

October 11, 2022

Mr. Peter Carlson
CARLSON STRATEGIC LAND SOLUTIONS
27134A Paseo Espada, Suite 323
San Juan Capistrano, CA 92675

**Subject: 901 E. Katella Avenue In-Fill Residential Project (TTM 19253) Trip
Generation Analysis, City of Orange, CA**

Dear Mr. Carlson:

Introduction

RK ENGINEERING GROUP, INC. (RK) is pleased to provide this Trip Generation Analysis for the proposed 901 E. Katella Avenue In-Fill Residential Project (TTM 19253).

The purpose of this study is to utilize the *City of Orange Traffic Impact Analysis Guidelines for Vehicle Miles Traveled and Level of Service Assessment*, dated July 2020, which establishes uniform analysis methodology and thresholds of significance for determining LOS as well as VMT impacts under the California Environmental Quality Act (CEQA), to determine if the project will require a detailed level of service (LOS) analysis.

Project Description

The project site is located at 901 E. Katella Avenue in the City of Orange. The project site is currently developed with a vacant AT&T call center. The proposed project consists of razing the existing vacant AT&T call center and constructing fifty-two (52) paired and detached townhomes. The project proposes 108 covered spaces and 11 uncovered spaces for a total of 119 parking spaces.

The site has the following Assessor's Parcel Number (APN): 375-461-41. The project site's current Land Use is General Commercial and is currently zoned as Commercial Professional (C-P); the project site's proposed land use is Medium Density Residential and is proposed to be zoned as Multiple-Family Residential (R-3).

Access to the project is proposed via one (1) full-access unsignalized driveway located along N. Cambridge Street and via one (1) right-in/right-out only unsignalized driveway located along E. Katella Avenue.

Exhibit A shows the location map of the proposed project. Exhibit B shows the proposed site plan.

Project Trip Generation

Trip generation represents the amount of traffic that is attracted and produced by a development.

Trip generation is typically estimated based on the trip generation rates from the latest *Institute of Transportation Engineers (ITE) Trip Generation Manual*. The latest and most recent version (11th Edition, 2021) of the ITE Manual has been utilized for this trip generation analysis. This publication provides a comprehensive evaluation of trip generation rates for a variety of land uses.

The proposed project consists of fifty-two (52) paired and detached townhomes. As such, ITE Land Use 215: Attached Single-Family Attached Housing rates are the most appropriate for this land use.

Table 1 shows the ITE trip generation rates (11th Edition) utilized for the trip generation analysis of the proposed project land use.

Table 1
ITE Trip Generation Rates¹

Land Use	ITE Code	Units ²	Peak Hour						ADT
			AM			PM			
			In	Out	Total	In	Out	Total	
Single-Family Attached Housing	215	DU	31%	69%	0.48	57%	43%	0.57	7.20

¹ Source: 2021 ITE Trip Generation Manual (11th Edition)

² DU = Dwelling Unit

Table 2 shows the total estimated trip generation for the project.

Table 2
Project Trip Generation

Land Use	Quantity	Units ²	Peak Hour						ADT
			AM			PM			
			In	Out	Total	In	Out	Total	
Single Family Attached Housing	52	DU	8	17	25	17	13	30	374

¹ Source: 2021 ITE Trip Generation Manual (11th Edition)

² DU = Dwelling Unit

As shown in Table 2, based on the ITE trip generation rates, the proposed project is forecast to generate approximately 374 daily trips with 25 trips in the AM peak hour and 30 trips in the PM peak hour.

As stated in the *City of Orange Traffic Impact Analysis Guidelines for Vehicle Miles Traveled and Level of Service Assessment*, dated July 2020, a traffic impact analysis (i.e. detailed LOS analyses) would be required if the project is expected to generate 51 or more peak hour trips. Based on the project trip generation (i.e. 374 daily trips, 25 AM peak hour trips, and 30 PM peak hour trips), the proposed project is not required to prepare a traffic impact analysis and is not expected to result in any significant adverse impacts on the operations of the roadway network and intersections.

Conclusion

RK Engineering Group, Inc. has completed this Trip Generation Analysis for the proposed 901 E. Katella Avenue In-Fill Residential Project (TTM 19253).

As stated in the *City of Orange Traffic Impact Analysis Guidelines for Vehicle Miles Traveled and Level of Service Assessment*, dated July 2020, a traffic impact analysis (i.e. detailed LOS analyses) would be required if the project is expected to generate 51 or more peak hour trips. Based on the project trip generation (i.e. 374 daily trips, 25 AM peak hour trips, and 30 PM peak hour trips), the proposed project is not required to prepare a traffic impact analysis and is not expected to result in any significant adverse impacts on the operations of the roadway network and intersections.

CARLSON STRATEGIC LAND SOLUTIONS

RK17680

Page 4

RK Engineering Group, Inc. appreciates this opportunity to work with the CARLSON STRATEGIC LAND SOLUTIONS on this project. If you have any questions regarding this study, please do not hesitate to contact us at (949) 474-0809.

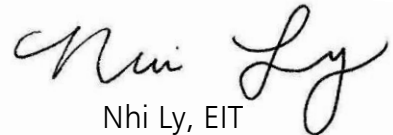
Sincerely,

RK ENGINEERING GROUP, INC.



Justin Tucker, P.E.

Principal Engineer



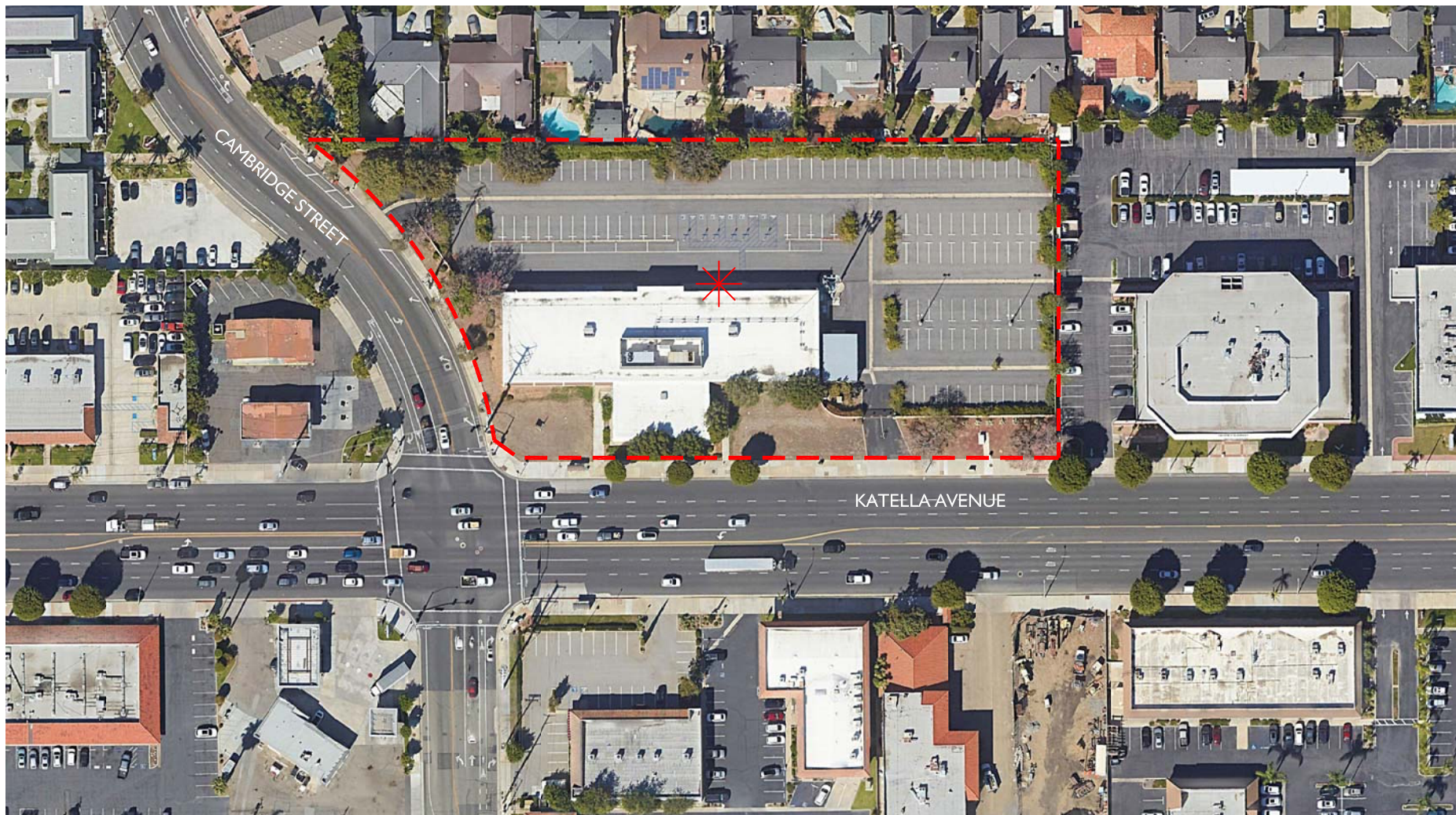
Nhi Ly, EIT

Engineer I

Attachments:



Exhibits



Legend:

--- = Project Site Boundary

* = Project Site



Exhibit B

Site Plan

