TRAFFIC IMPACT STUDY
FOR
RETAIL DEVELOPMENT AT 4391 BROWNSVILLE ROAD, POWDER SPRINGS, GEORGIA.

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A & R Project # 24-204

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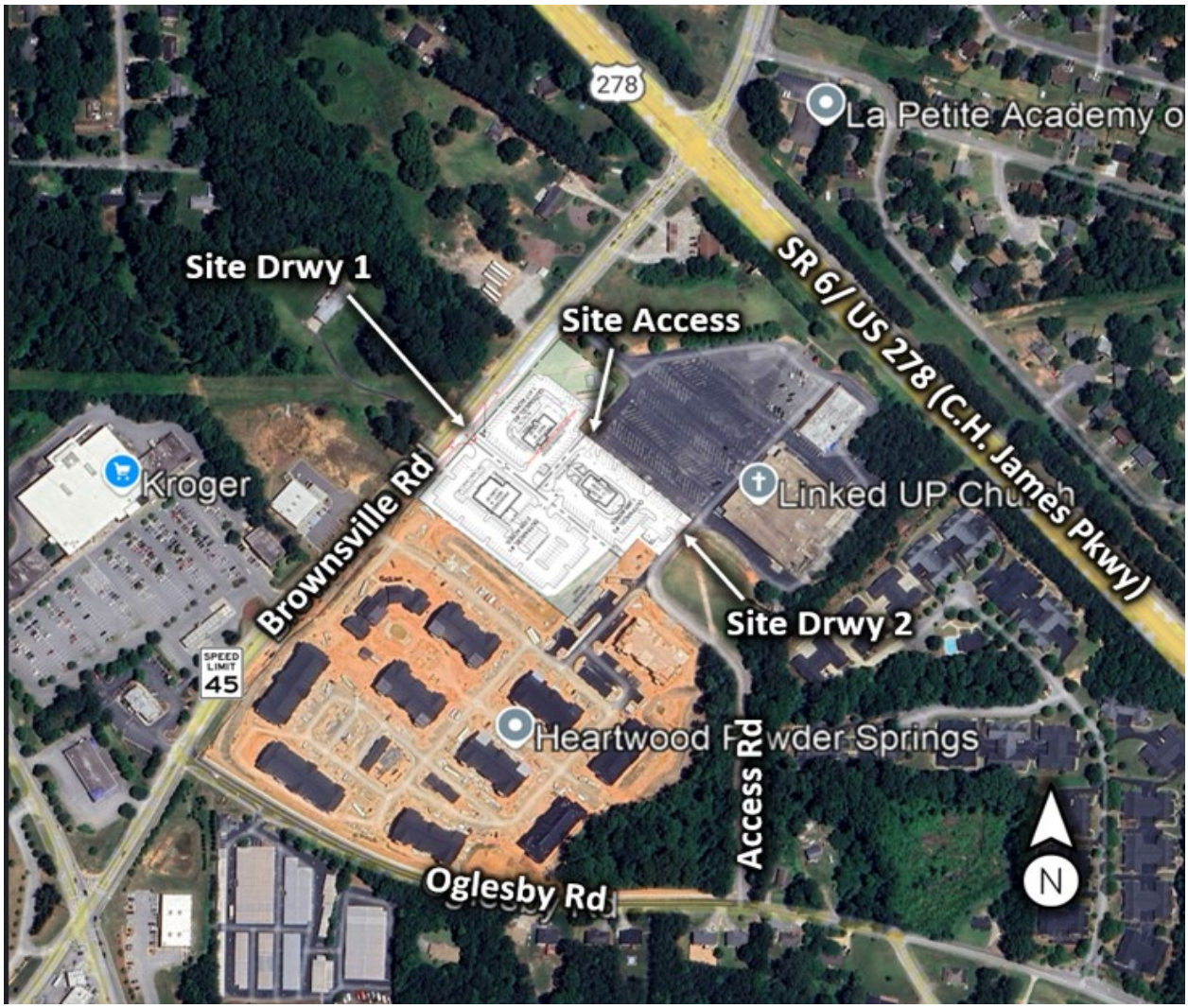
1.0 INTRODUCTION

The purpose of this study is to determine the traffic impact from the proposed retail development that will be located at 4391 Brownsville Road, Powder Springs, Georgia. The traffic analysis includes evaluation of the current operations and future conditions with the traffic generated by the development. The development will consist of:

- Parcel-A: Fine Dining Restaurant: 5,980 sf
- Parcel-B: Fast-food Restaurant with Drive-through Window: 3,400 sf
- Parcel-C: High Turn-over Site Down Restaurant: 3,400 sf



The development proposes access at the following locations:

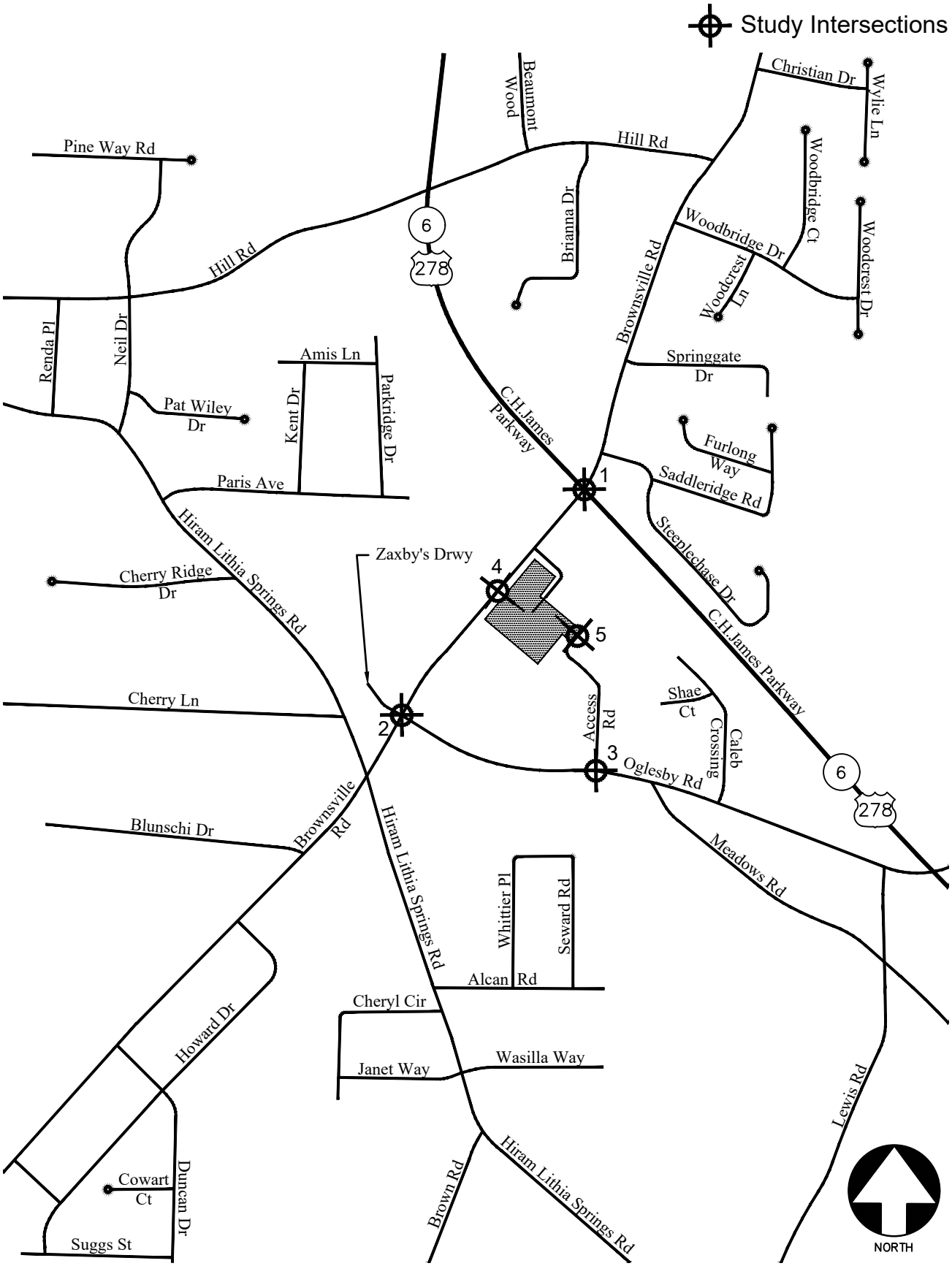
- Site Driveway 1: Full access driveway on Brownsville Road
- Site Driveway 2: Full access driveway on Access Road

The site also has an inter-parcel access to the adjacent Church, but to evaluate the traffic operations at the main site driveway conservatively, we have not assigned any traffic to the inter-parcel access.

The AM and PM peak hours have been analyzed in this study. This study includes the evaluation of traffic operations at the intersections of:

1. SR 6/ US 278 (C.H. James Parkway) at Brownsville Road
2. Brownsville Road at Oglesby Road/ Zaxby's Driveway
3. Oglesby Road at Access Road

Recommendations, if any, to improve traffic operations have been identified as appropriate and are discussed in detail in the following sections of the report. The location of the development and the surrounding roadway network are shown in Figure 1.



LOCATION MAP FIGURE 1

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2.0 EXISTING FACILITIES / CONDITIONS

2.1 Roadway Facilities

The following is a brief description of each of the roadway facilities located in proximity to the site:

2.1.1 SR 6/ US 278 (C.H. James Parkway)

SR 6/ US 278 (C.H. James Parkway) is an east-west, four-lane roadway with a two way left turns and posted speed limit of 55 mph in the vicinity of the site. Georgia Department of Transportation (GDOT) traffic counts (Station ID: 067-2328) indicate that the daily traffic volume on SR 6/ US 278 (C.H. James Parkway) in 2023 was 33,000 vehicles per day southeast of Brownsville Road. Cobb County DOT classifies SR 6/ US 278 (C.H. James Parkway) as an arterial roadway.

2.1.2 Brownsville Road

Brownsville Road is a north-south, two-lane, undivided roadway with a posted speed limit of 45 mph in the vicinity of the site. To the north of SR 6/ US 278 (C.H. James Parkway) the speed limit on Brownsville Road is 35 mph. Georgia Department of Transportation (GDOT) traffic counts (Station ID: 067-0961) indicate that the daily traffic volume on Brownsville Road in 2023 was 5,800 vehicles per day northeast of Hill Road. Cobb County DOT classifies Brownsville Road as an arterial roadway.

2.1.3 Oglesby Road

Oglesby Road is an east-west, two-lane, undivided roadway with a posted with a speed limit of 35 mph in the vicinity of the site. Cobb County DOT classifies Oglesby Road as a minor roadway.

3.0 STUDY METHODOLOGY

In this study, the methodology used for evaluating traffic operations at each of the subject intersections is based on the criteria set forth in the Transportation Research Board's Highway Capacity Manual, 6th edition (HCM 6). Synchro software, which utilizes the HCM methodology, was used for the analysis. The following is a description of the methodology employed for the analysis of unsignalized and signalized intersections.

3.1 Unsignalized Intersections

For unsignalized intersections controlled by a stop sign on minor streets, the level-of-service (LOS) for motor vehicles with controlled movements is determined by the computed control delay according to the thresholds stated in Table 1 below. LOS is determined for each minor street movement (or shared movement), as well as major street left turns. LOS is not defined for the intersection as a whole or for major street approaches. The LOS of any controlled movement which experiences a volume to capacity ratio greater than 1 is designated as "F" regardless of the control delay.

Control delay for unsignalized intersections includes initial deceleration delay, queue move-up time, stopped delay, and final acceleration delay. Several factors affect the control delay for unsignalized intersections, such as the availability and distribution of gaps in the conflicting traffic stream, critical gaps, and follow-up time for a vehicle in the queue.

Level-of-service is assigned a letter designation from "A" through "F". Level-of-service "A" indicates excellent operations with little delay to motorists, while level-of-service "F" exists when there are insufficient gaps of acceptable size to allow vehicles on the side street to cross the main road without experiencing long delays.

TABLE 1 – LEVEL-OF-SERVICE CRITERIA FOR UNSIGNALIZED INTERSECTIONS

Control Delay (sec/vehicle)	LOS by Volume-to-Capacity Ratio*	
	v/c ≤ 1.0	**v/c > 1.0**
≤ 10	A	F
> 10 and ≤ 15	B	F
> 15 and ≤ 25	C	F
> 25 and ≤ 35	D	F
> 35 and ≤ 50	E	F
> 50	F	F

*The LOS criteria apply to each lane on a given approach and to each approach on the minor street. LOS is not calculated for major-street approaches or for the intersection.

Source: Highway Capacity Manual, 6th edition, Exhibit 20-2 *LOS Criteria: Motorized Vehicle Mode*

3.2 Signalized Intersections

According to HCM procedures, LOS can be calculated for the entire intersection, each intersection approach, and each lane group. HCM uses control delay alone to characterize LOS for the entire intersection or an approach. Control delay per vehicle is composed of initial deceleration delay, queue move-up time, stopped delay, and final acceleration delay. Both control delay and volume-to-capacity ratio are used to characterize LOS for a lane group. A volume-to-capacity ratio of greater than 1.0 for a lane group indicates failure from capacity perspective. Therefore, such a lane group is assigned LOS F regardless of the amount of control delay.

Table 2 below summarizes the LOS criteria from HCM for motorized vehicles at signalized intersection.

TABLE 2 – LEVEL-OF-SERVICE CRITERIA FOR SIGNALIZED INTERSECTIONS

Control Delay (sec/vehicle) *	LOS for Lane Group by Volume-to-Capacity Ratio*	
	v/c ≤ 1.0	**v/c > 1.0**
≤ 10	A	F
> 10 and ≤ 20	B	F
> 20 and ≤ 35	C	F
> 35 and ≤ 55	D	F
> 55 and ≤ 80	E	F
> 80	F	F

*For approach-based and intersection wide assessments, LOS is defined solely by control delay

Source: Highway Capacity Manual, 6th edition, Exhibit 19-8 *LOS Criteria: Motorized Vehicle Mode*

LOS A is typically assigned when the volume-to-capacity (v/c) ratio is low and either progression is exceptionally favourable, or the cycle length is very short. LOS B is typically assigned when the v/c ratio is low and either progression is highly favorable, or the cycle length is short. However, more vehicles are stopped than with LOS A. LOS C is typically assigned when progression is favorable, or the cycle length is moderate. Individual *cycle failures* (one or more queued vehicles are not able to depart because of insufficient capacity during the cycle) may begin to appear at this level. Many vehicles still pass through the intersection without stopping, but the number of vehicles stopping is significant. LOS D is typically assigned when the v/c ratio is high and either progression is ineffective, or the cycle length is long. There are many vehicle-stops and individual cycle failures are noticeable. LOS E is typically assigned when the v/c ratio is high, progression is very poor, the cycle length is long, and individual cycle failures are frequent. LOS F is typically assigned when the v/c ratio is very high, progression is very poor, the cycle length is long, and most cycles fail to clear the queue.

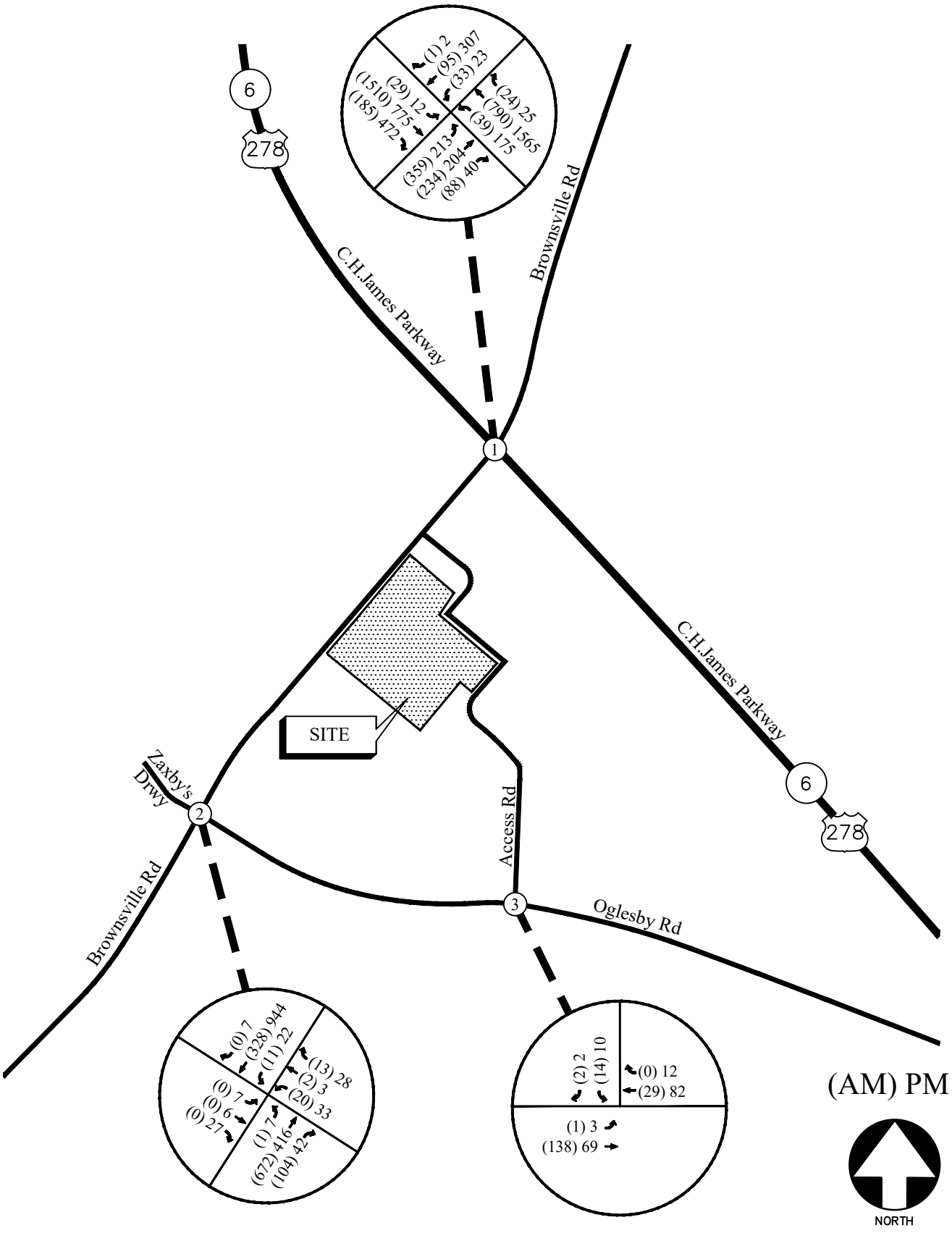
4.0 EXISTING 2024 TRAFFIC ANALYSIS

4.1 Existing Traffic Volumes

Existing traffic counts were obtained at the following study intersections:

1. SR 6/ US 278 (C.H. James Parkway) at Brownsville Road
2. Brownsville Road at Oglesby Road/ Zaxby's Chicken Fingers & Buffalo Wings Driveway
3. Oglesby Road at Access Road

Turning movement counts were collected on Tuesday, October 22, 2024. All turning movement counts were recorded during the AM and PM peak hours between 7:00am to 9:00am and 4:00pm to 6:00pm, respectively. The four consecutive 15-minute interval volumes that summed to produce the highest volume at the intersections were then determined. These volumes make up the peak hour traffic volumes for the intersections counted and are shown in Figure 2. The existing traffic control and lane geometry for the intersections are shown in Figure 3.



EXISTING WEEKDAY PEAK-HOUR VOLUMES FIGURE 2

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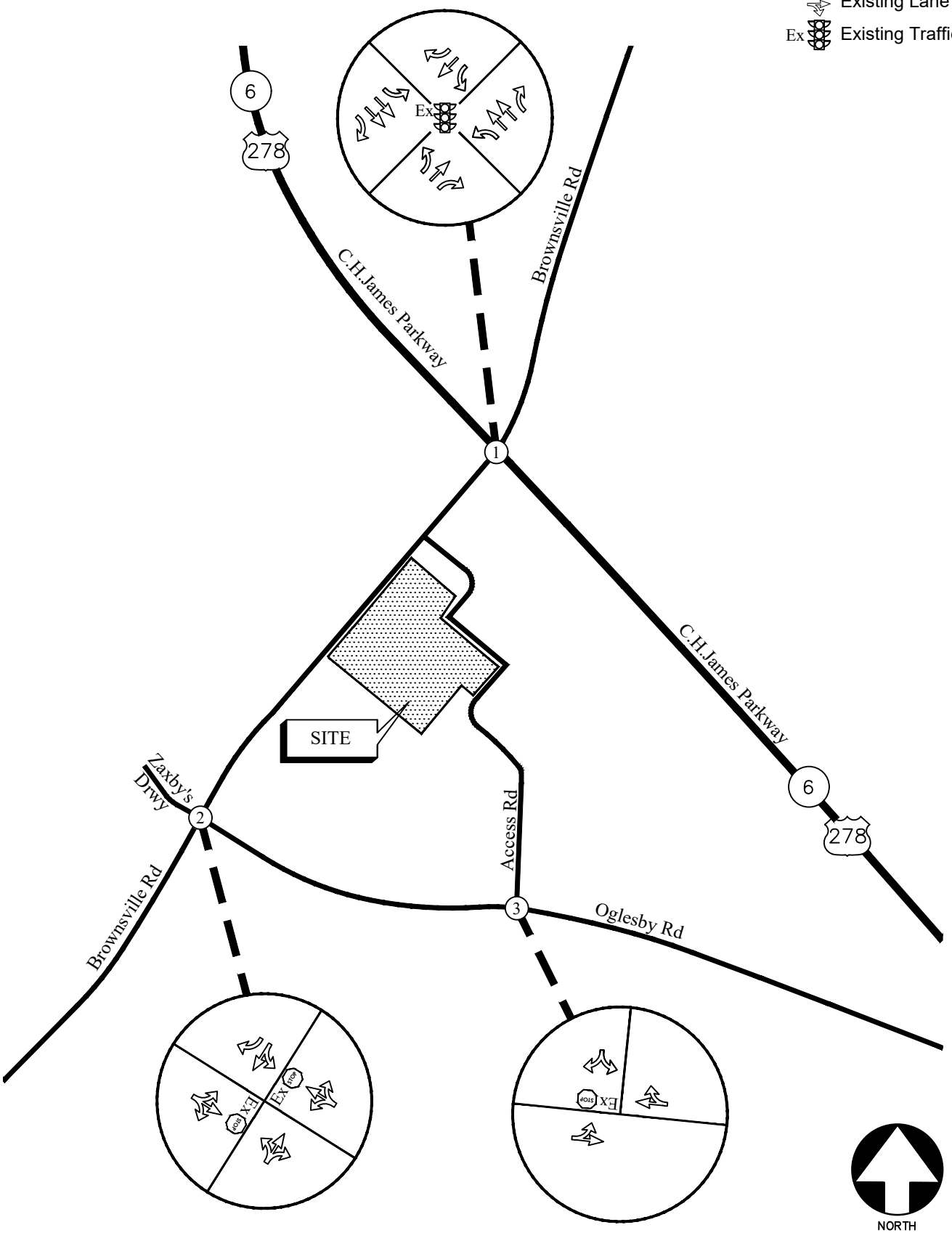

EXISTING TRAFFIC CONTROL AND LANE GEOMETRY FIGURE 3

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4.2 Existing Traffic Operations

Existing 2024 traffic operations were analyzed at the study intersections in accordance with the HCM methodology. The results of the analyses are shown in Table 3.

TABLE 3 – EXISTING INTERSECTION OPERATIONS

	Intersection	Traffic Control	LOS (Delay)	
			AM Peak Hour	PM Peak Hour
1	**Brownsville Rd @ SR 6/ US 278 (C.H. James Parkway)**	Signalized	**C (32.8)**	**C (37.8)**
	-Eastbound Approach		C (28.5)	C (29.0)
	-Westbound Approach		B (19.7)	C (33.0)
	-Northbound Approach		D (53.2)	D (52.3)
	-Southbound Approach		E (70.2)	E (77.0)
2	**Brownsville Road @ Oglesby Road/Zaxby's Driveway**	Stop Controlled on EB and WB Approaches		
	-Eastbound Approach (Zaxby's Driveway)		C (22.9)	D (31.1)
	-Westbound Approach (Oglesby Road)		D (27.8)	F (56.6)
	-Northbound Left		A (8.0)	B (10.2)
	-Southbound Left		A (9.8)	A (8.4)
3	**Oglesby Road @ Access Road**	Stop Controlled on SB Approach		
	-Eastbound Left		A (7.3)	A (7.4)
	-Southbound Approach		A (9.6)	A (9.5)

The results of the existing traffic operations analysis indicate that the signalized study intersection is operating at an overall level of service "C" in both AM and PM peak hours. The southbound approach of Brownsville Road (intersection # 1) is operating at LOS "E" in both peak hours. The stop-controlled Oglesby Road approach at Brownsville Road is operating at a level of service "F' in PM peak hour. It is not unusual for stop-controlled side-streets along arterial roadways to have elevated delays during peak periods as delays caused by side-streets wait times to turn left onto the mainline.

5.0 PROPOSED DEVELOPMENT

The development that will be located at 4391 Brownsville Road, Powder Springs, Georgia. The traffic analysis includes evaluation of the current operations and future conditions with the traffic generated by the development. The development will consist of:

- Parcel-A: Fine Dining Restaurant: 5,980 sf
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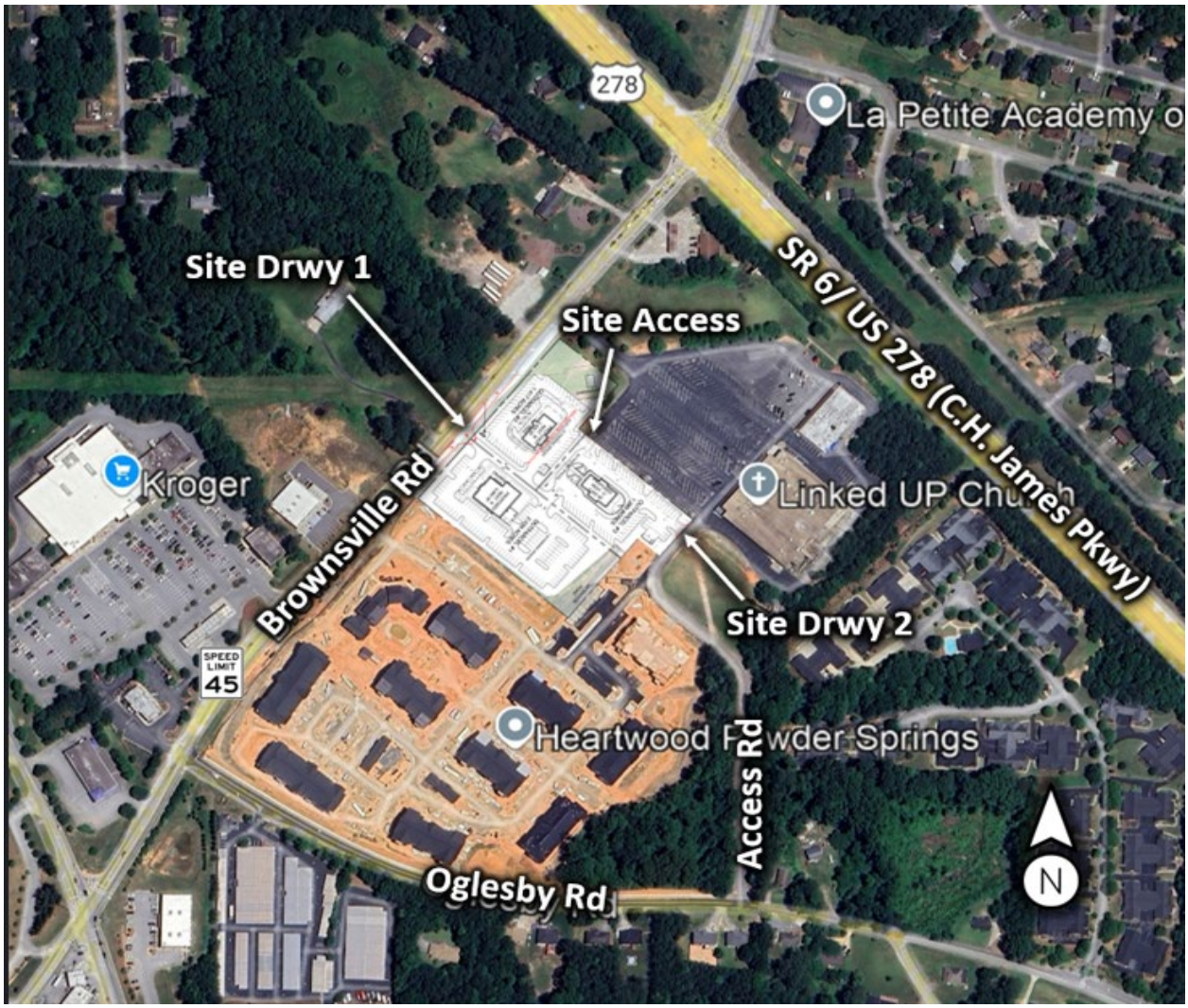
- Parcel-C: High Turn-over Site Down Restaurant: 3,400 sf



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- Site Driveway 1: Full access driveway on Brownsville Road
- Site Driveway 2: Full access driveway on Access Road

The site also has an inter-parcel access to the adjacent Church, but to evaluate the traffic operations at the main site driveway conservatively, we have not assigned any traffic to the inter-parcel access.

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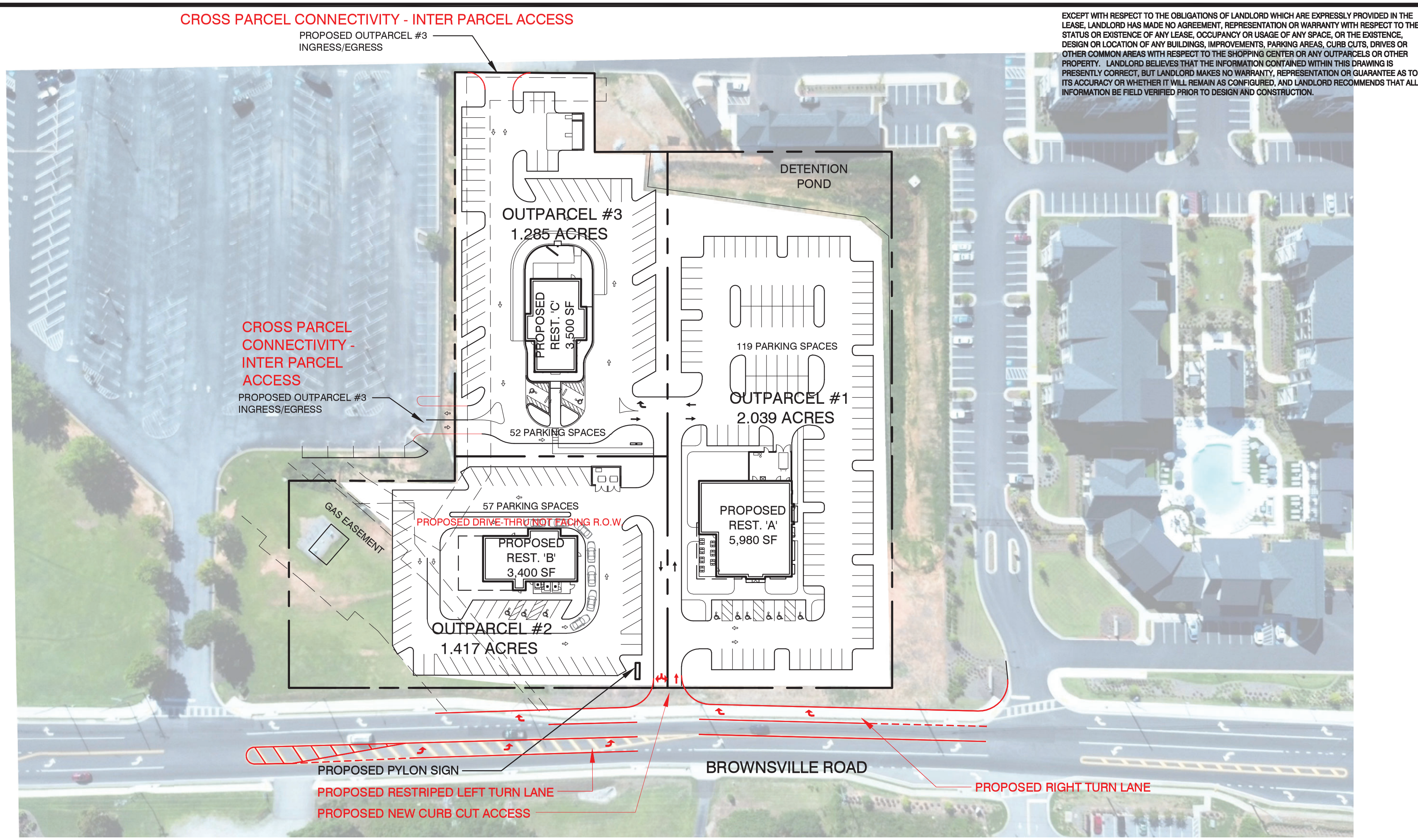

4391 BROWNSVILLE ROAD - PROPOSED SITE PLAN - RESTAURANTS

DRAWN BY: CO
DATE: 09/04/24

4391 BROWNSVILLE ROAD
POWDER SPRING, GA 30127

SELIG ENTERPRISES, INC.
1100 SPRING STREET NW SUITE 550
ATLANTA, GEORGIA 30309-2848
TEL (404) 876-5511 FAX (404) 875-2629

USER coneal - Sep 04, 2024 - 11:19am
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5.1 Trip Generation

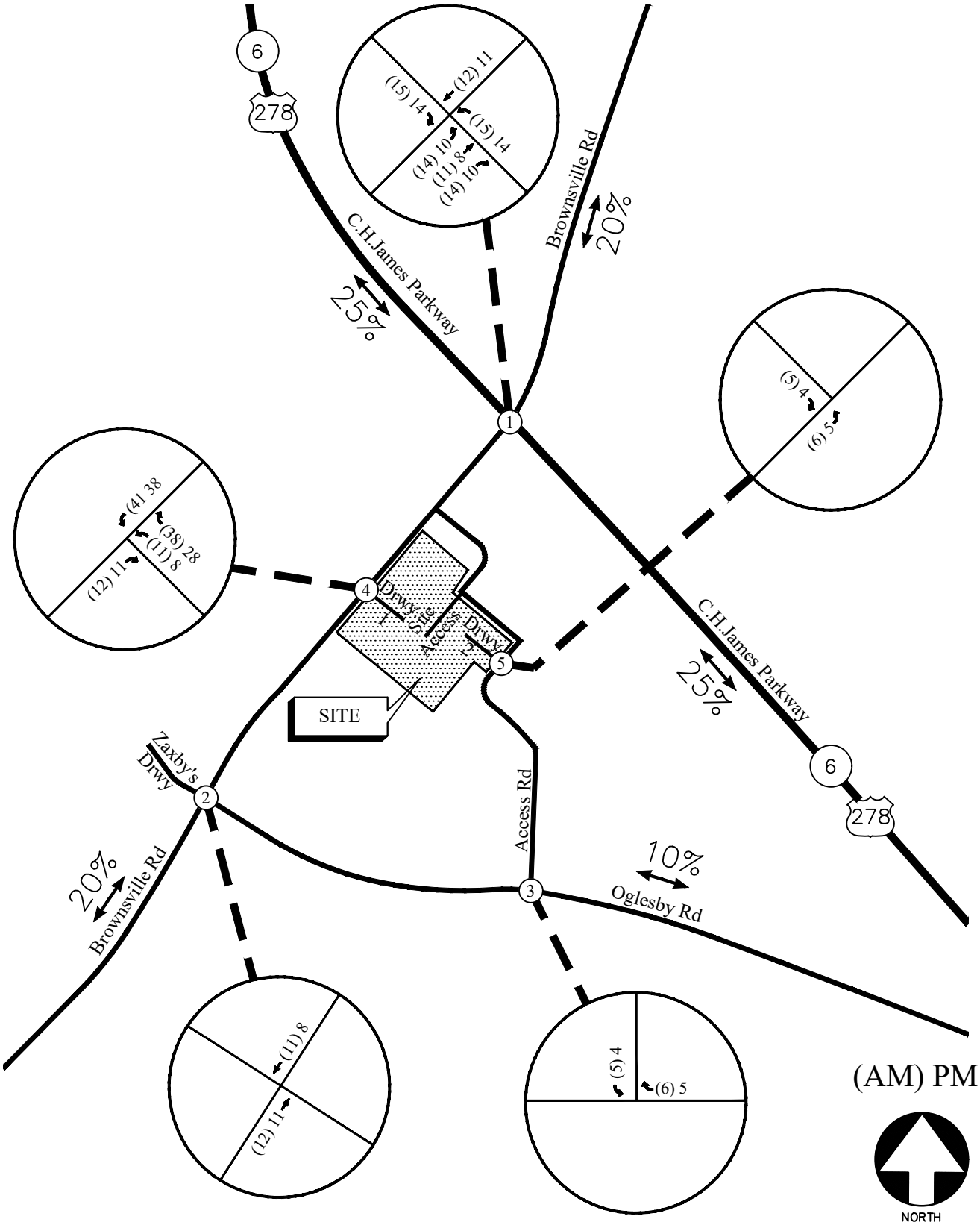
Trip generation estimates for the project were based on the rates and equations published in the 11th edition of the Institute of Transportation Engineers (ITE) Trip Generation report. This reference contains traffic volume count data collected at similar facilities nationwide. The trip generation was based on the following ITE Land Uses: *931 – Fine Dining Restaurant, 932 – High-Turnover (Site-Down) Restaurant and 934 – Fast-Food Restaurant with Drive-Through Window.* The calculated total trip generation for the proposed development is shown in Table 4.

TABLE 4 – TRIP GENERATION

Land Use	Size	AM Peak Hour			PM Peak Hour			24 Hour
		Enter	Exit	Total	Enter	Exit	Total	Total
ITE 931 – Fine Dining Restaurant	5,980 sf	2	2	4	31	16	47	501
Pass-by Trips (0%) 44%		0	0	0	-14	-7	-21	-210
ITE 932 – High-Turnover (Site-Down) Restaurant	3,400 sf	18	15	33	19	12	31	364
Pass-by Trips (0%) 43%		0	0	0	-8	-5	-13	-130
ITE 934 – Fast-Food Restaurant with Drive-Through Window	3,400 sf	77	75	152	58	54	112	1,589
Pass-by Trips (50%) 55%		-39	-38	-77	-32	-30	-62	-620
Total Trips without Reductions		**97**	**92**	**189**	**108**	**82**	**190**	**2,454**
Total Trips with Reductions		**58**	**54**	**112**	**54**	**40**	**94**	**1,494**

5.2 Trip Distribution

The trip distribution describes how traffic arrives and departs from the site. An overall trip distribution was developed for the site based on a review of the existing travel patterns in the area and the locations of major roadways and highways that will serve the development. The site-generated peak hour traffic volumes, shown in Table 4, were assigned to the study area intersections based on this distribution. The outer-leg distribution and AM and PM peak hour new traffic generated by the site are shown in Figure 5. Pass-by volumes have also been distributed based on existing travel patterns and are shown in Figure 6.



TRIP DISTRIBUTION AND SITE-GENERATED WEEKDAY PEAK HOUR VOLUMES

FIGURE 5

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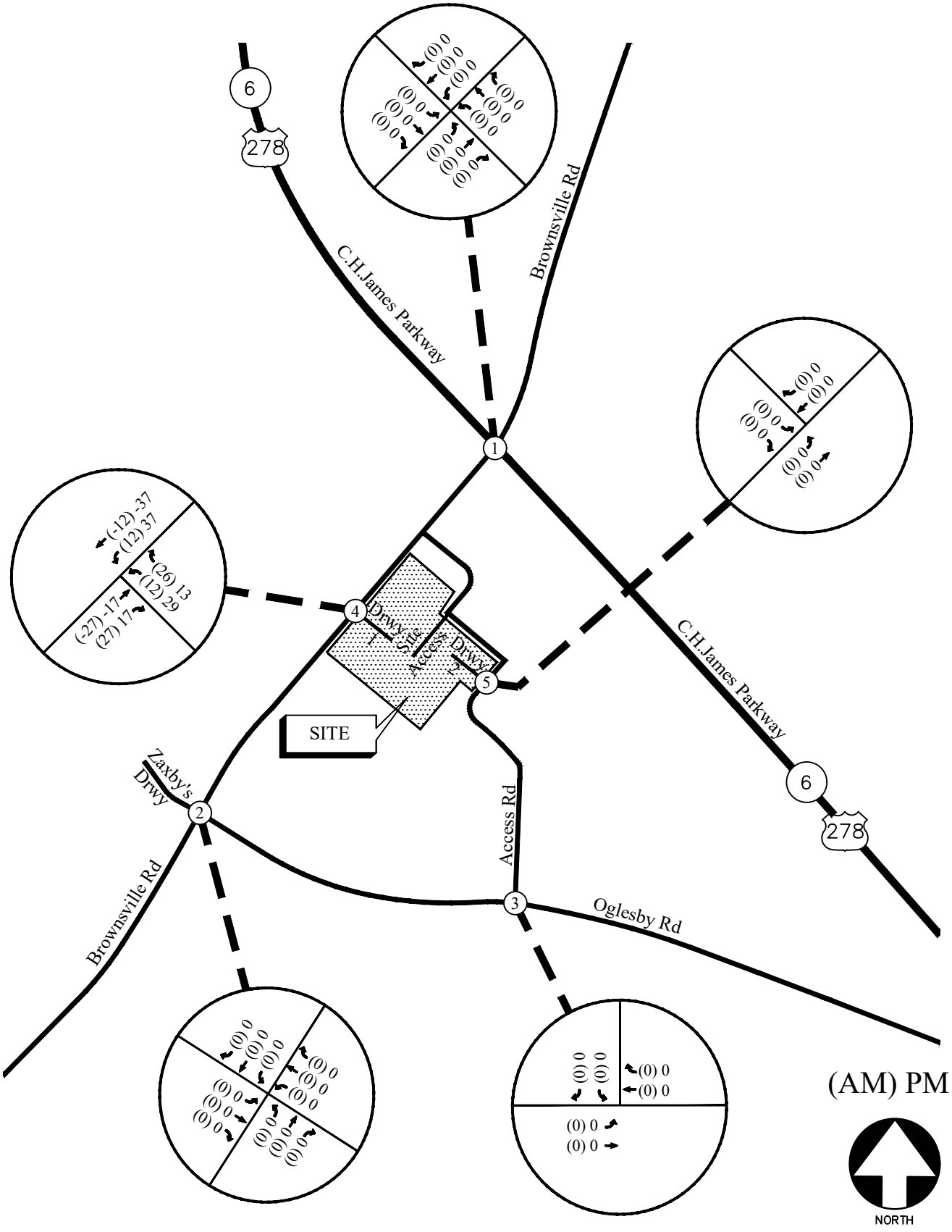

SITE PEAK HOUR PASS-BY VOLUMES FIGURE 6

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6.0 FUTURE 2026 TRAFFIC ANALYSIS

The future 2026 traffic operations are analyzed for the "Build" and "No-Build" conditions.

6.1 Future "No-Build" Conditions

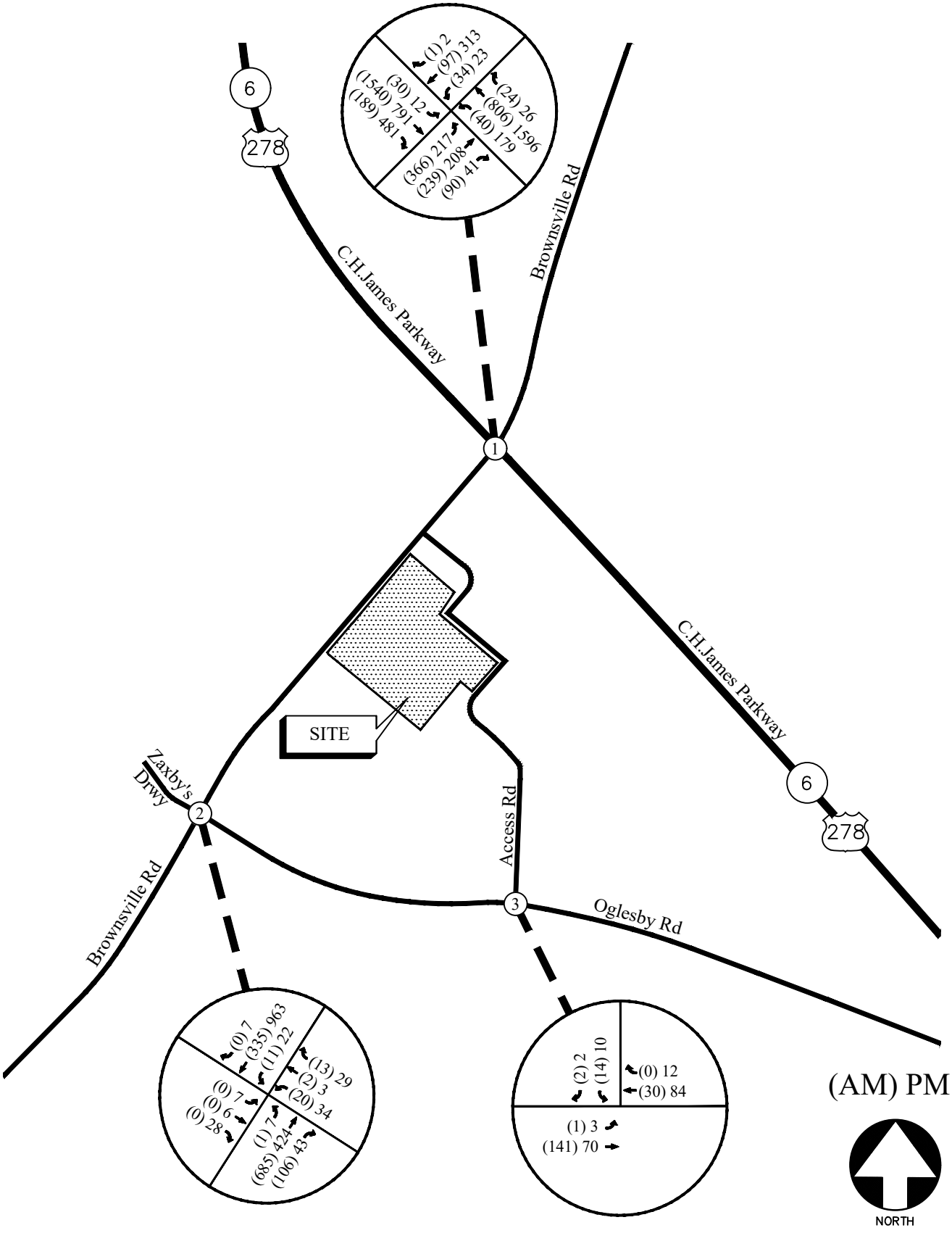
The "No-Build" (or background) conditions provide an assessment of how traffic will operate in the study horizon year without the study site being developed as proposed, with projected increases in through traffic volumes due to normal annual growth. The Future "No-Build" volumes consist of the existing traffic volumes (Figure 2) plus increases for annual growth of through traffic.

6.1.1 Annual Traffic Growth

In order to evaluate future traffic operations in this area, a projection of normal traffic growth was applied to the existing volumes. The Georgia Department of Transportation recorded average daily traffic volumes at several locations in the vicinity of the site. Reviewing the growth over the last five (between 2018-2019 & 2021-2023) years revealed growth of approximately 1% in the area. This growth factor was applied to the existing traffic volumes between collector and arterial roadways to estimate the future year traffic volumes prior to the addition of site-generated traffic. The resulting future "No-Build" volumes on the roadway are shown in Figure 7.

6.2 Future "Build" Conditions

The "Build" or development conditions include the estimated background traffic from the "No-Build" conditions plus the added traffic from the proposed development. To evaluate future traffic operations in this area, the additional traffic volumes from the site (Figure 5) and pass-by volumes (Figure 6) were added to base traffic volumes (Figure 7) to calculate the future traffic volumes after the construction of the development. These total future "Build" traffic volumes are shown in Figure 8.



FUTURE (NO-BUILD) WEEKDAY PEAK HOUR VOLUMES FIGURE 7

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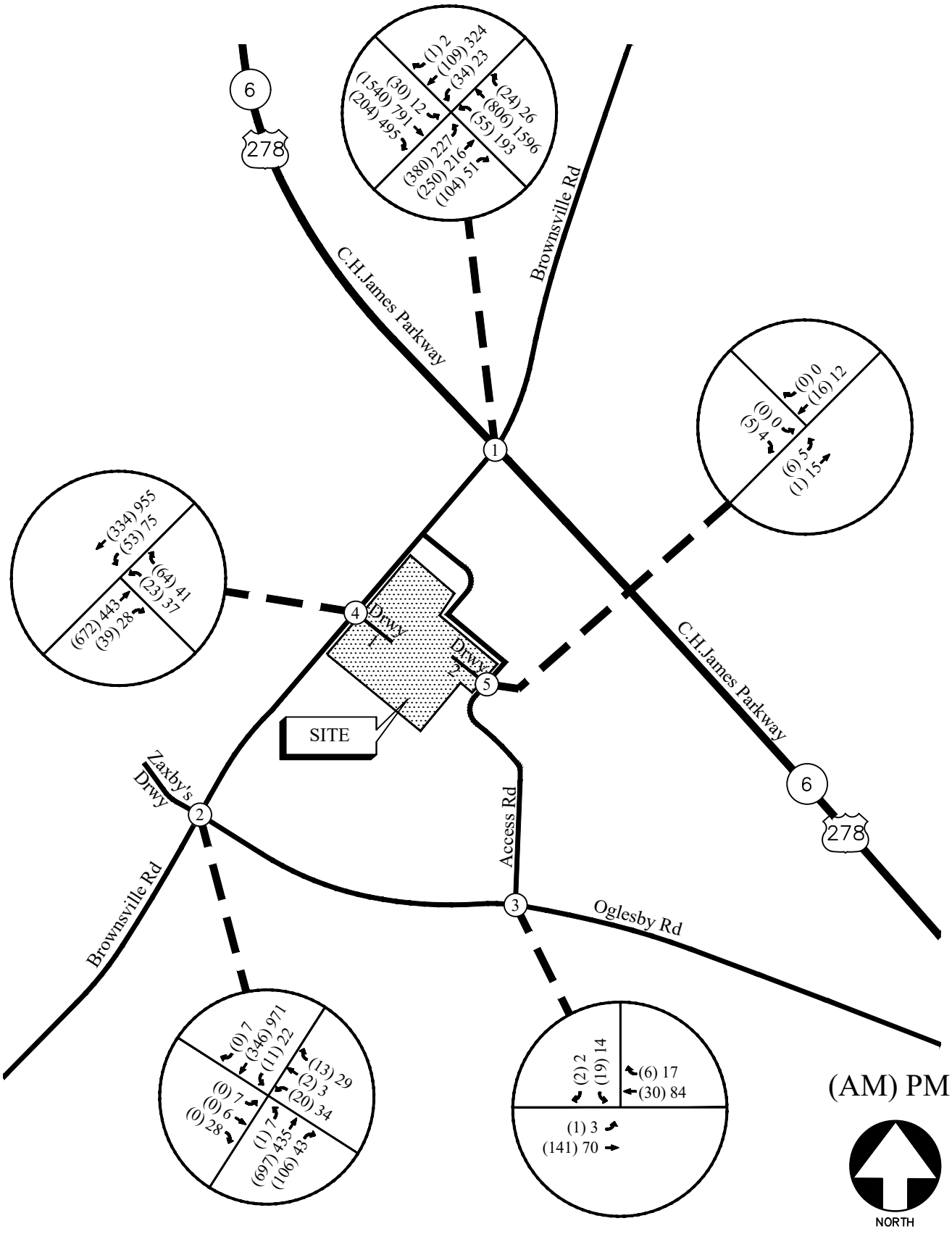

FUTURE (BUILD) WEEKDAY PEAK HOUR VOLUMES FIGURE 8

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6.3 Auxiliary Lane Analysis

Included below are analyses for left turn lanes and right turn lanes for all site driveways (per Cobb County Standards). The analyses below are based off the trip distribution included in Section 5.2. According to the trip distribution, the overall 24-hour two-way volume for traffic entering and exiting the site are 2,454 vehicles.

6.3.1 Left Turn Lane Analysis

Per Cobb County Development Standards, (402.10), a left turn lane may require for residential and commercial developments on two-lane thoroughfare roads. Since Brownsville Road is among the roadways classified in the county's major thoroughfare plan, a left turn lane is required. Therefore, left turn lane is recommended at the site driveway 1. Since Access Road is not among the roadways classified in the county's major thoroughfare plan, a left turn lane is not required. Therefore, left turn lane is not recommended at the site driveway 2.

6.3.2 Deceleration Turn Lane Analysis

Per Cobb County Development Standards, (402.9), right turn lanes are required on any roadway that is included in the county's major thoroughfare plan network. Since Brownsville Road is among the roadways classified in the county's major thoroughfare plan a right turn lane is required. Therefore, a deceleration lane is recommended at the site driveway 1. Since Access Road is not among the roadways classified in the county's major thoroughfare plan, a right turn lane is not required. Therefore, a deceleration turn lane is not recommended at the site driveway 2.

6.4 Future Traffic Operations

The future "No-Build" and "Build" traffic operations were analysed using the volumes in Figures 7 and 8, respectively. The results of the future traffic operations analysis are shown below in Table 5. Recommendations on traffic control and lane geometry are shown in Figure 9.

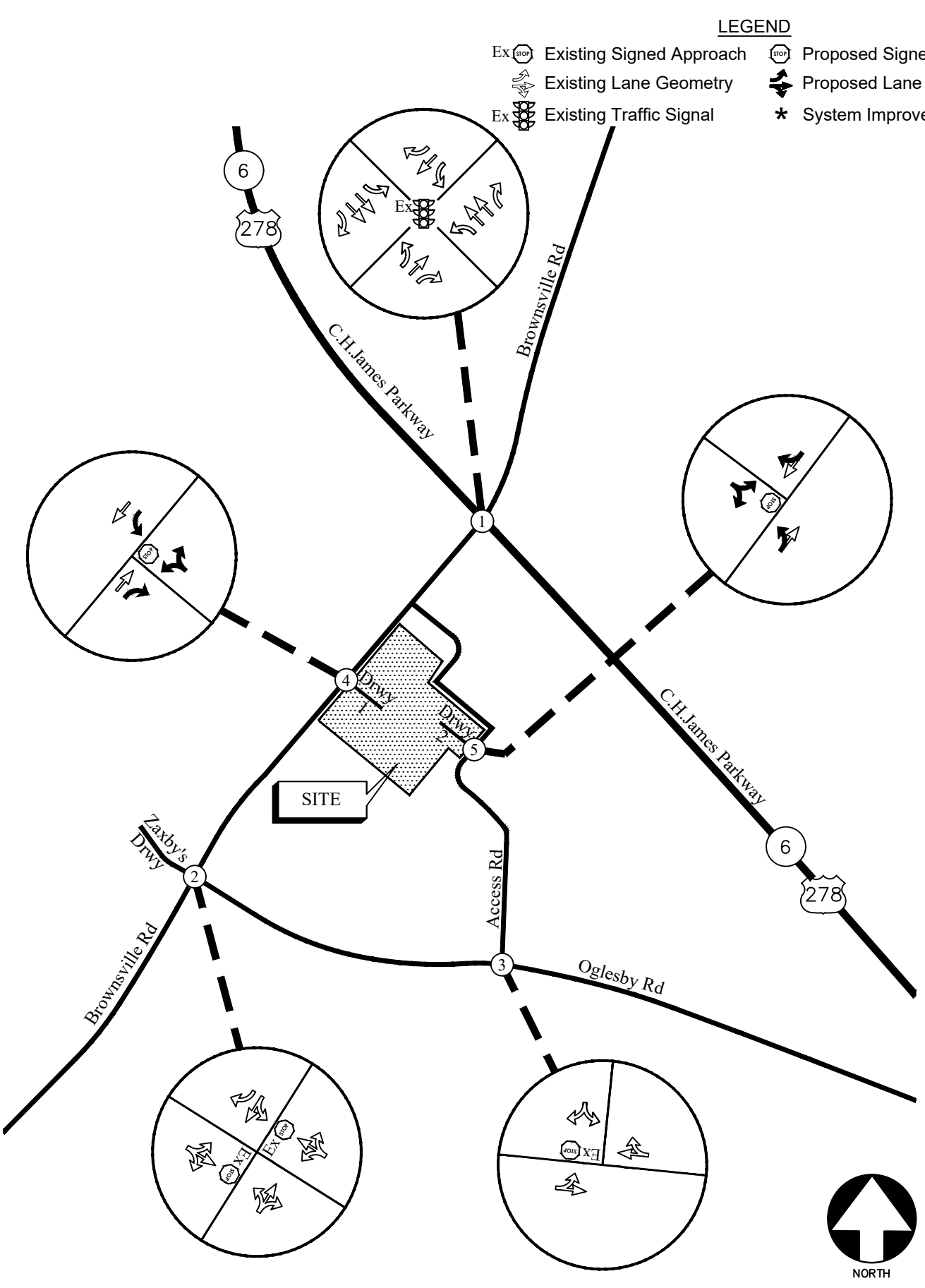
TABLE 5 – FUTURE INTERSECTION OPERATIONS

	Intersection	LOS (Delay)			
		NO BUILD		BUILD	
		AM Peak	PM Peak	AM Peak	PM Peak
1	**Brownsville Rd @ SR 6/ US 278 (C.H. James Pkwy)**	**C (33.8)**	**D (39.1)**	**C (35.6)**	**D (44.8)**
	-Eastbound Approach	C (30.0)	C (30.0)	C (32.3)	C (32.9)
	-Westbound Approach	B (20.3)	C (35.1)	B (21.5)	D (44.6)
	-Northbound Approach	D (53.3)	D (52.4)	D (53.9)	D (53.3)
	-Southbound Approach	E (70.1)	E (77.3)	E (69.9)	E (77.9)
2	**Brownsville Rd @ Oglesby Rd/Zaxby's Drwy**				
	-Eastbound Approach	C (23.5)	D (32.3)	C (24.3)	D (33.1)
	-Westbound Approach	D (28.9)	F (63.5)	D (30.1)	F (66.2)
	-Northbound Left	A (8.1)	B (10.3)	A (8.1)	B (10.3)
	-Southbound Left	A (9.8)	A (8.4)	A (9.9)	A (8.5)
3	**Oglesby Road @ Access Road**				
	-Eastbound Left	A (7.3)	A (7.4)	A (7.3)	A (7.5)
	-Southbound Approach	A (9.6)	A (9.5)	A (9.7)	A (9.6)
4	**Brownsville Road @ Site Driveway 1**				
	-Westbound Approach	-	-	C (21.0)	E (45.1)
	-Southbound Left			A (9.6)	A (8.7)
5	**Access Road @ Site Driveway 2**				
	-Eastbound Approach	-	-	A (8.4)	A (8.4)
	-Northbound Left			A (7.3)	A (7.2)

The results of the future "No-Build" conditions analysis indicates that the signalized study intersection will operate at an overall level of service "C" in AM peak hour and level of service "D" in PM peak hour. The southbound approach of Brownsville Road (intersection # 1) will continue to operate at LOS "E" in both peak hours. The stop-controlled Oglesby Road approach at Brownsville Road will continue to operate at a level of service "F' in PM peak hour.

The results of the future "Build" conditions analysis indicates that the signalized study intersection will continue to operate at an overall level of service "C" in AM peak hour and level of service "D" in PM peak hour as in "No-Build" conditions with its southbound approach of Brownsville Road continuing to operate at LOS "E" in both peak hours. The stop-controlled Oglesby Road approach at Brownsville Road will also continue to operate at a level of service "F" in PM peak hour. It is not unusual for stop-controlled side-streets along arterial roadways to have elevated delays during peak periods as delays caused by side-streets wait times to turn left onto the mainline. The impact of the site generated traffic on the study intersections is minimal.

The stop-controlled westbound site driveway approach on Brownsville Road will operate at satisfactory level of service “C” in AM peak hour and level of service “E” in PM peak hour with delays of 45.1 seconds. The low left-turn volumes exiting the site driveway will not warrant installation of a traffic signal. It is not unusual for stop-controlled side-streets along arterial roadways to have elevated delays during peak periods as delays caused by side-streets wait times to turn left onto the mainline.



FUTURE TRAFFIC CONTROL AND LANE GEOMETRY FIGURE 9

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7.0 CONCLUSIONS AND RECOMMENDATIONS

Traffic impacts were evaluated for the proposed retail development that will be located at 4391 Brownsville Road, Powder Springs, in Cobb County, Georgia. The traffic analysis includes evaluation of the current operations and future conditions with the traffic generated by the development. The development will consist of:

- Parcel-A: Fine Dining Restaurant: 5,980 sf
- Parcel-B: Fast-food Restaurant with Drive-through Window: 3,400 sf
- Parcel-C: High Turn-over Site Down Restaurant: 3,400 sf

The development proposes access at the following locations:

- Site Driveway 1: Full access driveway on Brownsville Road
- Site Driveway 2: Full access driveway on Access Road

The site also has an inter-parcel access to the adjacent Church, but to evaluate the traffic operations at the main site driveway conservatively, we have not assigned any traffic to the inter-parcel access.

Existing and future operations after completion of the project were analyzed at the intersections of:

1. SR 6/ US 278 (C.H. James Parkway) at Brownsville Road
2. Brownsville Road at Oglesby Road/ Zaxby's Driveway
3. Oglesby Road at Access Road
4. Brownsville Road at Site Driveway 1
5. Oglesby Road at Site Driveway 2

The analysis included the evaluation of future operations for "No-Build" and "Build" conditions, with the differences between "No-Build" and "Build" accounting for an increase in traffic due to the proposed development.

The results of the future "No-Build" conditions analysis indicates that the signalized study intersection will operate at an overall level of service "C" in AM peak hour and level of service "D" in PM peak hour. The southbound approach of Brownsville Road (intersection # 1) will continue to operate at LOS "E" in both peak hours. The stop-controlled Oglesby Road approach at Brownsville Road will continue to operate at a level of service "F' in PM peak hour.

The results of the future "Build" conditions analysis indicates that the signalized study intersection will continue to operate at an overall level of service "C" in AM peak hour and level of service "D" in PM peak hour as in "No-Build" conditions with its southbound approach of Brownsville Road continuing to operate at LOS "E" in both peak hours. The stop-controlled Oglesby Road approach at Brownsville Road will also continue to operate at a level of service "F" in PM peak hour. It is not unusual for stop-controlled side-streets along arterial roadways to have elevated delays during peak periods as delays caused by side-streets wait times to turn left onto the mainline.

The stop-controlled westbound site driveway approach on Brownsville Road will operate at satisfactory level of service "C" in AM peak hour and level of service "E" in PM peak hour with delays of 45.1 seconds. The low left-turn volumes exiting the site driveway will not warrant installation of a traffic signal. It is not unusual for stop-controlled side-streets along arterial roadways to have elevated delays during peak periods as delays caused by side-streets wait times to turn left onto the mainline.

7.1 Recommendation for Site Access Configuration

The following access configuration is recommended for the proposed site driveway intersections.

- Site Driveway - 1: Full access driveway on Brownsville Road
    - One entering lane and one exiting lane.
    - Stop-sign controlled on the driveway approach with Brownsville Road remaining free flow.
    - A left turn lane and right-turn lane for entering traffic on Brownsville Road.
    - Provide/confirm adequate sight distance per AASHTO standards.

- Site Driveway - 2: Full access driveway on Access Road
    - One entering and one exiting lanes.
    - Stop-sign controlled on the driveway approach with Access Road remaining free flow.
    - Provide/confirm adequate sight distance per AASHTO standards.

Appendix

EXISTING INTERSECTION TRAFFIC COUNTS

A & R Engineering, Inc.

2160 Kingston Court Suite 'O'
Marietta, GA 30067

TMC Data
Brownsville Road @ C H James Pkwy
7-9 am | 4-6 pm

File Name : 20240400
Site Code : 20240400
Start Date : 10-22-2024
Page No : 1

Groups Printed- Cars, Buses & Trucks

	Brownsville Road Northbound				Brownsville Road Southbound				C H James Pkwy Eastbound				C H James Pkwy Westbound				
Start Time	Left	Thru	Right	App. Total	Left	Thru	Right	App. Total	Left	Thru	Right	App. Total	Left	Thru	Right	App. Total	Int. Total
07:00 AM	101	56	22	179	11	10	0	21	6	425	34	465	9	180	5	194	859
07:15 AM	61	51	30	142	6	22	0	28	5	432	54	491	10	208	4	222	883
07:30 AM	104	57	21	182	9	25	1	35	8	353	41	402	13	197	9	219	838
07:45 AM	93	70	15	178	7	38	0	45	10	300	56	366	7	205	6	218	807
Total	359	234	88	681	33	95	1	129	29	1510	185	1724	39	790	24	853	3387
08:00 AM	93	52	17	162	2	32	1	35	3	328	65	396	7	163	5	175	768
08:15 AM	97	58	17	172	7	34	0	41	6	272	52	330	12	185	4	201	744
08:30 AM	73	46	13	132	10	29	0	39	1	278	54	333	14	203	2	219	723
08:45 AM	65	30	15	110	6	31	0	37	6	254	44	304	5	153	0	158	609
Total	328	186	62	576	25	126	1	152	16	1132	215	1363	38	704	11	753	2844
*** BREAK ***																	
04:00 PM	53	32	14	99	6	76	0	82	0	181	101	282	33	414	9	456	919
04:15 PM	62	42	19	123	4	59	2	65	5	191	112	308	37	383	12	432	928
04:30 PM	53	42	11	106	9	65	0	74	3	188	110	301	40	403	9	452	933
04:45 PM	49	46	10	105	6	76	1	83	4	179	123	306	41	367	5	413	907
Total	217	162	54	433	25	276	3	304	12	739	446	1197	151	1567	35	1753	3687
05:00 PM	57	47	12	116	4	81	1	86	2	204	114	320	42	400	7	449	971
05:15 PM	54	69	7	130	4	85	0	89	3	204	125	332	52	395	4	451	1002
05:30 PM	60	30	11	101	3	67	2	72	4	184	132	320	35	332	5	372	865
05:45 PM	59	45	10	114	5	68	0	73	3	194	128	325	51	271	4	326	838
Total	230	191	40	461	16	301	3	320	12	786	499	1297	180	1398	20	1598	3676
Grand Total	1134	773	244	2151	99	798	8	905	69	4167	1345	5581	408	4459	90	4957	13594
Apprch %	52.7	35.9	11.3		10.9	88.2	0.9		1.2	74.7	24.1		8.2	90	1.8		
Total %	8.3	5.7	1.8	15.8	0.7	5.9	0.1	6.7	0.5	30.7	9.9	41.1	3	32.8	0.7	36.5	

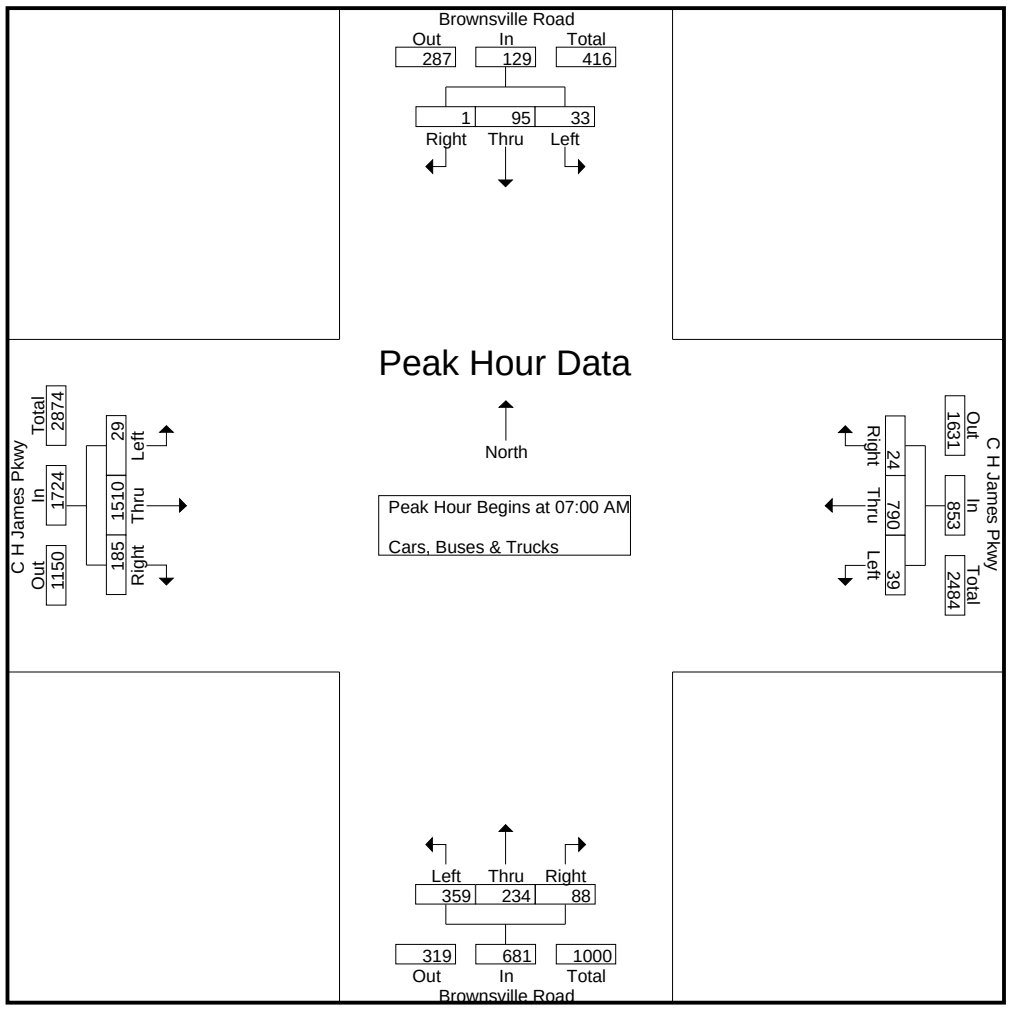
A & R Engineering, Inc.

2160 Kingston Court Suite 'O'
Marietta, GA 30067

TMC Data
Brownsville Road @ C H James Pkwy
7-9 am | 4-6 pm

File Name : 20240400
Site Code : 20240400
Start Date : 10-22-2024
Page No : 2

	Brownsville Road Northbound				Brownsville Road Southbound				C H James Pkwy Eastbound				C H James Pkwy Westbound				
Start Time	Left	Thru	Right	App. Total	Left	Thru	Right	App. Total	Left	Thru	Right	App. Total	Left	Thru	Right	App. Total	Int. Total
Peak Hour Analysis From 07:00 AM to 08:45 AM - Peak 1 of 1																	
Peak Hour for Entire Intersection Begins at 07:00 AM																	
07:00 AM	101	56	22	179	**11**	10	0	21	6	425	34	465	9	180	5	194	859
07:15 AM	61	51	**30**	142	6	22	0	28	5	**432**	54	**491**	10	**208**	4	**222**	**883**
07:30 AM	**104**	57	21	**182**	9	25	**1**	35	8	353	41	402	**13**	197	**9**	219	838
07:45 AM	93	**70**	15	178	7	**38**	0	**45**	**10**	300	**56**	366	7	205	6	218	807
Total Volume	359	234	88	681	33	95	1	129	29	1510	185	1724	39	790	24	853	3387
% App. Total	52.7	34.4	12.9		25.6	73.6	0.8		1.7	87.6	10.7		4.6	92.6	2.8		
PHF	.863	.836	.733	.935	.750	.625	.250	.717	.725	.874	.826	.878	.750	.950	.667	.961	.959



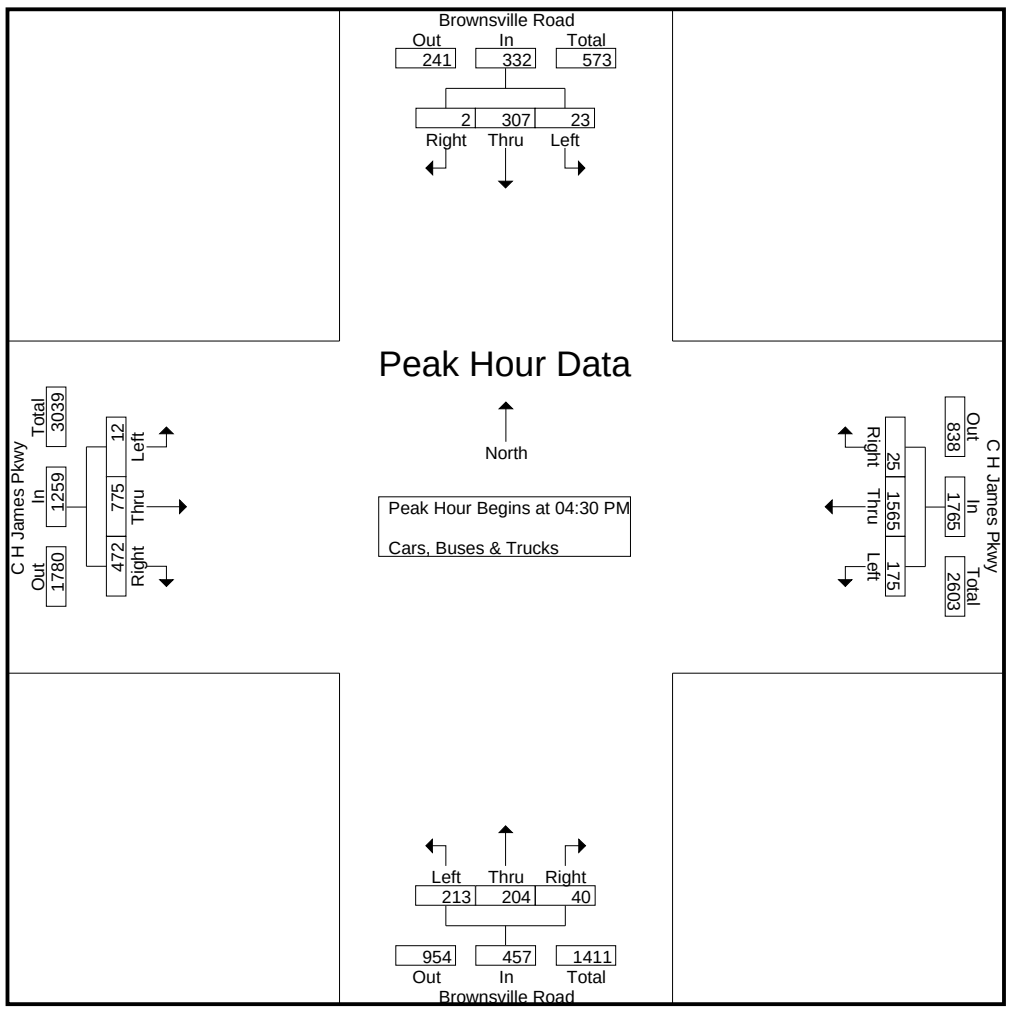
A & R Engineering, Inc.

2160 Kingston Court Suite 'O'
Marietta, GA 30067

TMC Data
Brownsville Road @ C H James Pkwy
7-9 am | 4-6 pm

File Name : 20240400
Site Code : 20240400
Start Date : 10-22-2024
Page No : 3

	Brownsville Road Northbound				Brownsville Road Southbound				C H James Pkwy Eastbound				C H James Pkwy Westbound				
Start Time	Left	Thru	Right	App. Total	Left	Thru	Right	App. Total	Left	Thru	Right	App. Total	Left	Thru	Right	App. Total	Int. Total
Peak Hour Analysis From 04:00 PM to 05:45 PM - Peak 1 of 1																	
Peak Hour for Entire Intersection Begins at 04:30 PM																	
04:30 PM	53	42	11	106	**9**	65	0	74	3	188	110	301	40	**403**	**9**	**452**	933
04:45 PM	49	46	10	105	6	76	**1**	83	**4**	179	123	306	41	367	5	413	907
05:00 PM	**57**	47	**12**	116	4	81	1	86	2	**204**	114	320	42	400	7	449	971
05:15 PM	54	**69**	7	**130**	4	**85**	0	**89**	3	204	**125**	**332**	**52**	395	4	451	**1002**
Total Volume	213	204	40	457	23	307	2	332	12	775	472	1259	175	1565	25	1765	3813
% App. Total	46.6	44.6	8.8		6.9	92.5	0.6		1	61.6	37.5		9.9	88.7	1.4		
PHF	.934	.739	.833	.879	.639	.903	.500	.933	.750	.950	.944	.948	.841	.971	.694	.976	.951



A & R Engineering, Inc.

2160 Kingston Court, Suite 'O'
Marietta, GA 30067

TMC Data
Brownsville Road @ Oglesby Road-
Zaxby's Drwy
7-9 am | 4-6 pm

File Name : 20240399
Site Code : 20240399
Start Date : 10-22-2024
Page No : 1

Groups Printed- Cars, Buses & Trucks

	Brownsville Rd Northbound				Brownsville Rd Southbound				Zaxbys Chicken Fingers & Buffalo Wings Drwy Eastbound				Oglesby Rd Westbound				
Start Time	Left	Thru	Right	App. Total	Left	Thru	Right	App. Total	Left	Thru	Right	App. Total	Left	Thru	Right	App. Total	Int. Total
07:00 AM	0	167	32	199	0	44	1	45	0	0	0	0	6	0	3	9	253
07:15 AM	0	162	40	202	3	46	1	50	0	0	0	0	4	0	0	4	256
07:30 AM	0	149	33	182	2	72	0	74	0	0	0	0	3	0	1	4	260
07:45 AM	0	157	21	178	1	72	0	73	0	0	0	0	12	1	4	17	268
Total	0	635	126	761	6	234	2	242	0	0	0	0	25	1	8	34	1037
08:00 AM	1	196	27	224	3	94	0	97	0	0	0	0	3	0	4	7	328
08:15 AM	0	170	23	193	5	90	0	95	0	0	0	0	2	1	4	7	295
08:30 AM	1	133	15	149	4	94	0	98	2	0	0	2	3	0	2	5	254
08:45 AM	0	121	18	139	1	97	0	98	0	0	0	0	5	0	5	10	247
Total	2	620	83	705	13	375	0	388	2	0	0	2	13	1	15	29	1124
*** BREAK ***																	
04:00 PM	1	89	4	94	8	192	0	200	2	1	2	5	7	2	7	16	315
04:15 PM	2	82	12	96	10	190	2	202	1	1	8	10	8	1	9	18	326
04:30 PM	2	114	10	126	7	177	4	188	3	2	6	11	11	3	7	21	346
04:45 PM	5	94	16	115	7	193	3	203	2	1	7	10	14	1	8	23	351
Total	10	379	42	431	32	752	9	793	8	5	23	36	40	7	31	78	1338
05:00 PM	1	96	8	105	3	221	6	230	3	2	8	13	11	2	6	19	367
05:15 PM	4	102	8	114	9	249	1	259	2	0	10	12	6	0	11	17	402
05:30 PM	1	117	11	129	7	233	0	240	1	3	7	11	10	1	3	14	394
05:45 PM	1	101	15	117	3	241	0	244	1	1	2	4	6	0	8	14	379
Total	7	416	42	465	22	944	7	973	7	6	27	40	33	3	28	64	1542
Grand Total	19	2050	293	2362	73	2305	18	2396	17	11	50	78	111	12	82	205	5041
Apprch %	0.8	86.8	12.4		3	96.2	0.8		21.8	14.1	64.1		54.1	5.9	40		
Total %	0.4	40.7	5.8	46.9	1.4	45.7	0.4	47.5	0.3	0.2	1	1.5	2.2	0.2	1.6	4.1	

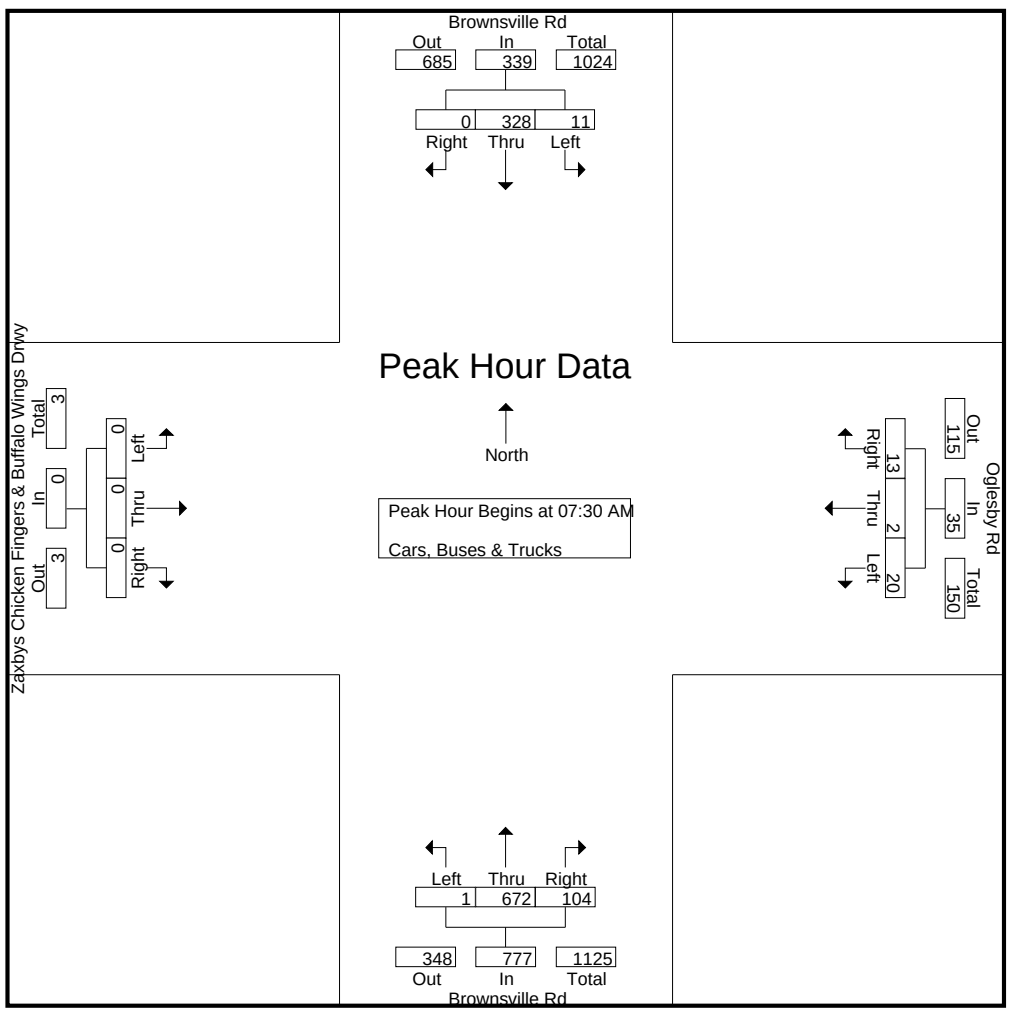
A & R Engineering, Inc.

2160 Kingston Court, Suite 'O'
Marietta, GA 30067

TMC Data
Brownsville Road @ Oglesby Road-
Zaxby's Drwy
7-9 am | 4-6 pm

File Name : 20240399
Site Code : 20240399
Start Date : 10-22-2024
Page No : 2

	Brownsville Rd Northbound				Brownsville Rd Southbound				Zaxbys Chicken Fingers & Buffalo Wings Drwy Eastbound				Oglesby Rd Westbound				
Start Time	Left	Thru	Right	App. Total	Left	Thru	Right	App. Total	Left	Thru	Right	App. Total	Left	Thru	Right	App. Total	Int. Total
Peak Hour Analysis From 07:00 AM to 08:45 AM - Peak 1 of 1																	
Peak Hour for Entire Intersection Begins at 07:30 AM																	
07:30 AM	0	149	**33**	182	2	72	0	74	0	0	0	0	3	0	1	4	260
07:45 AM	0	157	21	178	1	72	0	73	0	0	0	0	**12**	**1**	**4**	**17**	268
08:00 AM	**1**	**196**	27	**224**	3	**94**	0	**97**	0	0	0	0	3	0	4	7	**328**
08:15 AM	0	170	23	193	**5**	90	0	95	0	0	0	0	2	1	4	7	295
Total Volume	1	672	104	777	11	328	0	339	0	0	0	0	20	2	13	35	1151
% App. Total	0.1	86.5	13.4		3.2	96.8	0		0	0	0		57.1	5.7	37.1		
PHF	.250	.857	.788	.867	.550	.872	.000	.874	.000	.000	.000	.000	.417	.500	.813	.515	.877



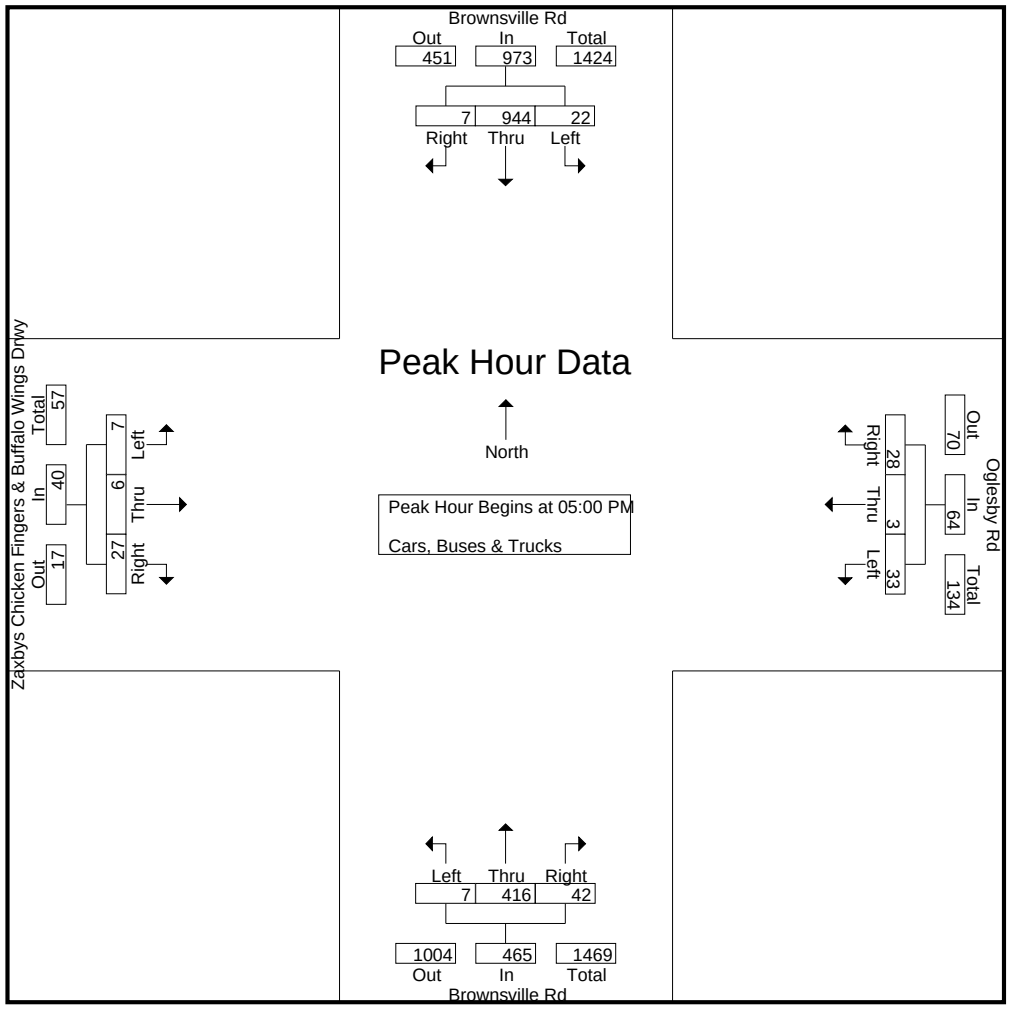
A & R Engineering, Inc.

2160 Kingston Court, Suite 'O'
Marietta, GA 30067

TMC Data
Brownsville Road @ Oglesby Road-
Zaxby's Drwy
7-9 am | 4-6 pm

File Name : 20240399
Site Code : 20240399
Start Date : 10-22-2024
Page No : 3

	Brownsville Rd Northbound				Brownsville Rd Southbound				Zaxbys Chicken Fingers & Buffalo Wings Drwy Eastbound				Oglesby Rd Westbound				
Start Time	Left	Thru	Right	App. Total	Left	Thru	Right	App. Total	Left	Thru	Right	App. Total	Left	Thru	Right	App. Total	Int. Total
Peak Hour Analysis From 04:00 PM to 05:45 PM - Peak 1 of 1																	
Peak Hour for Entire Intersection Begins at 05:00 PM																	
05:00 PM	1	96	8	105	3	221	**6**	230	**3**	2	8	**13**	**11**	**2**	6	**19**	367
05:15 PM	**4**	102	8	114	**9**	**249**	1	**259**	2	0	**10**	12	6	0	**11**	17	**402**
05:30 PM	1	**117**	11	**129**	7	233	0	240	1	**3**	7	11	10	1	3	14	394
05:45 PM	1	101	**15**	117	3	241	0	244	1	1	2	4	6	0	8	14	379
Total Volume	7	416	42	465	22	944	7	973	7	6	27	40	33	3	28	64	1542
% App. Total	1.5	89.5	9		2.3	97	0.7		17.5	15	67.5		51.6	4.7	43.8		
PHF	.438	.889	.700	.901	.611	.948	.292	.939	.583	.500	.675	.769	.750	.375	.636	.842	.959



A & R Engineering, Inc.

2160 Kingston Court, Suite 'O'
Marietta, GA 30067

TMC Data
Oglesby Road @ Access Road
7-9 am | 4-6 pm

File Name : 20240401
Site Code : 20240401
Start Date : 10-22-2024
Page No : 1

Groups Printed- Cars, Buses & Trucks

	Northbound				Access Road Southbound				Oglesby Road Eastbound				Oglesby Road Westbound				
Start Time	Left	Thru	Right	App. Total	Left	Thru	Right	App. Total	Left	Thru	Right	App. Total	Left	Thru	Right	App. Total	Int. Total
07:00 AM	0	0	0	0	5	0	2	7	0	48	0	48	0	2	0	2	57
07:15 AM	0	0	0	0	6	0	0	6	0	35	0	35	0	5	0	5	46
07:30 AM	0	0	0	0	2	0	0	2	0	30	0	30	0	14	0	14	46
07:45 AM	0	0	0	0	1	0	0	1	1	25	0	26	0	8	0	8	35
Total	0	0	0	0	14	0	2	16	1	138	0	139	0	29	0	29	184
08:00 AM	0	0	0	0	0	0	1	1	2	28	0	30	0	6	2	8	39
08:15 AM	0	0	0	0	0	0	0	0	0	22	0	22	0	6	2	8	30
08:30 AM	0	0	0	0	4	0	1	5	0	16	0	16	0	8	1	9	30
08:45 AM	0	0	0	0	1	0	0	1	0	15	0	15	0	10	2	12	28
Total	0	0	0	0	5	0	2	7	2	81	0	83	0	30	7	37	127
*** BREAK ***																	
04:00 PM	0	0	0	0	1	0	0	1	1	13	0	14	0	23	0	23	38
04:15 PM	0	0	0	0	1	0	0	1	1	17	0	18	0	19	6	25	44
04:30 PM	0	0	0	0	3	0	1	4	1	20	0	21	0	23	5	28	53
04:45 PM	0	0	0	0	5	0	1	6	0	19	0	19	0	17	1	18	43
Total	0	0	0	0	10	0	2	12	3	69	0	72	0	82	12	94	178
05:00 PM	0	0	0	0	2	0	1	3	0	13	0	13	0	10	3	13	29
05:15 PM	0	0	0	0	0	0	0	0	1	25	0	26	0	18	1	19	45
05:30 PM	0	0	0	0	0	0	0	0	1	13	0	14	0	15	2	17	31
05:45 PM	0	0	0	0	1	0	0	1	0	25	0	25	0	15	2	17	43
Total	0	0	0	0	3	0	1	4	2	76	0	78	0	58	8	66	148
Grand Total	0	0	0	0	32	0	7	39	8	364	0	372	0	199	27	226	637
Apprch %	0	0	0		82.1	0	17.9		2.2	97.8	0		0	88.1	11.9		
Total %	0	0	0	0	5	0	1.1	6.1	1.3	57.1	0	58.4	0	31.2	4.2	35.5	

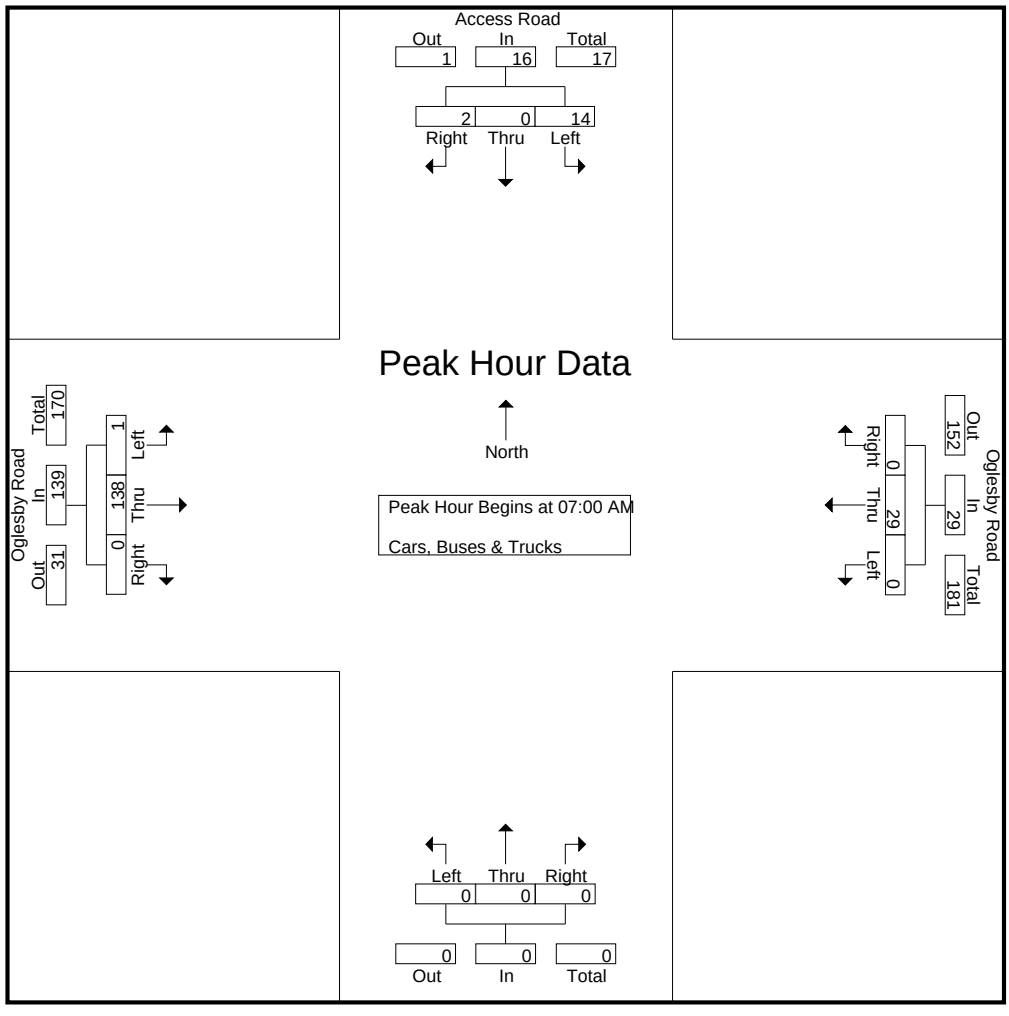
A & R Engineering, Inc.

2160 Kingston Court, Suite 'O'
Marietta, GA 30067

TMC Data
Oglesby Road @ Access Road
7-9 am | 4-6 pm

File Name : 20240401
Site Code : 20240401
Start Date : 10-22-2024
Page No : 2

	Northbound				Access Road Southbound				Oglesby Road Eastbound				Oglesby Road Westbound				
Start Time	Left	Thru	Right	App. Total	Left	Thru	Right	App. Total	Left	Thru	Right	App. Total	Left	Thru	Right	App. Total	Int. Total
Peak Hour Analysis From 07:00 AM to 08:45 AM - Peak 1 of 1																	
Peak Hour for Entire Intersection Begins at 07:00 AM																	
07:00 AM	0	0	0	0	5	0	**2**	**7**	0	**48**	0	**48**	0	2	0	2	**57**
07:15 AM	0	0	0	0	**6**	0	0	6	0	35	0	35	0	5	0	5	46
07:30 AM	0	0	0	0	2	0	0	2	0	30	0	30	0	**14**	0	**14**	46
07:45 AM	0	0	0	0	1	0	0	1	**1**	25	0	26	0	8	0	8	35
Total Volume	0	0	0	0	14	0	2	16	1	138	0	139	0	29	0	29	184
% App. Total	0	0	0		87.5	0	12.5		0.7	99.3	0		0	100	0		
PHF	.000	.000	.000	.000	.583	.000	.250	.571	.250	.719	.000	.724	.000	.518	.000	.518	.807



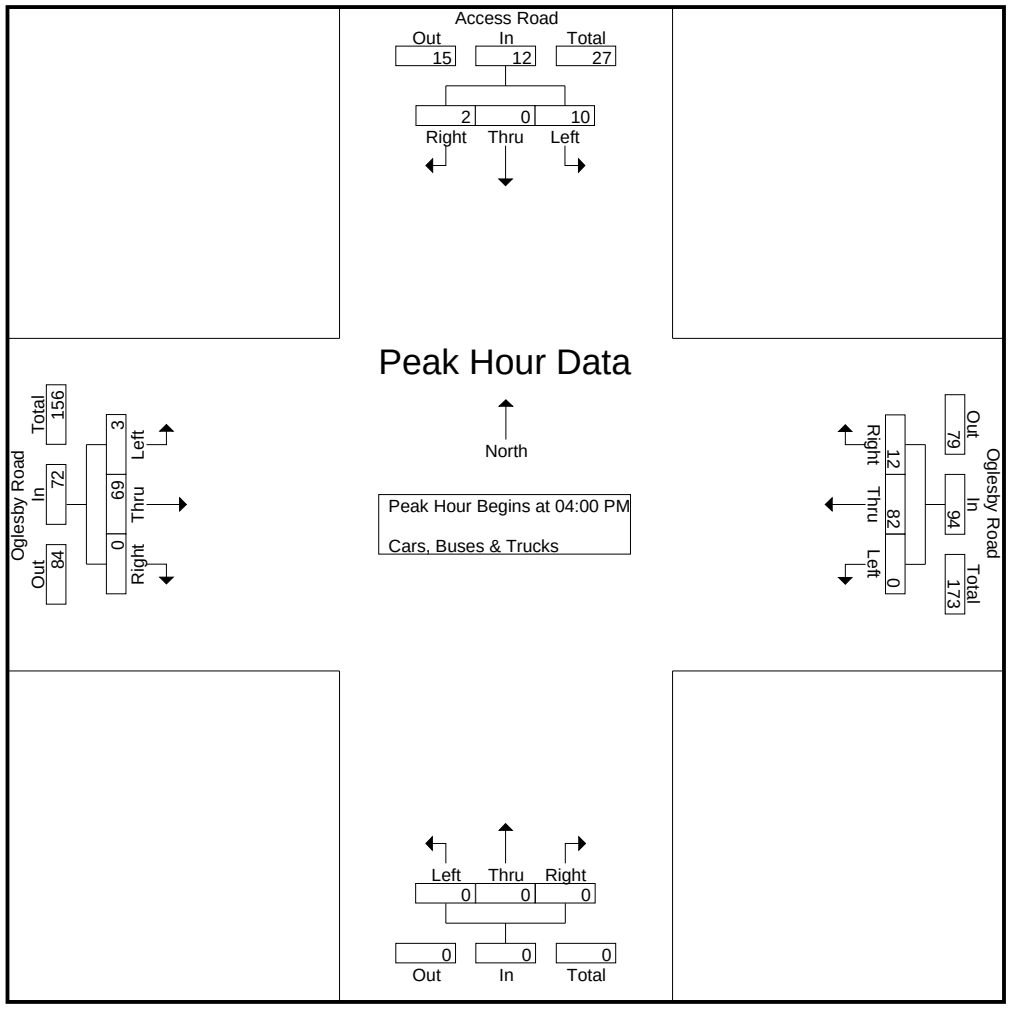
A & R Engineering, Inc.

2160 Kingston Court, Suite 'O'
Marietta, GA 30067

TMC Data
Oglesby Road @ Access Road
7-9 am | 4-6 pm

File Name : 20240401
Site Code : 20240401
Start Date : 10-22-2024
Page No : 3

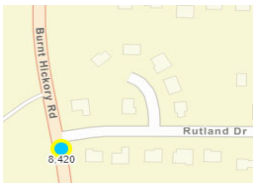
	Northbound				Access Road Southbound				Oglesby Road Eastbound				Oglesby Road Westbound				
Start Time	Left	Thru	Right	App. Total	Left	Thru	Right	App. Total	Left	Thru	Right	App. Total	Left	Thru	Right	App. Total	Int. Total
Peak Hour Analysis From 04:00 PM to 05:45 PM - Peak 1 of 1																	
Peak Hour for Entire Intersection Begins at 04:00 PM																	
04:00 PM	0	0	0	0	1	0	0	1	**1**	13	0	14	0	**23**	0	23	38
04:15 PM	0	0	0	0	1	0	0	1	1	17	0	18	0	19	**6**	25	44
04:30 PM	0	0	0	0	3	0	**1**	4	1	**20**	0	**21**	0	23	5	**28**	**53**
04:45 PM	0	0	0	0	**5**	0	1	**6**	0	19	0	19	0	17	1	18	43
Total Volume	0	0	0	0	10	0	2	12	3	69	0	72	0	82	12	94	178
% App. Total	0	0	0		83.3	0	16.7		4.2	95.8	0		0	87.2	12.8		
PHF	.000	.000	.000	.000	.500	.000	.500	.500	.750	.863	.000	.857	.000	.891	.500	.839	.840

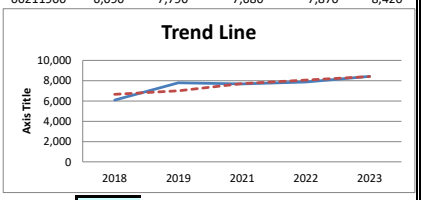


LINEAR REGRESSION OF DAILY TRAFFIC

Location	Growth Rate	R Squared	Station ID	Route	2018	2019	2021	2022	2023
Burnt Hickory Rd (S of Rutland D	6.0%	0.68	067-3019	00211900	6,090	7,790	7,680	7,870	8,420
Brownsville Rd (NE of McEacher	-0.2%	0.01	067-0958	00211800	12,000	11,200	11,100	11,600	11,700
Powder Springs Dallas Rd (SE of	6.2%	0.77	067-0261	00451617	7,290	8,230	8,200	8,530	9,910
Brownsville Rd (NE of Hill Rd)	-5.6%	0.60	067-0961	00211800	8,000	6,390	6,360	6,620	5,800
SR 6/ US 278 (C H James Pkwy) (	0.3%	0.13	067-2328	00000600	33,000	32,500	32,400	33,700	33,000
Weighted Average	**1.0%**	0.57	Sum of Count Stations =		66,380	66,110	65,740	68,320	68,830

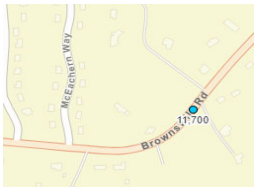
Location	Traffic Counter	RCLINK	2018	2019	2021	2022	2023
Burnt Hickory Rd (S of Rutland Dr)	067-3019	00211900	6,090	7,790	7,680	7,870	8,420

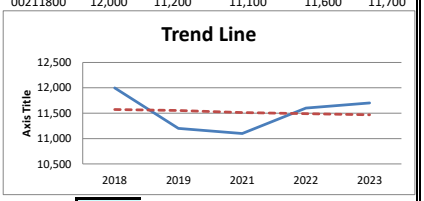




Growth Rate		6.0%	Intercept	-6,97,290	Slope	348.84
Trend Line		6,663	7,012	7,710	8,058	8,407

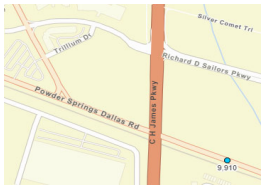
Location	Traffic Counter	RCLINK	2018	2019	2021	2022	2023
Brownsville Rd (NE of McEachern Way)	067-0958	00211800	12,000	11,200	11,100	11,600	11,700

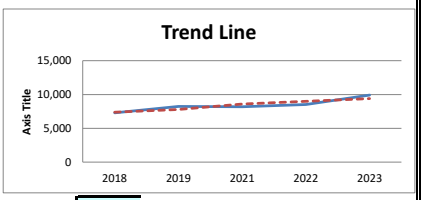




Growth Rate		-0.2%	Intercept	53,812	Slope	-20.93
Trend Line		11,574	11,553	11,512	11,491	11,470

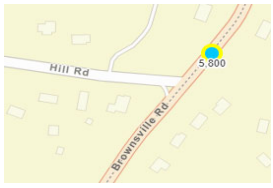
Location	Traffic Counter	RCLINK	2018	2019	2021	2022	2023
Powder Springs Dallas Rd (SE of SR 6/ US 278 (C H James Pkwy))	067-0261	00451617	7,290	8,230	8,200	8,530	9,910

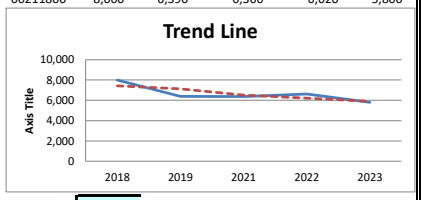




Growth Rate		6.2%	Intercept	-8,00,278	Slope	400.23
Trend Line		7,391	7,792	8,592	8,992	9,393

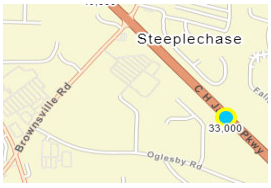
Location	Traffic Counter	RCLINK	2018	2019	2021	2022	2023
Brownsville Rd (NE of Hill Rd)	067-0961	00211800	8,000	6,390	6,360	6,620	5,800

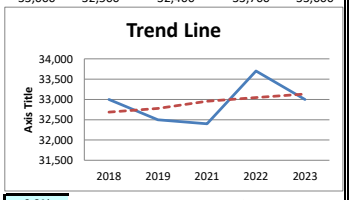




Growth Rate		-5.6%	Intercept	6,28,321	Slope	-307.67
Trend Line		7,434	7,126	6,511	6,203	5,896

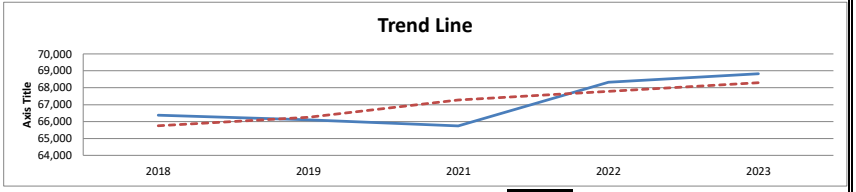
Location	Traffic Counter	RCLINK	2018	2019	2021	2022	2023
SR 6/ US 278 (C H James Pkwy) (SE of Brownsville Rd)	067-2328	00000600	33,000	32,500	32,400	33,700	33,000





Growth Rate		0.3%	Intercept	-1,47,994	Slope	89.53
Trend Line		32,687	32,777	32,956	33,045	33,135

Weighted Average	2018	2019	2021	2022	2023
Sum of Count Stations	66,380	66,110	65,740	68,320	68,830



Growth Rate		1.0%	Intercept	-9,63,430	Slope	510.00
Trend Line		65,750	66,260	67,280	67,790	68,300

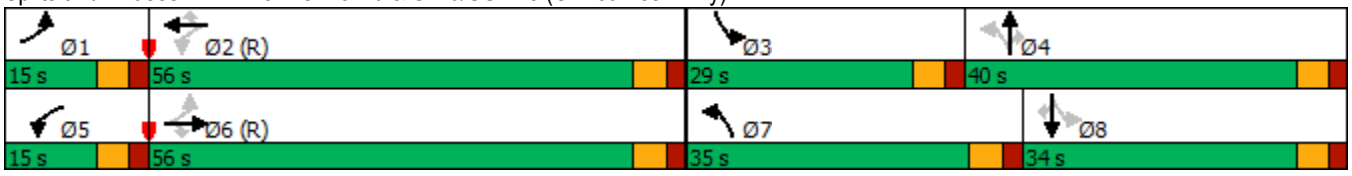
EXISTING INTERSECTION ANALYSIS

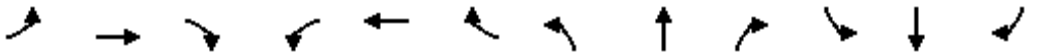
Lane Group	EBL	EBT	EBR	WBL	WBT	WBR	NBL	NBT	NBR	SBL	SBT	SBR
Lane Configurations												
Traffic Volume (vph)	29	1510	185	39	790	24	359	234	88	33	95	1
Future Volume (vph)	29	1510	185	39	790	24	359	234	88	33	95	1
Lane Group Flow (vph)	30	1573	193	41	823	25	374	244	92	34	99	1
Turn Type	pm+pt	NA	Perm	pm+pt	NA	Perm	pm+pt	NA	Perm	pm+pt	NA	Perm
Protected Phases	1	6		5	2		7	4		3	8	
Permitted Phases	6		6	2		2	4		4	8		8
Detector Phase	1	6	6	5	2	2	7	4	4	3	8	8
Switch Phase												
Minimum Initial (s)	4.0	15.0	15.0	4.0	15.0	15.0	4.0	6.0	6.0	4.0	6.0	6.0
Minimum Split (s)	15.0	39.5	39.5	15.0	39.5	39.5	15.0	40.5	40.5	15.0	40.5	40.5
Total Split (s)	15.0	56.0	56.0	15.0	56.0	56.0	35.0	40.0	40.0	29.0	34.0	34.0
Total Split (%)	10.7%	40.0%	40.0%	10.7%	40.0%	40.0%	25.0%	28.6%	28.6%	20.7%	24.3%	24.3%
Yellow Time (s)	3.5	3.5	3.5	3.5	3.5	3.5	3.5	3.5	3.5	3.5	3.5	3.5
All-Red Time (s)	2.0	2.0	2.0	2.0	2.0	2.0	2.0	2.0	2.0	2.0	2.0	2.0
Lost Time Adjust (s)	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
Total Lost Time (s)	5.5	5.5	5.5	5.5	5.5	5.5	5.5	5.5	5.5	5.5	5.5	5.5
Lead/Lag	Lead	Lag	Lag	Lead	Lag	Lag	Lead	Lag	Lag	Lead	Lag	Lag
Lead-Lag Optimize?	Yes	Yes	Yes	Yes	Yes	Yes	Yes	Yes	Yes	Yes	Yes	Yes
Recall Mode	None	C-Min	C-Min	None	C-Min	C-Min	None	None	None	None	None	None
v/c Ratio	0.09	0.89	0.22	0.30	0.47	0.03	0.79	0.47	0.18	0.17	0.58	0.00
Control Delay	14.5	39.4	6.7	19.9	23.5	0.0	51.6	46.2	6.0	34.2	73.8	0.0
Queue Delay	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
Total Delay	14.5	39.4	6.7	19.9	23.5	0.0	51.6	46.2	6.0	34.2	73.8	0.0
Queue Length 50th (ft)	11	686	21	15	260	0	284	193	0	21	88	0
Queue Length 95th (ft)	28	#940	72	36	350	0	374	275	34	44	145	0
Internal Link Dist (ft)		1243			1478			763			1078	
Turn Bay Length (ft)	245		285	230		300	250		435	297		300
Base Capacity (vph)	366	1773	866	163	1741	909	478	517	515	401	379	440
Starvation Cap Reductn	0	0	0	0	0	0	0	0	0	0	0	0
Spillback Cap Reductn	0	0	0	0	0	0	0	0	0	0	0	0
Storage Cap Reductn	0	0	0	0	0	0	0	0	0	0	0	0
Reduced v/c Ratio	0.08	0.89	0.22	0.25	0.47	0.03	0.78	0.47	0.18	0.08	0.26	0.00

Intersection Summary

Cycle Length: 140
Actuated Cycle Length: 140
Offset: 0 (0%), Referenced to phase 2:WBTL and 6:EBTL, Start of Green
Natural Cycle: 140
Control Type: Actuated-Coordinated
95th percentile volume exceeds capacity, queue may be longer.
Queue shown is maximum after two cycles.

Splits and Phases: 1: Brownsville Rd & SR 6/US 278 (C.H.James Pkwy)





Movement	EBL	EBT	EBR	WBL	WBT	WBR	NBL	NBT	NBR	SBL	SBT	SBR
Lane Configurations												
Traffic Volume (veh/h)	29	1510	185	39	790	24	359	234	88	33	95	1
Future Volume (veh/h)	29	1510	185	39	790	24	359	234	88	33	95	1
Initial Q (Qb), veh	0	0	0	0	0	0	0	0	0	0	0	0
Ped-Bike Adj(A_pbT)	1.00		1.00	1.00		1.00	1.00		1.00	1.00		1.00
Parking Bus, Adj	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00
Work Zone On Approach		No			No			No			No	
Adj Sat Flow, veh/h/ln	1870	1841	1841	1781	1752	1870	1870	1870	1870	1870	1870	1870
Adj Flow Rate, veh/h	30	1573	193	41	823	25	374	244	92	34	99	0
Peak Hour Factor	0.96	0.96	0.96	0.96	0.96	0.96	0.96	0.96	0.96	0.96	0.96	0.96
Percent Heavy Veh, %	2	4	4	8	10	2	2	2	2	2	2	2
Cap, veh/h	348	1914	854	136	1832	872	437	466	395	165	127	
Arrive On Green	0.02	0.55	0.55	0.02	0.55	0.55	0.20	0.25	0.25	0.02	0.07	0.00
Sat Flow, veh/h	1781	3497	1560	1697	3328	1585	1781	1870	1585	1781	1870	1585
Grp Volume(v), veh/h	30	1573	193	41	823	25	374	244	92	34	99	0
Grp Sat Flow(s),veh/h/ln	1781	1749	1560	1697	1664	1585	1781	1870	1585	1781	1870	1585
Q Serve(g_s), s	1.0	51.8	8.9	1.5	20.7	1.0	26.5	15.8	6.5	2.5	7.3	0.0
Cycle Q Clear(g_c), s	1.0	51.8	8.9	1.5	20.7	1.0	26.5	15.8	6.5	2.5	7.3	0.0
Prop In Lane	1.00		1.00	1.00		1.00	1.00		1.00	1.00		1.00
Lane Grp Cap(c), veh/h	348	1914	854	136	1832	872	437	466	395	165	127	
V/C Ratio(X)	0.09	0.82	0.23	0.30	0.45	0.03	0.86	0.52	0.23	0.21	0.78	
Avail Cap(c_a), veh/h	434	1914	854	212	1832	872	447	466	395	421	381	
HCM Platoon Ratio	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00
Upstream Filter(I)	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	0.00
Uniform Delay (d), s/veh	14.9	26.1	16.4	24.7	18.8	14.4	45.4	45.4	41.9	58.9	64.2	0.0
Incr Delay (d2), s/veh	0.1	4.1	0.6	1.2	0.8	0.1	14.8	1.1	0.3	0.6	9.7	0.0
Initial Q Delay(d3),s/veh	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
%ile BackOfQ(50%),veh/ln	0.4	20.5	3.3	0.6	7.6	0.4	13.2	7.3	2.6	1.1	3.8	0.0
Unsig. Movement Delay, s/veh												
LnGrp Delay(d),s/veh	15.0	30.2	17.0	25.9	19.6	14.4	60.2	46.5	42.2	59.5	73.9	0.0
LnGrp LOS	B	C	B	C	B	B	E	D	D	E	E	
Approach Vol, veh/h		1796			889			710			133	
Approach Delay, s/veh		28.5			19.7			53.2			70.2	
Approach LOS		C			B			D			E	

Timer - Assigned Phs	1	2	3	4	5	6	7	8
Phs Duration (G+Y+Rc), s	8.3	82.5	8.8	40.4	8.7	82.1	34.2	15.0
Change Period (Y+Rc), s	5.5	5.5	5.5	5.5	5.5	5.5	5.5	5.5
Max Green Setting (Gmax), s	9.5	50.5	23.5	34.5	9.5	50.5	29.5	28.5
Max Q Clear Time (g_c+I1), s	3.0	22.7	4.5	17.8	3.5	53.8	28.5	9.3
Green Ext Time (p_c), s	0.0	20.2	0.1	0.5	0.0	0.0	0.2	0.2

Intersection Summary	
HCM 6th Ctrl Delay	32.8
HCM 6th LOS	C

Notes

User approved pedestrian interval to be less than phase max green.

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

Intersection	
Int Delay, s/veh	1

Movement	EBL	EBT	EBR	WBL	WBT	WBR	NBL	NBT	NBR	SBL	SBT	SBR
Lane Configurations												
Traffic Vol, veh/h	1	1	1	20	2	13	1	672	104	11	328	0
Future Vol, veh/h	1	1	1	20	2	13	1	672	104	11	328	0
Conflicting Peds, #/hr	0	0	0	0	0	0	0	0	0	0	0	0
Sign Control	Stop	Stop	Stop	Stop	Stop	Stop	Free	Free	Free	Free	Free	Free
RT Channelized	-	-	None	-	-	None	-	-	None	-	-	Yield
Storage Length	-	-	-	-	-	-	-	-	-	-	-	70
Veh in Median Storage, #	-	0	-	-	0	-	-	0	-	-	0	-
Grade, %	-	0	-	-	0	-	-	0	-	-	0	-
Peak Hour Factor	88	88	88	88	88	88	88	88	88	88	88	88
Heavy Vehicles, %	2	2	2	2	2	2	2	2	2	2	2	2
Mvmt Flow	1	1	1	23	2	15	1	764	118	13	373	0

Major/Minor	Minor2			Minor1			Major1			Major2		
Conflicting Flow All	1233	1283	373	1225	1224	823	373	0	0	882	0	0
Stage 1	399	399	-	825	825	-	-	-	-	-	-	-
Stage 2	834	884	-	400	399	-	-	-	-	-	-	-
Critical Hdwy	7.12	6.52	6.22	7.12	6.52	6.22	4.12	-	-	4.12	-	-
Critical Hdwy Stg 1	6.12	5.52	-	6.12	5.52	-	-	-	-	-	-	-
Critical Hdwy Stg 2	6.12	5.52	-	6.12	5.52	-	-	-	-	-	-	-
Follow-up Hdwy	3.518	4.018	3.318	3.518	4.018	3.318	2.218	-	-	2.218	-	-
Pot Cap-1 Maneuver	154	165	673	156	179	373	1185	-	-	767	-	-
Stage 1	627	602	-	367	387	-	-	-	-	-	-	-
Stage 2	362	363	-	626	602	-	-	-	-	-	-	-
Platoon blocked, %								-	-		-	-
Mov Cap-1 Maneuver	144	161	673	152	175	373	1185	-	-	767	-	-
Mov Cap-2 Maneuver	144	161	-	152	175	-	-	-	-	-	-	-
Stage 1	626	589	-	366	386	-	-	-	-	-	-	-
Stage 2	345	362	-	611	589	-	-	-	-	-	-	-

Approach	EB	WB	NB	SB
HCM Control Delay, s	22.9	27.8	0	0.3
HCM LOS	C	D		

Minor Lane/Major Mvmt	NBL	NBT	NBR	EBLn1	WBLn1	SBL	SBT	SBR
Capacity (veh/h)	1185	-	-	205	197	767	-	-
HCM Lane V/C Ratio	0.001	-	-	0.017	0.202	0.016	-	-
HCM Control Delay (s)	8	0	-	22.9	27.8	9.8	0	-
HCM Lane LOS	A	A	-	C	D	A	A	-
HCM 95th %tile Q(veh)	0	-	-	0.1	0.7	0.1	-	-

Intersection	
Int Delay, s/veh	0.9

Movement	EBL	EBT	WBT	WBR	SBL	SBR
Lane Configurations						
Traffic Vol, veh/h	1	138	29	0	14	2
Future Vol, veh/h	1	138	29	0	14	2
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	81	81	81	81	81	81
Heavy Vehicles, %	2	2	2	2	2	2
Mvmt Flow	1	170	36	0	17	2

Major/Minor	Major1		Major2		Minor2	
Conflicting Flow All	36	0	-	0	208	36
Stage 1	-	-	-	-	36	-
Stage 2	-	-	-	-	172	-
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	1575	-	-	-	780	1037
Stage 1	-	-	-	-	986	-
Stage 2	-	-	-	-	858	-
Platoon blocked, %			-	-	-	
Mov Cap-1 Maneuver	1575	-	-	-	779	1037
Mov Cap-2 Maneuver	-	-	-	-	779	-
Stage 1	-	-	-	-	985	-
Stage 2	-	-	-	-	858	-

Approach	EB	WB	SB
HCM Control Delay, s	0.1	0	9.6
HCM LOS			A

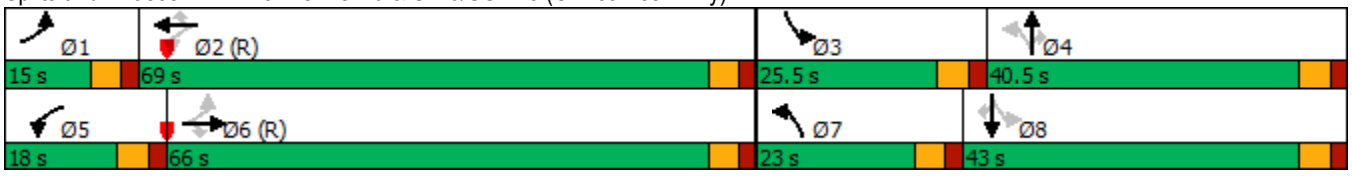
Minor Lane/Major Mvmt	EBL	EBT	WBT	WBR	SBLn1
Capacity (veh/h)	1575	-	-	-	804
HCM Lane V/C Ratio	0.001	-	-	-	0.025
HCM Control Delay (s)	7.3	0	-	-	9.6
HCM Lane LOS	A	A	-	-	A
HCM 95th %tile Q(veh)	0	-	-	-	0.1

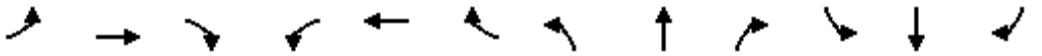
Lane Group	EBL	EBT	EBR	WBL	WBT	WBR	NBL	NBT	NBR	SBL	SBT	SBR
Lane Configurations												
Traffic Volume (vph)	12	775	472	175	1565	25	213	204	40	23	307	2
Future Volume (vph)	12	775	472	175	1565	25	213	204	40	23	307	2
Lane Group Flow (vph)	13	816	497	184	1647	26	224	215	42	24	323	2
Turn Type	pm+pt	NA	Perm	pm+pt	NA	Perm	pm+pt	NA	Perm	pm+pt	NA	Perm
Protected Phases	1	6		5	2		7	4		3	8	
Permitted Phases	6		6	2		2	4		4	8		8
Detector Phase	1	6	6	5	2	2	7	4	4	3	8	8
Switch Phase												
Minimum Initial (s)	4.0	15.0	15.0	4.0	15.0	15.0	4.0	6.0	6.0	4.0	6.0	6.0
Minimum Split (s)	15.0	39.5	39.5	15.0	39.5	39.5	15.0	40.5	40.5	15.0	40.5	40.5
Total Split (s)	15.0	66.0	66.0	18.0	69.0	69.0	23.0	40.5	40.5	25.5	43.0	43.0
Total Split (%)	10.0%	44.0%	44.0%	12.0%	46.0%	46.0%	15.3%	27.0%	27.0%	17.0%	28.7%	28.7%
Yellow Time (s)	3.5	3.5	3.5	3.5	3.5	3.5	3.5	3.5	3.5	3.5	3.5	3.5
All-Red Time (s)	2.0	2.0	2.0	2.0	2.0	2.0	2.0	2.0	2.0	2.0	2.0	2.0
Lost Time Adjust (s)	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
Total Lost Time (s)	5.5	5.5	5.5	5.5	5.5	5.5	5.5	5.5	5.5	5.5	5.5	5.5
Lead/Lag	Lead	Lag	Lag	Lead	Lag	Lag	Lead	Lag	Lag	Lead	Lag	Lag
Lead-Lag Optimize?	Yes	Yes	Yes	Yes	Yes	Yes	Yes	Yes	Yes	Yes	Yes	Yes
Recall Mode	None	C-Min	C-Min	None	C-Min	C-Min	None	None	None	None	None	None
v/c Ratio	0.11	0.53	0.51	0.54	0.87	0.03	0.78	0.38	0.08	0.08	0.85	0.00
Control Delay	18.6	32.4	5.5	22.9	37.2	0.1	53.8	43.5	0.3	30.3	77.0	0.0
Queue Delay	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
Total Delay	18.6	32.4	5.5	22.9	37.2	0.1	53.8	43.5	0.3	30.3	77.0	0.0
Queue Length 50th (ft)	5	305	18	85	668	0	160	172	0	15	306	0
Queue Length 95th (ft)	18	396	105	141	#1064	0	#224	242	0	34	402	0
Internal Link Dist (ft)		1243			1478			763			1078	
Turn Bay Length (ft)	245		285	230		300	250		435	297		300
Base Capacity (vph)	163	1541	970	349	1903	896	290	566	549	474	465	469
Starvation Cap Reductn	0	0	0	0	0	0	0	0	0	0	0	0
Spillback Cap Reductn	0	0	0	0	0	0	0	0	0	0	0	0
Storage Cap Reductn	0	0	0	0	0	0	0	0	0	0	0	0
Reduced v/c Ratio	0.08	0.53	0.51	0.53	0.87	0.03	0.77	0.38	0.08	0.05	0.69	0.00

Intersection Summary

Cycle Length: 150
Actuated Cycle Length: 150
Offset: 0 (0%), Referenced to phase 2:WBTL and 6:EBTL, Start of Green
Natural Cycle: 140
Control Type: Actuated-Coordinated
95th percentile volume exceeds capacity, queue may be longer.
Queue shown is maximum after two cycles.

Splits and Phases: 1: Brownsville Rd & SR 6/US 278 (C.H.James Pkwy)





Movement	EBL	EBT	EBR	WBL	WBT	WBR	NBL	NBT	NBR	SBL	SBT	SBR
Lane Configurations												
Traffic Volume (veh/h)	12	775	472	175	1565	25	213	204	40	23	307	2
Future Volume (veh/h)	12	775	472	175	1565	25	213	204	40	23	307	2
Initial Q (Qb), veh	0	0	0	0	0	0	0	0	0	0	0	0
Ped-Bike Adj(A_pbT)	1.00		1.00	1.00		1.00	1.00		1.00	1.00		1.00
Parking Bus, Adj	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00
Work Zone On Approach		No			No			No			No	
Adj Sat Flow, veh/h/ln	1870	1811	1870	1870	1870	1870	1870	1870	1870	1870	1870	1870
Adj Flow Rate, veh/h	13	816	497	184	1647	26	224	215	42	24	323	0
Peak Hour Factor	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95
Percent Heavy Veh, %	2	6	2	2	2	2	2	2	2	2	2	2
Cap, veh/h	111	1681	774	300	1925	859	268	530	450	289	352	
Arrive On Green	0.01	0.49	0.49	0.06	0.54	0.54	0.11	0.28	0.28	0.02	0.19	0.00
Sat Flow, veh/h	1781	3441	1585	1781	3554	1585	1781	1870	1585	1781	1870	1585
Grp Volume(v), veh/h	13	816	497	184	1647	26	224	215	42	24	323	0
Grp Sat Flow(s),veh/h/ln	1781	1721	1585	1781	1777	1585	1781	1870	1585	1781	1870	1585
Q Serve(g_s), s	0.6	23.8	35.0	7.5	59.4	1.1	14.8	14.0	2.9	1.6	25.4	0.0
Cycle Q Clear(g_c), s	0.6	23.8	35.0	7.5	59.4	1.1	14.8	14.0	2.9	1.6	25.4	0.0
Prop In Lane	1.00		1.00	1.00		1.00	1.00		1.00	1.00		1.00
Lane Grp Cap(c), veh/h	111	1681	774	300	1925	859	268	530	450	289	352	
V/C Ratio(X)	0.12	0.49	0.64	0.61	0.86	0.03	0.84	0.41	0.09	0.08	0.92	
Avail Cap(c_a), veh/h	204	1681	774	334	1925	859	275	530	450	497	468	
HCM Platoon Ratio	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00
Upstream Filter(I)	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	0.00
Uniform Delay (d), s/veh	28.1	25.7	28.6	19.7	29.4	16.0	43.3	43.5	39.5	48.1	59.8	0.0
Incr Delay (d2), s/veh	0.5	1.0	4.1	2.7	5.1	0.1	19.2	0.5	0.1	0.1	19.4	0.0
Initial Q Delay(d3),s/veh	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
%ile BackOfQ(50%),veh/ln	0.2	9.5	14.0	3.1	24.5	0.4	7.8	6.5	1.2	0.7	13.9	0.0
Unsig. Movement Delay, s/veh												
LnGrp Delay(d),s/veh	28.6	26.7	32.6	22.5	34.5	16.1	62.6	44.0	39.6	48.2	79.1	0.0
LnGrp LOS	C	C	C	C	C	B	E	D	D	D	E	
Approach Vol, veh/h		1326			1857			481			347	
Approach Delay, s/veh		29.0			33.0			52.3			77.0	
Approach LOS		C			C			D			E	

Timer - Assigned Phs	1	2	3	4	5	6	7	8
Phs Duration (G+Y+Rc), s	7.2	86.8	8.0	48.0	15.1	78.8	22.4	33.7
Change Period (Y+Rc), s	5.5	5.5	5.5	5.5	5.5	5.5	5.5	5.5
Max Green Setting (Gmax), s	9.5	63.5	20.0	35.0	12.5	60.5	17.5	37.5
Max Q Clear Time (g_c+I1), s	2.6	61.4	3.6	16.0	9.5	25.8	16.8	27.4
Green Ext Time (p_c), s	0.0	2.1	0.0	0.5	0.1	19.5	0.1	0.8

Intersection Summary	
HCM 6th Ctrl Delay	37.8
HCM 6th LOS	D

Notes

User approved pedestrian interval to be less than phase max green.

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

Intersection	
Int Delay, s/veh	3.3

Movement	EBL	EBT	EBR	WBL	WBT	WBR	NBL	NBT	NBR	SBL	SBT	SBR
Lane Configurations		↕			↕			↕			↕	↱
Traffic Vol, veh/h	7	6	27	33	3	28	7	416	42	22	944	7
Future Vol, veh/h	7	6	27	33	3	28	7	416	42	22	944	7
Conflicting Peds, #/hr	0	0	0	0	0	0	0	0	0	0	0	0
Sign Control	Stop	Stop	Stop	Stop	Stop	Stop	Free	Free	Free	Free	Free	Free
RT Channelized	-	-	None	-	-	None	-	-	None	-	-	Yield
Storage Length	-	-	-	-	-	-	-	-	-	-	-	70
Veh in Median Storage, #	-	0	-	-	0	-	-	0	-	-	0	-
Grade, %	-	0	-	-	0	-	-	0	-	-	0	-
Peak Hour Factor	96	96	96	96	96	96	96	96	96	96	96	96
Heavy Vehicles, %	2	2	2	2	2	2	2	2	2	2	2	2
Mvmt Flow	7	6	28	34	3	29	7	433	44	23	983	7

Major/Minor	Minor2			Minor1			Major1			Major2		
Conflicting Flow All	1514	1520	983	1515	1498	455	983	0	0	477	0	0
Stage 1	1029	1029	-	469	469	-	-	-	-	-	-	-
Stage 2	485	491	-	1046	1029	-	-	-	-	-	-	-
Critical Hdwy	7.12	6.52	6.22	7.12	6.52	6.22	4.12	-	-	4.12	-	-
Critical Hdwy Stg 1	6.12	5.52	-	6.12	5.52	-	-	-	-	-	-	-
Critical Hdwy Stg 2	6.12	5.52	-	6.12	5.52	-	-	-	-	-	-	-
Follow-up Hdwy	3.518	4.018	3.318	3.518	4.018	3.318	2.218	-	-	2.218	-	-
Pot Cap-1 Maneuver	98	119	302	98	122	605	703	-	-	1085	-	-
Stage 1	282	311	-	575	561	-	-	-	-	-	-	-
Stage 2	563	548	-	276	311	-	-	-	-	-	-	-
Platoon blocked, %								-	-		-	-
Mov Cap-1 Maneuver	87	112	302	81	115	605	703	-	-	1085	-	-
Mov Cap-2 Maneuver	87	112	-	81	115	-	-	-	-	-	-	-
Stage 1	278	296	-	567	553	-	-	-	-	-	-	-
Stage 2	525	540	-	233	296	-	-	-	-	-	-	-

Approach	EB	WB	NB	SB
HCM Control Delay, s	31.1	56.6	0.2	0.2
HCM LOS	D	F		

Minor Lane/Major Mvmt	NBL	NBT	NBR	EBLn1	WBLn1	SBL	SBT	SBR
Capacity (veh/h)	703	-	-	179	133	1085	-	-
HCM Lane V/C Ratio	0.01	-	-	0.233	0.501	0.021	-	-
HCM Control Delay (s)	10.2	0	-	31.1	56.6	8.4	0	-
HCM Lane LOS	B	A	-	D	F	A	A	-
HCM 95th %tile Q(veh)	0	-	-	0.9	2.3	0.1	-	-

Intersection	
Int Delay, s/veh	0.8

Movement	EBL	EBT	WBT	WBR	SBL	SBR
Lane Configurations						
Traffic Vol, veh/h	3	69	82	12	10	2
Future Vol, veh/h	3	69	82	12	10	2
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	84	84	84	84	84	84
Heavy Vehicles, %	2	2	2	2	2	2
Mvmt Flow	4	82	98	14	12	2

Major/Minor	Major1		Major2		Minor2	
Conflicting Flow All	112	0	-	0	195	105
Stage 1	-	-	-	-	105	-
Stage 2	-	-	-	-	90	-
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	1478	-	-	-	794	949
Stage 1	-	-	-	-	919	-
Stage 2	-	-	-	-	934	-
Platoon blocked, %		-	-	-		
Mov Cap-1 Maneuver	1478	-	-	-	792	949
Mov Cap-2 Maneuver	-	-	-	-	792	-
Stage 1	-	-	-	-	916	-
Stage 2	-	-	-	-	934	-

Approach	EB	WB	SB
HCM Control Delay, s	0.3	0	9.5
HCM LOS			A

Minor Lane/Major Mvmt	EBL	EBT	WBT	WBR	SBLn1
Capacity (veh/h)	1478	-	-	-	814
HCM Lane V/C Ratio	0.002	-	-	-	0.018
HCM Control Delay (s)	7.4	0	-	-	9.5
HCM Lane LOS	A	A	-	-	A
HCM 95th %tile Q(veh)	0	-	-	-	0.1

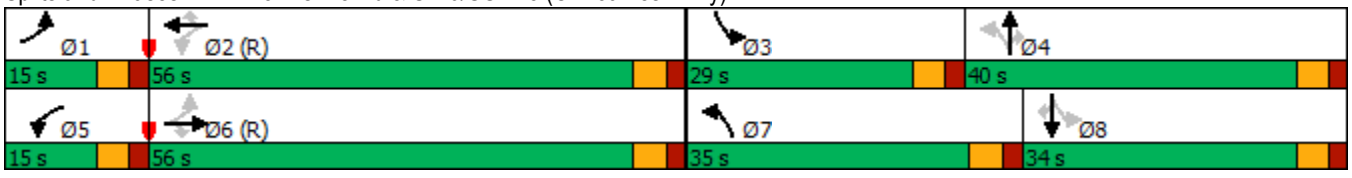
FUTURE "NO-BUILD" INTERSECTION ANALYSIS

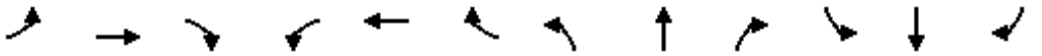
Lane Group	EBL	EBT	EBR	WBL	WBT	WBR	NBL	NBT	NBR	SBL	SBT	SBR
Lane Configurations												
Traffic Volume (vph)	30	1540	189	40	806	24	366	239	90	34	97	1
Future Volume (vph)	30	1540	189	40	806	24	366	239	90	34	97	1
Lane Group Flow (vph)	31	1604	197	42	840	25	381	249	94	35	101	1
Turn Type	pm+pt	NA	Perm	pm+pt	NA	Perm	pm+pt	NA	Perm	pm+pt	NA	Perm
Protected Phases	1	6		5	2		7	4		3	8	
Permitted Phases	6		6	2		2	4		4	8		8
Detector Phase	1	6	6	5	2	2	7	4	4	3	8	8
Switch Phase												
Minimum Initial (s)	4.0	15.0	15.0	4.0	15.0	15.0	4.0	6.0	6.0	4.0	6.0	6.0
Minimum Split (s)	15.0	39.0	39.0	15.0	39.0	39.0	15.0	40.5	40.5	15.0	40.5	40.5
Total Split (s)	15.0	56.0	56.0	15.0	56.0	56.0	35.0	40.0	40.0	29.0	34.0	34.0
Total Split (%)	10.7%	40.0%	40.0%	10.7%	40.0%	40.0%	25.0%	28.6%	28.6%	20.7%	24.3%	24.3%
Yellow Time (s)	3.5	3.5	3.5	3.5	3.5	3.5	3.5	3.5	3.5	3.5	3.5	3.5
All-Red Time (s)	2.0	2.0	2.0	2.0	2.0	2.0	2.0	2.0	2.0	2.0	2.0	2.0
Lost Time Adjust (s)	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
Total Lost Time (s)	5.5	5.5	5.5	5.5	5.5	5.5	5.5	5.5	5.5	5.5	5.5	5.5
Lead/Lag	Lead	Lag	Lag	Lead	Lag	Lag	Lead	Lag	Lag	Lead	Lag	Lag
Lead-Lag Optimize?	Yes	Yes	Yes	Yes	Yes	Yes	Yes	Yes	Yes	Yes	Yes	Yes
Recall Mode	None	C-Min	C-Min	None	C-Min	C-Min	None	None	None	None	None	None
v/c Ratio	0.09	0.91	0.23	0.31	0.48	0.03	0.81	0.51	0.19	0.18	0.58	0.00
Control Delay	14.6	41.3	7.0	20.2	23.8	0.0	53.1	48.5	6.4	34.2	73.8	0.0
Queue Delay	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
Total Delay	14.6	41.3	7.0	20.2	23.8	0.0	53.1	48.5	6.4	34.2	73.8	0.0
Queue Length 50th (ft)	12	714	23	16	268	0	290	198	0	21	90	0
Queue Length 95th (ft)	29	#972	75	37	361	0	382	280	37	45	148	0
Internal Link Dist (ft)		1243			1478			763			1078	
Turn Bay Length (ft)	245		285	230		300	250		435	297		300
Base Capacity (vph)	360	1766	863	163	1734	906	474	489	493	401	379	440
Starvation Cap Reductn	0	0	0	0	0	0	0	0	0	0	0	0
Spillback Cap Reductn	0	0	0	0	0	0	0	0	0	0	0	0
Storage Cap Reductn	0	0	0	0	0	0	0	0	0	0	0	0
Reduced v/c Ratio	0.09	0.91	0.23	0.26	0.48	0.03	0.80	0.51	0.19	0.09	0.27	0.00

Intersection Summary

Cycle Length: 140
Actuated Cycle Length: 140
Offset: 0 (0%), Referenced to phase 2:WBTL and 6:EBTL, Start of Green
Natural Cycle: 130
Control Type: Actuated-Coordinated
95th percentile volume exceeds capacity, queue may be longer.
Queue shown is maximum after two cycles.

Splits and Phases: 1: Brownsville Rd & SR 6/US 278 (C.H.James Pkwy)





Movement	EBL	EBT	EBR	WBL	WBT	WBR	NBL	NBT	NBR	SBL	SBT	SBR
Lane Configurations												
Traffic Volume (veh/h)	30	1540	189	40	806	24	366	239	90	34	97	1
Future Volume (veh/h)	30	1540	189	40	806	24	366	239	90	34	97	1
Initial Q (Qb), veh	0	0	0	0	0	0	0	0	0	0	0	0
Ped-Bike Adj(A_pbT)	1.00		1.00	1.00		1.00	1.00		1.00	1.00		1.00
Parking Bus, Adj	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00
Work Zone On Approach		No			No			No			No	
Adj Sat Flow, veh/h/ln	1870	1841	1841	1781	1752	1870	1870	1870	1870	1870	1870	1870
Adj Flow Rate, veh/h	31	1604	197	42	840	25	381	249	94	35	101	0
Peak Hour Factor	0.96	0.96	0.96	0.96	0.96	0.96	0.96	0.96	0.96	0.96	0.96	0.96
Percent Heavy Veh, %	2	4	4	8	10	2	2	2	2	2	2	2
Cap, veh/h	338	1899	847	129	1817	865	442	472	400	167	129	
Arrive On Green	0.02	0.54	0.54	0.02	0.55	0.55	0.21	0.25	0.25	0.02	0.07	0.00
Sat Flow, veh/h	1781	3497	1560	1697	3328	1585	1781	1870	1585	1781	1870	1585
Grp Volume(v), veh/h	31	1604	197	42	840	25	381	249	94	35	101	0
Grp Sat Flow(s),veh/h/ln	1781	1749	1560	1697	1664	1585	1781	1870	1585	1781	1870	1585
Q Serve(g_s), s	1.1	54.2	9.2	1.5	21.5	1.0	27.0	16.1	6.6	2.5	7.4	0.0
Cycle Q Clear(g_c), s	1.1	54.2	9.2	1.5	21.5	1.0	27.0	16.1	6.6	2.5	7.4	0.0
Prop In Lane	1.00		1.00	1.00		1.00	1.00		1.00	1.00		1.00
Lane Grp Cap(c), veh/h	338	1899	847	129	1817	865	442	472	400	167	129	
V/C Ratio(X)	0.09	0.84	0.23	0.32	0.46	0.03	0.86	0.53	0.23	0.21	0.78	
Avail Cap(c_a), veh/h	423	1899	847	205	1817	865	447	472	400	422	381	
HCM Platoon Ratio	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00
Upstream Filter(I)	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	0.00
Uniform Delay (d), s/veh	15.3	27.0	16.7	26.1	19.3	14.7	45.2	45.1	41.6	58.7	64.1	0.0
Incr Delay (d2), s/veh	0.1	4.8	0.6	1.4	0.8	0.1	15.6	1.1	0.3	0.6	9.8	0.0
Initial Q Delay(d3),s/veh	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
%ile BackOfQ(50%),veh/ln	0.4	21.7	3.5	0.6	7.9	0.4	13.5	7.5	2.6	1.2	3.9	0.0
Unsig. Movement Delay, s/veh												
LnGrp Delay(d),s/veh	15.4	31.8	17.4	27.6	20.1	14.7	60.7	46.2	41.9	59.3	73.9	0.0
LnGrp LOS	B	C	B	C	C	B	E	D	D	E	E	
Approach Vol, veh/h		1832			907			724			136	
Approach Delay, s/veh		30.0			20.3			53.3			70.1	
Approach LOS		C			C			D			E	

Timer - Assigned Phs	1	2	3	4	5	6	7	8
Phs Duration (G+Y+Rc), s	8.3	81.9	8.9	40.8	8.7	81.5	34.6	15.2
Change Period (Y+Rc), s	5.5	5.5	5.5	5.5	5.5	5.5	5.5	5.5
Max Green Setting (Gmax), s	9.5	50.5	23.5	34.5	9.5	50.5	29.5	28.5
Max Q Clear Time (g_c+I1), s	3.1	23.5	4.5	18.1	3.5	56.2	29.0	9.4
Green Ext Time (p_c), s	0.0	20.0	0.1	0.5	0.0	0.0	0.1	0.2

Intersection Summary	
HCM 6th Ctrl Delay	33.8
HCM 6th LOS	C

Notes

User approved pedestrian interval to be less than phase max green.

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

Intersection	
Int Delay, s/veh	1

Movement	EBL	EBT	EBR	WBL	WBT	WBR	NBL	NBT	NBR	SBL	SBT	SBR
Lane Configurations		↔			↔			↔			↕	↱
Traffic Vol, veh/h	1	1	1	20	2	13	1	685	106	11	335	0
Future Vol, veh/h	1	1	1	20	2	13	1	685	106	11	335	0
Conflicting Peds, #/hr	0	0	0	0	0	0	0	0	0	0	0	0
Sign Control	Stop	Stop	Stop	Stop	Stop	Stop	Free	Free	Free	Free	Free	Free
RT Channelized	-	-	None	-	-	None	-	-	None	-	-	Yield
Storage Length	-	-	-	-	-	-	-	-	-	-	-	70
Veh in Median Storage, #	-	0	-	-	0	-	-	0	-	-	0	-
Grade, %	-	0	-	-	0	-	-	0	-	-	0	-
Peak Hour Factor	88	88	88	88	88	88	88	88	88	88	88	88
Heavy Vehicles, %	2	2	2	2	2	2	2	2	2	2	2	2
Mvmt Flow	1	1	1	23	2	15	1	778	120	13	381	0

Major/Minor	Minor2			Minor1			Major1			Major2		
Conflicting Flow All	1256	1307	381	1248	1247	838	381	0	0	898	0	0
Stage 1	407	407	-	840	840	-	-	-	-	-	-	-
Stage 2	849	900	-	408	407	-	-	-	-	-	-	-
Critical Hdwy	7.12	6.52	6.22	7.12	6.52	6.22	4.12	-	-	4.12	-	-
Critical Hdwy Stg 1	6.12	5.52	-	6.12	5.52	-	-	-	-	-	-	-
Critical Hdwy Stg 2	6.12	5.52	-	6.12	5.52	-	-	-	-	-	-	-
Follow-up Hdwy	3.518	4.018	3.318	3.518	4.018	3.318	2.218	-	-	2.218	-	-
Pot Cap-1 Maneuver	148	160	666	150	173	366	1177	-	-	756	-	-
Stage 1	621	597	-	360	381	-	-	-	-	-	-	-
Stage 2	356	357	-	620	597	-	-	-	-	-	-	-
Platoon blocked, %								-	-		-	-
Mov Cap-1 Maneuver	138	156	666	146	169	366	1177	-	-	756	-	-
Mov Cap-2 Maneuver	138	156	-	146	169	-	-	-	-	-	-	-
Stage 1	620	584	-	359	380	-	-	-	-	-	-	-
Stage 2	339	356	-	604	584	-	-	-	-	-	-	-

Approach	EB	WB	NB	SB
HCM Control Delay, s	23.5	28.9	0	0.3
HCM LOS	C	D		

Minor Lane/Major Mvmt	NBL	NBT	NBR	EBLn1	WBLn1	SBL	SBT	SBR
Capacity (veh/h)	1177	-	-	198	190	756	-	-
HCM Lane V/C Ratio	0.001	-	-	0.017	0.209	0.017	-	-
HCM Control Delay (s)	8.1	0	-	23.5	28.9	9.8	0	-
HCM Lane LOS	A	A	-	C	D	A	A	-
HCM 95th %tile Q(veh)	0	-	-	0.1	0.8	0.1	-	-

Intersection	
Int Delay, s/veh	0.9

Movement	EBL	EBT	WBT	WBR	SBL	SBR
Lane Configurations						
Traffic Vol, veh/h	1	141	30	0	14	2
Future Vol, veh/h	1	141	30	0	14	2
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	81	81	81	81	81	81
Heavy Vehicles, %	2	2	2	2	2	2
Mvmt Flow	1	174	37	0	17	2

Major/Minor	Major1		Major2		Minor2	
Conflicting Flow All	37	0	-	0	213	37
Stage 1	-	-	-	-	37	-
Stage 2	-	-	-	-	176	-
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	1574	-	-	-	775	1035
Stage 1	-	-	-	-	985	-
Stage 2	-	-	-	-	855	-
Platoon blocked, %			-	-	-	
Mov Cap-1 Maneuver	1574	-	-	-	774	1035
Mov Cap-2 Maneuver	-	-	-	-	774	-
Stage 1	-	-	-	-	984	-
Stage 2	-	-	-	-	855	-

Approach	EB	WB	SB
HCM Control Delay, s	0.1	0	9.6
HCM LOS			A

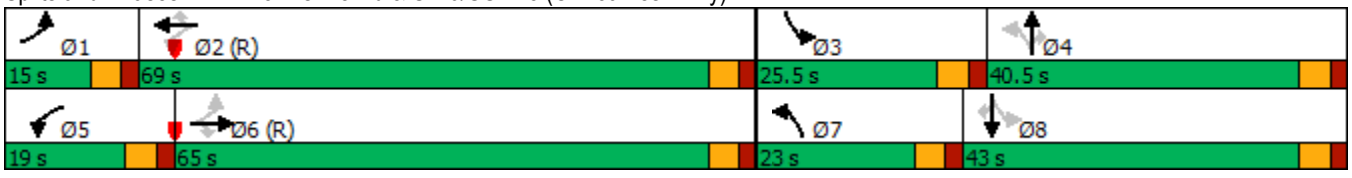
Minor Lane/Major Mvmt	EBL	EBT	WBT	WBR	SBLn1
Capacity (veh/h)	1574	-	-	-	799
HCM Lane V/C Ratio	0.001	-	-	-	0.025
HCM Control Delay (s)	7.3	0	-	-	9.6
HCM Lane LOS	A	A	-	-	A
HCM 95th %tile Q(veh)	0	-	-	-	0.1

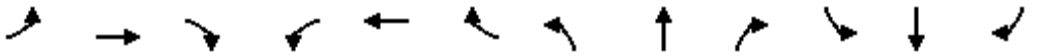
Lane Group	EBL	EBT	EBR	WBL	WBT	WBR	NBL	NBT	NBR	SBL	SBT	SBR
Lane Configurations												
Traffic Volume (vph)	12	791	481	179	1596	26	217	208	41	23	313	2
Future Volume (vph)	12	791	481	179	1596	26	217	208	41	23	313	2
Lane Group Flow (vph)	13	833	506	188	1680	27	228	219	43	24	329	2
Turn Type	pm+pt	NA	Perm	pm+pt	NA	Perm	pm+pt	NA	Perm	pm+pt	NA	Perm
Protected Phases	1	6		5	2		7	4		3	8	
Permitted Phases	6		6	2		2	4		4	8		8
Detector Phase	1	6	6	5	2	2	7	4	4	3	8	8
Switch Phase												
Minimum Initial (s)	4.0	15.0	15.0	4.0	15.0	15.0	4.0	6.0	6.0	4.0	6.0	6.0
Minimum Split (s)	15.0	39.5	39.5	15.0	39.5	39.5	15.0	40.5	40.5	15.0	40.5	40.5
Total Split (s)	15.0	65.0	65.0	19.0	69.0	69.0	23.0	40.5	40.5	25.5	43.0	43.0
Total Split (%)	10.0%	43.3%	43.3%	12.7%	46.0%	46.0%	15.3%	27.0%	27.0%	17.0%	28.7%	28.7%
Yellow Time (s)	3.5	3.5	3.5	3.5	3.5	3.5	3.5	3.5	3.5	3.5	3.5	3.5
All-Red Time (s)	2.0	2.0	2.0	2.0	2.0	2.0	2.0	2.0	2.0	2.0	2.0	2.0
Lost Time Adjust (s)	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
Total Lost Time (s)	5.5	5.5	5.5	5.5	5.5	5.5	5.5	5.5	5.5	5.5	5.5	5.5
Lead/Lag	Lead	Lag	Lag	Lead	Lag	Lag	Lead	Lag	Lag	Lead	Lag	Lag
Lead-Lag Optimize?	Yes	Yes	Yes	Yes	Yes	Yes	Yes	Yes	Yes	Yes	Yes	Yes
Recall Mode	None	C-Min	C-Min	None	C-Min	C-Min	None	None	None	None	None	None
v/c Ratio	0.11	0.55	0.53	0.56	0.89	0.03	0.79	0.38	0.08	0.07	0.85	0.00
Control Delay	18.8	33.3	6.1	23.7	38.9	0.1	54.8	43.3	0.3	30.1	77.3	0.0
Queue Delay	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
Total Delay	18.8	33.3	6.1	23.7	38.9	0.1	54.8	43.3	0.3	30.1	77.3	0.0
Queue Length 50th (ft)	5	316	25	87	698	0	162	175	0	15	311	0
Queue Length 95th (ft)	18	412	120	144	#1098	0	#226	246	0	34	411	0
Internal Link Dist (ft)		1243			1478			763			1078	
Turn Bay Length (ft)	245		285	230		300	250		435	297		300
Base Capacity (vph)	163	1523	962	346	1893	892	290	571	553	476	465	469
Starvation Cap Reductn	0	0	0	0	0	0	0	0	0	0	0	0
Spillback Cap Reductn	0	0	0	0	0	0	0	0	0	0	0	0
Storage Cap Reductn	0	0	0	0	0	0	0	0	0	0	0	0
Reduced v/c Ratio	0.08	0.55	0.53	0.54	0.89	0.03	0.79	0.38	0.08	0.05	0.71	0.00

Intersection Summary

Cycle Length: 150
Actuated Cycle Length: 150
Offset: 0 (0%), Referenced to phase 2:WBTL and 6:EBTL, Start of Green
Natural Cycle: 140
Control Type: Actuated-Coordinated
95th percentile volume exceeds capacity, queue may be longer.
Queue shown is maximum after two cycles.

Splits and Phases: 1: Brownsville Rd & SR 6/US 278 (C.H.James Pkwy)





Movement	EBL	EBT	EBR	WBL	WBT	WBR	NBL	NBT	NBR	SBL	SBT	SBR
Lane Configurations												
Traffic Volume (veh/h)	12	791	481	179	1596	26	217	208	41	23	313	2
Future Volume (veh/h)	12	791	481	179	1596	26	217	208	41	23	313	2
Initial Q (Qb), veh	0	0	0	0	0	0	0	0	0	0	0	0
Ped-Bike Adj(A_pbT)	1.00		1.00	1.00		1.00	1.00		1.00	1.00		1.00
Parking Bus, Adj	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00
Work Zone On Approach		No			No			No			No	
Adj Sat Flow, veh/h/ln	1870	1811	1870	1870	1870	1870	1870	1870	1870	1870	1870	1870
Adj Flow Rate, veh/h	13	833	506	188	1680	27	228	219	43	24	329	0
Peak Hour Factor	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95
Percent Heavy Veh, %	2	6	2	2	2	2	2	2	2	2	2	2
Cap, veh/h	103	1659	764	295	1909	852	270	539	457	292	358	
Arrive On Green	0.01	0.48	0.48	0.07	0.54	0.54	0.11	0.29	0.29	0.02	0.19	0.00
Sat Flow, veh/h	1781	3441	1585	1781	3554	1585	1781	1870	1585	1781	1870	1585
Grp Volume(v), veh/h	13	833	506	188	1680	27	228	219	43	24	329	0
Grp Sat Flow(s),veh/h/ln	1781	1721	1585	1781	1777	1585	1781	1870	1585	1781	1870	1585
Q Serve(g_s), s	0.6	24.8	36.4	7.8	62.2	1.2	15.0	14.2	3.0	1.6	25.9	0.0
Cycle Q Clear(g_c), s	0.6	24.8	36.4	7.8	62.2	1.2	15.0	14.2	3.0	1.6	25.9	0.0
Prop In Lane	1.00		1.00	1.00		1.00	1.00		1.00	1.00		1.00
Lane Grp Cap(c), veh/h	103	1659	764	295	1909	852	270	539	457	292	358	
V/C Ratio(X)	0.13	0.50	0.66	0.64	0.88	0.03	0.84	0.41	0.09	0.08	0.92	
Avail Cap(c_a), veh/h	196	1659	764	338	1909	852	275	539	457	499	468	
HCM Platoon Ratio	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00
Upstream Filter(I)	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	0.00
Uniform Delay (d), s/veh	29.6	26.5	29.5	20.5	30.5	16.3	43.0	43.1	39.1	47.7	59.5	0.0
Incr Delay (d2), s/veh	0.5	1.1	4.5	3.2	6.2	0.1	20.5	0.5	0.1	0.1	19.9	0.0
Initial Q Delay(d3),s/veh	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
%ile BackOfQ(50%),veh/ln	0.2	9.9	14.7	3.2	26.0	0.5	8.0	6.5	1.2	0.7	14.2	0.0
Unsig. Movement Delay, s/veh												
LnGrp Delay(d),s/veh	30.1	27.6	34.0	23.7	36.7	16.4	63.4	43.6	39.2	47.8	79.4	0.0
LnGrp LOS	C	C	C	C	D	B	E	D	D	D	E	
Approach Vol, veh/h		1352			1895			490			353	
Approach Delay, s/veh		30.0			35.1			52.4			77.3	
Approach LOS		C			D			D			E	

Timer - Assigned Phs	1	2	3	4	5	6	7	8
Phs Duration (G+Y+Rc), s	7.2	86.1	8.0	48.7	15.4	77.8	22.5	34.2
Change Period (Y+Rc), s	5.5	5.5	5.5	5.5	5.5	5.5	5.5	5.5
Max Green Setting (Gmax), s	9.5	63.5	20.0	35.0	13.5	59.5	17.5	37.5
Max Q Clear Time (g_c+I1), s	2.6	64.2	3.6	16.2	9.8	26.8	17.0	27.9
Green Ext Time (p_c), s	0.0	0.0	0.0	0.5	0.2	19.3	0.0	0.8

Intersection Summary	
HCM 6th Ctrl Delay	39.1
HCM 6th LOS	D

Notes

User approved pedestrian interval to be less than phase max green.

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

Intersection	
Int Delay, s/veh	3.7

Movement	EBL	EBT	EBR	WBL	WBT	WBR	NBL	NBT	NBR	SBL	SBT	SBR
Lane Configurations												
Traffic Vol, veh/h	7	6	28	34	3	29	7	424	43	22	963	7
Future Vol, veh/h	7	6	28	34	3	29	7	424	43	22	963	7
Conflicting Peds, #/hr	0	0	0	0	0	0	0	0	0	0	0	0
Sign Control	Stop	Stop	Stop	Stop	Stop	Stop	Free	Free	Free	Free	Free	Free
RT Channelized	-	-	None	-	-	None	-	-	None	-	-	Yield
Storage Length	-	-	-	-	-	-	-	-	-	-	-	70
Veh in Median Storage, #	-	0	-	-	0	-	-	0	-	-	0	-
Grade, %	-	0	-	-	0	-	-	0	-	-	0	-
Peak Hour Factor	96	96	96	96	96	96	96	96	96	96	96	96
Heavy Vehicles, %	2	2	2	2	2	2	2	2	2	2	2	2
Mvmt Flow	7	6	29	35	3	30	7	442	45	23	1003	7

Major/Minor	Minor2			Minor1			Major1			Major2		
Conflicting Flow All	1544	1550	1003	1546	1528	465	1003	0	0	487	0	0
Stage 1	1049	1049	-	479	479	-	-	-	-	-	-	-
Stage 2	495	501	-	1067	1049	-	-	-	-	-	-	-
Critical Hdwy	7.12	6.52	6.22	7.12	6.52	6.22	4.12	-	-	4.12	-	-
Critical Hdwy Stg 1	6.12	5.52	-	6.12	5.52	-	-	-	-	-	-	-
Critical Hdwy Stg 2	6.12	5.52	-	6.12	5.52	-	-	-	-	-	-	-
Follow-up Hdwy	3.518	4.018	3.318	3.518	4.018	3.318	2.218	-	-	2.218	-	-
Pot Cap-1 Maneuver	94	114	294	93	117	597	690	-	-	1076	-	-
Stage 1	275	304	-	568	555	-	-	-	-	-	-	-
Stage 2	556	543	-	269	304	-	-	-	-	-	-	-
Platoon blocked, %								-	-		-	-
Mov Cap-1 Maneuver	83	107	294	76	110	597	690	-	-	1076	-	-
Mov Cap-2 Maneuver	83	107	-	76	110	-	-	-	-	-	-	-
Stage 1	271	289	-	560	547	-	-	-	-	-	-	-
Stage 2	518	535	-	225	289	-	-	-	-	-	-	-

Approach	EB	WB	NB	SB
HCM Control Delay, s	32.3	63.5	0.2	0.2
HCM LOS	D	F		

Minor Lane/Major Mvmt	NBL	NBT	NBR	EBLn1	WBLn1	SBL	SBT	SBR
Capacity (veh/h)	690	-	-	174	126	1076	-	-
HCM Lane V/C Ratio	0.011	-	-	0.245	0.546	0.021	-	-
HCM Control Delay (s)	10.3	0	-	32.3	63.5	8.4	0	-
HCM Lane LOS	B	A	-	D	F	A	A	-
HCM 95th %tile Q(veh)	0	-	-	0.9	2.6	0.1	-	-

Intersection	
Int Delay, s/veh	0.8

Movement	EBL	EBT	WBT	WBR	SBL	SBR
Lane Configurations						
Traffic Vol, veh/h	3	70	84	12	10	2
Future Vol, veh/h	3	70	84	12	10	2
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	84	84	84	84	84	84
Heavy Vehicles, %	2	2	2	2	2	2
Mvmt Flow	4	83	100	14	12	2

Major/Minor	Major1		Major2		Minor2	
Conflicting Flow All	114	0	-	0	198	107
Stage 1	-	-	-	-	107	-
Stage 2	-	-	-	-	91	-
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	1475	-	-	-	791	947
Stage 1	-	-	-	-	917	-
Stage 2	-	-	-	-	933	-
Platoon blocked, %		-	-	-		
Mov Cap-1 Maneuver	1475	-	-	-	789	947
Mov Cap-2 Maneuver	-	-	-	-	789	-
Stage 1	-	-	-	-	914	-
Stage 2	-	-	-	-	933	-

Approach	EB	WB	SB
HCM Control Delay, s	0.3	0	9.5
HCM LOS			A

Minor Lane/Major Mvmt	EBL	EBT	WBT	WBR	SBLn1
Capacity (veh/h)	1475	-	-	-	812
HCM Lane V/C Ratio	0.002	-	-	-	0.018
HCM Control Delay (s)	7.4	0	-	-	9.5
HCM Lane LOS	A	A	-	-	A
HCM 95th %tile Q(veh)	0	-	-	-	0.1

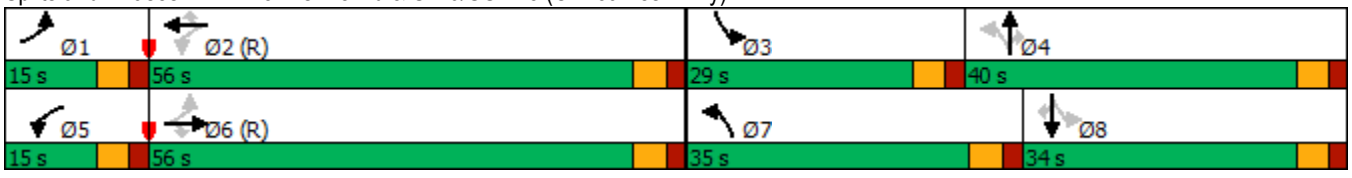
FUTURE "BUILD" INTERSECTION ANALYSIS

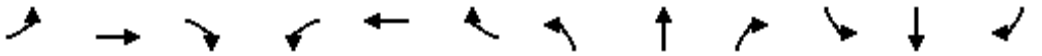
Lane Group	EBL	EBT	EBR	WBL	WBT	WBR	NBL	NBT	NBR	SBL	SBT	SBR
Lane Configurations												
Traffic Volume (vph)	30	1540	204	55	806	24	380	250	104	34	109	1
Future Volume (vph)	30	1540	204	55	806	24	380	250	104	34	109	1
Lane Group Flow (vph)	31	1604	213	57	840	25	396	260	108	35	114	1
Turn Type	pm+pt	NA	Perm	pm+pt	NA	Perm	pm+pt	NA	Perm	pm+pt	NA	Perm
Protected Phases	1	6		5	2		7	4		3	8	
Permitted Phases	6		6	2		2	4		4	8		8
Detector Phase	1	6	6	5	2	2	7	4	4	3	8	8
Switch Phase												
Minimum Initial (s)	4.0	15.0	15.0	4.0	15.0	15.0	4.0	6.0	6.0	4.0	6.0	6.0
Minimum Split (s)	15.0	39.5	39.5	15.0	39.5	39.5	15.0	40.5	40.5	15.0	40.5	40.5
Total Split (s)	15.0	56.0	56.0	15.0	56.0	56.0	35.0	40.0	40.0	29.0	34.0	34.0
Total Split (%)	10.7%	40.0%	40.0%	10.7%	40.0%	40.0%	25.0%	28.6%	28.6%	20.7%	24.3%	24.3%
Yellow Time (s)	3.5	3.5	3.5	3.5	3.5	3.5	3.5	3.5	3.5	3.5	3.5	3.5
All-Red Time (s)	2.0	2.0	2.0	2.0	2.0	2.0	2.0	2.0	2.0	2.0	2.0	2.0
Lost Time Adjust (s)	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
Total Lost Time (s)	5.5	5.5	5.5	5.5	5.5	5.5	5.5	5.5	5.5	5.5	5.5	5.5
Lead/Lag	Lead	Lag	Lag	Lead	Lag	Lag	Lead	Lag	Lag	Lead	Lag	Lag
Lead-Lag Optimize?	Yes	Yes	Yes	Yes	Yes	Yes	Yes	Yes	Yes	Yes	Yes	Yes
Recall Mode	None	C-Min	C-Min	None	C-Min	C-Min	None	None	None	None	None	None
v/c Ratio	0.10	0.93	0.25	0.40	0.49	0.03	0.84	0.52	0.21	0.17	0.61	0.00
Control Delay	15.2	44.9	8.5	24.6	24.6	0.0	54.8	47.8	7.7	33.3	73.8	0.0
Queue Delay	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
Total Delay	15.2	44.9	8.5	24.6	24.6	0.0	54.8	47.8	7.7	33.3	73.8	0.0
Queue Length 50th (ft)	12	732	32	22	272	0	301	205	0	21	101	0
Queue Length 95th (ft)	30	#1001	92	53	367	0	#395	289	47	44	162	0
Internal Link Dist (ft)		1243			1478			879			1078	
Turn Bay Length (ft)	245		285	230		300	250		435	297		300
Base Capacity (vph)	353	1722	845	164	1706	894	475	504	507	408	379	440
Starvation Cap Reductn	0	0	0	0	0	0	0	0	0	0	0	0
Spillback Cap Reductn	0	0	0	0	0	0	0	0	0	0	0	0
Storage Cap Reductn	0	0	0	0	0	0	0	0	0	0	0	0
Reduced v/c Ratio	0.09	0.93	0.25	0.35	0.49	0.03	0.83	0.52	0.21	0.09	0.30	0.00

Intersection Summary

Cycle Length: 140
Actuated Cycle Length: 140
Offset: 0 (0%), Referenced to phase 2:WBTL and 6:EBTL, Start of Green
Natural Cycle: 140
Control Type: Actuated-Coordinated
95th percentile volume exceeds capacity, queue may be longer.
Queue shown is maximum after two cycles.

Splits and Phases: 1: Brownsville Rd & SR 6/US 278 (C.H.James Pkwy)





Movement	EBL	EBT	EBR	WBL	WBT	WBR	NBL	NBT	NBR	SBL	SBT	SBR
Lane Configurations												
Traffic Volume (veh/h)	30	1540	204	55	806	24	380	250	104	34	109	1
Future Volume (veh/h)	30	1540	204	55	806	24	380	250	104	34	109	1
Initial Q (Qb), veh	0	0	0	0	0	0	0	0	0	0	0	0
Ped-Bike Adj(A_pbT)	1.00		1.00	1.00		1.00	1.00		1.00	1.00		1.00
Parking Bus, Adj	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00
Work Zone On Approach		No			No			No			No	
Adj Sat Flow, veh/h/ln	1870	1841	1841	1781	1752	1870	1870	1870	1870	1870	1870	1870
Adj Flow Rate, veh/h	31	1604	212	57	840	25	396	260	108	35	114	0
Peak Hour Factor	0.96	0.96	0.96	0.96	0.96	0.96	0.96	0.96	0.96	0.96	0.96	0.96
Percent Heavy Veh, %	2	4	4	8	10	2	2	2	2	2	2	2
Cap, veh/h	330	1851	826	129	1784	849	448	491	416	172	143	
Arrive On Green	0.02	0.53	0.53	0.03	0.54	0.54	0.21	0.26	0.26	0.02	0.08	0.00
Sat Flow, veh/h	1781	3497	1560	1697	3328	1585	1781	1870	1585	1781	1870	1585
Grp Volume(v), veh/h	31	1604	212	57	840	25	396	260	108	35	114	0
Grp Sat Flow(s),veh/h/ln	1781	1749	1560	1697	1664	1585	1781	1870	1585	1781	1870	1585
Q Serve(g_s), s	1.1	55.8	10.4	2.2	21.9	1.0	28.0	16.7	7.5	2.5	8.4	0.0
Cycle Q Clear(g_c), s	1.1	55.8	10.4	2.2	21.9	1.0	28.0	16.7	7.5	2.5	8.4	0.0
Prop In Lane	1.00		1.00	1.00		1.00	1.00		1.00	1.00		1.00
Lane Grp Cap(c), veh/h	330	1851	826	129	1784	849	448	491	416	172	143	
V/C Ratio(X)	0.09	0.87	0.26	0.44	0.47	0.03	0.88	0.53	0.26	0.20	0.80	
Avail Cap(c_a), veh/h	415	1851	826	199	1784	849	448	491	416	428	381	
HCM Platoon Ratio	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00
Upstream Filter(I)	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	0.00
Uniform Delay (d), s/veh	16.1	28.7	18.0	28.8	20.2	15.3	44.5	44.2	40.8	57.8	63.6	0.0
Incr Delay (d2), s/veh	0.1	5.8	0.8	2.4	0.9	0.1	18.6	1.1	0.3	0.6	9.8	0.0
Initial Q Delay(d3),s/veh	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
%ile BackOfQ(50%),veh/ln	0.4	22.7	3.9	0.9	8.1	0.4	14.3	7.7	3.0	1.2	4.4	0.0
Unsig. Movement Delay, s/veh												
LnGrp Delay(d),s/veh	16.3	34.4	18.7	31.2	21.1	15.4	63.1	45.3	41.2	58.3	73.4	0.0
LnGrp LOS	B	C	B	C	C	B	E	D	D	E	E	
Approach Vol, veh/h		1847			922			764			149	
Approach Delay, s/veh		32.3			21.5			53.9			69.9	
Approach LOS		C			C			D			E	

Timer - Assigned Phs	1	2	3	4	5	6	7	8
Phs Duration (G+Y+Rc), s	8.3	80.5	8.9	42.3	9.2	79.6	35.0	16.2
Change Period (Y+Rc), s	5.5	5.5	5.5	5.5	5.5	5.5	5.5	5.5
Max Green Setting (Gmax), s	9.5	50.5	23.5	34.5	9.5	50.5	29.5	28.5
Max Q Clear Time (g_c+I1), s	3.1	23.9	4.5	18.7	4.2	57.8	30.0	10.4
Green Ext Time (p_c), s	0.0	19.8	0.1	0.5	0.0	0.0	0.0	0.3

Intersection Summary	
HCM 6th Ctrl Delay	35.6
HCM 6th LOS	D

Notes

User approved pedestrian interval to be less than phase max green.

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

Intersection	
Int Delay, s/veh	1

Movement	EBL	EBT	EBR	WBL	WBT	WBR	NBL	NBT	NBR	SBL	SBT	SBR
Lane Configurations		↕			↕			↕			↕	↱
Traffic Vol, veh/h	1	1	1	20	2	13	1	697	106	11	346	0
Future Vol, veh/h	1	1	1	20	2	13	1	697	106	11	346	0
Conflicting Peds, #/hr	0	0	0	0	0	0	0	0	0	0	0	0
Sign Control	Stop	Stop	Stop	Stop	Stop	Stop	Free	Free	Free	Free	Free	Free
RT Channelized	-	-	None	-	-	None	-	-	None	-	-	Yield
Storage Length	-	-	-	-	-	-	-	-	-	-	-	70
Veh in Median Storage, #	-	0	-	-	0	-	-	0	-	-	0	-
Grade, %	-	0	-	-	0	-	-	0	-	-	0	-
Peak Hour Factor	88	88	88	88	88	88	88	88	88	88	88	88
Heavy Vehicles, %	2	2	2	2	2	2	2	2	2	2	2	2
Mvmt Flow	1	1	1	23	2	15	1	792	120	13	393	0

Major/Minor	Minor2			Minor1			Major1			Major2		
Conflicting Flow All	1282	1333	393	1274	1273	852	393	0	0	912	0	0
Stage 1	419	419	-	854	854	-	-	-	-	-	-	-
Stage 2	863	914	-	420	419	-	-	-	-	-	-	-
Critical Hdwy	7.12	6.52	6.22	7.12	6.52	6.22	4.12	-	-	4.12	-	-
Critical Hdwy Stg 1	6.12	5.52	-	6.12	5.52	-	-	-	-	-	-	-
Critical Hdwy Stg 2	6.12	5.52	-	6.12	5.52	-	-	-	-	-	-	-
Follow-up Hdwy	3.518	4.018	3.318	3.518	4.018	3.318	2.218	-	-	2.218	-	-
Pot Cap-1 Maneuver	142	154	656	144	167	359	1166	-	-	747	-	-
Stage 1	612	590	-	353	375	-	-	-	-	-	-	-
Stage 2	349	352	-	611	590	-	-	-	-	-	-	-
Platoon blocked, %								-	-		-	-
Mov Cap-1 Maneuver	132	150	656	140	163	359	1166	-	-	747	-	-
Mov Cap-2 Maneuver	132	150	-	140	163	-	-	-	-	-	-	-
Stage 1	611	577	-	352	374	-	-	-	-	-	-	-
Stage 2	332	351	-	595	577	-	-	-	-	-	-	-

Approach	EB	WB	NB	SB
HCM Control Delay, s	24.3	30.1	0	0.3
HCM LOS	C	D		

Minor Lane/Major Mvmt	NBL	NBT	NBR	EBLn1	WBLn1	SBL	SBT	SBR
Capacity (veh/h)	1166	-	-	190	183	747	-	-
HCM Lane V/C Ratio	0.001	-	-	0.018	0.217	0.017	-	-
HCM Control Delay (s)	8.1	0	-	24.3	30.1	9.9	0	-
HCM Lane LOS	A	A	-	C	D	A	A	-
HCM 95th %tile Q(veh)	0	-	-	0.1	0.8	0.1	-	-

Intersection	
Int Delay, s/veh	1.1

Movement	EBL	EBT	WBT	WBR	SBL	SBR
Lane Configurations						
Traffic Vol, veh/h	1	141	30	6	19	2
Future Vol, veh/h	1	141	30	6	19	2
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	81	81	81	81	81	81
Heavy Vehicles, %	2	2	2	2	2	2
Mvmt Flow	1	174	37	7	23	2

Major/Minor	Major1		Major2		Minor2	
Conflicting Flow All	44	0	-	0	217	41
Stage 1	-	-	-	-	41	-
Stage 2	-	-	-	-	176	-
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	1564	-	-	-	771	1030
Stage 1	-	-	-	-	981	-
Stage 2	-	-	-	-	855	-
Platoon blocked, %			-	-	-	
Mov Cap-1 Maneuver	1564	-	-	-	770	1030
Mov Cap-2 Maneuver	-	-	-	-	770	-
Stage 1	-	-	-	-	980	-
Stage 2	-	-	-	-	855	-

Approach	EB	WB	SB
HCM Control Delay, s	0.1	0	9.7
HCM LOS			A

Minor Lane/Major Mvmt	EBL	EBT	WBT	WBR	SBLn1
Capacity (veh/h)	1564	-	-	-	789
HCM Lane V/C Ratio	0.001	-	-	-	0.033
HCM Control Delay (s)	7.3	0	-	-	9.7
HCM Lane LOS	A	A	-	-	A
HCM 95th %tile Q(veh)	0	-	-	-	0.1

Intersection	
Int Delay, s/veh	2

Movement	WBL	WBR	NBT	NBR	SBL	SBT
Lane Configurations						
Traffic Vol, veh/h	23	64	672	39	53	334
Future Vol, veh/h	23	64	672	39	53	334
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	-	-	175	235	-
Veh in Median Storage, #	0	-	0	-	-	0
Grade, %	0	-	0	-	-	0
Peak Hour Factor	92	92	92	92	92	92
Heavy Vehicles, %	2	2	2	2	2	2
Mvmt Flow	25	70	730	42	58	363

Major/Minor	Minor1		Major1		Major2	
Conflicting Flow All	1209	730	0	0	772	0
Stage 1	730	-	-	-	-	-
Stage 2	479	-	-	-	-	-
Critical Hdwy	6.42	6.22	-	-	4.12	-
Critical Hdwy Stg 1	5.42	-	-	-	-	-
Critical Hdwy Stg 2	5.42	-	-	-	-	-
Follow-up Hdwy	3.518	3.318	-	-	2.218	-
Pot Cap-1 Maneuver	202	422	-	-	843	-
Stage 1	477	-	-	-	-	-
Stage 2	623	-	-	-	-	-
Platoon blocked, %			-	-		-
Mov Cap-1 Maneuver	188	422	-	-	843	-
Mov Cap-2 Maneuver	188	-	-	-	-	-
Stage 1	477	-	-	-	-	-
Stage 2	580	-	-	-	-	-

Approach	WB	NB	SB
HCM Control Delay, s	21	0	1.3
HCM LOS	C		

Minor Lane/Major Mvmt	NBT	NBR	WBLn1	SBL	SBT
Capacity (veh/h)	-	-	318	843	-
HCM Lane V/C Ratio	-	-	0.297	0.068	-
HCM Control Delay (s)	-	-	21	9.6	-
HCM Lane LOS	-	-	C	A	-
HCM 95th %tile Q(veh)	-	-	1.2	0.2	-

Intersection	
Int Delay, s/veh	3.1

Movement	EBL	EBR	NBL	NBT	SBT	SBR
Lane Configurations						
Traffic Vol, veh/h	0	5	6	1	16	0
Future Vol, veh/h	0	5	6	1	16	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	-	-	-	-	-
Veh in Median Storage, #	0	-	-	0	0	-
Grade, %	0	-	-	0	0	-
Peak Hour Factor	92	92	92	92	92	92
Heavy Vehicles, %	2	2	2	2	2	2
Mvmt Flow	0	5	7	1	17	0

Major/Minor	Minor2		Major1		Major2	
Conflicting Flow All	32	17	17	0	-	0
Stage 1	17	-	-	-	-	-
Stage 2	15	-	-	-	-	-
Critical Hdwy	6.42	6.22	4.12	-	-	-
Critical Hdwy Stg 1	5.42	-	-	-	-	-
Critical Hdwy Stg 2	5.42	-	-	-	-	-
Follow-up Hdwy	3.518	3.318	2.218	-	-	-
Pot Cap-1 Maneuver	982	1062	1600	-	-	-
Stage 1	1006	-	-	-	-	-
Stage 2	1008	-	-	-	-	-
Platoon blocked, %				-	-	-
Mov Cap-1 Maneuver	978	1062	1600	-	-	-
Mov Cap-2 Maneuver	978	-	-	-	-	-
Stage 1	1002	-	-	-	-	-
Stage 2	1008	-	-	-	-	-

Approach	EB	NB	SB
HCM Control Delay, s	8.4	6.2	0
HCM LOS	A		

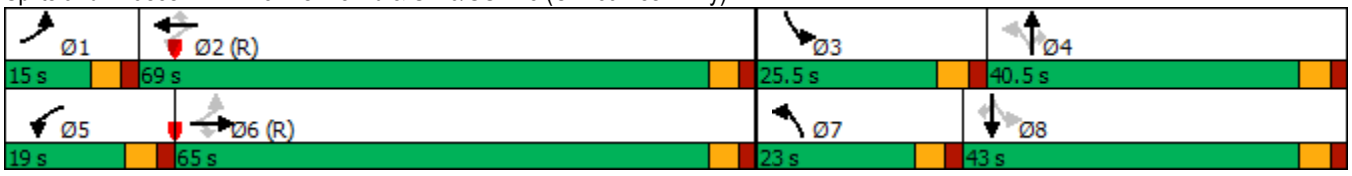
Minor Lane/Major Mvmt	NBL	NBT	EBLn1	SBT	SBR
Capacity (veh/h)	1600	-	1062	-	-
HCM Lane V/C Ratio	0.004	-	0.005	-	-
HCM Control Delay (s)	7.3	0	8.4	-	-
HCM Lane LOS	A	A	A	-	-
HCM 95th %tile Q(veh)	0	-	0	-	-

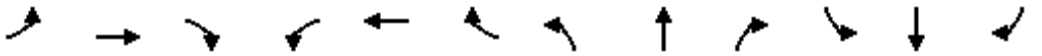
Lane Group	EBL	EBT	EBR	WBL	WBT	WBR	NBL	NBT	NBR	SBL	SBT	SBR
Lane Configurations												
Traffic Volume (vph)	12	791	495	193	1596	26	227	216	51	23	324	2
Future Volume (vph)	12	791	495	193	1596	26	227	216	51	23	324	2
Lane Group Flow (vph)	13	833	521	203	1680	27	239	227	54	24	341	2
Turn Type	pm+pt	NA	Perm	pm+pt	NA	Perm	pm+pt	NA	Perm	pm+pt	NA	Perm
Protected Phases	1	6		5	2		7	4		3	8	
Permitted Phases	6		6	2		2	4		4	8		8
Detector Phase	1	6	6	5	2	2	7	4	4	3	8	8
Switch Phase												
Minimum Initial (s)	4.0	15.0	15.0	4.0	15.0	15.0	4.0	6.0	6.0	4.0	6.0	6.0
Minimum Split (s)	15.0	39.5	39.5	15.0	39.5	39.5	15.0	40.5	40.5	15.0	40.5	40.5
Total Split (s)	15.0	65.0	65.0	19.0	69.0	69.0	23.0	40.5	40.5	25.5	43.0	43.0
Total Split (%)	10.0%	43.3%	43.3%	12.7%	46.0%	46.0%	15.3%	27.0%	27.0%	17.0%	28.7%	28.7%
Yellow Time (s)	3.5	3.5	3.5	3.5	3.5	3.5	3.5	3.5	3.5	3.5	3.5	3.5
All-Red Time (s)	2.0	2.0	2.0	2.0	2.0	2.0	2.0	2.0	2.0	2.0	2.0	2.0
Lost Time Adjust (s)	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
Total Lost Time (s)	5.5	5.5	5.5	5.5	5.5	5.5	5.5	5.5	5.5	5.5	5.5	5.5
Lead/Lag	Lead	Lag	Lag	Lead	Lag	Lag	Lead	Lag	Lag	Lead	Lag	Lag
Lead-Lag Optimize?	Yes	Yes	Yes	Yes	Yes	Yes	Yes	Yes	Yes	Yes	Yes	Yes
Recall Mode	None	C-Min	C-Min	None	C-Min	C-Min	None	None	None	None	None	None
v/c Ratio	0.11	0.55	0.56	0.65	0.97	0.03	0.83	0.39	0.10	0.07	0.86	0.00
Control Delay	19.0	34.0	7.6	27.8	49.5	0.1	58.9	43.0	0.6	29.8	78.1	0.0
Queue Delay	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
Total Delay	19.0	34.0	7.6	27.8	49.5	0.1	58.9	43.0	0.6	29.8	78.1	0.0
Queue Length 50th (ft)	6	324	42	97	764	0	170	181	0	15	323	0
Queue Length 95th (ft)	18	409	153	157	#1159	0	#266	254	3	34	427	0
Internal Link Dist (ft)		1243			1478			879			1078	
Turn Bay Length (ft)	245		285	230		300	250		435	297		300
Base Capacity (vph)	163	1519	932	322	1736	883	287	582	562	479	465	469
Starvation Cap Reductn	0	0	0	0	0	0	0	0	0	0	0	0
Spillback Cap Reductn	0	0	0	0	0	0	0	0	0	0	0	0
Storage Cap Reductn	0	0	0	0	0	0	0	0	0	0	0	0
Reduced v/c Ratio	0.08	0.55	0.56	0.63	0.97	0.03	0.83	0.39	0.10	0.05	0.73	0.00

Intersection Summary

Cycle Length: 150
Actuated Cycle Length: 150
Offset: 0 (0%), Referenced to phase 2:WBTL and 6:EBTL, Start of Green
Natural Cycle: 150
Control Type: Actuated-Coordinated
95th percentile volume exceeds capacity, queue may be longer.
Queue shown is maximum after two cycles.

Splits and Phases: 1: Brownsville Rd & SR 6/US 278 (C.H.James Pkwy)





Movement	EBL	EBT	EBR	WBL	WBT	WBR	NBL	NBT	NBR	SBL	SBT	SBR
Lane Configurations												
Traffic Volume (veh/h)	12	791	495	193	1596	26	227	216	51	23	324	2
Future Volume (veh/h)	12	791	495	193	1596	26	227	216	51	23	324	2
Initial Q (Qb), veh	0	0	0	0	0	0	0	0	0	0	0	0
Ped-Bike Adj(A_pbT)	1.00		1.00	1.00		1.00	1.00		1.00	1.00		1.00
Parking Bus, Adj	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00
Work Zone On Approach		No			No			No			No	
Adj Sat Flow, veh/h/ln	1870	1841	1841	1781	1752	1870	1870	1870	1870	1870	1870	1870
Adj Flow Rate, veh/h	13	833	521	203	1680	27	239	227	54	24	341	0
Peak Hour Factor	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95
Percent Heavy Veh, %	2	4	4	8	10	2	2	2	2	2	2	2
Cap, veh/h	81	1623	724	289	1757	837	275	556	471	295	369	
Arrive On Green	0.01	0.46	0.46	0.08	0.53	0.53	0.12	0.30	0.30	0.02	0.20	0.00
Sat Flow, veh/h	1781	3497	1560	1697	3328	1585	1781	1870	1585	1781	1870	1585
Grp Volume(v), veh/h	13	833	521	203	1680	27	239	227	54	24	341	0
Grp Sat Flow(s),veh/h/ln	1781	1749	1560	1697	1664	1585	1781	1870	1585	1781	1870	1585
Q Serve(g_s), s	0.6	25.1	40.3	9.1	72.2	1.2	15.6	14.6	3.7	1.6	26.8	0.0
Cycle Q Clear(g_c), s	0.6	25.1	40.3	9.1	72.2	1.2	15.6	14.6	3.7	1.6	26.8	0.0
Prop In Lane	1.00		1.00	1.00		1.00	1.00		1.00	1.00		1.00
Lane Grp Cap(c), veh/h	81	1623	724	289	1757	837	275	556	471	295	369	
V/C Ratio(X)	0.16	0.51	0.72	0.70	0.96	0.03	0.87	0.41	0.11	0.08	0.92	
Avail Cap(c_a), veh/h	174	1623	724	314	1757	837	275	556	471	502	468	
HCM Platoon Ratio	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00
Upstream Filter(I)	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	0.00
Uniform Delay (d), s/veh	34.5	28.3	32.3	22.3	33.7	17.0	42.4	42.2	38.3	46.9	59.1	0.0
Incr Delay (d2), s/veh	0.9	1.2	6.1	6.2	13.3	0.1	24.4	0.5	0.1	0.1	21.0	0.0
Initial Q Delay(d3),s/veh	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
%ile BackOfQ(50%),veh/ln	0.3	10.3	16.2	3.9	29.8	0.5	8.6	6.7	1.5	0.7	14.8	0.0
Unsig. Movement Delay, s/veh												
LnGrp Delay(d),s/veh	35.4	29.4	38.4	28.5	47.0	17.1	66.8	42.6	38.4	47.0	80.1	0.0
LnGrp LOS	D	C	D	C	D	B	E	D	D	D	F	
Approach Vol, veh/h		1367			1910			520			365	
Approach Delay, s/veh		32.9			44.6			53.3			77.9	
Approach LOS		C			D			D			E	

Timer - Assigned Phs	1	2	3	4	5	6	7	8
Phs Duration (G+Y+Rc), s	7.2	84.7	8.0	50.1	16.8	75.1	23.0	35.1
Change Period (Y+Rc), s	5.5	5.5	5.5	5.5	5.5	5.5	5.5	5.5
Max Green Setting (Gmax), s	9.5	63.5	20.0	35.0	13.5	59.5	17.5	37.5
Max Q Clear Time (g_c+I1), s	2.6	74.2	3.6	16.6	11.1	27.1	17.6	28.8
Green Ext Time (p_c), s	0.0	0.0	0.0	0.5	0.1	19.0	0.0	0.8

Intersection Summary	
HCM 6th Ctrl Delay	44.8
HCM 6th LOS	D

Notes

User approved pedestrian interval to be less than phase max green.

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

Intersection	
Int Delay, s/veh	3.8

Movement	EBL	EBT	EBR	WBL	WBT	WBR	NBL	NBT	NBR	SBL	SBT	SBR
Lane Configurations		↕			↕			↕			↕	↱
Traffic Vol, veh/h	7	6	28	34	3	29	7	435	43	22	971	7
Future Vol, veh/h	7	6	28	34	3	29	7	435	43	22	971	7
Conflicting Peds, #/hr	0	0	0	0	0	0	0	0	0	0	0	0
Sign Control	Stop	Stop	Stop	Stop	Stop	Stop	Free	Free	Free	Free	Free	Free
RT Channelized	-	-	None	-	-	None	-	-	None	-	-	Yield
Storage Length	-	-	-	-	-	-	-	-	-	-	-	70
Veh in Median Storage, #	-	0	-	-	0	-	-	0	-	-	0	-
Grade, %	-	0	-	-	0	-	-	0	-	-	0	-
Peak Hour Factor	96	96	96	96	96	96	96	96	96	96	96	96
Heavy Vehicles, %	2	2	2	2	2	2	2	2	2	2	2	2
Mvmt Flow	7	6	29	35	3	30	7	453	45	23	1011	7

Major/Minor	Minor2			Minor1			Major1			Major2		
Conflicting Flow All	1563	1569	1011	1565	1547	476	1011	0	0	498	0	0
Stage 1	1057	1057	-	490	490	-	-	-	-	-	-	-
Stage 2	506	512	-	1075	1057	-	-	-	-	-	-	-
Critical Hdwy	7.12	6.52	6.22	7.12	6.52	6.22	4.12	-	-	4.12	-	-
Critical Hdwy Stg 1	6.12	5.52	-	6.12	5.52	-	-	-	-	-	-	-
Critical Hdwy Stg 2	6.12	5.52	-	6.12	5.52	-	-	-	-	-	-	-
Follow-up Hdwy	3.518	4.018	3.318	3.518	4.018	3.318	2.218	-	-	2.218	-	-
Pot Cap-1 Maneuver	91	111	291	90	114	589	686	-	-	1066	-	-
Stage 1	272	302	-	560	549	-	-	-	-	-	-	-
Stage 2	549	536	-	266	302	-	-	-	-	-	-	-
Platoon blocked, %								-	-		-	-
Mov Cap-1 Maneuver	80	104	291	74	107	589	686	-	-	1066	-	-
Mov Cap-2 Maneuver	80	104	-	74	107	-	-	-	-	-	-	-
Stage 1	268	287	-	552	541	-	-	-	-	-	-	-
Stage 2	511	528	-	222	287	-	-	-	-	-	-	-

Approach	EB	WB	NB	SB
HCM Control Delay, s	33.1	66.2	0.1	0.2
HCM LOS	D	F		

Minor Lane/Major Mvmt	NBL	NBT	NBR	EBLn1	WBLn1	SBL	SBT	SBR
Capacity (veh/h)	686	-	-	170	123	1066	-	-
HCM Lane V/C Ratio	0.011	-	-	0.251	0.559	0.021	-	-
HCM Control Delay (s)	10.3	0	-	33.1	66.2	8.5	0	-
HCM Lane LOS	B	A	-	D	F	A	A	-
HCM 95th %tile Q(veh)	0	-	-	0.9	2.7	0.1	-	-

Intersection	
Int Delay, s/veh	0.9

Movement	EBL	EBT	WBT	WBR	SBL	SBR
Lane Configurations						
Traffic Vol, veh/h	3	70	84	17	14	2
Future Vol, veh/h	3	70	84	17	14	2
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	84	84	84	84	84	84
Heavy Vehicles, %	2	2	2	2	2	2
Mvmt Flow	4	83	100	20	17	2

Major/Minor	Major1		Major2		Minor2	
Conflicting Flow All	120	0	-	0	201	110
Stage 1	-	-	-	-	110	-
Stage 2	-	-	-	-	91	-
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	1468	-	-	-	788	943
Stage 1	-	-	-	-	915	-
Stage 2	-	-	-	-	933	-
Platoon blocked, %		-	-	-		
Mov Cap-1 Maneuver	1468	-	-	-	786	943
Mov Cap-2 Maneuver	-	-	-	-	786	-
Stage 1	-	-	-	-	912	-
Stage 2	-	-	-	-	933	-

Approach	EB	WB	SB
HCM Control Delay, s	0.3	0	9.6
HCM LOS			A

Minor Lane/Major Mvmt	EBL	EBT	WBT	WBR	SBLn1
Capacity (veh/h)	1468	-	-	-	803
HCM Lane V/C Ratio	0.002	-	-	-	0.024
HCM Control Delay (s)	7.5	0	-	-	9.6
HCM Lane LOS	A	A	-	-	A
HCM 95th %tile Q(veh)	0	-	-	-	0.1

Intersection	
Int Delay, s/veh	2.6

Movement	WBL	WBR	NBT	NBR	SBL	SBT
Lane Configurations						
Traffic Vol, veh/h	37	41	443	28	75	955
Future Vol, veh/h	37	41	443	28	75	955
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	-	-	175	235	-
Veh in Median Storage, #	0	-	0	-	-	0
Grade, %	0	-	0	-	-	0
Peak Hour Factor	92	92	92	92	92	92
Heavy Vehicles, %	2	2	2	2	2	2
Mvmt Flow	40	45	482	30	82	1038

Major/Minor	Minor1		Major1		Major2	
Conflicting Flow All	1684	482	0	0	512	0
Stage 1	482	-	-	-	-	-
Stage 2	1202	-	-	-	-	-
Critical Hdwy	6.42	6.22	-	-	4.12	-
Critical Hdwy Stg 1	5.42	-	-	-	-	-
Critical Hdwy Stg 2	5.42	-	-	-	-	-
Follow-up Hdwy	3.518	3.318	-	-	2.218	-
Pot Cap-1 Maneuver	104	584	-	-	1053	-
Stage 1	621	-	-	-	-	-
Stage 2	285	-	-	-	-	-
Platoon blocked, %			-	-		-
Mov Cap-1 Maneuver	96	584	-	-	1053	-
Mov Cap-2 Maneuver	96	-	-	-	-	-
Stage 1	621	-	-	-	-	-
Stage 2	263	-	-	-	-	-

Approach	WB	NB	SB
HCM Control Delay, s	45.1	0	0.6
HCM LOS	E		

Minor Lane/Major Mvmt	NBT	NBR	WBLn1	SBL	SBT
Capacity (veh/h)	-	-	171	1053	-
HCM Lane V/C Ratio	-	-	0.496	0.077	-
HCM Control Delay (s)	-	-	45.1	8.7	-
HCM Lane LOS	-	-	E	A	-
HCM 95th %tile Q(veh)	-	-	2.4	0.3	-

Intersection	
Int Delay, s/veh	1.9

Movement	EBL	EBR	NBL	NBT	SBT	SBR
Lane Configurations						
Traffic Vol, veh/h	0	4	5	15	12	0
Future Vol, veh/h	0	4	5	15	12	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	-	-	-	-	-
Veh in Median Storage, #	0	-	-	0	0	-
Grade, %	0	-	-	0	0	-
Peak Hour Factor	92	92	92	92	92	92
Heavy Vehicles, %	2	2	2	2	2	2
Mvmt Flow	0	4	5	16	13	0

Major/Minor	Minor2		Major1		Major2	
Conflicting Flow All	39	13	13	0	-	0
Stage 1	13	-	-	-	-	-
Stage 2	26	-	-	-	-	-
Critical Hdwy	6.42	6.22	4.12	-	-	-
Critical Hdwy Stg 1	5.42	-	-	-	-	-
Critical Hdwy Stg 2	5.42	-	-	-	-	-
Follow-up Hdwy	3.518	3.318	2.218	-	-	-
Pot Cap-1 Maneuver	973	1067	1606	-	-	-
Stage 1	1010	-	-	-	-	-
Stage 2	997	-	-	-	-	-
Platoon blocked, %				-	-	-
Mov Cap-1 Maneuver	970	1067	1606	-	-	-
Mov Cap-2 Maneuver	970	-	-	-	-	-
Stage 1	1007	-	-	-	-	-
Stage 2	997	-	-	-	-	-

Approach	EB	NB	SB
HCM Control Delay, s	8.4	1.8	0
HCM LOS	A		

Minor Lane/Major Mvmt	NBL	NBT	EBLn1	SBT	SBR
Capacity (veh/h)	1606	-	1067	-	-
HCM Lane V/C Ratio	0.003	-	0.004	-	-
HCM Control Delay (s)	7.2	0	8.4	-	-
HCM Lane LOS	A	A	A	-	-
HCM 95th %tile Q(veh)	0	-	0	-	-

TRAFFIC VOLUME WORKSHEETS

24-204 - Retail Development at 4391 Brownsville Road, Powder Springs

Traffic Volumes

A&R Engineering
October 2024

1.SR 6 @ Brownsville Rd

A.M. Peak Hour

Condition	Brownsville Road Northbound				Brownsville Road Southbound				SR 6/ US 278 (C.H. James Parkway) Eastbound				SR 6/ US 278 (C.H. James Parkway) Westbound			
	L	T	R	Tot	L	T	R	Tot	L	T	R	Tot	L	T	R	Tot
Existing 2024 Traffic Counts:	359	234	88	681	33	95	1	129	29	1510	185	1724	39	790	24	853
Growth Factor (%):	1	1	1		1	1	1		1	1	1		1	1	1	
No-Build 2026 Volumes:	366	239	90	695	34	97	1	132	30	1540	189	1759	40	806	24	870
Total New Trips:	14	11	14	39	0	12	0	12	0	0	15	15	15	0	0	15
Pass-by Trips:	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
Future 2026 Traffic Volumes:	380	250	104	734	34	109	1	144	30	1540	204	1774	55	806	24	885

P.M. Peak Hour

Condition	Brownsville Road Northbound				Brownsville Road Southbound				SR 6/ US 278 (C.H. James Parkway) Eastbound				SR 6/ US 278 (C.H. James Parkway) Westbound			
	L	T	R	Tot	L	T	R	Tot	L	T	R	Tot	L	T	R	Tot
Existing 2024 Traffic Counts:	213	204	40	457	23	307	2	332	12	775	472	1259	175	1565	25	1765
Growth Factor (%):	1	1	1		1	1	1		1	1	1		1	1	1	
No-Build 2026 Volumes:	217	208	41	466	23	313	2	338	12	791	481	1284	179	1596	26	1801
Total New Trips:	10	8	10	28	0	11	0	11	0	0	14	14	14	0	0	14
Pass-by Trips:	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
Future 2026 Traffic Volumes:	227	216	51	494	23	324	2	349	12	791	495	1298	193	1596	26	1815

24-204 - Retail Development at 4391 Brownsville Road, Powder Springs

Traffic Volumes

A&R Engineering
October 2024

2.Brownsville Rd @ Oglesby Rd

A.M. Peak Hour

Condition	Brownsville Road Northbound				Brownsville Road Southbound				Zaxbys Chicken Fingers & Buffalo Wings Drwy Eastbound				Oglesby Road Westbound			
	L	T	R	Tot	L	T	R	Tot	L	T	R	Tot	L	T	R	Tot
Existing 2024 Traffic Counts:	1	672	104	777	11	328	0	339	0	0	0	0	20	2	13	35
Growth Factor (%):	1	1	1		1	1	1		1	1	1		1	1	1	
No-Build 2026 Volumes:	1	685	106	792	11	335	0	346	0	0	0	0	20	2	13	35
Total New Trips:	0	12	0	12	0	11	0	11	0	0	0	0	0	0	0	0
Pass-by Trips:	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
Future 2026 Traffic Volumes:	1	697	106	804	11	346	0	357	0	0	0	0	20	2	13	35

P.M. Peak Hour

Condition	Brownsville Road Northbound				Brownsville Road Southbound				Zaxbys Chicken Fingers & Buffalo Wings Drwy Eastbound				Oglesby Road Westbound			
	L	T	R	Tot	L	T	R	Tot	L	T	R	Tot	L	T	R	Tot
Existing 2024 Traffic Counts:	7	416	42	465	22	944	7	973	7	6	27	40	33	3	28	64
Growth Factor (%):	1	1	1		1	1	1		1	1	1		1	1	1	
No-Build 2026 Volumes:	7	424	43	474	22	963	7	992	7	6	28	41	34	3	29	66
Total New Trips:	0	11	0	11	0	8	0	8	0	0	0	0	0	0	0	0
Pass-by Trips:	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
Future 2026 Traffic Volumes:	7	435	43	485	22	971	7	1000	7	6	28	41	34	3	29	66

24-204 - Retail Development at 4391 Brownsville Road, Powder Springs

Traffic Volumes

A&R Engineering
October 2024

3.Oglesby Rd @ Access Rd

A.M. Peak Hour

Condition	- Northbound					Access Road Southbound					Oglesby Road Eastbound					Oglesby Road Westbound			
	L	T	R	Tot		L	T	R	Tot		L	T	R	Tot		L	T	R	Tot
Existing 2024 Traffic Counts:	0	0	0	0		14	0	2	16		1	138	0	139		0	29	0	29
Growth Factor (%):	1	1	1			1	1	1			1	1	1			1	1	1	
No-Build 2026 Volumes:	0	0	0	0		14	0	2	16		1	141	0	142		0	30	0	30
Total New Trips:	0	0	0	0		5	0	0	5		0	0	0	0		0	0	6	6
Pass-by Trips:	0	0	0	0		0	0	0	0		0	0	0	0		0	0	0	0
Future 2026 Traffic Volumes:	0	0	0	0		19	0	2	21		1	141	0	142		0	30	6	36

P.M. Peak Hour

Condition	- Northbound					Access Road Southbound					Oglesby Road Eastbound					Oglesby Road Westbound			
	L	T	R	Tot		L	T	R	Tot		L	T	R	Tot		L	T	R	Tot
Existing 2024 Traffic Counts:	0	0	0	0		10	0	2	12		3	69	0	72		0	82	12	94
Growth Factor (%):	1	1	1			1	1	1			1	1	1			1	1	1	
No-Build 2026 Volumes:	0	0	0	0		10	0	2	12		3	70	0	73		0	84	12	96
Total New Trips:	0	0	0	0		4	0	0	4		0	0	0	0		0	0	5	5
Pass-by Trips:	0	0	0	0		0	0	0	0		0	0	0	0		0	0	0	0
Future 2026 Traffic Volumes:	0	0	0	0		14	0	2	16		3	70	0	73		0	84	17	101

24-204 - Retail Development at 4391 Brownsville Road, Powder Springs

Traffic Volumes

A&R Engineering
October 2024

4.Brownsville Rd @ Site Drwy 1

A.M. Peak Hour

	Brownsville Road Northbound					Brownsville Road Southbound					- Eastbound					Site Driveway 1 Westbound			
Condition	L	T	R	Tot		L	T	R	Tot		L	T	R	Tot		L	T	R	Tot
Existing 2024 Traffic Counts:	0	685	0	685		0	339	0	339		0	0	0	0		0	0	0	0
Growth Factor (%):	1	1	1			1	1	1			1	1	1			1	1	1	
No-Build 2026 Volumes:	0	699	0	699		0	346	0	346		0	0	0	0		0	0	0	0
Total New Trips:	0	0	12	12		41	0	0	41		0	0	0	0		11	0	38	49
Pass-by Trips:	0	-27	27	0		12	-12	0	0		0	0	0	0		12	0	26	38
Future 2026 Traffic Volumes:	0	672	39	711		53	334	0	387		0	0	0	0		23	0	64	87

P.M. Peak Hour

	Brownsville Road Northbound					Brownsville Road Southbound					- Eastbound					Site Driveway 1 Westbound			
Condition	L	T	R	Tot		L	T	R	Tot		L	T	R	Tot		L	T	R	Tot
Existing 2024 Traffic Counts:	0	451	0	451		0	973	0	973		0	0	0	0		0	0	0	0
Growth Factor (%):	1	1	1			1	1	1			1	1	1			1	1	1	
No-Build 2026 Volumes:	0	460	0	460		0	992	0	992		0	0	0	0		0	0	0	0
Total New Trips:	0	0	11	11		38	0	0	38		0	0	0	0		8	0	28	36
Pass-by Trips:	0	-17	17	0		37	-37	0	0		0	0	0	0		29	0	13	42
Future 2026 Traffic Volumes:	0	443	28	471		75	955	0	1030		0	0	0	0		37	0	41	78

24-204 - Retail Development at 4391 Brownsville Road, Powder Springs

Traffic Volumes

A&R Engineering
October 2024

5.Access Rd @ Site Drwy 2

A.M. Peak Hour

Condition	Access Road Northbound				Access Road Southbound				Site Driveway 2 Eastbound				- Westbound			
	L	T	R	Tot	L	T	R	Tot	L	T	R	Tot	L	T	R	Tot
Existing 2024 Traffic Counts:	0	1	0	1	0	16	0	16	0	0	0	0	0	0	0	0
Growth Factor (%):	1	1	1		1	1	1		1	1	1		1	1	1	
No-Build 2026 Volumes:	0	1	0	1	0	16	0	16	0	0	0	0	0	0	0	0
Total New Trips:	6	0	0	6	0	0	0	0	0	0	5	5	0	0	0	0
Pass-by Trips:	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
Future 2026 Traffic Volumes:	6	1	0	7	0	16	0	16	0	0	5	5	0	0	0	0

P.M. Peak Hour

Condition	Access Road Northbound				Access Road Southbound				Site Driveway 2 Eastbound				- Westbound			
	L	T	R	Tot	L	T	R	Tot	L	T	R	Tot	L	T	R	Tot
Existing 2024 Traffic Counts:	0	15	0	15	0	12	0	12	0	0	0	0	0	0	0	0
Growth Factor (%):	1	1	1		1	1	1		1	1	1		1	1	1	
No-Build 2026 Volumes:	0	15	0	15	0	12	0	12	0	0	0	0	0	0	0	0
Total New Trips:	5	0	0	5	0	0	0	0	0	0	4	4	0	0	0	0
Pass-by Trips:	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
Future 2026 Traffic Volumes:	5	15	0	20	0	12	0	12	0	0	4	4	0	0	0	0