RGA

Richard Garcia & Associates, Inc.

Traffic Impact Study

Sandpiper Apartments

9701 Wayne Avenue
Palmetto Bay, Florida

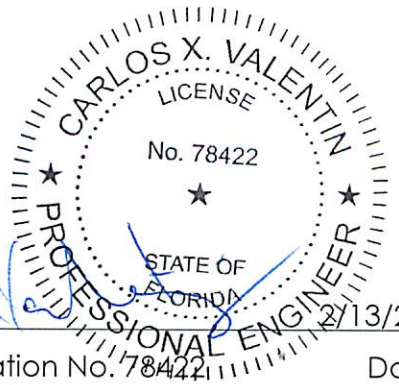
February 13th, 2017
Revised: May 4th, 2017

Engineer's Certification

I, Carlos X. Valentin, P.E. # 78422, certify that I currently hold an active Professional Engineers License in the State of Florida and am competent through education and experience to provide engineering services in the civil and traffic engineering disciplines contained in this report. In addition, the firm Richard Garcia & Associates, Inc. holds a Certificate of Authorization # 9592 in the State of Florida. I further certify that this report was prepared by me or under my responsible charge as defined in Chapter 61G15-18.001 F.A.C. and that all statements, conclusions and recommendations made herein are true and correct to the best of my knowledge and ability.

PROJECT DESCRIPTION: Sandpiper Apartments - Traffic Impact Study

PROJECT LOCATION: 9701 Wayne Avenue
Palmetto Bay, Florida



2/13/2017

Florida Registration No. 78422 Date

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Responses to City's Traffic Comments

We have reviewed the traffic comments from Marlin Engineering, Inc. dated April 17th, 2017 for the referenced project. We hereby offer the following responses in an effort to address the comments made.

1. **Please clarify what type of retail use is planned?**
    a. **Starbucks?**
    b. **Will it be open in the AM peak period?**

RGA Response: The subject project will have a quality restaurant (3,400 SF) and a variety of retail shops (6,600 SF). At this time, it is too premature for the Client to identify a specific retail store. Moreover, this project has not proposed a Starbucks. Lastly, the variety of retail shops will be open during the AM peak period. However, the quality restaurant will not be opened for breakfast.

2. **Study intersections: The study analyzed three (3) intersections, SW 97th Avenue (Franjo Road) & SW 181st Terrace, SW 181st Terrace & Wayne Avenue and SW 98th Avenue Road & Wayne Avenue. Note, the SW 97th Avenue (Franjo Road) & SW 181st Terrace and SW 181st Terrace & Wayne Avenue intersections are only fifty (50) feet apart.**
    a. **A future and existing intersection and link analysis shall be completed for all significant locations.**
    b. **The radius of influence shall be calculated for all trips greater than three (3) percent of the roadway level of service volume.**
    c. **AM and PM turning movement counts shall be collected at each significant intersection on a typical weekday.**
    d. **The AM and PM link volumes may be calculated from the intersection turning movement counts at each of significant intersections and utilized for the link concurrency analysis.**
    e. **The traffic impact analysis should be developed for each phase year of construction and shall analyze a future no build plus committed, future build scenario plus project trips and future build plus trips with mitigation (if necessary), for both the AM and PM peak periods. All significant intersections and links shall be analyzed for all scenarios.**

RGA Response: The radius of influence (study area) was determined consistent with the reviewer's suggested method. The three (3) intersections previously analyzed are the only locations that will have project trips greater than 3 percent of the roadway Level of Service volume and therefore, no additional intersections were analyzed. Note, the traffic counts for the studied intersections were collected during a typical weekday's AM and PM peak period.

Similarly, the roadway links were identified and evaluated for the AM and PM peak hour. Wayne Avenue (between SW 97 Ave. & SW 98 Avenue Road) and SW 98 Avenue Road (between Hibiscus St. & SW 183 St.) were analyzed for the existing condition, future condition without project (No Build) and future condition with project (Build). Note, the roadway link volumes were obtained from the intersection movement counts.

Lastly, this project will be constructed in one phase and no traffic mitigations were required since the analyses yielded results that satisfy the City's LOS threshold.

3. **Please justify the use of the specialty retail (826) versus shopping center (220), as the shopping center land use is more reliable and supported by more studies. The study utilizes shopping center for the AM peak hour, due to fact that there is not a trip rate in the AM peak hour for specialty retail.**

   RGA Response: It is our professional opinion that specialty retail (LU 826) is the most suitable land use for the proposed retail space and not shopping center (LU 820). LU 820 is typically used for large scale developments with a group of commercial establishments. Also, the average size of the independent variable for LU 820 exceeds 300,000 square feet and seems out of scale when compared to the proposed retail with 6,600 square feet.

4. **The label of the "Proposed Future Condition (2017)", is shown on page 14. However, the study states a future condition in 2019. Please clarify.**

   RGA Response: Note, it is typographical error. The project build-out year is slated for 2019 as stated throughout the report.

5. **Committed development should be included in the future background.**

   RGA Response: The committed development was included in the revised analysis. See revised study dated May 4th, 2017.

6. **Level of Service: Existing and Future LOS tables show the overall and critical approach LOS and delay. Please provide all available approach LOS and delay at each significant intersection.**

   RGA Response: The approach LOS and delay for each studied intersection was included in Appendix E of the study (Synchro output print outs). Nonetheless, the LOS and delay for each intersection approach was summarized for ease of review. See revised study.

Executive Summary

This study was prepared to determine the vehicle trips associated with the subject project and to evaluate the traffic impacts to the most impacted intersections.

The subject site is located on the northwest corner of SW 97th Avenue (Franjo Road) and SW 181st Terrace in the Village of Palmetto Bay, Florida. This site is currently vacant whereas the proposed mixed-use development consists of apartments with 139 units for rent, a quality restaurant with 3,400 square feet and 6,600 square feet of retail. The project build-out is slated for 2019. Moreover, the subject project has proposed two driveways on Wayne Avenue and a service driveway on Indigo Street. The east driveway on Wayne Avenue will operate as ingress only while the west driveway will provide full access to the site.

The trip generation characteristics for the subject project were obtained from **ITE's Trip Generation Manual, 9th Edition**. The trip generation analysis was performed for a typical weekday's AM and PM peak hour. This analysis includes internal capture rates (i.e. project internalization trips for the AM and PM peak hour). The internal capture rates were estimated following the methodology of Multi-Use Development Trip Generation and Internal Capture from the **ITE Trip Generation Handbook, 3rd Edition**. This methodology estimate an internal capture rate between each pair of land uses within a multi-use development. The following land uses, as identified by the Institute of Transportation Engineers (ITE), most closely resemble the subject project. These land uses (LU) are as follows:

- LU 220: Apartment - 139 Dwelling Units
- LU 826: Specialty Retail - 6,600 Square Feet
- LU 931: Quality Restaurant - 3,400 Square Feet

Based on the trip generation analysis, the subject project will generate 77 net external trips (19 trips-in & 58 trips-out) during the AM peak hour and 118 net external trips (71 trips-in & 47 trips-out) in the PM peak hour. The above peak hour trips were distributed to the most impacted intersections and assigned to the project's driveways consistent with the trip distribution percentages of the project's Traffic Analysis Zone 1144.

Manual Turning Movement Counts (TMC's) and traffic operational characteristics were gathered at the intersections of *SW 97th Avenue (Franjo Road)/SW 181st Terrace, SW 181st Terrace/Wayne Avenue and SW 98th Avenue Road/Wayne Avenue.* These turning movement counts were performed on Tuesday, May 3rd, 2016 during the typical weekday's AM peak period of 7:00 AM to 9:00 AM and PM peak period of 4:00 PM to 6:00 PM. Subsequently, the AM and PM peak hour traffic volumes were determined, adjusted for seasonal variations by using the Florida Department of Transportation

(FDOT) Seasonal Factor and utilized in the operational analysis for the existing condition. The operational analysis revealed that all the intersections are currently operating at LOS A during the AM and PM peak hour.

Based on historical traffic data and trends, regression analyses were performed to estimate the background traffic growth within the project's vicinity. The highest growth rate yielded 0.76 percent. However, a conservative 2.0 percent growth rate was utilized in the analysis. As such, the existing seasonally adjusted turning movement counts were augmented with a compounded background growth rate of 2.0 percent and committed trips. The resulting traffic volumes represent the proposed future condition without project in 2019. Similarly, the traffic volumes for the future condition with project in 2019 include background traffic growth, committed trips and the project net trips. The future traffic volumes with and without project were evaluated and the analysis revealed that all studied intersections will maintain the existing LOS A for both the AM and PM peak hour. Lastly, the proposed driveways were also evaluated and yielded LOS A. Table 1 summarizes the LOS and delay per approach for the each intersection and project's driveways.

Additionally, the roadway links of Wayne Avenue (between SW 97 Ave. & SW 98 Av. Rd.) and SW 98 Avenue Road (between Hibiscus St. & SW 183 St.) were identified as the most impacted by the subject project and therefore, evaluated for Level of Service (LOS). This analysis was performed for the existing condition, future condition without project (No Build) and future condition with project in 2019 during the AM and PM peak hour. As a result, the roadway analysis yielded LOS C for the existing condition and proposed conditions for the AM and PM peak hour.

In conclusion, the most impacted intersections and roadways are currently operating within the Village's acceptable LOS threshold and will continue to do so with the new traffic generated by the subject project. Therefore, no off-site improvements are required or recommended at this time.

Lastly, it is fair to conclude that the subject project will not adversely impact the traffic operations within the study area.

Table 1: Intersection Level of Service Summary

	Location	Intersection Control	Approach	Existing Condition (2016)				Future Condition without Project (2019)				Future Condition with Project (2019)			
				AM Peak Hour		PM Peak Hour		AM Peak Hour		PM Peak Hour		AM Peak Hour		PM Peak Hour	
				LOS	Delay (s)	LOS	Delay (s)	LOS	Delay (s)	LOS	Delay (s)	LOS	Delay (s)	LOS	Delay (s)
Intersections	**SW 97 Avenue & SW 181 Terrace**	Two-Way Stop	EB	C	16.6 *	B	13.8	C	18.3 *	B	14.7	C	19.7 *	C	17.8
			WB	C	15.1	C	15.5 *	C	16.3	C	17.0 *	C	16.9	C	19.2 *
			NB	A	0.2	A	0.1	A	0.2	A	0.1	A	0.2	A	0.4
			SB	A	0.2	A	0.1	A	0.1	A	0.1	A	0.1	A	0.1
			Overall	**A**	**2.0**	**A**	**0.6**	**A**	**2.0**	**A**	**0.6**	**A**	**2.8**	**A**	**1.3**
	SW 181 Terrace & Wayne Avenue	SEB Yield	EB	A	0.0	A	0.0	A	0.0	A	0.0	A	0.0	A	0.0
			WB	A	0.0	A	0.0	A	0.0	A	0.0	A	0.0	A	0.0
			NB	-	-	-	-	-	-	-	-	-	-	-	-
			SEB	A	9.0 *	A	8.7 *	A	9.0 *	A	8.7 *	A	9.3 *	A	9.0 *
			Overall	**A**	**1.7**	**A**	**0.6**	**A**	**1.7**	**A**	**0.6**	**A**	**3.7**	**A**	**2.4**
	SW 98 Avenue Road & Wayne Avenue	Two-Way Stop	EB	-	-	-	-	-	-	-	-	-	-	-	-
			WB	A	9.1 *	A	8.7 *	A	9.1 *	A	8.7 *	A	9.2 *	A	8.9 *
			NB	A	0.0	A	0.0	A	0.0	A	0.0	A	0.0	A	0.0
			SB	A	1.4	A	0.3	A	1.3	A	0.2	A	2.0	A	2.9
			Overall	**A**	**0.8**	**A**	**0.8**	**A**	**0.8**	**A**	**0.8**	**A**	**2.0**	**A**	**3.4**
Driveways	**Wayne Avenue & East Driveway (DW1)**	Ingress Only (Free Flow)	EB	-	-	-	-	-	-	-	-	A	0.0	A	0.5
			WB	-	-	-	-	-	-	-	-	A	0.0	A	0.0
			NB	-	-	-	-	-	-	-	-	-	-	-	-
			SB	-	-	-	-	-	-	-	-	-	-	-	-
			Overall	-	-	**-**	**-**	-	-	**-**	**-**	**A**	**0.0**	**A**	**0.2**
	Wayne Avenue & West Driveway (DW2)	Two-Way Stop	EB	-	-	-	-	-	-	-	-	A	1.7	A	6.5
			WB	-	-	-	-	-	-	-	-	A	0.0	A	0.0
			NB	-	-	-	-	-	-	-	-	-	-	-	-
			SB	-	-	-	-	-	-	-	-	A	8.8 *	A	8.9 *
			Overall	-	-	**-**	**-**	-	-	**-**	**-**	**A**	**5.7**	**A**	**5.5**

* TWSC Critical Approach

Introduction

The main objective of this report is to determine the vehicle trips associated with the subject project and to evaluate the traffic impacts to the most impacted intersections and roadways. As such, an operational analysis was performed to determine the capacity and Level of Service at the most impacted intersections during the typical weekday's AM and PM peak hour.

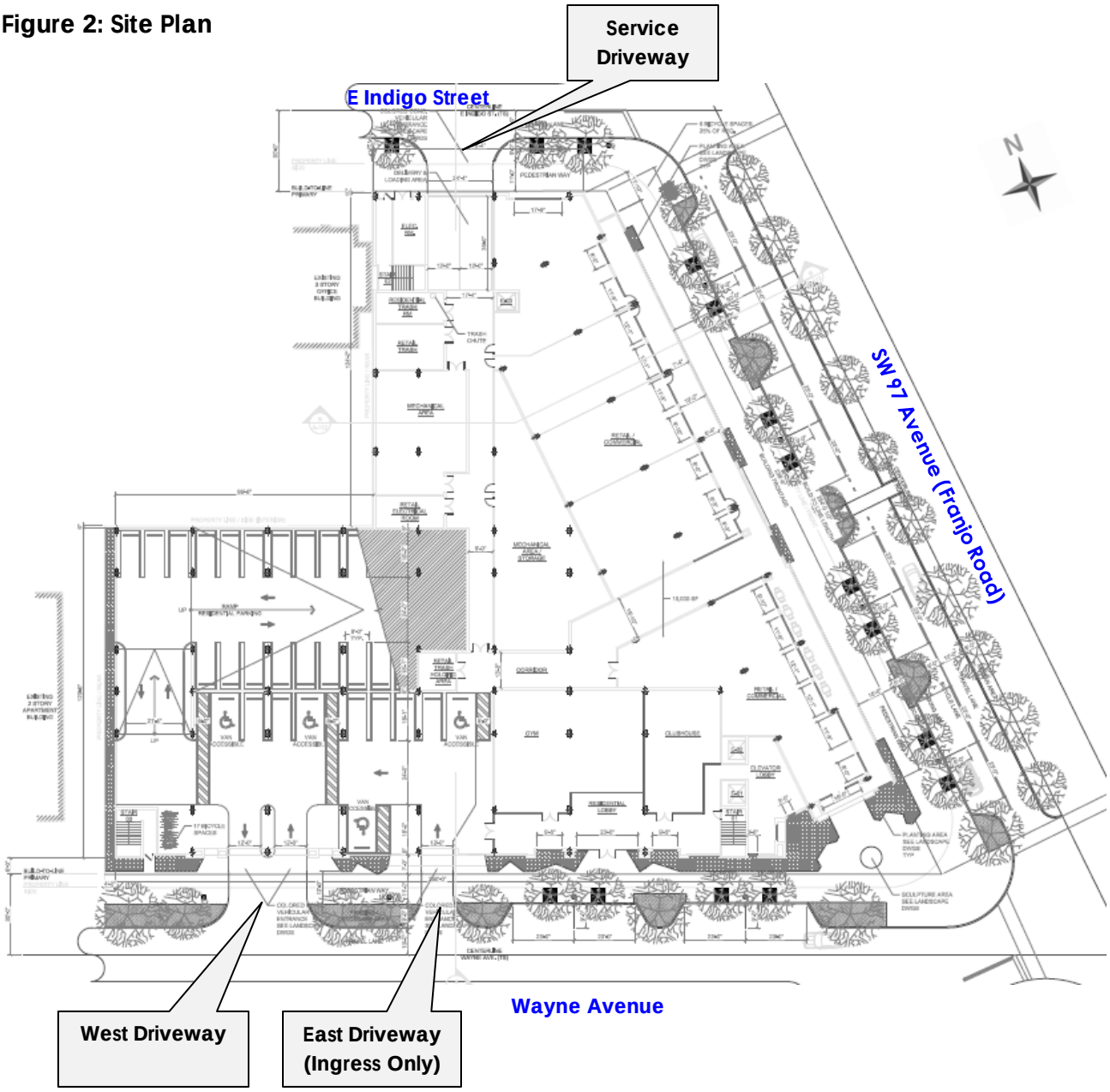
Project Description / Location

The subject site is located on the northwest corner of SW 97th Avenue (Franjo Road) and SW 181st Terrace in the Village of Palmetto Bay, Florida. This site is currently vacant whereas the proposed mixed-use development consists of apartments with 139 units for rent, a quality restaurant with 3,400 square feet and 6,600 square feet of retail. The project build-out is slated for 2019.

Moreover, the subject project has proposed two (2) driveways on Wayne Avenue and a service driveway on Indigo Street. The east driveway on Wayne Avenue will operate as ingress only while the west driveway will provide full access to the site. Figure 1 depicts the site's location map while Figure 2 is the site plan included for illustrative purpose only.

Figure 1: Location Map

Figure 2: Site Plan



Existing Condition (2016)

The purpose of this section is to identify the current operational and geometric characteristics of the intersections within the study area in order to provide a comparison to future conditions.

Turning Movement Counts (TMC's)

Manual Turning Movement Counts (TMC's) and traffic operational characteristics were gathered at the intersections identified below. These turning movement counts were performed on Tuesday, May 3rd, 2016 during the typical weekday's AM peak period of 7:00 AM to 9:00 AM and PM peak period of 4:00 PM to 6:00 PM. Subsequently, the AM and PM peak hour traffic volumes were determined, adjusted for seasonal variations by using the Florida Department of Transportation (FDOT) Seasonal Factor and utilized in the operational analysis for the existing condition. Traffic counts and operational characteristics were gathered at the following intersections:

- SW 97th Avenue (Franjo Road) & SW 181st Terrace
- SW 181st Terrace & Wayne Avenue
- SW 98th Avenue Road & Wayne Avenue

Figures 3 and 4 are graphical representations of the seasonally adjusted existing AM and PM peak hour TMC's, respectively. Appendix D contains the raw traffic data.

Figure 3: Existing Seasonally Adjusted TMC's - AM Peak Hour

Figure 4: Existing Seasonally Adjusted TMC's - PM Peak Hour

Intersection Level of Service (LOS)

The turning movement counts shown in the above figures were utilized to perform an operational analysis for the AM and PM peak hour condition. This analysis was performed consistent with the traffic operational characteristics (i.e. lane geometry, traffic control, etc.) at the time data collection took place and follows the latest Highway Capacity Manual (HCM) methodology.

The operational analysis revealed that all the intersections are currently operating at LOS A during the AM and PM peak hour. Table 2 summarizes the LOS results and vehicle delay. Appendix E contains other outputs such as volume to capacity ratio (V/C) and 95th Percentile Queue.

Table 2: Existing Intersection LOS & Delay - AM & PM Peak Hour

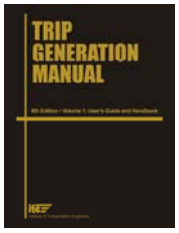
	Location	Intersection Control	Approach	Existing Condition (2016)			
				AM Peak Hour		PM Peak Hour	
				LOS	Delay (s)	LOS	Delay (s)
Intersections	**SW 97 Avenue & SW 181 Terrace**	Two-Way Stop	EB	C	16.6 *	B	13.8
			WB	C	15.1	C	15.5 *
			NB	A	0.2	A	0.1
			SB	A	0.2	A	0.1
			Overall	**A**	**2.0**	**A**	**0.6**
	SW 181 Terrace & Wayne Avenue	SEB Yield	EB	A	0.0	A	0.0
			WB	A	0.0	A	0.0
			NB	-	-	-	-
			SEB	A	9.0 *	A	8.7 *
			Overall	**A**	**1.7**	**A**	**0.6**
	SW 98 Avenue Road & Wayne Avenue	Two-Way Stop	EB	-	-	-	-
			WB	A	9.1 *	A	8.7 *
			NB	A	0.0	A	0.0
			SB	A	1.4	A	0.3
			Overall	**A**	**0.8**	**A**	**0.8**

* TWSC Critical Approach

Project Traffic

This section of the report describes the analysis for estimating the traffic associated with the subject project.

Trip Generation



The trip generation characteristics for the subject project were obtained from **ITE's Trip Generation Manual, 9th Edition**. The trip generation analysis was performed for a typical weekday's AM and PM peak hour. This analysis includes internal capture rates (i.e. project internalization trips for the AM and PM peak hour). The internal capture rates were estimated following the methodology of Multi-Use Development Trip Generation and Internal Capture from the **ITE Trip Generation Handbook, 3rd Edition**. This methodology estimate an internal capture rate between each pair of land uses within a multi-use development. The following land uses, as identified by the Institute of Transportation Engineers (ITE), most closely resemble the subject project. These land uses (LU) are as follows:

Proposed

- LU 220: Apartment - 139 Dwelling Units
- LU 826: Specialty Retail - 6,600 Square Feet
- LU 931: Quality Restaurant - 3,400 Square Feet

Based on the trip generation analysis, the subject project will generate 77 net external trips (19 trips-in & 58 trips-out) during the AM peak hour and 118 net external trips (71 trips-in & 47 trips-out) in the PM peak hour. These vehicle trips are likely to be reduced based on the rate and extent of the transit and pedestrian usage since neither of these adjustments were utilized in the trip generation analysis. Tables 3 and 4 summarize the trip generation results for the AM and PM peak hour, respectively. Appendix A contains the supporting documentation.

Table 3: Trip Generation - AM Peak Hour

LAND USE (LU)	UNITS	ITE LU CODE	ITE TRIP GENERATION RATE / EQUATION		AM PEAK HOUR TRIPS IN	OUT	TOTAL
Proposed							
Apartment	139 D.U.	220	Rate	0.51	14	57	71
			Eqn	*T=0.49(X)+3.73*	*14*	*58*	*72*
Specialty Retail *	6.600 Th.Sq.Ft.	820/826	Rate	0.96	4	2	6
Quality Restaurant	3.400 Th.Sq.Ft.	931	Rate	0.81	2	1	3
External Trips *(Proposed Trips)*					**20**	**61**	**81**
Internal Trip Capture	*4.2% of ExternalTrips*				*1*	*3*	*4*
Net External Trips *(External Trips - Internal Trips)*					**19**	**58**	**77**

Notes: ITE Trip Generation, 9th Edition & ITE Trip Generation Handbook, 3rd Edition.

* Since ITE does not provide AM data for Specialty Retail (LU 826), ITE's rate for LU 820 (Shopping Center) was used to estimate the AM peak hour trips. Internal capture was calculated consistent with the ITE methodology for Multi-Use Development Trip Generation and Internal Capture. Results utilized in the analysis.

Table 4: Trip Generation - PM Peak Hour

LAND USE (LU)	UNITS	ITE LU CODE	ITE TRIP GENERATION RATE / EQUATION		PM PEAK HOUR TRIPS IN	OUT	TOTAL
Proposed							
Apartment	139 D.U.	220	Rate	0.62	56	30	86
			Eqn	*T=.55(X)+17.65*	*61*	*33*	*94*
Specialty Retail	6.600 Th.Sq.Ft.	826	Rate	2.71	8	10	18
			Eqn	*T=2.40(X)+21.48*	*16*	*21*	*37*
Quality Restaurant	3.400 Th.Sq.Ft.	931	Rate	7.49	17	8	25
External Trips *(Proposed Trips)*					**94**	**62**	**156**
Internal Trip Capture	*24.5% of ExternalTrips*				*23*	*15*	*38*
Net External Trips *(External Trips - Internal Trips)*					**71**	**47**	**118**

Notes: ITE Trip Generation, 9th Edition & ITE Trip Generation Handbook, 3rd Edition.
Internal capture was calculated consistent with the ITE methodology for Multi-Use Development Trip Generation and Internal Capture. Results utilized in the analysis.

Trip Distribution

The subject project is located within the Traffic Analysis Zone (TAZ) 1144 as assigned by the Metropolitan Planning Organization's (MPO) on the Miami-Dade Transportation Plan (to the Year 2040) Directional Trips Distribution Report, October 2014. As such, the trip distribution was performed consistent with the trip distribution percentages of TAZ 1144 and by interpolating between the 2010 and 2040 TAZ data for the projected design year of 2019. Figure 5 depicts the TAZ map while the directional trip distribution percentages are outlined in Table 5. Appendix C contains the supporting documentation.

Figure 5: Traffic Analysis Zone (TAZ) Map

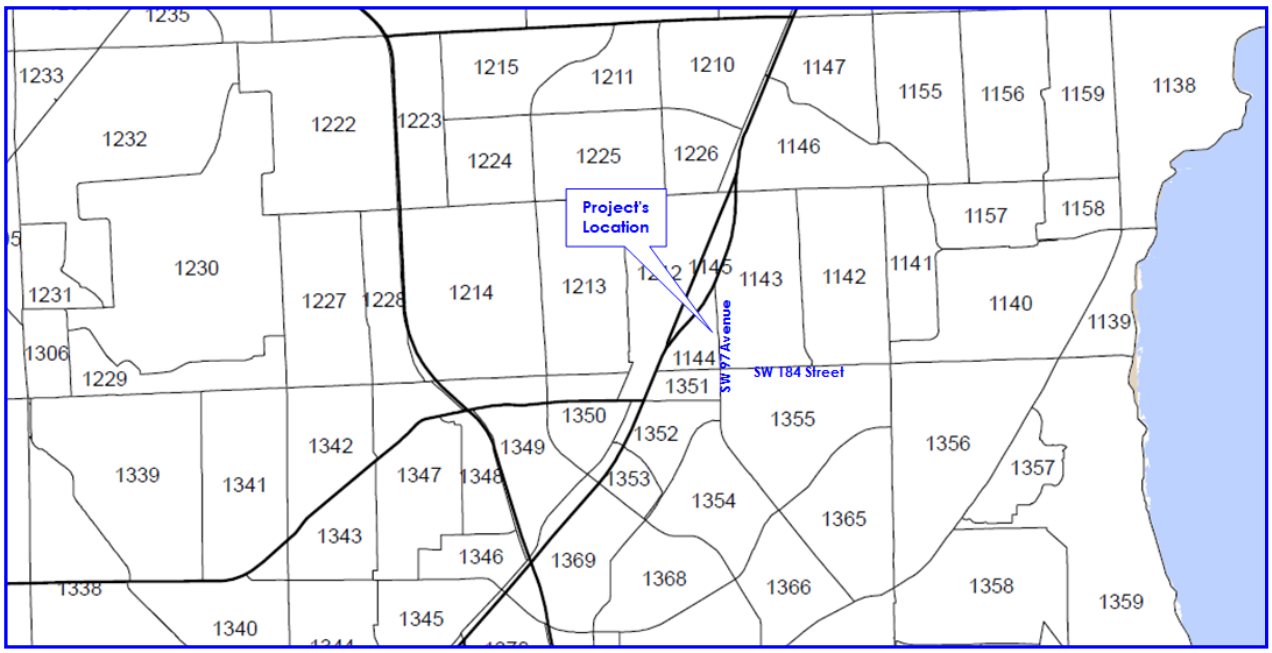


Table 5: Directional Trip Distribution

DIRECTION	DISTRIBUTION PERCENTAGES (%)		
	MIAMI-DADE LRTP MODEL YEAR		DESIGN YEAR
	2010	2040	2019
NNE	27.90	27.20	27.69
ENE	0.80	2.00	1.16
ESE	3.70	5.10	4.12
SSE	8.80	8.20	8.62
SSW	22.30	23.40	22.63
WSW	14.20	9.60	12.82
WNW	8.80	10.40	9.28
NNW	13.60	14.10	13.75
TOTAL	100.00	100.00	100.00

Trip Assignment

The net external peak hour trips were distributed into the four quadrants: North, South, East and West. Table 6 includes the trip distribution percentages and the corresponding trip assignments for the AM and PM peak hour. Lastly, Figures 6 and 7 depict the trips assigned to the intersections within the study area and project's driveways for the AM and PM peak hour, respectively.

Table 6: Directional Trip Assignment

DIRECTION	DISTRIBUTION	AM PEAK HOUR			PM PEAK HOUR		
		IN	OUT	TOTAL	IN	OUT	TOTAL
NORTH	41.44%	8	24	32	30	19	49
EAST	5.28%	1	3	4	4	3	7
SOUTH	31.25%	6	18	24	22	15	37
WEST	22.10%	4	13	17	15	10	25
	100.00%	**19**	**58**	**77**	**71**	**47**	**118**

Figure 6: Project Net Trips - AM Peak Hour

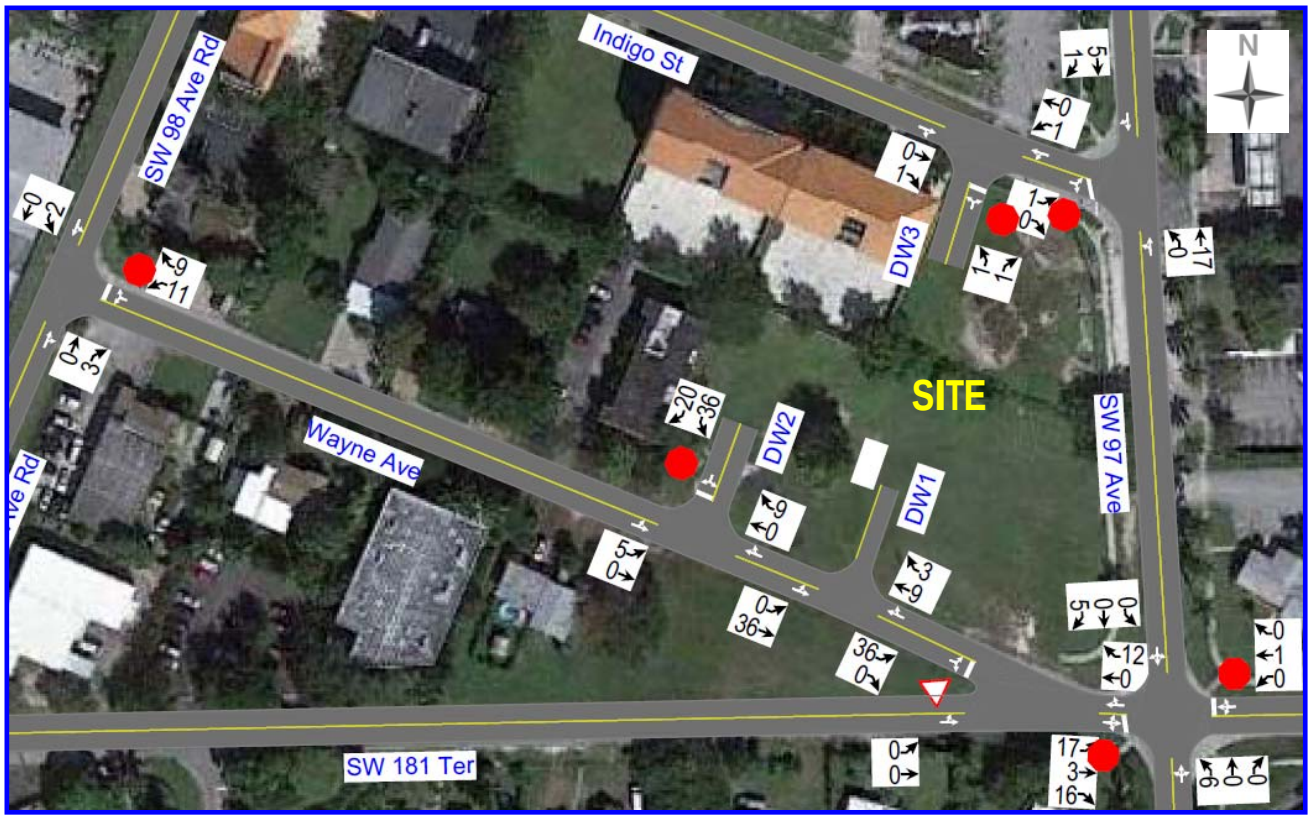


Figure 7: Project Net Trips - PM Peak Hour

Proposed Future Condition (2019)

This section of the report describes the traffic parameters utilized to develop and to evaluate the future peak hour volumes with project in 2019.

Background Traffic Growth

Using available traffic data from the Florida Department of Transportation (FDOT Count Stations 2562, 2563 & 8333), regression analyses were performed to estimate the background traffic growth within the project's vicinity. The highest growth rate yielded 0.76 percent. However, a conservative 2.0 percent growth rate was utilized in the analysis to determine background traffic for the future condition with project in 2019. Appendix C contains the supporting documentation.

Future Traffic Volumes - AM & PM Peak Hour

The existing seasonally adjusted turning movement counts were augmented with a compounded background growth rate of 2.0 percent and committed trips. The resulting traffic volumes represent the proposed future condition without project in 2019. Similarly, the traffic volumes for the future condition with project in 2019 include background traffic growth, committed trips and the project net trips. The calculations for the specific movements at each intersection are contained in Appendix D. Figures 8 and 9 depict the future traffic volumes for the AM and PM peak hour, respectively. Appendix E contains the figures with the proposed future condition without project (No Build).

Level of Service (LOS)

The future traffic volumes with and without project were evaluated to determine the Level of Service at each intersection in 2019. The operational analysis for the future conditions revealed that all the studied intersections will maintain the existing LOS A for the future AM and PM peak hour condition. Lastly, the project's driveways were also evaluated and yielded LOS A. Table 7 summarizes the LOS results while Appendix E includes the Synchro software sheets with other outputs such as queue lengths and volume to capacity (v/c) ratio.

Figure 8: Proposed Future Condition with Project Trips - AM Peak Hour

Figure 9: Proposed Future Condition with Project Trips - PM Peak Hour

Table 7: Future LOS & Delay - AM & PM Peak Hour

	Location	Intersection Control	Approach	Future Condition without Project (2019)				Future Condition with Project (2019)			
				AM Peak Hour		PM Peak Hour		AM Peak Hour		PM Peak Hour	
				LOS	Delay (s)	LOS	Delay (s)	LOS	Delay (s)	LOS	Delay (s)
Intersections	SW 97 Avenue & SW 181 Terrace	Two-Way Stop	EB	C	18.3 *	B	14.7	C	19.7 *	C	17.8
			WB	C	16.3	C	17.0 *	C	16.9	C	19.2 *
			NB	A	0.2	A	0.1	A	0.2	A	0.4
			SB	A	0.1	A	0.1	A	0.1	A	0.1
			Overall	**A**	**2.0**	**A**	**0.6**	**A**	**2.8**	**A**	**1.3**
	SW 181 Terrace & Wayne Avenue	SEB Yield	EB	A	0.0	A	0.0	A	0.0	A	0.0
			WB	A	0.0	A	0.0	A	0.0	A	0.0
			NB	-	-	-	-	-	-	-	-
			SEB	A	9.0 *	A	8.7 *	A	9.3 *	A	9.0 *
			Overall	**A**	**1.7**	**A**	**0.6**	**A**	**3.7**	**A**	**2.4**
	SW 98 Avenue Road & Wayne Avenue	Two-Way Stop	EB	-	-	-	-	-	-	-	-
			WB	A	9.1 *	A	8.7 *	A	9.2 *	A	8.9 *
			NB	A	0.0	A	0.0	A	0.0	A	0.0
			SB	A	1.3	A	0.2	A	2.0	A	2.9
			Overall	**A**	**0.8**	**A**	**0.8**	**A**	**2.0**	**A**	**3.4**
Driveways	Wayne Avenue & East Driveway (DW1)	Ingress Only (Free Flow)	EB	-	-	-	-	A	0.0	A	0.5
			WB	-	-	-	-	A	0.0	A	0.0
			NB	-	-	-	-	-	-	-	-
			SB	-	-	-	-	-	-	-	-
			Overall	**-**	**-**	**-**	**-**	**A**	**0.0**	**A**	**0.2**
	Wayne Avenue & West Driveway (DW2)	Two-Way Stop	EB	-	-	-	-	A	1.7	A	6.5
			WB	-	-	-	-	A	0.0	A	0.0
			NB	-	-	-	-	-	-	-	-
			SB	-	-	-	-	A	8.8 *	A	8.9 *
			Overall	**-**	**-**	**-**	**-**	**A**	**5.7**	**A**	**5.5**

* TWSC Critical Approach

Roadway Analysis / Level of Service (LOS)

As requested by the City's traffic consultant, the roadway links most impacted by the subject project were identified and evaluated for Level of Service (LOS). This analysis was performed for the existing condition, future condition without project (No Build) and future condition with project in 2019 during the AM and PM peak hour.

Existing Condition (2016)

The roadway links most impacted by the subject project are Wayne Avenue (between SW 97 Ave. & SW 98 Av. Rd.) and SW 98 Avenue Road (between Hibiscus St. & SW 183 St.). The roadway peak hour volumes were obtained from the intersection movement counts and evaluated using the using the generalized Table 4 of the 2013 FDOT (Florida Department of Transportation) Quality / Level of Service Handbook. The analysis revealed that both roadway links are operating at LOS C during the AM and PM peak hour. Table 8 contains the roadway volume, available capacity and LOS for the AM and PM peak hour.

Table 8: Existing Roadway LOS - AM & PM Peak Hour

ROADWAY LINK ANALYSIS - AM PEAK			LOS / VOLUME STANDARD	EXISTING TWO-WAY VOLUME	AVAILABLE CAPACITY	LOS
ROADWAY		LOCATION				
1	SW 98 Avenue Road	b/w Hibiscus Street & SW 183 Street	LOS E / 1,015 VPH 2LU - CLASS II	111	904	C
2	Wayne Avenue	b/w SW 97 Avenue & SW 98 Avenue Road	LOS E / 1,015 VPH 2LU - CLASS II	22	993	C
ROADWAY LINK ANALYSIS - PM PEAK			LOS / VOLUME STANDARD	EXISTING TWO-WAY VOLUME	AVAILABLE CAPACITY	LOS
ROADWAY		LOCATION				
1	SW 98 Avenue Road	b/w Hibiscus Street & SW 183 Street	LOS E / 1,015 VPH 2LU - CLASS II	50	966	C
2	Wayne Avenue	b/w SW 97 Avenue & SW 98 Avenue Road	LOS E / 1,015 VPH 2LU - CLASS II	8	1,007	C

Future Conditions (2019)

The existing roadway volumes were augmented with a compounded background growth rate of 2.0 percent and committed trips. The resulting traffic volumes represent the proposed future condition without project in 2019. Similarly, the traffic volumes for the future condition with project in 2019 include background traffic growth, committed trips and the project net trips. The analysis revealed that both roadway links will maintain the existing LOS C during the AM and PM peak hour. Table 9 summarizes the roadway volume, available capacity and LOS for the AM and PM peak hour.

Table 9: Future Roadway LOS - AM & PM Peak Hour

ROADWAY LINK ANALYSIS - AM PEAK			LOS / VOLUME STANDARD	EXISTING TWO-WAY VOLUME	BACKGROUND GROWTH @ 2.0% FOR PROJECT BUILD-OUT OF 2019 (3 YEAR GROWTH)	COMMITTED TRIPS	FUTURE VOLUME W/O PROJECT (2019)	AVAILABLE CAPACITY	LOS	PROJECT TRIPS	FUTURE VOLUME W/ PROJECT (2019)	AVAILABLE CAPACITY	LOS
ROADWAY		LOCATION											
1	SW 98 Avenue Road	b/w Hibiscus Street & SW 183 Street	LOS E / 1,015 VPH 2LU - CLASS II	111	7	0	118	898	C	14	132	884	C
2	Wayne Avenue	b/w SW 97 Avenue & SW 98 Avenue Road	LOS E / 1,015 VPH 2LU - CLASS II	22	1	0	23	992	C	25	48	967	C
ROADWAY LINK ANALYSIS - PM PEAK			LOS / VOLUME STANDARD	EXISTING TWO-WAY VOLUME	BACKGROUND GROWTH @ 2.0% FOR PROJECT BUILD-OUT OF 2019 (3 YEAR GROWTH)	COMMITTED TRIPS	FUTURE VOLUME W/O PROJECT (2019)	AVAILABLE CAPACITY	LOS	PROJECT TRIPS	FUTURE VOLUME W/ PROJECT (2019)	AVAILABLE CAPACITY	LOS
ROADWAY		LOCATION											
1	SW 98 Avenue Road	b/w Hibiscus Street & SW 183 Street	LOS E / 1,015 VPH 2LU - CLASS II	50	3	0	53	963	C	30	83	933	C
2	Wayne Avenue	b/w SW 97 Avenue & SW 98 Avenue Road	LOS E / 1,015 VPH 2LU - CLASS II	8	0	0	8	1,007	C	56	64	951	C

Conclusion

Based on the analysis documented in this report, the most impacted intersections and roadways are currently operating within the Village's acceptable LOS threshold and will continue to do so with the new traffic generated by the subject project. Therefore, no off-site improvements are required or recommended at this time.

Lastly, it is fair to conclude that the subject project will not adversely impact the traffic operations within the study area.

Appendix A: Trip Generation

TABLE: A1

TRIP GENERATION ANALYSIS
AM PEAK HOUR

Project Name: Sandpiper Apartments

LAND USE (LU)	UNITS	ITE LU CODE	ITE TRIP GENERATION RATE / EQUATION		AM PEAK HOUR TRIPS				
					%	IN	%	OUT	TOTAL
Proposed									
Apartment	139 D.U.	220	Rate	0.51	20%	14	80%	57	71
			Eqn	*T=0.49(X)+3.73*	*20%*	*14*	*80%*	*58*	*72*
Specialty Retail *	10.000 Th.Sq.Ft.	820/826	Rate	0.96	62%	6	38%	4	10
External Trips *(Proposed Trips)*					**24%**	**20**	**76%**	**62**	**82**
Internal Trip Capture		*2.4% of ExternalTrips*			*0%*	*0*	*100%*	*2*	*2*
Net External Trips *(External Trips - Internal Trips)*					**25%**	**20**	**75%**	**60**	**80**

Notes: Sources: ITE Trip Generation, 9th Edition & ITE Trip Generation Handbook, 3rd Edition.

* Since ITE does not provide AM data for Specialty Retail (LU 826), ITE's rate for LU 820 (Shopping Center) was used to estimate the AM peak hour trips. Results utilized in the analysis.

TABLE: A2

TRIP GENERATION ANALYSIS
PM PEAK HOUR

Project Name: Sandpiper Apartments

LAND USE (LU)	UNITS	ITE LU CODE	ITE TRIP GENERATION RATE / EQUATION		PM PEAK HOUR TRIPS				
					%	IN	%	OUT	TOTAL
Proposed									
Apartment	139 D.U.	220	Rate	0.62	65%	56	35%	30	86
			Eqn	*T=.55(X)+17.65*	*65%*	*61*	*35%*	*33*	*94*
Specialty Retail	10.000 Th.Sq.Ft.	826	Rate	2.71	44%	12	56%	15	27
			Eqn	*T=2.40(X)+21.48*	*44%*	*20*	*56%*	*25*	*45*
External Trips *(Proposed Trips)*					**58%**	**81**	**42%**	**58**	**139**
Internal Trip Capture		*12.9% of ExternalTrips*			*56%*	*10*	*44%*	*8*	*18*
Net External Trips *(External Trips - Internal Trips)*					**59%**	**71**	**41%**	**50**	**121**

Notes: Sources: ITE Trip Generation, 9th Edition & ITE Trip Generation Handbook, 3rd Edition.
Results utilized in the analysis.

Apartment
(220)

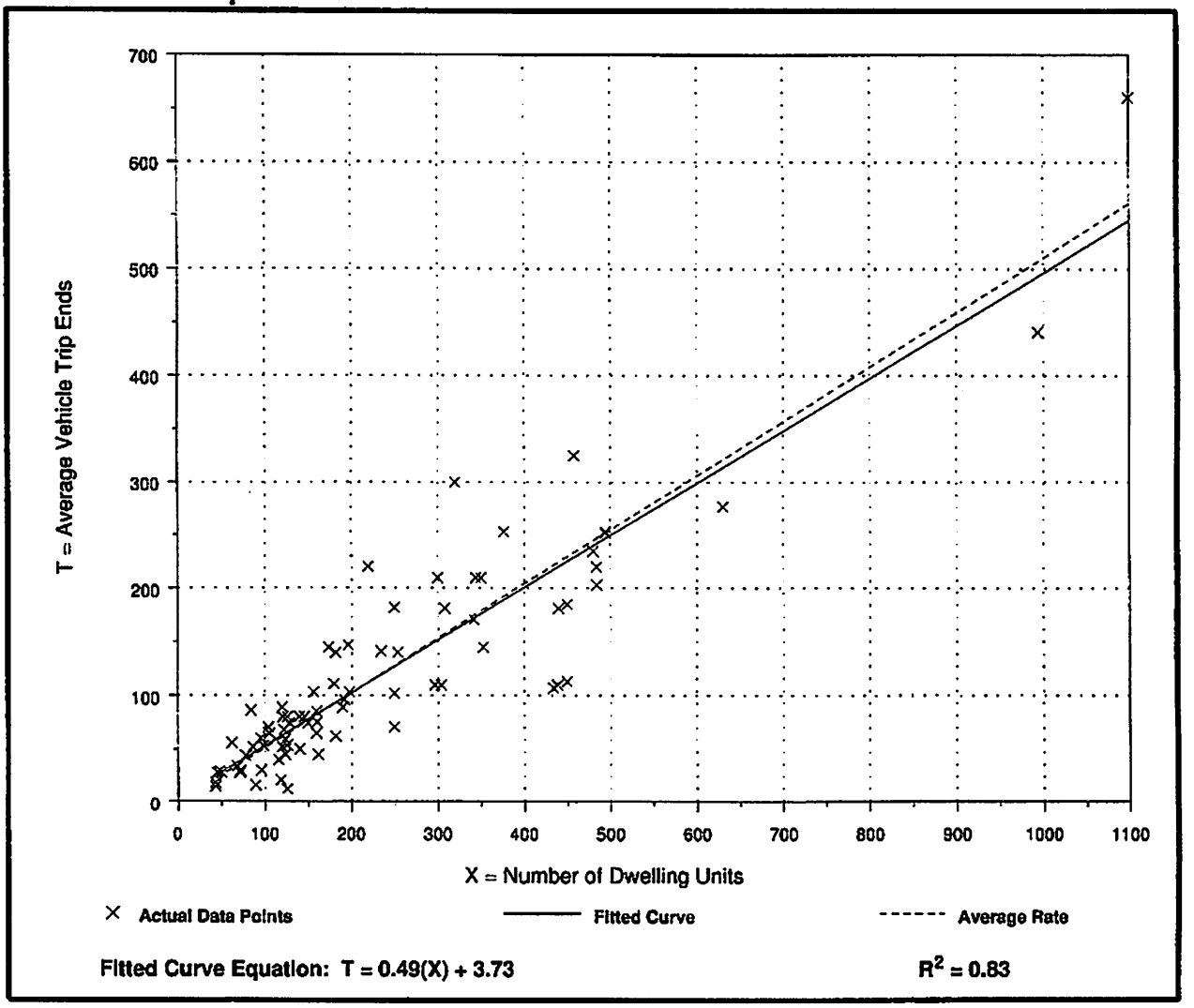
Average Vehicle Trip Ends vs: **Dwelling Units**
On a: **Weekday,**
Peak Hour of Adjacent Street Traffic,
One Hour Between 7 and 9 a.m.

Number of Studies: 78
Avg. Number of Dwelling Units: 235
Directional Distribution: 20% entering, 80% exiting

Trip Generation per Dwelling Unit

Average Rate	Range of Rates	Standard Deviation
0.51	0.10 - 1.02	0.73

Data Plot and Equation



Fitted Curve Equation: T = 0.49(X) + 3.73

R^2 = 0.83

Apartment
(220)

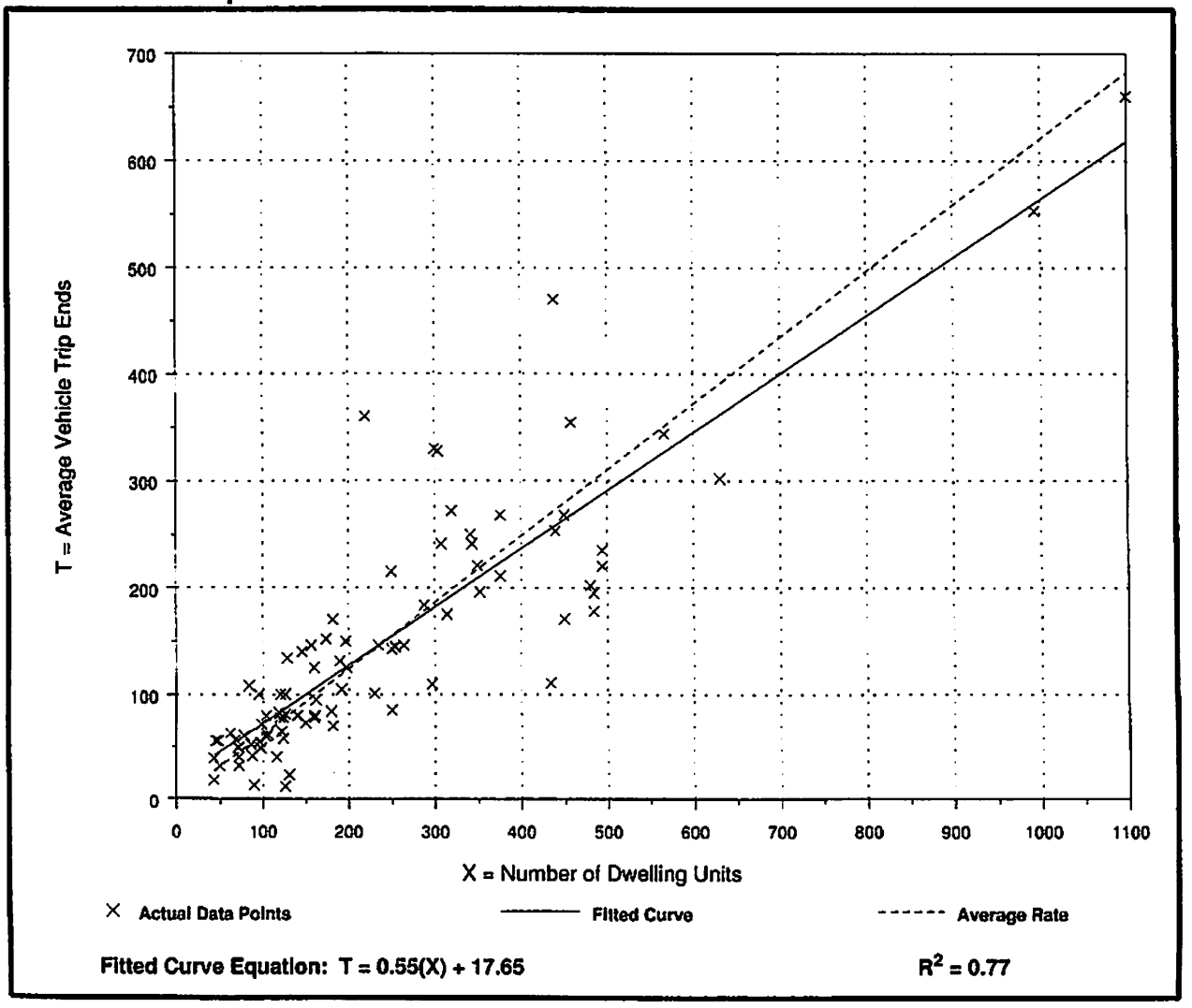
Average Vehicle Trip Ends vs: **Dwelling Units**
On a: **Weekday,**
Peak Hour of Adjacent Street Traffic,
One Hour Between 4 and 6 p.m.

Number of Studies: 90
Avg. Number of Dwelling Units: 233
Directional Distribution: 65% entering, 35% exiting

Trip Generation per Dwelling Unit

Average Rate	Range of Rates	Standard Deviation
0.62	0.10 - 1.64	0.82

Data Plot and Equation



Fitted Curve Equation: T = 0.55(X) + 17.65

R^2 = 0.77

Shopping Center
(820)

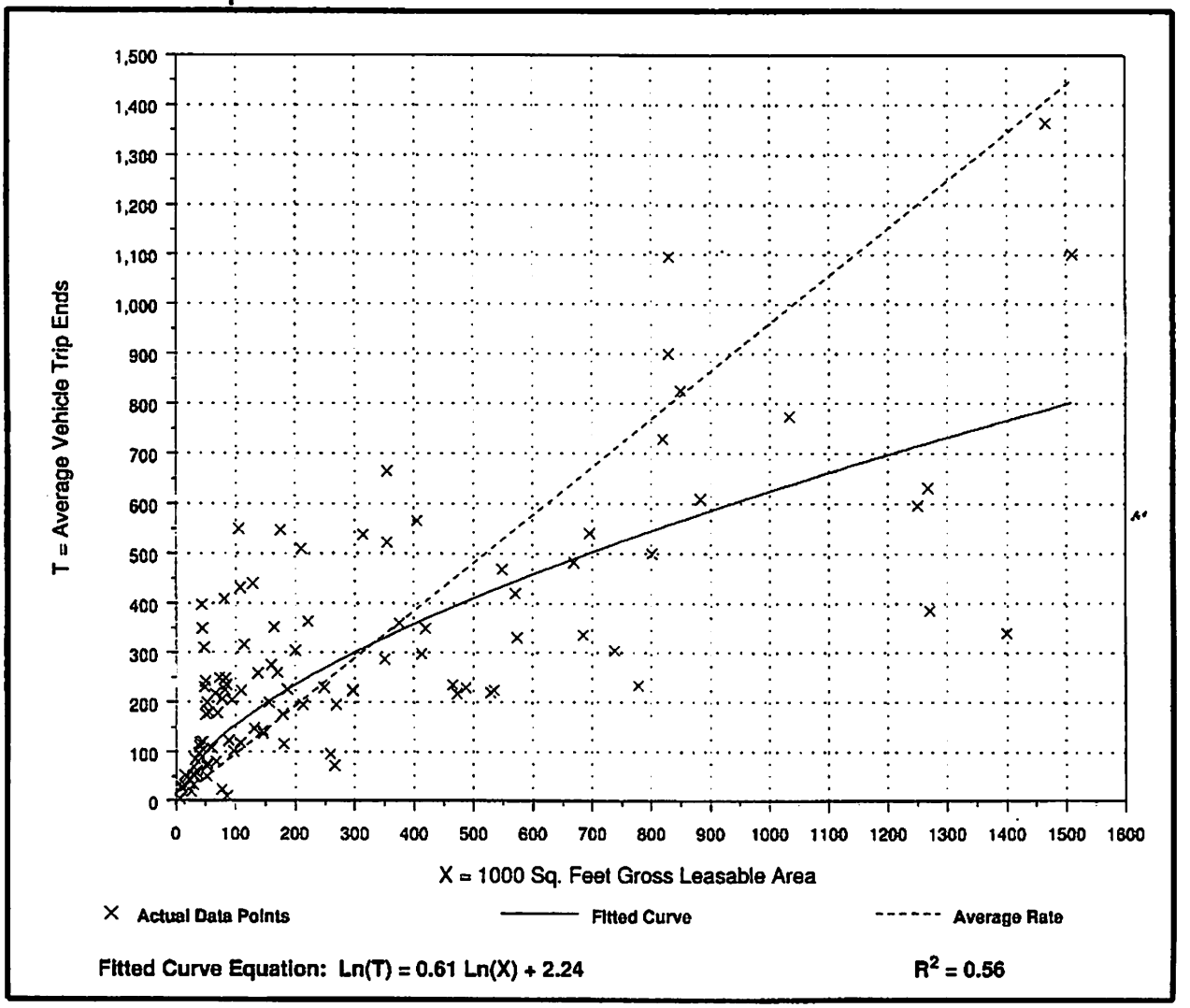
Average Vehicle Trip Ends vs: **1000 Sq. Feet Gross Leasable Area**
On a: **Weekday,**
Peak Hour of Adjacent Street Traffic,
One Hour Between 7 and 9 a.m.

Number of Studies: 104
Average 1000 Sq. Feet GLA: 310
Directional Distribution: 62% entering, 38% exiting

Trip Generation per 1000 Sq. Feet Gross Leasable Area

Average Rate	Range of Rates	Standard Deviation
0.96	0.10 - 9.05	1.31

Data Plot and Equation



Fitted Curve Equation: Ln(T) = 0.61 Ln(X) + 2.24 $R^2 = 0.56$

Specialty Retail Center
(826)

Average Vehicle Trip Ends vs: **1000 Sq. Feet Gross Leasable Area**
On a: **Weekday,**
Peak Hour of Adjacent Street Traffic,
One Hour Between 4 and 6 p.m.

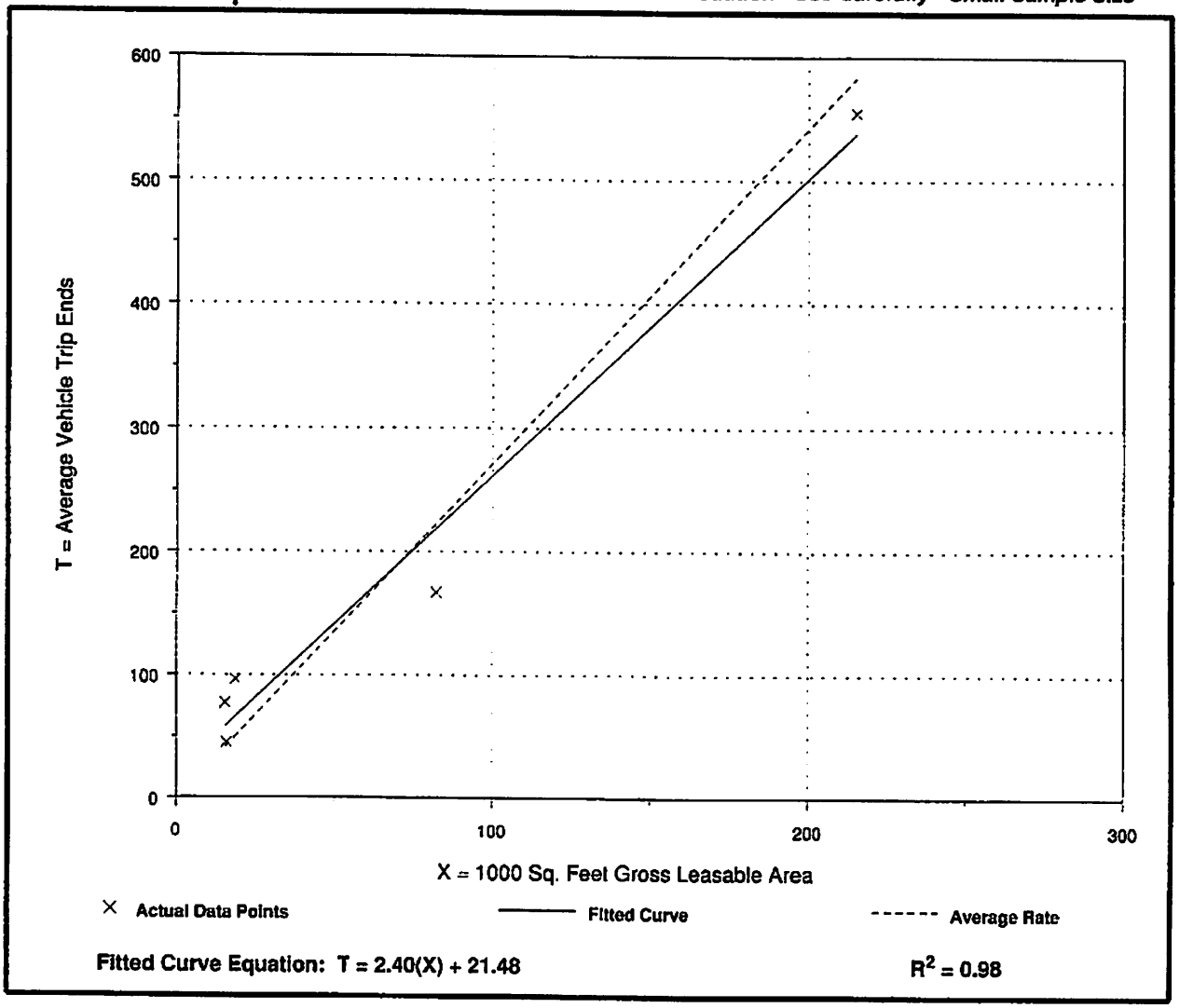
Number of Studies: 5
Average 1000 Sq. Feet GLA: 69
Directional Distribution: 44% entering, 56% exiting

Trip Generation per 1000 Sq. Feet Gross Leasable Area

Average Rate	Range of Rates	Standard Deviation
2.71	2.03 - 5.16	1.83

Data Plot and Equation

Caution - Use Carefully - Small Sample Size



Fitted Curve Equation: T = 2.40(X) + 21.48

R^2 = 0.98

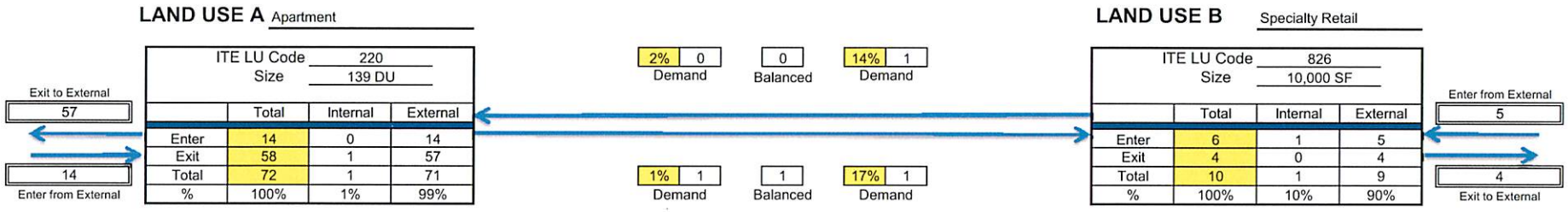
Sandpiper Apartments

INTERNAL TRIP CAPTURE (AM PEAK) - MIXED-USE DEVELOPMENT

Analyst CV

Date February 9, 2017

Time Period AM Peak Hour



Net External Trips for Multi-Use Development					
	LAND USE A	LAND USE B		TOTAL	
Enter	14	5		19	INTERNAL CAPTURE
Exit	57	4		61	
Total	71	9		80	2.4%
Single-Use Trip Gen. Est.	72	10		82	

Sources: Trip Generation Handbook, 3rd Edition.

Input variables.

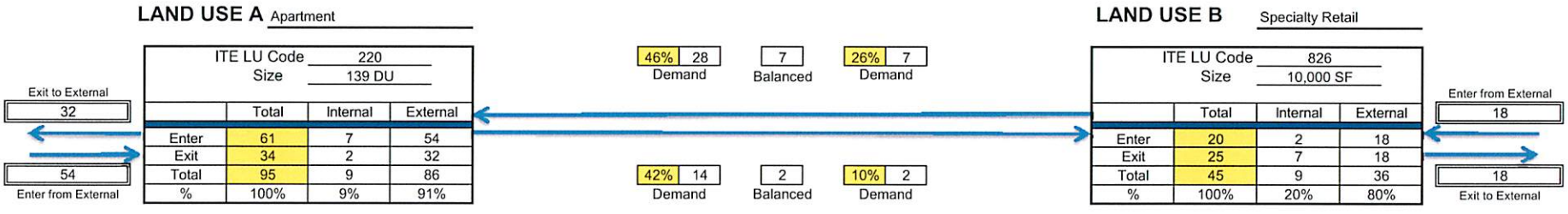
Sandpiper Apartments

INTERNAL TRIP CAPTURE (PM PEAK) - MIXED-USE DEVELOPMENT

Analyst CV

Date February 9, 2017

Time Period PM Peak Hour



Net External Trips for Multi-Use Development				
	LAND USE A	LAND USE B		TOTAL
Enter	54	18		72
Exit	32	18		50
Total	86	36		122
Single-Use Trip Gen. Est.	95	45		140

INTERNAL CAPTURE: 12.9%

Sources: Trip Generation Handbook, 3rd Edition.

Input variables.

Table 6.1 Unconstrained Internal Person Trip Capture Rates for Trip Origins within a Mixed-Use Development

		WEEKDAY	
		AM Peak Hour	PM Peak Hour
From OFFICE	To Retail	28%	20%
	To Restaurant	63%	4%
	To Cinema/Entertainment	0%	0%
	To Residential	1%	2%
	To Hotel	0%	0%
From RETAIL	To Office	29%	2%
	To Restaurant	13%	29%
	To Cinema/Entertainment	0%	4%
	To Residential	14%	26%
	To Hotel	0%	5%
From RESTAURANT	To Office	31%	3%
	To Retail	14%	41%
	To Cinema/Entertainment	0%	8%
	To Residential	4%	18%
	To Hotel	3%	7%
From CINEMA/ENTERTAINMENT	To Office	0%	2%
	To Retail	0%	21%
	To Restaurant	0%	31%
	To Residential	0%	8%
	To Hotel	0%	2%
From RESIDENTIAL	To Office	2%	4%
	To Retail	1%	42%
	To Restaurant	20%	21%
	To Cinema/Entertainment	0%	0%
	To Hotel	0%	3%
From HOTEL	To Office	75%	0%
	To Retail	14%	16%
	To Restaurant	9%	68%
	To Cinema/Entertainment	0%	0%
	To Residential	0%	2%

Source: Bochner, B., K. Hooper, B. Sperry, and R. Dunphy. NCHRP Report 684: *Enhancing Internal Trip Capture Estimation for Mixed-Use Developments.* Washington, DC: Transportation Research Board, Tables 99 and 100, 2011.

Table 6.2 Unconstrained Internal Person Trip Capture Rates for Trip Destinations within a Mixed-Use Development

		Weekday	
		AM Peak Hour	PM Peak Hour
To OFFICE	From Retail	4%	31%
	From Restaurant	14%	30%
	From Cinema/Entertainment	0%	6%
	From Residential	3%	57%
	From Hotel	3%	0%
To RETAIL	From Office	32%	8%
	From Restaurant	8%	50%
	From Cinema/Entertainment	0%	4%
	From Residential	17%	10%
	From Hotel	4%	2%
To RESTAURANT	From Office	23%	2%
	From Retail	50%	29%
	From Cinema/Entertainment	0%	3%
	From Residential	20%	14%
	From Hotel	6%	5%
To CINEMA/ENTERTAINMENT	From Office	0%	1%
	From Retail	0%	26%
	From Restaurant	0%	32%
	From Residential	0%	0%
	From Hotel	0%	0%
To RESIDENTIAL	From Office	0%	4%
	From Retail	2%	46%
	From Restaurant	5%	16%
	From Cinema/Entertainment	0%	4%
	From Hotel	0%	0%
To HOTEL	From Office	0%	0%
	From Retail	0%	17%
	From Restaurant	4%	71%
	From Cinema/Entertainment	0%	1%
	From Residential	0%	12%

Source: Bochner, B., K. Hooper, B. Sperry, and R. Dunphy. NCHRP Report 684: *Enhancing Internal Trip Capture Estimation for Mixed-Use Developments*. Washington, DC: Transportation Research Board, Tables 101 and 102, 2011.

Appendix B: Trip Distribution / Assignment

Sandpiper Apartments

Project Net Trips - AM Peak Hour

Sandpiper Apartments

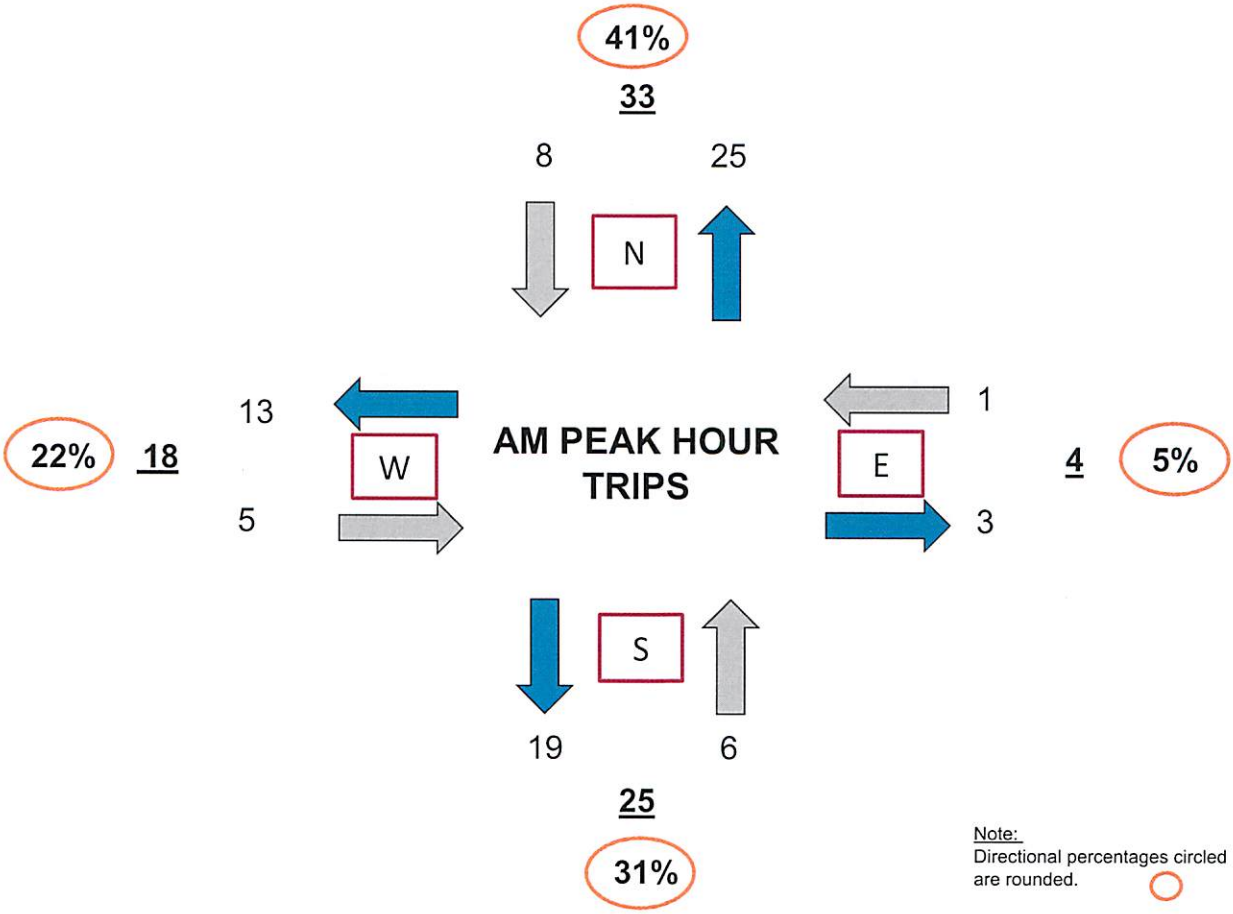
Project Net Trips - PM Peak Hour

TABLE: A3

Cardinal Distribution
AM Peak Hour
Traffic Analysis Zone (TAZ) 1144

Project Name: Sandpiper Apartments

DIRECTION	DISTRIBUTION (%) DESIGN YEAR	DIRECTION	DISTRIBUTION	AM PEAK HOUR		
				IN	OUT	TOTAL
NNE	27.69	NORTH	41.44%	8	25	33
ENE	1.16					
ESE	4.12	EAST	5.28%	1	3	4
SSE	8.62					
SSW	22.63	SOUTH	31.25%	6	19	25
WSW	12.82					
WNW	9.28	WEST	22.10%	5	13	18
NNW	13.75					
TOTAL	100.00		100.00%	20	60	80



Note:
Directional percentages circled are rounded.

TABLE: A3-1

Cardinal Distribution
AM Peak Hour
Traffic Analysis Zone (TAZ) 1144

Project Name: Sandpiper Apartments

DIRECTION	DISTRIBUTION PERCENTAGES (%)			AM PEAK HOUR		
	MIAMI-DADE LRTP MODEL YEAR		DESIGN YEAR	IN	OUT	TOTAL
	2010	2040	2019			
NNE	27.90	27.20	27.69	5	17	22
ENE	0.80	2.00	1.16	0	1	1
ESE	3.70	5.10	4.12	1	2	3
SSE	8.80	8.20	8.62	2	5	7
SSW	22.30	23.40	22.63	4	14	18
WSW	14.20	9.60	12.82	3	8	11
WNW	8.80	10.40	9.28	2	5	7
NNW	13.60	14.10	13.75	3	8	11
TOTAL	100.00	100.00	100.00	20	60	80

Note:

Based on Miami-Dade Transportation Plan (to the Year 2040) Directional Trip Distribution Report, October 2014. Since the current data is only available for the model years 2010 and 2040, the eight (8) cardinal directions were interpolated to the design year of 2019.

TABLE: A3-2

AM PEAK HOUR	IN	OUT	TOTAL
GROSS TRIPS:	20	60	80
PERCENT:	25.00%	75.00%	(Calculated)

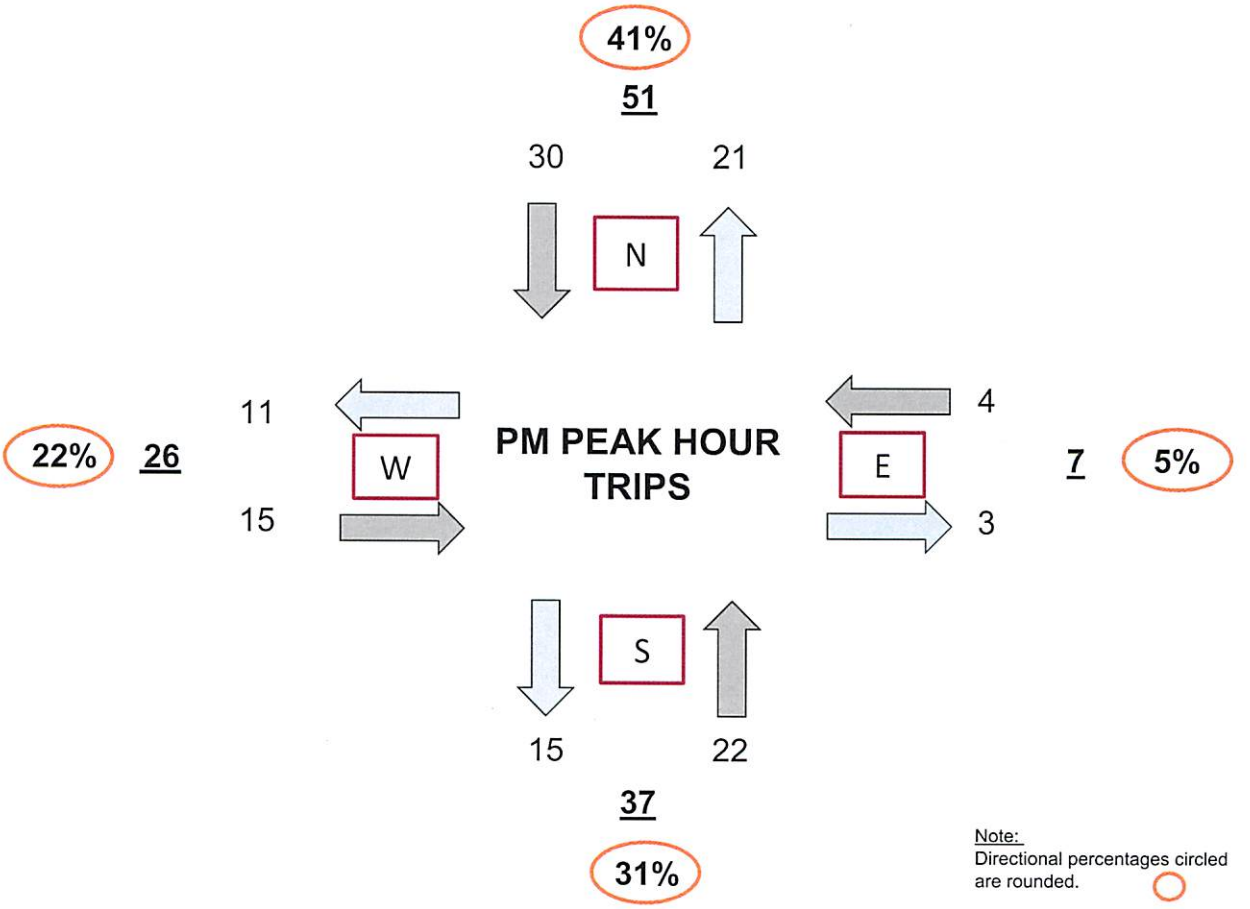
DIRECTION	DISTRIBUTION %	INGRESS		EGRESS		TOTAL
		CALCULATED	USED	CALCULATED	USED	
NNE	27.69	5.538	5	16.614	17	22
ENE	1.16	0.232	0	0.696	1	1
ESE	4.12	0.824	1	2.472	2	3
SSE	8.62	1.724	2	5.172	5	7
SSW	22.63	4.526	4	13.578	14	18
WSW	12.82	2.564	3	7.692	8	11
WNW	9.28	1.856	2	5.568	5	7
NNW	13.75	2.750	3	8.250	8	11
TOTAL	100.00	20.014	20	60.042	60	80

TABLE: A4

Cardinal Distribution
PM Peak Hour
Traffic Analysis Zone (TAZ) 1144

Project Name: Sandpiper Apartments

DIRECTION	DISTRIBUTION (%) DESIGN YEAR	DIRECTION	DISTRIBUTION	PM PEAK HOUR		
				IN	OUT	TOTAL
NNE	27.69	NORTH	41.44%	30	21	51
ENE	1.16					
ESE	4.12	EAST	5.28%	4	3	7
SSE	8.62					
SSW	22.63	SOUTH	31.25%	22	15	37
WSW	12.82					
WNW	9.28	WEST	22.10%	15	11	26
NNW	13.75					
TOTAL	100.00		100.00%	71	50	121



Note:
Directional percentages circled are rounded.

TABLE: A4-1

Cardinal Distribution
PM Peak Hour
Traffic Analysis Zone (TAZ) 1144

Project Name: Sandpiper Apartments

DIRECTION	DISTRIBUTION PERCENTAGES (%)			PM PEAK HOUR		
	MIAMI-DADE LRTP MODEL YEAR		DESIGN YEAR	IN	OUT	TOTAL
	2010	2040	2019			
NNE	27.90	27.20	27.69	20	14	34
ENE	0.80	2.00	1.16	1	1	2
ESE	3.70	5.10	4.12	3	2	5
SSE	8.80	8.20	8.62	6	4	10
SSW	22.30	23.40	22.63	16	11	27
WSW	14.20	9.60	12.82	9	6	15
WNW	8.80	10.40	9.28	6	5	11
NNW	13.60	14.10	13.75	10	7	17
TOTAL	100.00	100.00	100.00	71	50	121

Note:

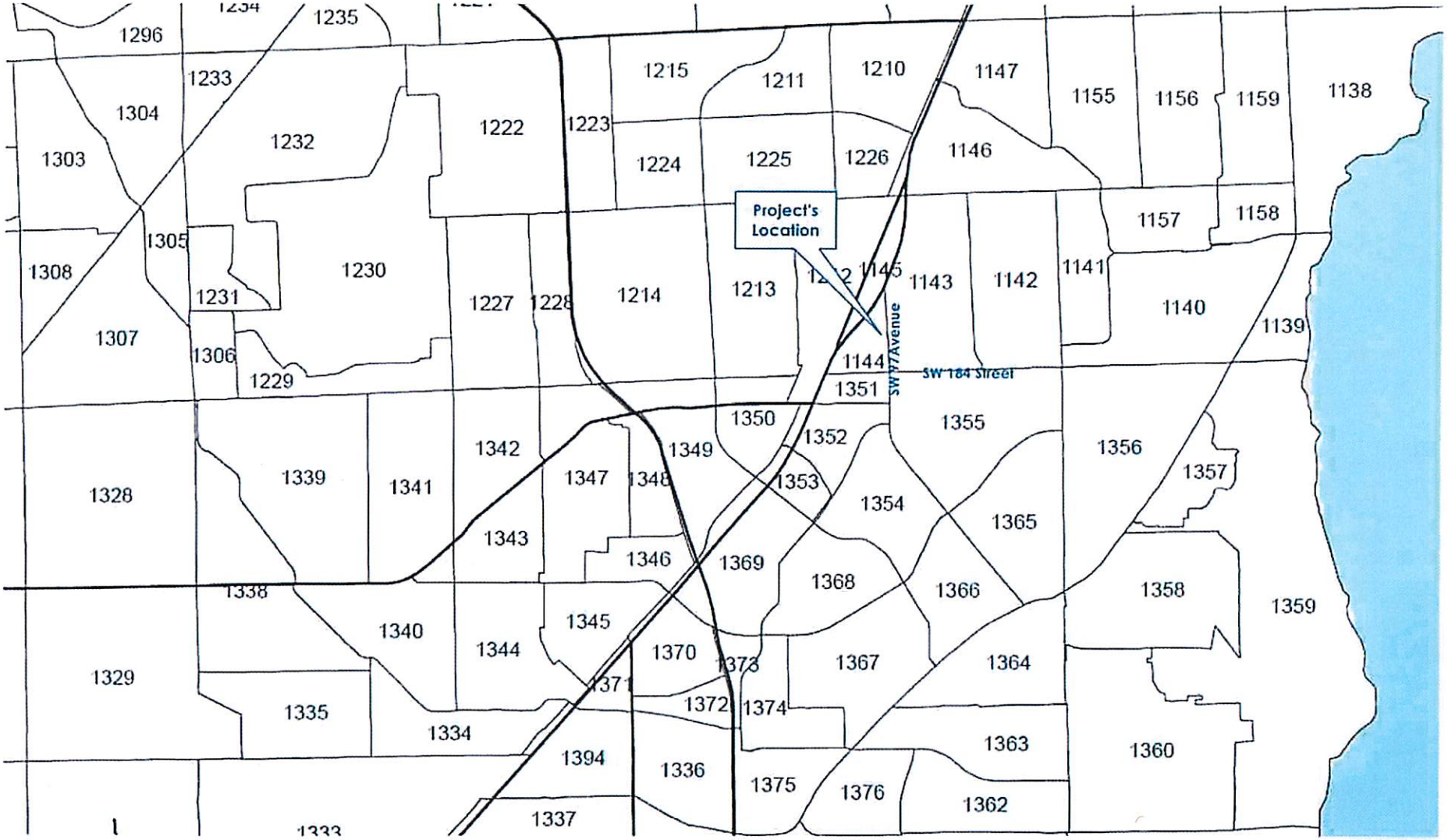
Based on Miami-Dade Transportation Plan (to the Year 2040) Directional Trip Distribution Report, October 2014. Since the current data is only available for the model years 2010 and 2040, the eight (8) cardinal directions were interpolated to the design year of 2019.

TABLE: A4-2

PM PEAK HOUR	IN	OUT	TOTAL
GROSS TRIPS:	71	50	121
PERCENT:	58.68%	41.32%	(Calculated)

DIRECTION	DISTRIBUTION %	INGRESS		EGRESS		TOTAL
		CALCULATED	USED	CALCULATED	USED	
NNE	27.69	19.660	20	13.845	14	34
ENE	1.16	0.824	1	0.580	1	2
ESE	4.12	2.925	3	2.060	2	5
SSE	8.62	6.120	6	4.310	4	10
SSW	22.63	16.067	16	11.315	11	27
WSW	12.82	9.102	9	6.410	6	15
WNW	9.28	6.589	6	4.640	5	11
NNW	13.75	9.763	10	6.875	7	17
TOTAL	100.00	71.050	71	50.035	50	121

TRAFFIC ANALYSIS ZONE (TAZ)



MOBILITY OPTIONS
2040 Miami-Dade Transportation Plan
EYES ON THE FUTURE

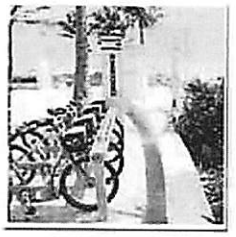
MIAMI-DADE 2040

Long Range Transportation Plan

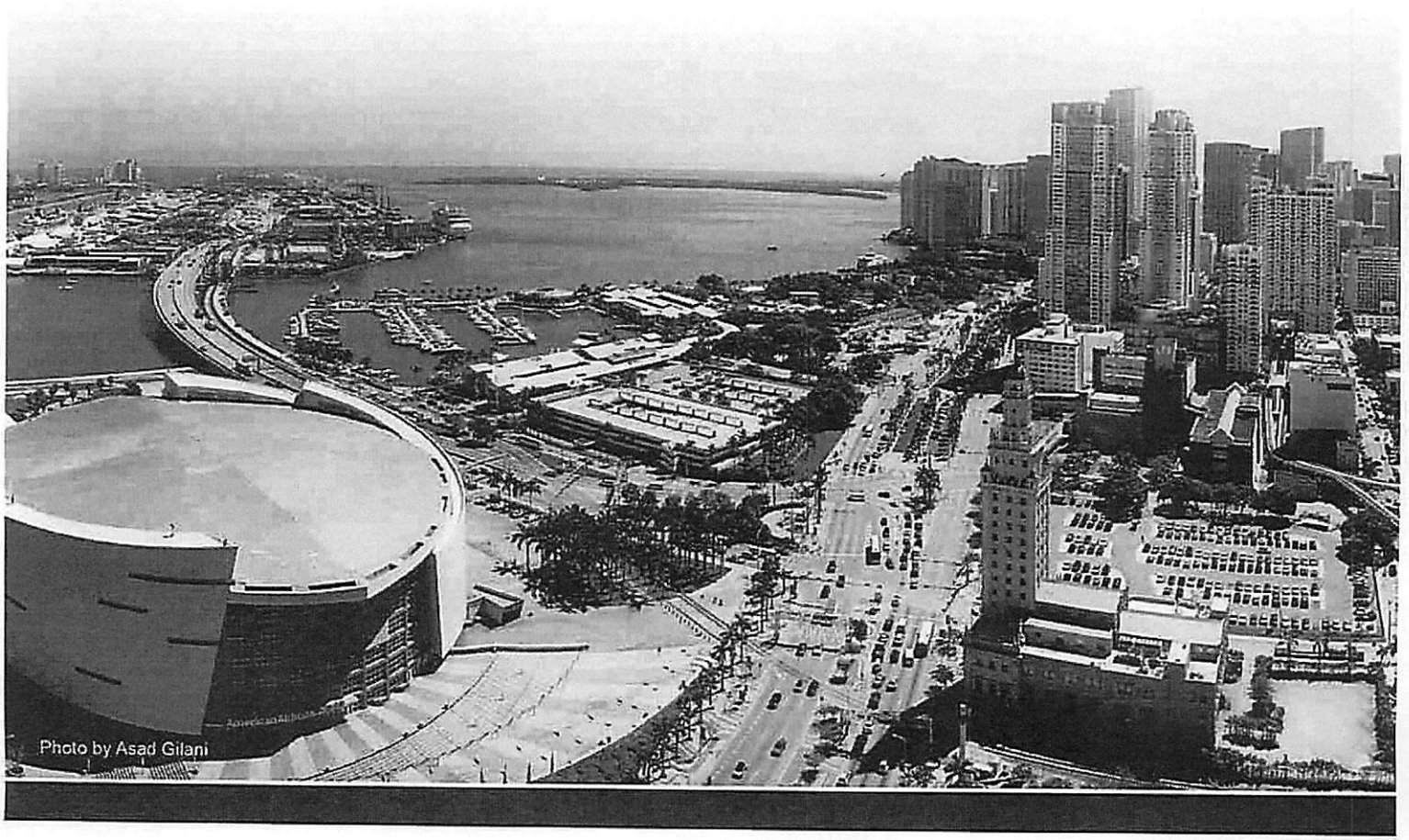
Directional Trip Distribution Report

October 23, 2014






MIAMI-DADE METROPOLITAN
PLANNING ORGANIZATION



Miami-Dade 2010 Directional Distribution Summary

Origin TAZ			Cardinal Directions								Total
County TAZ	Regional TAZ		NNE	ENE	ESE	SSE	SSW	WSW	WNW	NNW	
1128	4028	PERCENT	26.6	9.1	0.8	0.8	8.4	23.2	13.1	18.0	
1129	4029	TRIPS	642	178	178	13	212	561	313	553	2,650
1129	4029	PERCENT	24.2	6.7	6.7	0.5	8.0	21.2	11.8	20.9	
1130	4030	TRIPS	288	33	0	0	35	222	130	258	966
1130	4030	PERCENT	29.8	3.4	0.0	0.0	3.6	23.0	13.5	26.7	
1131	4031	TRIPS	1,042	43	0	0	204	683	751	901	3,624
1131	4031	PERCENT	28.8	1.2	0.0	0.0	5.6	18.9	20.7	24.9	
1132	4032	TRIPS	216	57	3	28	119	172	207	133	935
1132	4032	PERCENT	23.1	6.1	0.3	3.0	12.7	18.4	22.1	14.2	
1133	4033	TRIPS	293	10	0	0	56	165	264	266	1,054
1133	4033	PERCENT	27.8	1.0	0.0	0.0	5.3	15.7	25.1	25.2	
1134	4034	TRIPS	361	35	0	0	59	299	424	450	1,628
1134	4034	PERCENT	22.2	2.2	0.0	0.0	3.6	18.4	26.0	27.6	
1135	4035	TRIPS	2	0	0	0	0	3	1	3	9
1135	4035	PERCENT	22.2	0.0	0.0	0.0	0.0	33.3	11.1	33.3	
1136	4036	TRIPS	434	20	0	0	72	273	321	664	1,784
1136	4036	PERCENT	24.3	1.1	0.0	0.0	4.0	15.3	18.0	37.2	
1137	4037	TRIPS	151	0	0	0	42	176	118	220	707
1137	4037	PERCENT	21.4	0.0	0.0	0.0	5.9	24.9	16.7	31.1	
1138	4038	TRIPS	295	10	0	0	63	151	315	312	1,146
1138	4038	PERCENT	25.7	0.9	0.0	0.0	5.5	13.2	27.5	27.2	
1139	4039	TRIPS	115	0	0	28	109	231	260	277	1,020
1139	4039	PERCENT	11.3	0.0	0.0	2.8	10.7	22.7	25.5	27.2	
1140	4040	TRIPS	999	43	3	104	152	408	332	502	2,543
1140	4040	PERCENT	39.3	1.7	0.1	4.1	6.0	16.0	13.1	19.7	
1141	4041	TRIPS	470	25	10	36	95	131	208	367	1,342
1141	4041	PERCENT	35.0	1.9	0.8	2.7	7.1	9.8	15.5	27.4	
1142	4042	TRIPS	908	146	0	91	262	363	403	596	2,769
1142	4042	PERCENT	32.8	5.3	0.0	3.3	9.5	13.1	14.6	21.5	
1143	4043	TRIPS	1,255	115	142	254	631	401	427	768	3,993
1143	4043	PERCENT	31.4	2.9	3.6	6.4	15.8	10.0	10.7	19.2	
1144	4044	TRIPS	505	14	67	159	404	257	160	247	1,813
1144	4044	PERCENT	27.9	0.8	3.7	8.8	22.3	14.2	8.8	13.6	
1145	4045	TRIPS	1,446	175	159	550	1,577	637	558	727	5,829
1145	4045	PERCENT	24.8	3.0	2.7	9.4	27.1	10.9	9.6	12.5	
1146	4046	TRIPS	1,318	134	87	523	1,115	852	764	890	5,683
1146	4046	PERCENT	23.2	2.4	1.5	9.2	19.6	15.0	13.4	15.7	
1147	4047	TRIPS	1,202	213	130	89	721	416	506	737	4,014
1147	4047	PERCENT	30.0	5.3	3.2	2.2	18.0	10.4	12.6	18.4	
1148	4048	TRIPS	1,321	298	142	285	1,914	1,048	803	1,516	7,327
1148	4048	PERCENT	18.0	4.1	1.9	3.9	26.1	14.3	11.0	20.7	

Miami-Dade 2040 Directional Distribution Summary

Origin TAZ			Cardinal Directions								Total
County TAZ	Regional TAZ		NNE	ENE	ESE	SSE	SSW	WSW	WNW	NNW	
1128	4028	PERCENT	27.9	10.0	1.1	0.5	6.4	21.0	13.0	20.1	
1129	4029	TRIPS	760	141	73	12	145	588	359	578	2,656
1129	4029	PERCENT	28.6	5.3	2.8	0.5	5.5	22.1	13.5	21.8	
1130	4030	TRIPS	307	40	0	15	74	181	151	208	976
1130	4030	PERCENT	31.5	4.1	0.0	1.5	7.6	18.6	15.5	21.3	
1131	4031	TRIPS	1,125	56	4	0	193	794	716	895	3,783
1131	4031	PERCENT	29.7	1.5	0.1	0.0	5.1	21.0	18.9	23.7	
1132	4032	TRIPS	298	110	1	23	136	185	272	246	1,271
1132	4032	PERCENT	23.5	8.7	0.1	1.8	10.7	14.6	21.4	19.4	
1133	4033	TRIPS	289	4	0	0	43	172	237	289	1,034
1133	4033	PERCENT	28.0	0.4	0.0	0.0	4.2	16.6	22.9	28.0	
1134	4034	TRIPS	336	12	0	0	92	242	279	439	1,400
1134	4034	PERCENT	24.0	0.9	0.0	0.0	6.6	17.3	19.9	31.4	
1135	4035	TRIPS	2	0	0	0	0	12	1	7	22
1135	4035	PERCENT	9.1	0.0	0.0	0.0	0.0	54.6	4.6	31.8	
1136	4036	TRIPS	547	12	0	0	144	289	465	681	2,138
1136	4036	PERCENT	25.6	0.6	0.0	0.0	6.7	13.5	21.8	31.9	
1137	4037	TRIPS	96	5	0	0	41	86	155	156	539
1137	4037	PERCENT	17.8	0.9	0.0	0.0	7.6	16.0	28.8	28.9	
1138	4038	TRIPS	291	0	0	0	104	243	357	390	1,385
1138	4038	PERCENT	21.0	0.0	0.0	0.0	7.5	17.6	25.8	28.2	
1139	4039	TRIPS	193	0	0	23	115	304	218	313	1,166
1139	4039	PERCENT	16.6	0.0	0.0	2.0	9.9	26.1	18.7	26.8	
1140	4040	TRIPS	1,002	11	8	145	339	485	449	639	3,078
1140	4040	PERCENT	32.6	0.4	0.3	4.7	11.0	15.8	14.6	20.8	
1141	4041	TRIPS	466	40	4	27	168	255	208	328	1,496
1141	4041	PERCENT	31.2	2.7	0.3	1.8	11.2	17.1	13.9	21.9	
1142	4042	TRIPS	756	107	12	114	569	458	438	694	3,148
1142	4042	PERCENT	24.0	3.4	0.4	3.6	18.1	14.6	13.9	22.1	
1143	4043	TRIPS	1,803	134	100	236	1,263	845	993	888	6,262
1143	4043	PERCENT	28.8	2.1	1.6	3.8	20.2	13.5	15.9	14.2	
1144	4044	TRIPS	821	61	155	247	706	290	313	424	3,017
1144	4044	PERCENT	27.2	2.0	5.1	8.2	23.4	9.6	10.4	14.1	
1145	4045	TRIPS	2,289	326	226	557	2,297	1,095	1,214	1,281	9,285
1145	4045	PERCENT	24.7	3.5	2.4	6.0	24.7	11.8	13.1	13.8	
1146	4046	TRIPS	1,801	216	112	502	1,485	932	927	893	6,868
1146	4046	PERCENT	26.2	3.2	1.6	7.3	21.6	13.6	13.5	13.0	
1147	4047	TRIPS	1,315	112	118	94	1,099	494	556	1,038	4,826
1147	4047	PERCENT	27.3	2.3	2.5	2.0	22.8	10.2	11.5	21.5	
1148	4048	TRIPS	1,883	360	138	326	2,336	1,142	944	1,795	8,924
1148	4048	PERCENT	21.1	4.0	1.6	3.7	26.2	12.8	10.6	20.1	

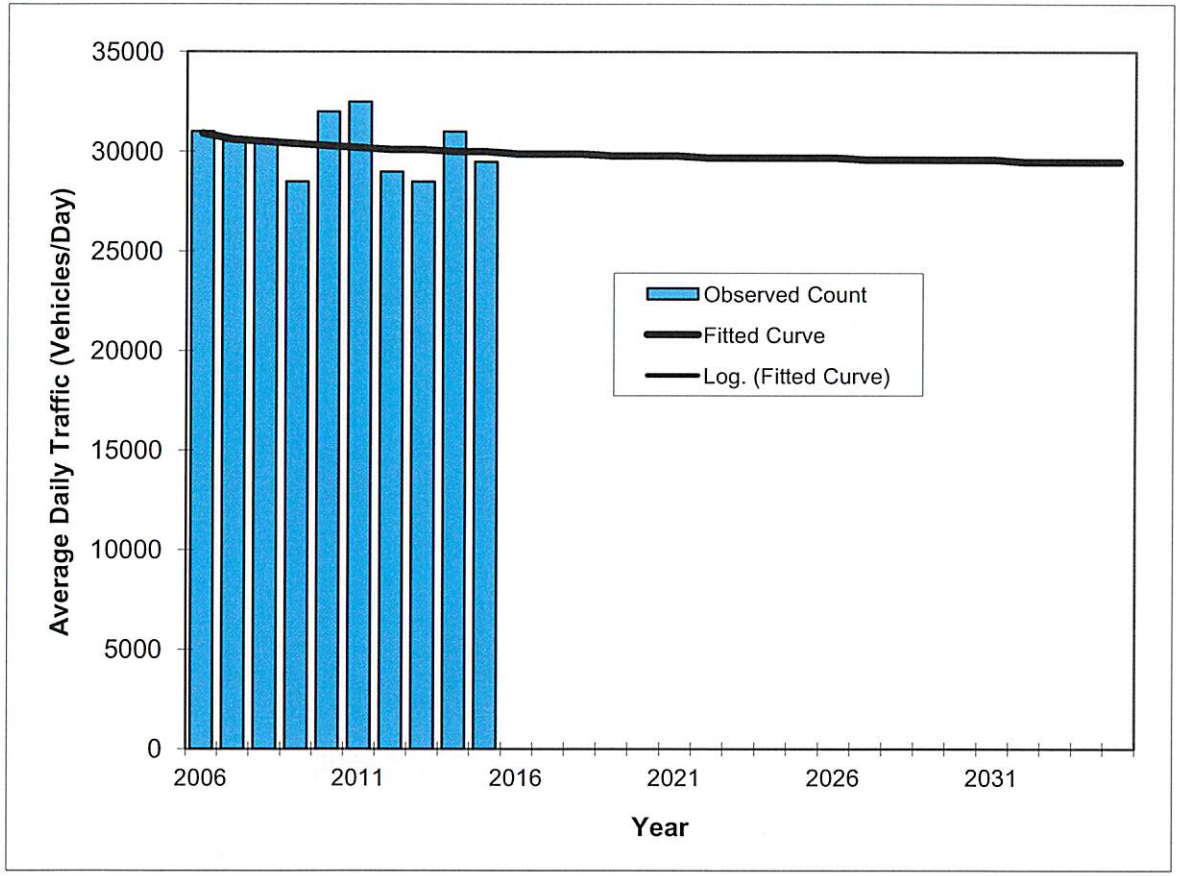
Appendix C: Growth Rate & Adjustment Factors

Traffic Trends - V2.0

SR 5/US 1 SOUTH DIXIE ONE WAY SB -- 300' S OF SW 174 ST

PIN#	973215-1
Location	1

County:	Miami (87)
Station #:	2562
Highway:	SR 5/US 1 SOUTH DIXIE ONE WAY SB



Year	Traffic (ADT/AADT) Count*	Trend**
2006	31000	30900
2007	30500	30600
2008	30500	30500
2009	28500	30400
2010	32000	30300
2011	32500	30200
2012	29000	30100
2013	28500	30100
2014	31000	30000
2015	29500	30000
2016 Opening Year Trend		
2016	N/A	29900
2018 Mid-Year Trend		
2018	N/A	29900
2019 Design Year Trend		
2019	N/A	29800
TRANPLAN Forecasts/Trends		

Trend R-squared:	4.87%
Compounded Annual Historic Growth Rate:	-0.33%
Compounded Growth Rate (2015 to Design Year):	-0.17%
Printed:	9-Feb-17

Decaying Exponential Growth Option

*Axle-Adjusted

FLORIDA DEPARTMENT OF TRANSPORTATION
TRANSPORTATION STATISTICS OFFICE
2015 HISTORICAL AADT REPORT

COUNTY: 87 - MIAMI-DADE

SITE: 2562 - SR5/US1 S DIXIE HWY ONE WAY SB 300' S OF SW 174 ST

YEAR	AADT	DIRECTION 1	DIRECTION 2	*K FACTOR	D FACTOR	T FACTOR
2015	29500 C	S 29500	0	9.00	99.90	5.20
2014	31000 C	S 31000		9.00	99.90	5.80
2013	28500 C	S 28500	0	9.00	99.90	5.40
2012	29000 C	S 29000	0	9.00	99.90	5.70
2011	32500 C	S 32500	0	9.00	99.90	6.10
2010	32000 C	S 32000	0	7.87	99.99	6.90
2009	28500 C	S 28500	0	7.98	99.99	6.30
2008	30500 C	S 30500	0	8.07	99.99	7.10
2007	30500 C	S 30500	0	7.90	99.99	8.00
2006	31000 C	S 31000	0	7.39	99.99	6.10
2005	30500 C	S 30500		7.70	99.90	5.50
2004	32500 C	S 32500	0	8.20	99.90	6.20
2003	29500 C	S 29500	0	8.10	99.90	4.80
2002	63500 C	S 32500	31000	9.20	99.90	3.40

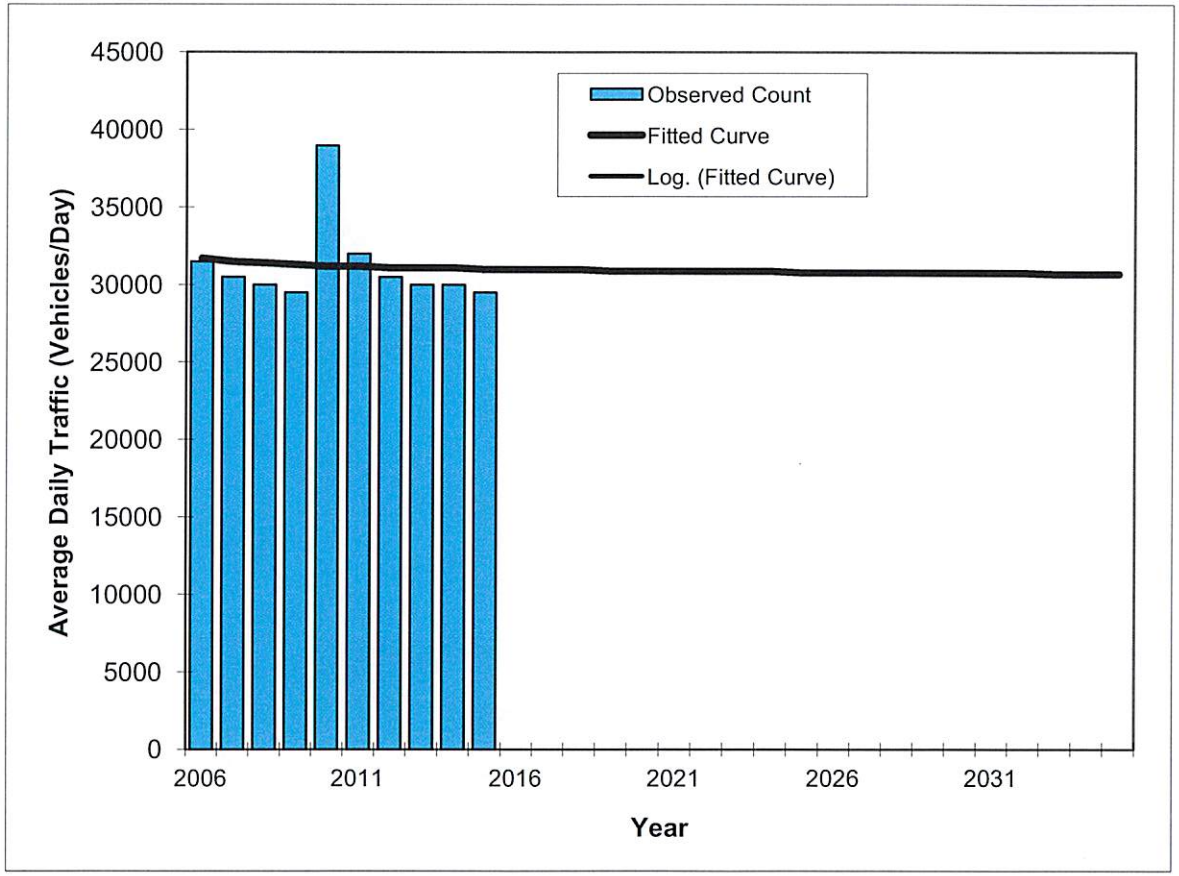
AADT FLAGS: C = COMPUTED; E = MANUAL ESTIMATE; F = FIRST YEAR ESTIMATE
S = SECOND YEAR ESTIMATE; T = THIRD YEAR ESTIMATE; F = FOURTH YEAR ESTIMATE
V = FIFTH YEAR ESTIMATE; 6 = SIXTH YEAR ESTIMATE; X = UNKNOWN
*K FACTOR: STARTING WITH YEAR 2011 IS STANDARDK, PRIOR YEARS ARE K30 VALUES

Traffic Trends - V2.0

SR 5/US 1 SOUTH DIXIE ONE WAY NB -- 300' S OF SW 174 ST

PIN#	973215-1
Location	1

County:	Miami (87)
Station #:	2563
Highway:	SR 5/US 1 SOUTH DIXIE ONE WAY NB



Year	Traffic (ADT/AADT) Count*	Trend**
2006	31500	31700
2007	30500	31500
2008	30000	31400
2009	29500	31300
2010	39000	31200
2011	32000	31200
2012	30500	31100
2013	30000	31100
2014	30000	31100
2015	29500	31000
2016 Opening Year Trend		
2016	N/A	31000
2018 Mid-Year Trend		
2018	N/A	31000
2019 Design Year Trend		
2019	N/A	30900
TRANPLAN Forecasts/Trends		

*Axle-Adjusted

Trend R-squared:	0.51%
Compounded Annual Historic Growth Rate:	-0.25%
Compounded Growth Rate (2015 to Design Year):	-0.08%
Printed:	9-Feb-17

Decaying Exponential Growth Option

FLORIDA DEPARTMENT OF TRANSPORTATION
TRANSPORTATION STATISTICS OFFICE
2015 HISTORICAL AADT REPORT

COUNTY: 87 - MIAMI-DADE

SITE: 2563 - SR5/US1 S.DIXIE HWY ONE WAY NB 300' S OF SW 174 ST

YEAR	AADT	DIRECTION 1	DIRECTION 2	*K FACTOR	D FACTOR	T FACTOR
2015	29500 C	N 29500	0	9.00	99.90	5.20
2014	30000 C	N 30000		9.00	99.90	5.80
2013	30000 C	N 30000	0	9.00	99.90	5.40
2012	30500 C	N 30500	0	9.00	99.90	5.70
2011	32000 C	N 32000	0	9.00	99.90	6.10
2010	39000 C	N 39000	0	7.87	99.99	6.90
2009	29500 C	N 29500	0	7.98	99.99	6.30
2008	30000 C	N 30000	0	8.07	99.99	7.10
2007	30500 C	N 30500	0	7.90	99.99	8.00
2006	31500 C	N 31500	0	7.39	99.99	6.10
2005	31000 C	N 31000		7.70	99.90	5.50
2004	29500 C	N 29500		8.20	99.90	6.20
2003	32000 C	N 32000		8.10	99.90	4.80

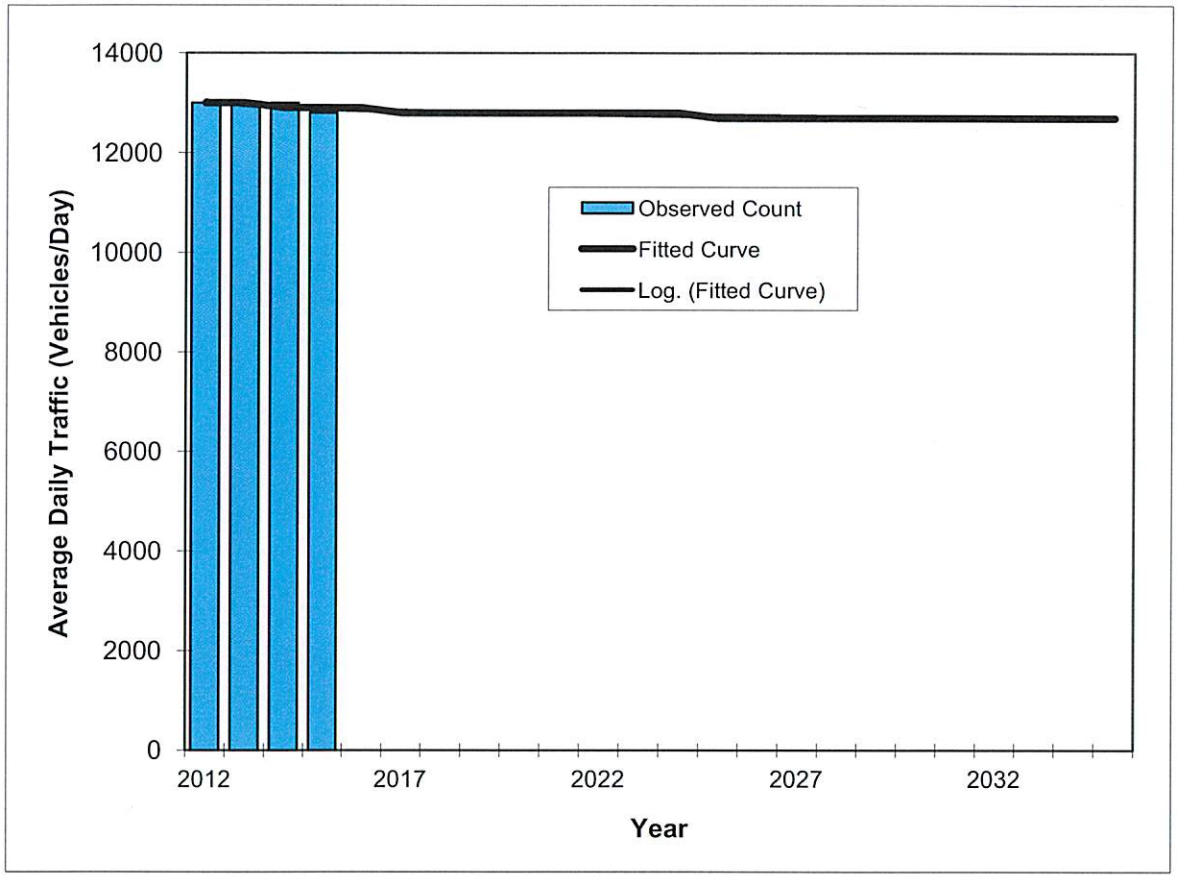
AADT FLAGS: C = COMPUTED; E = MANUAL ESTIMATE; F = FIRST YEAR ESTIMATE
S = SECOND YEAR ESTIMATE; T = THIRD YEAR ESTIMATE; F = FOURTH YEAR ESTIMATE
V = FIFTH YEAR ESTIMATE; 6 = SIXTH YEAR ESTIMATE; X = UNKNOWN
*K FACTOR: STARTING WITH YEAR 2011 IS STANDARDK, PRIOR YEARS ARE K30 VALUES

Traffic Trends - V2.0

FRANJO RD -- 200' SOUTH OF SW 184 STREET

PIN#	973215-1
Location	1

County:	Miami (87)
Station #:	8333
Highway:	FRANJO RD



Year	Traffic (ADT/AADT) Count*	Trend**
2012	13000	13000
2013	13000	13000
2014	13000	12900
2015	12800	12900
2016 Opening Year Trend		
2016	N/A	12900
2018 Mid-Year Trend		
2018	N/A	12800
2019 Design Year Trend		
2019	N/A	12800
TRANPLAN Forecasts/Trends		

Trend R-squared:	43.07%
Compounded Annual Historic Growth Rate:	-0.26%
Compounded Growth Rate (2015 to Design Year):	-0.19%
Printed:	9-Feb-17

Decaying Exponential Growth Option

*Axle-Adjusted

FLORIDA DEPARTMENT OF TRANSPORTATION
TRANSPORTATION STATISTICS OFFICE
2015 HISTORICAL AADT REPORT

COUNTY: 87 - MIAMI-DADE

SITE: 8333 - FRANJO RD, 200' SOUTH OF SW 184TH STREET

YEAR	AADT	DIRECTION 1	DIRECTION 2	*K FACTOR	D FACTOR	T FACTOR
2015	12800 T	N 6800	S 6000	9.00	57.40	13.70
2014	13000 S	N 6900	S 6100	9.00	59.30	17.40
2013	13000 F	N 6900	S 6100	9.00	58.90	16.20
2012	13000 C	N 6900	S 6100	9.00	59.70	16.00

AADT FLAGS: C = COMPUTED; E = MANUAL ESTIMATE; F = FIRST YEAR ESTIMATE
S = SECOND YEAR ESTIMATE; T = THIRD YEAR ESTIMATE; F = FOURTH YEAR ESTIMATE
V = FIFTH YEAR ESTIMATE; 6 = SIXTH YEAR ESTIMATE; X = UNKNOWN
*K FACTOR: STARTING WITH YEAR 2011 IS STANDARDK, PRIOR YEARS ARE K30 VALUES

2015 PEAK SEASON FACTOR CATEGORY REPORT - REPORT TYPE: ALL
CATEGORY: 8701 MIAMI-DADE SOUTH

MOCF: 0.98

WEEK	DATES	SF	PSCF
1	01/01/2015 - 01/03/2015	1.02	1.04
2	01/04/2015 - 01/10/2015	1.02	1.04
3	01/11/2015 - 01/17/2015	1.02	1.04
4	01/18/2015 - 01/24/2015	1.01	1.03
5	01/25/2015 - 01/31/2015	1.00	1.02
6	02/01/2015 - 02/07/2015	0.99	1.01
* 7	02/08/2015 - 02/14/2015	0.98	1.00
* 8	02/15/2015 - 02/21/2015	0.97	0.99
* 9	02/22/2015 - 02/28/2015	0.97	0.99
*10	03/01/2015 - 03/07/2015	0.97	0.99
*11	03/08/2015 - 03/14/2015	0.97	0.99
*12	03/15/2015 - 03/21/2015	0.98	1.00
*13	03/22/2015 - 03/28/2015	0.98	1.00
*14	03/29/2015 - 04/04/2015	0.99	1.01
*15	04/05/2015 - 04/11/2015	0.99	1.01
*16	04/12/2015 - 04/18/2015	0.99	1.01
*17	04/19/2015 - 04/25/2015	0.99	1.01
*18	04/26/2015 - 05/02/2015	0.99	1.01
*19	05/03/2015 - 05/09/2015	0.99	1.01
20	05/10/2015 - 05/16/2015	1.00	1.02
21	05/17/2015 - 05/23/2015	0.99	1.01
22	05/24/2015 - 05/30/2015	0.99	1.01
23	05/31/2015 - 06/06/2015	0.99	1.01
24	06/07/2015 - 06/13/2015	0.99	1.01
25	06/14/2015 - 06/20/2015	1.00	1.02
26	06/21/2015 - 06/27/2015	1.01	1.03
27	06/28/2015 - 07/04/2015	1.01	1.03
28	07/05/2015 - 07/11/2015	1.02	1.04
29	07/12/2015 - 07/18/2015	1.02	1.04
30	07/19/2015 - 07/25/2015	1.01	1.03
31	07/26/2015 - 08/01/2015	1.01	1.03
32	08/02/2015 - 08/08/2015	1.00	1.02
33	08/09/2015 - 08/15/2015	1.00	1.02
34	08/16/2015 - 08/22/2015	1.00	1.02
35	08/23/2015 - 08/29/2015	1.00	1.02
36	08/30/2015 - 09/05/2015	1.01	1.03
37	09/06/2015 - 09/12/2015	1.01	1.03
38	09/13/2015 - 09/19/2015	1.01	1.03
39	09/20/2015 - 09/26/2015	1.01	1.03
40	09/27/2015 - 10/03/2015	1.01	1.03
41	10/04/2015 - 10/10/2015	1.01	1.03
42	10/11/2015 - 10/17/2015	1.02	1.04
43	10/18/2015 - 10/24/2015	1.02	1.04
44	10/25/2015 - 10/31/2015	1.03	1.05
45	11/01/2015 - 11/07/2015	1.03	1.05
46	11/08/2015 - 11/14/2015	1.04	1.06
47	11/15/2015 - 11/21/2015	1.03	1.05
48	11/22/2015 - 11/28/2015	1.03	1.05
49	11/29/2015 - 12/05/2015	1.02	1.04
50	12/06/2015 - 12/12/2015	1.02	1.04
51	12/13/2015 - 12/19/2015	1.02	1.04
52	12/20/2015 - 12/26/2015	1.02	1.04
53	12/27/2015 - 12/31/2015	1.02	1.04

* PEAK SEASON

Appendix D: Traffic Counts (TMC's)

TABLE: A5

INTERSECTION APPROACH VOLUMES - AM PEAK HOUR

Project Name: Sandpiper Apartments

INTERSECTION NO.	1 INTERSECTION NAME	2 APPROACH	3 MOVEMENT	4 AM PEAK HR COUNT	5 DATE OF COUNT	6 PHF	7 SF	8 AM PEAK SEASONALLY ADJUSTED (EXISTING)	9 BACKGROUND GROWTH @ 2.0% FOR PROJECT BUILD-OUT OF 2019 (3 YEAR GROWTH)	10 NET TRAFFIC W/O PROJECT	11 PROJECT NET TRIPS (VPH)	12 TOTAL TRAFFIC (VPH) (PROPOSED) (2019)
1	SW 97 Avenue & SW 181 Terrace	SOUTHBOUND	SBR	4	Tuesday, May 03, 2016	0.937	0.99	4	0	4	5	9
			SBT	148			0.99	147	9	155	0	155
			SBL	3			0.99	3	0	3	0	3
			TOTAL	**155**				**153**	**9**	**163**	**5**	**168**
		WESTBOUND	WBR	22			0.99	22	1	23	0	23
			WBT	11			0.99	11	1	12	1	13
			WBL	9			0.99	9	1	9	0	9
			TOTAL	**42**				**42**	**3**	**44**	**1**	**45**
		NORTHBOUND	NBR	6			0.99	6	0	6	0	6
			NBT	533			0.99	528	32	560	0	560
			NBL	12			0.99	12	1	13	6	19
			TOTAL	**551**				**545**	**33**	**579**	**6**	**585**
		EASTBOUND	EBR	11			0.99	11	1	12	17	29
			EBT	12			0.99	12	1	13	3	16
			EBL	23			0.99	23	1	24	18	42
			TOTAL	**46**				**46**	**3**	**48**	**38**	**86**
	TOTAL			***794***				***786***	***48***	***834***	***50***	***884***
2	SW 181 Terrace & Wayne Avenue	SOUTHEASTBOUND	SEBR	0	Tuesday, May 03, 2016	0.750	0.99	0	0	0	0	0
			SEBT	0			0.99	0	0	0	0	0
			SEBL	15			0.99	15	1	16	38	54
			TOTAL	**15**				**15**	**1**	**16**	**38**	**54**
		WESTBOUND	WBR	7			0.99	7	0	7	12	19
			WBT	19			0.99	19	1	20	0	20
			WBL	0			0.99	0	0	0	0	0
			TOTAL	**26**				**26**	**2**	**27**	**12**	**39**
		NORTHBOUND	NBR	0			0.99	0	0	0	0	0
			NBT	0			0.99	0	0	0	0	0
			NBL	0			0.99	0	0	0	0	0
			TOTAL	**0**				**0**	**0**	**0**	**0**	**0**
		EASTBOUND	EBR	0			0.99	0	0	0	0	0
			EBT	37			0.99	37	2	39	0	39
			EBL	0			0.99	0	0	0	0	0
			TOTAL	**37**				**37**	**2**	**39**	**0**	**39**
	TOTAL			***78***				***77***	***5***	***82***	***50***	***132***

TABLE: A5

INTERSECTION APPROACH VOLUMES - AM PEAK HOUR

Project Name: Sandpiper Apartments

INTERSECTION NO.	1	2	3	4	5	6	7	8	9	10	11	12
	INTERSECTION NAME	APPROACH	MOVEMENT	AM PEAK HR COUNT	DATE OF COUNT	PHF	SF	AM PEAK SEASONALLY ADJUSTED (EXISTING)	BACKGROUND GROWTH @ 2.0% FOR PROJECT BUILD-OUT OF 2019 (3 YEAR GROWTH)	NET TRAFFIC W/O PROJECT	PROJECT NET TRIPS (VPH)	TOTAL TRAFFIC (VPH) (PROPOSED) (2019)
3	SW 98 Avenue & Wayne Avenue	SOUTHBOUND	SBR	0	Tuesday, May 03, 2016	0.879	0.99	0	0	0	0	0
			SBT	13			0.99	13	1	14	0	14
			SBL	3			0.99	3	0	3	2	5
			TOTAL	**16**				**16**	**1**	**17**	**2**	**19**
		WESTBOUND	WBR	1			0.99	1	0	1	9	10
			WBT	0			0.99	0	0	0	0	0
			WBL	7			0.99	7	0	7	11	18
			TOTAL	**8**				**8**	**0**	**8**	**20**	**28**
		NORTHBOUND	NBR	11			0.99	11	1	12	4	16
			NBT	81			0.99	80	5	85	0	85
			NBL	0			0.99	0	0	0	0	0
			TOTAL	**92**				**91**	**6**	**97**	**4**	**101**
		EASTBOUND	EBR	0			0.99	0	0	0	0	0
			EBT	0			0.99	0	0	0	0	0
			EBL	0			0.99	0	0	0	0	0
			TOTAL	**0**				**0**	**0**	**0**	**0**	**0**
	TOTAL			***116***				***115***	***7***	***122***	***26***	***148***

Notes:

1 Intersection Name
2 Intersection Approach
3 Intersection Approach Movement
4 TMC data provided by RGA, Inc.
5 Date of Count
6 Peak Hour Factor
7 Seasonal Factor (SF) obtained from FDOT
8 Seasonally Adjusted TMC = Count * SF (Existing Condition).
9 A 2.0 percent background growth was utilized with a project build-out of 2019.
10 Proposed Traffic w/o Project = Seasonally Adjusted TMC + Backgound
11 Project Trips.
12 Total Traffic = Net Traffic w/o Project + Site Traffic (Proposed Condition with Project)

TABLE: A6

INTERSECTION APPROACH VOLUMES - PM PEAK HOUR

Project Name: Sandpiper Apartments

INTERSECTION NO.	1 INTERSECTION NAME	2 APPROACH	3 MOVEMENT	4 PM PEAK HR COUNT	5 DATE OF COUNT	6 PHF	7 SF	8 PM PEAK SEASONALLY ADJUSTED (EXISTING)	9 BACKGROUND GROWTH @ 2.0% FOR PROJECT BUILD-OUT OF 2019 (3 YEAR GROWTH)	10 NET TRAFFIC W/O PROJECT	11 PROJECT NET TRIPS (VPH)	12 TOTAL TRAFFIC (VPH) (PROPOSED) (2019)
1	SW 97 Avenue & SW 181 Terrace	SOUTHBOUND	SBR	8	Tuesday, May 03, 2016	0.956	0.99	8	0	8	17	25
			SBT	507			0.99	502	31	533	0	533
			SBL	7			0.99	7	0	7	0	7
			TOTAL	**522**				**517**	**32**	**548**	**17**	**565**
		WESTBOUND	WBR	4			0.99	4	0	4	0	4
			WBT	3			0.99	3	0	3	4	7
			WBL	4			0.99	4	0	4	0	4
			TOTAL	**11**				**11**	**1**	**12**	**4**	**16**
		NORTHBOUND	NBR	12			0.99	12	1	13	0	13
			NBT	289			0.99	286	18	304	0	304
			NBL	3			0.99	3	0	3	14	17
			TOTAL	**304**				**301**	**18**	**319**	**14**	**333**
		EASTBOUND	EBR	14			0.99	14	1	15	10	25
			EBT	4			0.99	4	0	4	3	7
			EBL	2			0.99	2	0	2	12	14
			TOTAL	**20**				**20**	**1**	**21**	**25**	**46**
	TOTAL			***857***				***848***	***52***	***900***	***60***	***960***
2	SW 181 Terrace & Wayne Avenue	SOUTHEASTBOUND	SEBR	0	Tuesday, May 03, 2016	0.773	0.99	0	0	0	0	0
			SEBT	0			0.99	0	0	0	0	0
			SEBL	2			0.99	2	0	2	25	27
			TOTAL	**2**				**2**	**0**	**2**	**25**	**27**
		WESTBOUND	WBR	3			0.99	3	0	3	35	38
			WBT	9			0.99	9	1	9	0	9
			WBL	0			0.99	0	0	0	0	0
			TOTAL	**12**				**12**	**1**	**13**	**35**	**48**
		NORTHBOUND	NBR	0			0.99	0	0	0	0	0
			NBT	0			0.99	0	0	0	0	0
			NBL	0			0.99	0	0	0	0	0
			TOTAL	**0**				**0**	**0**	**0**	**0**	**0**
		EASTBOUND	EBR	0			0.99	0	0	0	0	0
			EBT	20			0.99	20	1	21	0	21
			EBL	0			0.99	0	0	0	0	0
			TOTAL	**20**				**20**	**1**	**21**	**0**	**21**
	TOTAL			***34***				***34***	***2***	***36***	***60***	***96***

TABLE: A6

INTERSECTION APPROACH VOLUMES - PM PEAK HOUR

Project Name: Sandpiper Apartments

INTERSECTION NO.	1 INTERSECTION NAME	2 APPROACH	3 MOVEMENT	4 PM PEAK HR COUNT	5 DATE OF COUNT	6 PHF	7 SF	8 PM PEAK SEASONALLY ADJUSTED (EXISTING)	9 BACKGROUND GROWTH @ 2.0% FOR PROJECT BUILD-OUT OF 2019 (3 YEAR GROWTH)	10 NET TRAFFIC W/O PROJECT	11 PROJECT NET TRIPS (VPH)	12 TOTAL TRAFFIC (VPH) (PROPOSED) (2019)
3	SW 98 Avenue & Wayne Avenue	SOUTHBOUND	SBR	0	Tuesday, May 03, 2016	0.867	0.99	0	0	0	0	0
			SBT	28			0.99	28	2	29	0	29
			SBL	1			0.99	1	0	1	18	19
			TOTAL	**29**				**29**	**2**	**30**	**18**	**48**
		WESTBOUND	WBR	1			0.99	1	0	1	12	13
			WBT	0			0.99	0	0	0	0	0
			WBL	3			0.99	3	0	3	11	14
			TOTAL	**4**				**4**	**0**	**4**	**23**	**27**
		NORTHBOUND	NBR	3			0.99	3	0	3	16	19
			NBT	16			0.99	16	1	17	0	17
			NBL	0			0.99	0	0	0	0	0
			TOTAL	**19**				**19**	**1**	**20**	**16**	**36**
		EASTBOUND	EBR	0			0.99	0	0	0	0	0
			EBT	0			0.99	0	0	0	0	0
			EBL	0			0.99	0	0	0	0	0
			TOTAL	**0**				**0**	**0**	**0**	**0**	**0**
	TOTAL			***52***				***51***	***3***	***55***	***57***	***112***

Notes:

1 Intersection Name
2 Intersection Approach
3 Intersection Approach Movement
4 TMC data provided by RGA, Inc.
5 Date of Count
6 Peak Hour Factor
7 Seasonal Factor (SF) obtained from FDOT
8 Seasonally Adjusted TMC = Count * SF (Existing Condition).
9 A 2.0 percent background growth was utilized with a project build-out of 2019.
10 Proposed Traffic w/o Project = Seasonally Adjusted TMC + Backgound
11 Project Trips.
12 Total Traffic = Net Traffic w/o Project + Site Traffic (Proposed Condition with Project)

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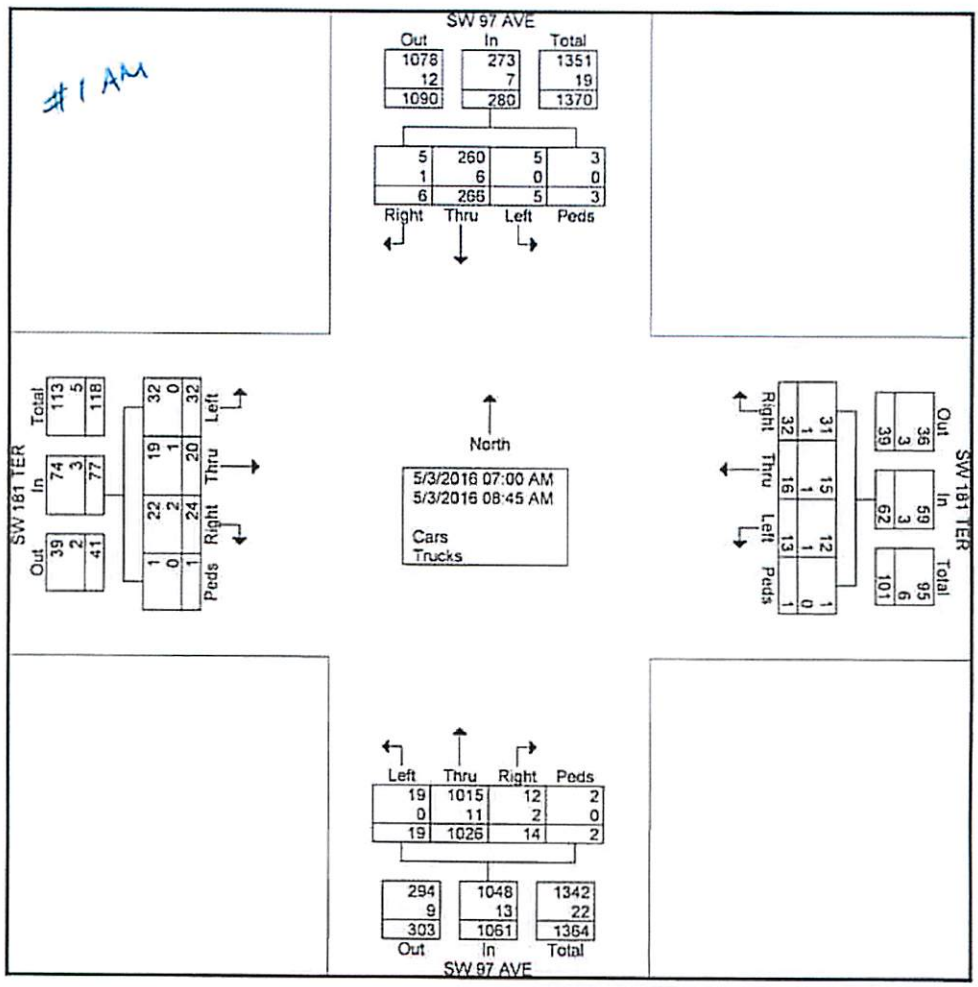
File Name : SW 97 Ave_SW 181 Ter_AM
Site Code : 00000000
Start Date : 5/3/2016
Page No : 1

Groups Printed- Cars - Trucks

	SW 97 AVE Southbound					SW 181 TER Westbound					SW 97 AVE Northbound					SW 181 TER Eastbound					
Start Time	Right	Thru	Left	Peds	App. Total	Right	Thru	Left	Peds	App. Total	Right	Thru	Left	Peds	App. Total	Right	Thru	Left	Peds	App. Total	Int. Total
07:00 AM	0	25	0	1	26	2	1	0	0	3	1	126	0	0	127	2	1	1	0	4	160
07:15 AM	0	24	2	0	26	2	2	1	0	5	2	129	1	0	132	1	2	4	0	7	170
07:30 AM	1	29	0	0	30	4	1	3	0	8	3	124	2	0	129	8	3	3	0	14	181
07:45 AM	4	35	1	0	40	4	2	0	0	6	2	145	1	0	148	3	4	12	0	19	213
Total	5	113	3	1	122	12	6	4	0	22	8	524	4	0	536	14	10	20	0	44	724
08:00 AM	0	24	1	2	27	5	3	6	0	14	1	149	2	1	153	3	5	4	1	13	207
08:15 AM	0	42	1	0	43	5	3	2	0	10	1	117	6	0	124	1	2	4	0	7	184
08:30 AM	0	47	0	0	47	8	3	1	0	12	2	122	3	0	127	4	1	3	0	8	194
08:45 AM	1	40	0	0	41	2	1	0	1	4	2	114	4	1	121	2	2	1	0	5	171
Total	1	153	2	2	158	20	10	9	1	40	6	502	15	2	525	10	10	12	1	33	756
Grand Total	6	266	5	3	280	32	16	13	1	62	14	1026	19	2	1061	24	20	32	1	77	1480
Apprch %	2.1	95	1.8	1.1		51.6	25.8	21	1.6		1.3	96.7	1.8	0.2		31.2	26	41.6	1.3		
Total %	0.4	18	0.3	0.2	18.9	2.2	1.1	0.9	0.1	4.2	0.9	69.3	1.3	0.1	71.7	1.6	1.4	2.2	0.1	5.2	
Cars	5	260	5	3	273	31	15	12	1	59	12	1015									
% Cars	83.3	97.7	100	100	97.5	96.9	93.8	92.3	100	95.2	85.7	98.9	100	100	98.8	91.7	95	100	100	96.1	98.2
Trucks	1	6	0	0	7	1	1	1	0	3	2	11	0	0	13	2	1	0	0	3	26
% Trucks	16.7	2.3	0	0	2.5	3.1	6.2	7.7	0	4.8	14.3	1.1	0	0	1.2	8.3	5	0	0	3.9	1.8



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File Name : SW 97 Ave_SW 181 Ter_AM
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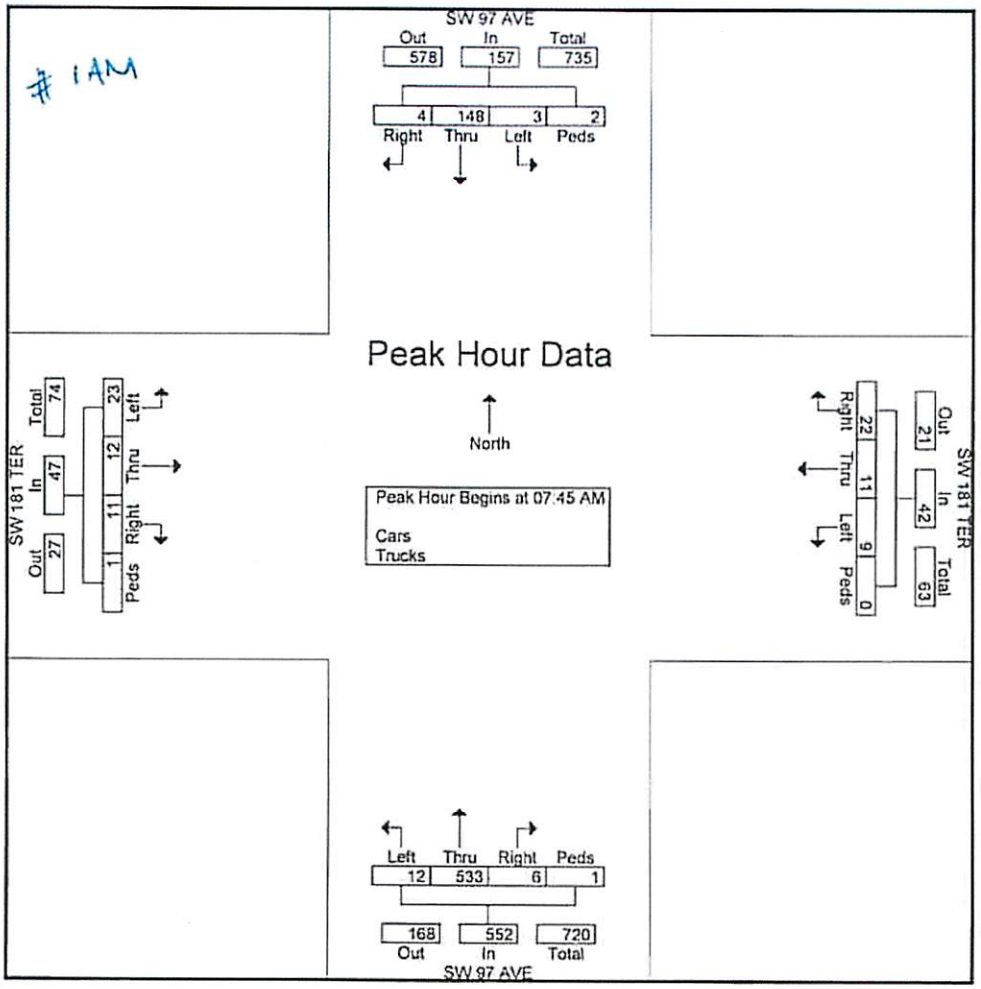
Start Date : 5/3/2016
Page No : 2

Start Time	SW 97 AVE Southbound					SW 181 TER Westbound					SW 97 AVE Northbound					SW 181 TER Eastbound					
	Right	Thru	Left	Peds	App. Total	Right	Thru	Left	Peds	App. Total	Right	Thru	Left	Peds	App. Total	Right	Thru	Left	Peds	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 07:45 AM																					
07:45 AM	4	35	1	0	40	4	2	0	0	6	2	145	1	0	148	3	4	12	0	19	213
08:00 AM	0	24	1	2	27	5	3	6	0	14	1	149	2	1	153	3	5	4	1	13	207
08:15 AM	0	42	1	0	43	5	3	2	0	10	1	117	6	0	124	1	2	4	0	7	184
08:30 AM	0	47	0	0	47	8	3	1	0	12	2	122	3	0	127	4	1	3	0	8	194
Total Volume	4	148	3	2	157	22	11	9	0	42	6	533	12	1	552	11	12	23	1	47	798
% App. Total	2.5	94.3	1.9	1.3		52.4	26.2	21.4	0		1.1	96.6	2.2	0.2		23.4	25.5	48.9	2.1		
PHF	.250	.787	.750	.250	.835	.688	.917	.375	.000	.750	.750	.894	.500	.250	.902	.688	.600	.479	.250	.618	.937



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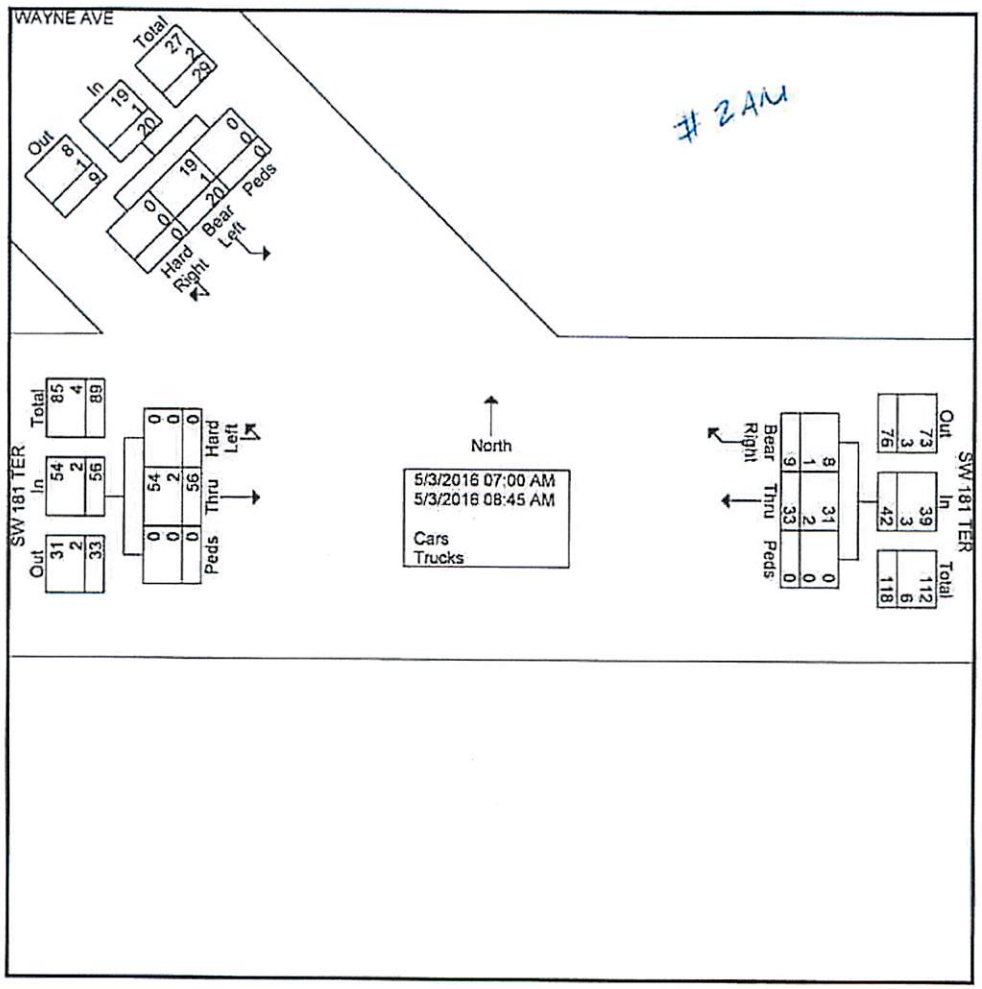
File Name : Wayne Ave_SW 181 Ter_AM
Site Code : 00000000
Start Date : 5/3/2016
Page No : 1

Groups Printed- Cars - Trucks

	WAYNE AVE Southeastbound				SW 181 TER Westbound				SW 181 TER Eastbound				
Start Time	Hard Right	Bear Left	Peds	App. Total	Bear Right	Thru	Peds	App. Total	Thru	Hard Left	Peds	App. Total	Int. Total
07:00 AM	0	0	0	0	0	1	0	1	4	0	0	4	5
07:15 AM	0	3	0	3	0	3	0	3	4	0	0	4	10
07:30 AM	0	4	0	4	2	2	0	4	10	0	0	10	18
07:45 AM	0	4	0	4	1	6	0	7	15	0	0	15	26
Total	0	11	0	11	3	12	0	15	33	0	0	33	59
08:00 AM	0	5	0	5	2	3	0	5	7	0	0	7	17
08:15 AM	0	2	0	2	2	8	0	10	5	0	0	5	17
08:30 AM	0	2	0	2	0	6	0	6	6	0	0	6	14
08:45 AM	0	0	0	0	2	4	0	6	5	0	0	5	11
Total	0	9	0	9	6	21	0	27	23	0	0	23	59
Grand Total	0	20	0	20	9	33	0	42	56	0	0	56	118
Apprch %	0	100	0		21.4	78.6	0		100	0	0		
Total %	0	16.9	0	16.9	7.6	28	0	35.6	47.5	0	0	47.5	
Cars	0	19	0	19	8	31	0	39	54	0	0	54	112
% Cars	0	95	0	95	88.9	93.9	0	92.9	96.4	0	0	96.4	94.9
Trucks	0	1	0	1	1	2	0	3	2	0	0	2	6
% Trucks	0	5	0	5	11.1	6.1	0	7.1	3.6	0	0	3.6	5.1



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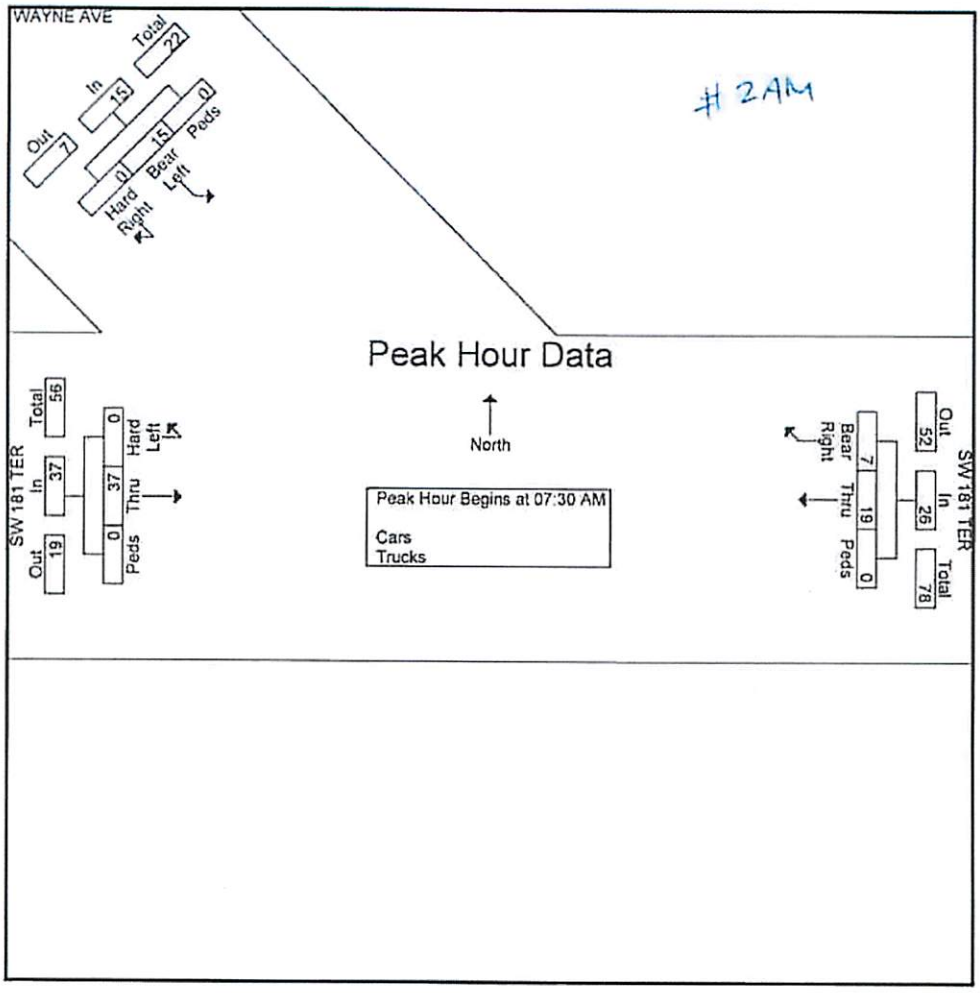
Page No : 2

	WAYNE AVE Southeastbound				SW 181 TER Westbound				SW 181 TER Eastbound				
Start Time	Hard Right	Bear Left	Peds	App. Total	Bear Right	Thru	Peds	App. Total	Thru	Hard Left	Peds	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	4	0	4	2	2	0	4	10	0	0	10	18
07:45 AM	0	4	0	4	1	6	0	7	15	0	0	15	26
08:00 AM	0	5	0	5	2	3	0	5	7	0	0	7	17
08:15 AM	0	2	0	2	2	8	0	10	5	0	0	5	17
Total Volume	0	15	0	15	7	19	0	26	37	0	0	37	78
% App. Total	0	100	0		26.9	73.1	0		100	0	0		
PHF	.000	.750	.000	.750	.875	.594	.000	.650	.617	.000	.000	.617	.750



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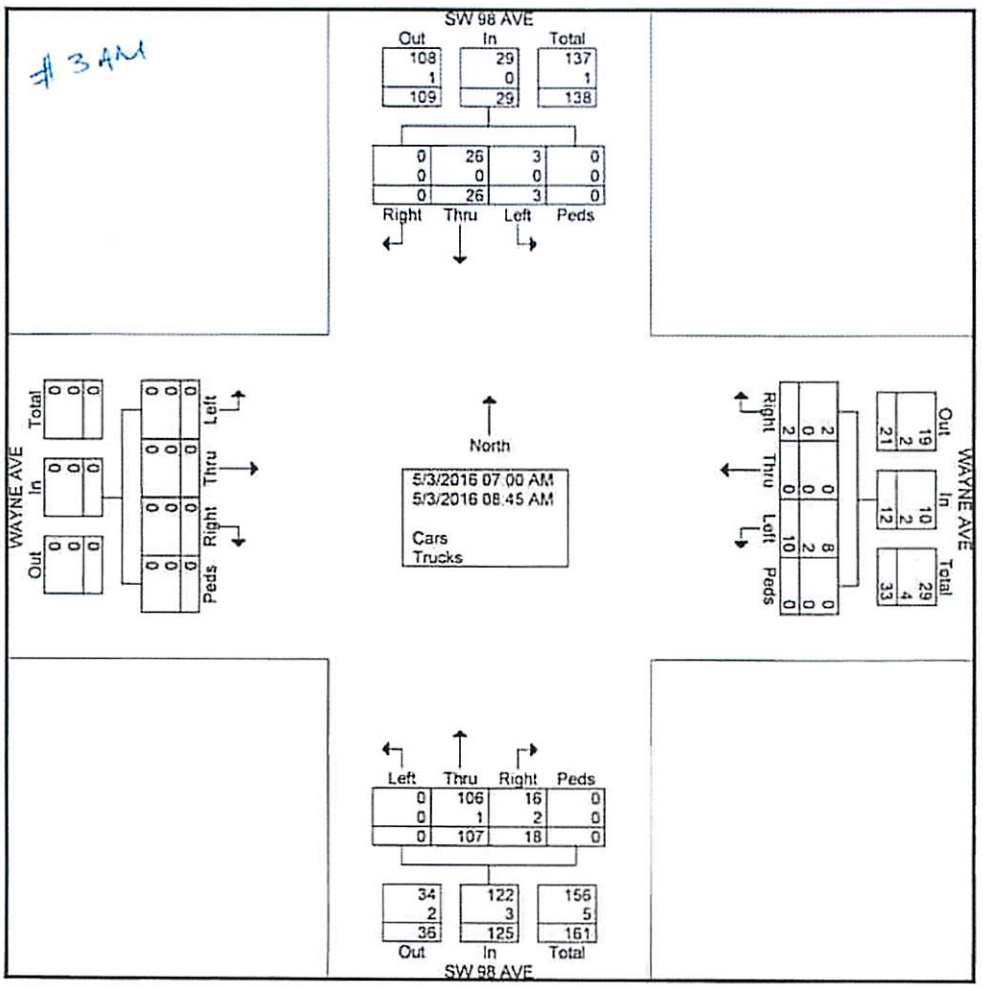
File Name : SW 98 Ave_Wayne Ave_AM
Site Code : 00000000
Start Date : 5/3/2016
Page No : 1

Groups Printed- Cars - Trucks

	SW 98 AVE Southbound					WAYNE AVE Westbound					SW 98 AVE Northbound					WAYNE AVE Eastbound					
Start Time	Right	Thru	Left	Peds	App. Total	Right	Thru	Left	Peds	App. Total	Right	Thru	Left	Peds	App. Total	Right	Thru	Left	Peds	App. Total	Int. Total
07:00 AM	0	1	0	0	1	0	0	0	0	0	1	3	0	0	4	0	0	0	0	0	5
07:15 AM	0	0	0	0	0	0	0	1	0	1	4	6	0	0	10	0	0	0	0	0	11
07:30 AM	0	3	1	0	4	1	0	2	0	3	2	15	0	0	17	0	0	0	0	0	24
07:45 AM	0	2	0	0	2	0	0	2	0	2	3	26	0	0	29	0	0	0	0	0	33
Total	0	6	1	0	7	1	0	5	0	6	10	50	0	0	60	0	0	0	0	0	73
08:00 AM	0	2	0	0	2	0	0	2	0	2	4	18	0	0	22	0	0	0	0	0	26
08:15 AM	0	6	2	0	8	0	0	1	0	1	2	22	0	0	24	0	0	0	0	0	33
08:30 AM	0	5	0	0	5	0	0	1	0	1	2	12	0	0	14	0	0	0	0	0	20
08:45 AM	0	7	0	0	7	1	0	1	0	2	0	5	0	0	5	0	0	0	0	0	14
Total	0	20	2	0	22	1	0	5	0	6	8	57	0	0	65	0	0	0	0	0	93
Grand Total	0	26	3	0	29	2	0	10	0	12	18	107	0	0	125	0	0	0	0	0	166
Apprch %	0	89.7	10.3	0		16.7	0	83.3	0		14.4	85.6	0	0		0	0	0	0		
Total %	0	15.7	1.8	0	17.5	1.2	0	6	0	7.2	10.8	64.5	0	0	75.3	0	0	0	0	0	
Cars	0	26	3	0	29	2	0	8	0	10	16	106	0	0	122	0	0	0	0	0	161
% Cars	0	100	100	0	100	100	0	80	0	83.3	88.9	99.1	0	0	97.6	0	0	0	0	0	97
Trucks	0	0	0	0	0	0	0	2	0	2	2	1	0	0	3	0	0	0	0	0	5
% Trucks	0	0	0	0	0	0	0	20	0	16.7	11.1	0.9	0	0	2.4	0	0	0	0	0	3



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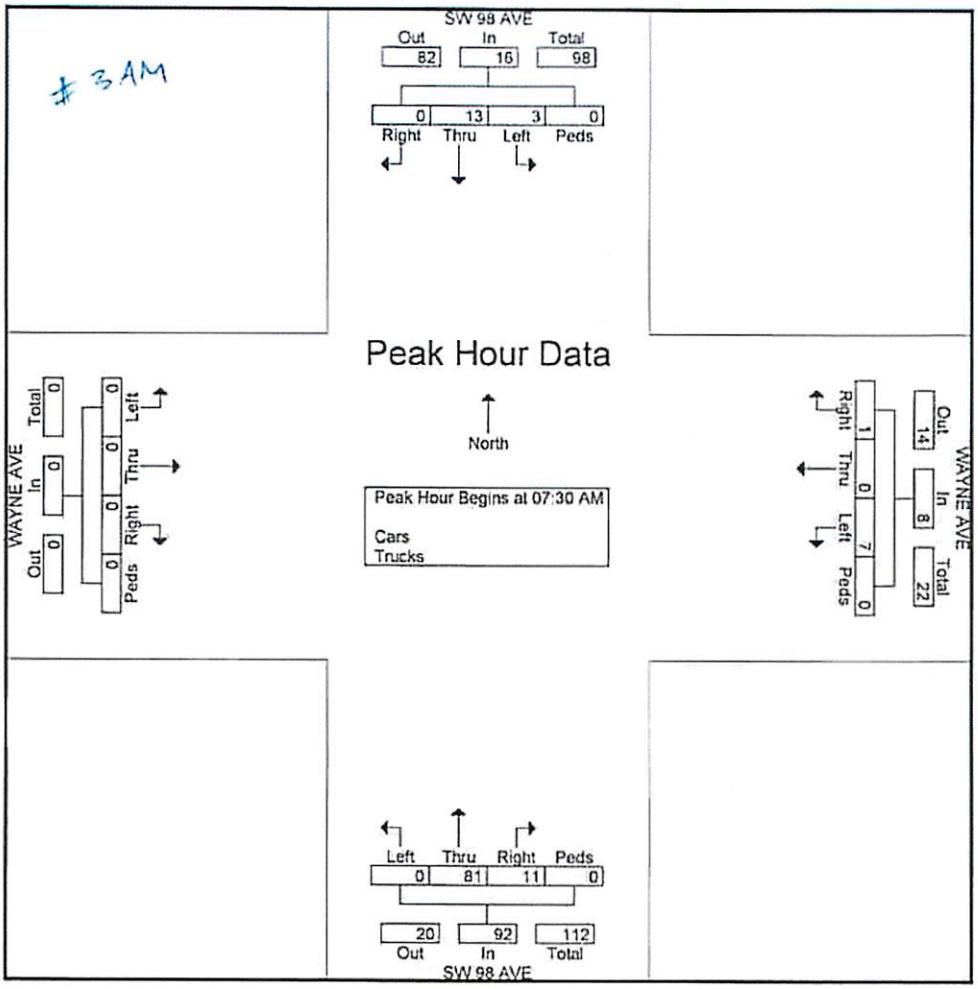
File Name : SW 98 Ave_Wayne Ave_AM
Site Code : 00000000
Start Date : 5/3/2016
Page No : 2

	SW 98 AVE Southbound					WAYNE AVE Westbound					SW 98 AVE Northbound					WAYNE AVE Eastbound					
Start Time	Right	Thru	Left	Peds	App. Total	Right	Thru	Left	Peds	App. Total	Right	Thru	Left	Peds	App. Total	Right	Thru	Left	Peds	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	3	1	0	4	1	0	2	0	3	2	15	0	0	17	0	0	0	0	0	24
07:45 AM	0	2	0	0	2	0	0	2	0	2	3	**26**	0	0	**29**	0	0	0	0	0	**33**
08:00 AM	0	2	0	0	2	0	0	2	0	2	4	18	0	0	22	0	0	0	0	0	26
08:15 AM	0	**6**	**2**	0	8	0	0	1	0	1	2	22	0	0	24	0	0	0	0	0	33
Total Volume	0	13	3	0	16	1	0	7	0	8	11	81	0	0	92	0	0	0	0	0	116
% App. Total	0	81.2	18.8	0		12.5	0	87.5	0		12	88	0	0		0	0	0	0		
PHF	.000	.542	.375	.000	.500	.250	.000	.875	.000	.667	.688	.779	.000	.000	.793	.000	.000	.000	.000	.000	.879



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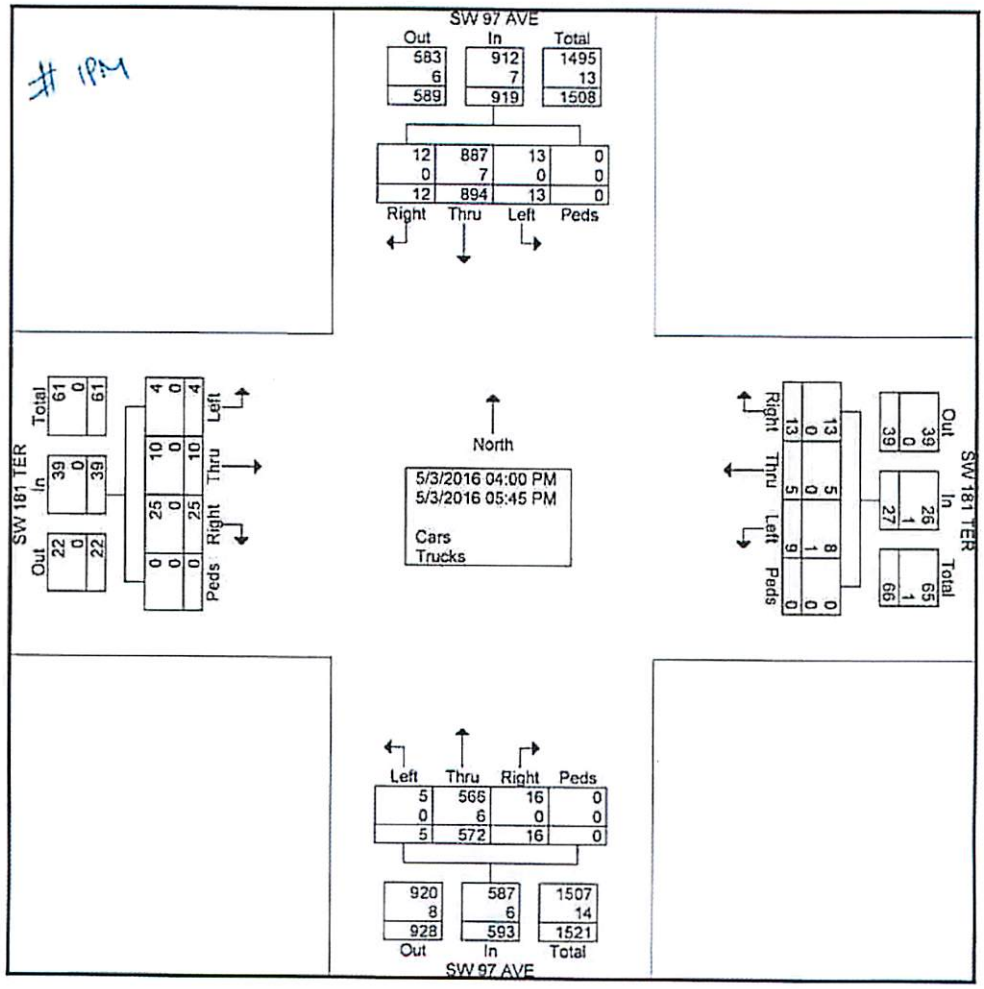
File Name : SW 97 Ave_SW 181 Ter_PM
Site Code : 00000000
Start Date : 5/3/2016
Page No : 1

Groups Printed- Cars - Trucks

	SW 97 AVE Southbound					SW 181 TER Westbound					SW 97 AVE Northbound					SW 181 TER Eastbound					
Start Time	Right	Thru	Left	Peds	App. Total	Right	Thru	Left	Peds	App. Total	Right	Thru	Left	Peds	App. Total	Right	Thru	Left	Peds	App. Total	Int. Total
04:00 PM	1	83	0	0	84	2	0	1	0	3	0	93	1	0	94	1	2	0	0	3	184
04:15 PM	0	105	2	0	107	4	1	2	0	7	0	80	0	0	80	3	0	2	0	5	199
04:30 PM	1	111	2	0	114	1	1	2	0	4	3	62	0	0	65	3	2	0	0	5	188
04:45 PM	2	120	0	0	122	2	1	1	0	4	2	87	2	0	91	4	1	1	0	6	223
Total	4	419	4	0	427	9	3	6	0	18	5	322	3	0	330	11	5	3	0	19	794
05:00 PM	2	133	3	0	138	0	2	1	0	3	6	71	0	0	77	4	1	1	0	6	224
05:15 PM	2	124	0	0	126	0	0	0	0	0	2	63	0	0	65	1	1	0	0	2	193
05:30 PM	2	130	4	0	136	2	0	2	0	4	2	68	1	0	71	5	1	0	0	6	217
05:45 PM	2	88	2	0	92	2	0	0	0	2	1	48	1	0	50	4	2	0	0	6	150
Total	8	475	9	0	492	4	2	3	0	9	11	250	2	0	263	14	5	1	0	20	784
Grand Total	12	894	13	0	919	13	5	9	0	27	16	572	5	0	593	25	10	4	0	39	1578
Apprch %	1.3	97.3	1.4	0		48.1	18.5	33.3	0		2.7	96.5	0.8	0		64.1	25.6	10.3	0		
Total %	0.8	56.7	0.8	0	58.2	0.8	0.3	0.6	0	1.7	1	36.2	0.3	0	37.6	1.6	0.6	0.3	0	2.5	
Cars	12	887	13	0	912	13	5	8	0	26	16	566	5	0	587	25	10	4	0	39	1564
% Cars	100	99.2	100	0	99.2	100	100	88.9	0	96.3	100	99	100	0	99	100	100	100	0	100	99.1
Trucks	0	7	0	0	7	0	0	1	0	1	0	6	0	0	6	0	0	0	0	0	14
% Trucks	0	0.8	0	0	0.8	0	0	11.1	0	3.7	0	1	0	0	1	0	0	0	0	0	0.9



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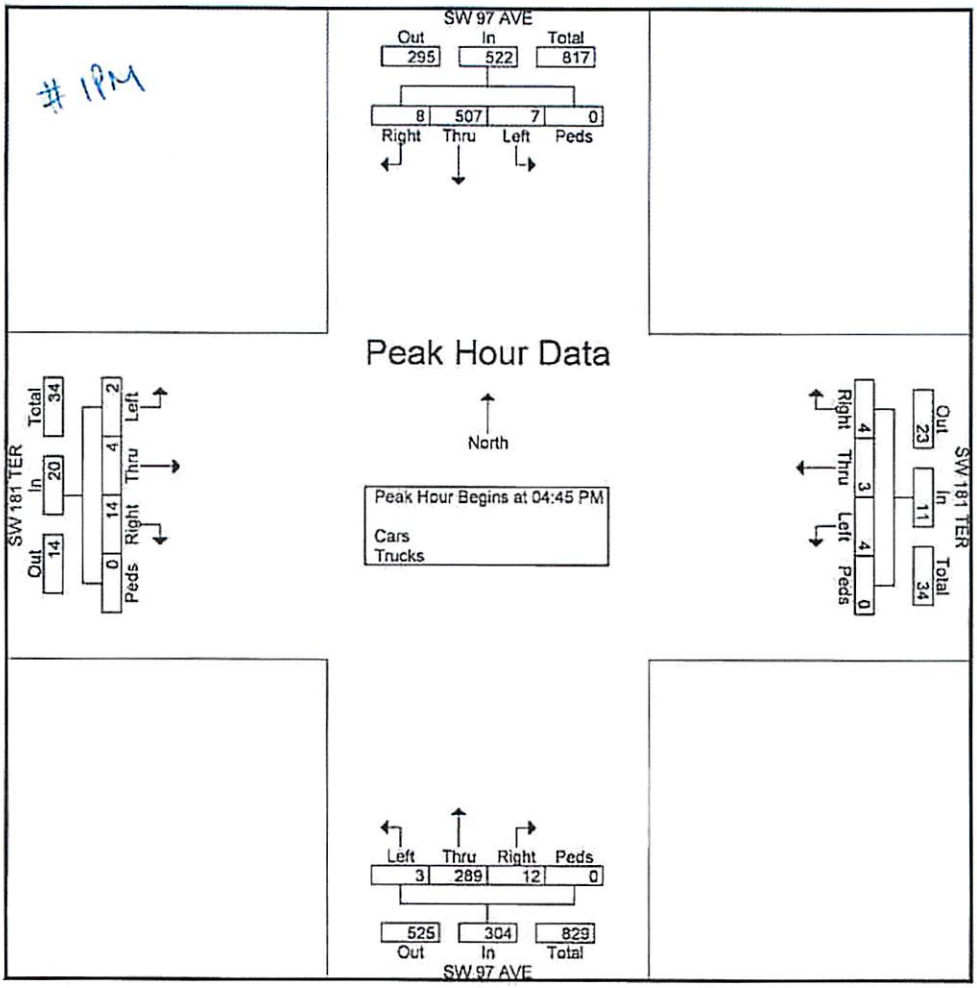
File Name : SW 97 Ave_SW 181 Ter_PM
Site Code : 00000000
Start Date : 5/3/2016
Page No : 2

	SW 97 AVE Southbound					SW 181 TER Westbound					SW 97 AVE Northbound					SW 181 TER Eastbound					
Start Time	Right	Thru	Left	Peds	App Total	Right	Thru	Left	Peds	App Total	Right	Thru	Left	Peds	App Total	Right	Thru	Left	Peds	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 04:45 PM																					
04:45 PM	2	120	0	0	122	2	1	1	0	4	2	87	2	0	91	4	1	1	0	6	223
05:00 PM	2	133	3	0	138	0	2	1	0	3	6	71	0	0	77	4	1	1	0	6	224
05:15 PM	2	124	0	0	126	0	0	0	0	0	2	63	0	0	65	1	1	0	0	2	193
05:30 PM	2	130	4	0	136	2	0	2	0	4	2	68	1	0	71	5	1	0	0	6	217
Total Volume	8	507	7	0	522	4	3	4	0	11	12	289	3	0	304	14	4	2	0	20	857
% App. Total	1.5	97.1	1.3	0		36.4	27.3	36.4	0		3.9	95.1	1	0		70	20	10	0		
PHF	1.00	.953	.438	.000	.946	.500	.375	.500	.000	.688	.500	.830	.375	.000	.835	.700	1.00	.500	.000	.833	.956



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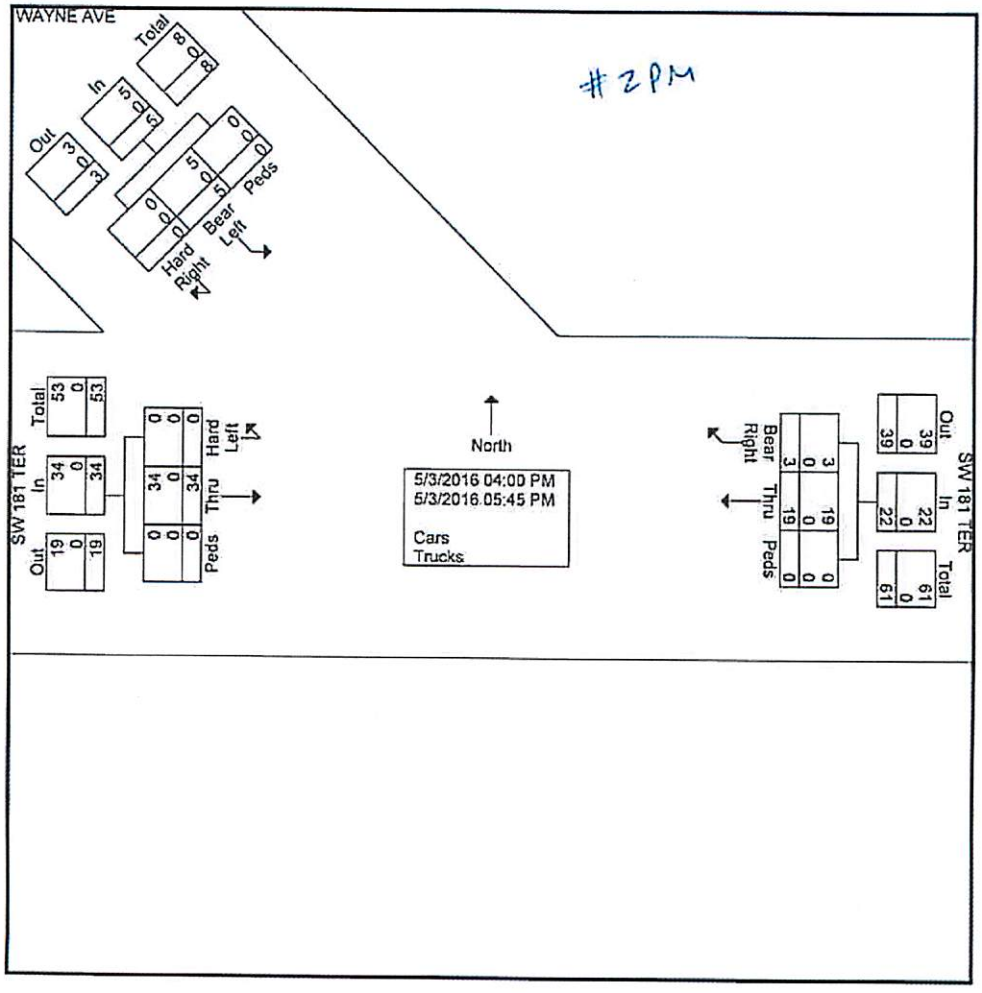
File Name : Wayne Ave_SW 181 Ter_PM
Site Code : 00000000
Start Date : 5/3/2016
Page No : 1

Groups Printed- Cars - Trucks

	WAYNE AVE Southeastbound				SW 181 TER Westbound				SW 181 TER Eastbound				
Start Time	Hard Right	Bear Left	Peds	App. Total	Bear Right	Thru	Peds	App. Total	Thru	Hard Left	Peds	App. Total	Int. Total
04:00 PM	0	0	0	0	0	2	0	2	3	0	0	3	5
04:15 PM	0	2	0	2	1	0	0	1	3	0	0	3	6
04:30 PM	0	0	0	0	1	1	0	2	5	0	0	5	7
04:45 PM	0	0	0	0	0	5	0	5	6	0	0	6	11
Total	0	2	0	2	2	8	0	10	17	0	0	17	29
05:00 PM	0	0	0	0	1	3	0	4	6	0	0	6	10
05:15 PM	0	1	0	1	0	2	0	2	1	0	0	1	4
05:30 PM	0	1	0	1	0	3	0	3	5	0	0	5	9
05:45 PM	0	1	0	1	0	3	0	3	5	0	0	5	9
Total	0	3	0	3	1	11	0	12	17	0	0	17	32
Grand Total	0	5	0	5	3	19	0	22	34	0	0	34	61
Apprch %	0	100	0		13.6	86.4	0		100	0	0		
Total %	0	8.2	0	8.2	4.9	31.1	0	36.1	55.7	0	0	55.7	
Cars	0	5	0	5	3	19	0	22	34	0	0	34	61
% Cars	0	100	0	100	100	100	0	100	100	0	0	100	100
Trucks	0	0	0	0	0	0	0	0	0	0	0	0	0
% Trucks	0	0	0	0	0	0	0	0	0	0	0	0	0



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File Name : Wayne Ave_SW 181 Ter_PM
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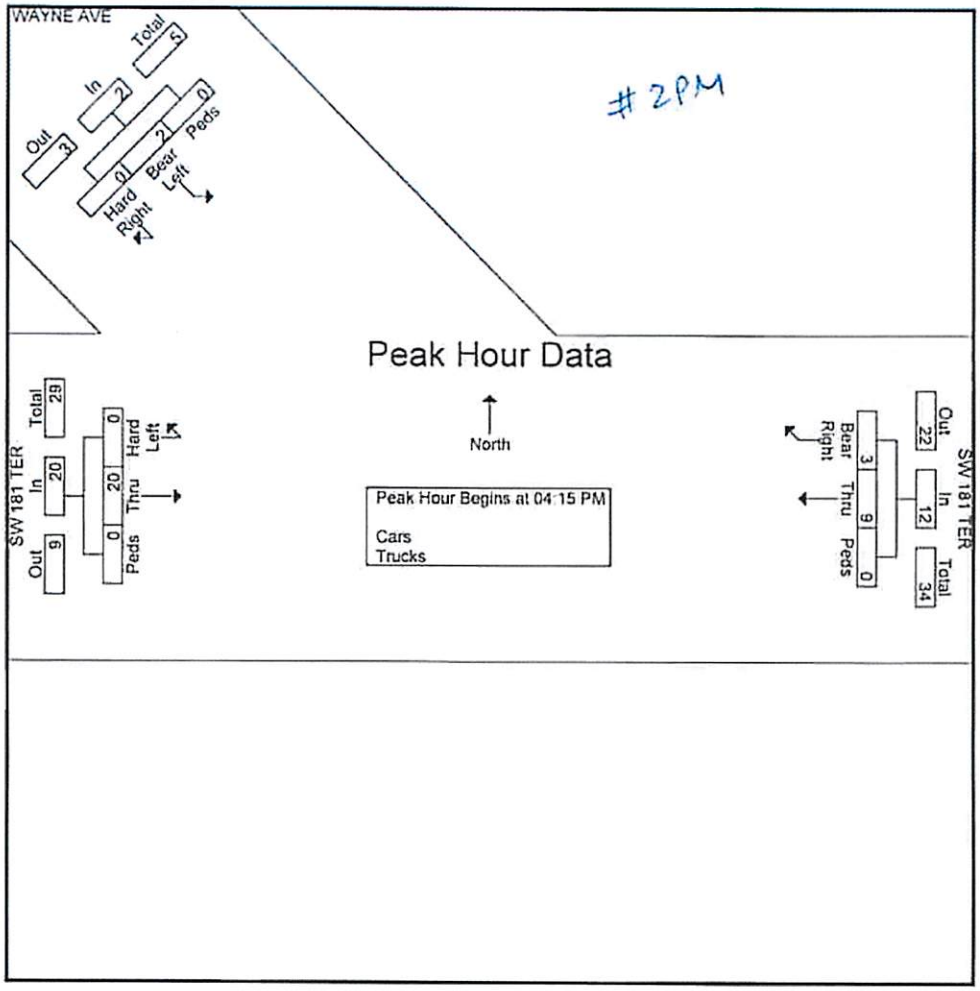
Page No : 2

	WAYNE AVE Southeastbound				SW 181 TER Westbound				SW 181 TER Eastbound				
Start Time	Hard Right	Bear Left	Peds	App. Total	Bear Right	Thru	Peds	App. Total	Thru	Hard Left	Peds	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 04:15 PM													
04:15 PM	0	2	0	2	1	0	0	1	3	0	0	3	6
04:30 PM	0	0	0	0	1	1	0	2	5	0	0	5	7
04:45 PM	0	0	0	0	0	5	0	5	6	0	0	6	11
05:00 PM	0	0	0	0	1	3	0	4	6	0	0	6	10
Total Volume	0	2	0	2	3	9	0	12	20	0	0	20	34
% App. Total	0	100	0		25	75	0		100	0	0		
PHF	.000	.250	.000	.250	.750	.450	.000	.600	.833	.000	.000	.833	.773



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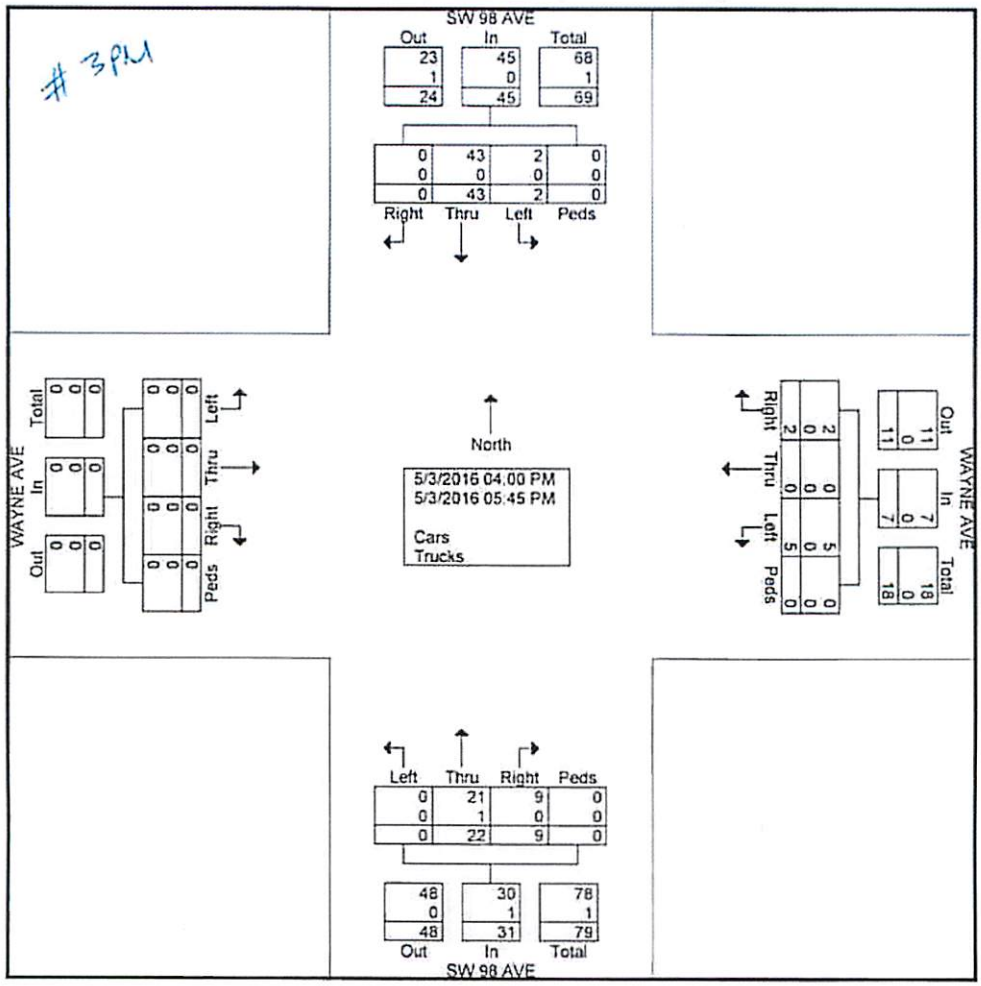
File Name : SW 98 Ave_Wayne Ave_PM
Site Code : 00000000
Start Date : 5/3/2016
Page No : 1

Groups Printed- Cars - Trucks

	SW 98 AVE Southbound					WAYNE AVE Westbound					SW 98 AVE Northbound					WAYNE AVE Eastbound					
Start Time	Right	Thru	Left	Peds	App. Total	Right	Thru	Left	Peds	App. Total	Right	Thru	Left	Peds	App. Total	Right	Thru	Left	Peds	App. Total	Int. Total
04:00 PM	0	4	0	0	4	0	0	1	0	1	1	2	0	0	3	0	0	0	0	0	8
04:15 PM	0	6	1	0	7	1	0	1	0	2	2	2	0	0	4	0	0	0	0	0	13
04:30 PM	0	7	0	0	7	0	0	1	0	1	0	6	0	0	6	0	0	0	0	0	14
04:45 PM	0	5	1	0	6	0	0	1	0	1	1	2	0	0	3	0	0	0	0	0	10
Total	0	22	2	0	24	1	0	4	0	5	4	12	0	0	16	0	0	0	0	0	45
05:00 PM	0	5	0	0	5	1	0	1	0	2	1	5	0	0	6	0	0	0	0	0	13
05:15 PM	0	11	0	0	11	0	0	0	0	0	1	3	0	0	4	0	0	0	0	0	15
05:30 PM	0	3	0	0	3	0	0	0	0	0	0	2	0	0	2	0	0	0	0	0	5
05:45 PM	0	2	0	0	2	0	0	0	0	0	3	0	0	0	3	0	0	0	0	0	5
Total	0	21	0	0	21	1	0	1	0	2	5	10	0	0	15	0	0	0	0	0	38
Grand Total	0	43	2	0	45	2	0	5	0	7	9	22	0	0	31	0	0	0	0	0	83
Apprch %	0	95.6	4.4	0		28.6	0	71.4	0		29	71	0	0		0	0	0	0		
Total %	0	51.8	2.4	0	54.2	2.4	0	6	0	8.4	10.8	26.5	0	0	37.3	0	0	0	0	0	
Cars	0	43	2	0	45	2	0	5	0	7	9	21	0	0	30	0	0	0	0	0	82
% Cars	0	100	100	0	100	100	0	100	0	100	100	95.5	0	0	96.8	0	0	0	0	0	98.8
Trucks	0	0	0	0	0	0	0	0	0	0	0	1	0	0	1	0	0	0	0	0	1
% Trucks	0	0	0	0	0	0	0	0	0	0	0	4.5	0	0	3.2	0	0	0	0	0	1.2



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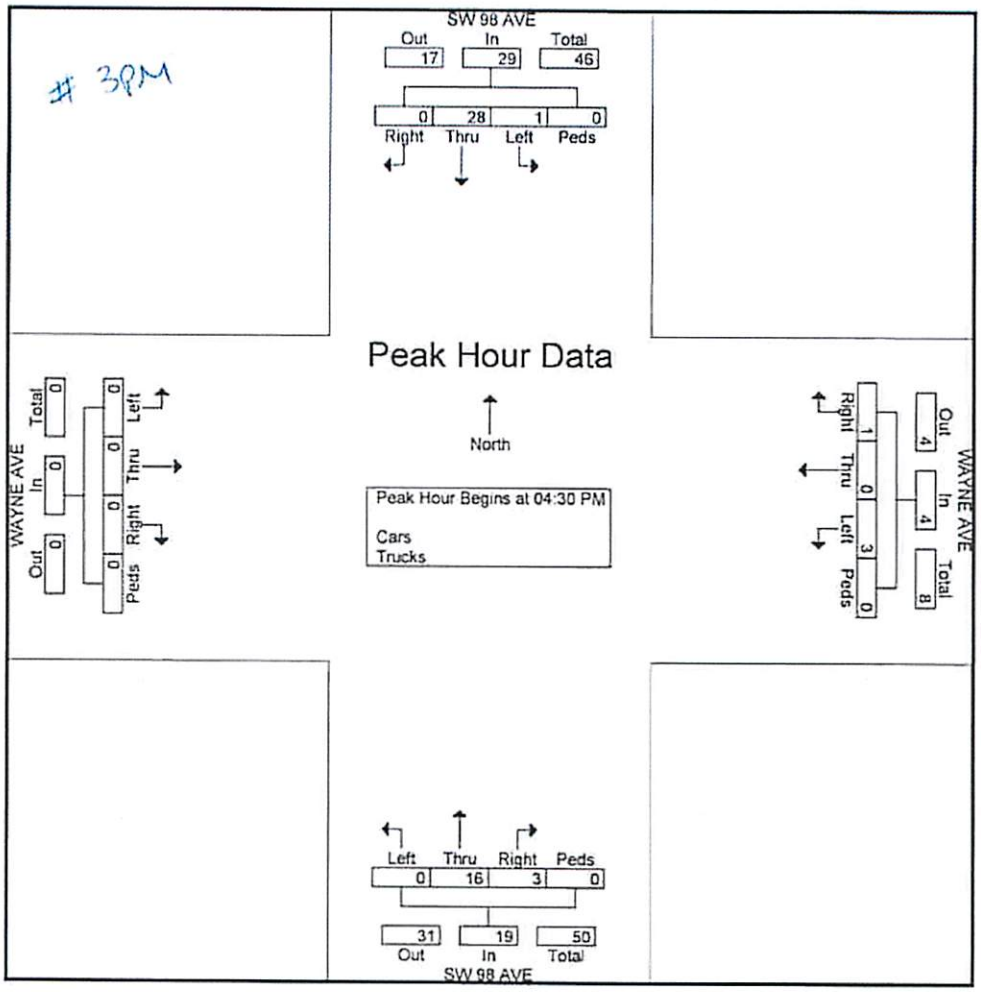
File Name : SW 98 Ave_Wayne Ave_PM
Site Code : 00000000
Start Date : 5/3/2016
Page No : 2

	SW 98 AVE Southbound					WAYNE AVE Westbound					SW 98 AVE Northbound					WAYNE AVE Eastbound					
Start Time	Right	Thru	Left	Peds	App Total	Right	Thru	Left	Peds	App Total	Right	Thru	Left	Peds	App Total	Right	Thru	Left	Peds	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	0	7	0	0	7	0	0	1	0	1	0	6	0	0	6	0	0	0	0	0	14
04:45 PM	0	5	1	0	6	0	0	1	0	1	1	2	0	0	3	0	0	0	0	0	10
05:00 PM	0	5	0	0	5	1	0	1	0	2	1	5	0	0	6	0	0	0	0	0	13
05:15 PM	0	11	0	0	11	0	0	0	0	0	1	3	0	0	4	0	0	0	0	0	15
Total Volume	0	28	1	0	29	1	0	3	0	4	3	16	0	0	19	0	0	0	0	0	52
% App Total	0	96.6	3.4	0		25	0	75	0		15.8	84.2	0	0		0	0	0	0		
PHF	.000	.636	.250	.000	.659	.250	.000	.750	.000	.500	.750	.667	.000	.000	.792	.000	.000	.000	.000	.000	.867



Appendix E: Level of Service (LOS) - Intersections & Project's Driveways

TABLE: A7

Level of Service (LOS) Summary - AM & PM Peak Hour

Project Name: Sandpiper Apartments

Existing Condition (2016)			AM Peak Hour					PM Peak Hour				
	Location	Intersection Control	Overall		* Critical Approach TWSC			Overall		* Critical Approach TWSC		
			LOS	Delay (sec)	Approach	LOS	Delay (sec)	LOS	Delay (sec)	Approach	LOS	Delay (sec)
1	SW 97 Avenue & SW 181 Terrace	Two-Way Stop	A	2.0	EB	C	16.6	A	0.6	WB	C	15.5
2	SW 181 Terrace & Wayne Avenue	SEB Yield	A	1.7	SEB	A	9.0	A	0.6	SEB	A	8.7
3	SW 98 Avenue & Wayne Avenue	Two-Way Stop	A	0.8	WB	A	9.1	A	0.8	WB	A	8.7
Proposed Future Condition (with Project Trips) (2019)			**AM Peak Hour**					**PM Peak Hour**				
	Location	Intersection Control	Overall		* Critical Approach TWSC			Overall		* Critical Approach TWSC		
			LOS	Delay (sec)	Approach	LOS	Delay (sec)	LOS	Delay (sec)	Approach	LOS	Delay (sec)
1	SW 97 Avenue & SW 181 Terrace	Two-Way Stop	A	2.9	EB	C	18.9	A	1.3	WB	C	18.3
2	SW 181 Terrace & Wayne Avenue	SEB Yield	A	3.8	SEB	A	9.3	A	2.6	SEB	A	9.0
3	SW 98 Avenue & Wayne Avenue	Two-Way Stop	A	2.0	WB	A	9.2	A	3.4	WB	A	8.9
4	Wayne Avenue & East Driveway (DW1)	Ingress Only	A	0.0	-	-	-	A	0.2	-	-	-
5	Wayne Avenue & West Driveway (DW2)	Two-Way Stop	A	5.8	SB	A	8.9	A	5.6	SB	A	9.0

Notes: * Critical Approach for TWSC.

Sandpiper Apartments

Existing Condition - AM Peak Hour

Intersection	
Int Delay, s/veh	2

Movement	EBL	EBT	EBR	WBL	WBT	WBR	NBL	NBT	NBR	SBL	SBT	SBR
Lane Configurations		↕			↕			↕			↕	
Traffic Vol, veh/h	23	12	11	9	11	22	12	528	6	3	147	4
Future Vol, veh/h	23	12	11	9	11	22	12	528	6	3	147	4
Conflicting Peds, #/hr	0	0	0	0	0	0	0	0	0	0	0	0
Sign Control	Stop	Stop	Stop	Stop	Stop	Stop	Free	Free	Free	Free	Free	Free
RT Channelized	-	-	None	-	-	None	-	-	None	-	-	None
Storage Length	-	-	-	-	-	-	-	-	-	-	-	-
Veh in Median Storage, #	-	0	-	-	0	-	-	0	-	-	0	-
Grade, %	-	0	-	-	0	-	-	0	-	-	0	-
Peak Hour Factor	94	94	94	94	94	94	94	94	94	94	94	94
Heavy Vehicles, %	2	2	2	2	2	2	2	2	2	2	2	2
Mvmt Flow	24	13	12	10	12	23	13	562	6	3	156	4

Major/Minor	Minor2			Minor1			Major1			Major2		
Conflicting Flow All	773	759	159	767	757	565	161	0	0	568	0	0
Stage 1	165	165	-	590	590	-	-	-	-	-	-	-
Stage 2	608	594	-	177	167	-	-	-	-	-	-	-
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	316	336	886	319	337	524	1418	-	-	1004	-	-
Stage 1	837	762	-	494	495	-	-	-	-	-	-	-
Stage 2	483	493	-	825	760	-	-	-	-	-	-	-
Platoon blocked, %								-	-		-	-
Mov Cap-1 Maneuver	290	331	886	302	332	524	1418	-	-	1004	-	-
Mov Cap-2 Maneuver	290	331	-	302	332	-	-	-	-	-	-	-
Stage 1	826	760	-	488	489	-	-	-	-	-	-	-
Stage 2	445	487	-	798	758	-	-	-	-	-	-	-

Approach	EB	WB	NB	SB
HCM Control Delay, s	16.6	15.1	0.2	0.2
HCM LOS	C	C		

Minor Lane/Major Mvmt	NBL	NBT	NBR	EBLn1	WBLn1	SBL	SBT	SBR
Capacity (veh/h)	1418	-	-	359	400	1004	-	-
HCM Lane V/C Ratio	0.009	-	-	0.136	0.112	0.003	-	-
HCM Control Delay (s)	7.6	0	-	16.6	15.1	8.6	0	-
HCM Lane LOS	A	A	-	C	C	A	A	-
HCM 95th %tile Q(veh)	0	-	-	0.5	0.4	0	-	-

Movement	EBL	EBT	WBT	WBR	SEL	SER
Lane Configurations						
Traffic Volume (veh/h)	0	37	19	7	15	0
Future Volume (Veh/h)	0	37	19	7	15	0
Sign Control		Free	Free		Yield	
Grade		0%	0%		0%	
Peak Hour Factor	0.75	0.75	0.75	0.75	0.75	0.75
Hourly flow rate (vph)	0	49	25	9	20	0
Pedestrians						
Lane Width (ft)						
Walking Speed (ft/s)						
Percent Blockage						
Right turn flare (veh)						
Median type		None	None			
Median storage veh)						
Upstream signal (ft)						
pX, platoon unblocked						
vC, conflicting volume	34				78	30
vC1, stage 1 conf vol						
vC2, stage 2 conf vol						
vCu, unblocked vol	34				78	30
tC, single (s)	4.1				6.4	6.2
tC, 2 stage (s)						
tF (s)	2.2				3.5	3.3
p0 queue free %	100				98	100
cM capacity (veh/h)	1578				924	1045

Direction, Lane #	EB 1	WB 1	SE 1
Volume Total	49	34	20
Volume Left	0	0	20
Volume Right	0	9	0
cSH	1578	1700	924
Volume to Capacity	0.00	0.02	0.02
Queue Length 95th (ft)	0	0	2
Control Delay (s)	0.0	0.0	9.0
Lane LOS			A
Approach Delay (s)	0.0	0.0	9.0
Approach LOS			A

Intersection Summary			
Average Delay	1.7		
Intersection Capacity Utilization	13.3%	ICU Level of Service	A
Analysis Period (min)	15		

Intersection	
Int Delay, s/veh	0.8

Movement	WBL	WBR	NBT	NBR	SBL	SBT
Lane Configurations						
Traffic Vol, veh/h	7	1	80	11	3	13
Future Vol, veh/h	7	1	80	11	3	13
Conflicting Peds, #/hr	0	0	0	0	0	0
Sign Control	Stop	Stop	Free	Free	Free	Free
RT Channelized	-	None	-	None	-	None
Storage Length	0	-	-	-	-	-
Veh in Median Storage, #	0	-	0	-	-	0
Grade, %	0	-	0	-	-	0
Peak Hour Factor	88	88	88	88	88	88
Heavy Vehicles, %	2	2	2	2	2	2
Mvmt Flow	8	1	91	13	3	15

Major/Minor	Minor1		Major1		Major2	
Conflicting Flow All	119	97	0	0	103	0
Stage 1	97	-	-	-	-	-
Stage 2	22	-	-	-	-	-
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	877	959	-	-	1489	-
Stage 1	927	-	-	-	-	-
Stage 2	1001	-	-	-	-	-
Platoon blocked, %			-	-		-
Mov Cap-1 Maneuver	875	959	-	-	1489	-
Mov Cap-2 Maneuver	875	-	-	-	-	-
Stage 1	927	-	-	-	-	-
Stage 2	999	-	-	-	-	-

Approach	WB	NB	SB
HCM Control Delay, s	9.1	0	1.4
HCM LOS	A		

Minor Lane/Major Mvmt	NBT	NBR	WBLn1	SBL	SBT
Capacity (veh/h)	-	-	885	1489	-
HCM Lane V/C Ratio	-	-	0.01	0.002	-
HCM Control Delay (s)	-	-	9.1	7.4	0
HCM Lane LOS	-	-	A	A	A
HCM 95th %tile Q(veh)	-	-	0	0	-

Palmetto Bay Village Center Apartments

Existing Condition - PM Peak Hour

Intersection	
Int Delay, s/veh	0.6

Movement	EBL	EBT	EBR	WBL	WBT	WBR	NBL	NBT	NBR	SBL	SBT	SBR
Lane Configurations		↕			↕			↕			↕	
Traffic Vol, veh/h	2	4	14	4	3	4	3	286	12	7	502	8
Future Vol, veh/h	2	4	14	4	3	4	3	286	12	7	502	8
Conflicting Peds, #/hr	0	0	0	0	0	0	0	0	0	0	0	0
Sign Control	Stop	Stop	Stop	Stop	Stop	Stop	Free	Free	Free	Free	Free	Free
RT Channelized	-	-	None	-	-	None	-	-	None	-	-	None
Storage Length	-	-	-	-	-	-	-	-	-	-	-	-
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	2	4	15	4	3	4	3	298	13	7	523	8

Major/Minor	Minor2			Minor1			Major1			Major2		
Conflicting Flow All	856	859	527	861	856	304	531	0	0	310	0	0
Stage 1	542	542	-	310	310	-	-	-	-	-	-	-
Stage 2	314	317	-	551	546	-	-	-	-	-	-	-
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	278	294	551	276	295	736	1036	-	-	1250	-	-
Stage 1	525	520	-	700	659	-	-	-	-	-	-	-
Stage 2	697	654	-	519	518	-	-	-	-	-	-	-
Platoon blocked, %								-	-		-	-
Mov Cap-1 Maneuver	272	290	551	263	291	736	1036	-	-	1250	-	-
Mov Cap-2 Maneuver	272	290	-	263	291	-	-	-	-	-	-	-
Stage 1	523	516	-	697	656	-	-	-	-	-	-	-
Stage 2	687	651	-	497	514	-	-	-	-	-	-	-

Approach	EB	WB	NB	SB
HCM Control Delay, s	13.8	15.5	0.1	0.1
HCM LOS	B	C		

Minor Lane/Major Mvmt	NBL	NBT	NBR	EBLn1	WBLn1	SBL	SBT	SBR
Capacity (veh/h)	1036	-	-	430	355	1250	-	-
HCM Lane V/C Ratio	0.003	-	-	0.048	0.032	0.006	-	-
HCM Control Delay (s)	8.5	0	-	13.8	15.5	7.9	0	-
HCM Lane LOS	A	A	-	B	C	A	A	-
HCM 95th %tile Q(veh)	0	-	-	0.2	0.1	0	-	-

Movement	EBL	EBT	WBT	WBR	SEL	SER
Lane Configurations						
Traffic Volume (veh/h)	0	20	9	3	2	0
Future Volume (Veh/h)	0	20	9	3	2	0
Sign Control		Free	Free		Yield	
Grade		0%	0%		0%	
Peak Hour Factor	0.77	0.77	0.77	0.77	0.77	0.77
Hourly flow rate (vph)	0	26	12	4	3	0
Pedestrians						
Lane Width (ft)						
Walking Speed (ft/s)						
Percent Blockage						
Right turn flare (veh)						
Median type		None	None			
Median storage veh)						
Upstream signal (ft)						
pX, platoon unblocked						
vC, conflicting volume	16				40	14
vC1, stage 1 conf vol						
vC2, stage 2 conf vol						
vCu, unblocked vol	16				40	14
tC, single (s)	4.1				6.4	6.2
tC, 2 stage (s)						
tF (s)	2.2				3.5	3.3
p0 queue free %	100				100	100
cM capacity (veh/h)	1602				972	1066

Direction, Lane #	EB 1	WB 1	SE 1
Volume Total	26	16	3
Volume Left	0	0	3
Volume Right	0	4	0
cSH	1602	1700	972
Volume to Capacity	0.00	0.01	0.00
Queue Length 95th (ft)	0	0	0
Control Delay (s)	0.0	0.0	8.7
Lane LOS			A
Approach Delay (s)	0.0	0.0	8.7
Approach LOS			A

Intersection Summary			
Average Delay	0.6		
Intersection Capacity Utilization	13.3%	ICU Level of Service	A
Analysis Period (min)	15		

Intersection	
Int Delay, s/veh	0.8

Movement	WBL	WBR	NBT	NBR	SBL	SBT
Lane Configurations						
Traffic Vol, veh/h	3	1	16	3	1	28
Future Vol, veh/h	3	1	16	3	1	28
Conflicting Peds, #/hr	0	0	0	0	0	0
Sign Control	Stop	Stop	Free	Free	Free	Free
RT Channelized	-	None	-	None	-	None
Storage Length	0	-	-	-	-	-
Veh in Median Storage, #	0	-	0	-	-	0
Grade, %	0	-	0	-	-	0
Peak Hour Factor	88	88	88	88	88	88
Heavy Vehicles, %	2	2	2	2	2	2
Mvmt Flow	3	1	18	3	1	32

Major/Minor	Minor1		Major1		Major2	
Conflicting Flow All	54	20	0	0	22	0
Stage 1	20	-	-	-	-	-
Stage 2	34	-	-	-	-	-
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	954	1058	-	-	1593	-
Stage 1	1003	-	-	-	-	-
Stage 2	988	-	-	-	-	-
Platoon blocked, %			-	-		-
Mov Cap-1 Maneuver	953	1058	-	-	1593	-
Mov Cap-2 Maneuver	953	-	-	-	-	-
Stage 1	1003	-	-	-	-	-
Stage 2	987	-	-	-	-	-

Approach	WB	NB	SB
HCM Control Delay, s	8.7	0	0.3
HCM LOS	A		

Minor Lane/Major Mvmt	NBT	NBR	WBLn1	SBL	SBT
Capacity (veh/h)	-	-	977	1593	-
HCM Lane V/C Ratio	-	-	0.005	0.001	-
HCM Control Delay (s)	-	-	8.7	7.3	0
HCM Lane LOS	-	-	A	A	A
HCM 95th %tile Q(veh)	-	-	0	0	-

Sandpiper Apartments

Proposed Future Condition w/Project - AM Peak Hour

Intersection	
Int Delay, s/veh	2.9

Movement	EBL	EBT	EBR	WBL	WBT	WBR	NBL	NBT	NBR	SBL	SBT	SBR
Lane Configurations		↕			↕			↕			↕	
Traffic Vol, veh/h	42	16	29	9	13	23	19	560	6	3	155	9
Future Vol, veh/h	42	16	29	9	13	23	19	560	6	3	155	9
Conflicting Peds, #/hr	0	0	0	0	0	0	0	0	0	0	0	0
Sign Control	Stop	Stop	Stop	Stop	Stop	Stop	Free	Free	Free	Free	Free	Free
RT Channelized	-	-	None	-	-	None	-	-	None	-	-	None
Storage Length	-	-	-	-	-	-	-	-	-	-	-	-
Veh in Median Storage, #	-	0	-	-	0	-	-	0	-	-	0	-
Grade, %	-	0	-	-	0	-	-	0	-	-	0	-
Peak Hour Factor	94	94	94	94	94	94	94	94	94	94	94	94
Heavy Vehicles, %	2	2	2	2	2	2	2	2	2	2	2	2
Mvmt Flow	45	17	31	10	14	24	20	596	6	3	165	10

Major/Minor	Minor2			Minor1			Major1			Major2		
Conflicting Flow All	835	819	170	839	820	599	174	0	0	602	0	0
Stage 1	176	176	-	639	639	-	-	-	-	-	-	-
Stage 2	659	643	-	200	181	-	-	-	-	-	-	-
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	287	310	874	285	310	502	1403	-	-	975	-	-
Stage 1	826	753	-	464	470	-	-	-	-	-	-	-
Stage 2	453	468	-	802	750	-	-	-	-	-	-	-
Platoon blocked, %								-	-		-	-
Mov Cap-1 Maneuver	259	303	874	258	303	502	1403	-	-	975	-	-
Mov Cap-2 Maneuver	259	303	-	258	303	-	-	-	-	-	-	-
Stage 1	809	751	-	454	460	-	-	-	-	-	-	-
Stage 2	409	458	-	754	748	-	-	-	-	-	-	-

Approach	EB	WB	NB	SB
HCM Control Delay, s	18.9	16.4	0.2	0.2
HCM LOS	C	C		

Minor Lane/Major Mvmt	NBL	NBT	NBR	EBLn1	WBLn1	SBL	SBT	SBR
Capacity (veh/h)	1403	-	-	351	364	975	-	-
HCM Lane V/C Ratio	0.014	-	-	0.264	0.132	0.003	-	-
HCM Control Delay (s)	7.6	0	-	18.9	16.4	8.7	0	-
HCM Lane LOS	A	A	-	C	C	A	A	-
HCM 95th %tile Q(veh)	0	-	-	1	0.4	0	-	-

Movement	EBL	EBT	WBT	WBR	SEL	SER
Lane Configurations						
Traffic Volume (veh/h)	0	39	20	19	54	0
Future Volume (Veh/h)	0	39	20	19	54	0
Sign Control		Free	Free		Yield	
Grade		0%	0%		0%	
Peak Hour Factor	0.75	0.75	0.75	0.75	0.75	0.75
Hourly flow rate (vph)	0	52	27	25	72	0
Pedestrians						
Lane Width (ft)						
Walking Speed (ft/s)						
Percent Blockage						
Right turn flare (veh)						
Median type		None	None			
Median storage veh)						
Upstream signal (ft)						
pX, platoon unblocked						
vC, conflicting volume	52				92	40
vC1, stage 1 conf vol						
vC2, stage 2 conf vol						
vCu, unblocked vol	52				92	40
tC, single (s)	4.1				6.4	6.2
tC, 2 stage (s)						
tF (s)	2.2				3.5	3.3
p0 queue free %	100				92	100
cM capacity (veh/h)	1554				909	1032

Direction, Lane #	EB 1	WB 1	SE 1
Volume Total	52	52	72
Volume Left	0	0	72
Volume Right	0	25	0
cSH	1554	1700	909
Volume to Capacity	0.00	0.03	0.08
Queue Length 95th (ft)	0	0	6
Control Delay (s)	0.0	0.0	9.3
Lane LOS			A
Approach Delay (s)	0.0	0.0	9.3
Approach LOS			A

Intersection Summary			
Average Delay	3.8		
Intersection Capacity Utilization	13.3%	ICU Level of Service	A
Analysis Period (min)	15		

Intersection	
Int Delay, s/veh	2

Movement	WBL	WBR	NBT	NBR	SBL	SBT
Lane Configurations						
Traffic Vol, veh/h	18	10	85	16	5	14
Future Vol, veh/h	18	10	85	16	5	14
Conflicting Peds, #/hr	0	0	0	0	0	0
Sign Control	Stop	Stop	Free	Free	Free	Free
RT Channelized	-	None	-	None	-	None
Storage Length	0	-	-	-	-	-
Veh in Median Storage, #	0	-	0	-	-	0
Grade, %	0	-	0	-	-	0
Peak Hour Factor	88	88	88	88	88	88
Heavy Vehicles, %	2	2	2	2	2	2
Mvmt Flow	20	11	97	18	6	16

Major/Minor	Minor1		Major1		Major2	
Conflicting Flow All	133	106	0	0	115	0
Stage 1	106	-	-	-	-	-
Stage 2	27	-	-	-	-	-
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	861	948	-	-	1474	-
Stage 1	918	-	-	-	-	-
Stage 2	996	-	-	-	-	-
Platoon blocked, %			-	-		-
Mov Cap-1 Maneuver	858	948	-	-	1474	-
Mov Cap-2 Maneuver	858	-	-	-	-	-
Stage 1	918	-	-	-	-	-
Stage 2	992	-	-	-	-	-

Approach	WB	NB	SB
HCM Control Delay, s	9.2	0	2
HCM LOS	A		

Minor Lane/Major Mvmt	NBT	NBR	WBLn1	SBL	SBT
Capacity (veh/h)	-	-	888	1474	-
HCM Lane V/C Ratio	-	-	0.036	0.004	-
HCM Control Delay (s)	-	-	9.2	7.5	0
HCM Lane LOS	-	-	A	A	A
HCM 95th %tile Q(veh)	-	-	0.1	0	-

Movement	EBL	EBT	WBT	WBR	SBL	SBR
Lane Configurations						
Traffic Volume (veh/h)	0	54	16	3	0	0
Future Volume (Veh/h)	0	54	16	3	0	0
Sign Control		Free	Free		Stop	
Grade		0%	0%		0%	
Peak Hour Factor	0.92	0.92	0.92	0.92	0.92	0.92
Hourly flow rate (vph)	0	59	17	3	0	0
Pedestrians						
Lane Width (ft)						
Walking Speed (ft/s)						
Percent Blockage						
Right turn flare (veh)						
Median type		None	None			
Median storage veh)						
Upstream signal (ft)						
pX, platoon unblocked						
vC, conflicting volume	20				78	18
vC1, stage 1 conf vol						
vC2, stage 2 conf vol						
vCu, unblocked vol	20				78	18
tC, single (s)	4.1				6.4	6.2
tC, 2 stage (s)						
tF (s)	2.2				3.5	3.3
p0 queue free %	100				100	100
cM capacity (veh/h)	1596				925	1060

Direction, Lane #	EB 1	WB 1
Volume Total	59	20
Volume Left	0	0
Volume Right	0	3
cSH	1596	1700
Volume to Capacity	0.00	0.01
Queue Length 95th (ft)	0	0
Control Delay (s)	0.0	0.0
Lane LOS		
Approach Delay (s)	0.0	0.0
Approach LOS		

Intersection Summary			
Average Delay	0.0		
Intersection Capacity Utilization	6.7%	ICU Level of Service	A
Analysis Period (min)	15		

Intersection	
Int Delay, s/veh	5.8

Movement	EBL	EBT	WBT	WBR	SBL	SBR
Lane Configurations		↰	↑		Y	
Traffic Vol, veh/h	6	16	7	9	38	20
Future Vol, veh/h	6	16	7	9	38	20
Conflicting Peds, #/hr	0	0	0	0	0	0
Sign Control	Free	Free	Free	Free	Stop	Stop
RT Channelized	-	None	-	None	-	None
Storage Length	-	-	-	-	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	7	17	8	10	41	22

Major/Minor	Major1		Major2		Minor2	
Conflicting Flow All	17	0	-	0	43	13
Stage 1	-	-	-	-	13	-
Stage 2	-	-	-	-	30	-
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	1600	-	-	-	968	1067
Stage 1	-	-	-	-	1010	-
Stage 2	-	-	-	-	993	-
Platoon blocked, %		-	-	-		
Mov Cap-1 Maneuver	1600	-	-	-	964	1067
Mov Cap-2 Maneuver	-	-	-	-	964	-
Stage 1	-	-	-	-	1010	-
Stage 2	-	-	-	-	989	-

Approach	EB	WB	SB
HCM Control Delay, s	2	0	8.9
HCM LOS			A

Minor Lane/Major Mvmt	EBL	EBT	WBT	WBR	SBLn1
Capacity (veh/h)	1600	-	-	-	997
HCM Lane V/C Ratio	0.004	-	-	-	0.063
HCM Control Delay (s)	7.3	0	-	-	8.9
HCM Lane LOS	A	A	-	-	A
HCM 95th %tile Q(veh)	0	-	-	-	0.2

Sandpiper Apartments

Proposed Future Condition w/Project - PM Peak Hour

Intersection	
Int Delay, s/veh	1.3

Movement	EBL	EBT	EBR	WBL	WBT	WBR	NBL	NBT	NBR	SBL	SBT	SBR
Lane Configurations		↕			↕			↕			↕	
Traffic Vol, veh/h	14	7	25	4	7	4	17	304	13	7	533	25
Future Vol, veh/h	14	7	25	4	7	4	17	304	13	7	533	25
Conflicting Peds, #/hr	0	0	0	0	0	0	0	0	0	0	0	0
Sign Control	Stop	Stop	Stop	Stop	Stop	Stop	Free	Free	Free	Free	Free	Free
RT Channelized	-	-	None	-	-	None	-	-	None	-	-	None
Storage Length	-	-	-	-	-	-	-	-	-	-	-	-
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	15	7	26	4	7	4	18	317	14	7	555	26

Major/Minor	Minor2			Minor1			Major1			Major2		
Conflicting Flow All	948	949	568	958	955	323	581	0	0	330	0	0
Stage 1	583	583	-	359	359	-	-	-	-	-	-	-
Stage 2	365	366	-	599	596	-	-	-	-	-	-	-
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	241	260	522	237	258	718	993	-	-	1229	-	-
Stage 1	498	499	-	659	627	-	-	-	-	-	-	-
Stage 2	654	623	-	488	492	-	-	-	-	-	-	-
Platoon blocked, %								-	-		-	-
Mov Cap-1 Maneuver	229	252	522	215	250	718	993	-	-	1229	-	-
Mov Cap-2 Maneuver	229	252	-	215	250	-	-	-	-	-	-	-
Stage 1	487	495	-	645	613	-	-	-	-	-	-	-
Stage 2	628	609	-	453	488	-	-	-	-	-	-	-

Approach	EB	WB	NB	SB
HCM Control Delay, s	17.5	18.3	0.4	0.1
HCM LOS	C	C		

Minor Lane/Major Mvmt	NBL	NBT	NBR	EBLn1	WBLn1	SBL	SBT	SBR
Capacity (veh/h)	993	-	-	336	287	1229	-	-
HCM Lane V/C Ratio	0.018	-	-	0.143	0.054	0.006	-	-
HCM Control Delay (s)	8.7	0	-	17.5	18.3	7.9	0	-
HCM Lane LOS	A	A	-	C	C	A	A	-
HCM 95th %tile Q(veh)	0.1	-	-	0.5	0.2	0	-	-

Movement	EBL	EBT	WBT	WBR	SEL	SER
Lane Configurations						
Traffic Volume (veh/h)	0	21	9	38	27	0
Future Volume (Veh/h)	0	21	9	38	27	0
Sign Control		Free	Free		Yield	
Grade		0%	0%		0%	
Peak Hour Factor	0.77	0.77	0.77	0.77	0.77	0.77
Hourly flow rate (vph)	0	27	12	49	35	0
Pedestrians						
Lane Width (ft)						
Walking Speed (ft/s)						
Percent Blockage						
Right turn flare (veh)						
Median type		None	None			
Median storage veh)						
Upstream signal (ft)						
pX, platoon unblocked						
vC, conflicting volume	61				64	36
vC1, stage 1 conf vol						
vC2, stage 2 conf vol						
vCu, unblocked vol	61				64	36
tC, single (s)	4.1				6.4	6.2
tC, 2 stage (s)						
tF (s)	2.2				3.5	3.3
p0 queue free %	100				96	100
cM capacity (veh/h)	1542				942	1036

Direction, Lane #	EB 1	WB 1	SE 1
Volume Total	27	61	35
Volume Left	0	0	35
Volume Right	0	49	0
cSH	1542	1700	942
Volume to Capacity	0.00	0.04	0.04
Queue Length 95th (ft)	0	0	3
Control Delay (s)	0.0	0.0	9.0
Lane LOS			A
Approach Delay (s)	0.0	0.0	9.0
Approach LOS			A

Intersection Summary			
Average Delay	2.6		
Intersection Capacity Utilization	13.3%	ICU Level of Service	A
Analysis Period (min)	15		

Intersection	
Int Delay, s/veh	3.4

Movement	WBL	WBR	NBT	NBR	SBL	SBT
Lane Configurations						
Traffic Vol, veh/h	14	13	17	19	19	29
Future Vol, veh/h	14	13	17	19	19	29
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	87	87	87	87	87	87
Heavy Vehicles, %	2	2	2	2	2	2
Mvmt Flow	16	15	20	22	22	33

Major/Minor	Minor1		Major1		Major2	
Conflicting Flow All	107	30	0	0	41	0
Stage 1	30	-	-	-	-	-
Stage 2	77	-	-	-	-	-
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	891	1044	-	-	1568	-
Stage 1	993	-	-	-	-	-
Stage 2	946	-	-	-	-	-
Platoon blocked, %			-	-		-
Mov Cap-1 Maneuver	879	1044	-	-	1568	-
Mov Cap-2 Maneuver	879	-	-	-	-	-
Stage 1	993	-	-	-	-	-
Stage 2	933	-	-	-	-	-

Approach	WB	NB	SB
HCM Control Delay, s	8.9	0	2.9
HCM LOS	A		

Minor Lane/Major Mvmt	NBT	NBR	WBLn1	SBL	SBT
Capacity (veh/h)	-	-	951	1568	-
HCM Lane V/C Ratio	-	-	0.033	0.014	-
HCM Control Delay (s)	-	-	8.9	7.3	0
HCM Lane LOS	-	-	A	A	A
HCM 95th %tile Q(veh)	-	-	0.1	0	-

Movement	EBL	EBT	WBT	WBR	SBL	SBR
Lane Configurations						
Traffic Volume (veh/h)	2	27	35	3	0	0
Future Volume (Veh/h)	2	27	35	3	0	0
Sign Control		Free	Free		Stop	
Grade		0%	0%		0%	
Peak Hour Factor	0.92	0.92	0.92	0.92	0.92	0.92
Hourly flow rate (vph)	2	29	38	3	0	0
Pedestrians						
Lane Width (ft)						
Walking Speed (ft/s)						
Percent Blockage						
Right turn flare (veh)						
Median type		None	None			
Median storage veh)						
Upstream signal (ft)						
pX, platoon unblocked						
vC, conflicting volume	41				72	40
vC1, stage 1 conf vol						
vC2, stage 2 conf vol						
vCu, unblocked vol	41				72	40
tC, single (s)	4.1				6.4	6.2
tC, 2 stage (s)						
tF (s)	2.2				3.5	3.3
p0 queue free %	100				100	100
cM capacity (veh/h)	1568				930	1032

Direction, Lane #	EB 1	WB 1
Volume Total	31	41
Volume Left	2	0
Volume Right	0	3
cSH	1568	1700
Volume to Capacity	0.00	0.02
Queue Length 95th (ft)	0	0
Control Delay (s)	0.5	0.0
Lane LOS	A	
Approach Delay (s)	0.5	0.0
Approach LOS		

Intersection Summary				
Average Delay	0.2			
Intersection Capacity Utilization	6.7%	ICU Level of Service	A	
Analysis Period (min)	15			

Intersection	
Int Delay, s/veh	5.6

Movement	EBL	EBT	WBT	WBR	SBL	SBR
Lane Configurations		↰	↑		Y	
Traffic Vol, veh/h	32	4	3	32	25	23
Future Vol, veh/h	32	4	3	32	25	23
Conflicting Peds, #/hr	0	0	0	0	0	0
Sign Control	Free	Free	Free	Free	Stop	Stop
RT Channelized	-	None	-	None	-	None
Storage Length	-	-	-	-	0	-
Veh in Median Storage, #	-	0	0	-	0	-
Grade, %	-	0	0	-	0	-
Peak Hour Factor	92	92	92	92	92	92
Heavy Vehicles, %	2	2	2	2	2	2
Mvmt Flow	35	4	3	35	27	25

Major/Minor	Major1		Major2		Minor2	
Conflicting Flow All	38	0	-	0	95	21
Stage 1	-	-	-	-	21	-
Stage 2	-	-	-	-	74	-
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	1572	-	-	-	905	1056
Stage 1	-	-	-	-	1002	-
Stage 2	-	-	-	-	949	-
Platoon blocked, %		-	-	-		
Mov Cap-1 Maneuver	1572	-	-	-	885	1056
Mov Cap-2 Maneuver	-	-	-	-	885	-
Stage 1	-	-	-	-	1002	-
Stage 2	-	-	-	-	928	-

Approach	EB	WB	SB
HCM Control Delay, s	6.5	0	9
HCM LOS			A

Minor Lane/Major Mvmt	EBL	EBT	WBT	WBR	SBLn1
Capacity (veh/h)	1572	-	-	-	959
HCM Lane V/C Ratio	0.022	-	-	-	0.054
HCM Control Delay (s)	7.3	0	-	-	9
HCM Lane LOS	A	A	-	-	A
HCM 95th %tile Q(veh)	0.1	-	-	-	0.2