

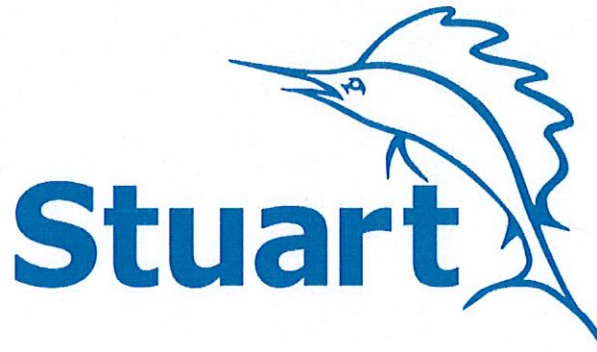
# SPORTFISH MARINA RESORT

Project No. 1992

CITY OF STUART, FLORIDA

## TRAFFIC STATEMENT

Prepared for:



By

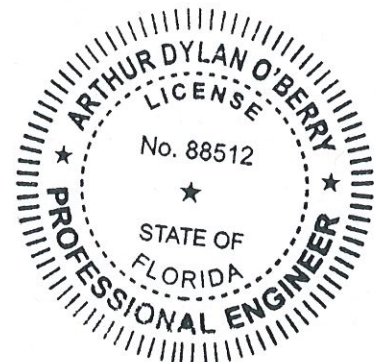



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12/9/2020

## Traffic Statement

### Introduction

The **Sportfish Marina Resort** project is located at 304 NW Flagler Avenue located within the City of Stuart in Martin County, Florida. CAPTEC Engineering, Inc. CAPTEC Engineering, Inc., has prepared this traffic statement to determine the impact associated with this project. The **37-Room Resort** will primarily be used as a luxury style resort. The preliminary plans depict three levels of resort hotel and two levels of parking garage.



### Trip Generation

The AM peak-hour and PM peak hour trips for this site were derived from the Institute of Transportation Engineers (ITE) Trip Generation 10<sup>th</sup> Edition Manual (ITE Land Use Code 330). The **Sportfish Marina Resort** is expected to generate the following peak hour trips:

#### AM Peak Hour of Adjacent Street

##### Calculated Trip Ends:

Average Rate: 12 (Total), 9 (Entry), 3 (Exit)

Fitted Curve: Not Available

#### PM Peak Hour of Adjacent Street

##### Calculated Trip Ends:

Average Rate: 15 (Total), 6 (Entry), 9 (Exit)

Fitted Curve: Not Available

## **Results**

The adjacent roadway, NW Flagler Avenue, ultimately lets out onto NW Dixie Highway. The current condition of NW Dixie Highway is Level of Service "C". The peak hour service capacity is 750 with a current PM Peak Volume of 235. The greatest peak hour peak direction impact is **1.20% (9/750)** which is below the 5.00% threshold set forth by the City of Stuart Land Development Code 4.05.02.

## **Conclusion**

This report has found that the proposed project provides sufficient traffic facilities which satisfy the requirements for LOS, volumes, impacts, traffic study and circulation analysis set forth by the City Code and requests traffic concurrency be issued for the project.

## Appendix

### Land Use: 330 Resort Hotel

#### Description

A resort hotel is similar to a hotel (Land Use 310) in that it provides sleeping accommodations, restaurants, cocktail lounges, retail shops, and guest services. The primary difference is that a resort hotel caters to the tourist and vacation industry, often providing a wide variety of recreational facilities/programs (golf courses, tennis courts, beach access, or other amenities) rather than convention and meeting business. Hotel (Land Use 310), all suites hotel (Land Use 311), business hotel (Land Use 312), and motel (Land Use 320) are related uses.

#### Additional Data

Nine studies provided information on room occupancy at the time of data collection. The average occupancy rate for these sites was approximately 88 percent.

Some properties contained in this land use provide guest transportation services such as airport shuttles, limousine service, or golf course shuttle service, which may have an impact on the overall trip generation rates.

The sites were surveyed in the 1980s and the 1990s in California, Florida, and South Carolina.

***For all lodging uses, it is important to collect data on occupied rooms as well as total rooms in order to accurately predict trip generation characteristics for the site.***

#### Source Numbers

270, 381, 436

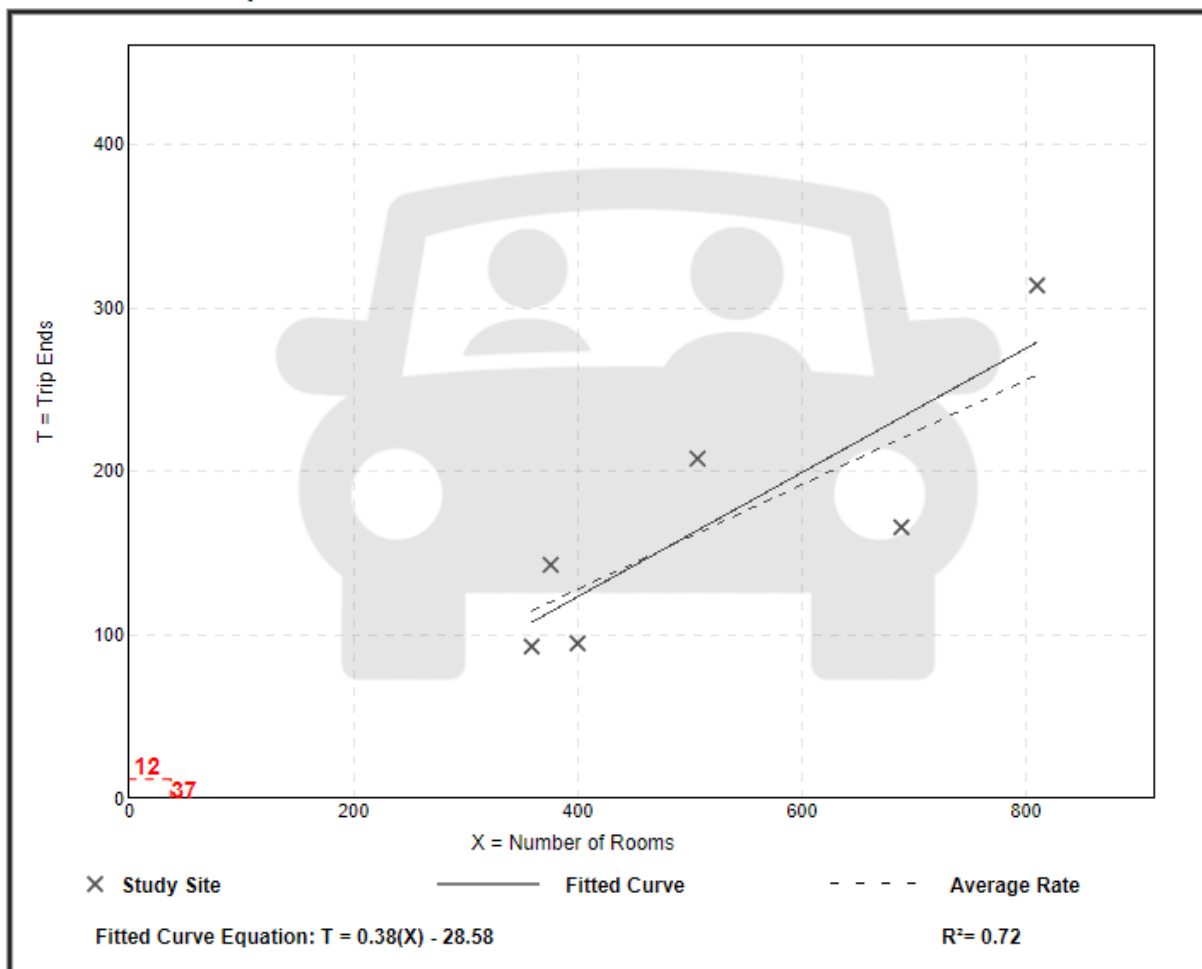
## Resort Hotel (330)

Vehicle Trip Ends vs: Rooms  
On a: Weekday,  
Peak Hour of Adjacent Street Traffic,  
One Hour Between 7 and 9 a.m.  
Setting/Location: General Urban/Suburban  
Number of Studies: 6  
Avg. Num. of Rooms: 524  
Directional Distribution: 72% entering, 28% exiting

### Vehicle Trip Generation per Room

Average Rate	Range of Rates	Standard Deviation
0.32	0.24 - 0.41	0.08

### Data Plot and Equation



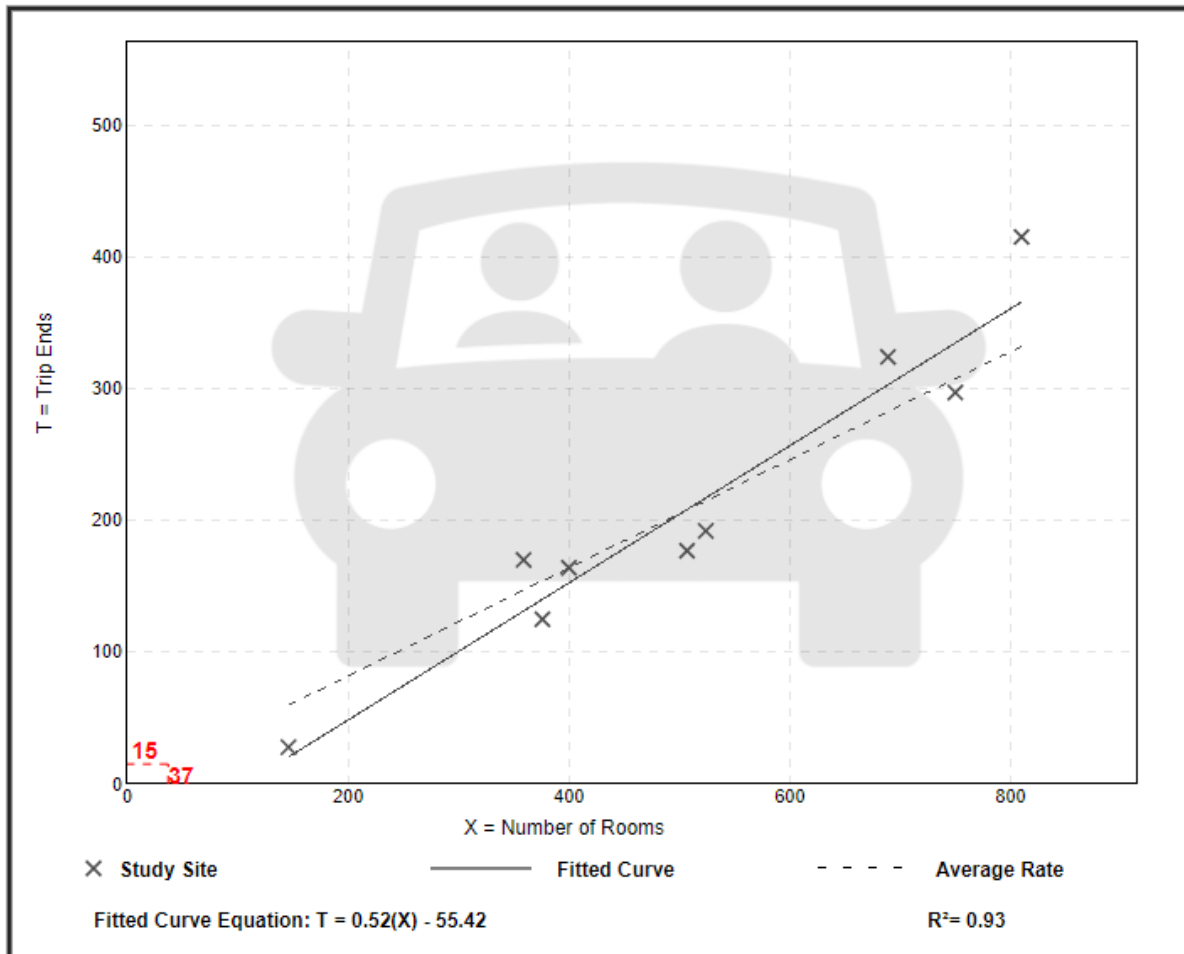
## Resort Hotel (330)

Vehicle Trip Ends vs: Rooms  
 On a: Weekday,  
 Peak Hour of Adjacent Street Traffic,  
 One Hour Between 4 and 6 p.m.  
 Setting/Location: General Urban/Suburban  
 Number of Studies: 9  
 Avg. Num. of Rooms: 507  
 Directional Distribution: 43% entering, 57% exiting

### Vehicle Trip Generation per Room

Average Rate	Range of Rates	Standard Deviation
0.41	0.19 - 0.51	0.08

### Data Plot and Equation



## Martin County 2019 Roadway Level of Service Inventory Report

Road Name	From	To	Type	Generalized Service Capacity	2019 Average Annual Daily Traffic	2019 Peak Hour Directional Volume	2019 Generalized LOS	Avg. Annual Growth Rate
Baker Rd	SR-5	CR-723	Class II: 2-Ln Undivided	750	5,349	243	C	1.8%
Berry Ave	Golden Bear Wy	CR-714	Class II: 2-Ln Undivided	750	3,487	177	C	1.3%
Berry Ave	CR-714	Sunset Tr	Class II: 2-Ln Undivided	750	1,809	97	C	0.5%
Britt Rd	Pine Lake Dr	SR-5	Class II: 2-Ln Undivided	750	4,565	212	C	0.6%
Citrus Blvd.	CR-714 (Martin Hwy)	Port St. Lucie Blvd.	Transitional 2-Ln Uninter /Undivided Flow	1200	5,391	469	C	7.0%
Commerce Ave	Salerno Rd	Monroe St	Class II: 2-Ln Undivided	750	6,156	393	D	3.1%
Commerce Ave	Monroe St	Indian St	Class II: 2-Ln Undivided	750	6,704	366	C	0.7%
Country Club Dr	Palm Beach County	Island Way	Class II: 2-Ln Undivided	750	2,827	134	C	0.5%
Country Club Dr	Island Way	Little Club Dr	Class II: 2-Ln Undivided	750	3,512	159	C	1.9%
County Line Rd	Little Club Dr	SR-5	Class II: 2-Ln Undivided	750	2,703	124	C	2.9%
Cove Rd	SR-76	Willoughby Blvd	Class I: 2-Ln Undivided	880	13,855	749	C	1.5%
Cove Rd	Willoughby Blvd	SR-5	Class I: 2-Ln Undivided	880	15,446	699	C	0.9%
Cove Rd	SR-5	CR-A1A	Class II: 2-Ln Undivided	750	13,161	586	D	2.5%
Cove Rd	CR-A1A	End	2-Ln Undivided Non- State	675	5,739	322	C	1.7%
CR-609 (Allapattah Rd)	SR-710	CR-714	Uninterrupted Rural Hwy: 2-Ln Undivided	740	1,892	109	A/B	3.5%
CR-609 (Allapattah Rd)	CR-714	St Lucie County	Uninterrupted Rural Hwy: 2-Ln Undivided	740	1,786	88	A/B	2.9%
CR-707 (Beach Rd)	Palm Beach County	CR-708	2-Ln Undivided Non- State	675	1,782	116	C	1.4%
<b>CR-707 (Dixie Hwy)</b>	<b>CR-723CR-707</b>	<b>CR-707 (Indian River Dr)</b>	<b>Class II: 2-Ln Undivided</b>	<b>750</b>	<b>5,383</b>	<b>235</b>	<b>C</b>	<b>0.8%</b>
CR-707 (Indian River Dr)	CR-707 (Dixie Hwy)	CR-707A (Jensen Beach Blvd.)	2-Ln Undivided Non- State	675	10,521	601	D	0.5%
CR-707 (Indian River Dr)	CR-707A	SR-732	Class II: 2-Ln Undivided	750	6,007	336	C	8.0%
CR-707 (Indian River Dr)	SR-732	St. Lucie County	2-Ln Undivided Non- State	675	6,615	351	D	8.0%

Segments with shaded LOS require additional analysis.  
The peaks are: CR-A1A (PM/5B) and Murphy Rd (PM/INB).