## Peak Hour - Pedestrians/Bicycles in Crosswalk




## Traffic Counts - Motorized Vehicles

| Interval Start Time | Stephenson Road Eastbound | | | | Stephenson Road Westbound | | | | Southland Trace Northbound | | | | Southland Trace Southbound | | | | | Rolling Hour | Pedestrian Crossings | | | |
|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|
| | U-Turn | Left | Thru | Right | U-Turn | Left | Thru | Right | U-Turn | Left | Thru | Right | U-Turn | Left | Thru | Right | Total | | West | East | South | North |
| 7:00 AM | 0 | 0 | 12 | 0 | 0 | 0 | 48 | 0 | 0 | 9 | 0 | 3 | 0 | 0 | 0 | 0 | 72 | 326 | 0 | 0 | 1 | 0 |
| 7:15 AM | 0 | 0 | 18 | 2 | 0 | 1 | 51 | 0 | 0 | 10 | 0 | 0 | 0 | 0 | 0 | 0 | 82 | 342 | 0 | 0 | 0 | 0 |
| 7:30 AM | 0 | 0 | 14 | 2 | 0 | 1 | 48 | 0 | 0 | 9 | 0 | 0 | 0 | 0 | 0 | 0 | 74 | 334 | 0 | 0 | 1 | 0 |
| 7:45 AM | 0 | 0 | 27 | 4 | 0 | 2 | 51 | 0 | 0 | 8 | 0 | 6 | 0 | 0 | 0 | 0 | 98 | 347 | 0 | 0 | 1 | 0 |
| 8:00 AM | 0 | 0 | 24 | 2 | 0 | 0 | 44 | 0 | 0 | 17 | 0 | 1 | 0 | 0 | 0 | 0 | 88 | 329 | 0 | 0 | 3 | 0 |
| 8:15 AM | 0 | 0 | 19 | 5 | 0 | 1 | 41 | 0 | 0 | 6 | 0 | 2 | 0 | 0 | 0 | 0 | 74 | | 0 | 0 | 2 | 0 |
| 8:30 AM | 0 | 0 | 22 | 7 | 0 | 1 | 51 | 0 | 0 | 6 | 0 | 0 | 0 | 0 | 0 | 0 | 87 | | 0 | 0 | 2 | 0 |
| 8:45 AM | 0 | 0 | 23 | 5 | 0 | 2 | 41 | 0 | 0 | 8 | 0 | 1 | 0 | 0 | 0 | 0 | 80 | | 0 | 0 | 0 | 0 |

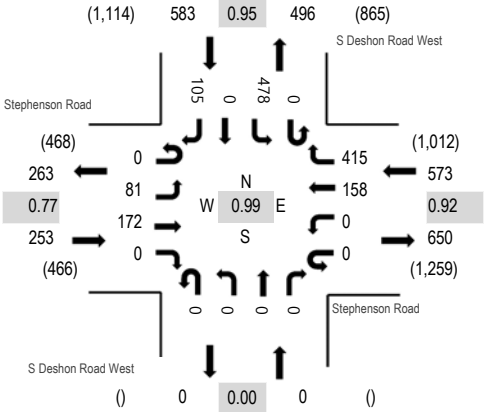
## Peak Rolling Hour Flow Rates

| Vehicle Type | Eastbound | | | | Westbound | | | | Northbound | | | | Southbound | | | | Total |
|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|
| | U-Turn | Left | Thru | Right | U-Turn | Left | Thru | Right | U-Turn | Left | Thru | Right | U-Turn | Left | Thru | Right | |
| Articulated Trucks | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| Lights | 0 | 0 | 86 | 17 | 0 | 4 | 185 | 0 | 0 | 37 | 0 | 8 | 0 | 0 | 0 | 0 | 337 |
| Mediums | 0 | 0 | 6 | 1 | 0 | 0 | 2 | 0 | 0 | 0 | 0 | 1 | 0 | 0 | 0 | 0 | 10 |
| Total | 0 | 0 | 92 | 18 | 0 | 4 | 187 | 0 | 0 | 37 | 0 | 9 | 0 | 0 | 0 | 0 | 347 |

ALL TRAFFIC DATA SERVICES
(303) 216-2439
www.alltrafficdata.net

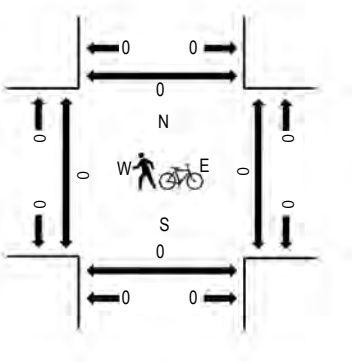
**Location:** 5 S Deshon Road West & Stephenson Road PM
**Date:** Thursday, August 6, 2020
**Peak Hour:** 05:00 PM - 06:00 PM
**Peak 15-Minutes:** 05:30 PM - 05:45 PM

## Peak Hour - Motorized Vehicles




Note: Total study counts contained in parentheses.

## Peak Hour - Pedestrians/Bicycles in Crosswalk




## Traffic Counts - Motorized Vehicles

| Interval Start Time | Stephenson Road Eastbound | | | | Stephenson Road Westbound | | | | S Deshon Road West Northbound | | | | S Deshon Road West Southbound | | | | | Rolling Hour | Pedestrian Crossings | | | |
|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|
| | U-Turn | Left | Thru | Right | U-Turn | Left | Thru | Right | U-Turn | Left | Thru | Right | U-Turn | Left | Thru | Right | Total | | West | East | South | North |
| 4:00 PM | 0 | 21 | 40 | 0 | 0 | 0 | 28 | 72 | 0 | 0 | 0 | 0 | 0 | 132 | 0 | 15 | 308 | 1,183 | 0 | 0 | 0 | 0 |
| 4:15 PM | 0 | 14 | 31 | 0 | 0 | 0 | 30 | 78 | 0 | 0 | 0 | 0 | 0 | 112 | 0 | 14 | 279 | 1,217 | 0 | 0 | 0 | 0 |
| 4:30 PM | 0 | 16 | 41 | 0 | 0 | 0 | 38 | 90 | 0 | 0 | 0 | 0 | 0 | 106 | 0 | 18 | 309 | 1,291 | 0 | 0 | 0 | 0 |
| 4:45 PM | 0 | 13 | 37 | 0 | 0 | 0 | 38 | 65 | 0 | 0 | 0 | 0 | 0 | 110 | 0 | 24 | 287 | 1,339 | 0 | 0 | 0 | 0 |
| 5:00 PM | 0 | 20 | 45 | 0 | 0 | 0 | 37 | 95 | 0 | 0 | 0 | 0 | 0 | 128 | 0 | 17 | 342 | 1,409 | 0 | 0 | 0 | 0 |
| 5:15 PM | 0 | 19 | 38 | 0 | 0 | 0 | 38 | 117 | 0 | 0 | 0 | 0 | 0 | 112 | 0 | 29 | 353 | | 0 | 0 | 0 | 0 |
| 5:30 PM | 0 | 28 | 54 | 0 | 0 | 0 | 37 | 95 | 0 | 0 | 0 | 0 | 0 | 119 | 0 | 24 | 357 | | 0 | 0 | 0 | 0 |
| 5:45 PM | 0 | 14 | 35 | 0 | 0 | 0 | 46 | 108 | 0 | 0 | 0 | 0 | 0 | 119 | 0 | 35 | 357 | | 0 | 0 | 0 | 0 |

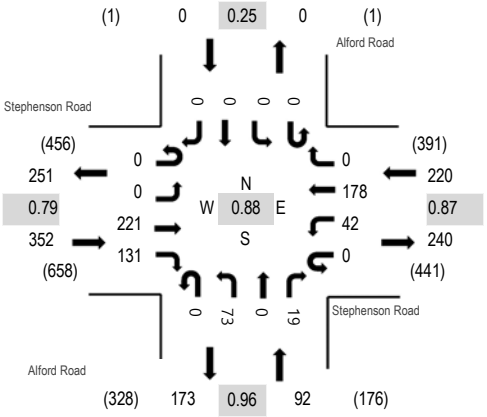
## Peak Rolling Hour Flow Rates

| Vehicle Type | Eastbound | | | | Westbound | | | | Northbound | | | | Southbound | | | | Total |
|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|
| | U-Turn | Left | Thru | Right | U-Turn | Left | Thru | Right | U-Turn | Left | Thru | Right | U-Turn | Left | Thru | Right | |
| Articulated Trucks | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 1 | 0 | 0 | 0 | 0 | 0 | 2 | 0 | 0 | 3 |
| Lights | 0 | 81 | 169 | 0 | 0 | 0 | 157 | 409 | 0 | 0 | 0 | 0 | 0 | 465 | 0 | 105 | 1,386 |
| Mediums | 0 | 0 | 3 | 0 | 0 | 0 | 1 | 5 | 0 | 0 | 0 | 0 | 0 | 11 | 0 | 0 | 20 |
| Total | 0 | 81 | 172 | 0 | 0 | 0 | 158 | 415 | 0 | 0 | 0 | 0 | 0 | 478 | 0 | 105 | 1,409 |

ALL TRAFFIC DATA SERVICES
(303) 216-2439
www.alltrafficdata.net

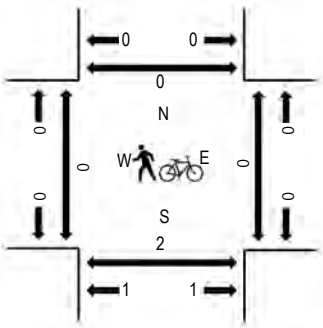
**Location:** 6 Alford Road & Stephenson Road PM
**Date:** Thursday, August 6, 2020
**Peak Hour:** 05:00 PM - 06:00 PM
**Peak 15-Minutes:** 05:30 PM - 05:45 PM

## Peak Hour - Motorized Vehicles




Note: Total study counts contained in parentheses.

## Peak Hour - Pedestrians/Bicycles in Crosswalk




## Traffic Counts - Motorized Vehicles

| Interval Start Time | Stephenson Road Eastbound | | | | Stephenson Road Westbound | | | | Alford Road Northbound | | | | Alford Road Southbound | | | | Total | Rolling Hour | Pedestrian Crossings | | | |
|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|
| | U-Turn | Left | Thru | Right | U-Turn | Left | Thru | Right | U-Turn | Left | Thru | Right | U-Turn | Left | Thru | Right | | | West | East | South | North |
| 4:00 PM | 1 | 0 | 51 | 33 | 0 | 8 | 24 | 0 | 0 | 12 | 0 | 7 | 0 | 0 | 0 | 0 | 136 | 562 | 0 | 0 | 0 | 0 |
| 4:15 PM | 0 | 0 | 45 | 39 | 0 | 5 | 42 | 0 | 0 | 15 | 0 | 6 | 0 | 0 | 0 | 0 | 152 | 587 | 0 | 0 | 0 | 0 |
| 4:30 PM | 0 | 0 | 39 | 30 | 0 | 7 | 52 | 0 | 0 | 20 | 1 | 6 | 0 | 1 | 0 | 0 | 156 | 598 | 0 | 0 | 0 | 0 |
| 4:45 PM | 0 | 0 | 44 | 24 | 0 | 9 | 24 | 0 | 0 | 15 | 0 | 2 | 0 | 0 | 0 | 0 | 118 | 631 | 0 | 0 | 1 | 0 |
| 5:00 PM | 0 | 0 | 53 | 34 | 0 | 9 | 41 | 0 | 0 | 22 | 0 | 2 | 0 | 0 | 0 | 0 | 161 | 664 | 0 | 0 | 0 | 0 |
| 5:15 PM | 0 | 0 | 52 | 35 | 0 | 9 | 45 | 0 | 0 | 14 | 0 | 8 | 0 | 0 | 0 | 0 | 163 | | 0 | 0 | 1 | 0 |
| 5:30 PM | 0 | 0 | 82 | 31 | 0 | 9 | 44 | 0 | 0 | 17 | 0 | 6 | 0 | 0 | 0 | 0 | 189 | | 0 | 0 | 0 | 0 |
| 5:45 PM | 0 | 0 | 34 | 31 | 0 | 15 | 48 | 0 | 0 | 20 | 0 | 3 | 0 | 0 | 0 | 0 | 151 | | 0 | 0 | 1 | 0 |

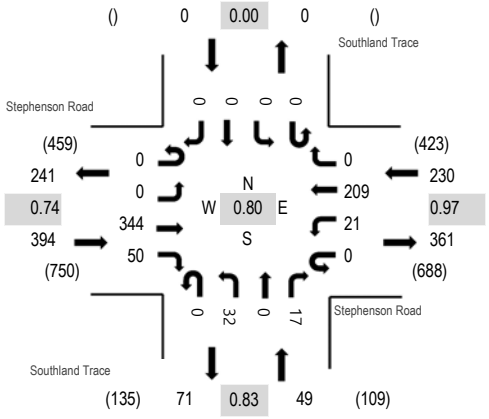
## Peak Rolling Hour Flow Rates

| Vehicle Type | Eastbound | | | | Westbound | | | | Northbound | | | | Southbound | | | | Total |
|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|
| | U-Turn | Left | Thru | Right | U-Turn | Left | Thru | Right | U-Turn | Left | Thru | Right | U-Turn | Left | Thru | Right | |
| Articulated Trucks | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| Lights | 0 | 0 | 218 | 129 | 0 | 42 | 177 | 0 | 0 | 73 | 0 | 19 | 0 | 0 | 0 | 0 | 658 |
| Mediums | 0 | 0 | 3 | 2 | 0 | 0 | 1 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 6 |
| Total | 0 | 0 | 221 | 131 | 0 | 42 | 178 | 0 | 0 | 73 | 0 | 19 | 0 | 0 | 0 | 0 | 664 |

ALL TRAFFIC DATA SERVICES
(303) 216-2439
www.alltrafficdata.net

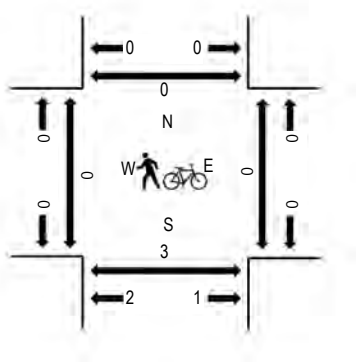
**Location:** 7 Southland Trace & Stephenson Road PM
**Date:** Thursday, August 6, 2020
**Peak Hour:** 05:00 PM - 06:00 PM
**Peak 15-Minutes:** 05:30 PM - 05:45 PM

## Peak Hour - Motorized Vehicles




Note: Total study counts contained in parentheses.

## Peak Hour - Pedestrians/Bicycles in Crosswalk




## Traffic Counts - Motorized Vehicles

| Interval Start Time | Stephenson Road Eastbound | | | | Stephenson Road Westbound | | | | Southland Trace Northbound | | | | Southland Trace Southbound | | | | | Rolling Hour | Pedestrian Crossings | | | |
|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|
| | U-Turn | Left | Thru | Right | U-Turn | Left | Thru | Right | U-Turn | Left | Thru | Right | U-Turn | Left | Thru | Right | Total | | West | East | South | North |
| 4:00 PM | 0 | 0 | 80 | 10 | 0 | 2 | 37 | 0 | 0 | 7 | 0 | 9 | 0 | 0 | 0 | 0 | 145 | 609 | 0 | 0 | 0 | 0 |
| 4:15 PM | 0 | 0 | 91 | 17 | 0 | 3 | 44 | 0 | 0 | 7 | 0 | 5 | 0 | 0 | 0 | 0 | 167 | 627 | 0 | 0 | 0 | 0 |
| 4:30 PM | 0 | 0 | 68 | 14 | 0 | 3 | 55 | 0 | 0 | 12 | 0 | 6 | 0 | 0 | 0 | 0 | 158 | 617 | 0 | 0 | 0 | 0 |
| 4:45 PM | 0 | 0 | 64 | 12 | 0 | 3 | 46 | 0 | 0 | 10 | 0 | 4 | 0 | 0 | 0 | 0 | 139 | 669 | 0 | 0 | 0 | 0 |
| 5:00 PM | 0 | 0 | 87 | 11 | 0 | 2 | 56 | 0 | 0 | 7 | 0 | 0 | 0 | 0 | 0 | 0 | 163 | 673 | 0 | 0 | 1 | 0 |
| 5:15 PM | 0 | 0 | 76 | 13 | 0 | 7 | 49 | 0 | 0 | 5 | 0 | 7 | 0 | 0 | 0 | 0 | 157 | | 0 | 0 | 1 | 0 |
| 5:30 PM | 0 | 0 | 118 | 15 | 0 | 4 | 55 | 0 | 0 | 10 | 0 | 8 | 0 | 0 | 0 | 0 | 210 | | 0 | 0 | 0 | 0 |
| 5:45 PM | 0 | 0 | 63 | 11 | 0 | 8 | 49 | 0 | 0 | 10 | 0 | 2 | 0 | 0 | 0 | 0 | 143 | | 0 | 0 | 1 | 0 |

## Peak Rolling Hour Flow Rates

| Vehicle Type | Eastbound | | | | Westbound | | | | Northbound | | | | Southbound | | | | Total |
|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|
| | U-Turn | Left | Thru | Right | U-Turn | Left | Thru | Right | U-Turn | Left | Thru | Right | U-Turn | Left | Thru | Right | |
| Articulated Trucks | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| Lights | 0 | 0 | 339 | 50 | 0 | 21 | 207 | 0 | 0 | 32 | 0 | 17 | 0 | 0 | 0 | 0 | 666 |
| Mediums | 0 | 0 | 5 | 0 | 0 | 0 | 2 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 7 |
| Total | 0 | 0 | 344 | 50 | 0 | 21 | 209 | 0 | 0 | 32 | 0 | 17 | 0 | 0 | 0 | 0 | 673 |

# All Traffic Data Services

www.alltrafficadata.net

Site Code: 1
Station ID: 1
STEPHENSON ROAD WEST OF
ALFORD ROAD
Latitude: 0' 0.0000 Undefined

| Start | 06-Aug-20 | EB | | Hour Totals | | WB | | Hour Totals | | Combined Totals | |
|---|---|---|---|---|---|---|---|---|---|---|---|
| Time | Thu | Morning | Afternoon | Morning | Afternoon | Morning | Afternoon | Morning | Afternoon | Morning | Afternoon |
| 12:00 | | 12 | 36 | | | 13 | 48 | | | | |
| 12:15 | | 10 | 45 | | | 7 | 48 | | | | |
| 12:30 | | 8 | 43 | | | 11 | 46 | | | | |
| 12:45 | | 7 | 43 | 37 | 167 | 5 | 40 | 36 | 182 | 73 | 349 |
| 01:00 | | 3 | 49 | | | 5 | 34 | | | | |
| 01:15 | | 10 | 53 | | | 11 | 40 | | | | |
| 01:30 | | 9 | 48 | | | 7 | 38 | | | | |
| 01:45 | | 9 | 44 | 31 | 194 | 0 | 58 | 23 | 170 | 54 | 364 |
| 02:00 | | 3 | 43 | | | 0 | 43 | | | | |
| 02:15 | | 4 | 49 | | | 5 | 42 | | | | |
| 02:30 | | 3 | 60 | | | 6 | 41 | | | | |
| 02:45 | | 2 | 42 | 12 | 194 | 1 | 45 | 12 | 171 | 24 | 365 |
| 03:00 | | 6 | 50 | | | 1 | 36 | | | | |
| 03:15 | | 6 | 51 | | | 10 | 47 | | | | |
| 03:30 | | 7 | 52 | | | 7 | 50 | | | | |
| 03:45 | | 5 | 59 | 24 | 212 | 2 | 41 | 20 | 174 | 44 | 386 |
| 04:00 | | 4 | 79 | | | 10 | 40 | | | | |
| 04:15 | | 3 | 75 | | | 6 | 51 | | | | |
| 04:30 | | 6 | 70 | | | 4 | 64 | | | | |
| 04:45 | | 2 | 68 | 15 | 292 | 5 | 57 | 25 | 212 | 40 | 504 |
| 05:00 | | 6 | 79 | | | 6 | 51 | | | | |
| 05:15 | | 8 | 64 | | | 12 | 49 | | | | |
| 05:30 | | 8 | 113 | | | 14 | 68 | | | | |
| 05:45 | | 6 | 59 | 28 | 315 | 13 | 67 | 45 | 235 | 73 | 550 |
| 06:00 | | 9 | 84 | | | 15 | 50 | | | | |
| 06:15 | | 9 | 72 | | | 32 | 67 | | | | |
| 06:30 | | 10 | 79 | | | 36 | 65 | | | | |
| 06:45 | | 10 | 72 | 38 | 307 | 36 | 60 | 119 | 242 | 157 | 549 |
| 07:00 | | 19 | 70 | | | 45 | 61 | | | | |
| 07:15 | | 19 | 62 | | | 42 | 40 | | | | |
| 07:30 | | 23 | 79 | | | 43 | 54 | | | | |
| 07:45 | | 28 | 68 | 89 | 279 | 41 | 48 | 171 | 203 | 260 | 482 |
| 08:00 | | 28 | 62 | | | 39 | 48 | | | | |
| 08:15 | | 20 | 41 | | | 33 | 32 | | | | |
| 08:30 | | 22 | 54 | | | 46 | 36 | | | | |
| 08:45 | | 20 | 48 | 90 | 205 | 38 | 46 | 156 | 162 | 246 | 367 |
| 09:00 | | 30 | 42 | | | 39 | 34 | | | | |
| 09:15 | | 26 | 41 | | | 38 | 33 | | | | |
| 09:30 | | 33 | 41 | | | 38 | 21 | | | | |
| 09:45 | | 38 | 23 | 127 | 147 | 38 | 25 | 153 | 113 | 280 | 260 |
| 10:00 | | 34 | 22 | | | 44 | 30 | | | | |
| 10:15 | | 24 | 29 | | | 43 | 27 | | | | |
| 10:30 | | 45 | 23 | | | 39 | 28 | | | | |
| 10:45 | | 36 | 22 | 139 | 96 | 33 | 21 | 159 | 106 | 298 | 202 |
| 11:00 | | 32 | 20 | | | 34 | 19 | | | | |
| 11:15 | | 35 | 16 | | | 33 | 15 | | | | |
| 11:30 | | 35 | 21 | | | 36 | 14 | | | | |
| 11:45 | | 40 | 27 | 142 | 84 | 36 | 10 | 139 | 58 | 281 | 142 |
| Total | | 772 | 2492 | | | 1058 | 2028 | | | 1830 | 4520 |
| Percent | | 23.7% | 76.3% | | | 34.3% | 65.7% | | | 28.8% | 71.2% |
| Grand Total | | 772 | 2492 | | | 1058 | 2028 | | | 1830 | 4520 |
| Percent | | 23.7% | 76.3% | | | 34.3% | 65.7% | | | 28.8% | 71.2% |
| ADT | | ADT 6,350 | | AADT 6,350 | | | | | | | |

# All Traffic Data Services

www.alltrafficadata.net

Site Code: 2
Station ID: 2
STEPHENSON ROAD WEST OF SR 124

Latitude: 0' 0.0000 Undefined

| Start Time | 06-Aug-20 Thu | EB Morning | EB Afternoon | Hour Totals Morning | Hour Totals Afternoon | WB Morning | WB Afternoon | Hour Totals Morning | Hour Totals Afternoon | Combined Totals Morning | Combined Totals Afternoon |
|---|---|---|---|---|---|---|---|---|---|---|---|
| 12:00 | | 9 | 57 | | | 10 | 72 | | | | |
| 12:15 | | 10 | 67 | | | 11 | 59 | | | | |
| 12:30 | | 5 | 65 | | | 7 | 58 | | | | |
| 12:45 | | 12 | 49 | 36 | 238 | 14 | 63 | 42 | 252 | 78 | 490 |
| 01:00 | | 6 | 74 | | | 7 | 49 | | | | |
| 01:15 | | 7 | 57 | | | 10 | 59 | | | | |
| 01:30 | | 4 | 63 | | | 6 | 45 | | | | |
| 01:45 | | 5 | 64 | 22 | 258 | 5 | 47 | 28 | 200 | 50 | 458 |
| 02:00 | | 5 | 40 | | | 5 | 41 | | | | |
| 02:15 | | 3 | 56 | | | 2 | 48 | | | | |
| 02:30 | | 7 | 67 | | | 5 | 65 | | | | |
| 02:45 | | 7 | 63 | 22 | 226 | 1 | 50 | 13 | 204 | 35 | 430 |
| 03:00 | | 7 | 69 | | | 5 | 69 | | | | |
| 03:15 | | 4 | 75 | | | 1 | 46 | | | | |
| 03:30 | | 5 | 66 | | | 3 | 71 | | | | |
| 03:45 | | 10 | 73 | 26 | 283 | 5 | 71 | 14 | 257 | 40 | 540 |
| 04:00 | | 3 | 63 | | | 3 | 72 | | | | |
| 04:15 | | 3 | 69 | | | 8 | 60 | | | | |
| 04:30 | | 9 | 74 | | | 2 | 62 | | | | |
| 04:45 | | 4 | 53 | 19 | 259 | 3 | 56 | 16 | 250 | 35 | 509 |
| 05:00 | | 14 | 72 | | | 4 | 71 | | | | |
| 05:15 | | 14 | 81 | | | 2 | 81 | | | | |
| 05:30 | | 12 | 88 | | | 5 | 85 | | | | |
| 05:45 | | 23 | 76 | 63 | 317 | 6 | 76 | 17 | 313 | 80 | 630 |
| 06:00 | | 24 | 70 | | | 10 | 88 | | | | |
| 06:15 | | 31 | 72 | | | 14 | 82 | | | | |
| 06:30 | | 29 | 66 | | | 14 | 96 | | | | |
| 06:45 | | 32 | 63 | 116 | 271 | 15 | 57 | 53 | 323 | 169 | 594 |
| 07:00 | | 44 | 54 | | | 24 | 70 | | | | |
| 07:15 | | 41 | 57 | | | 41 | 68 | | | | |
| 07:30 | | 56 | 58 | | | 29 | 61 | | | | |
| 07:45 | | 54 | 63 | 195 | 232 | 40 | 68 | 134 | 267 | 329 | 499 |
| 08:00 | | 51 | 63 | | | 30 | 63 | | | | |
| 08:15 | | 50 | 44 | | | 41 | 65 | | | | |
| 08:30 | | 44 | 39 | | | 37 | 60 | | | | |
| 08:45 | | 41 | 40 | 186 | 186 | 40 | 56 | 148 | 244 | 334 | 430 |
| 09:00 | | 59 | 40 | | | 33 | 41 | | | | |
| 09:15 | | 50 | 49 | | | 32 | 53 | | | | |
| 09:30 | | 55 | 41 | | | 44 | 32 | | | | |
| 09:45 | | 44 | 29 | 208 | 159 | 42 | 37 | 151 | 163 | 359 | 322 |
| 10:00 | | 52 | 31 | | | 51 | 29 | | | | |
| 10:15 | | 45 | 32 | | | 50 | 37 | | | | |
| 10:30 | | 54 | 14 | | | 35 | 29 | | | | |
| 10:45 | | 73 | 25 | 224 | 102 | 41 | 29 | 177 | 124 | 401 | 226 |
| 11:00 | | 56 | 17 | | | 41 | 16 | | | | |
| 11:15 | | 38 | 21 | | | 33 | 23 | | | | |
| 11:30 | | 54 | 20 | | | 46 | 29 | | | | |
| 11:45 | | 60 | 15 | 208 | 73 | 53 | 13 | 173 | 81 | 381 | 154 |
| Total | | 1325 | 2604 | | | 966 | 2678 | | | 2291 | 5282 |
| Percent | | 33.7% | 66.3% | | | 26.5% | 73.5% | | | 30.3% | 69.7% |
| Grand Total | | 1325 | 2604 | | | 966 | 2678 | | | 2291 | 5282 |
| Percent | | 33.7% | 66.3% | | | 26.5% | 73.5% | | | 30.3% | 69.7% |
| ADT | | ADT 7,573 | | AADT 7,573 | | | | | | | |

# All Traffic Data Services

www.alltrafficadata.net

Site Code: 3
Station ID: 3
SR 124 NORTH ASBURY DRIVE - HIGHTOWER TRAIL
Latitude: 0' 0.0000 Undefined

| Start Time | 06-Aug-20 Thu | NB Morning | NB Afternoon | Hour Totals Morning | Hour Totals Afternoon | SB Morning | SB Afternoon | Hour Totals Morning | Hour Totals Afternoon | Combined Totals Morning | Combined Totals Afternoon |
|---|---|---|---|---|---|---|---|---|---|---|---|
| 12:00 | | 34 | 179 | | | 44 | 205 | | | | |
| 12:15 | | 37 | 189 | | | 44 | 189 | | | | |
| 12:30 | | 41 | 216 | | | 28 | 223 | | | | |
| 12:45 | | 38 | 202 | 150 | 786 | 42 | 215 | 158 | 832 | 308 | 1618 |
| 01:00 | | 43 | 212 | | | 21 | 211 | | | | |
| 01:15 | | 31 | 207 | | | 35 | 206 | | | | |
| 01:30 | | 34 | 233 | | | 23 | 217 | | | | |
| 01:45 | | 20 | 215 | 128 | 867 | 27 | 206 | 106 | 840 | 234 | 1707 |
| 02:00 | | 26 | 207 | | | 21 | 204 | | | | |
| 02:15 | | 21 | 244 | | | 17 | 218 | | | | |
| 02:30 | | 23 | 252 | | | 21 | 227 | | | | |
| 02:45 | | 18 | 251 | 88 | 954 | 13 | 222 | 72 | 871 | 160 | 1825 |
| 03:00 | | 25 | 217 | | | 23 | 205 | | | | |
| 03:15 | | 24 | 260 | | | 21 | 251 | | | | |
| 03:30 | | 18 | 256 | | | 16 | 248 | | | | |
| 03:45 | | 42 | 273 | 109 | 1006 | 31 | 233 | 91 | 937 | 200 | 1943 |
| 04:00 | | 29 | 224 | | | 27 | 272 | | | | |
| 04:15 | | 18 | 250 | | | 43 | 308 | | | | |
| 04:30 | | 43 | 291 | | | 43 | 315 | | | | |
| 04:45 | | 26 | 274 | 116 | 1039 | 54 | 275 | 167 | 1170 | 283 | 2209 |
| 05:00 | | 56 | 308 | | | 49 | 303 | | | | |
| 05:15 | | 64 | 290 | | | 59 | 333 | | | | |
| 05:30 | | 65 | 334 | | | 78 | 383 | | | | |
| 05:45 | | 81 | 357 | 266 | 1289 | 120 | 323 | 306 | 1342 | 572 | 2631 |
| 06:00 | | 76 | 357 | | | 112 | 316 | | | | |
| 06:15 | | 103 | 293 | | | 143 | 296 | | | | |
| 06:30 | | 168 | 268 | | | 141 | 265 | | | | |
| 06:45 | | 186 | 212 | 533 | 1130 | 169 | 265 | 565 | 1142 | 1098 | 2272 |
| 07:00 | | 179 | 199 | | | 169 | 232 | | | | |
| 07:15 | | 181 | 208 | | | 186 | 231 | | | | |
| 07:30 | | 234 | 252 | | | 186 | 211 | | | | |
| 07:45 | | 197 | 186 | 791 | 845 | 178 | 222 | 719 | 896 | 1510 | 1741 |
| 08:00 | | 218 | 188 | | | 198 | 182 | | | | |
| 08:15 | | 169 | 173 | | | 192 | 192 | | | | |
| 08:30 | | 166 | 133 | | | 196 | 233 | | | | |
| 08:45 | | 151 | 145 | 704 | 639 | 209 | 161 | 795 | 768 | 1499 | 1407 |
| 09:00 | | 150 | 157 | | | 174 | 165 | | | | |
| 09:15 | | 156 | 148 | | | 183 | 146 | | | | |
| 09:30 | | 171 | 146 | | | 202 | 134 | | | | |
| 09:45 | | 163 | 124 | 640 | 575 | 199 | 118 | 758 | 563 | 1398 | 1138 |
| 10:00 | | 170 | 101 | | | 187 | 105 | | | | |
| 10:15 | | 158 | 110 | | | 201 | 103 | | | | |
| 10:30 | | 160 | 94 | | | 195 | 84 | | | | |
| 10:45 | | 178 | 82 | 666 | 387 | 163 | 89 | 746 | 381 | 1412 | 768 |
| 11:00 | | 179 | 67 | | | 209 | 75 | | | | |
| 11:15 | | 164 | 60 | | | 166 | 71 | | | | |
| 11:30 | | 189 | 73 | | | 211 | 69 | | | | |
| 11:45 | | 185 | 66 | 717 | 266 | 219 | 67 | 805 | 282 | 1522 | 548 |
| Total | | 4908 | 9783 | | | 5288 | 10024 | | | 10196 | 19807 |
| Percent | | 33.4% | 66.6% | | | 34.5% | 65.5% | | | 34.0% | 66.0% |
| Grand Total | | 4908 | 9783 | | | 5288 | 10024 | | | 10196 | 19807 |
| Percent | | 33.4% | 66.6% | | | 34.5% | 65.5% | | | 34.0% | 66.0% |
| ADT | | ADT 30,003 | | AADT 30,003 | | | | | | | |

Kimley»Horn

**APPENDIX C**

# Volume Development (Trip Generation and Growth Rate Calculations)

**Trip Generation Analysis (10th Ed. with *2nd Edition Handbook* Daily IC & *3rd Edition* AM/PM IC)**
**Summertree-Alford Road Tract**
**DeKalb County, GA**

| Land Use | Intensity | Daily Trips | AM Peak Hour | | | PM Peak Hour | | |
|---|---|---|---|---|---|---|---|---|
| | | | Total | In | Out | Total | In | Out |
| **Proposed Site Traffic** | | | | | | | | |
| 210 Single-Family Detached Housing | 140 d.u. | 1,418 | 104 | 26 | 78 | 140 | 88 | 52 |
| | | | | | | | | |
| **Gross Trips** | | **1,418** | **104** | **26** | **78** | **140** | **88** | **52** |
| Residential Trips | | 1,418 | 104 | 26 | 78 | 140 | 88 | 52 |
| *Mixed-Use Reductions* | | *0* | *0* | *0* | *0* | *0* | *0* | *0* |
| *Alternative Mode Reductions* | | *0* | *0* | *0* | *0* | *0* | *0* | *0* |
| Adjusted Residential Trips | | 1,418 | 104 | 26 | 78 | 140 | 88 | 52 |
| | | | | | | | | |
| *Mixed-Use Reductions - TOTAL* | | *0* | *0* | *0* | *0* | *0* | *0* | *0* |
| *Alternative Mode Reductions - TOTAL* | | *0* | *0* | *0* | *0* | *0* | *0* | *0* |
| *Pass-By Reductions - TOTAL* | | *0* | *0* | *0* | *0* | *0* | *0* | *0* |
| **New Trips** | | **1,418** | **104** | **26** | **78** | **140** | **88** | **52** |
| **Driveway Volumes** | | **1,418** | **104** | **26** | **78** | **140** | **88** | **52** |

# Summertree-Alford Rd Tract
## Growth Rate Table

| | |
|---|---|
| **Source:** | GDOT |
| **Location:** | Stephenson Road |
| | w/o Alford Road |
| **Route #:** | 00510900 |
| **Route Type:** | Minor Collector (Urban) |
| **Station:** | 089-0458 |
| **Capacity:** | |

| Count Year | Volume | Growth Rate |
|---|---|---|
| 2013 | 7,400 | |
| 2014 | 7,400 | 0.00% |
| 2015 | 7,400 | 0.00% |
| 2016 | 7,400 | 0.00% |
| 2017 | 7,400 | 0.00% |
| 2018 | 7,510 | 1.49% |

| | |
|---|---|
| **Avg. 1 Year Rates 2013-2018** | **0.30%** |

| | |
|---|---|
| **Source:** | GDOT |
| **Location:** | Stephenson Road |
| | e/o Vigo Drive |
| **Route #:** | 00067600 |
| **Route Type:** | Minor Collector (Urban) |
| **Station:** | 089-0461 |
| **Capacity:** | |

| Count Year | Volume | Growth Rate |
|---|---|---|
| 2013 | 6,810 | |
| 2014 | 6,810 | 0.00% |
| 2015 | 7,090 | 4.11% |
| 2016 | 7,260 | 2.40% |
| **2017** | **7,210** | -0.69% |
| 2018 | 7,320 | 1.53% |

| | |
|---|---|
| **Avg. 1 Year Rates 2013-2018** | **1.45%** |

DeKalb County Population Annual Growth (2010-2019):

| | |
|---|---|
| **Source:** | GDOT |
| **Location:** | Rockbridge Road |
| | w/o Monteagle Trace |
| **Route #:** | 00518900 |
| **Route Type:** | Minor Arterial (Urban) |
| **Station:** | 089-3449 |
| **Capacity:** | |

| Count Year | Volume | Growth Rate |
|---|---|---|
| 2013 | 15,100 | |
| 2014 | 15,100 | 0.00% |
| 2015 | 16,200 | 7.28% |
| **2016** | **15,800** | -2.47% |
| 2017 | 16,700 | 5.70% |
| **2018** | **14,100** | -15.57% |

| | |
|---|---|
| **Avg. 1 Year Rates 2013-2018** | **-1.36%** |
| **Avg. 1 Year Rates 2016-2018** | **-5.53%** |

**Annual Growth**
1.04%

***Bolded data is from actual count years.**

CHOSEN GROWTH RATE: 1.0%

Kimley»Horn

## APPENDIX D

# Intersection Volume Worksheets

# INTERSECTION VOLUME DEVELOPMENT

**Intersection #1**

**Southland Trace at Stephenson Road**

**AM PEAK HOUR**

| | Southland Trace | | | Southland Trace | | | Stephenson Road | | | Stephenson Road | | |
|---|---|---|---|---|---|---|---|---|---|---|---|---|
| | **Northbound** | | | **Southbound** | | | **Eastbound** | | | **Westbound** | | |
| **Description** | Left | Through | Right | Left | Through | Right | Left | Through | Right | Left | Through | Right |
| | | | | | | | | | | | | |
| Observed 2020 Traffic Volumes | 37 | 0 | 9 | 0 | 0 | 0 | 0 | 92 | 18 | 4 | 187 | 0 |
| Pedestrians | | 8 | | | 0 | | | 0 | | | 0 | |
| Conflicting Pedestrians | 0 | | 0 | 0 | | 0 | 0 | | 0 | 8 | | 0 |
| Heavy Vehicles | 0 | 0 | 1 | 0 | 0 | 0 | 0 | 6 | 1 | 0 | 2 | 0 |
| Heavy Vehicle % | 2% | 0% | 11% | 0% | 0% | 0% | 0% | 7% | 6% | 2% | 2% | 0% |
| Peak Hour Factor | | 0.89 | | | 0.89 | | | 0.89 | | | 0.89 | |
| Adjustment | 2.5 | 2.5 | 2.5 | 2.5 | 2.5 | 2.5 | 2.5 | 2.5 | 2.5 | 2.5 | 2.5 | 2.5 |
| Adjusted 2020 Volumes | 93 | 0 | 23 | 0 | 0 | 0 | 0 | 230 | 45 | 10 | 468 | 0 |
| Annual Growth Rate | 1.0% | 1.0% | 1.0% | 1.0% | 1.0% | 1.0% | 1.0% | 1.0% | 1.0% | 1.0% | 1.0% | 1.0% |
| Growth Factor | 1.062 | 1.062 | 1.062 | 1.062 | 1.062 | 1.062 | 1.062 | 1.062 | 1.062 | 1.062 | 1.062 | 1.062 |
| 2026 Background Traffic | 99 | 0 | 24 | 0 | 0 | 0 | 0 | 244 | 48 | 11 | 497 | 0 |
| | | | | | | | | | | | | |
| **Project Trips** | | | | | | | | | | | | |
| Trip Distribution IN | | | | | | | | 70% | | | | |
| Trip Distribution OUT | | | | | | | | | | | 70% | |
| Residential Trips | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 18 | 0 | 0 | 55 | 0 |
| | | | | | | | | | | | | |
| Total Project Trips | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 18 | 0 | 0 | 55 | 0 |
| | | | | | | | | | | | | |
| **2026 Buildout Total** | 99 | 0 | 24 | 0 | 0 | 0 | 0 | 262 | 48 | 11 | 552 | 0 |

**PM PEAK HOUR**

| | Southland Trace | | | Southland Trace | | | Stephenson Road | | | Stephenson Road | | |
|---|---|---|---|---|---|---|---|---|---|---|---|---|
| | **Northbound** | | | **Southbound** | | | **Eastbound** | | | **Westbound** | | |
| **Description** | Left | Through | Right | Left | Through | Right | Left | Through | Right | Left | Through | Right |
| | | | | | | | | | | | | |
| Observed 2020 Traffic Volumes | 32 | 0 | 17 | 0 | 0 | 0 | 0 | 344 | 50 | 21 | 209 | 0 |
| Pedestrians | | 3 | | | 0 | | | 0 | | | 0 | |
| Conflicting Pedestrians | 0 | | 0 | 0 | | 0 | 0 | | 0 | 3 | | 0 |
| Heavy Vehicles | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 5 | 0 | 0 | 2 | 0 |
| Heavy Vehicle % | 2% | 0% | 2% | 0% | 0% | 0% | 0% | 2% | 2% | 2% | 2% | 0% |
| Peak Hour Factor | | 0.80 | | | 0.80 | | | 0.80 | | | 0.80 | |
| Adjustment | 1.5 | 1.5 | 1.5 | 1.5 | 1.5 | 1.5 | 1.5 | 1.5 | 1.5 | 1.5 | 1.5 | 1.5 |
| Adjusted 2020 Volumes | 48 | 0 | 26 | 0 | 0 | 0 | 0 | 516 | 75 | 32 | 314 | 0 |
| Annual Growth Rate | 1.0% | 1.0% | 1.0% | 1.0% | 1.0% | 1.0% | 1.0% | 1.0% | 1.0% | 1.0% | 1.0% | 1.0% |
| Growth Factor | 1.062 | 1.062 | 1.062 | 1.062 | 1.062 | 1.062 | 1.062 | 1.062 | 1.062 | 1.062 | 1.062 | 1.062 |
| 2026 Background Traffic | 51 | 0 | 28 | 0 | 0 | 0 | 0 | 548 | 80 | 34 | 333 | 0 |
| | | | | | | | | | | | | |
| **Project Trips** | | | | | | | | | | | | |
| Trip Distribution IN | | | | | | | | 70% | | | | |
| Trip Distribution OUT | | | | | | | | | | | 70% | |
| Residential Trips | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 62 | 0 | 0 | 36 | 0 |
| | | | | | | | | | | | | |
| Total Project Trips | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 62 | 0 | 0 | 36 | 0 |
| | | | | | | | | | | | | |
| **2026 Buildout Total** | 51 | 0 | 28 | 0 | 0 | 0 | 0 | 610 | 80 | 34 | 369 | 0 |

*8/19/2020 16:05*

## INTERSECTION VOLUME DEVELOPMENT

**Intersection #2**

**Alford Road at Stephenson Road**

**AM PEAK HOUR**

| Description | Alford Road Northbound | | | | Alford Road Southbound | | | | Stephenson Road Eastbound | | | | Stephenson Road Westbound | | | |
|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|
| | U-Turn | Left | Through | Right | U-Turn | Left | Through | Right | U-Turn | Left | Through | Right | U-Turn | Left | Through | Right |
| Observed 2020 Traffic Volumes | 0 | 76 | 0 | 11 | 0 | 0 | 0 | 0 | 0 | 0 | 74 | 18 | 0 | 8 | 89 | 0 |
| Pedestrians | | 3 | | | | 4 | | | | 0 | | | | 0 | | |
| Conflicting Pedestrians | 0 | | | 0 | 0 | | | 0 | 4 | | | 0 | 3 | | | 0 |
| Heavy Vehicles | 0 | 2 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 2 | 0 | 0 | 1 | 1 | 0 |
| Heavy Vehicle % | 0% | 3% | 0% | 2% | 0% | 0% | 0% | 0% | 0% | 0% | 3% | 2% | 0% | 13% | 2% | 0% |
| Peak Hour Factor | | 0.96 | | | | 0.96 | | | | 0.96 | | | | 0.96 | | |
| Adjustment | | 2.5 | 2.5 | 2.5 | 2.5 | 2.5 | 2.5 | 2.5 | 2.5 | 2.5 | 2.5 | 2.5 | 2.5 | 2.5 | 2.5 | 2.5 |
| Adjusted 2020 Volumes | 0 | 190 | 0 | 28 | 0 | 0 | 0 | 0 | 0 | 0 | 185 | 45 | 0 | 20 | 223 | 0 |
| Annual Growth Rate | 1.0% | 1.0% | 1.0% | 1.0% | 1.0% | 1.0% | 1.0% | 1.0% | 1.0% | 1.0% | 1.0% | 1.0% | 1.0% | 1.0% | 1.0% | 1.0% |
| Growth Factor | 1.062 | 1.062 | 1.062 | 1.062 | 1.062 | 1.062 | 1.062 | 1.062 | 1.062 | 1.062 | 1.062 | 1.062 | 1.062 | 1.062 | 1.062 | 1.062 |
| 2026 Background Traffic | 0 | 202 | 0 | 30 | 0 | 0 | 0 | 0 | 0 | 0 | 196 | 48 | 0 | 21 | 237 | 0 |
| **Project Trips** | | | | | | | | | | | | | | | | |
| Trip Distribution IN | | | | | | | | | | | 50% | 15% | | 5% | | |
| Trip Distribution OUT | | 15% | | 5% | | | | | | | | | | | 50% | |
| Residential Trips | 0 | 12 | 0 | 4 | 0 | 0 | 0 | 0 | 0 | 0 | 13 | 4 | 0 | 1 | 39 | 0 |
| Total Project Trips | 0 | 12 | 0 | 4 | 0 | 0 | 0 | 0 | 0 | 0 | 13 | 4 | 0 | 1 | 39 | 0 |
| **2026 Buildout Total** | 0 | 214 | 0 | 34 | 0 | 0 | 0 | 0 | 0 | 0 | 209 | 52 | 0 | 22 | 276 | 0 |

**PM PEAK HOUR**

| Description | Alford Road Northbound | | | | Alford Road Southbound | | | | Stephenson Road Eastbound | | | | Stephenson Road Westbound | | | |
|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|
| | U-Turn | Left | Through | Right | U-Turn | Left | Through | Right | U-Turn | Left | Through | Right | U-Turn | Left | Through | Right |
| Observed 2020 Traffic Volumes | 0 | 73 | 0 | 19 | 0 | 0 | 0 | 0 | 0 | 0 | 221 | 131 | 0 | 42 | 178 | 0 |
| Pedestrians | | 2 | | | | 0 | | | | 0 | | | | 0 | | |
| Conflicting Pedestrians | 0 | | | 0 | 0 | | | 0 | 0 | | | 0 | 2 | | | 0 |
| Heavy Vehicles | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 3 | 2 | 0 | 0 | 1 | 0 |
| Heavy Vehicle % | 0% | 2% | 0% | 2% | 0% | 0% | 0% | 0% | 0% | 0% | 2% | 2% | 0% | 2% | 2% | 0% |
| Peak Hour Factor | | 0.88 | | | | 0.88 | | | | 0.88 | | | | 0.88 | | |
| Adjustment | | 1.5 | 1.5 | 1.5 | 1.5 | 1.5 | 1.5 | 1.5 | 1.5 | 1.5 | 1.5 | 1.5 | 1.5 | 1.5 | 1.5 | 1.5 |
| Adjusted 2020 Volumes | 0 | 110 | 0 | 29 | 0 | 0 | 0 | 0 | 0 | 0 | 332 | 197 | 0 | 63 | 267 | 0 |
| Annual Growth Rate | 1.0% | 1.0% | 1.0% | 1.0% | 1.0% | 1.0% | 1.0% | 1.0% | 1.0% | 1.0% | 1.0% | 1.0% | 1.0% | 1.0% | 1.0% | 1.0% |
| Growth Factor | 1.062 | 1.062 | 1.062 | 1.062 | 1.062 | 1.062 | 1.062 | 1.062 | 1.062 | 1.062 | 1.062 | 1.062 | 1.062 | 1.062 | 1.062 | 1.062 |
| 2026 Background Traffic | 0 | 117 | 0 | 31 | 0 | 0 | 0 | 0 | 0 | 0 | 352 | 209 | 0 | 67 | 283 | 0 |
| **Project Trips** | | | | | | | | | | | | | | | | |
| Trip Distribution IN | | | | | | | | | | | 50% | 15% | | 5% | | |
| Trip Distribution OUT | | 15% | | 5% | | | | | | | | | | | 50% | |
| Residential Trips | 0 | 8 | 0 | 3 | 0 | 0 | 0 | 0 | 0 | 0 | 44 | 13 | 0 | 4 | 26 | 0 |
| Total Project Trips | 0 | 8 | 0 | 3 | 0 | 0 | 0 | 0 | 0 | 0 | 44 | 13 | 0 | 4 | 26 | 0 |
| **2026 Buildout Total** | 0 | 125 | 0 | 34 | 0 | 0 | 0 | 0 | 0 | 0 | 396 | 222 | 0 | 71 | 309 | 0 |

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## INTERSECTION VOLUME DEVELOPMENT

**Intersection #3**

**S Deshon Road West at Stephenson Road**

**AM PEAK HOUR**

| | S Deshon Road West | | | | S Deshon Road West | | | | Stephenson Road | | | | Stephenson Road | | | |
|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|
| | **Northbound** | | | | **Southbound** | | | | **Eastbound** | | | | **Westbound** | | | |
| **Description** | U-Turn | Left | Through | Right | U-Turn | Left | Through | Right | U-Turn | Left | Through | Right | U-Turn | Left | Through | Right |
| Observed 2020 Traffic Volumes | 0 | 0 | 0 | 0 | 0 | 203 | 0 | 17 | 0 | 35 | 72 | 0 | 0 | 0 | 81 | 268 |
| Pedestrians | | 0 | | | | 0 | | | | 0 | | | | 0 | | |
| Conflicting Pedestrians | | 0 | | 0 | | 0 | | 0 | | 0 | | 0 | | 0 | | 0 |
| Heavy Vehicles | 0 | 0 | 0 | 0 | 0 | 5 | 0 | 0 | 0 | 0 | 6 | 0 | 0 | 0 | 3 | 6 |
| Heavy Vehicle % | 0% | 0% | 0% | 0% | 0% | 2% | 0% | 2% | 0% | 2% | 8% | 0% | 0% | 0% | 4% | 2% |
| Peak Hour Factor | | 0.90 | | | | 0.90 | | | | 0.90 | | | | 0.90 | | |
| Adjustment | | 2.5 | 2.5 | 2.5 | 2.5 | 2.5 | 2.5 | 2.5 | 2.5 | 2.5 | 2.5 | 2.5 | 2.5 | 2.5 | 2.5 | 2.5 |
| Adjusted 2020 Volumes | 0 | 0 | 0 | 0 | 0 | 508 | 0 | 43 | 0 | 88 | 180 | 0 | 0 | 0 | 203 | 670 |
| Annual Growth Rate | 1.0% | 1.0% | 1.0% | 1.0% | 1.0% | 1.0% | 1.0% | 1.0% | 1.0% | 1.0% | 1.0% | 1.0% | 1.0% | 1.0% | 1.0% | 1.0% |
| Growth Factor | 1.062 | 1.062 | 1.062 | 1.062 | 1.062 | 1.062 | 1.062 | 1.062 | 1.062 | 1.062 | 1.062 | 1.062 | 1.062 | 1.062 | 1.062 | 1.062 |
| 2026 Background Traffic | 0 | 0 | 0 | 0 | 0 | 539 | 0 | 46 | 0 | 93 | 191 | 0 | 0 | 0 | 215 | 711 |
| **Project Trips** | | | | | | | | | | | | | | | | |
| Trip Distribution IN | | | | | | | | 10% | | | | | | | 20% | |
| Trip Distribution OUT | | | | | | | | | | 10% | 20% | | | | | |
| Residential Trips | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 3 | 0 | 8 | 16 | 0 | 0 | 0 | 5 | 0 |
| Total Project Trips | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 3 | 0 | 8 | 16 | 0 | 0 | 0 | 5 | 0 |
| **2026 Buildout Total** | 0 | 0 | 0 | 0 | 0 | 539 | 0 | 49 | 0 | 101 | 207 | 0 | 0 | 0 | 220 | 711 |

**PM PEAK HOUR**

| | S Deshon Road West | | | | S Deshon Road West | | | | Stephenson Road | | | | Stephenson Road | | | |
|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|
| | **Northbound** | | | | **Southbound** | | | | **Eastbound** | | | | **Westbound** | | | |
| **Description** | U-Turn | Left | Through | Right | U-Turn | Left | Through | Right | U-Turn | Left | Through | Right | U-Turn | Left | Through | Right |
| Observed 2020 Traffic Volumes | 0 | 0 | 0 | 0 | 0 | 478 | 0 | 105 | 0 | 81 | 172 | 0 | 0 | 0 | 158 | 415 |
| Pedestrians | | 0 | | | | 0 | | | | 0 | | | | 0 | | |
| Conflicting Pedestrians | | 0 | | 0 | | 0 | | 0 | | 0 | | 0 | | 0 | | 0 |
| Heavy Vehicles | 0 | 0 | 0 | 0 | 0 | 11 | 0 | 0 | 0 | 0 | 3 | 0 | 0 | 0 | 1 | 5 |
| Heavy Vehicle % | 0% | 0% | 0% | 0% | 0% | 2% | 0% | 2% | 0% | 2% | 2% | 0% | 0% | 0% | 2% | 2% |
| Peak Hour Factor | | 0.99 | | | | 0.99 | | | | 0.99 | | | | 0.99 | | |
| Adjustment | | 1.5 | 1.5 | 1.5 | 1.5 | 1.5 | 1.5 | 1.5 | 1.5 | 1.5 | 1.5 | 1.5 | 1.5 | 1.5 | 1.5 | 1.5 |
| Adjusted 2020 Volumes | 0 | 0 | 0 | 0 | 0 | 717 | 0 | 158 | 0 | 122 | 258 | 0 | 0 | 0 | 237 | 623 |
| Annual Growth Rate | 1.0% | 1.0% | 1.0% | 1.0% | 1.0% | 1.0% | 1.0% | 1.0% | 1.0% | 1.0% | 1.0% | 1.0% | 1.0% | 1.0% | 1.0% | 1.0% |
| Growth Factor | 1.062 | 1.062 | 1.062 | 1.062 | 1.062 | 1.062 | 1.062 | 1.062 | 1.062 | 1.062 | 1.062 | 1.062 | 1.062 | 1.062 | 1.062 | 1.062 |
| 2026 Background Traffic | 0 | 0 | 0 | 0 | 0 | 761 | 0 | 168 | 0 | 130 | 274 | 0 | 0 | 0 | 252 | 661 |
| **Project Trips** | | | | | | | | | | | | | | | | |
| Trip Distribution IN | | | | | | | | 10% | | | | | | | 20% | |
| Trip Distribution OUT | | | | | | | | | | 10% | 20% | | | | | |
| Residential Trips | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 9 | 0 | 5 | 10 | 0 | 0 | 0 | 18 | 0 |
| Total Project Trips | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 9 | 0 | 5 | 10 | 0 | 0 | 0 | 18 | 0 |
| **2026 Buildout Total** | 0 | 0 | 0 | 0 | 0 | 761 | 0 | 177 | 0 | 135 | 284 | 0 | 0 | 0 | 270 | 661 |

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## INTERSECTION VOLUME DEVELOPMENT

**Intersection #4**

**Site Driveway East/ at Stephenson Road**

**AM PEAK HOUR**

| Description | Site Driveway East Northbound U-Turn | Left | Through | Right | Southbound U-Turn | Left | Through | Right | Stephenson Road Eastbound U-Turn | Left | Through | Right | Stephenson Road Westbound U-Turn | Left | Through | Right |
|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|
| Observed 2020 Traffic Volumes | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 85 | 0 | 0 | 0 | 97 | 0 |
| Pedestrians | | 0 | | | | 0 | | | | 0 | | | | 0 | | |
| Conflicting Pedestrians | 0 | | | 0 | 0 | | | 0 | 0 | | | 0 | 0 | | | 0 |
| Heavy Vehicles | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 2 | 0 | 0 | 0 | 2 | 0 |
| Heavy Vehicle % | 0% | 0% | 0% | 0% | 0% | 0% | 0% | 0% | 0% | 0% | 2% | 0% | 0% | 0% | 2% | 0% |
| Peak Hour Factor | | 0.96 | | | | 0.96 | | | | 0.96 | | | | 0.96 | | |
| Adjustment | | 2.5 | 2.5 | 2.5 | 2.5 | 2.5 | 2.5 | 2.5 | 2.5 | 2.5 | 2.5 | 2.5 | 2.5 | 2.5 | 2.5 | 2.5 |
| Adjusted 2020 Volumes | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 213 | 0 | 0 | 0 | 243 | 0 |
| Annual Growth Rate | 1.0% | 1.0% | 1.0% | 1.0% | 1.0% | 1.0% | 1.0% | 1.0% | 1.0% | 1.0% | 1.0% | 1.0% | 1.0% | 1.0% | 1.0% | 1.0% |
| Growth Factor | 1.062 | 1.062 | 1.062 | 1.062 | 1.062 | 1.062 | 1.062 | 1.062 | 1.062 | 1.062 | 1.062 | 1.062 | 1.062 | 1.062 | 1.062 | 1.062 |
| 2026 Background Traffic | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 226 | 0 | 0 | 0 | 258 | 0 |
| | | | | | | | | | | | | | | | | |
| **Project Trips** | | | | | | | | | | | | | | | | |
| Trip Distribution IN | | | | | | | | | | | | 50% | | 25% | 5% | |
| Trip Distribution OUT | | 50% | | 25% | | | | | | | 5% | | | | | |
| Residential Trips | 0 | 39 | 0 | 20 | 0 | 0 | 0 | 0 | 0 | 0 | 4 | 13 | 0 | 7 | 1 | 0 |
| | | | | | | | | | | | | | | | | |
| Total Project Trips | 0 | 39 | 0 | 20 | 0 | 0 | 0 | 0 | 0 | 0 | 4 | 13 | 0 | 7 | 1 | 0 |
| | | | | | | | | | | | | | | | | |
| **2026 Buildout Total** | 0 | 39 | 0 | 20 | 0 | 0 | 0 | 0 | 0 | 0 | 230 | 13 | 0 | 7 | 259 | 0 |

**PM PEAK HOUR**

| Description | Site Driveway East Northbound U-Turn | Left | Through | Right | Southbound U-Turn | Left | Through | Right | Stephenson Road Eastbound U-Turn | Left | Through | Right | Stephenson Road Westbound U-Turn | Left | Through | Right |
|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|
| Observed 2020 Traffic Volumes | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 240 | 0 | 0 | 0 | 220 | 0 |
| Pedestrians | | 0 | | | | 0 | | | | 0 | | | | 0 | | |
| Conflicting Pedestrians | 0 | | | 0 | 0 | | | 0 | 0 | | | 0 | 0 | | | 0 |
| Heavy Vehicles | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 3 | 0 | 0 | 0 | 1 | 0 |
| Heavy Vehicle % | 0% | 0% | 0% | 0% | 0% | 0% | 0% | 0% | 0% | 0% | 2% | 0% | 0% | 0% | 2% | 0% |
| Peak Hour Factor | | 0.88 | | | | 0.88 | | | | 0.88 | | | | 0.88 | | |
| Adjustment | | 1.5 | 1.5 | 1.5 | 1.5 | 1.5 | 1.5 | 1.5 | 1.5 | 1.5 | 1.5 | 1.5 | 1.5 | 1.5 | 1.5 | 1.5 |
| Adjusted 2020 Volumes | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 360 | 0 | 0 | 0 | 330 | 0 |
| Annual Growth Rate | 1.0% | 1.0% | 1.0% | 1.0% | 1.0% | 1.0% | 1.0% | 1.0% | 1.0% | 1.0% | 1.0% | 1.0% | 1.0% | 1.0% | 1.0% | 1.0% |
| Growth Factor | 1.062 | 1.062 | 1.062 | 1.062 | 1.062 | 1.062 | 1.062 | 1.062 | 1.062 | 1.062 | 1.062 | 1.062 | 1.062 | 1.062 | 1.062 | 1.062 |
| 2026 Background Traffic | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 382 | 0 | 0 | 0 | 350 | 0 |
| | | | | | | | | | | | | | | | | |
| **Project Trips** | | | | | | | | | | | | | | | | |
| Trip Distribution IN | | | | | | | | | | | | 50% | | 25% | 5% | |
| Trip Distribution OUT | | 50% | | 25% | | | | | | | 5% | | | | | |
| Residential Trips | 0 | 26 | 0 | 13 | 0 | 0 | 0 | 0 | 0 | 0 | 3 | 44 | 0 | 22 | 4 | 0 |
| | | | | | | | | | | | | | | | | |
| Total Project Trips | 0 | 26 | 0 | 13 | 0 | 0 | 0 | 0 | 0 | 0 | 3 | 44 | 0 | 22 | 4 | 0 |
| | | | | | | | | | | | | | | | | |
| **2026 Buildout Total** | 0 | 26 | 0 | 13 | 0 | 0 | 0 | 0 | 0 | 0 | 385 | 44 | 0 | 22 | 354 | 0 |

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## INTERSECTION VOLUME DEVELOPMENT

**Intersection #5**

**Alford Road at /Site Driveway West**

**AM PEAK HOUR**

| Description | Alford Road Northbound | | | | Alford Road Southbound | | | | Eastbound | | | | Site Driveway West Westbound | | | |
|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|
| | U-Turn | Left | Through | Right | U-Turn | Left | Through | Right | U-Turn | Left | Through | Right | U-Turn | Left | Through | Right |
| Observed 2020 Traffic Volumes | 0 | 0 | 87 | 0 | 0 | 0 | 26 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| Pedestrians | | | 0 | | | | 0 | | | | 0 | | | | 0 | |
| Conflicting Pedestrians | | 0 | | 0 | | 0 | | 0 | | 0 | | 0 | | 0 | | 0 |
| Heavy Vehicles | 0 | 0 | 2 | 0 | 0 | 0 | 1 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| Heavy Vehicle % | 0% | 0% | 2% | 0% | 0% | 0% | 4% | 0% | 0% | 0% | 0% | 0% | 0% | 0% | 0% | 0% |
| Peak Hour Factor | | | 0.96 | | | | 0.96 | | | | 0.96 | | | | 0.96 | |
| Adjustment | | 2.5 | 2.5 | 2.5 | 2.5 | 2.5 | 2.5 | 2.5 | 2.5 | 2.5 | 2.5 | 2.5 | 2.5 | 2.5 | 2.5 | 2.5 |
| Adjusted 2020 Volumes | 0 | 0 | 218 | 0 | 0 | 0 | 65 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| Annual Growth Rate | 1.0% | 1.0% | 1.0% | 1.0% | 1.0% | 1.0% | 1.0% | 1.0% | 1.0% | 1.0% | 1.0% | 1.0% | 1.0% | 1.0% | 1.0% | 1.0% |
| Growth Factor | 1.062 | 1.062 | 1.062 | 1.062 | 1.062 | 1.062 | 1.062 | 1.062 | 1.062 | 1.062 | 1.062 | 1.062 | 1.062 | 1.062 | 1.062 | 1.062 |
| 2026 Background Traffic | 0 | 0 | 231 | 0 | 0 | 0 | 69 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| **Project Trips** | | | | | | | | | | | | | | | | |
| Trip Distribution IN | | | | 5% | | 20% | | | | | | | | | | |
| Trip Distribution OUT | | | | | | | | | | | | | | 5% | | 20% |
| Residential Trips | 0 | 0 | 0 | 1 | 0 | 5 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 4 | 0 | 16 |
| Total Project Trips | 0 | 0 | 0 | 1 | 0 | 5 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 4 | 0 | 16 |
| **2026 Buildout Total** | 0 | 0 | 231 | 1 | 0 | 5 | 69 | 0 | 0 | 0 | 0 | 0 | 0 | 4 | 0 | 16 |

**PM PEAK HOUR**

| Description | Alford Road Northbound | | | | Alford Road Southbound | | | | Eastbound | | | | Site Driveway West Westbound | | | |
|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|
| | U-Turn | Left | Through | Right | U-Turn | Left | Through | Right | U-Turn | Left | Through | Right | U-Turn | Left | Through | Right |
| Observed 2020 Traffic Volumes | 0 | 0 | 92 | 0 | 0 | 0 | 173 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| Pedestrians | | | 0 | | | | 0 | | | | 0 | | | | 0 | |
| Conflicting Pedestrians | | 0 | | 0 | | 0 | | 0 | | 0 | | 0 | | 0 | | 0 |
| Heavy Vehicles | 0 | 0 | 0 | 0 | 0 | 0 | 2 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| Heavy Vehicle % | 0% | 0% | 2% | 0% | 0% | 0% | 2% | 0% | 0% | 0% | 0% | 0% | 0% | 0% | 0% | 0% |
| Peak Hour Factor | | | 0.88 | | | | 0.88 | | | | 0.88 | | | | 0.88 | |
| Adjustment | | 1.5 | 1.5 | 1.5 | 1.5 | 1.5 | 1.5 | 1.5 | 1.5 | 1.5 | 1.5 | 1.5 | 1.5 | 1.5 | 1.5 | 1.5 |
| Adjusted 2020 Volumes | 0 | 0 | 138 | 0 | 0 | 0 | 260 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| Annual Growth Rate | 1.0% | 1.0% | 1.0% | 1.0% | 1.0% | 1.0% | 1.0% | 1.0% | 1.0% | 1.0% | 1.0% | 1.0% | 1.0% | 1.0% | 1.0% | 1.0% |
| Growth Factor | 1.062 | 1.062 | 1.062 | 1.062 | 1.062 | 1.062 | 1.062 | 1.062 | 1.062 | 1.062 | 1.062 | 1.062 | 1.062 | 1.062 | 1.062 | 1.062 |
| 2026 Background Traffic | 0 | 0 | 146 | 0 | 0 | 0 | 276 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| **Project Trips** | | | | | | | | | | | | | | | | |
| Trip Distribution IN | | | | 5% | | 20% | | | | | | | | | | |
| Trip Distribution OUT | | | | | | | | | | | | | | 5% | | 20% |
| Residential Trips | 0 | 0 | 0 | 4 | 0 | 18 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 3 | 0 | 10 |
| Total Project Trips | 0 | 0 | 0 | 4 | 0 | 18 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 3 | 0 | 10 |
| **2026 Buildout Total** | 0 | 0 | 146 | 4 | 0 | 18 | 276 | 0 | 0 | 0 | 0 | 0 | 0 | 3 | 0 | 10 |

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## APPENDIX E

# *Synchro* Analysis Reports

| Intersection | |
|---|---|
| Int Delay, s/veh | 2.7 |

| Movement | EBT | EBR | WBL | WBT | NBL | NBR |
|---|---|---|---|---|---|---|
| Lane Configurations | | | | | | |
| Traffic Vol, veh/h | 230 | 45 | 10 | 468 | 93 | 23 |
| Future Vol, veh/h | 230 | 45 | 10 | 468 | 93 | 23 |
| Conflicting Peds, #/hr | 0 | 0 | 8 | 0 | 0 | 0 |
| Sign Control | Free | Free | Free | Free | Stop | Stop |
| RT Channelized | - | None | - | None | - | None |
| Storage Length | - | 240 | - | - | 0 | - |
| Veh in Median Storage, # | 0 | - | - | 0 | 0 | - |
| Grade, % | 0 | - | - | 0 | 0 | - |
| Peak Hour Factor | 89 | 89 | 89 | 89 | 89 | 89 |
| Heavy Vehicles, % | 7 | 6 | 2 | 2 | 2 | 11 |
| Mvmt Flow | 258 | 51 | 11 | 526 | 104 | 26 |

| Major/Minor | Major1 | | Major2 | | Minor1 | |
|---|---|---|---|---|---|---|
| Conflicting Flow All | 0 | 0 | 317 | 0 | 814 | 266 |
| Stage 1 | - | - | - | - | 266 | - |
| Stage 2 | - | - | - | - | 548 | - |
| Critical Hdwy | - | - | 4.12 | - | 6.42 | 6.31 |
| Critical Hdwy Stg 1 | - | - | - | - | 5.42 | - |
| Critical Hdwy Stg 2 | - | - | - | - | 5.42 | - |
| Follow-up Hdwy | - | - | 2.218 | - | 3.518 | 3.399 |
| Pot Cap-1 Maneuver | - | - | 1243 | - | 347 | 751 |
| Stage 1 | - | - | - | - | 779 | - |
| Stage 2 | - | - | - | - | 579 | - |
| Platoon blocked, % | - | - | | - | | |
| Mov Cap-1 Maneuver | - | - | 1234 | - | 340 | 745 |
| Mov Cap-2 Maneuver | - | - | - | - | 340 | - |
| Stage 1 | - | - | - | - | 773 | - |
| Stage 2 | - | - | - | - | 571 | - |

| Approach | EB | WB | NB |
|---|---|---|---|
| HCM Control Delay, s | 0 | 0.2 | 19.3 |
| HCM LOS | | | C |

| Minor Lane/Major Mvmt | NBLn1 | EBT | EBR | WBL | WBT |
|---|---|---|---|---|---|
| Capacity (veh/h) | 381 | - | - | 1234 | - |
| HCM Lane V/C Ratio | 0.342 | - | - | 0.009 | - |
| HCM Control Delay (s) | 19.3 | - | - | 7.9 | 0 |
| HCM Lane LOS | C | - | - | A | A |
| HCM 95th %tile Q(veh) | 1.5 | - | - | 0 | - |

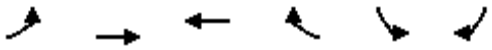
| Intersection | |
|---|---|
| Int Delay, s/veh | 4.8 |

| Movement | EBL | EBT | EBR | WBL | WBT | WBR | NBL | NBT | NBR | SBL | SBT | SBR |
|---|---|---|---|---|---|---|---|---|---|---|---|---|
| Lane Configurations | | | | | | | | | | | | |
| Traffic Vol, veh/h | 0 | 185 | 45 | 20 | 223 | 0 | 190 | 0 | 28 | 0 | 0 | 0 |
| Future Vol, veh/h | 0 | 185 | 45 | 20 | 223 | 0 | 190 | 0 | 28 | 0 | 0 | 0 |
| Conflicting Peds, #/hr | 4 | 0 | 0 | 3 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| Sign Control | Free | Free | Free | Free | Free | Free | Stop | Stop | Stop | Stop | Stop | Stop |
| RT Channelized | - | - | None | - | - | None | - | - | Yield | - | - | None |
| Storage Length | 140 | - | - | 140 | - | - | - | - | 230 | - | - | - |
| Veh in Median Storage, # | - | 0 | - | - | 0 | - | - | 1 | - | - | 0 | - |
| Grade, % | - | 0 | - | - | 0 | - | - | 0 | - | - | 0 | - |
| Peak Hour Factor | 96 | 96 | 96 | 96 | 96 | 96 | 96 | 96 | 96 | 96 | 96 | 96 |
| Heavy Vehicles, % | 0 | 3 | 2 | 13 | 2 | 0 | 3 | 0 | 2 | 0 | 0 | 0 |
| Mvmt Flow | 0 | 193 | 47 | 21 | 232 | 0 | 198 | 0 | 29 | 0 | 0 | 0 |

| Major/Minor | Major1 | | | Major2 | | | Minor1 | | | Minor2 | | |
|---|---|---|---|---|---|---|---|---|---|---|---|---|
| Conflicting Flow All | 236 | 0 | 0 | 243 | 0 | 0 | 494 | 498 | 220 | - | 521 | - |
| Stage 1 | - | - | - | - | - | - | 220 | 220 | - | - | 278 | - |
| Stage 2 | - | - | - | - | - | - | 274 | 278 | - | - | 243 | - |
| Critical Hdwy | 4.1 | - | - | 4.23 | - | - | 7.13 | 6.5 | 6.22 | - | 6.5 | - |
| Critical Hdwy Stg 1 | - | - | - | - | - | - | 6.13 | 5.5 | - | - | 5.5 | - |
| Critical Hdwy Stg 2 | - | - | - | - | - | - | 6.13 | 5.5 | - | - | 5.5 | - |
| Follow-up Hdwy | 2.2 | - | - | 2.317 | - | - | 3.527 | 4 | 3.318 | - | 4 | - |
| Pot Cap-1 Maneuver | 1343 | - | - | 1262 | - | - | 484 | 477 | 820 | 0 | 463 | 0 |
| Stage 1 | - | - | - | - | - | - | 780 | 725 | - | 0 | 684 | 0 |
| Stage 2 | - | - | - | - | - | - | 730 | 684 | - | 0 | 708 | 0 |
| Platoon blocked, % | | - | - | | - | - | | | | | | |
| Mov Cap-1 Maneuver | 1338 | - | - | 1258 | - | - | 476 | 466 | 818 | - | 452 | - |
| Mov Cap-2 Maneuver | - | - | - | - | - | - | 557 | 529 | - | - | 452 | - |
| Stage 1 | - | - | - | - | - | - | 778 | 723 | - | - | 670 | - |
| Stage 2 | - | - | - | - | - | - | 718 | 670 | - | - | 706 | - |

| Approach | EB | WB | NB | SB |
|---|---|---|---|---|
| HCM Control Delay, s | 0 | 0.7 | 14.3 | 0 |
| HCM LOS | | | B | A |

| Minor Lane/Major Mvmt | NBLn1 | NBLn2 | EBL | EBT | EBR | WBL | WBT | WBR | SBLn1 |
|---|---|---|---|---|---|---|---|---|---|
| Capacity (veh/h) | 557 | 818 | 1338 | - | - | 1258 | - | - | - |
| HCM Lane V/C Ratio | 0.355 | 0.036 | - | - | - | 0.017 | - | - | - |
| HCM Control Delay (s) | 15 | 9.6 | 0 | - | - | 7.9 | - | - | 0 |
| HCM Lane LOS | C | A | A | - | - | A | - | - | A |
| HCM 95th %tile Q(veh) | 1.6 | 0.1 | 0 | - | - | 0.1 | - | - | - |



| Movement | EBL | EBT | WBT | WBR | SBL | SBR |
|---|---|---|---|---|---|---|
| Lane Configurations | | | | | | |
| Traffic Volume (veh/h) | 88 | 180 | 203 | 670 | 508 | 43 |
| Future Volume (veh/h) | 88 | 180 | 203 | 670 | 508 | 43 |
| Initial Q (Qb), veh | 0 | 0 | 0 | 0 | 0 | 0 |
| Ped-Bike Adj(A_pbT) | 1.00 | | | 1.00 | 1.00 | 1.00 |
| Parking Bus, Adj | 1.00 | 1.00 | 1.00 | 1.00 | 1.00 | 1.00 |
| Work Zone On Approach | | No | No | | No | |
| Adj Sat Flow, veh/h/ln | 1870 | 1781 | 1841 | 1870 | 1870 | 1870 |
| Adj Flow Rate, veh/h | 98 | 200 | 226 | 744 | 564 | 48 |
| Peak Hour Factor | 0.90 | 0.90 | 0.90 | 0.90 | 0.90 | 0.90 |
| Percent Heavy Veh, % | 2 | 8 | 4 | 2 | 2 | 2 |
| Cap, veh/h | 358 | 941 | 762 | 1199 | 610 | 543 |
| Arrive On Green | 0.05 | 0.53 | 0.41 | 0.41 | 0.34 | 0.34 |
| Sat Flow, veh/h | 1781 | 1781 | 1841 | 1585 | 1781 | 1585 |
| Grp Volume(v), veh/h | 98 | 200 | 226 | 744 | 564 | 48 |
| Grp Sat Flow(s),veh/h/ln | 1781 | 1781 | 1841 | 1585 | 1781 | 1585 |
| Q Serve(g_s), s | 2.8 | 5.5 | 7.6 | 20.0 | 28.3 | 1.9 |
| Cycle Q Clear(g_c), s | 2.8 | 5.5 | 7.6 | 20.0 | 28.3 | 1.9 |
| Prop In Lane | 1.00 | | | 1.00 | 1.00 | 1.00 |
| Lane Grp Cap(c), veh/h | 358 | 941 | 762 | 1199 | 610 | 543 |
| V/C Ratio(X) | 0.27 | 0.21 | 0.30 | 0.62 | 0.92 | 0.09 |
| Avail Cap(c_a), veh/h | 443 | 941 | 762 | 1199 | 749 | 666 |
| HCM Platoon Ratio | 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 |
| Uniform Delay (d), s/veh | 13.6 | 11.6 | 18.2 | 5.2 | 29.3 | 20.7 |
| Incr Delay (d2), s/veh | 0.4 | 0.5 | 1.0 | 2.4 | 15.3 | 0.1 |
| Initial Q Delay(d3),s/veh | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 |
| %ile BackOfQ(50%),veh/ln | 1.0 | 2.1 | 3.2 | 17.0 | 14.2 | 2.1 |
| Unsig. Movement Delay, s/veh | | | | | | |
| LnGrp Delay(d),s/veh | 14.0 | 12.1 | 19.2 | 7.6 | 44.6 | 20.8 |
| LnGrp LOS | B | B | B | A | D | C |
| Approach Vol, veh/h | | 298 | 970 | | 612 | |
| Approach Delay, s/veh | | 12.8 | 10.3 | | 42.8 | |
| Approach LOS | | B | B | | D | |

| Timer - Assigned Phs | 1 | 2 | | 4 | | 6 |
|---|---|---|---|---|---|---|
| Phs Duration (G+Y+Rc), s | 10.6 | 44.4 | | 37.8 | | 55.0 |
| Change Period (Y+Rc), s | 6.0 | 6.0 | | 6.0 | | 6.0 |
| Max Green Setting (Gmax), s | 9.0 | 34.0 | | 39.0 | | 49.0 |
| Max Q Clear Time (g_c+I1), s | 4.8 | 22.0 | | 30.3 | | 7.5 |
| Green Ext Time (p_c), s | 0.1 | 3.5 | | 1.5 | | 1.1 |

| Intersection Summary | |
|---|---|
| HCM 6th Ctrl Delay | 21.3 |
| HCM 6th LOS | C |

| Intersection | |
|---|---|
| Int Delay, s/veh | 2.2 |

| Movement | EBT | EBR | WBL | WBT | NBL | NBR |
|---|---|---|---|---|---|---|
| Lane Configurations | | | | | | |
| Traffic Vol, veh/h | 516 | 75 | 32 | 314 | 48 | 26 |
| Future Vol, veh/h | 516 | 75 | 32 | 314 | 48 | 26 |
| Conflicting Peds, #/hr | 0 | 0 | 3 | 0 | 0 | 0 |
| Sign Control | Free | Free | Free | Free | Stop | Stop |
| RT Channelized | - | None | - | None | - | None |
| Storage Length | - | 240 | - | - | 0 | - |
| Veh in Median Storage, # | 0 | - | - | 0 | 0 | - |
| Grade, % | 0 | - | - | 0 | 0 | - |
| Peak Hour Factor | 80 | 80 | 80 | 80 | 80 | 80 |
| Heavy Vehicles, % | 2 | 2 | 2 | 2 | 2 | 2 |
| Mvmt Flow | 645 | 94 | 40 | 393 | 60 | 33 |

| Major/Minor | Major1 | | Major2 | | Minor1 | |
|---|---|---|---|---|---|---|
| Conflicting Flow All | 0 | 0 | 742 | 0 | 1121 | 648 |
| Stage 1 | - | - | - | - | 648 | - |
| Stage 2 | - | - | - | - | 473 | - |
| Critical Hdwy | - | - | 4.12 | - | 6.42 | 6.22 |
| Critical Hdwy Stg 1 | - | - | - | - | 5.42 | - |
| Critical Hdwy Stg 2 | - | - | - | - | 5.42 | - |
| Follow-up Hdwy | - | - | 2.218 | - | 3.518 | 3.318 |
| Pot Cap-1 Maneuver | - | - | 865 | - | 228 | 470 |
| Stage 1 | - | - | - | - | 521 | - |
| Stage 2 | - | - | - | - | 627 | - |
| Platoon blocked, % | - | - | | - | | |
| Mov Cap-1 Maneuver | - | - | 863 | - | 214 | 469 |
| Mov Cap-2 Maneuver | - | - | - | - | 214 | - |
| Stage 1 | - | - | - | - | 519 | - |
| Stage 2 | - | - | - | - | 590 | - |

| Approach | EB | WB | NB |
|---|---|---|---|
| HCM Control Delay, s | 0 | 0.9 | 25.7 |
| HCM LOS | | | D |

| Minor Lane/Major Mvmt | NBLn1 | EBT | EBR | WBL | WBT |
|---|---|---|---|---|---|
| Capacity (veh/h) | 265 | - | - | 863 | - |
| HCM Lane V/C Ratio | 0.349 | - | - | 0.046 | - |
| HCM Control Delay (s) | 25.7 | - | - | 9.4 | 0 |
| HCM Lane LOS | D | - | - | A | A |
| HCM 95th %tile Q(veh) | 1.5 | - | - | 0.1 | - |

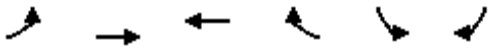
| Intersection | |
|---|---|
| Int Delay, s/veh | 3.2 |

| Movement | EBL | EBT | EBR | WBL | WBT | WBR | NBL | NBT | NBR | SBL | SBT | SBR |
|---|---|---|---|---|---|---|---|---|---|---|---|---|
| Lane Configurations | | | | | | | | | | | | |
| Traffic Vol, veh/h | 0 | 332 | 197 | 63 | 267 | 0 | 110 | 0 | 29 | 0 | 0 | 0 |
| Future Vol, veh/h | 0 | 332 | 197 | 63 | 267 | 0 | 110 | 0 | 29 | 0 | 0 | 0 |
| Conflicting Peds, #/hr | 0 | 0 | 0 | 2 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| Sign Control | Free | Free | Free | Free | Free | Free | Stop | Stop | Stop | Stop | Stop | Stop |
| RT Channelized | - | - | None | - | - | None | - | - | Yield | - | - | None |
| Storage Length | 140 | - | - | 140 | - | - | - | - | 230 | - | - | - |
| Veh in Median Storage, # | - | 0 | - | - | 0 | - | - | 1 | - | - | 0 | - |
| Grade, % | - | 0 | - | - | 0 | - | - | 0 | - | - | 0 | - |
| Peak Hour Factor | 88 | 88 | 88 | 88 | 88 | 88 | 88 | 88 | 88 | 88 | 88 | 88 |
| Heavy Vehicles, % | 0 | 2 | 2 | 2 | 2 | 0 | 2 | 0 | 2 | 0 | 0 | 0 |
| Mvmt Flow | 0 | 377 | 224 | 72 | 303 | 0 | 125 | 0 | 33 | 0 | 0 | 0 |

| Major/Minor | Major1 | | | Major2 | | | Minor1 | | | Minor2 | | |
|---|---|---|---|---|---|---|---|---|---|---|---|---|
| Conflicting Flow All | 303 | 0 | 0 | 603 | 0 | 0 | 938 | 938 | 491 | - | 1050 | - |
| Stage 1 | - | - | - | - | - | - | 491 | 491 | - | - | 447 | - |
| Stage 2 | - | - | - | - | - | - | 447 | 447 | - | - | 603 | - |
| Critical Hdwy | 4.1 | - | - | 4.12 | - | - | 7.12 | 6.5 | 6.22 | - | 6.5 | - |
| Critical Hdwy Stg 1 | - | - | - | - | - | - | 6.12 | 5.5 | - | - | 5.5 | - |
| Critical Hdwy Stg 2 | - | - | - | - | - | - | 6.12 | 5.5 | - | - | 5.5 | - |
| Follow-up Hdwy | 2.2 | - | - | 2.218 | - | - | 3.518 | 4 | 3.318 | - | 4 | - |
| Pot Cap-1 Maneuver | 1269 | - | - | 975 | - | - | 244 | 266 | 578 | 0 | 229 | 0 |
| Stage 1 | - | - | - | - | - | - | 559 | 552 | - | 0 | 577 | 0 |
| Stage 2 | - | - | - | - | - | - | 591 | 577 | - | 0 | 492 | 0 |
| Platoon blocked, % | | - | - | | - | - | | | | | | |
| Mov Cap-1 Maneuver | 1269 | - | - | 973 | - | - | 230 | 246 | 577 | - | 212 | - |
| Mov Cap-2 Maneuver | - | - | - | - | - | - | 357 | 360 | - | - | 212 | - |
| Stage 1 | - | - | - | - | - | - | 558 | 551 | - | - | 534 | - |
| Stage 2 | - | - | - | - | - | - | 547 | 534 | - | - | 491 | - |

| Approach | EB | WB | NB | SB |
|---|---|---|---|---|
| HCM Control Delay, s | 0 | 1.7 | 18.6 | 0 |
| HCM LOS | | | C | A |

| Minor Lane/Major Mvmt | NBLn1 | NBLn2 | EBL | EBT | EBR | WBL | WBT | WBR | SBLn1 |
|---|---|---|---|---|---|---|---|---|---|
| Capacity (veh/h) | 357 | 577 | 1269 | - | - | 973 | - | - | - |
| HCM Lane V/C Ratio | 0.35 | 0.057 | - | - | - | 0.074 | - | - | - |
| HCM Control Delay (s) | 20.4 | 11.6 | 0 | - | - | 9 | - | - | 0 |
| HCM Lane LOS | C | B | A | - | - | A | - | - | A |
| HCM 95th %tile Q(veh) | 1.5 | 0.2 | 0 | - | - | 0.2 | - | - | - |



| Movement | EBL | EBT | WBT | WBR | SBL | SBR |
|---|---|---|---|---|---|---|
| Lane Configurations | | | | | | |
| Traffic Volume (veh/h) | 122 | 258 | 237 | 623 | 717 | 158 |
| Future Volume (veh/h) | 122 | 258 | 237 | 623 | 717 | 158 |
| Initial Q (Qb), veh | 0 | 0 | 0 | 0 | 0 | 0 |
| Ped-Bike Adj(A_pbT) | 1.00 | | | 1.00 | 1.00 | 1.00 |
| Parking Bus, Adj | 1.00 | 1.00 | 1.00 | 1.00 | 1.00 | 1.00 |
| Work Zone On Approach | | No | No | | No | |
| Adj Sat Flow, veh/h/ln | 1870 | 1870 | 1870 | 1870 | 1870 | 1870 |
| Adj Flow Rate, veh/h | 123 | 261 | 239 | 629 | 724 | 160 |
| Peak Hour Factor | 0.99 | 0.99 | 0.99 | 0.99 | 0.99 | 0.99 |
| Percent Heavy Veh, % | 2 | 2 | 2 | 2 | 2 | 2 |
| Cap, veh/h | 355 | 916 | 693 | 1205 | 695 | 618 |
| Arrive On Green | 0.06 | 0.49 | 0.37 | 0.37 | 0.39 | 0.39 |
| Sat Flow, veh/h | 1781 | 1870 | 1870 | 1585 | 1781 | 1585 |
| Grp Volume(v), veh/h | 123 | 261 | 239 | 629 | 724 | 160 |
| Grp Sat Flow(s),veh/h/ln | 1781 | 1870 | 1870 | 1585 | 1781 | 1585 |
| Q Serve(g_s), s | 4.1 | 8.3 | 9.2 | 15.8 | 39.0 | 6.8 |
| Cycle Q Clear(g_c), s | 4.1 | 8.3 | 9.2 | 15.8 | 39.0 | 6.8 |
| Prop In Lane | 1.00 | | | 1.00 | 1.00 | 1.00 |
| Lane Grp Cap(c), veh/h | 355 | 916 | 693 | 1205 | 695 | 618 |
| V/C Ratio(X) | 0.35 | 0.28 | 0.34 | 0.52 | 1.04 | 0.26 |
| Avail Cap(c_a), veh/h | 410 | 916 | 693 | 1205 | 695 | 618 |
| HCM Platoon Ratio | 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 |
| Uniform Delay (d), s/veh | 17.0 | 15.1 | 22.7 | 4.8 | 30.5 | 20.7 |
| Incr Delay (d2), s/veh | 0.6 | 0.8 | 1.4 | 1.6 | 45.6 | 0.2 |
| Initial Q Delay(d3),s/veh | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 |
| %ile BackOfQ(50%),veh/ln | 1.6 | 3.4 | 4.1 | 15.1 | 24.8 | 7.2 |
| Unsig. Movement Delay, s/veh | | | | | | |
| LnGrp Delay(d),s/veh | 17.6 | 15.9 | 24.1 | 6.4 | 76.1 | 20.9 |
| LnGrp LOS | B | B | C | A | F | C |
| Approach Vol, veh/h | | 384 | 868 | | 884 | |
| Approach Delay, s/veh | | 16.4 | 11.2 | | 66.1 | |
| Approach LOS | | B | B | | E | |

| Timer - Assigned Phs | 1 | 2 | | 4 | | 6 |
|---|---|---|---|---|---|---|
| Phs Duration (G+Y+Rc), s | 11.9 | 43.1 | | 45.0 | | 55.0 |
| Change Period (Y+Rc), s | 6.0 | 6.0 | | 6.0 | | 6.0 |
| Max Green Setting (Gmax), s | 9.0 | 34.0 | | 39.0 | | 49.0 |
| Max Q Clear Time (g_c+I1), s | 6.1 | 17.8 | | 41.0 | | 10.3 |
| Green Ext Time (p_c), s | 0.1 | 3.4 | | 0.0 | | 1.4 |

| Intersection Summary | |
|---|---|
| HCM 6th Ctrl Delay | 34.9 |
| HCM 6th LOS | C |

| Intersection | |
|---|---|
| Int Delay, s/veh | 2.9 |

| Movement | EBT | EBR | WBL | WBT | NBL | NBR |
|---|---|---|---|---|---|---|
| Lane Configurations | | | | | | |
| Traffic Vol, veh/h | 244 | 48 | 11 | 497 | 99 | 24 |
| Future Vol, veh/h | 244 | 48 | 11 | 497 | 99 | 24 |
| Conflicting Peds, #/hr | 0 | 0 | 8 | 0 | 0 | 0 |
| Sign Control | Free | Free | Free | Free | Stop | Stop |
| RT Channelized | - | None | - | None | - | None |
| Storage Length | - | 240 | - | - | 0 | - |
| Veh in Median Storage, # | 0 | - | - | 0 | 0 | - |
| Grade, % | 0 | - | - | 0 | 0 | - |
| Peak Hour Factor | 89 | 89 | 89 | 89 | 89 | 89 |
| Heavy Vehicles, % | 7 | 6 | 2 | 2 | 2 | 11 |
| Mvmt Flow | 274 | 54 | 12 | 558 | 111 | 27 |

| Major/Minor | Major1 | | Major2 | | Minor1 | |
|---|---|---|---|---|---|---|
| Conflicting Flow All | 0 | 0 | 336 | 0 | 864 | 282 |
| Stage 1 | - | - | - | - | 282 | - |
| Stage 2 | - | - | - | - | 582 | - |
| Critical Hdwy | - | - | 4.12 | - | 6.42 | 6.31 |
| Critical Hdwy Stg 1 | - | - | - | - | 5.42 | - |
| Critical Hdwy Stg 2 | - | - | - | - | 5.42 | - |
| Follow-up Hdwy | - | - | 2.218 | - | 3.518 | 3.399 |
| Pot Cap-1 Maneuver | - | - | 1223 | - | 325 | 736 |
| Stage 1 | - | - | - | - | 766 | - |
| Stage 2 | - | - | - | - | 559 | - |
| Platoon blocked, % | - | - | | - | | |
| Mov Cap-1 Maneuver | - | - | 1214 | - | 318 | 730 |
| Mov Cap-2 Maneuver | - | - | - | - | 318 | - |
| Stage 1 | - | - | - | - | 760 | - |
| Stage 2 | - | - | - | - | 551 | - |

| Approach | EB | WB | NB |
|---|---|---|---|
| HCM Control Delay, s | 0 | 0.2 | 21.3 |
| HCM LOS | | | C |

| Minor Lane/Major Mvmt | NBLn1 | EBT | EBR | WBL | WBT |
|---|---|---|---|---|---|
| Capacity (veh/h) | 357 | - | - | 1214 | - |
| HCM Lane V/C Ratio | 0.387 | - | - | 0.01 | - |
| HCM Control Delay (s) | 21.3 | - | - | 8 | 0 |
| HCM Lane LOS | C | - | - | A | A |
| HCM 95th %tile Q(veh) | 1.8 | - | - | 0 | - |

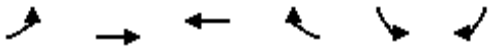
| Intersection | |
|---|---|
| Int Delay, s/veh | 5 |

| Movement | EBL | EBT | EBR | WBL | WBT | WBR | NBL | NBT | NBR | SBL | SBT | SBR |
|---|---|---|---|---|---|---|---|---|---|---|---|---|
| Lane Configurations | | | | | | | | | | | | |
| Traffic Vol, veh/h | 0 | 196 | 48 | 21 | 237 | 0 | 202 | 0 | 30 | 0 | 0 | 0 |
| Future Vol, veh/h | 0 | 196 | 48 | 21 | 237 | 0 | 202 | 0 | 30 | 0 | 0 | 0 |
| Conflicting Peds, #/hr | 4 | 0 | 0 | 3 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| Sign Control | Free | Free | Free | Free | Free | Free | Stop | Stop | Stop | Stop | Stop | Stop |
| RT Channelized | - | - | None | - | - | None | - | - | Yield | - | - | None |
| Storage Length | 140 | - | - | 140 | - | - | - | - | 230 | - | - | - |
| Veh in Median Storage, # | - | 0 | - | - | 0 | - | - | 1 | - | - | 0 | - |
| Grade, % | - | 0 | - | - | 0 | - | - | 0 | - | - | 0 | - |
| Peak Hour Factor | 96 | 96 | 96 | 96 | 96 | 96 | 96 | 96 | 96 | 96 | 96 | 96 |
| Heavy Vehicles, % | 0 | 3 | 2 | 13 | 2 | 0 | 3 | 0 | 2 | 0 | 0 | 0 |
| Mvmt Flow | 0 | 204 | 50 | 22 | 247 | 0 | 210 | 0 | 31 | 0 | 0 | 0 |

| Major/Minor | Major1 | | | Major2 | | | Minor1 | | | Minor2 | | |
|---|---|---|---|---|---|---|---|---|---|---|---|---|
| Conflicting Flow All | 251 | 0 | 0 | 257 | 0 | 0 | 523 | 527 | 232 | - | 552 | - |
| Stage 1 | - | - | - | - | - | - | 232 | 232 | - | - | 295 | - |
| Stage 2 | - | - | - | - | - | - | 291 | 295 | - | - | 257 | - |
| Critical Hdwy | 4.1 | - | - | 4.23 | - | - | 7.13 | 6.5 | 6.22 | - | 6.5 | - |
| Critical Hdwy Stg 1 | - | - | - | - | - | - | 6.13 | 5.5 | - | - | 5.5 | - |
| Critical Hdwy Stg 2 | - | - | - | - | - | - | 6.13 | 5.5 | - | - | 5.5 | - |
| Follow-up Hdwy | 2.2 | - | - | 2.317 | - | - | 3.527 | 4 | 3.318 | - | 4 | - |
| Pot Cap-1 Maneuver | 1326 | - | - | 1246 | - | - | 463 | 459 | 807 | 0 | 444 | 0 |
| Stage 1 | - | - | - | - | - | - | 769 | 716 | - | 0 | 673 | 0 |
| Stage 2 | - | - | - | - | - | - | 715 | 673 | - | 0 | 699 | 0 |
| Platoon blocked, % | | - | - | | - | - | | | | | | |
| Mov Cap-1 Maneuver | 1321 | - | - | 1242 | - | - | 456 | 448 | 805 | - | 433 | - |
| Mov Cap-2 Maneuver | - | - | - | - | - | - | 542 | 516 | - | - | 433 | - |
| Stage 1 | - | - | - | - | - | - | 767 | 714 | - | - | 658 | - |
| Stage 2 | - | - | - | - | - | - | 702 | 658 | - | - | 697 | - |

| Approach | EB | WB | NB | SB |
|---|---|---|---|---|
| HCM Control Delay, s | 0 | 0.6 | 15 | 0 |
| HCM LOS | | | C | A |

| Minor Lane/Major Mvmt | NBLn1 | NBLn2 | EBL | EBT | EBR | WBL | WBT | WBR | SBLn1 |
|---|---|---|---|---|---|---|---|---|---|
| Capacity (veh/h) | 542 | 805 | 1321 | - | - | 1242 | - | - | - |
| HCM Lane V/C Ratio | 0.388 | 0.039 | - | - | - | 0.018 | - | - | - |
| HCM Control Delay (s) | 15.8 | 9.7 | 0 | - | - | 8 | - | - | 0 |
| HCM Lane LOS | C | A | A | - | - | A | - | - | A |
| HCM 95th %tile Q(veh) | 1.8 | 0.1 | 0 | - | - | 0.1 | - | - | - |



| Movement | EBL | EBT | WBT | WBR | SBL | SBR |
|---|---|---|---|---|---|---|
| Lane Configurations | | | | | | |
| Traffic Volume (veh/h) | 93 | 191 | 215 | 711 | 539 | 46 |
| Future Volume (veh/h) | 93 | 191 | 215 | 711 | 539 | 46 |
| Initial Q (Qb), veh | 0 | 0 | 0 | 0 | 0 | 0 |
| Ped-Bike Adj(A_pbT) | 1.00 | | | 1.00 | 1.00 | 1.00 |
| Parking Bus, Adj | 1.00 | 1.00 | 1.00 | 1.00 | 1.00 | 1.00 |
| Work Zone On Approach | | No | No | | No | |
| Adj Sat Flow, veh/h/ln | 1870 | 1781 | 1841 | 1870 | 1870 | 1870 |
| Adj Flow Rate, veh/h | 103 | 212 | 239 | 790 | 599 | 51 |
| Peak Hour Factor | 0.90 | 0.90 | 0.90 | 0.90 | 0.90 | 0.90 |
| Percent Heavy Veh, % | 2 | 8 | 4 | 2 | 2 | 2 |
| Cap, veh/h | 336 | 917 | 738 | 1205 | 640 | 570 |
| Arrive On Green | 0.05 | 0.51 | 0.40 | 0.40 | 0.36 | 0.36 |
| Sat Flow, veh/h | 1781 | 1781 | 1841 | 1585 | 1781 | 1585 |
| Grp Volume(v), veh/h | 103 | 212 | 239 | 790 | 599 | 51 |
| Grp Sat Flow(s),veh/h/ln | 1781 | 1781 | 1841 | 1585 | 1781 | 1585 |
| Q Serve(g_s), s | 3.1 | 6.2 | 8.5 | 22.7 | 30.9 | 2.0 |
| Cycle Q Clear(g_c), s | 3.1 | 6.2 | 8.5 | 22.7 | 30.9 | 2.0 |
| Prop In Lane | 1.00 | | | 1.00 | 1.00 | 1.00 |
| Lane Grp Cap(c), veh/h | 336 | 917 | 738 | 1205 | 640 | 570 |
| V/C Ratio(X) | 0.31 | 0.23 | 0.32 | 0.66 | 0.94 | 0.09 |
| Avail Cap(c_a), veh/h | 415 | 917 | 738 | 1205 | 730 | 649 |
| HCM Platoon Ratio | 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 |
| Uniform Delay (d), s/veh | 14.8 | 12.7 | 19.6 | 5.4 | 29.4 | 20.2 |
| Incr Delay (d2), s/veh | 0.5 | 0.6 | 1.2 | 2.8 | 18.1 | 0.1 |
| Initial Q Delay(d3),s/veh | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 |
| %ile BackOfQ(50%),veh/ln | 1.2 | 2.4 | 3.6 | 19.0 | 15.9 | 0.0 |
| Unsig. Movement Delay, s/veh | | | | | | |
| LnGrp Delay(d),s/veh | 15.3 | 13.3 | 20.8 | 8.2 | 47.5 | 20.3 |
| LnGrp LOS | B | B | C | A | D | C |
| Approach Vol, veh/h | | 315 | 1029 | | 650 | |
| Approach Delay, s/veh | | 14.0 | 11.2 | | 45.4 | |
| Approach LOS | | B | B | | D | |

| Timer - Assigned Phs | 1 | 2 | | 4 | | 6 |
|---|---|---|---|---|---|---|
| Phs Duration (G+Y+Rc), s | 10.8 | 44.2 | | 40.2 | | 55.0 |
| Change Period (Y+Rc), s | 6.0 | 6.0 | | 6.0 | | 6.0 |
| Max Green Setting (Gmax), s | 9.0 | 34.0 | | 39.0 | | 49.0 |
| Max Q Clear Time (g_c+I1), s | 5.1 | 24.7 | | 32.9 | | 8.2 |
| Green Ext Time (p_c), s | 0.1 | 3.3 | | 1.3 | | 1.1 |

| Intersection Summary | |
|---|---|
| HCM 6th Ctrl Delay | 22.8 |
| HCM 6th LOS | C |

| Intersection | |
|---|---|
| Int Delay, s/veh | 2.5 |

| Movement | EBT | EBR | WBL | WBT | NBL | NBR |
|---|---|---|---|---|---|---|
| Lane Configurations | | | | | | |
| Traffic Vol, veh/h | 548 | 80 | 34 | 333 | 51 | 28 |
| Future Vol, veh/h | 548 | 80 | 34 | 333 | 51 | 28 |
| Conflicting Peds, #/hr | 0 | 0 | 3 | 0 | 0 | 0 |
| Sign Control | Free | Free | Free | Free | Stop | Stop |
| RT Channelized | - | None | - | None | - | None |
| Storage Length | - | 240 | - | - | 0 | - |
| Veh in Median Storage, # | 0 | - | - | 0 | 0 | - |
| Grade, % | 0 | - | - | 0 | 0 | - |
| Peak Hour Factor | 80 | 80 | 80 | 80 | 80 | 80 |
| Heavy Vehicles, % | 2 | 2 | 2 | 2 | 2 | 2 |
| Mvmt Flow | 685 | 100 | 43 | 416 | 64 | 35 |

| Major/Minor | Major1 | | Major2 | | Minor1 | |
|---|---|---|---|---|---|---|
| Conflicting Flow All | 0 | 0 | 788 | 0 | 1190 | 688 |
| Stage 1 | - | - | - | - | 688 | - |
| Stage 2 | - | - | - | - | 502 | - |
| Critical Hdwy | - | - | 4.12 | - | 6.42 | 6.22 |
| Critical Hdwy Stg 1 | - | - | - | - | 5.42 | - |
| Critical Hdwy Stg 2 | - | - | - | - | 5.42 | - |
| Follow-up Hdwy | - | - | 2.218 | - | 3.518 | 3.318 |
| Pot Cap-1 Maneuver | - | - | 831 | - | 207 | 446 |
| Stage 1 | - | - | - | - | 499 | - |
| Stage 2 | - | - | - | - | 608 | - |
| Platoon blocked, % | - | - | | - | | |
| Mov Cap-1 Maneuver | - | - | 829 | - | 193 | 445 |
| Mov Cap-2 Maneuver | - | - | - | - | 193 | - |
| Stage 1 | - | - | - | - | 498 | - |
| Stage 2 | - | - | - | - | 567 | - |

| Approach | EB | WB | NB |
|---|---|---|---|
| HCM Control Delay, s | 0 | 0.9 | 29.9 |
| HCM LOS | | | D |

| Minor Lane/Major Mvmt | NBLn1 | EBT | EBR | WBL | WBT |
|---|---|---|---|---|---|
| Capacity (veh/h) | 241 | - | - | 829 | - |
| HCM Lane V/C Ratio | 0.41 | - | - | 0.051 | - |
| HCM Control Delay (s) | 29.9 | - | - | 9.6 | 0 |
| HCM Lane LOS | D | - | - | A | A |
| HCM 95th %tile Q(veh) | 1.9 | - | - | 0.2 | - |

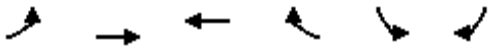
| Intersection | |
|---|---|
| Int Delay, s/veh | 3.4 |

| Movement | EBL | EBT | EBR | WBL | WBT | WBR | NBL | NBT | NBR | SBL | SBT | SBR |
|---|---|---|---|---|---|---|---|---|---|---|---|---|
| Lane Configurations | | | | | | | | | | | | |
| Traffic Vol, veh/h | 0 | 352 | 209 | 67 | 283 | 0 | 117 | 0 | 31 | 0 | 0 | 0 |
| Future Vol, veh/h | 0 | 352 | 209 | 67 | 283 | 0 | 117 | 0 | 31 | 0 | 0 | 0 |
| Conflicting Peds, #/hr | 0 | 0 | 0 | 2 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| Sign Control | Free | Free | Free | Free | Free | Free | Stop | Stop | Stop | Stop | Stop | Stop |
| RT Channelized | - | - | None | - | - | None | - | - | Yield | - | - | None |
| Storage Length | 140 | - | - | 140 | - | - | - | - | 230 | - | - | - |
| Veh in Median Storage, # | - | 0 | - | - | 0 | - | - | 1 | - | - | 0 | - |
| Grade, % | - | 0 | - | - | 0 | - | - | 0 | - | - | 0 | - |
| Peak Hour Factor | 88 | 88 | 88 | 88 | 88 | 88 | 88 | 88 | 88 | 88 | 88 | 88 |
| Heavy Vehicles, % | 0 | 2 | 2 | 2 | 2 | 0 | 2 | 0 | 2 | 0 | 0 | 0 |
| Mvmt Flow | 0 | 400 | 238 | 76 | 322 | 0 | 133 | 0 | 35 | 0 | 0 | 0 |

| Major/Minor | Major1 | | | Major2 | | | Minor1 | | | Minor2 | | |
|---|---|---|---|---|---|---|---|---|---|---|---|---|
| Conflicting Flow All | 322 | 0 | 0 | 640 | 0 | 0 | 995 | 995 | 521 | - | 1114 | - |
| Stage 1 | - | - | - | - | - | - | 521 | 521 | - | - | 474 | - |
| Stage 2 | - | - | - | - | - | - | 474 | 474 | - | - | 640 | - |
| Critical Hdwy | 4.1 | - | - | 4.12 | - | - | 7.12 | 6.5 | 6.22 | - | 6.5 | - |
| Critical Hdwy Stg 1 | - | - | - | - | - | - | 6.12 | 5.5 | - | - | 5.5 | - |
| Critical Hdwy Stg 2 | - | - | - | - | - | - | 6.12 | 5.5 | - | - | 5.5 | - |
| Follow-up Hdwy | 2.2 | - | - | 2.218 | - | - | 3.518 | 4 | 3.318 | - | 4 | - |
| Pot Cap-1 Maneuver | 1249 | - | - | 944 | - | - | 224 | 247 | 555 | 0 | 210 | 0 |
| Stage 1 | - | - | - | - | - | - | 539 | 535 | - | 0 | 561 | 0 |
| Stage 2 | - | - | - | - | - | - | 571 | 561 | - | 0 | 473 | 0 |
| Platoon blocked, % | | - | - | | - | - | | | | | | |
| Mov Cap-1 Maneuver | 1249 | - | - | 942 | - | - | 210 | 226 | 554 | - | 193 | - |
| Mov Cap-2 Maneuver | - | - | - | - | - | - | 338 | 343 | - | - | 193 | - |
| Stage 1 | - | - | - | - | - | - | 538 | 534 | - | - | 516 | - |
| Stage 2 | - | - | - | - | - | - | 525 | 516 | - | - | 472 | - |

| Approach | EB | WB | NB | SB |
|---|---|---|---|---|
| HCM Control Delay, s | 0 | 1.8 | 20.2 | 0 |
| HCM LOS | | | C | A |

| Minor Lane/Major Mvmt | NBLn1 | NBLn2 | EBL | EBT | EBR | WBL | WBT | WBR | SBLn1 |
|---|---|---|---|---|---|---|---|---|---|
| Capacity (veh/h) | 338 | 554 | 1249 | - | - | 942 | - | - | - |
| HCM Lane V/C Ratio | 0.393 | 0.064 | - | - | - | 0.081 | - | - | - |
| HCM Control Delay (s) | 22.4 | 11.9 | 0 | - | - | 9.2 | - | - | 0 |
| HCM Lane LOS | C | B | A | - | - | A | - | - | A |
| HCM 95th %tile Q(veh) | 1.8 | 0.2 | 0 | - | - | 0.3 | - | - | - |



| Movement | EBL | EBT | WBT | WBR | SBL | SBR |
|---|---|---|---|---|---|---|
| Lane Configurations | | | | | | |
| Traffic Volume (veh/h) | 130 | 274 | 252 | 661 | 761 | 168 |
| Future Volume (veh/h) | 130 | 274 | 252 | 661 | 761 | 168 |
| Initial Q (Qb), veh | 0 | 0 | 0 | 0 | 0 | 0 |
| Ped-Bike Adj(A_pbT) | 1.00 | | | 1.00 | 1.00 | 1.00 |
| Parking Bus, Adj | 1.00 | 1.00 | 1.00 | 1.00 | 1.00 | 1.00 |
| Work Zone On Approach | | No | No | | No | |
| Adj Sat Flow, veh/h/ln | 1870 | 1870 | 1870 | 1870 | 1870 | 1870 |
| Adj Flow Rate, veh/h | 131 | 277 | 255 | 668 | 769 | 170 |
| Peak Hour Factor | 0.99 | 0.99 | 0.99 | 0.99 | 0.99 | 0.99 |
| Percent Heavy Veh, % | 2 | 2 | 2 | 2 | 2 | 2 |
| Cap, veh/h | 346 | 916 | 687 | 1200 | 695 | 618 |
| Arrive On Green | 0.06 | 0.49 | 0.37 | 0.37 | 0.39 | 0.39 |
| Sat Flow, veh/h | 1781 | 1870 | 1870 | 1585 | 1781 | 1585 |
| Grp Volume(v), veh/h | 131 | 277 | 255 | 668 | 769 | 170 |
| Grp Sat Flow(s),veh/h/ln | 1781 | 1870 | 1870 | 1585 | 1781 | 1585 |
| Q Serve(g_s), s | 4.4 | 8.9 | 10.0 | 17.7 | 39.0 | 7.3 |
| Cycle Q Clear(g_c), s | 4.4 | 8.9 | 10.0 | 17.7 | 39.0 | 7.3 |
| Prop In Lane | 1.00 | | | 1.00 | 1.00 | 1.00 |
| Lane Grp Cap(c), veh/h | 346 | 916 | 687 | 1200 | 695 | 618 |
| V/C Ratio(X) | 0.38 | 0.30 | 0.37 | 0.56 | 1.11 | 0.28 |
| Avail Cap(c_a), veh/h | 394 | 916 | 687 | 1200 | 695 | 618 |
| HCM Platoon Ratio | 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 |
| Uniform Delay (d), s/veh | 17.2 | 15.3 | 23.2 | 5.1 | 30.5 | 20.8 |
| Incr Delay (d2), s/veh | 0.7 | 0.8 | 1.5 | 1.9 | 67.3 | 0.2 |
| Initial Q Delay(d3),s/veh | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 |
| %ile BackOfQ(50%),veh/ln | 1.7 | 3.7 | 4.4 | 16.8 | 29.0 | 7.6 |
| Unsig. Movement Delay, s/veh | | | | | | |
| LnGrp Delay(d),s/veh | 17.9 | 16.1 | 24.7 | 7.0 | 97.8 | 21.1 |
| LnGrp LOS | B | B | C | A | F | C |
| Approach Vol, veh/h | | 408 | 923 | | 939 | |
| Approach Delay, s/veh | | 16.7 | 11.9 | | 83.9 | |
| Approach LOS | | B | B | | F | |

| Timer - Assigned Phs | 1 | 2 | | 4 | | 6 |
|---|---|---|---|---|---|---|
| Phs Duration (G+Y+Rc), s | 12.3 | 42.7 | | 45.0 | | 55.0 |
| Change Period (Y+Rc), s | 6.0 | 6.0 | | 6.0 | | 6.0 |
| Max Green Setting (Gmax), s | 9.0 | 34.0 | | 39.0 | | 49.0 |
| Max Q Clear Time (g_c+I1), s | 6.4 | 19.7 | | 41.0 | | 10.9 |
| Green Ext Time (p_c), s | 0.1 | 3.5 | | 0.0 | | 1.5 |

| Intersection Summary | |
|---|---|
| HCM 6th Ctrl Delay | 42.5 |
| HCM 6th LOS | D |

| Intersection | |
|---|---|
| Int Delay, s/veh | 3.1 |

| Movement | EBT | EBR | WBL | WBT | NBL | NBR |
|---|---|---|---|---|---|---|
| Lane Configurations | | | | | | |
| Traffic Vol, veh/h | 262 | 48 | 11 | 552 | 99 | 24 |
| Future Vol, veh/h | 262 | 48 | 11 | 552 | 99 | 24 |
| Conflicting Peds, #/hr | 0 | 0 | 8 | 0 | 0 | 0 |
| Sign Control | Free | Free | Free | Free | Stop | Stop |
| RT Channelized | - | None | - | None | - | None |
| Storage Length | - | 240 | - | - | 0 | - |
| Veh in Median Storage, # | 0 | - | - | 0 | 0 | - |
| Grade, % | 0 | - | - | 0 | 0 | - |
| Peak Hour Factor | 89 | 89 | 89 | 89 | 89 | 89 |
| Heavy Vehicles, % | 2 | 2 | 2 | 2 | 2 | 4 |
| Mvmt Flow | 294 | 54 | 12 | 620 | 111 | 27 |

| Major/Minor | Major1 | | Major2 | | Minor1 | |
|---|---|---|---|---|---|---|
| Conflicting Flow All | 0 | 0 | 356 | 0 | 946 | 302 |
| Stage 1 | - | - | - | - | 302 | - |
| Stage 2 | - | - | - | - | 644 | - |
| Critical Hdwy | - | - | 4.12 | - | 6.42 | 6.24 |
| Critical Hdwy Stg 1 | - | - | - | - | 5.42 | - |
| Critical Hdwy Stg 2 | - | - | - | - | 5.42 | - |
| Follow-up Hdwy | - | - | 2.218 | - | 3.518 | 3.336 |
| Pot Cap-1 Maneuver | - | - | 1203 | - | 290 | 733 |
| Stage 1 | - | - | - | - | 750 | - |
| Stage 2 | - | - | - | - | 523 | - |
| Platoon blocked, % | - | - | | - | | |
| Mov Cap-1 Maneuver | - | - | 1194 | - | 283 | 727 |
| Mov Cap-2 Maneuver | - | - | - | - | 283 | - |
| Stage 1 | - | - | - | - | 744 | - |
| Stage 2 | - | - | - | - | 515 | - |

| Approach | EB | WB | NB |
|---|---|---|---|
| HCM Control Delay, s | 0 | 0.2 | 24.4 |
| HCM LOS | | | C |

| Minor Lane/Major Mvmt | NBLn1 | EBT | EBR | WBL | WBT |
|---|---|---|---|---|---|
| Capacity (veh/h) | 321 | - | - | 1194 | - |
| HCM Lane V/C Ratio | 0.431 | - | - | 0.01 | - |
| HCM Control Delay (s) | 24.4 | - | - | 8 | 0 |
| HCM Lane LOS | C | - | - | A | A |
| HCM 95th %tile Q(veh) | 2.1 | - | - | 0 | - |

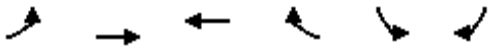
| Intersection | |
|---|---|
| Int Delay, s/veh | 5.2 |

| Movement | EBL | EBT | EBR | WBL | WBT | WBR | NBL | NBT | NBR | SBL | SBT | SBR |
|---|---|---|---|---|---|---|---|---|---|---|---|---|
| Lane Configurations | | | | | | | | | | | | |
| Traffic Vol, veh/h | 0 | 209 | 52 | 22 | 276 | 0 | 214 | 0 | 34 | 0 | 0 | 0 |
| Future Vol, veh/h | 0 | 209 | 52 | 22 | 276 | 0 | 214 | 0 | 34 | 0 | 0 | 0 |
| Conflicting Peds, #/hr | 4 | 0 | 0 | 3 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| Sign Control | Free | Free | Free | Free | Free | Free | Stop | Stop | Stop | Stop | Stop | Stop |
| RT Channelized | - | - | None | - | - | None | - | - | Yield | - | - | None |
| Storage Length | 140 | - | - | 140 | - | - | - | - | 230 | - | - | - |
| Veh in Median Storage, # | - | 0 | - | - | 0 | - | - | 1 | - | - | 0 | - |
| Grade, % | - | 0 | - | - | 0 | - | - | 0 | - | - | 0 | - |
| Peak Hour Factor | 96 | 96 | 96 | 96 | 96 | 96 | 96 | 96 | 96 | 96 | 96 | 96 |
| Heavy Vehicles, % | 2 | 2 | 2 | 5 | 2 | 2 | 2 | 2 | 2 | 2 | 2 | 2 |
| Mvmt Flow | 0 | 218 | 54 | 23 | 288 | 0 | 223 | 0 | 35 | 0 | 0 | 0 |

| Major/Minor | Major1 | | | Major2 | | | Minor1 | | | Minor2 | | |
|---|---|---|---|---|---|---|---|---|---|---|---|---|
| Conflicting Flow All | 292 | 0 | 0 | 275 | 0 | 0 | 582 | 586 | 248 | - | 613 | - |
| Stage 1 | - | - | - | - | - | - | 248 | 248 | - | - | 338 | - |
| Stage 2 | - | - | - | - | - | - | 334 | 338 | - | - | 275 | - |
| Critical Hdwy | 4.12 | - | - | 4.15 | - | - | 7.12 | 6.52 | 6.22 | - | 6.52 | - |
| Critical Hdwy Stg 1 | - | - | - | - | - | - | 6.12 | 5.52 | - | - | 5.52 | - |
| Critical Hdwy Stg 2 | - | - | - | - | - | - | 6.12 | 5.52 | - | - | 5.52 | - |
| Follow-up Hdwy | 2.218 | - | - | 2.245 | - | - | 3.518 | 4.018 | 3.318 | - | 4.018 | - |
| Pot Cap-1 Maneuver | 1270 | - | - | 1271 | - | - | 424 | 422 | 791 | 0 | 408 | 0 |
| Stage 1 | - | - | - | - | - | - | 756 | 701 | - | 0 | 641 | 0 |
| Stage 2 | - | - | - | - | - | - | 680 | 641 | - | 0 | 683 | 0 |
| Platoon blocked, % | | - | - | | - | - | | | | | | |
| Mov Cap-1 Maneuver | 1265 | - | - | 1267 | - | - | 417 | 411 | 789 | - | 398 | - |
| Mov Cap-2 Maneuver | - | - | - | - | - | - | 512 | 488 | - | - | 398 | - |
| Stage 1 | - | - | - | - | - | - | 754 | 699 | - | - | 627 | - |
| Stage 2 | - | - | - | - | - | - | 668 | 627 | - | - | 681 | - |

| Approach | EB | WB | NB | SB |
|---|---|---|---|---|
| HCM Control Delay, s | 0 | 0.6 | 16.3 | 0 |
| HCM LOS | | | C | A |

| Minor Lane/Major Mvmt | NBLn1 | NBLn2 | EBL | EBT | EBR | WBL | WBT | WBR | SBLn1 |
|---|---|---|---|---|---|---|---|---|---|
| Capacity (veh/h) | 512 | 789 | 1265 | - | - | 1267 | - | - | - |
| HCM Lane V/C Ratio | 0.435 | 0.045 | - | - | - | 0.018 | - | - | - |
| HCM Control Delay (s) | 17.3 | 9.8 | 0 | - | - | 7.9 | - | - | 0 |
| HCM Lane LOS | C | A | A | - | - | A | - | - | A |
| HCM 95th %tile Q(veh) | 2.2 | 0.1 | 0 | - | - | 0.1 | - | - | - |



| Movement | EBL | EBT | WBT | WBR | SBL | SBR |
|---|---|---|---|---|---|---|
| Lane Configurations | | | | | | |
| Traffic Volume (veh/h) | 101 | 207 | 220 | 711 | 539 | 49 |
| Future Volume (veh/h) | 101 | 207 | 220 | 711 | 539 | 49 |
| Initial Q (Qb), veh | 0 | 0 | 0 | 0 | 0 | 0 |
| Ped-Bike Adj(A_pbT) | 1.00 | | | 1.00 | 1.00 | 1.00 |
| Parking Bus, Adj | 1.00 | 1.00 | 1.00 | 1.00 | 1.00 | 1.00 |
| Work Zone On Approach | | No | No | | No | |
| Adj Sat Flow, veh/h/ln | 1870 | 1856 | 1870 | 1870 | 1870 | 1870 |
| Adj Flow Rate, veh/h | 112 | 230 | 244 | 790 | 599 | 54 |
| Peak Hour Factor | 0.90 | 0.90 | 0.90 | 0.90 | 0.90 | 0.90 |
| Percent Heavy Veh, % | 2 | 3 | 2 | 2 | 2 | 2 |
| Cap, veh/h | 341 | 961 | 752 | 1204 | 637 | 567 |
| Arrive On Green | 0.05 | 0.52 | 0.40 | 0.40 | 0.36 | 0.36 |
| Sat Flow, veh/h | 1781 | 1856 | 1870 | 1585 | 1781 | 1585 |
| Grp Volume(v), veh/h | 112 | 230 | 244 | 790 | 599 | 54 |
| Grp Sat Flow(s),veh/h/ln | 1781 | 1856 | 1870 | 1585 | 1781 | 1585 |
| Q Serve(g_s), s | 3.4 | 6.6 | 8.7 | 23.0 | 31.4 | 2.2 |
| Cycle Q Clear(g_c), s | 3.4 | 6.6 | 8.7 | 23.0 | 31.4 | 2.2 |
| Prop In Lane | 1.00 | | | 1.00 | 1.00 | 1.00 |
| Lane Grp Cap(c), veh/h | 341 | 961 | 752 | 1204 | 637 | 567 |
| V/C Ratio(X) | 0.33 | 0.24 | 0.32 | 0.66 | 0.94 | 0.10 |
| Avail Cap(c_a), veh/h | 411 | 961 | 752 | 1204 | 701 | 624 |
| HCM Platoon Ratio | 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 |
| Uniform Delay (d), s/veh | 14.8 | 12.8 | 19.8 | 5.6 | 30.0 | 20.6 |
| Incr Delay (d2), s/veh | 0.6 | 0.6 | 1.1 | 2.8 | 19.8 | 0.1 |
| Initial Q Delay(d3),s/veh | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 |
| %ile BackOfQ(50%),veh/ln | 1.3 | 2.6 | 3.7 | 19.3 | 16.4 | 0.0 |
| Unsig. Movement Delay, s/veh | | | | | | |
| LnGrp Delay(d),s/veh | 15.4 | 13.4 | 21.0 | 8.4 | 49.8 | 20.7 |
| LnGrp LOS | B | B | C | A | D | C |
| Approach Vol, veh/h | | 342 | 1034 | | 653 | |
| Approach Delay, s/veh | | 14.0 | 11.3 | | 47.4 | |
| Approach LOS | | B | B | | D | |

| Timer - Assigned Phs | 1 | 2 | | 4 | | 6 |
|---|---|---|---|---|---|---|
| Phs Duration (G+Y+Rc), s | 11.2 | 44.8 | | 40.5 | | 56.0 |
| Change Period (Y+Rc), s | 6.0 | 6.0 | | 6.0 | | 6.0 |
| Max Green Setting (Gmax), s | 9.0 | 35.0 | | 38.0 | | 50.0 |
| Max Q Clear Time (g_c+I1), s | 5.4 | 25.0 | | 33.4 | | 8.6 |
| Green Ext Time (p_c), s | 0.1 | 3.4 | | 1.1 | | 1.2 |

| Intersection Summary | |
|---|---|
| HCM 6th Ctrl Delay | 23.4 |
| HCM 6th LOS | C |

| Intersection | |
|---|---|
| Int Delay, s/veh | 1.2 |

| Movement | EBT | EBR | WBL | WBT | NBL | NBR |
|---|---|---|---|---|---|---|
| Lane Configurations | | | | | | |
| Traffic Vol, veh/h | 230 | 13 | 7 | 259 | 39 | 20 |
| Future Vol, veh/h | 230 | 13 | 7 | 259 | 39 | 20 |
| Conflicting Peds, #/hr | 0 | 0 | 0 | 0 | 0 | 0 |
| Sign Control | Free | Free | Free | Free | Stop | Stop |
| RT Channelized | - | None | - | None | - | None |
| Storage Length | - | 200 | 200 | - | 0 | - |
| Veh in Median Storage, # | 0 | - | - | 0 | 1 | - |
| Grade, % | 0 | - | - | 0 | 0 | - |
| Peak Hour Factor | 96 | 96 | 96 | 96 | 96 | 96 |
| Heavy Vehicles, % | 2 | 2 | 2 | 2 | 2 | 2 |
| Mvmt Flow | 240 | 14 | 7 | 270 | 41 | 21 |

| Major/Minor | Major1 | | Major2 | | Minor1 | |
|---|---|---|---|---|---|---|
| Conflicting Flow All | 0 | 0 | 254 | 0 | 524 | 240 |
| Stage 1 | - | - | - | - | 240 | - |
| Stage 2 | - | - | - | - | 284 | - |
| Critical Hdwy | - | - | 4.12 | - | 6.42 | 6.22 |
| Critical Hdwy Stg 1 | - | - | - | - | 5.42 | - |
| Critical Hdwy Stg 2 | - | - | - | - | 5.42 | - |
| Follow-up Hdwy | - | - | 2.218 | - | 3.518 | 3.318 |
| Pot Cap-1 Maneuver | - | - | 1311 | - | 514 | 799 |
| Stage 1 | - | - | - | - | 800 | - |
| Stage 2 | - | - | - | - | 764 | - |
| Platoon blocked, % | - | - | | - | | |
| Mov Cap-1 Maneuver | - | - | 1311 | - | 511 | 799 |
| Mov Cap-2 Maneuver | - | - | - | - | 589 | - |
| Stage 1 | - | - | - | - | 800 | - |
| Stage 2 | - | - | - | - | 760 | - |

| Approach | EB | WB | NB |
|---|---|---|---|
| HCM Control Delay, s | 0 | 0.2 | 11.1 |
| HCM LOS | | | B |

| Minor Lane/Major Mvmt | NBLn1 | EBT | EBR | WBL | WBT |
|---|---|---|---|---|---|
| Capacity (veh/h) | 647 | - | - | 1311 | - |
| HCM Lane V/C Ratio | 0.095 | - | - | 0.006 | - |
| HCM Control Delay (s) | 11.1 | - | - | 7.8 | - |
| HCM Lane LOS | B | - | - | A | - |
| HCM 95th %tile Q(veh) | 0.3 | - | - | 0 | - |

| Intersection | |
|---|---|
| Int Delay, s/veh | 0.9 |

| Movement | WBL | WBR | NBT | NBR | SBL | SBT |
|---|---|---|---|---|---|---|
| Lane Configurations | | | | | | |
| Traffic Vol, veh/h | 4 | 20 | 231 | 1 | 7 | 69 |
| Future Vol, veh/h | 4 | 20 | 231 | 1 | 7 | 69 |
| 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 | - | - | - | - | - |
| Veh in Median Storage, # | 0 | - | 0 | - | - | 0 |
| Grade, % | 0 | - | 0 | - | - | 0 |
| Peak Hour Factor | 96 | 96 | 96 | 96 | 96 | 96 |
| Heavy Vehicles, % | 2 | 2 | 2 | 2 | 2 | 2 |
| Mvmt Flow | 4 | 21 | 241 | 1 | 7 | 72 |

| Major/Minor | Minor1 | | Major1 | | Major2 | |
|---|---|---|---|---|---|---|
| Conflicting Flow All | 328 | 242 | 0 | 0 | 242 | 0 |
| Stage 1 | 242 | - | - | - | - | - |
| Stage 2 | 86 | - | - | - | - | - |
| Critical Hdwy | 6.42 | 6.22 | - | - | 4.12 | - |
| Critical Hdwy Stg 1 | 5.42 | - | - | - | - | - |
| Critical Hdwy Stg 2 | 5.42 | - | - | - | - | - |
| Follow-up Hdwy | 3.518 | 3.318 | - | - | 2.218 | - |
| Pot Cap-1 Maneuver | 666 | 797 | - | - | 1324 | - |
| Stage 1 | 798 | - | - | - | - | - |
| Stage 2 | 937 | - | - | - | - | - |
| Platoon blocked, % | | | - | - | | - |
| Mov Cap-1 Maneuver | 662 | 797 | - | - | 1324 | - |
| Mov Cap-2 Maneuver | 662 | - | - | - | - | - |
| Stage 1 | 798 | - | - | - | - | - |
| Stage 2 | 931 | - | - | - | - | - |

| Approach | WB | NB | SB |
|---|---|---|---|
| HCM Control Delay, s | 9.8 | 0 | 0.7 |
| HCM LOS | A | | |

| Minor Lane/Major Mvmt | NBT | NBR | WBLn1 | SBL | SBT |
|---|---|---|---|---|---|
| Capacity (veh/h) | - | - | 771 | 1324 | - |
| HCM Lane V/C Ratio | - | - | 0.032 | 0.006 | - |
| HCM Control Delay (s) | - | - | 9.8 | 7.7 | 0 |
| HCM Lane LOS | - | - | A | A | A |
| HCM 95th %tile Q(veh) | - | - | 0.1 | 0 | - |

| Intersection | |
|---|---|
| Int Delay, s/veh | 2.9 |

| Movement | EBT | EBR | WBL | WBT | NBL | NBR |
|---|---|---|---|---|---|---|
| Lane Configurations | | | | | | |
| Traffic Vol, veh/h | 610 | 80 | 34 | 369 | 51 | 28 |
| Future Vol, veh/h | 610 | 80 | 34 | 369 | 51 | 28 |
| Conflicting Peds, #/hr | 0 | 0 | 3 | 0 | 0 | 0 |
| Sign Control | Free | Free | Free | Free | Stop | Stop |
| RT Channelized | - | None | - | None | - | None |
| Storage Length | - | 240 | - | - | 0 | - |
| Veh in Median Storage, # | 0 | - | - | 0 | 0 | - |
| Grade, % | 0 | - | - | 0 | 0 | - |
| Peak Hour Factor | 80 | 80 | 80 | 80 | 80 | 80 |
| Heavy Vehicles, % | 2 | 2 | 2 | 2 | 2 | 2 |
| Mvmt Flow | 763 | 100 | 43 | 461 | 64 | 35 |

| Major/Minor | Major1 | | Major2 | | Minor1 | |
|---|---|---|---|---|---|---|
| Conflicting Flow All | 0 | 0 | 866 | 0 | 1313 | 766 |
| Stage 1 | - | - | - | - | 766 | - |
| Stage 2 | - | - | - | - | 547 | - |
| Critical Hdwy | - | - | 4.12 | - | 6.42 | 6.22 |
| Critical Hdwy Stg 1 | - | - | - | - | 5.42 | - |
| Critical Hdwy Stg 2 | - | - | - | - | 5.42 | - |
| Follow-up Hdwy | - | - | 2.218 | - | 3.518 | 3.318 |
| Pot Cap-1 Maneuver | - | - | 777 | - | 175 | 403 |
| Stage 1 | - | - | - | - | 459 | - |
| Stage 2 | - | - | - | - | 580 | - |
| Platoon blocked, % | - | - | | - | | |
| Mov Cap-1 Maneuver | - | - | 775 | - | 161 | 402 |
| Mov Cap-2 Maneuver | - | - | - | - | 161 | - |
| Stage 1 | - | - | - | - | 458 | - |
| Stage 2 | - | - | - | - | 537 | - |

| Approach | EB | WB | NB |
|---|---|---|---|
| HCM Control Delay, s | 0 | 0.8 | 38.2 |
| HCM LOS | | | E |

| Minor Lane/Major Mvmt | NBLn1 | EBT | EBR | WBL | WBT |
|---|---|---|---|---|---|
| Capacity (veh/h) | 204 | - | - | 775 | - |
| HCM Lane V/C Ratio | 0.484 | - | - | 0.055 | - |
| HCM Control Delay (s) | 38.2 | - | - | 9.9 | 0 |
| HCM Lane LOS | E | - | - | A | A |
| HCM 95th %tile Q(veh) | 2.4 | - | - | 0.2 | - |

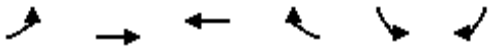
| Intersection | |
|---|---|
| Int Delay, s/veh | 3.8 |

| Movement | EBL | EBT | EBR | WBL | WBT | WBR | NBL | NBT | NBR | SBL | SBT | SBR |
|---|---|---|---|---|---|---|---|---|---|---|---|---|
| Lane Configurations | | | | | | | | | | | | |
| Traffic Vol, veh/h | 0 | 396 | 222 | 71 | 309 | 0 | 125 | 0 | 34 | 0 | 0 | 0 |
| Future Vol, veh/h | 0 | 396 | 222 | 71 | 309 | 0 | 125 | 0 | 34 | 0 | 0 | 0 |
| Conflicting Peds, #/hr | 0 | 0 | 0 | 2 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| Sign Control | Free | Free | Free | Free | Free | Free | Stop | Stop | Stop | Stop | Stop | Stop |
| RT Channelized | - | - | None | - | - | None | - | - | Yield | - | - | None |
| Storage Length | 140 | - | - | 140 | - | - | - | - | 230 | - | - | - |
| Veh in Median Storage, # | - | 0 | - | - | 0 | - | - | 1 | - | - | 0 | - |
| Grade, % | - | 0 | - | - | 0 | - | - | 0 | - | - | 0 | - |
| Peak Hour Factor | 88 | 88 | 88 | 88 | 88 | 88 | 88 | 88 | 88 | 88 | 88 | 88 |
| Heavy Vehicles, % | 2 | 2 | 2 | 2 | 2 | 2 | 2 | 2 | 2 | 2 | 2 | 2 |
| Mvmt Flow | 0 | 450 | 252 | 81 | 351 | 0 | 142 | 0 | 39 | 0 | 0 | 0 |

| Major/Minor | Major1 | | | Major2 | | | Minor1 | | | Minor2 | | |
|---|---|---|---|---|---|---|---|---|---|---|---|---|
| Conflicting Flow All | 351 | 0 | 0 | 704 | 0 | 0 | 1091 | 1091 | 578 | - | 1217 | - |
| Stage 1 | - | - | - | - | - | - | 578 | 578 | - | - | 513 | - |
| Stage 2 | - | - | - | - | - | - | 513 | 513 | - | - | 704 | - |
| Critical Hdwy | 4.12 | - | - | 4.12 | - | - | 7.12 | 6.52 | 6.22 | - | 6.52 | - |
| Critical Hdwy Stg 1 | - | - | - | - | - | - | 6.12 | 5.52 | - | - | 5.52 | - |
| Critical Hdwy Stg 2 | - | - | - | - | - | - | 6.12 | 5.52 | - | - | 5.52 | - |
| Follow-up Hdwy | 2.218 | - | - | 2.218 | - | - | 3.518 | 4.018 | 3.318 | - | 4.018 | - |
| Pot Cap-1 Maneuver | 1208 | - | - | 894 | - | - | 192 | 215 | 516 | 0 | 181 | 0 |
| Stage 1 | - | - | - | - | - | - | 501 | 501 | - | 0 | 536 | 0 |
| Stage 2 | - | - | - | - | - | - | 544 | 536 | - | 0 | 440 | 0 |
| Platoon blocked, % | | - | - | | - | - | | | | | | |
| Mov Cap-1 Maneuver | 1208 | - | - | 892 | - | - | 178 | 195 | 515 | - | 164 | - |
| Mov Cap-2 Maneuver | - | - | - | - | - | - | 308 | 314 | - | - | 164 | - |
| Stage 1 | - | - | - | - | - | - | 500 | 500 | - | - | 487 | - |
| Stage 2 | - | - | - | - | - | - | 495 | 487 | - | - | 439 | - |

| Approach | EB | WB | NB | SB |
|---|---|---|---|---|
| HCM Control Delay, s | 0 | 1.8 | 23.4 | 0 |
| HCM LOS | | | C | A |

| Minor Lane/Major Mvmt | NBLn1 | NBLn2 | EBL | EBT | EBR | WBL | WBT | WBR | SBLn1 |
|---|---|---|---|---|---|---|---|---|---|
| Capacity (veh/h) | 308 | 515 | 1208 | - | - | 892 | - | - | - |
| HCM Lane V/C Ratio | 0.461 | 0.075 | - | - | - | 0.09 | - | - | - |
| HCM Control Delay (s) | 26.3 | 12.6 | 0 | - | - | 9.4 | - | - | 0 |
| HCM Lane LOS | D | B | A | - | - | A | - | - | A |
| HCM 95th %tile Q(veh) | 2.3 | 0.2 | 0 | - | - | 0.3 | - | - | - |



| Movement | EBL | EBT | WBT | WBR | SBL | SBR |
|---|---|---|---|---|---|---|
| Lane Configurations | | | | | | |
| Traffic Volume (veh/h) | 135 | 284 | 270 | 661 | 761 | 177 |
| Future Volume (veh/h) | 135 | 284 | 270 | 661 | 761 | 177 |
| Initial Q (Qb), veh | 0 | 0 | 0 | 0 | 0 | 0 |
| Ped-Bike Adj(A_pbT) | 1.00 | | | 1.00 | 1.00 | 1.00 |
| Parking Bus, Adj | 1.00 | 1.00 | 1.00 | 1.00 | 1.00 | 1.00 |
| Work Zone On Approach | | No | No | | No | |
| Adj Sat Flow, veh/h/ln | 1870 | 1870 | 1870 | 1870 | 1870 | 1870 |
| Adj Flow Rate, veh/h | 136 | 287 | 273 | 668 | 769 | 179 |
| Peak Hour Factor | 0.99 | 0.99 | 0.99 | 0.99 | 0.99 | 0.99 |
| Percent Heavy Veh, % | 2 | 2 | 2 | 2 | 2 | 2 |
| Cap, veh/h | 346 | 935 | 704 | 1199 | 677 | 602 |
| Arrive On Green | 0.06 | 0.50 | 0.38 | 0.38 | 0.38 | 0.38 |
| Sat Flow, veh/h | 1781 | 1870 | 1870 | 1585 | 1781 | 1585 |
| Grp Volume(v), veh/h | 136 | 287 | 273 | 668 | 769 | 179 |
| Grp Sat Flow(s),veh/h/ln | 1781 | 1870 | 1870 | 1585 | 1781 | 1585 |
| Q Serve(g_s), s | 4.5 | 9.1 | 10.7 | 17.8 | 38.0 | 7.9 |
| Cycle Q Clear(g_c), s | 4.5 | 9.1 | 10.7 | 17.8 | 38.0 | 7.9 |
| Prop In Lane | 1.00 | | | 1.00 | 1.00 | 1.00 |
| Lane Grp Cap(c), veh/h | 346 | 935 | 704 | 1199 | 677 | 602 |
| V/C Ratio(X) | 0.39 | 0.31 | 0.39 | 0.56 | 1.14 | 0.30 |
| Avail Cap(c_a), veh/h | 393 | 935 | 704 | 1199 | 677 | 602 |
| HCM Platoon Ratio | 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 |
| Uniform Delay (d), s/veh | 16.8 | 14.8 | 22.8 | 5.1 | 31.0 | 21.7 |
| Incr Delay (d2), s/veh | 0.7 | 0.8 | 1.6 | 1.9 | 78.5 | 0.3 |
| Initial Q Delay(d3),s/veh | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 |
| %ile BackOfQ(50%),veh/ln | 1.7 | 3.7 | 4.7 | 16.5 | 30.4 | 8.1 |
| Unsig. Movement Delay, s/veh | | | | | | |
| LnGrp Delay(d),s/veh | 17.5 | 15.6 | 24.4 | 7.0 | 109.5 | 21.9 |
| LnGrp LOS | B | B | C | A | F | C |
| Approach Vol, veh/h | | 423 | 941 | | 948 | |
| Approach Delay, s/veh | | 16.2 | 12.1 | | 93.0 | |
| Approach LOS | | B | B | | F | |

| Timer - Assigned Phs | 1 | 2 | | 4 | | 6 |
|---|---|---|---|---|---|---|
| Phs Duration (G+Y+Rc), s | 12.4 | 43.6 | | 44.0 | | 56.0 |
| Change Period (Y+Rc), s | 6.0 | 6.0 | | 6.0 | | 6.0 |
| Max Green Setting (Gmax), s | 9.0 | 35.0 | | 38.0 | | 50.0 |
| Max Q Clear Time (g_c+I1), s | 6.5 | 19.8 | | 40.0 | | 11.1 |
| Green Ext Time (p_c), s | 0.1 | 3.7 | | 0.0 | | 1.6 |

| Intersection Summary | |
|---|---|
| HCM 6th Ctrl Delay | 46.0 |
| HCM 6th LOS | D |

| Intersection | |
|---|---|
| Int Delay, s/veh | 0.8 |

| Movement | EBT | EBR | WBL | WBT | NBL | NBR |
|---|---|---|---|---|---|---|
| Lane Configurations | | | | | | |
| Traffic Vol, veh/h | 385 | 44 | 22 | 354 | 26 | 13 |
| Future Vol, veh/h | 385 | 44 | 22 | 354 | 26 | 13 |
| Conflicting Peds, #/hr | 0 | 0 | 0 | 0 | 0 | 0 |
| Sign Control | Free | Free | Free | Free | Stop | Stop |
| RT Channelized | - | None | - | None | - | None |
| Storage Length | - | 200 | 200 | - | 0 | - |
| Veh in Median Storage, # | 0 | - | - | 0 | 1 | - |
| Grade, % | 0 | - | - | 0 | 0 | - |
| Peak Hour Factor | 88 | 88 | 88 | 88 | 88 | 88 |
| Heavy Vehicles, % | 2 | 2 | 2 | 2 | 2 | 2 |
| Mvmt Flow | 438 | 50 | 25 | 402 | 30 | 15 |

| Major/Minor | Major1 | | Major2 | | Minor1 | |
|---|---|---|---|---|---|---|
| Conflicting Flow All | 0 | 0 | 488 | 0 | 890 | 438 |
| Stage 1 | - | - | - | - | 438 | - |
| Stage 2 | - | - | - | - | 452 | - |
| Critical Hdwy | - | - | 4.12 | - | 6.42 | 6.22 |
| Critical Hdwy Stg 1 | - | - | - | - | 5.42 | - |
| Critical Hdwy Stg 2 | - | - | - | - | 5.42 | - |
| Follow-up Hdwy | - | - | 2.218 | - | 3.518 | 3.318 |
| Pot Cap-1 Maneuver | - | - | 1075 | - | 313 | 619 |
| Stage 1 | - | - | - | - | 651 | - |
| Stage 2 | - | - | - | - | 641 | - |
| Platoon blocked, % | - | - | | - | | |
| Mov Cap-1 Maneuver | - | - | 1075 | - | 306 | 619 |
| Mov Cap-2 Maneuver | - | - | - | - | 431 | - |
| Stage 1 | - | - | - | - | 651 | - |
| Stage 2 | - | - | - | - | 626 | - |

| Approach | EB | WB | NB |
|---|---|---|---|
| HCM Control Delay, s | 0 | 0.5 | 13.3 |
| HCM LOS | | | B |

| Minor Lane/Major Mvmt | NBLn1 | EBT | EBR | WBL | WBT |
|---|---|---|---|---|---|
| Capacity (veh/h) | 480 | - | - | 1075 | - |
| HCM Lane V/C Ratio | 0.092 | - | - | 0.023 | - |
| HCM Control Delay (s) | 13.3 | - | - | 8.4 | - |
| HCM Lane LOS | B | - | - | A | - |
| HCM 95th %tile Q(veh) | 0.3 | - | - | 0.1 | - |

| Intersection | |
|---|---|
| Int Delay, s/veh | 0.7 |

| Movement | WBL | WBR | NBT | NBR | SBL | SBT |
|---|---|---|---|---|---|---|
| Lane Configurations | | | | | | |
| Traffic Vol, veh/h | 3 | 13 | 146 | 4 | 22 | 276 |
| Future Vol, veh/h | 3 | 13 | 146 | 4 | 22 | 276 |
| 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 | - | - | - | - | - |
| Veh in Median Storage, # | 0 | - | 0 | - | - | 0 |
| Grade, % | 0 | - | 0 | - | - | 0 |
| Peak Hour Factor | 88 | 88 | 88 | 88 | 88 | 88 |
| Heavy Vehicles, % | 2 | 2 | 2 | 2 | 2 | 2 |
| Mvmt Flow | 3 | 15 | 166 | 5 | 25 | 314 |

| Major/Minor | Minor1 | | Major1 | | Major2 | |
|---|---|---|---|---|---|---|
| Conflicting Flow All | 533 | 169 | 0 | 0 | 171 | 0 |
| Stage 1 | 169 | - | - | - | - | - |
| Stage 2 | 364 | - | - | - | - | - |
| Critical Hdwy | 6.42 | 6.22 | - | - | 4.12 | - |
| Critical Hdwy Stg 1 | 5.42 | - | - | - | - | - |
| Critical Hdwy Stg 2 | 5.42 | - | - | - | - | - |
| Follow-up Hdwy | 3.518 | 3.318 | - | - | 2.218 | - |
| Pot Cap-1 Maneuver | 507 | 875 | - | - | 1406 | - |
| Stage 1 | 861 | - | - | - | - | - |
| Stage 2 | 703 | - | - | - | - | - |
| Platoon blocked, % | | | - | - | | - |
| Mov Cap-1 Maneuver | 496 | 875 | - | - | 1406 | - |
| Mov Cap-2 Maneuver | 496 | - | - | - | - | - |
| Stage 1 | 861 | - | - | - | - | - |
| Stage 2 | 688 | - | - | - | - | - |

| Approach | WB | NB | SB |
|---|---|---|---|
| HCM Control Delay, s | 9.8 | 0 | 0.6 |
| HCM LOS | A | | |

| Minor Lane/Major Mvmt | NBT | NBR | WBLn1 | SBL | SBT |
|---|---|---|---|---|---|
| Capacity (veh/h) | - | - | 765 | 1406 | - |
| HCM Lane V/C Ratio | - | - | 0.024 | 0.018 | - |
| HCM Control Delay (s) | - | - | 9.8 | 7.6 | 0 |
| HCM Lane LOS | - | - | A | A | A |
| HCM 95th %tile Q(veh) | - | - | 0.1 | 0.1 | - |

APPENDIX F

# GRTA Generalized Annual Average Daily Volumes

# TABLE 5

## Generalized Annual Average Daily Volumes for Use in GRTA's DRI Review

### State Two-Way Arterials

**Unsignalized** (Uninterrupted Flow)

| Lanes /Divided | Level of Service A | B | C | D | E |
|---|---|---|---|---|---|
| 2/undivided | 8,900 | 13,900 | 18,900 | 24,800 | 33,100 |
| 4/divided | 21,500 | 35,800 | 50,100 | 60,100 | 71,600 |
| 6/divided | 32,200 | 53,700 | 75,200 | 90,200 | 107,400 |

Interrupted Flow

**Class I** (> 2 signalized intersections per mile)

| Lanes /Divided | Level of Service A** | B | C | D*** | E*** |
|---|---|---|---|---|---|
| 2/undivided | N/A | 10,800 | 15,600 | 16,600 | 16,600 |
| 4/divided | N/A | 23,500 | 33,200 | 35,000 | 35,000 |
| 6/divided | N/A | 35,800 | 49,900 | 52,500 | 52,500 |
| 8/divided | N/A | 45,300 | 61,400 | 64,400 | 64,400 |

**Class II** (2-4.5 signalized intersections per mile)

| Lanes /Divided | Level of Service A** | B** | C | D | E |
|---|---|---|---|---|---|
| 2/undivided | N/A | N/A | 9,900 | 14,900 | 16,200 |
| 4/divided | N/A | N/A | 22,900 | 32,500 | 34,300 |
| 6/divided | N/A | N/A | 35,500 | 48,900 | 51,700 |
| 8/divided | N/A | N/A | 44,700 | 60,100 | 63,400 |

**Class III** ( > 4.5 signalized intersections per mile but not in CBD)

| Lanes /Divided | Level of Service A** | B** | C | D | E |
|---|---|---|---|---|---|
| 2/undivided | N/A | N/A | 3,300 | 12,100 | 15,800 |
| 4/divided | N/A | N/A | 7,800 | 27,800 | 33,600 |
| 6/divided | N/A | N/A | 12,100 | 43,300 | 50,500 |
| 8/divided | N/A | N/A | 15,300 | 54,200 | 62,100 |

**Class IV** ( > 4.5 signalized intersections per mile within CBD)

| Lanes /Divided | Level of Service A** | B** | C | D | E |
|---|---|---|---|---|---|
| 2/undivided | N/A | N/A | 3,700 | 13,800 | 15,300 |
| 4/divided | N/A | N/A | 8,900 | 29,900 | 32,600 |
| 6/divided | N/A | N/A | 14,000 | 45,500 | 49,000 |
| 8/divided | N/A | N/A | 17,500 | 56,200 | 60,100 |

* This table is based on the 1997 Highway Capacity Manual and data generated by the Florida DOT. For the purposes of GRTA review this table can be used for Level of Service Analysis in Section 2.2.
** Cannot be achieved.
*** Volumes are comparable because intesection capacities have been reached.

### Freeways

**Group I** (w/in urban area 500,000+ w/in 5 miles of CBD

| Lanes | Level of Service A | B | C | D | E |
|---|---|---|---|---|---|
| 4 | 21,200 | 34,300 | 51,500 | 66,200 | 81,700 |
| 6 | 32,600 | 52,700 | 79,000 | 101,600 | 125,400 |
| 8 | 44,500 | 71,800 | 107,800 | 138,600 | 171,100 |
| 10 | 55,600 | 89,800 | 134,700 | 173,200 | 213,800 |
| 12 | 65,200 | 105,400 | 158,100 | 203,200 | 250,900 |

**Group II** (w/in urban area 500,000+ not included in Group I)

| Lanes | Level of Service A | B | C | D | E |
|---|---|---|---|---|---|
| 4 | 20,900 | 32,800 | 49,200 | 62,600 | 74,500 |
| 6 | 32,100 | 50,400 | 75,600 | 96,200 | 114,500 |
| 8 | 43,800 | 68,800 | 103,200 | 131,300 | 156,300 |
| 10 | 54,700 | 86,000 | 129,000 | 164,200 | 195,400 |
| 12 | 64,100 | 100,800 | 151,200 | 192,400 | 229,100 |

### Non-State Roadways (Major City/County Roads)

| Lanes | Level of Service A** | B** | C | D | E |
|---|---|---|---|---|---|
| 2/undivided | N/A | N/A | 8,600 | 14,600 | 16,000 |
| 4/divided | N/A | N/A | 19,800 | 31,700 | 33,900 |
| 6/divided | N/A | N/A | 30,800 | 47,800 | 51,000 |

Other Signalized Roadways (Signalized Intersection Analysis)

| Lanes | Level of Service A** | B** | C | D | E |
|---|---|---|---|---|---|
| 2/undivided | N/A | N/A | 4,800 | 10,900 | 11,900 |
| 4/divided | N/A | N/A | 11,600 | 23,800 | 25,400 |

### Adjustments (Divided/Undivided)

(Alter corresponding two-way volumes by indicated percentage)

| Lanes | Median | Left Turn Bays | Adjustment Factor |
|---|---|---|---|
| 2 | divided | Yes | +5% |
| 2 | undivided | No | -20% |
| Multi | undivided | Yes | -5% |
| Multi | undivided | No | -25% |

**One-Way**

(Alter corresponding two-way volumes by indicated percentage)

| One-Way Lanes | Equivalent 2-Way Lanes | Adjustment Factor |
|---|---|---|
| 2 | 4 | -40% |
| 3 | 6 | -40% |
| 4 | 8 | -40% |
| 5 | 8 | -25% |

SOURCE: The Florida Department of Transportation, Systems Planning Office, 605 Suwannee Street - Mail Station # 19, Tallahassee, Florida, 32399-0450
September 1998 - www.dot.state.fl.us/planning
<<<The assumptions made in the development of this table appear in the 1998 Level of Service Handbook published by Florida DOT.>>>