



Traffic Study  
Prepared for  
**Integrated Science & Engineering**

**Senoia Road Business Park**  
Tyrone, GA

January 4, 2022

Submitted by  
**Maldino & Wilburn, LLC**

Report Date:  
January 4, 2022

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Maldino & Wilburn Project No.:  
21-45

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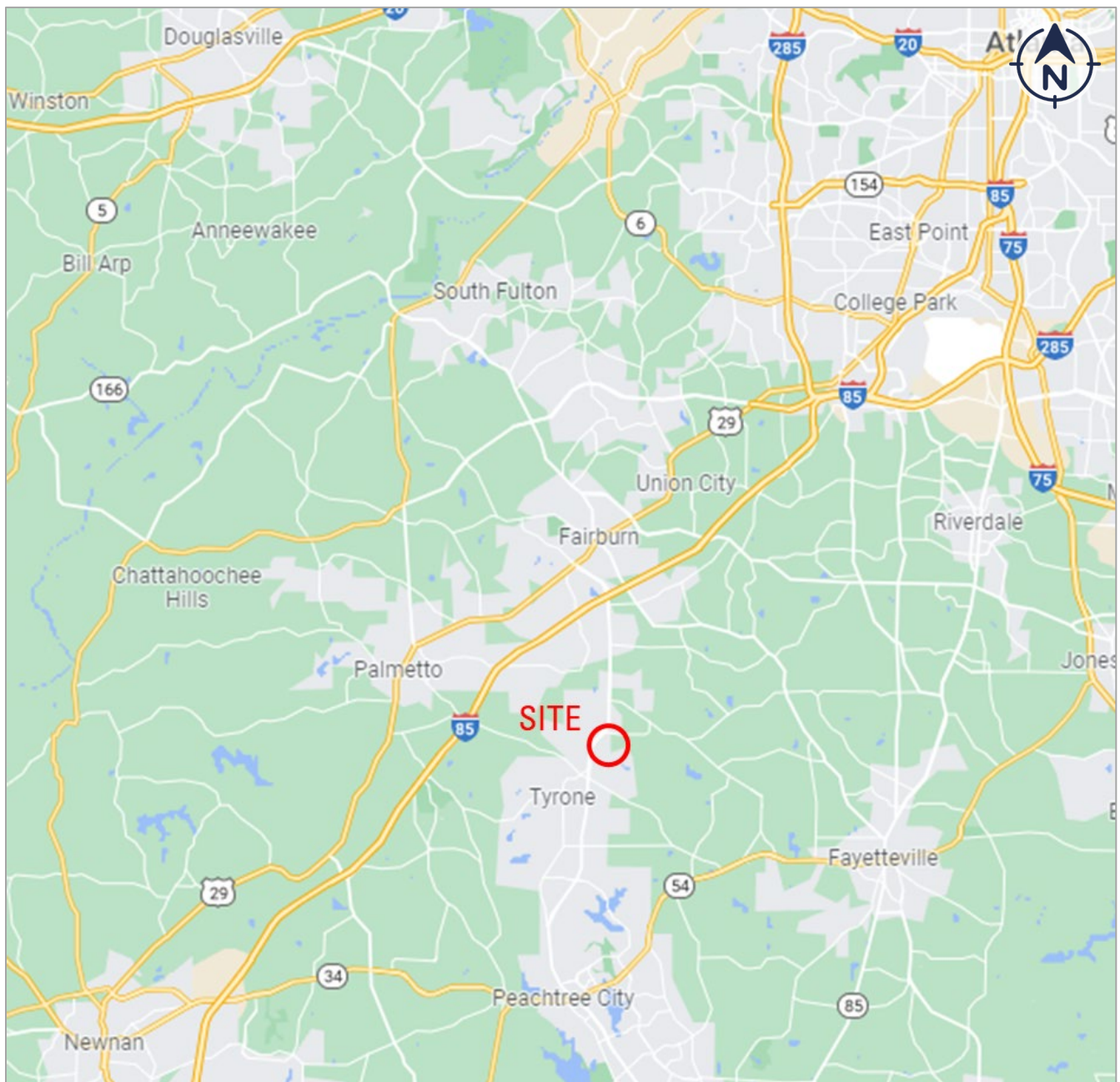
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# 1 Introduction

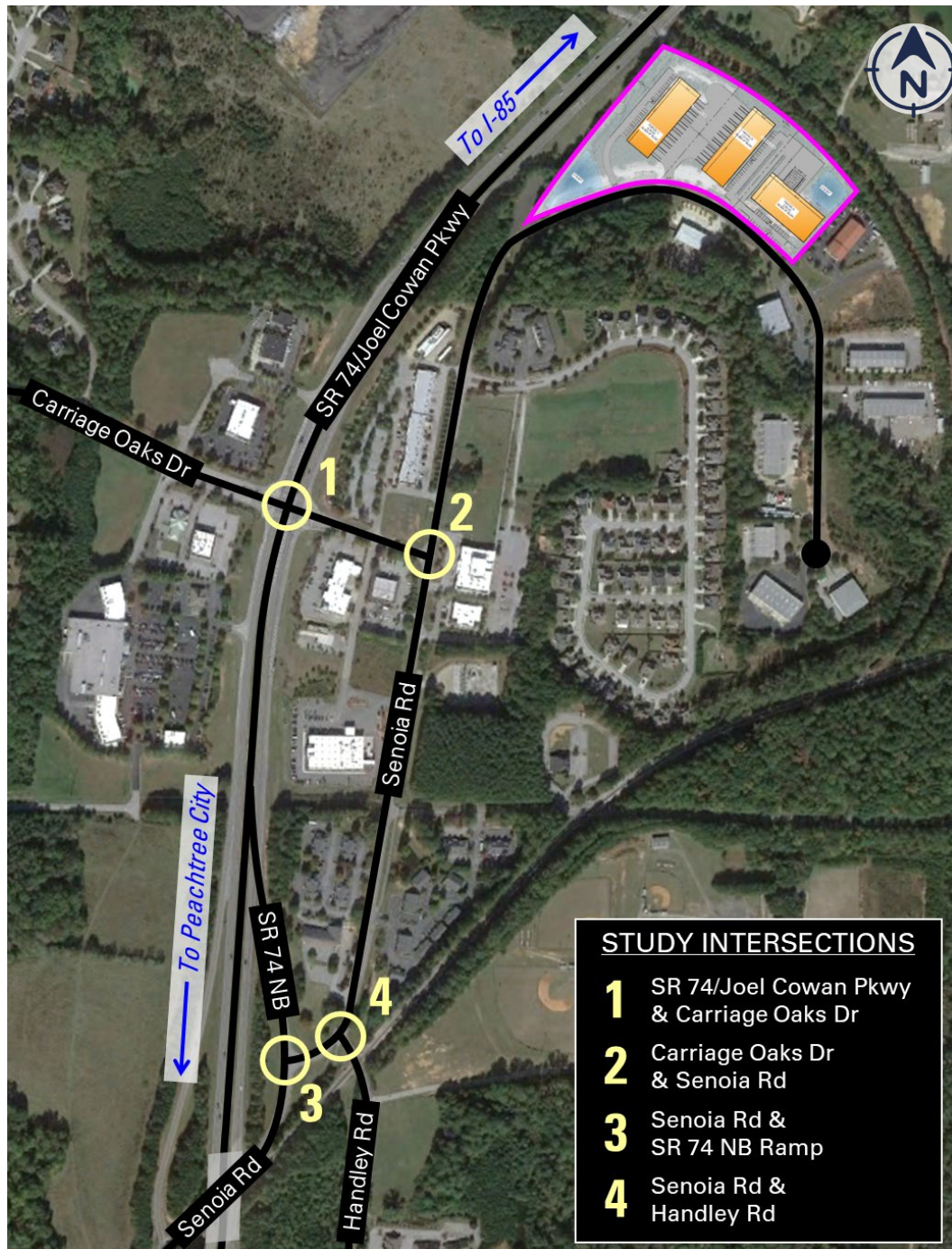
The purpose of this study is to evaluate the traffic-related impact the proposed Senoia Road Business Park development in Tyrone, Georgia. The project location is shown on the map below in Figure 1.

Figure 1: Project Location Map



The proposed Senoia Road Business Park development will include three 30,000-square-foot buildings and will be accessed by three new driveways to Senoia Road. The site is shown below in Figure 2 along with the intersections to be evaluated as part of this study. A concept for the new development is provided in Appendix A.

Figure 2: Study Area Details



## 2 Existing Conditions

An inventory of existing conditions was completed for the intersections included in this study. The inventory includes traffic control measures, intersection geometry, and peak hour traffic volumes.

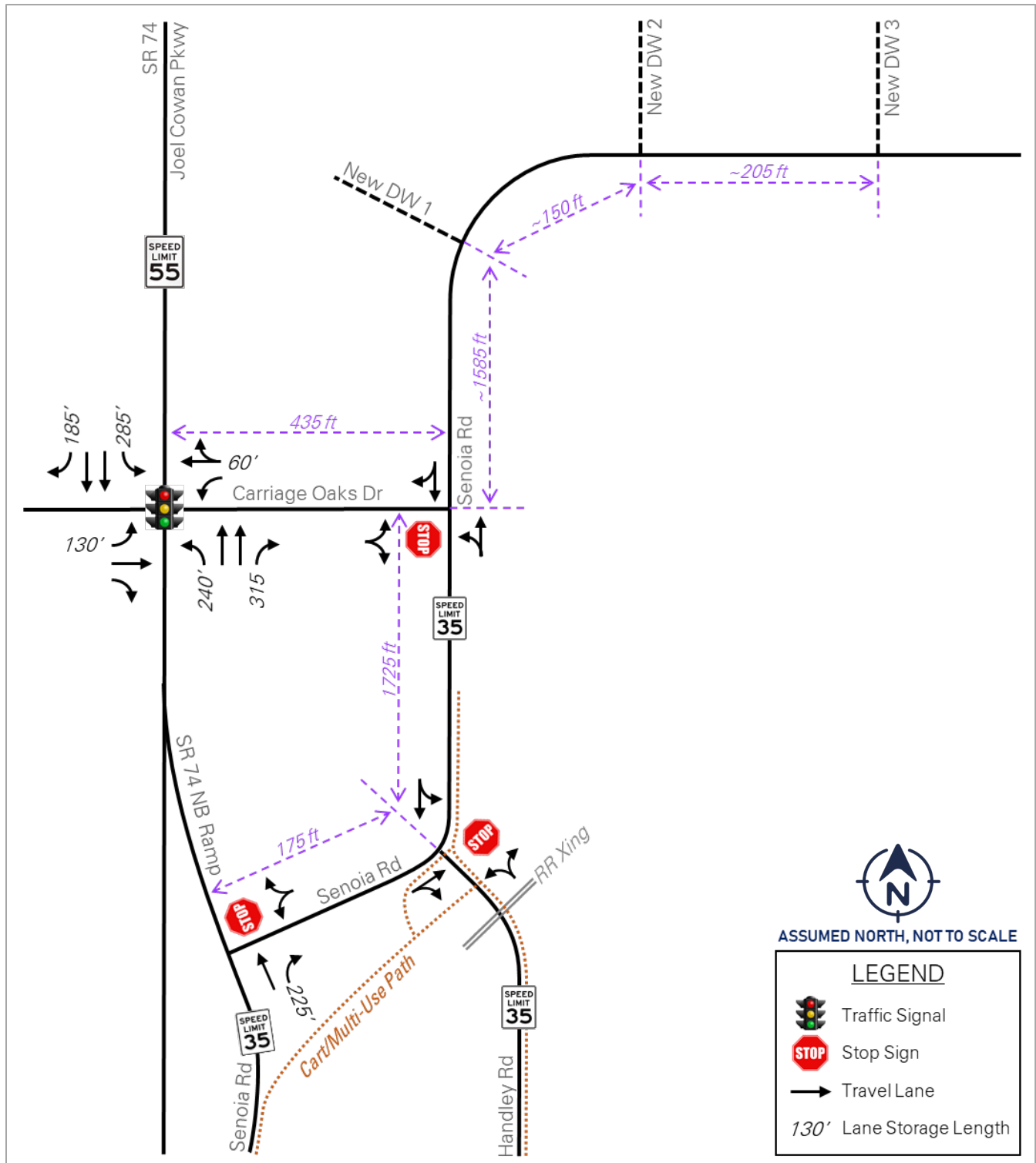
### Traffic Control and Intersection Geometry

The traffic control and intersection geometry for the study intersections are shown graphically on the following page in Figure 3.

### Traffic Volumes

The existing traffic volumes at the study intersections were obtained via four-hour Turning Movement Counts (TMC's) conducted during the AM and PM peak periods on Wednesday, December 8, 2021. The existing peak hour volumes are shown in Figure 4 on page 5. Traffic data reports are provided in Appendix B.

Figure 3: Existing Traffic Control and Intersection Geometry





## 3 Projected Conditions

Projected conditions, which represent the study area once the proposed development is complete and operational, were developed through the traditional three-step process of trip generation, trip distribution, and traffic assignment.

### Trip Generation

The trips expected to be generated by the proposed development were estimated based on trip rates from the Institute of Transportation Engineers (ITE) publication *Trip Generation*, 10<sup>th</sup> Edition. The estimated trip generation is summarized below in Table 1. The trip generation report is provided in Appendix C.

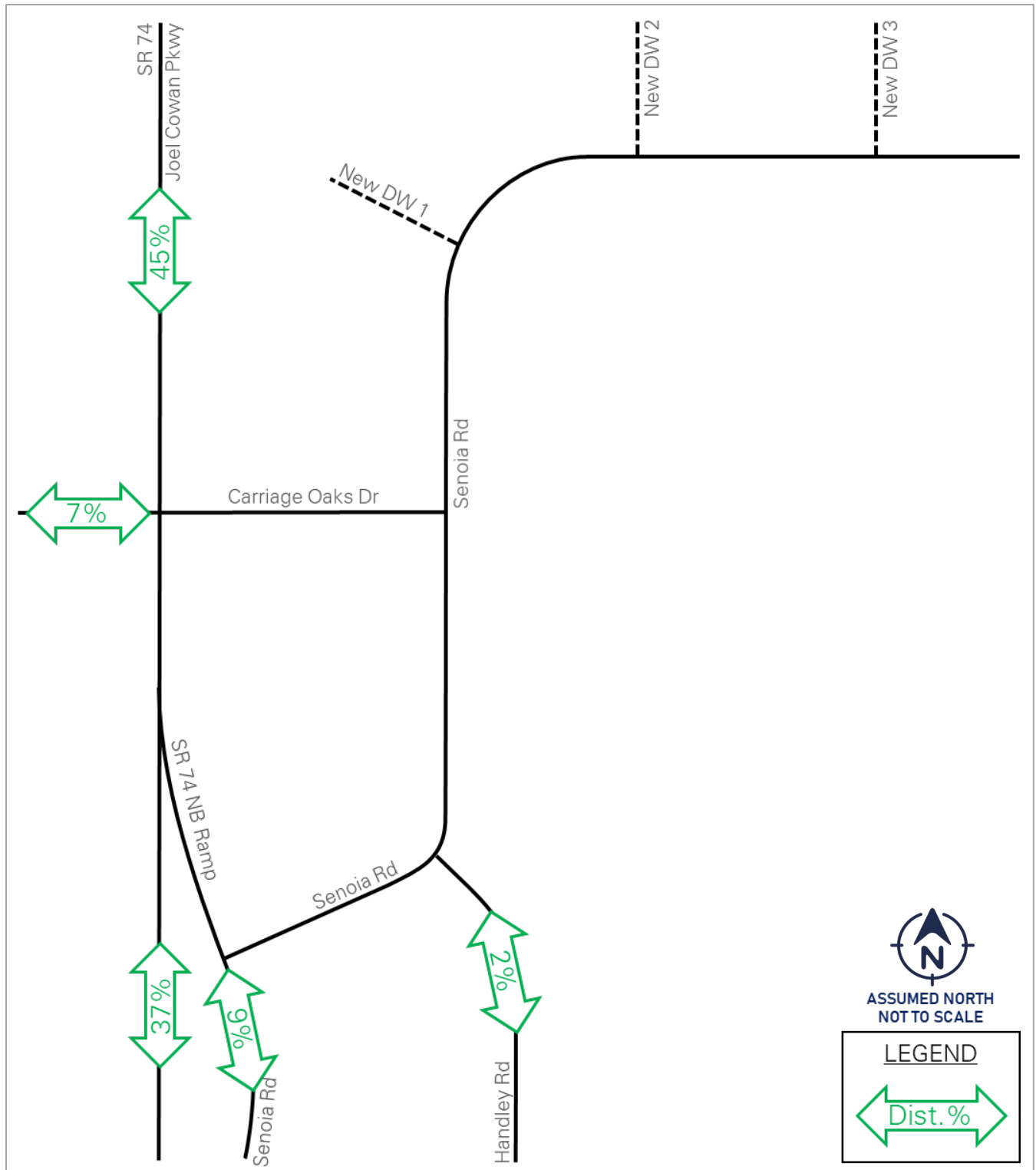
Table 1: Trip Generation Summary

| Land Use Code | Land Use                               | Size   | Daily |      |       | AM Peak Hour |      |       | PM Peak Hour |      |       |
|---------------|----------------------------------------|--------|-------|------|-------|--------------|------|-------|--------------|------|-------|
|               |                                        |        | Enter | Exit | Total | Enter        | Exit | Total | Enter        | Exit | Total |
| 110           | Building 1<br>General Light Industrial | 30 ksf | 75    | 74   | 149   | 18           | 3    | 21    | 2            | 17   | 19    |
| 110           | Building 2<br>General Light Industrial | 30 ksf | 75    | 74   | 149   | 18           | 3    | 21    | 2            | 17   | 19    |
| 110           | Building 3<br>General Light Industrial | 30 ksf | 75    | 74   | 149   | 18           | 3    | 21    | 2            | 17   | 19    |
| Total         |                                        |        | 225   | 222  | 447   | 54           | 9    | 63    | 6            | 51   | 57    |

### Trip Distribution

The distribution by which to assign new development traffic to the surrounding roadways was developed based on the distribution of traffic during the AM Peak Period, as this period is mostly home-to-work trips and many of the trips generated by the development will likely be trips to work and back. The distribution for generated new trips is shown on the following page in Figure 5.

Figure 5: New Trip Distribution



The resulting distribution of trips to the roadway network is summarized below in Table 2.

Table 2: New Trip Distribution to Roadway Network

| Origin/Destination             | Distribution<br>% | Daily      |            |            | AM Peak Hour |          |           | PM Peak Hour |           |           |
|--------------------------------|-------------------|------------|------------|------------|--------------|----------|-----------|--------------|-----------|-----------|
|                                |                   | Enter      | Exit       | Total      | Enter        | Exit     | Total     | Enter        | Exit      | Total     |
| North on SR 74/Joel Cowan Pkwy | 45                | 101        | 100        | 201        | 24           | 4        | 28        | 3            | 23        | 26        |
| South on SR 74/Joel Cowan Pkwy | 37                | 83         | 82         | 165        | 20           | 3        | 23        | 2            | 19        | 21        |
| Southwest on Senoia Rd         | 9                 | 20         | 20         | 40         | 5            | 1        | 6         | 1            | 5         | 6         |
| South on Handley Rd            | 2                 | 5          | 4          | 9          | 1            | 0        | 1         | 0            | 0         | 0         |
| West on Carriage Oaks Dr       | 7                 | 16         | 16         | 32         | 4            | 1        | 5         | 0            | 4         | 4         |
| <b>Total</b>                   | <b>100</b>        | <b>225</b> | <b>222</b> | <b>447</b> | <b>54</b>    | <b>9</b> | <b>63</b> | <b>6</b>     | <b>51</b> | <b>57</b> |

## Traffic Assignment

The new trips expected to be generated by the proposed development were assigned to the roadway based on the trip distribution shown in the previous section. The resulting traffic assignment is shown on the following page in Figure 6.

## Total Projected Volumes

The total projected volumes expected to occur once the development is complete and fully operational were found by adding the generated trips from Figure 6 to the existing volumes in Figure 4. The resulting total volumes are shown in Figure 7 on page 10.

Figure 6: Traffic Assignment

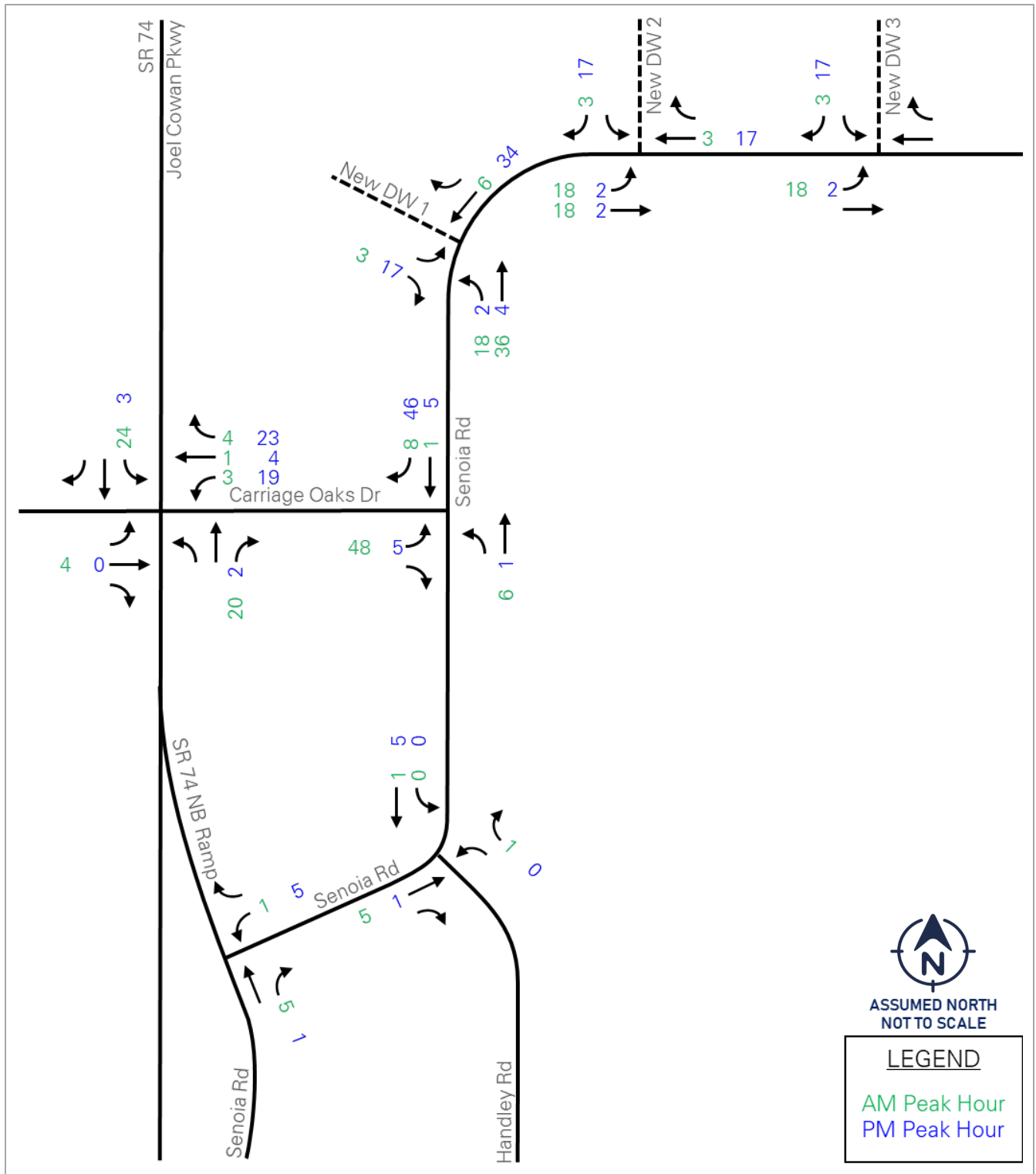
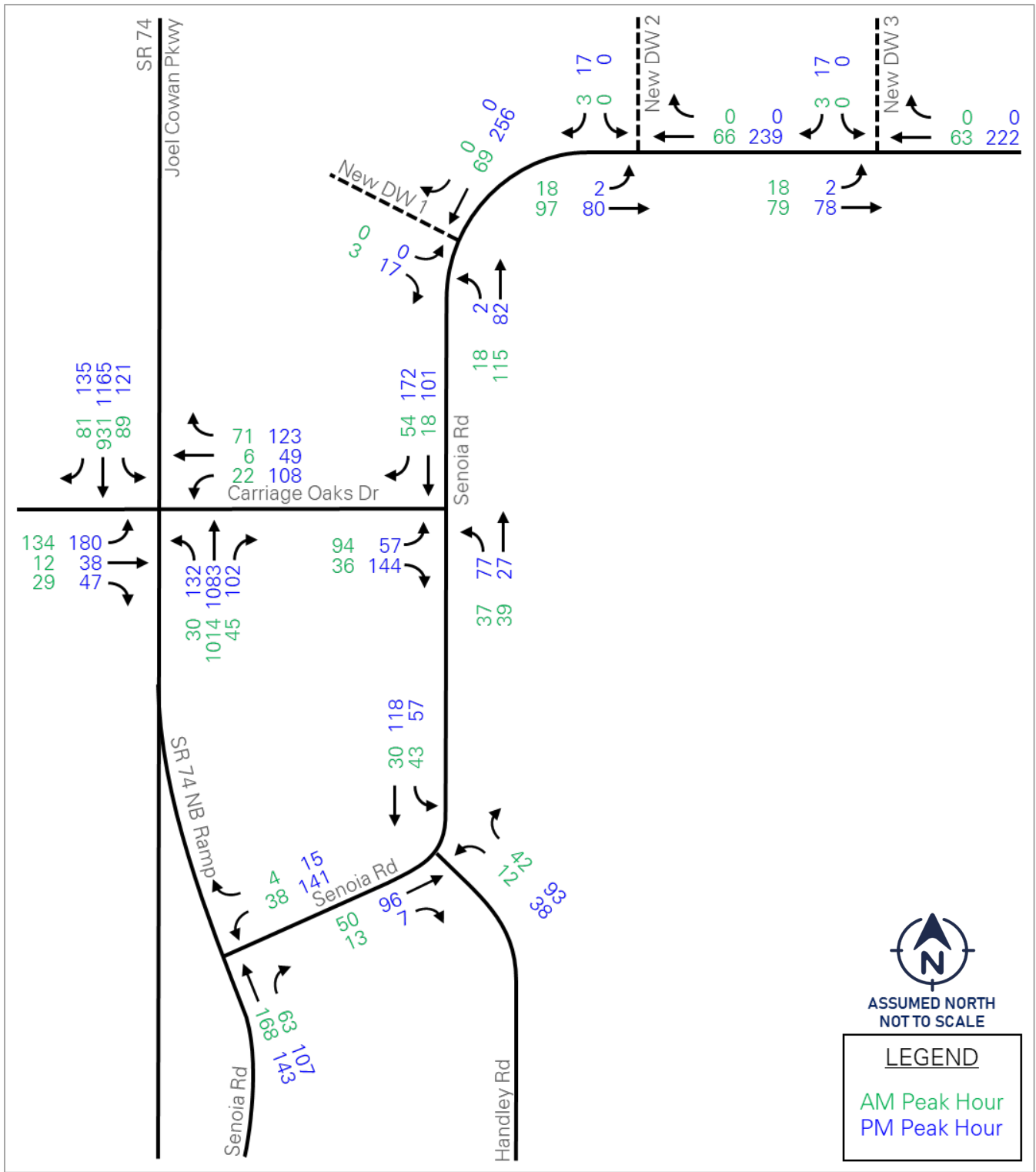


Figure 7: Total Projected Volumes



## 4 Capacity Analysis

Capacity analysis was conducted using *Synchro 10* software by Trafficware. The results of capacity analysis are reported in terms of Level of Service (LOS), which is a function of average delay per vehicle, in seconds. The Level of Service Scales according to the *Highway Capacity Manual* (HCM) are shown below in Table 3.

Table 3: HCM Level of Service Scales

| LEVEL OF SERVICE | AVERAGE DELAY PER VEHICLE (SECONDS) |                |
|------------------|-------------------------------------|----------------|
|                  | STOP CONTROL                        | SIGNAL CONTROL |
| A                | ≤10.0                               | ≤10.0          |
| B                | 10.1 to 15.0                        | 10.1 to 20.0   |
| C                | 15.1 to 25.0                        | 20.1 to 35.0   |
| D                | 25.1 to 35.0                        | 35.1 to 55.0   |
| E                | 35.1 to 50.0                        | 55.1 to 80.0   |
| F                | >50.0                               | >80.0          |

Capacity analysis was conducted for the study intersections under existing and projected conditions. For projected conditions, the new driveway intersections were evaluated with a shared left/right lane exiting the development and no dedicated turn lanes on Senoia Road.

The results of capacity analysis are provided on the following page in Table 4. For signalized intersections, results are provided as an average of all movements at the intersection. For unsignalized intersections, results are provided per movement or group of movements that share a lane. Movements or groups of movements that do not stop or yield and which are not expected to experience delay are not shown in the table. Capacity analysis reports are provided in Appendix D for existing conditions and Appendix E for projected conditions.

Table 4: Capacity Analysis Results – Existing and Projected Conditions

|   | INTERSECTION                             | MOVEMENT                     | AM PEAK HOUR |           | PM PEAK HOUR |           |
|---|------------------------------------------|------------------------------|--------------|-----------|--------------|-----------|
|   |                                          |                              | Existing     | Projected | Existing     | Projected |
| 1 | SR 74/Joel Cowan Pkwy & Carriage Oaks Dr | Average of All Movements     | B (15.9)     | B (15.8)  | C (21.7)     | C (23.5)  |
| 2 | Carriage Oaks Dr & Senoia Rd             | EB-L/R from Carriage Oaks Dr | A (9.5)      | B (10.1)  | B (11.6)     | B (12.1)  |
|   |                                          | NB-L/T from Senoia Rd        | A (7.4)      | A (7.4)   | A (7.9)      | A (8.1)   |
| 3 | Senoia Rd & SR 74 NB Ramp                | WB-L/R from Senoia Rd        | A (9.7)      | A (9.7)   | B (10.4)     | B (10.5)  |
| 4 | Senoia Rd & Handley Rd                   | WB-L/R from Handley Rd       | A (9.2)      | A (9.2)   | B (10.8)     | B (10.8)  |
|   |                                          | SB-L/T from Handley Rd       | A (7.4)      | A (7.4)   | A (7.6)      | A (7.6)   |
|   | Senoia Rd & New Driveway 1               | EB-L/T from Senoia Rd        | -            | A (7.4)   | -            | A (7.8)   |
|   |                                          | SB-L/R out of Development    | -            | A (8.7)   | -            | A (9.9)   |
|   | Senoia Rd & New Driveway 2               | EB-L/T from Senoia Rd        | -            | A (7.4)   | -            | A (7.8)   |
|   |                                          | SB-L/R out of Development    | -            | A (8.6)   | -            | A (9.8)   |
|   | Senoia Rd & New Driveway 3               | EB-L/T from Senoia Rd        | -            | A (7.4)   | -            | A (7.7)   |
|   |                                          | SB-L/R out of Development    | -            | A (8.6)   | -            | A (9.7)   |

Capacity analysis results indicate that all levels of service are expected to remain the same under projected conditions as they are under existing conditions. For one movement at the intersection of Carriage Oaks Drive and Senoia Road, the LOS changes from ‘A’ under existing conditions to ‘B’ under projected conditions, however this is only an increase in delay of 0.6 seconds, which is a negligible change.

With no dedicated turn lanes on Senoia Road or exiting the development, all three new driveways are expected to operate at LOS ‘A’.

Since no impacts on traffic operation are expected to result from the development, no traffic mitigations are recommended.

## 5 Summary

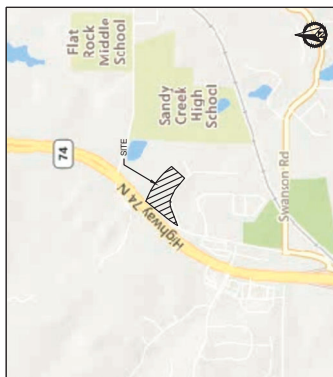
A summary of the evaluation of the traffic-related impact of the proposed Senoia Road Business Park is as follows:

- The new development is proposed to be constructed on the north side of Senoia Road in Tyrone, Georgia. The 90,000 square-foot facility is to include three 30,000-square-foot buildings and be accessed by three new driveways from Senoia Road.
- The development is expected to generate 447 new trips daily (225 entering, 222 exiting) with 63 occurring during the AM Peak Hour (54 entering, 9 exiting) and 57 occurring during the PM Peak Hour (6 entering, 51 exiting).
- The signalized intersection of SR 74/Joel Cowan Parkway and Carriage Oaks Drive currently operates at level of service (LOS) 'C' and is expected to continue to do so following the completion of the development.
- The unsignalized study intersections currently operate at level of service 'B' or better and are expected to continue to do so following the completion of the development.
- All three new driveways on Senoia Road are expected to operate at level of service 'A' following the completion of the development.
- No dedicated turn lanes at the new driveways are needed, on Senoia Road nor exiting the development, from a capacity analysis standpoint. Dedicated turn lanes at these locations are also not warranted based on GDOT volume thresholds for warranting dedicated turn lanes.
- No impact to traffic operation is expected as a result of the new development, therefore no traffic mitigations are recommended.

# Appendices

|                                                        |   |
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| Site Concept .....                                     | A |
| Traffic Data Reports .....                             | B |
| Trip Generation Report .....                           | C |
| Capacity Analysis Reports – Existing Conditions .....  | D |
| Capacity Analysis Reports – Projected Conditions ..... | E |

## Appendix A: Site Concept



VICINITY MAP  
N.T.S.

SITE PLAN NOTES:

1. DESIGNER:  
BLAND INVESTORS  
390 ALLISON DR. NE  
ATLANTA, GA 30326  
CONTACT: RANDY WRIGHT  
PHONE: 404-316-1101
2. ARCHITECT:  
JEFFERSON BROWNE GRESHAM ARCHITECTS, INC.  
1000 BULLMAN ROAD, SUITE 200  
PEACHTREE CITY, GA 30269  
CONTACT: JEFFERSON BROWN  
PHONE: 770-455-1500
3. ENGINEER:  
INTEGRATED SCIENCE & ENGINEERING, INC.  
1000 BULLMAN ROAD, SUITE 200  
PEACHTREE CITY, GA 30269  
CONTACT: ANDREW WALLS P.E.  
PHONE: 678-502-2106
4. SITE DATA:  
PARCELS LOTS 16, 17, AND TRACT "B" POWERS COURT  
OFFICE: 81,000 SF @ 1 SPACES PER 200 SF = 405 SPACES  
OFFICE: 16,000 SF @ 1 SPACES PER 200 SF = 80 SPACES
5. SITE AREA: 9.64 ACRES
6. ZONING: (ON)  
PROPOSED: (C2)
7. SETBACKS:  
FRONT: 50 FEET (BUILDING)  
REAR: 50 FEET (BUILDING)  
SIDE: 20 FEET (BUILDING)  
REAR: 20 FEET (BUILDING)
8. BUILDING AREA: 90,000 SF  
81,000 SF WAREHOUSE  
9,000 SF OFFICE
9. PARKING SUMMARY:  
- WAREHOUSE: 81,000 SF @ 1 SPACES PER 200 SF = 405 SPACES  
- OFFICE: 9,000 SF @ 1 SPACES PER 200 SF = 45 SPACES  
TOTAL REQUIRED PARKING = 450 SPACES  
TOTAL PROVIDED PARKING = 88 SPACES
10. NO PORTIONS OF THIS PROPERTY LIE WITHIN A FLOOD ZONE OF THE FLOOD INSURANCE RATE MAP, COMMUNITY PANEL #131130077 DATED SEPTEMBER 28, 2008.
11. WETLANDS AND STATE WATERS ARE NOT PRESENT ON SITE OR WITHIN 200 FEET OF THE PROPOSED DEVELOPMENT.
12. UTILITIES: WATER SERVICES PROVIDED BY THE FAYETTE COUNTY WATER SYSTEM. SEWER SERVICE PROVIDED BY THE FAYETTE COUNTY SEWER SYSTEM.
13. STORMWATER MANAGEMENT NARRATIVE: STORMWATER MANAGEMENT TO BE PROVIDED BY PROPOSED STORMWATER MANAGEMENT FACILITIES ON-SITE.



## Appendix B:

### Traffic Data Reports



ALL TRAFFIC DATA SERVICES

(303) 216-2439

www.alltrafficdata.net

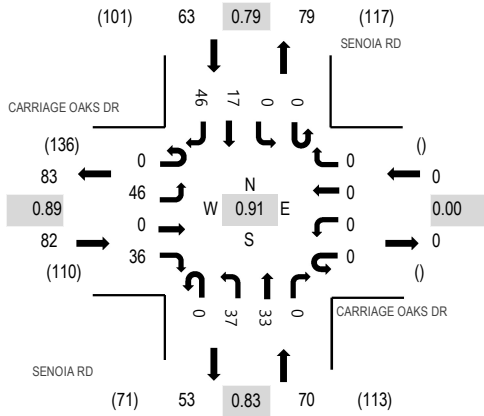
Location: #1 SENOIA RD & CARRIAGE OAKS DR AM

Date: Wednesday, December 8, 2021

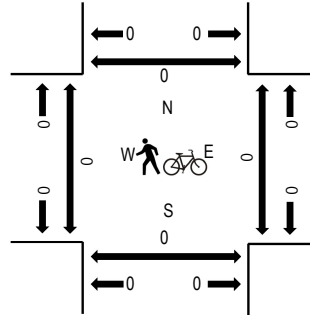
Peak Hour: 07:30 AM - 08:30 AM

Peak 15-Minutes: 08:00 AM - 08:15 AM

### Peak Hour - Motorized Vehicles



### Peak Hour - Pedestrians/Bicycles in Crosswalk



Note: Total study counts contained in parentheses.

### Traffic Counts - Motorized Vehicles

| Interval<br>Start Time | CARRIAGE OAKS DR<br>Eastbound |      |      |       | CARRIAGE OAKS DR<br>Westbound |      |      |       | SENOIA RD<br>Northbound |      |      |       | SENOIA RD<br>Southbound |      |      |       | Total | Rolling<br>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 |
| 6:30 AM                | 0                             | 3    | 0    | 1     | 0                             | 0    | 0    | 0     | 0                       | 3    | 1    | 0     | 0                       | 0    | 1    | 9     | 18    | 109             | 0                    | 0    | 0     | 0     |
| 6:45 AM                | 0                             | 4    | 0    | 4     | 0                             | 0    | 0    | 0     | 0                       | 5    | 4    | 0     | 0                       | 0    | 1    | 7     | 25    | 138             | 0                    | 0    | 0     | 0     |
| 7:00 AM                | 0                             | 6    | 0    | 2     | 0                             | 0    | 0    | 0     | 0                       | 8    | 5    | 0     | 0                       | 0    | 5    | 5     | 31    | 163             | 0                    | 0    | 0     | 0     |
| 7:15 AM                | 0                             | 6    | 0    | 2     | 0                             | 0    | 0    | 0     | 0                       | 8    | 9    | 0     | 0                       | 0    | 2    | 8     | 35    | 191             | 0                    | 0    | 0     | 0     |
| 7:30 AM                | 0                             | 13   | 0    | 6     | 0                             | 0    | 0    | 0     | 0                       | 7    | 7    | 0     | 0                       | 0    | 5    | 9     | 47    | 215             | 0                    | 0    | 0     | 0     |
| 7:45 AM                | 0                             | 13   | 0    | 10    | 0                             | 0    | 0    | 0     | 0                       | 9    | 6    | 0     | 0                       | 0    | 3    | 9     | 50    |                 | 0                    | 0    | 0     | 0     |
| 8:00 AM                | 0                             | 11   | 0    | 10    | 0                             | 0    | 0    | 0     | 0                       | 9    | 12   | 0     | 0                       | 0    | 5    | 12    | 59    |                 | 0                    | 0    | 0     | 0     |
| 8:15 AM                | 0                             | 9    | 0    | 10    | 0                             | 0    | 0    | 0     | 0                       | 12   | 8    | 0     | 0                       | 0    | 4    | 16    | 59    |                 | 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         | 46   | 0    | 36    | 0         | 0    | 0    | 0     | 0          | 36   | 32   | 0     | 0          | 0    | 16   | 45    | 211   |
| Mediums            | 0         | 0    | 0    | 0     | 0         | 0    | 0    | 0     | 0          | 1    | 1    | 0     | 0          | 0    | 1    | 1     | 4     |
| Total              | 0         | 46   | 0    | 36    | 0         | 0    | 0    | 0     | 0          | 37   | 33   | 0     | 0          | 0    | 17   | 46    | 215   |



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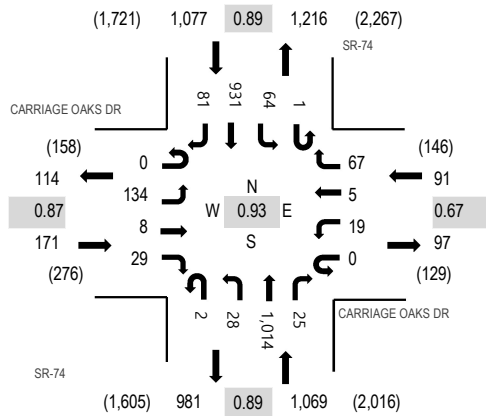
**Location:** #2 SR-74 & CARRIAGE OAKS DR AM

**Date:** Wednesday, December 8, 2021

**Peak Hour:** 07:30 AM - 08:30 AM

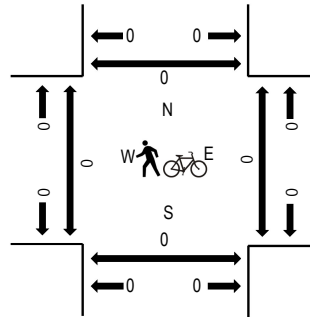
**Peak 15-Minutes:** 07:45 AM - 08:00 AM

### Peak Hour - Motorized Vehicles



Note: Total study counts contained in parentheses.

### Peak Hour - Pedestrians/Bicycles in Crosswalk



### Traffic Counts - Motorized Vehicles

| Interval<br>Start Time | CARRIAGE OAKS DR<br>Eastbound |      |      |       | CARRIAGE OAKS DR<br>Westbound |      |      |       | SR-74<br>Northbound |      |      |       | SR-74<br>Southbound |      |      |       | Total | Rolling<br>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 |
| 6:30 AM                | 0                             | 8    | 1    | 7     | 0                             | 1    | 0    | 11    | 0                   | 3    | 219  | 1     | 0                   | 2    | 117  | 0     | 370   | 1,751           | 0                    | 0    | 0     | 0     |
| 6:45 AM                | 0                             | 15   | 2    | 7     | 0                             | 1    | 0    | 11    | 0                   | 6    | 216  | 0     | 0                   | 5    | 134  | 6     | 403   | 1,961           | 0                    | 0    | 0     | 0     |
| 7:00 AM                | 0                             | 28   | 0    | 4     | 0                             | 5    | 0    | 8     | 1                   | 3    | 227  | 4     | 0                   | 8    | 162  | 12    | 462   | 2,206           | 0                    | 0    | 0     | 0     |
| 7:15 AM                | 0                             | 30   | 0    | 3     | 0                             | 2    | 1    | 15    | 1                   | 4    | 262  | 0     | 1                   | 9    | 179  | 9     | 516   | 2,310           | 0                    | 0    | 0     | 0     |
| 7:30 AM                | 0                             | 37   | 2    | 6     | 0                             | 1    | 1    | 13    | 0                   | 6    | 286  | 7     | 0                   | 14   | 186  | 21    | 580   | 2,408           | 0                    | 0    | 0     | 0     |
| 7:45 AM                | 0                             | 33   | 3    | 13    | 0                             | 3    | 0    | 16    | 1                   | 11   | 295  | 4     | 1                   | 15   | 242  | 11    | 648   |                 | 0                    | 0    | 0     | 0     |
| 8:00 AM                | 0                             | 27   | 1    | 4     | 0                             | 7    | 3    | 13    | 0                   | 7    | 211  | 7     | 0                   | 19   | 244  | 23    | 566   |                 | 0                    | 0    | 0     | 0     |
| 8:15 AM                | 0                             | 37   | 2    | 6     | 0                             | 8    | 1    | 25    | 1                   | 4    | 222  | 7     | 0                   | 16   | 259  | 26    | 614   |                 | 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    | 1     | 0         | 0    | 0    | 0     | 0          | 0    | 23    | 0     | 0          | 0    | 22   | 0     | 46    |
| Lights             | 0         | 132  | 8    | 27    | 0         | 19   | 5    | 65    | 2          | 27   | 975   | 25    | 1          | 64   | 885  | 80    | 2,315 |
| Mediums            | 0         | 2    | 0    | 1     | 0         | 0    | 0    | 2     | 0          | 1    | 16    | 0     | 0          | 0    | 24   | 1     | 47    |
| Total              | 0         | 134  | 8    | 29    | 0         | 19   | 5    | 67    | 2          | 28   | 1,014 | 25    | 1          | 64   | 931  | 81    | 2,408 |



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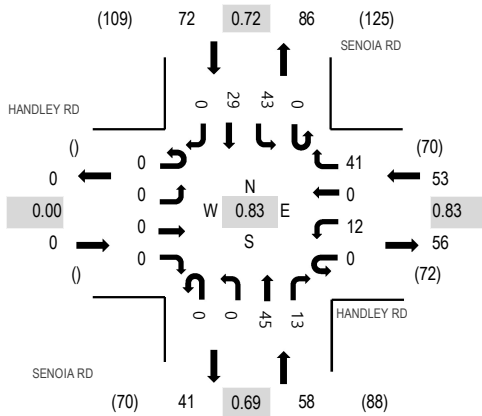
**Location:** #3 SENOIA RD & HANDLEY RD AM

**Date:** Wednesday, December 8, 2021

**Peak Hour:** 07:30 AM - 08:30 AM

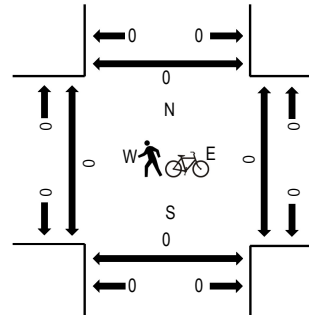
**Peak 15-Minutes:** 08:15 AM - 08:30 AM

### Peak Hour - Motorized Vehicles



Note: Total study counts contained in parentheses.

### Peak Hour - Pedestrians/Bicycles in Crosswalk



### Traffic Counts - Motorized Vehicles

| Interval<br>Start Time | HANDLEY RD<br>Eastbound |      |      |       | HANDLEY RD<br>Westbound |      |      |       | SENOIA RD<br>Northbound |      |      |       | SENOIA RD<br>Southbound |      |      |       | Total | Rolling<br>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 |
| 6:30 AM                | 0                       | 0    | 0    | 0     | 0                       | 0    | 0    | 1     | 0                       | 0    | 4    | 0     | 0                       | 1    | 4    | 0     | 10    | 84              | 0                    | 0    | 0     | 0     |
| 6:45 AM                | 0                       | 0    | 0    | 0     | 0                       | 0    | 0    | 4     | 0                       | 0    | 11   | 0     | 0                       | 3    | 4    | 0     | 22    | 114             | 0                    | 0    | 0     | 0     |
| 7:00 AM                | 0                       | 0    | 0    | 0     | 0                       | 4    | 0    | 1     | 0                       | 0    | 4    | 0     | 0                       | 4    | 9    | 0     | 22    | 138             | 0                    | 0    | 0     | 0     |
| 7:15 AM                | 0                       | 0    | 0    | 0     | 0                       | 1    | 0    | 6     | 0                       | 0    | 8    | 3     | 0                       | 5    | 7    | 0     | 30    | 158             | 0                    | 0    | 0     | 0     |
| 7:30 AM                | 0                       | 0    | 0    | 0     | 0                       | 7    | 0    | 5     | 0                       | 0    | 9    | 4     | 0                       | 8    | 7    | 0     | 40    | 183             | 0                    | 0    | 0     | 0     |
| 7:45 AM                | 0                       | 0    | 0    | 0     | 0                       | 2    | 0    | 12    | 0                       | 0    | 7    | 3     | 0                       | 12   | 10   | 0     | 46    |                 | 0                    | 0    | 0     | 0     |
| 8:00 AM                | 0                       | 0    | 0    | 0     | 0                       | 1    | 0    | 10    | 0                       | 0    | 16   | 5     | 0                       | 6    | 4    | 0     | 42    |                 | 0                    | 0    | 0     | 0     |
| 8:15 AM                | 0                       | 0    | 0    | 0     | 0                       | 2    | 0    | 14    | 0                       | 0    | 13   | 1     | 0                       | 17   | 8    | 0     | 55    |                 | 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    | 0    | 0     | 0         | 12   | 0    | 40    | 0          | 0    | 45   | 13    | 0          | 43   | 29   | 0     | 182   |
| Mediums            | 0         | 0    | 0    | 0     | 0         | 0    | 0    | 1     | 0          | 0    | 0    | 0     | 0          | 0    | 0    | 0     | 1     |
| Total              | 0         | 0    | 0    | 0     | 0         | 12   | 0    | 41    | 0          | 0    | 45   | 13    | 0          | 43   | 29   | 0     | 183   |



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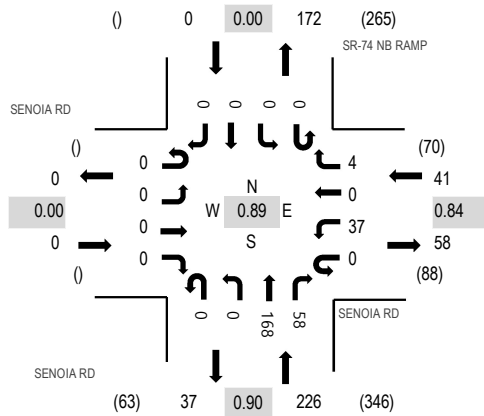
Location: #4 SENOIA RD & SENOIA RD AM

Date: Wednesday, December 8, 2021

Peak Hour: 07:30 AM - 08:30 AM

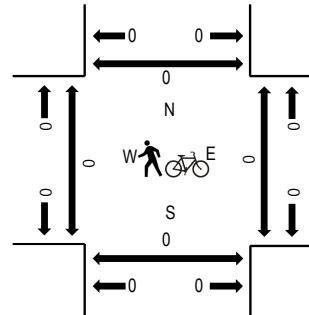
Peak 15-Minutes: 07:45 AM - 08:00 AM

### Peak Hour - Motorized Vehicles



Note: Total study counts contained in parentheses.

### Peak Hour - Pedestrians/Bicycles in Crosswalk



### Traffic Counts - Motorized Vehicles

| Interval<br>Start Time | SENOIA RD<br>Eastbound |      |      |       | SENOIA RD<br>Westbound |      |      |       | SENOIA RD<br>Northbound |      |      |       | SR-74 NB RAMP<br>Southbound |      |      |       | Total | Rolling<br>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 |
| 6:30 AM                | 0                      | 0    | 0    | 0     | 0                      | 4    | 0    | 0     | 0                       | 0    | 18   | 4     | 0                           | 0    | 0    | 0     | 26    | 149             | 0                    | 0    | 0     | 0     |
| 6:45 AM                | 0                      | 0    | 0    | 0     | 0                      | 4    | 0    | 0     | 0                       | 0    | 22   | 11    | 0                           | 0    | 0    | 0     | 37    | 192             | 0                    | 0    | 0     | 0     |
| 7:00 AM                | 0                      | 0    | 0    | 0     | 0                      | 9    | 0    | 3     | 0                       | 0    | 22   | 4     | 0                           | 0    | 0    | 0     | 38    | 230             | 0                    | 0    | 0     | 0     |
| 7:15 AM                | 0                      | 0    | 0    | 0     | 0                      | 9    | 0    | 0     | 0                       | 0    | 28   | 11    | 0                           | 0    | 0    | 0     | 48    | 249             | 0                    | 0    | 0     | 0     |
| 7:30 AM                | 0                      | 0    | 0    | 0     | 0                      | 11   | 0    | 3     | 0                       | 0    | 42   | 13    | 0                           | 0    | 0    | 0     | 69    | 267             | 0                    | 0    | 0     | 0     |
| 7:45 AM                | 0                      | 0    | 0    | 0     | 0                      | 12   | 0    | 0     | 0                       | 0    | 53   | 10    | 0                           | 0    | 0    | 0     | 75    |                 | 0                    | 0    | 0     | 0     |
| 8:00 AM                | 0                      | 0    | 0    | 0     | 0                      | 5    | 0    | 0     | 0                       | 0    | 31   | 21    | 0                           | 0    | 0    | 0     | 57    |                 | 0                    | 0    | 0     | 0     |
| 8:15 AM                | 0                      | 0    | 0    | 0     | 0                      | 9    | 0    | 1     | 0                       | 0    | 42   | 14    | 0                           | 0    | 0    | 0     | 66    |                 | 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    | 1    | 0     | 0          | 0    | 0    | 0     | 1     |
| Lights             | 0         | 0    | 0    | 0     | 0         | 37   | 0    | 4     | 0          | 0    | 162  | 58    | 0          | 0    | 0    | 0     | 261   |
| Mediums            | 0         | 0    | 0    | 0     | 0         | 0    | 0    | 0     | 0          | 0    | 5    | 0     | 0          | 0    | 0    | 0     | 5     |
| Total              | 0         | 0    | 0    | 0     | 0         | 37   | 0    | 4     | 0          | 0    | 168  | 58    | 0          | 0    | 0    | 0     | 267   |



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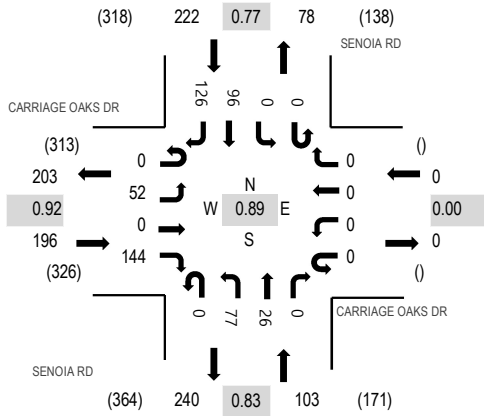
**Location:** #1 SENOIA RD & CARRIAGE OAKS DR PM

**Date:** Wednesday, December 8, 2021

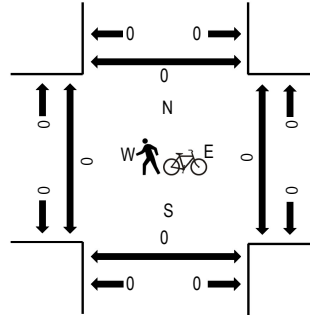
**Peak Hour:** 04:45 PM - 05:45 PM

**Peak 15-Minutes:** 05:00 PM - 05:15 PM

### Peak Hour - Motorized Vehicles



### Peak Hour - Pedestrians/Bicycles in Crosswalk



Note: Total study counts contained in parentheses.

### Traffic Counts - Motorized Vehicles

| Interval<br>Start Time | CARRIAGE OAKS DR<br>Eastbound |      |      |       | CARRIAGE OAKS DR<br>Westbound |      |      |       | SENOIA RD<br>Northbound |      |      |       | SENOIA RD<br>Southbound |      |      |       | Total | Rolling<br>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 |
| 4:30 PM                | 0                             | 13   | 0    | 19    | 0                             | 0    | 0    | 0     | 0                       | 12   | 2    | 0     | 0                       | 0    | 6    | 9     | 61    | 467             | 0                    | 0    | 0     | 0     |
| 4:45 PM                | 0                             | 14   | 0    | 39    | 0                             | 0    | 0    | 0     | 0                       | 22   | 6    | 0     | 0                       | 0    | 11   | 37    | 129   | 521             | 0                    | 0    | 0     | 0     |
| 5:00 PM                | 0                             | 13   | 0    | 30    | 0                             | 0    | 0    | 0     | 0                       | 24   | 7    | 0     | 0                       | 0    | 35   | 37    | 146   | 495             | 0                    | 0    | 0     | 0     |
| 5:15 PM                | 0                             | 13   | 0    | 37    | 0                             | 0    | 0    | 0     | 0                       | 14   | 7    | 0     | 0                       | 0    | 28   | 32    | 131   | 417             | 0                    | 0    | 0     | 0     |
| 5:30 PM                | 0                             | 12   | 0    | 38    | 0                             | 0    | 0    | 0     | 0                       | 17   | 6    | 0     | 0                       | 0    | 22   | 20    | 115   | 348             | 0                    | 0    | 0     | 0     |
| 5:45 PM                | 0                             | 15   | 0    | 30    | 0                             | 0    | 0    | 0     | 0                       | 22   | 2    | 0     | 0                       | 0    | 14   | 20    | 103   |                 | 0                    | 0    | 4     | 0     |
| 6:00 PM                | 1                             | 9    | 0    | 19    | 0                             | 0    | 0    | 0     | 0                       | 7    | 3    | 0     | 0                       | 0    | 16   | 13    | 68    |                 | 0                    | 0    | 0     | 0     |
| 6:15 PM                | 0                             | 12   | 0    | 12    | 0                             | 0    | 0    | 0     | 0                       | 16   | 4    | 0     | 0                       | 0    | 8    | 10    | 62    |                 | 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         | 52   | 0    | 144   | 0         | 0    | 0    | 0     | 0          | 77   | 26   | 0     | 0          | 0    | 96   | 126   | 521   |
| Mediums            | 0         | 0    | 0    | 0     | 0         | 0    | 0    | 0     | 0          | 0    | 0    | 0     | 0          | 0    | 0    | 0     | 0     |
| Total              | 0         | 52   | 0    | 144   | 0         | 0    | 0    | 0     | 0          | 77   | 26   | 0     | 0          | 0    | 96   | 126   | 521   |



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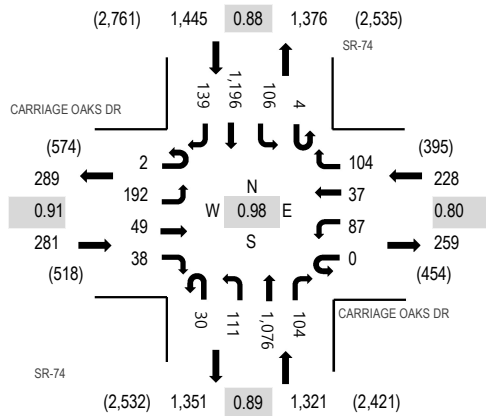
**Location:** #2 SR-74 & CARRIAGE OAKS DR PM

**Date:** Wednesday, December 8, 2021

**Peak Hour:** 05:00 PM - 06:00 PM

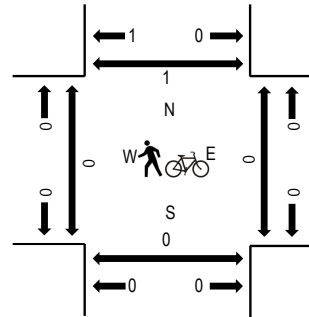
**Peak 15-Minutes:** 05:30 PM - 05:45 PM

### Peak Hour - Motorized Vehicles



Note: Total study counts contained in parentheses.

### Peak Hour - Pedestrians/Bicycles in Crosswalk



### Traffic Counts - Motorized Vehicles

| Interval<br>Start Time | CARRIAGE OAKS DR<br>Eastbound |      |      |       | CARRIAGE OAKS DR<br>Westbound |      |      |       | SR-74<br>Northbound |      |      |       | SR-74<br>Southbound |      |      |       | Total | Rolling<br>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 |
| 4:30 PM                | 0                             | 38   | 7    | 15    | 0                             | 8    | 7    | 23    | 7                   | 23   | 229  | 13    | 0                   | 26   | 271  | 37    | 704   | 3,108           | 0                    | 0    | 0     | 0     |
| 4:45 PM                | 0                             | 31   | 3    | 15    | 0                             | 21   | 14   | 23    | 5                   | 35   | 259  | 25    | 1                   | 36   | 273  | 38    | 779   | 3,242           | 0                    | 0    | 0     | 0     |
| 5:00 PM                | 0                             | 54   | 13   | 10    | 0                             | 32   | 17   | 24    | 8                   | 25   | 260  | 19    | 0                   | 23   | 323  | 28    | 836   | 3,275           | 0                    | 0    | 0     | 0     |
| 5:15 PM                | 0                             | 44   | 15   | 15    | 0                             | 17   | 10   | 32    | 3                   | 20   | 324  | 24    | 1                   | 28   | 220  | 36    | 789   | 3,140           | 0                    | 0    | 0     | 0     |
| 5:30 PM                | 1                             | 50   | 7    | 7     | 0                             | 19   | 4    | 21    | 14                  | 32   | 240  | 32    | 1                   | 28   | 349  | 33    | 838   | 2,987           | 0                    | 0    | 0     | 0     |
| 5:45 PM                | 1                             | 44   | 14   | 6     | 0                             | 19   | 6    | 27    | 5                   | 34   | 252  | 29    | 2                   | 27   | 304  | 42    | 812   |                 | 0                    | 0    | 0     | 1     |
| 6:00 PM                | 0                             | 40   | 9    | 6     | 0                             | 11   | 3    | 20    | 1                   | 22   | 224  | 13    | 0                   | 27   | 276  | 49    | 701   |                 | 0                    | 0    | 0     | 0     |
| 6:15 PM                | 0                             | 44   | 10   | 19    | 0                             | 14   | 5    | 18    | 2                   | 25   | 209  | 8     | 0                   | 18   | 237  | 27    | 636   |                 | 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    | 17    | 1     | 0          | 0    | 12    | 0     | 30    |
| Lights             | 2         | 192  | 49   | 38    | 0         | 87   | 37   | 104   | 30         | 111  | 1,056 | 103   | 4          | 106  | 1,179 | 139   | 3,237 |
| Mediums            | 0         | 0    | 0    | 0     | 0         | 0    | 0    | 0     | 0          | 0    | 3     | 0     | 0          | 0    | 5     | 0     | 8     |
| Total              | 2         | 192  | 49   | 38    | 0         | 87   | 37   | 104   | 30         | 111  | 1,076 | 104   | 4          | 106  | 1,196 | 139   | 3,275 |



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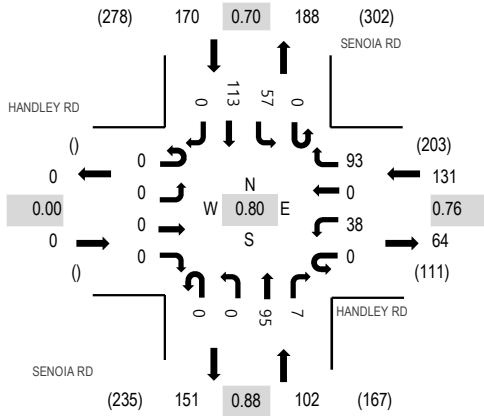
Location: #3 SENOIA RD & HANDLEY RD PM

Date: Wednesday, December 8, 2021

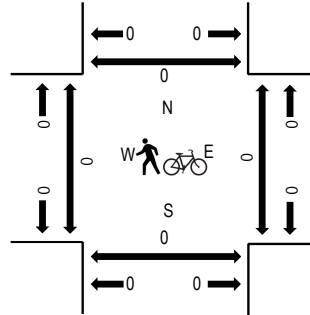
Peak Hour: 04:45 PM - 05:45 PM

Peak 15-Minutes: 05:00 PM - 05:15 PM

### Peak Hour - Motorized Vehicles



### Peak Hour - Pedestrians/Bicycles in Crosswalk



Note: Total study counts contained in parentheses.

### Traffic Counts - Motorized Vehicles

| Interval<br>Start Time | HANDLEY RD<br>Eastbound |      |      |       | HANDLEY RD<br>Westbound |      |      |       | SENOIA RD<br>Northbound |      |      |       | SENOIA RD<br>Southbound |      |      |       | Total | Rolling<br>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 |
|                        |                         |      |      |       |                         |      |      |       |                         |      |      |       |                         |      |      |       |       |                 |                      |      |       |       |
| 4:30 PM                | 0                       | 0    | 0    | 0     | 0                       | 9    | 0    | 17    | 0                       | 0    | 12   | 1     | 0                       | 16   | 15   | 0     | 70    | 392             | 0                    | 0    | 0     | 0     |
| 4:45 PM                | 0                       | 0    | 0    | 0     | 0                       | 11   | 0    | 33    | 0                       | 0    | 27   | 1     | 0                       | 11   | 27   | 0     | 110   | 403             | 0                    | 0    | 0     | 0     |
| 5:00 PM                | 0                       | 0    | 0    | 0     | 0                       | 11   | 0    | 29    | 0                       | 0    | 24   | 1     | 0                       | 20   | 41   | 0     | 126   | 364             | 0                    | 0    | 0     | 0     |
| 5:15 PM                | 0                       | 0    | 0    | 0     | 0                       | 12   | 0    | 12    | 0                       | 0    | 20   | 0     | 0                       | 13   | 29   | 0     | 86    | 287             | 0                    | 0    | 0     | 0     |
| 5:30 PM                | 0                       | 0    | 0    | 0     | 0                       | 4    | 0    | 19    | 0                       | 0    | 24   | 5     | 0                       | 13   | 16   | 0     | 81    | 256             | 0                    | 0    | 0     | 0     |
| 5:45 PM                | 0                       | 0    | 0    | 0     | 0                       | 3    | 0    | 17    | 0                       | 0    | 19   | 3     | 0                       | 12   | 17   | 0     | 71    |                 | 0                    | 0    | 0     | 0     |
| 6:00 PM                | 0                       | 0    | 0    | 0     | 0                       | 2    | 0    | 12    | 0                       | 0    | 9    | 0     | 0                       | 6    | 20   | 0     | 49    |                 | 0                    | 0    | 0     | 0     |
| 6:15 PM                | 0                       | 0    | 0    | 0     | 0                       | 3    | 0    | 9     | 0                       | 0    | 19   | 2     | 0                       | 7    | 15   | 0     | 55    |                 | 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    | 0    | 0     | 0         | 38   | 0    | 93    | 0          | 0    | 95   | 7     | 0          | 57   | 113  | 0     | 403   |
| Mediums            | 0         | 0    | 0    | 0     | 0         | 0    | 0    | 0     | 0          | 0    | 0    | 0     | 0          | 0    | 0    | 0     | 0     |
| Total              | 0         | 0    | 0    | 0     | 0         | 38   | 0    | 93    | 0          | 0    | 95   | 7     | 0          | 57   | 113  | 0     | 403   |



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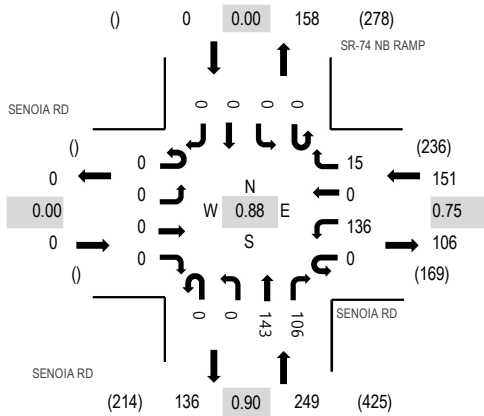
Location: #4 SENOIA RD & SENOIA RD PM

Date: Wednesday, December 8, 2021

Peak Hour: 04:45 PM - 05:45 PM

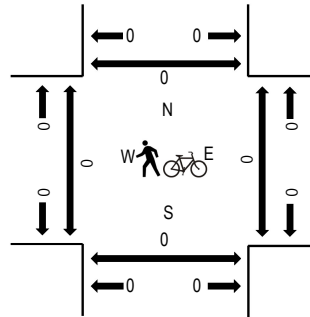
Peak 15-Minutes: 05:00 PM - 05:15 PM

### Peak Hour - Motorized Vehicles



Note: Total study counts contained in parentheses.

### Peak Hour - Pedestrians/Bicycles in Crosswalk



### Traffic Counts - Motorized Vehicles

| Interval<br>Start Time | SENOIA RD<br>Eastbound |      |      |       | SENOIA RD<br>Westbound |      |      |       | SENOIA RD<br>Northbound |      |      |       | SR-74 NB RAMP<br>Southbound |      |      |       | Total | Rolling<br>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 |
| 4:30 PM                | 0                      | 0    | 0    | 0     | 0                      | 21   | 0    | 3     | 0                       | 0    | 27   | 13    | 0                           | 0    | 0    | 0     | 64    | 379             | 0                    | 0    | 0     | 0     |
| 4:45 PM                | 0                      | 0    | 0    | 0     | 0                      | 31   | 0    | 7     | 0                       | 0    | 39   | 30    | 0                           | 0    | 0    | 0     | 107   | 400             | 0                    | 0    | 0     | 0     |
| 5:00 PM                | 0                      | 0    | 0    | 0     | 0                      | 48   | 0    | 4     | 0                       | 0    | 36   | 25    | 0                           | 0    | 0    | 0     | 113   | 375             | 0                    | 0    | 0     | 0     |
| 5:15 PM                | 0                      | 0    | 0    | 0     | 0                      | 37   | 0    | 4     | 0                       | 0    | 33   | 21    | 0                           | 0    | 0    | 0     | 95    | 321             | 0                    | 0    | 0     | 0     |
| 5:30 PM                | 0                      | 0    | 0    | 0     | 0                      | 20   | 0    | 0     | 0                       | 0    | 35   | 30    | 0                           | 0    | 0    | 0     | 85    | 282             | 0                    | 0    | 0     | 0     |
| 5:45 PM                | 0                      | 0    | 0    | 0     | 0                      | 18   | 0    | 2     | 0                       | 0    | 42   | 20    | 0                           | 0    | 0    | 0     | 82    |                 | 0                    | 0    | 0     | 0     |
| 6:00 PM                | 0                      | 0    | 0    | 0     | 0                      | 20   | 0    | 2     | 0                       | 0    | 28   | 9     | 0                           | 0    | 0    | 0     | 59    |                 | 0                    | 0    | 0     | 0     |
| 6:15 PM                | 0                      | 0    | 0    | 0     | 0                      | 19   | 0    | 0     | 0                       | 0    | 16   | 21    | 0                           | 0    | 0    | 0     | 56    |                 | 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    | 0    | 0     | 0         | 136  | 0    | 15    | 0          | 0    | 141  | 106   | 0          | 0    | 0    | 0     | 398   |
| Mediums            | 0         | 0    | 0    | 0     | 0         | 0    | 0    | 0     | 0          | 0    | 2    | 0     | 0          | 0    | 0    | 0     | 2     |
| Total              | 0         | 0    | 0    | 0     | 0         | 136  | 0    | 15    | 0          | 0    | 143  | 106   | 0          | 0    | 0    | 0     | 400   |

## Appendix C:

### Trip Generation Report

Trip Generation Summary

Alternative: Alternative 1

Phase:

Open Date: 12/28/2021

Project: New Project

Analysis Date: 12/28/2021

| ITE                              | Land Use                                        | Weekday Average Daily Trips |       |      |       | Weekday AM Peak Hour of Adjacent Street Traffic |       |      |       | Weekday PM Peak Hour of Adjacent Street Traffic |       |      |       |
|----------------------------------|-------------------------------------------------|-----------------------------|-------|------|-------|-------------------------------------------------|-------|------|-------|-------------------------------------------------|-------|------|-------|
|                                  |                                                 | *                           | Enter | Exit | Total | *                                               | Enter | Exit | Total | *                                               | Enter | Exit | Total |
| 110                              | Business Park Building 3<br>30 1000 Sq. Ft. GFA |                             | 75    | 74   | 149   |                                                 | 18    | 3    | 21    |                                                 | 2     | 17   | 19    |
| 110                              | Business Park Building 2<br>30 1000 Sq. Ft. GFA |                             | 75    | 74   | 149   |                                                 | 18    | 3    | 21    |                                                 | 2     | 17   | 19    |
| 110                              | Business Park Building 1<br>30 1000 Sq. Ft. GFA |                             | 75    | 74   | 149   |                                                 | 18    | 3    | 21    |                                                 | 2     | 17   | 19    |
|                                  |                                                 |                             |       |      |       |                                                 |       |      |       |                                                 |       |      |       |
| Unadjusted Volume                |                                                 |                             | 225   | 222  | 447   |                                                 | 54    | 9    | 63    |                                                 | 6     | 51   | 57    |
| Internal Capture Trips           |                                                 |                             | 0     | 0    | 0     |                                                 | 0     | 0    | 0     |                                                 | 0     | 0    | 0     |
| Pass-By Trips                    |                                                 |                             | 0     | 0    | 0     |                                                 | 0     | 0    | 0     |                                                 | 0     | 0    | 0     |
| Volume Added to Adjacent Streets |                                                 |                             | 225   | 222  | 447   |                                                 | 54    | 9    | 63    |                                                 | 6     | 51   | 57    |

Total Weekday Average Daily Trips Internal Capture = 0 Percent

Total Weekday AM Peak Hour of Adjacent Street Traffic Internal Capture = 0 Percent

Total Weekday PM Peak Hour of Adjacent Street Traffic Internal Capture = 0 Percent

\* - Custom rate used for selected time period.

Source: Institute of Transportation Engineers, Trip Generation Manual 10th Edition  
TRIP GENERATION 10, TRAFFICWARE, LLC

## Appendix D:

### Capacity Analysis Reports – Existing Conditions

# Lanes, Volumes, Timings

## 1: SR 74 (Joel Cowan Pkwy) & Carriage Oaks Dr

# Existing Conditions

AM Peak Hour

|                            |  |  |  |  |  |  |  |  |  |  |  |  |
|----------------------------|-----------------------------------------------------------------------------------|-----------------------------------------------------------------------------------|-----------------------------------------------------------------------------------|-----------------------------------------------------------------------------------|-----------------------------------------------------------------------------------|-----------------------------------------------------------------------------------|-------------------------------------------------------------------------------------|-------------------------------------------------------------------------------------|-------------------------------------------------------------------------------------|-------------------------------------------------------------------------------------|-------------------------------------------------------------------------------------|-------------------------------------------------------------------------------------|
| Lane Group                 | EBL                                                                               | EBT                                                                               | EBR                                                                               | WBL                                                                               | WBT                                                                               | WBR                                                                               | NBL                                                                                 | NBT                                                                                 | NBR                                                                                 | SBL                                                                                 | SBT                                                                                 | SBR                                                                                 |
| Lane Configurations        |  |  |  |  |  |                                                                                   |  |  |  |  |  |  |
| Traffic Volume (vph)       | 134                                                                               | 8                                                                                 | 29                                                                                | 19                                                                                | 5                                                                                 | 67                                                                                | 30                                                                                  | 1014                                                                                | 25                                                                                  | 65                                                                                  | 931                                                                                 | 81                                                                                  |
| Future Volume (vph)        | 134                                                                               | 8                                                                                 | 29                                                                                | 19                                                                                | 5                                                                                 | 67                                                                                | 30                                                                                  | 1014                                                                                | 25                                                                                  | 65                                                                                  | 931                                                                                 | 81                                                                                  |
| Ideal Flow (vphpl)         | 1900                                                                              | 1900                                                                              | 1900                                                                              | 1900                                                                              | 1900                                                                              | 1900                                                                              | 1900                                                                                | 1900                                                                                | 1900                                                                                | 1900                                                                                | 1900                                                                                | 1900                                                                                |
| Storage Length (ft)        | 130                                                                               |                                                                                   | 0                                                                                 | 60                                                                                |                                                                                   | 0                                                                                 | 240                                                                                 |                                                                                     | 315                                                                                 | 285                                                                                 |                                                                                     | 185                                                                                 |
| Storage Lanes              | 1                                                                                 |                                                                                   | 1                                                                                 | 1                                                                                 |                                                                                   | 0                                                                                 | 1                                                                                   |                                                                                     | 1                                                                                   | 1                                                                                   |                                                                                     | 1                                                                                   |
| Taper Length (ft)          | 50                                                                                |                                                                                   |                                                                                   | 25                                                                                |                                                                                   |                                                                                   | 75                                                                                  |                                                                                     |                                                                                     | 75                                                                                  |                                                                                     |                                                                                     |
| Satd. Flow (prot)          | 1770                                                                              | 1900                                                                              | 1509                                                                              | 1805                                                                              | 1589                                                                              | 0                                                                                 | 1736                                                                                | 3471                                                                                | 1615                                                                                | 1805                                                                                | 3438                                                                                | 1599                                                                                |
| Flt Permitted              | 0.707                                                                             |                                                                                   |                                                                                   | 0.752                                                                             |                                                                                   |                                                                                   | 0.243                                                                               |                                                                                     |                                                                                     | 0.151                                                                               |                                                                                     |                                                                                     |
| Satd. Flow (perm)          | 1317                                                                              | 1900                                                                              | 1509                                                                              | 1429                                                                              | 1589                                                                              | 0                                                                                 | 444                                                                                 | 3471                                                                                | 1615                                                                                | 287                                                                                 | 3438                                                                                | 1599                                                                                |
| Right Turn on Red          |                                                                                   |                                                                                   | Yes                                                                               |                                                                                   |                                                                                   | Yes                                                                               |                                                                                     |                                                                                     | Yes                                                                                 |                                                                                     |                                                                                     | Yes                                                                                 |
| Satd. Flow (RTOR)          |                                                                                   |                                                                                   | 82                                                                                |                                                                                   | 72                                                                                |                                                                                   |                                                                                     |                                                                                     | 82                                                                                  |                                                                                     |                                                                                     | 87                                                                                  |
| Link Speed (mph)           |                                                                                   | 35                                                                                |                                                                                   |                                                                                   | 35                                                                                |                                                                                   |                                                                                     | 55                                                                                  |                                                                                     |                                                                                     | 55                                                                                  |                                                                                     |
| Link Distance (ft)         |                                                                                   | 621                                                                               |                                                                                   |                                                                                   | 1631                                                                              |                                                                                   |                                                                                     | 525                                                                                 |                                                                                     |                                                                                     | 529                                                                                 |                                                                                     |
| Travel Time (s)            |                                                                                   | 12.1                                                                              |                                                                                   |                                                                                   | 31.8                                                                              |                                                                                   |                                                                                     | 6.5                                                                                 |                                                                                     |                                                                                     | 6.6                                                                                 |                                                                                     |
| Peak Hour Factor           | 0.93                                                                              | 0.93                                                                              | 0.93                                                                              | 0.93                                                                              | 0.93                                                                              | 0.93                                                                              | 0.93                                                                                | 0.93                                                                                | 0.93                                                                                | 0.93                                                                                | 0.93                                                                                | 0.93                                                                                |
| Heavy Vehicles (%)         | 2%                                                                                | 0%                                                                                | 7%                                                                                | 0%                                                                                | 0%                                                                                | 3%                                                                                | 4%                                                                                  | 4%                                                                                  | 0%                                                                                  | 0%                                                                                  | 5%                                                                                  | 1%                                                                                  |
| Shared Lane Traffic (%)    |                                                                                   |                                                                                   |                                                                                   |                                                                                   |                                                                                   |                                                                                   |                                                                                     |                                                                                     |                                                                                     |                                                                                     |                                                                                     |                                                                                     |
| Lane Group Flow (vph)      | 144                                                                               | 9                                                                                 | 31                                                                                | 20                                                                                | 77                                                                                | 0                                                                                 | 32                                                                                  | 1090                                                                                | 27                                                                                  | 70                                                                                  | 1001                                                                                | 87                                                                                  |
| Enter Blocked Intersection | No                                                                                | No                                                                                | No                                                                                | No                                                                                | No                                                                                | No                                                                                | No                                                                                  | No                                                                                  | No                                                                                  | No                                                                                  | No                                                                                  | No                                                                                  |
| Lane Alignment             | Left                                                                              | Left                                                                              | Right                                                                             | Left                                                                              | Left                                                                              | Right                                                                             | Left                                                                                | Left                                                                                | Right                                                                               | Left                                                                                | Left                                                                                | Right                                                                               |
| Median Width(ft)           |                                                                                   | 12                                                                                |                                                                                   |                                                                                   | 12                                                                                |                                                                                   |                                                                                     | 12                                                                                  |                                                                                     |                                                                                     | 12                                                                                  |                                                                                     |
| Link Offset(ft)            |                                                                                   | 0                                                                                 |                                                                                   |                                                                                   | 0                                                                                 |                                                                                   |                                                                                     | 0                                                                                   |                                                                                     |                                                                                     | 0                                                                                   |                                                                                     |
| Crosswalk Width(ft)        |                                                                                   | 16                                                                                |                                                                                   |                                                                                   | 16                                                                                |                                                                                   |                                                                                     | 16                                                                                  |                                                                                     |                                                                                     | 16                                                                                  |                                                                                     |
| Two way Left Turn Lane     |                                                                                   |                                                                                   |                                                                                   |                                                                                   |                                                                                   |                                                                                   |                                                                                     |                                                                                     |                                                                                     |                                                                                     |                                                                                     |                                                                                     |
| Headway Factor             | 1.00                                                                              | 1.00                                                                              | 1.00                                                                              | 1.00                                                                              | 1.00                                                                              | 1.00                                                                              | 1.00                                                                                | 1.00                                                                                | 1.00                                                                                | 1.00                                                                                | 1.00                                                                                | 1.00                                                                                |
| Turning Speed (mph)        | 15                                                                                |                                                                                   | 9                                                                                 | 15                                                                                |                                                                                   | 9                                                                                 | 15                                                                                  |                                                                                     | 9                                                                                   | 15                                                                                  |                                                                                     | 9                                                                                   |
| Turn Type                  | Perm                                                                              | NA                                                                                | Perm                                                                              | Perm                                                                              | NA                                                                                |                                                                                   | pm+pt                                                                               | NA                                                                                  | Perm                                                                                | pm+pt                                                                               | NA                                                                                  | Perm                                                                                |
| Protected Phases           |                                                                                   | 4                                                                                 |                                                                                   |                                                                                   | 8                                                                                 |                                                                                   | 5                                                                                   | 2                                                                                   |                                                                                     | 1                                                                                   | 6                                                                                   |                                                                                     |
| Permitted Phases           | 4                                                                                 |                                                                                   | 4                                                                                 | 8                                                                                 |                                                                                   |                                                                                   | 2                                                                                   |                                                                                     | 2                                                                                   | 6                                                                                   |                                                                                     | 6                                                                                   |
| Total Split (s)            | 36.0                                                                              | 36.0                                                                              | 36.0                                                                              | 36.0                                                                              | 36.0                                                                              |                                                                                   | 13.0                                                                                | 70.0                                                                                | 70.0                                                                                | 14.0                                                                                | 71.0                                                                                | 71.0                                                                                |
| Total Lost Time (s)        | 6.0                                                                               | 6.0                                                                               | 6.0                                                                               | 6.0                                                                               | 6.0                                                                               |                                                                                   | 6.0                                                                                 | 6.0                                                                                 | 6.0                                                                                 | 6.0                                                                                 | 6.0                                                                                 | 6.0                                                                                 |
| Act Effect Green (s)       | 12.9                                                                              | 12.9                                                                              | 12.9                                                                              | 12.9                                                                              | 12.9                                                                              |                                                                                   | 32.4                                                                                | 27.5                                                                                | 27.5                                                                                | 35.7                                                                                | 33.2                                                                                | 33.2                                                                                |
| Actuated g/C Ratio         | 0.21                                                                              | 0.21                                                                              | 0.21                                                                              | 0.21                                                                              | 0.21                                                                              |                                                                                   | 0.52                                                                                | 0.44                                                                                | 0.44                                                                                | 0.57                                                                                | 0.53                                                                                | 0.53                                                                                |
| v/c Ratio                  | 0.53                                                                              | 0.02                                                                              | 0.08                                                                              | 0.07                                                                              | 0.20                                                                              |                                                                                   | 0.09                                                                                | 0.72                                                                                | 0.04                                                                                | 0.21                                                                                | 0.55                                                                                | 0.10                                                                                |
| Control Delay              | 32.3                                                                              | 22.9                                                                              | 0.4                                                                               | 23.4                                                                              | 8.9                                                                               |                                                                                   | 6.7                                                                                 | 19.2                                                                                | 0.1                                                                                 | 7.6                                                                                 | 13.2                                                                                | 3.6                                                                                 |
| Queue Delay                | 0.0                                                                               | 0.0                                                                               | 0.0                                                                               | 0.0                                                                               | 0.0                                                                               |                                                                                   | 0.0                                                                                 | 0.0                                                                                 | 0.0                                                                                 | 0.0                                                                                 | 0.0                                                                                 | 0.0                                                                                 |
| Total Delay                | 32.3                                                                              | 22.9                                                                              | 0.4                                                                               | 23.4                                                                              | 8.9                                                                               |                                                                                   | 6.7                                                                                 | 19.2                                                                                | 0.1                                                                                 | 7.6                                                                                 | 13.2                                                                                | 3.6                                                                                 |
| LOS                        | C                                                                                 | C                                                                                 | A                                                                                 | C                                                                                 | A                                                                                 |                                                                                   | A                                                                                   | B                                                                                   | A                                                                                   | A                                                                                   | B                                                                                   | A                                                                                   |
| Approach Delay             |                                                                                   | 26.5                                                                              |                                                                                   |                                                                                   | 11.9                                                                              |                                                                                   |                                                                                     | 18.4                                                                                |                                                                                     |                                                                                     | 12.2                                                                                |                                                                                     |
| Approach LOS               |                                                                                   | C                                                                                 |                                                                                   |                                                                                   | B                                                                                 |                                                                                   |                                                                                     | B                                                                                   |                                                                                     |                                                                                     | B                                                                                   |                                                                                     |
| Queue Length 50th (ft)     | 48                                                                                | 3                                                                                 | 0                                                                                 | 6                                                                                 | 2                                                                                 |                                                                                   | 4                                                                                   | 180                                                                                 | 0                                                                                   | 9                                                                                   | 95                                                                                  | 0                                                                                   |
| Queue Length 95th (ft)     | 121                                                                               | 15                                                                                | 0                                                                                 | 25                                                                                | 35                                                                                |                                                                                   | 16                                                                                  | 304                                                                                 | 0                                                                                   | 28                                                                                  | 265                                                                                 | 23                                                                                  |
| Internal Link Dist (ft)    |                                                                                   | 541                                                                               |                                                                                   |                                                                                   | 1551                                                                              |                                                                                   |                                                                                     | 445                                                                                 |                                                                                     |                                                                                     | 449                                                                                 |                                                                                     |
| Turn Bay Length (ft)       | 130                                                                               |                                                                                   |                                                                                   | 60                                                                                |                                                                                   |                                                                                   | 240                                                                                 |                                                                                     | 315                                                                                 | 285                                                                                 |                                                                                     | 185                                                                                 |
| Base Capacity (vph)        | 654                                                                               | 944                                                                               | 791                                                                               | 710                                                                               | 826                                                                               |                                                                                   | 382                                                                                 | 3312                                                                                | 1545                                                                                | 365                                                                                 | 3240                                                                                | 1512                                                                                |
| Starvation Cap Reductn     | 0                                                                                 | 0                                                                                 | 0                                                                                 | 0                                                                                 | 0                                                                                 |                                                                                   | 0                                                                                   | 0                                                                                   | 0                                                                                   | 0                                                                                   | 0                                                                                   | 0                                                                                   |
| Spillback Cap Reductn      | 0                                                                                 | 0                                                                                 | 0                                                                                 | 0                                                                                 | 0                                                                                 |                                                                                   | 0                                                                                   | 0                                                                                   | 0                                                                                   | 0                                                                                   | 0                                                                                   | 0                                                                                   |
| Storage Cap Reductn        | 0                                                                                 | 0                                                                                 | 0                                                                                 | 0                                                                                 | 0                                                                                 |                                                                                   | 0                                                                                   | 0                                                                                   | 0                                                                                   | 0                                                                                   | 0                                                                                   | 0                                                                                   |

M&W

Synchro 10 Report

# Lanes, Volumes, Timings

## 1: SR 74 (Joel Cowan Pkwy) & Carriage Oaks Dr

# Existing Conditions

AM Peak Hour

|                   |  |  |  |  |  |  |  |  |  |  |  |  |
|-------------------|-----------------------------------------------------------------------------------|-----------------------------------------------------------------------------------|-----------------------------------------------------------------------------------|-----------------------------------------------------------------------------------|-----------------------------------------------------------------------------------|-----------------------------------------------------------------------------------|------------------------------------------------------------------------------------|-------------------------------------------------------------------------------------|-------------------------------------------------------------------------------------|-------------------------------------------------------------------------------------|-------------------------------------------------------------------------------------|-------------------------------------------------------------------------------------|
| Lane Group        | EBL                                                                               | EBT                                                                               | EBR                                                                               | WBL                                                                               | WBT                                                                               | WBR                                                                               | NBL                                                                                | NBT                                                                                 | NBR                                                                                 | SBL                                                                                 | SBT                                                                                 | SBR                                                                                 |
| Reduced v/c Ratio | 0.22                                                                              | 0.01                                                                              | 0.04                                                                              | 0.03                                                                              | 0.09                                                                              |                                                                                   | 0.08                                                                               | 0.33                                                                                | 0.02                                                                                | 0.19                                                                                | 0.31                                                                                | 0.06                                                                                |

## Intersection Summary

Area Type: Other

Cycle Length: 120

Actuated Cycle Length: 62.8

Control Type: Actuated-Uncoordinated

Maximum v/c Ratio: 0.72

Intersection Signal Delay: 15.9

Intersection LOS: B

Intersection Capacity Utilization 61.3%

ICU Level of Service B

Analysis Period (min) 15

Splits and Phases: 1: SR 74 (Joel Cowan Pkwy) & Carriage Oaks Dr

|                                                                                      |                                                                                      |                                                                                        |
|--------------------------------------------------------------------------------------|--------------------------------------------------------------------------------------|----------------------------------------------------------------------------------------|
|  Ø1 |  Ø2 |  Ø4 |
| 14 s                                                                                 | 70 s                                                                                 | 36 s                                                                                   |
|  Ø5 |  Ø6 |  Ø8 |
| 13 s                                                                                 | 71 s                                                                                 | 36 s                                                                                   |

HCM 6th TWSC  
2: Senoia Rd & Carriage Oaks Dr

Existing Conditions  
AM Peak Hour

| Intersection             |                                                                                   |        |       |                                                                                   |                                                                                   |      |
|--------------------------|-----------------------------------------------------------------------------------|--------|-------|-----------------------------------------------------------------------------------|-----------------------------------------------------------------------------------|------|
| Int Delay, s/veh         | 4.9                                                                               |        |       |                                                                                   |                                                                                   |      |
| Movement                 | EBL                                                                               | EBR    | NBL   | NBT                                                                               | SBT                                                                               | SBR  |
| Lane Configurations      |  |        |       |  |  |      |
| Traffic Vol, veh/h       | 46                                                                                | 36     | 37    | 33                                                                                | 17                                                                                | 46   |
| Future Vol, veh/h        | 46                                                                                | 36     | 37    | 33                                                                                | 17                                                                                | 46   |
| 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         | 91                                                                                | 91     | 91    | 91                                                                                | 91                                                                                | 91   |
| Heavy Vehicles, %        | 0                                                                                 | 0      | 3     | 3                                                                                 | 6                                                                                 | 2    |
| Mvmt Flow                | 51                                                                                | 40     | 41    | 36                                                                                | 19                                                                                | 51   |
| Major/Minor              | Minor2                                                                            | Major1 |       | Major2                                                                            |                                                                                   |      |
| Conflicting Flow All     | 163                                                                               | 45     | 70    | 0                                                                                 | -                                                                                 | 0    |
| Stage 1                  | 45                                                                                | -      | -     | -                                                                                 | -                                                                                 | -    |
| Stage 2                  | 118                                                                               | -      | -     | -                                                                                 | -                                                                                 | -    |
| Critical Hdwy            | 6.4                                                                               | 6.2    | 4.13  | -                                                                                 | -                                                                                 | -    |
| Critical Hdwy Stg 1      | 5.4                                                                               | -      | -     | -                                                                                 | -                                                                                 | -    |
| Critical Hdwy Stg 2      | 5.4                                                                               | -      | -     | -                                                                                 | -                                                                                 | -    |
| Follow-up Hdwy           | 3.5                                                                               | 3.3    | 2.227 | -                                                                                 | -                                                                                 | -    |
| Pot Cap-1 Maneuver       | 832                                                                               | 1031   | 1524  | -                                                                                 | -                                                                                 | -    |
| Stage 1                  | 983                                                                               | -      | -     | -                                                                                 | -                                                                                 | -    |
| Stage 2                  | 912                                                                               | -      | -     | -                                                                                 | -                                                                                 | -    |
| Platoon blocked, %       |                                                                                   |        |       | -                                                                                 | -                                                                                 | -    |
| Mov Cap-1 Maneuver       | 810                                                                               | 1031   | 1524  | -                                                                                 | -                                                                                 | -    |
| Mov Cap-2 Maneuver       | 810                                                                               | -      | -     | -                                                                                 | -                                                                                 | -    |
| Stage 1                  | 956                                                                               | -      | -     | -                                                                                 | -                                                                                 | -    |
| Stage 2                  | 912                                                                               | -      | -     | -                                                                                 | -                                                                                 | -    |
| Approach                 | EB                                                                                | NB     |       | SB                                                                                |                                                                                   |      |
| HCM Control Delay, s     | 9.5                                                                               | 3.9    |       | 0                                                                                 |                                                                                   |      |
| HCM LOS                  | A                                                                                 |        |       |                                                                                   |                                                                                   |      |
| Minor Lane/Major Mvmt    | NBL                                                                               | NBT    | EBLn1 | SBT                                                                               | SBR                                                                               |      |
| Capacity (veh/h)         | 1524                                                                              | -      | 894   | -                                                                                 | -                                                                                 |      |
| HCM Lane V/C Ratio       | 0.027                                                                             | -      | 0.101 | -                                                                                 | -                                                                                 |      |
| HCM Control Delay (s)    | 7.4                                                                               | 0      | 9.5   | -                                                                                 | -                                                                                 |      |
| HCM Lane LOS             | A                                                                                 | A      | A     | -                                                                                 | -                                                                                 |      |
| HCM 95th %tile Q(veh)    | 0.1                                                                               | -      | 0.3   | -                                                                                 | -                                                                                 |      |

HCM 6th TWSC  
3: Senoia Rd & SR 74 NB Ramp

Existing Conditions  
AM Peak Hour

Intersection

Int Delay, s/veh 1.5

| Movement                 | WBL                                                                               | WBR  | NBT                                                                               | NBR                                                                               | SBL  | SBT   |
|--------------------------|-----------------------------------------------------------------------------------|------|-----------------------------------------------------------------------------------|-----------------------------------------------------------------------------------|------|-------|
| Lane Configurations      |  |      |  |  |      |       |
| Traffic Vol, veh/h       | 37                                                                                | 4    | 168                                                                               | 58                                                                                | 0    | 0     |
| Future Vol, veh/h        | 37                                                                                | 4    | 168                                                                               | 58                                                                                | 0    | 0     |
| 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                                                                                 | -    | -                                                                                 | 225                                                                               | -    | -     |
| Veh in Median Storage, # | 0                                                                                 | -    | 0                                                                                 | -                                                                                 | -    | 16979 |
| Grade, %                 | 0                                                                                 | -    | 0                                                                                 | -                                                                                 | -    | 0     |
| Peak Hour Factor         | 89                                                                                | 89   | 89                                                                                | 89                                                                                | 89   | 89    |
| Heavy Vehicles, %        | 0                                                                                 | 0    | 4                                                                                 | 0                                                                                 | 0    | 0     |
| Mvmt Flow                | 42                                                                                | 4    | 189                                                                               | 65                                                                                | 0    | 0     |

| Major/Minor          | Minor1 | Major1 |   |   |
|----------------------|--------|--------|---|---|
| Conflicting Flow All | 189    | 189    | 0 | 0 |
| Stage 1              | 189    | -      | - | - |
| Stage 2              | 0      | -      | - | - |
| Critical Hdwy        | 6.4    | 6.2    | - | - |
| Critical Hdwy Stg 1  | 5.4    | -      | - | - |
| Critical Hdwy Stg 2  | -      | -      | - | - |
| Follow-up Hdwy       | 3.5    | 3.3    | - | - |
| Pot Cap-1 Maneuver   | 805    | 858    | - | - |
| Stage 1              | 848    | -      | - | - |
| Stage 2              | -      | -      | - | - |
| Platoon blocked, %   |        |        | - | - |
| Mov Cap-1 Maneuver   | 805    | 858    | - | - |
| Mov Cap-2 Maneuver   | 805    | -      | - | - |
| Stage 1              | 848    | -      | - | - |
| Stage 2              | -      | -      | - | - |

| Approach             | WB  | NB |
|----------------------|-----|----|
| HCM Control Delay, s | 9.7 | 0  |
| HCM LOS              | A   |    |

| Minor Lane/Major Mvmt | NBT | NBRWBLn1 |
|-----------------------|-----|----------|
| Capacity (veh/h)      | -   | - 810    |
| HCM Lane V/C Ratio    | -   | - 0.057  |
| HCM Control Delay (s) | -   | - 9.7    |
| HCM Lane LOS          | -   | - A      |
| HCM 95th %tile Q(veh) | -   | - 0.2    |

HCM 6th TWSC  
4: Senoia Rd & Handley Rd

Existing Conditions  
AM Peak Hour

| Intersection             |                                                                                   |        |        |                                                                                   |                                                                                   |       |
|--------------------------|-----------------------------------------------------------------------------------|--------|--------|-----------------------------------------------------------------------------------|-----------------------------------------------------------------------------------|-------|
| Int Delay, s/veh         | 4.4                                                                               |        |        |                                                                                   |                                                                                   |       |
| Movement                 | NBT                                                                               | NBR    | SBL    | SBT                                                                               | NWL                                                                               | NWR   |
| Lane Configurations      |  |        |        |  |  |       |
| Traffic Vol, veh/h       | 45                                                                                | 13     | 43     | 29                                                                                | 12                                                                                | 41    |
| Future Vol, veh/h        | 45                                                                                | 13     | 43     | 29                                                                                | 12                                                                                | 41    |
| Conflicting Peds, #/hr   | 0                                                                                 | 0      | 0      | 0                                                                                 | 41                                                                                | 0     |
| Sign Control             | Free                                                                              | Free   | Free   | Free                                                                              | Stop                                                                              | Stop  |
| RT Channelized           | -                                                                                 | None   | -      | None                                                                              | -                                                                                 | None  |
| Storage Length           | -                                                                                 | -      | -      | -                                                                                 | 0                                                                                 | -     |
| Veh in Median Storage, # | 0                                                                                 | -      | -      | 0                                                                                 | 0                                                                                 | -     |
| Grade, %                 | 0                                                                                 | -      | -      | 0                                                                                 | 0                                                                                 | -     |
| Peak Hour Factor         | 83                                                                                | 83     | 83     | 83                                                                                | 83                                                                                | 83    |
| Heavy Vehicles, %        | 0                                                                                 | 0      | 0      | 0                                                                                 | 0                                                                                 | 2     |
| Mvmt Flow                | 54                                                                                | 16     | 52     | 35                                                                                | 14                                                                                | 49    |
|                          |                                                                                   |        |        |                                                                                   |                                                                                   |       |
| Major/Minor              | Major1                                                                            | Major2 | Minor1 |                                                                                   |                                                                                   |       |
| Conflicting Flow All     | 0                                                                                 | 0      | 70     | 0                                                                                 | 242                                                                               | 62    |
| Stage 1                  | -                                                                                 | -      | -      | -                                                                                 | 62                                                                                | -     |
| Stage 2                  | -                                                                                 | -      | -      | -                                                                                 | 180                                                                               | -     |
| Critical Hdwy            | -                                                                                 | -      | 4.1    | -                                                                                 | 6.4                                                                               | 6.22  |
| Critical Hdwy Stg 1      | -                                                                                 | -      | -      | -                                                                                 | 5.4                                                                               | -     |
| Critical Hdwy Stg 2      | -                                                                                 | -      | -      | -                                                                                 | 5.4                                                                               | -     |
| Follow-up Hdwy           | -                                                                                 | -      | 2.2    | -                                                                                 | 3.5                                                                               | 3.318 |
| Pot Cap-1 Maneuver       | -                                                                                 | -      | 1544   | -                                                                                 | 751                                                                               | 1003  |
| Stage 1                  | -                                                                                 | -      | -      | -                                                                                 | 966                                                                               | -     |
| Stage 2                  | -                                                                                 | -      | -      | -                                                                                 | 856                                                                               | -     |
| Platoon blocked, %       | -                                                                                 | -      |        | -                                                                                 |                                                                                   |       |
| Mov Cap-1 Maneuver       | -                                                                                 | -      | 1544   | -                                                                                 | 697                                                                               | 1003  |
| Mov Cap-2 Maneuver       | -                                                                                 | -      | -      | -                                                                                 | 697                                                                               | -     |
| Stage 1                  | -                                                                                 | -      | -      | -                                                                                 | 966                                                                               | -     |
| Stage 2                  | -                                                                                 | -      | -      | -                                                                                 | 794                                                                               | -     |
|                          |                                                                                   |        |        |                                                                                   |                                                                                   |       |
|                          |                                                                                   |        |        |                                                                                   |                                                                                   |       |
| Approach                 | NB                                                                                | SB     |        | NW                                                                                |                                                                                   |       |
| HCM Control Delay, s     | 0                                                                                 | 4.4    |        | 9.2                                                                               |                                                                                   |       |
| HCM LOS                  | A                                                                                 |        |        |                                                                                   |                                                                                   |       |
|                          |                                                                                   |        |        |                                                                                   |                                                                                   |       |
|                          |                                                                                   |        |        |                                                                                   |                                                                                   |       |
| Minor Lane/Major Mvmt    | NBT                                                                               | NBR    | NWLn1  | SBL                                                                               | SBT                                                                               |       |
| Capacity (veh/h)         | -                                                                                 | -      | 912    | 1544                                                                              | -                                                                                 |       |
| HCM Lane V/C Ratio       | -                                                                                 | -      | 0.07   | 0.034                                                                             | -                                                                                 |       |
| HCM Control Delay (s)    | -                                                                                 | -      | 9.2    | 7.4                                                                               | 0                                                                                 |       |
| HCM Lane LOS             | -                                                                                 | -      | A      | A                                                                                 | A                                                                                 |       |
| HCM 95th %tile Q(veh)    | -                                                                                 | -      | 0.2    | 0.1                                                                               | -                                                                                 |       |

# Lanes, Volumes, Timings

## 1: SR 74 (Joel Cowan Pkwy) & Carriage Oaks Dr

# Existing Conditions

PM Peak Hour

|                            |  |  |  |  |  |  |  |  |  |  |  |  |
|----------------------------|-----------------------------------------------------------------------------------|-----------------------------------------------------------------------------------|-----------------------------------------------------------------------------------|-----------------------------------------------------------------------------------|-----------------------------------------------------------------------------------|-----------------------------------------------------------------------------------|-------------------------------------------------------------------------------------|-------------------------------------------------------------------------------------|-------------------------------------------------------------------------------------|-------------------------------------------------------------------------------------|-------------------------------------------------------------------------------------|-------------------------------------------------------------------------------------|
| Lane Group                 | EBL                                                                               | EBT                                                                               | EBR                                                                               | WBL                                                                               | WBT                                                                               | WBR                                                                               | NBL                                                                                 | NBT                                                                                 | NBR                                                                                 | SBL                                                                                 | SBT                                                                                 | SBR                                                                                 |
| Lane Configurations        |  |  |  |  |  |                                                                                   |  |  |  |  |  |  |
| Traffic Volume (vph)       | 180                                                                               | 38                                                                                | 47                                                                                | 89                                                                                | 45                                                                                | 100                                                                               | 132                                                                                 | 1083                                                                                | 100                                                                                 | 118                                                                                 | 1165                                                                                | 135                                                                                 |
| Future Volume (vph)        | 180                                                                               | 38                                                                                | 47                                                                                | 89                                                                                | 45                                                                                | 100                                                                               | 132                                                                                 | 1083                                                                                | 100                                                                                 | 118                                                                                 | 1165                                                                                | 135                                                                                 |
| Ideal Flow (vphpl)         | 1900                                                                              | 1900                                                                              | 1900                                                                              | 1900                                                                              | 1900                                                                              | 1900                                                                              | 1900                                                                                | 1900                                                                                | 1900                                                                                | 1900                                                                                | 1900                                                                                | 1900                                                                                |
| Storage Length (ft)        | 130                                                                               |                                                                                   | 0                                                                                 | 60                                                                                |                                                                                   | 0                                                                                 | 240                                                                                 |                                                                                     | 315                                                                                 | 285                                                                                 |                                                                                     | 185                                                                                 |
| Storage Lanes              | 1                                                                                 |                                                                                   | 1                                                                                 | 1                                                                                 |                                                                                   | 0                                                                                 | 1                                                                                   |                                                                                     | 1                                                                                   | 1                                                                                   |                                                                                     | 1                                                                                   |
| Taper Length (ft)          | 50                                                                                |                                                                                   |                                                                                   | 25                                                                                |                                                                                   |                                                                                   | 75                                                                                  |                                                                                     |                                                                                     | 75                                                                                  |                                                                                     |                                                                                     |
| Satd. Flow (prot)          | 1805                                                                              | 1900                                                                              | 1615                                                                              | 1805                                                                              | 1704                                                                              | 0                                                                                 | 1805                                                                                | 3539                                                                                | 1599                                                                                | 1805                                                                                | 3574                                                                                | 1615                                                                                |
| Flt Permitted              | 0.663                                                                             |                                                                                   |                                                                                   | 0.732                                                                             |                                                                                   |                                                                                   | 0.113                                                                               |                                                                                     |                                                                                     | 0.169                                                                               |                                                                                     |                                                                                     |
| Satd. Flow (perm)          | 1260                                                                              | 1900                                                                              | 1615                                                                              | 1391                                                                              | 1704                                                                              | 0                                                                                 | 215                                                                                 | 3539                                                                                | 1599                                                                                | 321                                                                                 | 3574                                                                                | 1615                                                                                |
| Right Turn on Red          |                                                                                   |                                                                                   | Yes                                                                               |                                                                                   |                                                                                   | Yes                                                                               |                                                                                     |                                                                                     | Yes                                                                                 |                                                                                     |                                                                                     | Yes                                                                                 |
| Satd. Flow (RTOR)          |                                                                                   |                                                                                   | 82                                                                                |                                                                                   | 92                                                                                |                                                                                   |                                                                                     |                                                                                     | 102                                                                                 |                                                                                     |                                                                                     | 109                                                                                 |
| Link Speed (mph)           |                                                                                   | 35                                                                                |                                                                                   |                                                                                   | 35                                                                                |                                                                                   |                                                                                     | 55                                                                                  |                                                                                     |                                                                                     | 55                                                                                  |                                                                                     |
| Link Distance (ft)         |                                                                                   | 621                                                                               |                                                                                   |                                                                                   | 1631                                                                              |                                                                                   |                                                                                     | 525                                                                                 |                                                                                     |                                                                                     | 529                                                                                 |                                                                                     |
| Travel Time (s)            |                                                                                   | 12.1                                                                              |                                                                                   |                                                                                   | 31.8                                                                              |                                                                                   |                                                                                     | 6.5                                                                                 |                                                                                     |                                                                                     | 6.6                                                                                 |                                                                                     |
| Peak Hour Factor           | 0.98                                                                              | 0.98                                                                              | 0.98                                                                              | 0.98                                                                              | 0.98                                                                              | 0.98                                                                              | 0.98                                                                                | 0.98                                                                                | 0.98                                                                                | 0.98                                                                                | 0.98                                                                                | 0.98                                                                                |
| Heavy Vehicles (%)         | 0%                                                                                | 0%                                                                                | 0%                                                                                | 0%                                                                                | 0%                                                                                | 0%                                                                                | 0%                                                                                  | 2%                                                                                  | 1%                                                                                  | 0%                                                                                  | 1%                                                                                  | 0%                                                                                  |
| Shared Lane Traffic (%)    |                                                                                   |                                                                                   |                                                                                   |                                                                                   |                                                                                   |                                                                                   |                                                                                     |                                                                                     |                                                                                     |                                                                                     |                                                                                     |                                                                                     |
| Lane Group Flow (vph)      | 184                                                                               | 39                                                                                | 48                                                                                | 91                                                                                | 148                                                                               | 0                                                                                 | 135                                                                                 | 1105                                                                                | 102                                                                                 | 120                                                                                 | 1189                                                                                | 138                                                                                 |
| Enter Blocked Intersection | No                                                                                | No                                                                                | No                                                                                | No                                                                                | No                                                                                | No                                                                                | No                                                                                  | No                                                                                  | No                                                                                  | No                                                                                  | No                                                                                  | No                                                                                  |
| Lane Alignment             | Left                                                                              | Left                                                                              | Right                                                                             | Left                                                                              | Left                                                                              | Right                                                                             | Left                                                                                | Left                                                                                | Right                                                                               | Left                                                                                | Left                                                                                | Right                                                                               |
| Median Width(ft)           |                                                                                   | 12                                                                                |                                                                                   |                                                                                   | 12                                                                                |                                                                                   |                                                                                     | 12                                                                                  |                                                                                     |                                                                                     | 12                                                                                  |                                                                                     |
| Link Offset(ft)            |                                                                                   | 0                                                                                 |                                                                                   |                                                                                   | 0                                                                                 |                                                                                   |                                                                                     | 0                                                                                   |                                                                                     |                                                                                     | 0                                                                                   |                                                                                     |
| Crosswalk Width(ft)        |                                                                                   | 16                                                                                |                                                                                   |                                                                                   | 16                                                                                |                                                                                   |                                                                                     | 16                                                                                  |                                                                                     |                                                                                     | 16                                                                                  |                                                                                     |
| Two way Left Turn Lane     |                                                                                   |                                                                                   |                                                                                   |                                                                                   |                                                                                   |                                                                                   |                                                                                     |                                                                                     |                                                                                     |                                                                                     |                                                                                     |                                                                                     |
| Headway Factor             | 1.00                                                                              | 1.00                                                                              | 1.00                                                                              | 1.00                                                                              | 1.00                                                                              | 1.00                                                                              | 1.00                                                                                | 1.00                                                                                | 1.00                                                                                | 1.00                                                                                | 1.00                                                                                | 1.00                                                                                |
| Turning Speed (mph)        | 15                                                                                |                                                                                   | 9                                                                                 | 15                                                                                |                                                                                   | 9                                                                                 | 15                                                                                  |                                                                                     | 9                                                                                   | 15                                                                                  |                                                                                     | 9                                                                                   |
| Turn Type                  | Perm                                                                              | NA                                                                                | Perm                                                                              | Perm                                                                              | NA                                                                                |                                                                                   | pm+pt                                                                               | NA                                                                                  | Perm                                                                                | pm+pt                                                                               | NA                                                                                  | Perm                                                                                |
| Protected Phases           |                                                                                   | 4                                                                                 |                                                                                   |                                                                                   | 8                                                                                 |                                                                                   | 5                                                                                   | 2                                                                                   |                                                                                     | 1                                                                                   | 6                                                                                   |                                                                                     |
| Permitted Phases           | 4                                                                                 |                                                                                   | 4                                                                                 | 8                                                                                 |                                                                                   |                                                                                   | 2                                                                                   |                                                                                     | 2                                                                                   | 6                                                                                   |                                                                                     | 6                                                                                   |
| Total Split (s)            | 39.0                                                                              | 39.0                                                                              | 39.0                                                                              | 39.0                                                                              | 39.0                                                                              |                                                                                   | 16.0                                                                                | 66.0                                                                                | 66.0                                                                                | 15.0                                                                                | 65.0                                                                                | 65.0                                                                                |
| Total Lost Time (s)        | 6.0                                                                               | 6.0                                                                               | 6.0                                                                               | 6.0                                                                               | 6.0                                                                               |                                                                                   | 6.0                                                                                 | 6.0                                                                                 | 6.0                                                                                 | 6.0                                                                                 | 6.0                                                                                 | 6.0                                                                                 |
| Act Effect Green (s)       | 18.0                                                                              | 18.0                                                                              | 18.0                                                                              | 18.0                                                                              | 18.0                                                                              |                                                                                   | 42.5                                                                                | 35.5                                                                                | 35.5                                                                                | 38.9                                                                                | 31.0                                                                                | 31.0                                                                                |
| Actuated g/C Ratio         | 0.23                                                                              | 0.23                                                                              | 0.23                                                                              | 0.23                                                                              | 0.23                                                                              |                                                                                   | 0.55                                                                                | 0.46                                                                                | 0.46                                                                                | 0.51                                                                                | 0.40                                                                                | 0.40                                                                                |
| v/c Ratio                  | 0.63                                                                              | 0.09                                                                              | 0.11                                                                              | 0.28                                                                              | 0.32                                                                              |                                                                                   | 0.44                                                                                | 0.68                                                                                | 0.13                                                                                | 0.38                                                                                | 0.83                                                                                | 0.19                                                                                |
| Control Delay              | 38.9                                                                              | 26.2                                                                              | 2.6                                                                               | 29.1                                                                              | 13.9                                                                              |                                                                                   | 14.5                                                                                | 20.5                                                                                | 3.8                                                                                 | 11.5                                                                                | 26.5                                                                                | 5.9                                                                                 |
| Queue Delay                | 0.0                                                                               | 0.0                                                                               | 0.0                                                                               | 0.0                                                                               | 0.0                                                                               |                                                                                   | 0.0                                                                                 | 0.0                                                                                 | 0.0                                                                                 | 0.0                                                                                 | 0.0                                                                                 | 0.0                                                                                 |
| Total Delay                | 38.9                                                                              | 26.2                                                                              | 2.6                                                                               | 29.1                                                                              | 13.9                                                                              |                                                                                   | 14.5                                                                                | 20.5                                                                                | 3.8                                                                                 | 11.5                                                                                | 26.5                                                                                | 5.9                                                                                 |
| LOS                        | D                                                                                 | C                                                                                 | A                                                                                 | C                                                                                 | B                                                                                 |                                                                                   | B                                                                                   | C                                                                                   | A                                                                                   | B                                                                                   | C                                                                                   | A                                                                                   |
| Approach Delay             |                                                                                   | 30.6                                                                              |                                                                                   |                                                                                   | 19.7                                                                              |                                                                                   |                                                                                     | 18.7                                                                                |                                                                                     |                                                                                     | 23.3                                                                                |                                                                                     |
| Approach LOS               |                                                                                   | C                                                                                 |                                                                                   |                                                                                   | B                                                                                 |                                                                                   |                                                                                     | B                                                                                   |                                                                                     |                                                                                     | C                                                                                   |                                                                                     |
| Queue Length 50th (ft)     | 76                                                                                | 14                                                                                | 0                                                                                 | 35                                                                                | 21                                                                                |                                                                                   | 24                                                                                  | 218                                                                                 | 0                                                                                   | 21                                                                                  | 250                                                                                 | 8                                                                                   |
| Queue Length 95th (ft)     | 179                                                                               | 46                                                                                | 10                                                                                | 91                                                                                | 79                                                                                |                                                                                   | 74                                                                                  | 372                                                                                 | 28                                                                                  | 57                                                                                  | 418                                                                                 | 45                                                                                  |
| Internal Link Dist (ft)    |                                                                                   | 541                                                                               |                                                                                   |                                                                                   | 1551                                                                              |                                                                                   |                                                                                     | 445                                                                                 |                                                                                     |                                                                                     | 449                                                                                 |                                                                                     |
| Turn Bay Length (ft)       | 130                                                                               |                                                                                   |                                                                                   | 60                                                                                |                                                                                   |                                                                                   | 240                                                                                 |                                                                                     | 315                                                                                 | 285                                                                                 |                                                                                     | 185                                                                                 |
| Base Capacity (vph)        | 572                                                                               | 863                                                                               | 778                                                                               | 632                                                                               | 824                                                                               |                                                                                   | 339                                                                                 | 2823                                                                                | 1296                                                                                | 352                                                                                 | 2815                                                                                | 1295                                                                                |
| Starvation Cap Reductn     | 0                                                                                 | 0                                                                                 | 0                                                                                 | 0                                                                                 | 0                                                                                 |                                                                                   | 0                                                                                   | 0                                                                                   | 0                                                                                   | 0                                                                                   | 0                                                                                   | 0                                                                                   |
| Spillback Cap Reductn      | 0                                                                                 | 0                                                                                 | 0                                                                                 | 0                                                                                 | 0                                                                                 |                                                                                   | 0                                                                                   | 0                                                                                   | 0                                                                                   | 0                                                                                   | 0                                                                                   | 0                                                                                   |
| Storage Cap Reductn        | 0                                                                                 | 0                                                                                 | 0                                                                                 | 0                                                                                 | 0                                                                                 |                                                                                   | 0                                                                                   | 0                                                                                   | 0                                                                                   | 0                                                                                   | 0                                                                                   | 0                                                                                   |

M&W

Synchro 10 Report

# Lanes, Volumes, Timings

## 1: SR 74 (Joel Cowan Pkwy) & Carriage Oaks Dr

# Existing Conditions

PM Peak Hour

|                   |  |  |  |  |  |  |  |  |  |  |  |  |
|-------------------|-----------------------------------------------------------------------------------|-----------------------------------------------------------------------------------|-----------------------------------------------------------------------------------|-----------------------------------------------------------------------------------|-----------------------------------------------------------------------------------|-----------------------------------------------------------------------------------|------------------------------------------------------------------------------------|-------------------------------------------------------------------------------------|-------------------------------------------------------------------------------------|-------------------------------------------------------------------------------------|-------------------------------------------------------------------------------------|-------------------------------------------------------------------------------------|
| Lane Group        | EBL                                                                               | EBT                                                                               | EBR                                                                               | WBL                                                                               | WBT                                                                               | WBR                                                                               | NBL                                                                                | NBT                                                                                 | NBR                                                                                 | SBL                                                                                 | SBT                                                                                 | SBR                                                                                 |
| Reduced v/c Ratio | 0.32                                                                              | 0.05                                                                              | 0.06                                                                              | 0.14                                                                              | 0.18                                                                              |                                                                                   | 0.40                                                                               | 0.39                                                                                | 0.08                                                                                | 0.34                                                                                | 0.42                                                                                | 0.11                                                                                |

### Intersection Summary

Area Type: Other

Cycle Length: 120

Actuated Cycle Length: 77

Control Type: Actuated-Uncoordinated

Maximum v/c Ratio: 0.83

Intersection Signal Delay: 21.7

Intersection LOS: C

Intersection Capacity Utilization 78.0%

ICU Level of Service D

Analysis Period (min) 15

Splits and Phases: 1: SR 74 (Joel Cowan Pkwy) & Carriage Oaks Dr

|                                                                                      |                                                                                      |                                                                                        |
|--------------------------------------------------------------------------------------|--------------------------------------------------------------------------------------|----------------------------------------------------------------------------------------|
|  Ø1 |  Ø2 |  Ø4 |
| 15 s                                                                                 | 66 s                                                                                 | 39 s                                                                                   |
|  Ø5 |  Ø6 |  Ø8 |
| 16 s                                                                                 | 65 s                                                                                 | 39 s                                                                                   |

HCM 6th TWSC  
2: Senoia Rd & Carriage Oaks Dr

Existing Conditions  
PM Peak Hour

| Intersection             |                                                                                   |      |      |                                                                                   |                                                                                   |      |
|--------------------------|-----------------------------------------------------------------------------------|------|------|-----------------------------------------------------------------------------------|-----------------------------------------------------------------------------------|------|
| Int Delay, s/veh         | 5.5                                                                               |      |      |                                                                                   |                                                                                   |      |
| Movement                 | EBL                                                                               | EBR  | NBL  | NBT                                                                               | SBT                                                                               | SBR  |
| Lane Configurations      |  |      |      |  |  |      |
| Traffic Vol, veh/h       | 52                                                                                | 144  | 77   | 26                                                                                | 96                                                                                | 126  |
| Future Vol, veh/h        | 52                                                                                | 144  | 77   | 26                                                                                | 96                                                                                | 126  |
| 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         | 89                                                                                | 89   | 89   | 89                                                                                | 89                                                                                | 89   |
| Heavy Vehicles, %        | 0                                                                                 | 0    | 0    | 0                                                                                 | 0                                                                                 | 0    |
| Mvmt Flow                | 58                                                                                | 162  | 87   | 29                                                                                | 108                                                                               | 142  |

| Major/Minor          | Minor2 | Major1 |      | Major2 |   |   |
|----------------------|--------|--------|------|--------|---|---|
| Conflicting Flow All | 382    | 179    | 250  | 0      | - | 0 |
| Stage 1              | 179    | -      | -    | -      | - | - |
| Stage 2              | 203    | -      | -    | -      | - | - |
| Critical Hdwy        | 6.4    | 6.2    | 4.1  | -      | - | - |
| Critical Hdwy Stg 1  | 5.4    | -      | -    | -      | - | - |
| Critical Hdwy Stg 2  | 5.4    | -      | -    | -      | - | - |
| Follow-up Hdwy       | 3.5    | 3.3    | 2.2  | -      | - | - |
| Pot Cap-1 Maneuver   | 624    | 869    | 1327 | -      | - | - |
| Stage 1              | 857    | -      | -    | -      | - | - |
| Stage 2              | 836    | -      | -    | -      | - | - |
| Platoon blocked, %   |        |        |      | -      | - | - |
| Mov Cap-1 Maneuver   | 582    | 869    | 1327 | -      | - | - |
| Mov Cap-2 Maneuver   | 582    | -      | -    | -      | - | - |
| Stage 1              | 800    | -      | -    | -      | - | - |
| Stage 2              | 836    | -      | -    | -      | - | - |

| Approach             | EB   | NB  | SB |
|----------------------|------|-----|----|
| HCM Control Delay, s | 11.6 | 5.9 | 0  |
| HCM LOS              | B    |     |    |

| Minor Lane/Major Mvmt | NBL   | NBT | EBLn1 | SBT | SBR |
|-----------------------|-------|-----|-------|-----|-----|
| Capacity (veh/h)      | 1327  | -   | 768   | -   | -   |
| HCM Lane V/C Ratio    | 0.065 | -   | 0.287 | -   | -   |
| HCM Control Delay (s) | 7.9   | 0   | 11.6  | -   | -   |
| HCM Lane LOS          | A     | A   | B     | -   | -   |
| HCM 95th %tile Q(veh) | 0.2   | -   | 1.2   | -   | -   |

HCM 6th TWSC  
3: Senoia Rd & SR 74 NB Ramp

Existing Conditions  
PM Peak Hour

Intersection

Int Delay, s/veh 3.9

| Movement                 | WBL                                                                               | WBR  | NBT                                                                               | NBR                                                                               | SBL  | SBT   |
|--------------------------|-----------------------------------------------------------------------------------|------|-----------------------------------------------------------------------------------|-----------------------------------------------------------------------------------|------|-------|
| Lane Configurations      |  |      |  |  |      |       |
| Traffic Vol, veh/h       | 136                                                                               | 15   | 143                                                                               | 106                                                                               | 0    | 0     |
| Future Vol, veh/h        | 136                                                                               | 15   | 143                                                                               | 106                                                                               | 0    | 0     |
| 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                                                                                 | -    | -                                                                                 | 225                                                                               | -    | -     |
| Veh in Median Storage, # | 0                                                                                 | -    | 0                                                                                 | -                                                                                 | -    | 16979 |
| Grade, %                 | 0                                                                                 | -    | 0                                                                                 | -                                                                                 | -    | 0     |
| Peak Hour Factor         | 88                                                                                | 88   | 88                                                                                | 88                                                                                | 88   | 88    |
| Heavy Vehicles, %        | 0                                                                                 | 0    | 1                                                                                 | 0                                                                                 | 0    | 0     |
| Mvmt Flow                | 155                                                                               | 17   | 163                                                                               | 120                                                                               | 0    | 0     |

| Major/Minor          | Minor1 | Major1 |   |   |
|----------------------|--------|--------|---|---|
| Conflicting Flow All | 163    | 163    | 0 | 0 |
| Stage 1              | 163    | -      | - | - |
| Stage 2              | 0      | -      | - | - |
| Critical Hdwy        | 6.4    | 6.2    | - | - |
| Critical Hdwy Stg 1  | 5.4    | -      | - | - |
| Critical Hdwy Stg 2  | -      | -      | - | - |
| Follow-up Hdwy       | 3.5    | 3.3    | - | - |
| Pot Cap-1 Maneuver   | 832    | 887    | - | - |
| Stage 1              | 871    | -      | - | - |
| Stage 2              | -      | -      | - | - |
| Platoon blocked, %   |        |        | - | - |
| Mov Cap-1 Maneuver   | 832    | 887    | - | - |
| Mov Cap-2 Maneuver   | 832    | -      | - | - |
| Stage 1              | 871    | -      | - | - |
| Stage 2              | -      | -      | - | - |

| Approach             | WB   | NB |
|----------------------|------|----|
| HCM Control Delay, s | 10.4 | 0  |
| HCM LOS              | B    |    |

| Minor Lane/Major Mvmt | NBT | NBRWBLn1 |
|-----------------------|-----|----------|
| Capacity (veh/h)      | -   | - 837    |
| HCM Lane V/C Ratio    | -   | - 0.205  |
| HCM Control Delay (s) | -   | - 10.4   |
| HCM Lane LOS          | -   | - B      |
| HCM 95th %tile Q(veh) | -   | - 0.8    |

HCM 6th TWSC  
4: Senoia Rd & Handley Rd

Existing Conditions  
PM Peak Hour

| Intersection             |                                                                                   |          |        |                                                                                   |                                                                                   |      |
|--------------------------|-----------------------------------------------------------------------------------|----------|--------|-----------------------------------------------------------------------------------|-----------------------------------------------------------------------------------|------|
| Int Delay, s/veh         | 4.6                                                                               |          |        |                                                                                   |                                                                                   |      |
| Movement                 | NBT                                                                               | NBR      | SBL    | SBT                                                                               | NWL                                                                               | NWR  |
| Lane Configurations      |  |          |        |  |  |      |
| Traffic Vol, veh/h       | 95                                                                                | 7        | 57     | 113                                                                               | 38                                                                                | 93   |
| Future Vol, veh/h        | 95                                                                                | 7        | 57     | 113                                                                               | 38                                                                                | 93   |
| Conflicting Peds, #/hr   | 0                                                                                 | 0        | 0      | 0                                                                                 | 0                                                                                 | 0    |
| Sign Control             | Free                                                                              | Free     | Free   | Free                                                                              | Stop                                                                              | Stop |
| RT Channelized           | -                                                                                 | None     | -      | None                                                                              | -                                                                                 | None |
| Storage Length           | -                                                                                 | -        | -      | -                                                                                 | 0                                                                                 | -    |
| Veh in Median Storage, # | 0                                                                                 | -        | -      | 0                                                                                 | 0                                                                                 | -    |
| Grade, %                 | 0                                                                                 | -        | -      | 0                                                                                 | 0                                                                                 | -    |
| Peak Hour Factor         | 80                                                                                | 80       | 80     | 80                                                                                | 80                                                                                | 80   |
| Heavy Vehicles, %        | 0                                                                                 | 0        | 0      | 0                                                                                 | 0                                                                                 | 0    |
| Mvmt Flow                | 119                                                                               | 9        | 71     | 141                                                                               | 48                                                                                | 116  |
| Major/Minor              | Major1                                                                            | Major2   | Minor1 |                                                                                   |                                                                                   |      |
| Conflicting Flow All     | 0                                                                                 | 0        | 128    | 0                                                                                 | 407                                                                               | 124  |
| Stage 1                  | -                                                                                 | -        | -      | -                                                                                 | 124                                                                               | -    |
| Stage 2                  | -                                                                                 | -        | -      | -                                                                                 | 283                                                                               | -    |
| Critical Hdwy            | -                                                                                 | -        | 4.1    | -                                                                                 | 6.4                                                                               | 6.2  |
| Critical Hdwy Stg 1      | -                                                                                 | -        | -      | -                                                                                 | 5.4                                                                               | -    |
| Critical Hdwy Stg 2      | -                                                                                 | -        | -      | -                                                                                 | 5.4                                                                               | -    |
| Follow-up Hdwy           | -                                                                                 | -        | 2.2    | -                                                                                 | 3.5                                                                               | 3.3  |
| Pot Cap-1 Maneuver       | -                                                                                 | -        | 1470   | -                                                                                 | 604                                                                               | 932  |
| Stage 1                  | -                                                                                 | -        | -      | -                                                                                 | 907                                                                               | -    |
| Stage 2                  | -                                                                                 | -        | -      | -                                                                                 | 770                                                                               | -    |
| Platoon blocked, %       | -                                                                                 | -        | -      | -                                                                                 | -                                                                                 | -    |
| Mov Cap-1 Maneuver       | -                                                                                 | -        | 1470   | -                                                                                 | 573                                                                               | 932  |
| Mov Cap-2 Maneuver       | -                                                                                 | -        | -      | -                                                                                 | 573                                                                               | -    |
| Stage 1                  | -                                                                                 | -        | -      | -                                                                                 | 907                                                                               | -    |
| Stage 2                  | -                                                                                 | -        | -      | -                                                                                 | 730                                                                               | -    |
| Approach                 | NB                                                                                |          | SB     |                                                                                   | NW                                                                                |      |
| HCM Control Delay, s     | 0                                                                                 |          | 2.5    |                                                                                   | 10.8                                                                              |      |
| HCM LOS                  |                                                                                   |          |        |                                                                                   | B                                                                                 |      |
| Minor Lane/Major Mvmt    | NBT                                                                               | NBRNWLn1 | SBL    | SBT                                                                               |                                                                                   |      |
| Capacity (veh/h)         | -                                                                                 | -        | 789    | 1470                                                                              | -                                                                                 |      |
| HCM Lane V/C Ratio       | -                                                                                 | -        | 0.208  | 0.048                                                                             | -                                                                                 |      |
| HCM Control Delay (s)    | -                                                                                 | -        | 10.8   | 7.6                                                                               | 0                                                                                 |      |
| HCM Lane LOS             | -                                                                                 | -        | B      | A                                                                                 | A                                                                                 |      |
| HCM 95th %tile Q(veh)    | -                                                                                 | -        | 0.8    | 0.2                                                                               | -                                                                                 |      |

## Appendix E:

### Capacity Analysis Reports – Projected Conditions

# Lanes, Volumes, Timings

## 1: SR 74 (Joel Cowan Pkwy) & Carriage Oaks Dr

# Projected Conditions

AM Peak Hour

|                            |  |  |  |  |  |  |  |  |  |  |  |  |
|----------------------------|-----------------------------------------------------------------------------------|-----------------------------------------------------------------------------------|-----------------------------------------------------------------------------------|-----------------------------------------------------------------------------------|-----------------------------------------------------------------------------------|-----------------------------------------------------------------------------------|-------------------------------------------------------------------------------------|-------------------------------------------------------------------------------------|-------------------------------------------------------------------------------------|-------------------------------------------------------------------------------------|-------------------------------------------------------------------------------------|-------------------------------------------------------------------------------------|
| Lane Group                 | EBL                                                                               | EBT                                                                               | EBR                                                                               | WBL                                                                               | WBT                                                                               | WBR                                                                               | NBL                                                                                 | NBT                                                                                 | NBR                                                                                 | SBL                                                                                 | SBT                                                                                 | SBR                                                                                 |
| Lane Configurations        |  |  |  |  |  |                                                                                   |   |  |  |  |  |  |
| Traffic Volume (vph)       | 134                                                                               | 12                                                                                | 29                                                                                | 22                                                                                | 6                                                                                 | 71                                                                                | 30                                                                                  | 1014                                                                                | 45                                                                                  | 89                                                                                  | 931                                                                                 | 81                                                                                  |
| Future Volume (vph)        | 134                                                                               | 12                                                                                | 29                                                                                | 22                                                                                | 6                                                                                 | 71                                                                                | 30                                                                                  | 1014                                                                                | 45                                                                                  | 89                                                                                  | 931                                                                                 | 81                                                                                  |
| Ideal Flow (vphpl)         | 1900                                                                              | 1900                                                                              | 1900                                                                              | 1900                                                                              | 1900                                                                              | 1900                                                                              | 1900                                                                                | 1900                                                                                | 1900                                                                                | 1900                                                                                | 1900                                                                                | 1900                                                                                |
| Storage Length (ft)        | 130                                                                               |                                                                                   | 0                                                                                 | 60                                                                                |                                                                                   | 0                                                                                 | 240                                                                                 |                                                                                     | 315                                                                                 | 285                                                                                 |                                                                                     | 185                                                                                 |
| Storage Lanes              | 1                                                                                 |                                                                                   | 1                                                                                 | 1                                                                                 |                                                                                   | 0                                                                                 | 1                                                                                   |                                                                                     | 1                                                                                   | 1                                                                                   |                                                                                     | 1                                                                                   |
| Taper Length (ft)          | 50                                                                                |                                                                                   |                                                                                   | 25                                                                                |                                                                                   |                                                                                   | 75                                                                                  |                                                                                     |                                                                                     | 75                                                                                  |                                                                                     |                                                                                     |
| Satd. Flow (prot)          | 1770                                                                              | 1900                                                                              | 1509                                                                              | 1805                                                                              | 1592                                                                              | 0                                                                                 | 1736                                                                                | 3471                                                                                | 1615                                                                                | 1805                                                                                | 3438                                                                                | 1599                                                                                |
| Flt Permitted              | 0.704                                                                             |                                                                                   |                                                                                   | 0.749                                                                             |                                                                                   |                                                                                   | 0.248                                                                               |                                                                                     |                                                                                     | 0.151                                                                               |                                                                                     |                                                                                     |
| Satd. Flow (perm)          | 1311                                                                              | 1900                                                                              | 1509                                                                              | 1423                                                                              | 1592                                                                              | 0                                                                                 | 453                                                                                 | 3471                                                                                | 1615                                                                                | 287                                                                                 | 3438                                                                                | 1599                                                                                |
| Right Turn on Red          |                                                                                   |                                                                                   | Yes                                                                               |                                                                                   |                                                                                   | Yes                                                                               |                                                                                     |                                                                                     | Yes                                                                                 |                                                                                     |                                                                                     | Yes                                                                                 |
| Satd. Flow (RTOR)          |                                                                                   |                                                                                   | 82                                                                                |                                                                                   | 76                                                                                |                                                                                   |                                                                                     |                                                                                     | 82                                                                                  |                                                                                     |                                                                                     | 87                                                                                  |
| Link Speed (mph)           |                                                                                   | 35                                                                                |                                                                                   |                                                                                   | 35                                                                                |                                                                                   |                                                                                     | 55                                                                                  |                                                                                     |                                                                                     | 55                                                                                  |                                                                                     |
| Link Distance (ft)         |                                                                                   | 621                                                                               |                                                                                   |                                                                                   | 1631                                                                              |                                                                                   |                                                                                     | 525                                                                                 |                                                                                     |                                                                                     | 529                                                                                 |                                                                                     |
| Travel Time (s)            |                                                                                   | 12.1                                                                              |                                                                                   |                                                                                   | 31.8                                                                              |                                                                                   |                                                                                     | 6.5                                                                                 |                                                                                     |                                                                                     | 6.6                                                                                 |                                                                                     |
| Peak Hour Factor           | 0.93                                                                              | 0.93                                                                              | 0.93                                                                              | 0.93                                                                              | 0.93                                                                              | 0.93                                                                              | 0.93                                                                                | 0.93                                                                                | 0.93                                                                                | 0.93                                                                                | 0.93                                                                                | 0.93                                                                                |
| Heavy Vehicles (%)         | 2%                                                                                | 0%                                                                                | 7%                                                                                | 0%                                                                                | 0%                                                                                | 3%                                                                                | 4%                                                                                  | 4%                                                                                  | 0%                                                                                  | 0%                                                                                  | 5%                                                                                  | 1%                                                                                  |
| Shared Lane Traffic (%)    |                                                                                   |                                                                                   |                                                                                   |                                                                                   |                                                                                   |                                                                                   |                                                                                     |                                                                                     |                                                                                     |                                                                                     |                                                                                     |                                                                                     |
| Lane Group Flow (vph)      | 144                                                                               | 13                                                                                | 31                                                                                | 24                                                                                | 82                                                                                | 0                                                                                 | 32                                                                                  | 1090                                                                                | 48                                                                                  | 96                                                                                  | 1001                                                                                | 87                                                                                  |
| Enter Blocked Intersection | No                                                                                | No                                                                                | No                                                                                | No                                                                                | No                                                                                | No                                                                                | No                                                                                  | No                                                                                  | No                                                                                  | No                                                                                  | No                                                                                  | No                                                                                  |
| Lane Alignment             | Left                                                                              | Left                                                                              | Right                                                                             | Left                                                                              | Left                                                                              | Right                                                                             | Left                                                                                | Left                                                                                | Right                                                                               | Left                                                                                | Left                                                                                | Right                                                                               |
| Median Width(ft)           |                                                                                   | 12                                                                                |                                                                                   |                                                                                   | 12                                                                                |                                                                                   |                                                                                     | 12                                                                                  |                                                                                     |                                                                                     | 12                                                                                  |                                                                                     |
| Link Offset(ft)            |                                                                                   | 0                                                                                 |                                                                                   |                                                                                   | 0                                                                                 |                                                                                   |                                                                                     | 0                                                                                   |                                                                                     |                                                                                     | 0                                                                                   |                                                                                     |
| Crosswalk Width(ft)        |                                                                                   | 16                                                                                |                                                                                   |                                                                                   | 16                                                                                |                                                                                   |                                                                                     | 16                                                                                  |                                                                                     |                                                                                     | 16                                                                                  |                                                                                     |
| Two way Left Turn Lane     |                                                                                   |                                                                                   |                                                                                   |                                                                                   |                                                                                   |                                                                                   |                                                                                     |                                                                                     |                                                                                     |                                                                                     |                                                                                     |                                                                                     |
| Headway Factor             | 1.00                                                                              | 1.00                                                                              | 1.00                                                                              | 1.00                                                                              | 1.00                                                                              | 1.00                                                                              | 1.00                                                                                | 1.00                                                                                | 1.00                                                                                | 1.00                                                                                | 1.00                                                                                | 1.00                                                                                |
| Turning Speed (mph)        | 15                                                                                |                                                                                   | 9                                                                                 | 15                                                                                |                                                                                   | 9                                                                                 | 15                                                                                  |                                                                                     | 9                                                                                   | 15                                                                                  |                                                                                     | 9                                                                                   |
| Turn Type                  | Perm                                                                              | NA                                                                                | Perm                                                                              | Perm                                                                              | NA                                                                                |                                                                                   | pm+pt                                                                               | NA                                                                                  | Perm                                                                                | pm+pt                                                                               | NA                                                                                  | Perm                                                                                |
| Protected Phases           |                                                                                   | 4                                                                                 |                                                                                   |                                                                                   | 8                                                                                 |                                                                                   | 5                                                                                   | 2                                                                                   |                                                                                     | 1                                                                                   | 6                                                                                   |                                                                                     |
| Permitted Phases           | 4                                                                                 |                                                                                   | 4                                                                                 | 8                                                                                 |                                                                                   |                                                                                   | 2                                                                                   |                                                                                     | 2                                                                                   | 6                                                                                   |                                                                                     | 6                                                                                   |
| Total Split (s)            | 35.0                                                                              | 35.0                                                                              | 35.0                                                                              | 35.0                                                                              | 35.0                                                                              |                                                                                   | 13.0                                                                                | 70.0                                                                                | 70.0                                                                                | 15.0                                                                                | 72.0                                                                                | 72.0                                                                                |
| Total Lost Time (s)        | 6.0                                                                               | 6.0                                                                               | 6.0                                                                               | 6.0                                                                               | 6.0                                                                               |                                                                                   | 6.0                                                                                 | 6.0                                                                                 | 6.0                                                                                 | 6.0                                                                                 | 6.0                                                                                 | 6.0                                                                                 |
| Act Effect Green (s)       | 13.1                                                                              | 13.1                                                                              | 13.1                                                                              | 13.1                                                                              | 13.1                                                                              |                                                                                   | 33.7                                                                                | 28.8                                                                                | 28.8                                                                                | 37.8                                                                                | 35.0                                                                                | 35.0                                                                                |
| Actuated g/C Ratio         | 0.20                                                                              | 0.20                                                                              | 0.20                                                                              | 0.20                                                                              | 0.20                                                                              |                                                                                   | 0.52                                                                                | 0.44                                                                                | 0.44                                                                                | 0.58                                                                                | 0.54                                                                                | 0.54                                                                                |
| v/c Ratio                  | 0.55                                                                              | 0.03                                                                              | 0.08                                                                              | 0.08                                                                              | 0.21                                                                              |                                                                                   | 0.09                                                                                | 0.71                                                                                | 0.06                                                                                | 0.28                                                                                | 0.54                                                                                | 0.10                                                                                |
| Control Delay              | 33.6                                                                              | 23.8                                                                              | 0.4                                                                               | 24.4                                                                              | 9.2                                                                               |                                                                                   | 6.7                                                                                 | 19.2                                                                                | 1.4                                                                                 | 8.1                                                                                 | 12.9                                                                                | 3.5                                                                                 |
| Queue Delay                | 0.0                                                                               | 0.0                                                                               | 0.0                                                                               | 0.0                                                                               | 0.0                                                                               |                                                                                   | 0.0                                                                                 | 0.0                                                                                 | 0.0                                                                                 | 0.0                                                                                 | 0.0                                                                                 | 0.0                                                                                 |
| Total Delay                | 33.6                                                                              | 23.8                                                                              | 0.4                                                                               | 24.4                                                                              | 9.2                                                                               |                                                                                   | 6.7                                                                                 | 19.2                                                                                | 1.4                                                                                 | 8.1                                                                                 | 12.9                                                                                | 3.5                                                                                 |
| LOS                        | C                                                                                 | C                                                                                 | A                                                                                 | C                                                                                 | A                                                                                 |                                                                                   | A                                                                                   | B                                                                                   | A                                                                                   | A                                                                                   | B                                                                                   | A                                                                                   |
| Approach Delay             |                                                                                   | 27.5                                                                              |                                                                                   |                                                                                   | 12.7                                                                              |                                                                                   |                                                                                     | 18.1                                                                                |                                                                                     |                                                                                     | 11.9                                                                                |                                                                                     |
| Approach LOS               |                                                                                   | C                                                                                 |                                                                                   |                                                                                   | B                                                                                 |                                                                                   |                                                                                     | B                                                                                   |                                                                                     |                                                                                     | B                                                                                   |                                                                                     |
| Queue Length 50th (ft)     | 50                                                                                | 4                                                                                 | 0                                                                                 | 8                                                                                 | 2                                                                                 |                                                                                   | 4                                                                                   | 185                                                                                 | 0                                                                                   | 13                                                                                  | 97                                                                                  | 0                                                                                   |
| Queue Length 95th (ft)     | 125                                                                               | 20                                                                                | 0                                                                                 | 30                                                                                | 37                                                                                |                                                                                   | 16                                                                                  | 313                                                                                 | 8                                                                                   | 37                                                                                  | 266                                                                                 | 23                                                                                  |
| Internal Link Dist (ft)    |                                                                                   | 541                                                                               |                                                                                   |                                                                                   | 1551                                                                              |                                                                                   |                                                                                     | 445                                                                                 |                                                                                     |                                                                                     | 449                                                                                 |                                                                                     |
| Turn Bay Length (ft)       | 130                                                                               |                                                                                   |                                                                                   | 60                                                                                |                                                                                   |                                                                                   | 240                                                                                 |                                                                                     | 315                                                                                 | 285                                                                                 |                                                                                     | 185                                                                                 |
| Base Capacity (vph)        | 610                                                                               | 884                                                                               | 746                                                                               | 662                                                                               | 781                                                                               |                                                                                   | 383                                                                                 | 3221                                                                                | 1504                                                                                | 387                                                                                 | 3226                                                                                | 1506                                                                                |
| Starvation Cap Reductn     | 0                                                                                 | 0                                                                                 | 0                                                                                 | 0                                                                                 | 0                                                                                 |                                                                                   | 0                                                                                   | 0                                                                                   | 0                                                                                   | 0                                                                                   | 0                                                                                   | 0                                                                                   |
| Spillback Cap Reductn      | 0                                                                                 | 0                                                                                 | 0                                                                                 | 0                                                                                 | 0                                                                                 |                                                                                   | 0                                                                                   | 0                                                                                   | 0                                                                                   | 0                                                                                   | 0                                                                                   | 0                                                                                   |
| Storage Cap Reductn        | 0                                                                                 | 0                                                                                 | 0                                                                                 | 0                                                                                 | 0                                                                                 |                                                                                   | 0                                                                                   | 0                                                                                   | 0                                                                                   | 0                                                                                   | 0                                                                                   | 0                                                                                   |

M&W

Synchro 10 Report

# Lanes, Volumes, Timings

## 1: SR 74 (Joel Cowan Pkwy) & Carriage Oaks Dr

# Projected Conditions

AM Peak Hour

|                   |  |  |  |  |  |  |  |  |  |  |  |  |
|-------------------|-----------------------------------------------------------------------------------|-----------------------------------------------------------------------------------|-----------------------------------------------------------------------------------|-----------------------------------------------------------------------------------|-----------------------------------------------------------------------------------|-----------------------------------------------------------------------------------|------------------------------------------------------------------------------------|-------------------------------------------------------------------------------------|-------------------------------------------------------------------------------------|-------------------------------------------------------------------------------------|-------------------------------------------------------------------------------------|-------------------------------------------------------------------------------------|
| Lane Group        | EBL                                                                               | EBT                                                                               | EBR                                                                               | WBL                                                                               | WBT                                                                               | WBR                                                                               | NBL                                                                                | NBT                                                                                 | NBR                                                                                 | SBL                                                                                 | SBT                                                                                 | SBR                                                                                 |
| Reduced v/c Ratio | 0.24                                                                              | 0.01                                                                              | 0.04                                                                              | 0.04                                                                              | 0.10                                                                              |                                                                                   | 0.08                                                                               | 0.34                                                                                | 0.03                                                                                | 0.25                                                                                | 0.31                                                                                | 0.06                                                                                |

### Intersection Summary

Area Type: Other

Cycle Length: 120

Actuated Cycle Length: 64.8

Control Type: Actuated-Uncoordinated

Maximum v/c Ratio: 0.71

Intersection Signal Delay: 15.8

Intersection LOS: B

Intersection Capacity Utilization 62.1%

ICU Level of Service B

Analysis Period (min) 15

Splits and Phases: 1: SR 74 (Joel Cowan Pkwy) & Carriage Oaks Dr

|                                                                                      |                                                                                      |                                                                                        |
|--------------------------------------------------------------------------------------|--------------------------------------------------------------------------------------|----------------------------------------------------------------------------------------|
|  Ø1 |  Ø2 |  Ø4 |
| 15 s                                                                                 | 70 s                                                                                 | 35 s                                                                                   |
|  Ø5 |  Ø6 |  Ø8 |
| 13 s                                                                                 | 72 s                                                                                 | 35 s                                                                                   |

HCM 6th TWSC  
2: Senoia Rd & Carriage Oaks Dr

Projected Conditions  
AM Peak Hour

| Intersection             |                                                                                   |      |      |                                                                                   |                                                                                   |      |
|--------------------------|-----------------------------------------------------------------------------------|------|------|-----------------------------------------------------------------------------------|-----------------------------------------------------------------------------------|------|
| Int Delay, s/veh         | 5.7                                                                               |      |      |                                                                                   |                                                                                   |      |
| Movement                 | EBL                                                                               | EBR  | NBL  | NBT                                                                               | SBT                                                                               | SBR  |
| Lane Configurations      |  |      |      |  |  |      |
| Traffic Vol, veh/h       | 94                                                                                | 36   | 37   | 39                                                                                | 18                                                                                | 54   |
| Future Vol, veh/h        | 94                                                                                | 36   | 37   | 39                                                                                | 18                                                                                | 54   |
| 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         | 91                                                                                | 91   | 91   | 91                                                                                | 91                                                                                | 91   |
| Heavy Vehicles, %        | 0                                                                                 | 0    | 3    | 3                                                                                 | 6                                                                                 | 2    |
| Mvmt Flow                | 103                                                                               | 40   | 41   | 43                                                                                | 20                                                                                | 59   |

| Major/Minor          | Minor2 | Major1 |       | Major2 |   |   |
|----------------------|--------|--------|-------|--------|---|---|
| Conflicting Flow All | 175    | 50     | 79    | 0      | - | 0 |
| Stage 1              | 50     | -      | -     | -      | - | - |
| Stage 2              | 125    | -      | -     | -      | - | - |
| Critical Hdwy        | 6.4    | 6.2    | 4.13  | -      | - | - |
| Critical Hdwy Stg 1  | 5.4    | -      | -     | -      | - | - |
| Critical Hdwy Stg 2  | 5.4    | -      | -     | -      | - | - |
| Follow-up Hdwy       | 3.5    | 3.3    | 2.227 | -      | - | - |
| Pot Cap-1 Maneuver   | 819    | 1024   | 1513  | -      | - | - |
| Stage 1              | 978    | -      | -     | -      | - | - |
| Stage 2              | 906    | -      | -     | -      | - | - |
| Platoon blocked, %   |        |        |       | -      | - | - |
| Mov Cap-1 Maneuver   | 796    | 1024   | 1513  | -      | - | - |
| Mov Cap-2 Maneuver   | 796    | -      | -     | -      | - | - |
| Stage 1              | 951    | -      | -     | -      | - | - |
| Stage 2              | 906    | -      | -     | -      | - | - |

| Approach             | EB   | NB  | SB |
|----------------------|------|-----|----|
| HCM Control Delay, s | 10.1 | 3.6 | 0  |
| HCM LOS              | B    |     |    |

| Minor Lane/Major Mvmt | NBL   | NBT | EBLn1 | SBT | SBR |
|-----------------------|-------|-----|-------|-----|-----|
| Capacity (veh/h)      | 1513  | -   | 848   | -   | -   |
| HCM Lane V/C Ratio    | 0.027 | -   | 0.168 | -   | -   |
| HCM Control Delay (s) | 7.4   | 0   | 10.1  | -   | -   |
| HCM Lane LOS          | A     | A   | B     | -   | -   |
| HCM 95th %tile Q(veh) | 0.1   | -   | 0.6   | -   | -   |

HCM 6th TWSC  
3: Senoia Rd & SR 74 NB Ramp

Projected Conditions  
AM Peak Hour

Intersection

Int Delay, s/veh 1.5

| Movement                 | WBL                                                                               | WBR  | NBT                                                                               | NBR                                                                               | SBL  | SBT   |
|--------------------------|-----------------------------------------------------------------------------------|------|-----------------------------------------------------------------------------------|-----------------------------------------------------------------------------------|------|-------|
| Lane Configurations      |  |      |  |  |      |       |
| Traffic Vol, veh/h       | 38                                                                                | 4    | 168                                                                               | 63                                                                                | 0    | 0     |
| Future Vol, veh/h        | 38                                                                                | 4    | 168                                                                               | 63                                                                                | 0    | 0     |
| 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                                                                                 | -    | -                                                                                 | 225                                                                               | -    | -     |
| Veh in Median Storage, # | 0                                                                                 | -    | 0                                                                                 | -                                                                                 | -    | 16979 |
| Grade, %                 | 0                                                                                 | -    | 0                                                                                 | -                                                                                 | -    | 0     |
| Peak Hour Factor         | 89                                                                                | 89   | 89                                                                                | 89                                                                                | 89   | 89    |
| Heavy Vehicles, %        | 0                                                                                 | 0    | 4                                                                                 | 0                                                                                 | 0    | 0     |
| Mvmt Flow                | 43                                                                                | 4    | 189                                                                               | 71                                                                                | 0    | 0     |

| Major/Minor          | Minor1 | Major1 |   |   |
|----------------------|--------|--------|---|---|
| Conflicting Flow All | 189    | 189    | 0 | 0 |
| Stage 1              | 189    | -      | - | - |
| Stage 2              | 0      | -      | - | - |
| Critical Hdwy        | 6.4    | 6.2    | - | - |
| Critical Hdwy Stg 1  | 5.4    | -      | - | - |
| Critical Hdwy Stg 2  | -      | -      | - | - |
| Follow-up Hdwy       | 3.5    | 3.3    | - | - |
| Pot Cap-1 Maneuver   | 805    | 858    | - | - |
| Stage 1              | 848    | -      | - | - |
| Stage 2              | -      | -      | - | - |
| Platoon blocked, %   |        |        | - | - |
| Mov Cap-1 Maneuver   | 805    | 858    | - | - |
| Mov Cap-2 Maneuver   | 805    | -      | - | - |
| Stage 1              | 848    | -      | - | - |
| Stage 2              | -      | -      | - | - |

| Approach             | WB  | NB |
|----------------------|-----|----|
| HCM Control Delay, s | 9.7 | 0  |
| HCM LOS              | A   |    |

| Minor Lane/Major Mvmt | NBT | NBRWBLn1 |
|-----------------------|-----|----------|
| Capacity (veh/h)      | -   | - 810    |
| HCM Lane V/C Ratio    | -   | - 0.058  |
| HCM Control Delay (s) | -   | - 9.7    |
| HCM Lane LOS          | -   | - A      |
| HCM 95th %tile Q(veh) | -   | - 0.2    |

HCM 6th TWSC  
4: Senoia Rd & Handley Rd

Projected Conditions  
AM Peak Hour

| Intersection             |                                                                                   |          |        |                                                                                   |                                                                                   |       |
|--------------------------|-----------------------------------------------------------------------------------|----------|--------|-----------------------------------------------------------------------------------|-----------------------------------------------------------------------------------|-------|
| Int Delay, s/veh         | 4.3                                                                               |          |        |                                                                                   |                                                                                   |       |
| Movement                 | NBT                                                                               | NBR      | SBL    | SBT                                                                               | NWL                                                                               | NWR   |
| Lane Configurations      |  |          |        |  |  |       |
| Traffic Vol, veh/h       | 50                                                                                | 13       | 43     | 30                                                                                | 12                                                                                | 42    |
| Future Vol, veh/h        | 50                                                                                | 13       | 43     | 30                                                                                | 12                                                                                | 42    |
| Conflicting Peds, #/hr   | 0                                                                                 | 0        | 0      | 0                                                                                 | 0                                                                                 | 0     |
| Sign Control             | Free                                                                              | Free     | Free   | Free                                                                              | Stop                                                                              | Stop  |
| RT Channelized           | -                                                                                 | None     | -      | None                                                                              | -                                                                                 | None  |
| Storage Length           | -                                                                                 | -        | -      | -                                                                                 | 0                                                                                 | -     |
| Veh in Median Storage, # | 0                                                                                 | -        | -      | 0                                                                                 | 0                                                                                 | -     |
| Grade, %                 | 0                                                                                 | -        | -      | 0                                                                                 | 0                                                                                 | -     |
| Peak Hour Factor         | 83                                                                                | 83       | 83     | 83                                                                                | 83                                                                                | 83    |
| Heavy Vehicles, %        | 0                                                                                 | 0        | 0      | 0                                                                                 | 0                                                                                 | 2     |
| Mvmt Flow                | 60                                                                                | 16       | 52     | 36                                                                                | 14                                                                                | 51    |
| Major/Minor              | Major1                                                                            | Major2   | Minor1 |                                                                                   |                                                                                   |       |
| Conflicting Flow All     | 0                                                                                 | 0        | 76     | 0                                                                                 | 208                                                                               | 68    |
| Stage 1                  | -                                                                                 | -        | -      | -                                                                                 | 68                                                                                | -     |
| Stage 2                  | -                                                                                 | -        | -      | -                                                                                 | 140                                                                               | -     |
| Critical Hdwy            | -                                                                                 | -        | 4.1    | -                                                                                 | 6.4                                                                               | 6.22  |
| Critical Hdwy Stg 1      | -                                                                                 | -        | -      | -                                                                                 | 5.4                                                                               | -     |
| Critical Hdwy Stg 2      | -                                                                                 | -        | -      | -                                                                                 | 5.4                                                                               | -     |
| Follow-up Hdwy           | -                                                                                 | -        | 2.2    | -                                                                                 | 3.5                                                                               | 3.318 |
| Pot Cap-1 Maneuver       | -                                                                                 | -        | 1536   | -                                                                                 | 785                                                                               | 995   |
| Stage 1                  | -                                                                                 | -        | -      | -                                                                                 | 960                                                                               | -     |
| Stage 2                  | -                                                                                 | -        | -      | -                                                                                 | 892                                                                               | -     |
| Platoon blocked, %       | -                                                                                 | -        | -      | -                                                                                 | -                                                                                 | -     |
| Mov Cap-1 Maneuver       | -                                                                                 | -        | 1536   | -                                                                                 | 758                                                                               | 995   |
| Mov Cap-2 Maneuver       | -                                                                                 | -        | -      | -                                                                                 | 758                                                                               | -     |
| Stage 1                  | -                                                                                 | -        | -      | -                                                                                 | 960                                                                               | -     |
| Stage 2                  | -                                                                                 | -        | -      | -                                                                                 | 861                                                                               | -     |
| Approach                 | NB                                                                                |          | SB     |                                                                                   | NW                                                                                |       |
| HCM Control Delay, s     | 0                                                                                 |          | 4.4    |                                                                                   | 9.2                                                                               |       |
| HCM LOS                  |                                                                                   |          |        |                                                                                   | A                                                                                 |       |
| Minor Lane/Major Mvmt    | NBT                                                                               | NBRNWLn1 | SBL    | SBT                                                                               |                                                                                   |       |
| Capacity (veh/h)         | -                                                                                 | -        | 930    | 1536                                                                              | -                                                                                 |       |
| HCM Lane V/C Ratio       | -                                                                                 | -        | 0.07   | 0.034                                                                             | -                                                                                 |       |
| HCM Control Delay (s)    | -                                                                                 | -        | 9.2    | 7.4                                                                               | 0                                                                                 |       |
| HCM Lane LOS             | -                                                                                 | -        | A      | A                                                                                 | A                                                                                 |       |
| HCM 95th %tile Q(veh)    | -                                                                                 | -        | 0.2    | 0.1                                                                               | -                                                                                 |       |

HCM 6th TWSC  
5: Senoia Rd & New DW 1

Projected Conditions  
AM Peak Hour

| Intersection             |        |                                                                                   |                                                                                   |        |                                                                                   |       |
|--------------------------|--------|-----------------------------------------------------------------------------------|-----------------------------------------------------------------------------------|--------|-----------------------------------------------------------------------------------|-------|
| Int Delay, s/veh         | 0.8    |                                                                                   |                                                                                   |        |                                                                                   |       |
| Movement                 | EBL    | EBT                                                                               | WBT                                                                               | WBR    | SBL                                                                               | SBR   |
| Lane Configurations      |        |  |  |        |  |       |
| Traffic Vol, veh/h       | 18     | 115                                                                               | 69                                                                                | 0      | 0                                                                                 | 3     |
| Future Vol, veh/h        | 18     | 115                                                                               | 69                                                                                | 0      | 0                                                                                 | 3     |
| Conflicting Peds, #/hr   | 0      | 0                                                                                 | 0                                                                                 | 0      | 0                                                                                 | 0     |
| Sign Control             | Free   | Free                                                                              | Free                                                                              | Free   | Stop                                                                              | Stop  |
| RT Channelized           | -      | None                                                                              | -                                                                                 | None   | -                                                                                 | None  |
| Storage Length           | -      | -                                                                                 | -                                                                                 | -      | 0                                                                                 | -     |
| Veh in Median Storage, # | -      | 0                                                                                 | 0                                                                                 | -      | 0                                                                                 | -     |
| Grade, %                 | -      | 0                                                                                 | 0                                                                                 | -      | 0                                                                                 | -     |
| Peak Hour Factor         | 92     | 92                                                                                | 92                                                                                | 92     | 92                                                                                | 92    |
| Heavy Vehicles, %        | 0      | 3                                                                                 | 6                                                                                 | 0      | 2                                                                                 | 2     |
| Mvmt Flow                | 20     | 125                                                                               | 75                                                                                | 0      | 0                                                                                 | 3     |
|                          |        |                                                                                   |                                                                                   |        |                                                                                   |       |
| Major/Minor              | Major1 | Major2                                                                            |                                                                                   | Minor2 |                                                                                   |       |
| Conflicting Flow All     | 75     | 0                                                                                 | -                                                                                 | 0      | 240                                                                               | 75    |
| Stage 1                  | -      | -                                                                                 | -                                                                                 | -      | 75                                                                                | -     |
| Stage 2                  | -      | -                                                                                 | -                                                                                 | -      | 165                                                                               | -     |
| Critical Hdwy            | 4.1    | -                                                                                 | -                                                                                 | -      | 6.42                                                                              | 6.22  |
| Critical Hdwy Stg 1      | -      | -                                                                                 | -                                                                                 | -      | 5.42                                                                              | -     |
| Critical Hdwy Stg 2      | -      | -                                                                                 | -                                                                                 | -      | 5.42                                                                              | -     |
| Follow-up Hdwy           | 2.2    | -                                                                                 | -                                                                                 | -      | 3.518                                                                             | 3.318 |
| Pot Cap-1 Maneuver       | 1537   | -                                                                                 | -                                                                                 | -      | 748                                                                               | 986   |
| Stage 1                  | -      | -                                                                                 | -                                                                                 | -      | 948                                                                               | -     |
| Stage 2                  | -      | -                                                                                 | -                                                                                 | -      | 864                                                                               | -     |
| Platoon blocked, %       |        | -                                                                                 | -                                                                                 | -      |                                                                                   |       |
| Mov Cap-1 Maneuver       | 1537   | -                                                                                 | -                                                                                 | -      | 738                                                                               | 986   |
| Mov Cap-2 Maneuver       | -      | -                                                                                 | -                                                                                 | -      | 738                                                                               | -     |
| Stage 1                  | -      | -                                                                                 | -                                                                                 | -      | 935                                                                               | -     |
| Stage 2                  | -      | -                                                                                 | -                                                                                 | -      | 864                                                                               | -     |
|                          |        |                                                                                   |                                                                                   |        |                                                                                   |       |
|                          |        |                                                                                   |                                                                                   |        |                                                                                   |       |
| Approach                 | EB     | WB                                                                                |                                                                                   | SB     |                                                                                   |       |
| HCM Control Delay, s     | 1      | 0                                                                                 |                                                                                   | 8.7    |                                                                                   |       |
| HCM LOS                  | A      |                                                                                   |                                                                                   |        |                                                                                   |       |
|                          |        |                                                                                   |                                                                                   |        |                                                                                   |       |
|                          |        |                                                                                   |                                                                                   |        |                                                                                   |       |
| Minor Lane/Major Mvmt    | EBL    | EBT                                                                               | WBT                                                                               | WBR    | SBLn1                                                                             |       |
| Capacity (veh/h)         | 1537   | -                                                                                 | -                                                                                 | -      | 986                                                                               |       |
| HCM Lane V/C Ratio       | 0.013  | -                                                                                 | -                                                                                 | -      | 0.003                                                                             |       |
| HCM Control Delay (s)    | 7.4    | 0                                                                                 | -                                                                                 | -      | 8.7                                                                               |       |
| HCM Lane LOS             | A      | A                                                                                 | -                                                                                 | -      | A                                                                                 |       |
| HCM 95th %tile Q(veh)    | 0      | -                                                                                 | -                                                                                 | -      | 0                                                                                 |       |

HCM 6th TWSC  
14: Senoia Rd & New DW 2

Projected Conditions  
AM Peak Hour

| Intersection             |        |                                                                                   |                                                                                   |        |                                                                                   |       |
|--------------------------|--------|-----------------------------------------------------------------------------------|-----------------------------------------------------------------------------------|--------|-----------------------------------------------------------------------------------|-------|
| Int Delay, s/veh         | 0.9    |                                                                                   |                                                                                   |        |                                                                                   |       |
| Movement                 | EBL    | EBT                                                                               | WBT                                                                               | WBR    | SBL                                                                               | SBR   |
| Lane Configurations      |        |  |  |        |  |       |
| Traffic Vol, veh/h       | 18     | 97                                                                                | 66                                                                                | 0      | 0                                                                                 | 3     |
| Future Vol, veh/h        | 18     | 97                                                                                | 66                                                                                | 0      | 0                                                                                 | 3     |
| Conflicting Peds, #/hr   | 0      | 0                                                                                 | 0                                                                                 | 0      | 0                                                                                 | 0     |
| Sign Control             | Free   | Free                                                                              | Free                                                                              | Free   | Stop                                                                              | Stop  |
| RT Channelized           | -      | None                                                                              | -                                                                                 | None   | -                                                                                 | None  |
| Storage Length           | -      | -                                                                                 | -                                                                                 | -      | 0                                                                                 | -     |
| Veh in Median Storage, # | -      | 0                                                                                 | 0                                                                                 | -      | 0                                                                                 | -     |
| Grade, %                 | -      | 0                                                                                 | 0                                                                                 | -      | 0                                                                                 | -     |
| Peak Hour Factor         | 92     | 92                                                                                | 92                                                                                | 92     | 92                                                                                | 92    |
| Heavy Vehicles, %        | 0      | 3                                                                                 | 6                                                                                 | 0      | 2                                                                                 | 2     |
| Mvmt Flow                | 20     | 105                                                                               | 72                                                                                | 0      | 0                                                                                 | 3     |
|                          |        |                                                                                   |                                                                                   |        |                                                                                   |       |
| Major/Minor              | Major1 | Major2                                                                            |                                                                                   | Minor2 |                                                                                   |       |
| Conflicting Flow All     | 72     | 0                                                                                 | -                                                                                 | 0      | 217                                                                               | 72    |
| Stage 1                  | -      | -                                                                                 | -                                                                                 | -      | 72                                                                                | -     |
| Stage 2                  | -      | -                                                                                 | -                                                                                 | -      | 145                                                                               | -     |
| Critical Hdwy            | 4.1    | -                                                                                 | -                                                                                 | -      | 6.42                                                                              | 6.22  |
| Critical Hdwy Stg 1      | -      | -                                                                                 | -                                                                                 | -      | 5.42                                                                              | -     |
| Critical Hdwy Stg 2      | -      | -                                                                                 | -                                                                                 | -      | 5.42                                                                              | -     |
| Follow-up Hdwy           | 2.2    | -                                                                                 | -                                                                                 | -      | 3.518                                                                             | 3.318 |
| Pot Cap-1 Maneuver       | 1541   | -                                                                                 | -                                                                                 | -      | 771                                                                               | 990   |
| Stage 1                  | -      | -                                                                                 | -                                                                                 | -      | 951                                                                               | -     |
| Stage 2                  | -      | -                                                                                 | -                                                                                 | -      | 882                                                                               | -     |
| Platoon blocked, %       |        | -                                                                                 | -                                                                                 | -      |                                                                                   |       |
| Mov Cap-1 Maneuver       | 1541   | -                                                                                 | -                                                                                 | -      | 760                                                                               | 990   |
| Mov Cap-2 Maneuver       | -      | -                                                                                 | -                                                                                 | -      | 760                                                                               | -     |
| Stage 1                  | -      | -                                                                                 | -                                                                                 | -      | 938                                                                               | -     |
| Stage 2                  | -      | -                                                                                 | -                                                                                 | -      | 882                                                                               | -     |
|                          |        |                                                                                   |                                                                                   |        |                                                                                   |       |
|                          |        |                                                                                   |                                                                                   |        |                                                                                   |       |
| Approach                 | EB     | WB                                                                                |                                                                                   | SB     |                                                                                   |       |
| HCM Control Delay, s     | 1.2    | 0                                                                                 |                                                                                   | 8.6    |                                                                                   |       |
| HCM LOS                  | A      |                                                                                   |                                                                                   |        |                                                                                   |       |
|                          |        |                                                                                   |                                                                                   |        |                                                                                   |       |
|                          |        |                                                                                   |                                                                                   |        |                                                                                   |       |
| Minor Lane/Major Mvmt    | EBL    | EBT                                                                               | WBT                                                                               | WBR    | SBLn1                                                                             |       |
| Capacity (veh/h)         | 1541   | -                                                                                 | -                                                                                 | -      | 990                                                                               |       |
| HCM Lane V/C Ratio       | 0.013  | -                                                                                 | -                                                                                 | -      | 0.003                                                                             |       |
| HCM Control Delay (s)    | 7.4    | 0                                                                                 | -                                                                                 | -      | 8.6                                                                               |       |
| HCM Lane LOS             | A      | A                                                                                 | -                                                                                 | -      | A                                                                                 |       |
| HCM 95th %tile Q(veh)    | 0      | -                                                                                 | -                                                                                 | -      | 0                                                                                 |       |

HCM 6th TWSC  
16: Senoia Rd & New DW 3

Projected Conditions  
AM Peak Hour

Intersection

Int Delay, s/veh 1

| Movement                 | EBL  | EBT                                                                               | WBT                                                                               | WBR  | SBL                                                                               | SBR  |
|--------------------------|------|-----------------------------------------------------------------------------------|-----------------------------------------------------------------------------------|------|-----------------------------------------------------------------------------------|------|
| Lane Configurations      |      |  |  |      |  |      |
| Traffic Vol, veh/h       | 18   | 79                                                                                | 63                                                                                | 0    | 0                                                                                 | 3    |
| Future Vol, veh/h        | 18   | 79                                                                                | 63                                                                                | 0    | 0                                                                                 | 3    |
| Conflicting Peds, #/hr   | 0    | 0                                                                                 | 0                                                                                 | 0    | 0                                                                                 | 0    |
| Sign Control             | Free | Free                                                                              | Free                                                                              | Free | Stop                                                                              | Stop |
| RT Channelized           | -    | None                                                                              | -                                                                                 | None | -                                                                                 | None |
| Storage Length           | -    | -                                                                                 | -                                                                                 | -    | 0                                                                                 | -    |
| Veh in Median Storage, # | -    | 0                                                                                 | 0                                                                                 | -    | 0                                                                                 | -    |
| Grade, %                 | -    | 0                                                                                 | 0                                                                                 | -    | 0                                                                                 | -    |
| Peak Hour Factor         | 92   | 92                                                                                | 92                                                                                | 92   | 92                                                                                | 92   |
| Heavy Vehicles, %        | 0    | 3                                                                                 | 6                                                                                 | 0    | 2                                                                                 | 2    |
| Mvmt Flow                | 20   | 86                                                                                | 68                                                                                | 0    | 0                                                                                 | 3    |

| Major/Minor          | Major1 | Major2 | Minor2        |
|----------------------|--------|--------|---------------|
| Conflicting Flow All | 68     | 0      | 0 194 68      |
| Stage 1              | -      | -      | - 68 -        |
| Stage 2              | -      | -      | - 126 -       |
| Critical Hdwy        | 4.1    | -      | - 6.42 6.22   |
| Critical Hdwy Stg 1  | -      | -      | - 5.42 -      |
| Critical Hdwy Stg 2  | -      | -      | - 5.42 -      |
| Follow-up Hdwy       | 2.2    | -      | - 3.518 3.318 |
| Pot Cap-1 Maneuver   | 1546   | -      | - 795 995     |
| Stage 1              | -      | -      | - 955 -       |
| Stage 2              | -      | -      | - 900 -       |
| Platoon blocked, %   | -      | -      | -             |
| Mov Cap-1 Maneuver   | 1546   | -      | - 784 995     |
| Mov Cap-2 Maneuver   | -      | -      | - 784 -       |
| Stage 1              | -      | -      | - 942 -       |
| Stage 2              | -      | -      | - 900 -       |

| Approach             | EB  | WB | SB  |
|----------------------|-----|----|-----|
| HCM Control Delay, s | 1.4 | 0  | 8.6 |
| HCM LOS              |     |    | A   |

| Minor Lane/Major Mvmt | EBL   | EBT | WBT | WBR | SBLn1 |
|-----------------------|-------|-----|-----|-----|-------|
| Capacity (veh/h)      | 1546  | -   | -   | -   | 995   |
| HCM Lane V/C Ratio    | 0.013 | -   | -   | -   | 0.003 |
| HCM Control Delay (s) | 7.4   | 0   | -   | -   | 8.6   |
| HCM Lane LOS          | A     | A   | -   | -   | A     |
| HCM 95th %tile Q(veh) | 0     | -   | -   | -   | 0     |

# Lanes, Volumes, Timings

## 1: SR 74 (Joel Cowan Pkwy) & Carriage Oaks Dr

# Projected Conditions

PM Peak Hour

|                            |  |  |  |  |  |  |  |  |  |  |  |  |
|----------------------------|-----------------------------------------------------------------------------------|-----------------------------------------------------------------------------------|-----------------------------------------------------------------------------------|-----------------------------------------------------------------------------------|-----------------------------------------------------------------------------------|-----------------------------------------------------------------------------------|-------------------------------------------------------------------------------------|-------------------------------------------------------------------------------------|-------------------------------------------------------------------------------------|-------------------------------------------------------------------------------------|-------------------------------------------------------------------------------------|-------------------------------------------------------------------------------------|
| Lane Group                 | EBL                                                                               | EBT                                                                               | EBR                                                                               | WBL                                                                               | WBT                                                                               | WBR                                                                               | NBL                                                                                 | NBT                                                                                 | NBR                                                                                 | SBL                                                                                 | SBT                                                                                 | SBR                                                                                 |
| Lane Configurations        |  |  |  |  |  |                                                                                   |   |  |  |  |  |  |
| Traffic Volume (vph)       | 180                                                                               | 38                                                                                | 47                                                                                | 108                                                                               | 49                                                                                | 123                                                                               | 132                                                                                 | 1083                                                                                | 102                                                                                 | 121                                                                                 | 1165                                                                                | 135                                                                                 |
| Future Volume (vph)        | 180                                                                               | 38                                                                                | 47                                                                                | 108                                                                               | 49                                                                                | 123                                                                               | 132                                                                                 | 1083                                                                                | 102                                                                                 | 121                                                                                 | 1165                                                                                | 135                                                                                 |
| Ideal Flow (vphpl)         | 1900                                                                              | 1900                                                                              | 1900                                                                              | 1900                                                                              | 1900                                                                              | 1900                                                                              | 1900                                                                                | 1900                                                                                | 1900                                                                                | 1900                                                                                | 1900                                                                                | 1900                                                                                |
| Storage Length (ft)        | 130                                                                               |                                                                                   | 0                                                                                 | 60                                                                                |                                                                                   | 0                                                                                 | 240                                                                                 |                                                                                     | 315                                                                                 | 285                                                                                 |                                                                                     | 185                                                                                 |
| Storage Lanes              | 1                                                                                 |                                                                                   | 1                                                                                 | 1                                                                                 |                                                                                   | 0                                                                                 | 1                                                                                   |                                                                                     | 1                                                                                   | 1                                                                                   |                                                                                     | 1                                                                                   |
| Taper Length (ft)          | 50                                                                                |                                                                                   |                                                                                   | 25                                                                                |                                                                                   |                                                                                   | 75                                                                                  |                                                                                     |                                                                                     | 75                                                                                  |                                                                                     |                                                                                     |
| Satd. Flow (prot)          | 1805                                                                              | 1900                                                                              | 1615                                                                              | 1805                                                                              | 1697                                                                              | 0                                                                                 | 1805                                                                                | 3539                                                                                | 1599                                                                                | 1805                                                                                | 3574                                                                                | 1615                                                                                |
| Flt Permitted              | 0.633                                                                             |                                                                                   |                                                                                   | 0.732                                                                             |                                                                                   |                                                                                   | 0.122                                                                               |                                                                                     |                                                                                     | 0.139                                                                               |                                                                                     |                                                                                     |
| Satd. Flow (perm)          | 1203                                                                              | 1900                                                                              | 1615                                                                              | 1391                                                                              | 1697                                                                              | 0                                                                                 | 232                                                                                 | 3539                                                                                | 1599                                                                                | 264                                                                                 | 3574                                                                                | 1615                                                                                |
| Right Turn on Red          |                                                                                   |                                                                                   | Yes                                                                               |                                                                                   |                                                                                   | Yes                                                                               |                                                                                     |                                                                                     | Yes                                                                                 |                                                                                     |                                                                                     | Yes                                                                                 |
| Satd. Flow (RTOR)          |                                                                                   |                                                                                   | 82                                                                                |                                                                                   | 105                                                                               |                                                                                   |                                                                                     |                                                                                     | 104                                                                                 |                                                                                     |                                                                                     | 106                                                                                 |
| Link Speed (mph)           |                                                                                   | 35                                                                                |                                                                                   |                                                                                   | 35                                                                                |                                                                                   |                                                                                     | 55                                                                                  |                                                                                     |                                                                                     | 55                                                                                  |                                                                                     |
| Link Distance (ft)         |                                                                                   | 621                                                                               |                                                                                   |                                                                                   | 1631                                                                              |                                                                                   |                                                                                     | 525                                                                                 |                                                                                     |                                                                                     | 529                                                                                 |                                                                                     |
| Travel Time (s)            |                                                                                   | 12.1                                                                              |                                                                                   |                                                                                   | 31.8                                                                              |                                                                                   |                                                                                     | 6.5                                                                                 |                                                                                     |                                                                                     | 6.6                                                                                 |                                                                                     |
| Peak Hour Factor           | 0.98                                                                              | 0.98                                                                              | 0.98                                                                              | 0.98                                                                              | 0.98                                                                              | 0.98                                                                              | 0.98                                                                                | 0.98                                                                                | 0.98                                                                                | 0.98                                                                                | 0.98                                                                                | 0.98                                                                                |
| Heavy Vehicles (%)         | 0%                                                                                | 0%                                                                                | 0%                                                                                | 0%                                                                                | 0%                                                                                | 0%                                                                                | 0%                                                                                  | 2%                                                                                  | 1%                                                                                  | 0%                                                                                  | 1%                                                                                  | 0%                                                                                  |
| Shared Lane Traffic (%)    |                                                                                   |                                                                                   |                                                                                   |                                                                                   |                                                                                   |                                                                                   |                                                                                     |                                                                                     |                                                                                     |                                                                                     |                                                                                     |                                                                                     |
| Lane Group Flow (vph)      | 184                                                                               | 39                                                                                | 48                                                                                | 110                                                                               | 176                                                                               | 0                                                                                 | 135                                                                                 | 1105                                                                                | 104                                                                                 | 123                                                                                 | 1189                                                                                | 138                                                                                 |
| Enter Blocked Intersection | No                                                                                | No                                                                                | No                                                                                | No                                                                                | No                                                                                | No                                                                                | No                                                                                  | No                                                                                  | No                                                                                  | No                                                                                  | No                                                                                  | No                                                                                  |
| Lane Alignment             | Left                                                                              | Left                                                                              | Right                                                                             | Left                                                                              | Left                                                                              | Right                                                                             | Left                                                                                | Left                                                                                | Right                                                                               | Left                                                                                | Left                                                                                | Right                                                                               |
| Median Width(ft)           |                                                                                   | 12                                                                                |                                                                                   |                                                                                   | 12                                                                                |                                                                                   |                                                                                     | 12                                                                                  |                                                                                     |                                                                                     | 12                                                                                  |                                                                                     |
| Link Offset(ft)            |                                                                                   | 0                                                                                 |                                                                                   |                                                                                   | 0                                                                                 |                                                                                   |                                                                                     | 0                                                                                   |                                                                                     |                                                                                     | 0                                                                                   |                                                                                     |
| Crosswalk Width(ft)        |                                                                                   | 16                                                                                |                                                                                   |                                                                                   | 16                                                                                |                                                                                   |                                                                                     | 16                                                                                  |                                                                                     |                                                                                     | 16                                                                                  |                                                                                     |
| Two way Left Turn Lane     |                                                                                   |                                                                                   |                                                                                   |                                                                                   |                                                                                   |                                                                                   |                                                                                     |                                                                                     |                                                                                     |                                                                                     |                                                                                     |                                                                                     |
| Headway Factor             | 1.00                                                                              | 1.00                                                                              | 1.00                                                                              | 1.00                                                                              | 1.00                                                                              | 1.00                                                                              | 1.00                                                                                | 1.00                                                                                | 1.00                                                                                | 1.00                                                                                | 1.00                                                                                | 1.00                                                                                |
| Turning Speed (mph)        | 15                                                                                |                                                                                   | 9                                                                                 | 15                                                                                |                                                                                   | 9                                                                                 | 15                                                                                  |                                                                                     | 9                                                                                   | 15                                                                                  |                                                                                     | 9                                                                                   |
| Turn Type                  | Perm                                                                              | NA                                                                                | Perm                                                                              | Perm                                                                              | NA                                                                                |                                                                                   | pm+pt                                                                               | NA                                                                                  | Perm                                                                                | pm+pt                                                                               | NA                                                                                  | Perm                                                                                |
| Protected Phases           |                                                                                   | 4                                                                                 |                                                                                   |                                                                                   | 8                                                                                 |                                                                                   | 5                                                                                   | 2                                                                                   |                                                                                     | 1                                                                                   | 6                                                                                   |                                                                                     |
| Permitted Phases           | 4                                                                                 |                                                                                   | 4                                                                                 | 8                                                                                 |                                                                                   |                                                                                   | 2                                                                                   |                                                                                     | 2                                                                                   | 6                                                                                   |                                                                                     | 6                                                                                   |
| Total Split (s)            | 40.0                                                                              | 40.0                                                                              | 40.0                                                                              | 40.0                                                                              | 40.0                                                                              |                                                                                   | 17.0                                                                                | 65.0                                                                                | 65.0                                                                                | 15.0                                                                                | 63.0                                                                                | 63.0                                                                                |
| Total Lost Time (s)        | 6.0                                                                               | 6.0                                                                               | 6.0                                                                               | 6.0                                                                               | 6.0                                                                               |                                                                                   | 6.0                                                                                 | 6.0                                                                                 | 6.0                                                                                 | 6.0                                                                                 | 6.0                                                                                 | 6.0                                                                                 |
| Act Effect Green (s)       | 19.4                                                                              | 19.4                                                                              | 19.4                                                                              | 19.4                                                                              | 19.4                                                                              |                                                                                   | 42.1                                                                                | 32.9                                                                                | 32.9                                                                                | 39.8                                                                                | 31.7                                                                                | 31.7                                                                                |
| Actuated g/C Ratio         | 0.24                                                                              | 0.24                                                                              | 0.24                                                                              | 0.24                                                                              | 0.24                                                                              |                                                                                   | 0.53                                                                                | 0.41                                                                                | 0.41                                                                                | 0.50                                                                                | 0.40                                                                                | 0.40                                                                                |
| v/c Ratio                  | 0.63                                                                              | 0.08                                                                              | 0.11                                                                              | 0.32                                                                              | 0.36                                                                              |                                                                                   | 0.44                                                                                | 0.76                                                                                | 0.14                                                                                | 0.43                                                                                | 0.83                                                                                | 0.20                                                                                |
| Control Delay              | 39.4                                                                              | 26.3                                                                              | 2.4                                                                               | 30.0                                                                              | 14.4                                                                              |                                                                                   | 13.5                                                                                | 23.9                                                                                | 4.0                                                                                 | 13.5                                                                                | 27.9                                                                                | 6.4                                                                                 |
| Queue Delay                | 0.0                                                                               | 0.0                                                                               | 0.0                                                                               | 0.0                                                                               | 0.0                                                                               |                                                                                   | 0.0                                                                                 | 0.0                                                                                 | 0.0                                                                                 | 0.0                                                                                 | 0.0                                                                                 | 0.0                                                                                 |
| Total Delay                | 39.4                                                                              | 26.3                                                                              | 2.4                                                                               | 30.0                                                                              | 14.4                                                                              |                                                                                   | 13.5                                                                                | 23.9                                                                                | 4.0                                                                                 | 13.5                                                                                | 27.9                                                                                | 6.4                                                                                 |
| LOS                        | D                                                                                 | C                                                                                 | A                                                                                 | C                                                                                 | B                                                                                 |                                                                                   | B                                                                                   | C                                                                                   | A                                                                                   | B                                                                                   | C                                                                                   | A                                                                                   |
| Approach Delay             |                                                                                   | 31.0                                                                              |                                                                                   |                                                                                   | 20.4                                                                              |                                                                                   |                                                                                     | 21.3                                                                                |                                                                                     |                                                                                     | 24.6                                                                                |                                                                                     |
| Approach LOS               |                                                                                   | C                                                                                 |                                                                                   |                                                                                   | C                                                                                 |                                                                                   |                                                                                     | C                                                                                   |                                                                                     |                                                                                     | C                                                                                   |                                                                                     |
| Queue Length 50th (ft)     | 78                                                                                | 14                                                                                | 0                                                                                 | 43                                                                                | 27                                                                                |                                                                                   | 25                                                                                  | 227                                                                                 | 0                                                                                   | 23                                                                                  | 259                                                                                 | 9                                                                                   |
| Queue Length 95th (ft)     | 185                                                                               | 46                                                                                | 10                                                                                | 110                                                                               | 94                                                                                |                                                                                   | 69                                                                                  | 392                                                                                 | 29                                                                                  | 62                                                                                  | 448                                                                                 | 49                                                                                  |
| Internal Link Dist (ft)    |                                                                                   | 541                                                                               |                                                                                   |                                                                                   | 1551                                                                              |                                                                                   |                                                                                     | 445                                                                                 |                                                                                     |                                                                                     | 449                                                                                 |                                                                                     |
| Turn Bay Length (ft)       | 130                                                                               |                                                                                   |                                                                                   | 60                                                                                |                                                                                   |                                                                                   | 240                                                                                 |                                                                                     | 315                                                                                 | 285                                                                                 |                                                                                     | 185                                                                                 |
| Base Capacity (vph)        | 549                                                                               | 867                                                                               | 782                                                                               | 635                                                                               | 832                                                                               |                                                                                   | 362                                                                                 | 2720                                                                                | 1253                                                                                | 323                                                                                 | 2678                                                                                | 1236                                                                                |
| Starvation Cap Reductn     | 0                                                                                 | 0                                                                                 | 0                                                                                 | 0                                                                                 | 0                                                                                 |                                                                                   | 0                                                                                   | 0                                                                                   | 0                                                                                   | 0                                                                                   | 0                                                                                   | 0                                                                                   |
| Spillback Cap Reductn      | 0                                                                                 | 0                                                                                 | 0                                                                                 | 0                                                                                 | 0                                                                                 |                                                                                   | 0                                                                                   | 0                                                                                   | 0                                                                                   | 0                                                                                   | 0                                                                                   | 0                                                                                   |
| Storage Cap Reductn        | 0                                                                                 | 0                                                                                 | 0                                                                                 | 0                                                                                 | 0                                                                                 |                                                                                   | 0                                                                                   | 0                                                                                   | 0                                                                                   | 0                                                                                   | 0                                                                                   | 0                                                                                   |

M&W

Synchro 10 Report

# Lanes, Volumes, Timings

## 1: SR 74 (Joel Cowan Pkwy) & Carriage Oaks Dr

# Projected Conditions

PM Peak Hour

|                   |  |  |  |  |  |  |  |  |  |  |  |  |
|-------------------|-----------------------------------------------------------------------------------|-----------------------------------------------------------------------------------|-----------------------------------------------------------------------------------|-----------------------------------------------------------------------------------|-----------------------------------------------------------------------------------|-----------------------------------------------------------------------------------|------------------------------------------------------------------------------------|-------------------------------------------------------------------------------------|-------------------------------------------------------------------------------------|-------------------------------------------------------------------------------------|-------------------------------------------------------------------------------------|-------------------------------------------------------------------------------------|
| Lane Group        | EBL                                                                               | EBT                                                                               | EBR                                                                               | WBL                                                                               | WBT                                                                               | WBR                                                                               | NBL                                                                                | NBT                                                                                 | NBR                                                                                 | SBL                                                                                 | SBT                                                                                 | SBR                                                                                 |
| Reduced v/c Ratio | 0.34                                                                              | 0.04                                                                              | 0.06                                                                              | 0.17                                                                              | 0.21                                                                              |                                                                                   | 0.37                                                                               | 0.41                                                                                | 0.08                                                                                | 0.38                                                                                | 0.44                                                                                | 0.11                                                                                |

## Intersection Summary

Area Type: Other

Cycle Length: 120

Actuated Cycle Length: 79.6

Control Type: Actuated-Uncoordinated

Maximum v/c Ratio: 0.83

Intersection Signal Delay: 23.5

Intersection LOS: C

Intersection Capacity Utilization 79.6%

ICU Level of Service D

Analysis Period (min) 15

## Splits and Phases: 1: SR 74 (Joel Cowan Pkwy) & Carriage Oaks Dr

|                                                                                      |                                                                                      |                                                                                        |
|--------------------------------------------------------------------------------------|--------------------------------------------------------------------------------------|----------------------------------------------------------------------------------------|
|  Ø1 |  Ø2 |  Ø4 |
| 15 s                                                                                 | 65 s                                                                                 | 40 s                                                                                   |
|  Ø5 |  Ø6 |  Ø8 |
| 17 s                                                                                 | 63 s                                                                                 | 40 s                                                                                   |

HCM 6th TWSC  
2: Senoia Rd & Carriage Oaks Dr

Projected Conditions  
PM Peak Hour

| Intersection             |                                                                                   |        |       |                                                                                   |                                                                                   |      |
|--------------------------|-----------------------------------------------------------------------------------|--------|-------|-----------------------------------------------------------------------------------|-----------------------------------------------------------------------------------|------|
| Int Delay, s/veh         | 5.3                                                                               |        |       |                                                                                   |                                                                                   |      |
| Movement                 | EBL                                                                               | EBR    | NBL   | NBT                                                                               | SBT                                                                               | SBR  |
| Lane Configurations      |  |        |       |  |  |      |
| Traffic Vol, veh/h       | 57                                                                                | 144    | 77    | 27                                                                                | 101                                                                               | 172  |
| Future Vol, veh/h        | 57                                                                                | 144    | 77    | 27                                                                                | 101                                                                               | 172  |
| 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         | 89                                                                                | 89     | 89    | 89                                                                                | 89                                                                                | 89   |
| Heavy Vehicles, %        | 0                                                                                 | 0      | 0     | 0                                                                                 | 0                                                                                 | 0    |
| Mvmt Flow                | 64                                                                                | 162    | 87    | 30                                                                                | 113                                                                               | 193  |
| Major/Minor              | Minor2                                                                            | Major1 |       | Major2                                                                            |                                                                                   |      |
| Conflicting Flow All     | 414                                                                               | 210    | 306   | 0                                                                                 | -                                                                                 | 0    |
| Stage 1                  | 210                                                                               | -      | -     | -                                                                                 | -                                                                                 | -    |
| Stage 2                  | 204                                                                               | -      | -     | -                                                                                 | -                                                                                 | -    |
| Critical Hdwy            | 6.4                                                                               | 6.2    | 4.1   | -                                                                                 | -                                                                                 | -    |
| Critical Hdwy Stg 1      | 5.4                                                                               | -      | -     | -                                                                                 | -                                                                                 | -    |
| Critical Hdwy Stg 2      | 5.4                                                                               | -      | -     | -                                                                                 | -                                                                                 | -    |
| Follow-up Hdwy           | 3.5                                                                               | 3.3    | 2.2   | -                                                                                 | -                                                                                 | -    |
| Pot Cap-1 Maneuver       | 599                                                                               | 835    | 1266  | -                                                                                 | -                                                                                 | -    |
| Stage 1                  | 830                                                                               | -      | -     | -                                                                                 | -                                                                                 | -    |
| Stage 2                  | 835                                                                               | -      | -     | -                                                                                 | -                                                                                 | -    |
| Platoon blocked, %       |                                                                                   |        |       | -                                                                                 | -                                                                                 | -    |
| Mov Cap-1 Maneuver       | 557                                                                               | 835    | 1266  | -                                                                                 | -                                                                                 | -    |
| Mov Cap-2 Maneuver       | 557                                                                               | -      | -     | -                                                                                 | -                                                                                 | -    |
| Stage 1                  | 772                                                                               | -      | -     | -                                                                                 | -                                                                                 | -    |
| Stage 2                  | 835                                                                               | -      | -     | -                                                                                 | -                                                                                 | -    |
| Approach                 | EB                                                                                | NB     |       | SB                                                                                |                                                                                   |      |
| HCM Control Delay, s     | 12.1                                                                              | 6      |       | 0                                                                                 |                                                                                   |      |
| HCM LOS                  | B                                                                                 |        |       |                                                                                   |                                                                                   |      |
| Minor Lane/Major Mvmt    | NBL                                                                               | NBT    | EBLn1 | SBT                                                                               | SBR                                                                               |      |
| Capacity (veh/h)         | 1266                                                                              | -      | 731   | -                                                                                 | -                                                                                 |      |
| HCM Lane V/C Ratio       | 0.068                                                                             | -      | 0.309 | -                                                                                 | -                                                                                 |      |
| HCM Control Delay (s)    | 8.1                                                                               | 0      | 12.1  | -                                                                                 | -                                                                                 |      |
| HCM Lane LOS             | A                                                                                 | A      | B     | -                                                                                 | -                                                                                 |      |
| HCM 95th %tile Q(veh)    | 0.2                                                                               | -      | 1.3   | -                                                                                 | -                                                                                 |      |

HCM 6th TWSC  
3: Senoia Rd & SR 74 NB Ramp

Projected Conditions  
PM Peak Hour

| Intersection             |                                                                                   |      |                                                                                   |                                                                                   |       |       |
|--------------------------|-----------------------------------------------------------------------------------|------|-----------------------------------------------------------------------------------|-----------------------------------------------------------------------------------|-------|-------|
| Int Delay, s/veh         | 4                                                                                 |      |                                                                                   |                                                                                   |       |       |
| Movement                 | WBL                                                                               | WBR  | NBT                                                                               | NBR                                                                               | SBL   | SBT   |
| Lane Configurations      |  |      |  |  |       |       |
| Traffic Vol, veh/h       | 141                                                                               | 15   | 143                                                                               | 107                                                                               | 0     | 0     |
| Future Vol, veh/h        | 141                                                                               | 15   | 143                                                                               | 107                                                                               | 0     | 0     |
| 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                                                                                 | -    | -                                                                                 | 225                                                                               | -     | -     |
| Veh in Median Storage, # | 0                                                                                 | -    | 0                                                                                 | -                                                                                 | -     | 16979 |
| Grade, %                 | 0                                                                                 | -    | 0                                                                                 | -                                                                                 | -     | 0     |
| Peak Hour Factor         | 88                                                                                | 88   | 88                                                                                | 88                                                                                | 88    | 88    |
| Heavy Vehicles, %        | 0                                                                                 | 0    | 1                                                                                 | 0                                                                                 | 0     | 0     |
| Mvmt Flow                | 160                                                                               | 17   | 163                                                                               | 122                                                                               | 0     | 0     |
| Major/Minor              | Minor1                                                                            |      | Major1                                                                            |                                                                                   |       |       |
| Conflicting Flow All     | 163                                                                               | 163  | 0                                                                                 | 0                                                                                 |       |       |
| Stage 1                  | 163                                                                               | -    | -                                                                                 | -                                                                                 |       |       |
| Stage 2                  | 0                                                                                 | -    | -                                                                                 | -                                                                                 |       |       |
| Critical Hdwy            | 6.4                                                                               | 6.2  | -                                                                                 | -                                                                                 |       |       |
| Critical Hdwy Stg 1      | 5.4                                                                               | -    | -                                                                                 | -                                                                                 |       |       |
| Critical Hdwy Stg 2      | -                                                                                 | -    | -                                                                                 | -                                                                                 |       |       |
| Follow-up Hdwy           | 3.5                                                                               | 3.3  | -                                                                                 | -                                                                                 |       |       |
| Pot Cap-1 Maneuver       | 832                                                                               | 887  | -                                                                                 | -                                                                                 |       |       |
| Stage 1                  | 871                                                                               | -    | -                                                                                 | -                                                                                 |       |       |
| Stage 2                  | -                                                                                 | -    | -                                                                                 | -                                                                                 |       |       |
| Platoon blocked, %       |                                                                                   |      | -                                                                                 | -                                                                                 |       |       |
| Mov Cap-1 Maneuver       | 832                                                                               | 887  | -                                                                                 | -                                                                                 |       |       |
| Mov Cap-2 Maneuver       | 832                                                                               | -    | -                                                                                 | -                                                                                 |       |       |
| Stage 1                  | 871                                                                               | -    | -                                                                                 | -                                                                                 |       |       |
| Stage 2                  | -                                                                                 | -    | -                                                                                 | -                                                                                 |       |       |
| Approach                 | WB                                                                                |      | NB                                                                                |                                                                                   |       |       |
| HCM Control Delay, s     | 10.5                                                                              |      | 0                                                                                 |                                                                                   |       |       |
| HCM LOS                  | B                                                                                 |      |                                                                                   |                                                                                   |       |       |
| Minor Lane/Major Mvmt    | NBT                                                                               |      | NBRWBLn1                                                                          |                                                                                   |       |       |
| Capacity (veh/h)         | -                                                                                 |      | -                                                                                 |                                                                                   | 837   |       |
| HCM Lane V/C Ratio       | -                                                                                 |      | -                                                                                 |                                                                                   | 0.212 |       |
| HCM Control Delay (s)    | -                                                                                 |      | -                                                                                 |                                                                                   | 10.5  |       |
| HCM Lane LOS             | -                                                                                 |      | -                                                                                 |                                                                                   | B     |       |
| HCM 95th %tile Q(veh)    | -                                                                                 |      | -                                                                                 |                                                                                   | 0.8   |       |

HCM 6th TWSC  
4: Senoia Rd & Handley Rd

Projected Conditions  
PM Peak Hour

| Intersection             |                                                                                   |          |        |                                                                                   |                                                                                   |      |
|--------------------------|-----------------------------------------------------------------------------------|----------|--------|-----------------------------------------------------------------------------------|-----------------------------------------------------------------------------------|------|
| Int Delay, s/veh         | 4.5                                                                               |          |        |                                                                                   |                                                                                   |      |
| Movement                 | NBT                                                                               | NBR      | SBL    | SBT                                                                               | NWL                                                                               | NWR  |
| Lane Configurations      |  |          |        |  |  |      |
| Traffic Vol, veh/h       | 96                                                                                | 7        | 57     | 118                                                                               | 38                                                                                | 93   |
| Future Vol, veh/h        | 96                                                                                | 7        | 57     | 118                                                                               | 38                                                                                | 93   |
| Conflicting Peds, #/hr   | 0                                                                                 | 0        | 0      | 0                                                                                 | 0                                                                                 | 0    |
| Sign Control             | Free                                                                              | Free     | Free   | Free                                                                              | Stop                                                                              | Stop |
| RT Channelized           | -                                                                                 | None     | -      | None                                                                              | -                                                                                 | None |
| Storage Length           | -                                                                                 | -        | -      | -                                                                                 | 0                                                                                 | -    |
| Veh in Median Storage, # | 0                                                                                 | -        | -      | 0                                                                                 | 0                                                                                 | -    |
| Grade, %                 | 0                                                                                 | -        | -      | 0                                                                                 | 0                                                                                 | -    |
| Peak Hour Factor         | 80                                                                                | 80       | 80     | 80                                                                                | 80                                                                                | 80   |
| Heavy Vehicles, %        | 0                                                                                 | 0        | 0      | 0                                                                                 | 0                                                                                 | 0    |
| Mvmt Flow                | 120                                                                               | 9        | 71     | 148                                                                               | 48                                                                                | 116  |
| Major/Minor              | Major1                                                                            | Major2   | Minor1 |                                                                                   |                                                                                   |      |
| Conflicting Flow All     | 0                                                                                 | 0        | 129    | 0                                                                                 | 415                                                                               | 125  |
| Stage 1                  | -                                                                                 | -        | -      | -                                                                                 | 125                                                                               | -    |
| Stage 2                  | -                                                                                 | -        | -      | -                                                                                 | 290                                                                               | -    |
| Critical Hdwy            | -                                                                                 | -        | 4.1    | -                                                                                 | 6.4                                                                               | 6.2  |
| Critical Hdwy Stg 1      | -                                                                                 | -        | -      | -                                                                                 | 5.4                                                                               | -    |
| Critical Hdwy Stg 2      | -                                                                                 | -        | -      | -                                                                                 | 5.4                                                                               | -    |
| Follow-up Hdwy           | -                                                                                 | -        | 2.2    | -                                                                                 | 3.5                                                                               | 3.3  |
| Pot Cap-1 Maneuver       | -                                                                                 | -        | 1469   | -                                                                                 | 598                                                                               | 931  |
| Stage 1                  | -                                                                                 | -        | -      | -                                                                                 | 906                                                                               | -    |
| Stage 2                  | -                                                                                 | -        | -      | -                                                                                 | 764                                                                               | -    |
| Platoon blocked, %       | -                                                                                 | -        | -      | -                                                                                 | -                                                                                 | -    |
| Mov Cap-1 Maneuver       | -                                                                                 | -        | 1469   | -                                                                                 | 566                                                                               | 931  |
| Mov Cap-2 Maneuver       | -                                                                                 | -        | -      | -                                                                                 | 566                                                                               | -    |
| Stage 1                  | -                                                                                 | -        | -      | -                                                                                 | 906                                                                               | -    |
| Stage 2                  | -                                                                                 | -        | -      | -                                                                                 | 724                                                                               | -    |
| Approach                 | NB                                                                                |          | SB     |                                                                                   | NW                                                                                |      |
| HCM Control Delay, s     | 0                                                                                 |          | 2.5    |                                                                                   | 10.8                                                                              |      |
| HCM LOS                  |                                                                                   |          |        |                                                                                   | B                                                                                 |      |
| Minor Lane/Major Mvmt    | NBT                                                                               | NBRNWLn1 | SBL    | SBT                                                                               |                                                                                   |      |
| Capacity (veh/h)         | -                                                                                 | -        | 784    | 1469                                                                              | -                                                                                 |      |
| HCM Lane V/C Ratio       | -                                                                                 | -        | 0.209  | 0.049                                                                             | -                                                                                 |      |
| HCM Control Delay (s)    | -                                                                                 | -        | 10.8   | 7.6                                                                               | 0                                                                                 |      |
| HCM Lane LOS             | -                                                                                 | -        | B      | A                                                                                 | A                                                                                 |      |
| HCM 95th %tile Q(veh)    | -                                                                                 | -        | 0.8    | 0.2                                                                               | -                                                                                 |      |

HCM 6th TWSC  
5: Senoia Rd & New DW 1

Projected Conditions  
PM Peak Hour

| Intersection             |        |                                                                                   |                                                                                   |        |                                                                                   |       |
|--------------------------|--------|-----------------------------------------------------------------------------------|-----------------------------------------------------------------------------------|--------|-----------------------------------------------------------------------------------|-------|
| Int Delay, s/veh         | 0.5    |                                                                                   |                                                                                   |        |                                                                                   |       |
| Movement                 | EBL    | EBT                                                                               | WBT                                                                               | WBR    | SBL                                                                               | SBR   |
| Lane Configurations      |        |  |  |        |  |       |
| Traffic Vol, veh/h       | 2      | 82                                                                                | 256                                                                               | 0      | 0                                                                                 | 17    |
| Future Vol, veh/h        | 2      | 82                                                                                | 256                                                                               | 0      | 0                                                                                 | 17    |
| Conflicting Peds, #/hr   | 0      | 0                                                                                 | 0                                                                                 | 0      | 0                                                                                 | 0     |
| Sign Control             | Free   | Free                                                                              | Free                                                                              | Free   | Stop                                                                              | Stop  |
| RT Channelized           | -      | None                                                                              | -                                                                                 | None   | -                                                                                 | None  |
| Storage Length           | -      | -                                                                                 | -                                                                                 | -      | 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                                                                                 | 2     |
| Mvmt Flow                | 2      | 92                                                                                | 288                                                                               | 0      | 0                                                                                 | 19    |
|                          |        |                                                                                   |                                                                                   |        |                                                                                   |       |
| Major/Minor              | Major1 | Major2                                                                            |                                                                                   | Minor2 |                                                                                   |       |
| Conflicting Flow All     | 288    | 0                                                                                 | -                                                                                 | 0      | 384                                                                               | 288   |
| Stage 1                  | -      | -                                                                                 | -                                                                                 | -      | 288                                                                               | -     |
| Stage 2                  | -      | -                                                                                 | -                                                                                 | -      | 96                                                                                | -     |
| 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       | 1274   | -                                                                                 | -                                                                                 | -      | 619                                                                               | 751   |
| Stage 1                  | -      | -                                                                                 | -                                                                                 | -      | 761                                                                               | -     |
| Stage 2                  | -      | -                                                                                 | -                                                                                 | -      | 928                                                                               | -     |
| Platoon blocked, %       |        | -                                                                                 | -                                                                                 | -      |                                                                                   |       |
| Mov Cap-1 Maneuver       | 1274   | -                                                                                 | -                                                                                 | -      | 618                                                                               | 751   |
| Mov Cap-2 Maneuver       | -      | -                                                                                 | -                                                                                 | -      | 618                                                                               | -     |
| Stage 1                  | -      | -                                                                                 | -                                                                                 | -      | 759                                                                               | -     |
| Stage 2                  | -      | -                                                                                 | -                                                                                 | -      | 928                                                                               | -     |
|                          |        |                                                                                   |                                                                                   |        |                                                                                   |       |
|                          |        |                                                                                   |                                                                                   |        |                                                                                   |       |
| Approach                 | EB     | WB                                                                                |                                                                                   | SB     |                                                                                   |       |
| HCM Control Delay, s     | 0.2    | 0                                                                                 |                                                                                   | 9.9    |                                                                                   |       |
| HCM LOS                  | A      |                                                                                   |                                                                                   |        |                                                                                   |       |
|                          |        |                                                                                   |                                                                                   |        |                                                                                   |       |
|                          |        |                                                                                   |                                                                                   |        |                                                                                   |       |
| Minor Lane/Major Mvmt    | EBL    | EBT                                                                               | WBT                                                                               | WBR    | SBLn1                                                                             |       |
| Capacity (veh/h)         | 1274   | -                                                                                 | -                                                                                 | -      | 751                                                                               |       |
| HCM Lane V/C Ratio       | 0.002  | -                                                                                 | -                                                                                 | -      | 0.025                                                                             |       |
| HCM Control Delay (s)    | 7.8    | 0                                                                                 | -                                                                                 | -      | 9.9                                                                               |       |
| HCM Lane LOS             | A      | A                                                                                 | -                                                                                 | -      | A                                                                                 |       |
| HCM 95th %tile Q(veh)    | 0      | -                                                                                 | -                                                                                 | -      | 0.1                                                                               |       |

HCM 6th TWSC  
14: Senoia Rd & New DW 2

Projected Conditions  
PM Peak Hour

| Intersection             |      |                                                                                   |                                                                                   |      |                                                                                   |      |
|--------------------------|------|-----------------------------------------------------------------------------------|-----------------------------------------------------------------------------------|------|-----------------------------------------------------------------------------------|------|
| Int Delay, s/veh         | 0.5  |                                                                                   |                                                                                   |      |                                                                                   |      |
| Movement                 | EBL  | EBT                                                                               | WBT                                                                               | WBR  | SBL                                                                               | SBR  |
| Lane Configurations      |      |  |  |      |  |      |
| Traffic Vol, veh/h       | 2    | 80                                                                                | 239                                                                               | 0    | 0                                                                                 | 17   |
| Future Vol, veh/h        | 2    | 80                                                                                | 239                                                                               | 0    | 0                                                                                 | 17   |
| Conflicting Peds, #/hr   | 0    | 0                                                                                 | 0                                                                                 | 0    | 0                                                                                 | 0    |
| Sign Control             | Free | Free                                                                              | Free                                                                              | Free | Stop                                                                              | Stop |
| RT Channelized           | -    | None                                                                              | -                                                                                 | None | -                                                                                 | None |
| Storage Length           | -    | -                                                                                 | -                                                                                 | -    | 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                                                                                 | 2    |
| Mvmt Flow                | 2    | 90                                                                                | 269                                                                               | 0    | 0                                                                                 | 19   |

| Major/Minor          | Major1 | Major2 | Minor2        |
|----------------------|--------|--------|---------------|
| Conflicting Flow All | 269    | 0      | 0 363 269     |
| Stage 1              | -      | -      | - 269 -       |
| Stage 2              | -      | -      | - 94 -        |
| 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   | 1295   | -      | - 636 770     |
| Stage 1              | -      | -      | - 776 -       |
| Stage 2              | -      | -      | - 930 -       |
| Platoon blocked, %   | -      | -      | -             |
| Mov Cap-1 Maneuver   | 1295   | -      | - 635 770     |
| Mov Cap-2 Maneuver   | -      | -      | - 635 -       |
| Stage 1              | -      | -      | - 774 -       |
| Stage 2              | -      | -      | - 930 -       |

| Approach             | EB  | WB | SB  |
|----------------------|-----|----|-----|
| HCM Control Delay, s | 0.2 | 0  | 9.8 |
| HCM LOS              | A   |    |     |

| Minor Lane/Major Mvmt | EBL   | EBT | WBT | WBR | SBLn1 |
|-----------------------|-------|-----|-----|-----|-------|
| Capacity (veh/h)      | 1295  | -   | -   | -   | 770   |
| HCM Lane V/C Ratio    | 0.002 | -   | -   | -   | 0.025 |
| HCM Control Delay (s) | 7.8   | 0   | -   | -   | 9.8   |
| HCM Lane LOS          | A     | A   | -   | -   | A     |
| HCM 95th %tile Q(veh) | 0     | -   | -   | -   | 0.1   |

HCM 6th TWSC  
16: Senoia Rd & New DW 3

Projected Conditions  
PM Peak Hour

| Intersection             |        |                                                                                   |                                                                                   |        |                                                                                   |       |
|--------------------------|--------|-----------------------------------------------------------------------------------|-----------------------------------------------------------------------------------|--------|-----------------------------------------------------------------------------------|-------|
| Int Delay, s/veh         | 0.6    |                                                                                   |                                                                                   |        |                                                                                   |       |
| Movement                 | EBL    | EBT                                                                               | WBT                                                                               | WBR    | SBL                                                                               | SBR   |
| Lane Configurations      |        |  |  |        |  |       |
| Traffic Vol, veh/h       | 2      | 78                                                                                | 222                                                                               | 0      | 0                                                                                 | 17    |
| Future Vol, veh/h        | 2      | 78                                                                                | 222                                                                               | 0      | 0                                                                                 | 17    |
| Conflicting Peds, #/hr   | 0      | 0                                                                                 | 0                                                                                 | 0      | 0                                                                                 | 0     |
| Sign Control             | Free   | Free                                                                              | Free                                                                              | Free   | Stop                                                                              | Stop  |
| RT Channelized           | -      | None                                                                              | -                                                                                 | None   | -                                                                                 | None  |
| Storage Length           | -      | -                                                                                 | -                                                                                 | -      | 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                                                                                 | 2     |
| Mvmt Flow                | 2      | 88                                                                                | 249                                                                               | 0      | 0                                                                                 | 19    |
| Major/Minor              | Major1 | Major2                                                                            |                                                                                   | Minor2 |                                                                                   |       |
| Conflicting Flow All     | 249    | 0                                                                                 | -                                                                                 | 0      | 341                                                                               | 249   |
| Stage 1                  | -      | -                                                                                 | -                                                                                 | -      | 249                                                                               | -     |
| Stage 2                  | -      | -                                                                                 | -                                                                                 | -      | 92                                                                                | -     |
| 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       | 1317   | -                                                                                 | -                                                                                 | -      | 655                                                                               | 790   |
| Stage 1                  | -      | -                                                                                 | -                                                                                 | -      | 792                                                                               | -     |
| Stage 2                  | -      | -                                                                                 | -                                                                                 | -      | 932                                                                               | -     |
| Platoon blocked, %       |        | -                                                                                 | -                                                                                 | -      |                                                                                   |       |
| Mov Cap-1 Maneuver       | 1317   | -                                                                                 | -                                                                                 | -      | 654                                                                               | 790   |
| Mov Cap-2 Maneuver       | -      | -                                                                                 | -                                                                                 | -      | 654                                                                               | -     |
| Stage 1                  | -      | -                                                                                 | -                                                                                 | -      | 790                                                                               | -     |
| Stage 2                  | -      | -                                                                                 | -                                                                                 | -      | 932                                                                               | -     |
| Approach                 | EB     | WB                                                                                |                                                                                   | SB     |                                                                                   |       |
| HCM Control Delay, s     | 0.2    | 0                                                                                 |                                                                                   | 9.7    |                                                                                   |       |
| HCM LOS                  |        |                                                                                   |                                                                                   | A      |                                                                                   |       |
| Minor Lane/Major Mvmt    | EBL    | EBT                                                                               | WBT                                                                               | WBR    | SBLn1                                                                             |       |
| Capacity (veh/h)         | 1317   | -                                                                                 | -                                                                                 | -      | 790                                                                               |       |
| HCM Lane V/C Ratio       | 0.002  | -                                                                                 | -                                                                                 | -      | 0.024                                                                             |       |
| HCM Control Delay (s)    | 7.7    | 0                                                                                 | -                                                                                 | -      | 9.7                                                                               |       |
| HCM Lane LOS             | A      | A                                                                                 | -                                                                                 | -      | A                                                                                 |       |
| HCM 95th %tile Q(veh)    | 0      | -                                                                                 | -                                                                                 | -      | 0.1                                                                               |       |